ABSTRACT

A STUDY OF SANDLY SOIL SUPPORT WHICH IS STABILIZED USING TX-300 REVIEWED FROM CBR VALUE

By

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In this era, construction in civil engineering is very closely related with physical and mechanical condition of soil. It is caused that soil has a material which plays an important role in supporting civil construction itself. A construction of civil engineering needs strong and solid foundation as supporting construction on it, to make it happen is needed good subgrade strength and fulfill the requirements established. Not all of soils have good mechanical characteristics and expected in its original condition, this is caused by the differences process of soil formation, the differences of topography and geology which form the soil surface. With the differences which occur in every soil type, therefore the stability is an alternative in soil power support itself.

In this research, the soil type which used is sandly soil derived from Kecamatan Pasir Sakti Lampung Timur which is mixed with TX-300 (multi-purpose chemicals) with mix levels TX-300 are dissimilar 0,6 ml, 0,9 ml, 1,2 ml and 1,5 ml, with diferent treatment in sample which has been mixed with aging or 7 days and submersion for 7 days too. With different mix levels and treatments too, it is expected in increasing its soil power support can be known.

In the experiment result shows (1) sample of sandly soil which is mixed TX-300 with mix levels 0,6 ml, 0,9 ml, 1,2 ml, 1,5 ml and aging for 7 days proved capable in increasing its soil power support although doesn’t reach target which is defined as a requirement to be created as base soil (subgrade) on roadworks. (2) sample of sandly soil which has been mixed with TX-300 with mix levels 0,6 ml, 0,9 ml, 1,2 ml, 1,5 ml and through aging which is done for 7 days, aging treatment
which done can not increase its soil power support, this is usually happened in field which called as critical condition.

Keyword: soil stabilization, soil power support, base soil.