of Interactive Analysis of Infrasound Data in the IDC

Infrasound is one of three waveform technologies which are part of the Comprehensive Nuclear Test Ban Treaty verification regime. Routine analysis of seismo-acoustic events with associations at infrasound stations started in the beginning of 2010 after six years of offline improvements of the automatic processing. During the past three years over 9000 infrasound events were validated by analysts and included in Late Event Bulletin (LEB). Except large seismic events with infrasound associations, infrasound events are characterized by a small number of associated phases. It poses a challenge to both automatic processing and analysts to create valid solutions. The International Data Centre (IDC) is working on improving the infrasound data processing by enhancing the detection capability and examining events formed by the Global Association algorithm (GA) in a separate Infrasound pipeline. In addition to improvements in automatic processing analysts gained experience in interactive analysis of infrasound data. A subset of validated events will be added to the existing reference database which may further improve the quality of automatic and reviewed products. This study will summarize three year results of routine interactive analysis of infrasound data in IDC Operations.

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