

TURNING



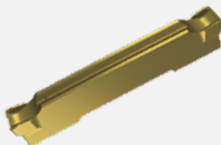
RELIABLE DEEPER PARTING-OFF & GROOVING OF STEELS AND STAINLESS STEELS

Our offer of parting-off and grooving systems has been expanded with a new range of double-edged inserts in various widths and an assortment of tools for general and small part machining. This is supported by a new designation that will allow you to easily select the appropriate insert and tool.

FEATURES & BENEFITS

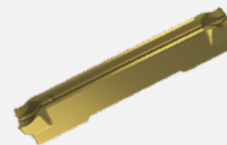
- 25mm long double edged inserts
- Broader range of widths from 2mm to 6mm
- Versatile G8330 PVD grade
- PR geometry – first choice for parting-off bars and grooving of interrupted cuts
- PM geometry – first choice for austenitic stainless steels and soft steels
- External tools from 16x16mm to 25x25mm with new advanced design
- Universal tool-blades 26mm and 32mm with special clamping key
- **Deep parting-off & grooving** – up to 60% deeper grooving capacity thanks to the inserts length
- **Improved operation reliability** on steels and stainless steels through a unique combination of new grade, insert and tool design
- **High quality surface finish** due to enhanced vibration resistance
- **Setup time savings** – when machining small parts due to accessible clamping screw [30° angled] and easy one-hand insert replacement
- **Prolonged tool life** with increased build up edge resistance [PM] / increased cutting edge strength [PR]

INSERT GEOMETRIES

**NEW****PR**

GEOMETRY PR

- First choice for parting-off bars and interrupted cuts
- Universal choice for a wide range of machining conditions

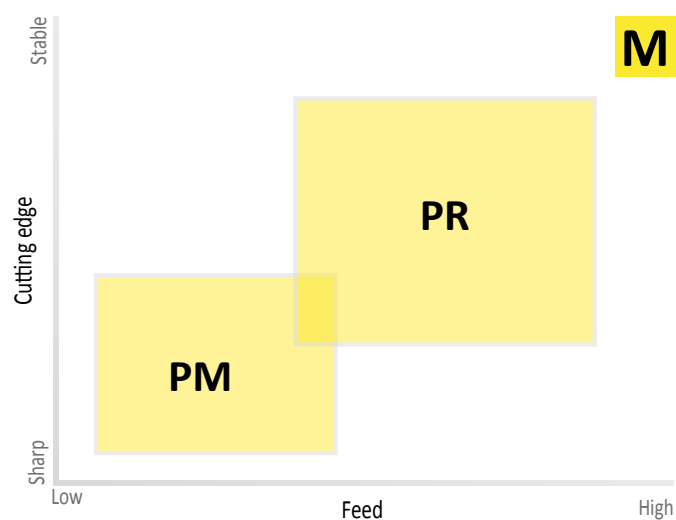
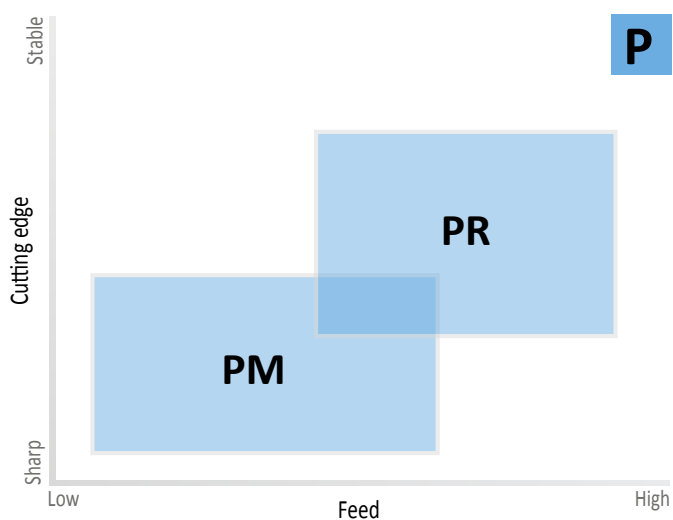
**NEW****PM**

