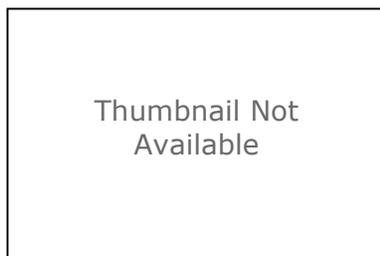


# Potentiometric Surface Map of the Unconsolidated Aquifers of Grant County

Shapefile



Tags

Potentiometric surface, static water level, groundwater, water wells, water tables, Grant County, Indiana, USA

## Summary

Display and/or analyses requiring spatial distribution of potentiometric surface elevations in Grant County.

## Description

This file is a digital geospatial polyline coverage of the unconsolidated potentiometric surface elevations mapped for Grant County, Indiana.

## Credits

There are no credits for this item.

## Use limitations

See access and use constraints information.

## Extent

**West** -85.869096 **East** -85.438671

**North** 40.656137 **South** 40.377240

## Scale Range

**Maximum (zoomed in)** 1:5,000

**Minimum (zoomed out)** 1:150,000,000

## ArcGIS Metadata ►

### Topics and Keywords ►

THEMES OR CATEGORIES OF THE RESOURCE **geoscientificInformation**

\* CONTENT TYPE **Downloadable Data**

EXPORT TO FGDC CSDGM XML FORMAT AS RESOURCE DESCRIPTION **No**

PLACE KEYWORDS **Grant County, Indiana, USA**

THEME KEYWORDS **Potentiometric surface, static water level, groundwater, water wells, water tables**

*Hide Topics and Keywords ▲*

### Citation ►

TITLE **Potentiometric Surface Map of the Unconsolidated Aquifers of Grant County**

PUBLICATION DATE **2013-10-01 00:00:00**

EDITION **1**

EDITION DATE **2013-10-01**

PRESENTATION FORMATS **\*digital map**

FGDC GEOSPATIAL PRESENTATION FORMAT **map**

SERIES

NAME Unconsolidated Potentiometric Surface Map

ISSUE PSM 33-A

OTHER CITATION DETAILS This map was compiled from multiple unpublished work maps based on USGS quadrangles at 1:24,000 scale: Fairmount, Gas City, Hartford City West, La Fontaine, Marion, Mount Etna, Point Isabel, Roll, Somerset, Sweetser, Van Buren, and Warren.

[Hide Citation ▲](#)

## Citation Contacts ►

### RESPONSIBLE PARTY

INDIVIDUAL'S NAME Glenn E. Grove

ORGANIZATION'S NAME Indiana Department of Natural Resources, Division of Water

CONTACT'S POSITION Resource Assessment Section

CONTACT'S ROLE originator

### CONTACT INFORMATION ►

#### PHONE

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#### ADDRESS

TYPE both

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[Hide Contact information ▲](#)

### RESPONSIBLE PARTY

ORGANIZATION'S NAME Indiana Department of Natural Resources, Division of Water

CONTACT'S ROLE publisher

### CONTACT INFORMATION ►

#### ADDRESS

DELIVERY POINT Indianapolis, Indiana, USA

[Hide Contact information ▲](#)

[Hide Citation Contacts ▲](#)

## Resource Details ►

DATASET LANGUAGES English (UNITED STATES)

DATASET CHARACTER SET utf8 - 8 bit UCS Transfer Format

STATUS completed

SPATIAL REPRESENTATION TYPE \*vector

### SPATIAL RESOLUTION

DATASET'S SCALE

SCALE DENOMINATOR 48000

\*PROCESSING ENVIRONMENT Microsoft Windows XP Version 5.1 (Build 2600) Service Pack 3; Esri ArcGIS 10.1.1.3143

## ARCGIS ITEM PROPERTIES

\* NAME UNC\_PSM\_Grant\_CO\_IN

\* SIZE 0.251

\* LOCATION file://

\\iotfilp19pw\dnr\dow\common\RA\_FILES\_ONLINE\33\_Grant\33\_Grant\_County\_PSM\_shapefiles\UNC\_PSM\_Grant\_CO\_IN.shp

