Electronic Supplementary Material (ESI) for Journal of Materials Chemistry A.

Fabrication of homogeneously Cu^{2+}/La^{3+}-doped CeO_2 nanosheets and their application in CO oxidation

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Supporting Information

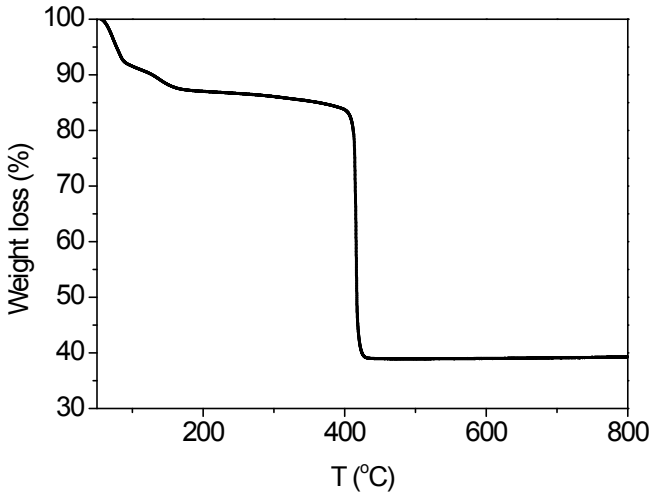


Figure S1. TGA curve of BTA-Ce with a ramp of 10 °C·min^{-1} under air flow.

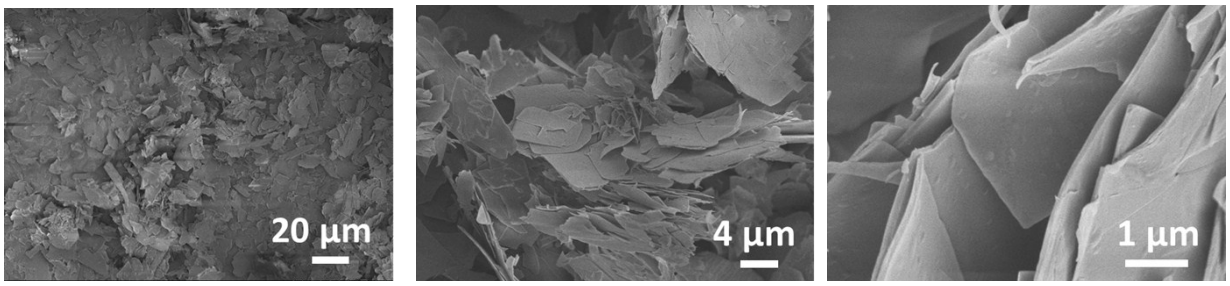
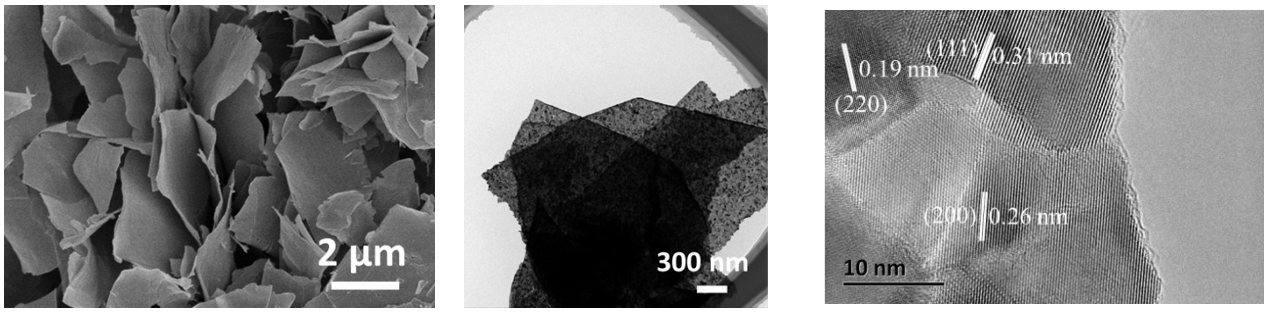
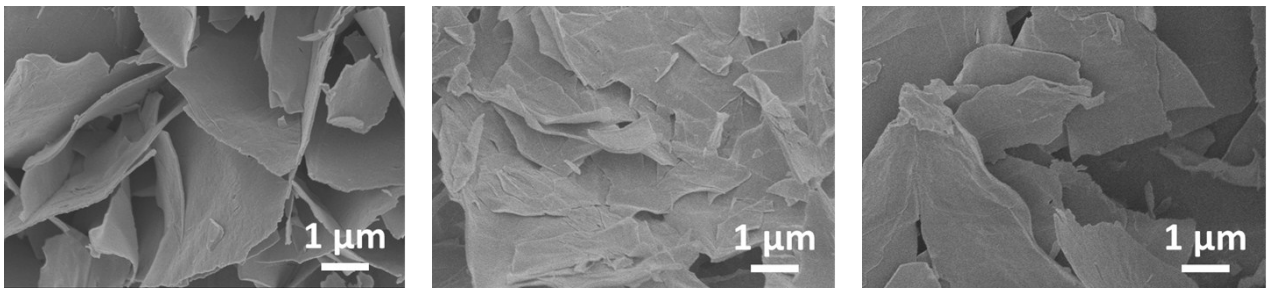


