# **INDIANA DEPARTMENT OF TRANSPORTATION**



100 North Senate Avenue Room N925 CM Indianapolis, Indiana 46204 PHONE: (317) 232-5502 FAX: (317) 232-5551 Eric Holcomb, Governor Joe McGuinness, Commissioner

# FINAL DRAFT MINUTES

# July 16, 2020 Standards Committee Meeting

(Changes to the Agenda by the Action of the Committee shown as highlighted in yellow. No changes to the First Draft Minutes.)

August 6, 2020

TO: Standards Committee

FROM: Scott Trammell, Secretary

RE: Minutes from the July 16, 2020 Standards Committee Meeting

The Standards Committee meeting was called to order by Mr. Pankow, Chair, at 09:03 a.m. on July 16, 2020. This meeting was held virtually via *Microsoft Teams*. The meeting was adjourned at 10:21 a.m.

The following committee members were in attendance:

Gregory Pankow, Chairman, Director, Construction Management
John Wooden, Contract Administration Division
Dave Boruff, Traffic Engineering
Mark Orton, Bridge Design Division
Joseph Novak, Construction Management
Kumar Dave, Pavement Engineering, Highway Design
Jim Reilman, Materials Management
Michael Koch, District Construction, Fort Wayne District
Elena Veksler, Highway Design and Technical Support
Kurt Pelz, Construction Technical Support
Louis Feagans, Engineering and Asset Management

Also, in attendance were the following:

Wortkoetter, Andrew J., INDOT Trammel, Scott, INDOT Smutzer, Katherine, INDOT Podorvanova, Lana, INDOT White, Peter, INDOT Sumner, Rebecca, INDOT Popovich, Marko, CONTECH Phillips, Elizabeth, INDOT Pfeiffer, Nathaniel, INDOT

Leckie, John, ACPA Russell, Melissa, INDOT

Whitacre, Nate, INDOT

Hauser, Derrick, INDOT Fisher, Steve, INDOT

Duncan, Thomas, FHWA Corrice, Zachariah, INDOT Blanchard, Jacob, INDOT

Cosenza, Nicolas, INDOT

Seef, Erik, INDOT

Frederick, Jared, INDOT

Osborn, Dan, ICI

Kachler, Mischa, INDOT Siddiki, Nayyar, INDOT

Susong, John, Rinker Materials

Harris, Tom, INDOT Fegan, Roland, INDOT Culbertson, James, INDOT Bruno, Joseph E, INDOT Beeson, Matthew, INDOT

McNutt, Don, ACPA Spreen, Jason, INDOT Jacobs, David L, INDOT

The following items were discussed:

## A. GENERAL BUSINESS ITEMS

## **OLD BUSINESS**

(No items were listed)

## **NEW BUSINESS**

1. Approval of the Minutes from the June 18, 2020 meeting

DISCUSSION: Mr. Pankow requested a motion to approve the Minutes from the June 18, 2020

meeting. Mr. Bruno stated that the RPD for the TMAs has been updated.

Motion: Mr. Novak Second: Mr. Boruff

Ayes: 8 Nays: 0

**ACTION:** 

**PASSED AS SUBMITTED** 

## **B. CONCEPTUAL PROPOSAL ITEMS**

**OLD BUSINESS** 

(No items were listed)

**NEW BUSINESS** 

(No items were listed)

# <u>C. STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS</u> PROPOSED ITEMS

ח וט	<b>BUSINESS</b>
	DOSHNESS

(No items were listed)

## **NEW BUSINESS**

Item	No. 1	Mr. Reilman	pg 4
2020	Standard Specifications:		$\lambda \forall$
	SECTION 301	AGGREGATE BASE	
<mark>ACTI</mark>	ON:	PASSED AS REVISED	
<u>Item</u>	No. 2	Mr. Reilman	pg 10
2020	Standard Specifications:		
	105.02	Plans and Working Drawings	
<mark>ACTI</mark>	ON:	WITHDRAWN	
Item	No. 3	Mr. Pelz	pg 16
	ial Provision:	X	
•	107-x-xxx	MIGRATORY BIRD PROTECTION	
<mark>ACTI</mark>	ON:	WITHDRAWN	
<u>Item</u>	No. 4	Mr. Pelz	pg 22
Speci	ial provision:		
	601-x-xxx	HAND DIG GUARDRAIL POST HO	DLE NEAR
		UTILITIES	
<mark>ACTI(</mark>	ON:	PASSED AS REVISED	
Item	No. 5	Mr. Novak	pg 26
	Standard Specifications:		
X	615.14	Basis of Payment	
<mark>ACTI</mark>	ON:	PASSED AS REVISED	
	Committee Members FHWA		

### PROPOSAL TO STANDARDS COMMITTEE

PROBLEM(S) ENCOUNTERED: Specification 301 has language that references to Specification 203.24 and 207. Language in 301.06 required revision due to 203.24 (203-R-685) and 207 (207-R-687) revisions. Additional revisions were included for clarification purposes.

PROPOSED SOLUTION: Revise language in Specification 301 to maintain consistency with 203-R-685 and 207-R-687.

