Supplementary information

Insight into the Role of Surface Wettability in Electrocatalytic Hydrogen Evolution Reactions Using Light-Sensitive Nanotubular TiO_2 Supported Pt Electrodes

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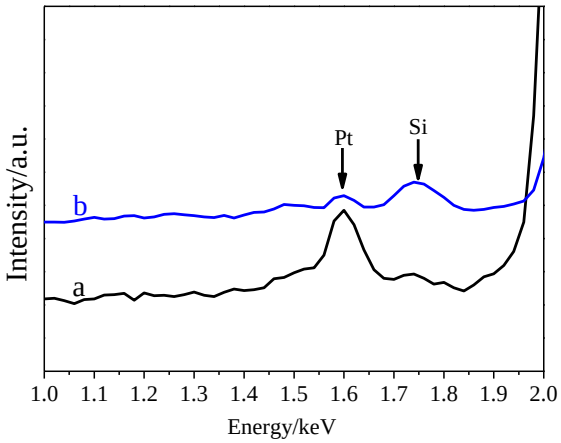

Figure S1. EDX patterns of OTS-modified Pt-TiO_2-NTs after UV illumination for 200 min on the specific surface of (a) Pt particles and (b) TiO_2 nanotubes. It is found that Si elements mainly distribute on the surface of TiO_2 nanotubes, which indicates that OTS molecules easily bond to TiO_2 nanotubes.

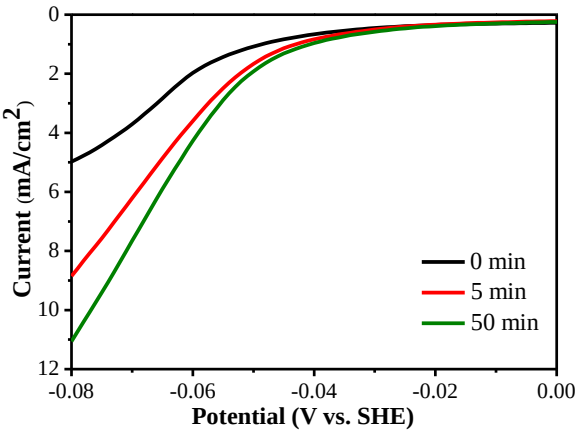

Figure S2. Magnified polarization curves of OTS-modified Pt-TiO_2-NTs at potential ranging -0.08 and 0 V (vs. SHE) when the UV illumination time is 0, 5 and 50 min in 0.5 M H_2SO_4. Following the decrease of water CA by UV illumination, the current density for HERs increases.