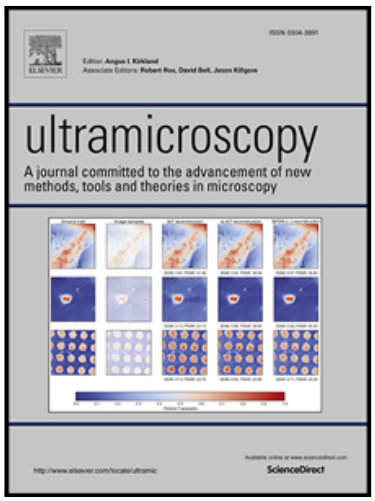

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Olof Bäcke,[1] Camilla Lindqvist,[2] Amaia Diaz de Zerio Mendaza,[2] Stefan Gustafsson,[1] Ergang Wang,[2] Mats R. Andersson,[2] Christian Müller,[2] Per Magnus Kristiansen,[3,4] Eva Olsson[1]*

[1]Department of Applied Physics, Chalmers University of Technology, 41296 Göteborg, Sweden

[2]Department of Chemistry and Chemical Engineering, Chalmers University of Technology, 41296 Göteborg, Sweden

[3]Institute of Polymer Nanotechnology (INKA), FHNW University of Applied Science and Arts Northwestern Switzerland, 5210 Windisch, Switzerland

[4]Laboratory for Micro- and Nanotechnology, Paul Scherrer Institute, 5232 Villigen, Switzerland

*eva.olsson@chalmers.se

Abstract

We show by in situ microscopy that the effects of electron beam irradiation during transmission electron microscopy can be used to lock microstructural features and enhance the structural thermal stability of a nanostructured polymer:fullerene blend. Polymer:fullerene bulk-heterojunction thin films show great promise for use as active layers in organic solar cells but their low thermal stability is a hindrance. Lack of thermal stability complicates manufacturing and influences the lifetime of