

Supporting Information

Biobased Polymers Derived from Itaconic Acid bearing clickable groups with Potent Antibacterial Activity and Negligible Hemolytic Activity

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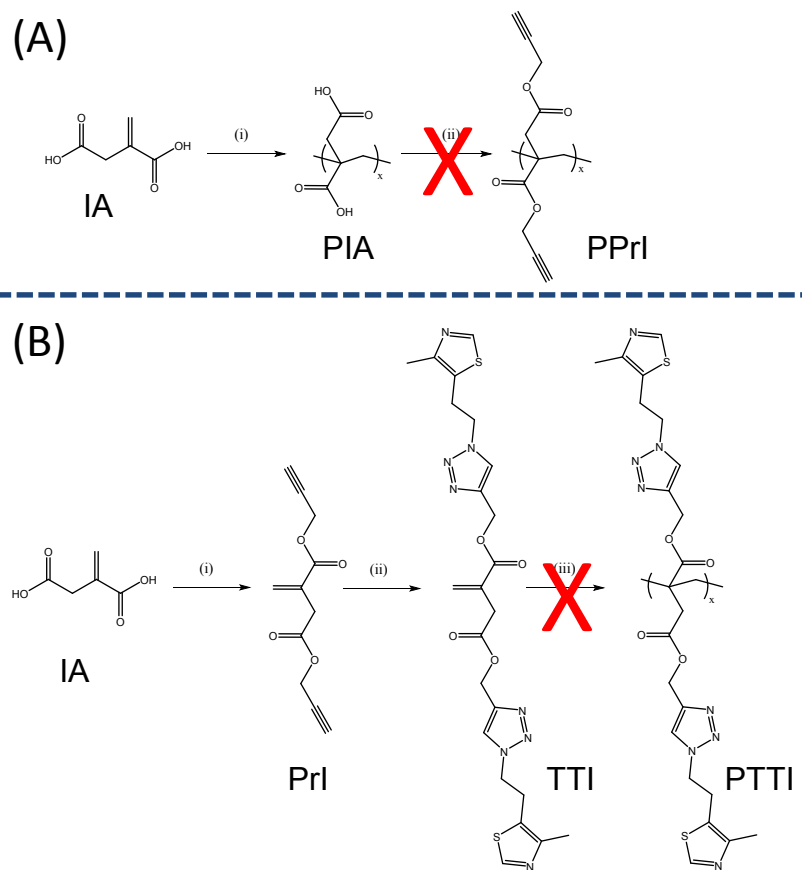
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Scheme S1. Failed approaches 1 (A) and 2 (B) used to synthesize polymers derived from itaconic acid with thiazole and triazole groups.

