

GARR TOOL High Performance Drilling Guide for Mini Drills

(Series 1550H,1250H,1850H)

	ISO Material	HRC	M/Min. (Vc)	CHIPLOAD PER TOOTH (Fz)		
				0.79 - 0.99mm	1.00 - 2.00mm	2.01 - 3.17mm
S	COBALT BASE ALLOYS					
	Haynes 25/188, Stellite 21, Cobalt Chrome	< 40 > 40	20 - 30 15 - 25	.005 - .010 .005 - .010	.010 - .018 .008 - .015	.015 - .025 .013 - .023
	NICKEL BASE ALLOYS					
	Inconel-625/718, Waspaloy, Invar, Rene, Hastelloy, Monel	< 40 > 40	20 - 30 15 - 25	.008 - .013 .005 - .010	.010 - .018 .008 - .015	.015 - .025 .013 - .023
	IRON BASE ALLOYS					
	A286, Discaloy, Haynes 556, Carpenter 22, Greek Ascology	< 40 > 40	20 - 30 15 - 25	.005 - .013 .005 - .010	.010 - .020 .008 - .018	.013 - .025 .010 - .023
	TITANIUM ALLOYS					
Commercially Pure, 6Al-4V, Astm 1/2/3, 6Al-25N-4Zr-2Mo-Si		25 - 40	.008 - .015	.010 - .020	.015 - .030	
5553 / Beta Titanium		20 - 35	.005 - .010	.008 - .015	.013 - .025	
M	STAINLESS STEELS					
	13/8, 15/5, 17-4, pH Types	< 40 > 40	30 - 40 25 - 40	.005 - .010 .005 - .010	.010 - .018 .008 - .015	.015 - .025 .013 - .023
	300 Series, 304L, Nitronic 50, Duplex, Super-Austenitic	< 40 > 40	25 - 40 25 - 35	.005 - .010 .005 - .010	.010 - .018 .008 - .015	.015 - .025 .013 - .023
	400 Series - 403, 405, 420, 455	< 40 > 40	30 - 45 25 - 40	.005 - .010 .005 - .010	.010 - .018 .008 - .015	.015 - .025 .013 - .023
	HIGH STRENGTH TOOL STEELS					
A2, D2, P20, H13, S7, O1	< 40 > 40	30 - 50 20 - 25	.008 - .015 .005 - .010	.010 - .020 .008 - .015	.015 - .030 .013 - .025	
P	MEDIUM ALLOY TOOL STEELS					
	4140, 4340, 52100, 6150, 8620	< 40 > 40	40 - 50 25 - 40	.010 - .020 .008 - .013	.015 - .030 .010 - .020	.020 - .038 .015 - .030
	CARBON STEELS					
1000's - 1018, 1020, 12L14	< 40	40 - 50	.010 - .020	.015 - .030	.020 - .038	
K	CAST MATERIAL					
	Ductile Iron		30 - 60	.010 - .020	.015 - .030	.020 - .038
Gray Iron		25 - 50	.010 - .020	.015 - .030	.020 - .038	
N	NON-FERROUS					
	Aluminum 2014, 2024, 6061-(T1-T6), 7075, Extruded		40 - 90	.010 - .020	.015 - .030	.020 - .038
	Magnesium		40 - 75	.010 - .020	.015 - .030	.020 - .038
	Copper		40 - 75	.010 - .020	.015 - .030	.020 - .038
	Brass		30 - 75	.008 - .020	.010 - .030	.015 - .038
Bronze		25 - 75	.008 - .020	.010 - .030	.015 - .038	

NOTE - ABOVE ARE STARTING PARAMETERS ONLY. HIGHER RESULTS MAY BE ACHIEVED WITH OPTIMUM CONDITIONS.