



## Okaloosa County, FL Common Schoolyard Species

### Pillbug

*Armadillidium vulgare*

eol  
Crustaceans



Okaloosa County, Florida  
+ Habitat Generalist

DETR  
Foodweb Role

Adult Body Length	1 cm (avg)
Development	Molts
Lifespan	1.5 yrs (avg)
Number of Eggs	100/yr (avg)
Activity	Nocturnal

IUCN Redlist™

NE

#### Adaptations + Energy Sources

Physical: Back covered in plates that act as armor  
Behavioral: Roll body into ball for protection  
Energy: Plant litter, seeds, scavenged dung

Image: Stanislav Krejčík CC-BY

Check out the 48 most common species of animals, plants, and fungi that have been observed by students at schoolyard bioblitzes across Okaloosa County! Take this deck outside and see what you can find in your schoolyard.

This card deck has been developed as part of the Okaloosa SCIENCE project, a collaborative STEM education grant for Okaloosa County School District in Florida. The goals of this project include enhancing scientific literacy, connecting to place, and building community by engaging in hands-on activities.

Find this card deck and more at:  
[education.eol.org/species\\_cards](http://education.eol.org/species_cards)



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Title Image Credit: Amy Lorenz CC-BY

### Project Description

#### Adaptations + Energy Sources

Physical: Uses venom to subdue prey  
Behavioral: Female carries egg sac/young on abdomen  
Energy: Insects, invertebrates, small vertebrates

Image: Valter Jacinto CC-BY-NC-SA

### Common Name

#### Scientific Name

#### Taxon Group

##### Food Web Roles

DECO	Decomposer: Energy from dead material
AUTO	Autotroph: Energy from sun, water, CO <sub>2</sub>
HERB	Herbivore: Energy from plants
OMNI	Omnivore: Energy from plants, animals
CARN	Carnivore: Energy from animals
APEX	Apex Predator: Top predator
DETR	Detritivore: Energy from dead vegetation
SANG	Sanguinivore: Energy from blood
MULT	Multiple: Energy from multiple sources

Habitat (where species is found)  
+ (indicates species is also found in other habitats)

##### Species Conservation Status

#### IUCN Redlist™

International Union for  
Conservation of Nature

NE	Not Evaluated
LC	Least Concern
DD	Data Deficient
NT	Near Threatened
EN	Endangered

NE Not Evaluated

VU Vulnerable

CR Critically Endangered

EW Extinct in Wild

EX Extinct

### Wolf Spiders

eol  
Arachnids



### Wolf Spiders

Lycosidae  
Arachnids



Okaloosa County, Florida  
+ Habitat Generalist

CARN  
Foodweb Role

Body Length	0.3-3 cm
Development	Molts
Adult Lifespan	1+ years
Number of Eggs	Several dozen
Activity	Nocturnal

IUCN Redlist™

NE

#### Adaptations + Energy Sources

Physical: Uses venom to subdue prey  
Behavioral: Female carries egg sac/young on abdomen  
Energy: Insects, invertebrates, small vertebrates

Image: Valter Jacinto CC-BY-NC-SA

### Jumping Spiders

eol  
Arachnids



### Jumping Spiders

Salticidae  
Arachnids



Okaloosa County, Florida  
+ Urban Habitats

CARN  
Foodweb Role

Body Length	3-17 mm
Development	5-6 molts
Lifespan	1 yr (max)
Number of Eggs	Several broods/yr
Activity	Diurnal

IUCN Redlist™

NE

#### Adaptations + Energy Sources

Physical: Four pairs of large eyes, excellent vision  
Behavioral: Can jump huge distances  
Energy: Insects and other small arthropods

Image: Valter Jacinto CC-BY-NC-SA



## Greenhouse Millipede

*Oxidus gracilis*

eol  
Diplopods



**DET R**  
Okaloosa County, Florida  
+ Urban Habitats Foodweb Role

**Body Length** 1.6-2.1 cm  
**Development** Incomplete: 7 stadia  
**Lifespan** 1-10 years (avg)  
**Number of Eggs** 40-150; ongoing  
**Activity** Nocturnal

