Data Sheet	Internal alloy name:	7075
EN AW 7075 – Rolled products	International alloy name: Chemical Symbol:	**EN AW 7075** **EN AW – Al Zn5,5MgCu**
Alumeco A/S	DIN-Werkstoff no.: Alloy type:	**3.4365** **Heat treatable alloy**

Main usage	Main properties	Important norms and literature	
• **Machining** • **Machinery** • **Forgings** • **Tools** • **Heavy duty structures** • **Hydraulics systems**	• **Very good workability** • **Good machinability** • **High strength**	**Rolled products:** **EN 485-1: Technical conditions for inspection and delivery** **EN 485-2: Mechanical properties** **EN 485-3: Tolerances on dimensions and form hot rolled products** **EN 485-4: Tolerances on dimensions and form cold rolled products**	**Chemical composition:** **EN 573-3: Chemical composition**

Chemical composition (%) EN 573-3

Si	Fe	Cu	Mn	Mg	Cr	Zn	Ti	Remarks	Other elements	
									Each	together
0.40	**0.50**	**1.2-2.0**	**0.30**	**2.1-2.9**	**0.18-0.28**	**5.1-6.1**	**0.20**	**Max. 0.25 Zr + Ti**	**0.05**	**0.15**

Typical mechanical properties EN 485 – 2

Thickness range (mm)	Temper	Rm MPa	$Rp_{0,2}$ MPa	A_{50} %	Hardness* HB	Bend radius*	
						180º	90º
1.5 up to 3.0	**T651**	**Min. 540**	**Min. 470**	**7**	**161**		**6.5t**
3.0 up to 6.0	**T651**	**Min. 545**	**Min. 475**	**8**	**163**		**8.0t**
6.0 up to 12.5	**T651**	**Min. 540**	**Min. 460**	**8**	**160**		**12.0t**
25 up to 50	**T651**	**Min. 530**	**Min. 460**	**5 (A%)**	**158**		**-**
100 up to 120	**T651**	**Min. 410**	**Min. 300**	**2 (A%)**	**119**		**-**
200 up to 300	**T651**	**Min. 360**	**Min. 220**	**1 (A%)**	**-**		**-**

* Information values only

Physical properties

Density g/cm³	Solidification range °C	Electrical conductivity %IACS	Thermal conductivity W/m K	Thermal expansion (μm m^{-1} K^{-1})	Annealing temperature °C	E - modulus (N / mm²)
2.81	475-635	39.5	155	23.5	-	72,000

Typical Alumeco products with this alloy

- **Rolled materials in various dimensions and form**

Properties and information (3 high/good; 2 medium; 1 poor/bad)

Resistance: Corrosion index, general: 1 Marine atm. corr. index: 1 Hot workability: Extrusion: 2 Forging: 2 Cold formability: Cold formability general: 1 Deep drawing: 1 Bending: 1	Weldability TIG welding: 1 MIG welding: 1 Solderability 1	Machinability Machinability index: 3	Anodizing: Decorative anodizing surface treatment: 1 Protective anodizing index: 2 Hard anodizing: 2 Color anodizing: 1