

Supporting information for

# Well-Defined Thermo- and pH-Responsive Double Hydrophilic Graft Copolymer Bearing a Pyridine-Containing Backbone

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## Supporting Figures

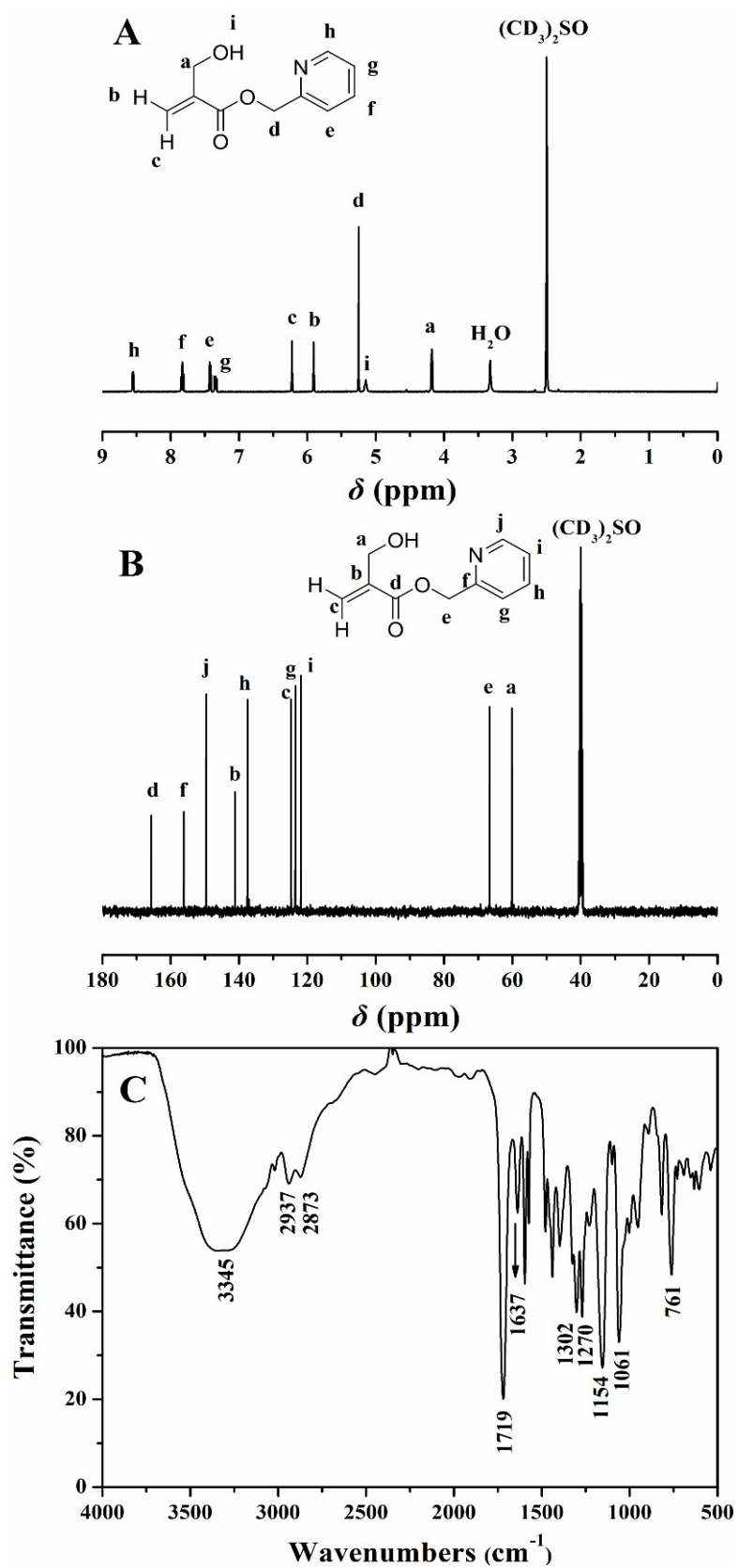


Figure S1.  $^1\text{H}$  NMR (A),  $^{13}\text{C}$  NMR (B) and FT-IR (C) spectra of PyMHMA.