APPLICABLE STANDARD SPECIFICATIONS: 203.24, 207, 301

APPLICABLE STANDARD DRAWINGS: NA

APPLICABLE DESIGN MANUAL SECTION: NA

APPLICABLE SECTION OF GIFE: Yes

APPLICABLE RECURRING SPECIAL PROVISIONS: 301-R-688, 207-R-687, and 203-R-685

PAY ITEMS AFFECTED: NA

APPLICABLE SUB-COMMITTEE ENDORSEMENT: Ad hoc: Victoria Leffel, Jim Reilman, Nayyar Siddiki, Haiyan Yang

IMPACT ANALYSIS (attach report): NA

Submitted By: Jim Reilman for Nayyar Siddiki

Title: State Materials Engineer

Organization: Office of Materials & Tests

Phone Number: 317-522 9692

Date: 06/12/2020

#### STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO STANDARD SPECIFICATIONS** 

## IMPACT ANALYSIS REPORT CHECKLIST

Explain the business case as to why this item should be presented to the Standards Committee for approval. Answer the following questions with Yes, No or N/A.

Does this item appear in any other specification sections? No

Will approval of this item affect the Approved Materials List? No

Will this proposal improve:

Construction costs? Yes

Construction time? Yes

Customer satisfaction? Yes

Congestion/travel time? Na

Ride quality? Na

Will this proposal reduce operational costs or maintenance effort? Yes

Will this item improve safety:

For motorists? NA

For construction workers? NA

Will this proposal improve quality for:

Construction procedures/processes? yes

Asset preservation? NA

Design process? Yes

<u>Will this change provide the contractor more flexibility?</u> yes Will this proposal provide clarification for the Contractor and field personnel? Yes

Can this item improve/reduce the number of potential change orders? Is this proposal needed for compliance with:

Federal or State regulations? NA

AASHTO or other design code? NA

<u>Is this item editorial?</u> No

<u>Provide any further information as to why this proposal should be placed on the Standards Committee meeting Agenda:</u>

Date: 07/16/20

#### REVISION TO STANDARD SPECIFICATIONS AND SPECIAL PROVISION

SECTION 301 - AGGREGATE BASE

(Note: Approved changes by the Standards committee on the <u>June 20, 2019</u> meeting are shown in Special Provisions 301-R-688 AGGREGATE BASE. Proposed novel changes are shown highlighted gray)

The Standard Specifications are revised as follows:

SECTION 301, BEGIN LINE 1, DELETE AND INSERT AS FOLLOWS:

#### **SECTION 301 – AGGREGATE BASE**

## **301.01 Description**

This work shall consist of placing coarse aggregate on a prepared subgrade in accordance with 105.03.

#### **MATERIALS**

## 301.02 Materials

Materials shall be in accordance with the following:

Coarse Aggregate, Class D or Higher	904	
Geotextile Geosynthetic Materials	918	.02

ACBF shall not be used for subgrade treatment Types ID, IV, and IVA.

## **CONSTRUCTION REQUIREMENTS**

## **301.03 Preparation of Subgrade**

Subgrade shall be eompacted prepared in accordance with 207.04. In areas of 500 ft or less in length, or for temporary runarounds, proofrolling will not be required. Proofrolling will not be required in trench sections and other areas where proofrolling equipment cannot be used.

## **301.04 Temperature Limitations**

Aggregate shall not be placed when the air temperature is less than 35°F. Aggregate shall not be placed on a frozen subgrade. Frozen aggregate shall not be placed.

## 301.05 Spreading

The moisture content of dense graded the aggregate shall be between 4% and the optimum moisture content prior to placement when the aggregate is delivered to the project. Unless otherwise directed, water shall not be added to the aggregate on the grade. The aggregate shall be spread in uniform lifts with a spreading and leveling device approved by the Engineer. The spreading and leveling device shall be capable of placing aggregate to the depth, width, and slope specified. The compacted depth of each lift shall be a minimum of 3 in. and a maximum of 6 in. The aggregate shall be handled and transported to minimize segregation and the loss of moisture. In areas inaccessible to mechanical equipment, each lift shall be 3 in. and an approved hand spreading methods may be used.

Date: 07/16/20

#### REVISION TO STANDARD SPECIFICATIONS AND SPECIAL PROVISION

SECTION 301 - AGGREGATE BASE

The moisture content of the aggregate shall be between 4% and the optimum moisture content when the aggregate is delivered to the project. Water shall not be added to the aggregate on the grade.

## 301.06 Compacting

Dense graded aggregate shall be compacted to achieve the maximum-allowable average deflection as determined with the Light Weight Deflectometer, LWD, testing in accordance with ITM 508203.24(b). Compaction shall not occur if the moisture content of the aggregate is greater than 6.0%. The maximum allowable deflection will be determined from a test section or will be specified. Test sections shall be constructed in accordance with ITM 514 for other materials not included in Table 1 to determine the maximum allowable deflection. The optimum moisture content will be determined in accordance with 203.24(a).

Samples for moisture content testing shall be taken on the grade from the first truck of the day. The frequency of the moisture content test for aggregates will be one test for each day of aggregate placement. The maximum—allowable average deflection for aggregate over the chemically modified soils and untreated soils shall be in accordance with the following: Tables shown in 203.24(b).

Material Type	Maximum Allowable Deflection (mm)
Aggregate over Lime Modified Soil	0.30
Aggregate over Cement Modified Soil	0.27

Table 1

Acceptance of the compaction of aggregates will be determined by averaging three LWD tests obtained at a random station determined in accordance with ITM 802. The location of the three tests will be at 2 ft from each edge of the construction area and at 1/2 of the width of the construction area. The average deflection shall be equal to or less than the maximum allowable deflection allowed in Table 1 or determined by the test section. The frequency of the LWD testing will be three tests for each 800 t for compacted aggregate.

As an alternate, aggregates shall be compacted to a minimum of 100% of the maximum dry densities in accordance with AASHTO T 99. In situ density will be determined in accordance with 203.24(b). The aggregate shall meet the compaction requirements at the time subsequent courses are placed. In areas inaccessible to compaction equipment such as private drives, and mailbox approaches, and temporary runarounds, the compaction requirements may be accepted by visual inspection.

