Effect of Adjacent Footings on Elastic Settlement of Shallow Foundations

Authors : Mustafa Aytekin

Abstract : In this study, impact of adjacent footings is considered on the estimation of elastic settlement of shallow foundations. In the estimation of elastic settlement, the Schmertmann's method that is a very popular method in the elastic settlement estimation of shallow foundations is employed. In order to consider affect of neighboring footings on elastic settlement of main footing in different configurations, a MATLAB script has been generated. Elastic settlements of the various configurations are estimated by the script and several conclusions have been reached.

Keywords : elastic (immediate) settlement, Schmertman Method, adjacent footings, shallow foundations

Conference Title : ICSRD 2020 : International Conference on Scientific Research and Development

Conference Location : Chicago, United States

Conference Dates : December 12-13, 2020