

**Supporting Information of**  
**Coupling Photocatalytic CO<sub>2</sub> Reduction with Benzyl Alcohol**  
**Oxidation to Produce Benzyl Acetate over Cu<sub>2</sub>O/Cu**

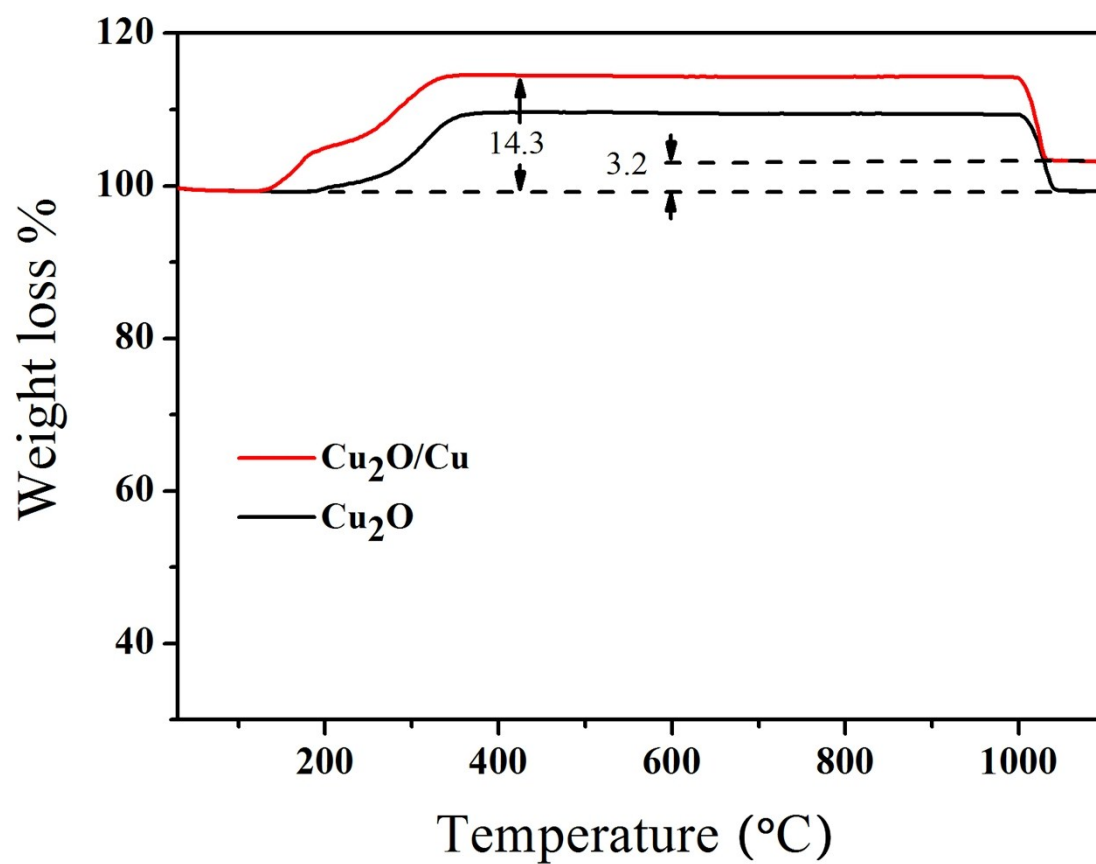
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People's Republic of China