Coarse graded aggregates shall be compacted in accordance with 203.25.

#### REVISION TO STANDARD SPECIFICATIONS AND SPECIAL PROVISION

SECTION 301 - AGGREGATE BASE

approaches, and temporary runarounds, the compaction requirements may be accepted by visual inspection.

All displacement or rutting of the aggregate shall be repaired prior to placing subsequent material.

Coarse graded aggregates shall be compacted in accordance with 203.25. When specified, geotextiles shall be installed in accordance with 616.11.

## **301.07 Checking and Correcting Base**

The top of each aggregate course shall be checked transversely to the cross section and all deviations in excess of 1/2 in. shall be corrected. If additional aggregate is required, the course shall be remixed and re-compacted.

## **301.08 Priming**

A prime coat, when required, shall be in accordance with 405.

## **301.09 Method of Measurement**

Compacted aggregate base will be measured by the cubic yard based on the theoretical volume to the neat line as shown on the plans. Geotextiles will be measured in accordance with 616.12.

## **301.10 Basis of Payment**

The accepted quantities of compacted aggregate base will be paid for at the contract unit price per cubic yard, complete in place. Geotextiles will be paid for in accordance with 616.13.

Payment will be made under:

Pay Item	Pay Unit Symbol
Compacted Aggregate, No. 2	CYS
Compacted Aggregate, No. 5	CYS
Compacted Aggregate, No. 8	CYS
Compacted Aggregate, No. 53	

The cost of placing, compacting, water, aggregate placed outside neat lines as shown on the plans, and necessary incidentals shall be included in the cost of the pay item.

Payment will not be made for material placed outside of a 1:1 slope from the planned typical section.

Replacement of pavement damaged by the Contractor's operations shall be at no additional payment.

Item No. 1 (2020 SS) (contd.)

Mr. Reilman Date: 07/16/20

#### COMMENTS AND ACTION

SECTION 301 - AGGREGATE BASE

#### **DISCUSSION:**

This item was introduced and presented by Mr. Reilman, assisted by Mr. Siddiki, who explained that 301 contains language that references 203.24 and 207. The language in 301.06 required revisions due to the 203.24 revisions made in Recurring Special Provision 203-R-685 and also in the 207 revisions found in RSP 207-R-687. Additional revisions have also been included for clarification purposes.

Mr. Reilman proposed to revise the language in 301, as shown above, in order to maintain consistency with 203-R-685 and 207-R-687. Mr. Reilman also asked if we should be consistent with referring to grade or subgrade? Mr. Siddiki suggested we stay with the language as is since the terms involve different conditions.

Mr. Koch commented on the language in 301.05, saying that 4% to optimum is a good requirement provided we treat it as a goal and understand conditions could change during placement, and that aggregate suppliers should not provide powder/saturated aggregate. Mr. Koch asked if we could leave in "Unless otherwise directed", since water, beating, and baking is sometimes needed. Minor edits for clarification are as shown.

For the language in 301.06, Mr. Koch stated that stiffness can be achieved with vibrating plates for private drives, which is okay, but he is concerned with the temporary runarounds as they will experience mainline traffic. Large equipment should be able to access and compact a runaround. Mr. Reilman concurred, and the proposed revisions are as shown highlighted in yellow above. This item passed as revised.

Motion: Mr. Reilman Second: Mr. Dave Ayes: 8 Nays: 0 FHWA Approval: YES	Passed as Submitted  Passed as Revised  Withdrawn	
Standard Specifications Sections referenced and/or affected:  301 begin pg 249.	X 2022 Standard Specification  Revise Pay Items List	ons
Recurring Special Provision references in: 301-R-688 AGGREGATE BASE	Create RSP (No) Effective: RSP Sunset Date:	
Standard Drawing affected:  NONE	X Revise RSP (No. <u>301-R-688</u> Effective: <u>December 1, 20</u> RSP Sunset Date: <u>2022 SS</u>	<mark>20</mark>
Design Manual Sections affected:  NONE	Standard Drawing Effective:	
GIFE Sections cross-references:  TBD	Create RPD (No) Effective:	
.55	<ul><li>K</li><li>GIFE Update</li><li>SiteManager Update</li></ul>	

STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO STANDARD SPECIFICATIONS** 

## PROPOSAL TO STANDARDS COMMITTEE

<u>PROBLEM(S) ENCOUNTERED:</u> There have been occurrences where it has been apparent that design calculations that accompany working drawings have not been reviewed by another individual.

<u>PROPOSED SOLUTION:</u> Require an independent review of design calculations for working drawings by a second, qualified individual.

APPLICABLE STANDARD SPECIFICATIONS: 105.02

APPLICABLE STANDARD DRAWINGS: None

APPLICABLE DESIGN MANUAL SECTION: None

APPLICABLE SECTION OF GIFE: section 29

APPLICABLE RECURRING SPECIAL PROVISIONS: None

PAY ITEMS AFFECTED: None

APPLICABLE SUB-COMMITTEE ENDORSEMENT: Ad hoc: Jim Reilman, Pete White

## IMPACT ANALYSIS (attach report):

Submitted By: Jim Reilman

Title: State Materials Engineer

Organization: INDOT, Office of Materials & Tests

Phone Number: 317-522-9692

Date: 6/12/2020

#### STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO STANDARD SPECIFICATIONS** 

## **IMPACT ANALYSIS REPORT CHECKLIST**

Explain the business case as to why this item should be presented to the Standards Committee for approval. Answer the following questions with Yes, No or N/A.