Figure S2. SEM images of BTA-Ce precursors under various magnifications.



(a) (b) (c)

Figure S3. SEM (a), TEM (b) and HRTEM (c) images of CeO_2.



(a) (b) (c)

Figure S4. SEM images of $La_{0.05}Ce_{0.95}O_{2-\delta}$ (a), $La_{0.1}Ce_{0.9}O_{2-\delta}$ (b) and $Cu_{0.04}Ce_{0.96}O_{2-\delta}$ (c).

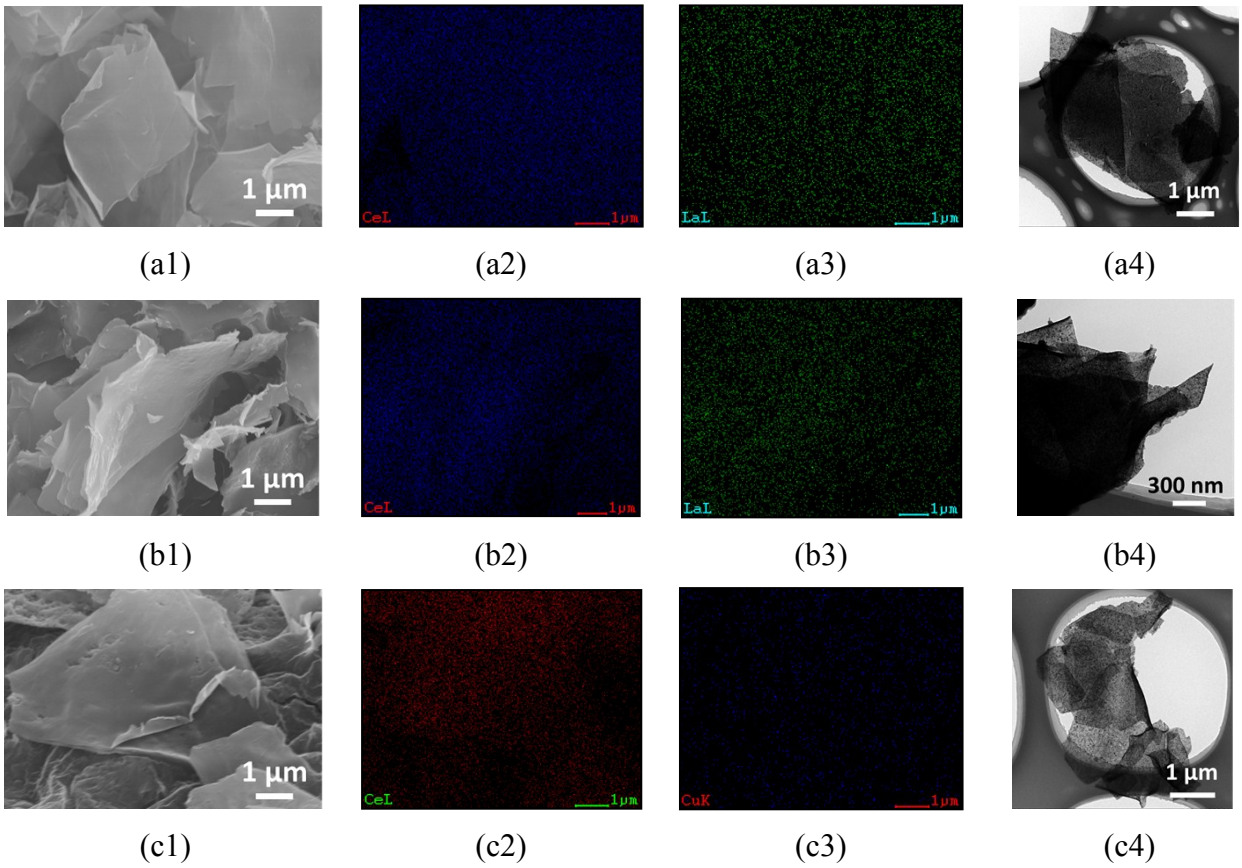


