

Michigan's State Threatened & Endangered Species Permitting Process for Local Agency Transportation Programs

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Responsibilities

Statewide Scope

Delegated authority for
administration of Part 365 of NREPA

T&E law
compliance

Plans and
Agreements

Internal &
External
Engagement

Conservation
coordination

State- and Federally-listed
species

Laws and Regulations

- T&E Laws
 - Federal Endangered Species Act - USFWS
 - State T&E Law, Part 365 NREPA, Endangered Species Protection - DNR
- Other rare species protections
 - Regulations on the Take of Reptiles and Amphibians - DNR
 - Bald and Golden Eagle Protection Act – USFWS
 - Migratory Bird Treaty Act - USFWS
 - Christmas Tree Act (Part 529 of NREPA) – MDARD
 - Ginseng Act – MDARD and DNR
 - Aquaculture Development Act - MDARD

Michigan Endangered Species Protection Law: Part 365 NREPA (Act 451 of 1994)



- Enacted September 1, 1974 – 50th anniversary last year!
- Administered by the Michigan Department of Natural Resources
- Protects state listed species from “Take”
- Statewide scope – applies to both public and private lands
- Applies to Federal, State, Local agencies; Private landowners

Threatened and Endangered Species (T&E)

- **Endangered species:** any species of fish, plant life, or wildlife that is in danger of extinction throughout all or a significant part of its range
- **Threatened species:** any species which is likely to become an endangered species within the foreseeable future throughout all or a significant portion of its range



Great Lakes Piping Plover - Endangered
Photo Credit: Roger Eriksson

“Take” under Part 365



- To take fish or wildlife means “to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, collect, or attempt to engage in any such conduct.”



- To take a plant means: “to collect, pick, cut, dig up, or destroy in any manner.”



- Individuals of listed plant and animal species are protected from take wherever they are found in Michigan – private and public lands.

State vs. Federal T&E laws



State

- Part 365 of NREPA, Endangered Species Protections (1974)
- Statewide scope
- 407 listed species
- Limited justifications for allowing take; no incidental take
- State law protects state and federally listed plants
- Review through state's Natural Heritage Database Biotics, managed by MNFI
- "Take/no take"

