

# Supplementary Materials: Synthesis of Multicolor Carbon Dots Based on Solvent Control and Its Application in the Detection of Crystal Violet

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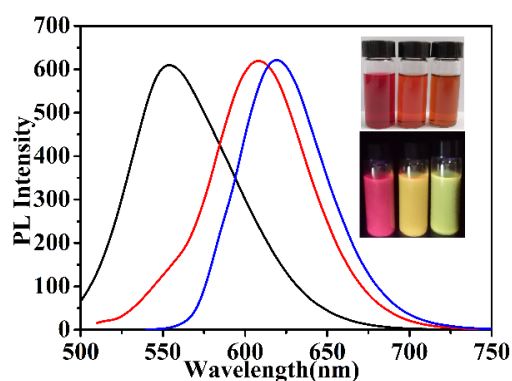


Figure S1. R-CDs Fluorescence spectra of four samples obtained by separation.

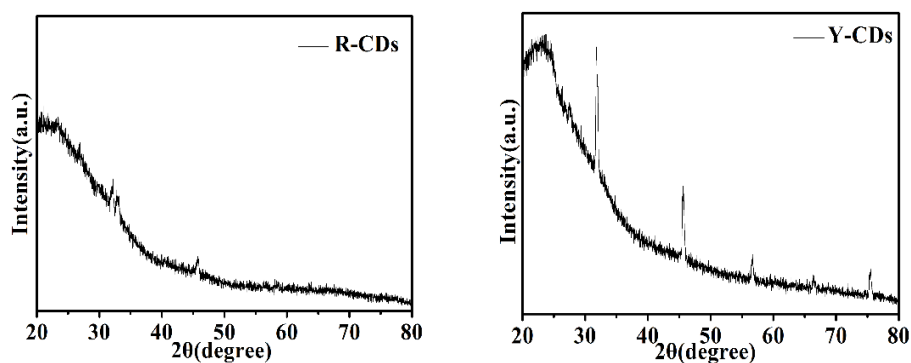


Figure S2. XRD patterns of the R-CDs and Y-CDs.

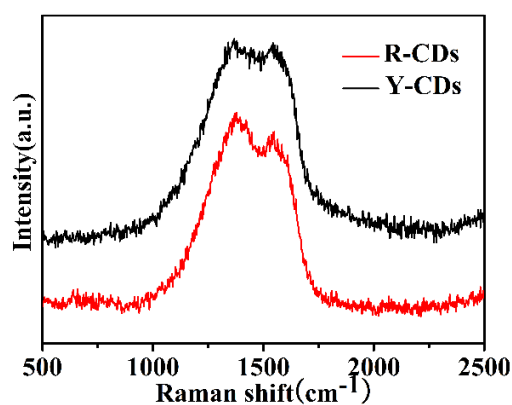


Figure S3. Raman spectra of the R-CDs and Y-CDs.

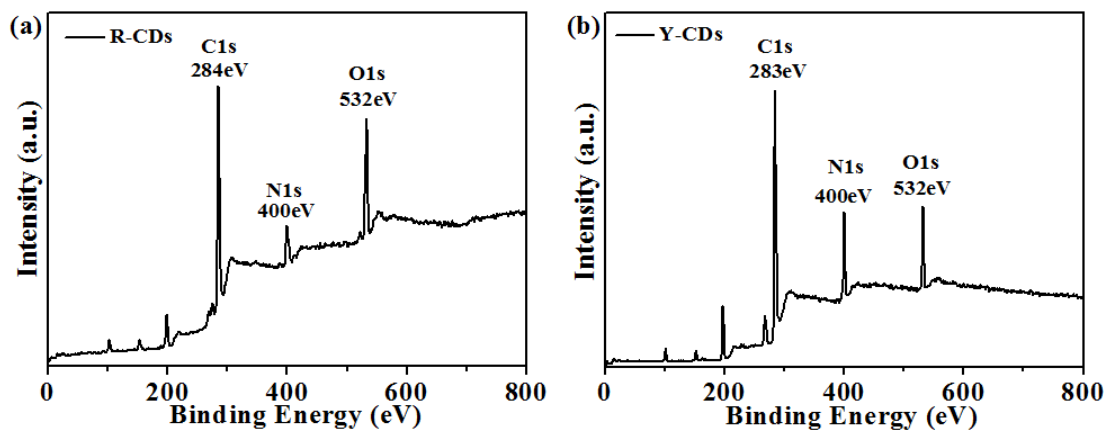


Figure S4. (a) R-CDs and (b) Y-CDs with XPS full spectrum.

