



---

## APPENDIX B

---

## **Appendix B.1**

---

# **CULTURAL RESOURCES INFORMATION**

# Historic Properties Listed or Eligible

| STATE                | RESOURCE NAME                 | ALPHA-NUMERIC CODE   | NATIONAL REGISTER CRITERIA |
|----------------------|-------------------------------|----------------------|----------------------------|
| Indiana<br>Downtown  | <i>Old Jeffersonville HD:</i> | ID-HC-5              | A and C                    |
|                      | <i>Grisamore House</i>        | ID-HC-56010          | C                          |
|                      | City School                   | ID-HC-61048          | A and C                    |
|                      | Train Depot                   | ID-HC-61007          | A and C                    |
|                      | Colgate-Palmolive HD          | ID-HC-63001-63009    | A and C                    |
|                      | Ohio Falls Car ... HD         | ID-HC-64001-64024    | A and C                    |
|                      | Big Four RR Bridge            | ID-HC-55024          | A                          |
|                      | Penn RR Bridge                | ID-HC-55022          | A                          |
|                      | G. R. Clark Bridge            | ID-HC-55023          | A and C                    |
|                      | House, 519 Riverside Drive    | ID-HC-65029          | C                          |
|                      | House, 527 Riverside Drive    | ID-HC-65030          | C                          |
| Indiana East<br>End  | Swartz Rural Ag. HD           | IE-HC-45026/26A/27   | A and C                    |
|                      | Fry House                     | IE-HC-45030          | A and C                    |
|                      | James A. Smith Farm           | IE-HC-45024          | A and D                    |
|                      | Federal Style House           | IE-HC-45031          | A                          |
|                      | Prather Farm                  | IE-HC-45029          | A and C                    |
|                      | Dellinger Farm                | IE-HC-55005B         | A                          |
|                      | Woods House                   | IE-HC-45035          | A and C                    |
|                      | Farmhouse                     | IE-HC-55012B         | C                          |
|                      | John Hoffman House            | IE-HC-55012          | C                          |
|                      | Moss Family House             | IE-HC-55010          | C                          |
|                      | House                         | IE-HC-55009          | C                          |
|                      | House                         | IE-HC-55008A         | C                          |
|                      | Farmstead                     | IE-HC-45033          | A and C                    |
|                      | Utica Cemetery*               | IE-HC-46001          | A                          |
|                      | Utica M/E Church*             | IE-HC-46007          | A and C                    |
|                      | Howes Farm*                   | IE-HC-46008          | A and C                    |
|                      | House*                        | IE-HC-46011E         | C                          |
|                      | Utica Christ Chapel*          | IE-HC-46016          | C                          |
|                      | House*                        | IE-HC-46015          | C                          |
|                      | William Brindle House*        | IE-HC-46012          | C                          |
|                      | House*                        | IE-HC-46014          | C                          |
|                      | Utica Lime Industry:*         | IE-HC-48001          | A and D                    |
|                      |                               | IE-HC-48002-48003    | A and D                    |
|                      |                               | IE-HC-48004          | A and D                    |
|                      | Lentz Cemetery*               | IE-HC-45022          | A                          |
|                      | Lentz Heirs Cemetery*         | IE-HC-45022A         | A                          |
|                      | Central Utica HD*             | IE-HC-47001/47020    | A and C                    |
|                      | WPA Sea Wall                  | IE-HC-46018          | A                          |
|                      | Ranney Wells HD               | IE-HC-XXXXX          | A and C                    |
|                      | INAAP Igloo Strg. HD          | IE-HC-XXXXX          | A                          |
|                      | House                         | IE-HC-46013          | C                          |
| Kentucky<br>Downtown | Brown Tobacco WH              | KD-HC-JFWP139        | C                          |
|                      | Snead Manufacturing           | KD-HC-JFCD107        | C                          |
|                      | West Main Street HD           | KD-HC-107            | A and C                    |
|                      | Phoenix Hill HD               | KD-HC-5              | A and C                    |
|                      | Butchertown HD                | KD-HC-4              | A and C                    |
|                      | <i>W. Main/10th Mnuf HD:</i>  | <i>KD-HC-XXXXX</i>   | A                          |
|                      | <i>New Enterprise Tobacco</i> | <i>KD-HC-JFWP134</i> | C                          |
|                      | <i>Tobacco Realty Co.</i>     | <i>KD-HC-JFWP137</i> | C                          |
|                      | Givens Headley Tobacco        | JD-HC-JFWP144        | A and C                    |
|                      | Conrad-Rawls Shoe Co.         | KD-HC-XXXXX          | A and C                    |
|                      | E. J. O'Brien Office          | KD-HC-JFWP142        | C                          |
|                      | Pennsylvania Lines Depot      | KD-HC-XXXXX          | A and C                    |
|                      | Peaslee-Gaulbert Paint HD     | KD-HC-XXXXX          | A                          |
|                      | Belle of Louisville           | KD-HC-JFCD218        | C                          |
|                      | Mayor Andrew Broadbuss        | KD-HC-JFCD252        | C                          |
|                      | Louisville Medical College    | KD-HC-JFCD159        | A and C                    |
|                      | Theodore Ahrens Trade HS      | KD-HC-XXXXX          | A and C                    |

# Historic Properties Listed or Eligible

| STATE                | RESOURCE NAME                 | ALPHA-NUMERIC CODE | NATIONAL REGISTER CRITERIA |
|----------------------|-------------------------------|--------------------|----------------------------|
| Kentucky East<br>End | Determan House                | KE-HC-JF843        | A                          |
|                      | Schildknecht House            | KE-HC-JF841        | A                          |
|                      | Rosewell                      | KE-HC-JF452        | C                          |
|                      | Bellevue                      | KE-HC-JF453        | A                          |
|                      | Country Estates HD:           | KE-HC-1            | A and C                    |
|                      | Ashbourne                     | KE-HC-JF570        | C                          |
|                      | Bingham-Hilliard              | KE-HC-JF557        | C                          |
|                      | R C Ballard School            | KE-HC-JF555        | C                          |
|                      | Shwab House                   | KE-HC-JF545        | C                          |
|                      | Rockledge                     | KE-HC-JF544        | C                          |
|                      | Winkworth                     | KE-HC-JF533        | C                          |
|                      | Ladless Hill                  | KE-HC-JF532        | C                          |
|                      | J. Chrisler House             | KE-HC-JF457        | C                          |
|                      | Lyncliffe                     | KE-HC-JF531        | C                          |
|                      | Blankenbaker Station          | KE-HC-JF658        | C                          |
|                      | Harrods Creek HD              | KE-HC-XXXXXX       | C                          |
|                      | Glenview HD                   | KE-HC-XXXXXX       | C                          |
|                      | Nitta Yuma HD                 | KE-HC-XXXXXX       | C                          |
|                      | Drumanard Ests HD             | KE-HC-XXXXXX       | C                          |
|                      | Bruce House                   | KE-HC-8            | C                          |
|                      | Crowfoot                      | KE-HC-9            | C                          |
|                      | Fincastle                     | KE-HC-JF918        | C                          |
|                      | Merriwether House             | KE-HC-JF690        | A                          |
|                      | Allison-Barrickman            | KE-HC-JF563        | C                          |
|                      | Juniper Beach HD              | KE-HC-7            | A                          |
|                      | Dogwood Hill                  | KE-HC-JF772        | C                          |
|                      | St. Francis in the Fields     | KE-HC-10           | A                          |
|                      | Croghan-Blankenbaker          | KE-HC-JF458/530    | C                          |
|                      | Midlands                      | KE-HC-JF671        | C                          |
|                      | James T. Taylor House         | KE-HC-XXXXXX       | A                          |
|                      | Alice Speed Stoll House       | KE-HC-XXXXXX       | A                          |
|                      | Upper Rvr. Rd. Bridge         | KE-HC-XXXXXX       | C                          |
|                      | Harrods Ck. Village HD        | KE-HC-XXXXXX       | C                          |
|                      | Green Castle Baptist          | KE-HC-XXXXXX       | A                          |
|                      | Prospect Store                | KE-HC-XXXXXX       | A                          |
|                      | Sutherland Farm               | KE-HC-JF447        | C                          |
|                      | Shirley/Baass House           | KE-HC-XXXXXX       | B and C                    |
|                      | James T. Taylor Subdiv HD     | KE-HC-XXXXXX       | A                          |
|                      | Jacob School Rd. HD           | KE-HC-XXXXXX       | A                          |
|                      | Jefferson Jacob School        | KE-HC-XXXXXX       | A and C                    |
|                      | Bennett/Griesbaum/Lang        | KE-HC-XXXXXX       | C                          |
|                      | J. C. Metcale House           | KE-HC-XXXXXX       | C                          |
|                      | Gaffney House                 | KE-HC-JF677        | C                          |
|                      | Edgewater Garden              | KE-HC-JF802        | A and C                    |
|                      | Louisville Wtr. Co. Pump Sta. | KE-HC-XXXXXX       | C                          |
|                      | Upper Rvr. Rd. HD             | KE-HC-XXXXXX       | B and C                    |
|                      | Rvr. Hill/Stonebridge HD      | KE-HC-XXXXXX       | C                          |
|                      | John C. Doolan House          | KE-HC-XXXXXX       | B                          |
|                      | McFerran House                | KE-HC-XXXXXX       | C                          |
|                      | J. E. Skinner House           | KE-HC-JE581        | C                          |
|                      | T. G. Peyton                  | KE-HC-XXXXXX       | C                          |
|                      | Cedarbrook Farm               | KE-HC-JF559        | A                          |
|                      | Old Upper Rvr. Rd. Bridge     | KE-HC-JF786        | C                          |
|                      | Addison W. Lee House          | KE-HC-XXXXXX       | B                          |
|                      | Horner House                  | KE-HC-XXXXXX       | C                          |

\* Indicates resources contained on the Multiple Property Listing of Utica Township

## **Appendix B.2**

---

# **NOISE ANALYSIS INFORMATION**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A2</b> |                          |                                                                                                |                                 |              |
|--------------------------------------------------------------------------------------------------------------------------------------|--------------------------|------------------------------------------------------------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                               | <b>Land Use Category</b> | <b>Description</b>                                                                             | <b>Representative Receptors</b> | <b>Total</b> |
| 1                                                                                                                                    | B                        | Residential<br>38.7 m (455.1 ft) north of A2                                                   | 4                               | 5            |
| 2                                                                                                                                    | B                        | Residential<br>149.8 m (491.5 ft) east of A2                                                   | 7                               | 8            |
| 3                                                                                                                                    | B                        | Residential<br>102.7 m (336.9 ft) west of A2                                                   | 2                               | 3            |
| 4                                                                                                                                    | B                        | Residential<br>132.4 m (434.4 ft) west of A2                                                   | 10                              | 11           |
| 5                                                                                                                                    | B                        | Residential<br>102.7 m (336.9 ft) north of A2                                                  | 18                              | 19           |
| 6                                                                                                                                    | B                        | Residential<br>131.7 m (432.1 ft) south of A2                                                  | 32                              | 33           |
| 7 / 8                                                                                                                                | B                        | Residential<br>94.2 m (303.2 ft) south of A2<br>Residential<br>114.0 m (374.0 ft) south of A2  | 13                              | 15           |
| 10                                                                                                                                   | B                        | Residential<br>132.3 m (434.1 ft) south of A2                                                  | 5                               | 6            |
| 21                                                                                                                                   | B                        | Residential<br>126.2 m (414.0 ft) south of A2                                                  | 14                              | 15           |
| 22                                                                                                                                   | B                        | Residential<br>139.4 m (457.3 ft) south of A2                                                  | 25                              | 26           |
| 86                                                                                                                                   | B                        | Residential<br>92.1 m (302.2 ft) south of A2                                                   | 2                               | 3            |
| 90                                                                                                                                   | B                        | Residential<br>114.0 m (374.0 ft) south of A2                                                  | 5                               | 6            |
| 91                                                                                                                                   | B                        | Residential<br>98.9 m (324.5 ft) south of A2                                                   | 0                               | 1            |
| 93 / 94                                                                                                                              | B                        | Residential<br>149.6 m (490.8 ft) south of A2<br>Residential<br>148.7 m (487.9 ft) south of A2 | 19                              | 21           |
| 120                                                                                                                                  | B                        | Residential<br>147.0 m (324.5 ft) south of A2                                                  | 17                              | 18           |
| 121                                                                                                                                  | B                        | Residential<br>133.2 m (324.5 ft) south of A2                                                  | 15                              | 16           |
| 122                                                                                                                                  | B                        | Residential<br>99.9 m (324.5 ft) north of A2                                                   | 0                               | 1            |
| 123                                                                                                                                  | B                        | Residential<br>163.3 m (324.5 ft) north of A2                                                  | 14                              | 15           |
| 124                                                                                                                                  | B                        | Residential<br>225.7 m (324.5 ft) north of A2                                                  | 3                               | 4            |

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A9</b> |                          |                                                                                                                                               |                                 |              |
|--------------------------------------------------------------------------------------------------------------------------------------|--------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                               | <b>Land Use Category</b> | <b>Description</b>                                                                                                                            | <b>Representative Receptors</b> | <b>Total</b> |
| 1                                                                                                                                    | B                        | Residential<br>112.8 m (370.1 ft) north of A9                                                                                                 | 1                               | 2            |
| 21                                                                                                                                   | B                        | Residential<br>95.9 m (313.0 ft) south of A9                                                                                                  | 0                               | 1            |
| 22 / 23                                                                                                                              | B                        | Residential<br>69.3 m (227.4 ft) south of A9<br>Residential<br>103.5 m (2339.6 ft) south of A9                                                | 36                              | 38           |
| 24 / 25                                                                                                                              | B                        | Residential<br>31.4 m (103.0 ft) south of A9<br>Residential<br>95.9 m (314.6 ft) south of A9                                                  | 40                              | 42           |
| 26 / 27                                                                                                                              | B                        | Residential<br>118.6 m (389.1 ft) north of A9<br>Residential<br>99.6 m (326.8 ft) north of A9                                                 | 6                               | 8            |
| 28 / 29 / 30                                                                                                                         | B                        | Residential<br>76.5 m (251.0 ft) north of A9<br>Residential<br>42.2 m (138.5 ft) north of A9<br>Residential<br>37.7 m (123.7 ft) north of A9  | 19                              | 22           |
| 31 / 32 / 33                                                                                                                         | B                        | Residential<br>134.5 m (441.3 ft) north of A9<br>Residential<br>80.1 m (262.8 ft) north of A9<br>Residential<br>52.3 m (171.6 ft) north of A9 | 43                              | 46           |
| 41                                                                                                                                   | B                        | Residential<br>83.6 m (274.3 ft) south of A9                                                                                                  | 23                              | 24           |
| 42 / 43                                                                                                                              | B                        | Residential<br>52.5 m (172.2 ft) south of A9<br>Residential<br>115.3 m (378.3 ft) south of A9                                                 | 48                              | 50           |
| 44                                                                                                                                   | B                        | Residential<br>142.1 m (466.2 ft) north of A9                                                                                                 | 6                               | 7            |
| 47                                                                                                                                   | B                        | Residential<br>62.2 m (204.1 ft) north of A9                                                                                                  | 4                               | 5            |
| 48 / 49                                                                                                                              | B                        | Residential<br>83.2m (273.0 ft) north of A9<br>Residential<br>49.0 m (160.8 ft) north of A9                                                   | 8                               | 10           |
| 50 / 51                                                                                                                              | B                        | Residential<br>94.7 m (310.7 ft) south of A9<br>Residential<br>135.7 m (445.2 ft) south of A9                                                 | 22                              | 24           |

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A9</b> |                          |                                                                                               |                                 |              |
|--------------------------------------------------------------------------------------------------------------------------------------|--------------------------|-----------------------------------------------------------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                               | <b>Land Use Category</b> | <b>Description</b>                                                                            | <b>Representative Receptors</b> | <b>Total</b> |
| 47                                                                                                                                   | B                        | Residential<br>62.2 m (204.1 ft) north of A9                                                  | 4                               | 5            |
| 48 / 49                                                                                                                              | B                        | Residential<br>83.2m (273.0 ft) north of A9<br>Residential<br>49.0 m (160.8 ft) north of A9   | 8                               | 10           |
| 50 / 51                                                                                                                              | B                        | Residential<br>94.7 m (310.7 ft) south of A9<br>Residential<br>135.7 m (445.2 ft) south of A9 | 22                              | 24           |
| 88 / 89                                                                                                                              | B                        | Residential<br>88.8 m (291.3 ft) south of A9<br>Residential<br>131.0 m (429.8 ft) south of A9 | 12                              | 14           |
| 91                                                                                                                                   | B                        | Residential<br>83.0 m (272.3 ft) south of A9                                                  | 0                               | 1            |
| 98                                                                                                                                   | C                        | Commercial<br>119.0 m (390.4 ft) south of A9                                                  | 2                               | 3            |
| 99                                                                                                                                   | B                        | Residential<br>112.0 m (367.5 ft) north of A9                                                 | 9                               | 10           |
| 100                                                                                                                                  | B                        | Residential<br>80.2 m (263.1 ft) north of A9                                                  | 18                              | 19           |
| 120                                                                                                                                  | B                        | Residential<br>87.7 m (287.7 ft) south of A9                                                  | 17                              | 18           |
| 122                                                                                                                                  | B                        | Residential<br>443.3 m (1454.4 ft) north of A9                                                | 0                               | 1            |
| 123                                                                                                                                  | B                        | Residential<br>722.9 m (2371.7 ft) north of A9                                                | 14                              | 15           |
| 124                                                                                                                                  | B                        | Residential<br>749.8 m (2460.0 ft) north of A9                                                | 3                               | 4            |

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A13a (Partial<br/>Interchange at U.S. 42)</b> |                                  |                                                                                                                                                     |                                     |              |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                  | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                                                                                                                  | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 1                                                                                                                                                                           | B                                | Residential<br>112.8 m (370.1 ft) north of A13a                                                                                                     | 2                                   | 3            |
| 12                                                                                                                                                                          | B                                | Residential<br>64.6 m (211.9 ft) north of A13a                                                                                                      | 4                                   | 5            |
| 21                                                                                                                                                                          | B                                | Residential<br>95.3 m (312.7 ft) south of A13a                                                                                                      | 13                                  | 14           |
| 22 / 23                                                                                                                                                                     | B                                | Residential<br>75.3 m (247.0 ft) south of A13a<br>Residential<br>107.8 m (353.7 ft) south of A13a                                                   | 42                                  | 44           |
| 24 / 25                                                                                                                                                                     | B                                | Residential<br>41.4 m (135.8 ft) south of A13a<br>Residential<br>103.6 m (339.9 ft) south of A13a                                                   | 52                                  | 54           |
| 26 / 27                                                                                                                                                                     | B                                | Residential<br>133.3 m (437.3 ft) north of A13a<br>Residential<br>113.6 m (372.7 ft) north of A13a                                                  | 8                                   | 10           |
| 28 / 29 / 30                                                                                                                                                                | B                                | Residential<br>77.1 m (253.0 ft) north of A13a<br>Residential<br>48.6 m (159.4 ft) north of A13a<br>Residential<br>45.0 m (147.6 ft) south of A13a  | 22                                  | 25           |
| 31 / 32 / 33                                                                                                                                                                | B                                | Residential<br>132.3 m (434.1 ft) north of A13a<br>Residential<br>79.9 m (262.1 ft) north of A13a<br>Residential<br>49.3 m (161.7 ft) north of A13a | 52                                  | 55           |
| 36 / 37                                                                                                                                                                     | B                                | Residential<br>123.8 m (406.2 ft) north of A13a<br>Residential<br>90.9 m (298.2 ft) north of A13a                                                   | 14                                  | 16           |
| 38                                                                                                                                                                          | B                                | Residential<br>74.0 m (242.8 ft) north of A13a                                                                                                      | 15                                  | 16           |

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A13a (Partial<br/>Interchange at U.S. 42)</b> |                                  |                                                                                                    |                                     |              |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|----------------------------------------------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                  | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                                                                 | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 39 / 40                                                                                                                                                                     | B                                | Residential<br>106.4 m (349.1 ft) north of A13a<br>Residential<br>38.0 m (124.7 ft) north of A13a  | 25                                  | 27           |
| 41                                                                                                                                                                          | B                                | Residential<br>78.1 m (256.2 ft) south of A13a                                                     | 56                                  | 57           |
| 44                                                                                                                                                                          | B                                | Residential<br>114.9 m (377.0 ft) south of A13a                                                    | 9                                   | 10           |
| 81 / 82                                                                                                                                                                     | B                                | Residential<br>89.6 m (294.0 ft) north of A13a<br>Residential<br>25.0 m (82.0 ft) north of A13a    | 20                                  | 22           |
| 83                                                                                                                                                                          | B                                | Residential<br>46.8 m (153.5 ft) north of A13a                                                     | 9                                   | 10           |
| 84                                                                                                                                                                          | B                                | Residential<br>109.4 m (358.9 ft) north of A13a                                                    | 10                                  | 11           |
| 86                                                                                                                                                                          | B                                | Residential<br>46.5 m (152.6 ft) north of A13a                                                     | 0                                   | 1            |
| 87                                                                                                                                                                          | B                                | Residential<br>128.2 m (420.6 ft) south of A13a                                                    | 2                                   | 3            |
| 90                                                                                                                                                                          | B                                | Residential<br>151.9 m (498.4 ft) north of A13a                                                    | 15                                  | 16           |
| 91                                                                                                                                                                          | B                                | Residential<br>33.1 m (108.6 ft) south of A13a                                                     | 0                                   | 1            |
| 93 / 94                                                                                                                                                                     | B                                | Residential<br>149.6 m (490.8 ft) south of A13a<br>Residential<br>126.3 m (414.4 ft) north of A13a | 19                                  | 21           |
| 120                                                                                                                                                                         | B                                | Residential<br>104.9 m (344.2 ft) south of A13a                                                    | 17                                  | 18           |
| 121                                                                                                                                                                         | B                                | Residential<br>71.7 m (235.2 ft) south of A13a                                                     | 15                                  | 16           |
| 122                                                                                                                                                                         | B                                | Residential<br>200.0 m (656.2 ft) north of A13a                                                    | 0                                   | 1            |
| 123                                                                                                                                                                         | B                                | Residential<br>281.4 m (923.2 ft) north of A13a                                                    | 14                                  | 15           |
| 124                                                                                                                                                                         | B                                | Residential<br>344.3 m (1129.6 ft) north of A13a                                                   | 3                                   | 4            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A13b (Full<br/>Interchange at Wolf Pen Branch Road)</b> |                                  |                                                                                                                                                     |                                     |              |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                            | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                                                                                                                  | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 1                                                                                                                                                                                     | B                                | Residential<br>112.8 m (370.1 ft) north of A13b                                                                                                     | 2                                   | 3            |
| 12                                                                                                                                                                                    | B                                | Residential<br>64.6 m (211.9 ft) north of A13b                                                                                                      | 4                                   | 5            |
| 21                                                                                                                                                                                    | B                                | Residential<br>95.3 m (312.7 ft) south of A13b                                                                                                      | 13                                  | 14           |
| 22 / 23                                                                                                                                                                               | B                                | Residential<br>75.3 m (247.0 ft) south of A13b<br>Residential<br>107.8 m (353.7 ft) south of A13b                                                   | 42                                  | 44           |
| 24 / 25                                                                                                                                                                               | B                                | Residential<br>41.4 m (135.8 ft) south of A13b<br>Residential<br>103.6 m (339.9 ft) south of A13b                                                   | 52                                  | 54           |
| 26 / 27                                                                                                                                                                               | B                                | Residential<br>117.3 m (384.8 ft) north of A13b<br>Residential<br>97.6 m (320.2 ft) north of A13b                                                   | 8                                   | 10           |
| 28 / 29 / 30                                                                                                                                                                          | B                                | Residential<br>72.9 m (239.2 ft) north of A13b<br>Residential<br>42.3 m (138.8 ft) north of A13b<br>Residential<br>36.3 m (119.1 ft) north of A13b  | 22                                  | 25           |
| 31 / 32 / 33                                                                                                                                                                          | B                                | Residential<br>132.3 m (434.1 ft) north of A13b<br>Residential<br>79.9 m (262.1 ft) north of A13b<br>Residential<br>49.3 m (161.7 ft) north of A13b | 52                                  | 55           |
| 36 / 37                                                                                                                                                                               | B                                | Residential<br>123.8 m (406.2 ft) north of A13b<br>Residential<br>90.9 m (298.2 ft) north of A13b                                                   | 14                                  | 16           |
| 38                                                                                                                                                                                    | B                                | Residential<br>74.0 m (242.8 ft) north of A13b                                                                                                      | 15                                  | 16           |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A13b (Full<br/>Interchange at Wolf Pen Branch Road)</b> |                                  |                                                                                                    |                                     |              |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|----------------------------------------------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                            | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                                                                 | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 39 / 40                                                                                                                                                                               | B                                | Residential<br>106.4 m (349.1 ft) north of A13b<br>Residential<br>149.8 m (491.5 ft) east of A13b  | 25                                  | 27           |
| 41                                                                                                                                                                                    | B                                | Residential<br>91.9 m (301.5 ft) south of A13b                                                     | 56                                  | 57           |
| 44                                                                                                                                                                                    | B                                | Residential<br>41.3 m (135.5 ft) south of A13b                                                     | 9                                   | 10           |
| 81 / 82                                                                                                                                                                               | B                                | Residential<br>101.5 m (333.0 ft) north of A13b<br>Residential<br>25.0 m (82.0 ft) north of A13b   | 20                                  | 22           |
| 83                                                                                                                                                                                    | B                                | Residential<br>46.8 m (153.5 ft) north of A13b                                                     | 9                                   | 10           |
| 84                                                                                                                                                                                    | B                                | Residential<br>109.4 m (358.9 ft) north of A13b                                                    | 10                                  | 11           |
| 86                                                                                                                                                                                    | B                                | Residential<br>46.5 m (152.6 ft) north of A13b                                                     | 0                                   | 1            |
| 87                                                                                                                                                                                    | B                                | Residential<br>128.2 m (420.6 ft) south of A13b                                                    | 2                                   | 3            |
| 90                                                                                                                                                                                    | B                                | Residential<br>151.9 m (498.4 ft) north of A13b                                                    | 15                                  | 16           |
| 91                                                                                                                                                                                    | B                                | Residential<br>33.1 m (108.6 ft) south of A13b                                                     | 0                                   | 1            |
| 93 / 94                                                                                                                                                                               | B                                | Residential<br>149.6 m (490.8 ft) south of A13b<br>Residential<br>126.3 m (414.4 ft) north of A13b | 19                                  | 21           |
| 120                                                                                                                                                                                   | B                                | Residential<br>104.9 m (344.2 ft) south of A13b                                                    | 17                                  | 18           |
| 121                                                                                                                                                                                   | B                                | Residential<br>71.7 m (235.2 ft) south of A13b                                                     | 15                                  | 16           |
| 122                                                                                                                                                                                   | B                                | Residential<br>200.0 m (656.2 ft) north of A13b                                                    | 0                                   | 1            |
| 123                                                                                                                                                                                   | B                                | Residential<br>281.4 m (923.2 ft) north of A13b                                                    | 14                                  | 15           |
| 124                                                                                                                                                                                   | B                                | Residential<br>344.3 m (1129.6 ft) north of A13b                                                   | 3                                   | 4            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A15a (Partial<br/>Interchange at U.S. 42)</b> |                                  |                                                                                                                                                     |                                     |              |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                  | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                                                                                                                  | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 1                                                                                                                                                                           | B                                | Residential<br>112.8 m (370.1 ft) north of A15a                                                                                                     | 2                                   | 3            |
| 11                                                                                                                                                                          | B                                | Residential<br>52.9 m (173.6 ft) east of A15a                                                                                                       | 3                                   | 4            |
| 12                                                                                                                                                                          | B                                | Residential<br>102.1 m (335.0 ft) south of A15a                                                                                                     | 6                                   | 7            |
| 13                                                                                                                                                                          | B                                | Residential<br>116.8 m (383.2 ft) east of A15a                                                                                                      | 1                                   | 2            |
| 21                                                                                                                                                                          | B                                | Residential<br>95.3 m (312.7 ft) south of A15a                                                                                                      | 13                                  | 14           |
| 22 / 23                                                                                                                                                                     | B                                | Residential<br>75.3 m (247.0 ft) south of A15a<br>Residential<br>107.8 m (353.7 ft) south of A15a                                                   | 42                                  | 44           |
| 24 / 25                                                                                                                                                                     | B                                | Residential<br>41.4 m (135.8 ft) south of A15a<br>Residential<br>103.6 m (339.9 ft) south of A15a                                                   | 52                                  | 54           |
| 26 / 27                                                                                                                                                                     | B                                | Residential<br>133.3 m (437.3 ft) north of A15a<br>Residential<br>113.6 m (372.7 ft) north of A15a                                                  | 8                                   | 10           |
| 28 / 29 / 30                                                                                                                                                                | B                                | Residential<br>77.1 m (253.0 ft) north of A15a<br>Residential<br>48.6 m (159.4 ft) north of A15a<br>Residential<br>45.0 m (147.6 ft) north of A15a  | 22                                  | 25           |
| 31 / 32 / 33                                                                                                                                                                | B                                | Residential<br>132.3 m (434.1 ft) north of A15a<br>Residential<br>79.9 m (262.1 ft) north of A15a<br>Residential<br>49.3 m (161.7 ft) north of A15a | 52                                  | 55           |
| 36 / 37                                                                                                                                                                     | B                                | Residential<br>141.6 m (464.6 ft) northeast of A15a<br>Residential<br>101.4 m (332.7 ft) northeast of A15a                                          | 14                                  | 16           |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A15a (Partial<br/>Interchange at U.S. 42)</b> |                                  |                                                                                                           |                                     |              |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|-----------------------------------------------------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                  | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                                                                        | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 38                                                                                                                                                                          | B                                | Residential<br>74.7 m (245.1 ft) south of A15a                                                            | 15                                  | 16           |
| 39 / 40                                                                                                                                                                     | B                                | Residential<br>133.6 m (438.3 ft) northeast of A15a<br>Residential<br>63.8 m (209.3 ft) northeast of A15a | 26                                  | 28           |
| 41                                                                                                                                                                          | B                                | Residential<br>78.1 m (256.2 ft) south of A15a                                                            | 56                                  | 57           |
| 44                                                                                                                                                                          | B                                | Residential<br>114.9 m (377.0 ft) south of A15a                                                           | 9                                   | 10           |
| 80                                                                                                                                                                          | B                                | Residential<br>105.0 m (344.5 ft) south of A15a                                                           | 0                                   | 1            |
| 85                                                                                                                                                                          | B                                | Farmland<br>81.8 m (268.4 ft) north of A15a                                                               | 0                                   | 1            |
| 86                                                                                                                                                                          | B                                | Residential<br>27.8 m (91.2 ft) south of A15a                                                             | 3                                   | 4            |
| 90                                                                                                                                                                          | B                                | Residential<br>111.1 m (364.5 ft) north of A15a                                                           | 6                                   | 7            |
| 91                                                                                                                                                                          | B                                | Residential<br>38.3 m (125.7 ft) south of A15a                                                            | 0                                   | 1            |
| 93 / 94                                                                                                                                                                     | B                                | Residential<br>149.6 m (490.8 ft) south of A15a<br>Residential<br>127.2 m (417.3 ft) north of A15a        | 19                                  | 21           |
| 120                                                                                                                                                                         | B                                | Residential<br>115.8 m (379.9 ft) south of A15a                                                           | 17                                  | 18           |
| 121                                                                                                                                                                         | B                                | Residential<br>103.0 m (337.9 ft) south of A15a                                                           | 15                                  | 16           |
| 122                                                                                                                                                                         | B                                | Residential<br>98.0 m (321.5 ft) north of A15a                                                            | 0                                   | 1            |
| 123                                                                                                                                                                         | B                                | Residential<br>119.7 m (392.7 ft) north of A15a                                                           | 14                                  | 15           |
| 124                                                                                                                                                                         | B                                | Residential<br>183.8 m (603.0 ft) north of A15a                                                           | 3                                   | 4            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A15b (Full<br/>Interchange at Wolf Pen Branch Road)</b> |                                  |                                                                                                                                                     |                                     |              |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                            | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                                                                                                                  | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 1                                                                                                                                                                                     | B                                | Residential<br>112.8 m (370.1 ft) north of A15b                                                                                                     | 2                                   | 3            |
| 11                                                                                                                                                                                    | B                                | Residential<br>52.9 m (173.6 ft) east of A15b                                                                                                       | 3                                   | 4            |
| 12                                                                                                                                                                                    | B                                | Residential<br>102.1 m (335.0 ft) south of A15b                                                                                                     | 6                                   | 7            |
| 13                                                                                                                                                                                    | B                                | Residential<br>116.8 m (383.2 ft) east of A15b                                                                                                      | 1                                   | 2            |
| 21                                                                                                                                                                                    | B                                | Residential<br>95.3 m (312.7 ft) south of A15b                                                                                                      | 13                                  | 14           |
| 22 / 23                                                                                                                                                                               | B                                | Residential<br>75.3 m (247.0 ft) south of A15b<br>Residential<br>107.8 m (353.7 ft) south of A15b                                                   | 42                                  | 44           |
| 24 / 25                                                                                                                                                                               | B                                | Residential<br>41.4 m (135.8 ft) south of A15b<br>Residential<br>103.6 m (339.9 ft) south of A15b                                                   | 52                                  | 54           |
| 26 / 27                                                                                                                                                                               | B                                | Residential<br>133.3 m (437.3 ft) north of A15b<br>Residential<br>113.6 m (372.7 ft) north of A15b                                                  | 8                                   | 10           |
| 28 / 29 / 30                                                                                                                                                                          | B                                | Residential<br>77.1 m (253.0 ft) north of A15b<br>Residential<br>48.6 m (159.4 ft) north of A15b<br>Residential<br>45.0 m (147.6 ft) north of A15b  | 22                                  | 25           |
| 31 / 32 / 33                                                                                                                                                                          | B                                | Residential<br>132.3 m (434.1 ft) north of A15b<br>Residential<br>79.9 m (262.1 ft) north of A15b<br>Residential<br>49.3 m (161.7 ft) north of A15b | 52                                  | 55           |
| 36 / 37                                                                                                                                                                               | B                                | Residential<br>141.6 m (464.6 ft) northeast of A15b<br>Residential<br>101.4 m (332.7 ft) northeast of A15b                                          | 14                                  | 16           |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A15b (Full Interchange at Wolf Pen Branch Road)</b> |                          |                                                                                                           |                                 |              |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|-----------------------------------------------------------------------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                                                                            | <b>Land Use Category</b> | <b>Description</b>                                                                                        | <b>Representative Receptors</b> | <b>Total</b> |
| 38                                                                                                                                                                                | B                        | Residential<br>74.7 m (245.1 ft) south of A15b                                                            | 15                              | 16           |
| 39 / 40                                                                                                                                                                           | B                        | Residential<br>133.6 m (438.3 ft) northeast of A15b<br>Residential<br>63.8 m (209.3 ft) northeast of A15b | 26                              | 28           |
| 41                                                                                                                                                                                | B                        | Residential<br>78.1 m (256.2 ft) south of A15b                                                            | 56                              | 57           |
| 44                                                                                                                                                                                | B                        | Residential<br>114.9 m (377.0 ft) south of A15b                                                           | 9                               | 10           |
| 80                                                                                                                                                                                | B                        | Residential<br>105.0 m (344.5 ft) south of A15b                                                           | 0                               | 1            |
| 85                                                                                                                                                                                | B                        | Farmland<br>81.8 m (268.4 ft) north of A15b                                                               | 0                               | 1            |
| 86                                                                                                                                                                                | B                        | Residential<br>27.8 m (91.2 ft) south of A15b                                                             | 3                               | 4            |
| 90                                                                                                                                                                                | B                        | Residential<br>111.1 m (364.5 ft) north of A15b                                                           | 6                               | 7            |
| 91                                                                                                                                                                                | B                        | Residential<br>38.3 m (125.7 ft) south of A15b                                                            | 0                               | 1            |
| 93 / 94                                                                                                                                                                           | B                        | Residential<br>149.6 m (490.8 ft) south of A15b<br>Residential<br>127.2 m (417.3 ft) north of A15b        | 19                              | 21           |
| 120                                                                                                                                                                               | B                        | Residential<br>115.8 m (379.9 ft) south of A15b                                                           | 17                              | 18           |
| 121                                                                                                                                                                               | B                        | Residential<br>103.0 m (337.9 ft) south of A15b                                                           | 15                              | 16           |
| 122                                                                                                                                                                               | B                        | Residential<br>98.0 m (321.5 ft) north of A15b                                                            | 0                               | 1            |
| 123                                                                                                                                                                               | B                        | Residential<br>119.7 m (392.7 ft) north of A15b                                                           | 14                              | 15           |
| 124                                                                                                                                                                               | B                        | Residential<br>183.8 m (603.0 ft) north of A15b                                                           | 3                               | 4            |

**LOUISVILLE – SOUTHERN INDIANA  
OHIO RIVER BRIDGES PROJECT  
Identification of Noise Receptors Along Alternative A16**

| <b>Receptor Number</b> | <b>Land Use Category</b> | <b>Description</b>                             | <b>Representative Receptors</b> | <b>Total</b> |
|------------------------|--------------------------|------------------------------------------------|---------------------------------|--------------|
| 1                      | B                        | Residential<br>112.8 m (370.1 ft) north of A16 | 5                               | 6            |
| 2                      | B                        | Residential<br>130.5 m (428.1 ft) east of A16  | 5                               | 6            |
| 3                      | B                        | Residential<br>97.1 m (318.6 ft) west of A16   | 0                               | 1            |
| 11                     | B                        | Residential<br>58.7 m (192.6 ft) west of A16   | 6                               | 7            |
| 14                     | B                        | Residential<br>151.9 m (498.4 ft) north of A16 | 18                              | 19           |
| 15                     | B                        | Residential<br>118.7 m (389.4 ft) south of A16 | 3                               | 4            |
| 16                     | B                        | Residential<br>54.4 m (178.8 ft) south of A16  | 4                               | 5            |
| 19                     | B                        | Residential<br>67.2 m (220.5 ft) south of A16  | 1                               | 2            |
| 20                     | B                        | Residential<br>96.8 m (317.6 ft) south of A16  | 2                               | 3            |
| 21                     | B                        | Residential<br>100.5 m (329.7 ft) south of A16 | 25                              | 26           |
| 22                     | B                        | Residential<br>115.1 m (377.6 ft) south of A16 | 28                              | 29           |
| 24                     | B                        | Residential<br>69.6 m (228.3 ft) south of A16  | 3                               | 4            |
| 25                     | B                        | Residential<br>133.5 m (438.0 ft) south of A16 | 4                               | 5            |
| 26                     | B                        | Residential<br>140.6 m (461.3 ft) south of A16 | 1                               | 2            |
| 27                     | B                        | Residential<br>122.6 m (402.2 ft) south of A16 | 5                               | 6            |
| 34                     | B                        | Residential<br>46.6 m (152.9 ft) south of A16  | 4                               | 5            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative A16</b> |                          |                                                |                                 |              |
|---------------------------------------------------------------------------------------------------------------------------------------|--------------------------|------------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                                | <b>Land Use Category</b> | <b>Description</b>                             | <b>Representative Receptors</b> | <b>Total</b> |
| 35                                                                                                                                    | B                        | Residential<br>146.3 m (480.0 ft) south of A16 | 18                              | 19           |
| 85                                                                                                                                    | B                        | Residential<br>82.4 m (270.3 ft) north of A16  | 5                               | 6            |
| 86                                                                                                                                    | B                        | Residential<br>27.8 m (91.2 ft) south of A16   | 23                              | 24           |
| 90                                                                                                                                    | B                        | Residential<br>99.5 m (326.4 ft) west of A16   | 9                               | 10           |
| 91                                                                                                                                    | B                        | Residential<br>43.2 m (141.7 ft) west of A16   | 14                              | 15           |
| 13                                                                                                                                    | B                        | Residential<br>94.7 m (310.7 ft) north of A16  | 11                              | 12           |
| 18                                                                                                                                    | B                        | Residential<br>158.8 m (521.0 ft) west of A16  | 15                              | 16           |
| 80                                                                                                                                    | B                        | Residential<br>140.3 m (460.3 ft) south of A16 | 10                              | 11           |
| 93                                                                                                                                    | B                        | Residential<br>149.6 m (490.8 ft) south of A16 | 3                               | 4            |
| 94                                                                                                                                    | B                        | Residential<br>127.1m (417.0 ft) south of A16  | 3                               | 4            |
| 120                                                                                                                                   | B                        | Residential<br>125.5 m (411.7 ft) south of A16 | 17                              | 18           |
| 121                                                                                                                                   | B                        | Residential<br>113.7 m (373.0 ft) south of A16 | 15                              | 16           |
| 122                                                                                                                                   | B                        | Residential<br>80.7 m (264.8 ft) north of A16  | 0                               | 1            |
| 123                                                                                                                                   | B                        | Residential<br>91.6 m (300.5 ft) north of A16  | 14                              | 15           |
| 124                                                                                                                                   | B                        | Residential<br>156.6 m (513.8 ft) north of A16 | 3                               | 4            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative B1</b> |                          |                                                                                              |                                 |              |
|--------------------------------------------------------------------------------------------------------------------------------------|--------------------------|----------------------------------------------------------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                               | <b>Land Use Category</b> | <b>Description</b>                                                                           | <b>Representative Receptors</b> | <b>Total</b> |
| 53                                                                                                                                   | B                        | Residential<br>103.4 m (339.2 ft) south of B1                                                | 78                              | 79           |
| 54                                                                                                                                   | B                        | Residential<br>105.2 m (345.1 ft) north of B1                                                | 80                              | 81           |
| 55                                                                                                                                   | B                        | School<br>103.1 m (338.3 ft) south of B1                                                     | 56                              | 57           |
| 56                                                                                                                                   | B                        | Residential<br>37.6 m (123.4 ft) west of B1                                                  | 11                              | 12           |
| 57                                                                                                                                   | B                        | Residential<br>130.5 m (428.1 ft) west of B1                                                 | 52                              | 53           |
| 58                                                                                                                                   | B                        | Residential<br>56.1 m (184.1 ft) north of B1                                                 | 13                              | 14           |
| 59                                                                                                                                   | B                        | Residential<br>93.1 m (305.4 ft) west of B1                                                  | 22                              | 23           |
| 60                                                                                                                                   | B                        | Residential<br>48.8 m (160.1 ft) south of B1                                                 | 10                              | 11           |
| 61                                                                                                                                   | B                        | Residential<br>111.4 m (365.5 ft) south of B1                                                | 8                               | 9            |
| 62                                                                                                                                   | B                        | Residential<br>157.2 m (515.7 ft) south of B1                                                | 3                               | 4            |
| 63                                                                                                                                   | B                        | Residential<br>138.8 m (455.4 ft) south of B1                                                | 5                               | 6            |
| 95                                                                                                                                   | B                        | Residential<br>109.3 m (358.6 ft) west of B1                                                 | 2                               | 3            |
| 101                                                                                                                                  | B                        | Commercial<br>27.0 m (88.6 ft) west of B1                                                    | 5                               | 6            |
| 102                                                                                                                                  | B                        | Residential<br>83.1 m (272.6 ft) east of B1                                                  | 20                              | 21           |
| 103 / 104                                                                                                                            | B                        | Residential<br>122.2 m (400.9 ft) west of B1<br>Residential<br>144.7 m (474.7 ft) west of B1 | 79                              | 81           |
| 105                                                                                                                                  | B                        | Residential<br>102.3 m (335.6 ft) west of B1                                                 | 3                               | 4            |
| 106                                                                                                                                  | B                        | Residential<br>46.0 m (150.9 ft) east of B1                                                  | 4                               | 5            |
| 107                                                                                                                                  | B                        | Residential<br>93.2 m (273.0 ft) east of B1                                                  | 3                               | 4            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along the I-265 Interchange<br/>Reconfiguration</b> |                                  |                                                              |                                     |              |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|--------------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                      | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                           | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 93                                                                                                                                                              | B                                | Residential<br>167.1 m (548.2 ft) north of I-265 Interchange | 2                                   | 3            |
| 94                                                                                                                                                              | B                                | Residential<br>138.5 m (454.4 ft) north of I-265 Interchange | 1                                   | 2            |
| 96                                                                                                                                                              | B                                | Residential<br>135.9 m (445.9 ft) north of I-265 Interchange | 9                                   | 10           |
| 97                                                                                                                                                              | B                                | Residential<br>92.0 m (301.8 ft) east of I-265 Interchange   | 3                                   | 4            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative C1 With An In-Place Kennedy Interchange</b> |                          |                                                        |                                 |              |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|--------------------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                                                                    | <b>Land Use Category</b> | <b>Description</b>                                     | <b>Representative Receptors</b> | <b>Total</b> |
| 64                                                                                                                                                                        | C                        | Commercial<br>43.3 m (142.1 ft) south of C1 In-Place   | 7                               | 8            |
| 65                                                                                                                                                                        | B/C                      | Commercial<br>33.7 m (110.6 ft) north of C1 In-Place   | 4                               | 5            |
| 66                                                                                                                                                                        | C                        | Commercial<br>92.6 m (303.8 ft) south of C1 In-Place   | 4                               | 5            |
| 67                                                                                                                                                                        | B/C                      | Commercial<br>49.7 m (163.1 ft) west of C1 In-Place    | 3                               | 4            |
| 68                                                                                                                                                                        | C                        | Commercial<br>19.1 m (62.7 ft) west of C1 In-Place     | 7                               | 8            |
| 69                                                                                                                                                                        | C                        | Commercial<br>17.5 m (57.4 ft) north of C1 In-Place    | 2                               | 3            |
| 70                                                                                                                                                                        | C                        | Commercial<br>63.2 m (207.3 ft) west of C1 In-Place    | 3                               | 4            |
| 71                                                                                                                                                                        | C                        | Commercial<br>21.4 m (70.2 ft) south of C1 In-Place    | 2                               | 3            |
| 72                                                                                                                                                                        | C                        | Commercial<br>25.0 m (82.0 ft) south of C1 In-Place    | 4                               | 5            |
| 108                                                                                                                                                                       | B                        | Residential<br>43.8 m (143.7 ft) east of C1 In-Place   | 6                               | 7            |
| 109                                                                                                                                                                       | B                        | Residential<br>18.3 m (60.0 ft) east of C1 In-Place    | 5                               | 6            |
| 110                                                                                                                                                                       | C                        | Commercial<br>33.6 m (110.2 ft) east of C1 In-Place    | 8                               | 9            |
| 111                                                                                                                                                                       | C                        | Commercial<br>141.0m (462.6 ft) west of C1 In-Place    | 3                               | 4            |
| 112                                                                                                                                                                       | B/C                      | Commercial<br>48.6 m (159.4 ft) east of C1 In-Place    | 10                              | 11           |
| 113                                                                                                                                                                       | C                        | Commercial<br>56.4 m (185.0 ft) west of C1 In-Place    | 5                               | 6            |
| 114                                                                                                                                                                       | C                        | Commercial<br>302.4 m (991.8 ft) west of C1 In-Place   | 15                              | 16           |
| 115                                                                                                                                                                       | C                        | Commercial<br>362.7 m (1,189.9 ft) west of C1 In-Place | 3                               | 4            |
| 116                                                                                                                                                                       | C                        | Commercial<br>417.0 m (1,368.1 ft) west of C1 In-Place | 9                               | 10           |
| 117                                                                                                                                                                       | B/C                      | Hospital<br>115.9 m (380.2 ft) east of C1 In-Place     | 8                               | 9            |
| 118                                                                                                                                                                       | C                        | Commercial<br>81.8 m (268.4 ft) south of C1 In-Place   | 12                              | 13           |
| 119                                                                                                                                                                       | C                        | Commercial<br>40.0 m (131.2 ft) north of C1 In-Place   | 12                              | 13           |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative C1 With A<br/>Relocated Kennedy Interchange</b> |                                  |                                                         |                                     |              |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------|---------------------------------------------------------|-------------------------------------|--------------|
| <b>Receptor<br/>Number</b>                                                                                                                                                    | <b>Land<br/>Use<br/>Category</b> | <b>Description</b>                                      | <b>Representative<br/>Receptors</b> | <b>Total</b> |
| 64                                                                                                                                                                            | C                                | Commercial<br>29.8 m (97.8 ft) south of C1 Relocated    | 4                                   | 5            |
| 66                                                                                                                                                                            | C                                | Commercial<br>265.3 m (870.4 ft) east of C1 Relocated   | 3                                   | 4            |
| 67                                                                                                                                                                            | B/C                              | Commercial<br>83.8 m (274.9 ft) west of C1 Relocated    | 3                                   | 4            |
| 68                                                                                                                                                                            | C                                | Commercial<br>6.60 m (21.7 ft) south of C1 Relocated    | 9                                   | 10           |
| 69                                                                                                                                                                            | C                                | Commercial<br>17.5 m (57.4 ft) west of C1 Relocated     | 6                                   | 7            |
| 70                                                                                                                                                                            | C                                | Commercial<br>63.2 m (207.3 ft) south of C1 Relocated   | 6                                   | 7            |
| 71                                                                                                                                                                            | C                                | Commercial<br>21.4 m (70.2 ft) south of C1 Relocated    | 3                                   | 4            |
| 72                                                                                                                                                                            | C                                | Commercial<br>25.0 m (82.0 ft) south of C1 Relocated    | 4                                   | 5            |
| 108                                                                                                                                                                           | B                                | Residential<br>43.8 m (143.7 ft) east of C1 Relocated   | 6                                   | 7            |
| 109                                                                                                                                                                           | B                                | Residential<br>18.3 m (60.0 ft) east of C1 Relocated    | 5                                   | 6            |
| 110                                                                                                                                                                           | C                                | Commercial<br>33.6 m (110.2 ft) east of C1 Relocated    | 8                                   | 9            |
| 111                                                                                                                                                                           | C                                | Commercial<br>141.0 m (462.6 ft) west of C1 Relocated   | 3                                   | 4            |
| 112                                                                                                                                                                           | B/C                              | Commercial<br>48.6 m (159.4 ft) east of C1 Relocated    | 10                                  | 11           |
| 113                                                                                                                                                                           | C                                | Commercial<br>56.4 m (185.0 ft) west of C1 Relocated    | 5                                   | 6            |
| 114                                                                                                                                                                           | C                                | Commercial<br>299.2m (981.6 ft) west of C1 Relocated    | 5                                   | 6            |
| 115                                                                                                                                                                           | C                                | Commercial<br>364.1 m (1,194.6 ft) west of C1 Relocated | 3                                   | 4            |
| 116                                                                                                                                                                           | C                                | Commercial<br>417.7 m (1,370.4 ft) west of C1 Relocated | 9                                   | 10           |
| 117                                                                                                                                                                           | B/C                              | Hospital<br>129.8 m (425.9 ft) east of C1 Relocated     | 12                                  | 13           |
| 118                                                                                                                                                                           | C                                | Commercial<br>99.2 m (325.5 ft) west of C1 Relocated    | 12                                  | 13           |
| 119                                                                                                                                                                           | C                                | Commercial<br>262.0 m (859.6 ft) east of C1 Relocated   | 12                                  | 13           |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Identification of Noise Receptors Along Alternative C2</b> |                          |                                             |                                 |              |
|--------------------------------------------------------------------------------------------------------------------------------------|--------------------------|---------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                               | <b>Land Use Category</b> | <b>Description</b>                          | <b>Representative Receptors</b> | <b>Total</b> |
| 64                                                                                                                                   | C                        | Commercial<br>41.9 m (137.4 ft) south of C2 | 7                               | 8            |
| 65                                                                                                                                   | B/C                      | Commercial<br>38.9 m (127.6 ft) east of C2  | 5                               | 6            |
| 66                                                                                                                                   | C                        | Commercial<br>95.8 m (314.3 ft) north of C2 | 3                               | 4            |
| 67                                                                                                                                   | B/C                      | Commercial<br>49.1 m (161.1 ft) north of C2 | 2                               | 3            |
| 68                                                                                                                                   | C                        | Commercial<br>18.7 m (61.4 ft) east of C2   | 4                               | 5            |
| 69                                                                                                                                   | C                        | Commercial<br>19.3 m (63.3 ft) west of C2   | 4                               | 5            |
| 70                                                                                                                                   | C                        | Commercial<br>67.4 m (221.1 ft) east of C2  | 5                               | 6            |
| 71                                                                                                                                   | C                        | Commercial<br>20.4 m (66.9 ft) north of C2  | 3                               | 4            |
| 72                                                                                                                                   | C                        | Commercial<br>25.0 m (82.0 ft) west of C2   | 4                               | 5            |
| 74                                                                                                                                   | C                        | Commercial<br>1.5 m (4.9 ft) south of C2    | 19                              | 20           |
| 75                                                                                                                                   | C                        | Commercial<br>17.1 m (56.1 ft) south of C2  | 9                               | 10           |
| 76                                                                                                                                   | B/C                      | Commercial<br>11.0 m (36.0 ft) west of C2   | 5                               | 6            |
| 77                                                                                                                                   | B                        | Residential<br>4.7 m (15.4 ft) south of C2  | 4                               | 5            |
| 78                                                                                                                                   | C                        | Commercial<br>109.8 m (360.2 ft) east of C2 | 14                              | 15           |
| 108                                                                                                                                  | B                        | Residential<br>92.5 m (303.5 ft) east of C2 | 7                               | 8            |
| 109                                                                                                                                  | B                        | Residential<br>68.5 m (224.7 ft) east of C2 | 8                               | 9            |
| 110                                                                                                                                  | C                        | Commercial<br>73.3 m (142.1 ft) east of C2  | 10                              | 11           |
| 111                                                                                                                                  | C                        | Commercial<br>141.0 m (462.6 ft) east of C2 | 3                               | 4            |
| 112                                                                                                                                  | B/C                      | Commercial<br>56.4m (185.0 ft) east of C2   | 7                               | 8            |
| 113                                                                                                                                  | C                        | Commercial<br>33.9 m (111.2 ft) west of C2  | 4                               | 5            |
| 114                                                                                                                                  | C                        | Commercial<br>12.5 m (41.0 ft) north of C2  | 5                               | 6            |
| 115                                                                                                                                  | C                        | Commercial<br>123.8 m (406.2 ft) east of C2 | 3                               | 4            |
| 116                                                                                                                                  | C                        | Commercial<br>107.3 m (352.0 ft) east of C2 | 8                               | 9            |
| 117                                                                                                                                  | B/C                      | Hospital<br>116.6 m (382.5 ft) east of C2   | 10                              | 11           |
| 118                                                                                                                                  | C                        | Commercial<br>173.6 m (569.6 ft) west of C2 | 5                               | 6            |
| 119                                                                                                                                  | C                        | Commercial<br>40.0 m (131.2 ft) east of C2  | 6                               | 7            |

