Solid Wire Rod for TIG Welding

BA-TIG AlMg5

Classification: ISO 18273: **S Al 5356 (AlMg5Cr)**
SFA-5.10: **ER5356**

Main Application:
BA-TIG AlMg5 is a solid wire rod for GTAW with 5% Mg. Suitable for welding Al Mg-and Al Mg Si- alloys. Excellent welding characteristics and good mechanical properties. High corrosion resistance. Applications in shipbuilding, storage tanks, railway and car industry.

Typical analysis and chemical composition acc. to ISO 18273 and AWS A5.10: (Weight Percent)

Wire rod	Si	Fe	Cu	Mn	Mg	Cr	Zn	Ti	Al
Typical analysis BA-TIG AlMg5	0.05	0.12	0.01	0.13	4.7	0.08	0.010	0.10	Rem
S Al 5356 acc. to ISO 18273	0.25	0.4	0.1	0.05-0.20	4.5-5.5	0.05-0.20	0.1	0.06-0.20	Rem
ER5356 acc. to AWS A5.10	0.25	0.4	0.1	0.05-0.2	4.5-5.5	0.05-0.20	0.1	0.06-0.20	Rem

All - Weld Metal Mechanical Properties / Welding Data:

Heat Treatment	As Welded
Yield Strength Re, N/mm² (ksi)	110 (16)
Tensile Strength Rm, N/mm² (ksi)	> 240 (35)
Elongation A5 [%]	> 18
Impact Energy ISO-V, J (ft lbs)	
Current/polarity	AC
Shielding Gas	ISO 14175: I1, I2, I3

Base Materials:
Al Mg Si 1, G-Al Mg 5, G-Al Mg 3 Si, Al Mg 5, Al Mg2 Mn 0,8, G-Al Mg 5 Si, Al Mg 3, Al Zn 4,5 Mg 1, G-Al Mg 3

Package Forms:
2,5 kg carton boxes as standard package form for GTAW wire rods.

Diameter:
1,6 – 4,0 mm. Sizes and tolerances acc. to ISO 544 and AWS A5.10.

Wire Rod Surface:
Smooth finish free from surface defects and foreign matter.