Figure S5. SEM images (1), mapping analyses of Ce (2) and La or Cu (3), and TEM images (4) of $La_{0.05}Ce_{0.95}O_{2-\delta}$ (a), $La_{0.1}Ce_{0.9}O_{2-\delta}$ (b) and $Cu_{0.04}Ce_{0.96}O_{2-\delta}$ (c).

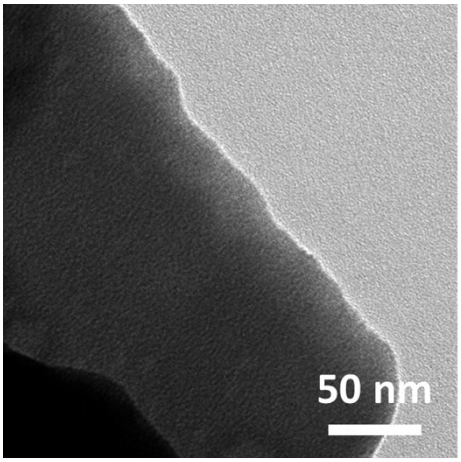


Figure S6. TEM images of CP precursor of $La_{0.1}Ce_{0.9}O_{2-\delta}$.

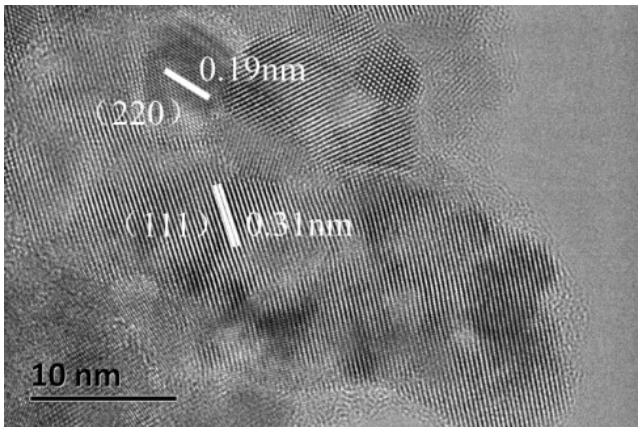


Figure S7. HRTEM images of $La_{0.1}Ce_{0.9}O_{2-\delta}$.

