TECHNISCHE UNIVERSITÄT DRESDEN

ZIF-8

Zinc 2-Methylimidazolate

Highly stable and hydrophobic Metal-Organic Framework

Information, quantities and prices:

Materials Center

Phone: +49 351 463 - 34864
Fax: +49 351 463 - 37287
materials.center@chemie.tu-dresden.de

www.metal-organic-frameworks.eu

TU Dresden
Department of Chemistry and Food Chemistry
Inorganic Chemistry I
01062 Dresden

Chemical Data

Chemical composition:
$C_8H_{10}N_4Zn$ (M_W = 227.6 g mol^{-1})

Min./Max. quantity: 1 - 50 g

Air and moisture sensitivity:
stable against water and moisture

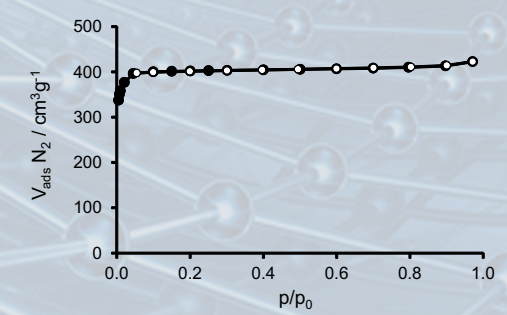
Colour: white powder

Particle size: < 5 µm

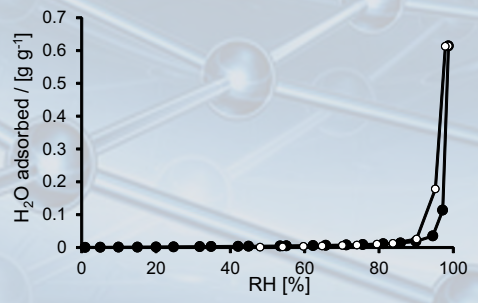
Single point BET (p/p_0 = 0.3):
~ 1200 m^{2}g^{-1}

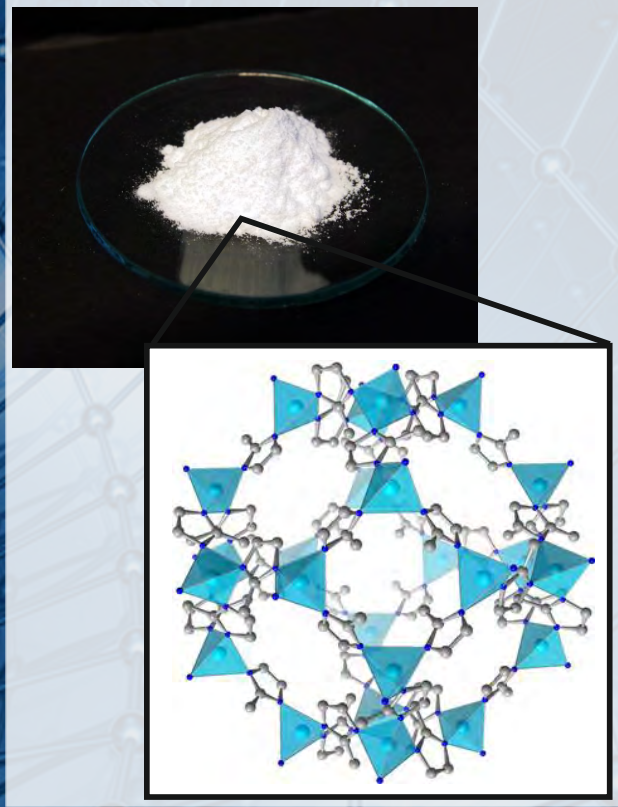
Specific pore volume (p/p_0 = 0.9):
~ 0.65 cm^{3}g^{-1}

N_2-Adsorption isotherm (77 K):



H_2O-Adsorption isotherm (298 K):





Literature

X.-C. Huang, Y.-Y. Lin, J.-P. Zhang, X.-M. Kim, *Angew. Chem. Int. Ed.*, **2006**, *45,* 1557 - 1559.
K. S. Park, Z. Ni, A. P. Côté, J. Y. Choi, R. Huang, F. J. Uribe-Romo, H. K. Chae, M. O´Keeffe, O. M. Yaghi, *Proc. Nat. Ac. Sci.*, **2006**,103(27), 10186 - 10191.