

A facile route to fabrication of inorganic-small organic molecule cable-like nanocomposite arrays

Xiujuan Zhang,^{a,c} Weigang Ju,^a Xiaohong Zhang,^{*a} and Shuitong Lee^{*b}

Electronic Supplementary Information (ESI):

† Preparation of pyrene nanotubes:

AAO membranes with an average pore diameter of 100 nm (100 ± 10 nm) were purchased from Whatman International Ltd. Pyrene was obtained from Aldrich and recrystallized twice before use.

Pyrene nanotubes were obtained by simple marination method.¹ In a typical procedure, the AAO template was marinated in a saturated pyrene/toluene solution and then the solution was allowed to evaporate. After the process was repeated several circles, the treated template was dried in a vacuum oven and this would reinforce the formed structure. The excess molecules on the surface of the template were removed by polishing with 1500 grid sand paper. Pyrene nanotubes with a diameter of about 100 nm were obtained inside the AAO templates.

¹ L. Y. Zhao, W. S. Yang, Y. Ma, J. N. Yao, Y. L. Li and H. B. Liu, *Chem. Commun.*, 2003, 2442.