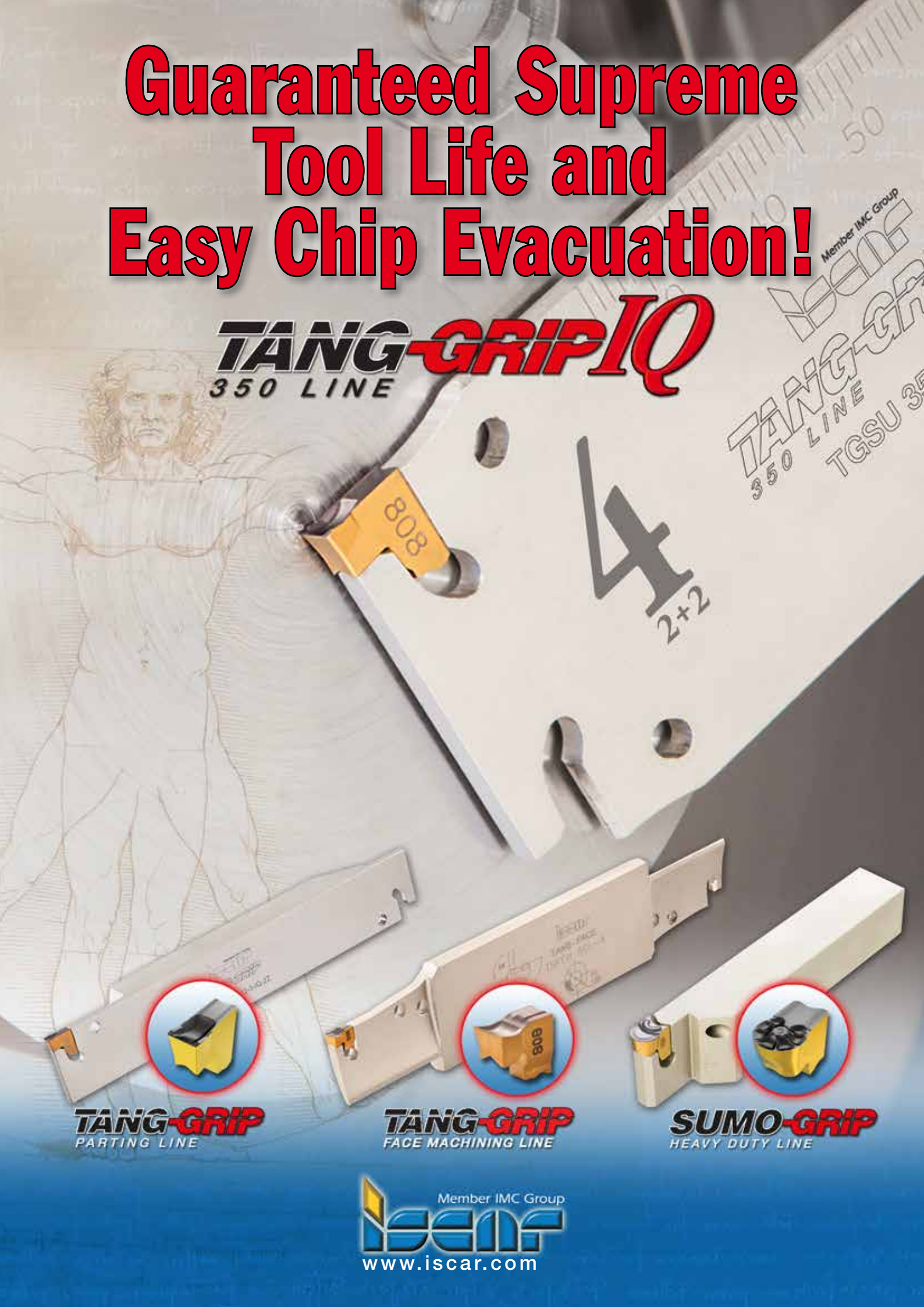
Guaranteed Supreme Tool Life and Easy Chip Evacuation!

TANG-GRIP IQ
350 LINE



TANG-GRIP
PARTING LINE

TANG-GRIP
FACE MACHINING LINE

SUMO-GRIP
HEAVY DUTY LINE

Member IMC Group
ISCAR
www.iscar.com

Engineered for MAXIMUM PARTING Performance

TANG-GRIP IQ
350 LINE

NEW 2+2 Free=4

Flat Top TANG-GRIP IQ Tools Engineered for Easy Chip Flow

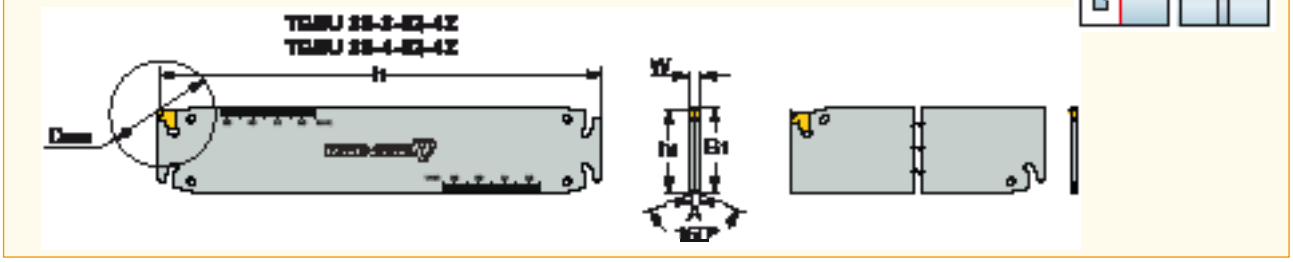
Featuring Longer Tool Life!

- Offers a free, unobstructed chip flow, since there is no upper jaw as in the other clamping systems (very important in deep grooving applications)
- **TANG-GRIP IQ** - single-ended parting insert with an unbeatable clamping method

IMPROVED BLADE GEOMETRY FEATURING LONGER TOOL LIFE AND HIGHER PRODUCTIVITY

TGSU

Flat Top Blades with Tangentially Oriented Pocket for Parting and Grooving, for TANG-GRIP Single-Ended Inserts



	Designation	B_1	W min	W max	A	l_1	h_1	D max	Insert
	TGSU 35-1.4-IQ	35.0	1.40	1.40	2.50 (2)	180.00	33.2	35.0	TAG 1.4
	TGSU 35-2-IQ	35.0	1.80	2.40	2.50 (3)	160.00	33.2	59.5	TAG 2
NEW	TGSU 35-3-IQ-4	35.0	2.80	3.50	2.50	180.00	33.2	120.0	TAG 3
NEW	TGSU 35-4-IQ-4	35.0	3.70	4.50	3.40	180.00	33.2	120.0	TAG 4
	TGSU 35-5-IQ	35.0	4.70	5.50	4.00	180.00	33.2	144.0	TAG 5
	TGSU 35-6-IQ	35.0	5.70	6.50	5.20	180.00	33.2	144.0	TAG 6
	TGSU 35-7-IQ	35.0	6.80	7.50	6.00	180.00	33.2	144.0	TAG 7
	TGSU 35C-8-IQ (1)	35.0	7.70	8.50	7.20	180.00	33.2	144.0	TAG 8
	TGSU 35C-9-IQ (1)	35.0	8.70	10.00	8.20	180.00	33.2	144.0	TAG 9
	TGSU 56C-7-IQ (1)	56.0	6.80	7.50	6.00	260.00	53.6	220.0	TAG 7
	TGSU 56C-8-IQ (1)	56.0	7.70	8.50	7.20	260.00	53.6	220.0	TAG 8
	TGSU 56C-9-IQ (1)	56.0	8.70	10.00	8.20	260.00	53.6	220.0	TAG 9

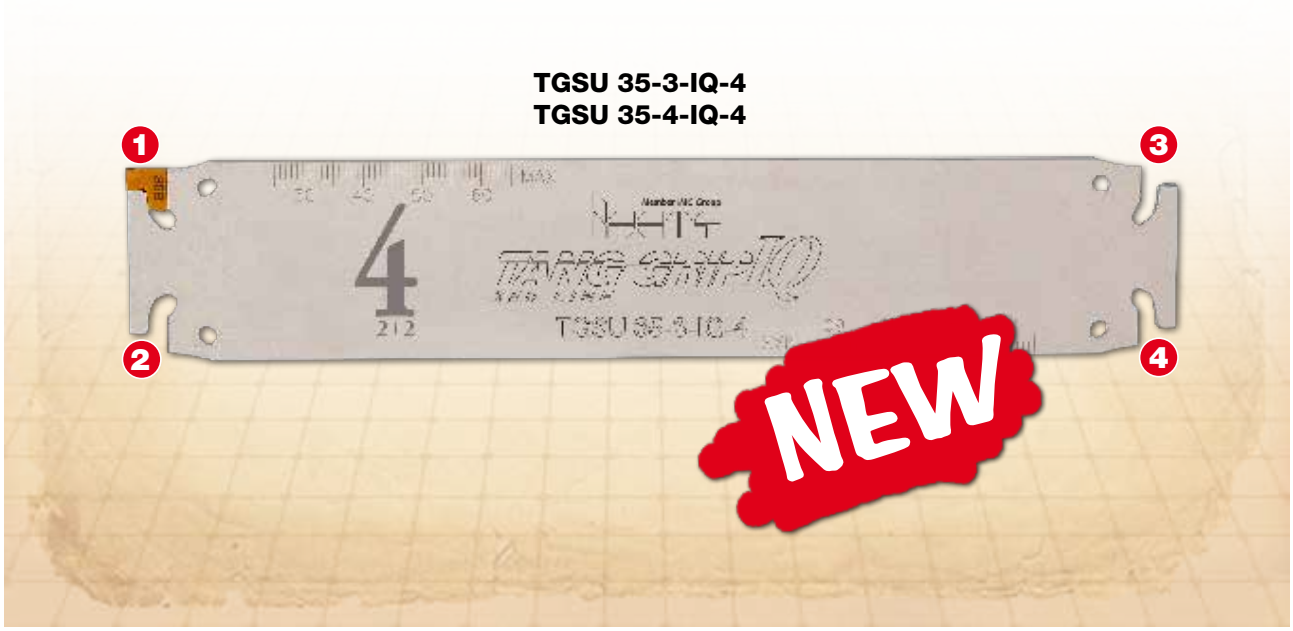
(1) C- Internal coolant, use with TGTBU HD blocks only. Cooling tube SGCU 341 should be ordered separately. (2) Thickness at the D.O.C. area is 1.05 mm (3) Thickness at the D.O.C. area is 1.65 mm

Spare Parts

Designation	Extractor	Cooling Tube
TGSU 35-1.4-IQ	ETG 1.4/1.6*	
TGSU 35-2-IQ	ETG 2*	
TGSU 35-3-IQ-4Z	ETG 3-4-SH*	
TGSU 35-4-IQ-4Z	ETG 3-4-SH*	
TGSU 35-5-IQ	ETG 5-7*	
TGSU 35-6-IQ	ETG 5-7*	
TGSU 35-7-IQ	ETG 5-7*	
TGSU 35C-8-IQ	ETG 8-12*	SGCU 341*
TGSU 35C-9-IQ	ETG 8-12*	SGCU 341*
TGSU 56C-7-IQ	ETG 5-7*	SGCU 341*
TGSU 56C-8-IQ	ETG 8-12*	SGCU 341*
TGSU 56C-9-IQ	ETG 8-12*	SGCU 341*

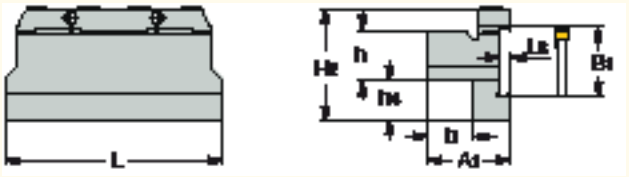
* Optional, should be ordered separately

TGSU 35-3-IQ-4
TGSU 35-4-IQ-4



TGTBU

Blocks for TGSU Parting and Grooving Blades



Choose blade by B1 dimension

Designation	h	b	B_1	L_3	A_1	H_2	h_4	L
TGTBU 20-35	20.0	19.0	35.0	6.00	38.00	56.0	23.7	110.00
TGTBU 25-35	25.0	23.0	35.0	6.00	42.00	56.0	18.7	110.00
TGTBU 32-35	32.0	29.0	35.0	6.00	48.00	56.0	11.7	110.00
TGTBU 32-35 HD (1)	32.0	30.0	35.0	8.00	55.00	64.0	18.0	130.00
TGTBU 40-35	40.0	41.0	35.0	6.00	60.00	56.0	3.7	110.00
TGTBU 40-35 HD (1)	40.0	41.0	35.0	8.00	66.00	64.0	10.0	130.00
TGTBU 40-56 HD (1)	40.0	41.0	56.0	8.00	66.00	72.0	28.0	130.00

(1) HD - Recommended blocks for TGSU...-8, TGSU...-9 blades

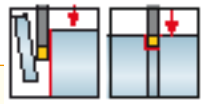
Spare Parts

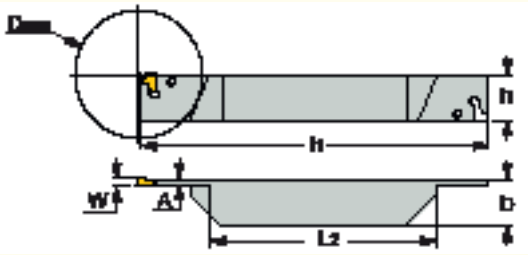
Designation	Top Clamp	Screw	Key
TGTBU 20-35	BKU 110	SR M6X30DIN912 12.9	HW 5.0
TGTBU 25-35	BKU 110	SR M6X30DIN912 12.9	HW 5.0
TGTBU 32-35	BKU 110	SR M6X30DIN912 12.9	HW 5.0
TGTBU 32-35 HD	BK 509	SR M8X30DIN912 12.9	HW 6.0
TGTBU 40-35	BKU 110	SR M6X30DIN912 12.9	HW 5.0
TGTBU 40-35 HD	BK 509	SR M8X30DIN912 12.9	HW 6.0
TGTBU 40-56 HD	BK 509	SR M8X30DIN912 12.9	HW 6.0

TGTR/L-IQ-2Z

Integral Shank, TANG-GRIP Parting and Grooving Toolholders

with 2 Pockets





Left-hand shown

Designation	W min	W max	D max	h	b	A	l_1	L_2
TGTR/L 2020-3-IQ-2Z	2.80	3.50	54.0	20.0	20.0	2.50	150.00	98.00
TGTR/L 2525-3-IQ-2Z	2.80	3.50	56.0	25.0	25.0	2.50	150.00	98.00
TGTR/L 2020-4-IQ-2Z	3.70	4.50	57.0	20.0	20.0	3.40	150.00	95.00
TGTR/L 2525-4-IQ-2Z	3.70	4.50	65.0	25.0	25.0	3.40	150.00	88.00

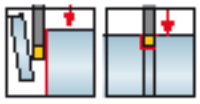
Spare Parts

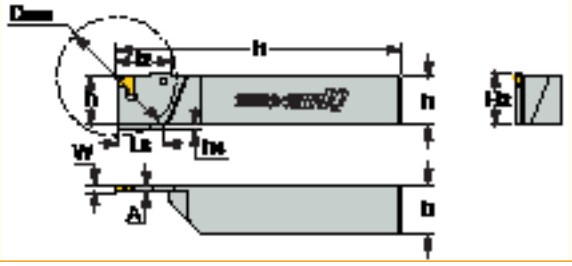
Designation	Extractor
TGTR/L-IQ-2Z	ETG 3-4-SH*

