## **Achievement Checklist**

To keep track of your achievements as you complete them, put a checkmark in the boxes next to each activity. To earn a badge, you should complete at least 3 activities for each category and then have your leader send a signed notice to the AFMS Juniors Activities Chair. To earn the Rockhound badge, you need to earn at least 6 of the 15 badges.

| 1. Rocks & Minerals                                | Date badge earned:      |    |
|--|-------------------------|----|
| □ 1.1 Learning the characteristics of minerals.    |                         |    |
| □ 1.2 Making and using a mineral ID kit.           |                         |    |
| □ 1.3 Building a mineral collection.               |                         |    |
| □ 1.4 The three rock types.                        |                         |    |
| □ 1.5 Crystal shapes.                              |                         |    |
| □ 1.6 Growing crystals.                            |                         |    |
| □ 1.7 State rocks, minerals, and gemstones.        |                         |    |
| 2. Earth Resources                                 | Date badge earned:      |    |
| □ 2.1 Everyday uses of rocks and minerals.         |                         |    |
| □ 2.2 Minerals in the home.                        |                         |    |
| □ 2.3 Collecting everyday objects and the minera   | ls that went into them. |    |
| □ 2.4 Field trip to a mine or quarry.              |                         |    |
| □ 2.5 Field trip to a hardware store.              |                         |    |
| □ 2.6 Careers in the earth sciences.               |                         |    |
| 3. Fossils   | Date badge earned:      |    |
| □ 3.1 The geological time chart.                   |                         |    |
| □ 3.2 Types of fossilization and making a fossil.  |                         |    |
| □ 3.3 The forms of life.                           |                         |    |
| □ 3.4 Collecting fossils.                          |                         |    |
| □ 3.5 A fossil-collecting field trip.              |                         |    |
| □ 3.6 Your state fossil.                           |                         |    |
| □ 3.7 Dinosaurs.                                   |                         |    |
| 4. Lapidary Arts                                   | Date badge earned:      |    |
| □ 4.1 Learning about lapidary rocks.               |                         | •, |
| □ 4.2 Choosing a lapidary project.                 |                         |    |
| □ 4.3 *Workshop safety and maintenance* (requi     |                         |    |
| □ 4.4 *Completing a lapidary project* (required to | to earn this badge).    |    |
| □ 4.5 Sharing your lapidary project.               |                         |    |
| 5. Collecting                                      | Date badge earned:      |    |
| □ 5.1 Building a collection.                       |                         |    |
| □ 5.2 Cataloging and labeling your collection.     |                         |    |
| □ 5.3 Storing a collection.                        |                         |    |
| □ 5.4 Displaying your collection.                  |                         |    |
| □ 5.5 Reporting about your collection.             |                         |    |

