

Al Mg 5 W/R

EN ISO 18273 - S Al 5356 (AlMg5Cr(A))
AWS A5.10: ER/R 5356

Characteristics: wrought aluminium alloy for filler metals purposes

Description: aluminium alloy for GMAW and GTAW welding but also for other special welding processes of Al Mg, Al Mn, Al Mg Si and Al Zn Mg alloys. Al Mg 5 has good corrosion-resistance and it's frequently used to weld 5xxx and 6xxx series base material that have to be anodized. AlMg5 is not suitable in the application at high temperature ($T_{work} > 65^{\circ}\text{C}$).

Application: bikes and motorbikes frames, automotive car body components, fixed and dump bodies, side panel loading, fuel air tanks, metal furnitures, ladders, loading ramps, lifting footboards, ship upper desk.

Approvals: CE, RINA, Lloyd's Register, Bureau Veritas, American Bureau of Shipping, RMRS, VdTÜV, DB, DNV, GL, CWB

Chemical composition according to EN ISO 18273 [%]:

	Si	Fe	Cu	Mn	Mg	Cr	Zn	V	Ga	Ti	Zr	Al	Be	other each	other total
min.	-	-	-	0.05	4.50	0.05	-	-	-	0.06	-	rem.	-	-	-
max.	0.25	0.40	0.10	0.20	5.50	0.20	0.10	-	-	0.20	-		0.0003	0.05	0.15

Remark: maximum value unless shown as a range or a minimum.

Mechanical properties: (as-welded)

min R_m [N/mm ²]	250
$R_p 0,2$ [N/mm ²]	115
A [%]	17
Solidus [°C]	571
Liquidus [°C]	635

Gas: EN ISO 14175 – I1 (Ar), I3 (Ar-He)

Winding: precision layer wound wire

Polarity: MIG=+ TIG ~

Available sizes:

Wire: diam. 0.80-1.00-1.20-1.60-2.00-2.40-3.17 mm

D100	0,5 kg	plastic spool	
D200	2,0 kg	plastic spool	
D300	7,0 kg	plastic spool	6,0 kg @ d.0.8 mm
BS300	7,0 kg	basket spool	
K415	10 kg	basket ring	
D355	18 kg	plastic spool	
B400	40 kg	basket spool	

Round drum 80 kg – SQUARE173 173 kg

Rods: diam 1.60-2.00-2.40-3.20-4.00-5.00 mm x 1000 mm
10 kg – 5 kg cardboard box

Both wire and rods available in FIDAT boxes or neutral boxes