**Adaptations + Energy Sources**  
Physical: Contain toxins that taste bad to predators  
Behavioral: Spend nearly all time sheltered under logs  
Energy Sources: Damp and decaying vegetation

Image: Joseph Berger, Bugwood.org CC-BY

## Centipedes

*Class Chilopoda*

eol  
Arthropods



**MULTI**  
Okaloosa County, Florida  
+ Habitat Generalist Foodweb Role

**Body Length** 0.4-15 cm  
**Development** Molts  
**Lifespan** 1-6 yrs  
**Number of Eggs** Variable  
**Activity** Nocturnal, diurnal

**Adaptations + Energy Sources**  
Physical: "Poison jaws" beneath head to capture prey  
Behavioral: Can run very fast to catch prey and escape  
Energy: Smaller arthropods and other invertebrates

Image: Biopix CC-BY-NC

## Variable Dancer

*Argia fumipennis*

eol  
Insects



**CARN**  
Okaloosa County, Florida  
+ Urban Habitats Foodweb Role

**Adult Body Length** 2.9-3.5 cm  
**Development** Incomplete  
**Adult Lifespan** 2-8 weeks  
**Number of Eggs** 1+ per stem  
**Wings** Two pairs

**Adaptations + Energy Sources**  
Physical: Blade-like ovipositor to cut/inject eggs in plant  
Behavioral: Hover over vegetation to pick off insects  
Energy: Small flying insects like midges + mosquitoes

Image: Jim Johnson CC-BY-NC

## Greenstriped Grasshopper

*Chortophaga viridifasciata*

eol  
Insects



**HERB**  
Okaloosa County, Florida  
+ Urban Habitats Foodweb Role

**Adult Body Length** 2.3-3.8 cm  
**Development** Incomplete  
**Adult Lifespan** 1 yr  
**Number of Eggs** 25; many/yr  
**Wings** 2 pairs

**Adaptations + Energy Sources**  
Physical: Long powerful back legs for hopping  
Behavioral: Males make crackling sound to attract mates  
Energy: Grasses, herbs, succulent plants

Image: Greg Lasley CC-BY-NC

## Two-lined Spittle Bug

*Prosapia bicincta*

eol  
Insects



**HERB**  
Okaloosa County, Florida  
+ Urban Habitats Foodweb Role

**Body Length** 0.8-1.0 cm  
**Development** Incomplete  
**Lifespan** 1-2 months  
**Number of Eggs** 50 (avg); 2/yr  
**Wings** 2 pairs

**Adaptations + Energy Sources**  
Physical: Produce foul-smelling chemical defense  
Behavioral: Nymphs live in foam "spittle" to stay moist  
Energy: Turf grasses, crops, ornamental plants, weeds

Image: Mary Keim CC-BY-NC-SA

## Lovebug

*Plecia nearctica*

eol  
Insects



**DET R**  
Okaloosa County, Florida  
+ Urban Habitats Foodweb Role

**Body Length** 0.6-0.9 cm  
**Development** Complete  
**Adult Lifespan** 2-3 days  
**Number of Eggs** 150-600; once  
**Wings** 2 pairs

**Adaptations + Energy Sources**  
Physical: Females are much larger than males  
Behavioral: Mated pairs remain attached for several days  
Energy: Larvae eat decaying vegetation, adults pollinate

Image: Jason Sharp CC-BY-NC-SA



## Festive Tiger Beetle

*Cicindela scutellaris*

eol  
Insects



+ Okaloosa County, Florida  
Coastal Uplands

CARN

Foodweb  
Role

**Adult Body Length** 1.1-1.4 cm

**Development** Complete

**Adult Lifespan** 2 yrs (max)

**Number of Eggs** 50 per season

**Wings** 2 pairs

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

**Physical:** Have large jaws for grabbing prey  
**Behavioral:** Adults chase prey at high speeds (9 km/h)  
**Energy:** Ants and other ground-dwelling arthropods

