

Technical Information

Recommended application of Machine Taps with coloured ring



Material	Green Ring	Green Ring PM	Blue Ring	White Ring	Black Ring	Yellow Ring	Orange Ring	Red Ring	Cutting Speed V= m/min	coolants and lubrications
Unalloyed steels, tensile strength < 800 N/mm ²	●	PM							10 - 18	drilling oil emulsion, cutting oil also with lubricity-increasing additives
Machining steels, case hardening steels, tempered steels	●	PM	●	○					10 - 18	
Unalloyed steels, tensile strength < 1000 N/mm ²	●	PM	●						6 - 10	
Unalloyed and alloyed steels, tensile strength < 1200 N/mm ²		PM	●					○	3 - 5	thread cutting oil, cutting oil highly activated with special additives, solid lubricants
Unalloyed and alloyed steels, tensile strength > 1200 N/mm ²								●	2 - 4	
Stainless and acid-resistant steels; VA-steels < 850 N/mm ²		PM	○	○					2 - 4	
Rust- and acid-resistant steels with high chromium-nickel content, V4A steels			●	○					2 - 4	
Gray cast iron					●				8 - 16	thread cutting oil, special thread cutting oil and emulsion
Graphite cast iron, malleable cast iron	●	PM	●						8 - 16	
Copper alloys short chipping					○		●		18 - 24	thread cutting oil, emulsion
Long-chipping brass	○	PM							12 - 18	
Aluminium, magnesium, unalloyed						●			20 - 30	thread cutting oil for non-ferrous metals, emulsion, petroleum
Aluminium alloys, Si < 0,5%			○			●			18 - 24	
Aluminium alloys, Si 0,5 - 10%	○	PM	●			○			14 - 18	
Aluminium alloys, Si > 10%			●						8 - 10	
Titanium alloys			○	○					2 - 4	oil, special thread cutting oil
Thermoplastics	●	PM							18 - 24	mold release oil, dry, oil mist, compressed air, emulsion
Thermosetting and fibre-reinforced plastics			○		●			●	8 - 12	