Electronic Supplementary Material (ESI) for RSC Advances

Supplementary Information for

Shape-controlled synthesis of $CdCO_3$ microcrystals and corresponding nanoporous CdO architectures

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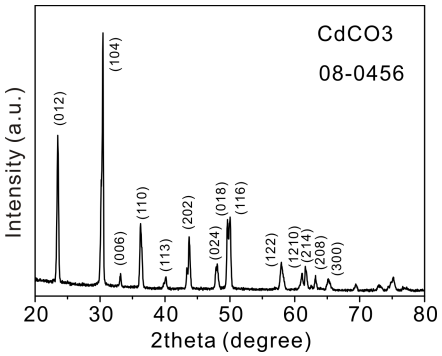

Figure S1. XRD pattern for the as-prepared $CdCO_3$ microcrystals.

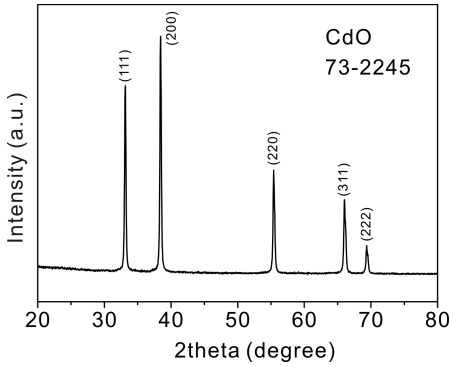

Figure S2. XRD pattern for the porous CdO nanostructures.

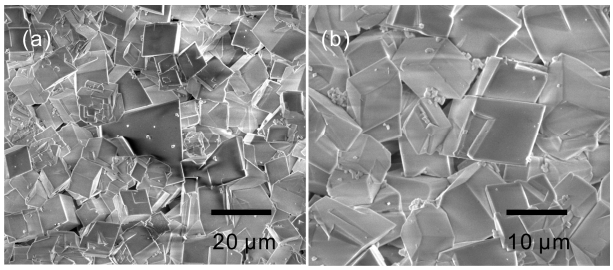

Figure S3. SEM (a) images of the $CdCO_3$ microcrystals synthesized in pure water.

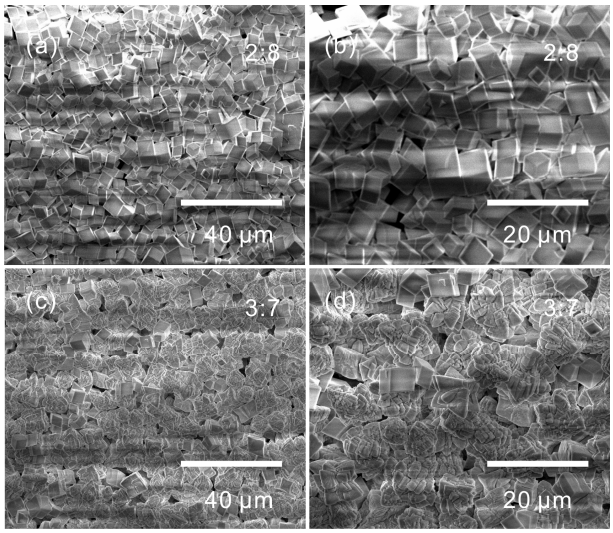

Figure S4. SEM images of the $CdCO_3$ products synthesized with 2:8 (a, b) and 3:7 (c, d) volume ratios of EG and water.

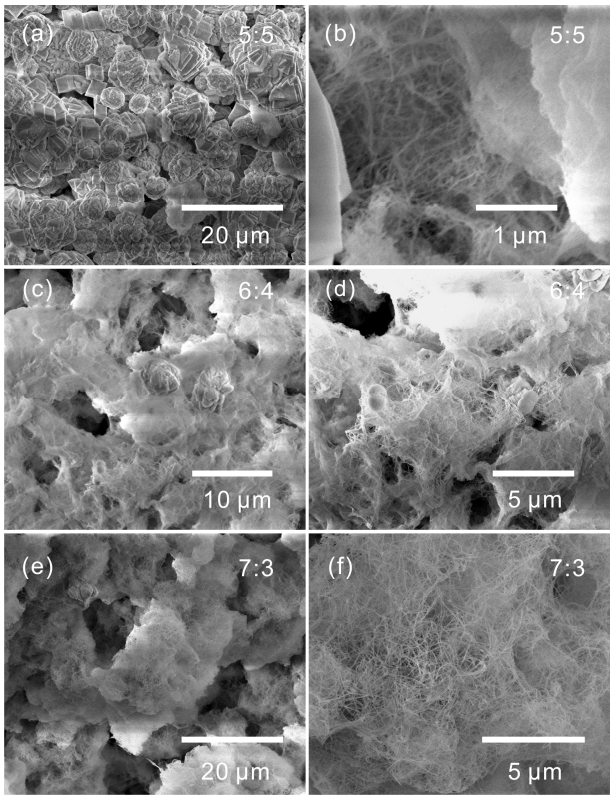

Figure S5. SEM images of the $CdCO_3$ products synthesized with 5:5 (a, b), 6:4 (c, d), and 7:3 (e, f) volume ratios of EG and water.

