Supporting information:

Microwave-assisted synthesis of UIO-66 and the adsorption performance to dyes

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Figure S1 The PXRD patterns of simulation from crystallographic information file (a); MWHAc-UIO-66 (b); MWBA-UIO-66 (c); HHAc-UIO-66 (d); MW-UIO-66 (e).

Figure S2 The TG curves of MW-UIO-66 (a, ❒); MWBA-UIO-66 (b, ①); MWHAc-UIO-66 (c, ❍); HHAc-UIO-66 (d, ♦).

Figure S3 The TEM diagrams of MW-UIO-66 (a, b); MWBA-UIO-66 (c, d); MWHAc-UIO-66 (e, f); HHAc-UIO-66 (g, h).

Figure S4 N_2 adsorption isotherms at 77K: MW-UIO-66 (a, ❒); MWBA-UIO-66 (b, ①); MWHAc-UIO-66 (c, ❍); HHAc-UIO-66 (d, ♦).

Figure S5 The photo after adsorption of acid chrome blue k soaked in MWHAc-UIO-66. The concentration of acid chrome blue k from left: 50ppm (a, ❍); 150ppm (b, ♦); 250ppm (c, ❒).

Figure S6 The PXRD patterns of MWHAc-UIO-66 after two reuses of MWHAc-UIO-66: simulation from crystallographic information file (a); MWHAc-UIO-66 (b); MWHAc-UIO-66 after two reuses(c).

Scheme 1S the structure of dyes

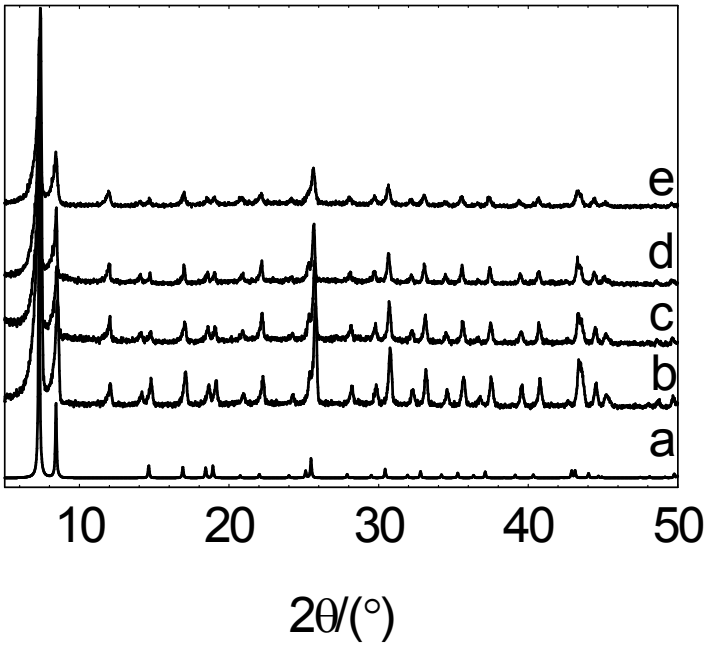


Figure S1 The PXRD patterns of simulation from crystallographic information file (a); MWHAc-UIO-66 (b); MWBA-UIO-66 (c); HHAc-UIO-66 (d); MW-UIO-66 (e).

