

(54) Title of the invention : An Aspergillus Based Fungal Strain Culture for Degrading Low Density Polyethylene (LDPE) and Method Thereof

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(57) Abstract :  
ABSTRACT: Title: An Aspergillus Based Fungal Strain Culture for Degrading low density Polyethylene (LDPE) and Method Thereof  
The present disclosure proposes an Aspergillus based fungal strain culture for degrading polyethylene (PE) and method thereof. The Aspergillus proliferans fungal strain is used for degrading low density polyethylene (PE). The proposed effective polyethylene (PE) degradation method increases the rate of low density polyethylene (LDPE) degradation. The fungal strain is able to produce extracellular enzymes laccase and manganese peroxidase which breaks down low density polyethylene (LDPE). The microbe A. proliferans utilized for LDPE degradation resulted in maximal weight loss and dissolved carbon dioxide.

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