

**Lesson Title:       GPS II**

**Summary:**           Students will learn to enter coordinates in the GPS and locate several caches around the playground.

**Grade Level:**       5th Grade

**Subject Area/s:**   Physical Education/Social Studies/Math

**Lesson Source:**    Current lesson plan

**Unit:**                GPS/Orienteering

**Modifications:**   Adding longitude and latitude coordinates enabling students to geocache as well as find waypoints

**Learning Objectives:**

1.           Students will be able to find waypoints without any assistance from the teacher.
2.           Students will be able to enter longitude and latitude coordinates into the GPS unit and find a cache with assistance of a partner.

**Standards:**

This lesson meets the National Physical Education Standards of:

Standard 1: Movement  
Standard 5:

**Outdoor Recreation:**

Students will be outside the entire class period/unit. Learning to use GPS will give students a recreational lifetime skill in which they can immediately apply to their and their families lives. GPS units are readily available at the Corp of Engineers at Lake Red Rock. This enables students to put into practice what they have learned in class.

**Environmental Concept or Skill:**

Students will be picking up trash as they are searching for waypoints and caches. They are learning to be more responsible for the environment. Students will also learn about plant and animal life in the areas they are caching and learn the "Do's and Don'ts of hiking or using private property.

**Inquiry Learning:**

Students will be asked questions from the teacher or have to ask questions to self or partner in order to be successful at caching. Might also questions where is the best place to hide a cache in this type of environment.

**Diverse Learners:**

Will need to provide alternate way of moving for a student with MS.  
Work in partners so students having difficulty may be taught by a student who has success.  
Caches hid at different distances for those who are less mobile or fit.  
Caches of a variety of sizes for ease and challenge.

**Suggested Time Frame:** 30 minute period

**Materials:**

|  |                                  |
|--|----------------------------------|
| 2 GPS Kits (20 GPS)                                | 6 flags                          |
| 6 caches of varying sizes                          | watch/timer                      |
| 1 pull cart (student with MS)                      | bucket or table to set GPS units |
| 2 Towels to set GPS units on<br>or to wipe off GPS |                                  |

**Prior Knowledge:**

Students have already learned GPS parts and have learned how to find waypoints.

**Lesson Introduction:** Talk about treasure hunts

**Lesson Procedure:**

**Assessment:** Students will return with the number of caches found and graded based on the number of caches found during the class period.

**Extensions:** Offer students the opportunity to attend a GPS event at Lake Red Rock the following Saturday after the GPS Unit.