

NARROW WIDTH SLITTERS



Cutter Series:
TSC

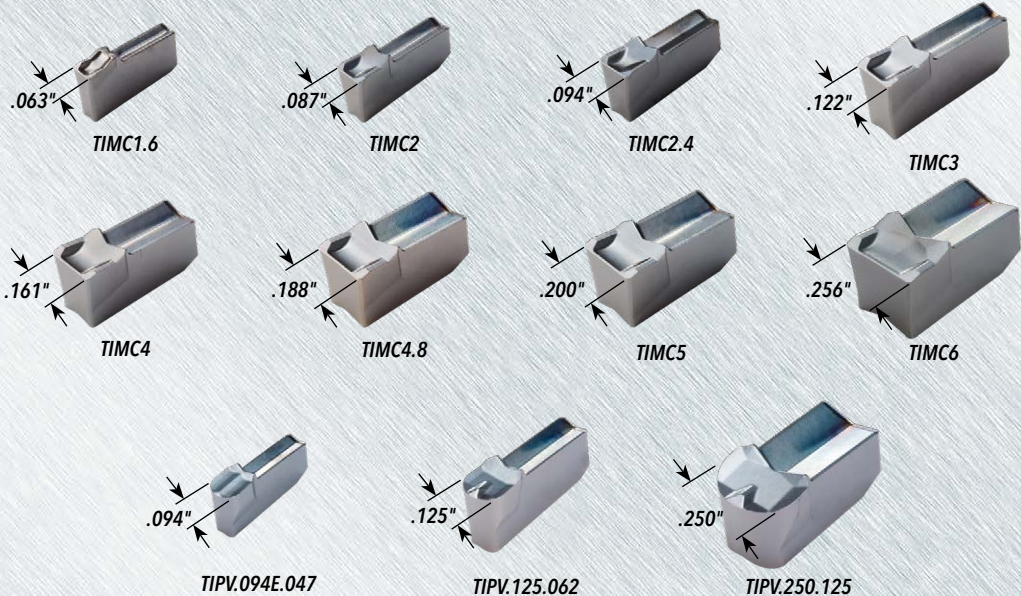
Insert Series:
TIMC, TIPV

Diameter Range:
Ø3.00"-8.00"

Width Range:
.063"-.256"

Applications:
Slitting & Sawing

Materials:
Iron, Steel, Stainless Steel,
Hi-Temps, Titanium



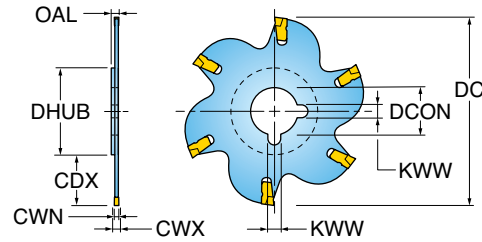
General Features:

- Narrow widths starting at .063"
- Simple easy-to-mount inserts...no wedges, clamps or screws
- Secure insert retention
- Self-positioning insert stopper for repeatability and minimal runout
- Positive rake geometry reduces cutting forces



TOCLAMP^{ULTRA}™ SERIES TSC_A

THIN SLITTER (.063 - .094 WIDTH)

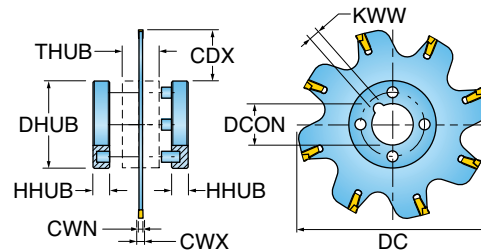


Part Number	DC Cutting Diameter	CWN Cutting Width Min.	CWX Cutting Width Max.	CDX Cutting Depth Max.	ZNP Peripheral Insert Count	DHUB Hub Diameter	OAL Overall Length	DCON Bore Diameter	KWW Keyway	SSC Insert Seat Size	RPMX RPM Max.
TSC3.0631.000A	3.000	0.063	0.063	0.71	8	1.54	0.10	1.000	0.25	1	1050
TSC3.0871.000A	3.000	0.087	0.094	0.71	8	1.54	0.10	1.000	0.25	2	1050
TSC4.0631.000A	4.000	0.063	0.063	1.21	10	1.54	0.10	1.000	0.25	1	780

NOTE: Insert extractor supplied with each cutter. Note maximum RPM ratings. Cutter width is dictated by insert width.

