

15-018: GeoGirls

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Experiment name: GeoGirls outreach experiment at Mount St. Helens

This experiment was part of a geology and geophysics outreach program called GeoGirls for middle school girls at Mount St. Helens. The field camp involved several small research projects, one of which was deploying portable seismometers near Mount St. Helens so the participants could “capture” their own earthquakes. The participants (middle school girls) deployed 5 texans with 4.5 Hz vertical geophones along the trail from Windy Ridge down to the pumice plain with supervision. The distance between sensors was on the order of a few hundred meters. The geophones were installed in holes 4-6” inches deep and reburied. The digitizers were not buried but were instead placed in white envelopes to reduce heating from the sun. The sensors were deployed for just over 24 hours and then retrieved and the data analyzed for any seismicity coming from Mount St. Helens. There are numerous rockfalls, at least one earthquake, and many curious harmonic signals potentially from helicopters in this dataset.