* Optional, should be ordered separately

TGTR/L-IQ

Integral Shank, TANG-GRIP Parting and Grooving Toolholder





Left-hand shown

Designation	W min	W max	h	b	A	l_1	H_2	l_2	L_3	h_4	D max	Insert
TGTR/L 1010-1.4-IQ	1.40	1.45	10.0	10.0	1.05	140.00	15.0	-	15.50	5.0	20.0	TAG 1.4
TGTR/L 1212-1.4-IQ	1.40	1.45	12.0	12.0	1.05	140.00	12.0	-	16.00	3.0	30.0	TAG 1.4
TGTR/L 1616-1.4-IQ	1.40	1.45	16.0	16.0	1.05	140.00	16.0	-	-	-	30.0	TAG 1.4
TGTR/L 2020-1.4-IQ	1.40	1.45	20.0	20.0	1.05	140.00	20.0	-	-	-	30.0	TAG 1.4
TGTR/L 1010-1.6-IQ	1.60	1.64	10.0	10.0	1.30	120.00	-	-	16.00	5.0	28.0	TAG 1.6
TGTR/L 1212-1.6-IQ	1.60	1.64	12.0	12.0	1.30	120.00	-	-	16.00	3.0	32.0	TAG 1.6
TGTR/L 1616-1.6-IQ	1.60	1.64	16.0	16.0	1.30	120.00	-	-	-	-	35.0	TAG 1.6
TGTR/L 1010-2-IQ	1.80	2.40	10.0	10.0	1.65	150.00	15.0	-	15.50	5.0	28.0	TAG 2
TGTR/L 1212-2-IQ	1.80	2.40	12.0	12.0	1.65	150.00	15.0	-	17.00	3.0	32.0	TAG 2
TGTR/L 1612-2-L120-IQ	1.80	2.50	16.0	12.0	1.65	120.00	16.0	-	-	-	35.0	TAG 2
TGTR/L 1616-2-IQ	1.80	2.40	16.0	16.0	1.65	150.00	16.0	-	-	-	35.0	TAG 2
TGTR/L 2012-2-IQ	1.80	2.40	20.0	12.0	1.65	125.00	20.0	-	-	-	35.0	TAG 2
TGTR/L 1212-3-IQ	2.80	3.50	12.0	12.0	2.50	150.00	19.0	-	19.00	7.0	32.0	TAG 3
TGTR/L 1612-3-L120-IQ	2.80	3.50	16.0	12.0	2.50	120.00	19.0	-	19.00	3.0	35.0	TAG 3
TGTR/L 1616-3-IQ	2.80	3.50	16.0	16.0	2.50	150.00	19.0	-	19.00	3.0	35.0	TAG 3
TGTR/L 2012-3-IQ	2.80	3.50	20.0	12.0	2.50	125.00	20.0	-	-	-	43.0	TAG 3
TGTR/L 2020-3-IQ	2.80	3.50	20.0	20.0	2.50	120.50	21.7	23.4	-	-	54.0	TAG 3
TGTR/L 2525-3-IQ	2.80	3.50	25.0	25.0	2.50	150.50	26.7	23.4	-	-	56.0	TAG 3
TGTR 2525K-3 (1)	2.80	3.50	25.0	25.0	2.50	150.00	26.7	23.4	-	-	56.0	TAG 3
TGTR/L 2020-4-IQ	3.70	4.50	20.0	20.0	3.40	120.50	21.7	23.4	-	-	57.0	TAG 4
TGTR/L 2525-4-IQ	3.70	4.50	25.0	25.0	3.40	150.50	26.7	23.4	-	-	65.0	TAG 4
TGTR/L 2020-5-IQ	4.70	5.50	20.0	20.0	4.00	120.00	21.7	-	-	-	57.0	TAG 5
TGTR/L 2525-5-IQ	4.70	5.50	25.0	25.0	4.00	150.00	25.0	-	-	-	76.0	TAG 5
TGTR/L 2525-6-IQ	5.70	6.50	25.0	25.0	5.20	150.00	25.0	-	-	-	76.0	TAG 6

(1) With coolant

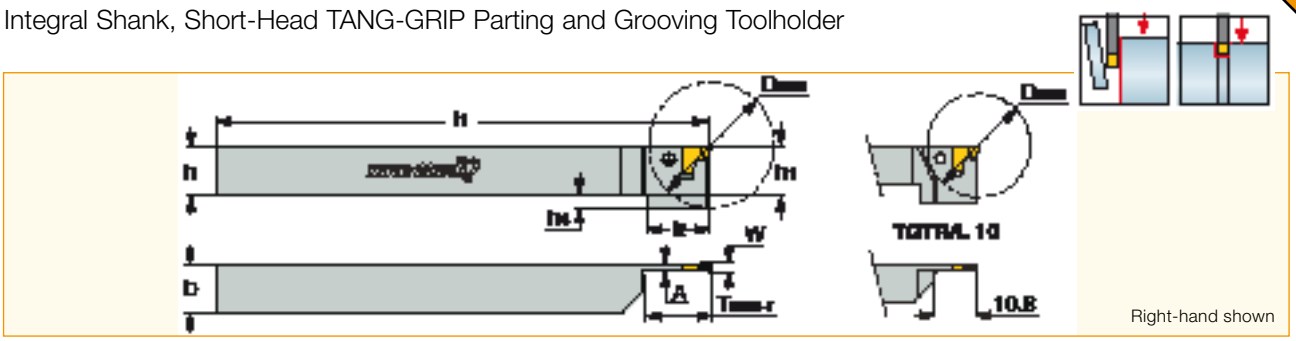
Spare Parts

Designation	Extractor
TGTR/L 1010-1.4-IQ	ETG 1.4/1.6*
TGTR/L 1212-1.4-IQ	ETG 1.4/1.6*
TGTR/L 1616-1.4-IQ	ETG 1.4/1.6*
TGTR/L 2020-1.4-IQ	ETG 1.4/1.6*
TGTR/L 1010-1.6-IQ	ETG 1.4/1.6*
TGTR/L 1212-1.6-IQ	ETG 1.4/1.6*
TGTR/L 1616-1.6-IQ	ETG 1.4/1.6*
TGTR/L 1010-2-IQ	ETG 2*
TGTR/L 1212-2-IQ	ETG 2*
TGTR/L 1612-2-L120-IQ	ETG 2*
TGTR/L 1616-2-IQ	ETG 2*
TGTR/L 2012-2-IQ	ETG 2*
TGTR/L 1212-3-IQ	ETG 3-4-SH*
TGTR/L 1612-3-L120-IQ	ETG 3-4-SH*
TGTR/L 1616-3-IQ	ETG 3-4-SH*
TGTR/L 2012-3-IQ	ETG 3-4-SH*
TGTR/L 2020-3-IQ	ETG 3-4*
TGTR/L 2525-3-IQ	ETG 3-4*
TGTR 2525K-3	ETG 3-4*
TGTR/L 2020-4-IQ	ETG 3-4*
TGTR/L 2525-4-IQ	ETG 3-4*
TGTR/L 2020-5-IQ	ETG 5-7*
TGTR/L 2525-5-IQ	ETG 5-7*
TGTR/L 2525-6-IQ	ETG 5-7*

* Optional, should be ordered separately

TGTR/L-2T..SH-L120

Integral Shank, Short-Head TANG-GRIP Parting and Grooving Toolholder



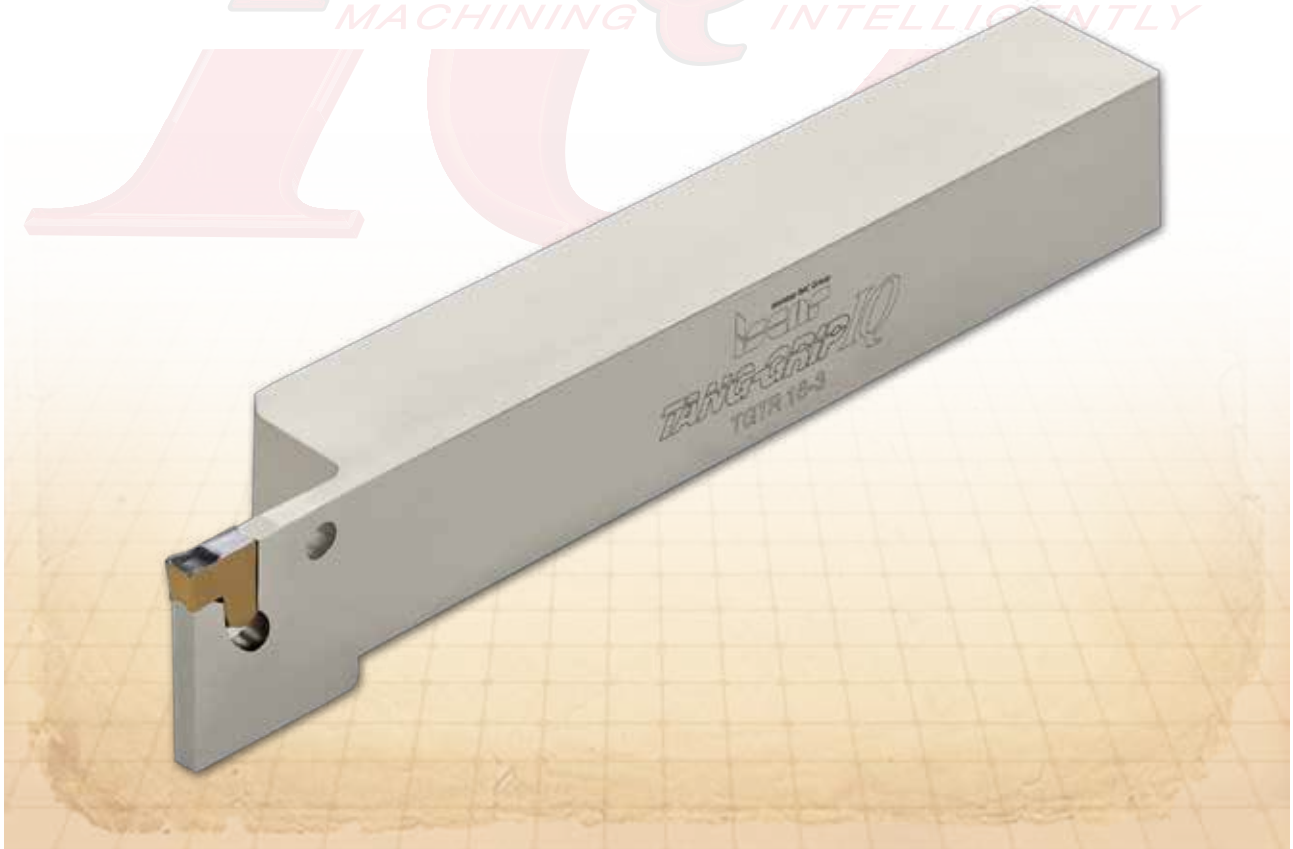
Designation	W	W min	W max	h	h_1	b	A	l_1	l_2	h_4	T_{max-r}	D_{max} (1)
TGTR/L 1010-2T10SH-L120-IQ	2.00	1.80	2.50	10.0	10.1	10.0	1.65	120.00	15.0	5.0	10.00	26.0
TGTR/L 1212-2T15SH-L120-IQ	2.00	1.80	2.50	12.0	12.1	12.0	1.65	120.00	15.0	3.0	15.00	30.0
TGTR/L 1616-2T18SH-L120-IQ	2.00	1.80	2.50	16.0	16.1	16.0	1.65	120.00	-	-	18.00	36.0

(1) For parting

Spare Parts

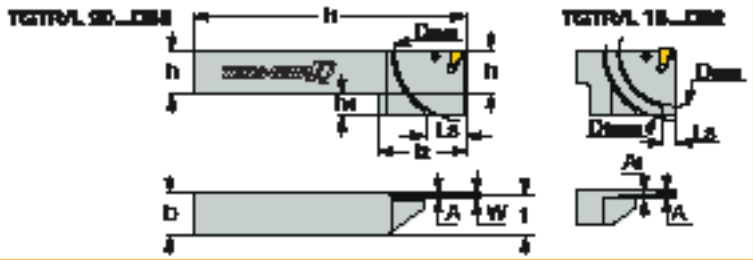
Designation	Extractor
TGTR/L-2T..SH-L120	ETG 2-SH-T*

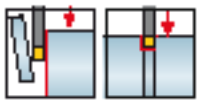
* Optional, should be ordered separately



TGTR/L-D

Integral Shank TANG-GRIP Parting and Grooving Toolholders with Reinforced Blades, Mainly for Sub-Spindle Machines



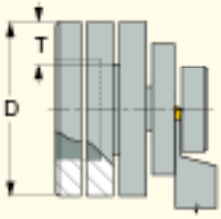


Right-hand shown

Designation	W	W min	W max	h	b	A	A1	l1	l2	f	h4	D max	D1 max	L3
TGTR/L 1616-2-D52-IQ	2.00	1.80	2.40	16.0	16.0	1.65	3.50	125.00	40.0	15.2	14.0	52.0	65.0	6.00
TGTR/L 2020-2-D65-IQ	2.00	1.80	2.40	20.0	20.0	1.65	-	125.00	40.0	19.2	10.0	65.0	-	18.00
TGTR/L 1616-3-D52-IQ	3.00	2.80	3.50	16.0	16.0	2.50	3.50	125.00	40.0	14.8	14.0	52.0	65.0	6.00
TGTR/L 2020-3-D65-IQ	3.00	2.80	3.50	20.0	20.0	2.50	-	125.00	40.0	18.8	10.0	65.0	-	18.00

Depth Capacity DGTR/L-D

Table determining depth of cut as function of workpiece diameter



Designation	T_{max}								
TGTR/L 1616-2-D52-IQ	26	19	16	15	13	11	10	9	8
TGTR/L 2020-2-D65-IQ		32.5	31	29	26	24	23	22	20
TGTR/L 1616-3-D52-IQ	26	20	17	15	13	11	10	9	8
TGTR/L 2020-3-D65-IQ		32.5	31	29	26	24	23	22	20
D →	52	65	70	80	100	120	150	200	300

Spare Parts

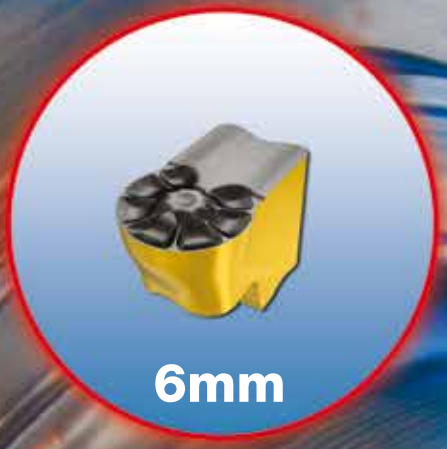
Designation	Extractor
TGTR/L 1616-2-D52-IQ	ETG 2*
TGTR/L 2020-2-D65-IQ	ETG 2*
TGTR/L 1616-3-D52-IQ	ETG 3-4-SH*
TGTR/L 2020-3-D65-IQ	ETG 3-4-SH*

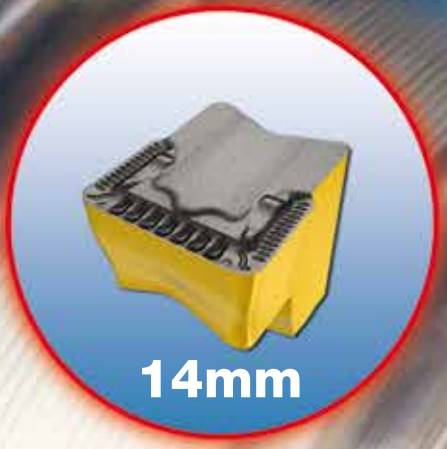
* Optional, should be ordered separately


808
4
2+2
NEW
2+2 Free=4

SUMO-GRIP
HEAVY DUTY LINE

Engineered for **Maximum** Groove Turning Performance





Heavy Duty Groove-Turn Applications

Single-ended inserts for heavy grooving, turning and parting applications, with the tangentially oriented clamping design for extra rigidity required for heavy grooving and turning conditions.

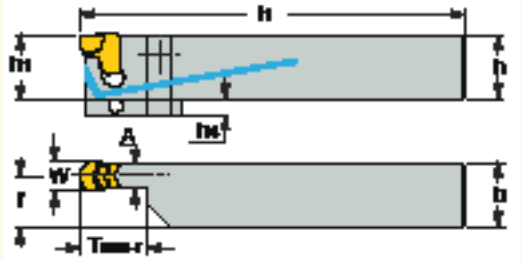
SUMO-GRIP System Features

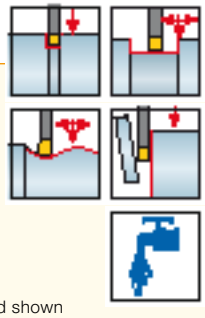
- Tangentially oriented pocket, providing a very rigid and secure clamping.
- Enables machining at very high feed rates (up to 1.0 mm/Rev).
- Recommended for machining large diameter parts and for heavy interrupted cuts.
- Offers a free, unobstructed chip flow, since there is no upper jaw as in the other clamping systems.
- The combination of tangential clamping and free chip flow results in improved insert and tool life and higher feed rates, which significantly increases productivity.
- Internal cooling system is directed to the frontal cutting edge, increasing the tool life in deep grooving applications.