<u>Does this item appear in any other specification sections?</u> No <u>Will approval of this item affect the Approved Materials List?</u> No Will this proposal improve:

Construction costs? N/A

Construction time? N/A

Customer satisfaction? N/A

Congestion/travel time? N/A

Ride quality? N/A

Will this proposal reduce operational costs or maintenance effort? N/A

Will this item improve safety:

For motorists? N/A

For construction workers? N/A

Will this proposal improve quality for:

Construction procedures/processes? Yes

Asset preservation? N/A

Design process? Yes

Will this change provide the contractor more flexibility? N/A

Will this proposal provide clarification for the Contractor and field personnel? Yes

Can this item improve/reduce the number of potential change orders? N/A

<u>Is this proposal needed for compliance with:</u>

Federal or State regulations? No

AASHTO or other design code? No

Is this item editorial? No

<u>Provide any further information as to why this proposal should be placed on the Standards Committee meeting Agenda:</u>

#### **REVISION TO STANDARD SPECIFICATIONS**

SECTION 105 - CONTROL OF WORK 105.02 Plans and Working Drawings

(Note: Proposed changes shown highlighted gray)

The Standard Specifications are revised as follows:

SECTION 105, BEGIN LINE 17, INSERT AS FOLLOWS:

## 105.02 Plans and Working Drawings

Road plans will show in detail structures of up to and including 20 ft spans, lines, grades, typical cross sections of the improvement, and general cross sections. They may also show general features of bridges. Bridge plans will show general plans and details of bridges.

Working drawings as defined in 101.74 shall be furnished.

Working drawings required for approval for construction purposes shall be submitted as soon as practical after contract award in a format acceptable to the Engineer. Working drawings will be reviewed for design features only. The Contractor shall be responsible for dimensions, accuracy, and fit of work. Welding symbols used on working drawings shall be those shown in AWS A2.4 standards.

Design calculations required for approval for construction purposes shall be submitted as soon as practical after contract award in a format acceptable to the Engineer. When requested, a longhand example of the design methodology shall be furnished if the design calculations are in a computer-printout format.

Working drawings and design calculations shall be signed by and shall bear the seal of a professional engineer. All working drawings and design calculations shall include the contract number, the Contractor's name, and contact person. All design calculations shall be independently reviewed for accuracy by a second qualified individual. This individual shall include their name and initials on the calculations. The qualifications of the independent reviewer shall be commensurate with the item being reviewed.

Working drawings shall be furnished for commercially available patented devices that appear on an approved list as published by the Department. Drawings shall be signed by and shall bear the seal of a licensed professional engineer. However, the professional engineer signing and stamping these drawings may be licensed in any state. Manufacturer's installation manuals shall be provided with the working drawings and will remain the property of the Department.

Working drawings and design calculations will be returned either approved or showing changes or corrections required within 14 calendar days of receipt. If required to be changed or corrected, the drawings shall be resubmitted until they receive approval.

Fabrication or construction shall not start on an item of work before working drawings are approved. Authorized alterations will be endorsed on approved plans or shown on supplementary sheets. All work done or material ordered prior to the approval

Item No. 2 (2020 SS) (contd.)

Mr. Reilman Date: 07/16/20

## **REVISION TO STANDARD SPECIFICATIONS**

SECTION 105 - CONTROL OF WORK 105.02 Plans and Working Drawings

of such plans and drawings shall be at the risk of the Contractor. Department approval of working drawings will not release the Contractor from the responsibility for errors, adequacy or safety of falsework, cofferdams, or other temporary work or risk in connection with the work. Prior to final acceptance the Contractor shall provide a copy of all approved working drawings, including all approved modifications.

Item No. 2 (2020 SS) (contd.)

Mr. Reilman Date: 07/16/20

#### **COMMENTS AND ACTION**

105.02 Plans and Working Drawings

#### **DISCUSSION:**

Mr. Reilman introduced and presented this item stating that there have been occurrences where it has been apparent that design calculations that accompany working drawings have not been reviewed by another individual.

Mr. Reilman proposed to require an independent review of design calculations for working drawings by a second, qualified individual.

Mr. Koch stated that our current working drawing process involves reviews by various engineering consultants depending upon the type of structure and application and asked if the independent review is required by code. Mr. Koch also asked if ICI or ACEC have reviewed this proposal.

Mr. Reilman responded that no, neither ICI or ACEC have seen this yet, and that the independent review is not required by code. This change was suggested by some of the consultant members that are part of the ASCE/INDOT Bridge Subcommittee. Mr. Reilman also stated that a second PE is not required, just a qualified individual. There have been occasions where submitted calculations contained basic errors that would have been caught by a second set of eyes.

Mr. White, prior to the meeting, concurred that it shouldn't be the responsibility of the Department to perform QC for the Contractor, but also understands Mr. Koch's concern about putting too many requirements on the reviewer. Mr. White also clarified that the intention is to weed out small errors and that the term "commensurate" implies that the reviewer have some level of competence applicable to the nature of the calculations.

Following much discussion concerning the language presented, Mr. Reilman withdrew this item pending further review.