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT<br/>Identification of Noise Receptors Along Alternative C3</b> |                          |                                               |                                 |              |
|--------------------------------------------------------------------------------------------------------------------------------|--------------------------|-----------------------------------------------|---------------------------------|--------------|
| <b>Receptor Number</b>                                                                                                         | <b>Land Use Category</b> | <b>Description</b>                            | <b>Representative Receptors</b> | <b>Total</b> |
| 64                                                                                                                             | C                        | Commercial<br>29.8 m (97.8 ft) south of C3    | 6                               | 7            |
| 66                                                                                                                             | C                        | Commercial<br>238.6 m (782.8 ft) north of C3  | 3                               | 4            |
| 67                                                                                                                             | B/C                      | Commercial<br>15.7 m (51.5 ft) west of C3     | 2                               | 3            |
| 68                                                                                                                             | C                        | Commercial<br>6.6 m (21.7 ft) east of C3      | 4                               | 5            |
| 69                                                                                                                             | C                        | Commercial<br>21.7 m (71.2 ft) west of C3     | 4                               | 5            |
| 70                                                                                                                             | C                        | Commercial<br>81.6 m (267.7 ft) east of C3    | 4                               | 5            |
| 71                                                                                                                             | C                        | Commercial<br>39.4 m (129.3 ft) west of C3    | 3                               | 4            |
| 72                                                                                                                             | C                        | Commercial<br>25.9 m (85.0 ft) west of C3     | 4                               | 5            |
| 108                                                                                                                            | B                        | Residential<br>92.5 m (303.5 ft) east of C3   | 7                               | 8            |
| 109                                                                                                                            | B                        | Residential<br>68.5 m (224.7 ft) east of C3   | 8                               | 9            |
| 110                                                                                                                            | C                        | Commercial<br>73.3 m (240.5 ft) east of C3    | 10                              | 11           |
| 111                                                                                                                            | C                        | Commercial<br>141.0 m (462.6 ft) west of C3   | 3                               | 4            |
| 112                                                                                                                            | B/C                      | Commercial<br>48.6 m (159.4 ft) east of C3    | 9                               | 10           |
| 113                                                                                                                            | C                        | Commercial<br>56.4 m (185.0 ft) west of C3    | 4                               | 5            |
| 114                                                                                                                            | C                        | Commercial<br>247.4 m (812.0 ft) west of C3   | 15                              | 16           |
| 115                                                                                                                            | C                        | Commercial<br>335.1 m (1,099.4 ft) west of C3 | 2                               | 3            |
| 116                                                                                                                            | C                        | Commercial<br>418.3 m (1,372.4 ft) west of C3 | 9                               | 10           |
| 117                                                                                                                            | B/C                      | Hospital<br>112.9 m (34.4 ft) east of C3      | 10                              | 11           |
| 118                                                                                                                            | C                        | Commercial<br>80.5 m (264.1 ft) west of C3    | 8                               | 9            |
| 119                                                                                                                            | C                        | Commercial<br>40.0 m (131.2 ft) west of C3    | 6                               | 7            |

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A2 and I-265 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 1                                                                                                                                                                              | 56.5                        | --                      | 68                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 2                                                                                                                                                                              | 51.1                        | --                      | 60                         | 9                                     | --                                    | 67  | --                            |                   |
| 3                                                                                                                                                                              | 48.8                        | --                      | 65                         | 16                                    | --                                    | 67  | 3                             | A                 |
| 4                                                                                                                                                                              | 48.7                        | --                      | 68                         | 19                                    | --                                    | 67  | 1                             | A                 |
| 5                                                                                                                                                                              | 50.3                        | --                      | 65                         | 15                                    | --                                    | 67  | 3                             | A                 |
| 6                                                                                                                                                                              | 53.6                        | --                      | 68                         | 14                                    | --                                    | 67  | 1                             | A                 |
| 7                                                                                                                                                                              | 49.0                        | --                      | 72                         | 23                                    | --                                    | 67  | 1                             | A                 |
| 8                                                                                                                                                                              | 50.5                        | --                      | 67                         | 17                                    | --                                    | 67  | 1                             | A                 |
| 10                                                                                                                                                                             | 52.3                        | --                      | 68                         | 16                                    | --                                    | 67  | 1                             | A                 |
| 21                                                                                                                                                                             | 54.8                        | --                      | 68                         | 13                                    | --                                    | 67  | 1                             | A                 |
| 22                                                                                                                                                                             | 58.1                        | --                      | 64                         | 6                                     | --                                    | 67  | --                            |                   |
| 86                                                                                                                                                                             | 54.8                        | --                      | 65                         | 10                                    | --                                    | 67  | 3                             | A                 |
| 90                                                                                                                                                                             | 52.1                        | --                      | 64                         | 12                                    | --                                    | 67  | 3                             | A                 |
| 91                                                                                                                                                                             | 58.1                        | --                      | 65                         | 7                                     | --                                    | 67  | --                            |                   |
| 93                                                                                                                                                                             | 49.4                        | 48                      | 67                         | 18                                    | 19                                    | 67  | 1                             | A                 |
| 94                                                                                                                                                                             | 53.9                        | 48                      | 68                         | 14                                    | 20                                    | 67  | 1                             | A                 |
| 96                                                                                                                                                                             | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                             | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 120                                                                                                                                                                            | 45.3                        | --                      | 65                         | 20                                    | --                                    | 67  | 3                             | A                 |
| 121                                                                                                                                                                            | 44.1                        | --                      | 65                         | 21                                    | --                                    | 67  | 3                             | A                 |
| 122                                                                                                                                                                            | 47.2                        | --                      | 67                         | 20                                    | --                                    | 67  | 1                             | A                 |
| 123                                                                                                                                                                            | 49.3                        | --                      | 64                         | 15                                    | --                                    | 67  | 3                             | A                 |
| 124                                                                                                                                                                            | 45.5                        | --                      | 62                         | 17                                    | --                                    | 67  | 3                             | A                 |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternative A2

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A9 and I-265 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 1                                                                                                                                                                              | 56.5                        | --                      | 68                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 21                                                                                                                                                                             | 54.8                        | --                      | 69                         | 14                                    | --                                    | 67  | 1                             | A                 |
| 22                                                                                                                                                                             | 58.1                        | --                      | 70                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 23                                                                                                                                                                             | 64.7                        | --                      | 68                         | 3                                     | --                                    | 67  | 2                             | A                 |
| 24                                                                                                                                                                             | 68.6                        | --                      | 68                         | 0*                                    | --                                    | 67  | 2                             | A                 |
| 25                                                                                                                                                                             | 54.3                        | --                      | 64                         | 10                                    | --                                    | 67  | 3                             | A                 |
| 26                                                                                                                                                                             | 58.5                        | --                      | 62                         | 4                                     | --                                    | 67  | --                            |                   |
| 27                                                                                                                                                                             | 56.8                        | --                      | 63                         | 6                                     | --                                    | 67  | --                            |                   |
| 28                                                                                                                                                                             | 50.3                        | --                      | 62                         | 12                                    | --                                    | 67  | 3                             | A                 |
| 29                                                                                                                                                                             | 54.7                        | --                      | 64                         | 9                                     | --                                    | 67  | --                            |                   |
| 30                                                                                                                                                                             | 55.0                        | --                      | 64                         | 9                                     | --                                    | 67  | --                            |                   |
| 31                                                                                                                                                                             | 51.8                        | --                      | 58                         | 6                                     | --                                    | 67  | --                            |                   |
| 32                                                                                                                                                                             | 52.9                        | --                      | 61                         | 8                                     | --                                    | 67  | --                            |                   |
| 33                                                                                                                                                                             | 58.9                        | --                      | 63                         | 4                                     | --                                    | 67  | --                            |                   |
| 41                                                                                                                                                                             | 56.9                        | --                      | 63                         | 6                                     | --                                    | 67  | --                            |                   |
| 42                                                                                                                                                                             | 50.6                        | --                      | 64                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 43                                                                                                                                                                             | 50.9                        | --                      | 61                         | 10                                    | --                                    | 67  | 3                             | A                 |
| 44                                                                                                                                                                             | 51.4                        | --                      | 62                         | 11                                    | --                                    | 67  | 3                             | A                 |
| 47                                                                                                                                                                             | 49.9                        | --                      | 66                         | 16                                    | --                                    | 67  | 1                             | A                 |
| 48                                                                                                                                                                             | 50.8                        | --                      | 69                         | 18                                    | --                                    | 67  | 1                             | A                 |
| 49                                                                                                                                                                             | 54.1                        | --                      | 72                         | 18                                    | --                                    | 67  | 1                             | A                 |
| 50                                                                                                                                                                             | 45.8                        | --                      | 64                         | 18                                    | --                                    | 67  | 3                             | A                 |
| 51                                                                                                                                                                             | 50.4                        | --                      | 61                         | 11                                    | --                                    | 67  | 3                             | A                 |
| 88                                                                                                                                                                             | 48.3                        | --                      | 68                         | 20                                    | --                                    | 67  | 1                             | A                 |
| 89                                                                                                                                                                             | 48.1                        | --                      | 63                         | 15                                    | --                                    | 67  | 3                             | A                 |
| 91                                                                                                                                                                             | 58.1                        | --                      | 69                         | 11                                    | --                                    | 67  | 1                             | C                 |
| 93                                                                                                                                                                             | 49.4                        | 48                      | 63                         | 14                                    | 15                                    | 67  | 3                             | A                 |
| 94                                                                                                                                                                             | 53.9                        | 48                      | 66                         | 12                                    | 18                                    | 67  | 1                             | A                 |
| 96                                                                                                                                                                             | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                             | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 98                                                                                                                                                                             | 54.0                        | --                      | 67                         | 13                                    | --                                    | 72  | 3                             | A                 |
| 99                                                                                                                                                                             | 53.2                        | --                      | 67                         | 14                                    | --                                    | 67  | 1                             | A                 |
| 100                                                                                                                                                                            | 48.6                        | --                      | 66                         | 17                                    | --                                    | 67  | 1                             | A                 |
| 120                                                                                                                                                                            | 45.3                        | --                      | 71                         | 26                                    | --                                    | 67  | 1                             | A                 |
| 122                                                                                                                                                                            | 47.2                        | --                      | 58                         | 11                                    | --                                    | 67  | 4                             | A                 |
| 123                                                                                                                                                                            | 49.3                        | --                      | 54                         | 5                                     | --                                    | 67  | --                            |                   |
| 124                                                                                                                                                                            | 45.5                        | --                      | 53                         | 8                                     | --                                    | 67  | --                            |                   |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternative A9

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

**\*** -- Project does not increase the noise level for this location

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A13a (Partial Interchange at U.S. 42)</b><br><b>and I-265 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                                             | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 1                                                                                                                                                                                                                           | 56.5                        | --                      | 67                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 12                                                                                                                                                                                                                          | 54.1                        | --                      | 71                         | 17                                    | --                                    | 67  | 1                             | A                 |
| 21                                                                                                                                                                                                                          | 54.8                        | --                      | 67                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 22                                                                                                                                                                                                                          | 58.1                        | --                      | 68                         | 10                                    | --                                    | 67  | 1                             | A                 |
| 23                                                                                                                                                                                                                          | 64.7                        | --                      | 66                         | 1                                     | --                                    | 67  | 2                             | A                 |
| 24                                                                                                                                                                                                                          | 68.6                        | --                      | 72                         | 3                                     | --                                    | 67  | 2                             | A                 |
| 25                                                                                                                                                                                                                          | 54.3                        | --                      | 67                         | 13                                    | --                                    | 67  | 1                             | A                 |
| 26                                                                                                                                                                                                                          | 58.5                        | --                      | 65                         | 7                                     | --                                    | 67  | --                            |                   |
| 27                                                                                                                                                                                                                          | 56.8                        | --                      | 66                         | 9                                     | --                                    | 67  | 2                             | A                 |
| 28                                                                                                                                                                                                                          | 50.3                        | --                      | 64                         | 14                                    | --                                    | 67  | 3                             | A                 |
| 29                                                                                                                                                                                                                          | 54.7                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 30                                                                                                                                                                                                                          | 55.0                        | --                      | 67                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 31                                                                                                                                                                                                                          | 51.8                        | --                      | 59                         | 7                                     | --                                    | 67  | --                            |                   |
| 32                                                                                                                                                                                                                          | 52.9                        | --                      | 62                         | 9                                     | --                                    | 67  | --                            |                   |
| 33                                                                                                                                                                                                                          | 58.9                        | --                      | 64                         | 5                                     | --                                    | 67  | --                            |                   |
| 36                                                                                                                                                                                                                          | 47.6                        | --                      | 62                         | 14                                    | --                                    | 67  | 3                             | A                 |
| 37                                                                                                                                                                                                                          | 49.5                        | --                      | 63                         | 14                                    | --                                    | 67  | 3                             | A                 |
| 38                                                                                                                                                                                                                          | 46.2                        | --                      | 63                         | 17                                    | --                                    | 67  | 3                             | A                 |
| 39                                                                                                                                                                                                                          | 50.1                        | --                      | 63                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 40                                                                                                                                                                                                                          | 54.8                        | --                      | 68                         | 13                                    | --                                    | 67  | 1                             | A                 |
| 41                                                                                                                                                                                                                          | 56.9                        | --                      | 66                         | 9                                     | --                                    | 67  | 2                             | A                 |
| 44                                                                                                                                                                                                                          | 51.4                        | --                      | 62                         | 11                                    | --                                    | 67  | 3                             | A                 |
| 81                                                                                                                                                                                                                          | 57.4                        | --                      | 69                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 82                                                                                                                                                                                                                          | 54.1                        | --                      | 74                         | 20                                    | --                                    | 67  | 1                             | A                 |
| 83                                                                                                                                                                                                                          | 48.3                        | --                      | 72                         | 24                                    | --                                    | 67  | 1                             | A                 |
| 84                                                                                                                                                                                                                          | 40.7                        | --                      | 63                         | 22                                    | --                                    | 67  | 3                             | A                 |
| 86                                                                                                                                                                                                                          | 54.8                        | --                      | 67                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 87                                                                                                                                                                                                                          | 51.4                        | --                      | 58                         | 7                                     | --                                    | 67  | --                            |                   |
| 90                                                                                                                                                                                                                          | 52.1                        | --                      | 65                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 91                                                                                                                                                                                                                          | 58.1                        | --                      | 71                         | 13                                    | --                                    | 67  | 1                             | C                 |
| 93                                                                                                                                                                                                                          | 49.4                        | 48                      | 65                         | 16                                    | 17                                    | 67  | 3                             | A                 |
| 94                                                                                                                                                                                                                          | 53.9                        | 48                      | 67                         | 13                                    | 19                                    | 67  | 1                             | A                 |
| 96                                                                                                                                                                                                                          | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                                                                          | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 120                                                                                                                                                                                                                         | 45.3                        | --                      | 69                         | 24                                    | --                                    | 67  | 1                             | A                 |
| 121                                                                                                                                                                                                                         | 44.1                        | --                      | 72                         | 28                                    | --                                    | 67  | 1                             | A                 |
| 122                                                                                                                                                                                                                         | 47.2                        | --                      | 64                         | 17                                    | --                                    | 67  | 3                             | A                 |
| 123                                                                                                                                                                                                                         | 49.3                        | --                      | 62                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 124                                                                                                                                                                                                                         | 45.5                        | --                      | 60                         | 15                                    | --                                    | 67  | 3                             | A                 |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternative A13a

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A13b (Full Interchange at Wolf Pen Branch Road)</b><br><b>and I-265 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                                                       | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 1                                                                                                                                                                                                                                     | 56.5                        | --                      | 68                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 12                                                                                                                                                                                                                                    | 54.1                        | --                      | 71                         | 17                                    | --                                    | 67  | 1                             | A                 |
| 21                                                                                                                                                                                                                                    | 54.8                        | --                      | 67                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 22                                                                                                                                                                                                                                    | 58.1                        | --                      | 70                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 23                                                                                                                                                                                                                                    | 64.7                        | --                      | 68                         | 3                                     | --                                    | 67  | 2                             | A                 |
| 24                                                                                                                                                                                                                                    | 68.6                        | --                      | 68                         | 0*                                    | --                                    | 67  | 2                             | A                 |
| 25                                                                                                                                                                                                                                    | 54.3                        | --                      | 65                         | 11                                    | --                                    | 67  | 3                             | A                 |
| 26                                                                                                                                                                                                                                    | 58.5                        | --                      | 63                         | 5                                     | --                                    | 67  | --                            |                   |
| 27                                                                                                                                                                                                                                    | 56.8                        | --                      | 64                         | 7                                     | --                                    | 67  | --                            |                   |
| 28                                                                                                                                                                                                                                    | 50.3                        | --                      | 63                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 29                                                                                                                                                                                                                                    | 54.7                        | --                      | 65                         | 10                                    | --                                    | 67  | 3                             | A                 |
| 30                                                                                                                                                                                                                                    | 55.0                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 31                                                                                                                                                                                                                                    | 51.8                        | --                      | 59                         | 7                                     | --                                    | 67  | --                            |                   |
| 32                                                                                                                                                                                                                                    | 52.9                        | --                      | 62                         | 9                                     | --                                    | 67  | --                            |                   |
| 33                                                                                                                                                                                                                                    | 58.9                        | --                      | 65                         | 6                                     | --                                    | 67  | --                            |                   |
| 36                                                                                                                                                                                                                                    | 47.6                        | --                      | 62                         | 14                                    | --                                    | 67  | 3                             | A                 |
| 37                                                                                                                                                                                                                                    | 49.5                        | --                      | 64                         | 15                                    | --                                    | 67  | 3                             | A                 |
| 38                                                                                                                                                                                                                                    | 46.2                        | --                      | 63                         | 17                                    | --                                    | 67  | 3                             | A                 |
| 39                                                                                                                                                                                                                                    | 50.1                        | --                      | 63                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 40                                                                                                                                                                                                                                    | 54.8                        | --                      | 68                         | 13                                    | --                                    | 67  | 1                             | A                 |
| 41                                                                                                                                                                                                                                    | 56.9                        | --                      | 64                         | 7                                     | --                                    | 67  | --                            |                   |
| 44                                                                                                                                                                                                                                    | 51.4                        | --                      | 61                         | 10                                    | --                                    | 67  | 3                             | A                 |
| 81                                                                                                                                                                                                                                    | 57.4                        | --                      | 69                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 82                                                                                                                                                                                                                                    | 54.1                        | --                      | 74                         | 20                                    | --                                    | 67  | 1                             | A                 |
| 83                                                                                                                                                                                                                                    | 48.3                        | --                      | 72                         | 24                                    | --                                    | 67  | 1                             | A                 |
| 84                                                                                                                                                                                                                                    | 40.7                        | --                      | 63                         | 22                                    | --                                    | 67  | 3                             | A                 |
| 86                                                                                                                                                                                                                                    | 54.8                        | --                      | 68                         | 13                                    | --                                    | 67  | 1                             | A                 |
| 87                                                                                                                                                                                                                                    | 51.4                        | --                      | 62                         | 11                                    | --                                    | 67  | 3                             | A                 |
| 90                                                                                                                                                                                                                                    | 52.1                        | --                      | 65                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 91                                                                                                                                                                                                                                    | 58.1                        | --                      | 71                         | 13                                    | --                                    | 67  | 1                             | C                 |
| 93                                                                                                                                                                                                                                    | 49.4                        | 48                      | 65                         | 16                                    | 17                                    | 67  | 3                             | A                 |
| 94                                                                                                                                                                                                                                    | 53.9                        | 48                      | 67                         | 13                                    | 19                                    | 67  | 1                             | A                 |
| 96                                                                                                                                                                                                                                    | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                                                                                    | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 120                                                                                                                                                                                                                                   | 45.3                        | --                      | 69                         | 24                                    | --                                    | 67  | 1                             | A                 |
| 121                                                                                                                                                                                                                                   | 44.1                        | --                      | 72                         | 28                                    | --                                    | 67  | 1                             | A                 |
| 122                                                                                                                                                                                                                                   | 47.2                        | --                      | 65                         | 18                                    | --                                    | 67  | 3                             | A                 |
| 123                                                                                                                                                                                                                                   | 49.3                        | --                      | 62                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 124                                                                                                                                                                                                                                   | 45.5                        | --                      | 60                         | 15                                    | --                                    | 67  | 3                             | A                 |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternative A13b

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

\* -- Project does not increase the noise level for this location

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For A15a Alternative (Partial Interchange at U.S. 42)</b><br><b>and I-265 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                                             | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 1                                                                                                                                                                                                                           | 56.5                        | --                      | 67                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 11                                                                                                                                                                                                                          | 51.1                        | --                      | 71                         | 20                                    | --                                    | 67  | 1                             | A                 |
| 12                                                                                                                                                                                                                          | 54.1                        | --                      | 68                         | 14                                    | --                                    | 67  | 1                             | A                 |
| 13                                                                                                                                                                                                                          | 50.8                        | --                      | 67                         | 16                                    | --                                    | 67  | 1                             | A                 |
| 21                                                                                                                                                                                                                          | 54.8                        | --                      | 67                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 22                                                                                                                                                                                                                          | 58.1                        | --                      | 68                         | 10                                    | --                                    | 67  | 1                             | A                 |
| 23                                                                                                                                                                                                                          | 64.7                        | --                      | 66                         | 1                                     | --                                    | 67  | 2                             | A                 |
| 24                                                                                                                                                                                                                          | 68.6                        | --                      | 72                         | 3                                     | --                                    | 67  | 2                             | A                 |
| 25                                                                                                                                                                                                                          | 54.3                        | --                      | 68                         | 14                                    | --                                    | 67  | 1                             | A                 |
| 26                                                                                                                                                                                                                          | 58.5                        | --                      | 66                         | 8                                     | --                                    | 67  | 2                             | A                 |
| 27                                                                                                                                                                                                                          | 56.8                        | --                      | 66                         | 9                                     | --                                    | 67  | 2                             | A                 |
| 28                                                                                                                                                                                                                          | 50.3                        | --                      | 64                         | 14                                    | --                                    | 67  | 3                             | A                 |
| 29                                                                                                                                                                                                                          | 54.7                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 30                                                                                                                                                                                                                          | 55.0                        | --                      | 67                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 31                                                                                                                                                                                                                          | 51.8                        | --                      | 59                         | 7                                     | --                                    | 67  | --                            |                   |
| 32                                                                                                                                                                                                                          | 52.9                        | --                      | 62                         | 9                                     | --                                    | 67  | --                            |                   |
| 33                                                                                                                                                                                                                          | 58.9                        | --                      | 64                         | 5                                     | --                                    | 67  | --                            |                   |
| 36                                                                                                                                                                                                                          | 47.6                        | --                      | 61                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 37                                                                                                                                                                                                                          | 49.5                        | --                      | 63                         | 14                                    | --                                    | 67  | 3                             | A                 |
| 38                                                                                                                                                                                                                          | 46.2                        | --                      | 63                         | 17                                    | --                                    | 67  | 3                             | A                 |
| 39                                                                                                                                                                                                                          | 50.1                        | --                      | 62                         | 12                                    | --                                    | 67  | 3                             | A                 |
| 40                                                                                                                                                                                                                          | 54.8                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 41                                                                                                                                                                                                                          | 56.9                        | --                      | 66                         | 9                                     | --                                    | 67  | 2                             | A                 |
| 44                                                                                                                                                                                                                          | 51.4                        | --                      | 62                         | 11                                    | --                                    | 67  | 3                             | A                 |
| 80                                                                                                                                                                                                                          | 57.4                        | --                      | 66                         | 9                                     | --                                    | 67  | 2                             | A                 |
| 85                                                                                                                                                                                                                          | 42.6                        | --                      | 68                         | 25                                    | --                                    | 67  | 1                             | A                 |
| 86                                                                                                                                                                                                                          | 54.8                        | --                      | 62                         | 7                                     | --                                    | 67  | --                            |                   |
| 90                                                                                                                                                                                                                          | 52.1                        | --                      | 67                         | 15                                    | --                                    | 67  | 1                             | A                 |
| 91                                                                                                                                                                                                                          | 58.1                        | --                      | 70                         | 12                                    | --                                    | 67  | 1                             | C                 |
| 93                                                                                                                                                                                                                          | 49.4                        | 48                      | 66                         | 17                                    | 18                                    | 67  | 1                             | A                 |
| 94                                                                                                                                                                                                                          | 53.9                        | 48                      | 68                         | 14                                    | 20                                    | 67  | 1                             | A                 |
| 96                                                                                                                                                                                                                          | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                                                                          | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 120                                                                                                                                                                                                                         | 45.3                        | --                      | 67                         | 22                                    | --                                    | 67  | 1                             | A                 |
| 121                                                                                                                                                                                                                         | 44.1                        | --                      | 68                         | 24                                    | --                                    | 67  | 1                             | A                 |
| 122                                                                                                                                                                                                                         | 47.2                        | --                      | 70                         | 23                                    | --                                    | 67  | 1                             | A                 |
| 123                                                                                                                                                                                                                         | 49.3                        | --                      | 68                         | 19                                    | --                                    | 67  | 1                             | A                 |
| 124                                                                                                                                                                                                                         | 45.5                        | --                      | 65                         | 20                                    | --                                    | 67  | 3                             | A                 |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternative A15a

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A15b (Full Interchange at Wolf Pen Branch Road)</b><br><b>and I-265 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                                                       | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 1                                                                                                                                                                                                                                     | 56.5                        | --                      | 66                         | 10                                    | --                                    | 67  | 1                             | A                 |
| 11                                                                                                                                                                                                                                    | 51.1                        | --                      | 71                         | 20                                    | --                                    | 67  | 1                             | A                 |
| 12                                                                                                                                                                                                                                    | 54.1                        | --                      | 68                         | 14                                    | --                                    | 67  | 1                             | A                 |
| 13                                                                                                                                                                                                                                    | 50.8                        | --                      | 67                         | 16                                    | --                                    | 67  | 1                             | A                 |
| 21                                                                                                                                                                                                                                    | 54.8                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 22                                                                                                                                                                                                                                    | 58.1                        | --                      | 68                         | 10                                    | --                                    | 67  | 1                             | A                 |
| 23                                                                                                                                                                                                                                    | 64.7                        | --                      | 65                         | 0*                                    | --                                    | 67  | --                            |                   |
| 24                                                                                                                                                                                                                                    | 68.6                        | --                      | 68                         | 0*                                    | --                                    | 67  | 2                             | A                 |
| 25                                                                                                                                                                                                                                    | 54.3                        | --                      | 64                         | 10                                    | --                                    | 67  | 3                             | A                 |
| 26                                                                                                                                                                                                                                    | 58.5                        | --                      | 63                         | 5                                     | --                                    | 67  | --                            |                   |
| 27                                                                                                                                                                                                                                    | 56.8                        | --                      | 64                         | 7                                     | --                                    | 67  | --                            |                   |
| 28                                                                                                                                                                                                                                    | 50.3                        | --                      | 63                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 29                                                                                                                                                                                                                                    | 54.7                        | --                      | 65                         | 10                                    | --                                    | 67  | 3                             | A                 |
| 30                                                                                                                                                                                                                                    | 55.0                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 31                                                                                                                                                                                                                                    | 51.8                        | --                      | 59                         | 7                                     | --                                    | 67  | --                            |                   |
| 32                                                                                                                                                                                                                                    | 52.9                        | --                      | 62                         | 9                                     | --                                    | 67  | --                            |                   |
| 33                                                                                                                                                                                                                                    | 58.9                        | --                      | 63                         | 4                                     | --                                    | 67  | --                            |                   |
| 36                                                                                                                                                                                                                                    | 47.6                        | --                      | 61                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 37                                                                                                                                                                                                                                    | 49.5                        | --                      | 63                         | 14                                    | --                                    | 67  | 3                             | A                 |
| 38                                                                                                                                                                                                                                    | 46.2                        | --                      | 63                         | 17                                    | --                                    | 67  | 3                             | A                 |
| 39                                                                                                                                                                                                                                    | 50.1                        | --                      | 62                         | 12                                    | --                                    | 67  | 3                             | A                 |
| 40                                                                                                                                                                                                                                    | 54.8                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 41                                                                                                                                                                                                                                    | 56.9                        | --                      | 64                         | 7                                     | --                                    | 67  | --                            |                   |
| 44                                                                                                                                                                                                                                    | 51.4                        | --                      | 64                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 80                                                                                                                                                                                                                                    | 57.4                        | --                      | 66                         | 9                                     | --                                    | 67  | 2                             | A                 |
| 85                                                                                                                                                                                                                                    | 42.6                        | --                      | 68                         | 25                                    | --                                    | 67  | 1                             | A                 |
| 86                                                                                                                                                                                                                                    | 54.8                        | --                      | 62                         | 7                                     | --                                    | 67  | --                            |                   |
| 90                                                                                                                                                                                                                                    | 52.1                        | --                      | 67                         | 15                                    | --                                    | 67  | 1                             | A                 |
| 91                                                                                                                                                                                                                                    | 58.1                        | --                      | 70                         | 12                                    | --                                    | 67  | 1                             | C                 |
| 93                                                                                                                                                                                                                                    | 49.4                        | 48                      | 66                         | 17                                    | 18                                    | 67  | 1                             | A                 |
| 94                                                                                                                                                                                                                                    | 53.9                        | 48                      | 68                         | 14                                    | 20                                    | 67  | 1                             | A                 |
| 96                                                                                                                                                                                                                                    | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                                                                                    | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 120                                                                                                                                                                                                                                   | 45.3                        | --                      | 68                         | 23                                    | --                                    | 67  | 1                             | A                 |
| 121                                                                                                                                                                                                                                   | 44.1                        | --                      | 69                         | 25                                    | --                                    | 67  | 1                             | A                 |
| 122                                                                                                                                                                                                                                   | 47.2                        | --                      | 70                         | 23                                    | --                                    | 67  | 1                             | A                 |
| 123                                                                                                                                                                                                                                   | 49.3                        | --                      | 68                         | 19                                    | --                                    | 67  | 1                             | A                 |
| 124                                                                                                                                                                                                                                   | 45.5                        | --                      | 65                         | 20                                    | --                                    | 67  | 3                             | A                 |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternative A15b

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

\* -- Project does not increase the noise level for this location

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A16 and I-256 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                 | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 1                                                                                                                                                                               | 56.5                        | --                      | 66                         | 10                                    | --                                    | 67  | 1                             | A                 |
| 2                                                                                                                                                                               | 51.1                        | --                      | 59                         | 8                                     | --                                    | 67  | --                            |                   |
| 3                                                                                                                                                                               | 48.8                        | --                      | 63                         | 14                                    | --                                    | 67  | 3                             | C                 |
| 11                                                                                                                                                                              | 51.1                        | --                      | 71                         | 20                                    | --                                    | 67  | 1                             | A                 |
| 14                                                                                                                                                                              | 52.2                        | --                      | 64                         | 12                                    | --                                    | 67  | 3                             | A                 |
| 15                                                                                                                                                                              | 48.8                        | --                      | 66                         | 17                                    | --                                    | 67  | 1                             | A                 |
| 16                                                                                                                                                                              | 49.1                        | --                      | 71                         | 22                                    | --                                    | 67  | 1                             | A                 |
| 19                                                                                                                                                                              | 56.9                        | --                      | 65                         | 8                                     | --                                    | 67  | --                            |                   |
| 20                                                                                                                                                                              | 52.8                        | --                      | 64                         | 11                                    | --                                    | 67  | 3                             | A                 |
| 21                                                                                                                                                                              | 54.8                        | --                      | 66                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 22                                                                                                                                                                              | 58.1                        | --                      | 61                         | 3                                     | --                                    | 67  | --                            |                   |
| 24                                                                                                                                                                              | 68.6                        | --                      | 57                         | 0*                                    | --                                    | 67  | --                            |                   |
| 25                                                                                                                                                                              | 54.3                        | --                      | 57                         | 3                                     | --                                    | 67  | --                            |                   |
| 26                                                                                                                                                                              | 58.5                        | --                      | 54                         | 0*                                    | --                                    | 67  | --                            |                   |
| 27                                                                                                                                                                              | 56.8                        | --                      | 53                         | 0*                                    | --                                    | 67  | --                            |                   |
| 34                                                                                                                                                                              | 61.2                        | --                      | 72                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 35                                                                                                                                                                              | 58.6                        | --                      | 66                         | 7                                     | --                                    | 67  | 2                             | A                 |
| 85                                                                                                                                                                              | 42.6                        | --                      | 65                         | 22                                    | --                                    | 67  | 3                             | A                 |
| 86                                                                                                                                                                              | 54.8                        | --                      | 62                         | 7                                     | --                                    | 67  | --                            |                   |
| 90                                                                                                                                                                              | 52.1                        | --                      | 61                         | 9                                     | --                                    | 67  | --                            |                   |
| 91                                                                                                                                                                              | 58.1                        | --                      | 70                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 13                                                                                                                                                                              | 50.8                        | --                      | 77                         | 26                                    | --                                    | 67  | 1                             | A                 |
| 18                                                                                                                                                                              | 50.6                        | --                      | 66                         | 15                                    | --                                    | 67  | 1                             | A                 |
| 80                                                                                                                                                                              | 57.4                        | --                      | 67                         | 10                                    | --                                    | 67  | 1                             | A                 |
| 93                                                                                                                                                                              | 49.4                        | 48                      | 66                         | 17                                    | 18                                    | 67  | 1                             | A                 |
| 94                                                                                                                                                                              | 53.9                        | 48                      | 68                         | 14                                    | 20                                    | 67  | 1                             | A                 |
| 96                                                                                                                                                                              | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                              | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 120                                                                                                                                                                             | 45.3                        | --                      | 68                         | 23                                    | --                                    | 67  | 1                             | A                 |
| 121                                                                                                                                                                             | 44.1                        | --                      | 68                         | 24                                    | --                                    | 67  | 1                             | A                 |
| 122                                                                                                                                                                             | 47.2                        | --                      | 71                         | 24                                    | --                                    | 67  | 1                             | A                 |
| 123                                                                                                                                                                             | 49.3                        | --                      | 70                         | 21                                    | --                                    | 67  | 1                             | A                 |
| 124                                                                                                                                                                             | 45.5                        | --                      | 66                         | 21                                    | --                                    | 67  | 1                             | A                 |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternative A16

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

\* -- Project does not increase the noise level for this location

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative B1 and I-256 Interchange Reconstruction</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 53                                                                                                                                                                             | 56.9                        | --                      | 66                         | 9                                     | --                                    | 67  | 2                             | A                 |
| 54                                                                                                                                                                             | 62.4                        | --                      | 66                         | 4                                     | --                                    | 67  | 2                             | A                 |
| 55                                                                                                                                                                             | 59.4                        | --                      | 65                         | 6                                     | --                                    | 67  | --                            |                   |
| 56                                                                                                                                                                             | 58.8                        | --                      | 71                         | 12                                    | --                                    | 67  | 1                             | A                 |
| 57                                                                                                                                                                             | 57.3                        | --                      | 65                         | 8                                     | --                                    | 67  | --                            |                   |
| 58                                                                                                                                                                             | 66.4                        | --                      | 67                         | 1                                     | --                                    | 67  | 2                             | A                 |
| 59                                                                                                                                                                             | 55.8                        | --                      | 67                         | 11                                    | --                                    | 67  | 1                             | A                 |
| 60                                                                                                                                                                             | 59.8                        | --                      | 66                         | 6                                     | --                                    | 67  | 2                             | A                 |
| 61                                                                                                                                                                             | 58.1                        | --                      | 63                         | 5                                     | --                                    | 67  | --                            |                   |
| 62                                                                                                                                                                             | 56.8                        | --                      | 61                         | 4                                     | --                                    | 67  | --                            |                   |
| 63                                                                                                                                                                             | 61.2                        | --                      | 60                         | 0*                                    | --                                    | 67  | --                            |                   |
| 93                                                                                                                                                                             | 49.4                        | 48                      | 63                         | 14                                    | 15                                    | 67  | 3                             | A                 |
| 94                                                                                                                                                                             | 53.9                        | 48                      | 66                         | 12                                    | 18                                    | 67  | 1                             | A                 |
| 95                                                                                                                                                                             | 52.4                        | --                      | 65                         | 13                                    | --                                    | 67  | 3                             | A                 |
| 96                                                                                                                                                                             | 59.5                        | 61                      | 64                         | 5                                     | 3                                     | 67  | --                            |                   |
| 97                                                                                                                                                                             | 59.1                        | 65                      | 68                         | 9                                     | 3                                     | 67  | 2                             | B                 |
| 101                                                                                                                                                                            | 51.7                        | --                      | 74                         | 22                                    | --                                    | 67  | 1                             | A                 |
| 102                                                                                                                                                                            | 58.3                        | --                      | 68                         | 10                                    | --                                    | 67  | 1                             | A                 |
| 103                                                                                                                                                                            | 53.2                        | --                      | 67                         | 14                                    | --                                    | 67  | 1                             | A                 |
| 104                                                                                                                                                                            | 56.2                        | --                      | 64                         | 8                                     | --                                    | 67  | --                            |                   |
| 105                                                                                                                                                                            | 52.8                        | --                      | 66                         | 13                                    | --                                    | 67  | 1                             | A                 |
| 106                                                                                                                                                                            | 43.2                        | --                      | 71                         | 28                                    | --                                    | 67  | 1                             | A                 |
| 107                                                                                                                                                                            | 60.1                        | --                      | 68                         | 8                                     | --                                    | 67  | 2                             | A                 |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternative B1

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

**C** -- Isolated receptor

**\*** -- Project does not increase the noise level for this location

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative C1 With An In-Place Kennedy Interchange</b> |                             |                         |                            |                                       |                                       |       |                               |                   |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-------|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC   | Category of Impact From Build | Barrier Abatement |
| 64                                                                                                                                                                             | 75.2                        | 72                      | 75                         | 0*                                    | 3                                     | 72    | 2                             | B                 |
| 65                                                                                                                                                                             | 62.1                        | 72                      | 75                         | 13                                    | 3                                     | 67/72 | 1                             | B                 |
| 66                                                                                                                                                                             | 67.9                        | 71                      | 70                         | 2                                     | -1                                    | 72    | --                            |                   |
| 67                                                                                                                                                                             | 61.3                        | 76                      | 76                         | 15                                    | 0                                     | 67/72 | 1                             | B                 |
| 68                                                                                                                                                                             | 67.7                        | 75                      | 76                         | 8                                     | 1                                     | 72    | 2                             | B                 |
| 69                                                                                                                                                                             | 71.3                        | 77                      | 77                         | 6                                     | 0                                     | 72    | 2                             | B                 |
| 70                                                                                                                                                                             | 70.0                        | 71                      | 71                         | 1                                     | 0                                     | 72    | 2                             | B                 |
| 71                                                                                                                                                                             | 69.3                        | 77                      | 78                         | 9                                     | 1                                     | 72    | 2                             | B                 |
| 72                                                                                                                                                                             | 73.5                        | 79                      | 79                         | 6                                     | 0                                     | 72    | 2                             | B                 |
| 108                                                                                                                                                                            | 65.2                        | 73                      | 73                         | 8                                     | 0                                     | 67    | 2                             | B                 |
| 109                                                                                                                                                                            | 66.8                        | 75                      | 78                         | 11                                    | 3                                     | 67    | 1                             | B                 |
| 110                                                                                                                                                                            | 62.2                        | 75                      | 78                         | 16                                    | 3                                     | 72    | 1                             | B                 |
| 111                                                                                                                                                                            | 67.1                        | 68                      | 68                         | 1                                     | 0                                     | 72    | --                            |                   |
| 112                                                                                                                                                                            | 66.5                        | 70                      | 72                         | 6                                     | 2                                     | 67/72 | 2                             | B                 |
| 113                                                                                                                                                                            | 66.6                        | 71                      | 71                         | 4                                     | 0                                     | 72    | 2                             | B                 |
| 114                                                                                                                                                                            | 61.0                        | 63                      | 63                         | 2                                     | 0                                     | 72    | --                            |                   |
| 115                                                                                                                                                                            | 59.6                        | 59                      | 59                         | 0*                                    | 0                                     | 72    | --                            |                   |
| 116                                                                                                                                                                            | 61.2                        | 58                      | 58                         | 0*                                    | 0                                     | 72    | --                            |                   |
| 117                                                                                                                                                                            | 64.6                        | 68                      | 69                         | 4                                     | 1                                     | 67/72 | 2                             | B                 |
| 118                                                                                                                                                                            | 60.6                        | 68                      | 64                         | 3                                     | -4                                    | 72    | --                            |                   |
| 119                                                                                                                                                                            | 60.4                        | 57                      | 58                         | 0*                                    | 1                                     | 72    | --                            |                   |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternative C1

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

C -- Isolated receptor

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative C1 With A Relocated Kennedy Interchange</b> |                             |                         |                            |                                       |                                       |       |                               |                   |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-------|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC   | Category of Impact From Build | Barrier Abatement |
| 64                                                                                                                                                                             | 75.2                        | 72                      | 75                         | 0*                                    | 3                                     | 72    | 2                             | B                 |
| 66                                                                                                                                                                             | 67.9                        | 71                      | 67                         | 0*                                    | -4                                    | 72    | --                            |                   |
| 67                                                                                                                                                                             | 61.3                        | 76                      | 75                         | 14                                    | -1                                    | 67/72 | 1                             | B                 |
| 68                                                                                                                                                                             | 67.7                        | 75                      | 77                         | 9                                     | 2                                     | 72    | 2                             | B                 |
| 69                                                                                                                                                                             | 71.3                        | 77                      | 76                         | 5                                     | 1                                     | 72    | 2                             | B                 |
| 70                                                                                                                                                                             | 70.0                        | 71                      | 71                         | 1                                     | 0                                     | 72    | 2                             | B                 |
| 71                                                                                                                                                                             | 69.3                        | 77                      | 78                         | 9                                     | 1                                     | 72    | 2                             | B                 |
| 72                                                                                                                                                                             | 73.5                        | 79                      | 79                         | 6                                     | 0                                     | 72    | 2                             | B                 |
| 108                                                                                                                                                                            | 65.2                        | 73                      | 73                         | 8                                     | 0                                     | 67    | 2                             | B                 |
| 109                                                                                                                                                                            | 66.8                        | 75                      | 78                         | 11                                    | 3                                     | 67    | 1                             | B                 |
| 110                                                                                                                                                                            | 62.2                        | 75                      | 78                         | 16                                    | 3                                     | 72    | 1                             | B                 |
| 111                                                                                                                                                                            | 67.1                        | 68                      | 68                         | 1                                     | 0                                     | 72    | --                            |                   |
| 112                                                                                                                                                                            | 66.5                        | 70                      | 72                         | 6                                     | 2                                     | 67/72 | 2                             | B                 |
| 113                                                                                                                                                                            | 66.6                        | 71                      | 71                         | 4                                     | 0                                     | 72    | 2                             | B                 |
| 114                                                                                                                                                                            | 61.0                        | 63                      | 63                         | 2                                     | 0                                     | 72    | --                            |                   |
| 115                                                                                                                                                                            | 59.6                        | 59                      | 59                         | 0*                                    | 0                                     | 72    | --                            |                   |
| 116                                                                                                                                                                            | 61.2                        | 58                      | 58                         | 0*                                    | 0                                     | 72    | --                            |                   |
| 117                                                                                                                                                                            | 64.6                        | 68                      | 69                         | 4                                     | 1                                     | 67/72 | 2                             | B                 |
| 118                                                                                                                                                                            | 60.6                        | 68                      | 64                         | 3                                     | -4                                    | 72    | --                            |                   |
| 119                                                                                                                                                                            | 60.4                        | 57                      | 58                         | 0*                                    | 1                                     | 72    | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternative C1

