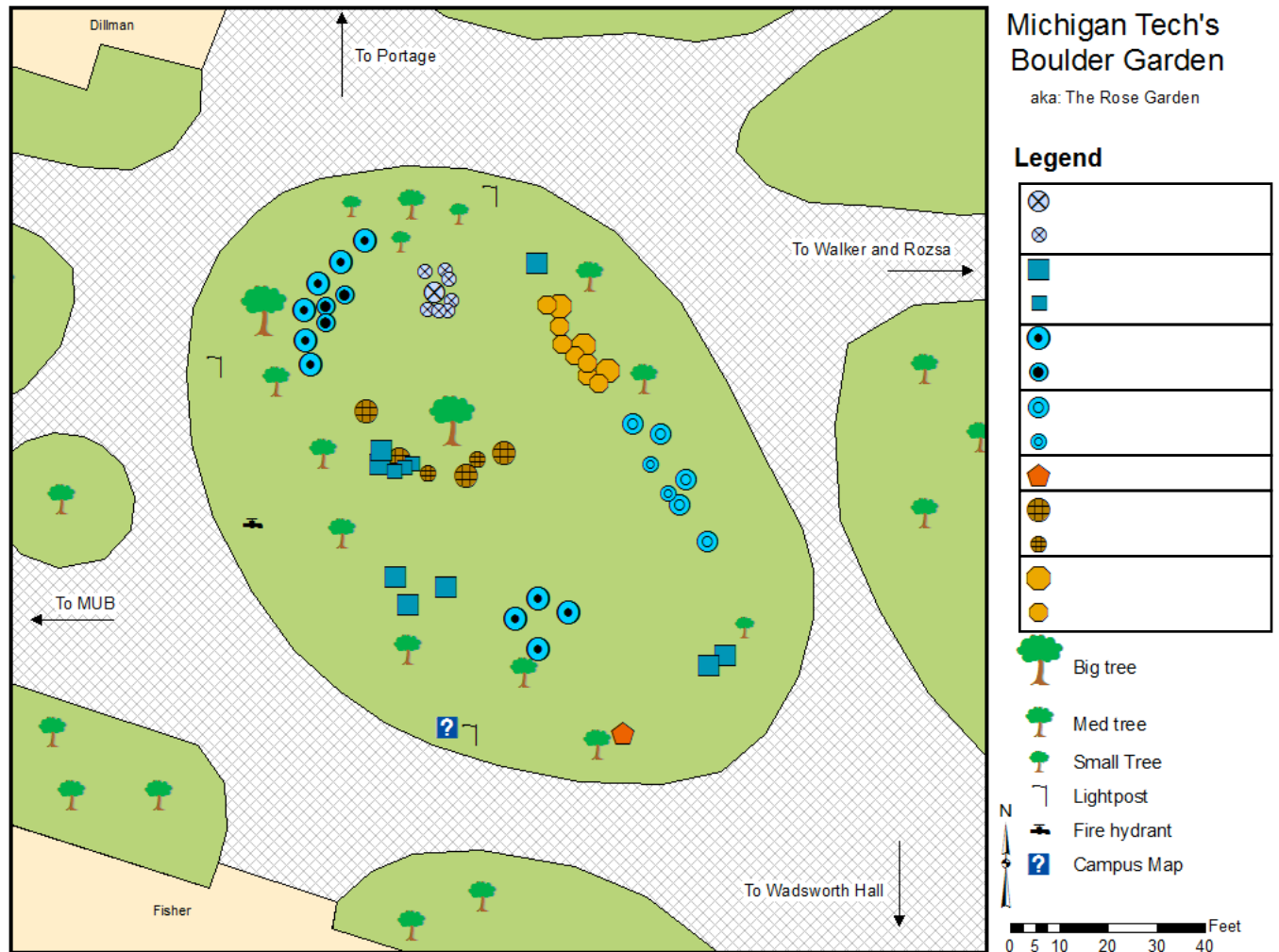


## The Boulder Garden: Rocks of the Keweenaw



**Basalt:** A dark rock that can appear black, grey or greenish. Formed from lava that was erupted at the surface. Unless the rock is one of the types noted below, simple basalt would be mostly one color.

**Amygdaloid:** a basalt that has lots of white spots - these spots are often stretched and look like ovals. Some spots may be lime green or pink due to different minerals. The spots are vesicles (air bubbles) in the lava that later filled in with minerals.

**Ophite:** a basalt that has a spotted/polka dotted appearance. Spotting can be small like pencil erasers or larger like a sponge painting. Spots are caused by groups of feldspar crystals.

**Rhyolite:** A red rock that was formed by lava with a different composition than the basalt. While mostly red, small black and white spots are also present due to other minerals.

**Conglomerate:** A sedimentary rock formed of pebbles and cobbles. While overall a red color, some of the pebbles contained may be other colors.

**Sandstone:** Also a sedimentary rock, but composed of sand grains. Sandstones from this area tend to be red with white spots or stripes. Unlike the conglomerate where the pebbles/cobbles are easy to see, it will be much harder to see the sand grains in these sandstones from a distance.

**Glacial Erratics:** Sometimes the glaciers bring in rocks that are not from the local area. Most of the rocks in the Keweenaw are either black or red in color

**Activities:**

1. Work in small groups and use the descriptions above to fill in the Map Legend.  
Different sized symbols with the same pattern simply represent larger or smaller boulders.
2. Which rock type do you find the most interesting? How would you describe this rock so you could identify it later (for example, if you found one as a pebble on the beach)?
3. Two of the rocks have good examples of glacial polishing. Try to find them! Which rocks look like they have been sanded or smoothed on a side?
4. Link the rocks in the boulder garden to the timeline, by drawing arrows between each rock and the appropriate event.

Glaciation

Hydrothermal mineralization

Rift fills with sediment

Rifting

Amygdaloid minerals form

Erratics

Basalt & Rhyolite

Sandstone & Conglomerate