Heavy Duty GROOVE TURN Applications

TGBHR/L

Toolholders for Heavy Duty Groove-Turn and Parting Applications





Left-hand shown

Designation	W	h	h_1	b	A	l_1	T_{max-r}	f	h_4
TGBHR/L 20C-6	6.00	20.0	20.0	20.0	5.20	135.00	12.00 (1)	17.4	5.0
TGBHR/L 25C-6	6.00	25.0	25.0	25.0	5.20	135.00	12.00 (1)	22.4	-
TGBHR/L 25C-8	8.00	25.0	25.0	25.0	7.00	150.00	25.00	21.5	12.0
TGBHR/L 32C-8	8.00	32.0	32.0	32.0	7.00	170.00	30.00	28.5	5.0
TGBHR/L 25C-10	10.00	25.0	25.0	25.0	8.00	150.00	25.00	21.0	12.0
TGBHR/L 32C-10	10.00	32.0	32.0	32.0	8.00	170.00	30.00	28.0	5.0
TGBHR/L 25C-12	12.00	25.0	25.0	25.0	10.00	150.00	25.00	20.0	12.0
TGBHR/L 32C-12	12.00	32.0	32.0	32.0	10.00	170.00	30.00	27.0	5.0
TGBHR/L 25C-14T20	14.00	25.0	25.0	25.0	12.00	140.00	20.00	19.0	12.0
TGBHR/L 32C-14T40	14.00	32.0	32.0	32.0	12.00	170.00	40.00	26.0	5.0
TGBHR/L 40C-14T40	14.00	40.0	40.0	40.0	12.00	170.00	40.00	34.0	-

The tools for the 14 mm inserts feature a 1/8" port thread for standard tube fittings.

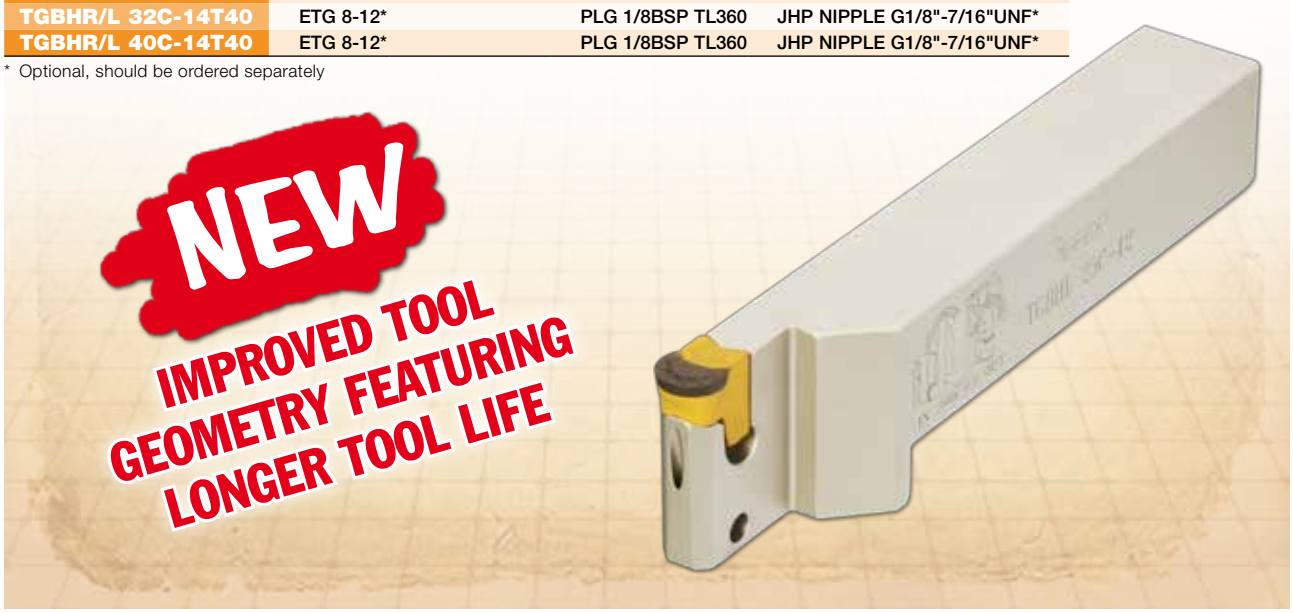
(1) See table below

TGBHR/L..C-6									
Tmax	28	26	24	22	20	18	16	14	12
Dmax	35	55	75	100	120	150	200	350	-

Spare Parts

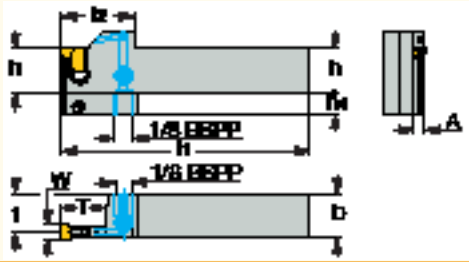
Designation	Extractor	Cooling Tube	Plug	Pipe Fitting
TGBHR/L 20C-6	ETG 5-7*	SGCU 341*		
TGBHR/L 25C-6	ETG 5-7*	SGCU 341*		
TGBHR/L 25C-8	ETG 8-12*	SGCU 341*		
TGBHR/L 32C-8	ETG 8-12*	SGCU 341*		
TGBHR/L 25C-10	ETG 8-12*	SGCU 341*		
TGBHR/L 32C-10	ETG 8-12*	SGCU 341*		
TGBHR/L 25C-12	ETG 8-12*	SGCU 341*		
TGBHR/L 32C-12	ETG 8-12*	SGCU 341*		
TGBHR/L 25C-14T20	ETG 8-12*		PLG 1/8BSP TL360	JHP NIPPLE G1/8"-7/16"UNF*
TGBHR/L 32C-14T40	ETG 8-12*		PLG 1/8BSP TL360	JHP NIPPLE G1/8"-7/16"UNF*
TGBHR/L 40C-14T40	ETG 8-12*		PLG 1/8BSP TL360	JHP NIPPLE G1/8"-7/16"UNF*

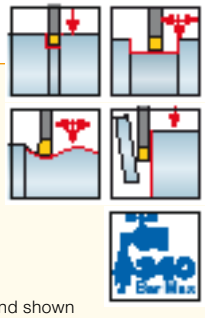
* Optional, should be ordered separately



TGBHR/L-JHP

Grooving and Turning SUMO-GRIP Tools with Channels for High Pressure Coolant





Right-hand shown

Designation	h	W	b	l_2	A	l_1	T_{max-r}	f	h_4
TGBHR/L 25-8-JHP	25.0	8.00	25.0	42.0	7.00	150.00	25.00	21.5	12.0
TGBHR/L 32-8-JHP	32.0	8.00	32.0	42.0	7.00	170.00	25.00	28.5	12.0

Flow Rate vs. Pressure

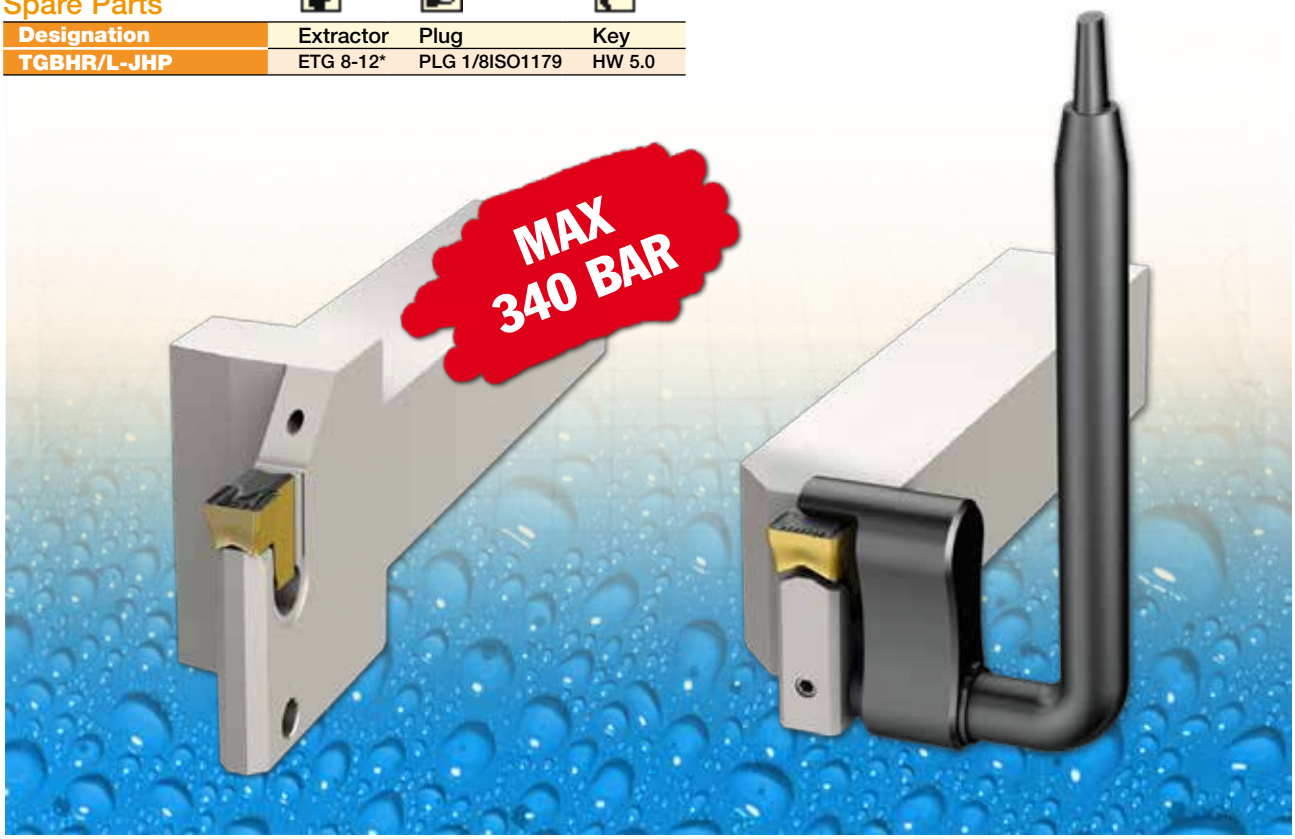
Designation	70 Bar Flow Rate (liters/min)	100 Bar Flow Rate (liters/min)	140 Bar Flow Rate (liters/min)
TGBHR/L 25-8-JHP	13-16	19-21	22-24
TGBHR/L 32-8-JHP	13-16	19-21	22-24

ETG 8-12 Extractor for 8 to 12.7 mm Inserts

* Optional, should be ordered separately

Spare Parts

Designation	Extractor	Plug	Key
TGBHR/L-JHP	ETG 8-12*	PLG 1/8ISO1179	HW 5.0



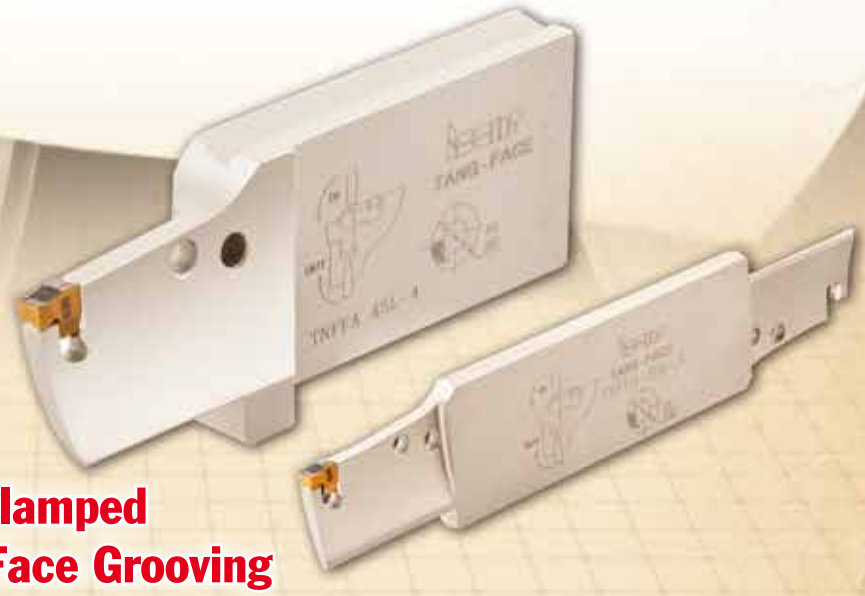

Engineered for
MAXIMUM
GROOVE TURNING
Performance

Engineered for MAXIMUM FACE GROOVING Performance

TANG-GRIP
FACE MACHINING LINE

NEW

SECURE CLAMPING FOR HIGH PRODUCTIVITY FACE MACHINING



TANG-GRIP Tangentially Clamped Single-Ended Inserts for Face Grooving

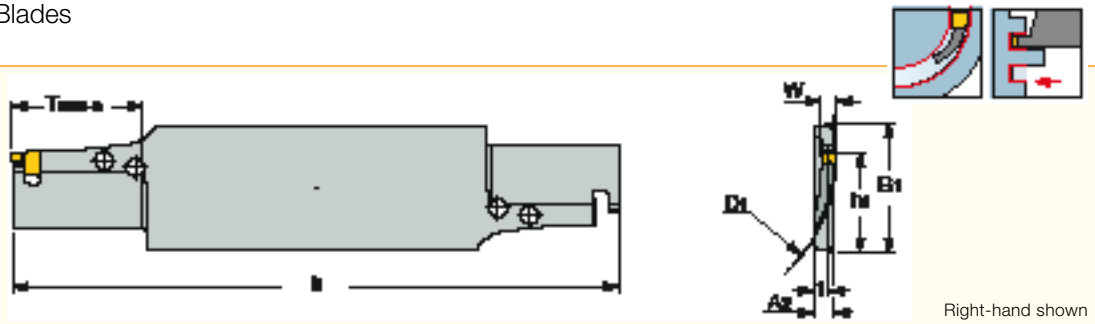
System Features

- Very rigid clamping in a tangentially oriented pocket
- Designed for face grooving in 25 to 500 mm diameter range penetration
- Enables machining at very high feed rates and interrupted cuts, providing excellent surface finish
- Offers a free, unobstructed chip flow, since there is no upper jaw as in the other clamping systems (very important in deep grooving applications)
- The combination of tangential clamping and free chip flow results in very high reliability, improved tool and pocket life
- Provides a solution to the problem of inserts being pulled out during retraction
- The same insert can be used for both right- and left-hand tools
- The combination of the C, M & P-type chipformer and the **SUMO TEC** grade IC808 provides excellent performance on a wide range of materials and cutting conditions
- The new tools are equipped with a user-friendly clamping and extraction device

TANG-GRIP FACE MACHINING LINE includes single and double-ended blades and adapters in 3 and 4 mm widths in the most advanced IC808 **SUMO TEC** grade. The blades are in a standard size, which fit ISCAR's standard blocks.