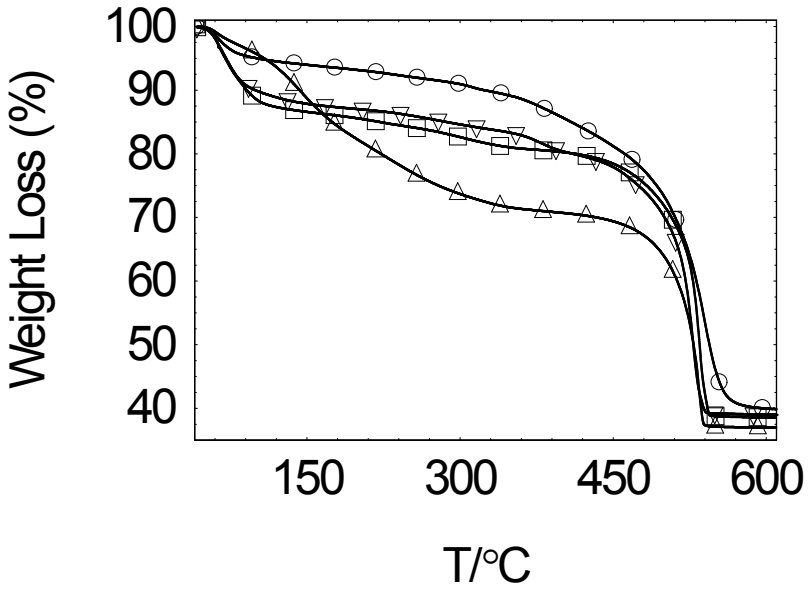
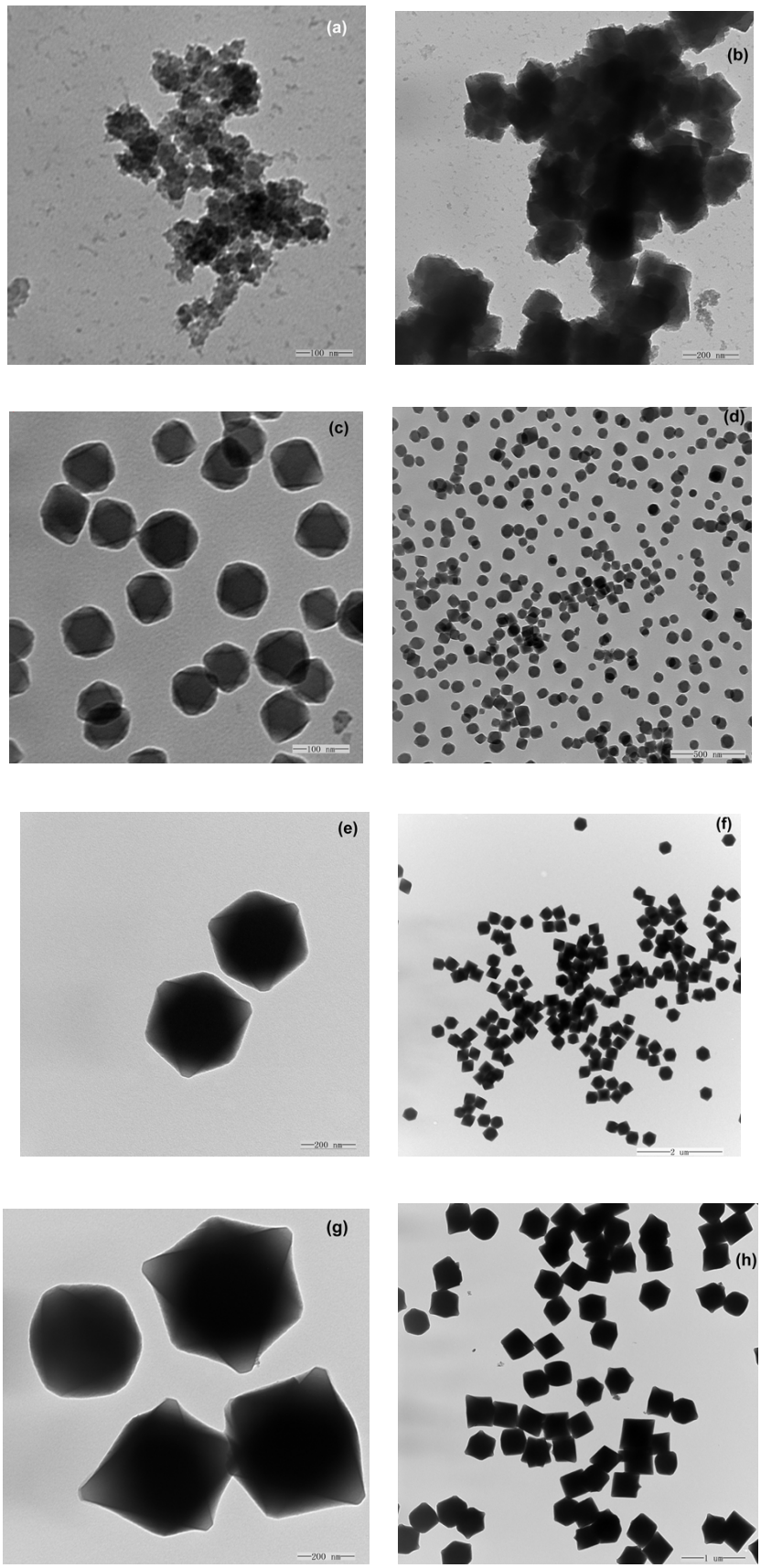


