

Evaluation of Hardness and Compression Strength Properties for Al6061 Hybrid Composite

Nagesh H C¹ and Dr. Jegadeeswaran N²

Assistant Professor, Dept. of Mechanical Engg. R. L. Jalappa Institute of Technology, Doddaballapur, India¹

Professor, School of Mechanical Engineering, REVA University, Bangalore, India²

Abstract: *Rice husk ash- rock dust- Al6061 alloy hybrid composite having 2 wt of rice husk ash constant value and 2 wt%, 4 wt%, and 6 wt% were fabricated by stir casting method. The casted composite specimens were machined as per the ASTM standard. Hardness and compression strength properties were evaluated for the different wt% of reinforcements. The wt% of Rock dust increases the hardness and compressive strength with rice husk ash constant of 2 wt%. The comparisons were made with and without reinforcements of Al6061 with respect to different weight percentage basis. It has been observed that addition of reinforcements significantly improves hardness and compressive strength properties as compared with that of unreinforced matrix.*

Keywords: Rice husk ash, Rock dust, Al6061, stir casting, mechanical properties

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