TNFFH-IQ

Face Grooving Blades



Right-hand shown

Designation	W	$D_{1\ min}$ (1)	$D_{1\ max}$ (2)	T_{max-a}	h_1	B_1	f	A_2	l_1
TNFFH 65R/L-3IQ	3.00	65.0	90.0	18.00	24.8	32.0	4.1	5.2	150.00
TNFFH 90R/L-3IQ	3.00	90.0	120.0	18.00	24.8	32.0	4.1	5.2	150.00
TNFFH 120R/L-3IQ	3.00	120.0	160.0	24.00	24.8	32.0	4.1	5.2	150.00
TNFFH 80R/L-4IQ	4.00	80.0	150.0	32.00	24.8	32.0	3.8	5.2	150.00
TNFFH 150R/L-4IQ	4.00	150.0	500.0	32.00	24.8	32.0	3.8	5.2	150.00
TNFFH 80R/L-5IQ	5.00	80.0	150.0	30.00	24.8	32.0	3.5	5.2	150.00
TNFFH 150R/L-5IQ	5.00	150.0	500.0	35.00	24.8	32.0	3.5	5.2	150.00
TNFFH 80R/L-6IQ	6.00	80.0	150.0	30.00	24.8	32.0	3.3	5.2	150.00
TNFFH 150R/L-6IQ	6.00	150.0	700.0	35.00	24.8	32.0	3.3	5.2	150.00

• B1 dimension links blades and blocks

(1) Minimum penetration diameter (2) Maximum penetration diameter

Spare Parts

Designation	Extractor
TNFFH-IQ	ETF 3-6*

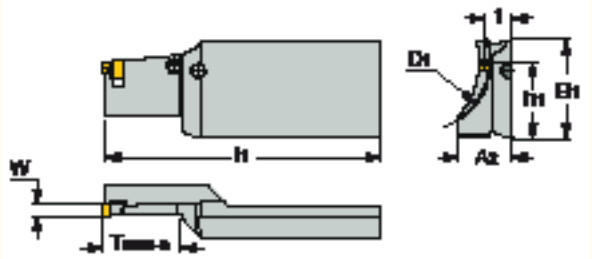
* Optional, should be ordered separately

ETF 3-6 extractor (should be ordered separately).

TANG-GRIP
FACE MACHINING LINE

TNFFA-IQ

Reinforced Face Grooving Blades



Right-hand shown

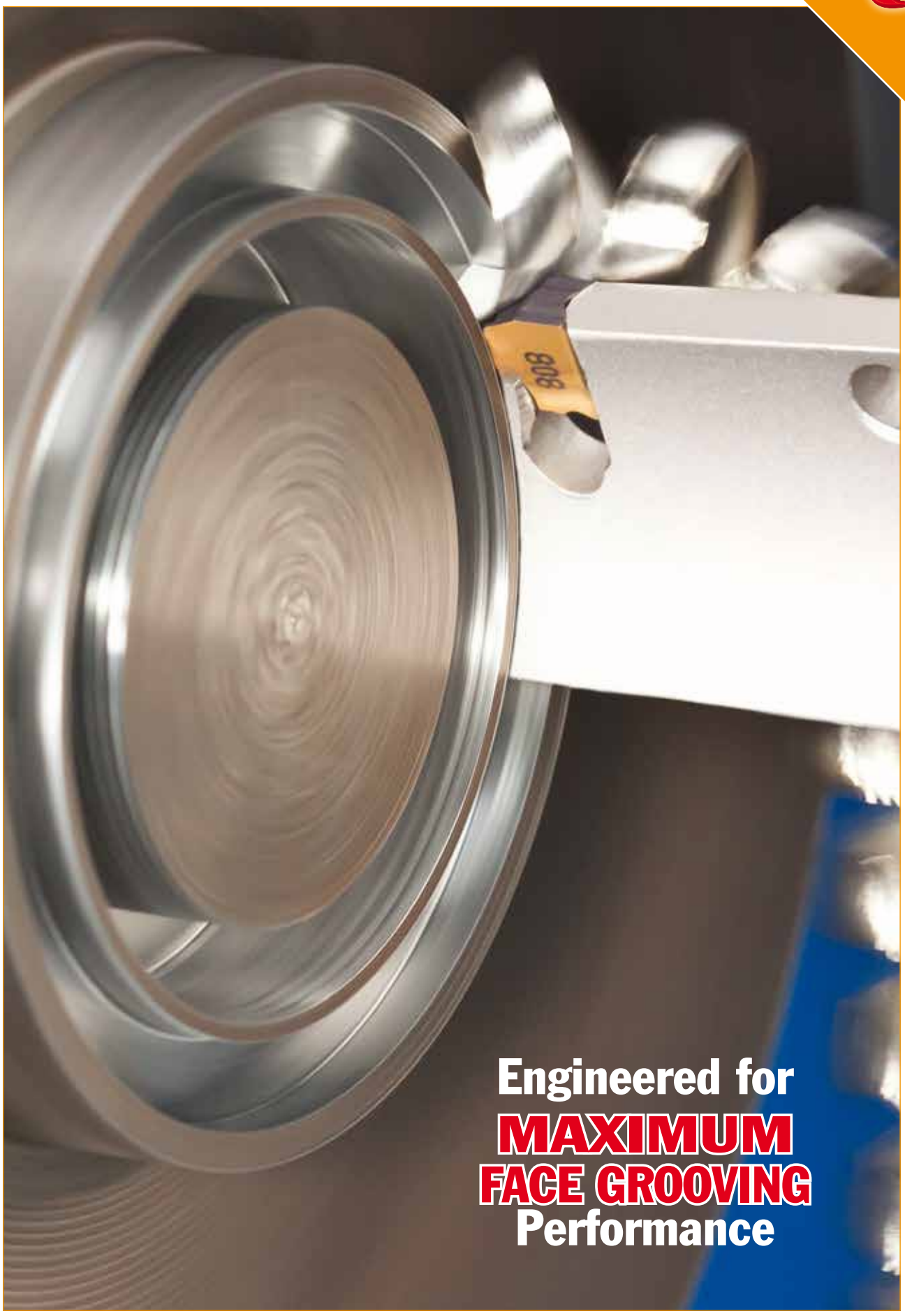
Designation	W	$D_{1\ min}$ (1)	$D_{1\ max}$ (2)	T_{max-a}	B_1	f	h_1	l_1	A_2
TNFFA 30R/L-3IQ	3.00	30.0	35.0	19.00	32.0	9.5	24.8	90.00	18.5
TNFFA 35R/L-3IQ	3.00	35.0	40.0	19.00	32.0	9.5	24.8	90.00	18.5
TNFFA 40R/L-3IQ	3.00	40.0	46.0	23.00	32.0	9.5	24.8	90.00	18.5
TNFFA 46R/L-3IQ	3.00	46.0	54.0	25.00	32.0	9.5	24.8	90.00	18.5
TNFFA 54R/L-3IQ	3.00	54.0	65.0	26.00	32.0	9.5	24.8	90.00	18.5
TNFFA 65R/L-3IQ	3.00	65.0	80.0	27.00	32.0	9.5	24.8	90.00	18.5
TNFFA 80R/L-3IQ	3.00	80.0	100.0	27.00	32.0	9.5	24.8	90.00	16.7
TNFFA 35R/L-4IQ	4.00	35.0	45.0	25.00	32.0	9.0	24.8	90.00	18.1
TNFFA 45R/L-4IQ	4.00	45.0	60.0	25.00	32.0	9.0	24.8	90.00	17.3
TNFFA 60R/L-4IQ	4.00	60.0	80.0	27.00	32.0	9.0	24.8	90.00	18.0
TNFFA 80R/L-4IQ	4.00	80.0	130.0	27.00	32.0	9.0	24.8	90.00	14.8
TNFFA 40R/L-5IQ	5.00	45.0	50.0	25.00	32.0	9.7	24.8	90.00	18.0
TNFFA 50R/L-5IQ	5.00	60.0	70.0	28.00	32.0	9.7	24.8	90.00	18.0
TNFFA 70R/L-5IQ	5.00	80.0	100.0	30.00	32.0	9.7	24.8	90.00	18.0
TNFFA 100R/L-5IQ	5.00	100.0	180.0	35.00	32.0	9.7	24.8	90.00	18.0
TNFFA 45R/L-6IQ	6.00	45.0	60.0	25.00	32.0	10.2	24.8	90.00	18.0
TNFFA 60R/L-6IQ	6.00	60.0	80.0	28.00	32.0	10.2	24.8	90.00	18.0
TNFFA 80R/L-6IQ	6.00	75.0	110.0	30.00	32.0	10.2	24.8	90.00	18.0
TNFFA 110R/L-6IQ	6.00	100.0	300.0	35.00	32.0	10.2	24.8	90.00	18.0

(1) Minimum penetration diameter (2) Maximum penetration diameter

Spare Parts

Designation	Extractor
TNFFA-IQ	ETF 3-6*

* Optional, should be ordered separately


Engineered for
MAXIMUM
FACE GROOVING
Performance

STANDARD
PARTING & GROOVING Tools

TANG-GRIP
PARTING LINE

Tangentially Clamped, Single-Ended Parting System

TAG Insert Features

- Very rigid clamping in a tangentially oriented pocket
- Enables machining at very high feed rates and provides excellent straightness and surface finish
- Recommended for parting large diameter parts and for interrupted cuts
- Offers a free, unobstructed chip flow, since there is no upper jaw as in the other clamping systems (very important in deep grooving and parting applications)
- The combination of tangential clamping and free chip flow results in improved tool and insert lifetime
- Provides a solution to the problem of inserts being pulled out during retraction

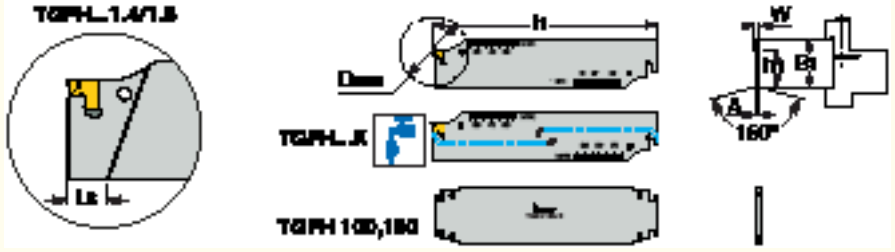
TAG inserts are available with a wide range of chipformers, with neutral and angular frontal cutting edges. The new tools are equipped with a user-friendly clamping and extraction device.

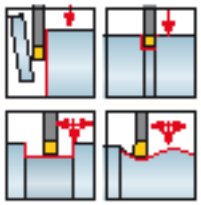
The **TANG-GRIP** family includes square shank tools, blades and inserts in 1.4-12.7 mm widths in the most advanced IC830 and IC808 **SUMO TEC** grades. The blades are in standard sizes which fit ISCAR's standard blocks.

TANG-GRIP
PARTING LINE

TGFH/R/L

Blades with Tangentially Oriented Pocket for Parting and Grooving,
for TANG-GRIP Single-Ended Inserts





Designation	B_1	W min	W max	A	l_1	L_3	h_1	D max	Coolant	Insert
TGFH 19-1.4	19.0	1.40	1.40	1.05 (2)	86.00	9.60	15.7	30.0	-	TAG 1.4
TGFH 19-1.6	19.0	1.60	1.60	1.30 (3)	86.00	11.00	15.7	32.0	-	TAG 1.6
TGFH 19-2	19.0	1.80	2.40	1.65	86.00	-	15.7	38.0	-	TAG 2
TGFH 26-1.4	26.0	1.40	1.40	1.05 (2)	110.00	8.30	21.4	29.0	-	TAG 1.4
TGFH 26-1.6	26.0	1.60	1.60	1.30 (3)	110.00	10.00	21.4	35.0	-	TAG 1.6
TGFH 26-2	26.0	1.80	2.40	1.65	110.00	-	21.4	50.0	-	TAG 2
TGFH 26-3	26.0	2.80	3.50	2.50	110.00	-	21.4	75.0	-	TAG 3
TGFH 26K-3 (1)	26.0	2.80	3.50	2.50	110.00	-	21.4	75.0	Y	TAG 3
TGFH 26-4	26.0	3.70	4.50	3.40	110.00	-	21.4	80.0	-	TAG 4
TGFH 26-5	26.0	4.70	5.50	4.00	150.00	-	21.4	80.0	-	TAG 5
TGFH 32-1.4	32.0	1.40	1.40	1.05 (2)	150.00	7.10	24.8	29.0	-	TAG 1.4
TGFH 32-1.6	32.0	1.60	1.60	1.30 (2)	150.00	10.00	24.8	38.0	-	TAG 1.6
TGFH 32-2	32.0	1.80	2.40	2.50 (4)	150.00	-	24.8	50.0	-	TAG 2
TGFH 32-3	32.0	2.80	3.50	2.50	150.00	-	24.8	100.0	-	TAG 3
TGFH 32K-3 (1)	32.0	2.80	3.50	2.50	150.00	-	24.8	100.0	Y	TAG 3
TGFH 32-4	32.0	3.70	4.50	3.40	150.00	-	24.8	100.0	-	TAG 4
TGFH 32K-4 (1)	32.0	3.70	4.50	3.40	150.00	-	24.8	100.0	Y	TAG 4
TGFH 32-5	32.0	4.70	5.50	4.00	150.00	-	24.8	120.0	-	TAG 5
TGFH 32-6	32.0	5.70	6.50	5.20	150.00	-	24.8	120.0	-	TAG 6
TGFH 32-7	32.0	6.80	7.50	6.00	148.00	-	24.8	120.0	-	TAG 7
TGFH 45-3	45.0	2.80	3.50	2.50	225.00	-	38.1	160.0	-	TAG 3
TGFH 45-4	45.0	3.70	4.50	3.40	225.00	-	38.1	160.0	-	TAG 4
TGFH 45-5	45.0	4.70	5.50	4.00	225.00	-	38.1	160.0	-	TAG 5
TGFH 45-6	45.0	5.70	6.50	5.20	225.00	-	38.1	160.0	-	TAG 6
TGFH 45-7	45.0	6.80	7.50	6.00	225.00	-	38.1	160.0	-	TAG 7
TGFH 52-7	52.6	6.80	7.50	6.00	190.00	-	45.2	190.0	-	TAG 7
TGFH 53-7	52.6	6.80	7.50	6.00	260.00	-	45.2	220.0	-	TAG 7
TGFH 52K-8 (1)	52.6	7.70	8.50	7.20	190.00	-	45.2	190.0	Y	TAG 8
TGFH 53K-8 (1)	52.6	7.70	8.50	7.20	260.00	-	45.2	215.0	Y	TAG 8
TGFH 52K-9 (1)	52.6	8.70	10.00	8.20	190.00	-	45.2	190.0	Y	TAG 9
TGFH 53K-9 (1)	52.6	8.70	10.00	8.20	260.00	-	45.2	215.0	Y	TAG 9
TGFHR/L 53K-12 (1)	52.6	11.70	12.70	10.00	260.00	-	45.2	215.0	Y	TAG 12
TGFH 100-9	100.0	8.70	10.00	8.20	460.00	-	92.5	450.0	-	TAG 9
TGFH 100-12	100.0	11.70	12.70	10.00	460.00	-	92.5	450.0	-	TAG 12
TGFH 150-12	150.0	11.70	12.70	10.00	610.00	-	142.5	600.0	-	TAG 12

(1) With coolant holes, recommended coolant pressure: 10 bar min, cooling tube SGCU 341 should be ordered separately. (2) Thickness beyond the D.O.C. area is 2.50 mm (3) Thickness beyond the D.O.C. area is 1.60 mm (4) Thickness at the D.O.C. area is 1.65 mm

