

Polymerization of ϵ -caprolactone with degraded PET for its functionalization

ORIGINAL PAPER Published: 04 July 2019

Volume 26, article number 180, (2019) [Cite this article](#)

[Save article](#)

[View saved research](#)



Journal of Polymer Research

[Aims and scope](#)

[Submit manuscript](#)

[Karina Espinoza-García](#), [Angel Marcos-Fernández](#), [Rodrigo Navarro](#), [Aurelio Ramírez-Hernández](#) , [Jose Eduardo Báez-García](#) & [Gustavo Rangel-Porras](#)

 535 Accesses  9 Citations  4 Altmetric [Explore all metrics](#) 

Abstract

Poly(caprolactone) (PCL) was synthesized from the polymerization of ϵ -caprolactone (CL) with degraded poly(ethylene terephthalate) (PET) for its functionalization using heptamolybdate of ammonium and tin(II) 2-ethylhexanoate, as catalyst and initiator, respectively. Polymerization of CL with bis(2-hydroxyethyl) terephthalate (BHET) was carried out to make a comparison. From the analysis by FTIR, the functional groups of