



## Before we begin:

- We want to know who is here! Please introduce yourself in the chat: Name. School.
- Please mute your microphone to reduce background noise.
- We will leave time for Q & A. Please submit your questions via the Google form that will be shared in the chat.
- This presentation, along with the questions and answers, will be posted on the WESO website.





# Feathered Friends Coaches' Meeting



# GOALS OF FEATHERED FRIENDS:

- Students will learn about birds *and show off* what they've learned
- Difficulty:
  - ~70% questions most kids will know
  - ~20% medium level questions
  - ~10% harder questions to determine placement
- Pick up a hobby!  
Students learn what it's like to be a birder "in the field"
- Get outside!





GENERAL ORNITHOLOGY:

WHAT MAKES AN ANIMAL A BIRD?



# BIRDS LAY EGGS WITH HARD SHELLS





# BIRDS EVOLVED FOR FLIGHT



Sponge-like,  
hollow bones

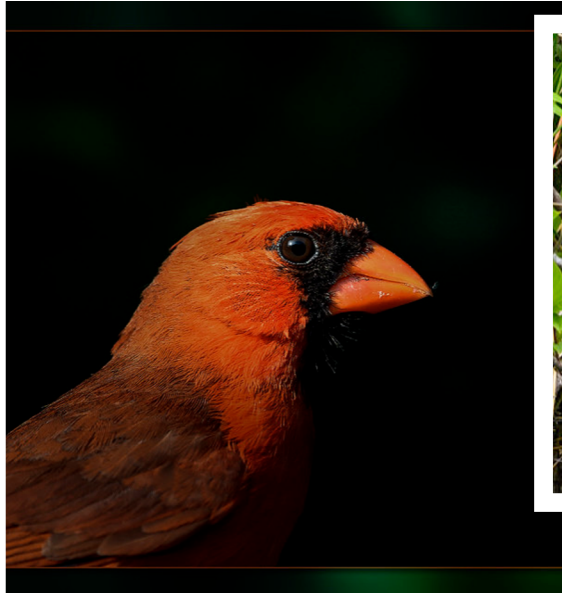


Mammal bone

# FEATHERS ARE A UNIQUE FEATURE OF BIRDS



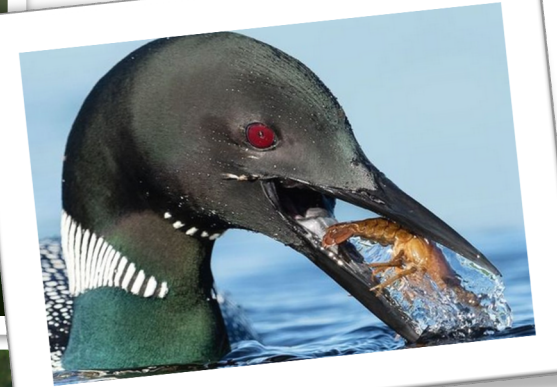
# BIRDS HAVE BEAKS AND BILLS





# A BEAK IS A TOOL

- used to get food
- drink water
- tear or break food
- gather nesting material
- preen
- feed babies and protect them from enemies.