Figure S2 the TG curves of MW-UIO-66 (a, ❒); MWBA-UIO-66 (b, ①); MWHAc-UIO-66 (c, ❍); HHAc-UIO-66 (d, ♦).



g h

Figure S3 The TEM diagrams of MW-UIO-66 (a, b); MWBA-UIO-66 (c, d);

MWHAc-UIO-66 (e, f); HHAc-UIO-66 (g, h).

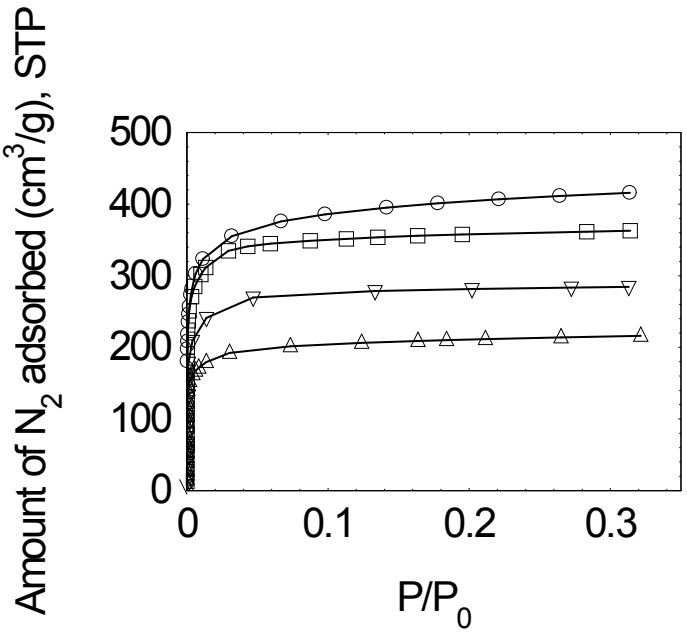
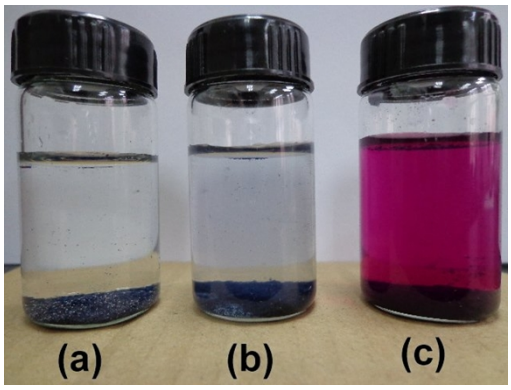


Figure S4 N_2 adsorption isotherms at 77K: MW-UIO-66 (a, ❒); MWBA-UIO-66 (b, ①); MWHAc-UIO-66 (c, ❍); HHAc-UIO-66 (d, ♦).



