Are You Into It?

If you know where you are and where you are going Geospatial Mapping (GPS/GIS) should be on your map. Make your own maps and find your way using the technology and software that puts the world at your fingertips.

- Develop an interest and understanding of global positioning and global information systems.
- Develop problem solving and logical reasoning skills.
- Improve communication and teamwork skills by working the way scientists and engineers do - in teams.
- Develop responsible attitudes about science and technology and how they relate to the real world and people’s lives.
- Gain experience in problem solving and decision-making using science process skills.
- Develop knowledge and skills related to geospatial mapping technologies.

Here’s what you can do all year!

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<td>Learn how to use a compass or a GPS unit.</td>
<td>Route your trail on foot or on a bicycle using a compass or GPS unit</td>
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<td>Discover all the ways interactive maps and GPS units are used to help us learn about and navigate our world.</td>
<td>Learn how to create an interactive GIS map and how to record and use GPS data.</td>
<td>Use mapping technologies to map an important resource in your community and publish it on the Web.</td>
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<td>Make and maintain a local geocache.</td>
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Step It Up!

Pass it on! Now that you know how, share it with others. Here are ideas to get you started.

Communication

- Give a presentation on geospatial mapping and how it is used on your community

Citizenship

- Create an online map of an important community resource such as child care centers or tourist attractions and work with your city to make it available through their website

Leadership

- Teach others how to use a GPS application
- Develop a workshop to teach others about geocaching

Learn more at www.extension.iastate.edu/4h/projects/geospatial-mapping-technology
or contact your county ISU Extension Office
Take Geospatial Mapping further!

Here are other opportunities to explore geospatial mapping:

- Contact your county ISU Extension Office for local workshops, activities, and events. [http://www.extension.iastate.edu/content/county-offices](http://www.extension.iastate.edu/content/county-offices)
- Want to meet others interested in the geospatial mapping? Check out 4-H camps and the Iowa 4-H Center. [http://www.extension.iastate.edu/4h/camping](http://www.extension.iastate.edu/4h/camping)
- Enter your science experiment or engineering design in a local science fair or the State Science + Technology Fair of Iowa. [http://www.sciencedafiowa.org/](http://www.sciencedafiowa.org/)
- Is it county fair time? Consider taking an exhibit, a piece of your project learning to the fair for judging and to show off what you have learned. It might get selected to go to the Iowa State Fair. [http://www.extension.iastate.edu/4h/statefair](http://www.extension.iastate.edu/4h/statefair)
- Attend Iowa 4-H Youth Conference and participate in workshops, motivational speakers and a community service project, bringing ideas back to your community. [http://www.extension.iastate.edu/4h/StateConference/](http://www.extension.iastate.edu/4h/StateConference/)
- Interested in a college education in fields related to geospatial mapping technologies or engineering? Schedule a visit with Iowa State University to explore those majors. [www.iastate.edu](http://www.iastate.edu)

### Resources

#### 4-H Resources

- Check out GPS kits: contact your local county Extension office
- Geospatial – Exploring Spaces, Going Places CD [http://www.4-hmail.org/Product/4-hcurriculum-geospatial/08358.aspx](http://www.4-hmail.org/Product/4-hcurriculum-geospatial/08358.aspx)
- 4-H GIS GPS Facebook Group [https://www.facebook.com/4hgisgps](https://www.facebook.com/4hgisgps)
- Virginia Cooperative Extension GPS/GIS [http://www.4-h.ext.vt.edu/programs/nree/gpsgis/](http://www.4-h.ext.vt.edu/programs/nree/gpsgis/)
- Maps & Apps NYSD Activity [http://www.4-h.org/4-h-national-youth-science-day/nyshome.aspx](http://www.4-h.org/4-h-national-youth-science-day/nyshome.aspx)

#### More Resources

- ESRI 4-H and GIS [http://www.esri.com/industries/k-12/4-h](http://www.esri.com/industries/k-12/4-h)
- Geographic Information Systems [http://www.gis.com](http://www.gis.com)
- University of Missouri Extension [http://4h.missouri.edu/programs/mapping/](http://4h.missouri.edu/programs/mapping/)
- Illinois 4-H Mapmakers [http://web.extension.illinois.edu/4hmapmakers/resources.cfm](http://web.extension.illinois.edu/4hmapmakers/resources.cfm)
- Washington State University Extension 4-H [http://whatcom.wsu.edu/4-h/mapping/](http://whatcom.wsu.edu/4-h/mapping/)

#### Record Keeping

Find all your record keeping tools at: [http://www.extension.iastate.edu/4h/page/record-keeping](http://www.extension.iastate.edu/4h/page/record-keeping)

- 4-H Yearly Summary (4H 0096)
- Basic 4-H Project Record (4H 0096A)
- Experienced 4-H Project Record (4H 0096B)
- Advanced 4-H Project Record (4H 0096C)
- Recordkeeping Self-Evaluation (4H 98, PDF)

### Exhibit Ideas

- Make a poster on how to use a GPS unit.
- Create a display about geocaching.
- Put together a notebook about how your community is using GPS/GIS.
- Create a GIS map of a resource in your community and enter it as an exhibit. Such as:
  - Identify historical locations in your
  - Find coordinates of emergency planning locations, restaurants, or auto-mechanic shops
  - Your school grounds, neighborhood, farm, or town
  - Traffic patterns of cars, livestock or wildlife movements
  - Be creative and develop your own map
- Contact your city, county, or parks and recreation officials about a project that would help them