



**溝入れ突切り加工用カッター
システム M475**

溝幅 3 mm / 4mm に対応

**GROOVE AND CUT-OFF
MILLING SYSTEM M475**

CUTTING WIDTH 3 AND 4 MM



ph HORN ph

R

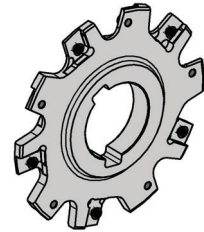
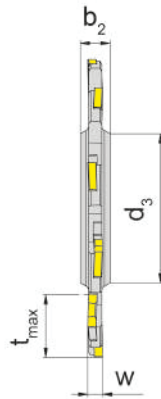
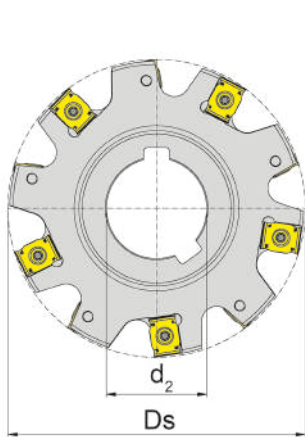
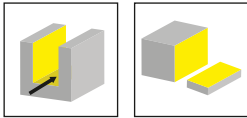
特長：

THE DIFFERENCE: MORE POSSIBILITIES

- **多刃仕様で高能率加工が可能**
Higher efficiency due to larger number of effective cutting edges
- **新材種のポジティブ形状の刃先で
良好な切れ味**
Positive insert geometry with new grade
- **右刃・左刃を同一インサート化し、
利便性を向上**
Neutral inserts for easy handling

ディスクミーリングカッター M475

Disc Milling Cutter



型式 Part number	Z	Ds	t _{max}	d ₂	b ₂	d ₃	w	n _{max}	HWS
M475.0080.27.03	10	80	18	27	8	40	3	20000	475016N
M475.0100.32.03	12	100	25	32	8	46	3	17000	475016N
M475.0125.40.03	16	125	32	40	10	54	3	15000	475016N
M475.0160.40.03	20	160	50	40	10	54	3	12000	475016N
M475.0080.27.04	10	80	18	27	8	40	4	21000	475022N
M475.0100.32.04	12	100	25	32	8	46	4	18000	475022N
M475.0125.40.04	16	125	32	40	10	54	4	15000	475022N
M475.0160.40.04	20	160	50	40	10	54	4	13000	475022N
M475.0200.40.04	26	200	70	40	10	54	4	11000	475022N

取り付け寸法 DIN 138 準拠
Bore (d2) with longitudinal keyway to DIN 138

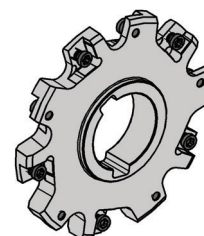
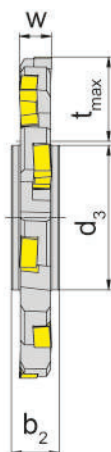
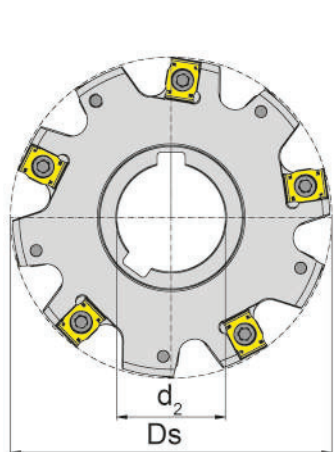
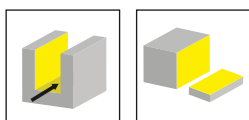
予備部品

Spare Parts

ディスクミーリングカッター Disc Milling Cutter	クランプねじ Clamping Screw	トルクスレンチ TORX PLUS® Wrench
M475...03	030.2523.T6P	T6PL
M475...04	030.0330.1217	T7PL