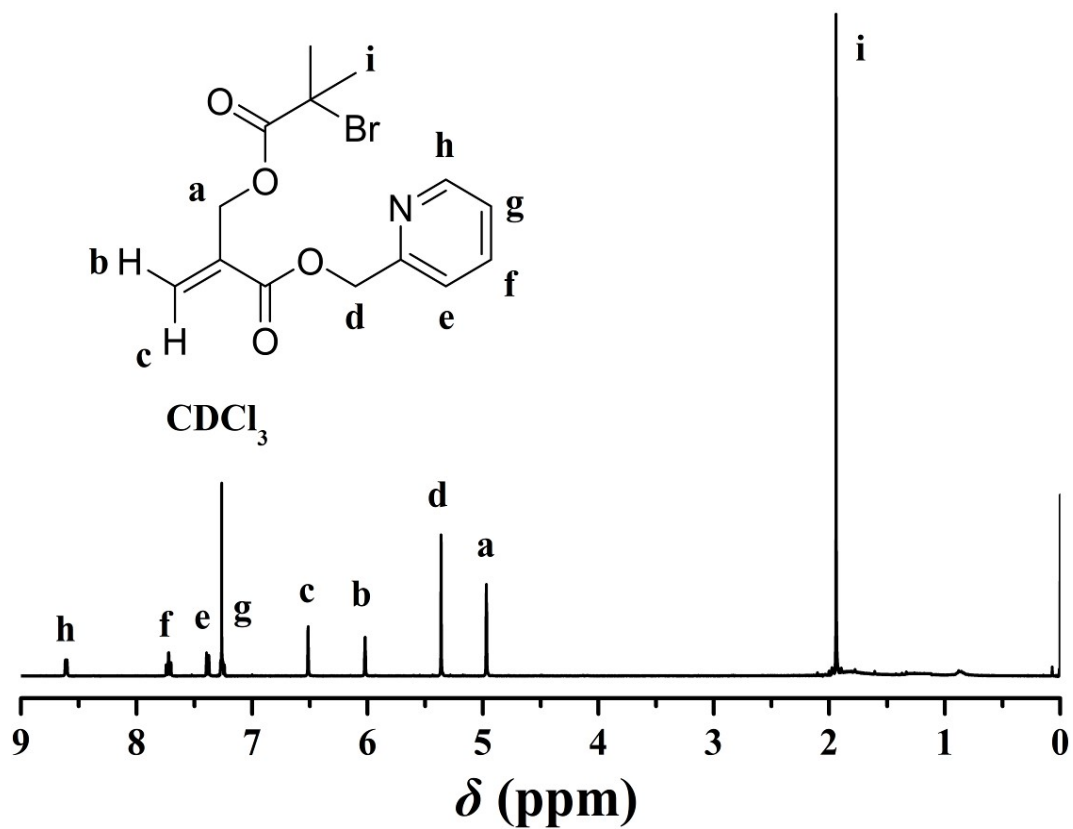


Figure S2. <sup>1</sup>H NMR spectrum of PyMBIBMA monomer in CDCl<sub>3</sub>.