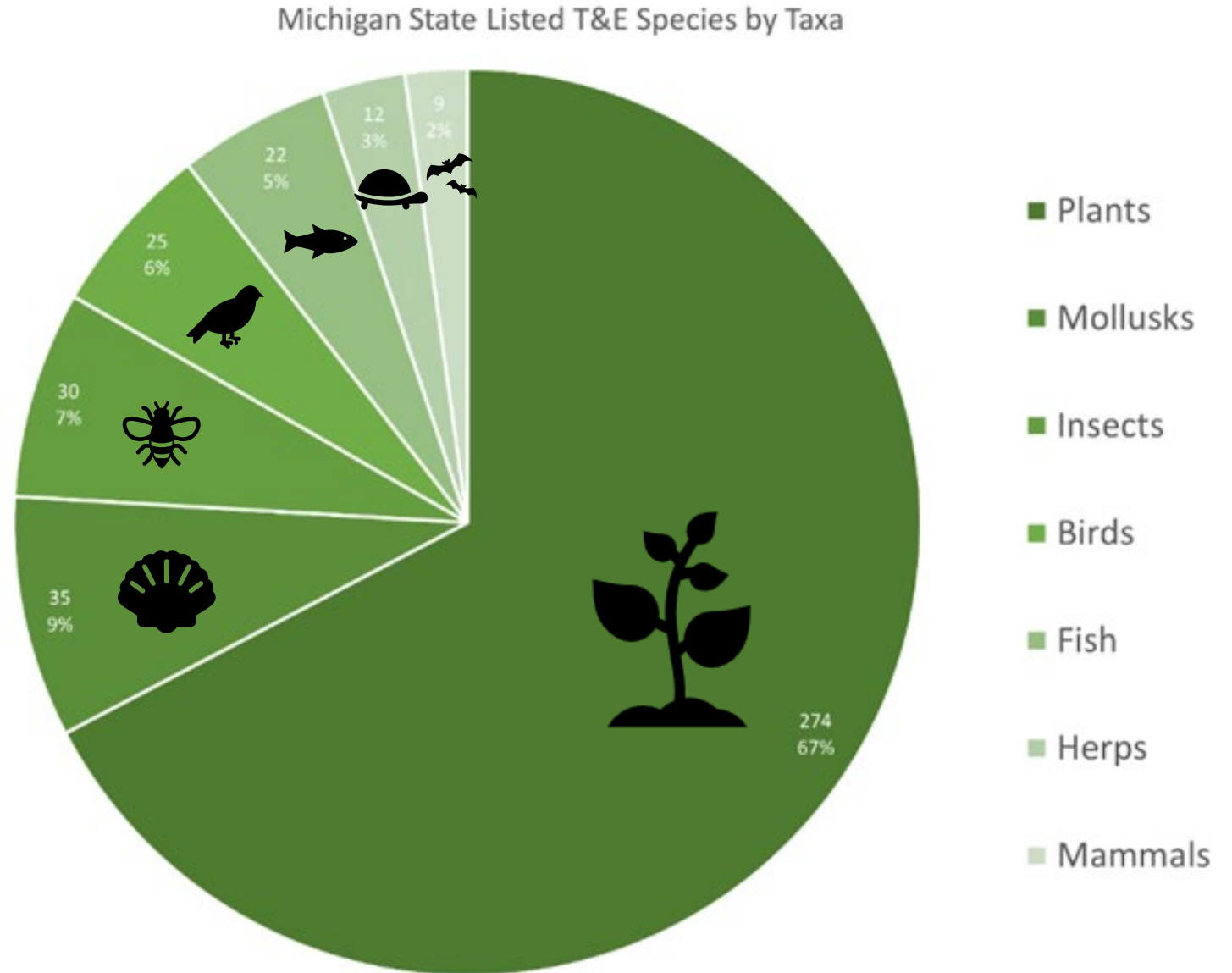


Federal

- Endangered Species Act (1973)
- National Scope
- 26 listed species in Michigan
- Incidental take may be permitted
- Federally threatened plants are only protected if there is a federal nexus (money, staff, lands, etc.)
- Review through IPaC
- "No effect, May effect, Not likely to adversely effect"

Michigan's Threatened and Endangered Species List

- List Updated March 20, 2023





Species of Special Concern



Reviewed at each threatened and endangered species list revision, and may also be added by the Michigan Natural Features Inventory at any time



Goal: track and manage to avoid future endangerment



When and where possible treat with similar management consideration as listed species



NOT protected under Part 365, but may be protected by other rare species laws

Michigan's State Listed Species - online

- T&E List online
- www.michigan.gov/dnr/managing-resources/wildlife/wildlife-permits/threatened-endangered-species/threatened-and-endangered-species-list

The screenshot shows the Michigan Department of Natural Resources website. The header includes the department logo and name, a search icon, and a navigation menu with items like 'Things to do', 'Places to go', 'Buy and apply', 'Education and safety', 'Managing your resources', 'About us', and 'Events'. The main content area features a large banner for 'Threatened and endangered species list'. Below the banner is a breadcrumb trail: Home > Managing your resources > Wildlife > Wildlife Permits > Threatened/Endangered Species > Threatened and endangered species list. The page title is 'Threatened and endangered species list'. There is a 'Show 10 entries' dropdown and a search box labeled 'Search: Filter by keyword...'. A table displays the following data:

Taxonomic group	Common name	Scientific name	Status
Bird	Barn owl	Tyto alba	Endangered
Bird	Black tern	Chlidonias niger	Threatened

Michigan Natural Features Inventory

- mnfi.anr.msu.edu/
- All Federally and State listed species, all Special Concern Species
- Lots of species-specific information
- Report observations

The screenshot shows the homepage of the Michigan Natural Features Inventory. At the top, there is a dark green header with the Michigan State University logo and the text "MICHIGAN STATE UNIVERSITY Michigan Natural Features Inventory MSU Extension". A search bar is located in the top right corner. Below the header is a white navigation bar with a map of Michigan icon and the following menu items: "Services | Plants & Animals | Natural Communities | Resources | Publications | Projects & Programs | About". The main content area features a large background image of a rocky shoreline with trees and water. Overlaid on this image is a white box containing the Michigan Natural Features Inventory logo and the tagline "Discover. Define. Deliver.". Below the image, the text "The Science that Guides Biodiversity Conservation" is displayed in a large, bold, teal font. To the right of this text, the heading "Our Public Impact" is followed by a paragraph: "We **discover** new knowledge. We **define** and organize it in the Natural Heritage Database. We interpret and **deliver** it to governmental agencies, NGOs, industry, researchers, and the public."

