

# Operating Parameters - Cut Taps



Material Reference		Approx. Rc	Approx. HB	Recommended SFM		
				HSS-E	HSS-E-PM	
<b>P</b>	Structural steels, free cutting steels		<180	<b>50-70</b>	<b>70-85</b>	
	Unalloyed case hardened steels		<22	<b>45-55</b>	<b>55-65</b>	
	Unalloyed heat treatable steels		<30	<b>35-45</b>	<b>45-55</b>	
	Structural steels, free cutting steels		<22	<b>45-55</b>	<b>55-65</b>	
	Case hardened steels, heat treatable steels		<30	<b>35-45</b>	<b>45-55</b>	
	Nitriding Steels, Spheroidal graphite iron		<38	<b>25-35</b>	<b>35-45</b>	
	Alloyed case hardened steels		<22	<b>45-55</b>	<b>55-65</b>	
	Alloyed heat treatable steels		<30	<b>35-45</b>	<b>45-55</b>	
	Alloyed tool steels		<38	<b>25-35</b>	<b>35-45</b>	
	High speed tool steels					
<b>M</b>	Stainless Steels	sulphured, austenitic, martensitic	<22	<220	<b>35-45</b>	<b>45-55</b>
			<30	<290	<b>25-35</b>	<b>35-45</b>
			<40	<375	<b>15-20</b>	<b>20-25</b>
<b>K</b>	Cast Iron		<180	-	-	
	Spheroidal graphite iron		<290	<b>50-70</b>	<b>70-85</b>	
	Malleable cast iron		<350	<b>30-40</b>	<b>40-50</b>	
<b>N</b>	Aluminum and Al-alloys	Al cast alloys	Silcon content	Wrought Aluminum		
			<6%	n/a	<b>55-65</b>	<b>75-85</b>
			6-12%	n/a		
		Al wrought alloys	n/a	30-80	<b>25-35</b>	<b>35-45</b>
			n/a	75-150		
	Magnesium alloys		<150	-	-	
	Copper and copper alloys		Long chipping	<b>50-70</b>	<b>70-85</b>	
		Short chipping				
Thermoplastics-Duroplastics		Long chipping	-	-		
		Short chipping	-	-		
<b>S</b>	Titanium and Ti alloys		140-275	<b>8-12</b>	<b>12-16</b>	
			300-380			
	Nickel and Ni alloys		200-300	<b>4-8</b>	<b>8-12</b>	
			>300			
<b>H</b>	Hardened steel		45-55	-	-	
			55-62	-	-	