# BIRDS HAVE TWO FEET:

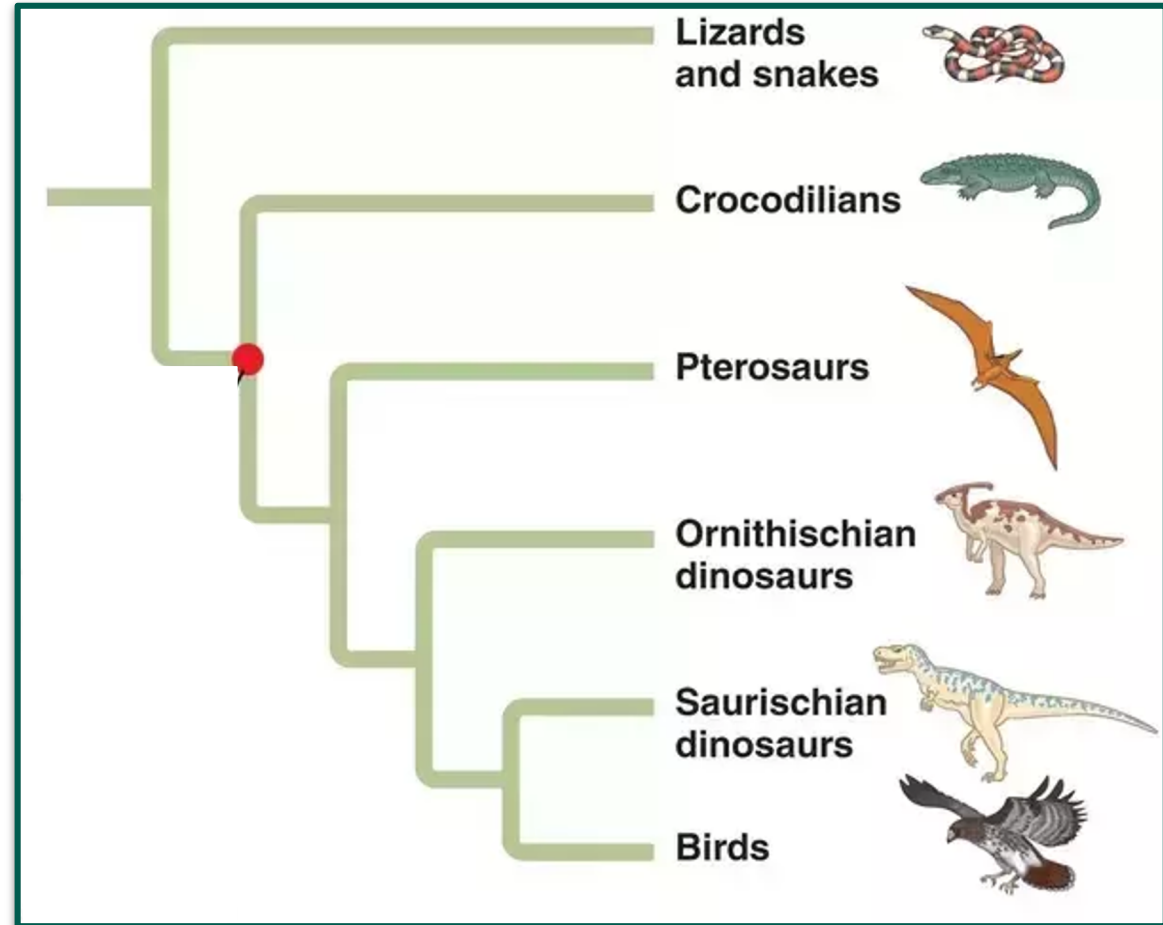
- Also a tool!
- Used to walk, stand, hop, perch, carry things, grab prey, swim, wade, and dig.



# BIRDS ARE DINOSAURS!



Deinonychus





# HOW ARE BIRDS AND REPTILES DIFFERENT?



**Birds:**  
All lay eggs  
Take care of babies  
Maintain body temperature  
Feathers  
Wings



**Reptiles:**  
Most lay eggs  
Do not care take care of babies  
Body is same temperature as surroundings  
Have scales

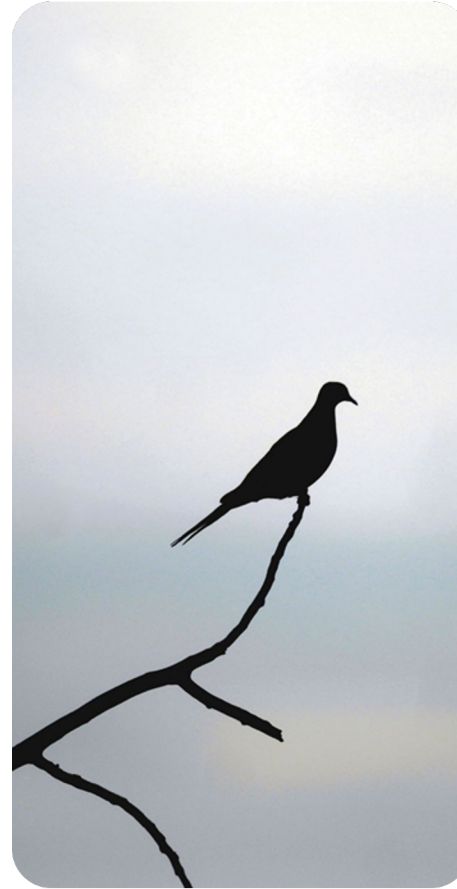


WE USE OUR SENSES TO MAKE OBSERVATIONS ABOUT BIRDS



WE CAN SUBMIT THE OBSERVATIONS TO SCIENTISTS

YOU CAN SEE SHAPES





# YOU CAN SEE SHAPES



Shape:

Sizes, outlines, posture!

Look at proportions!

YOU CAN SEE SHAPES



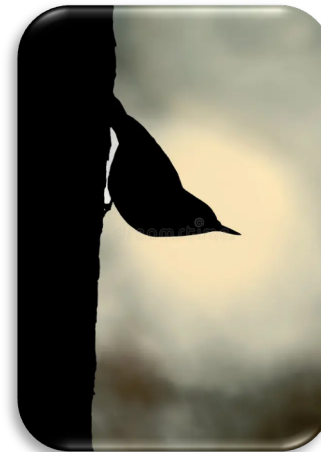


# YOU CAN SEE COLORS



Do you see any color in addition to black?

