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Metal organic framework derived magnetic porous carbon composites supported

gold and palladium nanoparticles as highly efficient and recyclable catalysts for

reduction of 4-nitrophenol and hydrodechlorination of 4-chlorophenol

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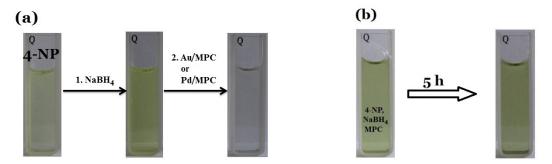


Figure S1. (a) The color changes of 4-NP after adding NaBH $_4$ and Au/MPC or Pd/MPC nanocatalyst. (b) The color changes of 4-NP and NaBH $_4$ solution after adding MPC and lasted for 5 h.

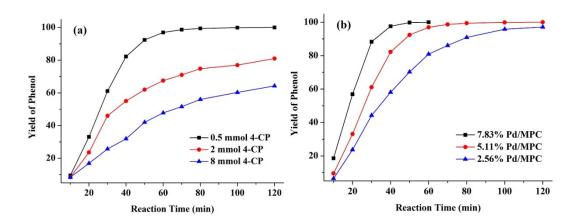


Figure S2. (a) Effect of concentration of 4-CP on the conversion of 4-CP by Pd/MPC. Reaction conditions: 10 mg Pd/MPC, 25 °C, 30 mL water, H_2 30 mL/min, 2 h. (b) Effect of Pd loading of the Pd/MPC for the HDC of 4-CP. Reaction conditions: 10 mg Pd/MPC, 0.5mmol 4-CP, 25 °C, 30 mL water, H_2 30 mL/min, 2 h.

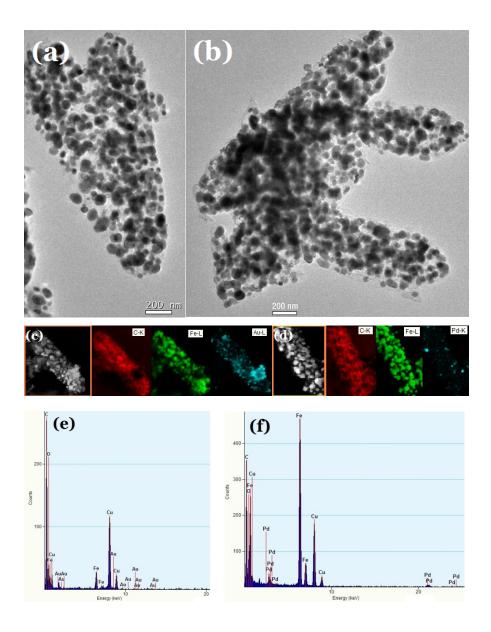


Figure S3. The TEM (a) and HAADF-STEM (c) images, EDS spectrum (e) of Au/MPC nanocatalyst used after six cycles. The TEM (b) and HAADF-STEM (d) images, EDS spectrum (f) of Pd/MPC nanocatalyst used after six cycles.