\* ACCESS PROTOCOL Local Area Network

[Hide Resource Details ▲](#)

## Extents ►

### EXTENT

#### GEOGRAPHIC EXTENT

##### BOUNDING RECTANGLE

EXTENT TYPE Extent used for searching

\* WEST LONGITUDE -85.869096

\* EAST LONGITUDE -85.438671

\* NORTH LATITUDE 40.656137

\* SOUTH LATITUDE 40.377240

\* EXTENT CONTAINS THE RESOURCE Yes

#### TEMPORAL EXTENT

BEGINNING DATE 2013-10-01 00:00:00

ENDING DATE 2013-10-01 00:00:00

#### EXTENT IN THE ITEM'S COORDINATE SYSTEM

\* WEST LONGITUDE 595994.322800

\* EAST LONGITUDE 632002.494300

\* SOUTH LATITUDE 4470789.046100

\* NORTH LATITUDE 4501205.893600

\* EXTENT CONTAINS THE RESOURCE Yes

[Hide Extents ▲](#)

## Resource Points of Contact ►

### POINT OF CONTACT

INDIVIDUAL'S NAME Glenn E. Grove

ORGANIZATION'S NAME Indiana Department of Natural Resources, Division of Water

CONTACT'S POSITION Resource Assessment Section

#### CONTACT INFORMATION ►

##### PHONE

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[Hide Contact information ▲](#)

[Hide Resource Points of Contact ▲](#)

## Resource Maintenance ►

### RESOURCE MAINTENANCE

UPDATE FREQUENCY not planned

[Hide Resource Maintenance ▲](#)

## Resource Constraints ►

### CONSTRAINTS

#### LIMITATIONS OF USE

See access and use constraints information.

### LEGAL CONSTRAINTS

ACCESS CONSTRAINTS other restrictions

#### OTHER CONSTRAINTS

The Indiana Department of Natural Resources, Division of Water has compiled this data set using data believed to be reasonably accurate. However, the Division makes no representation as to the accuracy, completeness, or usefulness of the data or data set. A degree of error is inherent in all maps. This map is intended for use only at the published scale. Reference to any specific commercial product, process, or service does not constitute an endorsement, recommendation, or favoring by the Division. Copyright 2013, Indiana Department of Natural Resources, Division of Water All Rights Reserved Any copying, adaptation, or distribution of these data without the express written consent of the Indiana Department of Natural Resources, Division of Water is discouraged.

[Hide Resource Constraints ▲](#)

## Spatial Reference ►

### ARCGIS COORDINATE SYSTEM

- \*TYPE Projected
- \*GEOGRAPHIC COORDINATE REFERENCE GCS\_North\_American\_1983
- \*PROJECTION NAD\_1983\_UTM\_Zone\_16N
- \*COORDINATE REFERENCE DETAILS

#### PROJECTED COORDINATE SYSTEM

WELL-KNOWN IDENTIFIER 26916

X ORIGIN -5120900

Y ORIGIN -9998100

XY SCALE 450445547.3910538

Z ORIGIN -100000

Z SCALE 10000

M ORIGIN -100000

M SCALE 10000

XY TOLERANCE 0.001

Z TOLERANCE 0.001

M TOLERANCE 0.001

HIGH PRECISION true

LATEST WELL-KNOWN IDENTIFIER 26916

WELL-KNOWN TEXT PROJCS["NAD\_1983\_UTM\_Zone\_16N",GEOGCS["GCS\_North\_American\_1983",DATUM["D\_North\_American\_1983",SPHEROID["GRS\_1980",6378137.0,298.257222101]],PRIMEM["Greenwich",0.0],UNIT["Degree",0.0174532925199433]],PROJECTION["Transverse\_Mercator"],PARAMETER["False\_Easting",500000.0],PARAMETER["False\_Northing",0.0],PARAMETER["Central\_Meridian",-87.0],PARAMETER["Scale\_Factor",0.9996],PARAMETER["Latitude\_Of\_Origin",0.0],UNIT["Meter",1.0],AUTHORITY["EPSG",26916]]