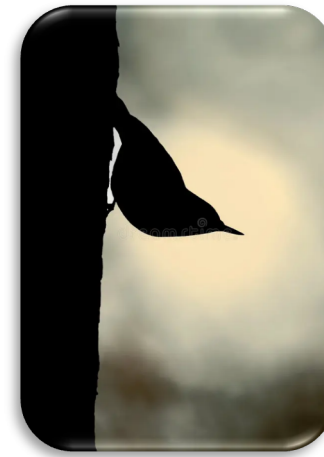
# YOU CAN SEE COLORS



## Shading con't

Eye lines, wing bars, rump patches?

# YOU CAN SEE COLORS

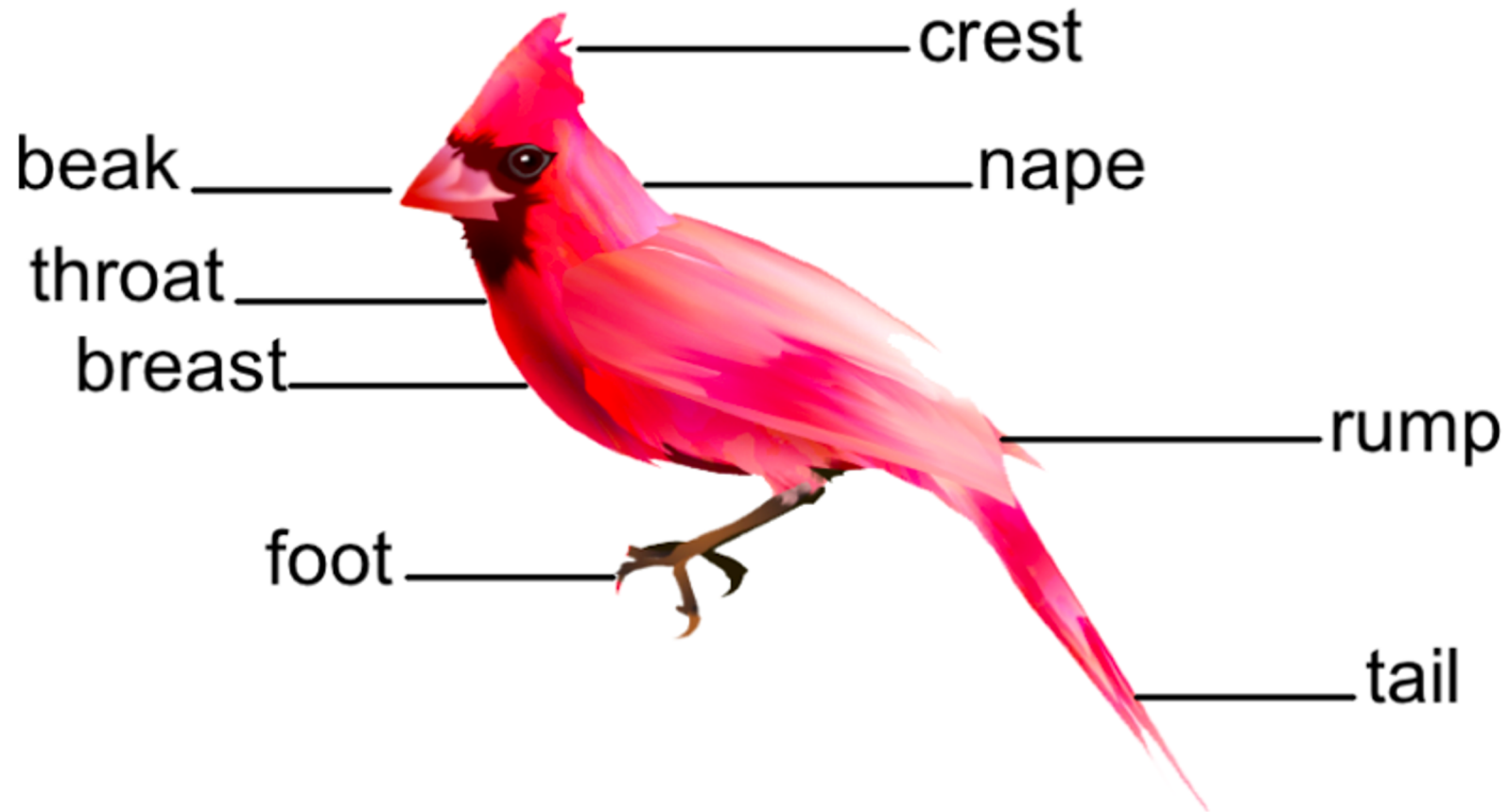


## Shading con't

Where are the dark spots verses light spots?



