ID: Type: **Poster**

Some features of wave forms of seismic events from the areas of nuclear Asia Test Sites according to the data of AS60 seismic station (AAK, Ala-Archa, Kyrgyzstan)

Three-component seismic station «Ala-Archa» (AAK) was installed in Kyrgyzstan in May, 1983. Location of this one in specially constructed granite tunnel away from the seismic noise sources has made the station an effective site for monitoring both regional, teleseismic events, and nuclear explosions. In October 1990, a digital broadband network station IRIS / IDA AAK was opened here, which was included in the IMS CTBTO network as an 3-C auxiliary seismic station AS060, certified in 2007. AAK station is located on regional distances from the Asia Nuclear Test Sites (Lop Nor, Semipalatinsk, Chagay and Poharan). A comparative analysis of the scanned and digitized historical records of underground nuclear explosions conducted at the Lop Nor Test Site in 1983-1996, at the STS in 1983-1989, as well as at the Poharan and Chagay in 1998 was fulfilled. The wave forms of nuclear explosions were compared with the records of tectonic earthquakes occurred in the areas of test sites and the surrounding territories. The spectral relations of major regional seismic phases both of the nuclear explosions and earthquakes were analyzed. Besides, the comparative analysis of five North Korean nuclear explosions (2006-2016) recorded by the AS60 station was made.

Primary author: BEREZINA, Anna (Institute of Seismology (IS))

Presenter: BEREZINA, Anna (Institute of Seismology (IS))

Track Classification: 2. Events and Nuclear Test Sites