GEOMETRY PM

- First choice for austenitic stainless steels and parting-off tubes



AREA OF APPLICATION



MACHINING EXAMPLE

Operation: Parting-off
 Material: C45
 Material group: P
 Insert: GL3-D300M02-PR, GL3-D300M02-PM
 Holder: GL3-S2525MFL-20-80
 Coolant: Yes

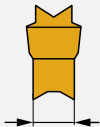
Insert geometry			PR	PM
Workpiece:			⬡ Bar	Tube
Cutting speed	v_c	m/min	140	140
Feed	f	mm/rev	0,14	0,1
Depth of cut	a_p	mm	20	10

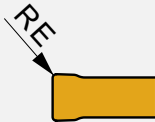
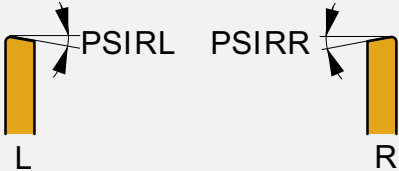


CODE DESIGNATION – PARTING OFF AND GROOVING INSERTS

1	2	3	4	5	6	7	8
GL	3	-	D 300	G	02	L06	- PM

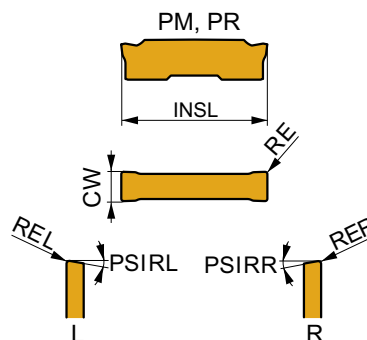


1	2	3	4																	
Tool group	Pocket size	Number of edges	Cutting width - CW																	
GL	1, 2, 3, 4, 5, 6																			
		<table><tr><td>S</td><td>One edge</td></tr><tr><td>D</td><td>Two edges</td></tr></table>	S	One edge	D	Two edges	<table><tr><td></td><td>CW</td></tr><tr><td>200</td><td>2,00</td></tr><tr><td>250</td><td>2,50</td></tr><tr><td>300</td><td>3,00</td></tr><tr><td>400</td><td>4,00</td></tr><tr><td>500</td><td>5,00</td></tr><tr><td>600</td><td>6,00</td></tr></table>		CW	200	2,00	250	2,50	300	3,00	400	4,00	500	5,00	600
S	One edge																			
D	Two edges																			
	CW																			
200	2,00																			
250	2,50																			
300	3,00																			
400	4,00																			
500	5,00																			
600	6,00																			

5	6	7	8																		
Edge design	Nose radius	Primary cutting edge angle	Chipbreaker design																		
<table><tr><td>G</td><td>Ground</td></tr><tr><td>M</td><td>Direct pressed</td></tr></table>	G	Ground	M	Direct pressed	 <table><tr><td></td><td>RE [mm]</td></tr><tr><td>02</td><td>0,2</td></tr><tr><td>03</td><td>0,3</td></tr><tr><td>04</td><td>0,4</td></tr></table>		RE [mm]	02	0,2	03	0,3	04	0,4	 <table><tr><td></td><td>[°]</td></tr><tr><td>06</td><td>6</td></tr><tr><td>12</td><td>12</td></tr></table>		[°]	06	6	12	12	PM PR
G	Ground																				
M	Direct pressed																				
	RE [mm]																				
02	0,2																				
03	0,3																				
04	0,4																				
	[°]																				
06	6																				
12	12																				

GL. D

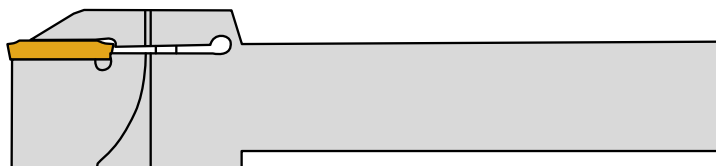
	CW	CWTOLL	CWTOLU	INSL
200	2,00	0,05	0,05	25
250	2,50	0,05	0,05	25
300	3,00	0,05	0,05	25
400	4,00	0,05	0,05	25
500	5,00	0,05	0,05	25
600	6,00	0,05	0,05	25