Michigan's Rare Plant and Rare Animal Lists

Create a PDF

MICHIGAN STATE UNIVERSITY
Michigan Natural Features Inventory
MSU Extension

Services | Plants & Animals | Natural Communities | Resources | Publications | Projects & Programs | About

Michigan's Rare Animals

This list presents the Endangered (E), Threatened (T), and Probably Extirpated (X) animal species of Michigan, which are protected under the Endangered Species Act of the State of Michigan (Part 365 of PA 451, 1994 Michigan Natural Resources and Environmental Protection Act). The current list became effective on March 20, 2023, after extensive review by technical advisors to the Michigan Department of Natural Resources and the citizenry of the state.

Also included in this list are animal species of Special Concern (SC). While not afforded legal protection under the Act, many of these species are of concern because of declining or relict populations in the state. Should these species continue to decline, they would be recommended for Threatened or Endangered status. Protection of Special Concern species now, before they reach dangerously low population levels, would prevent the need to list them in the future by maintaining adequate numbers of self-sustaining populations within Michigan. Some other potentially rare species are listed as Special Concern pending more precise information on their status in the state; when such information becomes available, they could be moved to threatened or endangered status or deleted from the list.

Amphibians and reptiles that are listed as special concern (SC) are legally protected under the Michigan Department of Natural Resources Director's Order No. FO-224.13. It is unlawful to kill, take, trap, possess, buy, or sell these species from the wild except as provided in the Order.

This list was produced by the Endangered Species Program of the Michigan Department of Natural Resources and the Michigan Natural Features Inventory. English names in common usage or from published sources have been incorporated, when possible, to facilitate public understanding of and participation in the Endangered Species Program. To comment on the list or request additional copies, or for information on the Endangered Species Program, contact the Endangered Species Coordinator, Wildlife Division, Michigan Department of Natural Resources, P.O. Box 30028, Lansing, MI 48909 (517-284-9453). To report occurrences of these species, please contact MNFI at mnfi@msu.edu.

[Download Animal List](#)

Scientific Name	Common Name	Federal Status	State Status	Global Rank	State Rank
Accipiter gentilis	Northern goshawk		I	G5	S3
Acella haldemani	Spindle lymanaea		SC	G3	SH
Acipenser fulvescens	Lake sturgeon		I	G3G4	S2
Acris blanchardi	Blanchard's cricket frog		I	G5	S2S3
Acrionota falcula	Corylus dagger moth		SC	G2G4	S2S3
Alasmidonta marginata	Elktoe		SC	G4	S32

MICHIGAN STATE UNIVERSITY
Michigan Natural Features Inventory
MSU Extension

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Michigan's Rare Plants

This list presents the Endangered (E), Threatened (T), and Probably Extirpated (X) plant species of Michigan, which are protected under the Endangered Species Act of the State of Michigan (Part 365 of PA 451, 1994 Michigan Natural Resources and Environmental Protection Act). The current list became effective on March 20, 2023, after extensive review by technical advisors to the Michigan Department of Natural Resources and the citizenry of the state.

Also included in this list are plant species of Special Concern. While not afforded legal protection under the Act, many of these species are of concern because of declining or relict populations in the state. Should these species continue to decline, they would be recommended for Threatened or Endangered status. Protection of Special Concern species now, before they reach dangerously low population levels, would prevent the need to list them in the future by maintaining adequate numbers of self-sustaining populations within Michigan. Some other potentially rare species are listed as of Special Concern pending more precise information on their status in the state; when such information becomes available, they could be moved to threatened or endangered status or deleted from the list.

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[Download Plant List](#)

Scientific Name	Common Name	Federal Status	State Status	Global Rank	State Rank
Adlumia fungosa	Climbing fumitory		T	G4	S3
Agalinis auriculata	Eared foxglove		X	G3	SX
Agalinis gattingeri	Gattinger's gerardia		E	G4	S1
Agalinis skinneriana	Skinner's gerardia		E	G3G4	S1
Agastache scrophulariifolia	Purple giant-hyssop		SC	G4	SNR
Agoseris glauca	Prairie or pale agoseris		T	G5	S2
Agrimonia rostellata	Beaked agrimony		SC	G5	S2
Allium schoenoprasum	Chives		T	G5	S2
Amerorchis rotundifolia	Small round-leaved orchis		E	G5	S1

MICHIGAN STATE UNIVERSITY
Michigan Natural Features Inventory
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Michigan's Natural Communities

By Name | By Group

[Code Definitions](#)