## COMMENTS AND ACTION

105.02 Plans and Working Drawings

## [continued]

Motion: Mr. Reilman Second: Mr. Dave	Action:
Ayes:	Passed as Submitted
Nays:	Passed as Revised
FHWA Approval:	<u>X</u> Withdrawn
Standard Specifications Sections referenced and/or affected:	2022 Standard Specifications
	Revise Pay Items List
105.02 pg 44.	
Recurring Special Provision references in:	Create RSP (No)
g up	Effective:
NONE	RSP Sunset Date:
Standard Drawing affected:	
	Revise RSP (No)
NONE	Effective:
Design Manual Sections affected:	RSP Sunset Date:
Design Mandal Sections affected.	
NONE	Standard Drawing
	Effective:
GIFE Sections cross-references:	
	Create RPD (No)
SECTION 29	Effective:
	CIET II I I
	GIFE Update
	SiteManager Update

Mr. Pelz Date: 07/16/20

STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO SPECIAL PROVISION** 

## PROPOSAL TO THE STANDARDS COMMITTEE

<u>PROBLEM(S) ENCOUNTERED:</u> Unique Special Provisions are intended for a single use on a specific contract for a specific situation on the contract that is not already covered by the Standard Specification or a Special Provision. However, some USPs have been utilized quite frequently on numerous contracts and have become somewhat "standard".

<u>PROPOSED SOLUTION:</u> The proposed solution for this USP is to convert it to a Recurring Special Provision in order to expedite the process of implementing this Special Provision into future contracts, which will make it easier for the implementation of the Migratory Bird Protection special provision on contracts.

**APPLICABLE STANDARD SPECIFICATIONS:** 107

APPLICABLE STANDARD DRAWINGS:

**APPLICABLE DESIGN MANUAL SECTION:** 

**APPLICABLE SECTION OF GIFE:** 

APPLICABLE RECURRING SPECIAL PROVISIONS:

PAY ITEMS AFFECTED: None

<u>APPLICABLE SUB-COMMITTEE ENDORSEMENT:</u> Scott Trammell, Construction Specifications Engineer, and the USP Review Process, et al.

IMPACT ANALYSIS (attach report): Yes

Submitted By: Kurt Pelz,

Title: Technical Services Manager

Organization: Construction Management

Phone Number: 317-234-7726

Date: June 25, 2020

Mr. Pelz Date: 07/16/20

#### STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO SPECIAL PROVISION** 

## **IMPACT ANALYSIS REPORT CHECKLIST**

Explain the business case as to why this item should be presented to the Standards Committee for approval. Answer the following questions with Yes, No or N/A.

Does this item appear in any other specification sections? No. Will approval of this item affect the Approved Materials List? No Will this proposal improve:

Construction costs? Yes
Construction time? Yes
Customer satisfaction? Yes
Congestion/travel time? Yes
Ride quality? N/A

Will this proposal reduce operational costs or maintenance effort? Yes

Will this item improve safety:

<u>For motorists?</u> Yes For construction workers? Yes

Will this proposal improve quality for:

Construction procedures/processes? Yes Asset preservation? Yes Design process? N/A

Will this change provide the contractor more flexibility? Yes

Will this proposal provide clarification for the Contractor and field personnel? Yes

Can this item improve/reduce the number of potential change orders? Yes

Is this proposal needed for compliance with:

Federal or State regulations? Yes AASHTO or other design code? N/A

Is this item editorial? No

Provide any further information as to why this proposal should be placed on the Standards Committee meeting Agenda: For ease of use for implementation and to improve the USP Review Process flow capacity.

#### **REVISION TO SPECIAL PROVISION**

107-x-xxx MIGRATORY BIRD PROTECTION (PROPOSED NEW)

#### 107-x-xxx MIGRATORY BIRD PROTECTION

(Adopted xx-xx-20)

#### Description

This work shall consist of protecting migratory bird species as required by the Migratory Bird Treaty Act, MBTA, in accordance with 105.03.

#### Materials

Materials shall be as required and as described herein.

#### Construction Requirements

The bridge structures may, or may not, have shown evidence of use, such as nests, by a bird species protected under the MBTA during previous inspections. Every effort shall be made by the Contractor not to disturb any nests with eggs or young.

Intentional taking of migratory birds or nests with eggs or young without a federal permit is prohibited by the Migratory Bird Treaty Act, 16 U.S.C. 703-712.

During the period between May 1 and September 7, bridge work on structures with migratory birds will be allowed provided the procedure below is implemented:

No special action is necessary by the Contractor for bridge work performed entirely on the deck as long as the Contractor shall not require access to areas where birds are nesting and contract work will not result in the disturbance of nesting adults, or to their eggs or young. Disturbance is any activity that would result in reproductive failures or the killing of eggs or young.

For bridge structures that have previous or current evidence of nesting use and where work performed entirely on the deck which results in perforation of the deck, or creates strong vibrations that could potentially dislodge nests beneath the deck, or that requires activity above and below the deck including removal, shall require that the Contractor use exclusionary devices to deter birds from nesting beneath the deck prior to start of work. If birds are present, the Contractor shall determine the status of the birds, their nests, and young and shall take any and all actions necessary to meet the requirements of the MBTA.

For bridge work performed from September 8 to April 30, birds are normally not nesting; therefore, no special actions by the Contractor are necessary after an inspection is conducted to determine that no birds are present.

#### Avoidance and Minimization Measures

Measures designed to avoid and minimize impacts to migratory birds nesting on structures shall be implemented prior to April 30 and be maintained throughout the nesting season. The Contractor shall be responsible for developing a project specific avoidance and minimization

Date: 07/16/20

#### **REVISION TO SPECIAL PROVISION**

#### 107-x-xxx MIGRATORY BIRD PROTECTION (PROPOSED NEW)

plan that shall be as approved by the Engineer. Avoidance and minimization measures shall include, but shall not be limited to:

After inspection and confirmation that no active nests with eggs or young are present, the Contractor shall remove existing nests and other nesting debris from the bridge girders or other surfaces that will be impacted by the project.

