

Figure S1 XPS survey spectrum of WSAC-3

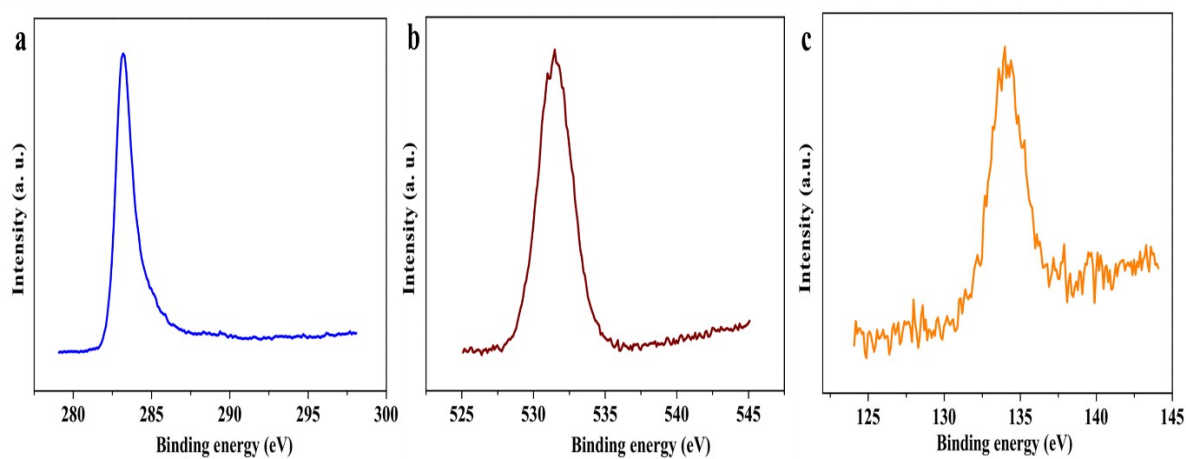


Figure S2 (a) C1s scan of WSAC-3; (b) O1s scan of WSAC-3; (c) P2p scan of WSAC-3

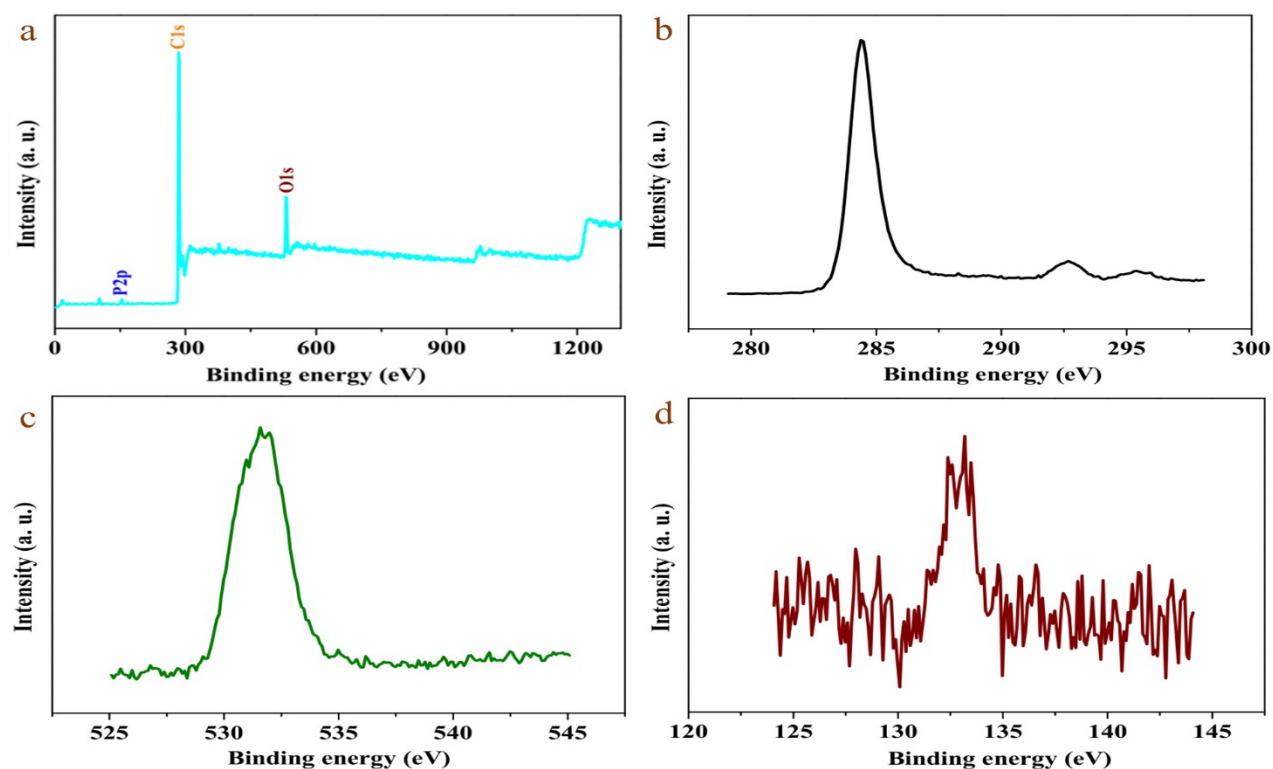


Figure S3 (a) XPS survey spectrum of WSC; (b) C1s scan of WSC; (c) O1s scan of WSC; (d) P2p scan of WSC