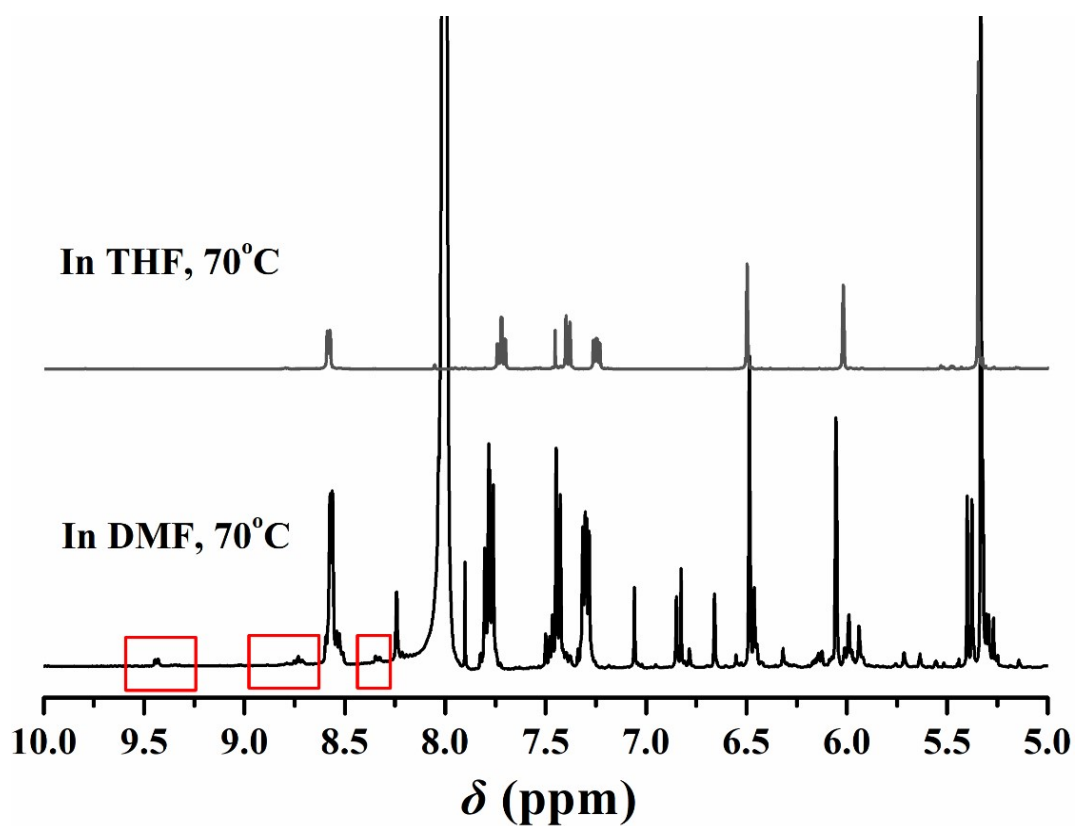


Figure S3. <sup>1</sup>H NMR spectra of PyMBIBMA in different solvents at 70°C in CDCl<sub>3</sub>.