TANG-GRIP PARTING LINE

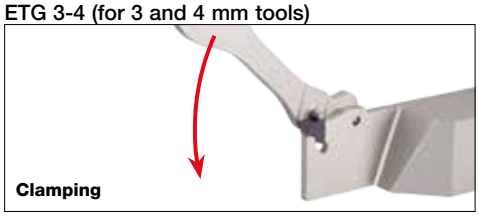
TGFH/R/L Spare Parts

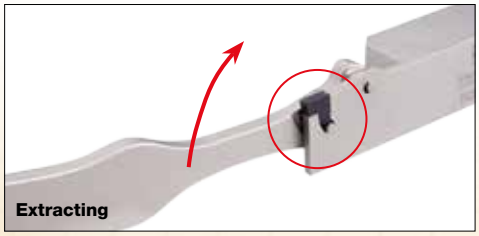
Designation	Sealing Screw	Extractor	Cooling Tube
TGFH 19-1.4		ETG 1.4/1.6*	
TGFH 19-1.6		ETG 1.4/1.6*	
TGFH 26-1.4		ETG 1.4/1.6*	
TGFH 26-1.6		ETG 1.4/1.6*	
TGFH 26-2		ETG 2*	
TGFH 26-3		ETG 3-4*	
TGFH 26K-3	SGC 340	ETG 3-4-SH*	
TGFH 26-4		ETG 3-4*	
TGFH 26-5		ETG 5-7*	
TGFH 32-1.4		ETG 1.4/1.6*	
TGFH 32-1.6		ETG 1.4/1.6*	
TGFH 32-2		ETG 2*	
TGFH 32-3		ETG 3-4*	
TGFH 32K-3	SGC 340	ETG 3-4-SH*	
TGFH 32-4		ETG 3-4*	
TGFH 32K-4	SGC 340	ETG 3-4-SH*	
TGFH 32-5		ETG 5-7*	
TGFH 32-7		ETG 5-7*	
TGFH 45-3		ETG 3-4*	
TGFH 45-4		ETG 3-4*	
TGFH 45-5		ETG 5-7*	
TGFH 45-6		ETG 5-7*	
TGFH 45-7		ETG 5-7*	
TGFH 52-7		ETG 5-7*	
TGFH 53-7		ETG 5-7*	
TGFH 52K-8		ETG 8-12*	SGCU 341*
TGFH 53K-8		ETG 8-12*	SGCU 341*
TGFH 52K-9		ETG 8-12*	SGCU 341*
TGFH 53K-9		ETG 8-12*	SGCU 341*
TGFHR/L 53K-12		ETG 8-12*	SGCU 341*
TGFH 100-9		ETG 8-12*	
TGFH 100-12		ETG 8-12*	
TGFH 150-12		ETG 8-12*	

* Optional, should be ordered separately

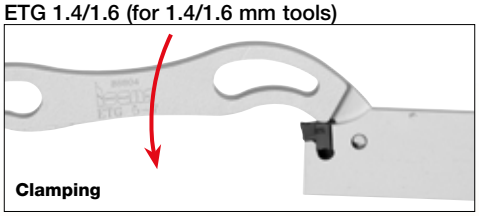
TANG-GRIP Extractor

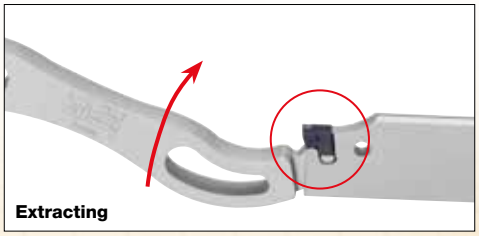
ETG 3-4 (for 3 and 4 mm tools)





ETG 5-7 (for 5-7 mm tools)
ETG 2 (for 2 mm tools)
ETG 1.4/1.6 (for 1.4/1.6 mm tools)

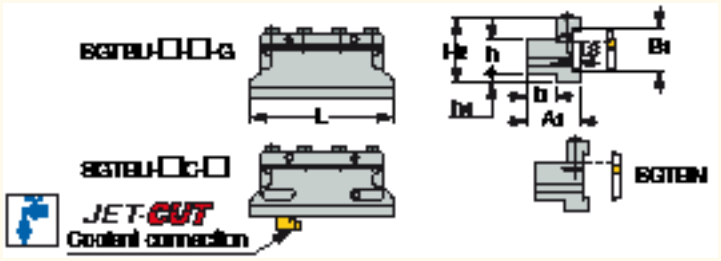




ETG 8-12 Extractor for 8 to 12.7 mm Inserts

SGTBU/SGTBN

Blocks for Various Parting and Grooving Blades



Designation	h	b	B_1	A_1	H_2	h_4	L_3	L
SGTBN 16-2	16.0	16.0	19.0	26.00	30.0	4.0	2.00	76.00
SGTBU 16-5G	16.0	17.0	26.0	34.00	43.0	13.0	4.00	86.00
SGTBU 20-5G	20.0	21.0	26.0	38.00	43.0	9.0	4.00	86.00
SGTBU 20-6G	20.0	19.0	32.0	38.00	50.0	13.0	5.30	100.00
SGTBU 25-5G	25.0	23.0	26.0	42.00	45.0	5.0	4.00	110.00
SGTBU 25-6G	25.0	23.0	32.0	42.00	50.0	8.0	5.30	110.00
SGTBU 25-8M	25.0	23.0	45.0	42.00	70.0	27.0	5.30	110.00
SGTBU 25C-6 (1)	25.0	23.0	32.0	42.00	50.0	8.0	5.30	110.00
SGTBU 32-25-6G	32.0	25.0	32.0	44.00	54.0	5.0	5.30	110.00
SGTBU 32-6G	32.0	29.0	32.0	48.00	54.0	5.0	5.30	110.00
SGTBU 32-8M	32.0	29.0	45.0	48.00	70.0	20.0	5.30	110.00
SGTBU 40-6G	40.0	-	32.0	60.00	57.0	-	5.30	114.00
SGTBU 40-9	40.0	41.0	52.6	66.00	81.0	22.0	8.00	130.00
SGTBU 50-9	50.0	41.0	52.6	66.00	83.0	14.0	8.00	135.00

• Choose blade by B1 dimension

(1) Elbow-style connector unit supplied with each JET-CUT tool block

Spare Parts

Designation	Top Clamp	Screw	Key	Pipe Fitting	Pipe Fitting 1	Pipe Fitting 2	Pipe Fitting 3
SGTBN 16-2		SR M5X25DIN912 12.9	HW 4.0				
SGTBU 16-5G	BKU 86	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 20-5G	BKU 86	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 20-6G	BKU 100	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 25-5G	BKU 105	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 25-6G	BKU 110	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 25-8M	BKU 110	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 25C-6	BKU 110	SR M6X30DIN912 12.9	HW 5.0	SGCU-344	CF 343*	CGF 343*	CGM 343*
SGTBU 32-25-6G	BKU 110	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 32-6G	BKU 110	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 32-8M	BKU 110	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 40-6G	BKU 110	SR M6X30DIN912 12.9	HW 5.0				
SGTBU 40-9	BK 509	SR M8X30DIN912 12.9	HW 6.0				
SGTBU 50-9	BK 509	SR M8X30DIN912 12.9	HW 6.0				

* Optional, should be ordered separately

TANG-GRIP PARTING LINE

Combined With JETHPLINE

MAX 300 BAR

High Pressure Coolant with Parting Tools

On exotic alloys such as inconel and titanium, it is usually impossible to break the chips with standard external coolant pressure. Applying high coolant pressure provides excellent chipbreaking results on all materials.

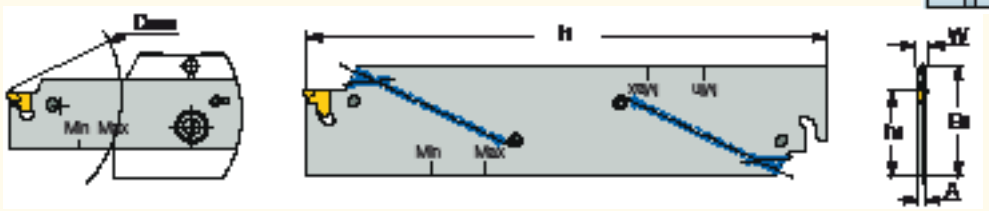
On some alloyed and stainless steel, especially when low feeds are applied, high pressure coolant may solve chipbreaking problems.

High pressure coolant reduces or even eliminates built-up edge phenomenon, especially when machining stainless steel and high temperature alloys.

TANG-GRIP PARTING LINE • JET HP LINE

TGFH-JHP

Parting and Grooving Blades for TANG-GRIP Inserts,
with Channels for High Pressure Coolant



Designation	B_1	W min	W max	A	l_1	h_1	D max	Insert
TGFH 26C-3-JHP	26.0	2.80	3.50	2.50	140.00	21.4	75.0	TAG 3
TGFH 32C-3-JHP	32.0	2.80	3.50	2.50	150.00	24.8	90.0	TAG 3
TGFH 26C-4-JHP	26.0	3.70	4.50	3.40	140.00	21.4	75.0	TAG 4
TGFH 32C-4-JHP	32.0	3.70	4.50	3.40	150.00	24.8	90.0	TAG 4
TGFH 32C-5-JHP	32.0	4.70	5.50	4.00	160.00	24.8	120.0	TAG 5
TGFH 32C-6-JHP	32.0	5.70	6.50	5.20	160.00	24.8	120.0	TAG 6

Spare Parts

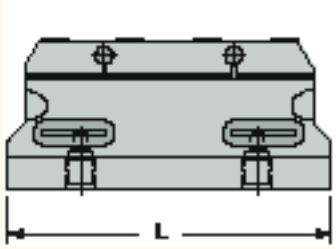
Designation	Sealing Screw	Extractor
TGFH 26C-3-JHP	SGC 340	ETG 3-4-SH*
TGFH 32C-3-JHP	SGC 340	ETG 3-4-SH*
TGFH 26C-4-JHP	SGC 340	ETG 3-4-SH*
TGFH 32C-4-JHP	SGC 340	ETG 3-4-SH*
TGFH 32C-5-JHP	SGC 340	ETG 5-7*
TGFH 32C-6-JHP	SGC 340	ETG 5-7*

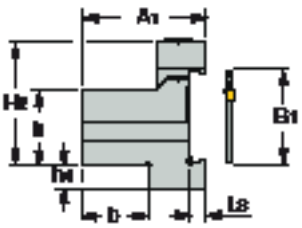
* Optional, should be ordered separately

Engineered for
MAXIMUM
PARTING & GROOVING
Performance

TGTBU JHP

Tool Blocks for Parting and Grooving Blades for High Pressure Coolant



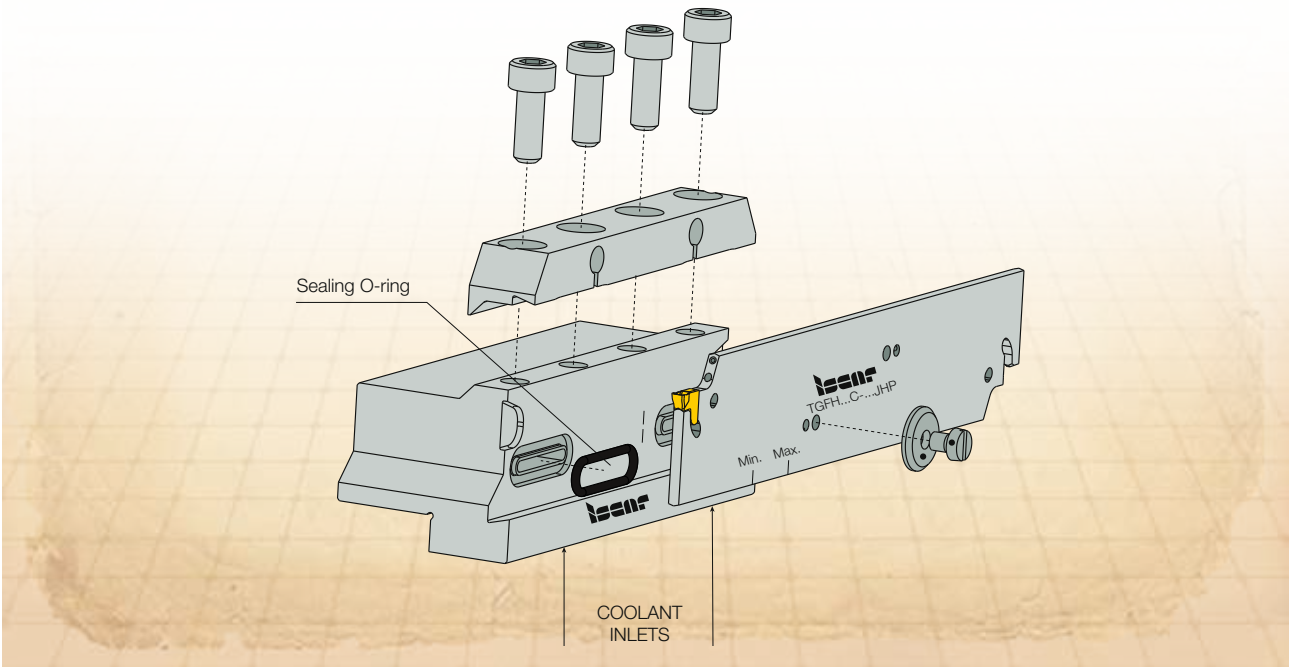


Choose blade by B1 dimension.

Designation	h	b	B_1	A_1	H_2	h_4	L_3	L
TGTBU 16-5G-JHP	16.0	16.9	26.0	34.00	29.9	13.1	4.10	86.00
TGTBU 20-5G-JHP	20.0	20.9	26.0	38.00	33.9	9.1	4.10	86.00
TGTBU 20-6G-JHP	20.0	19.0	32.0	38.20	36.4	15.0	5.30	100.00
TGTBU 25-5G-JHP	25.0	26.1	26.0	43.10	39.0	5.5	4.10	110.00
TGTBU 25-6G-JHP	25.0	23.0	32.0	42.20	41.4	8.0	5.30	110.00
TGTBU 32-6G-JHP	32.0	29.0	32.0	48.20	48.4	5.0	5.30	110.00

Spare Parts

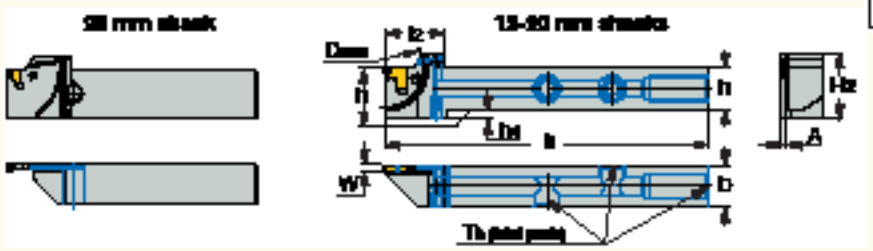
Designation	Top Clamp	Screw	Key
TGTBU 16-5G-JHP	BKU 86	SR M6X16DIN912 12.9	HW 5.0
TGTBU 20-5G-JHP	BKU 86	SR M6X16DIN912 12.9	HW 5.0
TGTBU 20-6G-JHP	BKU 100	SR M6X16DIN912 12.9	HW 5.0
TGTBU 25-5G-JHP	BKU 105	SR M6X16DIN912 12.9	HW 5.0
TGTBU 25-6G-JHP	BKU 110	SR M6X16DIN912 12.9	HW 5.0
TGTBU 32-6G-JHP	BKU 110	SR M6X16DIN912 12.9	HW 5.0



TANG-GRIP PARTING LINE • JET HP LINE

TGTR/L-JHP

Parting and Grooving Toolholders for TANG-GRIP Inserts,
with Channels for High Pressure Coolant



Designation	W min	W max	h	b	A	l_1	H_2	l_2	h_4	T_h	D max	Insert
TGTR/L 1212-2JHP	1.80	2.50	12.0	12.0	1.72	100.00	19.5	18.5	3.0	UNF 5/16-24 (1)	24.0	TAG 2
TGTR/L 1616-2JHP	1.80	2.50	16.0	16.0	1.72	120.00	21.5	25.5	-	UNF 5/16-24	35.0	TAG 2
TGTR/L 2012-2JHP	1.80	2.50	20.0	12.0	1.72	120.00	25.6	25.5	-	UNF 5/16-24	35.0	TAG 2
TGTR/L 1616-3JHP	2.80	3.50	16.0	16.0	2.50	120.00	24.5	25.5	3.0	UNF 5/16-24	35.0	TAG 3
TGTR/L 2020-3JHP	2.80	3.50	20.0	20.0	2.50	120.00	27.0	35.0	-	G1/8	54.0	TAG 3
TGTR/L 2525-3JHP	2.80	3.50	25.0	25.0	2.50	150.00	32.5	35.0	-	G1/8	56.0	TAG 3
TGTR/L 2020-4JHP	3.70	4.50	20.0	20.0	3.40	120.00	27.0	35.0	-	G1/8	54.0	TAG 4
TGTR/L 2525-4JHP	3.70	4.50	25.0	25.0	3.40	150.00	32.5	35.0	-	G1/8	56.0	TAG 4

• For user guide and accessories see pages

(1) Use M5 G1/8 adapter.

For inserts, see pages: TAG N-A () • TAG N-C/W/M () • TAG N-J/JS/JT () • TAG N-LF () • TAG N-MF () • TAG N-UT () • TAG R/L-C () • TAG R/L-J/JS ().

