

## EFFECT OF CARBON BLACK ON PROPERTIES OF BIODEGRADABLE COMPOSITES

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## Abstract

An evaluation of the effects of carbon black incorporation on mechanical and electroconductive properties of biodegradable materials is presented. The biodegradable composites based on Mater-Bi® (MB) filled 1; 2; 4 wt. % of carbon black (CB) were prepared by melt mixing. Mater-Bi® is a commercial bioplastic extensively used within food packaging applications. The mechanical and electrical properties of biodegradable matrix and its composites were investigated. The electroconductive properties of prepared materials were tested to determine the percolation threshold, as well as dielectric relaxation.



## Biography

Karol Leluk has completed his PhD at the age of 24 years from University of Wroclaw, Poland. He is holding position of professor's assistant of Wroclaw University of technology, Poland. For over 10 years he has been focused on polymer science, sharing his professional interests in polymer waste recycling, processes for processing thermoplastic polymer materials..

3rd World Congress on Bio-Polymers and Polymer Chemistry | Rome, Italy | February 24-25, 2020

**Citation:** Karol Leluk, *Effect of carbon black on properties of biodegradable composites*, Polymer Chemistry 2020, 3<sup>rd</sup> World Congress on Bio-Polymers and Polymer Chemistry, Rome, Italy, February 24-25, 2020, 03