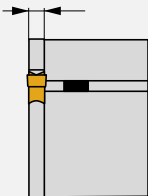


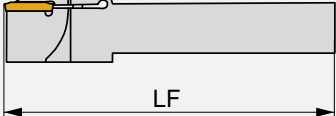
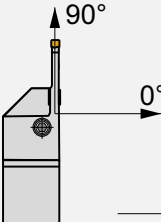
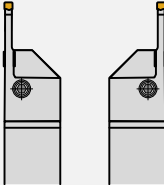
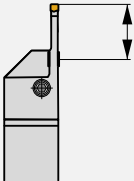
i		ISO		P	M	K	N	S	H	?		RE	FN	FX	PSIRL	PSIRR
		GL2-D200M02-PM	G8330	■	■	■				●	+++	02	0,05	0,12	-	-
		GL2-D200M02-PM	T7325	■	■	■				●	+++	02	0,05	0,12	-	-
		GL3-D250G02-PM	G8330	■	■	■				●	+++	02	0,05	0,15	-	-
		GL3-D300M02-PM	G8330	■	■	■				●	+++	02	0,05	0,15	-	-
		GL3-D300M02-PM	T7325	■	■	■				●	+++	02	0,05	0,15	-	-
		GL4-D400M02-PM	G8330	■	■	■				●	+++	02	0,08	0,18	-	-
		GL4-D400M02-PM	T7325	■	■	■				●	+++	02	0,08	0,18	-	-
		GL5-D500M03-PM	G8330	■	■	■				●	+++	03	0,1	0,21	-	-
		GL6-D600M03-PM	G8330	■	■	■				●	+++	03	0,1	0,24	-	-
		GL2-D200G02R06-PM	G8330	■	■	■				●	+++	02	0,05	0,12	-	6
		GL2-D200G02R06-PM	T7325	■	■	■				●	+++	02	0,05	0,12	-	6
		GL2-D200G02R12-PM	G8330	■	■	■				●	+++	02	0,05	0,15	-	12
		GL3-D300G02R06-PM	G8330	■	■	■				●	+++	02	0,05	0,15	-	6
		GL3-D300G02R06-PM	T7325	■	■	■				●	+++	02	0,05	0,15	-	6
		GL3-D300G02R12-PM	G8330	■	■	■				●	+++	02	0,05	0,15	-	12
		GL4-D400G02R06-PM	G8330	■	■	■				●	+++	02	0,08	0,18	-	6
		GL4-D400G02R06-PM	T7325	■	■	■				●	+++	02	0,08	0,18	-	6
		GL4-D400G02R12-PM	G8330	■	■	■				●	+++	02	0,08	0,18	-	12
		GL2-D200G02L06-PM	G8330	■	■	■				●	+++	02	0,05	0,12	6	-
		GL2-D200G02L06-PM	T7325	■	■	■				●	+++	02	0,05	0,12	6	-
		GL2-D200G02L12-PM	G8330	■	■	■				●	+++	02	0,05	0,15	12	-
		GL3-D300G02L06-PM	G8330	■	■	■				●	+++	02	0,05	0,15	6	-
		GL3-D300G02L06-PM	T7325	■	■	■				●	+++	02	0,05	0,15	6	-
		GL3-D300G02L12-PM	G8330	■	■	■				●	+++	02	0,05	0,15	12	-
		GL4-D400G02L06-PM	G8330	■	■	■				●	+++	02	0,08	0,18	6	-
		GL4-D400G02L06-PM	T7325	■	■	■				●	+++	02	0,08	0,18	6	-
		GL4-D400G02L12-PM	G8330	■	■	■				●	+++	02	0,08	0,18	12	-
		GL2-D200M02-PR	G8330	■	■	■				●	+++	02	0,05	0,16	-	-
		GL2-D200M02-PR	T7325	■	■	■				●	+++	02	0,05	0,16	-	-
		GL3-D300M02-PR	G8330	■	■	■				●	+++	02	0,05	0,2	-	-
		GL3-D300M02-PR	T7325	■	■	■				●	+++	02	0,05	0,2	-	-
		GL4-D400M02-PR	G8330	■	■	■				●	+++	02	0,08	0,25	-	-
		GL4-D400M02-PR	T7325	■	■	■				●	+++	02	0,08	0,25	-	-
		GL5-D500M04-PR	G8330	■	■	■				●	+++	04	0,1	0,28	-	-
		GL6-D600M04-PR	G8330	■	■	■				●	+++	04	0,1	0,32	-	-
		GL2-D200G02R06-PR	G8330	■	■	■				●	+++	02	0,05	0,16	-	6
		GL2-D200G02R12-PR	G8330	■	■	■				●	+++	02	0,05	0,16	-	12
		GL3-D300G02R06-PR	G8330	■	■	■				●	+++	02	0,05	0,2	-	6
		GL3-D300G02R12-PR	G8330	■	■	■				●	+++	02	0,05	0,2	-	12
		GL4-D400G02R06-PR	G8330	■	■	■				●	+++	02	0,08	0,25	-	6
		GL4-D400G02R12-PR	G8330	■	■	■				●	+++	02	0,08	0,25	-	12
		GL2-D200G02L06-PR	G8330	■	■	■				●	+++	02	0,05	0,16	6	-
		GL2-D200G02L12-PR	G8330	■	■	■				●	+++	02	0,05	0,16	12	-
		GL3-D300G02L06-PR	G8330	■	■	■				●	+++	02	0,05	0,2	6	-
		GL3-D300G02L12-PR	G8330	■	■	■				●	+++	02	0,05	0,2	12	-
		GL4-D400G02L06-PR	G8330	■	■	■				●	+++	02	0,08	0,25	6	-
		GL4-D400G02L12-PR	G8330	■	■	■				●	+++	02	0,08	0,25	12	-
		GL4-D400G02L12-PR	G8330	■	■	■				●	+++	02	0,08	0,25	12	-