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

C -- Isolated receptor

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification<br/>For Alternative C2</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                     | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 64                                                                                                                                  | 75.2                        | 72                      | 74                         | 0*                                    | 2                                     | 72  | 2                             | B                 |
| 65                                                                                                                                  | 62.1                        | 72                      | 74                         | 12                                    | 2                                     | 72  | 1                             | B                 |
| 66                                                                                                                                  | 67.9                        | 71                      | 71                         | 3                                     | 0                                     | 72  | 2                             | B                 |
| 67                                                                                                                                  | 61.3                        | 76                      | 72                         | 11                                    | -4                                    | 72  | 1                             | B                 |
| 68                                                                                                                                  | 67.7                        | 75                      | 76                         | 8                                     | 2                                     | 72  | 2                             | B                 |
| 69                                                                                                                                  | 71.3                        | 77                      | 76                         | 5                                     | -1                                    | 72  | 2                             | B                 |
| 70                                                                                                                                  | 70.0                        | 71                      | 72                         | 2                                     | 3                                     | 72  | 2                             | B                 |
| 71                                                                                                                                  | 69.3                        | 77                      | 76                         | 7                                     | 2                                     | 72  | 2                             | B                 |
| 72                                                                                                                                  | 73.5                        | 79                      | 78                         | 5                                     | -1                                    | 72  | 2                             | B                 |
| 74                                                                                                                                  | 69.1                        | 71                      | 72                         | 3                                     | 1                                     | 72  | 2                             | B                 |
| 75                                                                                                                                  | 68.2                        | 79                      | 76                         | 8                                     | -3                                    | 72  | 2                             | B                 |
| 76                                                                                                                                  | 65.4                        | 71                      | 72                         | 7                                     | 1                                     | 72  | 2                             | B                 |
| 77                                                                                                                                  | 73.3                        | 75                      | 69                         | 0*                                    | -6                                    | 72  | --                            |                   |
| 78                                                                                                                                  | 68.5                        | 67                      | 67                         | 0*                                    | 0                                     | 72  | --                            |                   |
| 108                                                                                                                                 | 65.2                        | 73                      | 68                         | 3                                     | -5                                    | 72  | --                            |                   |
| 109                                                                                                                                 | 66.8                        | 75                      | 72                         | 5                                     | -3                                    | 72  | 2                             | B                 |
| 110                                                                                                                                 | 62.2                        | 75                      | 74                         | 12                                    | -1                                    | 72  | 1                             | B                 |
| 111                                                                                                                                 | 67.1                        | 68                      | 67                         | 0*                                    | -1                                    | 72  | --                            |                   |
| 112                                                                                                                                 | 66.5                        | 70                      | 72                         | 6                                     | 2                                     | 72  | 2                             | B                 |
| 113                                                                                                                                 | 66.6                        | 71                      | 73                         | 6                                     | 2                                     | 72  | 2                             | B                 |
| 114                                                                                                                                 | 61.0                        | 63                      | 73                         | 12                                    | 10                                    | 72  | 1                             | A                 |
| 115                                                                                                                                 | 59.6                        | 59                      | 64                         | 4                                     | 5                                     | 72  | --                            |                   |
| 116                                                                                                                                 | 61.2                        | 58                      | 64                         | 3                                     | 6                                     | 72  | --                            |                   |
| 117                                                                                                                                 | 64.6                        | 68                      | 69                         | 4                                     | 1                                     | 72  | --                            |                   |
| 118                                                                                                                                 | 60.6                        | 68                      | 69                         | 8                                     | 1                                     | 72  | --                            |                   |
| 119                                                                                                                                 | 60.4                        | 57                      | 58                         | 0*                                    | 1                                     | 72  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternative C2

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

C -- Isolated receptor

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 2 – Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification<br/>For Alternative C3</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                     | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| 64                                                                                                                                  | 75.2                        | 72                      | 73                         | 0*                                    | 1                                     | 72  | 2                             | B                 |
| 66                                                                                                                                  | 67.9                        | 71                      | 66                         | 0*                                    | -5                                    | 72  | --                            |                   |
| 67                                                                                                                                  | 61.3                        | 76                      | 77                         | 16                                    | 1                                     | 72  | 1                             | B                 |
| 68                                                                                                                                  | 67.7                        | 75                      | 78                         | 10                                    | 3                                     | 72  | 1                             | B                 |
| 69                                                                                                                                  | 71.3                        | 77                      | 78                         | 7                                     | 1                                     | 72  | 2                             | B                 |
| 70                                                                                                                                  | 70.0                        | 71                      | 71                         | 1                                     | 0                                     | 72  | 2                             | B                 |
| 71                                                                                                                                  | 69.3                        | 77                      | 77                         | 8                                     | 0                                     | 72  | 2                             | B                 |
| 72                                                                                                                                  | 73.5                        | 79                      | 79                         | 6                                     | 0                                     | 72  | 2                             | B                 |
| 108                                                                                                                                 | 65.2                        | 73                      | 70                         | 5                                     | -3                                    | 72  | 2                             | B                 |
| 109                                                                                                                                 | 66.8                        | 75                      | 73                         | 6                                     | -2                                    | 72  | 2                             | B                 |
| 110                                                                                                                                 | 62.2                        | 75                      | 74                         | 12                                    | -1                                    | 72  | 1                             | B                 |
| 111                                                                                                                                 | 67.1                        | 68                      | 71                         | 4                                     | 3                                     | 72  | 2                             | B                 |
| 112                                                                                                                                 | 66.5                        | 70                      | 72                         | 6                                     | 2                                     | 72  | 2                             | B                 |
| 113                                                                                                                                 | 66.6                        | 71                      | 70                         | 3                                     | -1                                    | 72  | --                            |                   |
| 114                                                                                                                                 | 61.0                        | 63                      | 63                         | 2                                     | 0                                     | 72  | --                            |                   |
| 115                                                                                                                                 | 59.6                        | 59                      | 60                         | 0*                                    | 1                                     | 72  | --                            |                   |
| 116                                                                                                                                 | 61.2                        | 58                      | 59                         | 0*                                    | 1                                     | 72  | --                            |                   |
| 117                                                                                                                                 | 64.6                        | 68                      | 69                         | 4                                     | 1                                     | 72  | --                            |                   |
| 118                                                                                                                                 | 60.6                        | 68                      | 64                         | 3                                     | -4                                    | 72  | --                            |                   |
| 119                                                                                                                                 | 60.4                        | 57                      | 57                         | 0*                                    | 0                                     | 72  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternative C3

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

C -- Isolated receptor

\* -- Project does not increase the noise level for this location

| Historic Property Receptors |                           |                            |
|-----------------------------|---------------------------|----------------------------|
| Receptor Number             | Site Location             | Existing Noise Level (dBA) |
| H1                          | Cedar Brook Farm          | 50.9                       |
| H2                          | Crowfoot                  | 50.1                       |
| H3                          | Bruce House               | 45.7                       |
| H4                          | Fincastle                 | 46.0                       |
| H5                          | Allison-Barrickman        | 51.4                       |
| H6                          | St. Francis in the Fields | 50.1                       |
| H7                          | Drumanard                 | 48.1                       |
| H8                          | Merriwether House         | 46.5                       |
| H9                          | Bellevue                  | 49.3                       |
| H10                         | Nuttall House             | 53.2                       |
| H11                         | Rosewell                  | 44.7                       |
| H12                         | Determan Houses           | 43.2                       |
| H13                         | J. Schildknecht House     | 46.0                       |
| H14                         | Dogwood Hill              | 52.1                       |
| H15                         | Bare Acres                | 45.9                       |
| H16                         | Shady Brook Farm          | 42.1                       |
| H17                         | Country Estates           | 72.7                       |
| H18                         | Country Estates           | 72.4                       |
| H19                         | Juniper Beach HD          | 51.2                       |
| H20                         | Fry House                 | 49.8                       |
| H21                         | Prather Farm              | 64.1                       |
| H22                         | Swartz House              | 49.2                       |
| H23                         | Midlands                  | 59.0                       |
| H24                         | Blankenbaker Station      | 56.6                       |
| H25                         | Lyncliffe                 | 56.2                       |
| H26                         | Croghan-Blankenbaker      | 52.2                       |
| H27                         | Butchertown               | 71.3                       |
| H28                         | Butchertown               | 70.1                       |
| H29                         | Butchertown               | 73.1                       |
| H30                         | Big 4 Railroad Bridge     | 63.2                       |
| H31                         | Old Jeffersonville HD     | 65.1                       |
| H32                         | Old Jeffersonville HD     | 69.9                       |
| H33                         | War Memorial              | 61.5                       |
| H34                         | Grismore House            | 64.2                       |
| H35                         | City School               | 58.3                       |
| H36                         | Train Depot               | 67.1                       |
| H37                         | William Ingram House      | 57.6                       |
| H38                         | Phoenix Hill HD           | 65.0                       |
| H39                         | Phoenix Hill HD           | 69.5                       |

| <b>Historic Property Receptors<br/>(Continued)</b> |                                      |                                       |
|----------------------------------------------------|--------------------------------------|---------------------------------------|
| <b>Receptor Number</b>                             | <b>Site Location</b>                 | <b>Existing Noise Level<br/>(dBA)</b> |
| H40                                                | 100 West Main HD                     | 69.0                                  |
| H41                                                | L&N Railroad Office                  | 65.8                                  |
| H42                                                | Belle of Louisville                  | 70.8                                  |
| H43                                                | Mayor Andrew Broaddus                | 69.8                                  |
| H44                                                | Snead Manufacturing                  | 66.8                                  |
| H45                                                | West Main Street HD                  | 69.9                                  |
| H46                                                | West Main Street HD                  | 69.5                                  |
| H47                                                | New Enterprise Tobacco               | 67.1                                  |
| H47a                                               | New Enterprise Tobacco (2)           | 69.5                                  |
| H48                                                | Tobacco Realty Company               | 64.8                                  |
| H49                                                | Brown Tobacco Warehouse              | 60.2                                  |
| H50                                                | 2nd St. Bridge                       | 62.5                                  |
| H51                                                | Ohio Falls Car and Locomotive Co.    | 57.9                                  |
| H52                                                | Ohio Falls Car and Locomotive Co.    | 60.0                                  |
| H53                                                | Colgate Palmolive                    | 60.4                                  |
| H54                                                | Colgate Palmolive                    | 66.8                                  |
| H55                                                | Pennsylvania RR Bridge               | 58.5                                  |
| H56                                                | IE-HC-55008                          | 55.2                                  |
| H57                                                | Woods House                          | 49.7                                  |
| H58                                                | Federal Style House                  | 48.8                                  |
| H59                                                | James A Smith Farmstead              | 48.9                                  |
| H60                                                | McFerran House                       | 60.8                                  |
| H61                                                | Geiger Mill Ruin                     | 64.9                                  |
| H62                                                | Jacob School Rd HD                   | 53.9                                  |
| H63                                                | Edward Strater House                 | 53.0                                  |
| H64                                                | Harrods Creek Village HD             | 67.5                                  |
| H65                                                | Utica Cemetery                       | 49.2                                  |
| H66                                                | Lentz Cemetery                       | 52.1                                  |
| H67                                                | Edge Water Garden/Richmond Boat Club | 63.3                                  |
| H68                                                | Doolan House/Stonebridge HD          | 52.5                                  |
| H69                                                | Stonebridge HD 1                     | 70.1                                  |
| H70                                                | River Hill/Stonebridge HD 2          | 55.5                                  |
| H71                                                | Whitehead House                      | 65.0                                  |
| H72                                                | Dabney House/Upper River Rd HD       | 50.0                                  |
| H73                                                | Upper River Rd HD (407 Rock Hill)    | 55.7                                  |
| H74                                                | Voight House                         | 52.7                                  |
| H75                                                | Firehouse at 1419 E. Washington St   | 60.6                                  |
| H76                                                | Butchertown 1                        | 70.1                                  |

| <b>Historic Property Receptors<br/>(Continued)</b> |                                           |                                       |
|----------------------------------------------------|-------------------------------------------|---------------------------------------|
| <b>Receptor Number</b>                             | <b>Site Location</b>                      | <b>Existing Noise Level<br/>(dBA)</b> |
| H77                                                | Butchertown 2                             | 71.0                                  |
| H78                                                | 802-804 E. Main St                        | 66.4                                  |
| H79                                                | Albert Hess Furniture                     | 63.2                                  |
| H80                                                | Louisville Medical College                | 69.6                                  |
| H81                                                | Theodore Ahrens Trade High School         | 71.3                                  |
| H82                                                | National Biscuit Company                  | 64.6                                  |
| H83                                                | EJ O'Brien Office                         | 65.1                                  |
| H84                                                | Givens Headley & Tobacco Warehouse        | 68.9                                  |
| H85                                                | Conrad Rawls Shoe Company                 | 65.6                                  |
| H86                                                | Pennsylvania Lines Freight Depot          | 63.9                                  |
| H87                                                | Peaslee Gaulbert Paint manufacturing HD 1 | 70.0                                  |
| H88                                                | Peaslee Gaulbert Paint manufacturing HD 2 | 71.6                                  |
| H89                                                | Butchertown                               | 56.2                                  |
| H90                                                | Nitta Yuma                                | 51.7                                  |
| H91                                                | Riverside Dr.                             | 63.2                                  |
| H92                                                | 409 W. Maple                              | 57.0                                  |
| H93                                                | Harrods Creek Historic District           | 67.6                                  |

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leg**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A2 – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                 | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H1                                                                                                                                                              | 50.9                        | --                      | 59                         | 8                                     | --                                    | 67  | --                            |                   |
| H2                                                                                                                                                              | 50.1                        | --                      | 62                         | 12                                    | --                                    | 67  | 3                             | A                 |
| H3                                                                                                                                                              | 45.7                        | --                      | 63                         | 17                                    | --                                    | 67  | 3                             | A                 |
| H4                                                                                                                                                              | 46.0                        | --                      | 71                         | 25                                    | --                                    | 67  | 1                             | A                 |
| H13                                                                                                                                                             | 46.0                        | --                      | 61                         | 15                                    | --                                    | 67  | 3                             | A                 |
| H22                                                                                                                                                             | 49.2                        | --                      | 63                         | 14                                    | --                                    | 67  | 3                             | A                 |
| H62                                                                                                                                                             | 53.9                        | --                      | 60                         | 6                                     | --                                    | 67  | --                            |                   |
| H66                                                                                                                                                             | 52.1                        | --                      | 66                         | 14                                    | --                                    | 67  | 1                             | A                 |
| H74                                                                                                                                                             | 52.7                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H93                                                                                                                                                             | 67.6                        | --                      | 47                         | 0*                                    | --                                    | 67  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate A2

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A9 – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                 | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H1                                                                                                                                                              | 50.9                        | --                      | 60                         | 9                                     | --                                    | 67  | --                            |                   |
| H5                                                                                                                                                              | 51.4                        | --                      | 65                         | 14                                    | --                                    | 67  | 3                             | A                 |
| H6                                                                                                                                                              | 50.1                        | --                      | 57                         | 7                                     | --                                    | 67  | --                            |                   |
| H14                                                                                                                                                             | 52.1                        | --                      | 54                         | 2                                     | --                                    | 67  | --                            |                   |
| H15                                                                                                                                                             | 45.9                        | --                      | 60                         | 14                                    | --                                    | 67  | 3                             | A                 |
| H16                                                                                                                                                             | 42.1                        | --                      | 60                         | 18                                    | --                                    | 67  | 3                             | A                 |
| H17                                                                                                                                                             | 72.7                        | --                      | 65                         | 0*                                    | --                                    | 67  | --                            |                   |
| H18                                                                                                                                                             | 72.4                        | --                      | 66                         | 0*                                    | --                                    | 67  | 2                             | A                 |
| H19                                                                                                                                                             | 51.2                        | --                      | 66                         | 15                                    | --                                    | 67  | 1                             | A                 |
| H20                                                                                                                                                             | 49.8                        | --                      | 58                         | 8                                     | --                                    | 67  | --                            |                   |
| H22                                                                                                                                                             | 49.2                        | --                      | 56                         | 7                                     | --                                    | 67  | --                            |                   |
| H58                                                                                                                                                             | 48.8                        | --                      | 57                         | 8                                     | --                                    | 67  | --                            |                   |
| H59                                                                                                                                                             | 48.9                        | --                      | 65                         | 16                                    | --                                    | 67  | 3                             | A                 |
| H63                                                                                                                                                             | 53.0                        | --                      | 56                         | 3                                     | --                                    | 67  | --                            |                   |
| H74                                                                                                                                                             | 52.7                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H90                                                                                                                                                             | 51.7                        | --                      | 58                         | 6                                     | --                                    | 67  | --                            |                   |
| H93                                                                                                                                                             | 67.6                        | --                      | 54                         | 0*                                    | --                                    | 67  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate A9

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A13a (Partial Interchange at U.S. 42) – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                    | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H1                                                                                                                                                                                                 | 50.9                        | --                      | 60                         | 9                                     | --                                    | 67  | --                            |                   |
| H5                                                                                                                                                                                                 | 51.4                        | --                      | 60                         | 9                                     | --                                    | 67  | --                            |                   |
| H6                                                                                                                                                                                                 | 50.1                        | --                      | 54                         | 4                                     | --                                    | 67  | --                            |                   |
| H7                                                                                                                                                                                                 | 48.1                        | --                      | 55                         | 7                                     | --                                    | 67  | --                            |                   |
| H8                                                                                                                                                                                                 | 46.5                        | --                      | 62                         | 16                                    | --                                    | 67  | 3                             | A                 |
| H9                                                                                                                                                                                                 | 49.3                        | --                      | 64                         | 15                                    | --                                    | 67  | 3                             | A                 |
| H10                                                                                                                                                                                                | 53.2                        | --                      | 77                         | 24                                    | --                                    | 67  | 1                             | A                 |
| H11                                                                                                                                                                                                | 44.7                        | --                      | 65                         | 20                                    | --                                    | 67  | 3                             | A                 |
| H12                                                                                                                                                                                                | 43.2                        | --                      | 66                         | 23                                    | --                                    | 67  | 1                             | A                 |
| H13                                                                                                                                                                                                | 46.0                        | --                      | 58                         | 12                                    | --                                    | 67  | 4                             | A                 |
| H22                                                                                                                                                                                                | 49.2                        | --                      | 59                         | 10                                    | --                                    | 67  | 4                             | A                 |
| H63                                                                                                                                                                                                | 53.0                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H64                                                                                                                                                                                                | 67.5                        | --                      | 57                         | 0*                                    | --                                    | 67  | --                            |                   |
| H65                                                                                                                                                                                                | 49.2                        | --                      | 60                         | 11                                    | --                                    | 67  | 3                             | A                 |
| H74                                                                                                                                                                                                | 52.7                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H90                                                                                                                                                                                                | 51.7                        | --                      | 51                         | 0*                                    | --                                    | 67  | --                            |                   |
| H93                                                                                                                                                                                                | 67.6                        | --                      | 55                         | 0*                                    | --                                    | 67  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate A13a

**B** – Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A13b (Full Interchange at Wolf Pen Branch Road) –<br/>Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                                  | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H1                                                                                                                                                                                                               | 50.9                        | --                      | 59                         | 8                                     | --                                    | 67  | --                            |                   |
| H5                                                                                                                                                                                                               | 51.4                        | --                      | 59                         | 8                                     | --                                    | 67  | --                            |                   |
| H6                                                                                                                                                                                                               | 50.1                        | --                      | 53                         | 3                                     | --                                    | 67  | --                            |                   |
| H7                                                                                                                                                                                                               | 48.1                        | --                      | 57                         | 9                                     | --                                    | 67  | --                            |                   |
| H8                                                                                                                                                                                                               | 46.5                        | --                      | 62                         | 16                                    | --                                    | 67  | 3                             | A                 |
| H9                                                                                                                                                                                                               | 49.3                        | --                      | 64                         | 15                                    | --                                    | 67  | 3                             | A                 |
| H10                                                                                                                                                                                                              | 53.2                        | --                      | 77                         | 24                                    | --                                    | 67  | 1                             | A                 |
| H11                                                                                                                                                                                                              | 44.7                        | --                      | 65                         | 20                                    | --                                    | 67  | 3                             | A                 |
| H12                                                                                                                                                                                                              | 43.2                        | --                      | 67                         | 24                                    | --                                    | 67  | 1                             | A                 |
| H13                                                                                                                                                                                                              | 46.0                        | --                      | 58                         | 12                                    | --                                    | 67  | 4                             | A                 |
| H22                                                                                                                                                                                                              | 49.2                        | --                      | 59                         | 10                                    | --                                    | 67  | 4                             | A                 |
| H63                                                                                                                                                                                                              | 53.0                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H64                                                                                                                                                                                                              | 67.5                        | --                      | 57                         | 0*                                    | --                                    | 67  | --                            |                   |
| H65                                                                                                                                                                                                              | 49.2                        | --                      | 60                         | 11                                    | --                                    | 67  | 3                             | A                 |
| H74                                                                                                                                                                                                              | 52.7                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H90                                                                                                                                                                                                              | 51.7                        | --                      | 52                         | 0*                                    | --                                    | 67  | --                            |                   |
| H93                                                                                                                                                                                                              | 67.6                        | --                      | 55                         | 0*                                    | --                                    | 67  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate A13b

**B** – Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE – SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A15a (Partial Interchange at U.S. 42) – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                    | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H1                                                                                                                                                                                                 | 50.9                        | --                      | 60                         | 9                                     | --                                    | 67  | --                            |                   |
| H5                                                                                                                                                                                                 | 51.4                        | --                      | 60                         | 9                                     | --                                    | 67  | --                            |                   |
| H6                                                                                                                                                                                                 | 50.1                        | --                      | 53                         | 3                                     | --                                    | 67  | --                            |                   |
| H7                                                                                                                                                                                                 | 48.1                        | --                      | 54                         | 6                                     | --                                    | 67  | --                            |                   |
| H8                                                                                                                                                                                                 | 46.5                        | --                      | 62                         | 16                                    | --                                    | 67  | 3                             | A                 |
| H9                                                                                                                                                                                                 | 49.3                        | --                      | 65                         | 16                                    | --                                    | 67  | 3                             | A                 |
| H10                                                                                                                                                                                                | 53.2                        | --                      | 75                         | 22                                    | --                                    | 67  | 1                             | A                 |
| H11                                                                                                                                                                                                | 44.7                        | --                      | 68                         | 23                                    | --                                    | 67  | 1                             | A                 |
| H12                                                                                                                                                                                                | 43.2                        | --                      | 71                         | 28                                    | --                                    | 67  | 1                             | A                 |
| H13                                                                                                                                                                                                | 46.0                        | --                      | 63                         | 17                                    | --                                    | 67  | 3                             | A                 |
| H22                                                                                                                                                                                                | 49.2                        | --                      | 61                         | 12                                    | --                                    | 67  | 3                             | A                 |
| H63                                                                                                                                                                                                | 53.0                        | --                      | 59                         | 6                                     | --                                    | 67  | --                            |                   |
| H64                                                                                                                                                                                                | 67.5                        | --                      | 57                         | 0*                                    | --                                    | 67  | --                            |                   |
| H66                                                                                                                                                                                                | 52.1                        | --                      | 61                         | 9                                     | --                                    | 67  | --                            |                   |
| H74                                                                                                                                                                                                | 52.7                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H90                                                                                                                                                                                                | 51.7                        | --                      | 51                         | 0*                                    | --                                    | 67  | --                            |                   |
| H93                                                                                                                                                                                                | 67.6                        | --                      | 55                         | 0*                                    | --                                    | 67  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate A15a

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative A15b (Full Interchange at Wolf Pen Branch Road) –<br/>Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                                  | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H1                                                                                                                                                                                                               | 50.9                        | --                      | 59                         | 8                                     | --                                    | 67  | --                            |                   |
| H5                                                                                                                                                                                                               | 51.4                        | --                      | 58                         | 7                                     | --                                    | 67  | --                            |                   |
| H6                                                                                                                                                                                                               | 50.1                        | --                      | 52                         | 2                                     | --                                    | 67  | --                            |                   |
| H7                                                                                                                                                                                                               | 48.1                        | --                      | 54                         | 6                                     | --                                    | 67  | --                            |                   |
| H8                                                                                                                                                                                                               | 46.5                        | --                      | 62                         | 16                                    | --                                    | 67  | 3                             | A                 |
| H9                                                                                                                                                                                                               | 49.3                        | --                      | 65                         | 16                                    | --                                    | 67  | 3                             | A                 |
| H10                                                                                                                                                                                                              | 53.2                        | --                      | 75                         | 22                                    | --                                    | 67  | 1                             | A                 |
| H11                                                                                                                                                                                                              | 44.7                        | --                      | 68                         | 23                                    | --                                    | 67  | 1                             | A                 |
| H12                                                                                                                                                                                                              | 43.2                        | --                      | 71                         | 28                                    | --                                    | 67  | 1                             | A                 |
| H13                                                                                                                                                                                                              | 46.0                        | --                      | 63                         | 17                                    | --                                    | 67  | 3                             | A                 |
| H22                                                                                                                                                                                                              | 49.2                        | --                      | 61                         | 12                                    | --                                    | 67  | 3                             | A                 |
| H63                                                                                                                                                                                                              | 53.0                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H64                                                                                                                                                                                                              | 67.5                        | --                      | 57                         | 0*                                    | --                                    | 67  | --                            |                   |
| H66                                                                                                                                                                                                              | 52.1                        | --                      | 61                         | 9                                     | --                                    | 67  | --                            |                   |
| H74                                                                                                                                                                                                              | 52.7                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H90                                                                                                                                                                                                              | 51.7                        | --                      | 50                         | 0*                                    | --                                    | 67  | --                            |                   |
| H93                                                                                                                                                                                                              | 67.6                        | --                      | 55                         | 0*                                    | --                                    | 67  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate A15b

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification<br/>For Alternative A16 – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                            | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H1                                                                                                                                                         | 50.9                        | --                      | 59                         | 8                                     | --                                    | 67  | --                            |                   |
| H2                                                                                                                                                         | 50.1                        | --                      | 59                         | 9                                     | --                                    | 67  | --                            |                   |
| H3                                                                                                                                                         | 45.7                        | --                      | 65                         | 19                                    | --                                    | 67  | 3                             | A                 |
| H4                                                                                                                                                         | 46.0                        | --                      | 55                         | 9                                     | --                                    | 67  | --                            |                   |
| H10                                                                                                                                                        | 53.2                        | --                      | 61                         | 8                                     | --                                    | 67  | --                            |                   |
| H11                                                                                                                                                        | 44.7                        | --                      | 67                         | 22                                    | --                                    | 67  | 1                             | A                 |
| H12                                                                                                                                                        | 43.2                        | --                      | 63                         | 20                                    | --                                    | 67  | 3                             | A                 |
| H13                                                                                                                                                        | 46.0                        | --                      | 68                         | 22                                    | --                                    | 67  | 1                             | A                 |
| H22                                                                                                                                                        | 49.2                        | --                      | 61                         | 12                                    | --                                    | 67  | 3                             | A                 |
| H66                                                                                                                                                        | 52.1                        | --                      | 61                         | 9                                     | --                                    | 67  | --                            |                   |
| H74                                                                                                                                                        | 52.7                        | --                      | 58                         | 5                                     | --                                    | 67  | --                            |                   |
| H93                                                                                                                                                        | 67.6                        | --                      | 53                         | 0*                                    | --                                    | 67  | --                            |                   |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate A16

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative B1 – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                 | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H21                                                                                                                                                             | 64.1                        | --                      | 67                         | 3                                     | --                                    | 67  | 2                             | A                 |
| H22                                                                                                                                                             | 49.2                        | --                      | 63                         | 14                                    | --                                    | 67  | 3                             | A                 |
| H23                                                                                                                                                             | 59.0                        | --                      | 68                         | 9                                     | --                                    | 67  | 2                             | A                 |
| H24                                                                                                                                                             | 56.6                        | --                      | 64                         | 7                                     | --                                    | 67  | --                            |                   |
| H25                                                                                                                                                             | 56.2                        | --                      | 60                         | 4                                     | --                                    | 67  | --                            |                   |
| H26                                                                                                                                                             | 52.2                        | --                      | 67                         | 15                                    | --                                    | 67  | 1                             | A                 |
| H56                                                                                                                                                             | 55.2                        | --                      | 61                         | 6                                     | --                                    | 67  | --                            |                   |
| H57                                                                                                                                                             | 49.7                        | --                      | 65                         | 15                                    | --                                    | 67  | 3                             | A                 |
| H60                                                                                                                                                             | 60.8                        | --                      | 70                         | 9                                     | --                                    | 67  | 2                             | A                 |
| H67                                                                                                                                                             | 63.3                        | --                      | 62                         | 0*                                    | --                                    | 67  | --                            |                   |
| H68                                                                                                                                                             | 52.5                        | --                      | 65                         | 13                                    | --                                    | 67  | 3                             | A                 |
| H69                                                                                                                                                             | 70.1                        | --                      | 74                         | 4                                     | --                                    | 67  | 2                             | A                 |
| H70                                                                                                                                                             | 55.5                        | --                      | 68                         | 13                                    | --                                    | 67  | 1                             | A                 |
| H71                                                                                                                                                             | 65.0                        | --                      | 60                         | 0*                                    | --                                    | 67  | --                            |                   |
| H72                                                                                                                                                             | 50.0                        | --                      | 63                         | 13                                    | --                                    | 67  | 3                             | A                 |
| H73                                                                                                                                                             | 55.7                        | --                      | 65                         | 9                                     | --                                    | 67  | --                            |                   |
| H74                                                                                                                                                             | 52.7                        | --                      | 56                         | 3                                     | --                                    | 67  | --                            |                   |
| 105                                                                                                                                                             | 52.8                        | --                      | 66                         | 13                                    | --                                    | 67  | 1                             | A                 |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate B1

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative C1 With An In-Place Kennedy Interchange – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                      | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H27                                                                                                                                                                                                  | 71.3                        | 62                      | 65                         | 0*                                    | 3                                     | 67  | --                            |                   |
| H28                                                                                                                                                                                                  | 70.1                        | 63                      | 68                         | 0*                                    | 5                                     | 67  | 2                             | A                 |
| H29                                                                                                                                                                                                  | 73.1                        | 62                      | 67                         | 0*                                    | 5                                     | 67  | 2                             | A                 |
| H30                                                                                                                                                                                                  | 63.2                        | 65                      | 66                         | 3                                     | 1                                     | 72  | 2                             | B                 |
| H31                                                                                                                                                                                                  | 65.1                        | 75                      | 81                         | 16                                    | 6                                     | 72  | 1                             | A                 |
| H32                                                                                                                                                                                                  | 69.9                        | 74                      | 78                         | 8                                     | 4                                     | 72  | 2                             | A                 |
| H33                                                                                                                                                                                                  | 61.5                        | 66                      | 67                         | 6                                     | 1                                     | 67  | 2                             | B                 |
| H34                                                                                                                                                                                                  | 64.2                        | 61                      | 62                         | 0*                                    | 1                                     | 67  | --                            |                   |
| H35                                                                                                                                                                                                  | 58.3                        | 61                      | 62                         | 4                                     | 1                                     | 67  | --                            |                   |
| H36                                                                                                                                                                                                  | 67.1                        | 64                      | 69                         | 2                                     | 5                                     | 72  | --                            |                   |
| H37                                                                                                                                                                                                  | 57.6                        | 69                      | 67                         | 9                                     | -2                                    | 67  | 2                             | B                 |
| H38                                                                                                                                                                                                  | 65.0                        | 80                      | 83                         | 18                                    | 3                                     | 67  | 1                             | B                 |
| H39                                                                                                                                                                                                  | 69.5                        | 81                      | 80                         | 11                                    | -1                                    | 67  | 1                             | B                 |
| H40                                                                                                                                                                                                  | 69.0                        | 67                      | 61                         | 0*                                    | -6                                    | 72  | --                            |                   |
| H41                                                                                                                                                                                                  | 65.8                        | 70                      | 62                         | 0*                                    | -8                                    | 72  | --                            |                   |
| H42                                                                                                                                                                                                  | 70.8                        | 79                      | 59                         | 0*                                    | -20                                   | 72  | --                            |                   |
| H43                                                                                                                                                                                                  | 69.8                        | 81                      | 58                         | 0*                                    | -23                                   | 67  | --                            |                   |
| H44                                                                                                                                                                                                  | 66.8                        | 72                      | 52                         | 0*                                    | -20                                   | 72  | --                            |                   |
| H45                                                                                                                                                                                                  | 69.9                        | 75                      | 52                         | 0*                                    | -23                                   | 72  | --                            |                   |
| H46                                                                                                                                                                                                  | 69.5                        | 78                      | 53                         | 0*                                    | -25                                   | 72  | --                            |                   |
| H47                                                                                                                                                                                                  | 67.1                        | 78                      | 52                         | 0*                                    | -26                                   | 72  | --                            |                   |
| H48                                                                                                                                                                                                  | 64.8                        | 76                      | 51                         | 0*                                    | -25                                   | 72  | --                            |                   |
| H49                                                                                                                                                                                                  | 60.2                        | 72                      | 51                         | 0*                                    | -21                                   | 72  | --                            |                   |
| H50                                                                                                                                                                                                  | 62.5                        | 64                      | 65                         | 3                                     | 1                                     | 72  | --                            |                   |
| H51                                                                                                                                                                                                  | 57.9                        | 66                      | 69                         | 11                                    | 3                                     | 72  | 3                             | B                 |
| H52                                                                                                                                                                                                  | 60.0                        | 69                      | 69                         | 9                                     | 0                                     | 72  | 2                             | B                 |
| H53                                                                                                                                                                                                  | 60.4                        | 67                      | 66                         | 6                                     | -1                                    | 72  | 2                             | B                 |
| H54                                                                                                                                                                                                  | 66.8                        | 68                      | 67                         | 0*                                    | -1                                    | 72  |                               |                   |
| H55                                                                                                                                                                                                  | 58.5                        | 56                      | 55                         | 0*                                    | -1                                    | 72  | --                            |                   |
| H61                                                                                                                                                                                                  | 64.9                        | 60                      | 64                         | 0*                                    | 4                                     | 67  | --                            |                   |
| H75                                                                                                                                                                                                  | 60.6                        | 75                      | 66                         | 5                                     | -9                                    | 72  | --                            |                   |
| H76                                                                                                                                                                                                  | 70.1                        | 64                      | 61                         | 0*                                    | -3                                    | 67  | --                            |                   |
| H77                                                                                                                                                                                                  | 71.0                        | 60                      | 64                         | 0*                                    | 4                                     | 67  | --                            |                   |
| H78                                                                                                                                                                                                  | 66.4                        | 62                      | 65                         | 0*                                    | 3                                     | 67  | --                            |                   |
| H79                                                                                                                                                                                                  | 63.2                        | 64                      | 76                         | 13                                    | 12                                    | 72  | 1                             | A                 |
| H80                                                                                                                                                                                                  | 69.6                        | 75                      | 73                         | 3                                     | -2                                    | 67  | 2                             | B                 |
| H81                                                                                                                                                                                                  | 71.3                        | 74                      | 74                         | 3                                     | 0                                     | 67  | 2                             | B                 |
| H89                                                                                                                                                                                                  | 56.2                        | 66                      | 68                         | 12                                    | 2                                     | 67  | 1                             | B                 |
| H91                                                                                                                                                                                                  | 63.2                        | 60                      | 61                         | 0*                                    | 1                                     | 67  | --                            |                   |
| H92                                                                                                                                                                                                  | 57.0                        | 68                      | 69                         | 12                                    | 1                                     | 67  | 1                             | B                 |

**A** -- Possible barrier location (feasibility/reasonableness study necessary) for alternate C1 In-Place

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative C1 With A Relocated Kennedy Interchange – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                                                      | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H27                                                                                                                                                                                                  | 71.3                        | 62                      | 68                         | 0*                                    | 6                                     | 67  | 2                             | A                 |
| H28                                                                                                                                                                                                  | 70.1                        | 63                      | 73                         | 3                                     | 10                                    | 67  | 2                             | A                 |
| H29                                                                                                                                                                                                  | 73.1                        | 62                      | 70                         | 0*                                    | 8                                     | 67  | 2                             | A                 |
| H30                                                                                                                                                                                                  | 63.2                        | 65                      | 66                         | 3                                     | 1                                     | 72  | 2                             | B                 |
| H31                                                                                                                                                                                                  | 65.1                        | 75                      | 80                         | 15                                    | 5                                     | 72  | 1                             | A                 |
| H32                                                                                                                                                                                                  | 69.9                        | 74                      | 78                         | 8                                     | 4                                     | 72  | 2                             | A                 |
| H33                                                                                                                                                                                                  | 61.5                        | 66                      | 67                         | 6                                     | 1                                     | 67  | 2                             | B                 |
| H34                                                                                                                                                                                                  | 64.2                        | 61                      | 62                         | 0*                                    | 1                                     | 67  | --                            |                   |
| H35                                                                                                                                                                                                  | 58.3                        | 61                      | 62                         | 4                                     | 1                                     | 67  | --                            |                   |
| H36                                                                                                                                                                                                  | 67.1                        | 64                      | 69                         | 2                                     | 5                                     | 72  | --                            |                   |
| H37                                                                                                                                                                                                  | 57.6                        | 69                      | 68                         | 10                                    | -1                                    | 67  | 1                             | B                 |
| H38                                                                                                                                                                                                  | 65.0                        | 80                      | 80                         | 15                                    | 0                                     | 67  | 1                             | B                 |
| H39                                                                                                                                                                                                  | 69.5                        | 81                      | 79                         | 10                                    | -2                                    | 67  | 1                             | B                 |
| H40                                                                                                                                                                                                  | 69.0                        | 67                      | 62                         | 0*                                    | -5                                    | 72  | --                            |                   |
| H41                                                                                                                                                                                                  | 65.8                        | 70                      | 63                         | 0*                                    | -7                                    | 72  | --                            |                   |
| H42                                                                                                                                                                                                  | 70.8                        | 79                      | 59                         | 0*                                    | -20                                   | 72  | --                            |                   |
| H43                                                                                                                                                                                                  | 69.8                        | 81                      | 58                         | 0*                                    | -23                                   | 67  | --                            |                   |
| H44                                                                                                                                                                                                  | 66.8                        | 72                      | 52                         | 0*                                    | -20                                   | 72  | --                            |                   |
| H45                                                                                                                                                                                                  | 69.9                        | 75                      | 52                         | 0*                                    | -23                                   | 72  | --                            |                   |
| H46                                                                                                                                                                                                  | 69.5                        | 78                      | 53                         | 0*                                    | -25                                   | 72  | --                            |                   |
| H47                                                                                                                                                                                                  | 67.1                        | 78                      | 52                         | 0*                                    | -26                                   | 72  | --                            |                   |
| H48                                                                                                                                                                                                  | 64.8                        | 76                      | 51                         | 0*                                    | -25                                   | 72  | --                            |                   |
| H49                                                                                                                                                                                                  | 60.2                        | 72                      | 51                         | 0*                                    | -21                                   | 72  | --                            |                   |
| H50                                                                                                                                                                                                  | 62.5                        | 64                      | 65                         | 3                                     | 1                                     | 72  | --                            |                   |
| H51                                                                                                                                                                                                  | 57.9                        | 66                      | 69                         | 11                                    | 3                                     | 72  | 3                             | B                 |
| H52                                                                                                                                                                                                  | 60.0                        | 69                      | 69                         | 9                                     | 0                                     | 72  | --                            |                   |
| H53                                                                                                                                                                                                  | 60.4                        | 67                      | 66                         | 6                                     | -1                                    | 72  | --                            |                   |
| H54                                                                                                                                                                                                  | 66.8                        | 68                      | 67                         | 0*                                    | -1                                    | 72  | --                            |                   |
| H55                                                                                                                                                                                                  | 58.5                        | 56                      | 56                         | 0*                                    | 0                                     | 72  | --                            |                   |
| H61                                                                                                                                                                                                  | 64.9                        | 60                      | 76                         | 11                                    | 16                                    | 67  | 1                             | A                 |
| H75                                                                                                                                                                                                  | 60.6                        | 75                      | 68                         | 7                                     | -7                                    | 72  | --                            |                   |
| H76                                                                                                                                                                                                  | 70.1                        | 64                      | 62                         | 0*                                    | -2                                    | 67  | --                            |                   |
| H77                                                                                                                                                                                                  | 71.0                        | 60                      | 65                         | 0*                                    | 5                                     | 67  | --                            |                   |
| H78                                                                                                                                                                                                  | 66.4                        | 62                      | 65                         | 0*                                    | 3                                     | 67  | --                            |                   |
| H79                                                                                                                                                                                                  | 63.2                        | 64                      | 75                         | 12                                    | 11                                    | 72  | 1                             | A                 |
| H80                                                                                                                                                                                                  | 69.6                        | 75                      | 75                         | 5                                     | 0                                     | 67  | --                            |                   |
| H81                                                                                                                                                                                                  | 71.3                        | 74                      | 75                         | 4                                     | 1                                     | 67  | --                            |                   |
| H89                                                                                                                                                                                                  | 56.2                        | 66                      | 70                         | 14                                    | 4                                     | 67  | 1                             | A                 |
| H91                                                                                                                                                                                                  | 63.2                        | 60                      | 61                         | 0*                                    | 1                                     | 67  | --                            |                   |
| H92                                                                                                                                                                                                  | 57.0                        | 68                      | 69                         | 12                                    | 1                                     | 67  | 1                             | B                 |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate C1 Relocated

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative C2 – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                 | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H27                                                                                                                                                             | 71.3                        | 62                      | 64                         | 0*                                    | 2                                     | 67  | --                            |                   |
| H28                                                                                                                                                             | 70.1                        | 63                      | 67                         | 0*                                    | 4                                     | 67  | 2                             | A                 |
| H29                                                                                                                                                             | 73.1                        | 62                      | 66                         | 0*                                    | 4                                     | 67  | 2                             | A                 |
| H30                                                                                                                                                             | 63.2                        | 65                      | 64                         | 1                                     | -1                                    | 72  | --                            |                   |
| H31                                                                                                                                                             | 65.1                        | 75                      | 76                         | 11                                    | 1                                     | 72  | 1                             | B                 |
| H32                                                                                                                                                             | 69.9                        | 74                      | 74                         | 4                                     | 0                                     | 72  | 2                             | B                 |
| H33                                                                                                                                                             | 61.5                        | 66                      | 65                         | 4                                     | -1                                    | 67  | --                            |                   |
| H34                                                                                                                                                             | 64.2                        | 61                      | 61                         | 0*                                    | 0                                     | 67  | --                            |                   |
| H35                                                                                                                                                             | 58.3                        | 61                      | 62                         | 4                                     | 1                                     | 67  | --                            |                   |
| H36                                                                                                                                                             | 67.1                        | 64                      | 65                         | 0*                                    | 1                                     | 72  | --                            |                   |
| H37                                                                                                                                                             | 57.6                        | 69                      | 70                         | 12                                    | 1                                     | 67  | 1                             | B                 |
| H38                                                                                                                                                             | 65.0                        | 80                      | 80                         | 15                                    | 0                                     | 67  | 1                             | B                 |
| H39                                                                                                                                                             | 69.5                        | 81                      | 80                         | 11                                    | -1                                    | 67  | 1                             | B                 |
| H40                                                                                                                                                             | 69.0                        | 67                      | 63                         | 0*                                    | -4                                    | 72  | --                            |                   |
| H41                                                                                                                                                             | 65.8                        | 70                      | 64                         | 0*                                    | -6                                    | 72  | --                            |                   |
| H42                                                                                                                                                             | 70.8                        | 79                      | 68                         | 0*                                    | -11                                   | 72  | --                            |                   |
| H43                                                                                                                                                             | 69.8                        | 81                      | 80                         | 10                                    | -1                                    | 67  | 1                             | B                 |
| H44                                                                                                                                                             | 66.8                        | 72                      | 72                         | 5                                     | 0                                     | 72  | 2                             | A                 |
| H45                                                                                                                                                             | 69.9                        | 75                      | 75                         | 5                                     | 0                                     | 72  | 2                             | A                 |
| H46                                                                                                                                                             | 69.5                        | 78                      | 75                         | 6                                     | -3                                    | 72  | 2                             | A                 |
| H47                                                                                                                                                             | 67.1                        | 78                      | 75                         | 8                                     | -3                                    | 72  | 2                             | A                 |
| H48                                                                                                                                                             | 64.8                        | 76                      | 74                         | 9                                     | -2                                    | 72  | 2                             | A                 |
| H49                                                                                                                                                             | 60.2                        | 72                      | 72                         | 12                                    | 0                                     | 72  | 1                             | A                 |
| H50                                                                                                                                                             | 62.5                        | 64                      | 69                         | 7                                     | 5                                     | 72  | --                            |                   |
| H51                                                                                                                                                             | 57.9                        | 66                      | 69                         | 11                                    | 3                                     | 72  | 3                             | B                 |
| H52                                                                                                                                                             | 60.0                        | 69                      | 70                         | 10                                    | 1                                     | 72  | 3                             | B                 |
| H53                                                                                                                                                             | 60.4                        | 67                      | 74                         | 14                                    | 7                                     | 72  | 1                             | A                 |
| H54                                                                                                                                                             | 66.8                        | 68                      | 71                         | 4                                     | 3                                     | 72  | 2                             | B                 |
| H55                                                                                                                                                             | 58.5                        | 56                      | 61                         | 3                                     | 5                                     | 72  | --                            |                   |
| H61                                                                                                                                                             | 64.9                        | 60                      | 63                         | 0*                                    | 3                                     | 67  | --                            |                   |
| H47A                                                                                                                                                            | 69.5                        | 75                      | 76                         | 7                                     | 1                                     | 72  | 2                             | B                 |
| H75                                                                                                                                                             | 60.6                        | 64                      | 65                         | 4                                     | 1                                     | 72  | --                            |                   |
| H76                                                                                                                                                             | 70.1                        | 60                      | 61                         | 0*                                    | 1                                     | 67  | --                            |                   |
| H77                                                                                                                                                             | 71.0                        | 62                      | 63                         | 0*                                    | 1                                     | 67  | --                            |                   |
| H78                                                                                                                                                             | 66.4                        | 64                      | 64                         | 0*                                    | 0                                     | 67  | --                            |                   |
| H79                                                                                                                                                             | 63.2                        | 75                      | 76                         | 13                                    | 1                                     | 72  | 1                             | A                 |
| H80                                                                                                                                                             | 69.6                        | 74                      | 71                         | 1                                     | -3                                    | 67  | 2                             | B                 |
| H81                                                                                                                                                             | 71.3                        | 74                      | 73                         | 2                                     | -1                                    | 67  | 2                             | B                 |
| H82                                                                                                                                                             | 64.6                        | 71                      | 73                         | 8                                     | 2                                     | 72  | 2                             | B                 |
| H83                                                                                                                                                             | 65.1                        | 66                      | 66                         | 1                                     | 0                                     | 72  | --                            |                   |
| H84                                                                                                                                                             | 68.9                        | 63                      | 64                         | 0*                                    | 1                                     | 72  | --                            |                   |

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative C2 – Historic Properties (Continued)</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                             | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H85                                                                                                                                                                         | 65.6                        | 66                      | 68                         | 2                                     | 2                                     | 72  | --                            |                   |
| H86                                                                                                                                                                         | 63.9                        | 59                      | 68                         | 4                                     | 9                                     | 72  | --                            |                   |
| H87                                                                                                                                                                         | 70.7                        | 53                      | 76                         | 5                                     | 23                                    | 72  | 2                             | A                 |
| H88                                                                                                                                                                         | 71.6                        | 54                      | 76                         | 4                                     | 22                                    | 72  | 2                             | A                 |
| H89                                                                                                                                                                         | 56.2                        | 66                      | 67                         | 11                                    | 1                                     | 67  | 1                             | B                 |
| H91                                                                                                                                                                         | 63.2                        | 60                      | 65                         | 2                                     | 5                                     | 67  | --                            |                   |
| H92                                                                                                                                                                         | 57.0                        | 68                      | 67                         | 10                                    | -1                                    | 67  | 1                             | B                 |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate C2

