



TCMT 431 Z14

APPLICATION

- Generic grade for steel
- Suitable for fine and medium machining of steels, stainless steel and cast-irons



GRADE Z14

This is a TIN PVD coated carbide insert for fine to medium machining of steels, stainless steel and cast-irons

	STEEL	STAINLESS	CAST IRON	NON FERROUS	S.ALLOYS	HEAT TREATED
GROUP	P30	M30	K30			
Sfm ft/min	344 - 509	197 - 295	312 - 476			
Fn Inch/Z	0.0031 - 0.0079	0.0035 - 0.0071	0.0031 - 0.0079			
ap Inch	0.016 - 0.118	0.016 - 0.118	0.016 - 0.118			

LEGEND

Sfm (Vc)	Surface Feet per Minute
Fn (ipr)	Feed per revolution
Fz (ipt)	Feed per tooth
ap	Depth of cut

FORMULA

$S \text{ (RPM)} = Sfm * 12 / \pi / D = \text{rev per minute}$
$F \text{ (IPR, inch per revolution)} = S * Fn = \text{feed per minute}$
$F \text{ (IPM, inch per minute)} = S * Fz * n.\text{flutes} = \text{feed per minute}$
$Sfm = S * D * \pi / 12$