Image: Mary Keim CC-BY-NC-SA

## Asian Lady Beetle

*Harmonia axyridis*

eol  
Insects



+ Okaloosa County, Florida  
Urban Habitats

CARN

Foodweb  
Role

**Adult Body Length** 5-8 mm

**Development** Complete

**Adult Lifespan** 30-60 days

**Number of Eggs** 25 egg/day; ongoing

**Wings** 2 pairs (modified)

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

**Physical:** Secrete foul-smelling fluid when disturbed  
**Behavioral:** Hibernate in large numbers in structures  
**Energy:** Aphids, mites, thrips, and other small pests

Image: 2010 Dr. Janos Bodor

## German Cockroach

*Blattella germanica*

eol  
Insects



+ Okaloosa County, Florida  
Urban Habitats

DETR

Foodweb  
Role

**Adult Body Length** 1.3-1.6 cm

**Development** Incomplete

**Adult Lifespan** 100-200 days

**Number of Eggs** 120-240/season

**Wings** 2 pairs

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

**Physical:** Carry eggsac until just before hatching  
**Behavioral:** Breed continuously  
**Energy:** Human foods (starches, sweets, meats, etc.)

Image: Dina Elmahdy CC-BY-NC

## Black Carpenter Ant

*Camponotus pennsylvanicus*

eol  
Insects



+ Okaloosa County, Florida  
Habitat Generalist

OMNI

Foodweb  
Role

**Adult Body Length** 0.5-1.6 cm, workers

**Development** Complete

**Adult Lifespan** 0.5-7 yrs (queen)

**Number of Eggs** 5-15; 2/yr

**Wings** Queen + males

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

**Physical:** Antennae are used for communication  
**Behavioral:** Share regurgitated food; increase immunity  
**Energy:** Insects, larvae, nectar, fruit, fungi

Image: Patrick Coin CC-BY-NC-SA

## Red Fire Ant

*Solenopsis invicta*

eol  
Insects



+ Okaloosa County, Florida  
Urban Habitats

OMNI

Foodweb  
Role

**Adult Body Length** 0.2-0.6 cm

**Development** Complete

**Adult Lifespan** 30 days - 6 yrs

**Number of Eggs** 1,500/day (max)

**Wings** Queen, male alates

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

**Physical:** Chewing mouthparts bite, slice, and rip food  
**Behavioral:** Swarm, bite, and sting intruders to mound  
**Energy:** Invertebrates, small reptiles, birds, mammals

Image: 2009 Barry Rice CC-BY-NC-SA

## Southern Yellowjacket

*Vespaula squamosa*

eol  
Insects



+ Okaloosa County, Florida  
Habitat Generalist

OMNI

Foodweb  
Role

**Adult Body Length** 1.25 cm (workers)

**Development** Complete

**Adult Lifespan** <1 yr (workers)

**Number of Eggs** 4,000-5,000/yr

**Wings** 2 pairs

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

**Physical:** Can deliver venomous sting in defense  
**Behavioral:** Nest in the ground, stumps, or trees  
**Energy:** Carrion, live insects, sugary foods

Image: Sean McCann CC-BY-NC-SA



## Common Buckeye

*Junonia coenia*

eol  
Insects



Okaloosa County, Florida  
+ Urban Habitats

HERB  
Foodweb Role

Wingspan	4.2-7 cm
Development	Complete
Adult Lifespan	10 days
Number of Eggs	1 per leaf
Wings	2 pairs

IUCN  
Redlist™

NE

### Adaptations and Energy Source

Physical: Eyespots on wing to ward off predators  
Behavioral: Migrate south in winter  
Energy: Snapdragons, toadflax, asters, plantains

Image: Harvey Barrison CC-BY-SA

## Earthworm

*Lumbricus terrestris*

eol  
Inverts - Annelids



Okaloosa County, Florida  
+ Habitat Generalist

DETR  
Foodweb Role

Adult Body Length	35 cm (max)
Development	4 stages, no molt
Lifespan	6 yrs (avg)
Number of Eggs	1-20; cocoon
Activity	Nocturnal

IUCN  
Redlist™

NE

### Adaptations + Energy Sources

Physical: Bristles on each body segment help grip soil  
Behavioral: Move to surface when feel vibrations in soil  
Energy: Decaying vegetation, feces, carrion

