TECHNISCHE UNIVERSITÄT DRESDEN

NPC-1

N-doped porous carbon

from wood waste
by sustainable synthesis

Information, quantities and prices:

Materials Center

Phone: +49 351 463 - 32021
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, N-content tunable (1-12 wt%)

Min./Max. Quantity: 50 mg / 2 g

Air and Moisture sensitivity:

stable in air and against water

Colour: black

Particle Size: <10 µm

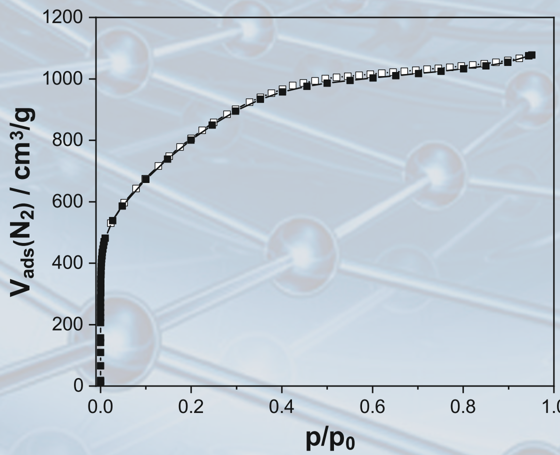
Specific Surface Area (BET):

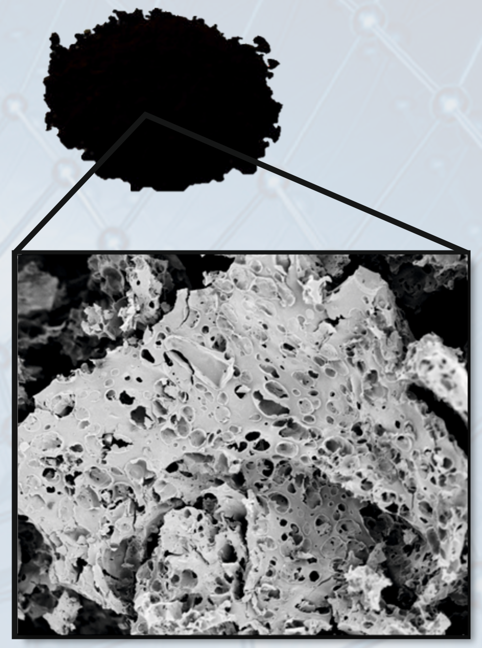
2200 - 2900 m^2g^{-1} (var. with N-content)

Specific Pore Volume (p/p_0 = 0.95):

1.5 - 1.9 cm^3g^{-1} (var. with N-content)

Adsorption isotherm:





Literature

Schneidermann, C., Kensy, C., Otto, P., Oswald, S., Giebeler, L., Leistenschneider, D., ... & Borchardt, L. (2018). Nitrogen-doped biomass-derived carbon by mechanochemical synthesis for lithium-sulfur batteries. ChemSusChem.