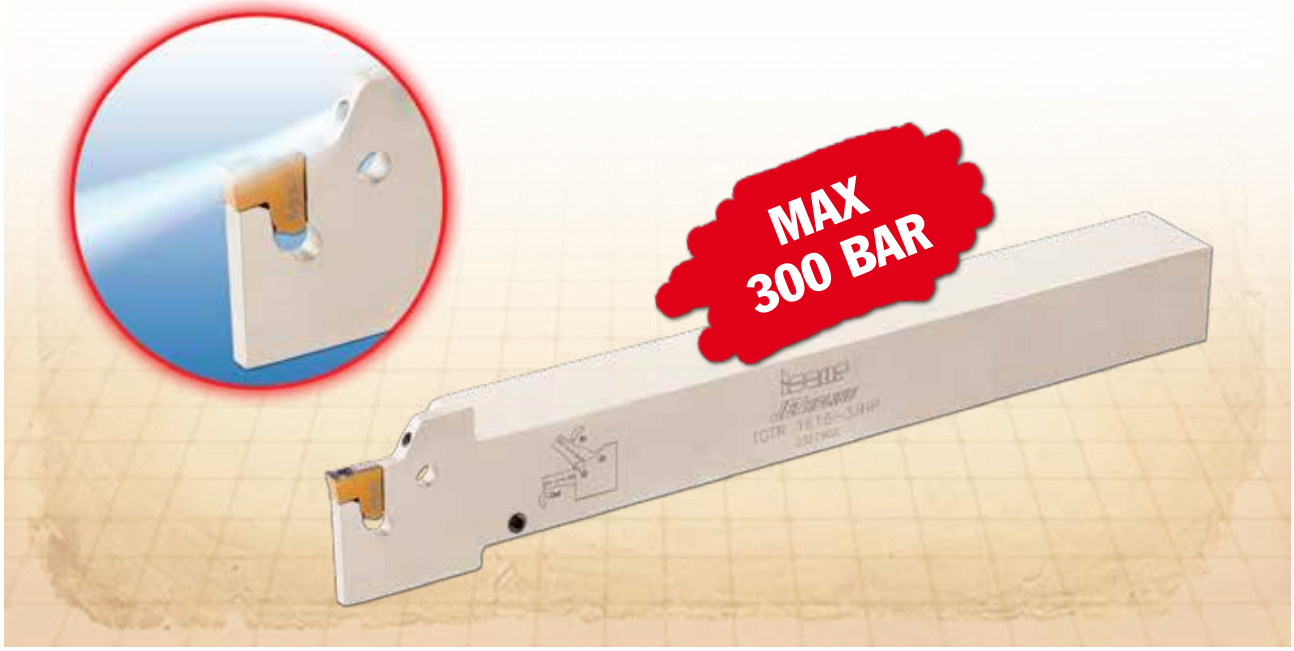
Flow Rate vs. Pressure

Designation	70 Bar Flow Rate (liters/min)	100 Bar Flow Rate (liters/min)	140 Bar Flow Rate (liters/min)
TGTR/L...-2JHP	2-4	4-6	6-8
TGTR/L...-3JHP	7-9	9-11	11-13
TGTR/L...-4JHP	7-9	9-11	11-13

Spare Parts

Designation	Extractor	Plug	Plug Key
TGTR/L 1212-2JHP	ETG 2-SH-T*	SR 5/16UNF TL360	HW 5/32"
TGTR/L 1616-2JHP	ETG 2*	SR 5/16UNF TL360	HW 5/32"
TGTR/L 2012-2JHP	ETG 2*	SR 5/16UNF TL360	HW 5/32"
TGTR/L 1616-3JHP	ETG 3-4-SH*	SR 5/16UNF TL360	HW 5/32"
TGTR/L 2020-3JHP	ETG 3-4-SH*	PLG 1/8BSP TL360	HW 5.0
TGTR/L 2525-3JHP	ETG 3-4-SH*		
TGTR/L 2020-4JHP	ETG 3-4-SH*	PLG 1/8BSP TL360	HW 5.0
TGTR/L 2525-4JHP	ETG 3-4-SH*		

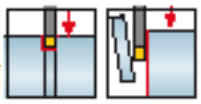
* Optional, should be ordered separately

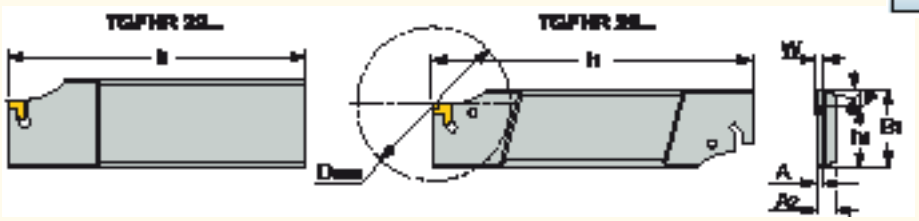


TANG-GRIP PARTING LINE

TGFHR/L

Double- and Single-Ended Parting and Grooving Reinforced Blades
for TANG-GRIP Tangentially Clamped Inserts





Right-hand shown

Designation	B_1	W_{min}	W_{max}	A	A_2	l_1	h_1	D_{max}
TGFHL 26T16-2	26.0	1.80	2.40	1.65	7.9	110.50	21.4	43.0
TGFHR 26T16-3	26.0	2.80	3.50	2.50	7.9	110.50	21.4	43.0
TGFHR/L 26T23-2	26.0	1.80	2.40	1.65	7.9	110.50	21.4	56.0
TGFHR/L 26T23-3	26.0	2.80	3.50	2.50	7.9	110.50	21.4	46.0
TGFHR/L 32T22-2	32.0	1.80	2.40	1.65	7.9	110.50	24.8	42.0
TGFHR/L 32T22-3	32.0	2.80	3.50	2.50	7.9	110.50	24.8	42.0
TGFHR/L 32T33-3	32.0	2.80	3.50	2.50	7.9	110.50	24.8	66.0
TGFHR/L 32T33-4	32.0	3.70	4.50	3.40	7.9	110.50	24.8	66.0

Spare Parts

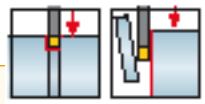
Designation	Extractor
TGFHL 26T16-2	ETG 2*
TGFHR 26T16-3	ETG 3-4-SH*
TGFHR/L 26T23-2	ETG 2*
TGFHR/L 26T23-3	ETG 3-4-SH*
TGFHR/L 32T22-2	ETG 2*
TGFHR/L 32T22-3	ETG 3-4-SH*
TGFHR/L 32T33-3	ETG 3-4-SH*
TGFHR/L 32T33-4	ETG 3-4-SH*

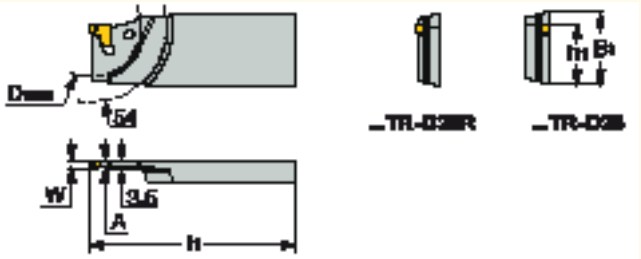
* Optional, should be ordered separately

TANG-GRIP PARTING LINE

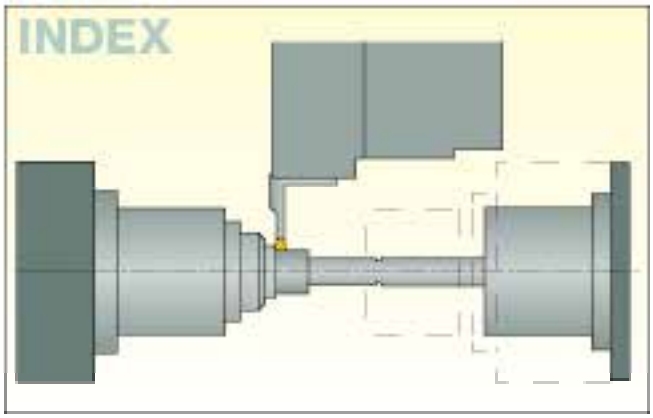
TGFHL-TR

TANG-GRIP Reinforced Blades for Traub and Index Machines,
for TANG-GRIP Tangentially Clamped Inserts





Designation	B_1	W min	W max	A	l_1	h_1	D max	Insert
TGFHL 26-2TR-D36	26.0	1.80	2.40	1.65	110.00	21.4	36.0	TAG 2
TGFHL 26-2TR-D36R	26.0	1.80	2.40	1.65	110.00	21.4	36.0	TAG 2
TGFHL 26-3TR-D36	26.0	2.80	3.50	2.50	110.00	21.4	36.0	TAG 3
TGFHL 26-3TR-D36R	26.0	2.80	3.50	2.50	110.00	21.4	36.0	TAG 3



Spare Parts

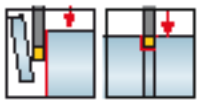
Designation	Extractor
TGFHL 26-2TR-D36	ETG 2*
TGFHL 26-2TR-D36R	ETG 2*
TGFHL 26-3TR-D36	ETG 3-4-SH*
TGFHL 26-3TR-D36R	ETG 3-4-SH*

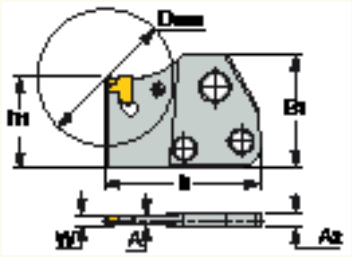
* Optional, should be ordered separately

TANG-GRIP PARTING LINE

TGAD

Parting and Grooving Adapters for TANG-GRIP Tangentially Clamped Inserts





Designation	W min	W max	A	A_2	l_1	D max	h_1	B_1	Insert
TGAD 1.4N	1.40	1.40	3.20	1.1	41.50	32.0	24.0	29.0	TAG 1.4
TGAD 2N	1.80	2.40	3.20	1.7	41.50	32.0	24.0	30.0	TAG 2
TGAD 3N	2.80	3.50	4.00	2.4	41.50	35.0	24.0	30.0	TAG 3
TGAD 4N	3.70	4.50	3.20	3.2	50.50	50.0	24.0	30.0	TAG 4
TGAD 5N	4.70	5.50	4.00	4.0	50.50	50.0	24.0	30.0	TAG 5

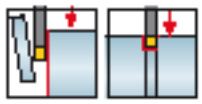
Spare Parts

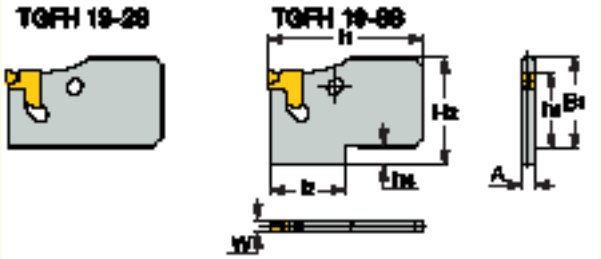
Designation	Extractor
TGAD 1.4N	ETG 1.4/1.6*
TGAD 2N	ETG 2*
TGAD 3N	ETG 3-4-SH*
TGAD 4N	ETG 3-4-SH*
TGAD 5N	ETG 5-7*

* Optional, should be ordered separately

TGFH-S

Single-Sided Blades for TANG-GRIP Parting and Grooving Inserts





Designation	B_1	W min	W max	A	l_1	h_1	H_2	h_4	l_2	T_{max-r}	D max
TGFH 19-2S	19.0	1.80	2.40	1.65	32.00	15.7	19.0	-	-	12.00	36.0
TGFH 19-3S	19.0	2.80	3.50	2.50	32.00	15.7	22.0	3.0	15.5	16.00	40.0

• For Dmax and Tmax drawing see SGBHR/L holder.

Spare Parts

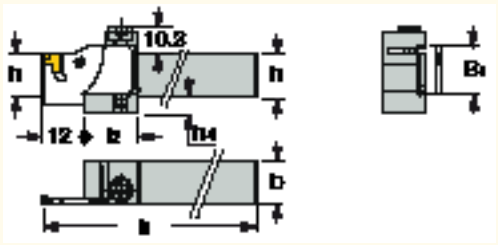
Designation	Extractor
TGFH 19-2S	ETG 2*
TGFH 19-3S	ETG 3-4-SH*

* Optional, should be ordered separately

TANG-GRIP PARTING LINE

SGBHR/L

Tool Blocks for TANG-GRIP Single-Sided Blades



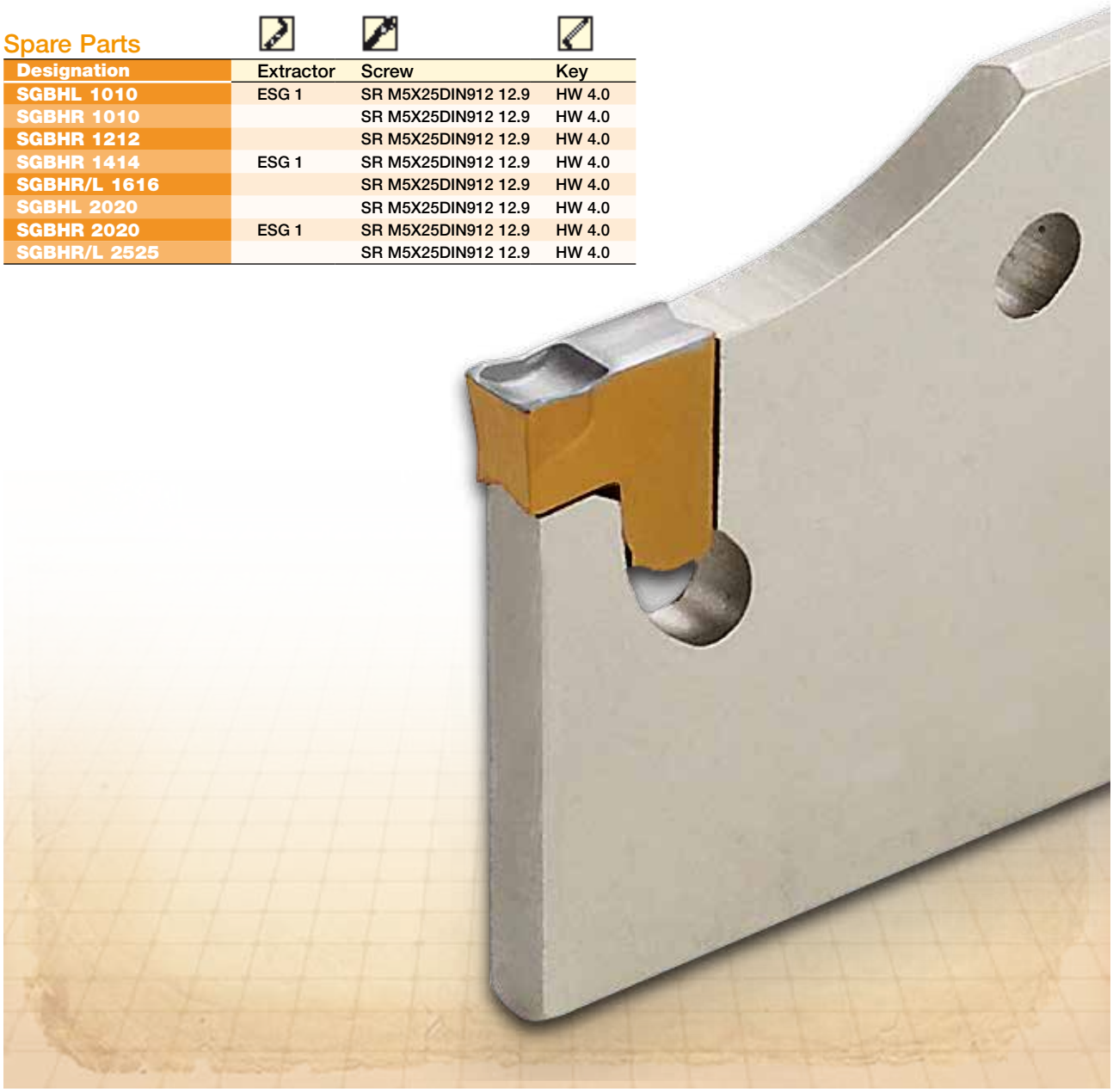
Right-hand shown

Designation	h	b	h_4	l_1	B_1	l_2	T_{max-r}	D_{max}
SGBHR/L 1010	10.0	10.0	10.0	154.00	19.0	20.0	16.00	40.0
SGBHR 1212	12.0	12.0	8.0	154.00	19.0	20.0	16.00	40.0
SGBHR 1414	14.0	14.0	6.0	154.00	19.0	20.0	16.00	40.0
SGBHR/L 1616	16.0	16.0	6.0	154.00	19.0	20.0	16.00	40.0
SGBHR/L 2020	20.0	20.0	2.0	154.00	19.0	20.0	16.00	40.0
SGBHR/L 2525	25.0	25.0	-	154.00	19.0	20.0	16.00	40.0

• For Dmax and Tmax dimensions see TGFH-S adapters.