### REFERENCE SYSTEM IDENTIFIER

- \*VALUE 26916
- \*CODESPACE EPSG
- \*VERSION 7.11.2

[Hide Spatial Reference ▲](#)

## Spatial Data Properties ►

## VECTOR ▶

\* LEVEL OF TOPOLOGY FOR THIS DATASET geometry only

### GEOMETRIC OBJECTS

FEATURE CLASS NAME UNC\_PSM\_Grant\_CO\_IN

\* OBJECT TYPE composite

\* OBJECT COUNT 29

[Hide Vector ▲](#)

## ARCGIS FEATURE CLASS PROPERTIES ▶

FEATURE CLASS NAME UNC\_PSM\_Grant\_CO\_IN

\* FEATURE TYPE Simple

\* GEOMETRY TYPE Polyline

\* HAS TOPOLOGY FALSE

\* FEATURE COUNT 29

\* SPATIAL INDEX TRUE

\* LINEAR REFERENCING FALSE

[Hide ArcGIS Feature Class Properties ▲](#)

[Hide Spatial Data Properties ▲](#)

## Data Quality ▶

### SCOPE OF QUALITY INFORMATION ▶

RESOURCE LEVEL dataset

[Hide Scope of quality information ▲](#)

### DATA QUALITY REPORT - COMPLETENESS OMISSION ▶

**MEASURE DESCRIPTION** In conducting the mapping, the author(s) evaluated hundreds of water well records, especially those having relatively complete information on well location, static water level, well depth, ground elevation, and lithology. There were areas in the county with sparse information because of lack of well records or incomplete records.

[Hide Data quality report - Completeness omission ▲](#)

### DATA QUALITY REPORT - QUANTITATIVE ATTRIBUTE ACCURACY ▶

**MEASURE DESCRIPTION** The mapping was conducted after a thorough documentation of well locations and water well record details.

[Hide Data quality report - Quantitative attribute accuracy ▲](#)

### DATA QUALITY REPORT - ABSOLUTE EXTERNAL POSITIONAL ACCURACY ▶

**MEASURE DESCRIPTION** The locations of many wells were field checked and the locations posted on 7.5 minute topographic maps. Visual confirmation of wells was not always possible. Many locations were based only on the street address, driving directions, or other location information provided on the well record.

[Hide Data quality report - Absolute external positional accuracy ▲](#)

[Hide Data Quality ▲](#)

## Lineage ▶

### PROCESS STEP ▶

**DESCRIPTION** After selection of water well records was complete, specific well data and other maps and reports were considered in the mapping process. For example, ground elevation, static water level, well depth, aquifer top and bottom elevation and lithology were obtained from well records. Other maps and reports included regional potentiometric surface elevations, hydrogeologic settings, groundwater availability, bedrock topography, and surface topography.

[Hide Process step ▲](#)

PROCESS STEP ►

DESCRIPTION Data were selected by careful evaluation of water well records to determine if the wells were field located and if they contained complete and reasonable information.

[Hide Process step ▲](#)

PROCESS STEP ►

RATIONALE A polyline coverage was created using the heads-up method and attributed by Glenn E. Grove. Attribute definitions are described below.

[Hide Process step ▲](#)

SOURCE DATA ►

DESCRIPTION Water well records from the IDNR-DOW well record database; USGS topography maps; various consultant geotechnical reports

SOURCE CITATION ►

TITLE Potentiometric Surface Map of the Unconsolidated Aquifers of Grant County, Indiana

PUBLICATION DATE 2013-10-01 00:00:00

EDITION 1

EDITION DATE 2013-10-01

SERIES

NAME Unconsolidated Potentiometric Surface Map

ISSUE PSM 33-A

RESPONSIBLE PARTY

INDIVIDUAL'S NAME Glenn E. Grove

ORGANIZATION'S NAME Indiana Department of Natural Resources, Division of Water

CONTACT'S POSITION Resource Assessment Section

CONTACT'S ROLE originator

RESPONSIBLE PARTY

ORGANIZATION'S NAME Indiana Department of Natural Resources, Division of Water

CONTACT'S ROLE publisher

[Hide Source citation ▲](#)

[Hide Source data ▲](#)