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

**Appendix B.2 / Table 4 – Historic Properties Noise Abatement Tables - dBA Leq (Continued)**

| <b>LOUISVILLE - SOUTHERN INDIANA<br/>OHIO RIVER BRIDGES PROJECT</b><br><b>Noise Abatement Classification</b><br><b>For Alternative C3 – Historic Properties</b> |                             |                         |                            |                                       |                                       |     |                               |                   |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|-------------------------|----------------------------|---------------------------------------|---------------------------------------|-----|-------------------------------|-------------------|
| Receptor Number                                                                                                                                                 | 1999/2000 Existing Measured | 2025 No-Build Predicted | 2025 Predicted Noise Level | Difference Between Existing and Build | Difference Between No-Build and Build | NAC | Category of Impact From Build | Barrier Abatement |
| H27                                                                                                                                                             | 71.3                        | 62                      | 77                         | 6                                     | 15                                    | 67  | 2                             | A                 |
| H28                                                                                                                                                             | 70.1                        | 63                      | 76                         | 6                                     | 13                                    | 67  | 2                             | A                 |
| H29                                                                                                                                                             | 73.1                        | 62                      | 70                         | 0*                                    | 8                                     | 67  | 2                             | A                 |
| H30                                                                                                                                                             | 63.2                        | 65                      | 64                         | 1                                     | -1                                    | 72  | --                            |                   |
| H31                                                                                                                                                             | 65.1                        | 75                      | 74                         | 9                                     | -1                                    | 72  | 2                             | B                 |
| H32                                                                                                                                                             | 69.9                        | 74                      | 73                         | 3                                     | -1                                    | 72  | 2                             | A                 |
| H33                                                                                                                                                             | 61.5                        | 66                      | 65                         | 4                                     | -1                                    | 67  | --                            |                   |
| H34                                                                                                                                                             | 64.2                        | 61                      | 61                         | 0*                                    | 0                                     | 67  | --                            |                   |
| H35                                                                                                                                                             | 58.3                        | 61                      | 63                         | 5                                     | 2                                     | 67  | --                            |                   |
| H36                                                                                                                                                             | 67.1                        | 64                      | 71                         | 4                                     | 7                                     | 72  | 2                             | A                 |
| H37                                                                                                                                                             | 57.6                        | 69                      | 68                         | 10                                    | -1                                    | 67  | 1                             | B                 |
| H38                                                                                                                                                             | 65.0                        | 80                      | 77                         | 12                                    | -3                                    | 67  | 1                             | B                 |
| H39                                                                                                                                                             | 69.5                        | 81                      | 83                         | 14                                    | 2                                     | 67  | 1                             | B                 |
| H40                                                                                                                                                             | 69.0                        | 67                      | 66                         | 0*                                    | -1                                    | 72  | --                            |                   |
| H41                                                                                                                                                             | 65.8                        | 70                      | 69                         | 3                                     | -1                                    | 72  | --                            |                   |
| H42                                                                                                                                                             | 70.8                        | 79                      | 67                         | 0*                                    | -12                                   | 72  | --                            |                   |
| H43                                                                                                                                                             | 69.8                        | 81                      | 63                         | 0*                                    | -18                                   | 67  | --                            |                   |
| H44                                                                                                                                                             | 66.8                        | 72                      | 53                         | 0*                                    | -19                                   | 72  | --                            |                   |
| H45                                                                                                                                                             | 69.9                        | 75                      | 53                         | 0*                                    | -22                                   | 72  | --                            |                   |
| H46                                                                                                                                                             | 69.5                        | 78                      | 54                         | 0*                                    | -24                                   | 72  | --                            |                   |
| H47                                                                                                                                                             | 67.1                        | 78                      | 53                         | 0*                                    | -25                                   | 72  | --                            |                   |
| H48                                                                                                                                                             | 64.8                        | 76                      | 52                         | 0*                                    | -24                                   | 72  | --                            |                   |
| H49                                                                                                                                                             | 60.2                        | 72                      | 52                         | 0*                                    | -20                                   | 72  | --                            |                   |
| H50                                                                                                                                                             | 62.5                        | 64                      | 66                         | 4                                     | 2                                     | 72  | --                            |                   |
| H51                                                                                                                                                             | 57.9                        | 66                      | 69                         | 11                                    | 3                                     | 72  | 3                             | B                 |
| H52                                                                                                                                                             | 60.0                        | 69                      | 68                         | 8                                     | -1                                    | 72  | --                            |                   |
| H53                                                                                                                                                             | 60.4                        | 67                      | 66                         | 6                                     | -1                                    | 72  | --                            |                   |
| H54                                                                                                                                                             | 66.8                        | 68                      | 67                         | 0*                                    | -1                                    | 72  | --                            |                   |
| H55                                                                                                                                                             | 58.5                        | 56                      | 56                         | 0*                                    | 0                                     | 72  | --                            |                   |
| H61                                                                                                                                                             | 64.9                        | 60                      | 75                         | 10                                    | 15                                    | 67  | 1                             | A                 |
| H75                                                                                                                                                             | 60.6                        | 75                      | 70                         | 9                                     | -5                                    | 72  | --                            |                   |
| H76                                                                                                                                                             | 70.1                        | 64                      | 62                         | 0*                                    | -2                                    | 67  | --                            |                   |
| H77                                                                                                                                                             | 71.0                        | 60                      | 64                         | 0*                                    | 4                                     | 67  | --                            |                   |
| H78                                                                                                                                                             | 66.4                        | 62                      | 65                         | 0*                                    | 3                                     | 67  | --                            |                   |
| H79                                                                                                                                                             | 63.2                        | 64                      | 73                         | 10                                    | 9                                     | 72  | 1                             | A                 |
| H80                                                                                                                                                             | 69.6                        | 75                      | 73                         | 3                                     | -2                                    | 67  | 2                             | B                 |
| H81                                                                                                                                                             | 71.3                        | 74                      | 73                         | 2                                     | -1                                    | 67  | 2                             | B                 |
| H89                                                                                                                                                             | 56.2                        | 66                      | 70                         | 14                                    | 4                                     | 67  | 1                             | A                 |
| H91                                                                                                                                                             | 63.2                        | 60                      | 61                         | 0*                                    | 1                                     | 67  | --                            |                   |
| H92                                                                                                                                                             | 57.0                        | 68                      | 68                         | 11                                    | 0                                     | 67  | 1                             | A                 |

**A** – Possible barrier location (feasibility/reasonableness study necessary) for alternate C3

**B** -- Proposed project does not appreciably alter (>3 dBA) future noise levels.

\* -- Project does not increase the noise level for this location

## **Appendix B.3**

---

# **WETLANDS INFORMATION**

Table 1  
Summary Table of Potential Wetlands

TABLE I. SUMMARY TABLE OF POTENTIAL WETLANDS

| Alpha-Numeric Code | Cowardin/NWI Classification | Field Determination <sup>1</sup> | Field Classification <sup>2</sup> | Meets USACOE Jurisdictional Criteria <sup>3</sup> | Indicator Lacking <sup>4</sup> | Notes                        |
|--------------------|-----------------------------|----------------------------------|-----------------------------------|---------------------------------------------------|--------------------------------|------------------------------|
| ID-WE-10           | PFO1Ah                      | Non-Wetland                      |                                   | Not Applicable                                    | V, S                           |                              |
| ID-WE-6            | PFO1A                       | Non-Wetland                      |                                   | Not Applicable                                    | S                              |                              |
| ID-WE-8            | PSS1Ch                      | Non-Wetland                      |                                   | Not Applicable                                    | V, S                           |                              |
| ID-WE-9            | PSS1Ah                      | Non-Wetland                      |                                   | Not Applicable                                    | V, S                           |                              |
| IE-WE-1            | PFO1A                       | Non-Wetland                      |                                   | Not Applicable                                    | S                              | Shale substrate, No Soil     |
| IE-WE-100          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Lentzier Creek Tributary     |
| IE-WE-100A         | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                              |
| IE-WE-101          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Lancassange Creek Tributary  |
| IE-WE-102          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                              |
| IE-WE-103          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                              |
| IE-WE-104          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                              |
| IE-WE-105          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                              |
| IE-WE-106          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                              |
| IE-WE-107          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                              |
| IE-WE-108          | Potential                   | Headwater                        |                                   |                                                   |                                |                              |
| IE-WE-11           | PEMA                        | Non-Wetland                      |                                   | Not Applicable                                    | V                              | No evidence, Corn field      |
| IE-WE-13           | R4SBC                       | Wetland                          | R4SBC                             | Yes                                               |                                |                              |
| IE-WE-13A          | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | V,H,S                          |                              |
| IE-WE-17           | PEMA                        | Wetland                          | PEMA/PUBGh                        | Yes -hydric soil unit inclusion                   |                                | Ginat inclusion in low spots |
| IE-WE-18           | PEMA                        | Non-Wetland                      |                                   | Not Applicable                                    | V, H, S                        | No Evidence                  |
| IE-WE-2            | PUBGh                       | Wetland                          | Channel                           | Yes                                               |                                |                              |
| IE-WE-30           | R3UBh                       | Wetland                          | R3UBh                             | Yes                                               |                                | Lentzier Creek               |
| IE-WE-31           | PFO1A                       | Wetland                          | PFO1A                             | Yes                                               |                                | Multiple data points         |
| IE-WE-32           | PFO1A                       | Non-Wetland                      |                                   | Not Applicable                                    | V,H,S                          |                              |
| IE-WE-33           | PFO1A                       | Non-Wetland                      |                                   | Not Applicable                                    | V,H                            |                              |
| IE-WE-35           | PFO1A                       | Wetland                          | PFO1A/PFO1Hb                      | Yes                                               |                                | Beaver Dam                   |
| IE-WE-38           | PUBGh                       | Wetland                          | PUBGh                             | No -upland soil unit, no channel                  |                                | Corydon soil, farm pond      |

Table 1  
Summary Table of Potential Wetlands

| Alpha-Numeric Code | Cowardin/NWI Classification | Field Determination <sup>1</sup> | Field Classification <sup>2</sup> | Meets USACOE Jurisdictional Criteria <sup>3</sup> | Indicator Lacking <sup>4</sup> | Notes                              |
|--------------------|-----------------------------|----------------------------------|-----------------------------------|---------------------------------------------------|--------------------------------|------------------------------------|
| IE-WE-4            | PUBGh                       | Wetland                          | PUBGh                             | No -upland soil unit, no channel                  |                                | Hosmer soil                        |
| IE-WE-40           | PUBGh                       | Wetland                          | PUBGh                             | No -upland soil unit, no channel                  |                                | Corydon soil                       |
| IE-WE-42           | PUBFh                       | No Access                        | No Access                         | No -upland soil unit, no channel                  |                                | No Access                          |
| IE-WE-45           | PUBGh                       | Wetland                          | PUBGh                             | Yes -hydric soil unit, adjacent to Lentzier Creek |                                | Dry Pond due to drought conditions |
| IE-WE-49           | PUBGx                       | Wetland                          | PUBGx                             | Not Jurisdictional                                |                                | Quarry with potential hazmat       |
| IE-WE-5            | PUBGh                       | Wetland                          | PUBGh                             | Yes -hydric soil                                  |                                | Unconfirmed mapped soil type       |
| IE-WE-50           | L2ABGh                      | Wetland                          | PUBGh                             | Not Jurisdictional                                |                                | Quarry with potential hazmat       |
| IE-WE-52           | L1UBHx                      | Wetland                          | L1UBHx                            | Not Jurisdictional                                |                                | Quarry with potential hazmat       |
| IE-WE-54           | PFO1Ch                      | Non-Wetland                      |                                   | Not Applicable                                    | H, S                           |                                    |
| IE-WE-55           | PUBGx                       | Wetland                          | PUBGx                             | Not Jurisdictional                                |                                | Quarry                             |
| IE-WE-57           | PEMC                        | Wetland                          | PEMA                              | Yes                                               |                                | Marginal wetland area              |
| IE-WE-59           | L1UBHx                      | Wetland                          | L1UBHx                            | Not Jurisdictional                                |                                | Quarry                             |
| IE-WE-6            | PUBGh                       | Wetland                          | PUBGh                             | Yes -site contains a channel                      |                                |                                    |
| IE-WE-60           | PUBGx                       | Wetland                          | PUBGx                             | Not Jurisdictional                                |                                | Quarry                             |
| IE-WE-67           | PFO1A                       | Non-Wetland                      |                                   | Not Applicable                                    | V, H, S                        |                                    |
| IE-WE-68           | R2UBH                       | Wetland                          | R2UBH                             | Yes                                               |                                | Lancassange Creek                  |
| IE-WE-69           | PFO1A                       | Wetland                          | PSS/PEMA                          | Yes                                               |                                |                                    |
| IE-WE-7            | PUBGh                       | Wetland                          | PUBGh                             | Yes -hydric soil unit inclusion                   |                                | Bonnie inclusion                   |
| IE-WE-70           | PEMA                        | Non-Wetland                      |                                   | Not Applicable                                    | H, S                           |                                    |
| IE-WE-71           | PFO1A                       | Non-Wetland                      |                                   | Not Applicable                                    | H, S                           | Multiple data points               |
| IE-WE-71A          | PFO1A                       | Non-Wetland                      |                                   | Not Applicable                                    | V, S                           |                                    |
| IE-WE-71B          | Potential                   | Wetland                          | PUBG                              | Yes -hydric soil unit                             |                                | Unconfirmed mapped soil type       |
| IE-WE-72           | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | S                              |                                    |
| IE-WE-73           | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | S                              |                                    |
| IE-WE-77           | PEMC                        | Non-Wetland                      |                                   | Not Applicable                                    | V, H                           | Filled area                        |
| IE-WE-78           | PEMA                        | Wetland                          | PEMA                              | Yes                                               |                                |                                    |
| IE-WE-79           | PUBFx                       | No Access                        | No Access                         | No Access                                         |                                | No access                          |
| IE-WE-7A           | Potential                   | Wetland                          | R4SB                              | Yes                                               |                                |                                    |
| IE-WE-8            | PEMA                        | Non-Wetland                      |                                   | Not Applicable                                    | V, H, S                        | No evidence, see IE-WE-8A and 8B   |
| IE-WE-83           | PEMCx                       | Non-Wetland                      |                                   | Not Applicable                                    | V                              | Disturbed                          |

Table 1  
Summary Table of Potential Wetlands

| Alpha-Numeric Code | Cowardin/NWI Classification | Field Determination <sup>1</sup> | Field Classification <sup>2</sup> | Meets USACOE Jurisdictional Criteria <sup>3</sup> | Indicator Lacking <sup>4</sup> | Notes                               |
|--------------------|-----------------------------|----------------------------------|-----------------------------------|---------------------------------------------------|--------------------------------|-------------------------------------|
| IE-WE-87           | PUBGx                       | Wetland                          | PUBGx                             | Not Jurisdictional                                |                                | Quarry                              |
| IE-WE-88           | Potential                   | Wetland                          | PUBHh                             | Yes -site contains a channel                      |                                |                                     |
| IE-WE-89           | R4SBC                       | Wetland                          | R4SBC                             | Yes                                               |                                | Unnamed Tributary to Lentzier Creek |
| IE-WE-8A           | Potential                   | Wetland                          | PEMA                              | Yes                                               |                                |                                     |
| IE-WE-8B           | Potential                   | Wetland                          | PEMA                              | Yes                                               |                                |                                     |
| IE-WE-90           | PUBGh                       | Wetland                          | PUBGh                             | No -upland soil unit, no channel                  |                                | Pond                                |
| IE-WE-91           | PUBGh                       | Wetland                          | PUBGh                             | No -upland soil unit, no channel                  |                                | Farm pond                           |
| IE-WE-92           | Potential                   | Wetland                          | PUBH                              | No -upland soil unit, no channel                  |                                | Farm pond                           |
| IE-WE-94           | Potential                   | Wetland                          | R3UBH                             | Yes                                               |                                | Lentzier Creek Tributary            |
| IE-WE-94A          | Potential                   | Wetland                          | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                                     |
| IE-WE-95           | Potential                   | Wetland                          | R3UBH                             | Yes                                               |                                | Lentzier Creek Tributary            |
| IE-WE-96           | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Lentzier Creek Tributary            |
| IE-WE-96A          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                                     |
| IE-WE-97           | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Lentzier Creek Tributary            |
| IE-WE-97A          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                                     |
| IE-WE-98           | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Lentzier Creek Tributary            |
| IE-WE-98A          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                                     |
| IE-WE-98B          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                |                                     |
| IE-WE-99           | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Lentzier Creek Tributary            |
| KD-WE-5            | L1UBHh                      | Wetland                          | L1UBHh                            | Yes                                               |                                | Beargrass Creek                     |
| KE-WE-10           | PUBHx                       | Wetland                          | PUBHx                             | No -Active Water Treatment Plant                  |                                | Wastewater treatment pond           |
| KE-WE-100          | Potential                   | Wetland                          | R3UBH                             | Yes                                               |                                | Little Goose Creek Tributary        |
| KE-WE-101          | Potential                   | Wetland                          | R3UBH                             | Yes                                               |                                | Harrods Creek Tributary             |
| KE-WE-102          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Harrods Creek Tributary             |
| KE-WE-102A         | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Harrods Creek Tributary             |
| KE-WE-103          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Harrods Creek Tributary             |
| KE-WE-104          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Little Goose Creek Tributary        |
| KE-WE-104A         | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Little Goose Creek Tributary        |
| KE-WE-105          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Little Goose Creek Tributary        |
| KE-WE-106          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Little Goose Creek Tributary        |
| KE-WE-106A         | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Little Goose Creek Tributary        |
| KE-WE-106B         | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Little Goose Creek Tributary        |
| KE-WE-108          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | (RCBC-1)                            |
| KE-WE-11           | Potential                   | Wetland                          | PUBH                              | Yes -hydric soils                                 |                                | Data Form is for adjacent soils     |
| KE-WE-11A          | Potential                   | Wetland                          | PFO1A                             | Yes                                               |                                |                                     |

Table 1  
Summary Table of Potential Wetlands

| Alpha-Numeric Code | Cowardin/NWI Classification | Field Determination <sup>1</sup> | Field Classification <sup>2</sup> | Meets USACOE Jurisdictional Criteria <sup>3</sup> | Indicator Lacking <sup>4</sup> | Notes                              |
|--------------------|-----------------------------|----------------------------------|-----------------------------------|---------------------------------------------------|--------------------------------|------------------------------------|
| KE-WE-12           | Potential                   | Wetland                          | PUBG                              | Yes -contains hydric soil unit                    |                                |                                    |
| KE-WE-13           | PUBHh                       | Wetland                          | PUBHh                             | Yes -contains hydric soil unit                    |                                | Dry Pond due to drought conditions |
| KE-WE-14           | PUBHh                       | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                |                                    |
| KE-WE-15           | PUBHh                       | Wetland                          | PUBHh                             | Yes -hydric soil unit inclusion and channel       |                                | Ginat inclusion in low spots       |
| KE-WE-16           | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | V, H, S                        | New Kroger Store, filled           |
| KE-WE-17           | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | V, H, S                        |                                    |
| KE-WE-17A          | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | H,S                            |                                    |
| KE-WE-18           | Potential                   | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                | Wheeling soil                      |
| KE-WE-19           | Potential                   | Wetland                          | PEM1C                             | Yes                                               |                                | Aquatic Macrophytes                |
| KE-WE-19A          | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Harrods Creek Tributary            |
| KE-WE-20           | PUBHh                       | Wetland                          | PUBGh                             | No -upland soil unit, no channel                  |                                | Farm pond                          |
| KE-WE-21           | PFO1Ch                      | Wetland                          | PFO1Ch                            | Yes                                               |                                | Multiple data points               |
| KE-WE-21A          | R4SBC                       | Wetland                          | R4SBC                             | Yes                                               |                                | Harrods Creek Tributary            |
| KE-WE-22           | PEM1C                       | Non-Wetland                      |                                   | Not Applicable                                    | V, H, S                        |                                    |
| KE-WE-22A          | PEM1C                       | Wetland                          | PEM1C                             | Yes                                               |                                |                                    |
| KE-WE-25           | Potential                   | Wetland                          | R3UBH                             | Yes                                               |                                | Harrods Creek Tributary            |
| KE-WE-26           | PUBHh                       | Wetland                          | PUBHh                             | Yes, hydric soil unit inclusion                   |                                | Melvin soils in low spots          |
| KE-WE-28           | Marina                      | Wetland                          | PUBHx                             | Yes                                               |                                | Marina at Harrods Creek            |
| KE-WE-29           | PFO1Ah                      | Non-Wetland                      |                                   | Not Applicable                                    | S                              | Developed into parking lot         |
| KE-WE-30           | PUBHh                       | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                | Water detention pond               |
| KE-WE-31           | PUBHh                       | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                | Water detention pond               |
| KE-WE-32           | PEM1Fh                      | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                | Contiguous with KE-WE-31           |
| KE-WE-33           | PEM1Fh                      | Wetland                          | PUBh                              | No -upland soil unit, no channel                  |                                | Contiguous with KE-WE-31           |
| KE-WE-40           | PUGHh                       | Non-Wetland                      |                                   | Not Applicable                                    | H, S                           | Filled area                        |
| KE-WE-41           | PFO1Ah                      | Wetland                          | PFO1Ah                            | Yes                                               |                                |                                    |
| KE-WE-43           | Potential                   | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                |                                    |
| KE-WE-45           | Potential                   | Wetland                          | PUBHh                             | Yes, Part of Harrods Creek                        |                                |                                    |
| KE-WE-46           | PSS1Ch                      | Wetland                          | PSS1Ch                            | Yes                                               |                                | Drainage from treatment pond       |
| KE-WE-47           | R2UBH                       | Wetland                          | R2UBH                             | Yes                                               |                                | Harrods Creek                      |
| KE-WE-48           | R2UBH                       | Wetland                          | R2UBH                             | Yes                                               |                                | Little Goose Creek                 |
| KE-WE-48A          | Potential                   | Wetland                          | PFO1A                             | Yes                                               |                                |                                    |
| KE-WE-48B          | Potential                   | Wetland                          | PFO1A                             | Yes                                               |                                |                                    |
| KE-WE-48C          | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | S                              |                                    |

Table 1  
Summary Table of Potential Wetlands

| Alpha-Numeric Code | Cowardin/NWI Classification | Field Determination <sup>1</sup> | Field Classification <sup>2</sup> | Meets USACOE Jurisdictional Criteria <sup>3</sup> | Indicator Lacking <sup>4</sup> | Notes                                     |
|--------------------|-----------------------------|----------------------------------|-----------------------------------|---------------------------------------------------|--------------------------------|-------------------------------------------|
| KE-WE-48D          | Potential                   | Non-Wetland                      |                                   | Not Applicable                                    | S                              |                                           |
| KE-WE-50           | PUBHh                       | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                |                                           |
| KE-WE-56           | PUBHh                       | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                |                                           |
| KE-WE-57           | PUBHh                       | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                |                                           |
| KE-WE-6            | PEMICx                      | Wetland                          | PUBHy/PEMICx                      | No -Active Water Treatment Plant                  |                                | WWT, Contiguous with KE-WE-85             |
| KE-WE-60           | L1UBWh                      | Wetland                          | L1UBWh                            | Yes                                               |                                | Goose Creek                               |
| KE-WE-61           | PFO1Ah                      | Non-Wetland                      |                                   | Not Applicable                                    | S                              | Multiple data points                      |
| KE-WE-68           | Potential                   | Headwater                        | R4SB                              | Not Delineated for Baseline- from planimetrics    |                                | Previously modified                       |
| KE-WE-7            | Potential                   | Wetland                          | PFO1A                             | Yes                                               |                                | Multiple data points                      |
| KE-WE-8            | PUBFx                       | Wetland                          | PUBFx                             | No -Active Water Treatment Plant                  |                                | Wastewater treatment pond                 |
| KE-WE-84           | PUBFh                       | Non-Wetland                      |                                   | Not Applicable                                    | H, S                           |                                           |
| KE-WE-85           | PUBHy                       | Wetland                          | PUBHy                             | No -Active Water Treatment Plant                  |                                | Wastewater treatment pond                 |
| KE-WE-86           | PUBFx                       | Wetland                          | PUBFx                             | No -Active Water Treatment Plant                  |                                | Wastewater treatment pond                 |
| KE-WE-87           | PUBHh                       | Wetland                          | PUBHh                             | Yes, hydric soil unit inclusion                   |                                | Melvin soils in low spots                 |
| KE-WE-88           | PFOAh                       | Non-Wetland                      |                                   | Not Applicable                                    | H, S                           |                                           |
| KE-WE-9            | PEMCx                       | Wetland                          | PUBHh/PEMCx                       | No -Active Water Treatment Plant                  |                                | Wastewater treatment pond                 |
| KE-WE-90           | PUBFh                       | Non-Wetland                      |                                   | Not Applicable                                    | S                              | Delineated                                |
| KE-WE-91           | PUBHh                       | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                |                                           |
| KE-WE-95           | Potential                   | Wetland                          | PUBH                              | Yes, site contains a channel                      |                                | Putney's Pond (Hunting Creek)             |
| KE-WE-95A          | Potential                   | Wetland                          | PEMC                              | Yes                                               |                                |                                           |
| KE-WE-95B          | Potential                   | Wetland                          | R3UBH                             | Yes                                               |                                | Hunting Creek (Putney's Pond)             |
| KE-WE-97           | Potential                   | Wetland                          | PUBGh                             | No -upland soil unit, no channel                  |                                | Dry Pond                                  |
| KE-WE-998          | Potential                   | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                | Riverfields constructed wetland           |
| KE-WE-999          | Potential                   | Wetland                          | PUBHh                             | No -upland soil unit, no channel                  |                                | Riverfields constructed wetland           |
| Ohio River         | L1UBHh                      | Wetland                          | L1UBHh                            | Yes                                               |                                | Ohio River within limits of project only. |

1 = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

2 = Field classifications are not listed for those sites determined to be Non-Wetlands

3 = For those areas determined to contain hydric vegetation, soils and hydrology, an evaluation was made to determine the whether the USACOE would have jurisdictional authority over the site. For example, ponds constructed on upland soil units and not containing a stream channel are not considered to be jurisdictional wetlands by the USACOE.

4 = V = Vegetation, H = Hydrology, S = Soil

Table II - Summary Table of Jurisdictional Wetlands

TABLE II. SUMMARY TABLE OF JURISDICTIONAL WETLANDS

| Alpha-Numeric Code                           | Cowardin/NWI Classification | Field Classification | Size in Acres <sup>1</sup> | Primary Function(s)                                  | Notes                          |
|----------------------------------------------|-----------------------------|----------------------|----------------------------|------------------------------------------------------|--------------------------------|
| <b>PALUSTRINE FORESTED WETLANDS (PFO)</b>    |                             |                      |                            |                                                      |                                |
| IE-WE-31                                     | PFO1A                       | PFO1A                | 2.82                       | Flood Control and Wildlife Habitat                   | Adjacent to Lentzier Creek     |
| IE-WE-35                                     | PFO1A                       | PFO1A/PFO1Hb         | 7.51                       | Flood Control and Wildlife Habitat                   | Beaver Dam                     |
| KE-WE-11A                                    | Potential                   | PFO1A                | 3.11                       | Nutrient Removal/Transformation, Toxicant Retention  | Adjacent to LWC settling ponds |
| KE-WE-21                                     | PFO1Ch                      | PFO1Ch               | 1.90                       | Flood Control and Sediment Stabilaztion              | Drains to Harrods Creek        |
| KE-WE-41                                     | PFO1Ah                      | PFO1Ah               | 3.58                       | Nutrient Removal/Transformation and Wildlife Habitat |                                |
| KE-WE-48A                                    | Potential                   | PFO1A                | 0.35                       | Flood Control and Wildlife Habitat                   |                                |
| KE-WE-48B                                    | Potential                   | PFO1A                | 0.35                       | Flood Control and Wildlife Habitat                   |                                |
| KE-WE-7                                      | Potential                   | PFO1A                | 3.71                       | Nutrient Removal/Transformation, Toxicant Retention  | Adjacent to LWC settling ponds |
| TOTAL AREA OF PFO WETLANDS DELINEATED        |                             |                      | 23.33 acres                |                                                      |                                |
| <b>PALUSTRINE SCRUB-SHRUB WETLANDS (PSS)</b> |                             |                      |                            |                                                      |                                |
| IE-WE-69                                     | PFO1A                       | PSS/PEMA             | 1.31                       | Flood Control and Wildlife Habitat                   | Adjacent to Lancassange Creek  |
| KE-WE-46                                     | PSS1Ch                      | PSS1Ch               | 0.35                       | Sediment Control and Toxicant Retention              | Drainage from treatment pond   |
| TOTAL AREA OF PSS WETLANDS DELINEATED        |                             |                      | 1.66                       |                                                      |                                |
| Alpha-Numeric Code                           | Cowardin/NWI Classification | Field Classification | Size in Acres <sup>1</sup> | Primary Function(s)                                  | Notes                          |
| <b>PALUSTRINE EMERGENT WETLANDS (PEM)</b>    |                             |                      |                            |                                                      |                                |
| IE-WE-17                                     | PEMA                        | PEMA/PUBGh           | 0.07                       | Sediment Control and Nutrient Removal                |                                |
| IE-WE-57                                     | Potential                   | PEMA                 | 0.12                       | Nutrient Removal and Toxicant Retention              |                                |
| IE-WE-78                                     | PEMA                        | PEMA                 | 1.63                       | Sediment Control and Nutrient Removal                |                                |
| IE-WE-8A                                     | Potential                   | PEMA                 | 0.27                       | Sediment Control and Nutrient Removal                |                                |

Table II - Summary Table of Jurisdictional Wetlands

| Alpha-Numeric Code                              | Cowardin/NWI Classification | Field Classification | Size in Acres <sup>1</sup> | Primary Function(s)                           | Notes                                        |
|-------------------------------------------------|-----------------------------|----------------------|----------------------------|-----------------------------------------------|----------------------------------------------|
| PALUSTRINE EMERGENT WETLANDS (PEM)              |                             |                      |                            |                                               |                                              |
| IE-WE-8B                                        | Potential                   | PEMA                 | 0.20                       | Sediment Control and Nutrient Removal         |                                              |
| KE-WE-19                                        | Potential                   | PEM1C                | 0.12                       | Sediment Control and Wildlife Habitat         | Aquatic macrophytes                          |
| KE-WE-22A                                       | PEM1C                       | PEM1C                | 1.80                       | Sediment/Flood Control and Nutrient Removal   |                                              |
| KE-WE-95A                                       | Potential                   | PEMC                 | 0.07                       | Sediment and Flood Control                    |                                              |
| TOTAL AREA OF PEM WETLANDS DELINEATED           |                             |                      | 4.28 acres                 |                                               |                                              |
| PALUSTRINE UNCONSOLIDATED BOTTOM WETLANDS (PUB) |                             |                      |                            |                                               |                                              |
| IE-WE-45                                        | PUBGh                       | PUBGh                | 0.42                       | Flood Control and Wildlife Habitat            | Dry Pond due to drought conditions           |
| IE-WE-5                                         | PUBGh                       | PUBGh                | 0.10                       | Nutrient Removal and Toxicant Retention       | Dry pond                                     |
| IE-WE-6                                         | PUBGh                       | PUBGh                | 1.75                       | Wildlife Habitat                              |                                              |
| IE-WE-7                                         | PUBGh                       | PUBGh                | 0.40                       | Aquatic/Wildlife Habitat                      |                                              |
| IE-WE-71B                                       | Potential                   | PUBG                 | 0.22                       | Flood Control and Wildlife Habitat            |                                              |
| IE-WE-88                                        | Potential                   | PUBHh                | 18.11                      | Sediment Control and Nutrient Removal         |                                              |
| KE-WE-11                                        | Potential                   | PUBH                 | 0.20                       | Sediment Control and Nutrient Removal         | Data Form is for adjacent soils              |
| KE-WE-12                                        | Potential                   | PUBG                 | 0.57                       | Wildlife/Aquatic Habitat and Nutrient Removal |                                              |
| KE-WE-13                                        | PUBHh                       | PUBHh                | 1.73                       | Wildlife/Aquatic Habitat and Nutrient Removal | Dry pond due to drought conditions in region |
| KE-WE-15                                        | PUBHh                       | PUBHh                | 0.32                       | Wildlife/Aquatic Habitat and Nutrient Removal |                                              |
| KE-WE-26                                        | PUBHh                       | PUBHh                | 0.91                       | Wildlife/Aquatic Habitat and Nutrient Removal |                                              |
| KE-WE-28                                        | Marina                      | PUBHx                | 2.08                       | Flood Control and Wildlife/Aquatic Habitat    | Marina at Harrods Creek                      |
| KE-WE-45                                        | Potential                   | PUBHh                | 1.48                       | Flood Control and Wildlife/Aquatic Habitat    | Part of Harrods Creek                        |
| KE-WE-87                                        | PUBHh                       | PUBHh                | 0.25                       | Wildlife/Aquatic Habitat                      |                                              |
| KE-WE-95                                        | Potential                   | PUBH                 | 7.59                       | Flood Control and Wildlife/Aquatic Habitat    | Putney's Pond/Hunting Creek                  |
| TOTAL AREA OF PUB WETLANDS DELINEATED           |                             |                      | 36.13 acres                |                                               |                                              |

Table II - Summary Table of Jurisdictional Wetlands

| LACUSTRINE WETLANDS (LUB)                      |                             |                      |                            |                                            |                             |
|------------------------------------------------|-----------------------------|----------------------|----------------------------|--------------------------------------------|-----------------------------|
| KE-WE-60                                       | L1UBWh                      | L1UBWh               | 3.10 mi                    | Flood Control and Wildlife/Aquatic Habitat | Goose Creek                 |
| KE-WE-5                                        | L1UBHh                      | L1UBHh               | 1.12 mi                    | Flood Control and Wildlife/Aquatic Habitat | Beargrass Creek             |
| Ohio River                                     | L1UBHh                      | L1UBHh               | 11.15 mi                   | Flood Control and Wildlife/Aquatic Habitat | Ohio River                  |
| TOTAL AREA / LENGTH OF LUB WETLANDS DELINEATED |                             |                      | 15.37 miles                |                                            |                             |
| Alpha-Numeric Code                             | Cowardin/NWI Classification | Field Classification | Size in Miles <sup>1</sup> | Primary Function(s)                        | Notes                       |
| RIVERINE WETLANDS                              |                             |                      |                            |                                            |                             |
| IE-WE-100                                      | Headwater                   | R4SB                 | 0.56                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek Tributary    |
| IE-WE-100A                                     | Headwater                   | R4SB                 | 0.03                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-101                                      | Headwater                   | R4SB                 | 0.12                       | Flood Control and Wildlife/Aquatic Habitat | Lancassange Creek Tributary |
| IE-WE-102                                      | Headwater                   | R4SB                 | 0.50                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-103                                      | Headwater                   | R4SB                 | 0.19                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-104                                      | Headwater                   | R4SB                 | 0.19                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-105                                      | Headwater                   | R4SB                 | 0.12                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-106                                      | Headwater                   | R4SB                 | 0.06                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-107                                      | Headwater                   | R4SB                 | 0.19                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-108                                      | Headwater                   | R4SB                 | 0.15                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-13                                       | R4SBC                       | R4SBC                | 0.56                       | Flood Control and Wildlife/Aquatic Habitat | Unnamed Creek               |
| IE-WE-2                                        | PUBGh                       | Channel / R4SBC      | 0.06                       | Flood Control and Wildlife/Aquatic Habitat | Unnamed Creek               |
| IE-WE-30                                       | R3UBh                       | R3UBh                | 3.84                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek              |
| IE-WE-68                                       | R2UBH                       | R2UBH                | 2.60                       | Flood Control and Wildlife/Aquatic Habitat | Lancassange Creek           |
| IE-WE-7A                                       | Potential                   | R4SB                 | 0.43                       | Flood Control and Wildlife/Aquatic Habitat | Unnamed Creek               |
| IE-WE-89                                       | R4SBC                       | R4SBC                | 0.93                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek Tributary    |
| IE-WE-94                                       | Potential                   | R3UBH                | 0.74                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek Tributary    |
| IE-WE-94A                                      | Headwater                   | R4SB                 | 0.43                       | Flood Control and Wildlife/Aquatic Habitat |                             |
| IE-WE-95                                       | Potential                   | R3UBH                | 0.50                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek Tributary    |
| IE-WE-96                                       | Headwater                   | R4SB                 | 0.62                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek Tributary    |
| IE-WE-96A                                      | Headwater                   | R4SB                 | 0.12                       | Flood Control and Wildlife/Aquatic Habitat |                             |

Table II - Summary Table of Jurisdictional Wetlands

| Alpha-Numeric Code                                                                                                                                                                          | Cowardin/NWI Classification | Field Classification | Size in Miles <sup>1</sup> | Primary Function(s)                        | Notes                         |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------|----------------------|----------------------------|--------------------------------------------|-------------------------------|
| RIVERINE WETLANDS CONT.                                                                                                                                                                     |                             |                      |                            |                                            |                               |
| IE-WE-97                                                                                                                                                                                    | Headwater                   | R4SB                 | 0.37                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek Tributary      |
| IE-WE-97A                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.12                       | Flood Control and Wildlife/Aquatic Habitat |                               |
| IE-WE-98                                                                                                                                                                                    | Headwater                   | R4SB                 | 0.25                       | Flood Control and Wildlife/Aquatic Habitat | Ohio River Drainage           |
| IE-WE-98A                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.19                       | Flood Control and Wildlife/Aquatic Habitat |                               |
| IE-WE-98B                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.06                       | Flood Control and Wildlife/Aquatic Habitat |                               |
| IE-WE-99                                                                                                                                                                                    | Headwater                   | R4SB                 | 0.31                       | Flood Control and Wildlife/Aquatic Habitat | Lentzier Creek Tributary      |
| KE-WE-100                                                                                                                                                                                   | Potential                   | R3UBH                | 0.50                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek Tributary  |
| KE-WE-101                                                                                                                                                                                   | Potential                   | R3UBH                | 0.50                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek Tributary       |
| KE-WE-102                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.25                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek Tributary       |
| KE-WE-102A                                                                                                                                                                                  | Headwater                   | R4SB                 | 0.25                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek Tributary       |
| KE-WE-103                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.25                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek Tributary       |
| KE-WE-104                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.31                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek Tributary  |
| KE-WE-104A                                                                                                                                                                                  | Headwater                   | R4SB                 | 0.06                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek Tributary  |
| KE-WE-105                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.19                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek Tributary  |
| KE-WE-106                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.56                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek Tributary  |
| KE-WE-106A                                                                                                                                                                                  | Headwater                   | R4SB                 | 0.09                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek Tributary  |
| KE-WE-106B                                                                                                                                                                                  | Headwater                   | R4SB                 | 0.03                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek Tributary  |
| KE-WE-108                                                                                                                                                                                   | Headwater                   | R4SB                 | 1.18                       | Flood Control and Wildlife/Aquatic Habitat | Ditch                         |
| KE-WE-19A                                                                                                                                                                                   | Headwater                   | R4SB                 | 0.74                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek Tributary       |
| KE-WE-25                                                                                                                                                                                    | Potential                   | R3UBH                | 1.24                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek Tributary       |
| KE-WE-47                                                                                                                                                                                    | R2UBH                       | R2UBH                | 3.72                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek                 |
| KE-WE-48                                                                                                                                                                                    | R2UBH                       | R2UBH                | 4.96                       | Flood Control and Wildlife/Aquatic Habitat | Little Goose Creek            |
| KE-WE-68                                                                                                                                                                                    | Headwater                   | R4SB                 | 2.23                       | Flood Control and Wildlife/Aquatic Habitat | Ditch, Previously modified    |
| KE-WE-95B                                                                                                                                                                                   | Potential                   | R3UBH                | 0.62                       | Flood Control and Wildlife/Aquatic Habitat | Hunting Creek (Putney's Pond) |
| KE-WE-21A                                                                                                                                                                                   | R4SBC                       | R4SBC                | 0.25                       | Flood Control and Wildlife/Aquatic Habitat | Harrods Creek Tributary       |
| TOTAL LENGTH OF RIVERINE WETLANDS DELINEATED                                                                                                                                                |                             |                      | 32.17 miles                |                                            |                               |
| TOTAL AREA / LENGTH OF WETLANDS DELINEATED                                                                                                                                                  |                             |                      | 65.4 acres / 47.54 miles   |                                            |                               |
| 1 = The values shown for lacustrine and riverine systems are in miles.<br>The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only. |                             |                      |                            |                                            |                               |

**Table III**  
**Direct and Indirect Wetland Impacts by Alternative**

**TABLE III:**         **Direct and Indirect Wetland Impacts by Alternative**  
**Impact Evaluation Matrices**

| TABLE III: Direct and Indirect Wetland Impact by Site Number |                                   |                                  |                                    |                 |                                                                                      |                                    |
|--------------------------------------------------------------|-----------------------------------|----------------------------------|------------------------------------|-----------------|--------------------------------------------------------------------------------------|------------------------------------|
| ALTERNATIVE A2                                               |                                   |                                  |                                    |                 |                                                                                      |                                    |
| Alternative Comparison Impact Evaluation Matrix              |                                   |                                  |                                    |                 |                                                                                      |                                    |
| Alpha-Numeric Code                                           | Field Classification <sup>1</sup> | Total Size in Acres <sup>2</sup> | Area of Direct Impact <sup>3</sup> | Indirect Impact | Type of Indirect Impact                                                              | Notes                              |
| PALUSTRINE UNCONSOLIDATED BOTTOM WETLANDS (PUB)              |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-88                                                     | PUBHh                             | 18.11                            | 0.00                               | Yes             | Hydrology altered                                                                    | Connected to IE-WE-7A and IE-WE-13 |
| KE-WE-12                                                     | PUBG                              | 0.57                             | 0.57                               | Not Applicable  | Complete take                                                                        | Complete take                      |
| KE-WE-13                                                     | PUBHh                             | 1.73                             | 0.82                               | Yes             | Fragmented and Hydrology altered                                                     |                                    |
| KE-WE-95                                                     | PUBH                              | 7.59                             | 0.77                               | Yes             | Proximity to habitat, Shading                                                        | Putney's Pond                      |
| TOTAL AREA OF PUB IMPACTS                                    |                                   |                                  | 2.16                               |                 |                                                                                      |                                    |
| PALUSTRINE EMERGENT WETLANDS (PEM)                           |                                   |                                  |                                    |                 |                                                                                      |                                    |
| KE-WE-95A                                                    | PEMC                              | 0.07                             | 0.05                               | Yes             | Fragmented                                                                           | Only 0.01 ha remain                |
| TOTAL AREA OF PEM IMPACTS                                    |                                   |                                  | 0.05                               |                 |                                                                                      |                                    |
| RIVERINE WETLANDS <sup>4</sup>                               |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-7A                                                     | R4SB (Ditch)                      | 0.4 mi                           | 0.02                               | Yes             | Down-cutting, increased sediment load, creation of barriers to species and processes |                                    |
| IE-WE-30                                                     | R3UBh (Lentzier Ck)               | 3.8 mi                           | 0.32                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| IE-WE-94                                                     | R3UBH (Lentzier Ck Trib)          | 0.7 mi                           | 0.17                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| IE-WE-96                                                     | R4SB (Lentzier Ck Trib)           | 0.6 mi                           | 0.10                               | Yes             | Down-cutting, increased sediment load, creation of barriers                          |                                    |
| IE-WE-97                                                     | R4SB (Lentzier Ck Trib)           | 0.4 mi                           | 0.05                               | Yes             | Down-cutting, increased sediment load, creation of barriers                          |                                    |
| IE-WE-89                                                     | R4SBC (Lentzier Ck Trib)          | 0.9 mi                           | 0.47                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| KE-WE-25                                                     | R3UBH (Harrods Ck Trib)           | 1.2 mi                           | 0.27                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| KE-WE-47                                                     | R2UBH (Harrods Ck)                | 3.7 mi                           | 1.95                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| TOTAL AREA OF RIVERINE IMPACTS                               |                                   |                                  | 3.35                               |                 |                                                                                      |                                    |
|                                                              |                                   |                                  |                                    |                 |                                                                                      |                                    |
| TOTAL AREA OF DIRECT WETLAND IMPACTS                         |                                   |                                  | 5.51                               |                 |                                                                                      |                                    |

1 = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

2 = The values shown for lacustrine and all riverine systems are in linear kilometers. The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only.

3 = All alternatives would encroach upon the Ohio River. Encroachment is anticipated to be limited to the placement of piers within the channel only. Detailed impacts of these encroachments will be determined during the design of the preferred alternative.

4 = Additional impacts for riverine and lacustrine wetlands have been listed under the Water Body Modifications Table.

**Table III**  
**Direct and Indirect Wetland Impacts by Alternative**

| TABLE III: Direct and Indirect Wetland Impact by Site Number<br>Alternative Comparison Impact Evaluation Matrix |                                   |                                  | ALTERNATIVE A9 |                 |                                                                     |                                                      |
|-----------------------------------------------------------------------------------------------------------------|-----------------------------------|----------------------------------|----------------|-----------------|---------------------------------------------------------------------|------------------------------------------------------|
| Alpha-Numeric Code                                                                                              | Field Classification <sup>1</sup> | Total Size in Acres <sup>2</sup> | Direct Impact  | Indirect Impact | Type of Indirect Impact                                             | Notes                                                |
| <b>PALUSTRINE FORESTED WETLANDS (PFO)</b>                                                                       |                                   |                                  |                |                 |                                                                     |                                                      |
| KE-WE-41                                                                                                        | PFO1Ah                            | 3.58                             | 0.79           | Yes             | Bisected, Shading                                                   |                                                      |
| TOTAL AREA OF PFO IMPACTS                                                                                       |                                   |                                  | 0.79           |                 |                                                                     |                                                      |
| <b>PALUSTRINE EMERGENT WETLANDS (PEM)</b>                                                                       |                                   |                                  |                |                 |                                                                     |                                                      |
| IE-WE-57                                                                                                        | PEMA                              | 0.12                             | 0.02           | Yes             | Hydrology altered, Shading                                          | Site may be spanned by a bridge                      |
| TOTAL AREA OF PEM                                                                                               |                                   |                                  | 0.02           |                 |                                                                     |                                                      |
| <b>PALUSTRINE UNCONSOLIDATED BOTTOM WETLANDS (PUB)</b>                                                          |                                   |                                  |                |                 |                                                                     |                                                      |
| IE-WE-88                                                                                                        | PUBHh                             | 18.11                            | 0.00           | Yes             | Hydrology altered                                                   | Connected to IE-WE-7A & IE-WE-13                     |
| IE-WE-60                                                                                                        | PUBGx                             | 1.56                             | 1.48           | Yes             | Fragmented, Shading                                                 | Only 0.03 ha remain, site may be spanned by a bridge |
| TOTAL AREA OF PUB IMPACTS                                                                                       |                                   |                                  | 1.48           |                 |                                                                     |                                                      |
| <b>LACUSTRINE WETLANDS</b>                                                                                      |                                   |                                  |                |                 |                                                                     |                                                      |
| KE-WE-60                                                                                                        | L1UBWh (Goose Ck.)                | 3.1 mi                           | 0.77           | Yes             | Proximity to habitat, creation of barriers to processes and species |                                                      |
| TOTAL AREA OF LACUSTRINE IMPACTS                                                                                |                                   |                                  | 0.77           |                 |                                                                     |                                                      |
| <b>RIVERINE WETLANDS</b>                                                                                        |                                   |                                  |                |                 |                                                                     |                                                      |
| IE-WE-13                                                                                                        | R4SBC (Ditch)                     | 0.6 mi                           | 0.02           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| IE-WE-7A                                                                                                        | R4SB (Ditch)                      | 0.4 mi                           | 0.05           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| IE-WE-99                                                                                                        | R4SB (Lentzier Ck Trib)           | 0.3 mi                           | 0.07           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| IE-WE-100                                                                                                       | R4SB (Lentzier Ck Trib)           | 0.6 mi                           | 0.02           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| IE-WE-95                                                                                                        | R3UBH (Lentzier Ck Trib)          | 0.5 mi                           | 0.27           | Yes             | Creation of barriers to processes and species                       |                                                      |
| KE-WE-104                                                                                                       | R4SB (Little Goose Ck Trib)       | 0.3 mi                           | 0.05           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| KE-WE-104A                                                                                                      | R4SB (Little Goose Ck Trib)       | 0.1 mi                           | 0.02           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| KE-WE-105                                                                                                       | R4SB (Little Goose Ck Trib)       | 0.2 mi                           | 0.02           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| KE-WE-100                                                                                                       | R3UBH (Little Goose Ck Trib)      | 0.5 mi                           | 0.15           | Yes             | Creation of barriers to processes and species, shading              |                                                      |
| KE-WE-106                                                                                                       | R4SB (Little Goose Ck Trib)       | 0.6 mi                           | 0.02           | Yes             | Down-cutting, increased sedimentation, creation of barriers         |                                                      |
| KE-WE-48                                                                                                        | R2UBH (Little Goose Ck)           | 5.0 mi                           | 0.91           | Yes             | Creation of barriers to processes and species                       |                                                      |
| TOTAL AREA OF RIVERINE IMPACTS                                                                                  |                                   |                                  | 1.60           |                 |                                                                     |                                                      |
|                                                                                                                 |                                   |                                  |                |                 |                                                                     |                                                      |
| TOTAL AREA OF DIRECT WETLAND IMPACTS                                                                            |                                   |                                  | 4.66           |                 |                                                                     |                                                      |

<sup>1</sup> = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

<sup>2</sup> = The values shown for lacustrine and all riverine systems are in linear kilometers. The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only.

