

Operating Guidelines

Materials				Vc Cutting Speed SFM	fz Feed/Tooth (inch)	Harder «-----» Tougher				Coolant			
ISO	Mat'l Group #VDI 3323	Type	Examples			Cermet		Carbide					
						IN0560	IN2010	IN10K	IN2040				
P	1-11	Non, Low & High alloy steel	1018, A36, 4140, P20, H13, D2	300 - 650	.010-.030				1	No			
				600 - 800		1							
M	12, 13	Stainless steel (ferritic and martensitic)	410, 416, 440	260 - 520	.010-.030				1	Yes			
	14	Stainless steel (austenitic)	303, 304, 316, 15-5, 17-4							May not be required at high speeds			
K	15, 16	Gray cast iron	CLS. 20, 30, 45	460 - 660	.020-.030		1			No			
	17, 18	Nodular cast iron	60-40-18, 100-70-03	330 - 600									
N	21-30	Aluminum	7075, 6061	1300 - 2000	.020-.030			1		Yes			
S	31-35	High-temp alloys	Inconel, Hastelloy, Nimonic, Monel	260 - 460	.010-.030				1	Yes			

Note: Feed and speed recommendations are starting operating parameters. They are only guidelines from which further optimization should take place. Operating parameters are influenced by many machining variables. These variables may cause for reductions in feeds and speed or dramatic increases. Additionally, DOC and WOC may need to be revised to optimize the tools performance.