WASTE-TO-WASTE MANAGEMENT AND RESOURCE CONSERVATION AND RECYCLING

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Abstract

Social upgradation results more postconsumer glass and plastic waste and continuously demands newer techniques for their management. This research proposes a new waste-to-waste management strategy by using waste glass for polyolefin degradation. For this purpose, waste glass is activated by mechanochemical treatment and resultant material is used for the thermal pyrolysis of polyolefin. Certain improvement in the product quality is achieved by selectivity towards more alkane fraction.

Key words: polyolefin degradation, recycling, resource conservation, solid acid, solid waste management, waste glass

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