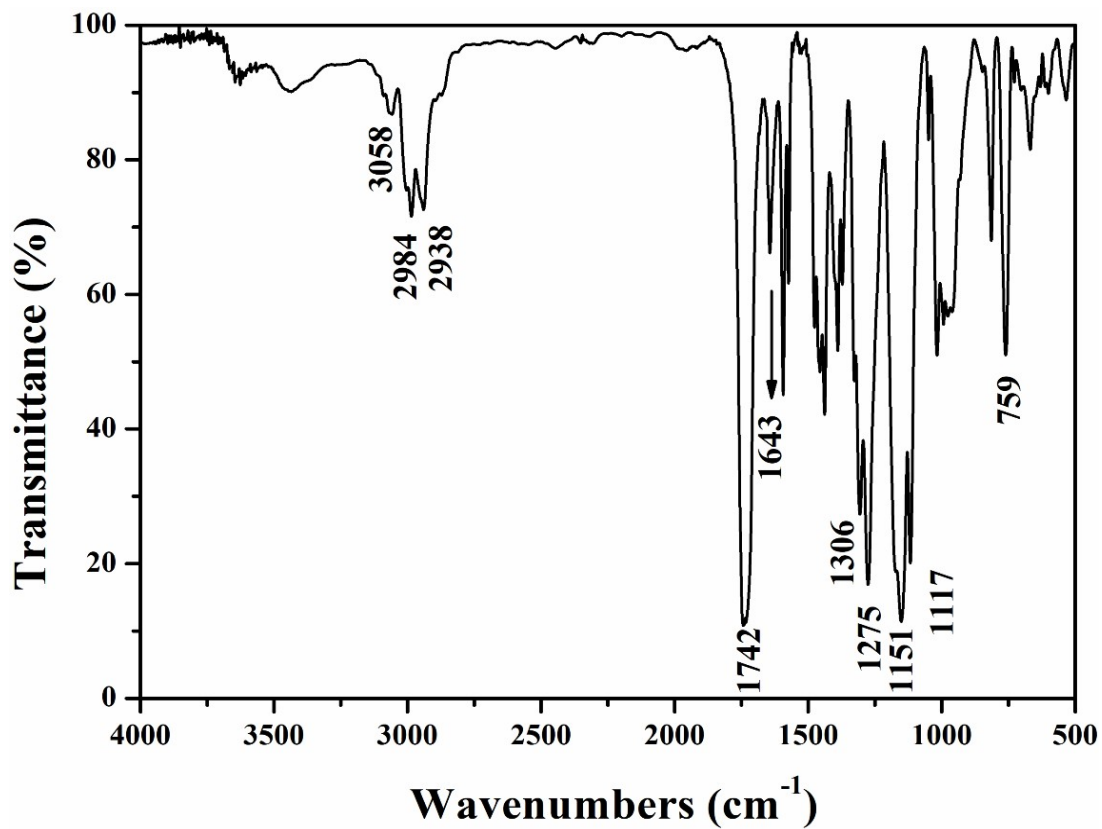


Figure S4. FT-IR spectrum of PyMCIBMA monomer.