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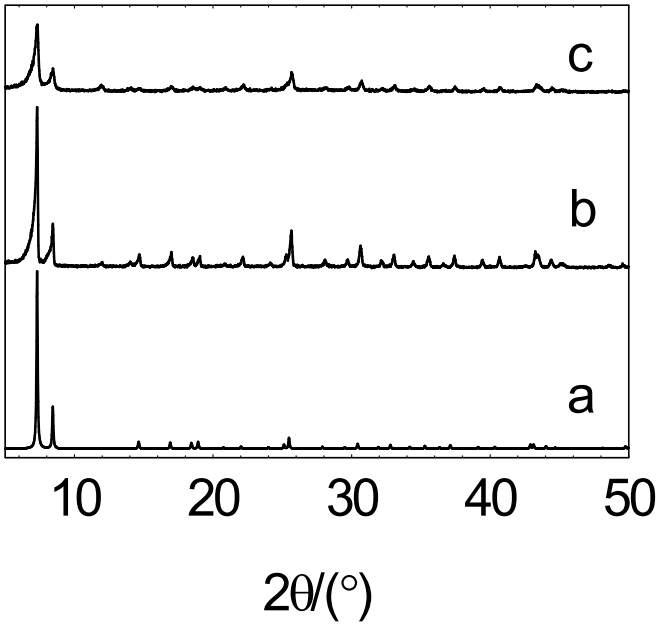
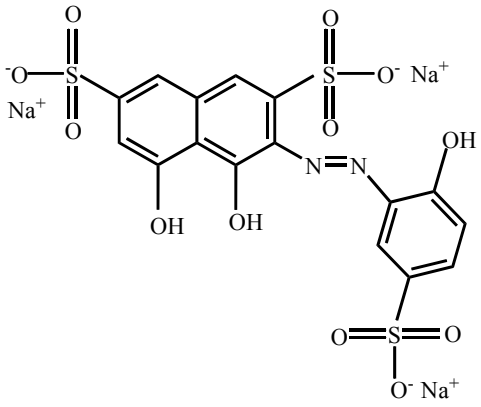
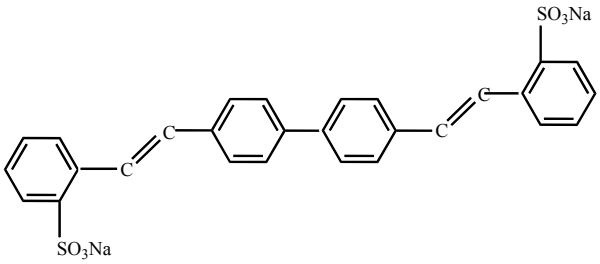
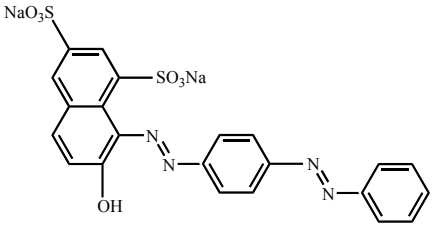


Figure S6 The PXRD patterns of MWHAc-UIO-66 after two reuses of MWHAc-UIO-66: simulation from crystallographic information file (a); MWHAc-UIO-66 (b); MWHAc-UIO-66 after two reuses(c).

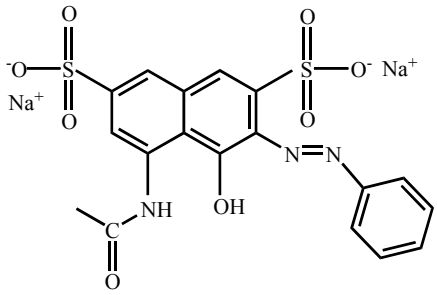


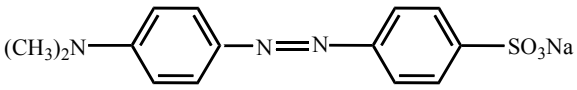
Acid chrome blue K





4,4’-bis(2-sulfonatostyryl)biphenyl disodium (FBA351) Crocein scarlet MOO





Acid red 1 methyl orange (MO)

Scheme 1 the structure of dyes.