<sup>3</sup> = All alternatives would encroach upon the Ohio River. Encroachment is anticipated to be limited to the placement of piers within the channel only. Detailed impacts of these encroachments will be determined during the design of the preferred alternative.

<sup>4</sup> = Additional impacts for riverine and lacustrine wetlands have been listed under the Water Body Modifications Table.

**Table III**  
**Direct and Indirect Wetland Impacts by Alternative**

| TABLE III: Direct and Indirect Wetland Impact by Site Number<br>Alternative Comparison Impact Evaluation Matrix |                                   |                                  | ALTERNATIVE A13                    |                 |                                                                                      |                                  |
|-----------------------------------------------------------------------------------------------------------------|-----------------------------------|----------------------------------|------------------------------------|-----------------|--------------------------------------------------------------------------------------|----------------------------------|
| Alpha-Numeric Code                                                                                              | Field Classification <sup>1</sup> | Total Size in Acres <sup>2</sup> | Area of Direct Impact <sup>3</sup> | Indirect Impact | Type of Indirect Impact                                                              | Notes                            |
| <b>PALUSTRINE FORESTED WETLANDS (PFO)</b>                                                                       |                                   |                                  |                                    |                 |                                                                                      |                                  |
| IE-WE-35                                                                                                        | PFO1A/PFO1Hb                      | 7.51                             | 0.10                               | Yes             | Proximity to Habitat                                                                 |                                  |
| TOTAL AREA OF PFO IMPACTS                                                                                       |                                   |                                  | 0.10                               |                 |                                                                                      |                                  |
| <b>PALUSTRINE EMERGENT WETLANDS (PEM)</b>                                                                       |                                   |                                  |                                    |                 |                                                                                      |                                  |
| KE-WE-19                                                                                                        | PEM1C                             | 0.12                             | 0.12                               | Not Applicable  | Complete Take                                                                        | Complete Take                    |
| KE-WE-22A                                                                                                       | PEM1C                             | 1.80                             | 0.00                               | Yes             | Proximity to Habitat                                                                 |                                  |
| TOTAL AREA OF PEM                                                                                               |                                   |                                  | 0.12                               |                 |                                                                                      |                                  |
| <b>PALUSTRINE UNCONSOLIDATED BOTTOM WETLANDS (PUB)</b>                                                          |                                   |                                  |                                    |                 |                                                                                      |                                  |
| IE-WE-88                                                                                                        | PUBHh                             | 18.11                            | 0.00                               | Yes             | Hydrology altered, creation of barriers to processes and species                     | Connected to IE-WE-7A & IE-WE-13 |
| KE-WE-28                                                                                                        | PUBHx                             | 2.08                             | 0.02                               | Yes             | Proximity to habitat                                                                 | Site may be spanned by a bridge  |
| TOTAL AREA OF PUB IMPACTS                                                                                       |                                   |                                  | 0.02                               |                 |                                                                                      |                                  |
| <b>RIVERINE WETLANDS</b>                                                                                        |                                   |                                  |                                    |                 |                                                                                      |                                  |
| IE-WE-13                                                                                                        | R4SB (Ditch)                      | 0.6 mi                           | 0.02                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                  |
| IE-WE-7A                                                                                                        | R4SB (Ditch)                      | 0.4 mi                           | 0.02                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                  |
| IE-WE-30                                                                                                        | R3UBh (Lentzier Ck)               | 3.8 mi                           | 0.86                               | Yes             | Creation of barriers to processes and species                                        |                                  |
| IE-WE-94                                                                                                        | R3UBH (Lentzier Ck Trib)          | 0.7 mi                           | 0.49                               | Yes             | Creation of barriers to processes and species                                        |                                  |
| IE-WE-96                                                                                                        | R4SB (Lentzier Ck Trib)           | 0.6 mi                           | 0.10                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                  |
| IE-WE-89                                                                                                        | R4SBC (Lentzier Ck Trib)          | 0.9 mi                           | 0.37                               | Yes             | Creation of barriers to processes and species                                        |                                  |
| KE-WE-19A                                                                                                       | R4SB (Harrods Ck Trib)            | 0.7 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                  |
| KE-WE-47                                                                                                        | R2UBH (Harrods Ck)                | 3.7 mi                           | 2.64                               | Yes             | Creation of barriers to processes and species                                        |                                  |
| TOTAL AREA OF RIVERINE IMPACTS                                                                                  |                                   |                                  | 4.55                               |                 |                                                                                      |                                  |
|                                                                                                                 |                                   |                                  |                                    |                 |                                                                                      |                                  |
| TOTAL AREA OF DIRECT WETLAND IMPACTS                                                                            |                                   |                                  | 4.79                               |                 |                                                                                      |                                  |

1 = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

2 = The values shown for lacustrine and all riverine systems are in linear kilometers. The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only.

3 = All alternatives would encroach upon the Ohio River. Encroachment is anticipated to be limited to the placement of piers within the channel only. Detailed impacts of these encroachments will be determined during the design of the preferred alternative.

4 = Additional impacts for riverine and lacustrine wetlands have been listed under the Water Body Modifications Table.

**Table III**  
**Direct and Indirect Wetland Impacts by Alternative**

| TABLE III: Direct and Indirect Wetland Impact by Site Number<br>Alternative Comparison Impact Evaluation Matrix |                                   |                                  | ALTERNATIVE A15                    |                 |                                                                                      |                                    |
|-----------------------------------------------------------------------------------------------------------------|-----------------------------------|----------------------------------|------------------------------------|-----------------|--------------------------------------------------------------------------------------|------------------------------------|
| Alpha-Numeric Code                                                                                              | Field Classification <sup>1</sup> | Total Size in Acres <sup>2</sup> | Area of Direct Impact <sup>3</sup> | Indirect Impact | Type of Indirect Impact                                                              | Notes                              |
| <b>PALUSTRINE EMERGENT WETLANDS (PEM)</b>                                                                       |                                   |                                  |                                    |                 |                                                                                      |                                    |
| KE-WE-19                                                                                                        | PEM1C                             | 0.12                             | 0.12                               | Not Applicable  |                                                                                      | Complete Take                      |
| KE-WE-22A                                                                                                       | PEM1C                             | 1.80                             | 0.00                               | Yes             | Hydrology altered                                                                    |                                    |
| TOTAL AREA OF PEM IMPACTS                                                                                       |                                   |                                  | 0.12                               |                 |                                                                                      |                                    |
| <b>PALUSTRINE UNCONSOLIDATED BOTTOM WETLANDS (PUB)</b>                                                          |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-88                                                                                                        | PUBHh                             | 18.11                            | 0.00                               | Yes             | Hydrology altered, creation of barriers to processes and species                     | Connected to IE-WE-7A and IE-WE-13 |
| TOTAL AREA OF PUB IMPACTS                                                                                       |                                   |                                  | 0.00                               |                 |                                                                                      |                                    |
| <b>RIVERINE WETLANDS</b>                                                                                        |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-13                                                                                                        | R4SBC (Ditch)                     | 0.6 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-7A                                                                                                        | R4SB(Ditch)                       | 0.4 mi                           | 0.02                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-30                                                                                                        | R3UBh (Lentzier Ck)               | 3.8 mi                           | 0.47                               | Yes             | Creation of barriers to processes and species                                        |                                    |
| IE-WE-94                                                                                                        | R3UBH (Lentzier Ck Trib)          | 0.7 mi                           | 0.37                               | Yes             | Creation of barriers to processes and species                                        |                                    |
| IE-WE-96                                                                                                        | R4SB (Lentzier Ck Trib)           | 0.6 mi                           | 0.10                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-97                                                                                                        | R4SB (Lentzier Ck Trib)           | 0.4 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-89                                                                                                        | R4SBC (Lentzier Ck Trib)          | 0.9 mi                           | 0.22                               | Yes             | Creation of barriers to processes and species                                        |                                    |
| IE-WE-98                                                                                                        | R4SB (Ohio River Trib)            | 0.2 mi                           | 0.12                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| KE-WE-19A                                                                                                       | R4SB (Harrods Ck Trib)            | 0.7 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| KE-WE-47                                                                                                        | R2UBH (Harrods Ck)                | 3.7 mi                           | 2.05                               | Yes             | Creation of barriers to processes and species                                        |                                    |
| KE-WE-21A                                                                                                       | R4SBC (Harrods Ck Trib)           | 0.25 mi                          | 0.24                               | Yes             | Creation of barriers to processes and species                                        | Connects KE-WE-11A and KE-WE-21    |
| TOTAL AREA OF RIVERINE IMPACTS                                                                                  |                                   |                                  | 3.74                               |                 |                                                                                      |                                    |
|                                                                                                                 |                                   |                                  |                                    |                 |                                                                                      |                                    |
| TOTAL AREA OF DIRECT WETLAND IMPACTS                                                                            |                                   |                                  | 3.86                               |                 |                                                                                      |                                    |

1 = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

2 = The values shown for lacustrine and all riverine systems are in linear kilometers. The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only.

3 = All alternatives would encroach upon the Ohio River. Encroachment is anticipated to be limited to the placement of piers within the channel only. Detailed impacts of these encroachments will be determined during the design of the preferred alternative.

4 = Additional impacts for riverine and lacustrine wetlands have been listed under the Water Body Modifications Table.

**Table III**  
**Direct and Indirect Wetland Impacts by Alternative**

| TABLE III: Direct and Indirect Wetland Impact by Site Number<br>Alternative Comparison Impact Evaluation Matrix |                                   |                                  | ALTERNATIVE A16                    |                 |                                                                                      |                                    |
|-----------------------------------------------------------------------------------------------------------------|-----------------------------------|----------------------------------|------------------------------------|-----------------|--------------------------------------------------------------------------------------|------------------------------------|
| Alpha-Numeric Code                                                                                              | Field Classification <sup>1</sup> | Total Size in Acres <sup>2</sup> | Area of Direct Impact <sup>3</sup> | Indirect Impact | Type of Indirect Impact                                                              | Notes                              |
| <b>PALUSTRINE FORESTED WETLANDS (PFO)</b>                                                                       |                                   |                                  |                                    |                 |                                                                                      |                                    |
| KE-WE-7                                                                                                         | PFO1A                             | 3.71                             | 0.74                               | Yes             | Proximity to habitat, Shading                                                        |                                    |
| KE-WE-11A                                                                                                       | PFO1A                             | 3.11                             | 0.57                               | Yes             | Proximity to habitat, Shading                                                        |                                    |
| TOTAL AREA OF PFO IMPACTS                                                                                       |                                   |                                  | 1.31                               |                 |                                                                                      |                                    |
| <b>PALUSTRINE UNCONSOLIDATED BOTTOM WETLANDS (PUB)</b>                                                          |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-88                                                                                                        | PUBHh                             | 18.11                            | 0.00                               | Yes             | Hydrology altered                                                                    | Connected to IE-WE-7A and IE-WE-13 |
| TOTAL AREA OF PUB IMPACTS                                                                                       |                                   |                                  | 0.00                               |                 |                                                                                      |                                    |
| <b>RIVERINE WETLANDS</b>                                                                                        |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-13                                                                                                        | R4SBC (Ditch)                     | 0.6 mi                           | 0.02                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-7A                                                                                                        | R4SB (Ditch)                      | 0.4 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-30                                                                                                        | R3UBh (Lentzier Ck)               | 3.8 mi                           | 0.37                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| IE-WE-94                                                                                                        | R3UBH (Lentzier Ck Trib)          | 0.7 mi                           | 0.07                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| IE-WE-96                                                                                                        | R4SB (Lentzier Ck Trib)           | 0.6 mi                           | 0.07                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-97                                                                                                        | R4SB (Lentzier Ck Trib)           | 0.4 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-89                                                                                                        | R4SBC (Lentzier Ck Trib)          | 0.9 mi                           | 0.22                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| KE-WE-103                                                                                                       | R4SB (Harrods Ck Trib)            | 0.2 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| KE-WE-102A                                                                                                      | R4SB (Harrods Ck Trib)            | 0.2 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| KE-WE-25                                                                                                        | R3BUH (Hunting Creek)             | 1.2 mi                           | 0.10                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| KE-WE-47                                                                                                        | R2UBH (Harrods Ck)                | 3.7 mi                           | 3.14                               | Yes             | Creation of barriers to species and processes                                        |                                    |
| KE-WE-101                                                                                                       | R3UBH (Harrods Ck Trib)           | 0.5 mi                           | 0.64                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| TOTAL AREA OF RIVERINE IMPACTS                                                                                  |                                   |                                  | 4.83                               |                 |                                                                                      |                                    |
|                                                                                                                 |                                   |                                  |                                    |                 |                                                                                      |                                    |
| TOTAL AREA OF DIRECT WETLAND IMPACTS                                                                            |                                   |                                  | 6.14                               |                 |                                                                                      |                                    |

1 = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

2 = The values shown for lacustrine and all riverine systems are in linear kilometers. The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only.

3 = All alternatives would encroach upon the Ohio River. Encroachment is anticipated to be limited to the placement of piers within the channel only. Detailed impacts of these encroachments will be determined during the design of the preferred alternative.

4 = Additional impacts for riverine and lacustrine wetlands have been listed under the Water Body Modifications Table.

**Table III**  
**Direct and Indirect Wetland Impacts by Alternative**

| TABLE III: Direct and Indirect Wetland Impact by Site Number<br>Alternative Comparison Impact Evaluation Matrix |                                   |                                  | ALTERNATIVE B1                     |                 |                                                                                      |                                    |
|-----------------------------------------------------------------------------------------------------------------|-----------------------------------|----------------------------------|------------------------------------|-----------------|--------------------------------------------------------------------------------------|------------------------------------|
| Alpha-Numeric Code                                                                                              | Field Classification <sup>1</sup> | Total Size in Acres <sup>2</sup> | Area of Direct Impact <sup>3</sup> | Indirect Impact | Type of Indirect Impact                                                              | Notes                              |
| <b>PALUSTRINE SCRUB-SHRUB WETLANDS (PSS)</b>                                                                    |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-69                                                                                                        | PSS/PEMA                          | 1.31                             | 1.26                               | Yes             | Fragmented                                                                           | Only 0.02 ha remain                |
| TOTAL AREA OF PSS IMPACTS                                                                                       |                                   |                                  | 1.26                               |                 |                                                                                      |                                    |
| <b>PALUSTRINE EMERGENT WETLANDS (PEM)</b>                                                                       |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-78                                                                                                        | PEMA                              | 1.63                             | 0.17                               | Yes             | Proximity to habitat                                                                 |                                    |
| TOTAL AREA OF PEM IMPACTS                                                                                       |                                   |                                  | 0.17                               |                 |                                                                                      |                                    |
| <b>PALUSTRINE UNCONSOLIDATED BOTTOM WETLANDS (PUB)</b>                                                          |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-88                                                                                                        | PUBHh                             | 18.11                            | 0.00                               | Yes             | Hydrology altered                                                                    | Connected to IE-WE-7A and IE-WE-13 |
| TOTAL AREA OF PUB IMPACTS                                                                                       |                                   |                                  | 0                                  |                 |                                                                                      |                                    |
| <b>RIVERINE WETLANDS</b>                                                                                        |                                   |                                  |                                    |                 |                                                                                      |                                    |
| IE-WE-13                                                                                                        | R4SBC (Ditch)                     | 0.6 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-68                                                                                                        | R2UBH (Lancassange Ck)            | 2.6 mi                           | 1.14                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| IE-WE-101                                                                                                       | R4SB (Lancassange Ck Trib)        | 0.1 mi                           | 0.02                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species |                                    |
| KE-WE-108                                                                                                       | R4SB (Ditch)                      | 1.2 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species | Previous similar impact at I-264   |
| KE-WE-68                                                                                                        | R4SBC (Ditch)                     | 2.2 mi                           | 0.05                               | Yes             | Down-cutting, increased sedimentation, creation of barriers to processes and species | Previous similar impact at I-264   |
| TOTAL AREA OF RIVERINE IMPACTS                                                                                  |                                   |                                  | 1.31                               |                 |                                                                                      |                                    |
| TOTAL AREA OF DIRECT WETLAND IMPACTS                                                                            |                                   |                                  | 2.74                               |                 |                                                                                      |                                    |

1 = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

2 = The values shown for lacustrine and all riverine systems are in linear kilometers. The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only.

3 = All alternatives would encroach upon the Ohio River. Encroachment is anticipated to be limited to the placement of piers within the channel only. Detailed impacts of these encroachments will be determined during the design of the preferred alternative.

4 = Additional impacts for riverine and lacustrine wetlands have been listed under the Water Body Modifications Table.

**Table III**  
**Direct and Indirect Wetland impact by Alternative**

| TABLE III: Direct and Indirect Wetland Impact by Site Number<br>Alternative Comparison Impact Evaluation Matrix |                                   |                                  | ALTERNATIVES C1, C2 & C3            |    |      |                 |                                               |       |
|-----------------------------------------------------------------------------------------------------------------|-----------------------------------|----------------------------------|-------------------------------------|----|------|-----------------|-----------------------------------------------|-------|
|                                                                                                                 |                                   |                                  | Area of Direct Impacts <sup>3</sup> |    |      |                 |                                               |       |
| Alpha-Numeric Code                                                                                              | Field Classification <sup>1</sup> | Total Size in Acres <sup>2</sup> | C1                                  | C2 | C3   | Indirect Impact | Type of Indirect Impact                       | Notes |
| LACUSTRINE WETLANDS                                                                                             |                                   |                                  |                                     |    |      |                 |                                               |       |
| KD-WE-5                                                                                                         | L1UBHh (Beargrass Ck.)            | 1.1 mi                           | 0.25                                | 0  | 0.25 | Yes             | Creation of barriers to processes and species |       |
| TOTAL AREA OF LACUSTRINE IMPACTS                                                                                |                                   |                                  | 0.25                                | 0  | 0.25 |                 |                                               |       |
|                                                                                                                 |                                   |                                  |                                     |    |      |                 |                                               |       |
| TOTAL AREA OF DIRECT WETLAND IMPACTS                                                                            |                                   |                                  | 0.25                                | 0  | 0.25 |                 |                                               |       |

1 = Field determinations conducted per the 1987 U.S. Army Corps of Engineers Wetland Delineation Manual.

2 = The values shown for lacustrine and all riverine systems are in linear kilometers. The lengths measured for the listed lacustrine and riverine systems are the lengths within the project area only.

3 = All alternatives would encroach upon the Ohio River. Encroachment is anticipated to be limited to the placement of piers within the channel only. Detailed impacts of these encroachments will be determined during the design of the preferred alternative.

4 = Additional impacts for riverine and lacustrine wetlands have been listed under the Water Body Modifications Table.

**Table IV**  
**Water Body Modifications by Alternative**

**TABLE IV: Water Body Modifications by Alternative**  
**Impact Evaluation Matrix**

| <b>ALTERNATIVE A2</b>             |                |                             |                              |                             |           |                                   |                           |                          |                        |                                   |
|-----------------------------------|----------------|-----------------------------|------------------------------|-----------------------------|-----------|-----------------------------------|---------------------------|--------------------------|------------------------|-----------------------------------|
| Alpha-Numeric<br>Code of Waterway | Classification | Name of Waterway<br>Crossed | Stream<br>Order <sup>1</sup> | Location Along<br>Alignment | Structure | Type of Modification              | Width of<br>Waterway (ft) | Length of<br>Impact (ft) | Area of<br>Impact (Ac) | Game fish<br>present <sup>2</sup> |
| IE-WE-7A                          | R4SB           | Ditch                       | 0                            | 10+881                      | Culvert   | Channel straightening & enclosure | 3.9                       | 361                      | 0.02                   | 0                                 |
| IE-WE-30                          | R3UBH          | Lentzier Creek              | 2                            | 11+992                      | Bridge    | Bank stabilization, Realignment   | 23.0                      | 597                      | 0.32                   | 3                                 |
| IE-WE-94                          | R3UBH          | Lentzier Creek Tributary    | 1                            | 12+774                      | Bridge    | Bank stabilization, Realignment   | 16.4                      | 427                      | 0.17                   | UK                                |
| IE-WE-96                          | R4SB           | Lentzier Creek Tributary    | 0                            | 13+245                      | Culvert   | Channel straightening & enclosure | 5.9                       | 666                      | 0.10                   | UK                                |
| IE-WE-97                          | R4SB           | Lentzier Creek Tributary    | 0                            | 13+770                      | Culvert   | Channel straightening & enclosure | 5.9                       | 410                      | 0.05                   | UK                                |
| IE-WE-89                          | R4SBC          | Lentzier Creek Tributary    | 1                            | 14+015                      | Bridge    | Bank stabilization, Realignment   | 37.1                      | 558                      | 0.47                   | UK                                |
| KE-WE-25                          | R3UBH          | Harrods Creek Tributary     | 2                            | 17+344                      | Bridge    | Bank stabilization, Realignment   | 29.5                      | 394                      | 0.27                   | UK                                |
| KE-WE-95                          | PUBH           | Putney's Pond               | 3                            | 17+973                      | Bridge    | Span, piers only                  | NA                        | NA                       | 0.00                   | 4                                 |
| KE-WE-47                          | R2UBH          | Harrods Creek               | 5                            | 18+813                      | Bridge    | Bank stabilization, Realignment   | 98.4                      | 863                      | 1.95                   | 9                                 |
| <b>TOTALS</b>                     |                |                             |                              |                             |           |                                   | <b>220.2</b>              | <b>4275</b>              | <b>3.36</b>            |                                   |

| <b>ALTERNATIVE A9</b>             |                   |                                       |                              |                             |           |                                   |                           |                          |                        |                                   |
|-----------------------------------|-------------------|---------------------------------------|------------------------------|-----------------------------|-----------|-----------------------------------|---------------------------|--------------------------|------------------------|-----------------------------------|
| Alpha-Numeric<br>Code of Waterway | Classification    | Name of Waterway<br>Crossed           | Stream<br>Order <sup>1</sup> | Location Along<br>Alignment | Structure | Type of Modification              | Width of<br>Waterway (ft) | Length of<br>Impact (ft) | Area of<br>Impact (Ac) | Game fish<br>present <sup>2</sup> |
| IE-WE-13                          | R4SBC             | Ditch                                 | 0                            | 10+270                      | Culvert   | Channel straightening & enclosure | 3.9                       | 279                      | 0.02                   | 0                                 |
| IE-WE-7A                          | R4SB              | Ditch                                 | 1                            | 10+840                      | Culvert   | Channel straightening & enclosure | 3.9                       | 459                      | 0.05                   | 0                                 |
| IE-WE-99                          | R4SB              | Lentzier Creek Tributary              | 0                            | 12+040                      | Culvert   | Channel straightening & enclosure | 5.9                       | 525                      | 0.07                   | UK                                |
| IE-WE-100                         | R4SB              | Lentzier Creek Tributary              | 0                            | 13+260                      | Culvert   | Channel straightening & enclosure | 3.9                       | 279                      | 0.02                   | UK                                |
| IE-WE-95                          | R3UBH             | Lentzier Creek Tributary              | 1                            | 13+785                      | Culvert   | Channel straightening & enclosure | 11.8                      | 961                      | 0.27                   | UK                                |
| KE-WE-48 and<br>KE-WE-60          | R2UBH &<br>L1UBWh | Little Goose Creek and<br>Goose Creek | 4                            | 16+618                      | Bridge    | Bank stabilization, Realignment   | 30.8                      | 262                      | 0.20                   | 2                                 |
| KE-WE-60                          | L1UBWh            | Goose Creek                           | 3                            | 16+740                      | Bridge    | Bank stabilization, Realignment   | 31.5                      | 243                      | 0.17                   | 2                                 |
| KE-WE-60                          | L1UBWh            | Goose Creek                           | 3                            | 16+903                      | Bridge    | Bank stabilization, Realignment   | 31.5                      | 541                      | 0.40                   | 2                                 |
| KE-WE-104                         | R4SB              | Little Goose Creek<br>Tributary       | 0                            | 17+300                      | Culvert   | Channel straightening & enclosure | 5.9                       | 279                      | 0.05                   | UK                                |
| KE-WE-104A                        | R4SB              | Little Goose Creek<br>Tributary       | 0                            | 17+370                      | Culvert   | Channel straightening & enclosure | 3.9                       | 279                      | 0.02                   | UK                                |
| KE-WE-48                          | R2UBH             | Little Goose Creek                    | 3                            | 17+650                      | Bridge    | Bank stabilization, Realignment   | 55.8                      | 568                      | 0.72                   | 2                                 |
| KE-WE-105                         | R4SB              | Little Goose Creek<br>Tributary       | 0                            | 17+990                      | Culvert   | Channel straightening & enclosure | 3.9                       | 279                      | 0.02                   | UK                                |
| KE-WE-100                         | R3UBH             | Little Goose Creek<br>Tributary       | 1                            | 18+300                      | Culvert   | Channel straightening & enclosure | 10.2                      | 650                      | 0.15                   | UK                                |
| KE-WE-106                         | R4SB              | Little Goose Creek<br>Tributary       | 0                            | 18+840                      | Culvert   | Channel straightening & enclosure | 3.9                       | 279                      | 0.02                   | UK                                |
| <b>TOTALS</b>                     |                   |                                       |                              |                             |           |                                   | <b>207.0</b>              | <b>5883</b>              | <b>2.20</b>            |                                   |

**Table IV  
Water Body Modifications by Alternative**

| <b>ALTERNATIVE A13</b>         |                |                          |                           |                          |           |                                   |                        |                       |                     |                                |
|--------------------------------|----------------|--------------------------|---------------------------|--------------------------|-----------|-----------------------------------|------------------------|-----------------------|---------------------|--------------------------------|
| Alpha-Numeric Code of Waterway | Classification | Name of Waterway Crossed | Stream Order <sup>1</sup> | Location Along Alignment | Structure | Type of Modification              | Width of Waterway (ft) | Length of Impact (ft) | Area of Impact (Ac) | Game fish present <sup>2</sup> |
| IE-WE-13                       | R4SBC          | Ditch                    | 1                         | 10+300                   | Culvert   | Channel straightening & enclosure | 3.9                    | 279                   | 0.02                | 0                              |
| IE-WE-7A                       | R4SB           | Ditch                    | 0                         | 10+870                   | Culvert   | Channel straightening & enclosure | 3.9                    | 361                   | 0.02                | 0                              |
| IE-WE-30                       | R3UBh          | Lentzier Creek           | 2                         | 12+227                   | Bridge    | Bank stabilization, realignment   | 23.0                   | 1654                  | 0.86                | 3                              |
| IE-WE-94                       | R3UBH          | Lentzier Creek Tributary | 1                         | 12+820                   | Bridge    | Bank stabilization, realignment   | 49.2                   | 446                   | 0.49                | UK                             |
| IE-WE-96                       | R4SB           | Lentzier Creek Tributary | 0                         | 13+240                   | Culvert   | Channel straightening & enclosure | 5.9                    | 656                   | 0.10                | UK                             |
| IE-WE-89                       | R4SBC          | Lentzier Creek Tributary | 1                         | 13+720                   | Bridge    | Bank stabilization, realignment   | 29.5                   | 558                   | 0.37                | UK                             |
| KE-WE-19A                      | R4SB           | Harrods Creek Tributary  | 0                         | 16+760                   | Culvert   | Channel straightening & enclosure | 5.9                    | 417                   | 0.05                | UK                             |
| KE-WE-47                       | R2UBH          | Harrods Creek            | 5                         | 17+060                   | Bridge    | Bank stabilization, realignment   | 137.8                  | 833                   | 2.64                | 9                              |
| <b>TOTALS</b>                  |                |                          |                           |                          |           |                                   | 259.2                  | 5204                  | 4.57                |                                |

| <b>ALTERNATIVE A15</b>         |                |                          |                           |                          |           |                                   |                        |                       |                     |                                |
|--------------------------------|----------------|--------------------------|---------------------------|--------------------------|-----------|-----------------------------------|------------------------|-----------------------|---------------------|--------------------------------|
| Alpha-Numeric Code of Waterway | Classification | Name of Waterway Crossed | Stream Order <sup>1</sup> | Location Along Alignment | Structure | Type of Modification              | Width of Waterway (ft) | Length of Impact (ft) | Area of Impact (Ac) | Game fish present <sup>2</sup> |
| IE-WE-13                       | R4SBC          | Ditch                    | 1                         | 10+240                   | Culvert   | Channel straightening & enclosure | 5.9                    | 279                   | 0.05                | 0                              |
| IE-WE-7A                       | R4SB           | Ditch                    | 0                         | 10+870                   | Culvert   | Channel straightening & enclosure | 3.9                    | 404                   | 0.02                | 0                              |
| IE-WE-30                       | R3UBh          | Lentzier Creek           | 2                         | 12+000                   | Bridge    | Bank stabilization, realignment   | 38.7                   | 538                   | 0.47                | 3                              |
| IE-WE-94                       | R3UBH          | Lentzier Creek Tributary | 1                         | 12+780                   | Bridge    | Bank stabilization, realignment   | 24.6                   | 646                   | 0.37                | UK                             |
| IE-WE-96                       | R4SB           | Lentzier Creek Tributary | 0                         | 13+260                   | Culvert   | Channel straightening & enclosure | 5.9                    | 735                   | 0.10                | UK                             |
| IE-WE-97                       | R4SB           | Lentzier Creek Tributary | 0                         | 13+760                   | Culvert   | Channel straightening & enclosure | 3.9                    | 512                   | 0.05                | UK                             |
| IE-WE-89                       | R4SBC          | Lentzier Creek Tributary | 1                         | 14+050                   | Bridge    | Bank stabilization, realignment   | 34.5                   | 295                   | 0.22                | UK                             |
| IE-WE-98                       | R4SB           | Ditch                    | 0                         | 15+000                   | Culvert   | Channel straightening & enclosure | 9.8                    | 518                   | 0.12                | 0                              |
| KE-WE-19A                      | R4SB           | Harrods Creek Tributary  | 0                         | 17+220                   | Culvert   | Channel straightening & enclosure | 5.9                    | 417                   | 0.05                | UK                             |
| KE-WE-47                       | R2UBH          | Harrods Creek            | 5                         | 17+500                   | Bridge    | Bank stabilization, realignment   | 143.1                  | 623                   | 2.05                | 9                              |
| <b>TOTALS</b>                  |                |                          |                           |                          |           |                                   | 276.3                  | 4967                  | 3.51                |                                |

**Table IV  
Water Body Modifications by Alternative**

| <b>ALTERNATIVE A16</b>                    |                       |                                     |                                     |                                     |                  |                                   |                                   |                                  |                                |                                          |
|-------------------------------------------|-----------------------|-------------------------------------|-------------------------------------|-------------------------------------|------------------|-----------------------------------|-----------------------------------|----------------------------------|--------------------------------|------------------------------------------|
| <b>Alpha-Numeric<br/>Code of Waterway</b> | <b>Classification</b> | <b>Name of Waterway<br/>Crossed</b> | <b>Stream<br/>Order<sup>1</sup></b> | <b>Location Along<br/>Alignment</b> | <b>Structure</b> | <b>Type of Modification</b>       | <b>Width of<br/>Waterway (ft)</b> | <b>Length of<br/>Impact (ft)</b> | <b>Area of<br/>Impact (Ac)</b> | <b>Game fish<br/>present<sup>2</sup></b> |
| IE-WE-13                                  | R4SBC                 | Ditch                               | 1                                   | 9+340                               | Culvert          | Channel straightening & enclosure | 3.9                               | 279                              | 0.02                           | 0                                        |
| IE-WE-7A                                  | R4SB                  | Ditch                               | 0                                   | 10+070                              | Culvert          | Channel straightening & enclosure | 5.9                               | 410                              | 0.05                           | 0                                        |
| IE-WE-30                                  | R3UBh                 | Lentzier Creek                      | 2                                   | 11+140                              | Bridge           | Bank stabilization, realignment   | 32.8                              | 492                              | 0.37                           | 3                                        |
| IE-WE-94                                  | R3UBH                 | Lentzier Creek Tributary            | 1                                   | 11+980                              | Bridge           | Bank stabilization, realignment   | 7.9                               | 459                              | 0.07                           | UK                                       |
| IE-WE-96                                  | R4SB                  | Lentzier Creek Tributary            | 0                                   | 12+430                              | Culvert          | Channel straightening & enclosure | 3.9                               | 837                              | 0.07                           | UK                                       |
| IE-WE-97                                  | R4SB                  | Lentzier Creek Tributary            | 0                                   | 12+930                              | Culvert          | Channel straightening & enclosure | 3.9                               | 420                              | 0.05                           | UK                                       |
| IE-WE-89                                  | R4SBC                 | Lentzier Creek Tributary            | 1                                   | 13+222                              | Bridge           | Bank stabilization, realignment   | 29.5                              | 335                              | 0.22                           | UK                                       |
| KE-WE-103                                 | R4SB                  | Harrods Creek Tributary             | 0                                   | 16+120                              | Culvert          | Channel straightening & enclosure | 5.9                               | 410                              | 0.05                           | UK                                       |
| KE-WE-102A                                | R4SB                  | Harrods Creek Tributary             | 0                                   | 16+300                              | Culvert          | Channel straightening & enclosure | 5.9                               | 410                              | 0.05                           | UK                                       |
| KE-WE-25                                  | R3UBH                 | Harrods Creek Tributary             | 2                                   | 17+200                              | Culvert          | Channel straightening & enclosure | 13.1                              | 364                              | 0.10                           | UK                                       |
| KE-WE-47                                  | R2UBH                 | Harrods Creek                       | 5                                   | 16+735                              | Bridge           | Bank stabilization, realignment   | 183.7                             | 345                              | 1.46                           | 9                                        |
| KE-WE-47                                  | R2UBH                 | Harrods Creek                       | 5                                   | 17+016                              | Bridge           | Bank stabilization, realignment   | 116.5                             | 328                              | 0.89                           | 9                                        |
| KE-WE-47                                  | R2UBH                 | Harrods Creek                       | 5                                   | 17+345                              | Bridge           | Bank stabilization, realignment   | 101.7                             | 341                              | 0.79                           | 9                                        |
| KE-WE-101                                 | R3UBH                 | Harrods Creek Tributary             | 1                                   | 18+160                              | Culvert          | Channel straightening & enclosure | 55.8                              | 509                              | 0.64                           | UK                                       |
| <b>TOTALS</b>                             |                       |                                     |                                     |                                     |                  |                                   | <b>570.6</b>                      | <b>5939</b>                      | <b>4.84</b>                    |                                          |

**Table IV**  
**Water Body Modifications by Alternative**

| <b>ALTERNATIVE B1</b>          |                |                             |                           |                          |           |                                                                    |                        |                       |                     |                                |
|--------------------------------|----------------|-----------------------------|---------------------------|--------------------------|-----------|--------------------------------------------------------------------|------------------------|-----------------------|---------------------|--------------------------------|
| Alpha-Numeric Code of Waterway | Classification | Name of Waterway Crossed    | Stream Order <sup>1</sup> | Location Along Alignment | Structure | Type of Modification                                               | Width of Waterway (ft) | Length of Impact (ft) | Area of Impact (Ac) | Game fish present <sup>2</sup> |
| IE-WE-13                       | R4SBC          | Ditch                       | 1                         | 10+320                   | Culvert   | Channel straightening & enclosure                                  | 5.9                    | 279                   | 0.05                | 0                              |
| IE-WE-68                       | R2UBH          | Lancassange Creek           | 3                         | 10+920                   | Culvert   | Channel straightening & enclosure                                  | 10.2                   | 591                   | 0.15                | 2                              |
| IE-WE-68                       | R2UBH          | Lancassange Creek           | 3                         | 12+890                   | Bridge    | Bank stabilization, realignment                                    | 26.6                   | 492                   | 0.30                | 2                              |
| IE-WE-101                      | R4SB           | Lancassange Creek Tributary | 0                         | Ramp                     | Culvert   | Channel straightening & enclosure                                  | 3.9                    | 279                   | 0.02                | UK                             |
| IE-WE-68                       | R2UBH          | Lancassange Creek           | 3                         | 14+600                   | Bridge    | Bank stabilization, realignment                                    | 49.9                   | 607                   | 0.69                | 2                              |
| KE-WE-108                      | R4SB           | Ditch                       | 1                         | I-71                     | Culvert   | Channel straightening & enclosure, expansion of existing structure | 5.9                    | 410                   | 0.05                | 0                              |
| KE-WE-68                       | R4SB           | Ditch                       | 2                         | I-71                     | Culvert   | Channel straightening & enclosure, expansion of existing structure | 5.9                    | 410                   | 0.05                | 0                              |
| <b>TOTALS</b>                  |                |                             |                           |                          |           |                                                                    | 108.3                  | 3068                  | 1.31                |                                |

| <b>ALTERNATIVE C1</b>          |                |                          |                           |                          |           |                                 |                        |                       |                     |                                |
|--------------------------------|----------------|--------------------------|---------------------------|--------------------------|-----------|---------------------------------|------------------------|-----------------------|---------------------|--------------------------------|
| Alpha-Numeric Code of Waterway | Classification | Name of Waterway Crossed | Stream Order <sup>1</sup> | Location Along Alignment | Structure | Type of Modification            | Width of Waterway (ft) | Length of Impact (ft) | Area of Impact (Ac) | Game fish present <sup>2</sup> |
| KD-WE-5                        | L1UBHh         | Beargrass Creek          | 4                         | 12+947                   | Bridge    | Bank stabilization, realignment | 49.2                   | 256                   | 0.25                | 4                              |

| <b>ALTERNATIVE C2</b>          |                |                          |                           |                          |           |                                 |                        |                       |                     |                                |
|--------------------------------|----------------|--------------------------|---------------------------|--------------------------|-----------|---------------------------------|------------------------|-----------------------|---------------------|--------------------------------|
| Alpha-Numeric Code of Waterway | Classification | Name of Waterway Crossed | Stream Order <sup>1</sup> | Location Along Alignment | Structure | Type of Modification            | Width of Waterway (ft) | Length of Impact (ft) | Area of Impact (Ac) | Game fish present <sup>2</sup> |
| KD-WE-5                        | L1UBHh         | Beargrass Creek          | 4                         | Not yet assigned         | Bridge    | Bank stabilization, realignment | 49.2                   | 0                     | 0                   | 4                              |

| <b>ALTERNATIVE C3</b>          |                |                          |                           |                          |           |                                 |                        |                       |                     |                                |
|--------------------------------|----------------|--------------------------|---------------------------|--------------------------|-----------|---------------------------------|------------------------|-----------------------|---------------------|--------------------------------|
| Alpha-Numeric Code of Waterway | Classification | Name of Waterway Crossed | Stream Order <sup>1</sup> | Location Along Alignment | Structure | Type of Modification            | Width of Waterway (ft) | Length of Impact (ft) | Area of Impact (Ac) | Game fish present <sup>2</sup> |
| KD-WE-5                        | L1UBHh         | Beargrass Creek          | 4                         | Not yet assigned         | Bridge    | Bank stabilization, realignment | 49.2                   | 256                   | 0.25                | 4                              |

1= Stream Classification was done according to the Strahler method. Please see the text for details.

2= Please refer to the Aquatic Vertebrates Table X for a listing of game fish. UK- Unknown No archival data or field survey data for game fish.

# MEMO OF UNDERSTANDING

This memorandum of understanding is made and entered into this 28th day of January, 1991 between the Indiana Department of Transportation (INDOT), the Indiana Department of Natural Resources (IDNR), and the U. S. Fish and Wildlife Service (USFWS) for the purpose of improving the regulatory programs process.

Whereas, INDOT, IDNR and USFWS wish to cooperate with each other to facilitate state and federal permitting requirements in the determination of the type and level of wetland mitigation required and,

Whereas, the INDOT will accomplish wetland mitigation through sequencing, i.e. avoiding impacts, minimizing impacts, rectifying impacts, reducing impacts over time and compensating impacts,

Therefore, in consideration of the terms and conditions set forth herein the INDOT, IDNR and USFWS agree as follows:

1. INDOT in cooperation with the IDNR and USFWS shall determine the quality and quantity of wetland habitat to be impacted by INDOT projects. INDOT will utilize the Federal Manual for Identifying and Delineating Jurisdictional Wetlands. The IDNR and USFWS will be requested to review and comment on INDOT's findings at the early coordination phase of project development.

2. INDOT, using the input from IDNR and USFWS, will formulate appropriate and practicable measures to offset unavoidable impacts to wetlands.
3. INDOT will send a summary or copy of the approved environmental document containing the measures to offset unavoidable impacts to wetlands to IDNR's Division of Fish and Wildlife and the USFWS.
4. If IDNR or the USFWS feel other appropriate and practicable measures are required for regulatory purposes they will notify INDOT in writing so INDOT can arrange a field review. The field review, which will include representatives from INDOT, IDNR and USFWS, will identify additional unavoidable impacts to wetlands and final compensation to the extent appropriate and practicable will be noted.
5. As a result of the field review, if all agencies agree, a mitigation agreement will be prepared. This agreement will be signed by the Department Director of IDNR, the Commissioner of INDOT and the supervisor of the USFWS Bloomington Indiana Field Office. The mitigation agreement will accompany all permit requests so the permitting agency has written documentation that agreement on wetland mitigation has been reached, by the three agencies.
6. Mitigation ratios acceptable to INDOT, IDNR and USFWS will be:

| <u>Wetland Type</u>                                         | <u>Ratio</u>                                  |
|-------------------------------------------------------------|-----------------------------------------------|
| A) farmed                                                   | 1 to 1                                        |
| B) scrub-shrub and palustrine/<br>lacustrine emergent       | 2-3 to 1 depending<br>upon quality            |
| C) bottomland hardwood forest                               | 3-4 to 1 depending<br>upon quality            |
| D) exceptional, unique,<br>critical (i.e. cypress<br>swamp) | 4 and above to 1<br>depending upon<br>quality |

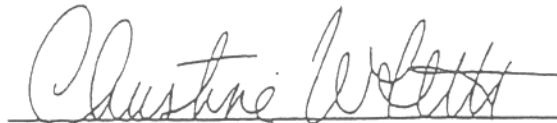
Acceptable mitigation shall be restoration or creation.

The mitigation ratios take into consideration the initial loss plus a time factor to achieve in kind or greater value wetland habitat. The goal is to achieve no net loss of the wetland resource. Wetland mitigation ratios for violations or unpermitted activities shall be determined on a case by case basis.

7. The INDOT, IDNR and USFWS agree that due to conditions at certain project sites, wetland mitigation such as restoration or creation may not be available or may otherwise be impracticable. All parties further realize that in some cases agreement on appropriate and practicable wetland mitigation will not be attained by the three agencies. In those cases, the INDOT agrees to monetary compensation at the rate of \$1500/acre, to be dedicated to a designated wetland restoration or wetland creation project(s) at the aforementioned specified mitigation ratios.

8. Reimbursement to IDNR and/or USFWS for personnel costs will be made by INDOT for formally requested work associated with wetland design, construction or monitoring for compliance and/or achievement of the intended purpose(s).
9. All parties agree that INDOT, not being a resource agency, will transfer title of lands acquired for wetland mitigation to an agreed upon recipient in lieu of INDOT holding such lands in perpetuity.
10. This document will be reviewed annually or more frequently at the request of any of the foregoing agencies.