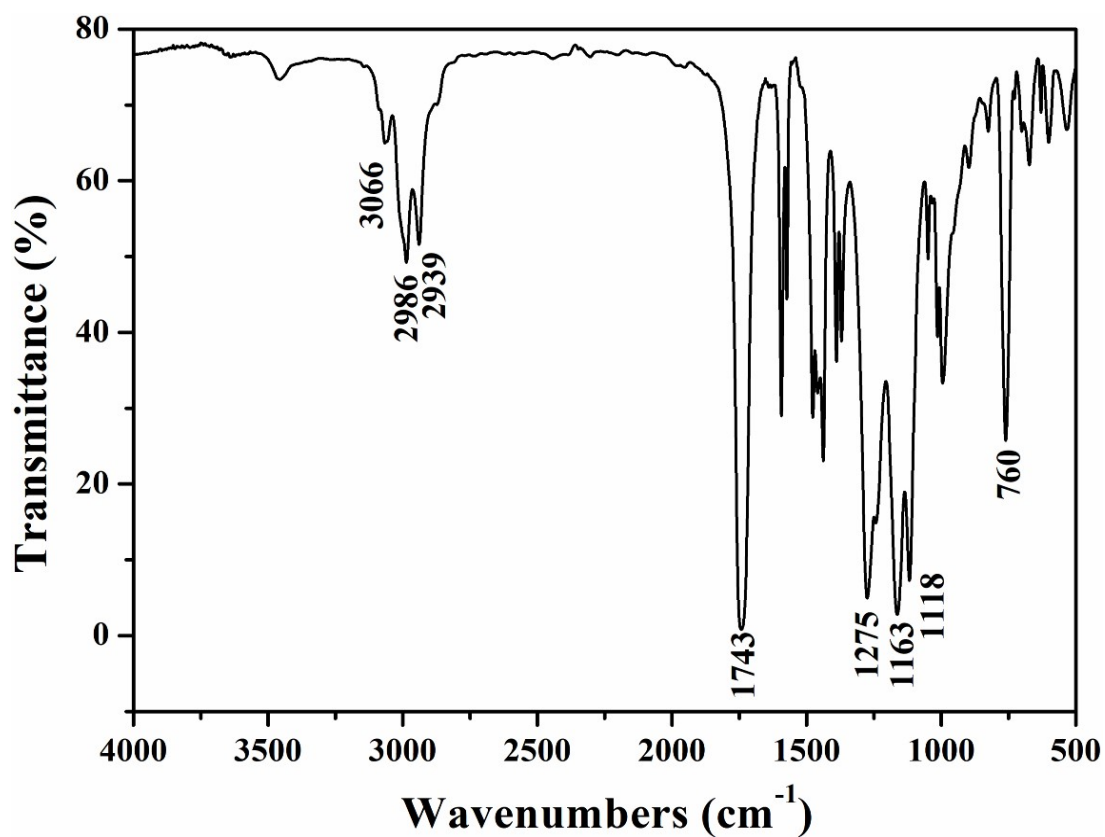
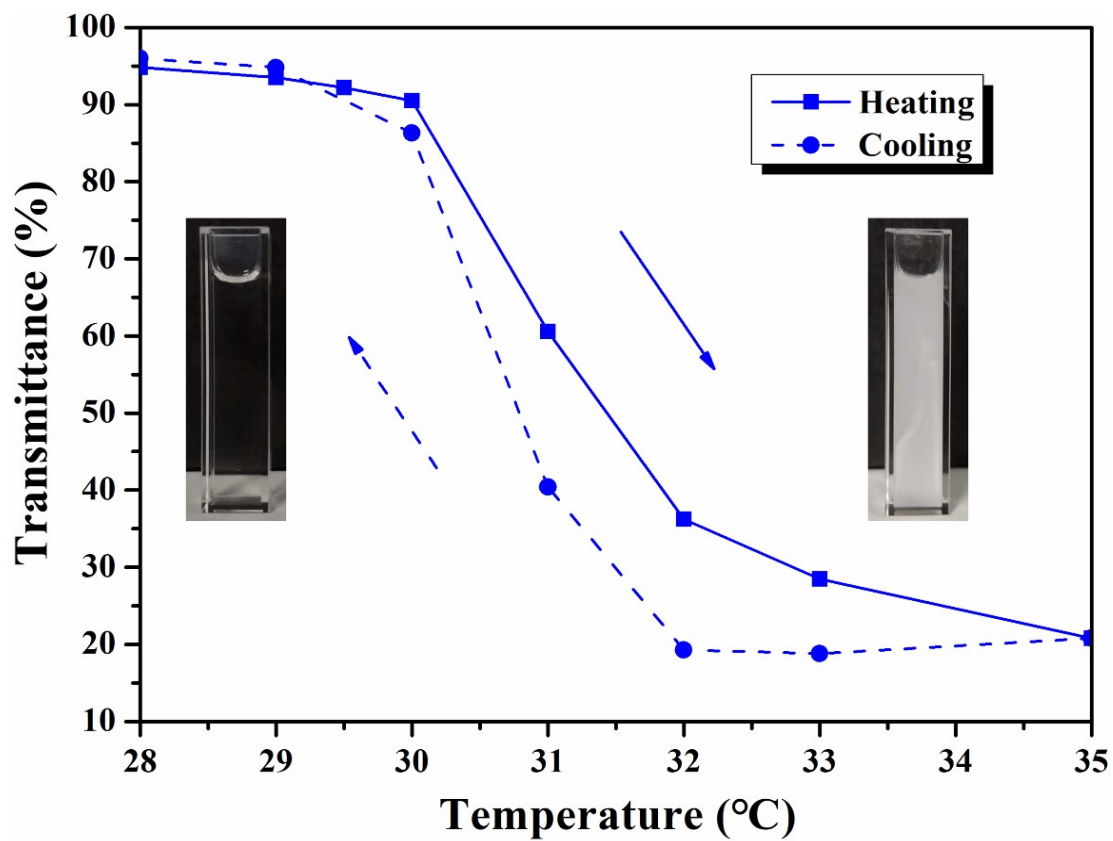
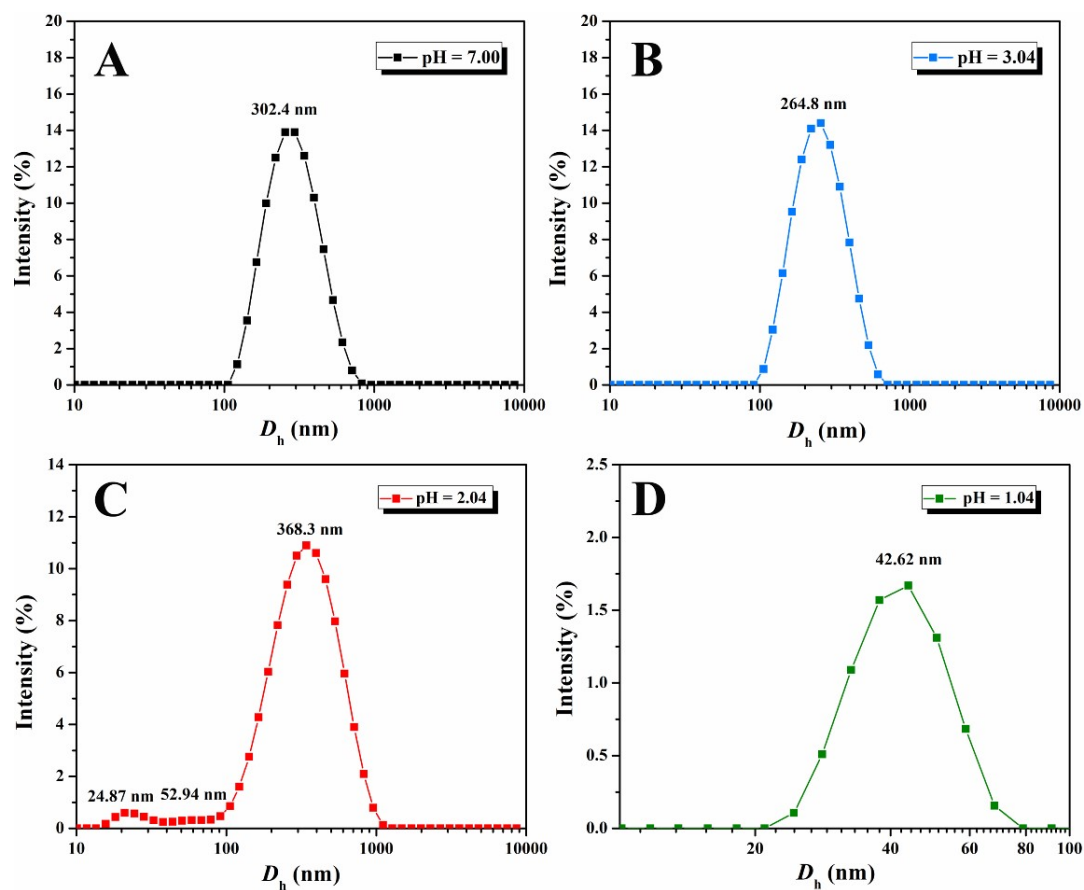


Figure S5. FT-IR spectrum of poly(PyMCIBMA)-S(C=S)Ph.



**Figure S6.** Transmittance vs. temperature for PPyMA-g-PNIPAM **5c** aqueous solutions at pH = 7.00 during one heating and cooling cycle.



**Figure S7.** Distributions of hydrodynamic diameter of micelles formed by PPyMA-g-PNIPAM 5a (0.5 mg/mL), pH = 7.00 (A), 3.04 (B), 2.04 (C) and 1.04 (D).