



DimeRisk Project: Development of an educational and training program for the prevention and mitigation of seismic risk in Spain

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In Spain, due to the low recurrence of earthquakes in the last century, there is no awareness of seismic risk and prevention plans. For this reason, moderate magnitude earthquakes have generated significant damage and casualties. However, the risk is evident, in Spain during the nineteenth century there were more than five destructive earthquakes with intensities greater than VIII (e.g. Arenas del Rey IX-X, Torrevieja IX-X). A recent example was the 2011 Lorca earthquake, that with moderate magnitudes and intensities (magnitude Mw 5.2, intensity VI) it struck a populated area with old historic buildings and a population unprepared (9 victims, 324 injured, 1,200 million in reparations). In this earthquake many errors were found in the behavior of the population and in the basic self-protection measures.

Many countries have educational programs that significantly reduce the damage and losses caused by earthquakes. The objective of this project (Dimerisk project) is to generate training and educational materials that help mitigate the damage and losses caused by earthquakes. This project is based on plans of experienced countries (e.g. U.S.A., Italy, Mexico, New Zealand) but having into account the mistakes made in the last earthquake in Spain, and also the characteristics of the Spanish educational system and building characteristics. This project has been founded by FUNDACION MAPFRE. The team is formed by geologist, earthquake researchers and teachers at secondary schools and universities. The ultimate goal is to generate material that can inform about the seismic and geological processes that participate in an earthquake and the basics of self-protection against earthquakes. This project has focused on scenarios (offices, factories, homes, education centers) and educational levels (schools, colleges and universities). Educational materials have been also developed for different educational levels with basic concepts related to seismicity, how to behave during an earthquake, drills, and the main actions to protect non-structural building elements. Though some of these activities have already been tested in classrooms, its implementation in educational centers in the town of Lorca will be carried out. As a final task, all this material will be reported in the form of manuals to be distributed to government agencies, ministry of education, regional councils, civil protection, etc.

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