

# Solvent-Based Elimination of Organic Matter from Marine-Collected Plastics

Amaia Mendoza <sup>1,\*</sup>, Galder Kortaberria <sup>1</sup>, Florencio F. Marzo <sup>1</sup>, Ugo Mayor <sup>2,3</sup>, Oihane C. Basurko <sup>4</sup> and Cristina Peña-Rodríguez <sup>1,\*</sup>

<sup>1</sup> “Materials +Technologies” Research Group (GMT), Department of Chemical and Environmental Engineering, Faculty of Engineering, Gipuzkoa, University of the Basque Country (UPV/EHU), Plaza Europa 1, 20018 Donostia-San Sebastián, Spain; galder.kortaberria@ehu.eus (G.K.); florencio.fernandez@ehu.eus (F.F.M.)

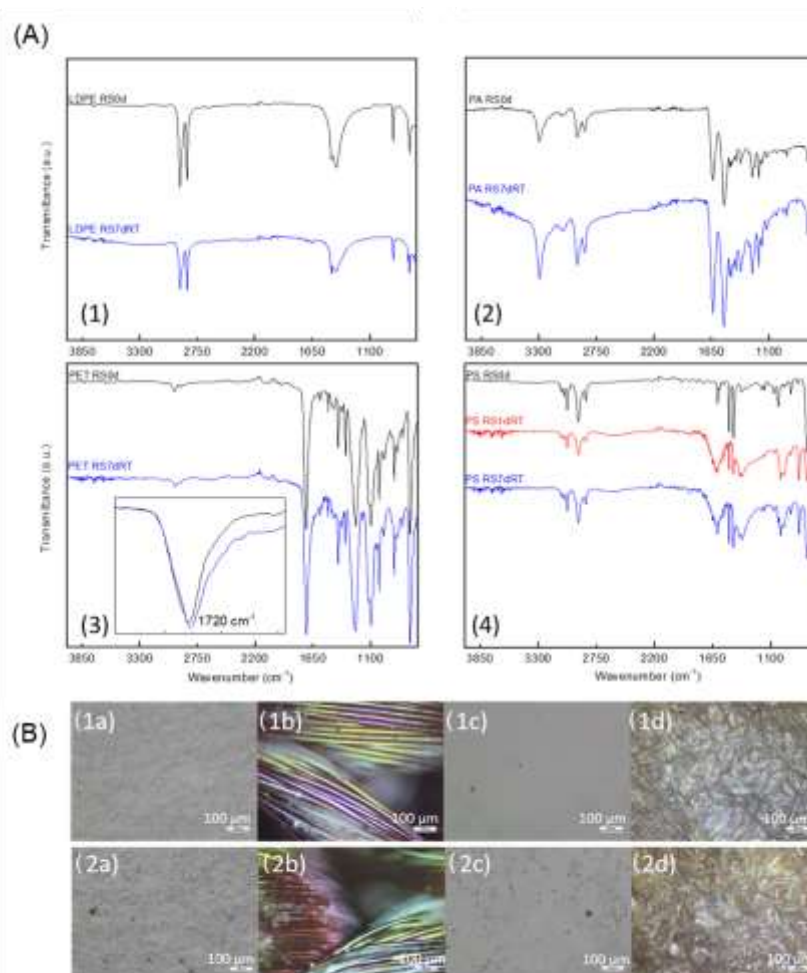
<sup>2</sup> Department of Biochemistry and Molecular Biology, Faculty of Science and Technology, University of the Basque Country (UPV/EHU), 48940 Leioa, Spain; ugo.mayor@ehu.eus

<sup>3</sup> Ikerbasque, Basque Foundation for Science, 48009 Bilbao, Spain

<sup>4</sup> AZTI Marine Research, Basque Research and Technology Alliance (BRTA), Herrera Kaia Portualdea z/g, 20110 Pasaia, Spain; ocabezas@azti.es

\* Correspondence: amendoza001@ehu.eus (A.M.); cristina.pr@ehu.eus (C.P.-R.)

## Supplementary Material



**Figure S1.** (A) FTIR spectra of RS samples of LDPE (1), PA (2), PET (3) and PS (4) at different test times in KOH 10 % at RT and (B) Optical microscopy images of RS samples of LDPE (a), PA (b), PET (c) and

PS (d), before the test (1) and after one week in KOH 10% (2). Samples are identified as RSXdY, where X and Y indicate the number of days and the treatment temperature, respectively.

**Supplementary Materials:** The following are available online at [www.mdpi.com/article/10.3390/environments8070068/s1](http://www.mdpi.com/article/10.3390/environments8070068/s1), Figure S1: (A) FTIR spectra of RS samples of LDPE (1), PA (2), PET (3) and PS (4) at different test times in KOH 10% at RT and (B) Optical microscopy images of RS samples of LDPE (a), PA (b), PET (c) and PS (d), before the test (1) and after one week in KOH 10% (2).

**Author Contributions:** Conceptualization, A.M. and C.P.-R.; methodology, A.M., U.M. and C.P.-R.; software, A.M.; validation, G.K. and C.P.-R.; formal analysis, G.K.; investigation, A.M.; resources, C.P.-R.; data curation, A.M. and G.K.; writing—original draft preparation, A.M.; writing—review and editing, G.K., F.F.M., U.M. and O.C.B.; visualization, A.M. and G.K.; supervision, G.K., O.C.B. and C.P.-R.; project administration, C.P.-R.; funding acquisition, C.P.-R. All authors have read and agreed to the published version of the manuscript.

**Funding:** This research received no external funding.

**Institutional Review Board Statement:** Not applicable.

**Informed Consent Statement:** Not applicable.

**Data Availability Statement:** The authors confirm that the data supporting the findings of this study are available within the article and its Supplementary Materials.

**Acknowledgments:** This work was supported by the Provincial Council of Gipuzkoa (ItsasMikro project). The authors would like to thank the University of the Basque Country (GIU18/216 Research Group).

**Conflicts of Interest:** The authors declare no conflict of interest.



© 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (<http://creativecommons.org/licenses/by/4.0/>).