ディスクミーリングカッター M475

Disc Milling Cutter



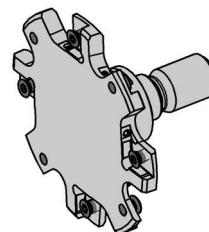
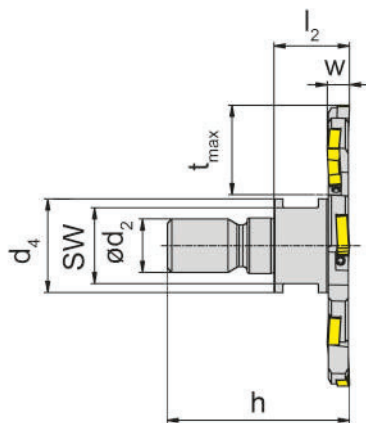
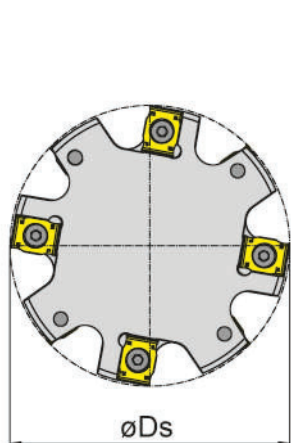
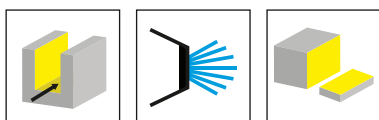
型式 Part number	Z	Ds	t _{max}	d ₂	b ₂	d ₃	w	n _{max}	HWS
M475.0080.27.05	10	80	18	27	8	40	5	22000	475027N
M475.0100.32.05	12	100	25	32	8	46	5	19000	475027N
M475.0125.40.05	16	125	32	40	10	54	5	17000	475027N
M475.0160.40.05	20	160	50	40	10	54	5	14000	475027N
M475.0200.40.05	26	200	70	40	10	54	5	12000	475027N
M475.0080.27.06	10	80	21	27	10	36	6	21000	475032N
M475.0100.32.06	12	100	25,5	32	10	47	6	18000	475032N
M475.0125.40.06	16	125	32,5	40	10	58	6	15000	475032N
M475.0160.40.06	20	160	50	40	10	58	6	13000	475032N
M475.0200.50.06	26	200	63,5	50	10	71	6	11000	475032N
M475.0080.27.08	10	80	21	27	12	36	8	17000	475043N
M475.0100.32.08	12	100	25,5	32	12	47	8	15000	475043N
M475.0125.40.08	16	125	32,5	40	12	58	8	12000	475043N
M475.0160.40.08	20	160	50	40	12	58	8	10000	475043N
M475.0200.50.08	26	200	63,5	50	12	71	8	8000	475043N

取り付け寸法 DIN 138 準拠
Bore [d2] with longitudinal keyway to DIN 138

予備部品

Spare Parts

ディスクミーリングカッター Disc Milling Cutter	クランプねじ Clamping Screw	トルクスレンチ TORX PLUS® Wrench
M475...05	030.3541.T8P	T8PL
M475...06	030.3550.T10P	T10PL
M475...08	030.350P.1110	T15PQ

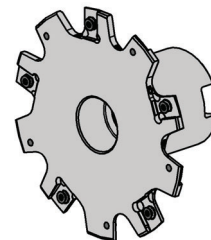
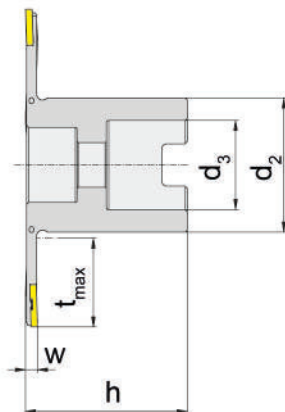
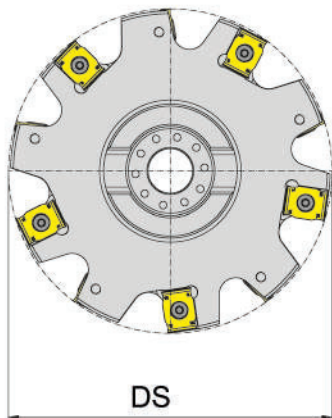
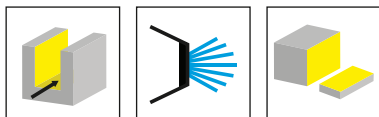


型式 Part number	Z	Ds	h	l_2	d_4	d_2	SW	w	t_{max}	n_{max}	HWS
M475.0040.M8.03.IK	4	40	33	15	13	M8	10	3	13	32000	475016N
M475.0050.M10.03.IK	6	50	35	15	18	M10	15	3	15	28000	475016N
M475.0063.M12.03.IK	8	63	41	17	21	M12	17	3	20	24000	475016N
M475.0040.M8.04.IK	4	40	33	15	13	M8	10	4	13	33000	475022N
M475.0050.M10.04.IK	6	50	35	15	18	M10	15	4	15	28000	475022N
M475.0063.M12.04.IK	8	63	41	17	21	M12	17	4	20	25000	475022N
M475.0040.M8.05.IK	4	40	33	15	13	M8	10	5	13	35000	475027N
M475.0050.M10.05.IK	6	50	35	15	18	M10	15	5	15	30000	475027N
M475.0063.M12.05.IK	8	63	41	17	21	M12	17	5	20	26000	475027N