Spare Parts

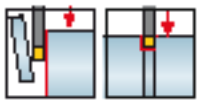
Designation	Extractor	Screw	Key
SGBHL 1010	ESG 1	SR M5X25DIN912 12.9	HW 4.0
SGBHR 1010		SR M5X25DIN912 12.9	HW 4.0
SGBHR 1212		SR M5X25DIN912 12.9	HW 4.0
SGBHR 1414	ESG 1	SR M5X25DIN912 12.9	HW 4.0
SGBHR/L 1616		SR M5X25DIN912 12.9	HW 4.0
SGBHL 2020		SR M5X25DIN912 12.9	HW 4.0
SGBHR 2020	ESG 1	SR M5X25DIN912 12.9	HW 4.0
SGBHR/L 2525		SR M5X25DIN912 12.9	HW 4.0

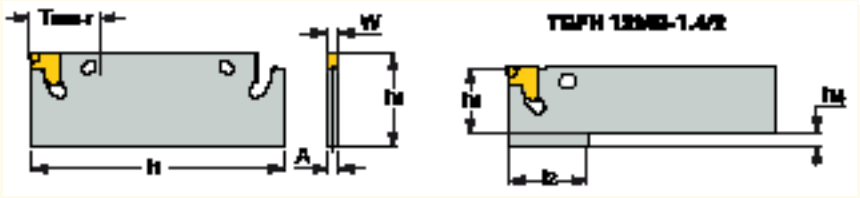


TANG-GRIP PARTING LINE

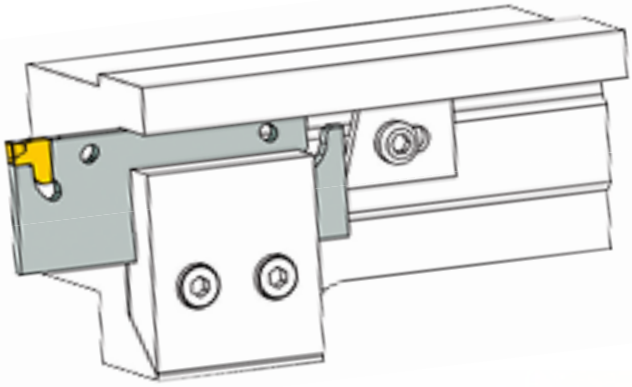
TGFH-MB

Parting and Grooving Blades for Other Manufacturers' Blocks





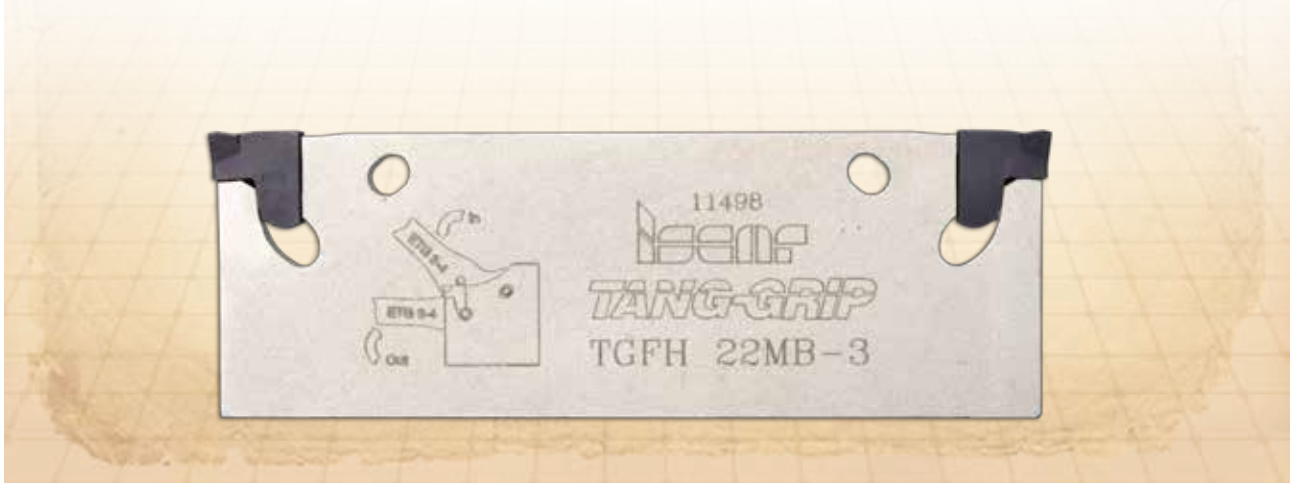
Designation	W min	W max	A	l_1	h_1	h_4	l_2	T_{max-r}	Insert
TGFH 12MB-2 L58	1.80	2.40	1.65	58.00	12.2	2.8	15.5	11.50	TAG 2
TGFH 17MB-2 L58	1.80	2.40	1.65	58.00	17.2	-	-	11.50	TAG 2
TGFH 22MB-2 L58	1.80	2.40	1.65	58.00	22.2	-	-	11.50	TAG 2
TGFH 17MB-3	2.80	3.50	2.50	64.00	17.2	-	-	12.00	TAG 3
TGFH 22MB-3	2.80	3.50	2.50	64.00	22.2	-	-	12.00	TAG 3
TGFH 22MB-3-L84	2.80	3.50	2.50	84.00	22.2	-	-	16.00	TAG 3
TGFH 28MB-3	2.80	3.50	2.50	100.00	28.0	-	-	19.00	TAG 3
TGFH 17MB-4	3.70	4.50	3.40	70.00	17.2	-	-	14.00	TAG 4
TGFH 22MB-4	3.70	4.50	3.40	70.00	22.2	-	-	14.00	TAG 4
TGFH 22MB-4-L90	3.70	4.50	3.40	90.00	22.2	-	-	17.00	TAG 4
TGFH 28MB-4	3.70	4.50	3.40	100.00	28.0	-	-	19.00	TAG 4



Spare Parts

Designation	
TGFH 12MB-2 L58	
TGFH 17MB-2 L58	
TGFH 22MB-2 L58	
TGFH 17MB-3	
TGFH 22MB-3	
TGFH 22MB-3-L84	
TGFH 28MB-3	ETG 3-4-SH*
TGFH 17MB-4	ETG 3-4-SH*
TGFH 22MB-4	ETG 3-4-SH*
TGFH 22MB-4-L90	ETG 3-4-SH*
TGFH 28MB-4	ETG 3-4-SH*

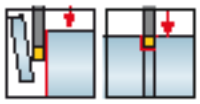
* Optional, should be ordered separately

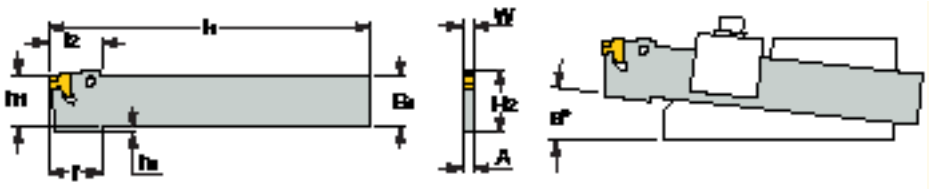


TANG-GRIP
PARTING LINE

TGFS

Blades for Multi-Spindle Machines - Replacement for HSS and Brazed Tools





Designation	W min	W max	B_1	A	l_1	H_2	h_1	l_2	f	h_4	D max	a°	Insert
TGFS 0-17-2	1.80	2.40	17.2	1.65	110.00	17.2	17.2	-	18.0	1.8	35.0	0	TAG 2
TGFS 0-17-3	2.80	3.50	17.2	2.50	110.00	19.0	17.2	-	18.0	1.8	60.0	0	TAG 3
TGFS 5-17-2	1.80	2.40	17.4	1.65	110.00	18.9	17.5	18.0	18.0	1.5	35.0	5	TAG 2
TGFS 5-17-3	2.80	3.50	17.4	2.50	110.00	20.7	17.5	18.0	18.0	1.5	60.0	5	TAG 3
TGFS 5-17-4	3.70	4.50	17.4	3.40	110.00	20.7	17.5	18.0	18.0	1.5	60.0	5	TAG 4
TGFS 5-22-2	1.80	2.40	22.2	1.65	150.00	23.8	22.4	18.0	-	-	50.0	5	TAG 2
TGFS 5-22-3	2.80	3.50	22.2	2.50	150.00	24.1	22.4	18.0	-	-	75.0	5	TAG 3
TGFS 5-22-4	3.70	4.50	22.2	3.40	150.00	24.1	22.4	18.0	-	-	80.0	5	TAG 4
TGFS 5-28-4	3.70	4.50	28.6	3.40	150.00	30.4	28.7	18.0	-	-	100.0	5	TAG 4

Spare Parts

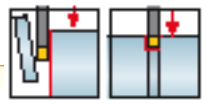
Designation	Extractor
TGFS 0-17-2	ETG 2*
TGFS 0-17-3	ETG 3-4-SH*
TGFS 5-17-2	ETG 2*
TGFS 5-17-3	ETG 3-4-SH*
TGFS 5-17-4	ETG 3-4-SH*
TGFS 5-22-2	ETG 2*
TGFS 5-22-3	ETG 3-4-SH*
TGFS 5-22-4	ETG 3-4-SH*
TGFS 5-28-4	ETG 3-4-SH*

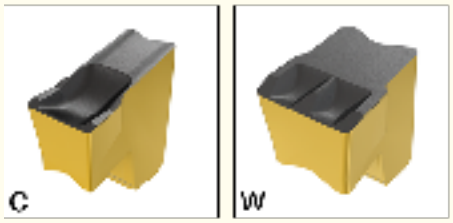
* Optional, should be ordered separately

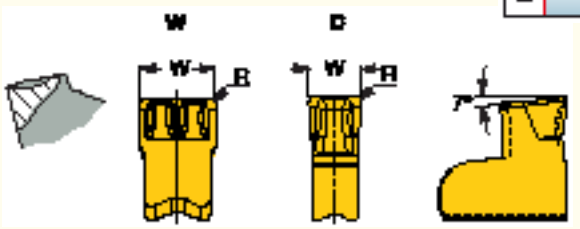
TANG-GRIP PARTING LINE

TAG N-C/W/M

Parting and Grooving Single-Ended Insert for Parting Bars,
Hard Materials and Tough Applications







Designation	Dimensions W	W±toler	R±0.04	Tough ↔ Hard IC830	IC928	IC5400	IC808	IC908	IC30N	IC807	IC20	Recommended Machining Data f groove (mm/rev)
TAG N1.4C	1.40	0.05	0.16							●		0.04-0.10
TAG N1.6C	1.60	0.05	0.16	●			●					0.04-0.14
TAG N2C	2.00	0.05	0.20	●		●	●		●		●	0.05-0.16
TAG N2.4C	2.40	0.04	0.16	●			●					0.06-0.18
TAG N3CB (1)	3.00	0.05	0.35	●			●					0.12-0.30
TAG N3C	3.05	0.05	0.20	●	●	●	●	●	●	●	●	0.10-0.25
TAG N3M (2)	3.05	0.05	0.20	●				●				0.06-0.18
TAG N3W	3.05	0.05	0.20	●				●				0.10-0.25
TAG N4C	4.00	0.05	0.24	●	●	●	●	●		●	●	0.10-0.30
TAG N4CB (1)	4.00	0.05	0.40	●				●				0.10-0.33
TAG N4M (2)	4.00	0.05	0.24	●				●				0.06-0.20
TAG N4W	4.00	0.05	0.24	●				●				0.10-0.30
TAG N4.8C	4.80	0.05	0.30	●			●					0.10-0.35
TAG N5C	5.05	0.05	0.25	●			●				●	0.10-0.35
TAG N6.3C	6.30	0.10	0.35	●			●					0.15-0.40
TAG N7W	7.00	0.10	0.50	●			●					0.18-0.40
TAG N8C	8.00	0.10	0.50	●			●					0.20-0.70
TAG N9.5C	9.50	0.10	0.50	●			●					0.25-0.80
TAG N9.5W	9.50	0.10	0.50	●			●					0.22-0.80
TAG N12.7W	12.70	0.10	0.85	●			●					0.30-0.80

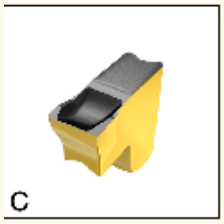
• Feed values for grade IC20 should be decreased by 50%

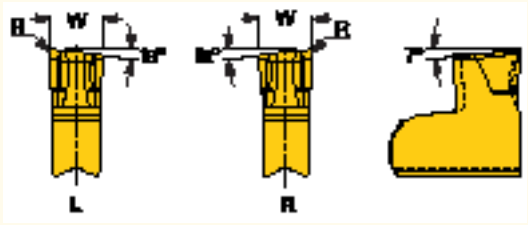
(1) Larger corner radii for interrupted cut and high feed applications. (2) Similar to C-type, but with a modified edge. Improved chip control at medium feeds.

TANG-GRIP
PARTING LINE

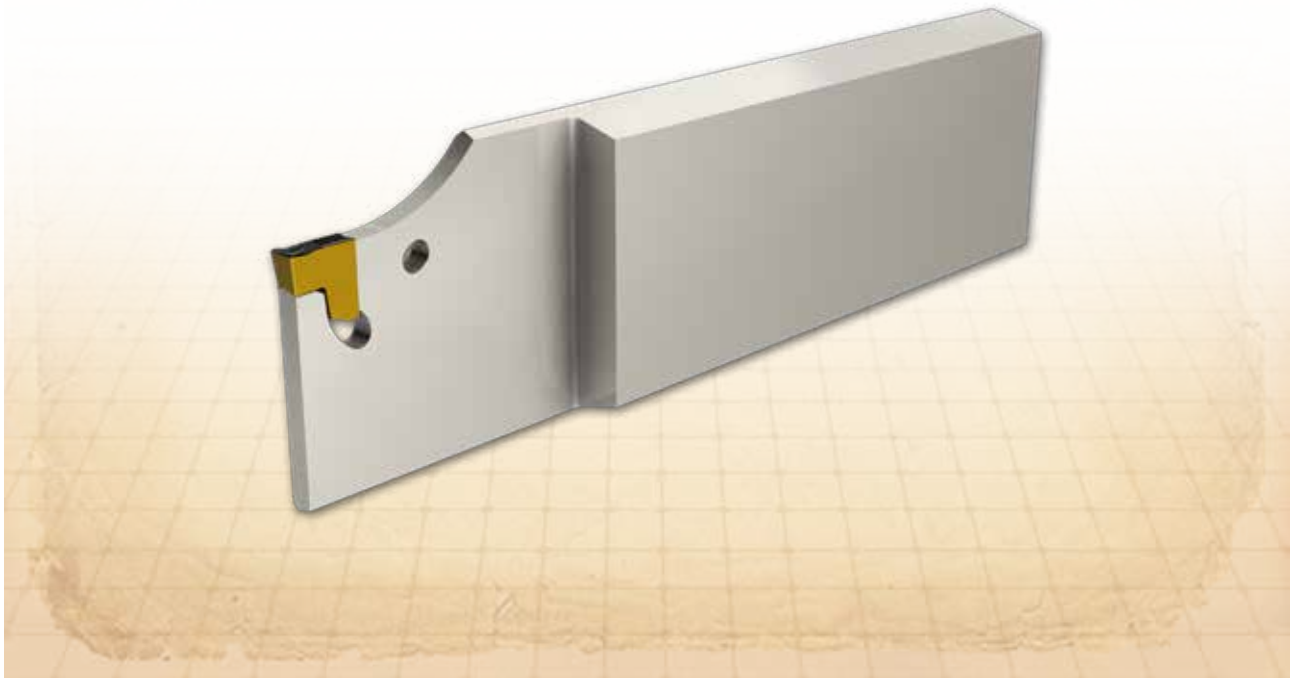
TAG R/L-C

Parting Single-Ended Insert for Bars, Hard Materials and Tough Parting Applications