# BODY PARTS ARE OFTEN PART OF NAMES



# Eye Rings



Note the yellow eye ring on the Canada Warbler (left)  
and the broken eye ring on the Magnolia Warbler  
(right)

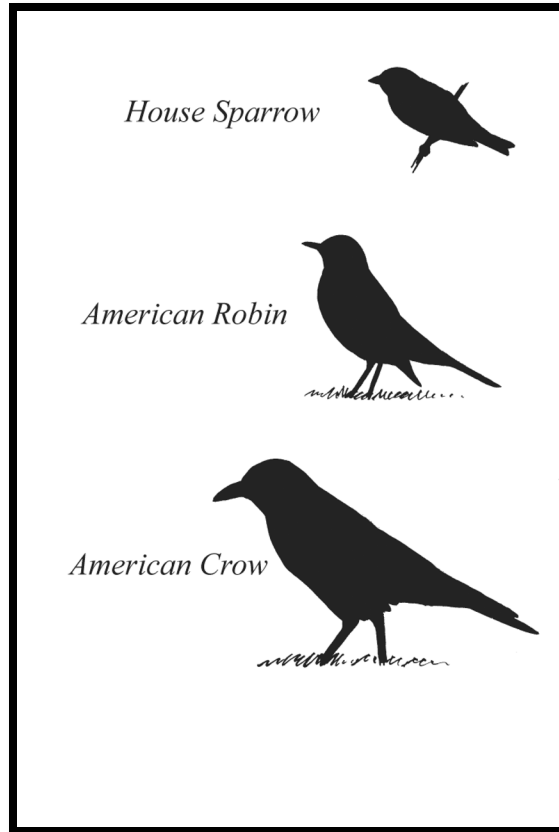
## Eye Lines and Face Patterns



The bird on the left is a White-throated Sparrow, the  
one on the right is a Chipping Sparrow.

# WE CAN SEE SIZE!

Think about major, relative (not precise) differences!  
Sizes (weights and wingspans) are in guides!





THINK ABOUT WHERE YOU ARE

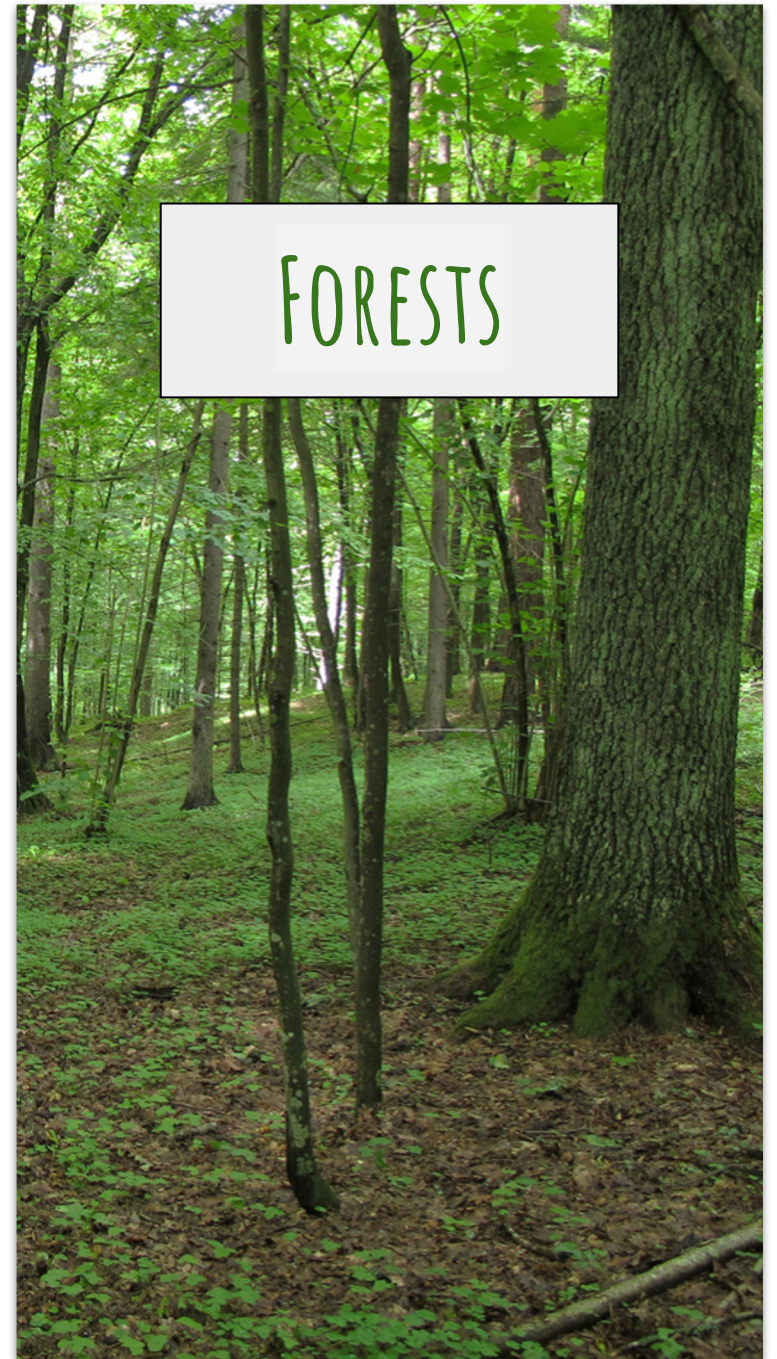
WETLANDS



GRASSLANDS



FORESTS





# MIGRATION AFFECTS THE BIRDS WE CAN SEE



Should be able to read a migration map for Michigan birds (but not other geography)