Image: Malcolm Storey CC-BY-NC-SA

## Yellow Garden Slug

*Limax flavus*

eol  
Gastropods



Okaloosa County, Florida  
+ Urban Habitats

DETR  
Foodweb Role

Body Length	7.5-10 cm
Shell/Mantle	20% of body
Lifespan	3-4 yrs (max)
Number of Eggs	40-60 eggs; few/yr
Activity	Nocturnal

IUCN  
Redlist™

NE

### Adaptations + Energy Sources

Physical: Rough tongue called radula for scraping food  
Behavioral: Prefer using gardens and houses as habitat  
Energy: Fungi, lichen, decaying plant materials

Image: Walter Jacinto CC-BY-NC-SA

## Southern Toad

*Anaxyrus terrestris*

eol  
Amphibians



Okaloosa County, Florida  
+ Urban Habitats

CARN  
Foodweb Role

Snout-vent Length	6.5 cm (avg)
Webbing/Toe Pads	Partial; absent
Adult Habitat	Terrestrial; fossorial
Clutch/Broods	2,500-4000; 1/yr
Activity	Nocturnal

IUCN  
Redlist™

LC

### Adaptations + Energy Sources

Physical: Secrete bufotoxin to deter predators  
Behavioral: Burrow underground in winter for warmth  
Energy: Insects, spiders, and other arthropods; snails

Image: 2010 Matthew Niemiller CC-BY-NC

## Green Tree Frog

*Hyla cinerea*

eol  
Amphibians



Okaloosa County, Florida  
+ Urban Habitats

CARN  
Foodweb Role

Snout-vent Length	3.2-6.4 cm
Webbing/Toe Pads	Partial; large pads
Adult Habitat	Arboreal
Clutch / Broods	700-2,000; 1+/yr
Activity	Nocturnal

IUCN  
Redlist™

LC

### Adaptations + Energy Sources

Physical: Bright green color camouflages on plants  
Behavioral: Have calls for mating, alarm, and rain  
Energy: Active insects like mosquitos and flies

Image: selimahharmon CC-BY-NC

## Green Anole

*Anolis carolinensis*

eol  
Reptiles



Okaloosa County, Florida  
+ Urban Habitats

CARN  
Foodweb Role

Total Length	10-20 cm
Adult Weight	2-6 g
Adult Habitat	Arboreal
Clutch/Broods	6-9; 1/yr
Activity	Diurnal

IUCN  
Redlist™

LC

### Adaptations + Energy Sources

Physical: Adhesive pads on toes to climb  
Behavioral: Males puff up throat sac in mating display  
Energy: Insects, other arthropods, mollusks

Image: Wikimedia Commons CC-BY-SA



## Six-lined Racerunner

*Cnemidophorus sexlineatus*

eol  
Reptiles



**CARN**  
Okaloosa County, Florida  
+ Urban Habitats  
Foodweb Role

Total Length	15-24 cm
Adult Weight	200 g (max)
Adult Habitat	Terrestrial
Clutch / Broods	4-6; 1/yr
Activity	Diurnal

**IUCN Redlist™** LC

**Adaptations + Energy Sources**  
Physical: Uses long tail to increase speed/balance  
Behavioral: Most active in hot, dry environments  
Energy: Insects, spiders, other arthropods, snails

Image: Linda Gail Price CC-BY-NC

## Red-tailed Hawk

*Buteo jamaicensis*

eol  
Birds



**APEX**  
Okaloosa County, Florida  
+ Urban Habitats  
Foodweb Role

Wingspan	114-133 cm
Adult Weight	0.9-1.5 kg
Lifespan	10-21 yrs (avg)
Clutch / Broods	1-5; 1/yr
Nest Type	Pile on tree or cliff

**IUCN Redlist™** LC

**Adaptations + Energy Sources**  
Physical: Sharp talons for catching prey  
Behavioral: Soar above open areas searching for prey  
Energy: Rodents, rabbits, birds, snakes, carrion