CODE DESIGNATION – PARTING OFF AND GROOVING HOLDERS (EXTERNAL TURNING)

1	2		3	4	5	6	7		8		9	10	11
GL	3	-	S	2525	M	F	L	-	20	-	R	120	090



1	2	3	4											
Tool group	Pocket size	Shank type	Shank dimensions											
GL	1, 2, 3, 4, 5, 6													
		<table><tr><td>A</td><td>steel shank with internal coolant</td></tr><tr><td>S</td><td>steel shank without internal coolant</td></tr></table>	A	steel shank with internal coolant	S	steel shank without internal coolant	<table><tr><td></td><td>H/B [mm]/ [mm]</td></tr><tr><td>1616</td><td>- 16/16</td></tr><tr><td>2020</td><td>- 20/20</td></tr><tr><td>2525</td><td>- 25/25</td></tr></table>		H/B [mm]/ [mm]	1616	- 16/16	2020	- 20/20	2525
A	steel shank with internal coolant													
S	steel shank without internal coolant													
	H/B [mm]/ [mm]													
1616	- 16/16													
2020	- 20/20													
2525	- 25/25													

5	6	7	8														
Holder total length - LF	Tool style - cutting edge angle	Version (right/left)	Cutting depth maximum - CDX														
 <table><thead><tr><th></th><th>LF [mm]</th></tr></thead><tbody><tr><td>K</td><td>125</td></tr><tr><td>M</td><td>150</td></tr><tr><td>P</td><td>170</td></tr></tbody></table>		LF [mm]	K	125	M	150	P	170	 <table><thead><tr><th></th><th>[°]</th></tr></thead><tbody><tr><td>G</td><td>0</td></tr><tr><td>F</td><td>90</td></tr></tbody></table>		[°]	G	0	F	90	 R L	
	LF [mm]																
K	125																
M	150																
P	170																
	[°]																
G	0																
F	90																