Community Name	Global Rank	State Rank
Alvar	G2?	S1
Bog	G3G5	S4
Boreal Forest	GU	S3
Bur Oak Plains	G1SX	SX
Cave	G4?	S1
Clay Bluffs	GNR	S2
Coastal Fen	G1G2	S2
Coastal Plain Marsh	G2	S2
Dry Northern Forest	G3?	S3
Dry Sand Prairie	G3	S2
Dry Southern Forest	G4	S3
Dry-mesic Northern Forest	G4	S3
Dry-mesic Prairie	G3	S1
Dry-mesic Southern Forest	G4	S3
Emergent Marsh	GU	S4
Floodplain Forest	G3?	S3
Granite Bedrock Glade	G3G5	S2
Granite Bedrock Lakeshore	G4G5	S2
Granite Cliff	G4G5	S2
Granite Lakeshore Cliff	GU	S1
Great Lakes Barrens	G3	S2
Great Lakes Marsh	G2	S3

County Element Data

The lists include all elements (species and natural communities) for which locations have been recorded in MNFI's database for each county. Information from the database cannot provide a definitive statement on the presence, absence, or condition of the natural features in any given locality, since much of the state has not been specifically or thoroughly surveyed for their occurrence and the conditions at previously surveyed sites are constantly changing. The County Elements Lists should be used as a reference of which natural features currently or historically were recorded in the county and should be considered when developing land use plans.

Choose a county

Wayne County

[Code Definitions](#)

Species

Scientific Name	Common Name	Federal Status	State Status	Global Rank	State Rank	Occurrences in County	Last Observed in County
Acipenser fulvescens	Lake sturgeon		I	G3G4	S2	8	2016
Adlumia fungosa	Climbing fumitory		I	G4	S3	1	1929
Alasmidonta marginata	Elktoe		SC	G4	S3?	9	2020
Alasmidonta viridis	Slippershell		I	G4G5	S2S3	9	1933
Ambystoma texanum	Small-mouthed salamander		E	G5	S1	1	2001