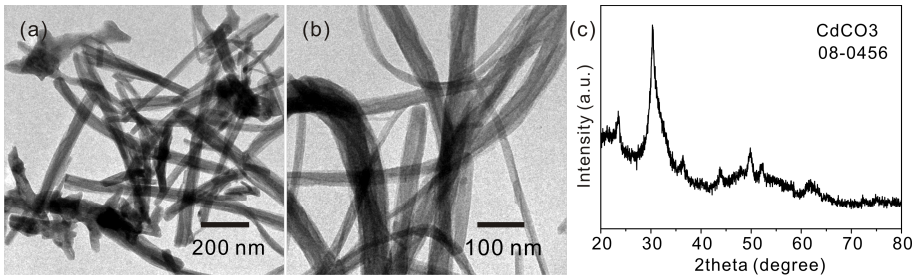

Figure S6. TEM (a, b) images and XRD pattern (c) of the $CdCO_3$ nanobelts synthesized with 9:1 volume ratio of EG and water.

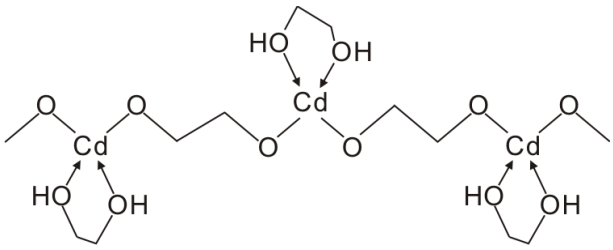

Figure S7. Schematic illustration of linear complex that was formed between EG and cadmium cations.

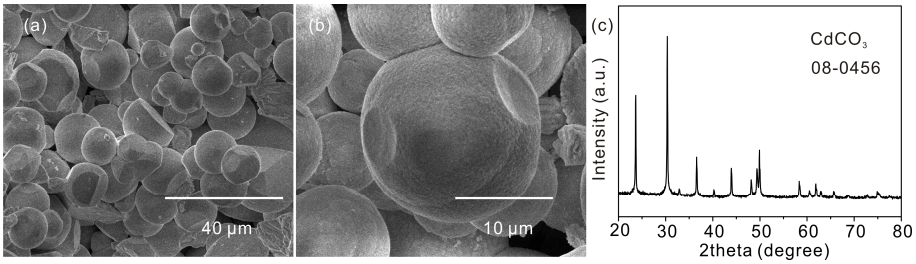

Figure S8. SEM images (a, b) and XRD pattern (c) of the products synthesized with 1:9 volume ratio of EG and water using $CdSO_4$ as cadmium source.

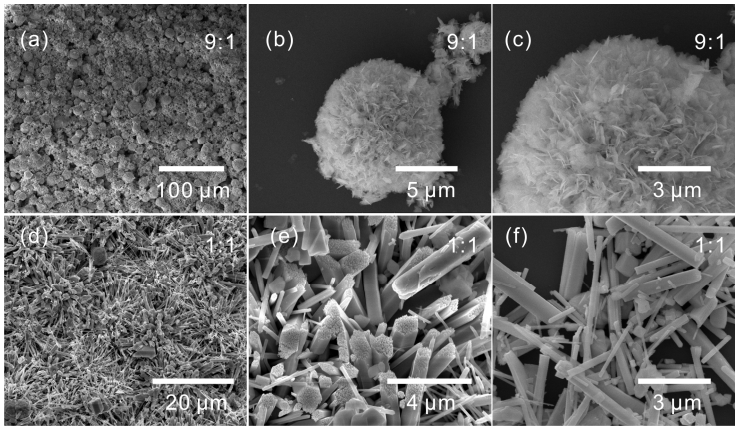

Figure S9. SEM images of the microcrystals synthesized using $CdCl_2$. (a) SEM images of products prepared with 9:1 (a-c) and 1:1 (d-f) volume ratios of EG and water.

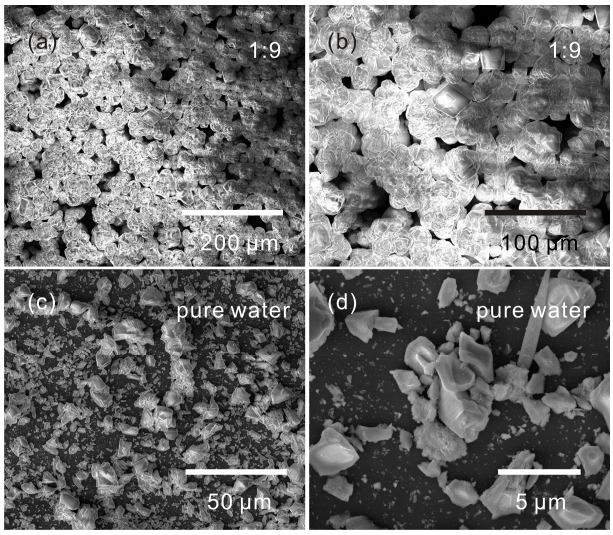

Figure S10. SEM images of the microcrystals synthesized using $CdCl_2$. SEM images (a, b) of products prepared with 1:9 volume ratio of EG and water. SEM images (c, d) of products prepared in pure water.

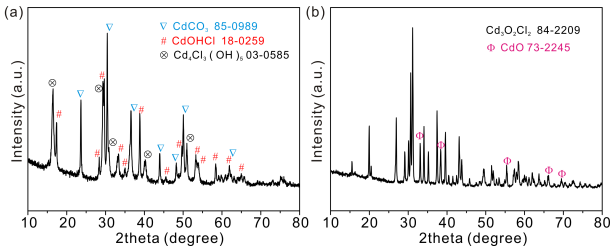

Figure S11. XRD patterns of the microcrystals before (a) and after (b) calcination at 500 °C for 1 hour in air. The microcrystals were synthesized with 9:1 volume ratio of EG and water using $CdCl_2$ as cadmium resource.