



Wear-Con Wear Plate Product Comparison

Product	Mild Steel	WC304™	WC304HT™	WC400™	WC500™	Diamond Clad™	WC700 Plus™	MirA Clad™	WC700 XT™	SHC800™	Feather Clad™	WC900™	WC910™
Properties													
Hardness	150-180 BHN	180 BHN	350 BHN	360-440 BHN	477-555 BHN	60-64 RC	60-64 RC	60-64 RC	56-65 RC	58-60 RC	68 RC	73-75 RC	Impact: 68 RC Non-Impact: 93 RA
Max Service Temp	1000°F (538°C)	1600°F (871°C)	-	-	-	1000°F (538°C)	1000°F (538°C)	1000°F (538°C)	1400°F (760°C)	1112°F (600°C)	1000°F (538°C)	1000°F (538°C)	800°F (427°C)
Yield Strength	36,000 psi	39,000 psi	100,000 psi	140,000 psi	190,000 psi	-	-	-	-	-	-	-	-
Tensile Strength	98,000 psi	87,000 psi	140,000 psi	180,000 psi	250,000 psi	-	-	-	-	-	-	-	same as base metal
Shear Strength	11,500 psi	-	-	-	-	-	-	-	-	-	-	-	Minimum: 20,000 psi Maximum: 50,000 psi
Elongation (%)	18	-	-	16	12	-	-	-	-	-	-	-	-
Chemical Composition (%)													
C	.26	0.08	0.03	0.14	0.28	4.0 - 5.0	4.0 - 5.0	4.0 - 5.0	5.27	-	4.0 - 5.0	5.27	-
Mn	.75	2.0	7.0 - 9.0	1.42	0.84	0.3	0.3	0.3	2.1	-	0.3	2.1	-
P	.04	-	-	0.007	0.025	0.02	0.02	0.02	0.022	-	0.02	0.022	-
S	.05	-	-	0.003	0.001	-	-	-	0.016	-	-	0.016	-
Si	.40	1.0	1.0	0.45	0.5	1.1	1.1	1.1	0.5	-	1.1	0.5	-
Mo	-	-	-	0.25	0.25	-	-	-	-	-	-	-	-
Cr	-	18.0 - 20.0	15.0 - 17.0	0.04	0.25	28.0 - 32.0	28.0 - 32.0	28.0 - 32.0	26.1 - 30.0	-	28.0 - 32.0	26.1 - 30.0	-
B	-	-	-	0.0018	0.0013	-	-	-	-	-	-	-	-
N	-	8.0 - 11.0	1.5	-	-	-	-	-	-	-	-	-	-
W	-	-	-	-	-	-	-	-	-	-	-	35.0	-
Welding Rod Spec.	6011 7018 ER-70-6	30855	309 SSL 310 SS	ER70-6 E-70xx E-100xx E-110xx 7018	E-7018 E-100xx E-110xx E-120xx	7018 ER70-6 Post Alloy 2865	7018 ER70-6 Post Alloy 2865	7018 ER70-6 Post Alloy 2865	E-7018	7018 ER70-6 Post Alloy 2865	7018 ER70-6 Post Alloy 2865	Post Alloy 299-SPL	E-70xx E-80xx E-90xx E-100xx E-110xx E-120xx
Dimensions	48" x 96" 60" x 120"	48" x 96"	48" x 120"	48" x 96" 60" x 120"	48" x 96" 60" x 120"	48" x 96" 60" x 120"	48" x 96" 60" x 120"	48" x 96" 60" x 120"	60" x 120"	6" x 6" 6" x 18" 12" x 12" 12" x 18"	32" x 76"	42 1/2" x 92 1/2"	1/4" 3/8" 1/2" 3/4" 1" 1 1/2"
Thickness	1/8"+	1/4"	1/4"	3/16" - 4"	1/8" - 4"	1/4" 3/8" 1/2" 3/4"	1/4" 3/8" 1/2" 3/4"	3/8" 1/2" 3/4" 1"	3/8" 1/2" 3/4" 1"	1/2" 3/4"	3/16"	3/8" 1/2" 3/4" 1"	1/16" 1/8" 3/16"