Maps will be colorblind friendly

# All About Birds

## Red-winged Blackbird

★  
Overview

ID info

Life History

Maps

Sounds



Listen

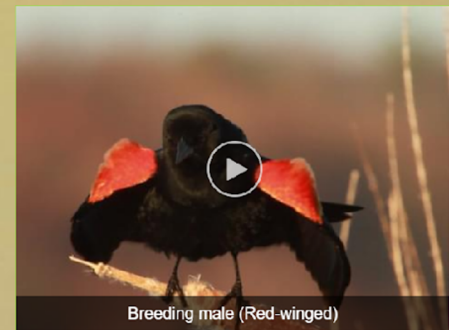
ID Info



Breeding male (Red-winged)



Female (Red-winged)



Breeding male (Red-winged)



# All About Birds

## Red-winged Blackbird

### Life History

- Overview
- ID info
- Life History
- Maps
- Sounds

[Habitat](#)
[Food](#)
[Nesting](#)
[Behavior](#)
[Conservation](#)
[Backyard Tips](#)
[Credits](#)

Explore Birds of North America to learn more.



Habitat  
Marshes



Food  
Insects



Nesting  
Shrub



Behavior  
Ground Forager



Conservation  
Low Concern

### Habitat



Red-winged Blackbirds spend the breeding season in wet places like fresh or saltwater marshes and rice paddies. You may also find them breeding in drier places like sedge meadows, alfalfa fields, and fallow fields. Occasionally, Red-winged Blackbirds nest in wooded areas along waterways. In fall and winter, they congregate in agricultural fields, feedlots, pastures, and grassland.

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### Food



Red-winged Blackbirds eat mainly insects in the summer and seeds, including corn and wheat, in the winter. Sometimes they feed by probing at the bases of aquatic plants with their slender bills, prying them open to get at insects hidden inside. In fall and winter they eat weedy seeds such as ragweed and cocklebur as well as native sunflowers and waste grains.

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### Nesting

#### NEST PLACEMENT



Red-winged Blackbirds build their nests low among vertical shoots of marsh vegetation, shrubs, or trees. Females choose the nest site with some input from the male. Typically, she puts the nest near the ground (or water surface in a marsh), in dense, grass-like vegetation such as cattails, bulrushes, sedges, and *Phragmites* in wetlands; goldenrod, blackberry, or willow and alder trees in uplands; and wheat, barley, alfalfa, and rice plants.

#### NEST DESCRIPTION

Females build the nests by winding stringy plant material around several close, upright stems and

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WE CAN SUBMIT THE OBSERVATIONS TO SCIENTISTS

WE HEAR BIRD SOUNDS ALL THE TIME!!!





# WE HEAR BIRD SOUNDS ALL THE TIME!!!



Some are name callers:

Jay  
Jay  
Jay

# WE HEAR BIRD SOUNDS ALL THE TIME!!!



Some are name callers:

