

## عنوان مقاله:

STIFFENER REQUIREMENTS IN STIFFENED STEEL PLATE SHEAR WALLS

## محل انتشار:

هفتمین کنفرانس بین المللی زلزله شناسی و مهندسی زلزله (سال: 1394)

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## نویسندگان:

Ahmad RAHMZADEH - *Earthquake Engineering Graduate Student, School of Civil Engineering, College of Engineering, University of Tehran, Tehran, Iran*

Mehdi GHASSEMIEH - *Associate Professor, School of Civil Engineering, College of Engineering, University of Tehran, Tehran, Iran*

## خلاصه مقاله:

The 6-story Olive View Medical Center in California and the 35-story Kobe City Hall tower, both of which showed good performance while withstanding earthquakes, are two examples of structures that were constructed using stiffened steel plate shear walls as a lateral load resisting system. Stiffeners are used in such lateral load resisting systems to improve the buckling stability of the shear panel. However, using plate girder equations often leads to unconservative and, in some cases, incorrect design of stiffeners due to major differences between plate girders and steel plate shear walls (SPSWs). In this paper, the effect of the rigidity and arrangement of stiffeners on the buckling behavior of plates is studied using the finite element method (FEM). Subsequently figures covering curves for the design of stiffeners in various practical configurations are presented.

## کلمات کلیدی:

Plate Buckling, Critical Shear Stress, Stiffener, Rigidity, Steel Plate Shear Wall

## لینک ثابت مقاله در پایگاه سیویلیکا:

<https://civilica.com/doc/1132407>