Image: Don DeBold. Wikimedia Commons CC-BY-SA

## Osprey

*Pandion haliaetus*

eol  
Birds



**CARN**  
Okaloosa County, Florida  
+ Coastal Uplands  
Foodweb Role

Wingspan	150-180 cm
Adult Weight	1.4-2 kg
Lifespan	25 yrs (max)
Clutch Size	1-4; 1/yr
Nest Type	Tree-top or platform

**IUCN Redlist™** LC

**Adaptations + Energy Sources**  
Physical: Barbed pads on talons to grasp slippery fish  
Behavioral: Turn fish to face forward to reduce drag  
Energy: Freshwater and marine fish

Image: Finiky CC-BY

## Mourning Dove

*Zenaidura macroura*

eol  
Birds



**HERB**  
Okaloosa County, Florida  
+ Urban Habitats  
Foodweb Role

Wingspan	45 cm
Adult Weight	86-170 g
Lifespan	1.5 yrs (avg)
Clutch/Broods	2 eggs; 1-6/yr
Nest Type	Flimsy cup in tree

**IUCN Redlist™** LC

**Adaptations + Energy Sources**  
Physical: Enlarged esophagus called crop to store seeds  
Behavioral: Fly in tight flocks during courtship  
Energy: Seeds, mainly from grasses and grains

Image: e\_monk CC-BY-NC-SA

## Red-bellied Woodpecker

*Melanerpes carolinus*

eol  
Birds



**OMNI**  
Okaloosa County, Florida  
+ Hardwood Forested Uplands  
Foodweb Role

Wingspan	33-42 cm
Adult Weight	56-91 g
Lifespan	12 yrs (max)
Clutch/Broods	2-6; 1-3/yr
Nest Type	Tree cavity

**IUCN Redlist™** LC

**Adaptations + Energy Sources**  
Physical: Stiff tail feathers support bird as it forages  
Behavioral: Sometimes stores nuts in crevices for later  
Energy: Insects, spiders, arthropods, seeds, nuts

Image: Ken Thomas

## Chimney Swift

*Chaetura pelasgica*

eol  
Birds



**CARN**  
Okaloosa County, Florida  
+ Urban Habitats  
Foodweb Role

Wingspan	27-30 cm
Adult Weight	17-30 g
Lifespan	10 yrs (max)
Clutch; Broods	3-5; 1-2/yr
Nest Type	Nest in chimneys

**IUCN Redlist™** NT

**Adaptations + Energy Sources**  
Physical: Long claws for perching vertically in nest  
Behavioral: Fly almost constantly except overnight  
Energy: Flying insects

Image: Greg Lasley CC-BY-NC



**American Crow**  
*Corvus brachyrhynchos*

**OMNI**  
Foodweb Role

**Okaloosa County, Florida**  
Habitat Generalist

<b>Wingspan</b>	85-100 cm
<b>Adult Weight</b>	316-620 g
<b>Lifespan</b>	14 yrs (max)
<b>Clutch / Broods</b>	3-9; 1-2/yr
<b>Nest Type</b>	Cup in tree

**Adaptations + Energy Sources**

**Physical:** Bill has slight hook on the end for hunting

**Behavioral:** Known to steal food from other animals

**Energy:** Seeds, fruits, mice, insects, fish, eggs, carrion

Image: Greg Lasley CC-BY-NC

**Blue Jay**  
*Cyanocitta cristata*

**OMNI**  
Foodweb Role

**Okalooa County, Florida**  
Urban Habitats

<b>Wingspan</b>	34-43 cm
<b>Adult Weight</b>	70-100 g
<b>Lifespan</b>	7 yrs (avg)
<b>Clutch/Broods</b>	2-7; 1/yr
<b>Nest Type</b>	Open cup in tree