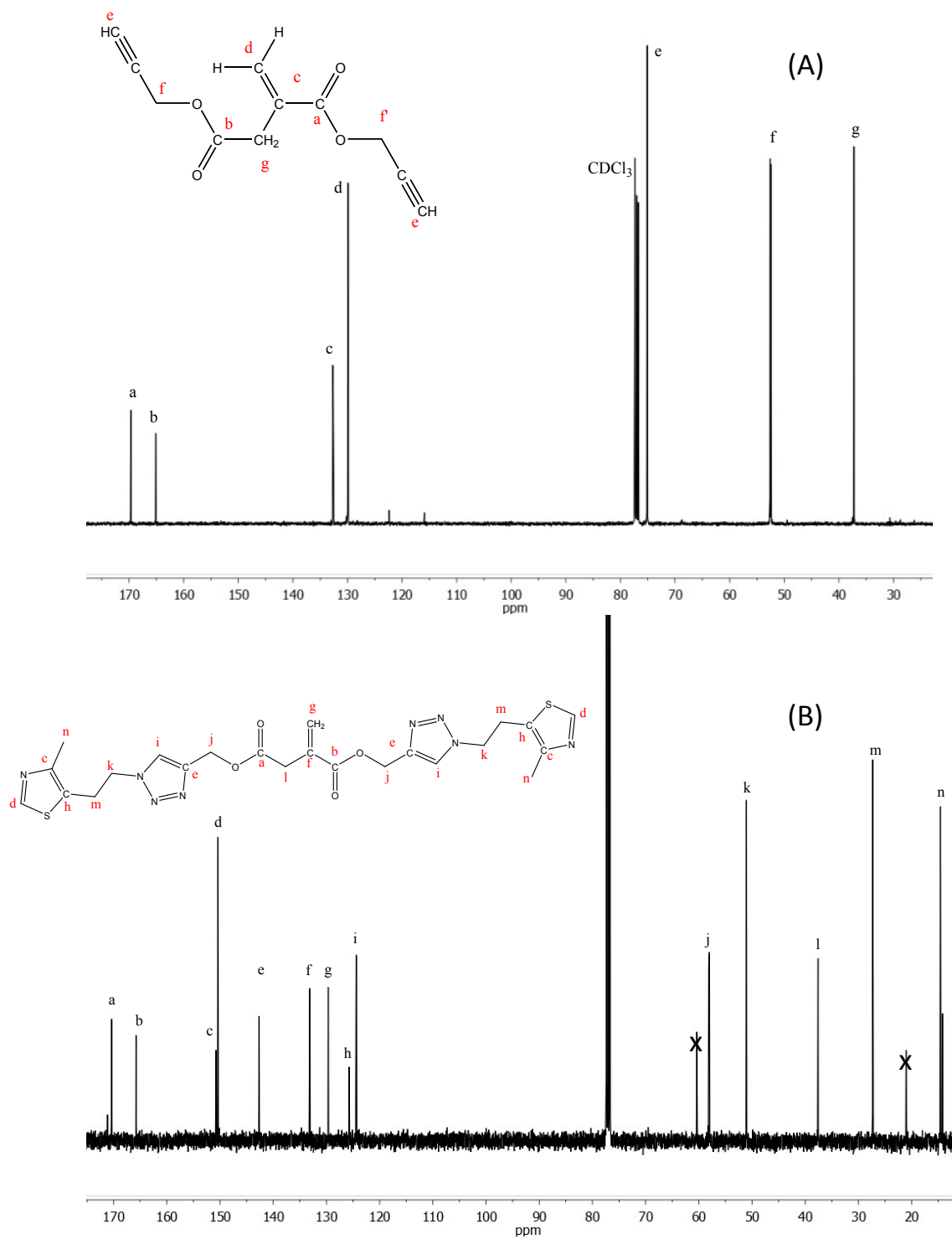


Figure S1. ^{13}C -NMR spectra of (A) clickable monomer PrI and (B) monomer derivative TTI with thiazole and triazole groups in deuterated chloroform.

