

# Council Patches

Cave Explorer J C S A

This program is designed to offer girls the opportunity to learn about caves as a natural wonder, to appreciate them as a habitat and to stretch themselves as they explore local caves.

J C S A

Complete at least one activity from each section.

## Discover:

1. Make a list or chart showing the steps needed to prepare to go caving. Include safety, equipment and clothing.
2. Identify caves in your area. A list of some of the caves within or near the Girl Scout council boundaries follows. You may know of others.
  - Maquoketa Caves (Jackson County, Iowa)
  - Crystal Lake Cave (Dubuque County, Iowa)
  - Spook Cave (Clayton County, Iowa)
  - Niagara Cave (Harmony, Minnesota on the Iowa border)
3. Study different kinds of caves at your local library or on-line and do one of the following:
  - Make drawings showing the different kinds of caves.
  - Find out about the effect of weathering on caves.
  - Find out about groups of people who have lived in caves.
  - Make a model of a cave and label the different parts.
4. Study the plant and animal life that might be found in a cave. Write a paragraph about what you find and discuss at a troop meeting.
5. Discover how sinkholes are formed through the following experiment: Cut a two-liter clear plastic pop bottle in half and cut a small hole in the bottom of the bottle. Put in 1 cup of gravel in the bottom of the bottle. Add sugar cubes in stacks of three or four (about 9-12 altogether). Add gravel around the sugar cubes to keep them from falling over. Pour water over the sugar and watch the effect. The water will drain out the bottom. This is how sinkholes are formed.

## Connect:

1. Invite a speaker to come and talk to your troop about caving. Check with the Conservation Board, your county Department of Natural Resources or your local college or university science department for information about caves or resource people in your area.
2. Attend a Girl Scout or community event about caving.
3. Explore a cave and look for some of the things you have learned from your research. Please note *Safety-Wise* and the Volunteer Resources Guide for safety precautions with caving.

## Take Action:

1. Make posters on cave safety or "Do Not Litter" signs that could be placed in or near a cave in your area. Check with the park ranger or person in charge of the cave for permission to display your posters.
2. Present your cave knowledge to another group of Girl Scouts or to another youth group in your community.
3. Make a personal action plan to help preserve caves so that others may enjoy them into the future.