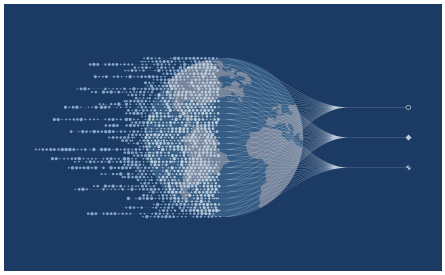

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# of temperature on GS-13 seismometer calibration results

The impact of temperature variability in the environment of a seismometer has the potential to affect its operating performance and should be well understood for sensors within the IMS. In this study, GS-13 passive seismometers are collocated with broadband CMG-3T seismometers at two seismic sites near Sandia National Laboratories' FACT site. The operating temperatures of the seismometers are continuously recorded while the sensors undergo daily electrical calibrations. These datasets allows us to measure how temperature impacts the electrical calibration results as well as the sensors' actual response to ground motion. We compare our measured temperature coefficients for the GS-13 sensors to those predicated by colleagues at Natural Resources Canada (NRCAN) who conducted a study on how temperature impacts the operation of the S-13 seismometers in the YKA seismic array.

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