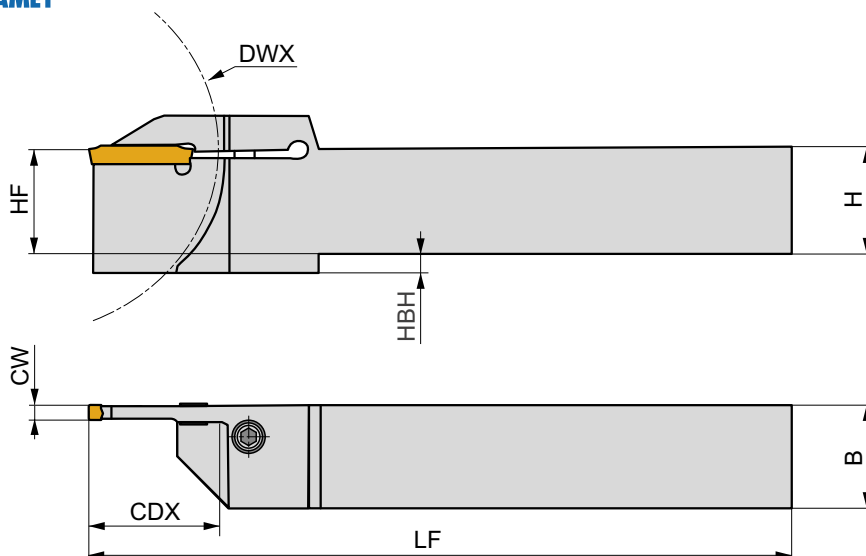
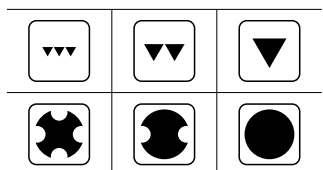
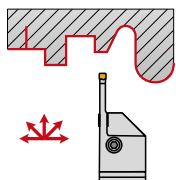
9	10	11
Blade curvature direction	Maximum diameter	Minimum diameter
 Additional information for axial turning.		

GLSF(RL) EXT

P M K N S H

G

PRAMET



	HF	H	B	LF	CW	CDX	HBH	DWX	kg		
	[mm]	[mm]	[mm]	[mm]	[mm]	[mm]	[mm]	[mm]			
GL2-S1616KFR/L-16-45	16	16	16	125	2	16	3	45	0,23	GI334	GL12
GL2-S2020KFR/L-20-80	20	20	20	125	2	20	-	80	0,39	GI334	GL11
GL2-S2525MFR/L-20-80	25	25	25	150	2	20	-	80	0,68	GI334	GL11
GL3-S1616KFR/L-16-45	16	16	16	125	3	16	3	45	0,23	GI335	GL12
GL3-S2020KFR/L-20-80	20	20	20	125	3	20	-	80	0,39	GI335	GL11
GL3-S2525MFR/L-20-80	25	25	25	150	3	20	-	80	0,68	GI335	GL11
GL3-S2525PFR/L-32-80	25	25	25	170	3	32	5	80	0,72	GI335	GL11
GL4-S2020KFR/L-20-80	20	20	20	125	4	20	-	80	0,39	GI336	GL11
GL4-S2525MFR/L-20-80	25	25	25	150	4	20	-	80	0,68	GI336	GL11
GL4-S2525PFR/L-32-80	25	25	25	170	4	32	5	80	0,72	GI336	GL11
GL5-S2020KFR/L-20-80	20	20	20	125	5	20	-	80	0,39	GI337	GL11
GL5-S2525MFR/L-20-80	25	25	25	150	5	20	-	80	0,68	GI337	GL11
GL6-S2020KFR/L-20-80	20	20	20	125	6	20	-	80	0,39	GI338	GL11
GL6-S2525MFR/L-20-80	25	25	25	150	6	20	-	80	0,68	GI338	GL11

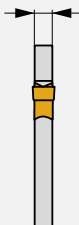
GI334	GL2..
GI335	GL3..
GI336	GL4..
GI337	GL5..
GI338	GL6..

