Electronic Supplementary Information

Growth of Single-Crystalline Rutile TiO₂ Nanowires Array on Titanate Nanosheet Film for Dye-Sensitized Solar Cells

Panpan Sun, Xintong Zhang,^{*} Xueping Liu, Lingling Wang, Changhua Wang, Jikai Yang, Yichun Liu

Center for Advanced Optoelectronic Functional Materials Research, and Key Laboratory for UV-Emitting Materials and Technology of Ministry of Education, Northeast Normal University, 5268 Renmin Street, Changchun 130024, China

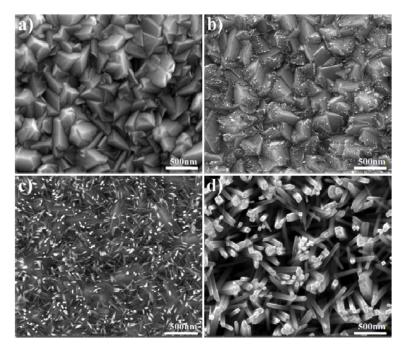


Fig. SI-1 Top view SEM images showing the growth process of TiO_2 nanowire on bare conductive FTO substrate: a) before hydrothermal reaction, and hydrothermal reacted with titanium precursor being present for b) 1h, c) 2h, d) 8h. The epitaxial relationship between FTO and rutile nanowires leads to the nanowires first grow along the epitaxial interface, and then experience secondary nucleation and begin to grow to nanowire arrys.

^{*} To whom correspondence should be addressed. Tel./Fax: +86-431-85099772; E-mail: xtzhang@nenu.edu.cn