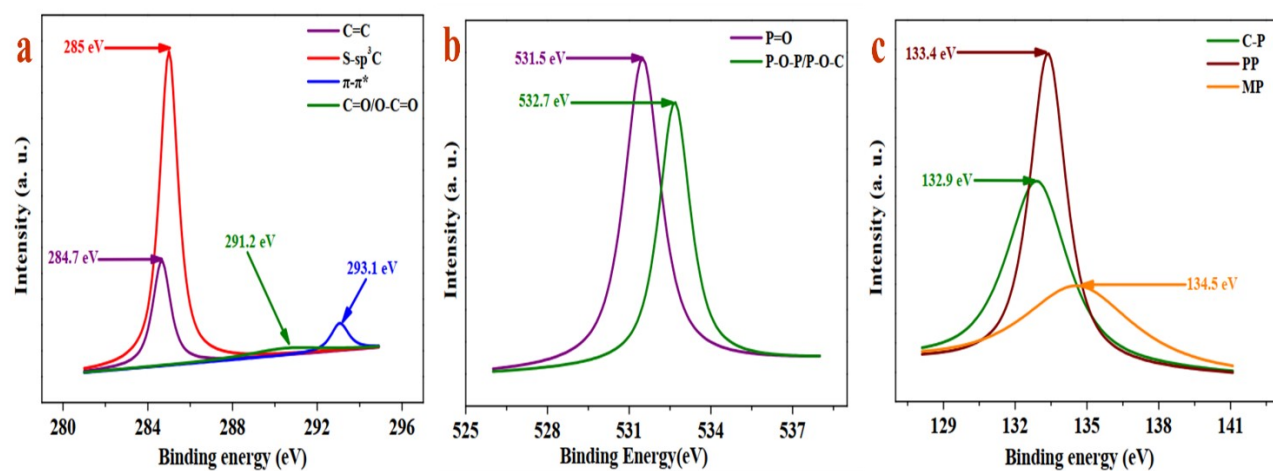


Figure S4 (a) High resolution C1s of WSC; (b) High resolution O1s of WSC; (c) High resolution P2p of WSC

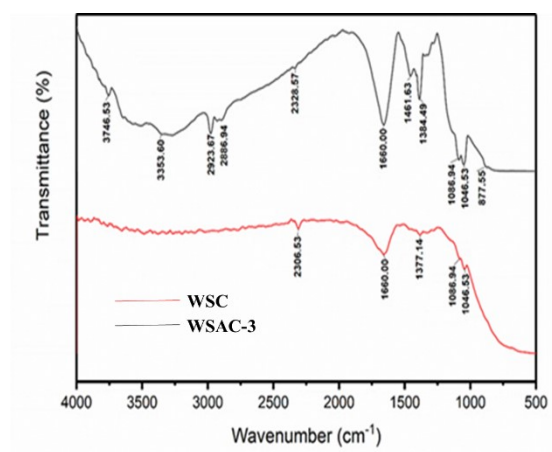


Figure S5 FT-IR spectra of WSC and WSAC-3 materials

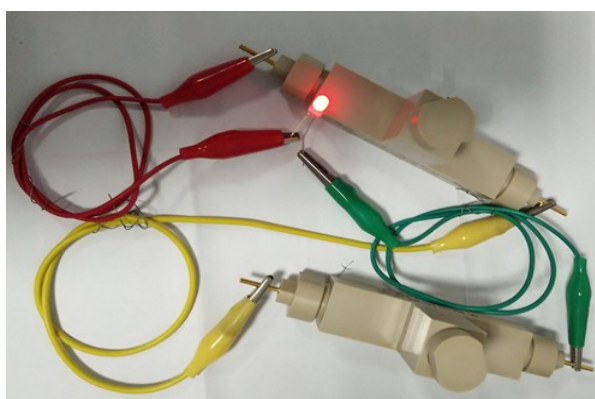


Figure S6 photograph of lighting LED bulbs