

THE NEW VALUE FRONTIER



Chipbreakers for automatic lathes

Excellent chip control in a wide range of applications

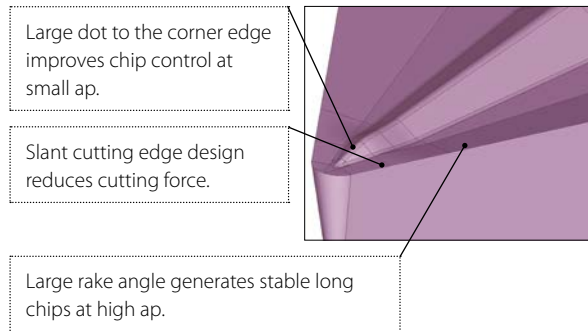


3D sharp edge chipbreaker series for automatic lathes

- Excellent chip control in a wide range of applications.
- Sharp cutting due to ground edge periphery of high precision.
- The mirror polished insert provides improved adhesion resistance and surface finish.

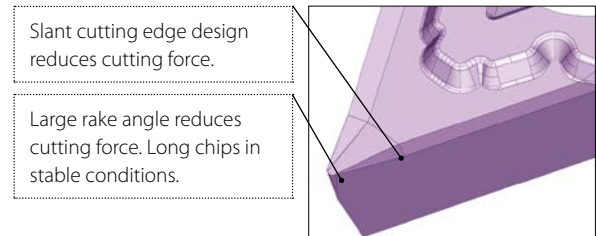
Finishing (low cutting force) / SK chipbreaker

- 3D chipbreaker with sharpness and good chip control.
- Application range: ap 0.5 - 3.0 mm.



General use (low cutting force) / CK chipbreaker

- Smooth chip evacuation with large rake angle.
- Application range: ap 1.0 - 2.5 mm.



Small and large ap / GQ chipbreaker For finishing / GF chipbreaker

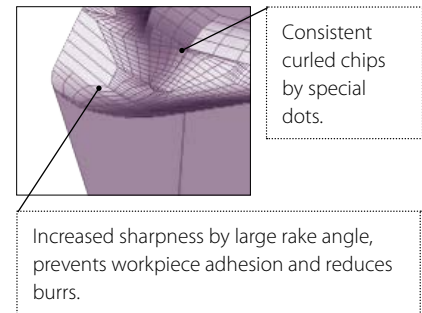
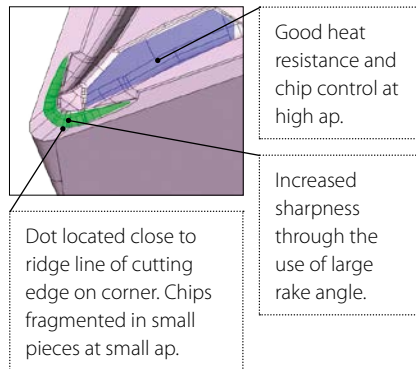
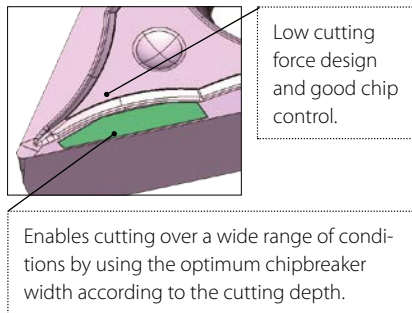
Available in a wide range of applications:

- Steel: ap = 0.8 - 5.0 mm
- Stainless steel: ap = 0.8 - 3.0 mm

Applicable range: ap = 0.25 - 1.25 mm

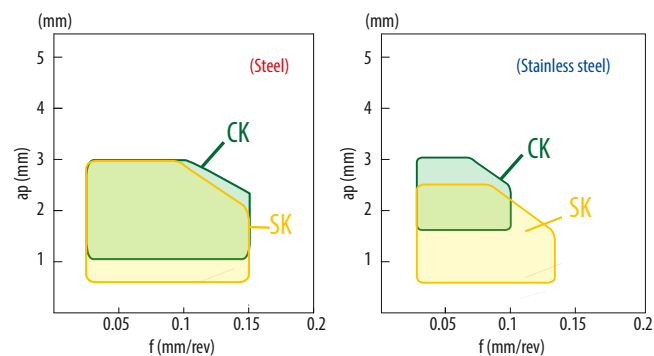
Minute ap / CF chipbreaker

Applicable range: ap = 0.02 - 0.2 mm

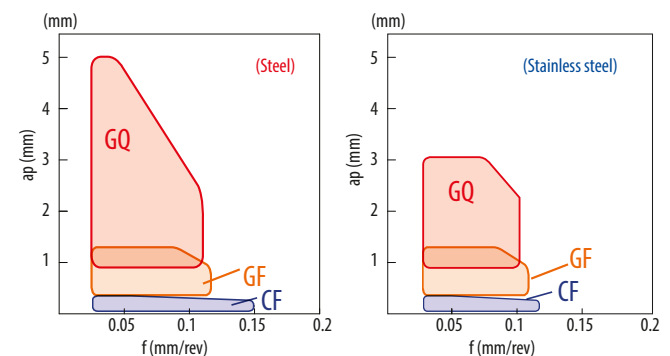


Chipbreaker application range

Cutting force oriented (Low cutting force)

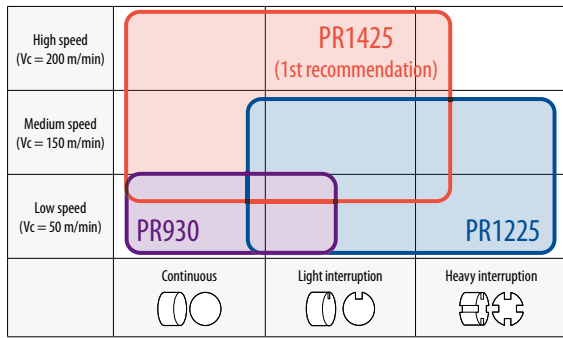


Chip control oriented



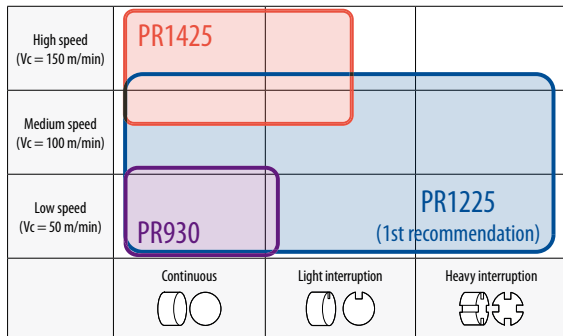
Application range of grades

Steel



PR1225: High reliability in interrupted cutting. Stable cutting at low to middle speed.
PR930: Stable cutting at low speed.

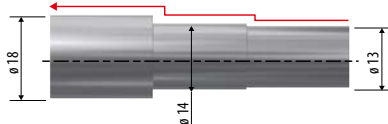
Stainless steel



PR1425: Extended tool life in high speed cutting.
PR930: Extended tool life in low speed cutting.

Case studies

100Cr6



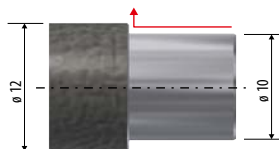
- Vc = 165 - 250 m/min
- ap = 0.3 - 1.3 mm
- f = 0.07 mm/rev
- DCGT11T302MFP-SK
- Wet

Tool life +30%

SK PR1425	200 pcs/edge
Competitor G (Molded chipbreaker, PVD coated)	150 pcs/edge

Excellent chip control even at variable ap machining.

Electromagnetic stainless steel



- Vc = 180 - 210 m/min
- ap = 0.25 - 1.2 mm
- f = 0.025 - 0.05 mm/rev
- DCGT11T302MFP-SK
- Wet

Tool life +75%

SK PR1225	3,500 pcs/edge
Competitor H (Molded chipbreaker, PVD coated)	2,000 pcs/edge

Better chip control compared with the competitor.

