

Supporting Information

(Manuscript ID JM-ART-02-2011-010830)

**DNA-Based Fabrication of Density-Controlled Vertically
Aligned ZnO Nanorod Arrays and Its SERS applications**

Lanlan Sun, Dongxu Zhao*, Zhenzhong Zhang, Binghui Li, Dezhen Shen

Key Laboratory of Excited State Processes, Chinese Academy of Sciences,
Changchun Institute of Optics, Fine Mechanics and Physics, Chinese Academy of
Sciences, 16 East Nan-Hu Road, Open Economic Zone, Changchun 130033, People's
Republic of China

* To whom correspondence should be addressed. E-mail: dxzhao2000@yahoo.com.cn

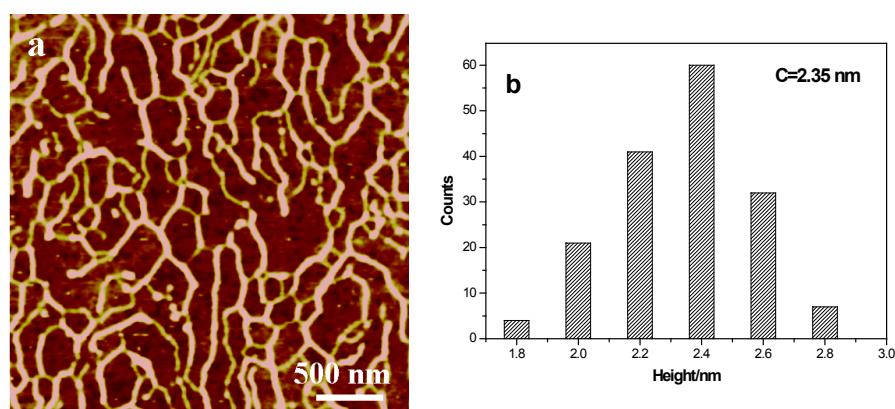


Figure S1 (a) Tapping mode AFM image of DNA networks on ITO surface after six times of Zn^{2+} wetting treatment, (b) corresponding height distribution histogram of AFM image of (a).

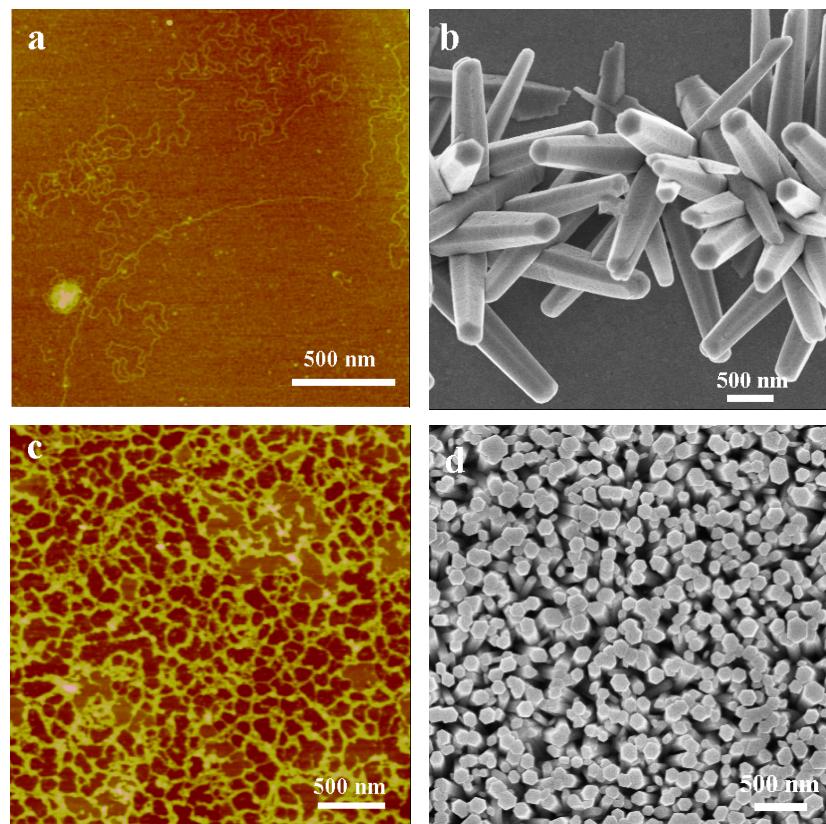


Figure S2 Tapping mode AFM images of DNA structures on ITO surface with various DNA concentration: (a) 5 and (c) 20 $\text{ng}/\mu\text{L}$, (b) and (d) SEM images of correspondingly obtained ZnO NRs arrays.

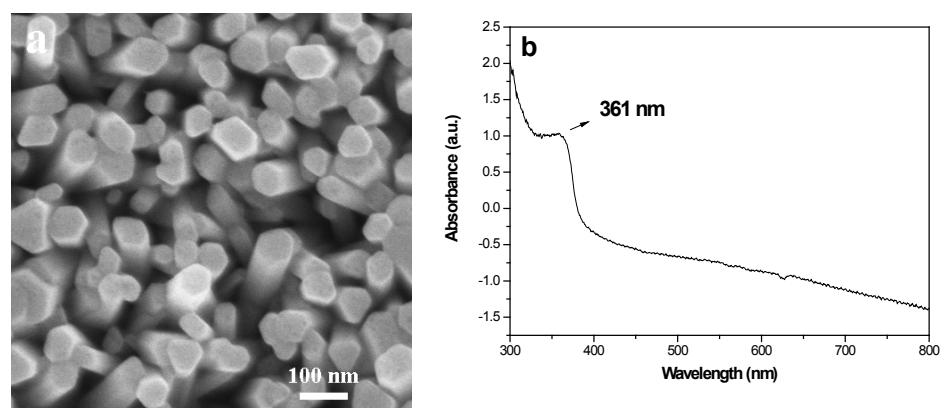


Figure S3 (a) SEM image and (b) UV-vis absorption spectrum of ZnO NRs grown on glass.

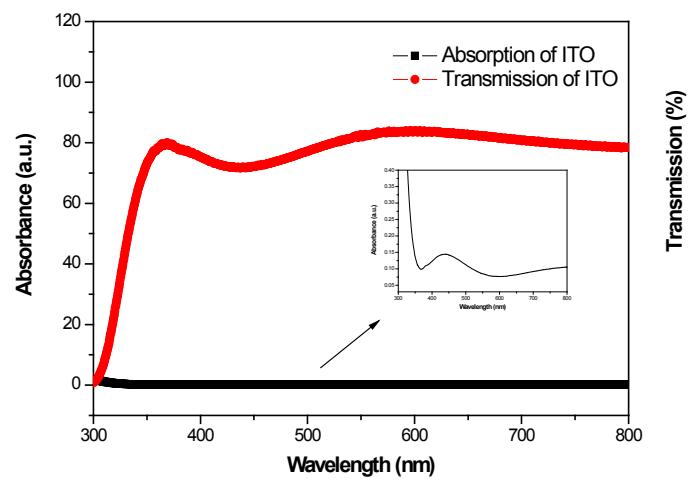


Figure S4 UV-vis absorption and transmission spectra of pure ITO slide.