Stanford

Nuzhet Inci Kilic

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Bio

BIO

I am a PhD student in the Fiber and Polymer Technology Department at KTH Royal Institute of Technology in Stockholm, Sweden. I graduated in Materials Science and Nanotechnology Engineering with a BSc at TOBB University of Economics and Technology (Turkey) and an MSc in Nanotechnology at KTH Royal Institute of Technology (Sweden). I am currently also a visiting student researcher at Stanford University.

My research interests lie at the intersection of nanomaterials, functional bio-based materials, and sustainable electronics. Specifically, I focus on integrating conducting and functional materials with cellulose-based fibers to develop advanced materials for applications such as energy storage, sensors, actuators, and paper-based electronics. My work explores how tailoring the structure and surface chemistry of cellulose can enhance electronic and ionic conductivity, while also investigating scalable fabrication approaches including industrial papermaking and advanced material processing techniques. During my research, I also work on advanced characterization of these materials to better understand their structure-property relationships and improve their performance in emerging electronic and energy technologies.

LINKS

- Google Scholar: https://scholar.google.com/citations?user=hEsAXQkAAAAJ&hl=tr
- LinkedIn: https://www.linkedin.com/in/nikilic/

Publications

PUBLICATIONS

- **3D-Printed Crosslinked Nanocellulose-MXene Hydrogels and Aerogels with High Strength and Conductivity.** *Small (Weinheim an der Bergstrasse, Germany)*
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- **Two-Photon Polymerization Printing with High Metal Nanoparticle Loading.** *ACS applied materials & interfaces*
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- **Carbon Quantum Dots Conjugated Rhodium Nanoparticles as Hybrid Multimodal Contrast Agents.** *Nanomaterials (Basel, Switzerland)*
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