

# SPEED & FEED INFORMATION

## SPEED & FEEDS FOR SERIES: Z7TVW

### DESCRIPTION: 7 FLUTE - VARIABLE FLUTE - LIGHT TO MEDIUM FINISHING APPLICATIONS

#### Notes

**Note:** All technical data provided are suggested starting points. They may be increase or decreased depending on machine condition, depth of cut, finish required, coolant, etc. Call our TECHNICAL SERVICE Team with questions

Material Guide			Condition	SFM	FL	CHIP PER TOOTH							
						1/8"	3/16"	1/4"	3/8"	1/2"	5/8"	3/4"	1"
ISO-M	Precipitation	13-8, 15-5, 17-4PH	High Speed Profiling @ Full Length Axial / < .1 D Radial	325	7	0.0010	0.0014	0.0019	0.0029	0.0038	0.0048	0.0058	0.0077
			Profiling @ Full Length Axial / < .08 D Radial	250	7	0.0007	0.0011	0.0014	0.0022	0.0029	0.0036	0.0043	0.0058
	Austenitic	302, 303, 304L, 316L	High Speed Profiling @ Full Length Axial / < .1 D Radial	350	7	0.0010	0.0014	0.0019	0.0029	0.0038	0.0048	0.0058	0.0077
			Profiling @ Full Length Axial / < .08 D Radial	275	7	0.0007	0.0011	0.0014	0.0022	0.0029	0.0036	0.0043	0.0058
	Martensitic	403, 410, 416	High Speed Profiling @ Full Length Axial / < .1 D Radial	375	7	0.0011	0.0016	0.0022	0.0032	0.0043	0.0054	0.0065	0.0086
			Profiling @ Full Length Axial / < .08 D Radial	250	7	0.0008	0.0013	0.0017	0.0025	0.0034	0.0042	0.0050	0.0067
ISO-S	Cobalt Base	Stellite, Haynes 25, 188, X-40	High Speed Profiling @ Full Length Axial / < .1 D Radial	135	7	0.0003	0.0004	0.0005	0.0008	0.0011	0.0014	0.0016	0.0022
			Profiling @ Full Length Axial / < .08 D Radial	110	7	0.0003	0.0005	0.0007	0.0007	0.0013	0.0016	0.0020	0.0026
	Nickel Base	Inconel 600, 625, 718, Nickel 200, 270, Invar, Monel 400, 405, K-Monel, Perma-Nickel 300, Inconel 600	High Speed Profiling @ Full Length Axial / < .1 D Radial	120	7	0.0004	0.0005	0.0007	0.0010	0.0017	0.0016	0.0026	0.0026
			Profiling @ Full Length Axial / < .08 D Radial	105	7	0.0004	0.0005	0.0007	0.0011	0.0018	0.0018	0.0022	0.0022
	Iron Base	Incoloy 800-802, Multimet N-155	High Speed Profiling @ Full Length Axial / < .1 D Radial	105	7	0.0004	0.0005	0.0008	0.0013	0.0017	0.0021	0.0025	0.0033
			Profiling @ Full Length Axial / < .08 D Radial	95	7	0.0004	0.0006	0.0009	0.0014	0.0019	0.0023	0.0028	0.0038
ISO-P	High Strength Steels	4140, 4340, 52100	High Speed Profiling @ Full Length Axial / < .1 D Radial	425	7	0.00072	0.0011	0.0014	0.0022	0.0029	0.0036	0.0043	0.0058
			Profiling @ Full Length Axial / < .08 D Radial	350	7	0.0005	0.0007	0.0010	0.0014	0.0019	0.0024	0.0029	0.0038
	High Alloy Steels Mold & Die	A-2, P20, 01, 02, 06, D2, H-13	High Speed Profiling @ Full Length Axial / < .1 D Radial	400	7	0.0010	0.0014	0.0019	0.0029	0.0038	0.0048	0.0058	0.0077
			Profiling @ Full Length Axial / < .08 D Radial	300	7	0.0007	0.0011	0.0014	0.0022	0.0029	0.0036	0.0043	0.0058
	Medium Alloy Steels	200, 250, 300	High Speed Profiling @ Full Length Axial / < .1 D Radial	375	7	0.0010	0.0014	0.0019	0.0029	0.0038	0.0048	0.0058	0.0077
			Profiling @ Full Length Axial / < .08 D Radial	320	7	0.0007	0.0011	0.0014	0.0022	0.0029	0.0036	0.0043	0.0058
	Low Alloy Steels-Maraging	10XX, 11XX, 13XX	High Speed Profiling @ Full Length Axial / < .1 D Radial	420	7	0.0011	0.0016	0.0022	0.0032	0.0043	0.0054	0.0065	0.0086
			Profiling @ Full Length Axial / < .08 D Radial	350	7	0.0007	0.0011	0.0014	0.0022	0.0029	0.0036	0.0043	0.0058
ISO-K	Ductile Iron	ASTM A536, ASTM 897	High Speed Profiling @ Full Length Axial / < .1 D Radial	375	7	0.0012	0.0018	0.0024	0.0036	0.0048	0.0060	0.0072	0.0096
	Profiling @ Full Length Axial / < .08 D Radial		300	7	0.0010	0.0014	0.0019	0.0029	0.0038	0.0048	0.0058	0.0077	
	Cast Iron	SAE 1431, ASTM A48	High Speed Profiling @ Full Length Axial / < .1 D Radial	425	7	0.0018	0.0027	0.0036	0.0054	0.0072	0.0090	0.0108	0.0144
	Grey Cast Iron		Profiling @ Full Length Axial / < .08 D Radial	325	7	0.0012	0.0018	0.0024	0.0036	0.0048	0.0060	0.0072	0.0096
ISO-S	Titanium Alloys	6AL-4V, ASTM 1, 2, 3, 6AL-2S	High Speed Profiling @ Full Length Axial / < .1 D Radial	300	7	0.0010	0.0014	0.0019	0.0029	0.0038	0.0048	0.0058	0.0077
			Profiling @ Full Length Axial / < .08 D Radial	225	7	0.0007	0.0011	0.0014	0.0022	0.0029	0.0036	0.0043	0.0058

For 5553, decrease SFM and IPM by 25%

