



Fig. 1.) Adsorption of cyclooctane into the confinements provided by an on-surface metal organic network: One to three molecules rest on the bottom substrate within the confinement. As four molecules gather in a single pore, they are lifted into a dynamic adsorption mode, -- unexpected at 5K substrate temperature for a molecule that melts at  $\sim 300$  K higher temperatures.

Reference:

Aisha Ahsan et al., *J. Phys. Chem. Lett.* 2022, 13, 32, 7504–7513