



Showcasing research from Professor LaShanda Korley's research group, Chemical & Biomolecular Engineering, University of Delaware, USA.

Engineering lignin-derivable diacrylate networks with tunable architecture and mechanics

Network engineering offers a promising pathway toward the development of processable, fully bio-derivable, aromatic (meth)acrylate thermosets. In this work, a series of acrylate thermosets, synthesized from lignin-derivable vanillyl alcohol/bisguaiacol F diacrylates and a bio-based *n*-butyl acrylate, was designed as a sustainable platform to explore the impact of network architecture and molecular structure on thermomechanical behavior. This modular approach led to renewable thermoset materials suitable for composite applications and damping technology.

As featured in:



See LaShanda T. J. Korley *et al.*, *Mater. Adv.*, 2024, 5, 6070.