State Threatened and Endangered Species Regulatory Process



OVERHAULED T&E
PERMITTING PROCESS
STARTING IN 2022



FOCUS IS ON STREAMLINING
THE PERMITTING PROCESS
TO INCREASE
TRANSPARENCY AND
EFFICIENCY



CLARIFY WHEN PERMITS ARE
AND ARE NOT NEEDED

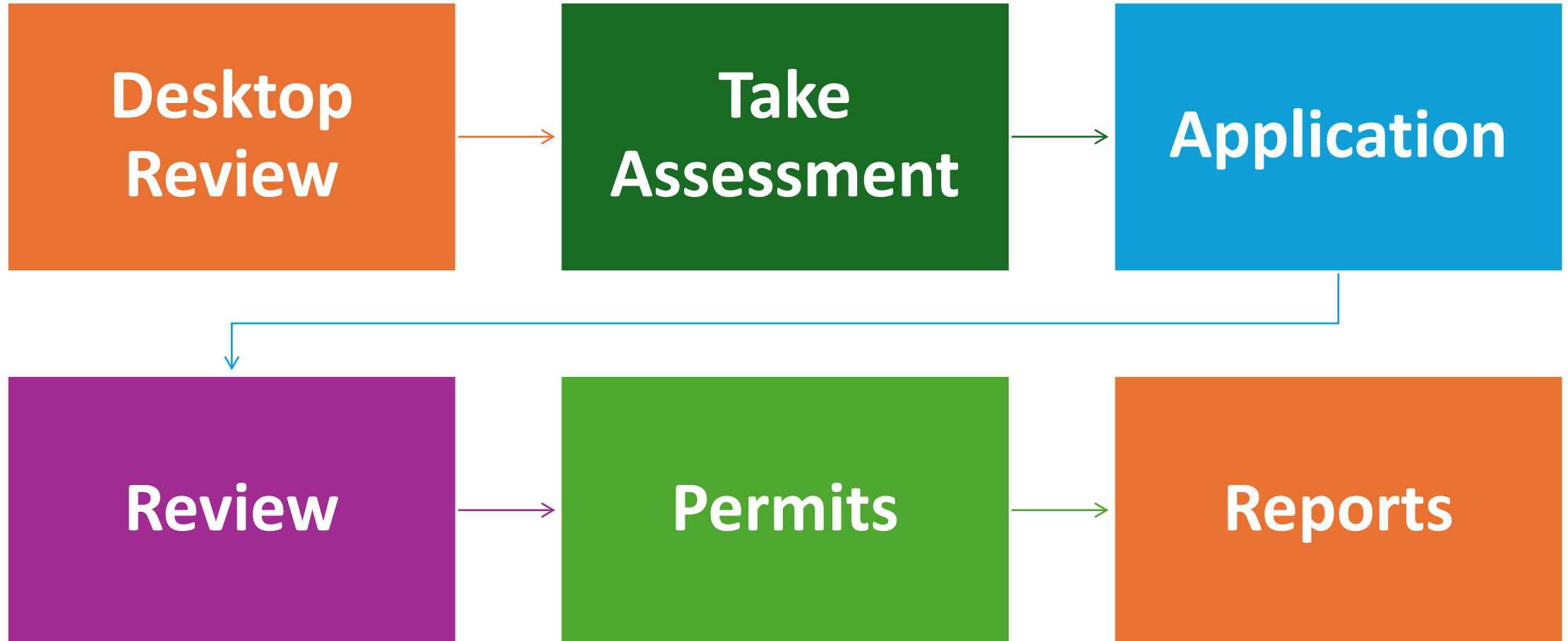


SPEND OUR TIME AND
EFFORT ON SPECIES THAT
NEED IT MOST



USING THE REGULATORY
PROGRAM TO INFORM
PROACTIVE CONSERVATION
IN THE FUTURE

State Threatened and Endangered Species Regulatory Process



Rare Species Desktop Review Process



To initiate the state threatened and endangered species permit review process, project proponents will need a desktop review of the Natural Heritage Database (Biotics)

Can be completed by MNFI or a consultant with a subscription to the Natural Heritage Database (Biotics)
DNR website contains a list of permitted consultants
The DNR cannot conduct desktop reviews



There is a fee for the review



The **federal** endangered species review process is entirely separate

State of Michigan Environmental Agencies



DNR

- Authority for state endangered species laws
- Issues state T&E permits
- Divisions: Wildlife, Forest Resources, Parks and Recreation, Fisheries, Public Lands



MICHIGAN DEPARTMENT OF
ENVIRONMENT, GREAT LAKES, AND ENERGY

EGLE

- Authority for natural resource protections (other Parts of NREPA)
- May conduct T&E desktop reviews as part of their other authorities, but do not issue T&E permits
- Divisions: Water Resources, Air Quality, Drinking Water and Environmental Health, Geologic Resources, Climate and Energy, Great Lakes
- Transportation Review Unit

Rare Species Desktop Review Process

- If the desktop review of the Natural Heritage Database shows potential to “take” a state listed species, a state threatened and endangered species permit may be needed
- No take = no permit needed



Take Assessment



Take Assessment

Surveys

- Must be conducted by a qualified surveyor in the appropriate time frame as indicated by the MNFI species web pages
- For plants, if a field survey of the project footprint is conducted in the appropriate window by a qualified surveyor and no plants are found, the applicant may assume that project activities will not result in take of the plant
- Surveys that may result in take must be conducted under a state threatened and endangered species permit



Survey Methods

Random meander search covers areas that appear likely to have rare taxa, based on habitat and the judgment of the investigator.

Meander search

Survey Period: From first week of August to fourth week of September

Take Assessment

No-Take Avoidance Measures

- Developed by the DNR for some taxa
- For all taxa:
 - If project's impact footprint (including downstream impacts, noise and pesticide drift) is outside of species habitat, we expect no take, and no state T&E species permit is needed.



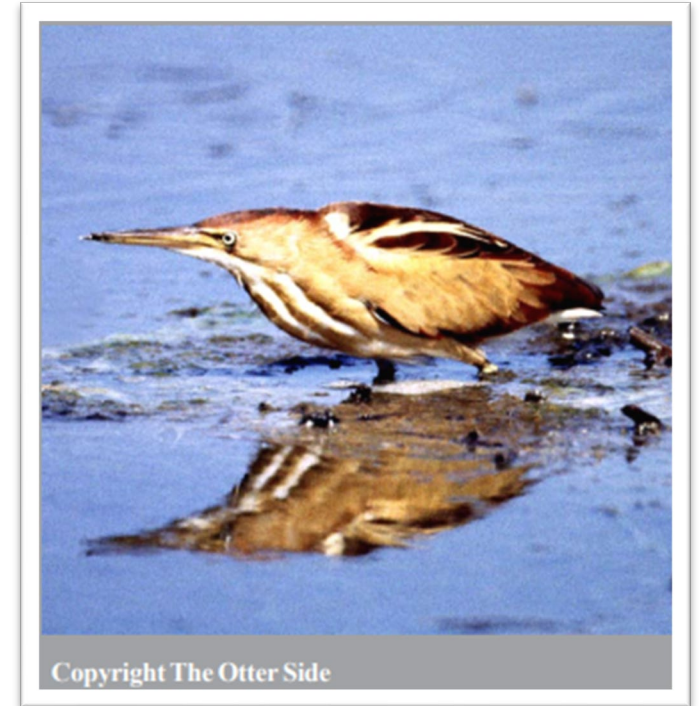
Pugnose Minnow



Take Assessment

No-Take Avoidance Measures

- Birds
 - Project is conducted outside of nesting season.
- Or
 - Project is conducted outside of nesting habitat during nesting season.
- Species-specific nesting season dates are available from the DNR.