予備部品

Spare Parts

スクリーインカッター Screw-in cutter	クランプねじ Clamping Screw	トルクスレンチ TORX PLUS® Wrench
M475.0...03	030.2523.T6P	T6PL
M475.0...04	030.0330.1217	T7PL
M475.0...05	030.3541.T8P	T8PL



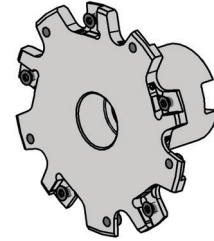
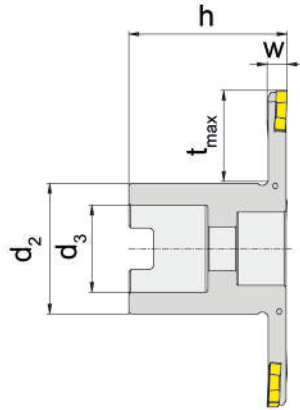
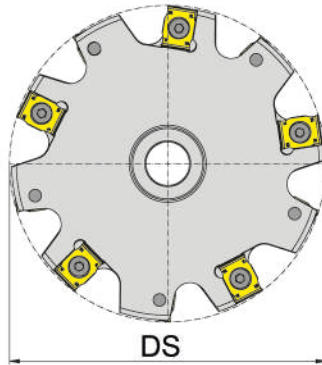
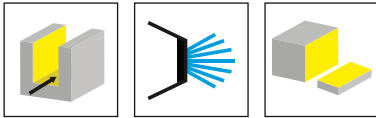
型式 Part number	Z	Ds	t _{max}	h	d ₃	d ₂	n _{max}	w	HWS
M475.0063.16.03.IK	8	63	17,5	35	16	32	24000	3	475016N
M475.0080.16.03.IK	10	80	25	40	16	28	20000	3	475016N
M475.0080.22.03.IK	10	80	23	40	22	33	20000	3	475016N
M475.0100.27.03.IK	12	100	25	50	27	48	17000	3	475016N
M475.0125.27.03.IK	16	125	37,5	50	27	48	15000	3	475016N
M475.0125.32.03.IK	16	125	32,5	50	32	56	15000	3	475016N
M475.0125.40.03.IK	16	125	26,5	50	40	70	15000	3	475016N
M475.0160.40.03.IK	20	160	44	50	40	70	12000	3	475016N
M475.0063.16.04.IK	8	63	17,5	35	16	32	25000	4	475022N
M475.0080.16.04.IK	10	80	25	40	16	28	21000	4	475022N
M475.0080.22.04.IK	10	80	23	40	22	33	21000	4	475022N
M475.0100.27.04.IK	12	100	25	50	27	48	18000	4	475022N
M475.0125.27.04.IK	16	125	37,5	50	27	48	15000	4	475022N
M475.0125.32.04.IK	16	125	23,5	50	32	56	15000	4	475022N
M475.0125.40.04.IK	16	125	26,5	50	40	70	15000	4	475022N
M475.0160.40.04.IK	20	160	44	50	40	70	13000	4	475022N
M475.0200.40.04.IK	26	200	64	50	40	70	11000	4	475022N

取り付け寸法 DIN 138 準拠
Bore (d3) with cross keyway to DIN 138

予備部品

Spare Parts

アーバー取付型カッター Arbour Mounted Cutter	クランプねじ Clamping Screw	トルクスレンチ TORX PLUS® Wrench
M475...03	030.2523.T6P	T6PL
M475...04	030.0330.1217	T7PL



