

APPENDIX B

MICHIGAN NATURAL FEATURES INVENTORY INFORMATION REQUEST

Michigan Natural Features Inventory Information Request

Requestor: **Stephanie Kozlowicz - URS**

Project: **Grayling Township**

Location: **T26N R03W Sec. 4,5,6,7,8,9 and surrounding sections.**

Request submission date: **November 28, 2011**

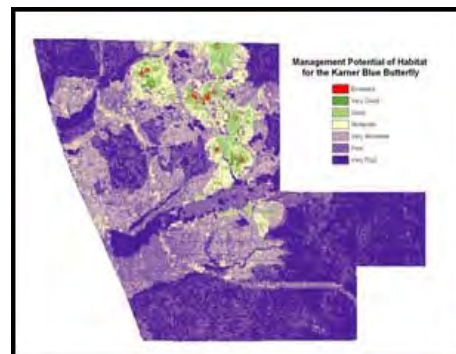
Print Date: **November 28, 2011**

Detailed information on the species listed in this report can be found in abstracts and the rare species explorer on the Michigan Natural Features Inventory (MNFI) website. The MNFI website can be found at: <http://www.msue.msu.edu/mnfi>

The species in this report are listed alphabetically by scientific name. Each record from the database is listed individually. Therefore you may see multiple listings for the same species. The locational and survey date information may be the only differentiating factors when looking at multiple occurrences for a given species. Heritage methodology is followed when entering species occurrences into the MNFI database. Detailed information on heritage methodology can be obtained on NatureServe's website at the link listed below.

<http://www.natureserve.org/prodServices/heritagemethodology.jsp>

By acceptance of the information services made available through MNFI the recipient understands that access to the information is provided for primary use only. MNFI requests that the user respect the confidential and sensitive nature of the information. There should be no redistribution of the information. Indiscriminate distribution of information regarding locations of many rare species represents a threat to their protection. Additionally, since the information is constantly being updated MNFI requests that any information service provided by MNFI is destroyed upon completion of the primary use. This information should be considered valid for one year only.



Alasmidonta viridis

Slippershell

Invertebrate Animal

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G4G5	STATE RANK: S2S3	LAST OBSERVED DATE: 1934-09-19
------------------------	------------------------	--------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T26NR03W 7, 8

Appalachia arcana

Secretive locust

Invertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G2G3	STATE RANK: S2S3	LAST OBSERVED DATE: 1951-08-04
------------------------	-------------------------	--------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T26NR03W 3, 4, 5, 8, 9, 10, 15, 16, 17

Brachionycha borealis

Boreal brachionyncha

Invertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G4	STATE RANK: S1S2	LAST OBSERVED DATE: 1989-04-13
------------------------	-------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408456/Pere Cheney

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T26NR03W 29, 31, 32

Calypso bulbosa

Calypso or fairy-slipper

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S2	LAST OBSERVED DATE: 1887-05-16
------------------------	------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T26NR03W 6, 7, 8, 17, 18, 19

T26NR04W 1, 11, 12, 13, 14, 24

Cirsium hillii

Hill's thistle

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 1992-07-30
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake, 4408475/K P Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T26NR02W 5

T27NR02W 4, 8, 14, 15, 17, 19, 20, 22, 29, 32

T28NR02W 35

Cirsium hillii

Hill's thistle

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 1992-10-26
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T26NR03W	6
T26NR04W	1
T27NR03W	31
T27NR04W	36

Cirsium hillii

Hill's thistle

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 2008-06-18
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408456/Pere Cheney

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T25NR03W	3
T26NR03W	34

Cirsium hillii

Hill's thistle

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 2008-07-13
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake, 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T26NR03W 11, 12

Cirsium hillii

Hill's thistle

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 1993-09-28
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408456/Pere Cheney

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T26NR04W 36

Cirsium hillii

Hill's thistle

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 1993-07-30
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling, 4408465/Wakeley Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 13, 14

Cirsium hillii

Hill's thistle

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 1998-08-07
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 20

Dalibarda repens

False violet

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S1S2	LAST OBSERVED DATE: 1975-08-24
------------------------	------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake, 4408466/Grayling, 4408476/Big Bradford Lake, 4408475/K P Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 10, 11, 12, 13, 14, 15, 22, 23, 24