Least Bittern



Take Assessment

No-Take Avoidance Measures:

Program for Turtles Impacted by Development

- Option 1: Work in the inactive season November 16- March 31
- Option 2: Fence the project footprint during the active season April 1-November 15, remove turtles inside the fence to outside of the fence
- Option 3: During the active season April 1-November 15, for linear projects, employ a biomonitor to sweep ahead of equipment and move turtles out of the way



Wood turtle



Spotted turtle



Take Assessment

No-Take Avoidance Measures:

Program for Turtles Impacted by Development

- Use wildlife friendly erosion materials
- If the project results in mortality of 2 or more turtles in one day, operations must cease for the day
- Optional/recommended BMPs for conservation
- No reporting is required, but reports of Blanding's, wood, spotted, and eastern box turtles to the MNFI Rare Species Form is appreciated
- See full Program for Turtles Impacted by Development for details



Wood turtle



Spotted turtle



Take Assessment

No-Take Avoidance Measures

- Mussels
 - Project impact footprint does not impact stream, river, pond, or lake, or alter hydrology, or result in runoff that would impact mussel species
 - Fiber BMPs - Horizontal Directional Drilling 10 feet deep below all mussel streams



Rayed bean



Take Assessment

No-Take Avoidance Measures

- Plants
 - Project conducts a survey and avoids the footprint of the any listed plants
 - Does not apply to indicator species for rare natural communities - exceptions provided by the DNR
 - Project is conducted outside of species habitat (wetland, forest, grasslands)



Sullivant's Milkweed

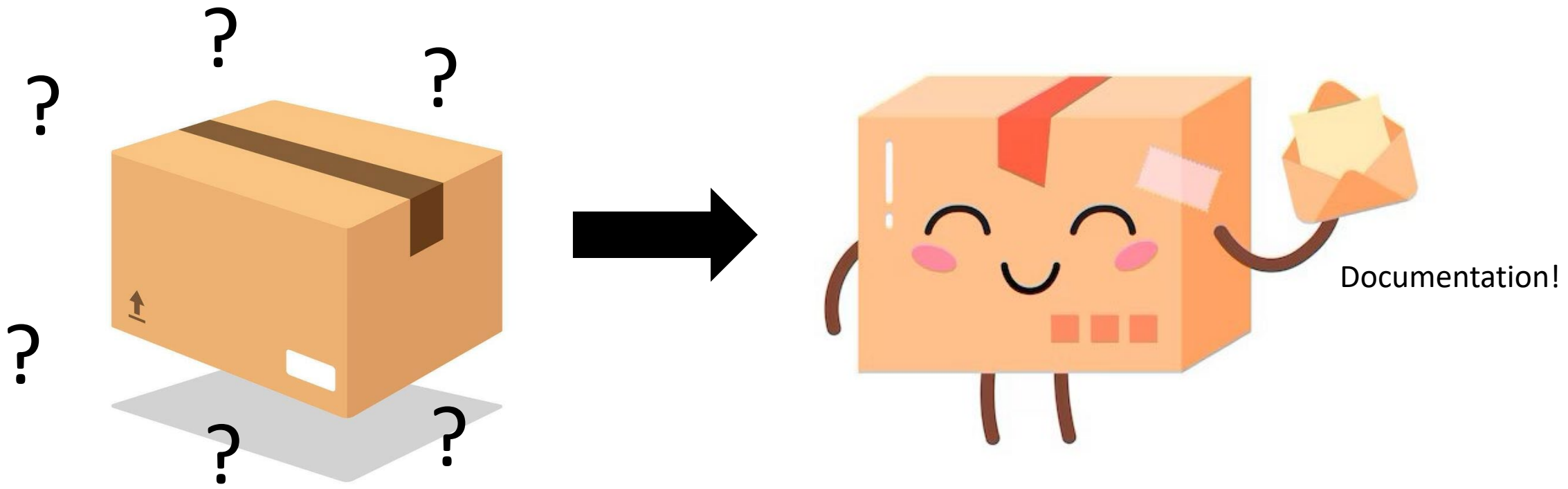


: MNFI

Broadband Equity, Access, and Deployment: Fiber Installation BMPs

- BEAD is bringing \$2.5 billion to Michigan for internet infrastructure development
- Michigan High Speed Internet approved funding for 220,000 locations in Michigan
- State T&E law applies in the ROW
 - Many of our disturbance-dependent plant species, turtles, snakes, and more live in the ROW
- Multiple options for compliance with state T&E law
 - Fiber species review list – restricted to species that may experience take
 - No-take avoidance measures
 - T&E BMPs for installation on Local Agency Program ROWs available on our website
 - [Threatened/Endangered Species](#)
 - Additional BMPs available for MDOT trunkline ROW and on DNR-owned land