| 6. Showmanship   | Date badge earned:                                 |
|--|--|
| □ 6.1 Techniques for effective displays.   | -  |
| □ 6.2 Holding a workshop on display ideas.   |  |
| □ 6.3 Observing and evaluating displays.   |  |
| □ 6.4 *Making your own public display* (required   | to earn this badge).                               |
| □ 6.5 Entering competition.  |  |
| 7. Communication   | Date badge earned:                                 |
| □ 7.1 Oral report.   |  |
| □ 7.2 Written report or newsletter article.  |  |
| □ 7.3 Bulletin board display.  |  |
| □ 7.4 Corresponding with experts.  |  |
| □ 7.5 Holding a symposium.   |  |
| □ 7.6 Writing a field trip guide.  |  |
| 8. Field Trips   | Date badge earned:                                 |
| □ 8.1 * Field trip etiquette and AFMS Code of Ethi   |  |
| □ 8.2 Field trip planning.   |  |
| □ 8.3 *Taking a field trip* (required to earn this ba  | dge).  |
| □ 8.4 Record keeping.  |  |
| □ 8.5 The indoor field trip.   |  |
|  |  |
| 9. Leadership  | Date badge earned:                                 |
| 9. Leadership  □ 9.1 Becoming a youth officer.   | Date badge earned:                                 |
| <ul><li>9. Leadership</li><li>□ 9.1 Becoming a youth officer.</li><li>□ 9.2 Organizing a group display.</li></ul>  | Date badge earned:                                 |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentation</li> </ul>  | -  |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentation</li> <li>□ 9.4 Planning and leading a field trip.</li> </ul>  | on.  |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentation</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> </ul>   | on.<br>youth newsletter.                           |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local get</li> </ul>   | on.<br>youth newsletter.                           |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentation</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> </ul>   | on.<br>youth newsletter.                           |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local get</li> </ul>   | on.<br>youth newsletter.                           |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local ge</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> </ul>   | on.<br>youth newsletter.<br>em show.               |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local get</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> </ul>  | on.<br>youth newsletter.<br>em show.               |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local get</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> </ul>   | on.<br>youth newsletter.<br>em show.               |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local ge</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> <li>□ 10.4 Sedimentary rocks.</li> </ul>   | on.<br>youth newsletter.<br>em show.               |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local get</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> </ul>   | on.<br>youth newsletter.<br>em show.               |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local ge</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> <li>□ 10.4 Sedimentary rocks.</li> </ul>   | on.<br>youth newsletter.<br>em show.               |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local ge</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> <li>□ 10.4 Sedimentary rocks.</li> <li>□ 10.5 Metamorphic rocks.</li> <li>11. Earth in Space</li> <li>□ 11.1 Modeling the solar system.</li> </ul>   | on. youth newsletter. em show.  Date badge earned: |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local ge</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> <li>□ 10.4 Sedimentary rocks.</li> <li>□ 10.5 Metamorphic rocks.</li> <li>11. Earth in Space</li> <li>□ 11.1 Modeling the solar system.</li> <li>□ 11.2 Learning about visitors from space.</li> </ul>   | on. youth newsletter. em show.  Date badge earned: |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local ge</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> <li>□ 10.4 Sedimentary rocks.</li> <li>□ 10.5 Metamorphic rocks.</li> <li>11. Earth in Space</li> <li>□ 11.1 Modeling the solar system.</li> <li>□ 11.2 Learning about visitors from space.</li> <li>□ 11.3 Effects of meteorites and famous craters.</li> </ul> | on. youth newsletter. em show.  Date badge earned: |
| <ul> <li>□ 9.1 Becoming a youth officer.</li> <li>□ 9.2 Organizing a group display.</li> <li>□ 9.3 Leading a show-and-tell session or presentati</li> <li>□ 9.4 Planning and leading a field trip.</li> <li>□ 9.5 Overseeing a newsletter column or an entire</li> <li>□ 9.6 Managing a youth activity booth at a local ge</li> <li>□ 9.7 Mentoring.</li> <li>10. Earth Processes</li> <li>□ 10.1 What is a rock?</li> <li>□ 10.2 Plate tectonics and the rock cycle.</li> <li>□ 10.3 Igneous rocks.</li> <li>□ 10.4 Sedimentary rocks.</li> <li>□ 10.5 Metamorphic rocks.</li> <li>11. Earth in Space</li> <li>□ 11.1 Modeling the solar system.</li> <li>□ 11.2 Learning about visitors from space.</li> </ul>   | on. youth newsletter. em show.  Date badge earned: |

| <ul> <li>12. Gold Panning &amp; Prospecting</li> <li>□ 12.1 Gold as a mineral.</li> <li>□ 12.2 Uses of gold.</li> <li>□ 12.3 Gold throughout history.</li> <li>□ 12.4 Gold resources in your own state or</li> <li>□ 12.5 Field trip to a gold mine.</li> <li>□ 12.6 Panning for gold.</li> </ul>  | Date badge earned:region.  |
|--|--|
| <ul> <li>13. Gemstone Lore &amp; Legend</li> <li>□ 13.1 Anniversary stones.</li> <li>□ 13.2 Birthstones and the Zodiac.</li> <li>□ 13.3 Fabled gemstones.</li> <li>□ 13.4 Gems in religion.</li> <li>□ 13.5 Mysticism and minerals.</li> </ul>   | Date badge earned:   |
| <ul> <li>14. Stone Age Tools &amp; Art</li> <li>□ 14.1 Rocks and minerals used as tools.</li> <li>□ 14.2 Making stone tools.</li> <li>□ 14.3 Making stone tools and art from clay</li> <li>□ 14.4 Making rock art.</li> <li>□ 14.5 Recording and interpreting rock art.</li> <li>□ 14.6 Visiting a museum or Native American</li> </ul>      |  |
| 15. Rocking on the Computer  □ 15.1 Exploring the web.  □ 15.2 Reporting on favorite web sites.  □ 15.3 Making presentations with the computer of the activities you've completed. When you and have your FRA leader sign and forward chair to receive your Rockhound badge. | cally. o earn 6 or more of the 15 badges. Check off have earned 6 or more badges, sign below |
|  | Date completed   |
| My signature   | Youth leader's signature   |
| Name of my club  | Youth Leader's preferred mailing address for receiving the badge:                            |
|  |  |
|  |  |