Dendroica kirtlandii

Kirtland's warbler

Vertebrate Animal

FEDERAL STATUS: LE	STATE STATUS: E	GLOBAL RANK: G1	STATE RANK: S1	LAST OBSERVED DATE: 2010
---------------------------	------------------------	------------------------	-----------------------	---------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408462/Mio, 4408463/Red Oak, 4408472/Oak Lake, 4408473/Comstock Hills, 4408466/Grayling, 4408464/Luzerne NW, 4408465/Wakeley Lake, 4408475/K P Lake, 4408474/Lovells, 4408456/Pere Cheney, 4408455/Roscommon North, 4408484/Johannesburg

COUNTY: Crawford, Montmorency, Oscoda, Otsego

WATERSHED: Au Sable

TOWN RANGE	SECTIONS
T25NR02W	2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 14, 15, 16, 17, 20, 21, 22
T25NR03W	1, 2, 3, 4, 12
T26NR01E	2, 3, 4, 5, 6, 7, 8
T26NR01W	2, 3
T26NR02W	2, 3, 4, 5, 6, 7, 8, 18, 19, 27, 28, 29, 30, 31, 32, 33, 34
T26NR03W	1, 2, 3, 9, 10, 11, 12, 13, 14, 15, 16, 21, 22, 23, 24, 25, 26, 27, 33, 34, 35, 36
T27NR01E	1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 22, 23, 24, 29, 30, 31, 32, 33, 34, 35
T27NR01W	1, 3, 4, 5, 7, 8, 9, 10, 12, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 32, 33, 34, 35, 36
T27NR02E	5, 6, 7, 8, 17, 18, 19
T27NR02W	4, 5, 6, 7, 8, 9, 11, 13, 14, 16, 17, 18, 19, 20, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35
T27NR03W	13, 24, 25, 34, 35, 36
T28NR01E	7, 8, 17, 18, 19, 20, 28, 29, 30, 31, 32, 33, 35, 36
T28NR01W	1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 32, 33, 34, 36
T28NR02W	1, 12, 13
T29NR01E	31
T29NR01W	17, 19, 20, 21, 22, 23, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36
T29NR02W	36

Dry Northern Forest

Dry Woodland, Upper Midwest Type

Terrestrial Community - Other Cla

FEDERAL STATUS:	STATE STATUS:	GLOBAL RANK: G3?	STATE RANK: S3	LAST OBSERVED DATE: 2009-07-14
------------------------	----------------------	-------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 11, 14

Dry-mesic Northern Forest

Terrestrial Community - Other Cla

FEDERAL STATUS:	STATE STATUS:	GLOBAL RANK: G4	STATE RANK: S3	LAST OBSERVED DATE: 2009-07-14
------------------------	----------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 15

Dry-mesic Northern Forest

Terrestrial Community - Other Cla

FEDERAL STATUS:	STATE STATUS:	GLOBAL RANK: G4	STATE RANK: S3	LAST OBSERVED DATE: 2009-09-03
------------------------	----------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling, 4408476/Big Bradford Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 11, 14

Emydoidea blandingii

Blanding's turtle

Vertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G4	STATE RANK: S3	LAST OBSERVED DATE: 2002-05-07
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 14, 15

Festuca scabrella

Rough fescue

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S2S3	LAST OBSERVED DATE: 1994
------------------------	------------------------	------------------------	-------------------------	---------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake, 4408475/K P Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR02W 8, 9, 10, 14, 15, 17, 18, 19, 20, 21, 22, 27, 29, 32

Festuca scabrella

Rough fescue

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S2S3	LAST OBSERVED DATE: 1992-07-22
------------------------	------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 14

Festuca scabrella

Rough fescue

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S2S3	LAST OBSERVED DATE: 1999-06-18
------------------------	------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T26NR03W 12, 13

Festuca scabrella

Rough fescue

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S2S3	LAST OBSERVED DATE: 2007-06-07
------------------------	------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408456/Pere Cheney

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T25NR03W 3

T26NR03W 34

Festuca scabrella

Rough fescue

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S2S3	LAST OBSERVED DATE: 1993-07-30
------------------------	------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 12, 13

