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## LOFAR ionospheric scintillation spectral measurements in mid-latitude region

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Due to its small intensity, ionospheric scintillation at the mid-latitudes is difficult to observe. The measurements of signal amplitude scintillation from GNSS in this region are almost impossible to perform with sufficient quality.

The European interferometer LOFAR observing in the frequency range 10-90 MHz, provides a good opportunity to carry out complex studies on the ionospheric scintillation in the mid-latitudes.

In this work, we show statistical analysis of amplitude scintillation intensity described by the S4 index as well as spectral parameters given from specially designed pipelines dedicated to computing and analyzing spectra obtained with a single LOFAR station and ILT observation. We also show temporal and spatial statistics for spectral index, Fresnel frequency, and noise level of measurement.