Take Assessment – Compliance Checklist



Take Assessment – Compliance Checklist

A	B	C	D	E	F	G	H	I	J	K	L
			State Listing Status	Federal Listing Status	EO Rank(s)	Have you had a USFWS consult for federally listed animals?	Survey results if applicable (presence/absence)	Take Determination	How is the project getting to compliance for this species?	What No-Take Avoidance Measures can be implemented?	What Conservation Measures can be implemented?
Taxa	Species Common Name	Species Scientific Name									

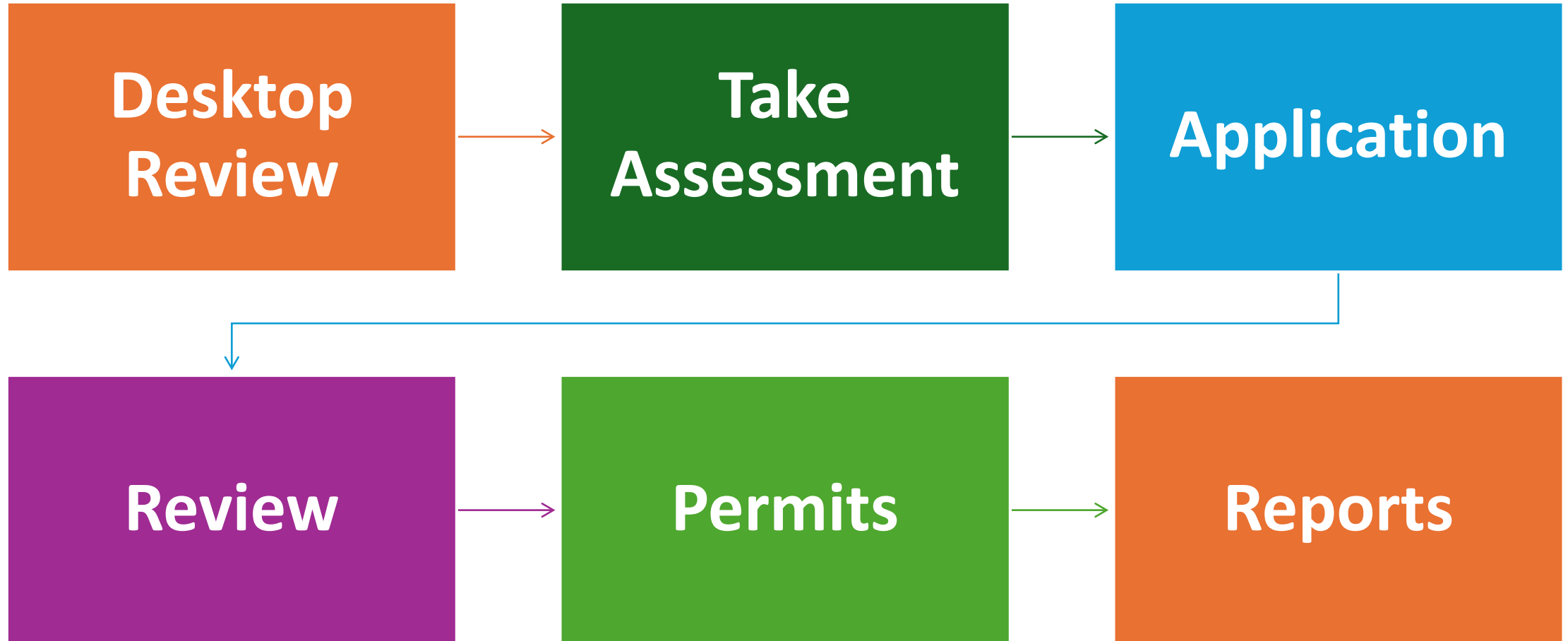
Compliance Checklist

- Helps applicants identify at least one compliance mechanism per species in the desktop review or on-site surveys
- If the project can identify compliance mechanisms that avoid take, no state threatened and endangered species permit is necessary
- Helps clarify conservation measures proposed by the applicant
- Example compliance mechanisms:
 - No habitat present for this species in the project footprint and no impacts outside the project footprint
 - No-Take Avoidance Measures
 - Species is Special Concern
 - Element Occurrence Ranks are Historic (H) or Extirpated (X)
 - Applying for take permit, with or without proposing conservation measures