Positive type inserts

Shape	Left-hand shown	Description	Dimension (mm)					Grades
			I.C.	Thick-ness	Hole	Corner-R (re)	Relief Angle	
Minute ap		CCGT 030101MP-CF	3.5	1.4	1.9	< 0.1	7°	● ●
		CCGT 030102MP-CF	3.5	1.4	1.9	< 0.2		
Sharp Edge / Polished		CCGT 040101MP-CF	4.3	1.8	2.3	< 0.1	7°	● ●
		CCGT 040102MP-CF	4.3	1.8	2.3	< 0.2		
Finishing		CCGT 060201MFP-GF	6.35	2.38	2.8	< 0.1	7°	● ●
		CCGT 060202MFP-GF	6.35	2.38	2.8	< 0.2		
Sharp Edge / Polished		CCGT 09T301MFP-GF	9.525	3.97	4.4	< 0.1	7°	● ●
		CCGT 09T302MFP-GF	9.525	3.97	4.4	< 0.2		
Finishing		CCGT 060201MFP-SK	6.35	2.38	2.8	< 0.1	7°	● ●
		CCGT 060202MFP-SK	6.35	2.38	2.8	< 0.2		
Sharp Edge / Polished		CCGT 09T301MFP-SK	9.525	3.97	4.4	< 0.1	7°	● ●
		CCGT 09T302MFP-SK	9.525	3.97	4.4	< 0.2		
General Use		CCGT 060201MP-CK	6.35	2.38	2.8	< 0.1	7°	● ●
		CCGT 060202MP-CK	6.35	2.38	2.8	< 0.2		
Finishing-Medium		CCGT 060201MFP-GQ	6.35	2.38	2.8	< 0.1	7°	● ●
		CCGT 060202MFP-GQ	6.35	2.38	2.8	< 0.2		
Sharp Edge / Polished		CCGT 09T301MFP-GQ	9.525	3.97	4.4	< 0.1	7°	● ●
		CCGT 09T302MFP-GQ	9.525	3.97	4.4	< 0.2		
Minute ap		DCGT 070201MP-CF	6.35	2.38	2.8	< 0.1	7°	● ●
		DCGT 070202MP-CF	6.35	2.38	2.8	< 0.2		
Sharp Edge / Polished		DCGT 11T301MP-CF	9.525	3.97	4.4	< 0.1	7°	● ●
		DCGT 11T302MP-CF	9.525	3.97	4.4	< 0.2		
Finishing		DCGT 070201MFP-GF	6.35	2.38	2.8	< 0.1	7°	● ●
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General Use		DCGT 070201MP-CK	6.35	2.38	2.8	< 0.1	7°	● ●
		DCGT 070202MP-CK	6.35	2.38	2.8	< 0.2		
Finishing-Medium		DCGT 070201MFP-GQ	6.35	2.38	2.8	< 0.1	7°	● ●
		DCGT 070202MFP-GQ	6.35	2.38	2.8	< 0.2		
Sharp Edge / Polished		DCGT 11T301MFP-GQ	9.525	3.97	4.4	< 0.1	7°	● ●
		DCGT 11T302MFP-GQ	9.525	3.97	4.4	< 0.2		
Minute ap		TBGT 060101MP-CF	3.97	1.59	2.3	< 0.1	5°	● ●
		TBGT 060102MP-CF	3.97	1.59	2.3	< 0.2		
Sharp Edge/Polished		TPGT 080201MP-CF	4.76	2.38	2.3	< 0.1	11°	● ●
		TPGT 080202MP-CF	4.76	2.38	2.3	< 0.2		
Minute ap		TPGT 090201MP-CF	5.56	2.38	3.0	< 0.1	11°	● ●
		TPGT 090202MP-CF	5.56	2.38	3.0	< 0.2		
Sharp Edge / Polished		VPGT 110301MP-CF	6.35	3.18	2.8	< 0.1	11°	● ●
		VPGT 110302MP-CF	6.35	3.18	2.8	< 0.2		
Finishing		VPGT 110301MFP-GF	6.35	3.18	2.8	< 0.1	11°	● ●
		VPGT 110302MFP-GF	6.35	3.18	2.8	< 0.2		
Sharp Edge / Polished		VPGT 080201MP-CK	4.76	2.38	2.3	< 0.1	11°	● ●
		VPGT 080202MP-CK	4.76	2.38	2.3	< 0.2		
General Use		VPGT 110301MP-CK	6.35	3.18	2.8	< 0.1	11°	● ●
		VPGT 110302MP-CK	6.35	3.18	2.8	< 0.2		
Minute ap		WBG 060101MP-L-CF	3.97	1.59	2.3	< 0.1	5°	● ●
		WBG 060102MP-L-CF	3.97	1.59	2.3	< 0.2		
Sharp Edge / Polished		WBG 060101MP-L-CF	3.97	1.59	2.3	< 0.1	5°	● ●
		WBG 060102MP-L-CF	3.97	1.59	2.3	< 0.2		

An insert which corner-R (re) dimension is shown with inequality sign (EX: < 0.1, < 0.2) indicates minus tolerance of corner-R (re).

●: Standard Item

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