

Compass Navigation - half day option

In the classroom, learn how a compass works, how to set a bearing and how to orientate their compass correctly. On Suntrap field, complete a star orienteering course, working in pairs to navigate set points and routes. Further develop compass skills in the forest using landmarks to navigate around obstacles.

Learning objectives

- to apply existing knowledge of angles in a practical setting to learn how to use a compass accurately
- to solve simple challenges and problems successfully
- to show responsibility for themselves and a team



Some suggestions for visit preparation

1. Use protractors to measure angles, and learn how many degrees are in a right angle and a circle.
2. Look at maps and discuss the compass rose displayed on them.
3. Work with magnets to understand that they attract and repel.

Follow up suggestions

1. Complete a map work session leading to Suntrap's 'Round the Rides' orienteering activity.
2. Use a compass to plot a route around the school/ grounds, and make a set of instructions for other pupils to follow.
3. Draw shapes with chalk on the playground from written instructions, using a compass.

National curriculum links

Mathematics

Y5 Geometry – properties of shapes

- know angles are measured in degrees
- draw given angles, and measure them in degrees (°)

Identify:

- angles at a point and 1 whole turn (total 360°)
- angles at a point on a straight line and half a turn (total 180°)
- other multiples of 90°

Y6 Geometry – properties of shapes

- recognise angles where they meet at a point, are on a straight line, or are vertically opposite, and find missing angles

Physical education

- take part in outdoor and adventurous activity challenges both individually and within a team
- compare their performances with previous ones and demonstrate improvement to achieve their personal best

Geography

Geographical skills and fieldwork

- use the 8 points of a compass, 4- and 6-figure grid references, symbols and key (including the use of Ordnance Survey maps) to build their knowledge of the United Kingdom and the wider world

Science

Y3 Forces and magnets

- observe how magnets attract or repel each other and attract some materials and not others
- compare and group together a variety of everyday materials on the basis of whether they are attracted to a magnet, and identify some magnetic materials

PSHE guidance

- to equip pupils with a sound understanding of risk and with the knowledge and skills necessary to make safe



EVENT SPECIFIC RISK ASSESSMENT

Visit details: Compass navigation

Carried out by: Suntrap Centre

Date: Dec 2017

| Issue | How to manage it |
|-----------------------------------|---|
| Understanding/behaviour | Class teacher to advise Suntrap staff of any children who may need extra support out in the forest to help them to follow instructions. School to ensure that there is appropriate adult: children ratios as required. |
| Medical conditions | Suntrap staff to check that school staff brings medication out into the forest. All adults to be made aware of any medical conditions. Suntrap staff will carry a first aid kit. |
| Getting lost | Keep within sight of teacher/adult & observe boundaries as directed by the staff. |
| Choking/Poisoning | No eating outside unless directly instructed by Suntrap staff. |
| Falling branches | During extreme weather conditions Suntrap staff will make an assessment to ensure it is safe to enter the forest. |
| Injury from horses/dogs or bikes | Group to be instructed to stand to the side, be quiet and still when horses, dogs or bikes are near. |
| Accident when crossing the road | Group to be instructed on follow safe procedures for crossing roads (Suntrap Line). No one to walk across the cattle grid. |
| Injury through falling & throwing | Climbing of trees and throwing sticks/stones prohibited. |
| Getting wet/cold | Clothing should be appropriate for weather conditions. i.e hat, coat and gloves. Wellies should be worn when walking through stream. |
| Soil borne disease | Children instructed not to put fingers in mouth during/after activities which include handling plants, soil and sticks. Hands should be washed with warm soapy water before eating lunch/snack. |
| Deep water | Children to keep away from pond boundaries. |