**Adaptations + Energy Sources**

Physical: Have pouch under tongue to store acorns

Behavioral: Often mimic the calls of hawks

Energy: Seeds, nuts, arthropods, eggs, nestlings

Image: Saforrest CC-BY-SA

Eastern Bluebird		EOL Birds
<i>Sialia sialis</i>		
		
	Okaloosa County, Florida Coastal Uplands	 
<b>Wingspan</b>	25–32 cm	
<b>Adult Weight</b>	28–32 g	
<b>Lifespan</b>	6–10 years	
<b>Clutch / Broods</b>	2–7; 1–3/yr	
<b>Nest Type</b>	Tree cavity	
<b>Adaptations + Energy Sources</b>		
Physical: Males have bright blue and red plumage		
Behavioral: Defend feeding and nesting territories		
Energy: Ground-dwelling insects, spiders, and berries		
Image: Lothiriel01 CC-BY-NC		

**Northern Mockingbird**  
*Mimus polyglottos*

**OMNI**

**Foodweb Role**

Wingspan	31-35 cm
Adult Weight	45-58 g
Lifespan	8 yrs (avg)
Clutch / Broods	2-6; 2-3/yr
Nest Type	Cup

**Adaptations + Energy Sources**

**Physical:** White wing patches make wings look larger

**Behavioral:** Sing 39+ songs that mimic sounds

**Energy:** Mainly berries and fruits, insects, some lizards

Image: gaberlunzi CC-BY-NC-SA

**European Starling**  
*Sturnus vulgaris*

**eOL**  
Birds

**OMNI**  
Foodweb  
Role

**Wingspan** 30-40 cm  
**Adult Weight** 70-100 g  
**Lifespan** 15 yrs (avg)  
**Clutch/Broods** 3-6; 1-2/yr  
**Nest Type** Cavity in structure

**LC**  
**IUCN**  
Redlist™

**Adaptations + Energy Sources**

Physical: Eyes rotate forward; can see in front of bill  
Behavioral: Form huge flocks in a tight ribbon formations  
Energy: Insects, arthropods, fruits

Image: Arnstein Rønning CC-BY-SA

**House Sparrow**  
*Passer domesticus*

eol  
Birds

OMNI  
Foodweb Role

	Okaloosa County, Florida
+	Urban Habitats

**Wingspan** 19-25 cm  
**Adult Weight** 27-29 g  
**Lifespan** 13 yrs (max)  
**Clutch/Broods** 1-8 eggs; 1-4/yr  
**Nest Type** Cavity in structure

**Adaptations + Energy Sources**

Physical: Males with brighter plumage are dominant  
Behavioral: Outcompetes native birds for cavity nests  
Energy: Insects, arthropods, seeds, grain, nuts, fruit

Image: Arnold Paul CC-BY-SA



## Eastern Gray Squirrel Mammals



 Okaloosa County, Florida  
+ Habitat Generalist 

Body Length	23-30 cm
Adult Weight	338-750 g
Lifespan	6 years (avg)
Offspring/Litters	2-4 (avg); 2/yr
Female Maturity	15 months



**Adaptations + Energy Sources**  
 Physical: Rotating leg joints allow head-first tree descent  
 Behavioral: Communicate with gestures and vocalizations  
 Energy: Nuts, seeds, fruit and insects

Image: test CC-BY

## Longleaf Pine Conifers



 Okaloosa County, Florida  
+ Pines/Sandhill 

Height	30.5 - 36.6 m
Growth Form	Tree
Leaf Duration	Evergreen
Flower Color	Yellow
Sunlight/Soil	Sun; dry, sandy



**Adaptations + Energy Sources**  
 Growth: Develop thick, fire-resistant bark  
 Reproduction: Seeds grow best on bare soil after fire  
 Energy: Sunlight, carbon dioxide, water

Image: Mary Keim CC-BY-NC-SA

## Southern Magnolia Flowering Plants



 Okaloosa County, Florida  
+ Hardwood Forested Uplands 

Height	30 m (max)
Growth Form	Tree
Leaf Duration	Evergreen
Flower Color	White
Sunlight/Soil	Variable; loamy



**Adaptations + Energy Sources**  
 Growth: Evergreen leaves have waxy top to retain water  
 Reproduction: Mammals and birds eat, disperse seeds  
 Energy: Sunlight, carbon dioxide, water

Image: Forest & Kim Starr CC-BY

## Sand Live Oak Flowering Plants



 Okaloosa County, Florida  
+ Urban Habitats 

Height	9.1 m (avg)
Growth Form	Tree
Leaf Duration	Evergreen
Flower Color	Green
Sunlight/Soil	Full sun; sandy



