عنوان مقاله:

The study of site effects on seismic response of adjacent rectangular valleys

محل انتشار:

چهارمین کنفرانس بین‌المللی رفتار بلندمدت و فن‌آوری‌های نوسازی سازگار با محیط زیست سدها (سال: 1396)

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خلاصه مقاله:

A numerical analysis on the seismic site effects due to ground irregularities is performed. Two dimensional (2D) rectangular configurations under incidence of vertically propagating SV waves is modeled with the aid of HYBRID program, combining finite elements in the near field and boundary elements in the far field. In fact this paper aims to study the adjacency effects of two rectangular valleys on the ground amplification at various points across the valleys. Valleys are characterized by their depth, H and their half width at the surface, L and the calculations are made for different depth ratios H/L= 0.2, 0.4, 0.6, l. Finally, some practical graphs are proposed in terms of engineering applications to assess the spectral response at the surface of rectangular valleys.

کلمات کلیدی:

Site Effect, Seismic Response, Hybrid Numerical Method, Adjacent Valleys, Filling Ratio