Supplementary Information

Controllable Electrochromic Polyamide Film and Device Produced by Facile Ultrasonic Spray-coating

Huan-Shen Liu^{1,+}, Wei-Chieh Chang^{2,+}, Chin-Yen Chou¹, Bo-Cheng Pan¹, Yi-Shan Chou², Guey-Sheng Liou^{1,*}, and Cheng-Liang Liu^{2,*}

¹Institute of Polymer Science and Engineering, National Taiwan University, Taipei, 10617 Taiwan

²Department of Chemical and Materials Engineering, National Central University, Taoyuan, 32001 Taiwan

^{*}gsliou@ntu.edu.tw; clliu@ncu.edu.tw

⁺These authors contributed equally to this work

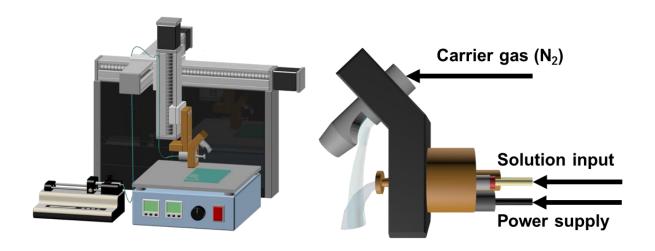


Figure S1. Schematic representation of setup for ultrasonic spray-coating of electrochromic polymer thin film.

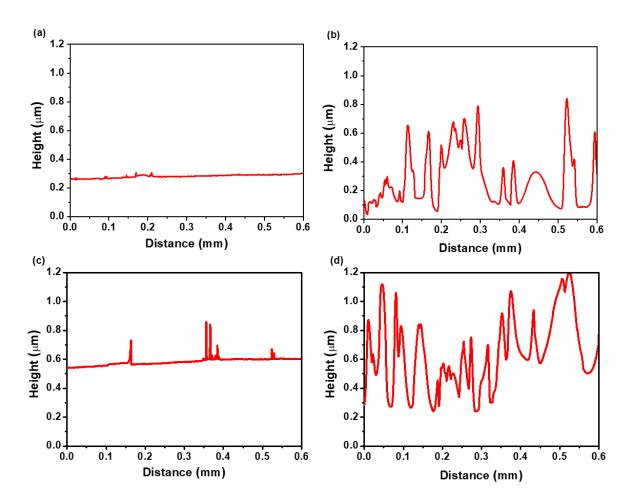


Figure S2. Surface height line scans of ultrasonic spray-coated (a) Film A, (b) Film B, (c)

Film C and (d) **Film D**, measured by profilometry over a lateral distance of 0.6 mm.

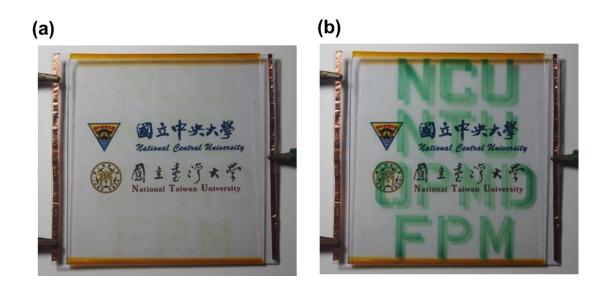


Figure S3. Photograph of the pattern TPA-OMD polyamide ECD in the (a) neutral state and (b) oxidized state.