

DESCRIPTION

Aluminium Alloy 3003 is a medium strength alloy with a very good resistance to atmospheric corrosion, very good Weldability and good cold formability. It has better mechanical properties, especially at elevated temperatures in comparison to 1000 series alloys

APPLICATIONS

AA-3003 is typically used in:

- General sheet metal works requiring greater strength
- Insulation panels
- Profiled building sheets
- Metal jacketing
- Food & chemical handling equipment
- Packaging containers, closures and cladding
- Cooking utensils and bakery moulds

Please note that Mechanical Properties shown are for H-14 temper*

*H 14 – Most common temper is work hardened by rolling to half hard, not annealed after rolling.

CHEMICAL COMPOSITION

Element	Composition %
Manganese (Mn)	1.10 – 1.50
Iron (Fe)	0.00 - 0.70
Copper (Cu)	0.05 - 0.20
Magnesium (Mg)	0.0 - 0.05
Silicon (Si)	0.0 – 0.60
Zinc (Zn)	0.0 – 0.10
Others (Total)	0.0 – 0.15
Other (Each)	0.0 - 0.05
Aluminium (Al)	Balance

SUPPLIED FORMS

At **Dinco Trading Co** we stock Aluminium Alloy 3003 in the form of Plain/Stucco embossed in sheets as well as in coils.

MECHANICAL PROPERTIES

Property	Value
Proof Stress	50 Min MPa
Tensile Strength	140 - 180 MPa
Elongation at 50 mm	5 Min %
Hardness Brinell	28 HB

WELDABILITY

Weldability – Gas: Very good
Weldability – Arc: Very good
Brazeability: Excellent
Weldability – Resistance: Good

FABRICATION

Machinability: Average
Workability – Cold: Very good

GENERIC PHYSICAL PROPERTIES

Property	Value
Density	2.73 g/cm ³
Melting Point	655 °C
Thermal Expansion	23.1 ×10 ⁻⁶ /K
Modulus of Elasticity	69.5 GPa
Thermal Conductivity	190 W/m.K
Electrical Resistivity	0.034 ×10 ⁻⁶ Ω.m

SIZES RANGE FOR AA3003-H 14

We stock Aluminium Alloy 3003 H14 at our warehouse in the UAE.

Please contact us on sales@dinco.ae with your inquiries or call: 06-5432452