

**Visvesvaraya Technological University, Belgaum**



A Project Report on  
**"Rice Husk Ash Concrete Blocks"**

*Submitted in partial fulfillment for the  
Award of Degree of*

*Bachelor of Engineering  
In  
Civil Engineering*

Submitted by:

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## ABSTRACT

An experimental investigation into the effect of various rice husk ash – cement properties on some physical properties of block used for masonry construction was made. Totally 60 samples were made with different variations. RHA was prepared using charcoal from burning firewood. Preliminary analysis of the constituent materials of the Portland cement and RHA blocks were conducted to confirm their suitability for block making. Physical test of the freshly prepared mix was also carried out, 230mm x 110mm x 80mm blocks were cast, cured and crushed for 3,7,28 days at 0,10,20,30,40,50,60,70,80 percentages of replaced blocks. The compressive strength of the OPC/RHA blocks increases with age at curing and decreases as the percentage of RHA content increases. The study arrived at an optimum replacement level of 10%.

### **The main objective of the study:-**

To cast the concrete blocks of size 230mm x 110mm x 80mm made up of cement and rice husk ash in different mix proportion of water to cement ratio to study their density, workability, water absorption and compressive strength at 3,7 and 28 days.