Signatures



Indiana Department of Transportation

Commissioner



Indiana Department of Natural Resources

Director



U. S. Fish and Wildlife Service  
Bloomington, Indiana Field Office

January 28, 1991

Supervisor

**Appendix B.4**  
**FARMLAND CONVERSION IMPACT RATING FORMS**

# FARMLAND CONVERSION IMPACT RATING FOR CORRIDOR TYPE PROJECTS

|                                                                                                                                                                                                                                            |                                                                                |                                                                            |                           |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------|----------------------------------------------------------------------------|---------------------------|
| (To be completed by Federal Agency)                                                                                                                                                                                                        |                                                                                | 3. Date of Land Evaluation Request<br><u>MARCH 7, 2000</u>                 | 4. Sheet 1 of <u>2</u>    |
| 1. Name of Project<br><u>LOUISVILLE-SOUTHERN INDIANA OHIO RIVER BRIDGES</u>                                                                                                                                                                |                                                                                | 5. Federal Agency Involved<br><u>U.S. DOT - FHWA</u>                       |                           |
| 2. Type of Project<br><u>HIGHWAY- RIGHT-OF-WAY</u>                                                                                                                                                                                         |                                                                                | 6. County and State<br><u>CLARK COUNTY, INDIANA</u>                        |                           |
| PART II (To be completed by SCS)                                                                                                                                                                                                           |                                                                                | 1. Date Request Received By SCS                                            | 2. Person Completing Form |
| 3. Does the corridor contain prime, unique statewide or local important farmland?<br>(If no, the FPPA does not apply - Do not complete additional parts of this form). YES <input checked="" type="checkbox"/> NO <input type="checkbox"/> |                                                                                | 4. Acres Irrigated <u>144</u> Average Farm Size                            |                           |
| 5. Major Crops<br><u>CORN</u>                                                                                                                                                                                                              | 6. Farmable Land In Government Jurisdiction<br>Acres: <u>180,470</u> <u>74</u> | 7. Amount Of Farmland As Defined In FPPA<br>Acres: <u>90,235</u> <u>37</u> |                           |
| 8. Name Of Land Evaluation System Used                                                                                                                                                                                                     | 9. Name of Local Site Assessment System                                        | 10. Date Land Evaluation Returned By SCS                                   |                           |

| PART III (To be completed by Federal Agency)                      | Alternative Corridor For Segment |              |               |               |
|-------------------------------------------------------------------|----------------------------------|--------------|---------------|---------------|
|                                                                   | <u>Alt 2</u>                     | <u>Alt 9</u> | <u>Alt 13</u> | <u>Alt 15</u> |
| A. Total Acres To Be Converted Directly                           | <u>285.0</u>                     | <u>166</u>   | <u>283</u>    | <u>287</u>    |
| B. Total Acres To Be Converted Indirectly, Or To Receive Services | <u>0</u>                         | <u>0</u>     | <u>0</u>      | <u>0</u>      |
| C. Total Acres In Corridor                                        | <u>285.0</u>                     | <u>166</u>   | <u>283</u>    | <u>287</u>    |

| PART IV (To be completed by SCS) Land Evaluation Information                                                                               |            |            |            |            |
|--------------------------------------------------------------------------------------------------------------------------------------------|------------|------------|------------|------------|
| A. Total Acres Prime And Unique Farmland                                                                                                   | <u>114</u> | <u>102</u> | <u>124</u> | <u>121</u> |
| B. Total Acres Statewide And Local Important Farmland                                                                                      | <u>0</u>   | <u>0</u>   | <u>0</u>   | <u>0</u>   |
| C. Percentage Of Farmland In County Or Local Govt. Unit To Be Converted                                                                    | <u>126</u> | <u>113</u> | <u>139</u> | <u>134</u> |
| D. Percentage Of Farmland In Govt. Jurisdiction With Same Or Higher Relative Value                                                         | <u>173</u> | <u>105</u> | <u>160</u> | <u>160</u> |
| PART V (To be completed by SCS) Land Evaluation Criterion Relative Value of Farmland to Be Serviced or Converted (Scale of 0 - 100 Points) |            |            |            |            |
|                                                                                                                                            | <u>56</u>  | <u>71</u>  | <u>62</u>  | <u>61</u>  |

| VI (To be completed by Federal Agency) Corridor Assessment Criteria (These criteria are explained in 7 CFR 658.5(c)) |    | Maximum Points |      |       |       |       |
|----------------------------------------------------------------------------------------------------------------------|----|----------------|------|-------|-------|-------|
| 1. Area In Nonurban Use                                                                                              | 15 | 10.5           | 10.5 | 12.75 | 12.75 |       |
| 2. Perimeter In Nonurban Use                                                                                         | 10 | 7.0            | 7.0  | 9.0   | 9.5   |       |
| 3. Percent Of Corridor Being Farmed                                                                                  | 20 | 8.9            | 9.4  | 6.5   | 9.0   |       |
| 4. Protection Provided By State And Local Government                                                                 | 20 | 0              | 0    | 0     | 0     |       |
| 5. Size Of Present Farm Unit Compared To Average                                                                     | 10 | 0              | 1    | 0     | 3.0   |       |
| 6. Creation Of Nonfarmable Farmland                                                                                  | 25 | 0              | 0    | 0     | 0     |       |
| 7. Availability Of Farm Support Services                                                                             | 5  | 5.0            | 5.0  | 5.0   | 5.0   |       |
| 8. On-Farm Investments                                                                                               | 20 | 15.0           | 15.0 | 15.0  | 15.0  |       |
| 9. Effects Of Conversion On Farm Support Services                                                                    | 25 | 0              | 0    | 0     | 0     |       |
| 10. Compatibility With Existing Agricultural Use                                                                     | 10 | 3.1            | 3    | 3     | 4     |       |
| TOTAL CORRIDOR ASSESSMENT POINTS                                                                                     |    | 160            | 49.5 | 50.9  | 51.25 | 58.25 |

| PART VII (To be completed by Federal Agency)                              |     |       |       |        |        |
|---------------------------------------------------------------------------|-----|-------|-------|--------|--------|
| Relative Value Of Farmland (From Part V)                                  | 100 | 56    | 71    | 62     | 61     |
| Total Corridor Assessment (From Part VI above or a local site assessment) | 160 | 49.5  | 50.9  | 51.25  | 58.25  |
| TOTAL POINTS (Total of above 2 lines)                                     | 260 | 105.5 | 121.9 | 113.25 | 119.25 |

|                       |                                                         |                       |                                                                                                  |
|-----------------------|---------------------------------------------------------|-----------------------|--------------------------------------------------------------------------------------------------|
| 1. Corridor Selected: | 2. Total Acres of Farmlands to be Converted by Project: | 3. Date Of Selection: | 4. Was A Local Site Assessment Used?<br>YES <input type="checkbox"/> NO <input type="checkbox"/> |
|-----------------------|---------------------------------------------------------|-----------------------|--------------------------------------------------------------------------------------------------|

5. Reason For Selection:

Signature of Person Completing This Part: \_\_\_\_\_ DATE: \_\_\_\_\_

FARMLAND CONVERSION IMPACT RATING  
FOR CORRIDOR TYPE PROJECTS

|                                                                                                                                                                                                                                            |                                                                  |                                                              |                           |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------|--------------------------------------------------------------|---------------------------|
| PART I (To be completed by Federal Agency)                                                                                                                                                                                                 |                                                                  | 3. Date of Land Evaluation Request<br>MARCH 7, 2000          | 4. Sheet 2 of 2           |
| 1. Name of Project<br>LOUISVILLE-SOUTHERN INDIANA OHIO RIVER BRIDGES PROJECT                                                                                                                                                               |                                                                  | 5. Federal Agency Involved<br>U.S. D. O. T - FHWA            |                           |
| 2. Type of Project<br>HIGHWAY - Right-of-Way                                                                                                                                                                                               |                                                                  | 6. County and State<br>CLARK COUNTY, INDIANA                 |                           |
| PART II (To be completed by SCS)                                                                                                                                                                                                           |                                                                  | 1. Date Request Received By SCS                              | 2. Person Completing Form |
| 3. Does the corridor contain prime, unique statewide or local important farmland?<br>(If no, the FPPA does not apply - Do not complete additional parts of this form). YES <input checked="" type="checkbox"/> NO <input type="checkbox"/> |                                                                  | 4. Acres Irrigated Average Farm Size<br>144                  |                           |
| 5. Major Crop(s)<br>CORN                                                                                                                                                                                                                   | 6. Farmable Land In Government Jurisdiction<br>Acres: 180,470 74 | 7. Amount Of Farmland As Defined In FPPA<br>Acres: 90,235 37 |                           |
| 8. Name Of Land Evaluation System Used                                                                                                                                                                                                     | 9. Name of Local Site Assessment System                          | 10. Date Land Evaluation Returned By SCS                     |                           |

| PART III (To be completed by Federal Agency)                      | Alternative Corridor For Segment |        |        |        |
|-------------------------------------------------------------------|----------------------------------|--------|--------|--------|
|                                                                   | Alt. 1                           | Alt. 2 | Alt. 3 | Alt. 4 |
|                                                                   | 205                              | 196    | NA     | NA     |
|                                                                   | 0                                | 0      | NA     | NA     |
| A. Total Acres To Be Converted Directly                           | 205                              | 196    | NA     | NA     |
| B. Total Acres To Be Converted Indirectly, Or To Receive Services | 0                                | 0      | NA     | NA     |
| C. Total Acres In Corridor                                        | 205                              | 196    | NA     | NA     |

|                                                                                                                                               |                                                                                    |     |     |    |    |
|-----------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------|-----|-----|----|----|
| PART IV (To be completed by SCS) Land Evaluation Information                                                                                  | A. Total Acres Prime And Unique Farmland                                           | 110 | 143 | NA | NA |
|                                                                                                                                               | B. Total Acres Statewide And Local-Important Farmland                              | 0   | 0   | NA | NA |
|                                                                                                                                               | C. Percentage Of Farmland In County Or Local Govt. Unit To Be Converted            | 122 | 158 | NA | NA |
|                                                                                                                                               | D. Percentage Of Farmland In Govt. Jurisdiction With Same Or Higher Relative Value | 100 | 42  | NA | NA |
| PART V (To be completed by SCS) Land Evaluation Criterion Relative Value<br>of Farmland to Be Serviced or Converted (Scale of 0 - 100 Points) |                                                                                    | 60  | 80  | NA | NA |

|                                                                                                                              |    |                   |       |      |    |
|------------------------------------------------------------------------------------------------------------------------------|----|-------------------|-------|------|----|
| PART VI (To be completed by Federal Agency) Corridor<br>Assessment Criteria (These criteria are explained in 7 CFR 658.5(c)) |    | Maximum<br>Points |       |      |    |
| 1. Area In Nonurban Use                                                                                                      | 15 | 12.75             | 7.5   | NA   | NA |
| 2. Perimeter In Nonurban Use                                                                                                 | 10 | 9.5               | 6     | NA   | NA |
| 3. Percent Of Corridor Being Farmed                                                                                          | 20 | 9.1               | 9.6   | NA   | NA |
| 4. Protection Provided By State And Local Government                                                                         | 20 | 0                 | 0     | NA   | NA |
| 5. Size Of Present Farm Unit Compared To Average                                                                             | 10 | 0                 | 0     | NA   | NA |
| 6. Creation Of Nonfarmable Farmland                                                                                          | 25 | 0                 | 0     | NA   | NA |
| 7. Availability Of Farm Support Services                                                                                     | 5  | 5.0               | 5.0   | NA   | NA |
| 8. On-Farm Investments                                                                                                       | 20 | 15.0              | 15.0  | NA   | NA |
| 9. Effects Of Conversion On Farm Support Services                                                                            | 25 | 0                 | 0     | NA   | NA |
| 10. Comparability With Existing Agricultural Use                                                                             | 10 | 3.0               | 3.0   | NA   | NA |
| TOTAL CORRIDOR ASSESSMENT POINTS                                                                                             |    | 160               | 54.35 | 46.1 | NA |

|                                                                              |     |        |       |    |    |
|------------------------------------------------------------------------------|-----|--------|-------|----|----|
| PART VII (To be completed by Federal Agency)                                 |     |        |       |    |    |
| Relative Value Of Farmland (From Part V)                                     | 100 | 60     | 80    | NA | NA |
| Total Corridor Assessment (From Part VI above or a local site<br>assessment) | 160 | 54.35  | 46.1  | NA | NA |
| TOTAL POINTS (Total of above 2 lines)                                        | 260 | 114.35 | 126.1 | NA | NA |

|                       |                                                            |                       |                                                                                                  |
|-----------------------|------------------------------------------------------------|-----------------------|--------------------------------------------------------------------------------------------------|
| 1. Corridor Selected: | 2. Total Acres of Farmlands to be<br>Converted by Project: | 3. Date Of Selection: | 4. Was A Local Site Assessment Used?<br>YES <input type="checkbox"/> NO <input type="checkbox"/> |
|-----------------------|------------------------------------------------------------|-----------------------|--------------------------------------------------------------------------------------------------|

|                                                                                   |  |
|-----------------------------------------------------------------------------------|--|
| 5. Reason For Selection:                                                          |  |
| 6. Does the corridor contain prime, unique statewide or local important farmland? |  |
| 7. Major Crops:                                                                   |  |

Signature of Person Completing This Part: \_\_\_\_\_ DATE: \_\_\_\_\_

FARMLAND CONVERSION IMPACT RATING  
FOR CORRIDOR TYPE PROJECTS

|                                                                                                                                                                                                                                            |                                                                      |                                                                 |                           |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------|-----------------------------------------------------------------|---------------------------|
| (To be completed by Federal Agency)                                                                                                                                                                                                        |                                                                      | 3. Date of Land Evaluation Request<br>MARCH 3, 2000             | 4. Sheet 1 of 2           |
| 1. Name of Project<br>LOUISVILLE-SOUTHERN INDIANA CHOKER BRIDGE                                                                                                                                                                            |                                                                      | 5. Federal Agency Involved<br>U.S. DOT - FHWA                   |                           |
| 2. Type of Project<br>HIGHWAY - RIGHT OF WAY                                                                                                                                                                                               |                                                                      | 6. County and State<br>JEFFERSON COUNTY - KENTUCKY              |                           |
| PART II (To be completed by SCS)                                                                                                                                                                                                           |                                                                      | 1. Date Request Received By SCS                                 | 2. Person Completing Form |
| 3. Does the corridor contain prime, unique statewide or local important farmland?<br>(If no, the FPPA does not apply - Do not complete additional parts of this form). YES <input checked="" type="checkbox"/> NO <input type="checkbox"/> |                                                                      | 4. Acres Irrigated<br>0                                         | Average Farm Size<br>82   |
| 5. Major Crop(s)<br>CORN, SOYBEANS                                                                                                                                                                                                         | 6. Farmable Land In Government Jurisdiction<br>Acres: 133,074 4.55.7 | 7. Amount Of Farmland As Defined In FPPA<br>Acres: 112,852 4.47 |                           |
| 8. Name Of Land Evaluation System Used                                                                                                                                                                                                     | 9. Name of Local Site Assessment System                              | 10. Date Land Evaluation Received By SCS                        |                           |

| PART III (To be completed by Federal Agency)                      | Alternative Corridor For Segment |       |       |       |
|-------------------------------------------------------------------|----------------------------------|-------|-------|-------|
|                                                                   | Alt 1                            | Alt 2 | Alt 3 | Alt 4 |
| A. Total Acres To Be Converted Directly                           | 140.0                            | 78.0  | 77.0  | 79.0  |
| B. Total Acres To Be Converted Indirectly, Or To Receive Services | 0                                | 0     | 0     | 0     |
| C. Total Acres In Corridor                                        | 140.0                            | 78.0  | 77.0  | 79.0  |

| PART IV (To be completed by SCS) Land Evaluation Information                                                                               |      |      |      |      |
|--------------------------------------------------------------------------------------------------------------------------------------------|------|------|------|------|
| A. Total Acres Prime And Unique Farmland                                                                                                   | 32.0 | 11.0 | 12.0 | 4.0  |
| B. Total Acres Statewide And Local Important Farmland                                                                                      | 7.0  | 5.0  | 0    | 0    |
| C. Percentage Of Farmland In County Or Local Govt. Unit To Be Converted                                                                    | .001 | .001 | .001 | .001 |
| D. Percentage Of Farmland In Govt. Jurisdiction With Same Or Higher Relative Value                                                         | 23.9 | 62.3 |      | 50.4 |
| PART V (To be completed by SCS) Land Evaluation Criterion Relative Value Of Farmland To Be Serviced Or Converted (Scale of 0 - 100 Points) | 91.2 | 72.7 | 87.2 | 78.2 |

| PART VI (To be completed by Federal Agency) Corridor Assessment Criteria (These criteria are explained in 7 CFR 558.5(c)) |     | Maximum Points |      |      |      |  |
|---------------------------------------------------------------------------------------------------------------------------|-----|----------------|------|------|------|--|
| 1. Area In Nonurban Use                                                                                                   | 15  | 4.5            | 9    | 7.5  | 7.5  |  |
| 2. Perimeter In Nonurban Use                                                                                              | 10  | 4.0            | 9.2  | 9.1  | 9.1  |  |
| 3. Percent Of Corridor Being Farmed                                                                                       | 20  | 10.1           | 10.8 | 1.6  | 0    |  |
| 4. Protection Provided By State And Local Government                                                                      | 20  | 0              | 20.0 | 20.0 | 20.0 |  |
| 5. Size Of Present Farm Unit Compared To Average                                                                          | 10  | 0              | 10.0 | 10.0 | 10.0 |  |
| 6. Creation Of Nonfarmable Farmland                                                                                       | 25  | 0              | 0    | 0    | 0    |  |
| 7. Availability Of Farm Support Services                                                                                  | 5   | 5              | 5.0  | 5.0  | 5.0  |  |
| 8. On-Farm Investments                                                                                                    | 20  | 20             | 20.0 | 20.0 | 20.0 |  |
| 9. Effects Of Conversion On Farm Support Services                                                                         | 25  | 0              | 0    | 0    | 0    |  |
| 10. Compatibility With Existing Agricultural Use                                                                          | 10  | 3              | 10.0 | 10.0 | 10.0 |  |
| TOTAL CORRIDOR ASSESSMENT POINTS                                                                                          | 160 | 46.60          | 94   | 83.2 | 81.4 |  |

| PART VII (To be completed by Federal Agency)                              |     |       |       |       |       |  |
|---------------------------------------------------------------------------|-----|-------|-------|-------|-------|--|
| Relative Value Of Farmland (From Part V)                                  | 100 | 91.2  | 72.7  | 87.2  | 78.2  |  |
| Total Corridor Assessment (From Part VI above or a local site assessment) | 160 | 46.60 | 94    | 83.2  | 81.6  |  |
| TOTAL POINTS (Total of above 2 lines)                                     | 260 | 137.8 | 166.7 | 170.4 | 159.8 |  |

|                       |                                                         |                       |                                                                                                  |
|-----------------------|---------------------------------------------------------|-----------------------|--------------------------------------------------------------------------------------------------|
| 1. Corridor Selected: | 2. Total Acres of Farmlands to be Converted by Project: | 3. Date Of Selection: | 4. Was A Local Site Assessment Used?<br>YES <input type="checkbox"/> NO <input type="checkbox"/> |
|-----------------------|---------------------------------------------------------|-----------------------|--------------------------------------------------------------------------------------------------|

5. Reason For Selection:

Signature of Person Completing This Part: \_\_\_\_\_ DATE: \_\_\_\_\_

FARMLAND CONVERSION IMPACT RATING  
FOR CORRIDOR TYPE PROJECTS

|                                                                                                                                                                                                                                               |                                                                                      |                                                                               |                                                          |                           |                 |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|-------------------------------------------------------------------------------|----------------------------------------------------------|---------------------------|-----------------|
| <b>PART I (To be completed by Federal Agency)</b>                                                                                                                                                                                             |                                                                                      | 3. Date of Land Evaluation Request<br><u>MARCH 3, 2000</u>                    |                                                          | 4. Sheet <u>2 of 2</u>    |                 |
| 1. Name of Project<br><u>LOUISVILLE-SOUTHERN INDIANA OHIO RIVER BRIDGES</u>                                                                                                                                                                   |                                                                                      | 5. Federal Agency Involved<br><u>US DOT - FHWA</u>                            |                                                          |                           |                 |
| 2. Type of Project<br><u>HIGHWAY - RIGHT-OF-WAY</u>                                                                                                                                                                                           |                                                                                      | 6. County and State<br><u>JEFFERSON County, Kentucky</u>                      |                                                          |                           |                 |
| <b>PART II (To be completed by SCS)</b>                                                                                                                                                                                                       |                                                                                      | 1. Date Request Received By SCS                                               |                                                          | 2. Person Completing Form |                 |
| 3. Does the corridor contain prime, unique statewide or local important farmland?<br>(If no, this FPPA does not apply - Do not complete additional parts of this form). YES: <input checked="" type="checkbox"/> NO: <input type="checkbox"/> |                                                                                      | 4. Acres Impacted                                                             |                                                          | Average Farm Size         |                 |
|                                                                                                                                                                                                                                               |                                                                                      | <u>0</u>                                                                      |                                                          | <u>82</u>                 |                 |
| 5. Major Crop(s)<br><u>CORN, SOY BEANS</u>                                                                                                                                                                                                    | 6. Farmable Land In Government Jurisdiction<br>Acres: <u>133,107.4</u> % <u>55.7</u> | 7. Amount Of Farmland As Defined In FPPA<br>Acres: <u>112,852</u> % <u>47</u> |                                                          |                           |                 |
| 8. Name Of Land Evaluation System Used                                                                                                                                                                                                        | 9. Name of Local Site Assessment System                                              | 10. Date Land Evaluation Received By SCS                                      |                                                          |                           |                 |
| <b>PART III (To be completed by Federal Agency)</b>                                                                                                                                                                                           |                                                                                      | Alternative Corridor For Segment                                              |                                                          |                           |                 |
|                                                                                                                                                                                                                                               |                                                                                      | <u>Alt A</u>                                                                  | <u>Alt B</u>                                             | <u>Alt C</u>              | <u>Corridor</u> |
| A. Total Acres To Be Converted Directly                                                                                                                                                                                                       |                                                                                      | <u>159.0</u>                                                                  | <u>24.0</u>                                              | <u>81.0</u>               | <u>72.0</u>     |
| B. Total Acres To Be Converted Indirectly, Or To Receive Services                                                                                                                                                                             |                                                                                      | <u>0</u>                                                                      | <u>0</u>                                                 | <u>0</u>                  | <u>0</u>        |
| C. Total Acres In Corridor                                                                                                                                                                                                                    |                                                                                      | <u>159.0</u>                                                                  | <u>24.0</u>                                              | <u>81.0</u>               | <u>92.0</u>     |
| <b>PART IV (To be completed by SCS) Land Evaluation Information</b>                                                                                                                                                                           |                                                                                      |                                                                               |                                                          |                           |                 |
| A. Total Acres Prime And Unique Farmland                                                                                                                                                                                                      |                                                                                      | <u>0</u>                                                                      | <u>0</u>                                                 | <u>0</u>                  | <u>0</u>        |
| B. Total Acres Statewide And Local Important Farmland                                                                                                                                                                                         |                                                                                      | <u>0</u>                                                                      | <u>0</u>                                                 | <u>0</u>                  | <u>0</u>        |
| C. Percentage Of Farmland In County Or Local Govt. Unit To Be Converted                                                                                                                                                                       |                                                                                      | <u>0</u>                                                                      | <u>0</u>                                                 | <u>0</u>                  | <u>0</u>        |
| D. Percentage Of Farmland In Govt. Jurisdiction With Same Or Higher Relative Value                                                                                                                                                            |                                                                                      | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| <b>PART V (To be completed by SCS) Land Evaluation Criterion Relative Value of Farmland to Be Served or Converted (Scale of 0 - 100 Points)</b>                                                                                               |                                                                                      | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| <b>PART VI (To be completed by Federal Agency) Corridor Assessment Criteria (Those criteria are explained in 7 CFR 658.5(c))</b>                                                                                                              |                                                                                      | Maximum Points                                                                |                                                          |                           |                 |
| 1. Area In Nonurban Use                                                                                                                                                                                                                       | 15                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 2. Perimeter In Nonurban Use                                                                                                                                                                                                                  | 10                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 3. Percent Of Corridor Being Farmed                                                                                                                                                                                                           | 20                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 4. Protection Provided By State And Local Government                                                                                                                                                                                          | 20                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 5. Size Of Present Farm Unit Compared To Average                                                                                                                                                                                              | 10                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 6. Creation Of Nonfarmable Farmland                                                                                                                                                                                                           | 25                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 7. Availability Of Farm Support Services                                                                                                                                                                                                      | 5                                                                                    | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 8. On-Farm Investments                                                                                                                                                                                                                        | 20                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 9. Effects Of Conversion On Farm Support Services                                                                                                                                                                                             | 25                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 10. Compatibility With Existing Agricultural Use                                                                                                                                                                                              | 10                                                                                   | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| <b>TOTAL CORRIDOR ASSESSMENT POINTS</b>                                                                                                                                                                                                       | <b>160</b>                                                                           | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| <b>PART VII (To be completed by Federal Agency)</b>                                                                                                                                                                                           |                                                                                      |                                                                               |                                                          |                           |                 |
| Relative Value Of Farmland (From Part V)                                                                                                                                                                                                      | 100                                                                                  | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| Total Corridor Assessment (From Part VI above or a local site assessment)                                                                                                                                                                     | 160                                                                                  | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| <b>TOTAL POINTS (Total of above 2 lines)</b>                                                                                                                                                                                                  | <b>260</b>                                                                           | <u>NA</u>                                                                     | <u>NA</u>                                                | <u>NA</u>                 | <u>NA</u>       |
| 1. Corridor Selected:                                                                                                                                                                                                                         | 2. Total Acres of Farmlands to be Converted by Project:                              | 3. Date Of Selection:                                                         | 4. Was A Local Site Assessment Used?                     |                           |                 |
|                                                                                                                                                                                                                                               |                                                                                      |                                                                               | YES <input type="checkbox"/> NO <input type="checkbox"/> |                           |                 |
| 5. Reason For Selection:                                                                                                                                                                                                                      |                                                                                      |                                                                               |                                                          |                           |                 |
|                                                                                                                                                                                                                                               |                                                                                      |                                                                               |                                                          |                           |                 |

Signature of Person Completing This Part:

DATE

**Appendix B.5**

---

**PLANT AND ANIMAL SURVEYS**

## TERRESTRIAL FLORAL SPECIES

### A. Goose Creek

#### Gymnospermae

Pinaceae (Pine Family)

*Tsuga canadensis*

Eastern hemlock

#### Angiospermae – Monocotyledoneae

Commelinaceae (Spiderwort Family)

*Commelina* sp.

Day-flower

Cyperaceae (Sedge Family)

*Carex grayii*

Gray's sedge

Graminae (Grass Family)

*Arundinaria gigantea*

*Festuca elatior*

Cane

Fescue

Liliaceae (Lily Family)

*Erythronium americanum*

*Trillium sessile*

Trout lily

Sessile trillium

#### Angiospermae - Dicotyledoneae

Aceraceae (Maple Family)

*Acer rubrum*

*Acer saccharinum*

Red maple

Silver maple

Apocynaceae (Dogbane Family)

*Vinca minor*

Periwinkle

Balsaminaceae (Jewel Weed Family)

*Impatiens capensis*

*Impatiens pallida*

Spotted touch-me-not

Jewel weed

Berberidaceae (Barberry Family)

*Podophyllum peltatum*

May apple

Bignoniaceae (Trumpet Creeper Family)

*Bignonia radicans*

Trumpet creeper

Caprifoliaceae (Honeysuckle Family)

*Lonicera japonica*

Japanese honeysuckle

Compositae (Thistle Family)

*Artemisia annua*

*Erigeron annuus*

*Eupatorium purpureum*

*Solidago altissima*

Annual wormwood

Daisy fleabane

Wide-leaved Joe-pye weed

Tall goldenrod

|                                 |                       |
|---------------------------------|-----------------------|
| <i>Solidago canadensis</i>      | Canada goldenrod      |
| <i>Solidago gigantea</i>        | Late goldenrod        |
| <i>Solidago uliginosa</i>       | Bog goldenrod         |
| <i>Verbsina alternifolia</i>    | Wingstem              |
| Cruciferae (Mustard Family)     |                       |
| <i>Barbarea vulgaris</i>        | Wintercress           |
| <i>Cardamine douglassii</i>     | Purple cress          |
| <i>Dentaria laciniata</i>       | Cut-leaved toothwort  |
| <i>Rorippa sylvestris</i>       | Creeping yellow cress |
| Fabaceae (Pea Family)           |                       |
| <i>Trifolium hybridum</i>       | Alsike clover         |
| <i>Trifolium pratense</i>       | Red clover            |
| <i>Trifolium repens</i>         | White clover          |
| Fagaceae (Beech Family)         |                       |
| <i>Quercus palustris</i>        | Pin oak               |
| Fumariaceae (Fumewort Family)   |                       |
| <i>Dicentra cucullaria</i>      | Dutchman's breeches   |
| Geraniaceae (Geranium Family)   |                       |
| <i>Geranium carolinianum</i>    | Carolina cranes-bill  |
| Juglandaceae (Walnut Family)    |                       |
| <i>Juglans nigra</i>            | Black walnut          |
| Labiatae (Mint Family)          |                       |
| <i>Lamium purpureum</i>         | Purple dead-nettle    |
| Moraceae (Mulberry Family)      |                       |
| <i>Maclura pomifera</i>         | Osageorange           |
| <i>Morus rubra</i>              | Red mulberry          |
| Oleaceae (Olive Family)         |                       |
| <i>Fraxinus americana</i>       | White ash             |
| Platanaceae (Plane Tree Family) |                       |
| <i>Platanus occidentalis</i>    | Sycamore              |
| Polemoniaceae (Phlox Family)    |                       |
| <i>Phlox divaricata</i>         | Wild blue phlox       |
| Portulacaceae (Purslane Family) |                       |
| <i>Claytonia virginica</i>      | Spring beauty         |
| <i>Portulaca oleracea</i>       | Purslane              |
| Ranunculaceae (Crowfoot Family) |                       |
| <i>Ranunculus</i> sp.           | Buttercup             |
| Rubiaceae (Bedstraw Family)     |                       |
| <i>Galium aparine</i>           | Cleavers              |
| <i>Houstonia caerulea</i>       | Bluets                |

|                                                                                     |                                     |
|-------------------------------------------------------------------------------------|-------------------------------------|
| Salicaceae (Willow Family)<br><i>Populus deltoides</i>                              | Eastern cottonwood                  |
| Saururaceae (Lizard's Tail Family)<br><i>Saururus cernuus</i>                       | Lizard's tail                       |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapus</i>                        | Common mullein                      |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                      | Tree-of-heaven                      |
| Ulmaceae (Elm Family)<br><i>Ulmus americana</i><br><i>Ulmus rubra</i>               | American elm<br>Slippery elm        |
| Urticaceae (Nettle Family)<br><i>Boehmeria cylindrica</i><br><i>Urtica dioica</i>   | False nettle<br>Stinging nettle     |
| Violaceae (Violet Family)<br><i>Viola papilionacea</i><br><i>Viola rotundifolia</i> | Common blue violet<br>Yellow violet |
| Vitaceae (Grape Family)<br><i>Vitis vulpina</i>                                     | Winter grape                        |

**B. Little Goose Creek**

Angiospermae - Monocotyledoneae

|                                                                                                                                             |                                                                                  |
|---------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------|
| Graminae (Grass Family)<br><i>Arundinaria gigantea</i><br><i>Festuca elatior</i>                                                            | Cane<br>Fescue                                                                   |
| Liliaceae (Lily Family)<br><i>Erythronium albidum</i><br><i>Trillium flexipes</i><br><i>Trillium sessile</i><br><i>Uvularia grandiflora</i> | White trout lily<br>Bent trillium<br>Sessile trillium<br>Large flowered bellwort |

Angiospermae - Dicotyledoneae

|                                                                           |                           |
|---------------------------------------------------------------------------|---------------------------|
| Aceraceae (Maple Family)<br><i>Acer rubrum</i><br><i>Acer saccharinum</i> | Red maple<br>Silver maple |
| Aquifoliaceae (Holly Family)<br><i>Ilex opaca</i>                         | American holly            |
| Aristolochiaceae (Birthwort Family)<br><i>Asarum canadense</i>            | Wild ginger               |
| Balsaminaceae (Jewel Weed Family)<br><i>Impatiens capensis</i>            | Spotted touch-me-not      |

|                                                                                                                                                                          |                                                                                                |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------|
| <i>Impatiens pallida</i>                                                                                                                                                 | Jewel weed                                                                                     |
| Berberidaceae (Barberry Family)<br><i>Podophyllum peltatum</i>                                                                                                           | May apple                                                                                      |
| Caprifoliaceae (Honeysuckle Family)<br><i>Lonicera japonica</i>                                                                                                          | Japanese honeysuckle                                                                           |
| Compositae (Thistle Family)<br><i>Achillea millefolium</i><br><i>Solidago</i> sp.<br><i>Verbesina alternifolia</i>                                                       | Yarrow<br>Goldenrod<br>Wingstem                                                                |
| Cruciferae (Mustard Family)<br><i>Almaria officinalis</i><br><i>Barbarea verna</i><br><i>Barbarea vulgaris</i><br><i>Dentaria laciniata</i><br><i>Rorippa sylvestris</i> | Garlic mustard<br>Spring cress<br>Wintercress<br>Cut-leaved toothwort<br>Creeping yellow cress |
| Fabaceae (Pea Family)<br><i>Cercis canadensis</i><br><i>Trifolium hybridum</i><br><i>Trifolium pratense</i><br><i>Trifolium repens</i>                                   | Redbud<br>Alsike clover<br>Red clover<br>White clover                                          |
| Fagaceae (Beech Family)<br><i>Quercus palustris</i>                                                                                                                      | Pin oak                                                                                        |
| Fumariaceae (Fumewort Family)<br><i>Dicentra cucullaria</i>                                                                                                              | Dutchman's breeches                                                                            |
| Geraniaceae (Geranium Family)<br><i>Geranium carolinianum</i>                                                                                                            | Carolina cranes-bill                                                                           |
| Hydrophyllaceae (Waterleaf Family)<br><i>Hydrophyllum virginianum</i>                                                                                                    | Virginia waterleaf                                                                             |
| Juglandaceae (Walnut Family)<br><i>Carya ovata</i><br><i>Juglans nigra</i>                                                                                               | Shagbark hickory<br>Black walnut                                                               |
| Labiatae (Mint Family)<br><i>Lamium purpureum</i>                                                                                                                        | Purple dead-nettle                                                                             |
| Moraceae (Mulberry Family)<br><i>Maclura pomifera</i><br><i>Morus rubra</i>                                                                                              | Osageorange<br>Red mulberry                                                                    |
| Oleaceae (Olive Family)<br><i>Fraxinus americana</i>                                                                                                                     | White ash                                                                                      |
| Platanaceae (Plane Tree Family)<br><i>Platanus occidentalis</i>                                                                                                          | Sycamore                                                                                       |

|                                                                                                             |                                                                  |
|-------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------|
| Polemoniaceae (Phlox Family)<br><i>Phlox divaricata</i>                                                     | Wild blue phlox                                                  |
| Portulacaceae (Purslane Family)<br><i>Claytonia virginica</i>                                               | Spring beauty                                                    |
| Salicaceae (Willow Family)<br><i>Populus deltoides</i>                                                      | Eastern cottonwood                                               |
| Saururaceae (Lizard's Tail Family)<br><i>Saururus cernuus</i>                                               | Lizard's tail                                                    |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapsus</i>                                               | Common mullein                                                   |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                                              | Tree-of-heaven                                                   |
| Rubiaceae (Bedstraw Family)<br><i>Galium boreale</i>                                                        | Bedstraw                                                         |
| Ulmaceae (Elm Family)<br><i>Celtis occidentalis</i><br><i>Ulmus americana</i>                               | Hackberry<br>American elm                                        |
| Violaceae (Violet Family)<br><i>Viola blanda</i><br><i>Viola papilionacea</i><br><i>Viola pennsylvanica</i> | Sweet white violet<br>Common blue violet<br>Smooth yellow violet |

### C. Fox Harbor Road/Harrods Creek

#### Angiospermae - Monocotyledoneae

|                                                                                                          |                                                |
|----------------------------------------------------------------------------------------------------------|------------------------------------------------|
| Cyperaceae (Sedge Family)<br><i>Carex lurida</i>                                                         | Sallow sedge                                   |
| Gramineae (Grass Family)<br><i>Bromus sterilis</i><br><i>Festuca elatior</i><br><i>Sorghum halepense</i> | Sterile brome grass<br>Fescue<br>Johnson grass |
| Iridaceae (Iris Family)<br><i>Sisyrinchium angustifolium</i>                                             | Blue-eyed grass                                |

#### Angiospermae - Dicotyledonae

|                                                                                            |                                         |
|--------------------------------------------------------------------------------------------|-----------------------------------------|
| Aceraceae (Maple Family)<br><i>Acer negundo</i><br><i>Acer rubrum</i>                      | Boxelder<br>Red Maple                   |
| Balsaminaceae (Jewel Weed Family)<br><i>Impatiens capensis</i><br><i>Impatiens pallida</i> | Spotted touch-me-not<br>Pale jewel weed |

|                                                                                                                                                                                                                                                                  |                                                                                                                                                 |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------|
| Berberidaceae (Barberry Family)<br><i>Podophyllum peltatum</i>                                                                                                                                                                                                   | May apple                                                                                                                                       |
| Caprifoliaceae (Honeysuckle Family)<br><i>Lonicera japonica</i>                                                                                                                                                                                                  | Japanese honeysuckle                                                                                                                            |
| Celastraceae (Staff-tree Family)<br><i>Celastrus scandens</i>                                                                                                                                                                                                    | Bittersweet                                                                                                                                     |
| Compositae (Thistle Family)<br><i>Aster divaricatus</i><br><i>Aster novae-angliae</i><br><i>Cichorium intybus</i><br><i>Daucus carota</i><br><i>Eupatorium fistulosum</i><br><i>Eupatorium perfoliatum</i><br><i>Eupatorium</i> sp.<br><i>Solidago ulmifolia</i> | White wood aster<br>New England aster<br>Chicory<br>Queen Anne's lace<br>Common Joe-pye weed<br>Boneset<br>Thoroughwort<br>Elm-leaved goldenrod |
| Cruciferae (Mustard Family)<br><i>Alliaria officinalis</i><br><i>Barbarea vulgaris</i>                                                                                                                                                                           | Garlic mustard<br>Wintercress                                                                                                                   |
| Ericaceae (Heath Family)<br><i>Rhododendron maximum</i>                                                                                                                                                                                                          | Great laurel                                                                                                                                    |
| Fabaceae (Pea Family)<br><i>Cercis canadensis</i><br><i>Gleditsia triacanthos</i><br><i>Robinia pseudo-acacia</i><br><i>Trifolium agrarium</i><br><i>Trifolium hybridum</i><br><i>Trifolium pratense</i><br><i>Trifolium repens</i>                              | Red bud<br>Honey locust<br>Black locust<br>Yellow hop clover<br>Alsike clover<br>Red clover<br>White clover                                     |
| Fagaceae (Beech Family)<br><i>Quercus palustris</i>                                                                                                                                                                                                              | Pin oak                                                                                                                                         |
| Geraniaceae (Geranium Family)<br><i>Geranium carolinianum</i>                                                                                                                                                                                                    | Carolina cranes-bill                                                                                                                            |
| Juglandaceae (Walnut Family)<br><i>Juglans nigra</i>                                                                                                                                                                                                             | Black walnut                                                                                                                                    |
| Labiatae (Mint Family)<br><i>Glechoma hederaceae</i><br><i>Lamium purpureum</i>                                                                                                                                                                                  | Ground ivy<br>Purple dead-nettle                                                                                                                |
| Lauraceae (Laural Family)<br><i>Lindera benzion</i>                                                                                                                                                                                                              | Spice bush                                                                                                                                      |
| Magnoliaceae (Magnolia Family)<br><i>Liriodendron tulipifera</i>                                                                                                                                                                                                 | Tulip poplar                                                                                                                                    |
| Moraceae (Mulberry Family)<br><i>Malcura pomifera</i>                                                                                                                                                                                                            | Osageorange                                                                                                                                     |

|                                                                                |                               |
|--------------------------------------------------------------------------------|-------------------------------|
| <i>Morus rubra</i>                                                             | Red mulberry                  |
| Platanaceae (Plane Tree Family)<br><i>Platanus occidentalis</i>                | Sycamore                      |
| Rosaceae (Rose Family)<br><i>Fragaria virginiana</i><br><i>Rosa multiflora</i> | Strawberry<br>Multiflora rose |
| Saururaceae (Lizard's Tail Family)<br><i>Saururus cernuus</i>                  | Lizard's Tail                 |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapsus</i>                  | Common mullein                |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                 | Tree-of-heaven                |
| Umbelliferae (Carrot Family)<br><i>Pastinaca sativa</i>                        | Parsnip                       |
| Ulmaceae (Elm Family)<br><i>Celtis occidentalis</i><br><i>Ulmus americana</i>  | Hackberry<br>American elm     |
| Vitaceae (Vine Family)<br><i>Vitis aestivalis</i>                              | Summer grape                  |

**D. Six Mile Island**

Angiospermae - Monocotyledoneae

|                                                                                 |                             |
|---------------------------------------------------------------------------------|-----------------------------|
| Cyperaceae (Sedge Family)<br><i>Carex</i> sp.                                   | Sedge                       |
| Gramineae (Grass Family)<br><i>Festuca elatior</i><br><i>Panicum verrucosum</i> | Fescue<br>Warty panic grass |

Angiospermae - Dicotyledoneae

|                                                                            |                           |
|----------------------------------------------------------------------------|---------------------------|
| Aceraceae (Maple Family)<br><i>Acer negundo</i><br><i>Acer saccharinum</i> | Box elder<br>Silver maple |
| Anacardiaceae (Sumac Family)<br><i>Rhus radicans</i>                       | Poison ivy                |
| Balaminaceae (Jewel Weed Family)<br><i>Impatiens capensis</i>              | Spotted touch-me-not      |
| Bignoniaceae (Trumpet-Creeper Family)<br><i>Bignonia radicans</i>          | Trumpet creeper           |

|                                     |                      |
|-------------------------------------|----------------------|
| Caprifoliaceae (Honeysuckle Family) |                      |
| <i>Lonicera japonica</i>            | Japanese honeysuckle |
| <i>Sambucus canadensis</i>          | Common elderberry    |
| Compositae (Thistle Family)         |                      |
| <i>Lactuca canadensis</i>           | Wild Lettuce         |
| <i>Verbesina alternifolia</i>       | Wingstem             |
| Cruciferae (Mustard Family)         |                      |
| <i>Alliaria officinalis</i>         | Garlic mustard       |
| <i>Arabis sp.</i>                   | Cress                |
| <i>Barbarea vulgaris</i>            | Wintercress          |
| Fabaceae (Pea Family)               |                      |
| <i>Amorpha fruticosa</i>            | False indigo         |
| <i>Trifolium hybridum</i>           | Alsike clover        |
| <i>Trifolium pratense</i>           | Red clover           |
| <i>Trifolium repens</i>             | White clover         |
| Fagaceae (Beech Family)             |                      |
| <i>Quercus palustris</i>            | Pin oak              |
| Juglandaceae (Walnut Family)        |                      |
| <i>Juglans nigra</i>                | Black walnut         |
| Labiatae (Mint Family)              |                      |
| <i>Lamium purpureum</i>             | Purple dead-nettle   |
| Moraceae (Mulberry Family)          |                      |
| <i>Maclura pomifera</i>             | Osageorange          |
| <i>Morus alba</i>                   | White mulberry       |
| <i>Morus rubra</i>                  | Red mulberry         |
| Oleaceae (Olive Family)             |                      |
| <i>Fraxinus americana</i>           | White ash            |
| Phytolaccaceae (Pokeweed Family)    |                      |
| <i>Phytolacca americana</i>         | Pokeweed             |
| Platanaceae (Plane Tree Family)     |                      |
| <i>Platanus occidentalis</i>        | Sycamore             |
| Salicaceae (Willow Family)          |                      |
| <i>Populus deltoides</i>            | Eastern cottonwood   |
| Simaroubaceae (Ailanthus Family)    |                      |
| <i>Ailanthus altissima</i>          | Tree-of-heaven       |
| Umbelliferae (Carrot Family)        |                      |
| <i>Pastinaca sativa</i>             | Parsnip              |
| Ulmaceae (Elm Family)               |                      |
| <i>Celtis occidentalis</i>          | Hackberry            |
| <i>Ulmus americana</i>              | American elm         |

Urticaceae (Nettle Family)  
*Laportea canadensis*  
*Pilea pumila*

Wood nettle  
Clearweed

Vitaceae (Vine Family)  
*Vitis riparia*

Riverbank grape

E. **Muddy Fork**

Angiospermae - Monocotyledoneae

Araceae (Arum Family)  
*Arisaema triphyllum*

Jack-in-the-pulpit

Graminae (Grass Family)  
*Arundinaria gigantea*  
*Dactylis glomerata*  
*Festuca elatior*

Cane  
Orchard grass  
Fescue

Angiospermae - Dicotyledoneae

Aceraceae (Maple Family)  
*Acer rubrum*

Red maple

Aesculaceae (Buckeye Family)  
*Aesculus glabra*

Ohio buckeye

Annonaceae (Custard Apple Family)  
*Asimina triloba*

Pawpaw

Balsaminaceae (Jewel Weed Family)  
*Impatiens capensis*  
*Impatiens pallida*

Spotted touch-me-not  
Pale jewel weed

Berberidaceae (Barberry Family)  
*Podophyllum peltatum*

May apple

Bignoniaceae (Trumpet-Creeper Family)  
*Bignonia capreolata*

Cross vine

Caprifoliaceae (Honeysuckle Family)  
*Lonicera japonica*

Japanese honeysuckle

Cruciferae (Mustard Family)  
*Alliaria officinalis*  
*Barbarea vulgaris*  
*Dentaria laciniata*

Garlic mustard  
Wintercress  
Cut-leaved toothwort

Ericaceae (Heath Family)  
*Rhododendron maximum*

Great laurel

Fabaceae (Pea Family)  
*Cercis canadensis*  
*Trifolium hybridum*  
*Trifolium pratense*

Redbud  
Alsike clover  
Red clover

|                                    |                      |
|------------------------------------|----------------------|
| <i>Trifolium repens</i>            | White clover         |
| Fagaceae (Beech Family)            |                      |
| <i>Fagus grandifolia</i>           | American beech       |
| <i>Quercus palustris</i>           | Pin oak              |
| Fumariaceae (Fumewort Family)      |                      |
| <i>Dicentra cucullaria</i>         | Dutchman's breeches  |
| Geraniaceae (Geranium Family)      |                      |
| <i>Geranium carolinianum</i>       | Carolina cranes-bill |
| Hydrophyllaceae (Waterleaf Family) |                      |
| <i>Phacelia purshii</i>            | Miami mist           |
| Juglandaceae (Walnut Family)       |                      |
| <i>Juglans nigra</i>               | Black walnut         |
| Labiatae (Mint Family)             |                      |
| <i>Lamium purpureum</i>            | Purple dead-nettle   |
| Moraceae (Mulberry Family)         |                      |
| <i>Maclura pomifera</i>            | Osageorange          |
| <i>Morus rubra</i>                 | Red mulberry         |
| Oleaceae (Olive Family)            |                      |
| <i>Fraxinus americana</i>          | White ash            |
| Platanaceae (Plane Tree Family)    |                      |
| <i>Platanus occidentalis</i>       | Sycamore             |
| Polemoniaceae (Phlox Family)       |                      |
| <i>Phlox divaricata</i>            | Wild blue phlox      |
| Rubiaceae (Bedstraw Family)        |                      |
| <i>Galium boreale</i>              | Bedstraw             |
| Scrophulariaceae (Figwort Family)  |                      |
| <i>Verbascum thapsus</i>           | Common mullein       |
| Simaroubaceae (Ailanthus Family)   |                      |
| <i>Ailanthus altissima</i>         | Tree-of-heaven       |
| Ulmaceae (Elm Family)              |                      |
| <i>Ulmus americana</i>             | American elm         |
| Umbelliferae (Carrot Family)       |                      |
| <i>Pastinaca sativa</i>            | Parsnip              |

F. **Waterfront Park**

Angiospermae - Monocotyledoneae

|                                   |          |
|-----------------------------------|----------|
| Amaryllidaceae (Amaryllis Family) |          |
| <i>Narcissus pseudo-narcissus</i> | Daffodil |

|                                       |                      |
|---------------------------------------|----------------------|
| Gramineae (Grass Family)              |                      |
| <i>Festuca elatior</i>                | Fescue               |
| Angiospermae - Dicotyledonae          |                      |
| Balsaminaceae (Jewel Weed Family)     |                      |
| <i>Impatiens capensis</i>             | Spotted touch-me-not |
| Caryophyllaceae (Pink Family)         |                      |
| <i>Saponaria officinalis</i>          | Bouncing bet         |
| Caprifoliaceae (Honeysuckle Family)   |                      |
| <i>Lonicera japonica</i>              | Japanese honeysuckle |
| Convolvulaceae (Morning Glory Family) |                      |
| <i>Ipomoea hedracea</i>               | English ivy          |
| Cruciferae (Mustard Family)           |                      |
| <i>Barbarea vulgaris</i>              | Wintercress          |
| Fabaceae (Pea Family)                 |                      |
| <i>Baptista australis</i>             | Blue false indigo    |
| <i>Trifolium hybridum</i>             | Alsike clover        |
| <i>Trifolium pratense</i>             | Red clover           |
| <i>Trifolium repens</i>               | White clover         |
| Fagaceae (Beech Family)               |                      |
| <i>Quercus macrocarpa</i>             | Burr oak             |
| <i>Quercus palustris</i>              | Pin oak              |
| Geraniaceae (Geranium Family)         |                      |
| <i>Geranium carolinianum</i>          | Carolina cranes-bill |
| Juglandaceae (Walnut Family)          |                      |
| <i>Juglans nigra</i>                  | Black walnut         |
| Labiatae (Mint Family)                |                      |
| <i>Lamium purpureum</i>               | Purple dead-nettle   |
| Moraceae (Mulberry Family)            |                      |
| <i>Maclura pomifera</i>               | Osageorange          |
| <i>Morus rubra</i>                    | Red mulberry         |
| Scrophulariaceae (Figwort Family)     |                      |
| <i>Verbascum thapsus</i>              | Common mullein       |
| Simaroubaceae (Ailanthus Family)      |                      |
| <i>Ailanthus altissima</i>            | Tree-of-heaven       |
| Ulmaceae (Elm Family)                 |                      |
| <i>Ulmus americana</i>                | American elm         |
| Umbelliferae (Carrot Family)          |                      |
| <i>Pastinaca sativa</i>               | Parsnip              |

G.      **Transylvania Beach Road Area/Harrods Creek**

Gymnospermae

Cupressaceae (Cypress Family)  
*Juniperus virginiana*

Red cedar

Taxodiaceae (Bald Cypress Family)  
*Taxodium distichum*

Bald cypress

Pinaceae (Pine Family)  
*Pinus strobus*

White pine

Angiospermae – Monocotyledoneae

Gramineae (Grass Family)  
*Bromus japonicus*  
*Elymus virginicus*  
*Festuca elatior*  
*Sorghum halepensis*  
*Phleum pratense*  
*Phragmites communis*

Japanese brome grass  
Wild rye  
Fescue  
Johnson grass  
Timothy  
Common reed grass

Juncaceae (Rush Family)  
*Juncus marginatus*

Grass-leaved rush

Iridaceae (Iris Family)  
*Iris sp.*

Iris

Cyperaceae (Sedge Family)  
*Carex intumescens*  
*Cyperus strigosus*

Bladder sedge  
Galingale

Angiospermae - Dicotyledoneae

Aceraceae (Maple Family)  
*Acer negundo*  
*Acer rubrum*  
*Acer saccharinum*  
*Acer saccharum*