Chickadee dee dee



# BIRDS OF THE FOREST: CHICKADEES AND FRIENDS



Black-capped Chickadee



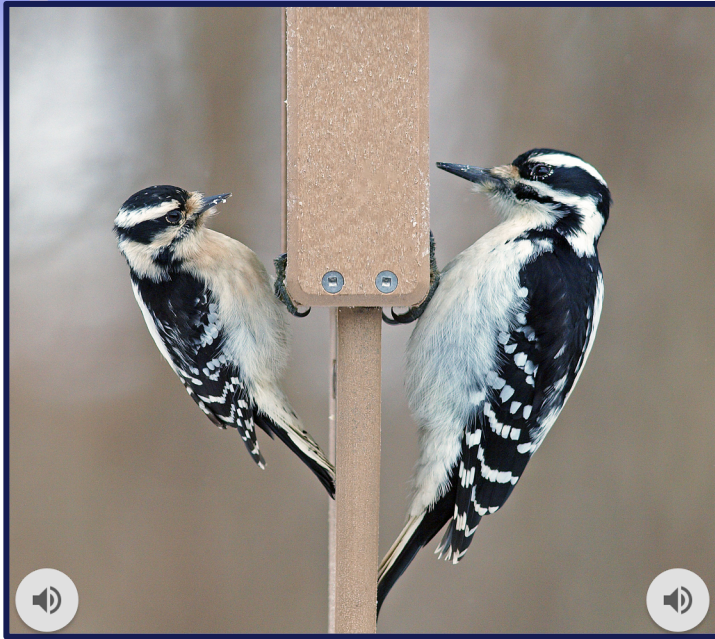
Tufted Titmouse



White-breasted Nuthatch



# BIRDS OF THE FOREST: WOODPECKERS



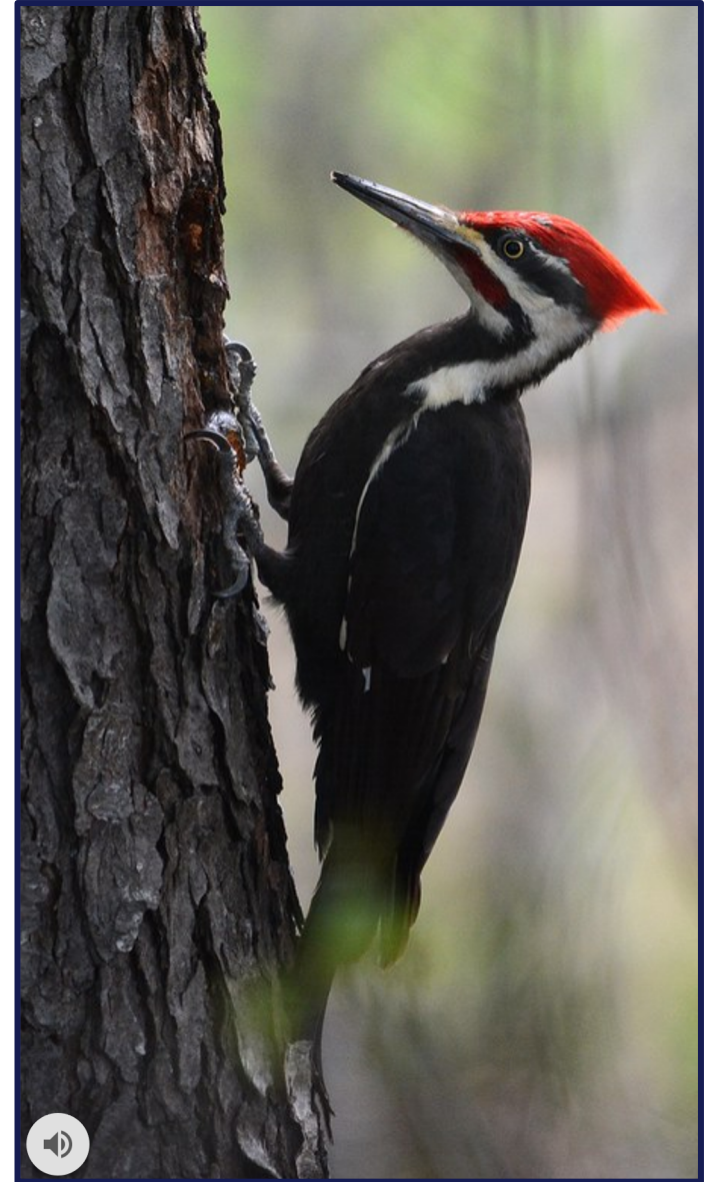
Downy Woodpecker (small)  
and  
Hairy Woodpecker (large)



Red-bellied  
Woodpecker



Northern Flicker



Pileated Woodpecker



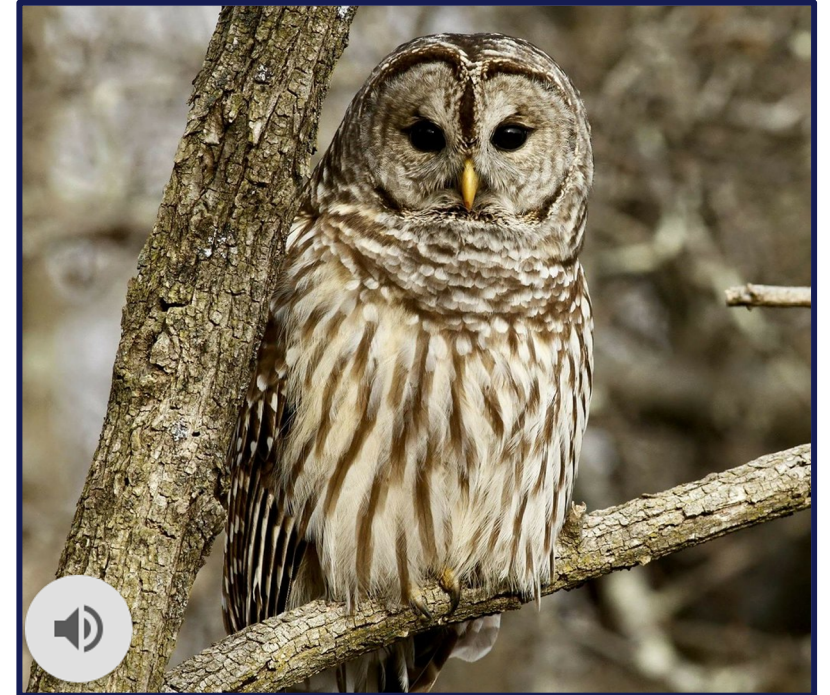
# BIRDS OF THE FOREST: OWLS



Great Horned Owl



Eastern Screech-owl  
(Gray and red)



