

Electronic Supplementary Information

Substrate Templated Synthesis for Single-Phase and Uniform Zr-Porphyrin Based Metal Organic Frameworks

Seong Won Hong^[a], Ju Won Paik^[a,c], Dongju Seo^[a], Jae-Min Oh^{*[b]}, Young Kyu Jeong^{*[c]},
Jin Kuen Park^{*[a]}

^[a] Department of Chemistry, Hankuk University of Foreign Studies, Yongin, 17035,
Gyeonggi-do, Republic of Korea, E-mail: jinkpark@hufs.ac.kr.

^[b] Department of Energy and Materials Engineering, Dongguk University-Seoul, Seoul
04620, Republic of Korea, E-mail: jaemin.oh@dongguk.edu.

^[c] Korea Institute of Industrial Technology (KITECH), 137-41 Gwahakdanji-ro, Gangneung-
si 25440 Republic of Korea, E-mail: immrc80@gmail.com.

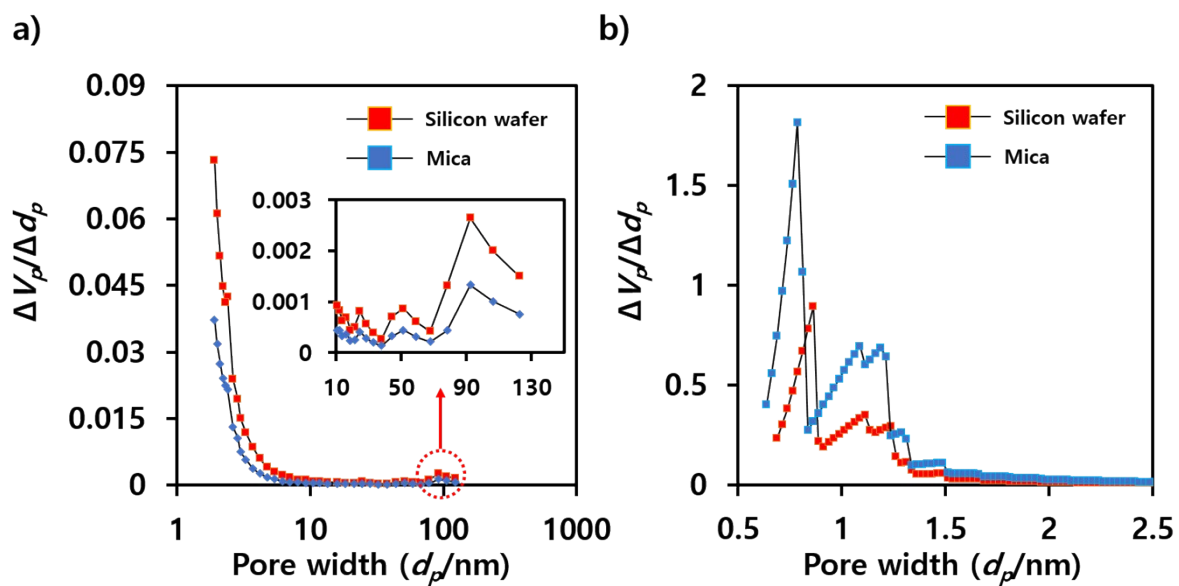


Figure S1. (a) Barret-Joyner-Halenda (BJH) pore size distribution of PCN-221 for mesopores and macropores and (b) Horváth-Kawazoe (HK) pore size distribution of PCN-221 for micropores obtained with silicon wafers and mica films.

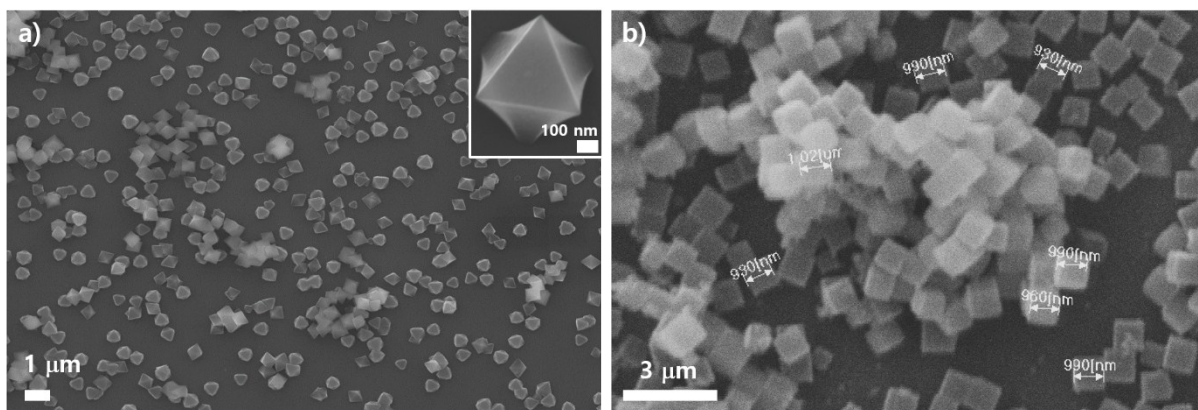


Figure S2. Scanning electron microscopy images of resulting products such as (a) UiO-66 and (b) MOF-525 on surfaces of silicon wafers using $\text{ZrOCl}_2 \cdot 8\text{H}_2\text{O}$ at 120 °C with acetic acid as a modulator.