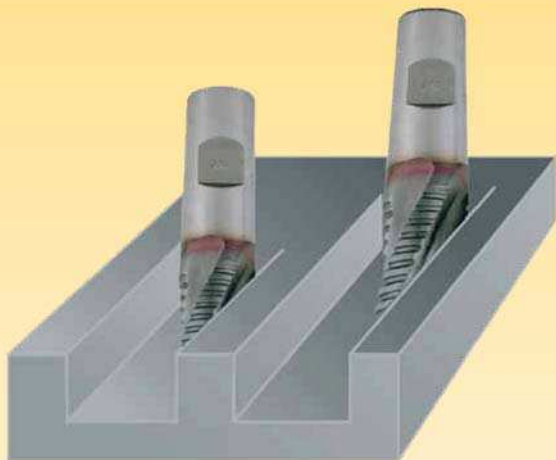


AERO-ROUGH / RS 100 U/F - Roughing geometry for optimal efficiency



RS 100 high-performance roughing cutters benefit from a completely new roughing geometry, considerably reducing surface finish wear thanks to its unequal spacing. The result is a drastic increase in tool life compared to conventional round knuckle-type geometries and an improvement in the surface finish quality of the workpiece, so that in many applications finishing operations are unnecessary and the machining cost per workpiece is vastly reduced. In addition, the tool excels with a much reduced power requirement in comparison to tools without chip breaking geometry. Two types of RS 100 high-performance roughing cutters are available: The 4-flute, 30° RH spiral RS 100 U is suitable for the machining of all standard steels. With a new 5 to 6 flute geometry and a spiral angle increased to 45°, RS 100 F possesses a considerably increased core diameter and is suitable for roughing/finishing operations with a width of cut up to 0.25 x D in all general purpose steels and tough materials.



Advantages at a glance:

- increased tool life in comparison to milling cutters with round knuckle-type teeth
- increased feed rate thanks to new edge wear protection
- improved workpiece surface finish
- reduced power requirement compared to smooth cutting milling cutters

Material	Alloyed Steel		Tool Steel		Cast iron		Stainless steel		Aluminium		Ti-special alloys		H	
	up to 28HRC	over 28 HRC	up to 180 HB 30	over 180 HB 30	up to 28 HRC	over 28 HRC	up to 3% Si	over 3% Si	Ti-based	Ni-based	up to 52 HRC	over 52 HRC		
Aero-Rough 48	●	●	●	○	●	○	○	○	○	○	○	○	○	○
Aero-Rough 56	○	●	●	●	○	○				●	○	○	○	○

● = optimal suitability ○ = limited suitability

Comparison overview:

Type	NR round knuckle-type	NF flat knuckle-type (old)	RS 100 U&F (new)
Perform. index	100%	65%	120%
Workpiece Surface finish	Ra = 9-10 µm	Ra = 6-7 µm	Ra = 2-3 µm
Tool life index	100%	100%	140%