Boxelder  
Red maple  
Silver maple  
Sugar maple

Aesculaceae (Buckeye Family)  
*Aesculus glabra*

Ohio buckeye

Anacardiaceae (Sumac Family)  
*Rhus glabra*  
*Rhus radicans*

Smooth sumac  
Poison ivy

Apocynaceae (Dogbane Family)  
*Apocynum pubescens*

Velvet dogbane

Balsaminaceae (Jewel Weed Family)  
*Impatiens capensis*  
*Impatiens pallida*

Spotted touch-me-not  
Pale jewel weed

|                                     |                      |
|-------------------------------------|----------------------|
| Betulaceae (Birch Family)           |                      |
| <i>Betula nigra</i>                 | River birch          |
| Boraginaceae (Borage Family)        |                      |
| <i>Cynoglossum virginianum</i>      | Comfrey              |
| Caprifoliaceae (Honeysuckle Family) |                      |
| <i>Lonicera japonica</i>            | Japanese honeysuckle |
| <i>Sambucus canadensis</i>          | Common elder         |
| Compositae (Thistle Family)         |                      |
| <i>Cichorium intybus</i>            | Chicory              |
| <i>Eupatorium coelestinum</i>       | Mistflower           |
| <i>Eupatorium perfoliatum</i>       | Boneset              |
| <i>Lactuca canadensis</i>           | Tall lettuce         |
| <i>Rudbeckia laciniata</i>          | Tall coneflower      |
| <i>Solidago ulmifolia</i>           | Elm-leaved goldenrod |
| <i>Solidago altissima</i>           | Tall goldenrod       |
| <i>Solidago gigantea</i>            | Late goldenrod       |
| <i>Solidago juncea</i>              | Early goldenrod      |
| <i>Solidago nemoralis</i>           | Oldfield goldenrod   |
| <i>Tragopogon major</i>             | Goat's beard         |
| <i>Verbesina alternifolia</i>       | Wingstem             |
| Cruciferae (Mustard Family)         |                      |
| <i>Alliaria officinalis</i>         | Garlic mustard       |
| <i>Armoracia lapathifolia</i>       | Horseradish          |
| <i>Barbarea vulgaris</i>            | Wintercress          |
| <i>Nasturtium officinale</i>        | Watercress           |
| Dipsacaceae (Teasel Family)         |                      |
| <i>Dipsacus sylvestris</i>          | Common teasel        |
| Elaeagnaceae (Oleaster Family)      |                      |
| <i>Elaeagnus umbellata</i>          | Autumn olive         |
| Fabaceae (Pea Family)               |                      |
| <i>Amorpha fruticosa</i>            | Indigo bush          |
| <i>Gleditsia triacanthos</i>        | Honey locust         |
| <i>Gymnocladus dioica</i>           | Kentucky coffeetree  |
| <i>Trifolium hybridum</i>           | Alsike clover        |
| <i>Trifolium pratense</i>           | Red clover           |
| <i>Trifolium repens</i>             | White clover         |
| <i>Vicia angustifolia</i>           | Common vetch         |
| Fagaceae (Beech Family)             |                      |
| <i>Quercus palustris</i>            | Pin oak              |
| <i>Fagus grandifolia</i>            | American beech       |
| <i>Quercus velutina</i>             | Black oak            |
| <i>Quercus shumardii</i>            | Shumard oak          |
| Geraniaceae (Geranium Family)       |                      |
| <i>Geranium carolinianum</i>        | Carolina cranes-bill |

|                                                                                                           |                                                      |
|-----------------------------------------------------------------------------------------------------------|------------------------------------------------------|
| Hamamelidaceae (Witch-Hazel Family)<br><i>Liquidambar styraciflua</i>                                     | Sweetgum                                             |
| Hydrophyllaceae (Waterleaf)<br><i>Phacelia purshii</i>                                                    | Miami mist                                           |
| Juglandaceae (Walnut Family)<br><i>Juglans nigra</i>                                                      | Black walnut                                         |
| Labiatae (Mint Family)<br><i>Glechoma henderacea</i><br><i>Lamium purpureum</i><br><i>Mentha piperita</i> | Ground ivy<br>Purple dead-nettle<br>Peppermint       |
| Magnoliaceae (Magnolia Family)<br><i>Liriodendron tulipifera</i>                                          | Tulip poplar                                         |
| Moraceae (Mulberry Family)<br><i>Maclura pomifera</i><br><i>Morus alba</i><br><i>Morus rubra</i>          | Osageorange<br>White mulberry<br>Red mulberry        |
| Oleaceae (Olive Family)<br><i>Fraxinus americana</i>                                                      | White ash                                            |
| Phytolaccaceae (Pokeweed Family)<br><i>Phytolacca americana</i>                                           | Pokeweed                                             |
| Platanaceae (Plane Tree Family)<br><i>Platanus occidentalis</i>                                           | Sycamore                                             |
| Polygonaceae (Buckwheat Family)<br><i>Rumex crispus</i>                                                   | Curly dock                                           |
| Rosaceae (Rose Family)<br><i>Prunus serotina</i><br><i>Rosa multiflora</i>                                | Wild cherry<br>Multiflora rose                       |
| Rubiaceae (Madder Family)<br><i>Galium aparine</i><br><i>Galium boreale</i>                               | Cleavers<br>Bedstraw                                 |
| Salicaceae (Willow Family)<br><i>Populus deltoides</i><br><i>Salix nigra</i><br><i>Salix interior</i>     | Eastern cottonwood<br>Black willow<br>Sandbar willow |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapsus</i>                                             | Common mullein                                       |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                                            | Tree-of-heaven                                       |
| Solanaceae (Potato Family)<br><i>Solanum carolinensis</i>                                                 | Horsenettle                                          |

|                              |                   |
|------------------------------|-------------------|
| Tiliaceae (Linden Family)    |                   |
| <i>Tilia americana</i>       | Basswood          |
| Ulmaceae (Elm Family)        |                   |
| <i>Celtis occidentalis</i>   | Hackberry         |
| <i>Ulmus americana</i>       | American elm      |
| <i>Ulmus rubra</i>           | Slippery elm      |
| Umbelliferae (Carrot Family) |                   |
| <i>Daucus carota</i>         | Queen Anne's lace |
| <i>Pastinaca sativa</i>      | Parsnip           |
| Urticaceae (Nettle Family)   |                   |
| <i>Boehmeria cylindrica</i>  | False nettle      |
| <i>Pilea pumila</i>          | Clearweed         |
| <i>Urtica dioica</i>         | Stinging nettle   |
| Vitaceae (Vine Family)       |                   |
| <i>Vitis aestivalis</i>      | Summer grape      |

#### H. **Wolf Pen Area**

##### Pteridophyta

|                                         |                       |
|-----------------------------------------|-----------------------|
| Polypodiaceae (Fern Family)             |                       |
| <i>Adiantum pedatum</i>                 | Maiden-hair fern      |
| <i>Asplenium rhizophyllum</i>           | Walking fern          |
| <i>Asplenium platyneuron</i>            | Ebony spleen-wort     |
| <i>Cystopteris protrusa</i>             | Southern fragile fern |
| <i>Polystichum acrostichoides</i>       | Christmas fern        |
| <i>Woodsia obtusa</i>                   | Blunt-lobed woodsia   |
| Ophioglossaceae (Adder's Tongue Family) |                       |
| <i>Botrychium matricariifolium</i>      | Grape fern            |
| <i>Botrychium virginianum</i>           | Rattlesnake fern      |

##### Gymnospermae

|                             |           |
|-----------------------------|-----------|
| Pinaceae (Pine Family)      |           |
| <i>Juniperus virginiana</i> | Red cedar |

##### Angiospermae - Monocotyledoneae

|                             |                    |
|-----------------------------|--------------------|
| Araceae (Arum Family)       |                    |
| <i>Arisaema dracontium</i>  | Green dragon       |
| <i>Arisaema triphyllum</i>  | Jack-in-the-pulpit |
| Cyperaceae (Sedge Family)   |                    |
| <i>Carex vulpinoidea</i>    | Fox sedge          |
| Graminae (Grass Family)     |                    |
| <i>Arundinaria gigantea</i> | Cane               |
| <i>Festuca elatior</i>      | Fescue             |

|                                       |                         |
|---------------------------------------|-------------------------|
| Iridaceae (Iris Family)               |                         |
| <i>Iris verna</i>                     | Dwarf iris              |
| Liliaceae (Lily Family)               |                         |
| <i>Allium cernuum</i>                 | Wild onion              |
| <i>Allium tricoccum</i>               | Wild leek               |
| <i>Camassia scilloides</i>            | Wild hyacinth           |
| <i>Erythronium americanum</i>         | Yellow trout lily       |
| <i>Erythronium albidum</i>            | White trout lily        |
| <i>Ornithogalum umbellatum</i>        | Star-of-Bethlehem       |
| <i>Polygonatum biflorum</i>           | Solomon's seal          |
| <i>Smilax herbacea</i>                | Carrion flower          |
| <i>Smilacina racemosa</i>             | False Solomon's seal    |
| <i>Trillium grandiflorum</i>          | Large-flowered trillium |
| <i>Trillium sessile</i>               | Sessile trillium        |
| <i>Uvularia grandiflora</i>           | Large-flowered bellwort |
| Angiospermae - Dicotyledoneae         |                         |
| Aceraceae (Maple Family)              |                         |
| <i>Acer negundo</i>                   | Boxelder                |
| <i>Acer rubra</i>                     | Red maple               |
| Aesculaceae (Buckeye Family)          |                         |
| <i>Aesculus glabra</i>                | Ohio buckeye            |
| Apocynaceae (Dogbane Family)          |                         |
| <i>Apocynum</i> sp.                   | Dogbane                 |
| <i>Vinca minor</i>                    | Periwinkle              |
| Araliaceae (Ginseng Family)           |                         |
| <i>Panax trifolius</i>                | Dwarf ginseng           |
| Aristolochiaceae (Birthwort Family)   |                         |
| <i>Asarum canadense</i>               | Wild ginger             |
| Balsaminaceae (Jewel Weed Family)     |                         |
| <i>Impatiens capensis</i>             | Spotted touch-me-not    |
| Berberidaceae (Barberry Family)       |                         |
| <i>Jeffersonia diphylla</i>           | Twinleaf                |
| <i>Podophylluym peltatum</i>          | Mayapple                |
| Bignoniaceae (Trumpet-Creeper Family) |                         |
| <i>Bignonia radicans</i>              | Trumpet creeper         |
| Boraginaceae (Borage Family)          |                         |
| <i>Mertensia virginica</i>            | Virginia bluebell       |
| Campanulaceae (Bluebell Family)       |                         |
| <i>Campanula americana</i>            | Tall bellflower         |
| Caprifoliaceae (Honeysuckle Family)   |                         |
| <i>Lonicera japonica</i>              | Japanese honeysuckle    |
| <i>Symphoricarpos orbiculatus</i>     | Coralberry              |

|                                  |                             |
|----------------------------------|-----------------------------|
| Caryophyllaceae (Pink Family)    |                             |
| <i>Stellaria pubera</i>          | Star chickweed              |
| Celastraceae (Staff-Tree Family) |                             |
| <i>Celastrus scandens</i>        | Round bittersweet           |
| Compositae (Thistle Family)      |                             |
| <i>Aster novae-angliae</i>       | New England aster           |
| <i>Aster umbellatus</i>          | Tall flat-top white aster   |
| <i>Eupatorium purpureum</i>      | Wide-leaved Joe-pye weed    |
| <i>Eupatorium rugosum</i>        | White snakeroot             |
| <i>Eupatorium serotinum</i>      | Late flowering thoroughwort |
| <i>Latuca canadensis</i>         | Wild lettuce                |
| Crassulaceae (Orpine Family)     |                             |
| <i>Sedum acre</i>                | Mossy stonecrop             |
| <i>Sedum pulchellum</i>          | Pink stonecrop              |
| <i>Sedum ternatum</i>            | Wild stonecrop              |
| Cruciferae (Mustard Family)      |                             |
| <i>Almaria officinalis</i>       | Garlic mustard              |
| <i>Arabis laevigata</i>          | Smooth rock-cress           |
| <i>Barbarea vulgaris</i>         | Wintercress                 |
| <i>Dentaria sp.</i>              | Toothwort                   |
| <i>Dentaria laciniata</i>        | Cut-leaved toothwort        |
| Cornaceae (Dogwood Family)       |                             |
| <i>Cornus alternifolia</i>       | Alternate-leaved dogwood    |
| <i>Cornus florida</i>            | Flowering dogwood           |
| <i>Cornus obliqua</i>            | Silky dogwood               |
| Ericaceae (Heath Family)         |                             |
| <i>Ledum groenlandicum</i>       | Labrador tea                |
| <i>Rhododendron maximum</i>      | Great laurel                |
| Fabaceae (Pea Family)            |                             |
| <i>Cercis canadensis</i>         | Redbud                      |
| <i>Robinia pseudo-acacia</i>     | Black locust                |
| <i>Trifolium hybridum</i>        | Alsike clover               |
| <i>Trifolium pratense</i>        | Red clover                  |
| <i>Trifolium repens</i>          | White clover                |
| Fagaceae (Beech Family)          |                             |
| <i>Castanea dentata</i>          | American chestnut           |
| <i>Castanea pumila</i>           | Allegheny chinkapin         |
| <i>Fagus grandifolia</i>         | American beech              |
| <i>Quercus rubra</i>             | Red oak                     |
| Fumariaceae (Fumewort Family)    |                             |
| <i>Corydalis flavula</i>         | Yellow corydalis            |
| <i>Dicentra cucullaria</i>       | Dutchman's breeches         |
| <i>Dicentra canadensis</i>       | Squirrel corn               |
| Geraniaceae (Geranium Family)    |                             |
| <i>Geranium maculatum</i>        | Wild geranium               |

|                                 |                      |
|---------------------------------|----------------------|
| <i>Geranium carolinianum</i>    | Carolina cranes-bill |
| Juglandaceae (Walnut Family)    |                      |
| <i>Juglans nigra</i>            | Black walnut         |
| <i>Carya laciniosa</i>          | Shellbark hickory    |
| Labiatae (Mint Family)          |                      |
| <i>Glechoma hederacea</i>       | Ground-ivy           |
| <i>Lamium amplexicaule</i>      | Henbit               |
| <i>Lamium purpureum</i>         | Purple dead-nettle   |
| <i>Synandra hispidula</i>       | Synandra             |
| Lauraceae (Laural Family)       |                      |
| <i>Lindera benzion</i>          | Spice bush           |
| Malaceae (Apple Family)         |                      |
| <i>Malus glaucescens</i>        | American crabapple   |
| Moraceae (Mulberry Family)      |                      |
| <i>Morus rubra</i>              | Red mulberry         |
| <i>Maclura pomifera</i>         | Osageorange          |
| Oleaceae (Olive Family)         |                      |
| <i>Fraxinus americana</i>       | White ash            |
| <i>Ligustrum vulgare</i>        | Privet               |
| Papaveraceae (Poppy Family)     |                      |
| <i>Sanguinaria canadensis</i>   | Bloodroot            |
| <i>Stylophorum diphyllum</i>    | Celandine poppy      |
| Platanaceae (Plane Tree Family) |                      |
| <i>Platanus occidentalis</i>    | Sycamore             |
| Polemoniaceae (Phlox Family)    |                      |
| <i>Phlox divericata</i>         | Wild blue phlox      |
| <i>Polemonium van-bruntiae</i>  | Jacob's ladder       |
| Portulacaceae (Purslane Family) |                      |
| <i>Claytonia virginica</i>      | Spring beauty        |
| <i>Portulaca oleracea</i>       | Common purslane      |
| Rhamnaceae (Buckthorn Family)   |                      |
| <i>Rhamnus cathartica</i>       | Buckthorn            |
| Ranunculaceae (Crowfoot Family) |                      |
| <i>Actaea alba</i>              | White baneberry      |
| <i>Anemonella thalictroides</i> | Rue anemone          |
| <i>Clematis viorna</i>          | Leatherflower        |
| <i>Delphinium</i> sp.           | Larkspur             |
| <i>Hepatica americana</i>       | Roundlobe hepatica   |
| <i>Hydrastis canadensis</i>     | Goldenseal           |
| <i>Isopyrum bitematum</i>       | False rue anemone    |
| <i>Ranunculus</i> sp.           | Buttercup            |
| Rosaceae (Rose Family)          |                      |
| <i>Crataegus crus-galli</i>     | Hawthorn             |

|                                                                                                                                     |                                                                                    |
|-------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------|
| <i>Rubus occidentalis</i>                                                                                                           | Black raspberry                                                                    |
| Rubiaceae (Bedstraw Family)<br><i>Galium boreale</i>                                                                                | Bedstraw                                                                           |
| Salicaceae (Willow Family)<br><i>Populus deltoides</i>                                                                              | Eastern cottonwood                                                                 |
| Saururaceae (Lizard's-Tail Family)<br><i>Saururus cernuus</i>                                                                       | Lizard's tail                                                                      |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                                                                      | Tree-of-heaven                                                                     |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapsus</i>                                                                       | Common mullein                                                                     |
| Ulmaceae (Elm Family)<br><i>Celtis occidentalis</i><br><i>Ulmus americana</i><br><i>Ulmus rubra</i>                                 | Hackberry<br>American elm<br>Slippery elm                                          |
| Umbelliferae (Carrot Family)<br><i>Erigenia bulbosa</i><br><i>Pastinaca sativa</i>                                                  | Harbinger-of-spring<br>Parsnip                                                     |
| Urticaceae (Nettle Family)<br><i>Laportea canadensis</i>                                                                            | Wood nettle                                                                        |
| Violaceae (Violet Family)<br><i>Viola blanda</i><br><i>Viola hastata</i><br><i>Viola papilionacera</i><br><i>Viola rotundifolia</i> | Sweet white violet<br>Halbred-yellow violet<br>Common blue violet<br>Yellow violet |
| Vitaceae (Grape Family)<br><i>Vitis vulpina</i>                                                                                     | Winter grape                                                                       |

## I. Drumanard

### Pteridophyta

|                                                            |                    |
|------------------------------------------------------------|--------------------|
| Polypodiaceae (Fern Family)<br><i>Athyrium asplenoides</i> | Southern lady fern |
|------------------------------------------------------------|--------------------|

### Gymnospermae

|                                                                           |                       |
|---------------------------------------------------------------------------|-----------------------|
| Pinaceae (Pine Family)<br><i>Tsuga canadensis</i><br><i>Pinus strobus</i> | Hemlock<br>White pine |
| Taxodiaceae (Bald Cypress Family)<br><i>Taxodium distichum</i>            | Bald Cypress          |

### Angiospermae - Monocotyledoneae

|                                     |                      |
|-------------------------------------|----------------------|
| Araceae (Arum Family)               |                      |
| <i>Arisaema dracontium</i>          | Green dragon         |
| <i>Arisaema triphyllum</i>          | Jack-in-the-pulpit   |
| Liliaceae (Lily Family)             |                      |
| <i>Smilax herbacea</i>              | Jacob's ladder       |
| Angiospermae - Dicotyledoneae       |                      |
| Aceraceae (Maple Family)            |                      |
| <i>Acer negundo</i>                 | Boxelder             |
| <i>Acer rubra</i>                   | Red maple            |
| <i>Acer saccharinum</i>             | Silver maple         |
| Aesculaceae (Buckeye Family)        |                      |
| <i>Aesculus glabra</i>              | Ohio buckeye         |
| Apocynaceae (Dogbane Family)        |                      |
| <i>Vinca minor</i>                  | Periwinkle           |
| Aquifoliaceae (Holly Family)        |                      |
| <i>Ilex opaca</i>                   | American holly       |
| Betulaceae (Birch Family)           |                      |
| <i>Betula nigra</i>                 | River birch          |
| Caprifoliaceae (Honeysuckle Family) |                      |
| <i>Lonicura japonica</i>            | Japanese honeysuckle |
| <i>Symphoricarpos albus</i>         | Coralberry           |
| <i>Viburnum sp.</i>                 | Viburnum             |
| Cornaceae (Dogwood Family)          |                      |
| <i>Cornus florida</i>               | Flowering dogwood    |
| Cruciferae (Mustard Family)         |                      |
| <i>Nasturtium officinale</i>        | Watercress           |
| Ericaceae (Heath Family)            |                      |
| <i>Oxydendrum arboreum</i>          | Sourwood             |
| Fabaceae (Pea Family)               |                      |
| <i>Cercis canadensis</i>            | Redbud               |
| <i>Gleditsia triacanthos</i>        | Honeylocust          |
| <i>Trifolium campestre</i>          | Low hop clover       |
| <i>Trifolium repens</i>             | White clover         |
| Fagaceae (Beech Family)             |                      |
| <i>Castanea dentata</i>             | American chestnut    |
| <i>Quercus coccinea</i>             | Red oak              |
| <i>Quercus palustris</i>            | Pin oak              |
| <i>Quercus shumardii</i>            | Shumard oak          |
| <i>Quercus velutina</i>             | Black oak            |
| Hippuridaceae (Mare's Tail Family)  |                      |
| <i>Hedera helix</i>                 | English ivy          |

|                                                                                                                              |                                                                         |
|------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------|
| Juglandaceae (Walnut Family)<br><i>Juglans nigra</i>                                                                         | Black walnut                                                            |
| Lauraceae (Laurel Family)<br><i>Lindera benzoin</i>                                                                          | Spicebush                                                               |
| Magnoliaceae (Magnolia Family)<br><i>Liriodendron tulipifera</i>                                                             | Tuliptree                                                               |
| Menispermaceae (Moonseed Family)<br><i>Menispermum canadense</i>                                                             | Canada moonseed                                                         |
| Moraceae (Mulberry Family)<br><i>Maclura pomifera</i>                                                                        | Osageorange                                                             |
| Oleaceae (Olive Family)<br><i>Fraxinus americana</i><br><i>Fraxinus pennsylvanica</i><br><i>Ligustrum vulgare</i>            | White ash<br>Green ash<br>Privet                                        |
| Polemoniaceae (Polemonium Family)<br><i>Phlox divaricata</i>                                                                 | Wild blue phlox                                                         |
| Phytolaccaceae (Pokeweed Family)<br><i>Phytolacca americana</i>                                                              | Pokeweed                                                                |
| Rosaceae (Rose Family)<br><i>Duchesnea indica</i><br><i>Prunus serotina</i><br><i>Rubus</i> sp.<br><i>Rubus occidentalis</i> | Indian strawberry<br>Wild black cherry<br>Blackberry<br>Black raspberry |
| Salicaceae (Willow Family)<br><i>Populus alba</i>                                                                            | White poplar                                                            |
| Ulmaceae (Elm Family)<br><i>Celtis occidentalis</i>                                                                          | Hackberry                                                               |
| Violaceae (Violet Family)<br><i>Viola blanda</i><br><i>Viola papilionaceae</i>                                               | Sweet white violet<br>Common blue violet                                |
| Vitaceae (Vine Family)<br><i>Parthenocissus quinquefolia</i>                                                                 | Virginia creeper                                                        |

## **J. Utica Pike North of Utica**

### Angiospermae - Monocotyledoneae

|                                                                               |                         |
|-------------------------------------------------------------------------------|-------------------------|
| Graminae (Grass Family)<br><i>Festuca elatior</i><br><i>Holcus halepensis</i> | Fescue<br>Johnson grass |
|-------------------------------------------------------------------------------|-------------------------|

|                                       |                       |
|---------------------------------------|-----------------------|
| <i>Hystrix patula</i>                 | Bottlebrush grass     |
| Cyperaceae (Sedge Family)             |                       |
| <i>Carex amphibola</i>                | Narrow-leaved sedge   |
| <i>Carex blanda</i>                   | Woodland sedge        |
| <i>Carex festuaceae</i>               | Fescue sedge          |
| <i>Carex plataginea</i>               | Plantain-leaved sedge |
| <i>Carex rosea</i>                    | Stellate sedge        |
| Juncaceae (Rush Family)               |                       |
| <i>Juncus effusus</i>                 | Common rush           |
| <i>Juncus tenuis</i>                  | Path rush             |
| Typhaceae (Cattail Family)            |                       |
| <i>Typha latifolia</i>                | Cattail               |
| Angiospermae - Dicotyledoneae         |                       |
| Aceraceae (Maple Family)              |                       |
| <i>Acer negundo</i>                   | Boxelder              |
| <i>Acer rubra</i>                     | Red maple             |
| <i>Acer saccharium</i>                | Silver maple          |
| <i>Acer saccharum</i>                 | Sugar maple           |
| Aesculaceae (Buckeye Family)          |                       |
| <i>Aesculus glabra</i>                | Ohio buckeye          |
| Anacardiaceae (Sumac Family)          |                       |
| <i>Rhus copallina</i>                 | Upland sumac          |
| <i>Rhus glabra</i>                    | Smooth sumac          |
| <i>Rhus radicans</i>                  | Poison ivy            |
| Balsaminaceae (Jewel Weed Family)     |                       |
| <i>Impatiens capensis</i>             | Spotted touch-me-not  |
| Betulaceae (Birch Family)             |                       |
| <i>Betula nigra</i>                   | River birch           |
| Bignoniaceae (Trumpet Creeper Family) |                       |
| <i>Bignonia caperolata</i>            | Cross vine            |
| Caprifoliaceae (Honeysuckle Family)   |                       |
| <i>Diervilla lonicera</i>             | Bush honeysuckle      |
| <i>Lonicera japonica</i>              | Japanese honeysuckle  |
| Celastraceae (Staff-Tree Family)      |                       |
| <i>Euonymus americanus</i>            | Strawberry bush       |
| Crassulaceae (Orpine Family)          |                       |
| <i>Sedum purpureum</i>                | Sedum                 |
| Compositae (Thistle Family)           |                       |
| <i>Aster umbellatus</i>               | Tall white aster      |
| <i>Cirsium discolor</i>               | Field thistle         |
| <i>Chrysanthemum leucanthemum</i>     | Oxeye daisy           |

*Erigeron ramosus*  
*Solidago altissima*  
*Solidago canadensis*  
*Solidago gigantea*  
*Solidago uliginosa*

Daisy fleabane  
Tall goldenrod  
Canada goldenrod  
Late-flowering goldenrod  
Bog goldenrod

Crassulaceae (Orpine Family)  
*Sedum purpureum*

Live-forever sedum

Cruciferae (Mustard Family)  
*Alliaria officinalis*  
*Barbarea vulgaris*

Garlic mustard  
Wintercress

Fabaceae (Pea Family)  
*Amphicarpa bracteata*  
*Cercis canadensis*  
*Gleditsia triacanthos*  
*Medicago sativa*  
*Melilotus officinalis*  
*Trifolium agrarium*  
*Trifolium hybridum*  
*Trifolium pratense*  
*Trifolium repens*

Hog-peanut  
Redbud  
Black locust  
Alfalfa  
Yellow sweetclover  
Yellow hop clover  
Alsike clover  
Red clover  
White clover

Fagaceae (Beech Family)  
*Fagus grandifolia*  
*Quercus muehlenbergii*  
*Quercus palustris*  
*Quercus prinus*

American beech  
Chinquapin oak  
Pin oak  
Chesnut oak

Geraniaceae (Geranium Family)  
*Geranium carolinianum*

Carolina cranes-bill

Hydrophyllaceae (Waterleaf Family)  
*Hydrophyllum virginianum*  
*Phacelia purshii*

Virginia waterleaf  
Miami mist

Illicaceae (Holly Family)  
*Ilex verticillata*

Winterberry

Juglandaceae (Walnut Family)  
*Juglans nigra*

Black walnut

Labiatae (Mint Family)  
*Lamium purpureum*

Purple dead-nettle

Moraceae (Mulberry Family)  
*Maclura pomifera*  
*Morus alba*  
*Morus rubra*

Osageorange  
White mulberry  
Red mulberry

Oleaceae (Olive Family)  
*Fraxinus americana*  
*Fraxinus pennsylvanica*

White ash  
Green ash

|                                                                                                                 |                                                        |
|-----------------------------------------------------------------------------------------------------------------|--------------------------------------------------------|
| Oenothera (Evening-Primrose Family)<br><i>Oenothera biennis</i>                                                 | Common evening primrose                                |
| Platanaceae (Plane Tree Family)<br><i>Platanus occidentalis</i>                                                 | Sycamore                                               |
| Phytolaccaceae (Pokeweed Family)<br><i>Phytolacca americana</i>                                                 | Pokeweed                                               |
| Ranunculaceae (Crowfoot Family)<br><i>Delphinium tricornis</i>                                                  | Dwarf larkspur                                         |
| Rosaceae (Rose Family)<br><i>Fragaria vesca</i><br><i>Rosa multiflora</i>                                       | Hedge strawberry<br>Multiflora rose                    |
| Salicaceae (Willow Family)<br><i>Populus deltoides</i><br><i>Populus grandidentata</i><br><i>Salix interior</i> | Eastern cottonwood<br>Bigtooth aspen<br>Sandbar willow |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapsus</i>                                                   | Common mullein                                         |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                                                  | Tree-of-heaven                                         |
| Solanaceae (Potato Family)<br><i>Datura stramonium</i>                                                          | Jimson weed                                            |
| Ulmaceae (Elm Family)<br><i>Celtis occidentalis</i><br><i>Ulmus americana</i>                                   | Hackberry<br>American elm                              |
| Umbelliferae (Carrot Family)<br><i>Pastinaca sativa</i>                                                         | Parsnip                                                |
| Valerianaceae (Valerian Family)<br><i>Valerianella</i> sp.                                                      | Corn salad                                             |
| Vitaceae (Grape Family)<br><i>Vitis vulpina</i>                                                                 | Winter grape                                           |

#### **K. Lancassange Creek**

##### **Pteridophyta**

|                                                             |               |
|-------------------------------------------------------------|---------------|
| Equisetaceae (Horsetail Family)<br><i>Equisetum hyemale</i> | Scouring rush |
|-------------------------------------------------------------|---------------|

##### **Angiospermae - Monocotyledoneae**

|                                                                     |             |
|---------------------------------------------------------------------|-------------|
| Alismataceae (Water Plantain Family)<br><i>Sagittaria latifolia</i> | Duck potato |
|---------------------------------------------------------------------|-------------|

|                                     |                       |
|-------------------------------------|-----------------------|
| Cyperaceae (Sedge Family)           |                       |
| <i>Carex amphibola</i>              | Narrow-leaved sedge   |
| <i>Carex annectens</i>              | Yellow-fruited sedge  |
| <i>Carex blanda</i>                 | Woodland sedge        |
| <i>Carex grayii</i>                 | Gray's sedge          |
| <i>Carex plantaginea</i>            | Plantain-leaved sedge |
| <i>Carex rosea</i>                  | Stellate sedge        |
| Gramineae (Grass Family)            |                       |
| <i>Dactylis glomerata</i>           | Orchard grass         |
| <i>Elymus canadensis</i>            | Canada wild rye       |
| <i>Elymus virginicus</i>            | Virginia wild rye     |
| <i>Festuca elatior</i>              | Fescue                |
| <i>Panicum implicatum</i>           | Panic grass           |
| Typhaceae (Cattail Family)          |                       |
| <i>Typha latifolia</i>              | Cattail               |
| Juncaceae (Rush Family)             |                       |
| <i>Juncus effusus</i>               | Soft rush             |
| <i>Juncus marginatus</i>            | Grass-leaved rush     |
| Angiospermae - Dicotyledoneae       |                       |
| Aceraceae (Maple Family)            |                       |
| <i>Acer negundo</i>                 | Boxelder              |
| <i>Acer rubrum</i>                  | Red maple             |
| Aesculaceae (Buckeye Family)        |                       |
| <i>Aesculus hippocastanum</i>       | Horsechestnut         |
| Anacardiaceae (Sumac Family)        |                       |
| <i>Rhus radicans</i>                | Poison ivy            |
| Annonaceae (Custard Apple Family)   |                       |
| <i>Asimina triloba</i>              | Pawpaw                |
| Balsaminaceae (Jewel Weed Family)   |                       |
| <i>Impatiens capensis</i>           | Spotted touch-me-not  |
| Betulaceae (Birch Family)           |                       |
| <i>Betula nigra</i>                 | River birch           |
| Caprifoliaceae (Honeysuckle Family) |                       |
| <i>Diervilla lonicera</i>           | Bush honeysuckle      |
| <i>Lonicera japonica</i>            | Japanese honeysuckle  |
| <i>Sambucus canadensis</i>          | Common elder          |
| Cichoriaceae (Chicory Family)       |                       |
| <i>Lactuca canadensis</i>           | Tall lettuce          |
| Compositae (Thistle Family)         |                       |
| <i>Aster dumosus</i>                | Bushy aster           |
| <i>Bidens</i> sp.                   | Tickseed sunflower    |
| <i>Cirsium</i> sp.                  | Thistle               |
| <i>Erigeron annuus</i>              | Daisy fleabane        |

*Eupatorium fistulosum*  
*Eupatorium perfoliatum*  
*Eupatorium purpureum*  
*Ridgwaya alternifolia*  
*Scutellaria nervosa*  
*Solidago rugosa*  
*Verbesina alternifolia*  
*Vernonia altissima*

Common Joe-pye weed  
Boneset  
Wide-leaved Joe-pye weed  
Wingstem  
Veined skullcap  
Wrinkled-leaf goldenrod  
Wingstem  
Tall ironweed

Cornaceae (Dogwood Family)  
*Cornus rugosa*

Dogwood

Cruciferae (Mustard Family)  
*Alliaria officinalis*  
*Barbarea vulgaris*

Garlic mustard  
Wintercress

Ericaceae (Heath Family)  
*Rhododendron maximum*

Great laurel

Fagaceae (Beech Family)  
*Fagus granifolia*  
*Quercus palustris*

American beech  
Pin oak

Geraniaceae (Geranium Family)  
*Geranium carolinianum*

Carolina cranes-bill

Juglandaceae (Walnut Family)  
*Carya ovata*  
*Juglans nigra*

Shagbark hickory  
Black walnut

Labiatae (Mint Family)  
*Glechoma hederacea*  
*Lamium purpureum*  
*Scutellaria latetiflora*

Ground-ivy  
Purple dead-nettle  
Mad-dog skullcap

Fabaceae (Pea Family)  
*Amphicarpa bracteata*  
*Cercis canadensis*  
*Gleditsia triacanthos*  
*Gymnocladus dioica*  
*Lespedeza virginica*  
*Trifolium agrarium*  
*Trifolium hybridum*  
*Trifolium pratense*  
*Trifolium repens*

Hog-peanut  
Redbud  
Black locust  
Kentucky coffeetree  
Virginia bushclover  
Yellow hop clover  
Alsike clover  
Red clover  
White clover

Magnoliaceae (Magnolia Family)  
*Magnolia acuminata*

Cucumber tree

Moraceae (Mulberry Family)  
*Maclura pomifera*  
*Morus alba*  
*Morus rubra*

Osageorange  
White mulberry  
Red mulberry

Oleaceae (Olive Family)  
*Fraxinus americana*

White ash

|                                                                                                                              |                                                                      |
|------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------|
| <i>Fraxinus pennsylvanica</i>                                                                                                | Green ash                                                            |
| Platanaceae (Plane Tree Family)<br><i>Platanus occidentalis</i>                                                              | Sycamore                                                             |
| Polygonaceae<br><i>Polygonum coccineum</i><br><i>Tovara virginiana</i>                                                       | Smartweed<br>Virginia knotweed                                       |
| Rubiaceae (Bedstraw Family)<br><i>Galium aparine</i>                                                                         | Cleavers                                                             |
| Salicaceae (Willow Family)<br><i>Populus alba</i><br><i>Populus deltoides</i><br><i>Salix interior</i><br><i>Salix nigra</i> | White poplar<br>Eastern cottonwood<br>Sandbar willow<br>Black willow |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapsus</i>                                                                | Common mullein                                                       |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                                                               | Tree-of-heaven                                                       |
| Solanaceae (Potato Family)<br><i>Physalis virginiana</i>                                                                     | Wild cherry                                                          |
| Ulmaceae (Elm Family)<br><i>Celtis occidentalis</i><br><i>Ulmus americana</i>                                                | Hackberry<br>American elm                                            |
| Umbelliferae (Carrot Family)<br><i>Conium maculatum</i><br><i>Pastinaca sativa</i>                                           | Poison hemlock<br>Parsnip                                            |
| Urticaceae (Nettle Family)<br><i>Laportea canadensis</i><br><i>Pilea pumila</i><br><i>Urtica dioica</i>                      | Wood nettle<br>Clearweed<br>Stinging nettle                          |
| Verbenaceae (Vervain Family)<br><i>Verbena hastata</i>                                                                       | Ironweed                                                             |
| Violaceae (Violet Family)<br><i>Viola papilionacea</i>                                                                       | Common blue violet                                                   |
| Vitaceae (Grape Family)<br><i>Parthenocissus quinquefolia</i><br><i>Vitis aestivalis</i>                                     | Virginia creeper<br>Summer grape                                     |

**L.      Lentzier Creek**

Gymnospermae

|                                       |                         |
|---------------------------------------|-------------------------|
| Pinaceae (Pine Family)                | Red cedar<br>White pine |
| <i>Juniperus virginiana</i>           |                         |
| <i>Pinus strobus</i>                  |                         |
| Angiospermae - Monocotyledonae        |                         |
| Araceae (Arum Family)                 |                         |
| <i>Arisaema triphyllum</i>            | Jack-in-the-pulpit      |
| Cyperaceae (Sedge Family)             |                         |
| <i>Carex plantaginea</i>              | Plantain-leaved sedge   |
| Graminae (Grass Family)               |                         |
| <i>Festuca elatior</i>                | Fescue                  |
| <i>Lolium perenne</i>                 | Rye grass               |
| <i>Panicum boscii</i>                 | Panic grass             |
| <i>Triticum aestivum</i>              | Wheat                   |
| <i>Uniola latifolia</i>               | Wild oats               |
| Iridaceae (Iris Family)               |                         |
| <i>Sisyrinchium montanum</i>          | Blue-eyed grass         |
| Liliaeae (Lily Family)                |                         |
| <i>Allium cernuum</i>                 | Wild onion              |
| Angiospermae - Dicotyledoneae         |                         |
| Aceraceae (Maple Family)              |                         |
| <i>Acer negundo</i>                   | Boxelder                |
| <i>Acer rubrum</i>                    | Red maple               |
| <i>Acer saccharinum</i>               | Silver maple            |
| Anacardiaceae (Sumac Family)          |                         |
| <i>Rhus radicans</i>                  | Poison ivy              |
| Aristolochiaceae (Birthwort Family)   |                         |
| <i>Aristolochia macrophylla</i>       | Pipevine                |
| Asclepiadaceae (Milkweed Family)      |                         |
| <i>Asclepias speciosa</i>             | Showy milkweed          |
| Balsaminaceae (Jewel Weed Family)     |                         |
| <i>Impatiens capensis</i>             | Spotted touch-me-not    |
| <i>Impatiens pallida</i>              | Jewel weed              |
| Bignoniaceae (Trumpet Creeper Family) |                         |
| <i>Campsis radicans</i>               | Trumpet creeper         |
| <i>Catalpa bignonioides</i>           | Catalpa                 |
| Boraginaceae (Borage Family)          |                         |
| <i>Symphytum officinale</i>           | Comfrey                 |
| Caprifoliaceae (Honeysuckle Family)   |                         |
| <i>Lonicera japonica</i>              | Japanese honeysuckle    |
| <i>Diervilla lonicera</i>             | Bush honeysuckle        |
| <i>Symphoricarpos orbiculatus</i>     | Coralberry              |

|                                     |                         |
|-------------------------------------|-------------------------|
| Cichoriaceae (Chicory Family)       |                         |
| <i>Cichorium intybus</i>            | Chicory                 |
| Compositae (Thistle Family)         |                         |
| <i>Ambrosia trifida</i>             | Giant ragweed           |
| <i>Aster pilosus</i>                | White heath aster       |
| <i>Cirsium vulgare</i>              | Common Thistle          |
| <i>Erigeron annuus</i>              | Daisy fleabane          |
| <i>Eupatorium fistulosum</i>        | Common Joe-pye weed     |
| <i>Eupatorium perfoliatum</i>       | Boneset                 |
| <i>Solidago altissima</i>           | Tall goldenrod          |
| <i>Solidago canadensis</i>          | Canada goldenrod        |
| <i>Solidago gigantea</i>            | Late goldenrod          |
| <i>Solidago nemoralis</i>           | Oldfield goldenrod      |
| <i>Solidago rugosa</i>              | Wrinkled-leaf goldenrod |
| <i>Solidago speciosa</i>            | Showy goldenrod         |
| <i>Vernonia altissima</i>           | Tall ironweed           |
| Cruciferae (Mustard Family)         |                         |
| <i>Barbarea vulgaris</i>            | Wintercress             |
| Ericaceae (Heath Family)            |                         |
| <i>Rhododendron maximum</i>         | Great laurel            |
| Fabaceae (Pea Family)               |                         |
| <i>Cercis canadensis</i>            | Redbud                  |
| <i>Gleditsia triacanthos</i>        | Black locust            |
| <i>Trifolium agrarium</i>           | Yellow hop clover       |
| <i>Trifolium hybridum</i>           | Alsike clover           |
| <i>Trifolium pratense</i>           | Red clover              |
| <i>Trifolium repens</i>             | White clover            |
| Fagaceae (Beech Family)             |                         |
| <i>Quercus palustris</i>            | Pin oak                 |
| Geraniaceae (Geranium Family)       |                         |
| <i>Geranium carolinianum</i>        | Carolina cranes-bill    |
| Hamamelidaceae (Witch-Hazel Family) |                         |
| <i>Liquidambar styraciflua</i>      | Sweetgum                |
| Labiatae (Mint Family)              |                         |
| <i>Lamium amplexicaule</i>          | Henbit                  |
| <i>Lamium purpureum</i>             | Purple dead-nettle      |
| Lauraceae (Laurel Family)           |                         |
| <i>Lindera benzoin</i>              | Spice bush              |
| <i>Sassafras albidum</i>            | Sassafras               |
| Juglandaceae (Walnut Family)        |                         |
| <i>Juglans nigra</i>                | Black walnut            |
| Moraceae (Mulberry Family)          |                         |
| <i>Maclura pomifera</i>             | Osageorange             |
| <i>Morus alba</i>                   | White mulberry          |

|                                                                                                         |                                                   |
|---------------------------------------------------------------------------------------------------------|---------------------------------------------------|
| <i>Morus rubra</i>                                                                                      | Red mulberry                                      |
| Oleaceae (Olive Family)<br><i>Fraxinus americana</i>                                                    | White ash                                         |
| Phytolaccaceae (Pokeweed Family)<br><i>Phytolacca americana</i>                                         | Pokeweed                                          |
| Platanaceae (Plane Tree Family)<br><i>Platanus occidentalis</i>                                         | Sycamore                                          |
| Rosaceae (Rose Family)<br><i>Prunus serotina</i><br><i>Rosa multiflora</i><br><i>Rubus occidentalis</i> | Wild cherry<br>Multiflora rose<br>Black raspberry |
| Rubiaceae (Madder Family)<br><i>Galium aparine</i><br><i>Galium boreale</i>                             | Cleavers<br>Bedstraw                              |
| Salicaceae (Willow Family)<br><i>Populus nigra</i><br><i>Salix nigra</i>                                | Lombardy poplar<br>Black willow                   |
| Simaroubaceae (Ailanthus Family)<br><i>Ailanthus altissima</i>                                          | Tree-of-heaven                                    |
| Scrophulariaceae (Figwort Family)<br><i>Verbascum thapsus</i>                                           | Common mullein                                    |
| Solanaceae (Nightshade Family)<br><i>Solanum americanum</i>                                             | Black nightshade                                  |
| Umbelliferae (Carrot Family)<br><i>Conium maculatum</i><br><i>Pastinaca sativa</i>                      | Poison hemlock<br>Parsnip                         |
| Ulmaceae (Elm Family)<br><i>Celtis occidentalis</i><br><i>Ulmus rubra</i><br><i>Ulmus americana</i>     | Hackberry<br>Slippery elm<br>American elm         |
| Vitaceae (Grape Family)<br><i>Parthenocissus quinquefolia</i>                                           | Virginia creeper                                  |

## TERRESTRIAL FAUNAL (ANIMAL) SPECIES

Endangered/Threatened status is provided in bold for those species; refer to the **LEGEND** following this listing.

