



***Benincasa hispida* (Ash gourd) Seed Extract- As Corrosion Inhibitor For Mild Steel In Acid Medium**

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**ABSTRACT**

*Seed extract of Benincasa hispida was evaluated for its corrosion inhibitive effect on mild steel in 1M H<sub>2</sub>SO<sub>4</sub> using weight loss and electrochemical measurement techniques. The results reflect that the inhibition efficiency increases with increase of extract concentration. Maximum inhibition efficiency in 1M H<sub>2</sub>SO<sub>4</sub> was found to be 94.7% for a period of 6h with 0.5% concentration of the inhibitor. Experimental results were fitted in to Langmuir and Temkin adsorption isotherm to study the process of inhibition. Potentiodynamic polarization results reveal that the seed extract behaved like mixed type inhibitor.*

**Keywords:** *Benincasa hispida* seed, Mild steel, Corrosion inhibition, H<sub>2</sub>SO<sub>4</sub> medium.

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