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Role of the Egyptian National Seismological Network to mitigate the seismic hazard in Egypt

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Egypt is located close to one of the continental fracture system (Hellenic arc) at the convergence boundary of two big lithospheric plates (Eurasia and Africa). Also, Egypt is affected by the open of the Red Sea (Mid Oceanic System) and its two branches (the Gulf of Suez and the Gulf of Aqaba-Dead Sea transform system). Thus the seismicity is due to the interaction between the three plates of Eurasia, Africa and Arabian plates. Thus it could be concluded that although the damaging earthquakes occurred infrequently, its risky consequences could not be ignored. Egypt witnessed a numerous of damaged event, for instance, 1992 Cairo earthquake with magnitude (5.9 mb) caught the Egyptian people. This earthquake caused 600 deaths, 10000 injured and left a damage of more than 40 million US$. As a result of this damage. As well as 1995 Gulf of Aqaba earthquake with Mw 7.2. The Egyptian Government supports the National Research Institute of Astronomy and Geophysics (NRIAG) to install the Egyptian National Seismic Network ENSN and the strong motion network. The main objectives of the network are: Monitoring local and regional activity including artificial events, assessment seismic hazard, estimating the expected future earthquake effects and protecting strategic buildings, high dam and archeological sites.