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**Investigation of Polymer-70% Aluminum Powder Composite**

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**ABSTRACT:**

Metals and polymers permutation in order to produce polymer metals composites attain new fascination and significance to several authors. The first effort to syndicate these two classes of materials was formulated in the earlier years of the 20th era. In this article, aluminum flakes were positively assimilated in polyethylene PE matrix to syndicate the valuable properties of metals and polymers. They extend to light weight, endurance to corrosion, brisk fabrication rates and an extensive range of moduli etc. In the current research, differing from 0% to 70% by volume of aluminum flakes were assimilated into polyethylene (PE) matrix by means of mechanical stirring. The impact of filler particle addition on the properties of the composites was identified.