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Comparative Study of Practical Methods for Reducing the Vulnerability of the Earthquake in Iran and the World

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Abstract

Earthquake is known as one of the most destructive natural phenomena that causes a wide range of disasters: irrespective of the economic losses that are inflicted on the city, and in a smaller scale on the citizens, the human losses, and also the psychological problems caused by the death of the relatives, homelessness and insecurity are all known as a crisis caused by earthquake. Since it is impossible to prevent earthquake, we should look for proper approaches to confront this phenomenon. More importantly, surveying the features and the characteristics of the cities should be carried out as the basis of preventive actions towards earthquake because if we suppose the seismic intensity to be equal, it's the urban features and structures that can change a natural phenomenon to a human catastrophe. The

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present article aims to survey the most significant global and national experiences related to decreasing the vulnerabilities to earthquakes, and also re-defining the set of urban-designing approaches in order to reduce damages of earthquakes. Based on the given data, the research method is qualitative and attributive. The results show that the global experiences put emphasis on city texture, including open spaces, the connection network, and physical structures, while in Iran, irrespective of the studies by the JICA[3] group, most of the assaying and damage-decreasing modeling cases have been performed in terms of single-structures and the social features have been ignored. Finally, we should say that, just in the circumstances that we set the plans of "urban-safety against earthquake" as a goal in all the stages of planning, especially the urban planning programs, we would be able to reduce the vulnerability of the cities toward seismic problems.

Keywords: Earthquake, Vulnerability, Urban Planning, Global studies.

[3] Japan International Cooperation Agency

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