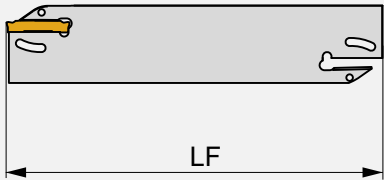
GL11	US 5018-T20P	5,0	M5	18,2	-	LK T20P	-
GL12	HS 0516	5,0	M5	-	16	-	HXX4

CODE DESIGNATION – PARTING OFF AND GROOVING BLADES (EXTERNAL TURNING)

1	2		3	4	5	6
GL	3	-	S	32	M	B



1	2	3				
Tool group	Pocket size	Shank type				
GL	1, 2, 3, 4, 5, 6 	<table><tr><td>A</td><td>steel shank with internal coolant</td></tr><tr><td>S</td><td>steel shank without internal coolant</td></tr></table>	A	steel shank with internal coolant	S	steel shank without internal coolant
A	steel shank with internal coolant					
S	steel shank without internal coolant					

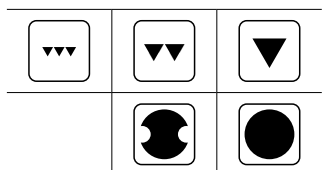
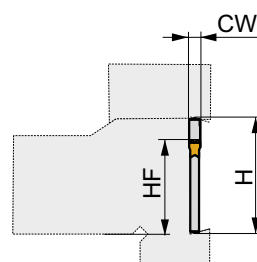
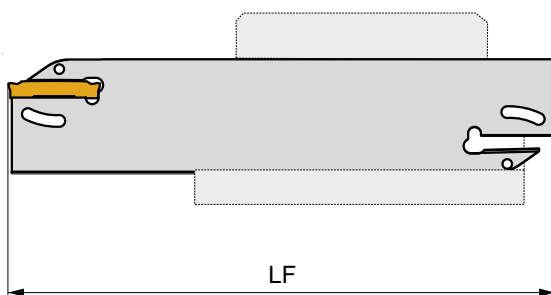
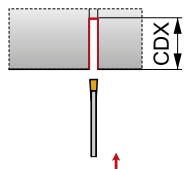
4	5	6															
Shank dimensions	Blade total length - LF	Tool style															
 <table><tr><td></td><td>H [mm]</td></tr><tr><td>26</td><td>26</td></tr><tr><td>32</td><td>32</td></tr></table>		H [mm]	26	26	32	32	 <table><tr><td></td><td>LF [mm]</td><td>LF [in]</td></tr><tr><td>K</td><td>125</td><td>5.000</td></tr><tr><td>M</td><td>150</td><td>6.000</td></tr></table>		LF [mm]	LF [in]	K	125	5.000	M	150	6.000	B - blade
	H [mm]																
26	26																
32	32																
	LF [mm]	LF [in]															
K	125	5.000															
M	150	6.000															

GLS B

P M K N S H

PRAMET

X



	HF	H	LF	CW	CDX	kg		
	[mm]	[mm]	[mm]	[mm]	[mm]			
GL2-S26KB	20	26	125	2	35	0,14	GI334	KV2
GL2-S32MB	25	32	150	2	50	0,16	GI334	KV2
GL3-S26KB	20	26	125	3	35	0,14	GI335	KV2
GL3-S32MB	25	32	150	3	50	0,16	GI335	KV2
GL4-S32MB	25	32	150	4	50	0,16	GI336	KV2
GL5-S32MB	25	32	150	5	60	0,16	GI337	KV2
GL6-S32MB	25	32	150	6	60	0,16	GI338	KV2

GI334								
GI335								
GI336								
GI337								
GI338								

KV2								

CUTTING DEPTHS DEPENDING ON MACHINED DIAMETER

