



Application	Material	d1 [mm]	z	v <sub>c</sub> [m/min]	f <sub>s</sub> [mm]	a <sub>p</sub> [mm]	a <sub>e</sub> [mm]	n [min <sup>-1</sup> ]	v <sub>r</sub> [mm/min]	Q [cm <sup>3</sup> /min]	q <sub>Z</sub> [°]
	Steel < 850 N/mm <sup>2</sup> 	4.00	4	180	0.035	6.000	1.600	14325	2005	19.3	20°
		5.00	4	180	0.040	7.500	2.000	11460	1835	27.5	20°
	Steel 850 - 1100 N/mm <sup>2</sup> 	6.00	4	180	0.050	9.000	2.400	9550	1910	41.3	20°
		8.00	4	180	0.060	12.000	3.200	7160	1720	66.0	20°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	10.00	4	180	0.075	15.000	4.000	5730	1720	103.1	20°
		12.00	4	180	0.085	18.000	4.800	4775	1625	140.3	20°
	Steel 850 - 1100 N/mm <sup>2</sup> 	16.00	4	180	0.095	24.000	6.400	3580	1360	209.0	20°
		20.00	4	180	0.110	30.000	8.000	2865	1260	302.5	20°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	4.00	4	150	0.030	6.000	1.600	11935	1430	13.8	18°
		5.00	4	150	0.035	7.500	2.000	9550	1335	20.1	18°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	6.00	4	150	0.040	9.000	2.400	7960	1275	27.5	18°
		8.00	4	150	0.050	12.000	3.200	5970	1195	45.8	18°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	10.00	4	150	0.065	15.000	4.000	4775	1240	74.5	18°
		12.00	4	150	0.075	18.000	4.800	3980	1195	103.1	18°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	16.00	4	150	0.085	24.000	6.400	2985	1015	155.8	18°
		20.00	4	150	0.100	30.000	8.000	2385	955	229.2	18°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	4.00	4	70	0.030	6.000	1.600	5570	670	6.4	12°
		5.00	4	70	0.035	7.500	2.000	4455	625	9.4	12°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	6.00	4	70	0.040	9.000	2.400	3715	595	12.8	12°
		8.00	4	70	0.050	12.000	3.200	2785	555	21.4	12°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	10.00	4	70	0.060	15.000	4.000	2230	535	32.1	12°
		12.00	4	70	0.075	18.000	4.800	1855	555	48.1	12°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	16.00	4	70	0.085	24.000	6.400	1395	475	72.7	12°
		20.00	4	70	0.095	30.000	8.000	1115	425	101.6	12°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	4.00	4	90	0.020	6.000	1.600	7160	575	5.5	12°
		5.00	4	90	0.025	7.500	2.000	5730	575	8.6	12°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	6.00	4	90	0.030	9.000	2.400	4775	575	12.4	12°
		8.00	4	90	0.035	12.000	3.200	3580	500	19.3	12°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	10.00	4	90	0.045	15.000	4.000	2865	515	30.9	12°
		12.00	4	90	0.055	18.000	4.800	2385	525	45.4	12°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	16.00	4	90	0.065	24.000	6.400	1790	465	71.5	12°
		20.00	4	90	0.080	30.000	8.000	1430	460	110.0	12°
	Steel < 850 N/mm <sup>2</sup> 	4.00	4	145	0.025	5.000	4.000	11540	1155	23.1	32°
		5.00	4	145	0.030	6.250	5.000	9230	1110	34.6	32°
	Steel 850 - 1100 N/mm <sup>2</sup> 	6.00	4	145	0.040	7.500	6.000	7690	1230	55.4	32°
		8.00	4	145	0.045	10.000	8.000	5770	1040	83.1	32°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	10.00	4	145	0.055	12.500	10.000	4615	1015	126.9	32°
		12.00	4	145	0.065	15.000	12.000	3845	1000	180.0	32°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	16.00	4	145	0.070	20.000	16.000	2885	810	258.5	32°
		20.00	4	145	0.085	25.000	20.000	2310	785	392.3	32°
	Steel 850 - 1100 N/mm <sup>2</sup> 	4.00	4	120	0.020	5.000	4.000	9550	765	15.3	29°
		5.00	4	120	0.025	6.250	5.000	7640	765	23.9	29°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	6.00	4	120	0.030	7.500	6.000	6365	765	34.4	29°
		8.00	4	120	0.040	10.000	8.000	4775	765	61.1	29°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	10.00	4	120	0.050	12.500	10.000	3820	765	95.5	29°
		12.00	4	120	0.055	15.000	12.000	3185	700	126.1	29°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	16.00	4	120	0.065	20.000	16.000	2385	620	198.6	29°
		20.00	4	120	0.075	25.000	20.000	1910	575	286.5	29°
	Steel < 850 N/mm <sup>2</sup> 	4.00	4	55	0.025	5.000	4.000	4375	440	8.8	19°
		5.00	4	55	0.025	6.250	5.000	3500	350	10.9	19°
	Steel 850 - 1100 N/mm <sup>2</sup> 	6.00	4	55	0.030	7.500	6.000	2920	350	15.8	19°
		8.00	4	55	0.040	10.000	8.000	2190	350	28.0	19°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	10.00	4	55	0.045	12.500	10.000	1750	315	39.4	19°
		12.00	4	55	0.055	15.000	12.000	1460	320	57.8	19°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	16.00	4	55	0.065	20.000	16.000	1095	285	91.0	19°
		20.00	4	55	0.070	25.000	20.000	875	245	122.5	19°
	Steel < 850 N/mm <sup>2</sup> 	4.00	4	70	0.015	5.000	4.000	5570	335	6.7	14°
		5.00	4	70	0.020	6.250	5.000	4455	355	11.1	14°
	Steel 850 - 1100 N/mm <sup>2</sup> 	6.00	4	70	0.025	7.500	6.000	3715	370	16.7	14°
		8.00	4	70	0.025	10.000	8.000	2785	280	22.3	14°
	Cold work tool steel (12% Cr), high alloyed [1.2379] 	10.00	4	70	0.035	12.500	10.000	2230	310	39.0	14°
		12.00	4	70	0.040	15.000	12.000	1855	295	53.5	14°
	Inox normal [Cr-Ni/1.4301] [Cr-Ni-Mo/1.4571] 	16.00	4	70	0.050	20.000	16.000	1395	280	89.1	14°
		20.00	4	70	0.060	25.000	20.000	1115	265	133.7	14°