

## Supporting Information of

Rare earth-free composites of carbon dots/metal-organic framework as white light-emitting phosphor

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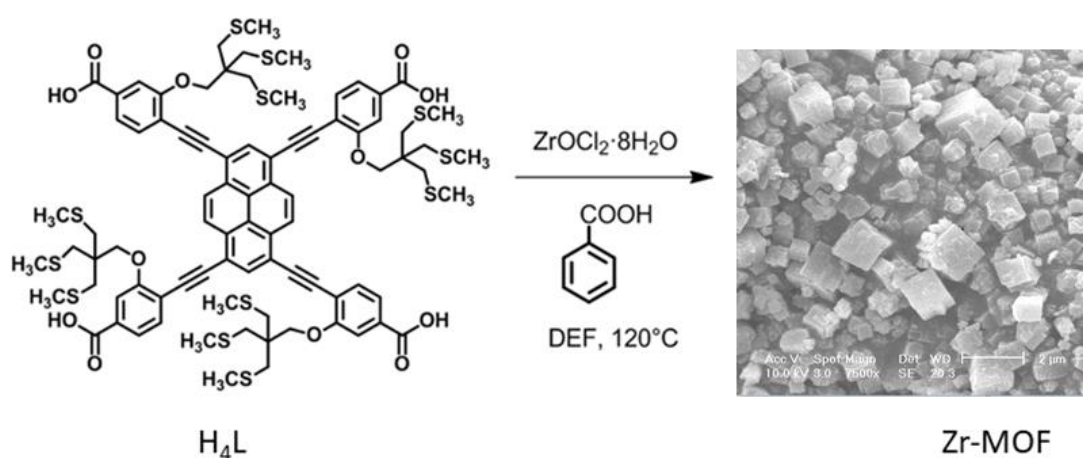


Figure S1. Solvothermal synthesis of Zr-MOF: reaction components, and TEM image of the resulting product.

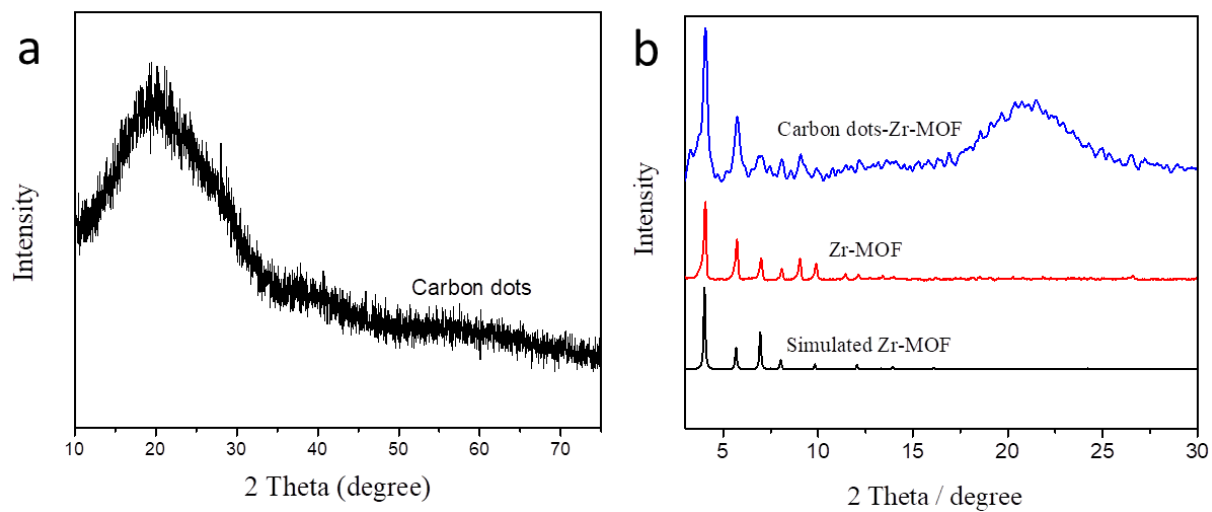


Figure S2. Powder X-ray diffraction patterns of (a) CDs, and 9b) synthesized Zr-MOF, CDs/Zr-MOF composite, and simulated Zr-MOF.