[Hide Lineage ▲](#)

## Distribution ►

DISTRIBUTOR ►

CONTACT INFORMATION

INDIVIDUAL'S NAME Glenn E. Grove

ORGANIZATION'S NAME Indiana Department of Natural Resources, Division of Water

CONTACT'S POSITION Resource Assessment Section

CONTACT'S ROLE distributor

CONTACT INFORMATION ►

PHONE

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[Hide Contact information ▲](#)

[Hide Distributor ▲](#)

#### DISTRIBUTION FORMAT

\*NAME Shapefile

VERSION Digital

#### TRANSFER OPTIONS

\*TRANSFER SIZE 0.251

#### ONLINE SOURCE

LOCATION <http://www.in.gov/dnr/water/7256.htm>

[Hide Distribution ▲](#)

## Fields ►

#### DETAILS FOR OBJECT [UNC\\_PSM\\_Grant\\_CO\\_IN ►](#)

\*TYPE Feature Class

\*ROW COUNT 29

#### FIELD FID ►

\*ALIAS FID

\*DATA TYPE OID

\*WIDTH 4

\*PRECISION 0

\*SCALE 0

\*FIELD DESCRIPTION

Internal feature number.

\*DESCRIPTION SOURCE

ESRI

\*DESCRIPTION OF VALUES Sequential unique whole numbers that are automatically generated.

[Hide Field FID ▲](#)

#### FIELD Shape ►

\*ALIAS Shape

\*DATA TYPE Geometry

\*WIDTH 0

\*PRECISION 0

\*SCALE 0

\*FIELD DESCRIPTION

Feature geometry.

\*DESCRIPTION SOURCE

ESRI

\* DESCRIPTION OF VALUES Coordinates defining the features.

[Hide Field Shape ▲](#)

FIELD STATIC\_E ►

\* ALIAS static\_e  
\* DATA TYPE SmallInteger  
\* WIDTH 4  
\* PRECISION 4  
\* SCALE 0

FIELD DESCRIPTION  
Potentiometric surface in feet

DESCRIPTION SOURCE  
IDNR

[Hide Field STATIC\\_E ▲](#)

[Hide Details for object UNC\\_PSM\\_Grant\\_CO\\_IN ▲](#)

[Hide Fields ▲](#)

**Metadata Details ►**

\* METADATA LANGUAGE English (UNITED STATES)  
METADATA CHARACTER SET utf8 - 8 bit UCS Transfer Format

SCOPE OF THE DATA DESCRIBED BY THE METADATA \* dataset  
SCOPE NAME \* dataset

LAST UPDATE 2013-10-01

ARCGIS METADATA PROPERTIES

METADATA FORMAT ArcGIS 1.0  
METADATA STYLE FGDC CSDGM Metadata  
STANDARD OR PROFILE USED TO EDIT METADATA FGDC

CREATED IN ARCGIS FOR THE ITEM 2013-11-14 11:39:20  
LAST MODIFIED IN ARCGIS FOR THE ITEM 2013-12-12 07:21:55

AUTOMATIC UPDATES  
HAVE BEEN PERFORMED Yes  
LAST UPDATE 2013-12-12 07:21:55

[Hide Metadata Details ▲](#)

**Metadata Contacts ►**

METADATA CONTACT

INDIVIDUAL'S NAME Glenn E. Grove  
ORGANIZATION'S NAME Indiana Department of Natural Resources, Division of Water  
CONTACT'S POSITION Resource Assessment Section  
CONTACT'S ROLE point of contact

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[Hide Contact information ▲](#)

[Hide Metadata Contacts ▲](#)

## Metadata Maintenance ►

#### MAINTENANCE

UPDATE FREQUENCY not planned

[Hide Metadata Maintenance ▲](#)

## Metadata Constraints ►

#### LEGAL CONSTRAINTS

ACCESS CONSTRAINTS other restrictions

#### OTHER CONSTRAINTS

Access constraints: This metadata file is intended to accompany the subject geospatial set. This file may be updated, and the most recent version is available by contacting the IDNR Division of Water.

[Hide Metadata Constraints ▲](#)

## FGDC Metadata (read-only) ▼