Decision making framework for earthquake resistant building

Abstract

Malaysia is a country with very low seismic. Most of the buildings in our country may not consider seismic load during structure design, thus the level of safety for remains unknown. Recently, earthquake events have become more frequent. Therefore, engineers have to be alert and kept updated with the knowledge and behavior of earthquake trend in this area. It is vital to assess the precaution measures that can be taken and consider them in the future building design. Therefore, a decision making framework in designing earthquake resistant building especially for school building in Malaysia is needed to help engineers to consider earthquake risk in the building design. This framework employed NERA Program with the assistance of SAP2000 software for analysis of the performance of earthquake resistant building.