Table 8 — Mechanical properties at room temperature of solution annealed [a] (see Table A.1) austenitic steels and resistance to intergranular corrosion in conditions 1C, 1E, 1D, 1X, 1G and 2D

Steel designation		Thickness t or diameter [b] *d*	Hard-ness [c, d]	0,2 %-proof strength	1 %-proof strength	Tensile Strength [d, e]	Elongation after fracture [d, e]		Impact energy (ISO-V)		Resistance to intergranular corrosion [f]	
Name	Number	mm	HBW max.	$R_{p0,2}$ [e] MPa min.	$R_{p1,0}$ [c,e] MPa min.	R_m MPa	A % min. (long.)	A % min. (tr.)	KV_2 J min. (long.)	KV_2 J min. (tr.)	in the delivery condition	in the sensitized condition [g]
Standard grades												
X10CrNi18-8	1.4310	≤ 40	230	195	230	500 to 750	40	-	-	-	no	no
X2CrNi18-9	1.4307	≤ 160	215	175	210	500 to 700	45	-	100	-	yes	yes
		160 < t ≤ 250					-	35	-	60		
X8CrNiS18-9	1.4305	≤ 160	230	190	225	500 to 750	35	-	-	-	no	no
X6CrNiCuS18-9-2	1.4570	≤ 160	215	185	220	500 to 710	35	-	-	-	no	no
X3CrNiCu18-9-4	1.4567	≤ 160	215	175	210	450 to 650	45	-	-	-	yes	yes
X2CrNiN18-10	1.4311	≤ 160	230	270	305	550 to 760	40	-	100	-	yes	yes
		160 < t ≤ 250					-	30	-	60		
X5CrNi18-10	1.4301	≤ 160	215	190	225	500 to 700	45	-	100	-	yes	no [h]
		160 < t ≤ 250					-	35	-	60		
X6CrNiTi18-10	1.4541	≤ 160	215	190	225	500 to 700	40	-	100	-	yes	yes
		160 < t ≤ 250					-	30	-	60		
X2CrNi19-11	1.4306	≤ 160	215	180	215	460 to 680	45	-	100	-	yes	yes
		160 < t ≤ 250		-	-		-	35	-	60		