Take Assessment – Compliance Checklist

Taxa	Species Common Name	Species Scientific Name	State Listing Status	Federal Listing Status	EO Rank(s)	Have you had a USFWS consult for federally listed animals?	Survey results if applicable (presence/absence)	Take Determination	How is the project getting to compliance for this species?	What No-Take Avoidance Measures can be implemented?	What Conservation Measures can be implemented?
Herp	Eastern massasauga	Sistrurus catenatus	T	T	B	No		Take	Take Permit		
Bird	Bald eagle	Haliaeetus leucocephalus	SC		B			No Take	Species is Special Concern		
Plant	Climbing fumitory	Adlumia fungosa	T		A			No Take	Not on fiber species list		
Plant	Kitten-tails	Besseyia bullii	E		B			No Take	No habitat in project footprint		
Plant	Calypso or fairy-slipper	Calypso bulbosa	T		H			No Take	EO rank is H		
Herp	Spotted turtle	Clemmys guttata	T		C			No Take	Following Program for Turtles Impacted by Development		

State Threatened and Endangered Species Regulatory Process



Application

- Threatened and Endangered Species Permit Application is now an online form: [Threatened/Endangered Species](#)
- All permit types require the standard application
- Additional requirements vary by permit type
- Attachments for additional requirements may be sent to DNR-StateTEPermit@michigan.gov
- There is no fee to apply

State and Federally Co-listed Species



For most projects that impact federally listed animals, the DNR will defer to the U.S. Fish and Wildlife Service

State permits are required for:
Projects that propose bat handling
Eastern massasauga for priority populations
Some captive co-listed species



State permits are required for all federally listed plants

Application

Permit categories

- Consultant Survey
- Education or Scientific
- Species and Habitat Management
- Development 1
 - Construction projects, Utilities, Local Area Road Commissions, Individuals
- Development 2
 - Wind and Solar energy development, MDOT projects
- Salvage
- Live Animal Programs



Karner Blue Butterfly



: USFWS photo library

Application – Development 1

Construction projects, Utilities, Local Area Road Commissions, Individuals

Can be held by consultants, project managers, or other project proponents

Permittee is responsible for compliance and reporting

Additional requirements

- 2-page summary of impacts to species, including description of area and habitat and GPS location
- Desktop review of Biotics
- Aerial photos or spatial data
- Compliance checklist
- For projects including multiple entities, a 1-page communication plan
- Any proposed conservation measures, including methods for translocation of plants and monitoring if applicable

Application Review Process



Permit review and processing can take 90-150 days after all necessary documentation is received



Application volume is very high April - October



In times of high application volume, human health and safety permits are prioritized



Apply early to avoid project delays!

Projects that require mussel or plant surveys should apply well in advance of the appropriate survey windows to avoid delays

Application Review Process

Justifications for issuing permits under Part 365

1. For scientific, zoological or educational purposes (Sec. 36505-4)
2. For propagation in captivity of such fish, plants, or wildlife to ensure their survival (Sec. 36505-4)
3. To protect human health and safety (Sec. 36505-5)
4. To alleviate damage to property (Sec. 36505-5)
5. For falconry (Sec. 36505-6)

Eastern massasauga
rattlesnake neonate in a
deer hoofprint



: Eyes in the Field



Application Review Process

Conservation measures

- Reduce level of take and become conditions of the permit
- The DNR can help develop appropriate conservation measures in coordination with taxa experts
- Project proponents (or their consultants!) can also propose conservation measures and doing so can expedite permit review



Common tern



: Cornell Lab of Ornithology

Kirtland's Warbler



: Dan Kennedy



Permits



Formal authorization letters with standard permit conditions, project-specific conservation measures, and specific reporting requirements



Changes to your permit may be approved as amendments pending review



Duration depends on permit type

Reports

Annual and/or final reports are required to maintain permits and obtain future permits

Reporting requirements vary by permit type and justification

Data collected via annual reports is shared with the Michigan Natural Features Inventory to inform future conservation efforts

Takeaways

Do



- Obtain a desktop review of Biotics, not just IPaC
- Take any “off-ramps” you can
- Build in sufficient time to obtain your state T&E permit
- Apply via the online form AND submit all supporting permit materials to DNR-StateTEPermit@michigan.gov

Don't



- Forget to consider costs for your desktop review, implementing BMPs, hiring consultants and/or biomonitors, etc.
- Miss survey windows, especially for plants
- Panic! We will get through this!



Questions?