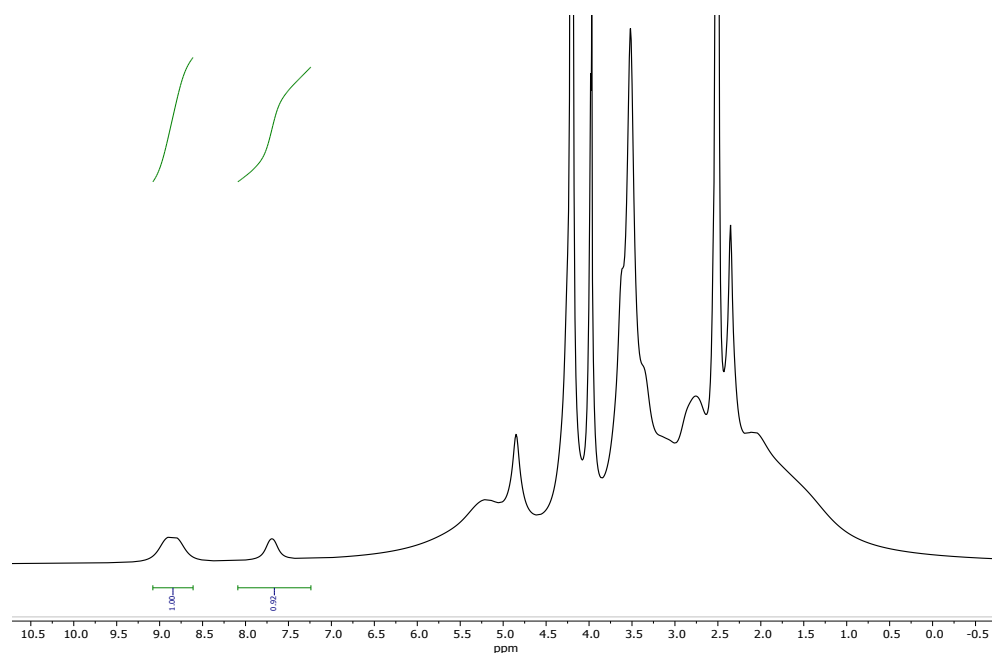


Figure S2. Copolymer P50T-Me. $^1\text{H-NMR}$ (400 MHz, DMSO-d_6), δ (ppm): 8.82 (2H, *H*-thiazole), 7.66 (2H, *H*-thiazole), 5.24 (4H, O- CH_2 -thiazole), 4.85 (4H, CH_2 -N), 4.15 (6H, N^+CH_3 triazole), 3.97 (6H, N^+CH_3 thiazole), 3.50 (4H, CH_2 -thiazole and 6H, -O- CH_3), 2.33 (6H, CH_3 -thiazole).