After nest removal, exclusion devices shall be installed on the structure, especially if the start of construction will be delayed after April 30. Exclusion devices may include plastic sheeting, canvas, burlap, or other material to block access to the underside of bridges and exterior girders. Ledge protectors, such as coil and pin and wire, can be placed on structures to prevent nest building where appropriate. The use of weather resistant polypropylene netting with 1/4 in. or smaller openings is also an option but is not recommended since it can trap adult birds.

After nest removal, hazing or harassment devices using sight or sound to scare the birds away may be installed on the structure. Materials may include mylar flagging and auditory speakers. Other sensory deterrents such as active construction, predator models, scare balloons, and sonic devices may also be used.

The Contractor shall inspect the underside of the existing structure on a routine basis to ensure that nests are removed prior to egg laying and that exclusion devices that have been damaged are repaired. If eggs or young are present, construction activity that may impact those nests shall cease and the Department's Office of Environmental Services shall be contacted. No additional contract time will be granted if eggs or young are found.

If approved by the Engineer, the Contractor shall consider not removing nests that are near, but not in, the immediate work area. The nests may also be screened from construction to prevent impacts. Work may continue if the active nests will not be destroyed and if parent birds will not be precluded from tending their nests to the extent that eggs or young are negatively impacted.

#### Status of Birds and Nests

If birds penetrate the barrier or nest building has commenced, the Contractor shall determine how birds are entering the underside of the bridge and adjust or repair the barrier to prevent further access. If nest building or repair of existing nests has begun, but no eggs or young are present in the nests, based upon visual inspection of the nest and activity of the adults, the Contractor shall remove the nests.

Every effort shall be made by the Contractor not to disturb any nests with eggs or young. If active nests with eggs or young are found that would be affected by construction activities, work shall be delayed until an evaluation of nesting status and avoidance and minimization measures implemented or the birds fledge from the nest.

#### Method of Measurement

Monitoring the structures, removal of nests and the furnishing, installation, and removal of bird deterrents, and all other activities

Date: 07/16/20

#### **REVISION TO SPECIAL PROVISION**

## 107-x-xxx MIGRATORY BIRD PROTECTION (PROPOSED NEW)

associated with the migratory bird protection as described herein will not be measured for payment.

## Basis of Payment

All costs for determining the need for, the placing of deterrents, and all costs associated with conducting work in compliance with the Migratory Bird Treaty Act as stated herein will not be paid for separately but shall be included in the cost of other items.

Item No. 3 (2020 SS) (contd.)

Mr. Pelz Date: 07/16/20

#### COMMENTS AND ACTION

107-x-xxx MIGRATORY BIRD PROTECTION

## **DISCUSSION:**

This item was introduced and presented by Mr. Pelz who explained that some USPs have been utilized quite frequently on numerous contracts and have become somewhat "standard".

For this reason, Mr. Pelz proposed to convert this USP to a Recurring Special Provision in order to make it easier for the implementation of the Migratory Bird Protection special provision on contracts.

Ms. Smutzer questioned the language presented in this special provision and suggested that the Department's Environmental Division take another look at it.

Mr. Osborn expressed concern over possibly requiring that the Contractor have an expert on site. Mr. Pankow agreed that this needs to be looked into.

Following a discussion on who is responsible for implementing the procedures and that is determined, Mr. Pelz withdrew this item pending further review by Construction and the environmental subject matter experts.

Motion: Mr. Pelz Second: Mr. Reilman	Action:	
Ayes:		Passed as Submitted
Nays:		Passed as Revised
FHWA Approval:	X	Withdrawn
Standard Specifications Sections referenced and/or affected:		2022 Standard Specifications
Section 107.		Revise Pay Items List
Recurring Special Provision references in:	<u> </u>	Create RSP (No)
		Effective:
NONE		RSP Sunset Date:
Standard Drawing affected:		
	_	Revise RSP (No)
NONE		Effective:
		RSP Sunset Date:
Design Manual Sections affected:		
NONE		Standard Drawing
		Effective:
GIFE Sections cross-references:		
NONE	<b> </b> —	Create RPD (No)
NONE		Effective:
		GIFE Update
	_	SiteManager Update

Mr. Pelz Date: 07/16/20

STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO SPECIAL PROVISION** 

## PROPOSAL TO THE STANDARDS COMMITTEE

PROBLEM(S) ENCOUNTERED: Unique Special Provisions are intended for a single use on a specific contract for a specific situation on the contract that is not already covered by the Standard Specification or a Special Provision. However, some USPs have been utilized quite frequently on numerous contracts and have become somewhat "standard".

<u>PROPOSED SOLUTION:</u> The proposed solution for this USP is to convert it to a Recurring Special Provision in order to expedite the process of implementing this Special Provision into future contracts, which will make it easier for the implementation of requiring guardrail post holes be hand dug when the posts are located within the Tolerance Zone of a utility.

**APPLICABLE STANDARD SPECIFICATIONS: 601** 

APPLICABLE STANDARD DRAWINGS:

**APPLICABLE DESIGN MANUAL SECTION:** 

APPLICABLE SECTION OF GIFE:

APPLICABLE RECURRING SPECIAL PROVISIONS:

PAY ITEMS AFFECTED: Hand Dig Guardrail Post Hole

<u>APPLICABLE SUB-COMMITTEE ENDORSEMENT:</u> Scott Trammell, Construction Specifications Engineer, and the USP Review Process, et al.