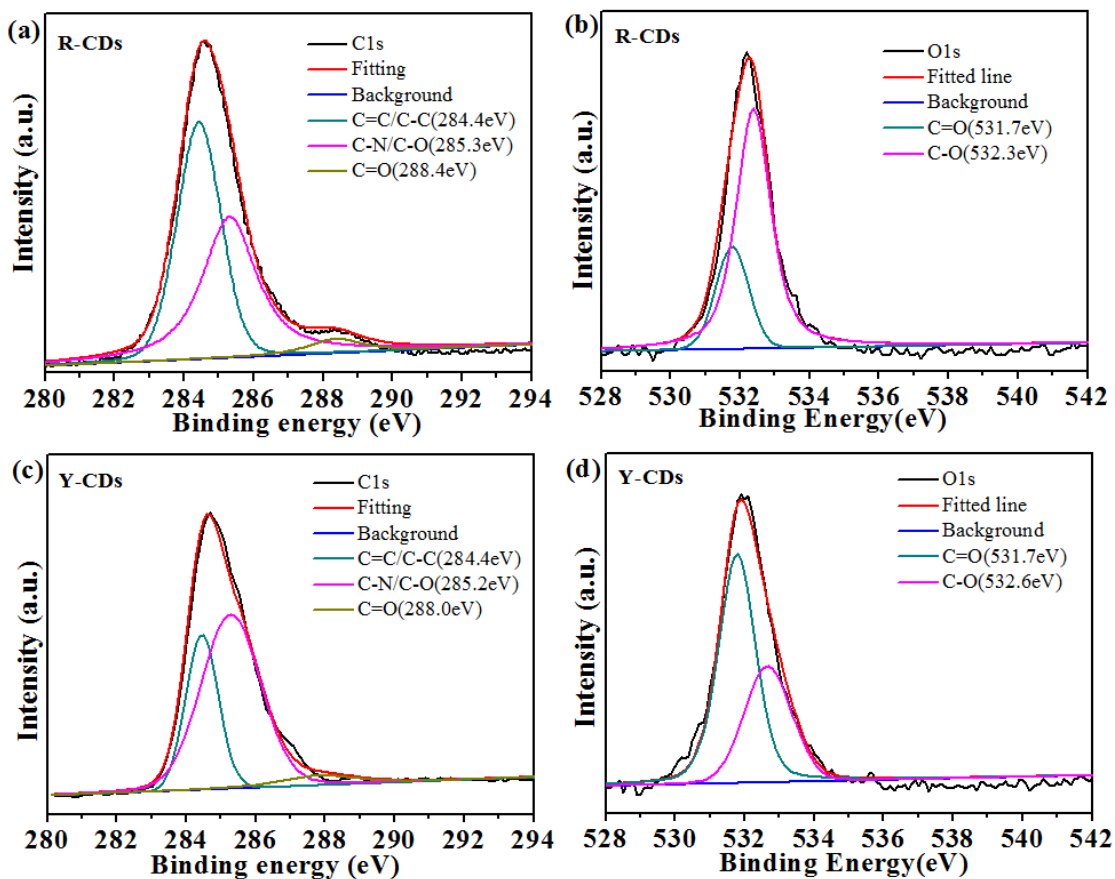


Figure S5. (a) C1s and (b) O1s spectra of R-CD, (c) C1s and (d) O1s spectra of Y-CDs.

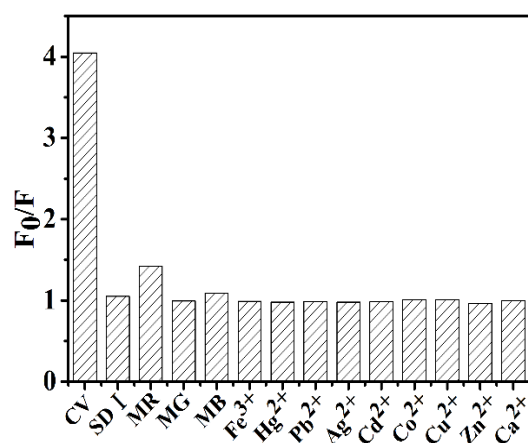


Figure S6. Sensitivity investigation of the Y-CDs for CV detection (samples concentration: 10  $\mu$ M).

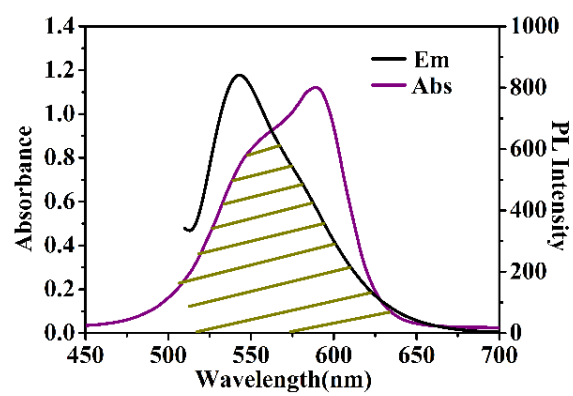


Figure S7. The overlap between absorption spectrum of CV and the emission spectra of Y-CDs.