

ABSTRACT

Sonia Fara Dila, 2021 : *Effect of Clay and Trass Mixture on Laboratory California Bearing Ratio (CBR) Value as Backfill*

Abstract : A toll road is a civil building located above the subgrade level. Calculating the effect of the bearing capacity of embankment soil is important to calculate the load acting on the toll road structure. In planning the structure of the road, the main factor that must be considered is the condition of the soil itself, good soil is soil with dense grains and little sand. The method to determine the bearing capacity of the soil is to find the value of the California bearing ratio (CBR). In the Pekanbaru - Padang Toll Road Project, the Sicincin - Lubuk Alung - Padang Section uses the technical specifications of the toll road by requiring a CBR value of not less than 6% in accordance with the characteristics of the carrying capacity of the embankment. The purpose of this study was to determine whether a mixture of clay with trass can increase the bearing capacity of the embankment soil. Based on the results of the study, it was found that a mixture of clay soil with trass can increase the bearing capacity of the embankment soil. 1:3 mixture is a mixture that can be used as CBM stockpiles on toll roads.

Keyword : Toll Road, Soil Carrying Capacity, CBR.