



Determination of Soil Parameters by “in Situ” Tests for Calculation of Stability of Piles

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Abstract: Near the town of Lipjan in Kosovo for the Directorate for Roads, for the foundations of the bridge over the river Sitnicë were applied reinforced concrete piles of “Franki” system. Bridge consists of four spread footings on piles, two central and two laterals. Since the terrain where the bridge is supposed to consist of layers of soft clay and silt but in the depth of sandy gravel material with variable characteristics. For this purpose provided the foundations with reinforced concrete pile. Piles are adopting the system "Frankie" Ø52mm, while the piles length varies from 12 to 20m. Based on the geotechnical parameters obtained from laboratory and field investigations, determined the capacity for different lengths of individual pilots. Considering that to non-cohesive materials cannot be obtained undisturbed samples modulus of deformation of these layers can be determined by field load test of pile. For this purpose, it is often used static penetration test. In order to compare the results, on the ground near the foundations of bridges are made of five field load test of piles, whereby are obtained results of bearing capacity for the field load test of piles.

Key words: *pile, static penetration, bearing capacity, skin friction, field load test.*

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