**Adaptations + Energy Sources**  
 Growth: Most of tree is underground, regrows after fire  
 Reproduction: Acorns favored by wildlife, spread seeds  
 Energy: Sunlight, carbon dioxide, water

Image: Homer Edward Price CC-BY

## Yaupon Holly Flowering Plants



 Okaloosa County, Florida  
+ Hardwood Forested Uplands 

Height	4.6-7.6 m
Growth Form	Shrub, tree
Leaf Duration	Evergreen
Flower Color	White
Sunlight/Soil	Sun/shade; moist



**Adaptations + Energy Sources**  
 Growth: High tolerance for drought, water, and sea salt  
 Reproduction: Birds eat and disperse red berries  
 Energy: Sunlight, carbon dioxide, water

Image: Mary Keim CC-BY-NC-SA

## Saw Palmetto Flowering Plants



 Okaloosa County, Florida  
+ Coastal Uplands 

Height	0.6-2.1 m
Growth Form	Shrub
Leaf Duration	Evergreen
Flower Color	Yellow-white
Sunlight/Soil	Shade; sandy soil



**Adaptations + Energy Sources**  
 Growth: Shade-tolerant leaves can live up to 3.5 years  
 Reproduction: Seeds dispersed by fruit-eating animals  
 Energy: Sunlight, carbon dioxide, water

Image: Miguel Vieira from Walnut Creek, CA, USA CC-BY



## Eastern Prickly Pear

*Opuntia humifusa*

eol

Flowering Plants



+ Okaloosa County, Florida  
Coastal Uplands

AUTO

Foodweb  
Role

Height	7.5-10 cm
Growth Form	Cactus
Life Cycle	Perennial
Flower Color	Yellow and red
Sunlight/Soil	Full sun; sandy

LC

IUCN  
Redlist™

### Adaptations + Energy Sources

Growth: Spines on pads protect from being eaten  
Reproduction: Individual pads can break off and sprout  
Energy: Sunlight, carbon dioxide, water

Image: Matt Muir CC-BY-NC-SA

## Earleaf Greenbrier

*Smilax auriculata*

eol

Flowering Plants



+ Okaloosa County, Florida  
Habitat Generalist

AUTO

Foodweb  
Role

Height	7-9 m
Growth Form	Vine
Life Cycle	Perennial
Flower Color	Yellow
Sunlight/Soil	Full/part sun; sandy

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

Growth: Climbs other plants as a vine  
Reproduction: Has "tubers" below ground that sprout  
Energy: Sunlight, carbon dioxide, water

Image: Mary Keim CC-BY-NC-SA

## Virginia Creeper

*Parthenocissus quinquefolia*

eol

Flowering Plants



+ Okaloosa County, Florida  
Habitat Generalist

AUTO

Foodweb  
Role

Length	2 m (max)
Growth Form	Vine
Life Cycle	Perennial
Flower Color	Green
Sunlight/Soil	Variable; variable

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

Growth: Vine climbs trees and structures for sunlight  
Reproduction: Birds eat and disperse berries  
Energy: Sunlight, carbon dioxide, water

Image: Mary Keim CC-BY-NC-SA

## Florida Pusley

*Richardia scabra*

eol

Flowering Plants



+ Okaloosa County, Florida  
Urban Habitats

AUTO

Foodweb  
Role

Height	80 cm (max)
Growth Form	Herbaceous
Life Cycle	Annual
Flower Color	White
Sunlight/Soil	Full sun; variable

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

Growth: Grows easily in disturbed, sandy areas  
Reproduction: Blooms anytime throughout the year  
Energy: Sunlight, carbon dioxide, water

Image: Mark Hyde, Bart Wursten and Petra Ballings CC-BY-NC

## Yellow Wood Sorrel

*Oxalis dillenii*

eol

Flowering Plants



+ Okaloosa County, Florida  
Urban Habitats

AUTO

Foodweb  
Role

Height	7-20 cm
Growth Form	Herbaceous
Life Cycle	Perennial
Flower Color	Yellow
Sunlight/Soil	Full sun; disturbed