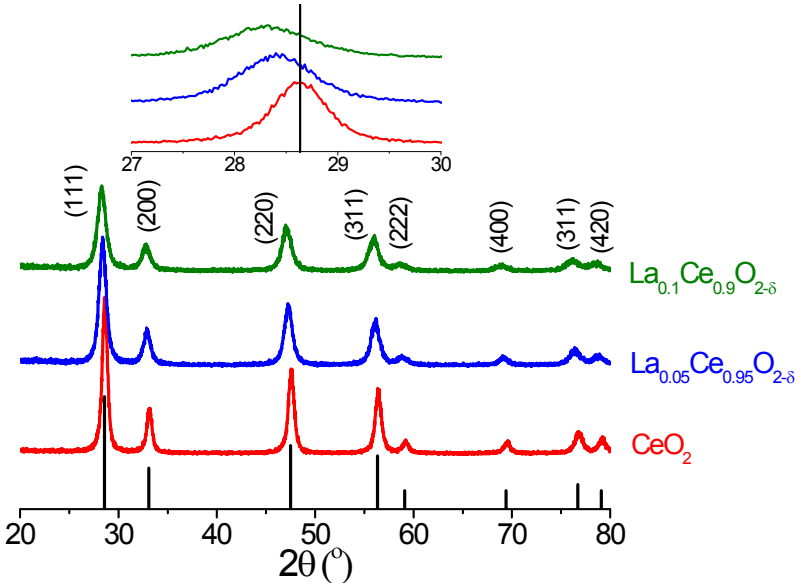


Figure S8. XRD patterns of La-doped ceria and theoretical pattern at bottom.

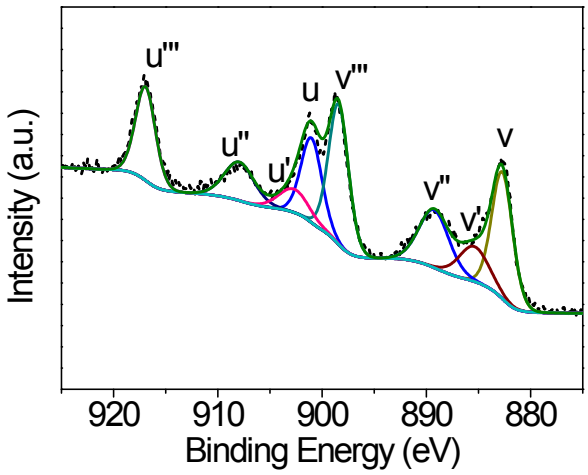


Figure S9. XPS spectra of Ce 3d in $Cu_{0.1}Ce_{0.9}O_{2-\delta}$ after catalytic reaction.

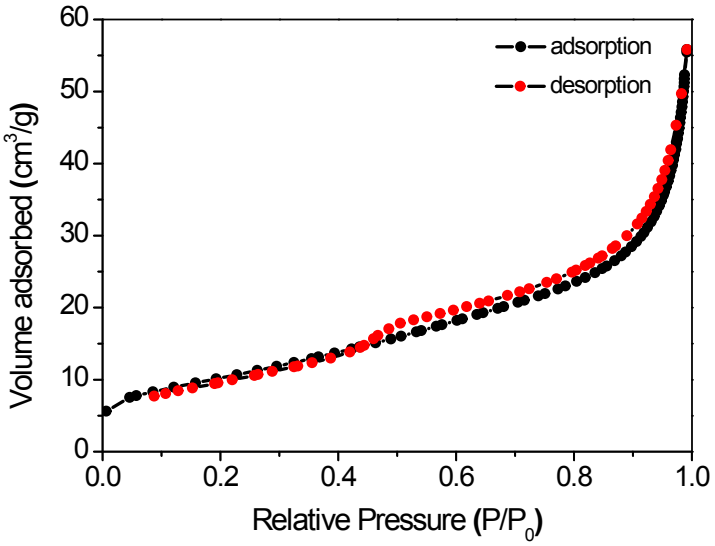


Figure S10. Nitrogen adsorption-desorption isotherm of ceria.

Table S1. Metal contents in the doped ceria detected by ICP-MS.

Sample	M	M (mol%)	Ce (mol%)
$La_{0.05}Ce_{0.95}O_{2-\delta}$	La	4.7	95.3
$La_{0.1}Ce_{0.9}O_{2-\delta}$	La	10.2	89.8
$Cu_{0.04}Ce_{0.96}O_{2-\delta}$	Cu	4.0	96.0
$Cu_{0.1}Ce_{0.9}O_{2-\delta}$	Cu	9.9	90.1