



Nature

Merit Badge Workbook



This workbook can help you but you still need to read the merit badge pamphlet.

This Workbook can help you organize your thoughts as you prepare to meet with your merit badge counselor

Merit Badge Counselors may not require the use of this or any similar workbooks.

You still must satisfy your counselor that you can demonstrate each skill and have learned the information. You should use the work space provided for each requirement to keep track of which requirements have been completed, and to make notes for discussing the item with your counselor, not for providing full and complete answers.

If a requirement says that you must take an action using words such as "discuss", "show", "tell", "explain", "demonstrate", "identify", etc, that is what you must do.

No one may add or subtract from the official requirements found in Scouts BSA Requirements (Pub.# 33216) and/or on Scouting.org.

The requirements were last issued or revised in 2023 • This workbook was updated in December 2022.

Scout's Name: _____ Unit: _____

Counselor's Name: _____ Phone No.: _____ Email: _____

Please submit errors, omissions, comments or suggestions about this **workbook** to: Workbooks@USScouts.Org

Comments or suggestions for changes to the **requirements** for the **merit badge** should be sent to: Merit.Badge@Scouting.Org

1. Name three ways in which plants are important to animals.

1.

2.

3.

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Name a plant that is protected in your state or region, and explain why it is at risk. _____

2. Name three ways in which animals are important to plants.

1.	
2.	
3.	

Name an animal that is protected in your state or region, and explain why it is at risk. _____

3. Explain the term "food chain."

Give an example of a four-step land food chain and a four-step water food chain.

Land food chain

1.	
2.	
3.	
4.	

Water food chain

1.	
2.	
3.	
4.	

4. Do all of the requirements in FIVE of the following fields:

a. **Birds**

1. In the field, identify eight species of birds.

1.	
2.	
3.	
4.	
5.	
6.	
7.	
8.	

2. Make and set out a birdhouse OR a feeding station OR a birdbath.

List what birds used it during a period of one month.

(There is a table you may use to record your observations at the end of this workbook.)

b. **Mammals**

1. In the field, identify three species of wild mammals.

1.	
2.	
3.	

2. Make plaster casts of the tracks of a wild mammal.

c. **Reptiles or Amphibians**

1. Show that you can recognize the venomous snakes in your area.

2. In the field, identify three species of reptiles or amphibians.

1.	
2.	
3.	

3. Recognize one species of toad or frog by voice; OR identify one reptile or amphibian by eggs, den, burrow, or other signs.

d. **Insects or Spiders**

1. Collect, and identify either in the field or through photographs 10 species of insects or spiders.*

1.	
2.	
3.	
4.	
5.	
6.	
7.	
8.	
9.	
10.	

- 2. Hatch an insect from the pupa or cocoon; OR hatch adults from nymphs; OR keep larvae until they form pupae or cocoons; OR keep a colony of ants or bees through one season.

e. Fish

- 1. Identify two species of fish native to your area.

1.
2.

- 2. Collect four kinds of animal food eaten by fish in the wild.

1.
2.
3.
4.

f. Mollusks and Crustaceans

- 1. Identify five species of mollusks and crustaceans.

1.
2.
3.
4.
5.

- 2. Collect, mount, and label six shells.

1.
2.
3.
4.
5.
6.

g. Plants

- 1. In the field, identify 15 species of wild plants.

1.
2.
3.
4.
5.
6.
7.
8.
9.
10.
11.

12.	
13.	
14.	
15.	

- 2. Do ONE of the following options:
- a. Collect and label the seeds of six plants OR the leaves of 12 plants.
- b. Photograph the seeds of six plants OR the leaves of 12 plants and create a catalog of your photos.

1.		7.	
2.		8.	
3.		9.	
4.		10.	
5.		11.	
6.		12.	

h. **Soils and Rocks**

- 1. Collect and identify three different types of soil that represent soils high in sand, clay and humus.

High in Sand	
High in Clay	
High in Humus	

- 2. Collect and identify five different types of rocks from your area.

1.	
2.	
3.	
4.	
5.	

- 5. Discuss the principle of Leave No Trace and how it relates to nature.

- 6. Do the following:
 - a. Explain what succession is to your counselor.

- b. Visit a natural area (forest, grassland, meadow, water feature) and explain what stage of succession (both plant and animal) the area is in.

Talk about what community/succession stages may have been there before and what community/succession stages may replace what you see now.

Discuss what disturbances or changes have taken place in the past to create this landscape and what changes may occur in the future to change the landscape further.

*Photos may be those taken with your own equipment or gathered from other sources.

Note: In most cases all specimens should be returned to the wild at the location of original capture after the requirements have been met. Check with your merit badge counselor for those instances where the return of these specimens would not be appropriate.

Under the Endangered Species Act of 1973, some plants and animals are or may be protected by federal law. The same ones and/or others may be protected by state law. Be sure that you do not collect protected species.

Your state may require that you purchase and carry a license to collect certain species. Check with the wildlife and fish and game officials in your state regarding species regulations before you begin to collect.

When working on merit badges, Scouts and Scouters should be aware of some vital information in the current edition of the *Guide to Advancement* (BSA publication 33088). Important excerpts from that publication can be downloaded from <http://usscouts.org/advance/docs/GTA-Excerpts-meritbadges.pdf>. You can download a complete copy of the *Guide to Advancement* from <http://www.scouting.org/filestore/pdf/33088.pdf>.

Requirement 4a(2) Listing of what birds used the birdhouse, feeding station, or birdbath you set out

Starting Date:					Ending Date:			
Week	Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	
1.								
2.								
3.								
4.								
5.								