Amana Tool®

INDUSTRIAL

Composite, Fiberglass & Phenolic Cutting ZrN Coated Router Bits

Operating RPM: 18,000

Material	Spindle Speed SFM*	Chip Load Per Tooth								
		#46093 1.2mm (0.047)	#46040 1/8" (0.125)	#46090/46091 1/8" (0.125)	#46042 3/16" (0.1875)	#46092 3/16" (0.1875)	#46043 1/4" (0.250)	#46094/46097 1/4" (0.250)	#46045 3/8" (0.375)	#46047 1/2" (0.50)
Composites	600 - 800	0.001" - 0.002"	0.002" - 0.004"	0.002" - 0.004"	0.002" - 0.004"	0.002" - 0.004"	0.003" - 0.005"	0.003" - 0.005"	0.003" - 0.005"	0.004" - 0.006"
Fiberglass	800 - 1,200	0.001" - 0.002"	0.003" - 0.005"	0.002" - 0.004"	0.003" - 0.005"	0.002" - 0.004"	0.003" - 0.005"	0.003" - 0.005"	0.003" - 0.005"	0.004" - 0.006"
Phenolic	800 - 1,200	0.001" - 0.002"	0.003" - 0.005"	0.002" - 0.004"	0.003" - 0.005"	0.002" - 0.004"	0.004" - 0.006"	0.003" - 0.005"	0.004" - 0.006"	0.005" - 0.007"
Aluminum	300 - 600	0.001" - 0.002"	0.003" - 0.005"	0.002" - 0.004"	0.003" - 0.005"	0.002" - 0.004"	0.004" - 0.006"	0.003" - 0.005"	0.004" - 0.006"	0.005" - 0.007"

*** SFM** Surface feet per minute

Simple Machining Calculations:
To find **RPM:** (SFM x 3.82) / diameter of tool
To find **SFM:** 0.262 x diameter of tool x RPM
To find **Feed Rate IPM:** RPM x # of flutes x chip load
To find **Chip Load:** Feed Rate IPM / (RPM x # of Flutes)

Depth of Cut: 1 x D Use recommended chip load
2 x D Reduce chip load by 25%
3 x D Reduce chip load by 50%

Disclaimer: It is important to understand that these values are only recommendations.