

NEOMA™ and other thermal insulation forms

Property	Units	NEOMA™ Foam test values	Standards under JIS A 9521 foam classification			
			Phenolic C II	Extruded PS Class A 3-bA	Expanded PS Class A 3	Rigid urethane Class A 2-2A
Density	kg/m ³	27	≥ 25	≥ 25	≥ 20	≥ 25
Thermal conductivity	W/mK at 20°C	0.020	≤ 0.020	≤ 0.028	≤ 0.038	≤ 0.024
Bending strength	N/cm ²	45	≥ 15	≥ 25	≥ 18	≥ 15
Compressive strength	N/cm ²	17	≥ 10	≥ 20	≥ 8	≥ 8
Water absorbance	g/100cm ²	1.7	≤ 5.0	≤ 0.01	≤ 1.0	≤ 3.0
Vapor permeability (25 mm thickness)	ng/m ² sPa	42	≤ 60	≤ 145	≤ 250	≤ 40

Notes:

Values shown for NEOMA™ Foam are basic values for standard version, and not for high-density version.

Values shown for NEOMA™ Foam are typical test values and represent no specification or warranty. All other values are taken from JIS A 9521 Prefoamed Cellular Plastics Thermal Insulation Materials (2017R).

Test methods

JIS A 9521.....Density, compressive strength, absorbance, vapor permeability

JIS A 1412.....Thermal conductivity

ASTM D 696.....Heat deformation temperature