**IMPACT ANALYSIS (attach report):** Yes

Submitted By: Kurt Pelz,

Title: Technical Services Manager

Organization: Construction Management

Phone Number: 317-234-7726

Date: June 24, 2020

Mr. Pelz Date: 07/16/20

#### STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO SPECIAL PROVISION** 

#### IMPACT ANALYSIS REPORT CHECKLIST

Explain the business case as to why this item should be presented to the Standards Committee for approval. Answer the following questions with Yes, No or N/A.

Does this item appear in any other specification sections? No, just 601.

Will approval of this item affect the Approved Materials List? No Will this proposal improve:

Construction costs? Yes

Construction time? Yes

Customer satisfaction? Yes

Congestion/travel time? Yes

Ride quality? N/A

Will this proposal reduce operational costs or maintenance effort? Yes

Will this item improve safety:

For motorists? Yes

For construction workers? Yes

Will this proposal improve quality for:

Construction procedures/processes? Yes

Asset preservation? Yes Design process? N/A

Will this change provide the contractor more flexibility? Yes

Will this proposal provide clarification for the Contractor and field personnel? Yes

Can this item improve/reduce the number of potential change orders? Yes

Is this proposal needed for compliance with:

 $\frac{\text{Federal or State regulations?}}{\text{AASHTO or other design code?}} Yes$ 

Is this item editorial? No

<u>Provide any further information as to why this proposal should be placed on the Standards Committee</u> <u>meeting Agenda:</u> For ease of use for implementation and to improve the USP Review Process flow capacity.

#### **REVISION TO SPECIAL PROVISION**

601-x-xxx HAND DIG GUARDRAIL POST HOLE NEAR UTILITIES (PROPOSED NEW)

601-x-xxx HAND DIG GUARDRAIL POST HOLE NEAR UTILITIES

(Adopted xx-xx-20)

#### Description

This work shall consist of hand digging guardrail post holes in accordance with 105.03. An undistributed quantity has been included in the contract for this work.

#### Materials

Materials shall be in accordance with 601.02.

#### Construction Requirements

When the posts are located within the Tolerance Zoneapproximate location of a utility in accordance with IC-8-1-26-2, 12 in. diameter holes shall be bored in accordance with 601.03 to the required embedment depth by use of hand tools or vacuum excavation, and backfilled with suitable material in accordance with 601.03. If there are 10 or more hand dug holes adjacent to each other, the hole shall be backfilled with removable flowable fill and the guardrail posts shall be placed immediately into the backfilled hole and braced until the flowable fill cures.

### Method of Measurement

The guardrail post holes will be measured per each hand dug post hole.

### Basis of Payment

The guardrail post holes will be paid for at the contract unit price per each hand dug post hole, complete in place.

Payment will be made under:

Pay Item			Pay	Unit	Symbol
Hand Dig	Guardrail	Post	Hole	E	ACH

The cost of the B-borrowbackfill material or removable flowable fill shall be included in the cost of Hand Dig Guardrail Post Hole.

Item No. 4 (2020 SS) (contd.) Mr. Pelz

Date: 07/16/20

#### COMMENTS AND ACTION

601-x-xxx HAND DIG GUARDRAIL POST HOLE NEAR UTILITIES

#### **DISCUSSION:**

Mr. Pelz introduced and presented this item reminding the committee that some USPs have been utilized quite frequently on numerous contracts and have become somewhat "standard".

Therefore, the proposed solution for this USP is to convert it to a Recurring Special Provision in order to expedite the process of implementing this Special Provision into future contracts, requiring that guardrail post holes be hand dug when the posts are located within the Tolerance Zone of a utility.

Clarification regarding the use of suitable materials for backfill has been incorporated as shown.

Following a brief discussion, it was decided to keep the language concerning undistributed quantities. Mr. Osborn suggested revising the language from Tolerance Zone, to approximate location, for clarification and consistency with IC-8-1-26-2, as shown.

Mr. Pelz revised his motion and this item passed as revised.

Motion: Mr. Pelz Second: Mr. Koch Ayes: 10 Nays: 0 FHWA Approval: YES	Action:	Passed as Submitted Passed as Revised Withdrawn
Standard Specifications Sections referenced and/or affected:  SECTION 601.	<u>x</u>	2022 Standard Specifications  Revise Pay Items List (to change pay item type)
Recurring Special Provision references in:  NONE	<u>x</u>	Create RSP (No. <u>601-R-721</u> ) Effective: <u>December 1, 2020</u> RSP Sunset Date:
Standard Drawing affected:  NONE  Design Manual Sections affected:	_	Revise RSP (No) Effective: RSP Sunset Date:
NONE GIFE Sections cross-references:	_	Standard Drawing Effective:
NONE	_	Create RPD (No) Effective:
7	_	GIFE Update SiteManager Update

Mr. Novak Date: 07/16/20

STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO STANDARD SPECIFICATIONS** 

## PROPOSAL TO STANDARDS COMMITTEE

PROBLEM(S) ENCOUNTERED: The current 615.14 specification has led to questionable interpretation as to how the placement of bench mark tablets in structures are paid for. 615.14 currently reads that the cost is included in the pay items within the 615 section of the specifications. However, there are bridge contracts that require the placement of bench mark tablets in accordance with 105.08 (Construction Engineering) but there are no 615 pay items in the contract.

<u>PROPOSED SOLUTION:</u> Revise 615.14 to state that the cost for placement of bench mark tablets in structures is included in the cost of the pay item Construction Engineering.