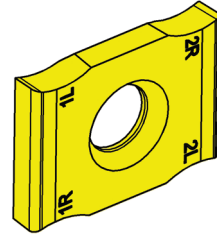
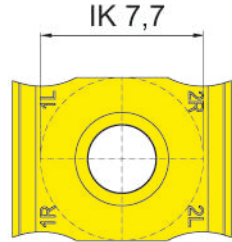
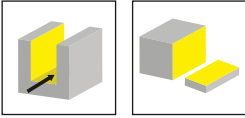
型式 Part number	Z	Ds	t _{max}	h	d ₃	d ₂	n _{max}	w	HWS
M475.0063.16.05.IK	8	63	17,5	35	16	32	26000	5	475027N
M475.0080.16.05.IK	10	80	25	40	16	28	22000	5	475027N
M475.0080.22.05.IK	10	80	23	40	22	33	22000	5	475027N
M475.0100.27.05.IK	12	100	25	50	27	48	19000	5	475027N
M475.0125.27.05.IK	16	125	37,5	50	27	48	17000	5	475027N
M475.0125.32.05.IK	16	125	32,5	50	32	56	17000	5	475027N
M475.0125.40.05.IK	16	125	26,5	50	40	70	17000	5	475027N
M475.0160.40.05.IK	20	160	44	50	40	70	14000	5	475027N
M475.0200.40.05.IK	26	200	64	50	40	70	12000	5	475027N
M475.0100.27.06.IK	12	100	25	50	27	48	18000	6	475032N
M475.0125.32.06.IK	16	125	32	50	32	56	15000	6	475032N
M475.0160.40.06.IK	20	160	44	60	40	70	13000	6	475032N
M475.0200.40.06.IK	26	200	54	50	40	90	11000	6	475032N
M475.0100.27.08.IK	12	100	25	50	27	48	15000	8	475043N
M475.0125.32.08.IK	16	125	32	50	32	56	12000	8	475043N
M475.0160.40.08.IK	20	160	44	60	40	70	10000	8	475043N
M475.0200.40.08.IK	26	200	54	50	40	90	8000	8	475043N

取り付け寸法 DIN 138 準拠
Bore (d3) with cross keyway to DIN 138

予備部品

Spare Parts

アーバー取付型カッター Arbour Mounted Cutter	クランプねじ Clamping Screw	トルクスレンチ TORX PLUS® Wrench
M475...05	030.3541.T8P	T8PL
M475...06	030.3550.T10P	T10PL
M475...08	030.350P.1110	T15PQ



超硬材種
Carbide grades

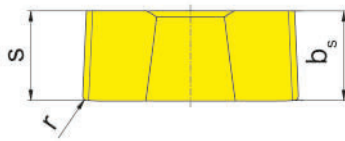
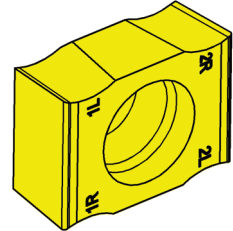
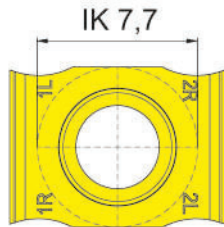
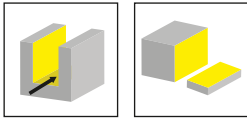
▲ 在庫品
on stock

△ 4 週間
4 weeks

型式 Part number	b_s	r	s	HIS	RC4G
S475.0162.10.02	1,6	0,2	1,62	475016N	▲
S475.0163.10.04	1,61	0,4	1,63	475016N	△
S475.0163.10.05	1,61	0,5	1,63	475016N	△
S475.0222.10.02	2,2	0,2	2,22	475022N	▲
S475.0223.10.04	2,21	0,4	2,23	475022N	△
S475.0223.10.05	2,21	0,5	2,23	475022N	△
S475.0222.10.08	2,22	0,8	2,22	475022N	△

平均切りくず厚さ h_m medium thickness of chip		
高剛性 0,05 very rigid	安定 0,03 rigid	不安定 0,01 not rigid