### A. Goose Creek Area

#### Aves

|                                   |                            |
|-----------------------------------|----------------------------|
| <i>Anas platyrhynchos</i>         | Mallard                    |
| <i>Aix sponsa</i>                 | Wood duck                  |
| <i>Nycticorax nycticorax</i>      | Black-crowned night heron  |
| <i>Nyctanassa violacea</i>        | Yellow-crowned night heron |
| <i>Otus asio</i>                  | Eastern screech-owl        |
| <i>Bubo virginianus</i>           | Great horned owl           |
| <i>Strix varia</i>                | Barred owl                 |
| <i>Megasceryle alcyon</i>         | Belted kingfisher          |
| <i>Melanerpes erythrocephalus</i> | Red-headed woodpecker      |
| <i>Dryocopus pileatus</i>         | Pileated woodpecker        |
| <i>Melanerpes carolinus</i>       | Red-bellied woodpecker     |
| <i>Picoides villosus</i>          | Hairy woodpecker           |
| <i>Cyanocitta cristata</i>        | Blue jay                   |
| <i>Sitta carolinensis</i>         | White-breasted nuthatch    |
| <i>Thryothorus ludovicianus</i>   | Carolina wren              |
| <i>Turdus migratorius</i>         | American robin             |
| <i>Corvus brachyrhynchos</i>      | American crow              |
| <i>Contopus virens</i>            | Eastern wood peewee        |
| <i>Empidonax virescens</i>        | Acadian flycatcher         |
| <i>Vireo griseus</i>              | White-eyed vireo           |

#### Mammalia

|                               |                                        |
|-------------------------------|----------------------------------------|
| <i>Tamias striatus</i>        | Eastern chipmunk                       |
| <i>Sciurus carolinensis</i>   | Gray squirrel                          |
| <i>Glaucomys volans</i>       | Southern flying squirrel               |
| <i>Marmota monax</i>          | Ground hog                             |
| <i>Castor canadensis</i>      | Beaver                                 |
| <i>Odocoileus canadensis</i>  | White-tailed deer                      |
| <i>Blarina brevicauda</i>     | Short-tailed shrew                     |
| <i>Eptesicus fuscus</i>       | Big brown bat                          |
| <i>Myotis lucifugus</i>       | Little brown bat                       |
| <i>Myotis sodalis</i>         | Indiana bat = <b>FE; E-IN &amp; KY</b> |
| <i>Myotis septentrionalis</i> | Northern long-eared bat                |
| <i>Myotis grisescens</i>      | Gray bat = <b>FE; E-IN &amp; KY</b>    |
| <i>Nycticeius humeralis</i>   | Evening bat = <b>T-KY, E-IN</b>        |
| <i>Pipistrellus subflavus</i> | Eastern pipistrelle                    |
| <i>Lasiurus borealis</i>      | Red bat                                |

## Amphibia

*Eurycea bislineata bislineata*  
*Hyla chrysoscelis*  
*Rana clamitans melanota*  
*Rana u. utricularia*  
*Terrapene carolina carolina*

Southern two-lined salamander  
Cope's gray treefrog  
Green frog  
Southern leopard frog  
Eastern box turtle

## Crustacea

*Orconectes jeffersoni*

Louisville crayfish = **E-KY**

## B. Little Goose Creek Area

## Aves

*Butorides striatus*  
*Anas rubripes*  
*Nycticorax nycticorax*  
*Nyctanassa violacea*  
*Buteo jamaicensis*  
*Falco sparverius*  
*Coccyzus americanus*  
*Strix varia*  
*Megasceryle alcyon*  
*Picoides villosus*  
*Tyrannus tyrannus*  
*Cyanocitta cristata*  
*Thryothorus ludovicianus*  
*Turdus migratorius*  
*Parus carolinensis*

Green-back heron  
Black duck  
Black-crowned night heron  
Yellow-crowned night heron  
Red tailed hawk  
American kestrel  
Yellow-billed cuckoo  
Barred owl  
Belted kingfisher  
Hairy woodpecker  
Eastern kingbird  
Blue jay  
Carolina wren  
American robin  
Carolina chickadee

## Mammalia

*Castor canadensis*  
*Marmota monax*  
*Sciurus carolinensis*  
*Sciurus niger*  
*Odocoileus virginianus*  
*Blarina brevicauda*  
*Lasiurus borealis*  
*Eptesicus fuscus*  
*Myotis sodalis*  
*Myotis grisescens*  
*Pipistrellus subflavus*

Beaver  
Ground hog  
Gray squirrel  
Fox squirrel  
White-tailed deer  
Short-tailed shrew  
Red bat  
Big brown bat  
Indiana bat = **FE; E-IN & KY**  
Gray bat = **FE; E-IN & KY**  
Eastern pipistrelle

## Reptilia

*Thamnophis sirtalis*

Garter snake

## C. Harrods Creek Area

### Aves

|                                 |                             |
|---------------------------------|-----------------------------|
| <i>Thryothorus ludovicianus</i> | Carolina wren               |
| <i>Ardea herodias</i>           | Great blue heron = <b>S</b> |
| <i>Branta canadensis</i>        | Canada goose                |
| <i>Anas platyrhynchos</i>       | Mallard                     |
| <i>Hylocichla mustelina</i>     | Wood thrush                 |
| <i>Piranga rubra</i>            | Summer tanager              |
| <i>Charadrius vociferus</i>     | Killdeer                    |
| <i>Strix varia</i>              | Barred owl                  |
| <i>Bubo virginianus</i>         | Great horned owl            |
| <i>Mimus polyglottos</i>        | Mockingbird                 |
| <i>Turdus migratorius</i>       | American robin              |
| <i>Protonotaria citrea</i>      | Prothonotary warbler        |
| <i>Cardinalis cardinalis</i>    | Northern cardinal           |
| <i>Passerina cyanea</i>         | Indigo bunting              |
| <i>Buteo lineatus</i>           | Red-shouldered hawk         |

### Mammalia

|                               |                   |
|-------------------------------|-------------------|
| <i>Eptesicus fuscus</i>       | Big brown bat     |
| <i>Procyon lotor</i>          | Raccoon           |
| <i>Ondatra zibethicus</i>     | Muskrat           |
| <i>Castor canadensis</i>      | Beaver            |
| <i>Odocoileus virginianus</i> | White-tailed deer |

### Reptilia

|                             |                      |
|-----------------------------|----------------------|
| <i>Nerodia s. sipedon</i>   | Northern water snake |
| <i>Nerodia s. pleuralis</i> | Midland water snake  |

### Amphibia

|                                      |                               |
|--------------------------------------|-------------------------------|
| <i>Desmognathus ochrophaeus</i>      | Mountain dusky salamander     |
| <i>Eurycea bislineata bislineata</i> | Southern two-lined salamander |
| <i>Rana catesbeiana</i>              | Bullfrog                      |
| <i>Rana clamitans melanota</i>       | Green frog                    |
| <i>Hyla versicolor</i>               | Gray treefrog                 |

### Mollusca

|                             |               |
|-----------------------------|---------------|
| <i>Anodonta grandis</i>     | Giant floater |
| <i>Strophitus undulatus</i> | Squawfoot     |
| <i>Corbicula fluminea</i>   | Asian clam    |

## D. Wolf Pen Area

### Aves

|                              |                                         |
|------------------------------|-----------------------------------------|
| <i>Ardea herodias</i>        | Great blue heron = <b>S</b>             |
| <i>Branta canadensis</i>     | Canada goose                            |
| <i>Aix sponsa</i>            | Wood duck                               |
| <i>Buteo jamaicensis</i>     | Red-tailed hawk                         |
| <i>Falco peregrinus</i>      | Peregrine falcon = <b>E-IN &amp; KY</b> |
| <i>Meleagris gallopavo</i>   | Wild turkey                             |
| <i>Colinus virginianus</i>   | Northern bobwhite                       |
| <i>Otus asio</i>             | Eastern screech-owl                     |
| <i>Bubo virginianus</i>      | Great horned owl                        |
| <i>Strix varia</i>           | Barred owl                              |
| <i>Megascops alcyon</i>      | Belted kingfisher                       |
| <i>Dryocopus pileatus</i>    | Pileated woodpecker                     |
| <i>Melanerpes carolinus</i>  | Red-bellied woodpecker                  |
| <i>Picoides villosus</i>     | Hairy woodpecker                        |
| <i>Parus bicolor</i>         | Tufted titmouse                         |
| <i>Parus carolinensis</i>    | Carolina chickadee                      |
| <i>Sitta carolinensis</i>    | White-breasted nuthatch                 |
| <i>Cistothorus platensis</i> | Sedge wren = <b>S, E-IN</b>             |
| <i>Cardinalis cardinalis</i> | Northern cardinal                       |
| <i>Corvus brachyrhynchos</i> | American crow                           |
| <i>Cyanocitta cristata</i>   | Blue jay                                |
| <i>Ammodramus henslowii</i>  | Henslow's sparrow = <b>E-IN, S</b>      |

### Mammalia

|                                 |                         |
|---------------------------------|-------------------------|
| <i>Didelphis virginiana</i>     | Opposum                 |
| <i>Lasiurus borealis</i>        | Red bat                 |
| <i>Myotis septentrionalis</i>   | Northern long-eared bat |
| <i>Procyon lotor</i>            | Raccoon                 |
| <i>Mustela vison</i>            | Mink                    |
| <i>Canis latrans</i>            | Coyote                  |
| <i>Vulpes vulpes</i>            | Red fox                 |
| <i>Urocyon cinereoargenteus</i> | Gray fox                |
| <i>Tamias striatus</i>          | Eastern chipmunk        |
| <i>Sciurus carolinensis</i>     | Gray squirrel           |
| <i>Sciurus niger</i>            | Fox squirrel            |
| <i>Odocoileus virginianus</i>   | White-tailed deer       |

### Reptilia

|                                    |                         |
|------------------------------------|-------------------------|
| <i>Apalone s. spinifera</i>        | Eastern spiny softshell |
| <i>Terrapene carolina carolina</i> | Eastern box turtle      |

### Amphibia

|                                   |                          |
|-----------------------------------|--------------------------|
| <i>Desmognathus fuscus</i>        | Dusky salamander         |
| <i>Acris crepitans blanchardi</i> | Blanchard's cricket frog |

*Hyla chrysocelis*  
*Rana catesbeiana*  
*Rana clamitans melanota*

Cope's gray treefrog  
Bullfrog  
Green frog

Mollusca

*Corbicula fluminea*

Asian clam

E. **Six Mile Island**

Aves

*Anas platyrhynchos*  
*Sayornis phoebe*  
*Cardinalis cardinalis*  
*Corvus brachyrhynchos*  
*Cyanocitta cristata*  
*Hylocichla mustelina*  
*Setophaga ruticilla*  
*Oporornis formosus*  
*Agelaius phoeniceus*  
*Carduelis tristis*

Mallard  
Eastern phoebe  
Northern Cardinal  
American crow  
Blue jay  
Wood thrush  
American redstart  
Kentucky warbler  
Red-winged blackbird  
American goldfinch

Mammalia

*Odocoileus virginianus*

White-tailed deer

F. **Drumanard Area**

Aves

*Buteo jamaicensis*  
*Cathartes aura*  
*Bubo virginianus*  
*Sphyrapicus varius*  
*Sayornis phoebe*  
*Melanerpes carolinus*  
*Picoides villosus*  
*Corvus brachyrhynchos*  
*Thryothorus ludovicianus*  
*Turdus migratorius*  
*Vireo olivaceus*  
*Cardinalis cardinalis*

Red-tailed hawk  
Turkey vulture  
Great horned owl  
Yellow-bellied sapsucker  
Eastern phoebe  
Red-bellied woodpecker  
Hairy woodpecker  
American crow  
Carolina wren  
American robin  
Red-eyed vireo  
Northern cardinal

Mammalia

*Scalopus aquaticus*  
*Odocoileus virginianus*

Eastern mole  
White-tailed deer

## Reptilia

*Terrepene carolina carolina*

Eastern box turtle

## Amphibia

*Rana utricularia*

Southern leopard frog

## G. Muddy Fork Area

### Aves

*Otus asio*

Common screech owl

*Bubo virginianus*

Great horned owl

*Buteo jamaicensis*

Red-tailed hawk

*Meleagris gallopavo*

Wild turkey

### Mammalia

*Eptesicus fuscus*

Big brown bat

*Lasiurus borealis*

Red bat

*Sciurus carolinensis*

Gray squirrel

*Tamias striatus*

Eastern chipmunk

*Odocoileus virginianus*

White-tailed deer

### Amphibia

*Rana clamitans melanota*

Green frog

*Hyla chrysoscelis*

Cope's gray treefrog

## H. Ninth Street Area

### Aves

*Anas rubripes*

Black duck

*Anas platyrhynchos*

Mallard

*Casmerodius albus*

Great egret = **E-KY, SC**

*Ardea herodias*

Great blue heron = **S**

## I. Beargrass Creek

### Aves

*Aix sponsa*

Wood duck

*Ardea herodias*

Great blue heron = **S**

*Butorides striatus*

Green-back heron

*Nycticorax nycticorax*

Black-crowned night heron

*Nyctanassa violacea*

Yellow-crowned night heron

*Megaceryle alcyon*

Belted Kingfisher

## Mammalia

*Lasiurus borealis*  
*Eptesicus fuscus*

Red bat  
Big brown bat

## Reptilia

*Graptemys geographica*  
*Chrysemys scripta elegans*  
*Trionyx sp.*

Map turtle  
Red-eared turtle  
Softshell turtle

## J. Utica Pike Area

## Aves

*Corvus brachyrhynchos*  
*Cyanocitta cristata*  
*Anas platyrhynchos*  
*Fulica americana*  
*Colinus virginianus*  
*Cathartes aura*  
*Coccyzus americanus*  
*Megascerys alcyon*  
*Meleagris gallopavo*  
*Riparia riparia*  
*Thryothorus ludovicianus*  
*Picoides villosus*  
*Dumetella carolinensis*  
*Sturnus vulgaris*  
*Quiscalus quiscula*  
*Sitta carolinensis*  
*Turdus migratorius*  
*Lanius ludovicianus*

American crow  
Blue jay  
Mallard  
American coot  
Northern bobwhite  
Turkey vulture  
Yellow-billed cuckoo  
Belted kingfisher  
Wild turkey  
Bank swallow = **S**  
Carolina wren  
Hairy woodpecker  
Gray catbird  
Starlings  
Common grackle  
White-breasted nuthatch  
American robin  
Loggerhead shrike

## Mammalia

*Procyon lotor*  
*Marmota monax*  
*Canis latrans*  
*Sciurus carolinensis*  
*Odocoileus virginianus*

Raccoon  
Ground hog  
Coyote  
Gray squirrel  
White-tailed deer

## Amphibia

*Rana u. utricularia*  
*Rana catesbeiana*

Southern leopard frog  
Bullfrog

K. **Lancassange Creek Area**

Aves

|                           |                                   |
|---------------------------|-----------------------------------|
| <i>Branta canadensis</i>  | Canada goose                      |
| <i>Anus platyrhynchos</i> | Mallard                           |
| <i>Ardea herodias</i>     | Great blue heron = <b>S</b>       |
| <i>Accipiter striatus</i> | Sharp-shinned hawk = <b>SC, S</b> |
| <i>Buteo jamaicensis</i>  | Red-tailed hawk                   |
| <i>Coragyps atratus</i>   | Black vulture                     |
| <i>Tyto alba</i>          | Common barn owl = <b>S, E-IN</b>  |
| <i>Strix varia</i>        | Barred owl                        |
| <i>Otus asio</i>          | Common Screech owl                |
| <i>Contopus virens</i>    | Eastern pewee                     |
| <i>Mimus polyglottos</i>  | Northern mocking bird             |
| <i>Turdus migratorius</i> | American robin                    |
| <i>Piranga rubra</i>      | Summer tanager                    |
| <i>Vireo griseus</i>      | White-eyed vireo                  |

Mammalia

|                               |                                     |
|-------------------------------|-------------------------------------|
| <i>Blarina brevicauda</i>     | Short-tailed shrew                  |
| <i>Myotis grisescens</i>      | Gray bat = <b>FE; E-IN &amp; KY</b> |
| <i>Lasiurus borealis</i>      | Red bat                             |
| <i>Eptesicus fuscus</i>       | Big brown bat                       |
| <i>Pipistrellus subflavus</i> | Eastern pipistrelle                 |
| <i>Procyon lotor</i>          | Raccoon                             |
| <i>Marmota monax</i>          | Ground hog                          |
| <i>Tamias striatus</i>        | Eastern chipmunk                    |
| <i>Ondatra zibethicus</i>     | Muskrat                             |
| <i>Odocoileus virginianus</i> | White-tailed deer                   |

Amphibia

|                                |                      |
|--------------------------------|----------------------|
| <i>Trionyx sp.</i>             | Softshell turtle     |
| <i>Natrix s. sipedon</i>       | Northern water snake |
| <i>Bufo woodhousii fowleri</i> | Fowler's toad        |
| <i>Bufo americana</i>          | American toad        |

L. **Lentzier Creek Area**

Aves

|                            |                         |
|----------------------------|-------------------------|
| <i>Branta canadensis</i>   | Canada goose            |
| <i>Meleagris gallopavo</i> | Wild turkey             |
| <i>Colinus virginianus</i> | Northern bobwhite       |
| <i>Buteo jamaicensis</i>   | Red-tailed hawk         |
| <i>Falco sparverius</i>    | Sparrow hawk            |
| <i>Otus asio</i>           | Common screech owl      |
| <i>Coccyzus americanus</i> | Yellow-billed cuckoo    |
| <i>Riparia riparia</i>     | Bank swallow = <b>S</b> |

*Mimus polyglottos*  
*Protonotaria citrea*  
*Turdus migratorius*  
*Quiscalus quiscula*  
*Sturnus vulgaris*  
*Sturnella magna*  
*Piranga rubra*  
*Passerina cyanea*  
*Pipilo erythrophthalmus*

Northern mockingbird  
Prothonotary warbler  
American robin  
Common grackle  
Starling  
Eastern meadowlark  
Summer tanager  
Indigo bunting  
Rufous-sided towhee

#### Mammalia

*Pipestrellus subflavus*  
*Eptesicus fuscus*  
*Lasiurus borealis*  
*Procyon lotor*  
*Glaucomys volans*  
*Ondatra zibethica*  
*Odocoileus virginianus*

Eastern pipestrelle  
Big brown bat  
Red bat  
Raccoon  
Southern flying squirrel  
Muskrat  
White-tailed deer

#### Amphibia

*Rana catesbeiana*  
*Rana clamitans melanota*  
*Natrix s. sipedon*

Bullfrog  
Green frog  
Northern water snake

#### Mollusca

*Anodonta grandis*  
*Corbicula fluminea*

Giant floater  
Asian clam

### **LEGEND**

**E = State Endangered**  
**FE = Federally Endangered**  
**S = Special Concern (Kentucky)**  
**SC = Special Concern (Indiana)**  
**T = State Threatened**  
**H = Historic (Kentucky)**  
**IN = Indiana**  
**KY = Kentucky**

## MACROINVERTEBRATES

### A. Goose Creek

Sampling was completed on April 5, 1999.

|                                 |                   |
|---------------------------------|-------------------|
| Ephemeroptera                   |                   |
| Heptageniidae                   |                   |
| <i>Stenacron interpunctatum</i> | 1 nymph           |
| Megaloptera                     |                   |
| Sialidae                        |                   |
| <i>Sialis</i> sp.               | 3 larvae          |
| Diptera                         |                   |
| Chironomidae                    | 81 larvae; 1 pupa |
| Decapoda                        |                   |
| Cambaridae                      |                   |
| <i>Cambarus</i> sp.             | 1 juvenile        |
| Isopoda                         |                   |
| Asellidae                       |                   |
| <i>Lirceus</i> sp.              | 8 specimens       |
| Amphipoda                       |                   |
| Gammaridae                      |                   |
| <i>Gammarus</i> sp.             | 1 specimen        |
| Bivalvia                        |                   |
| Corbiculidae                    |                   |
| <i>Corbicula</i> sp.            | 4 specimens       |
| Gastropoda                      |                   |
| Lymnaeidae                      |                   |
| <i>Lymnaea</i> sp.              | 11 specimens      |
| <i>Stagnicola</i> sp. (?)       | 1 specimen        |
| Pleuroceridae                   |                   |
| <i>Elimia</i> sp.               | 5 specimens       |
| Physidae                        |                   |
| <i>Physa</i> sp.                | 13 specimens      |
| Oligochaeta                     | 25 worms          |
| <i>Tubificidae</i>              | 7 worms           |
| Hirudinae                       | 3 worms           |

|                      |     |   |      |
|----------------------|-----|---|------|
| Total Taxa           | (s) | = | 14   |
| Total Individuals    | (N) | = | 165  |
| Biological Diversity | (d) | = | 2.54 |
| Equitability         | (e) | = | 0.57 |

## B. Little Goose Creek

Sampling was completed on April 6, 1999.

|                             |  |             |
|-----------------------------|--|-------------|
| Ephemeroptera               |  |             |
| Baetidae                    |  |             |
| <i>Baetis</i> sp.           |  | 1 nymph     |
| Odonata                     |  |             |
| Gomphidae                   |  |             |
| <i>Hagenius brevistylus</i> |  | 1 nymph     |
| Aeshnidae                   |  |             |
| <i>Boyeria</i> sp.          |  | 1 nymph     |
| Trichoptera                 |  |             |
| Hydropsychidae              |  |             |
| <i>Cheumatopsyche</i> sp.   |  | 2 larvae    |
| Lepidoptera                 |  |             |
| Pyralidae (?)               |  | 2 larvae    |
| Diptera                     |  |             |
| Tipulidae                   |  | 1 pupa      |
| <i>Tipula abdominalis</i>   |  | 2 larvae    |
| Chironomidae                |  | 4 larvae    |
| Decapoda                    |  |             |
| Cambaridae                  |  |             |
| <i>Orconectes</i> sp.       |  | 1 adult     |
| Isopoda                     |  |             |
| Asellidae                   |  |             |
| <i>Lirceus</i> sp.          |  | 5 specimens |
| Gastropoda                  |  |             |
| Pleuroceridae               |  |             |
| <i>Elimia</i> sp.           |  | 2 specimens |
| Physidae                    |  |             |
| <i>Physa</i> sp.            |  | 6 specimens |
| Oligochaeta                 |  | 1 worm      |

|                      |     |   |      |        |
|----------------------|-----|---|------|--------|
| Hirudinea            |     |   |      | 1 worm |
| Turbellaria          |     |   |      | 1 worm |
| Total Taxa           | (s) | = | 15   |        |
| Total Individuals    | (N) | = | 31   |        |
| Biological Diversity | (d) | = | 3.56 |        |
| Equitability         | (e) | = | 1.13 |        |

### C. **Wolf Pen Branch**

Sampling was completed on April 6, 1999.

|                           |  |  |  |           |
|---------------------------|--|--|--|-----------|
| Ephemeroptera             |  |  |  |           |
| Baetidae                  |  |  |  |           |
| <i>Baetis</i> sp.         |  |  |  | 46 nymphs |
| Odonata                   |  |  |  |           |
| Calopterygidae            |  |  |  |           |
| <i>Calopteryx</i> sp.     |  |  |  | 6 nymphs  |
| Megaloptera               |  |  |  |           |
| Sialidae                  |  |  |  |           |
| <i>Sialis</i> sp.         |  |  |  | 1 larva   |
|                           |  |  |  |           |
| Corydalidae               |  |  |  |           |
| <i>Nigronia</i> sp.       |  |  |  | 1 larva   |
| Coleoptera                |  |  |  |           |
| Psephenidae               |  |  |  |           |
| <i>Psephenus herricki</i> |  |  |  | 9 larvae  |
|                           |  |  |  |           |
| Elmidae                   |  |  |  |           |
| <i>Stenelmis</i> sp.      |  |  |  | 1 larva   |
| Trichoptera               |  |  |  |           |
| Limnephilidae             |  |  |  |           |
| <i>Hydatophylax</i> sp.   |  |  |  | 1 larva   |
|                           |  |  |  |           |
| Uenoidae                  |  |  |  |           |
| <i>Neophylax</i> sp.      |  |  |  | 22 larvae |
|                           |  |  |  |           |
| Helicopsychidae           |  |  |  |           |
| <i>Helicopsyche</i> sp.   |  |  |  | 3 larvae  |
|                           |  |  |  |           |
| Rhyacophilidae            |  |  |  |           |
| <i>Rhyacophila</i> sp.    |  |  |  | 5 larvae  |
| Diptera                   |  |  |  |           |
| Tipulidae                 |  |  |  |           |
| <i>Tipula abdominalis</i> |  |  |  | 4 larvae  |

|                      |                   |
|----------------------|-------------------|
| <i>Tipula</i>        | 1 larvae          |
| Tabanidae            |                   |
| <i>Chrysops</i> sp.  | 1 larva           |
| Simuliidae           |                   |
| <i>Prosimulium</i>   | 2 larva           |
| Chironomidae         | 33 larvae         |
| Decapoda             |                   |
| Cambaridae           |                   |
| <i>Cambarus</i> sp.  | 2 juveniles       |
| Isopoda              |                   |
| Asellidae            |                   |
| <i>Lirceus</i> sp.   | 327 specimens     |
| Amphipoda            |                   |
| Gammaridae           |                   |
| <i>Gammarus</i> sp.  | 212 specimens     |
| Bivalvia             |                   |
| Corbiculidae         |                   |
| <i>Corbicula</i> sp. | 6 specimens       |
| Gastropoda           |                   |
| Lymnaeidae           |                   |
| <i>Fossaria</i> sp.  | 1 specimen        |
| Physidae             |                   |
| <i>Physa</i> sp.     | 217 specimens     |
| Oligochaeta          | 5 worms           |
| Hirudinea            | 1 worm            |
| Turbellaria          | 28 worms          |
| Total Taxa           | (s) = 24          |
| Total Individuals    | (N) = 935 (179)   |
| Biological Diversity | (d) = 2.59 (3.27) |
| Equitability         | (e) = 0.33 (0.58) |

#### D. **Hunting Creek**

Sampling was completed April 7, 1999.

Odonata  
Calopterygidae

|                      |                           |                    |
|----------------------|---------------------------|--------------------|
|                      | <i>Calopteryx</i> sp.     | 1 nymph            |
|                      | Coenagrionidae            |                    |
|                      | <i>Argia</i> sp.          | 11 nymphs          |
| Coleoptera           |                           |                    |
|                      | Elmidae                   |                    |
|                      | <i>Stenelmis</i> sp.      | 4 adults           |
|                      | Eubriidae                 |                    |
|                      | <i>Ectopria</i> sp.       | 4 larvae           |
| Trichoptera          |                           |                    |
|                      | Hydropsychidae            | 96 pupae           |
|                      | <i>Ceratopsyche</i> sp.   | 5 larvae           |
|                      | <i>Cheumatopsyche</i> sp. | 152 larvae         |
| Diptera              |                           |                    |
|                      | Empididae                 |                    |
|                      | <i>Hemerodromia</i> sp.   | 1 larva            |
|                      | Simuliidae                |                    |
|                      | <i>Prosimulium</i> sp.    | 1 larva            |
|                      | Chironomidae              | 2 pupae; 26 larvae |
| Isopoda              |                           |                    |
|                      | Asellidae                 |                    |
|                      | <i>Lirceus</i> sp.        | 3 specimens        |
| Bivalvia             |                           |                    |
|                      | Corbiculidae              |                    |
|                      | <i>Corbicula</i> sp.      | 3 specimens        |
| Gastropoda           |                           |                    |
|                      | Lymnaeidae                |                    |
|                      | <i>Fossaria</i> sp.       | 1 specimen         |
|                      | Physidae                  |                    |
|                      | <i>Physa</i> sp.          | 3 specimens        |
| Hirudinea            |                           | 1 worm             |
| Turbellaria          |                           | 13 worms           |
| Total Taxa           | (s) =                     | 16                 |
| Total Individuals    | (N) =                     | 327                |
| Biological Diversity | (d) =                     | 2.25               |
| Equitability         | (e) =                     | 0.38               |

E.     **Muddy Fork**

Sampling was completed on April 7, 1999.

|                           |               |  |
|---------------------------|---------------|--|
| Odonata                   |               |  |
| Calopterygidae            |               |  |
| <i>Calopteryx</i> sp.     | 9 nymphs      |  |
| Coleoptera                |               |  |
| Elmidae                   |               |  |
| <i>Stenelmis</i> sp.      | 11 larvae     |  |
| Eubriidae                 |               |  |
| <i>Ectopria</i> sp.       | 1 larvae      |  |
| Trichoptera               |               |  |
| Hydropsychidae            | 3 pupae       |  |
| <i>Ceratopsyche</i> sp.   | 1 larvae      |  |
| <i>Cheumatopsyche</i> sp. | 2 larvae      |  |
| Lepidoptera               |               |  |
| <i>Pyralidae</i> (?)      | 1 larva       |  |
| Diptera                   |               |  |
| Simuliidae                |               |  |
| <i>Simulium</i> sp.       | 2 larvae      |  |
| Chironomidae              | 27 larvae     |  |
| Decapoda                  |               |  |
| Cambaridae                |               |  |
| <i>Cambarus</i> sp.       | 2 juveniles   |  |
| Isopoda                   |               |  |
| Asellidae                 |               |  |
| <i>Lirceus</i> sp.        | 136 specimens |  |
| Amphipoda                 |               |  |
| Gammaridae                |               |  |
| <i>Gammarus</i> sp.       | 97 specimens  |  |
| Bivalvia                  |               |  |
| Corbiculidae              |               |  |
| <i>Corbicula</i> sp.      | 5 specimens   |  |
| Gastropoda                |               |  |
| Pleuroceridae             |               |  |
| <i>Pleurocera</i> sp.     | 4 specimens   |  |
| Physidae                  |               |  |
| <i>Physa</i> sp.          | 1 specimen    |  |

|                            |     |   |      |        |             |
|----------------------------|-----|---|------|--------|-------------|
| Lymnaeidae                 |     |   |      |        |             |
| <i>Fossaria</i> sp.        |     |   |      |        | 2 specimens |
| Planorbidae                |     |   |      |        |             |
| <i>Planorbella</i> sp. (?) |     |   |      |        | 1 shell     |
| Oligochaeta                |     |   |      |        | 30 worms    |
| Hirudinea                  |     |   |      |        | 4 worms     |
| Turbellaria                |     |   |      |        | 5 worms     |
| Total Taxa                 | (s) | = | 20   |        |             |
| Total Individuals          | (N) | = | 345  | (112)  |             |
| Biological Diversity       | (d) | = | 2.64 | (3.29) |             |
| Equitability               | (e) | = | 0.45 | (0.07) |             |

#### F. Harrods Creek

Sampling was completed June 13, 2000.

|                                  |  |  |  |  |                  |
|----------------------------------|--|--|--|--|------------------|
| Diptera                          |  |  |  |  |                  |
| Chironomidae                     |  |  |  |  | 6 larvae; 1 pupa |
| Bivalvia                         |  |  |  |  |                  |
| Sphaeriidae                      |  |  |  |  |                  |
| <u>Sphaerium</u> sp.             |  |  |  |  | 4 specimens      |
| Gastropoda                       |  |  |  |  |                  |
| Viviparidae                      |  |  |  |  |                  |
| * <u>Viviparus</u> sp. (?)       |  |  |  |  | 1 specimen       |
| * <u>Cipangopaludina</u> sp. (?) |  |  |  |  | 1 specimen       |
| Oligochaeta                      |  |  |  |  | 54 worms         |

\*Shells were extremely weathered; difficult to evaluate some characters.

The number of total individuals included in the Harrods Creek sample is insufficient to conduct biological diversity and equitability indices. However, the distribution of taxa within the sample are typical of most dredge grab samples taken from the bottom sediments in Kentucky streams. Without knowing the depth of the water at the sample site and the type of bottom sediments, it was difficult to assess the expected diversity of the macroinvertebrate community within these samples.

## G. **Beargrass Creek**

|                  |          |
|------------------|----------|
| Diptera          |          |
| Chironomidae     | 2 larvae |
| Ephemeroptera    |          |
| Ephemeridea      |          |
| <u>Hexagenia</u> | 4 nymphs |
| Oligochaeta      | 24 worms |

This was an insufficient number of total individuals within the Beargrass Creek sample to conduct meaningful analysis of the macroinvertebrate community.

## H. **Lancassange Creek**

Sampling was completed on April 8, 1999.

|                           |                    |
|---------------------------|--------------------|
| Odonata                   |                    |
| Calopterygidae            |                    |
| <i>Calopteryx</i> sp.     | 3 nymphs           |
| Coleoptera                |                    |
| Hydrophilidae             |                    |
| <i>Berosus</i> sp.        | 5 larvae           |
| Elmidae                   |                    |
| <i>Stenelmis</i> sp.      | 3 adults; 6 larvae |
| Trichoptera               |                    |
| Hydropsychidae            | 84 pupae           |
| <i>Hydropsyche</i> sp.    | 39 larvae          |
| <i>Ceratopsyche</i> sp.   | 34 larvae          |
| <i>Cheumatopsyche</i> sp. | 103 larvae         |
| Diptera                   |                    |
| Tipulidae                 |                    |
| <i>Tipula</i> sp.         | 1 larva            |
| <i>Pilaria</i> sp.        | 1 larva            |
| Simuliidae                |                    |
| <i>Prosimulium</i> sp.    | 2 larvae           |
| Chironomidae              | 61 larvae          |
| Isopoda                   |                    |
| Asellidae                 |                    |
| <i>Lirceus</i> sp.        | 136 specimens      |

|                      |          |   |      |        |             |
|----------------------|----------|---|------|--------|-------------|
| Lepidoptera          |          |   |      |        |             |
| Pyralidae (?)        |          |   |      |        | 1 larva     |
| Amphipoda            |          |   |      |        |             |
| Gammaridae           |          |   |      |        |             |
| <i>Gammarus</i> sp.  |          |   |      |        | 5 specimens |
| Bivalvia             |          |   |      |        |             |
| Corbiculidae         |          |   |      |        |             |
| <i>Corbicula</i> sp. |          |   |      |        | 3 specimens |
| Gastropoda           |          |   |      |        |             |
| Lymnaeidae           |          |   |      |        |             |
| <i>Fossaria</i> sp.  |          |   |      |        | 2 specimens |
|                      | Physidae |   |      |        |             |
| <i>Physa</i> sp.     |          |   |      |        | 1 specimen  |
| Oligochaeta          |          |   |      |        | 3 worms     |
| Hirudinea            |          |   |      |        | 1 worm      |
| Total Taxa           | (s)      | = | 19   |        |             |
| Total Individuals    | (N)      | = | 494  | (255)  |             |
| Biological Diversity | (d)      | = | 2.98 | (2.71) |             |
| Equitability         | (e)      | = | 0.58 | (0.47) |             |

#### I. **Lentzier Creek**

Sampling was completed on April 8, 1999.

|                                           |             |  |  |  |          |
|-------------------------------------------|-------------|--|--|--|----------|
| Ephemeroptera                             |             |  |  |  |          |
| Heptageniidae                             |             |  |  |  |          |
| <i>Stenacron interpunctatum</i>           |             |  |  |  | 5 nymphs |
| <i>Stenonema</i> sp.                      |             |  |  |  | 1 nymph  |
|                                           | Ephemeridae |  |  |  |          |
| <i>Hexagenia</i> sp.                      |             |  |  |  | 1 nymph  |
|                                           | Baetidae    |  |  |  |          |
| <i>Baetis</i> sp.                         |             |  |  |  | 1 nymph  |
| Plecoptera                                |             |  |  |  |          |
| Nemouridae                                |             |  |  |  |          |
| <i>Amphinemura</i> sp. (partial specimen) |             |  |  |  | 1 nymph  |
|                                           | Perlodidae  |  |  |  |          |
| <i>Isoperla</i> sp.                       |             |  |  |  | 1 nymph  |

|                             |  |                      |
|-----------------------------|--|----------------------|
| Megaloptera                 |  |                      |
| Sialidae                    |  |                      |
| <i>Sialis</i> sp.           |  | 1 larva              |
| Corydalidae                 |  |                      |
| <i>Nigronia serricornis</i> |  | 1 larva              |
| Coleoptera                  |  |                      |
| Psephenidae                 |  |                      |
| <i>Psephenus herricki</i>   |  | 27 larvae            |
| Elmidae                     |  |                      |
| <i>Stenelmis</i> sp.        |  | 16 larvae            |
| Trichoptera                 |  |                      |
| Hydropsychidae              |  | 12 pupae             |
| <i>Ceratopsyche</i> sp.     |  | 4 larvae             |
| <i>Cheumatopsyche</i> sp.   |  | 4 larvae             |
| Hydroptilidae               |  |                      |
| <i>Hydroptila</i> (?) sp.   |  | 1 larva              |
| Philopotamidae              |  |                      |
| <i>Chimarra</i> sp.         |  | 1 larva              |
| Polycentropodidae           |  |                      |
| <i>Cernotina</i> sp.        |  | 21 larvae            |
| Limnephilidae               |  |                      |
| <i>Ironoquia</i> sp.        |  | 1 larva              |
| Diptera                     |  |                      |
| Tipulidae                   |  | 4 pupae (?)          |
| <i>Tipula abdominalis</i>   |  | 1 larva              |
| <i>Antocha</i> sp.          |  | 1 larva              |
| <i>Pilaria</i> sp.          |  | 2 larvae             |
| <i>Pedicia</i> sp.          |  | 1 larva              |
| Simuliidae                  |  |                      |
| <i>Simulium</i> sp.         |  | 1 larva; 19 pupae    |
| <i>Prosimulium</i> sp.      |  | 1 pupa               |
| Chironomidae                |  | 246 larvae; 9 pupae  |
| Decapoda                    |  |                      |
| Cambaridae                  |  |                      |
| <i>Orconectes</i> sp.       |  | 1 adult; 4 juveniles |

|                      |     |   |      |              |
|----------------------|-----|---|------|--------------|
| Isopoda              |     |   |      |              |
| Asellidae            |     |   |      |              |
| <i>Lirceus</i> sp.   |     |   |      | 14 specimens |
| Amphipoda            |     |   |      |              |
| Gammaridae           |     |   |      |              |
| <i>Gammarus</i> sp.  |     |   |      | 9 specimens  |
| Gastropoda           |     |   |      |              |
| Physidae             |     |   |      |              |
| <i>Physa</i> sp.     |     |   |      | 9 specimens  |
| Unidentified snail   |     |   |      | 1 specimen   |
| Bivalvia             |     |   |      |              |
| Corbiculidae         |     |   |      |              |
| <i>Corbicula</i> sp. |     |   |      | 11 specimens |
| Oligochaeta          |     |   |      | 7 worms      |
| Turbellaria          |     |   |      | 1 worm       |
| Total Taxa           | (s) | = | 33   | (33)         |
| Total Individuals    | (N) | = | 441  | (187)        |
| Biological Diversity | (d) | = | 2.73 | (4.17)       |
| Equitability         | (e) | = | 0.27 | (0.82)       |

#### J. Ohio River

Sampling was completed on June 12, 2000 and on July 6, 2000.

##### June 12, 2000 Sampling

This sample included four adult weevils of the Family Curculionidae (Coleoptera) and one spider (Arachnida). The specimens did not fit any of the keys to the aquatic insects or macroinvertebrates and are most like terrestrial forms. Therefore, no analysis can be made referenced to the organisms in this Ohio River sample.

##### July 6, 2000 Sampling

|                           |  |  |  |         |
|---------------------------|--|--|--|---------|
| Trichoptera               |  |  |  | 1 pupa  |
| Hydropsychidae            |  |  |  |         |
| <i>Potamyia</i> sp. (?)   |  |  |  | 1 larva |
| Gastropoda                |  |  |  |         |
| Pleuroceridae             |  |  |  |         |
| <i>Pleurocera</i> sp. (?) |  |  |  | 1 shell |
| Viviparidae               |  |  |  |         |
| <i>Campeloma</i> sp. (?)  |  |  |  | 1 shell |

There was insufficient data within this Ohio River sample to conduct a meaningful analysis of the macroinvertebrate community. It is interesting that chironomid larva and oligochaetes were missing from this sample.

## AQUATIC VERTEBRATES

### A. Goose Creek, 8 April 1999

| Scientific Name                | Common Name         |
|--------------------------------|---------------------|
| <i>Semotilus atromaculatus</i> | Creek chub          |
| <i>Lythrurus ardens</i>        | Rosefin shiner      |
| <i>Notropis ludibundus</i>     | Sand shiner         |
| <i>Etheostoma caeruleum</i>    | Rainbow darter      |
| <i>Etheostoma nigrum</i>       | Johnny darter       |
| <i>Etheostoma blennioides</i>  | Greenside darter    |
| <i>Etheostoma flabellare</i>   | Fantail darter      |
| <i>Aplodinotus grunniens</i>   | Freshwater drum     |
| <i>Dorosoma cepedianum</i>     | Gizzard shad        |
| <i>Lepomis macrochirus</i>     | Bluegill            |
| <i>Lepomis megalotis</i>       | Longear sunfish     |
| <i>Hypentelium nigricans</i>   | Northern hog sucker |

### B. Little Goose Creek, 8 April 1999

| Scientific Name                | Common Name      |
|--------------------------------|------------------|
| <i>Semotilus atromaculatus</i> | Creek chub       |
| <i>Pimephales notatus</i>      | Bluntnose minnow |
| <i>Lythrurus ardens</i>        | Rosefin shiner   |
| <i>Lepomis macrochirus</i>     | Bluegill         |
| <i>Lepomis megalotis</i>       | Longear sunfish  |
| <i>Notropis rubellus</i>       | Rosyface shiner  |
| <i>Etheostoma nigrum</i>       | Johnny darter    |
| <i>Etheostoma caeruleum</i>    | Rainbow darter   |

### C. Wolf Pen Branch, 7 April 1999

| Scientific Name                | Common Name         |
|--------------------------------|---------------------|
| <i>Semotilus atromaculatus</i> | Creek chub          |
| <i>Hypentelium nigricans</i>   | Northern hog sucker |
| <i>Lythrurus ardens</i>        | Rosefin shiner      |
| <i>Lepomis macrochirus</i>     | Bluegill            |
| <i>Lepomis megalotis</i>       | Longear sunfish     |
| <i>Etheostoma caeruleum</i>    | Rainbow darter      |
| <i>Etheostoma nigrum</i>       | Johnny darter       |
| <i>Etheostoma blennioides</i>  | Greenside darter    |
| <i>Etheostoma flabellare</i>   | Fantail darter      |

**D. Hunting Creek, 7 April 1999**

| Scientific Name                | Common Name         |
|--------------------------------|---------------------|
| <i>Semotilus atromaculatus</i> | Creek chub          |
| <i>Campostoma anomalum</i>     | Central stoneroller |
| <i>Pimephales notatus</i>      | Bluntnose minnow    |
| <i>Cyprinus carpio</i>         | Common carp         |
| <i>Catostomus commersoni</i>   | White sucker        |
| <i>Noturus flavus</i>          | Stonecat            |
| <i>Ameriurus natalis</i>       | Yellow bullhead     |
| <i>Gambusia affinis</i>        | Mosquitofish        |
| <i>Lepomis gulosus</i>         | Warmouth            |
| <i>Lepomis cyanellus</i>       | Green sunfish       |
| <i>Micropterus punctulatus</i> | Spotted bass        |
| <i>Lepomis macrochirus</i>     | Bluegill            |

**E. Muddy Fork, 7 April 1999**

| Scientific Name                | Common Name      |
|--------------------------------|------------------|
| <i>Semotilus atromaculatus</i> | Creek chub       |
| <i>Pimephales notatus</i>      | Bluntnose minnow |
| <i>Lepomis cyanellus</i>       | Green sunfish    |
| <i>Lepomis macrochirus</i>     | Bluegill         |

**F. Beargrass Creek - Archival Data**

| Scientific Name                | Common Name         |
|--------------------------------|---------------------|
| <i>Dorosoma cepedianum</i>     | Gizzard shad        |
| <i>Catostomus commersoni</i>   | White sucker        |
| <i>Micropterus salmoides</i>   | Largemouth bass     |
| <i>Ictalurus natalis</i>       | Yellow bullhead     |
| <i>Lepomis megalotis</i>       | Longear sunfish     |
| <i>Cyprinus carpio</i>         | Common carp         |
| <i>Gambusia affinis</i>        | Mosquitofish        |
| <i>Etheostoma blennioides</i>  | Greenside darter    |
| <i>Etheostoma flabellare</i>   | Fantail darter      |
| <i>Notropis chrysocephalus</i> | Striped shiner      |
| <i>Pimephales notatus</i>      | Bluntnose minnow    |
| <i>Semotilus atromaculatus</i> | Creek chub          |
| <i>Campostoma anomalum</i>     | Central stoneroller |
| <i>Lepomis cyanellus</i>       | Green sunfish       |
| <i>Lepomis macrochirus</i>     | Bluegill            |

G. **Lancassange Creek, 8 April 1999**

| Scientific Name                | Common Name         |
|--------------------------------|---------------------|
| <i>Semotilus atromaculatus</i> | Creek chub          |
| <i>Campostoma anomalum</i>     | Central stoneroller |
| <i>Cyprinella whipplei</i>     | Steelcolor shiner   |
| <i>Pimephales notatus</i>      | Bluntnose minnow    |
| <i>Notropis atherinoides</i>   | Emerald shiner      |
| <i>Notropis rubellus</i>       | Rosyface shiner     |
| <i>Notropis volucellus</i>     | Mimic shiner        |
| <i>Ameriurus natalis</i>       | Yellow bullhead     |
| <i>Gambusia affinis</i>        | Mosquitofish        |
| <i>Lepomis cyanellus</i>       | Green sunfish       |
| <i>Lepomis macrochirus</i>     | Bluegill            |
| <i>Etheostoma blennioides</i>  | Greenside darter    |

H. **Lentzier Creek, 8 April 1999**

| Scientific Name                | Common Name         |
|--------------------------------|---------------------|
| <i>Semotilus atromaculatus</i> | Creek chub          |
| <i>Campostoma anomalum</i>     | Central stoneroller |
| <i>Lythrurus ardens</i>        | Rosefin shiner      |
| <i>Cottus carolinae</i>        | Banded sculpin      |
| <i>Hypentelium nigricans</i>   | Northern hog sucker |
| <i>Lepomis cyanellus</i>       | Green sunfish       |
| <i>Etheostoma nigrum</i>       | Johnny darter       |
| <i>Etheostoma blennioides</i>  | Greenside darter    |
| <i>Etheostoma flabellare</i>   | Fantail darter      |
| <i>Ambloplites rupestris</i>   | Rock bass           |
| <i>Campostoma anomalum</i>     | Central stoneroller |
| <i>Micropterus dolomieu</i>    | Smallmouth bass     |

## I. Ohio River - Archival Data

At the direction of the Kentucky Transportation Cabinet (KYTC), archival data is sufficient to document fish species in the Ohio River. This data was obtained from 1957, 1958, 1959, 1961, 1968, 1969, 1970, 1974, 1976, 1978, 1979, 1981, 1983, 1985, 1987, 1988, 1989, 1991 and 1997.

| Scientific Name                    | Common Name                |
|------------------------------------|----------------------------|
| <i>Ichthyomyzon bdellium</i>       | Ohio lamprey               |
| <i>Ichthyomyzon unicuspis</i>      | Silver lamprey             |
| <i>Polyodon spathula</i>           | Paddlefish                 |
| <i>Lepisosteus platostomus</i>     | Shortnose gar              |
| <i>Lepisosteus osseus</i>          | Longnose gar               |
| <i>Anguilla rostrata</i>           | American eel               |
| <i>Alosa chrysochloris</i>         | Skipjack herring           |
| <i>Dorosoma cepedianum</i>         | Gizzard shad               |
| <i>Dorosoma petenense</i>          | Threadfin shad             |
| <i>Hiodon alosoides</i>            | Goldeye                    |
| <i>Hiodon tergisus</i>             | Mooneye                    |
| <i>Carassius auratus</i>           | Goldfish                   |
| <i>Cyprinus carpio</i>             | Common carp                |
| <i>Cyprinus</i>                    | Bighead carp               |
| <i>Ctenopharyngodon idella</i>     | Grass carp                 |
| <i>Hypophthalmichthys molitrix</i> | Silver carp                |
| <i>Hybopsis aestivalis</i>         | Speckled chub              |
| <i>Hybopsis stoneriana</i>         | Silver chub                |
| <i>Notemigonus crysoleucas</i>     | Golden shiner              |
| <i>Notropis atherinoides</i>       | Emerald shiner             |
| <i>Notropis photogenis</i>         | Silver shiner              |
| <i>Notropis blennius</i>           | River shiner               |
| <i>Notropis chrysocephalus</i>     | Striped shiner             |
| <i>Notropis volucellus</i>         | Mimic shiner               |
| <i>Hybognathus nuchalis</i>        | Mississippi silvery minnow |
| <i>Campostoma anomalum</i>         | Central stoneroller        |
| <i>Cycleptus elongatus</i>         | Blue sucker                |
| <i>Carpionodes carpio</i>          | River carpsucker           |
| <i>Carpionodes cyprinus</i>        | Quillback carpsucker       |
| <i>Carpionodes velifer</i>         | Highfin carpsucker         |
| <i>Catostomus commersoni</i>       | White sucker               |
| <i>Ictiobus bubalus</i>            | Smallmouth buffalo         |
| <i>Ictiobus cyprinellus</i>        | Bigmouth buffalo           |
| <i>Ictiobus niger</i>              | Black buffalo              |
| <i>Minytrema melanops</i>          | Spotted sucker             |
| <i>Moxostoma erythrurum</i>        | Golden redhorse            |
| <i>Moxostoma macrolepidotum</i>    | Shorthead redhorse         |
| <i>Moxostoma carinatum</i>         | River redhorse             |
| <i>Moxostoma anisurum</i>          | Silver redhorse            |
| <i>Ictalurus furcatus</i>          | Blue catfish               |
| <i>Ictalurus punctatus</i>         | Channel catfish            |

| Scientific Name                | Common Name           |
|--------------------------------|-----------------------|
| <i>Pylodictis olivaris</i>     | Flathead catfish      |
| <i>Ictalurus melas</i>         | Black bullhead        |
| <i>Ictalurus natalis</i>       | Yellow bullhead       |
| <i>Ictalurus nebulosus</i>     | Brown bullhead        |
| <i>Fundulus notatus</i>        | Blackstripe topminnow |
| <i>Labidesthes sicculus</i>    | Brook silverside      |
| <i>Morone saxatilis</i>        | Striped bass          |
| <i>Morone saxatilis-hybrid</i> | Hybrid striped bass   |
| <i>Morone chrysops</i>         | White bass            |
| <i>Ambloplites rupestris</i>   | Rock bass             |
| <i>Lepomis cyanellus</i>       | Green sunfish         |
| <i>Chaenobryttus gulosus</i>   | Warmouth              |
| <i>Lepomis humilis</i>         | Orangespotted sunfish |
| <i>Lepomis macrochirus</i>     | Bluegill              |
| <i>Lepomis megalotis</i>       | Longear sunfish       |
| <i>Lepomis microlophus</i>     | Redear sunfish        |
| <i>Micropterus punctulatus</i> | Spotted bass          |
| <i>Micropterus salmoides</i>   | Largemouth bass       |
| <i>Micropterus dolomieu</i>    | Smallmouth bass       |
| <i>Pomoxis annularis</i>       | White crappie         |
| <i>Pomoxis nigromaculatus</i>  | Black crappie         |
| <i>Percina caprodes</i>        | Logperch              |
| <i>Percina sciera</i>          | Slenderhead darter    |
| <i>Etheostoma blennioides</i>  | Greenside darter      |
| <i>Etheostoma nigrum</i>       | Johnny darter         |
| <i>Etheostoma flabellare</i>   | Fantail darter        |
| <i>Etheostoma caeruleum</i>    | Rainbow darter        |
| <i>Stizostedion canadense</i>  | Sauger                |
| <i>Stizostedion vitreum</i>    | Walleye               |
| <i>Perca flavescens</i>        | Yellow perch          |
| <i>Aplodinotus grunniens</i>   | Freshwater drum       |
| <i>Hypentelium nigricans</i>   | Northern hog sucker   |
| <i>Notropis hudsonius</i>      | Spottail shiner       |
| <i>Lepomis gibbosus</i>        | Pumpkinseed           |
| <i>Moxostoma duquesnei</i>     | Black redhorse        |
| <i>Pimephales notatus</i>      | Bluntnose minnow      |
| <i>Carpionodes</i> sp.         | Carpionodes species   |
| <i>Percina copelandi</i>       | Channel darter        |
| <i>Cyprinidae</i> sp.          | Cyprinidae species    |
| <i>Luxilus cornutus</i>        | Common shiner         |
| <i>Etheostoma kennicotti</i>   | Stripetail darter     |
| <i>Noturus gyrinus</i>         | Tadpole madtom        |
| <i>Notropis stramineus</i>     | Sand shiner           |

## J. Harrods Creek - Archival Data

At the direction of the Kentucky Department of Transportation (KYTC), archival data is sufficient to document fish species in Harrods Creek.

| Scientific Name                 | Common Name           |
|---------------------------------|-----------------------|
| <i>Micropterus salmoides</i>    | Largemouth bass       |
| <i>Micropterus punctulatus</i>  | Spotted bass          |
| <i>Ambloplites rupestris</i>    | Rock bass             |
| <i>Micropterus dolomieu</i>     | Smallmouth bass       |
| <i>Lepomis macrochirus</i>      | Bluegill              |
| <i>Lepomis megalotis</i>        | Longear sunfish       |
| <i>Lepomis cyanellus</i>        | Green sunfish         |
| <i>Lepomis microlophus</i>      | Redear sunfish        |
| <i>Chaenobryttus gulosus</i>    | Warmouth              |
| <i>Moxostoma erythrurum</i>     | Golden redhorse       |
| <i>Moxostoma duquesnei</i>      | Black redhorse        |
| <i>Moxostoma macrolepidotum</i> | Shorthead redhorse    |
| <i>Hypentelium nigricans</i>    | Northern hogsucker    |
| <i>Catostomus commersoni</i>    | White sucker          |
| <i>Ictalurus natalis</i>        | Yellow bullhead       |
| <i>Aplodinotus grunniens</i>    | Freshwater drum       |
| <i>Dorosoma cepedianum</i>      | Gizzard shad          |
| <i>Campostoma anomalum</i>      | Central stoneroller   |
| <i>Semotilus atromaculatus</i>  | Creek chub            |
| <i>Ericymba buccata</i>         | Silverjaw minnow      |
| <i>Notropis chrysocephalus</i>  | Striped shiner        |
| <i>Labidesthes sicculus</i>     | Brook silverside      |
| <i>Notropis ardens</i>          | Rosefin shiner        |
| <i>Notropis atherinoides</i>    | Emerald shiner        |
| <i>Pimephales notatus</i>       | Bluntnose minnow      |
| <i>Fundulus notatus</i>         | Blackstripe topminnow |
| <i>Noturus flavus</i>           | Stonecat              |
| <i>Etheostoma blennioides</i>   | Greenside darter      |
| <i>Etheostoma flabellare</i>    | Fantail darter        |
| <i>Etheostoma nigrum</i>        | Johnny darter         |
| <i>Etheostoma spectabile</i>    | Orangethroat darter   |
| <i>Percina caprodes</i>         | Logperch              |