



Application Data • Series 70NS • Stainless Steel/High-Temp • Metric

Material Group														
	Profile Milling		★ AITiN-MT		Recommended Feed Per Tooth (fz = mm/th) for 3D milling/profiling (A)									
	A		Cutting Speed – Vc m/min			D1 – Diameter								
	ap	ae	min		max	mm	6,0	8,0	10,0	12,0	16,0	20,0	25,0	
M	1	0.5 x D	0.55 x D	90	–	115	fz	0,300	0,400	0,500	0,540	0,720	0,900	1,125
	2	0.5 x D	0.55 x D	60	–	80	fz	0,240	0,320	0,400	0,480	0,640	0,800	1,000
S	3	0.5 x D	0.55 x D	60	–	70	fz	0,240	0,320	0,400	0,480	0,640	0,800	1,000
	1	0.5 x D	0.55 x D	50	–	90	fz	0,270	0,360	0,450	0,500	0,650	0,800	1,000
	2	0.5 x D	0.55 x D	50	–	80	fz	0,240	0,320	0,400	0,480	0,600	0,700	0,900
	3	0.5 x D	0.55 x D	25	–	40	fz	0,180	0,240	0,300	0,350	0,430	0,500	0,600
	4	0.5 x D	0.55 x D	50	–	60	fz	0,210	0,280	0,350	0,420	0,560	0,700	0,875

70NS Metric									Ramping Guide for Circular and Linear Interpolation						
Geometrical Parameters									Circular Interpolation		Linear Interpolation				
									Allowed Range of Hole Diameter		Calculated Length (mm) per Ramp Angle				
diameter	Ap1 max	Rfm	Rt	Rc	Xfm	Yfm	YD	Number	Smallest	Largest	Ramp Angle (degree)				
[mm]	[mm]	[mm]	[mm]	[mm]	[mm]	[mm]	[mm]	flutes			1	2	3	4	5
6	0,32	6	0,67	0,375	0,338	0,75	1,26	6	8,52	12	18,12	9,06	6,03	4,52	3,61
8	0,42	8	0,89	0,500	0,450	1,00	1,68	6	11,36	16	24,16	12,08	8,05	6,03	4,82
10	0,53	10	1,12	0,625	0,562	1,25	2,10	6	14,2	20	30,20	15,09	10,06	7,54	6,02
12	0,63	12	1,34	0,750	0,674	1,50	2,52	6	17,04	24	36,24	18,11	12,07	9,05	7,23
16	0,84	16	1,79	1,000	0,915	2,00	3,36	6	22,72	32	48,31	24,15	16,09	12,06	9,64
20	1,05	20	2,23	1,250	1,124	2,50	4,20	6	28,4	40	60,39	30,19	20,11	15,08	12,05
25	1,25	25	2,90	1,5625	1,405	3,1250	5,25	6	35,5	50	70,61	35,80	23,85	17,88	14,29
Recommended Feed											30%	30%	30%	30%	10%

NOTE: Lower value of cutting speed is used for high stock removal applications or for higher hardness (machinability) within group.
 Higher value of cutting speed is used for finishing applications or for lower hardness (machinability) within group.
 Above parameters are based on ideal conditions. For smaller taper machining centres, please adjust parameters accordingly on diameters greater than 12mm.

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