**APPLICABLE STANDARD SPECIFICATIONS: 615.14** 

APPLICABLE STANDARD DRAWINGS: N/A

APPLICABLE DESIGN MANUAL SECTION: N/A

APPLICABLE SECTION OF GIFE: N/A

APPLICABLE RECURRING SPECIAL PROVISIONS: N/A

PAY ITEMS AFFECTED: N/A

APPLICABLE SUB-COMMITTEE ENDORSEMENT: N/A

IMPACT ANALYSIS (attach report): N/A

Submitted By: Joseph Novak

Title: State Construction Engineer

Organization: Construction Management

Phone Number: 317-232-5456

Date: 6/25/2020

Mr. Novak Date: 07/16/20

#### STANDARD SPECIFICATIONS, SPECIAL PROVISIONS AND STANDARD DRAWINGS

**REVISION TO STANDARD SPECIFICATIONS** 

## **IMPACT ANALYSIS REPORT CHECKLIST**

Explain the business case as to why this item should be presented to the Standards Committee for approval. Answer the following questions with Yes, No or N/A.

<u>Does this item appear in any other specification sections?</u> NO <u>Will approval of this item affect the Approved Materials List?</u> NO Will this proposal improve:

Construction costs? NO

**Construction time?** NO

Customer satisfaction? NO

Congestion/travel time? NO

Ride quality? NO

Will this proposal reduce operational costs or maintenance effort? NO

Will this item improve safety:

For motorists? NO

For construction workers? NO

Will this proposal improve quality for:

Construction procedures/processes? YES

Asset preservation? NO

Design process? NO

Will this change provide the contractor more flexibility? NO

Will this proposal provide clarification for the Contractor and field personnel? YES

Can this item improve/reduce the number of potential change orders? YES

<u>Is this proposal needed for compliance with:</u>

Federal or State regulations? NO

AASHTO or other design code? NO

Is this item editorial? NO

<u>Provide any further information as to why this proposal should be placed on the Standards Committee meeting Agenda:</u>

Mr. Novak Date: 07/16/20

#### **REVISION TO STANDARD SPECIFICATIONS**

SECTION 615 - MONUMENTS, MARKERS, AND PARKING BARRIERS 615.14 Basis of Payment

(Note: Proposed changes shown highlighted gray)

The Standard Specifications are revised as follows:

SECTION 615, BEGIN LINE 170, DELETE AND INSERT AS FOLLOWS:

## 615.14 Basis of Payment

The acceptable quantities of right-of-way markers, reset right-of-way markers, monuments, re-established monuments, castings adjusted to grade monuments, bench mark posts, and reset bench mark posts, parking barriers, and reset parking barriers will be paid for at the contract unit price per each, complete in place.

Payment will be made under:

Pay Item	Pay Unit Symbol
Bench Mark Post	ЕАСН
Bench Mark Post, Reset	EACH
Casting Adjusted to Grade, Monument	
Monument,	EACH
type	
Monument, Re-Establish	EACH
Parking Barrier, Concrete	EACH
Parking Barrier, Reset	EACH
Parking Barrier, Timber Post	EACH
Right-of-Way Marker	EACH
Right-of-Way Marker, Reset	EACH

The cost of setting tablets in structures or bench mark posts, extensions for monuments, adjustment castings, backfill, disposal of surplus materials, re-establishing disturbed existing monuments, and all other necessary incidentals shall be included in the cost of the pay items in this section. The cost of setting tablets in bench mark posts or structures or bench mark posts shall be included in the cost of the pay item Construction Engineering.

The cost of existing parking barrier removal, storage, resetting, and all other necessary incidentals needed for resetting shall be included in the cost of parking barrier, reset. Existing barriers that are damaged by the Contractor shall be replaced with no additional payment.

Item No. 5 (2020 SS) (contd.)

Mr. Novak Date: 07/16/20

#### **COMMENTS AND ACTION**

615.14 Basis of Payment

#### **DISCUSSION:**

This item was introduced and presented by Mr. Novak who stated that the current 615.14 specification language has led to questionable interpretations as to how the placement of benchmark tablets in structures are paid to be for. The language in 615.14 currently reads that the cost is included in the pay items within the 615 section of the specifications. However, there are bridge contracts that require the placement of benchmark tablets in accordance with 105.08, Construction Engineering, but have no 615 pay items in the contract.

Mr. Novak proposed to revise 615.14 to state that the cost for placement of benchmark tablets in structures shall be included in the cost of the pay item Construction Engineering.

Mr. Koch asked if the Bench Mark Post pay items should be struck, and Mr. Novak replied that no, only the cost of setting the tablet is included in the cost of Construction Engineering. The Bench Mark Post pay items will remain. Mr. Koch asked if the proposed language could be revised for clarification. Revisions are as shown above.

There was no further discussion and this item passed as revised.

Motion: Mr. Novak Second: Mr. Koch	Action:	
Ayes: 10		Passed as Submitted
Nays: 0	X	Passed as Revised
FHWA Approval: <mark>YES</mark>		Withdrawn
Standard Specifications Sections referenced and/or affected:	<u>X</u>	2022 Standard Specifications
SECTION 615.14 pg 497.	-	Revise Pay Items List
Recurring Special Provision references in:	X	Create RSP (No. <u>615-R-720</u> )
		Effective: December 1, 2020
NONE		RSP Sunset Date: 2022 SS book
Standard Drawing affected:		
No		Revise RSP (No)
NONE		Effective:
Design Manual Sections affected:		RSP Sunset Date:
Design Mandal Sections affected.		
NONE		Standard Drawing Effective:
GIFE Sections cross-references:		Lineouve.
		Create RPD (No)
NONE		Effective:
		GIFE Update
	_	SiteManager Update