



The codified amplification factor of $R_o.R_d$ was not found to cover the mentioned extra inelastic deflections resulted from connection behavior.

- The local deformation of the HSS column face attached to a W or HSS beam produces a flexible connection condition and increases the lateral deflection by 6% and 9%, respectively, for the 6- and 12-story modular buildings.
- Using plastic hinge with sectional fiber discretization for the RC shear walls can lead to computationally efficient analytical models with acceptable accuracy, in comparison with the other refined modeling technique such as layered nonlinear shell elements.

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