Festuca scabrella

Rough fescue

Vascular Plant

FEDERAL STATUS:	STATE STATUS: T	GLOBAL RANK: G5	STATE RANK: S2S3	LAST OBSERVED DATE: 2004-10-20
------------------------	------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 36

Haliaeetus leucocephalus

Bald eagle

Vertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G5	STATE RANK: S4	LAST OBSERVED DATE: 2005-06-16
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408467/Lake Margrethe

COUNTY: Crawford

WATERSHED: Manistee, Au Sable

TOWN RANGE SECTIONS

T26NR04W 3, 4, 10, 11, 16, 21

T27NR04W 23

Haliaeetus leucocephalus

Bald eagle

Vertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G5	STATE RANK: S4	LAST OBSERVED DATE: 1979
------------------------	-------------------------	------------------------	-----------------------	---------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 10, 15, 16

Intermittent Wetland

Infertile Pond/marsh, Great Lakes Type

Terrestrial Community - Other Cla

FEDERAL STATUS:	STATE STATUS:	GLOBAL RANK: G2	STATE RANK: S3	LAST OBSERVED DATE: 2006-08-10
------------------------	----------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408467/Lake Margrethe

COUNTY: Crawford

WATERSHED: Au Sable, Manistee

TOWN RANGE **SECTIONS**

T26NR04W 2, 3, 4

Lycopodiella subappressa

Northern appressed clubmoss

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G2	STATE RANK: S2	LAST OBSERVED DATE: 1993-10-31
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W 29, 30

Northern Fen

Alkaline Shrub/herb Fen, Upper Midwest Type Terrestrial Community - Other Cla

FEDERAL STATUS:	STATE STATUS:	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 2004-07-28
------------------------	----------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR02W 19

Northern Shrub Thicket

Wet Scrubland, Upper Midwest Type

Terrestrial Community - Other Cla

FEDERAL STATUS:	STATE STATUS:	GLOBAL RANK: G4	STATE RANK: S5	LAST OBSERVED DATE: 2009-09-03
------------------------	----------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 14, 23

Pandion haliaetus

Osprey

Vertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G5	STATE RANK: S4	LAST OBSERVED DATE: 1994-05-24
------------------------	-------------------------	------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T26NR03W 7

Prosapia ignipectus

Red-legged spittlebug

Invertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G4	STATE RANK: S2S3	LAST OBSERVED DATE: 1998-08-07
------------------------	-------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 14

Prosapia ignipectus

Red-legged spittlebug

Invertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G4	STATE RANK: S2S3	LAST OBSERVED DATE: 1998-08-07
------------------------	-------------------------	------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 20

Prunus alleghaniensis var. davisii

Alleghany or Sloe plum

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G4T3Q	STATE RANK: S3	LAST OBSERVED DATE: 1993-05-26
------------------------	-------------------------	---------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408465/Wakeley Lake, 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T26NR03W 1, 2

T27NR03W 36

Prunus alleghaniensis var. davisii

Alleghany or Sloe plum

Vascular Plant

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G4T3Q	STATE RANK: S3	LAST OBSERVED DATE: 1992-05-19
------------------------	-------------------------	---------------------------	-----------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T26NR03W 5, 6

T27NR03W 19, 20, 21, 28, 29, 30, 31, 32, 33

T27NR04W 25, 36

Pyrgus wyandot

Grizzled skipper

Invertebrate Animal

FEDERAL STATUS:	STATE STATUS: SC	GLOBAL RANK: G1G2Q	STATE RANK: S1S2	LAST OBSERVED DATE: 1965
------------------------	-------------------------	---------------------------	-------------------------	---------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE SECTIONS

T27NR03W 15

Sistrurus catenatus catenatus

Eastern massasauga

Vertebrate Animal

FEDERAL STATUS: C	STATE STATUS: SC	GLOBAL RANK: G3G4T3T4	STATE RANK: S3S4	LAST OBSERVED DATE: 2006-08-06
--------------------------	-------------------------	------------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling, 4408467/Lake Margrethe, 4408476/Big Bradford Lake, 4408468/Black Creek,