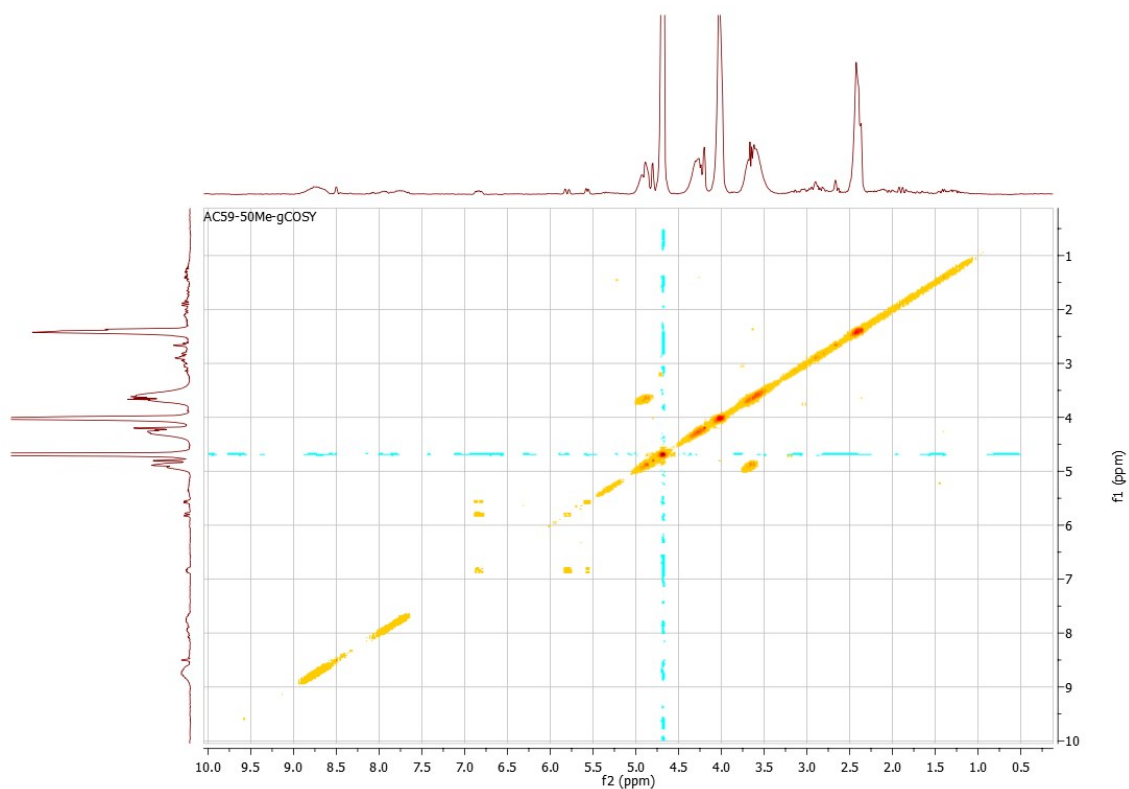


Figure S3. COSY-NMR spectrum in deuterated water of P50T-Me copolymer.

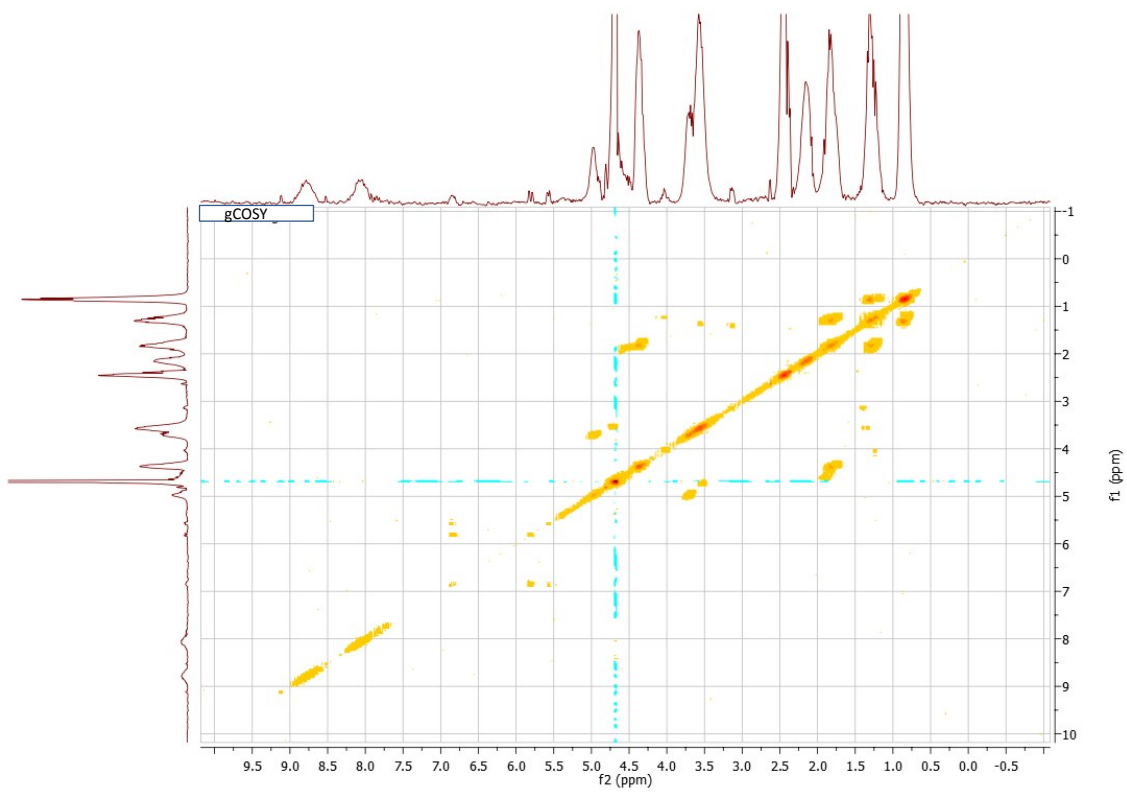


Figure S4. COSY-NMR spectrum in deuterated water of P50T-Bu copolymer.