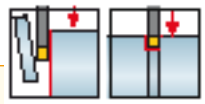
Designation	Dimensions			Tough ↔ Hard					Recommended Machining Data
	W±0.10	R±0.05	f_a°	IC830	IC928	IC808	IC908	IC30N	f groove (mm/rev)
TAG R/L2C-6D	2.05	0.20	6.0	●		●			0.04-0.12
TAG R2.4C-8D	2.40	0.16	8.0			●			0.05-0.13
TAG R/L3C-6D	3.00	0.20	6.0	●	●	●	●		0.08-0.18
TAG R3C-8D	3.00	0.20	8.0					●	0.06-0.16
TAG R/L3C-15D	3.00	0.20	15.0	●	●	●	●		0.08-0.16
TAG R/L4C-4D	4.05	0.24	4.0	●	●	●	●		0.08-0.20
TAG R/L5C-4D	5.05	0.25	4.0	●		●			0.10-0.25
TAG R/L6.3C-4D	6.35	0.35	4.0	●		●			0.12-0.30

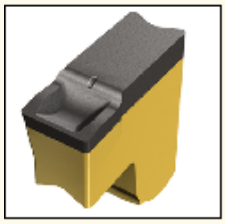


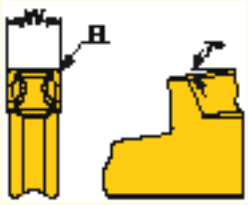
TANG-GRIP PARTING LINE

TAG N-MF

Parting and Grooving Single-Ended Insert for Parting Bars, Hard Materials and Tough Applications, Medium Feed



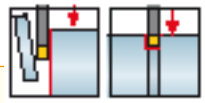


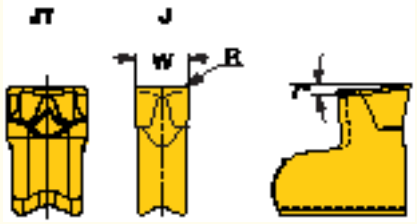


Designation	Dimensions W	W±toler	R±0.03	IC5400	Recommended Machining Data f groove (mm/rev)
TAG N2MF	2.00	0.05	0.20	●	0.04-0.12
TAG N3MF	3.00	0.05	0.20	●	0.06-0.18

TAG N-J/JS/JT

Parting and Grooving Single-Ended Insert, for Soft Materials





Designation	Dimensions W±0.04	R±0.05	Tough ↔ Hard IC830	IC928	IC5400	IC808	IC908	IC807	IC20	Recommended Machining Data f groove (mm/rev)
TAG N1.4J	1.40	0.16	●			●		●		0.03-0.10
TAG N1.6J	1.60	0.16	●			●				0.03-0.12
TAG N2JS (1)	2.00	0.02	●			●				0.03-0.08
TAG N2J	2.00	0.20	●		●	●			●	0.04-0.12
TAG N2JT	2.00	0.20	●	●	●	●	●			0.04-0.10
TAG N3JS (1)	3.05	0.02	●			●				0.04-0.10
TAG N3J	3.05	0.20	●	●	●	●	●	●	●	0.04-0.16
TAG N3JT	3.05	0.20	●		●	●	●			0.05-0.18
TAG N3.2JT	3.25	0.20				●				0.05-0.18
TAG N4J	4.00	0.24	●	●	●	●	●	●		0.04-0.18
TAG N4JT	4.05	0.24	●		●	●	●			0.06-0.20
TAG N5J	5.05	0.25	●			●				0.05-0.20
TAG N5JT	5.05	0.25	●			●	●			0.06-0.22
TAG N6.3J	6.35	0.34	●			●				0.06-0.22
TAG N6.3JT	6.35	0.34	●				●			0.08-0.25
TAG N7JT	7.05	0.50	●			●				0.10-0.28

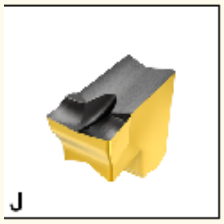
• JT chipformer has the basic positive configuration of the J-type and a reinforced negative frontal edge. Most suitable for soft materials at low to medium feeds. The JS-type has sharp corners.

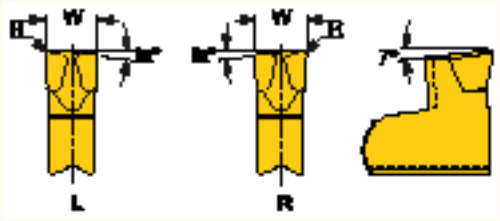
(1) Sharp corners

TANG-GRIP PARTING LINE

TAG R/L-J/JS

TANG-GRIP Parting Inserts for Soft Materials, Tubes, Small Diameters and Thin-Walled Parts



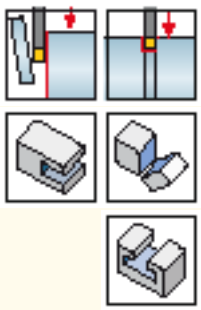


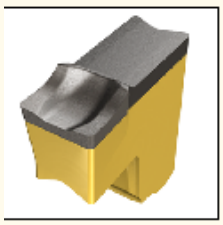
Designation	Dimensions W	R	f_a°	Tough ↔ Hard IC830	IC928	IC808	IC908	IC807	Recommended Machining Data f groove (mm/rev)
TAG R/L1.4J-8D	1.40	0.16	8.0	●		●		●	0.03-0.08
TAG R/L1.4JS-10D (1)	1.40	0.02	10.0	●		●		●	0.02-0.06
TAG R/L2J-6D	2.00	0.20	6.0	●		●			0.03-0.10
TAG R/L2JS-6D (1)	2.00	0.02	6.0	●		●			0.02-0.08
TAG R/L2J-15D	2.00	0.20	15.0	●		●			0.03-0.08
TAG R/L2JS-15D (1)	2.00	0.02	15.0	●		●			0.02-0.06
TAG R/L3J-6D	3.00	0.20	6.0	●	●	●	●		0.04-0.14
TAG R/L3JS-6D (1)	3.00	0.02	6.0	●		●			0.03-0.10
TAG R/L3J-15D	3.00	0.20	15.0	●	●	●	●		0.04-0.12
TAG R/L3JS-15D (1)	3.00	0.02	15.0	●		●			0.03-0.08
TAG R/L4J-4D	4.00	0.24	4.0	●	●	●	●		0.04-0.15
TAG R/L5J-4D	5.05	0.25	4.0	●		●			0.05-0.18
TAG R/L6.3J-4D	6.35	0.35	4.0	●		●			0.05-0.20

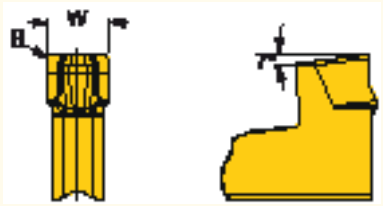
(1) Sharp corners

TAG N-LF

Parting and Grooving Single-Ended Insert, for Stainless Steel at Low to Medium Feed





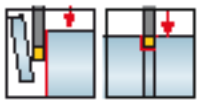


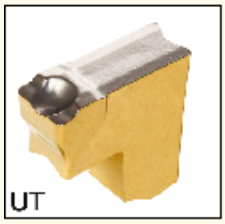
Designation	Dimensions $W^{\pm 0.04}$	$R^{\pm 0.03}$	Tough ↔ Hard IC830	IC5400	IC808	Recommended Machining Data f groove (mm/rev)
TAG N2LF	2.00	0.20	●	●	●	0.03-0.08
TAG N3LF	3.05	0.20	●	●	●	0.04-0.10

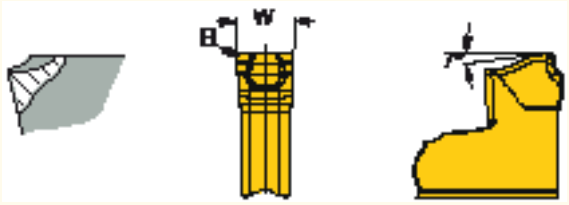
TANG-GRIP PARTING LINE

TAG N-UT

Parting and Grooving Single-Sided Insert, for Low Feeds on Cr-Ni Alloys, Ductile Materials and Low Carbon Steel



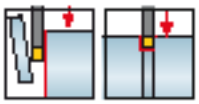


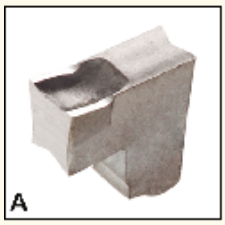


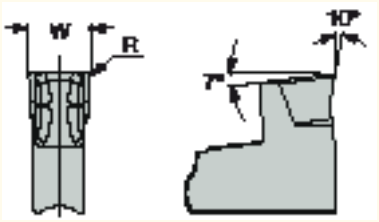
Designation	Dimensions W±0.04	Dimensions R±0.04	Tough ↔ Hard IC830	IC808	IC908	Recommended Machining Data f groove (mm/rev)
TAG N2UT	2.00	0.20	●	●	●	0.03-0.10
TAG N3UT	3.00	0.30	●	●		0.04-0.12
TAG N4UT	4.00	0.30			●	0.05-0.15
TAG N5UT	5.00	0.30			●	0.05-0.18
TAG N6UT	6.00	0.85			●	0.06-0.22

TAG N-A

Parting and Grooving Single-Ended Insert for Machining Aluminum





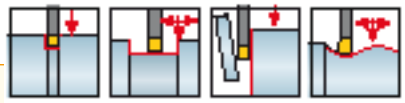


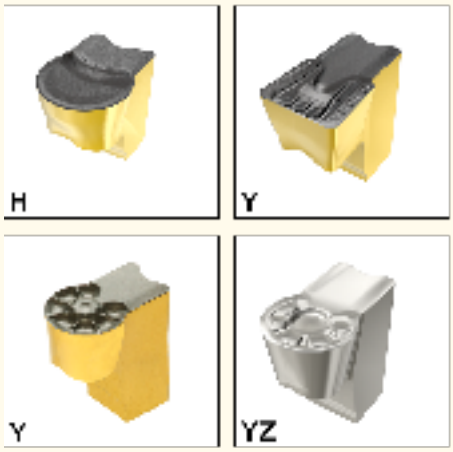
Designation	Dimensions W±0.04	Dimensions R±0.05	IC20	Recommended Machining Data f groove (mm/rev)
TAG N2A	2.10	0.20	●	0.02-0.10
TAG N3A	3.05	0.20	●	0.03-0.14
TAG N4A	4.05	0.24	●	0.03-0.16

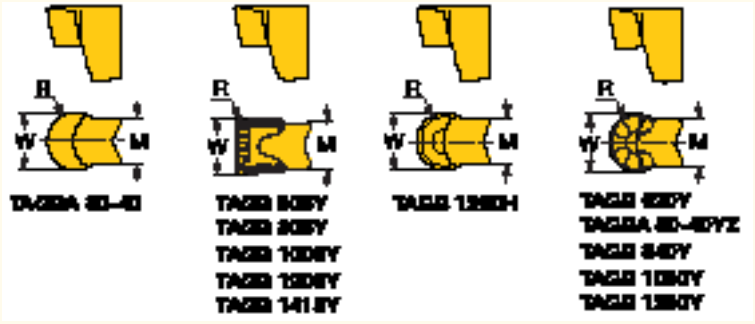
SUMO-GRIP HEAVY DUTY LINE

TAGB/TAGBA

Grooving, Turning and Parting Single-Ended Utility Insert





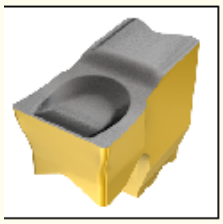


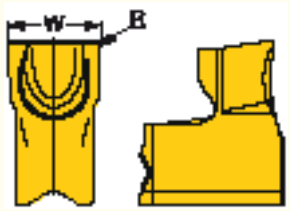
Designation	Dimensions W	W±toler	R±0.05	M	Tough ↔ Hard IC8250	IC808	IC07	IC806	IC807	Recommended Machining Data ap (mm)	f turn (mm/rev)	f groove (mm/rev)
TAGB 608Y	6.00	0.05	0.80	5.2		●		●		1.00-3.60	0.20-0.60	0.18-0.30
TAGB 630Y	6.00	0.05	3.00	5.2		●		●		0.00-3.00	0.25-0.55	0.18-0.32
TAGB 808Y	8.00	0.05	0.80	6.2	●	●		●	●	1.00-5.60	0.25-0.55	0.18-0.32
TAGB 840Y	8.00	0.05	4.00	6.2	●	●		●	●	0.00-4.00	0.24-0.67	0.18-0.32
TAGB 1008Y	10.00	0.05	0.80	8.0	●	●				1.00-7.00	0.30-0.70	0.22-0.40
TAGB 1050Y	10.00	0.05	5.00	8.0	●	●				0.00-5.00	0.30-0.85	0.22-0.40
TAGB 1208Y	12.00	0.07	0.80	10.0	●	●				1.00-8.40	0.35-0.85	0.26-0.48
TAGB 1260Y	12.00	0.07	6.00	10.0	●	●				0.00-6.00	0.35-0.90	0.26-0.48
TAGB 1260H (1)	12.00	0.07	6.00	10.0	●	●				0.00-6.00	0.45-1.00	0.35-0.55
TAGB 1415Y	14.00	0.07	1.50	12.0	●	●				1.80-8.40	0.35-0.85	0.26-0.50
TAGBA 80-40YZ	8.00	0.05	4.00	6.0			●			0.00-4.00	0.40-0.70	0.25-0.40

(1) H-type chipformer with a negative T-land for machining heavy interrupted applications and cast iron parts

TNF-P-IQ

Face Grooving Single-Ended Inserts for Machining Steel

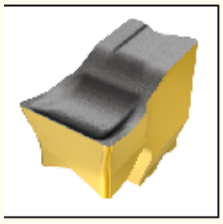


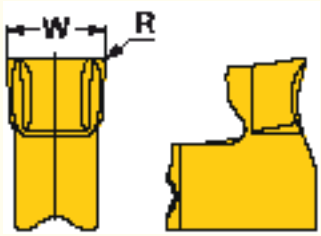


Designation	Dimensions W±0.05	Dimensions R	IC808	Recommended Machining Data f face-groove (mm/rev)
TNF 3P-IQ	3.00	0.30	●	0.10-0.15
TNF 4P-IQ	4.00	0.25	●	0.10-0.15
TNF 5P-IQ	5.00	0.35	●	0.12-0.20
TNF 6P-IQ	6.00	0.35	●	0.12-0.20

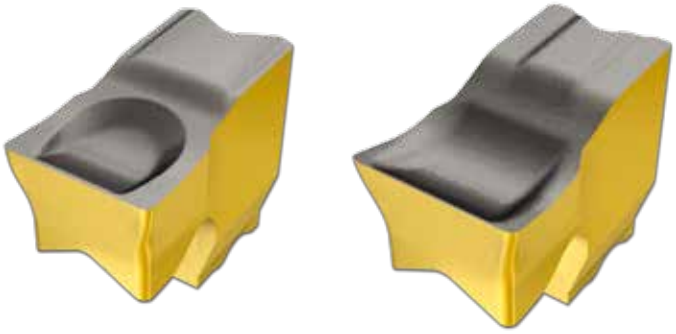
TNF-M-IQ

Face Grooving Single-Ended Inserts for Machining Stainless Steel and High Temperature Alloys





Designation	Dimensions W±0.05	Dimensions R	IC808	Recommended Machining Data f face-groove (mm/rev)
TNF 3M-IQ	3.00	0.30	●	0.08-0.10
TNF 4M-IQ	4.00	0.25	●	0.08-0.12
TNF 5M-IQ	5.00	0.35	●	0.12-0.20
TNF 6M-IQ	6.00	0.35	●	0.12-0.20

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