ID: Type: **Poster**

3.3-P37. Trends in Waveform Data Processing and Analysis at the International Data Centre Jan 2000 to Jun 2013.

The statistics of signals associated to events in the IDC's final automatic event list (SEL3) and after analyst review (LEB) reveal features and trends that may assist in prioritizing work to improve both. Since 2005 the number of manually detected signals at primary seismic arrays has increased substantially. Major differences are revealed in the performance of automatic signal association between different station types and certain stations in particular; this points to non-optimum tuning of automatic processing for specific stations, which is also suggested by variations in the prevalence of analyst re-beaming of array signals. The percentage of automatically detected signals retimed by analysts is substantial and increasing; this implies deficiencies in automatic measurement of signal onset times. The first half of 2012, when analysts were exceptionally presented with all auxiliary seismic data rather than only the segments automatically requested, witnessed a dramatic increase in manually detected signals. This suggests non-optimum automatic requesting of auxiliary data. Other features explored are a doubling of the percentage of signals automatically identified as noise from 2005; the wisdom of excluding unidentified coda phases (tx) and 'defining' Rg arrivals from the reviewed event bulletin, and an apparent deficit in the automatic association of regional phases.

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