Barred Owl



# BIRDS OF THE GRASSLANDS



Eastern  
Meadowlark



Bobolink



Field (top) &  
Grasshopper (bottom)  
Sparrows



Northern Harrier



Ring-Necked Pheasant



# BIRDS OF THE YEAR: 2026



# COMMON BIRD LIST:



(this is Al slop)

## Common Bird List:

American Crow	Blue Jay	Great Horned Owl	Northern Cardinal	Sandhill Crane
American Goldfinch	Canada Goose	House Finch	Red-tailed Hawk	Tufted Titmouse
American Robin	Downy Woodpecker	House Sparrow	Red-winged Blackbird	Turkey Vulture
Bald Eagle	Eastern Bluebird	Mallard	Ring-billed Gull	White-breasted Nuthatch
Black-capped Chickadee	Great Blue Heron	Mourning Dove	Ruby-throated Hummingbird	Wild Turkey

# GRADE 2

## Big Birds



Common Loon



Great Egret



Mute Swan



Ring-necked Pheasant



Trumpeter Swan

(this is actually pretty good AI)

# GRADE 3

## Beyond the Feeder



Baltimore Oriole



Gray Catbird



Barn Swallow



Hairy Woodpecker



Eastern Wood Peewee



House Wren



Chimney Swift



European Starling



Rose-breasted Grosbeak



Northern Flicker

(this is AI slop)



# GRADE 4

## Raptors



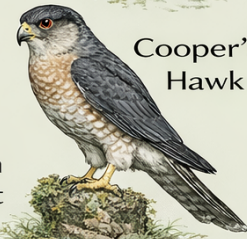
American  
Kestrel



Barred  
Owl



Broad-winged  
Hawk



Cooper's  
Hawk



Eastern  
Screech-  
Owl

Northern  
Saw-whet  
Owl



Northern  
Saw-whet  
Owl



Osprey

Peregrine  
Falcon



Snowy Owl

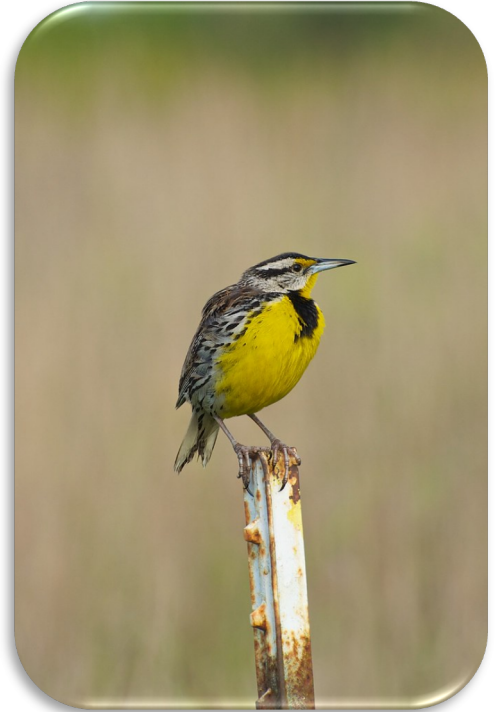
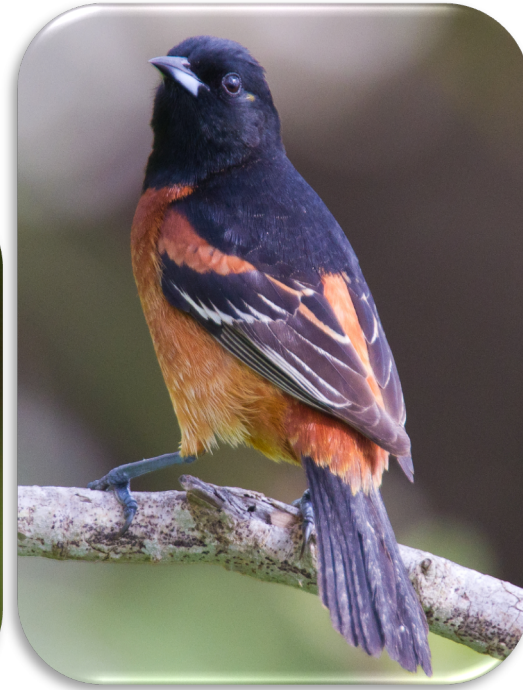
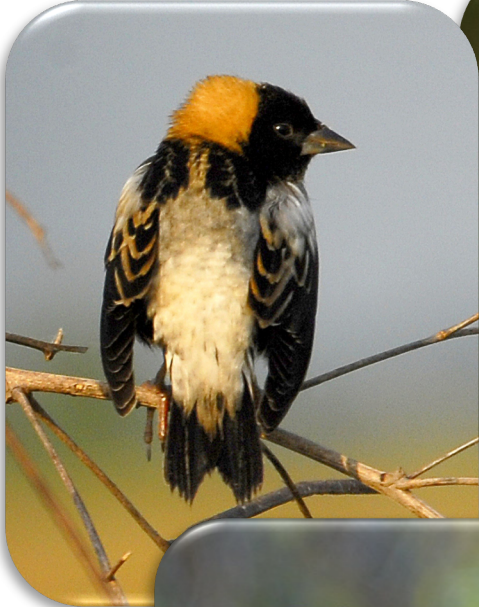
Red-  
shouldered  
Hawk