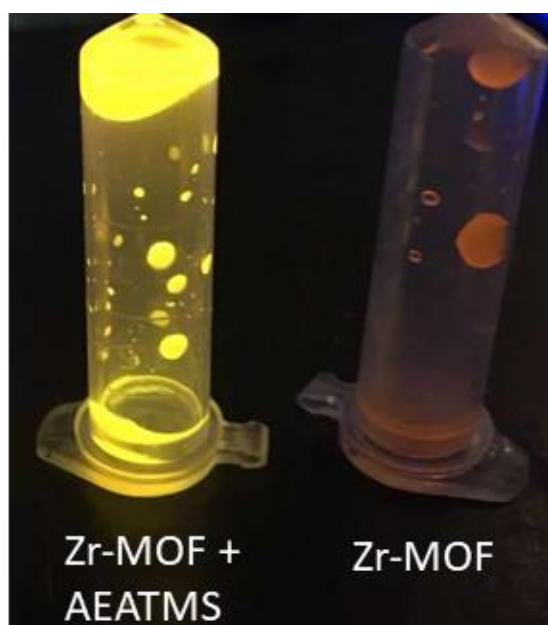


Fig. S3. Photographs of Zr-MOF and AEATMS Zr-MOF under the hand UV (365nm) light.

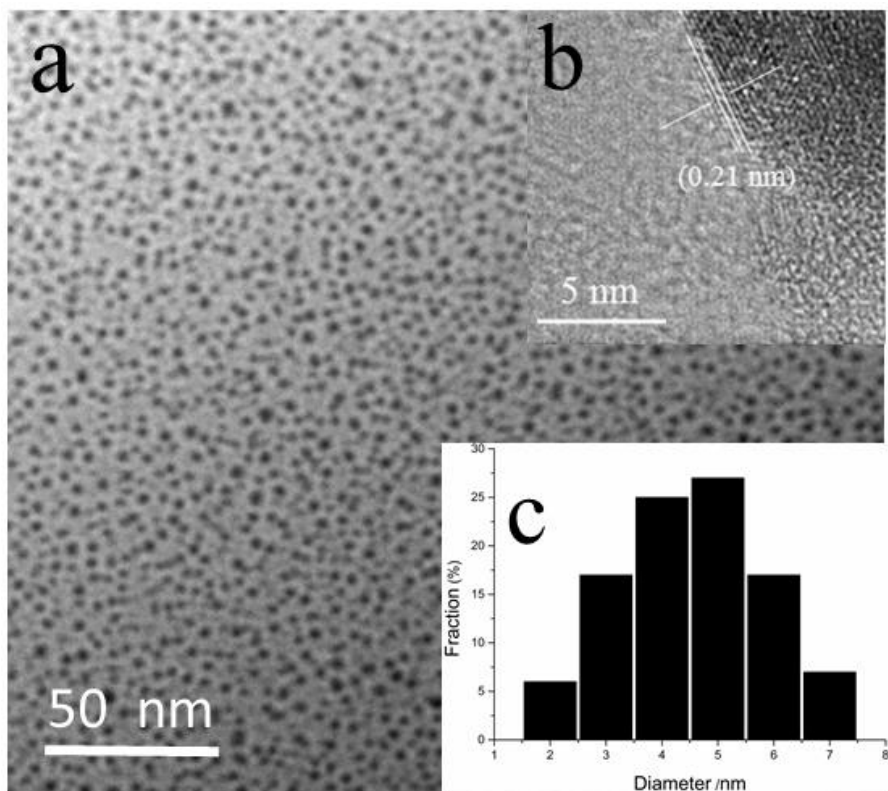


Figure S4. (a) TEM image of CDs; insets in (b) and (c) show HRTEM image of a single CD particle, and the size distribution of the CDs, correspondingly.

