

Gas Tungsten Arc Welding Rods and Wires  
for Stainless Steel

Brand Name	Specification		Dia. mm	Application and Characteristics
	JIS	AWS		
YT-DP8	☆Z 3321 YS2209	☆A5.9 ER2209	1.2 1.6 2.0 2.4	Welding of SUS329J3L and UNS S31803
YT-DP3	—	—	1.2 1.6 2.0 2.4	Welding of SUS329J4L
YT-DP3W	—	—	1.0 1.2 1.6 2.0 2.4	Welding of Super Duplex Stainless Steel (DP3W tube, NAR-DP3W)
YT-410	☆Z 3321 YS410	☆A5.9 ER410	1.2 1.6 2.0 2.4	Welding of SUS410
YT-430	☆Z 3321 YS430	☆A5.9 ER430	1.2 1.6	Welding of SUS430
YT-430L	☆Z 3321 YS430L	☆A5.9 ER430	2.0 2.4	
YT-190	—	—	1.2 1.6 2.0 2.4	Welding of NSSC™190 and YUS190 (190Cr-2Mo-Ti, Nb)
YT-444	—	—	1.2 1.6 2.0 2.4	Welding of SUS444

Typical chemical compositions of weld metal (%)							Typical mechanical properties of weld metal		
C	Si	Mn	Ni	Cr	Mo	Other	TS, MPa	El, %	PWHT
0.007	0.41	1.61	8.4	22.1	3.26	N: 0.10	780	35	—
0.010	0.37	0.78	9.3	25.3	3.03	W: 0.27 Cu: 0.4 N: 0.17	830	29	—
0.017	0.42	0.53	9.2	25.7	3.07	W: 2.11 Cu: 0.5 N: 0.28	890	29	—
0.06	0.38	0.30	—	12.9	—	—	520	33	850°C×2h
0.05	0.33	0.37	—	16.8	—	—	530	28	750°C×2h
0.01	0.39	0.49	—	16.8	—	—	520	30	
0.008	0.09	0.16	—	19.2	1.93	Nb: 0.30 N: 0.011 Ti: 0.13	480	12	—
0.004	0.02	0.06	0.5	19.0	2.14	Nb: 0.29 N: 0.005 O: 0.002	500	28	—