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

Growth: Leaves fold up at night and open during day  
Reproduction: Seed capsules explode when disturbed  
Energy: Sunlight, carbon dioxide, water

Image: John Hilty CC-BY-NC

## Common Dandelion

*Taraxacum sylvanicum*

eol

Flowering Plants



+ Okaloosa County, Florida  
Urban Habitats

AUTO

Foodweb  
Role

Height	46 cm (max)
Growth Form	Herb/Forb
Life Cycle	Perennial
Flower Color	Yellow
Sunlight/Soil	Open; disturbed

NE

IUCN  
Redlist™

### Adaptations + Energy Sources

Growth: Rosettes cover ground, blocking other plants  
Reproduction: Seeds light and fly on wind or by force  
Energy: Sunlight, carbon dioxide, water

Image: 2008 Keir Morse CC-BY-NC-SA



## Evening Primrose

*Oenothera biennis*

eol  
Flowering Plants



Okaloosa County, Florida  
+ Urban Habitats

Height	0.6-1.8 m	
Growth Form	Herbaceous	
Life Cycle	Biennial	
Flower Color	Yellow	
Sunlight/Soil	Full sun; dry, sandy	

### Adaptations + Energy Flow

Growth: Tolerant of drought and shade  
Reproduction: Blooms at night to attract night pollinators  
Energy: Sunlight, carbon dioxide, water

Image: Malcolm Storey CC-BY-NC-SA

## Mock Vervain

*Glandularia pulchella*

eol  
Flowering Plants



Okaloosa County, Florida  
+ Urban Habitats

Height	15-20 cm	
Growth Form	Herbaceous	
Life Cycle	Perennial	
Flower Color	Pink-purple	
Sunlight/Soil	Part-shade; sandy	

### Adaptations + Energy Sources

Growth: Tolerant of drought and dry soils  
Reproduction: Bright flowers to attract pollinators  
Energy: Sunlight, carbon dioxide, water

Image: Forest & Kim Starr CC-BY

## Field Mushroom

*Agaricus campestris*

eol  
Fungi



Okaloosa County, Florida  
+ Urban Habitats

Cap Size	3-11 cm	
Growth Habit	Central stem	
Spore Surface	Gills	
Cap Color	White	
Spore Print	Dark brown	

### Adaptations + Energy Sources

Growth: Hyphae threads absorb nutrients from food  
Reproduction: Gill surface increases spore production  
Energy: Absorb nutrients from dead organic matter

Image: Drew Henderson CC-BY-NC-SA

## eol species cards

**Adaptation:** A physical characteristic or behavior that helps an organism survive in its environment

**Adult Habitat:** The place an adult amphibian or reptile lives and finds its resources: arboreal (in trees), terrestrial (on ground), fossorial (burrowing), or aquatic (in water)

**Brood/Litter:** Group of young produced at one time

**Carapace:** Shell of a turtle or head and thorax of arthropods

**Cathemeral:** Active during day and night

**Clutch Size:** Number of eggs laid in a nest at one time

**Complete Metamorphosis:** Some insects have a four stage life cycle: egg, larva, pupa, adult

**Crepuscular:** Active at dawn and dusk

**Direct Development:** In salamanders, eggs laid on land without larval stage; young resemble adults

## eol species cards

**Diurnal:** Active during the day

**Habitat:** The area an organism lives and can find its resources

**Indirect Development:** In salamanders, eggs are laid in water and spend larval stage in water

**Growth Form:** Classification of plants as trees, shrubs, herbaceous, and grasses

**Incomplete Metamorphosis:** Some insects have a three stage life cycle: eggs, nymph, adult

**Molt:** The act of shedding exoskeleton, skin or feathers as an animal grows

**Snout-vent Length:** In amphibians and reptiles, the length from tip of nose to tail base (cloaca)

**Standard Length:** In fishes, length from tip of snout to end of last vertebra

**Toe pads/Webbing:** In frogs and toads, the size of sticky toe pads to climb or extent of webbing to swim

## Vocabulary

## Vocabulary