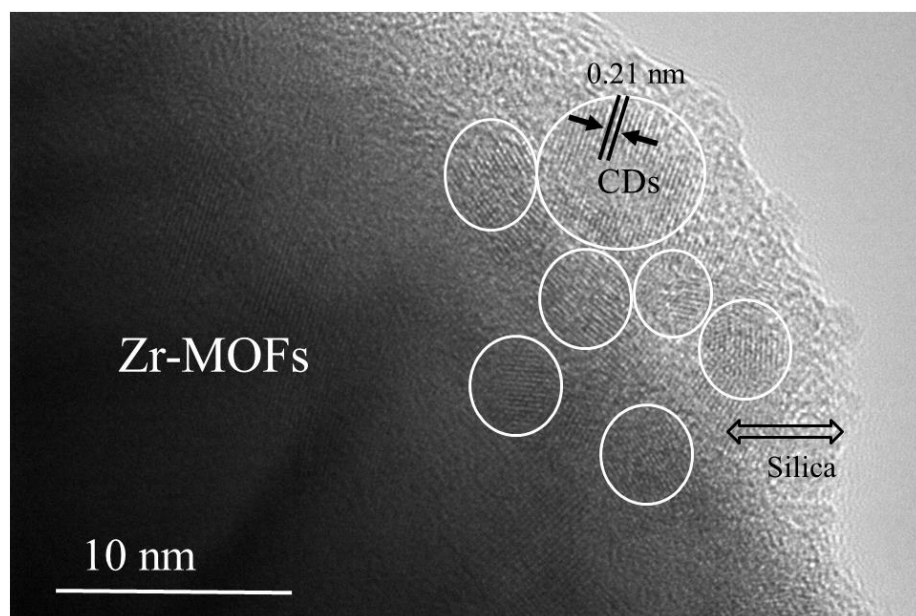


Figure S5. HRTEM image of CDs/Zr-MOFs.

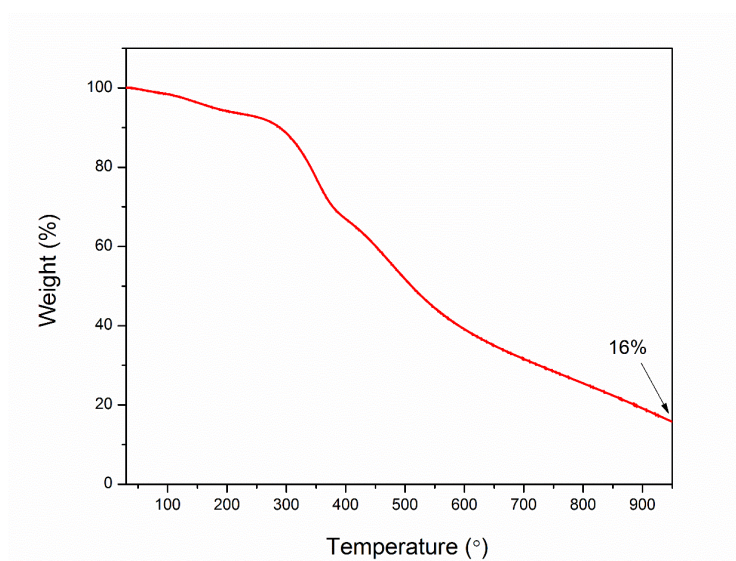


Figure S6. Thermogravimetric analysis (TGA) plot of Zr-MOF (heating rate at 2 °C/min).

