

Solution of Magnesium Chloride Specification

Specification **S_{EES} 25 %**
Trade name Brine of Magnesium chloride
Formula MgCl₂

Chemical composition	Average		Concentration range	
Magnesium chloride (MgCl ₂)	308 g/l	25,0 %	24 %	26 %
Potassium chloride (KCl)	1,6 g/l	0,13 %	0,1 %	0,2 %
Sodium chloride (NaCl)	4,4 g/l	0,35 %	0,3 %	0,4 %
Magnesium sulphate (MgSO ₄)	1,2 g/l	0,10 %	0,1 %	0,2 %
Calcium sulphate (CaSO ₄)	0,2 g/l	0,1 %	0,1 %	0,2 %

Demands for Salt Solutions in Germany (DIN EN 16811-2)					
	Real value	Limit value		Real value	Limit value
Arsenic (As)	< 0,1 mg/l	≤ 0,25 mg/l	Copper (Cu)	< 0,2 mg/l	≤ 0,50 mg/l
Lead (Pb)	< 0,4 mg/l	≤ 0,50 mg/l	Nickel (Ni)	< 0,2 mg/l	≤ 0,50 mg/l
Cadmium (Cd)	< 0,1 mg/l	≤ 0,20 mg/l	Mercury (Hg)	< 0,01 mg/l	≤ 0,05 mg/l
Chrome, total (Cr)	< 0,1 mg/l	≤ 0,50 mg/l	Zinc (Zn)	< 1,0 mg/l	≤ 2,0 mg/l
			Iron (Fe)	< 10 mg/l	not applicable

Physical Data

Density at 20 °C	Corresponds to	pH-value	Specific heat
1,23 g/cm ³	27 °Be	5,5 – 7	3,52 MJ / m ³ K

Properties

Additive	no
Colour	clear, yellowish / brownish
Solubility	Brine with water in all ratios miscible