COUNTY: Crawford, Kalkaska 4408478/Starvation Lake, 4408477/Frederic

WATERSHED: Au Sable, Manistee

TOWN RANGE SECTIONS

T26NR04W 2, 3, 4, 5, 6, 7, 8

T26NR05W 1, 2

T27NR04W 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35

T27NR05W 1, 2, 3, 4, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 21, 22, 23, 24, 25, 26, 27, 28, 34, 35, 36

T28NR04W 19, 20, 21, 22, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36

T28NR05W 23, 24, 25, 26, 27, 28, 33, 34, 35, 36

Sistrurus catenatus catenatus

Eastern massasauga

Vertebrate Animal

FEDERAL STATUS: C	STATE STATUS: SC	GLOBAL RANK: G3G4T3T4	STATE RANK: S3S4	LAST OBSERVED DATE: 1982-07-15
--------------------------	-------------------------	------------------------------	-------------------------	---------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408467/Lake Margrethe, 4408466/Grayling, 4408457/Cote Dame Marie, 4408456/Pere Cheney, 4408455/Roscommon North, 4408465/Wakeley Lake

COUNTY: Crawford

WATERSHED: Au Sable, Manistee

TOWN RANGE **SECTIONS**

T25NR03W	2, 3, 4, 5, 6
T25NR04W	1
T26NR02W	5, 6, 7, 8, 17, 18, 19, 20, 30
T26NR03W	1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36
T26NR04W	1, 2, 3, 10, 11, 12, 13, 14, 15, 22, 23, 24, 25, 26, 27, 35, 36
T27NR02W	30, 31
T27NR03W	15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36
T27NR04W	23, 24, 25, 26, 27, 34, 35, 36

Sistrurus catenatus catenatus

Eastern massasauga

Vertebrate Animal

FEDERAL STATUS: C	STATE STATUS: SC	GLOBAL RANK: G3G4T3T4	STATE RANK: S3S4	LAST OBSERVED DATE: 1990-06
--------------------------	-------------------------	------------------------------	-------------------------	------------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T27NR03W	14, 23
----------	--------

Solidago houghtonii

Houghton's goldenrod

Vascular Plant

FEDERAL STATUS: LT	STATE STATUS: T	GLOBAL RANK: G3	STATE RANK: S3	LAST OBSERVED DATE: 2010-08-31
--------------------	-----------------	-----------------	----------------	--------------------------------

USGS TOPOQUAD MAPSHEET CODE/NAME: 4408466/Grayling

COUNTY: Crawford

WATERSHED: Au Sable

TOWN RANGE **SECTIONS**

T26NR04W 11, 12, 13, 14

Michigan Natural Features Inventory Information Request

Print Date: November 28, 2011
Information valid for one year.

Enclosed is the data requested from Michigan Natural Features Inventory (MNFI). This information is a list of Element Occurrences (EO) at the section level. In some cases, the extent of an animal's range or a community type may extend past the sections listed.

The MNFI database is an ongoing and continuously updated information base. The database is the only comprehensive single source of existing information on Michigan's endangered, threatened, or otherwise significant plant and animal species, natural plant communities, and other natural features. This database cannot provide a definitive statement on the presence, absence, or condition of the natural features in any given locality, since most sites have not been specifically or thoroughly surveyed for their occurrence. Furthermore, plant and animal populations and natural communities change with time. Therefore, the information services provided should not be regarded as a complete statement on the occurrence of special natural features of the area in question. In many cases the information may require the interpretation of a trained scientist.

The recipient(s) of the information understand that state endangered and threatened species are protected under state law (Act 451 of 1994, the Natural Resources and Environmental Protection Act, Part 365, Endangered Species Protection). Any questions, observations, new findings, violations or clearance of project activities should be conducted with the Michigan Department of Natural Resources, Wildlife Division. Contact Lori Sargent or Todd Hogrefe at (517) 373-1263. The recipient(s) of the information understand that federally endangered and threatened species are protected under federal law (Endangered Species Act of 1973). Any questions, observations, new findings, violations or clearance of project activities should be conducted with the U.S. Fish and Wildlife Service in East Lansing. Their phone number is (517) 351-2555. Recipients of the information are responsible for ensuring the protection of protected species and obtaining proper clearance before project activities begin.