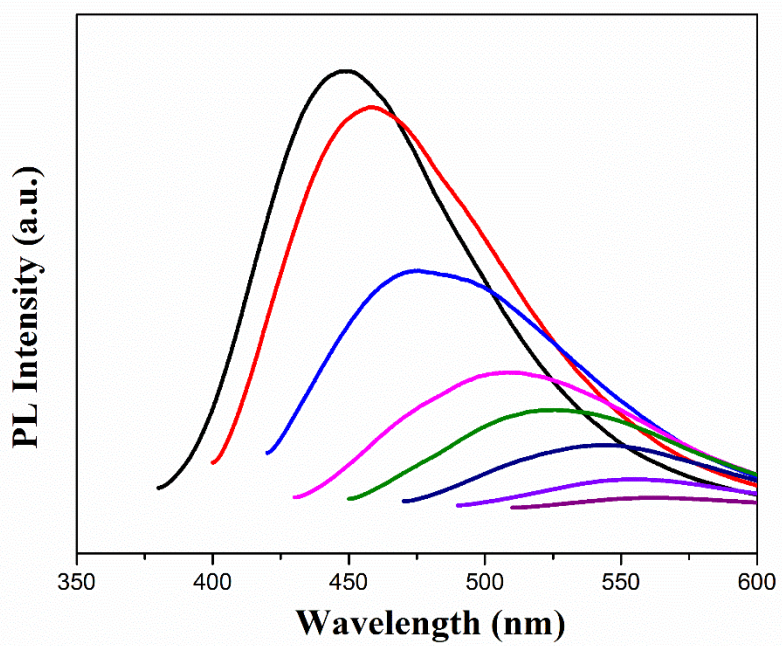


Figure S7. Excitation-dependent PL emission spectra of CDs.

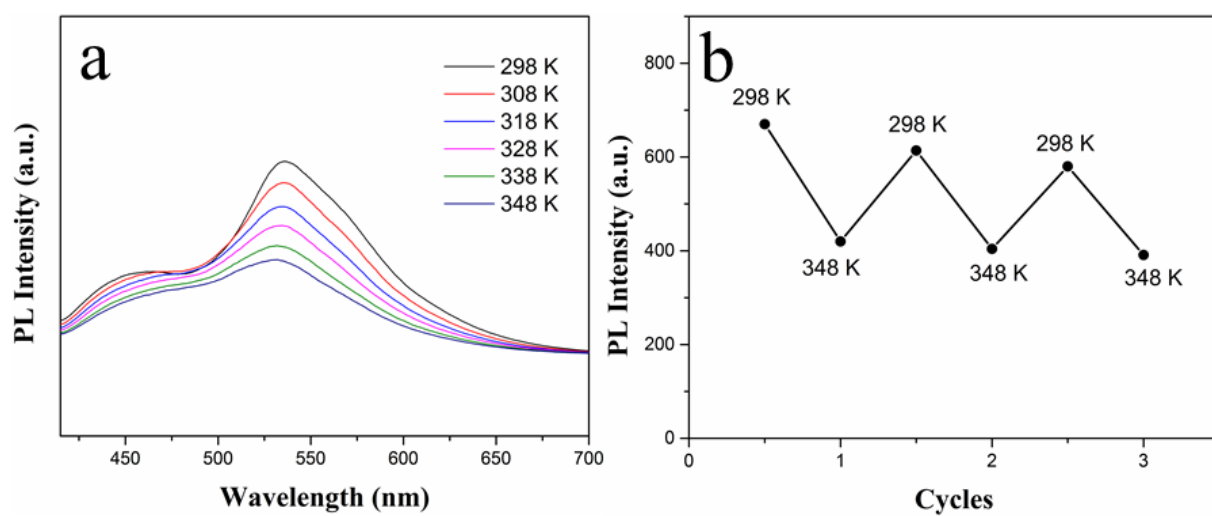


Figure S8. PL emission spectra of CDs/Zr-MOFs obtained at different temperature upon 360 nm excitation (a), and the thermal stability test of CDs/Zr-MOFs (b).