

**25M, 27M  
(METRIC)**

	<b>Cut</b>	<b>Speed</b>	<b>Feed (mm/flute)</b>				
			Type	m/min	6	8	10

**CFRP, AFRP  
(Carbon Fiber, Aramid Fiber)**

Slot	120	0.040	0.065	0.075	0.100	0.120
Profile	150	0.040	0.065	0.075	0.100	0.120
Light	250	0.095	0.145	0.175	0.235	0.280

**GFRP  
(Fiberglass)**

Slot	100	0.040	0.065	0.075	0.100	0.120
Profile	120	0.040	0.065	0.075	0.100	0.120
Light	200	0.095	0.145	0.175	0.235	0.280

**CARBON, GRAPHITE**

Slot	145	0.050	0.080	0.095	0.125	0.150
Profile	185	0.050	0.080	0.095	0.125	0.150
Light	300	0.115	0.185	0.220	0.290	0.350

**PLASTIC**

Slot	245	0.050	0.080	0.095	0.125	0.150
Profile	305	0.050	0.080	0.095	0.125	0.150
Light	505	0.115	0.185	0.220	0.290	0.350

**MACHINABLE CERAMIC,  
MACHINABLE GLASS**

Slot	10	0.020	0.035	0.040	0.050	0.060
Profile	15	0.020	0.035	0.040	0.050	0.060
Light	25	0.045	0.075	0.085	0.115	0.140

**Cut Type**

Slot	Profile	Light
27M	25M, 27M	25M, 27M
Rw = D <sub>1</sub> Ad = D <sub>1</sub>	Rw = .5 x D <sub>1</sub> Ad = 1.5 x D <sub>1</sub>	Rw = .05 x D <sub>1</sub> Ad = L <sub>2</sub>



$$\text{rpm} = (1000 \times \text{m/min}) / (3.14 \times D_1)$$

$$\text{mm/min} = (\text{mm/flute}) \times \text{no. of flutes} \times \text{rpm}$$

- maximum recommended depths shown
- adjust speed and feed based upon resin type and/or fiber structure
- reduce speed when overheating causes melting or damage to resin
- reduce feed if delamination or fraying occurs
- finish cuts typically require reduced feed and cutting depths
- rates shown are for use without coolant; rates may be increased with coolant use
- dust collection is vital when machining dry
- diamond coating will increase tool life in graphite and composite materials
- refer to the SGS Tool Wizard for more complete technical information (available at )