ABSTRACT

As a Civil Engineer it is our responsibility to enhance the properties of soil by adding the wastes. In this, Industrial Waste "Ground Granulated Blast Furnace Slag" (i.e., a by-product of steel and iron making) with lime added in soil to enhance soil properties. A soft soil has significant problem, most important the subsoil strength, shear strength, high compressibility etc. Due to rapid increase of urbanization, Land is required of good bearing strength and stability. stabilization is the broad sense for the increasing the strength, bearing capacity and another physical property of soil. stabilization can be done through chemical or mechanical methods. In this, the soil is stabilized using GGBS and lime. By using GGBS and Lime, the construction cost is decreased & make economical. The influence of GGBS and lime mixture on the engineering property such as liquid limit, plastic limit, specific gravity, standard proctor test, unconfined compressive strength test, has been investigated. GGBS was added from 0% to 8% by dry weight of soil with lime of 1% as constant by dry weight of soil. It is concluded that the strength of the soil increase on addition of GGBS and lime in increasing proportion in black cotton soil.