



## **Influence of AAC and conventional brick infill walls on seismic performance of RC framed structure**

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**Abstract:**Our construction activities are growing day by day rapidly. The innovative materials used in the construction of reinforced concrete masonry infill are also developing at a higher rate. Mostly for construction bricks are used as their main material. A brick is a block or single unit of a ceramic material used in a masonry construction. It is a standard-sized weight-bearing building unit. This project deals with the investigation, planning, designing, and replacement of ordinary bricks with aerated autoclaved concrete blocks. The aim of this project is to use AAC instead of ordinary bricks which are environmental friendly and high energy efficient, fire safety and cost effectiveness. A number of researches have been carried out experimentally and analytically to study the behavior of in filled reinforced concrete frames. The study of effect of types of infill materials used (i.e. AAC block) on the seismic performances of in-fill R.C. frames is however still limited. In fact, the infill wall enhances considerably the strength and rigidity of the structure. In the present study seismic performance of AAC blocks & conventional brick infill panel (with and without opening) in R.C. framed structure are compared using the software ETABS.

**Keywords :**RC Framed Structure, RC Masonry Brick And AAC Infill With And Without Opening, Static Equivalent Method.

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