Implats Seismic related Incidents
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Rockburst Incidents
Source Mechanisms inferred from damage mechanisms
Source and Damage Mechanism

Mechanisms observed at Impala

- 30.8% located in or close to previously damaged pillars and FOG's
- 21.6% pillar burst
- 4.9% pillar foundation failure
- 10% located in mined out areas
- 16.3% unknown source mechanism but produced FOG
- 14.7% no damage associated
- 1.8% slip on geological structures
Rockburst Damage
10 Shaft Severe Seismic Activity

A seismic event with $M_L = 2.2$ and a series of seismic events with magnitudes ranging between 0.0 and 1.6 that occurred on the 03/07/2008 and locates near 1973 crosscut panel in 10 Shaft.

47 Events were recorded within 30 minutes 24 of which had $M_L > 0.0$
Location of seismic events
A thorough investigation was conducted through 2073 and 2074 panels, whereby:

Pillar burst/foundation failure within panel 6W, 5W and 4W, which led to total collapse of panel 4W and total collapse of 1973 crosscut were observed
Damage within Panels
Crosscut damage