By acceptance of the information services made available through MNFI the recipient understands that access to the information is provided for primary use only. MNFI requests that the user respect the confidential and sensitive nature of the information. There should be no redistribution of the information. Indiscriminate distribution of information regarding locations of many rare species represents a threat to their protection. Additionally, since the information is constantly being updated MNFI requests that any information service provided by MNFI is destroyed upon completion of the primary use. This information should be considered valid for one year only.

This information is used to guide conservation and land management activities. Some of the element records are historical. While this information may not be important for regulatory purposes, it is important for management and restoration purposes and for scientific use.

State Protection Status Code Definitions

E = Endangered
T = Threatened
SC = Special concern
X = Presumed extirpated (legally 'threatened' if rediscovered)

Federal Protection Status Code Definitions

LE = Listed endangered
LT = Listed threatened
LELT = Partly listed endangered and partly listed threatened
PDL = Proposed delist
E(S/A) = Endangered based on similarities/appearance
PS = Partial status (federally listed in only part of its range)
C = Species being considered for federal status

Global Heritage Status Rank Definitions

The priority assigned by [NatureServe <http://www.natureserve.org>](http://www.natureserve.org)'s national office for data collection and protection based upon the element's status throughout its entire world-wide range. Criteria not based only on number of occurrences; other critical factors also apply. Note that ranks are frequently combined.

G1 = Critically imperiled globally because of extreme rarity (5 or fewer occurrences range-wide or very few remaining individuals or acres) or because of some factor(s) making it especially vulnerable to extinction.
G2 = Imperiled globally because of rarity (6 to 20 occurrences or few remaining individuals or acres) or because of some factor(s) making it very vulnerable to extinction throughout its range.
G3 = Either very rare and local throughout its range or found locally (even abundantly at some of its locations) in a restricted range (e.g. a single western state, a physiographic region in the East) or because of other factor(s) making it vulnerable to extinction throughout its range; in terms of occurrences, in the range of 21 to 100.
G4 = Apparently secure globally, though it may be quite rare in parts of its range, especially at the periphery.
G5 = Demonstrably secure globally, though it may be quite rare in parts of its range, especially at the periphery.
GH = Of historical occurrence throughout its range, i.e. formerly part of the established biota, with the expectation that it may be rediscovered (e.g. Bachman's Warbler).
GU = Possibly in peril range-wide, but status uncertain; need more information.
GX = Believed to be extinct throughout its range (e.g. Passenger Pigeon with virtually no likelihood that it will be rediscovered).
G? = Incomplete data
Q = Taxonomy uncertain
T = Subspecies
U = Unmappable through out the global geographic extent
? = Questionable

Subnational Heritage Status Rank Definitions

The priority assigned by the Michigan Natural Features Inventory for data collection and protection based upon the element's status within the state. Criteria not based only on number of occurrences; other critical factors also apply. Note that ranks are frequently combined.

S1 = Critically imperiled in the state because of extreme rarity (5 or fewer occurrences or very few remaining individuals or acres) or because of some factor(s) making it especially vulnerable to extirpation in the state.
S2 = Imperiled in state because of rarity (6 to 20 occurrences or few remaining individuals or acres) or because of some factor(s) making it very vulnerable to extirpation from the state.
S3 = Rare or uncommon in state (on the order of 21 to 100 occurrences).
S4 = Apparently secure in state, with many occurrences.
S5 = Demonstrably secure in state and essentially ineradicable under present conditions.
SA = Accidental in state, including species (usually birds or butterflies) recorded once or twice or only at very great intervals, hundreds or even thousands of miles outside their usual range.
SE = An exotic established in the state; may be native elsewhere in North America (e.g. house finch or catalpa in eastern states).
SH = Of historical occurrence in state and suspected to be still extant.
SN = Regularly occurring, usually migratory and typically nonbreeding species.
SR = Reported from state, but without persuasive documentation which would provide a basis for either accepting or rejecting the report.
SRF = Reported falsely (in error) from state but this error persisting in the literature.
SU = Possibly in peril in state, but status uncertain; need more information.
SX = Apparently extirpated from state.