ID: Type: **Poster**

Hazard Assessment for Northern Malawi

By virtue of its tectonic position on the southern tip of the East African Rift System; The northern region of Malawi often experiences earthquakes of varied sizes. These earthquakes are a significant hazard to the communities in the area. The December 2009, Karonga earthquake of moment magnitude Mw 6.0 (USGS, 2009), caused significant damage and disruption to local communities which are already poor. It is therefore a societal and scientific interest to understand the seismicity of the region since this helps in formulation of appropriate policies for disaster risk reduction measures such as national seismic safety regulations and building standards. Earthquake catalogs, which records earthquakes, explosions, and seismic disturbances, play a key role in seismic hazard assessment. Seismic monitoring data is one of beneficial service the CTBTO offers to its signatory states which can be used for disaster management among other uses. This study intends to identify and define seismic sources for northern Malawi which will be used to produce seismic hazard maps with different probabilities of exceedance. The study will use Probabilistic Seismic Hazard Analysis methodology which quantifies the rate of exceeding various ground motion levels, given all possible earthquakes in an area of interest (Anza et al., 2011).

Primary author: CHIKALAMO, Elias Edson (Malawi University of Science and Technology)

Presenter: CHIKALAMO, Elias Edson (Malawi University of Science and Technology)

Track Classification: Theme 5. CTBT in a Global Context