Sharp-  
shinned  
Hawk

(this is pretty good AI, too)

# BLACKBIRDS (Icteridae)





# Warblers





# Sparrows (little brown birds)



# RULES AND REGULATIONS:

## **Concepts covered:**

All grades share a Common Bird List. In addition, each grade level has a grade-specific bird list organized around a unifying theme. These themes become more challenging with each grade and are designed to encourage comparison among related birds.

For each bird, students should be familiar with:

- Visual identification (color, shape, relative size)
- Songs and calls
- Habitat preferences
- Diet and feeding behavior
- Migration patterns
- Special adaptations

Questions span a range of difficulty and are designed to assess age-appropriate knowledge and skills. Only common names needed (not scientific).

**Each grade-level test will *primarily* cover birds from that grade-level and Common Bird list.**

# RULES AND REGULATIONS:

## Rules:

- Spelling errors do not lower the score.
- No handwritten notes.
- Field guides permitted.
- No notes are allowed in the field guide. Field guides should be unmarked. Any groups with marked field guides will be supplied a different field guide for the test.
- Tabs with bird names are allowed in the field guide.

## Materials distributed by WESO:

**Field Guide:** *The Sibley Field Guide to Birds of Eastern North America: Second Edition* also known as "*Sibley Birds East*."

- Other published field guides are allowed, but not distributed.



**Materials to bring to the competition:**

- Field guide (limited guides available to borrow at event)
- All other materials for exam are provided.

**Competition Format:**

The team will be given a written test in which they identify birds by sight and sound and show off their knowledge of avian anatomy, behavior, and natural history.

Teams will complete a written test that may include:

- Bird identification by photographs or illustrations
- Identification of bird songs and calls
- Questions about anatomy, behavior, habitat, and migration
- Identification of specimens, which may include birds, nests, wings, feet, eggs, etc.
- Question formats may include multiple choice, true/false, fill-in-the-blank, matching, and ordering questions.

Time is not a scoring factor in Feathered Friends. Students will (reasonably) be permitted to ask to hear or see a question again during, or at the end of the test. Bird calls can be replayed, and all are given enough time to clearly be identified.

**Scoring:** Highest score wins.

### Tiebreakers:

- Visual identification of a bird on no grade list (field guide reference).
- Identification of a bird call not on the team's grade-specific list.
- An estimation question (for example, estimating the number of birds in a photo).

### Materials useful for practice:

- Your field guide
- App for calls - Merlin, Chirp! USA (maybe others!)
- Merlin Bird ID (free app that identifies birds by sound for you when out walking)
- [www.allaboutbirds.org](http://www.allaboutbirds.org) (lots of info, but great for "Pokemon Card"-like info)
- Set-up a bird feeder station
- <https://academy.allaboutbirds.org/learning-games/>
- Nature walks – guided (by Washtenaw Bird Nature Alliance) and unguided.

**No cell phones or smart watches are allowed in event rooms. Participants who bring those items will be asked to leave them with the event supervisor for the duration of the event.**

### Event Questions

Please ask questions on Discord



# Questions after tonight?



## WESO Discord Server

Every WESO event has its own channel

Join the WESO server to submit your questions in the event chat

Event supervisors or WESO board members will monitor the discussion and answer questions

Event coaches can use the chat to exchange coaching ideas

Go to [wesoscience.org/events/](https://wesoscience.org/events/) for details on how to join the WESO server and guidelines for its use

# QUESTIONS NOW?

**Please submit your questions now using the Google form that was shared with you in the chat.**

**We will answer live and post all questions and written answers to the website following the meeting.**