P	●
M	●
K	●
N	-
S	-
H	-



超硬材種
Carbide grades

▲ 在庫品
on stock

△ 4 週間
4 weeks

型式 Part number	b_s	r	s	HIS	RC4G
S475.0273.10.02	2,7	0,2	2,73	475027N	▲
S475.0274.10.04	2,71	0,4	2,74	475027N	△
S475.0275.10.05	2,72	0,5	2,75	475027N	△
S475.0275.10.08	2,74	0,8	2,74	475027N	△
S475.0275.10.10	2,75	1	2,75	475027N	△
S475.0276.10.12	2,76	1,2	2,76	475027N	△
S475.0323.10.02	3,2	0,2	3,23	475032N	▲
S475.0324.10.04	3,21	0,4	3,24	475032N	△
S475.0325.10.05	3,22	0,5	3,25	475032N	△
S475.0325.10.08	3,24	0,8	3,24	475032N	△
S475.0325.10.10	3,25	1	3,25	475032N	△
S475.0326.10.12	3,26	1,2	3,26	475032N	△
S475.0327.10.15	3,27	1,5	3,27	475032N	△
S475.0433.10.02	4,3	0,2	4,33	475043N	▲
S475.0434.10.04	4,31	0,4	4,34	475043N	△
S475.0435.10.05	4,32	0,5	4,35	475043N	△
S475.0435.10.08	4,34	0,8	4,34	475043N	△
S475.0435.10.10	4,35	1	4,35	475043N	△
S475.0436.10.12	4,36	1,2	4,36	475043N	△
S475.0437.10.15	4,37	1,5	4,37	475043N	△
S475.0439.10.20	4,39	2	4,39	475043N	△

平均切りくず厚さ h_m
medium thickness of chip

高剛性 0,05 安定 0,03 不安定 0,01
very rigid rigid not rigid

P	●
M	●
K	●
N	-
S	-
H	-

被削材 Material		材種 グループ Material group	硬度 (HB) Hardness Brinell	張力 R_m [N/mm ²] Tensile Strength	被削材例 Example Material	切削速度 Cutting speed vc (m/min) RC4G	
P 炭素鋼 Carbon steel	~ 0,2 % C	P1.1	125	430	S15CK	160-240	
	~ 0,4% C 焼鈍材 annealed	P1.2	190	610	SPV36	160-240	
	~ 0,4% C 焼入材 quenched	P1.3	210	640	SCMn3A	160-240	
	~ 0,6% C 焼鈍材 annealed	P1.4	190	610	S55C	160-240	
	~ 0,6% C 焼入材 quenched	P1.5	300	1000	S58C	160-240	
	快削鋼 Free cutting steel	P1.6	220	750	SUM22	160-240	
	合金鋼 (<5%) Alloyed steel	焼鈍材 annealed	P2.1	180	590	SUJ2	180-220
		焼入材 quenched	P2.2	280	960	SNC415	180-220
		焼入材 quenched	P2.3	350	1250	SCM435	180-220
		焼入材 quenched	P2.4	430	1450	SUP9	180-220
	高合金鋼 (>5%) high alloyed steel	焼鈍材 annealed	P3.1	200	680	SUH21	80-120
		焼入鋼 hardened	P3.2	350	1200	SKD2	80-100
	鋳鋼 Cast steel	非合金 unalloyed	P4.1	180	590	FC200	160-220
		合金 alloyed	P4.2	220	750	SCH2X2	80-140
	焼結鋼 Sintered steel	ソフト soft	P5.1	220	570	SMF5030	
	M ステンレス鋼 Stainless steel	マルテンサイト系 フェライト系 martensitic ferritic	M1.1	200	680	SUS416	80-140
オーステナイト系 フェライト系 austenitic ferritic		M1.2	300	1000	SUS316LN	70-120	
オーステナイト系 austenitic		M1.3	230	780	SUS316LN	70-120	
K ねずみ鋳鉄 Grey cast iron	低張力 low tensile strength	K1.1	180	250	FC250	180-250	
	高張力 high tensile strength	K1.2	250	350	FC350 相当	120-180	
	球状黒鉛鋳鉄 Spheroidal graphite cast iron	フェライト系 ferritic	K2.1	160	400	FCD400	120-160
		パーライト系 perlitic	K2.1	260	700	FCD600	120-160
	可鍛鋳鉄 Malleable cast iron	フェライト系 ferritic	K3.1	200	400	FCMWP440	60-120
		パーライト系 perlitic	K3.2	260	700	FCMP490 相当	80-140



溝入れ加工のベストソリューションを
ご提案いたします。

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輸入総代理店

—

株式会社IZUSHI

中部支店／刈谷テクニカルセンター

〒448-0807 愛知県刈谷市東刈谷町二丁目二番地 2

Tel 0566-62-8075

Fax 0566-62-8084

horn@ztec-izushi.co.jp

www.phhorn.jp

DEUTSCHLAND, STAMMSITZ

GERMANY, HEADQUARTERS

—

Hartmetall Werkzeugfabrik

Paul Horn GmbH

Horn-Straße 1

D-72072 Tübingen

Tel +49 7071 / 70040

Fax +49 7071 / 72893

info@de.horn-group.com

horn-group.com