

# Household Waste Management in AychitMandir, Mahal, Nagpur: A Study on Generation, Segregation, and Disposal

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**Abstract:** Household waste, comprising organic, plastic, metal, glass, and paper, is a growing concern due to improper segregation and disposal. This study analyzed waste management practices in AychitMandir, Mahal, Nagpur, covering 74 households across different socioeconomic groups. Waste was sorted, weighed, and classified daily for seven days. Door-to-door collection, transportation via tricycle rickshaws and tractors, and disposal at Bhandewadi dumping site were assessed. The average daily per capita waste generation was 0.634 kg/capita/day, with 63.6% organic waste being the largest component. 57% of households participated in collection, but only 7% were aware of environmentally safe disposal. Inconsistent segregation and open dumping were major challenges, despite community willingness for improved practices. The study highlights the need for awareness, better infrastructure, and systematic waste management for sustainability.

**Keywords:** Household waste, Waste segregation, Waste disposal, Waste management, Organic waste