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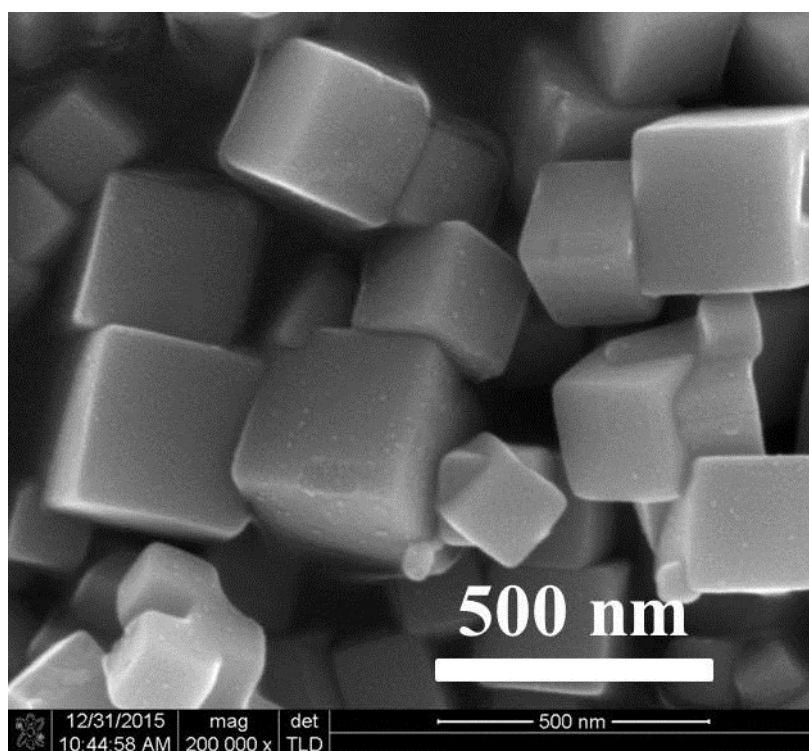
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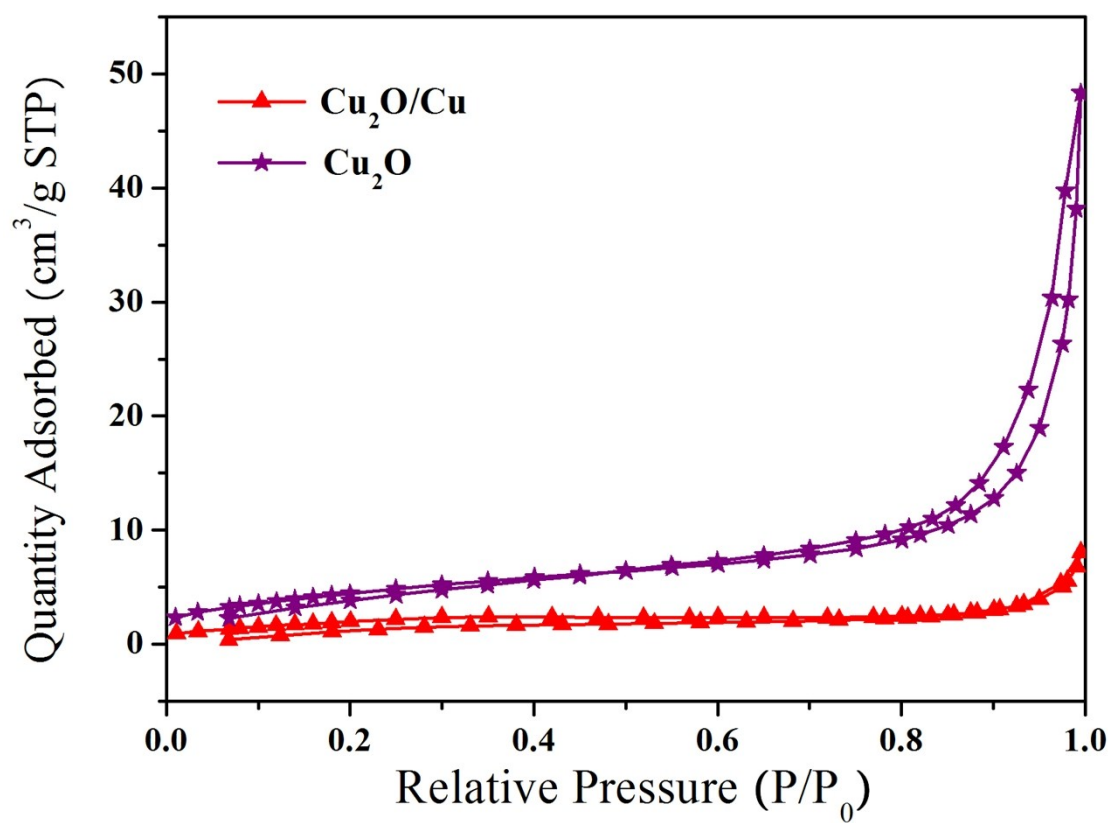
Fig. S1 TGA curves of  $\text{Cu}_2\text{O}/\text{Cu}$  and  $\text{Cu}_2\text{O}$ .



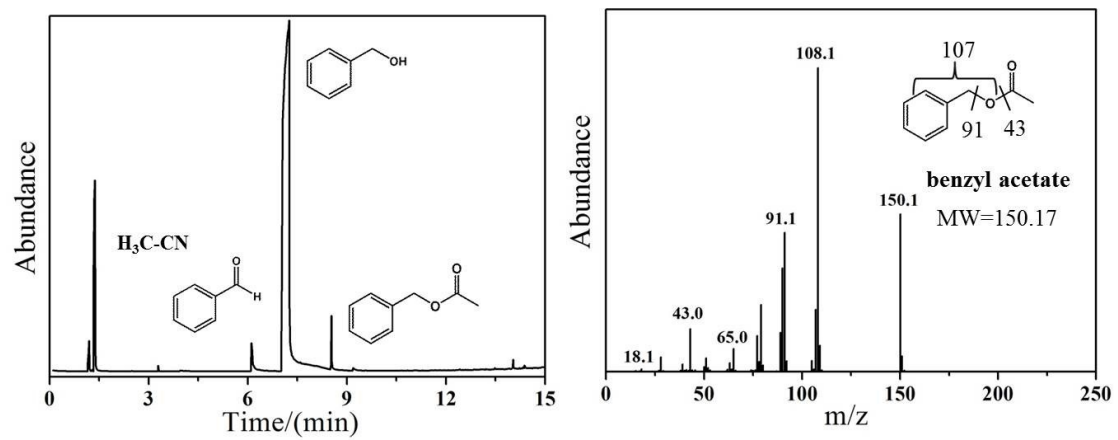
**Fig. S2** SEM image of  $\text{Cu}_2\text{O}$ .



**Fig. S3** N<sub>2</sub> adsorption-desorption isotherms of Cu<sub>2</sub>O and Cu<sub>2</sub>O/Cu.



**Fig. S4** (a) GC signals of liquid products and (b) MS signals for product with retention time of 8.5 mins.



**Fig. S5** In-situ IR spectra of Cu<sub>2</sub>O/Cu under the atmosphere of different concentration of CO<sub>2</sub>.

