

MT-904 L

1.4519

TIG/MIG welding wire of fully austenitic, copper-containing chrome-nickel-molybdenum-steel with high molybdenum and very low carbon content, for welding high-alloy steels which are strongly corrosion resistant when exposed to reducing media. Weld metal suitable for temperatures up to +350°C.

Standard designation

Material No.	1.4519
AWS/ASME SFA-5.9	ER 385
EN ISO 14343-A	G/W 20 25 5 Cu L

Main base metals

Exceptionally corrosion-proof steels/cast steels e.g.

1.4500	G-X 7 NiCrMoCuNb 25 20	1.4536	G-X 2NiCrMoCuN 25 20
1.4505	X 5 NiCrMoCuNb 20 18	1.4539	X 2 NiCrMoCu 25 20 5
1.4506	X 5 NiCrMoCuTi 20 18	1.4585	G-X 7 NiCrMoCuNb 18 18

Mechanical properties of all – weld – metal (typical values)

Welding process			TIG I1		MIG M12	
Gas shield			untreated		untreated	
Thermal treatment			+20° - 196°C		+20°C -196°C	
Test temperature			[°C]		[°C]	
0,2%-yield strength	R _{p0,2}	MPa	≥320		≥320	
Tensile strength	R _m	MPa	≥510		≥510	
Elongation	A ₅	[%]	≥25		≥25	
Impact strength	A _v	[J]	LNB	LNB	LNB	LNB

Average chemical composition of all - weld – metal (%)

C	Si	Mn	Cr	Mo	Ni	Cu
0,03	1,0	1,0-4,0	19,0-22,0	4,0-6,0	24,0-27,0	1,0-2,0

Structure

Fully austenitic

Approvals

TÜV, DB, CE

Gas types applicable TIG

I1

Gas types applicable MIG

M 12

TIG rod diameters, unit weights

Diameter [mm]	Length [mm]	Kg per box
1,60	1000	10,0
2,00	1000	10,0
2,40	1000	10,0
3,20	1000	10,0

MIG welding wire

Diameter 0,8mm 1,0mm 1,2mm

Welding positions MIG acc.to EN ISO 6947

PA, PB, PF

Welding positions TIG acc.to EN ISO 6947

PA, PB, PC, PF

Current/Polarity TIG

= -

Current/Polarity MIG

= +