TOCLAMP^{ULTRA}™ SERIES TSC_K

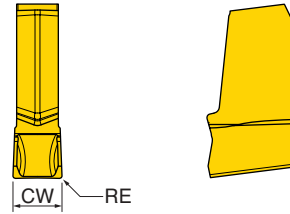
THIN SLITTER (.122 - .256 WIDTH)



Part Number	DC Cutting Diameter	CWN Cutting Width Min.	CWX Cutting Width Max.	CDX Cutting Depth Max.	ZNP Peripheral Insert Count	DHUB Hub Diameter	HHUB Hub Height	THUB Hub Thickness	DCON Bore Diameter	KWW Keyway	SSC Insert Seat Size	RPMX RPM Max.
TSC4.1221.000K	4.000	0.122	0.161	1.08	6	1.81	0.390	0.874	1.000	0.25	4	780
TSC4.1881.000K	4.000	0.188	0.200	1.08	6	1.81	0.390	0.937	1.000	0.25	4	780
TSC5.1221.250K	5.000	0.122	0.161	1.40	8	2.17	0.390	0.874	1.250	0.31	4	630
TSC5.1881.250K	5.000	0.188	0.200	1.40	8	2.17	0.390	0.937	1.250	0.31	4	630
TSC6.1221.500K	6.000	0.122	0.161	1.41	10	3.15	0.470	1.034	1.500	0.38	4	520
TSC6.1881.500K	6.000	0.188	0.200	1.41	10	3.15	0.470	1.097	1.500	0.38	4	520
TSC6.2361.500K	6.000	0.220	0.256	1.41	10	3.15	0.470	1.143	1.500	0.38	6	520
TSC8.1221.500K	8.000	0.122	0.161	2.41	14	3.15	0.470	1.034	1.500	0.38	4	390
TSC8.1881.500K	8.000	0.188	0.200	2.41	14	3.15	0.470	1.097	1.500	0.38	4	390
TSC8.2361.500K	8.000	0.220	0.256	2.41	14	3.15	0.470	1.143	1.500	0.38	6	390

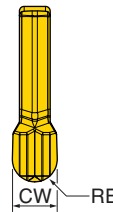
NOTE: Insert extractor supplied with each cutter. Hub-set ordered separately. Note maximum RPM ratings. Cutter width is dictated by insert width.

TOCLAMP^{ULTRA}™ INSERTS





Part Number	CW Cutting Width	RE Corner Radius	SSC Insert Seat Size	IH Insert Hand	Grade	TT6030	TT8020	TT9030
TIMC1.6	0.063	0.006	1	Neutral		•	•	•
TIMC2	0.087	0.008	2	Neutral		•	•	•
TIMC2.4	0.094	0.008	2	Neutral		•	•	•
TIMC3	0.122	0.008	4	Neutral		•	•	•
TIMC4	0.161	0.010	4	Neutral		•	•	•
TIMC4.8	0.189	0.011	4	Neutral		•	•	
TIMC5	0.200	0.012	4	Neutral			•	

TOCLAMP^{ULTRA}™ FULL RADIUS INSERTS



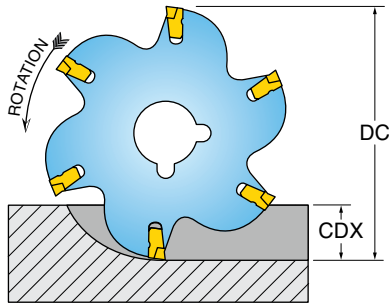
Part Number	CW Cutting Width	RE Corner Radius	SSC Insert Seat Size	IH Insert Hand	Grade	TT6030	TT8020	TT9030
TIPV.094.047	0.094	0.047	2	Neutral			•	
TIPV.125.062	0.125	0.062	4	Neutral			•	
TIPV.250.125	0.250	0.125	6	Neutral			•	

TOCLAMP^{ULTRA}™ HARDWARE

Part Number		
	Insert Extractor	Hub Set
TSC3.0631.000A	HZS.0012	-
TSC3.0871.000A	HZS.0012	-
TSC4.0631.000A	HZS.0012	-
TSC4.1221.000K	HZS.0012	FL-0002
TSC4.1881.000K	DR-0031	FL-0002
TSC5.1221.250K	HZS.0012	FL-0003
TSC5.1881.250K	DR-0031	FL-0003
TSC6.1221.500K	HZS.0012	FL-0004
TSC6.1881.500K	DR-0031	FL-0004
TSC6.2361.500K	DR-0031	FL-0004
TSC8.1221.500K	HZS.0012	FL-0004
TSC8.1881.500K	DR-0031	FL-0004
TSC8.2361.500K	DR-0031	FL-0004

TOCLAMP^{ULTRA}™ OPERATING GUIDELINES

Series TSC				Feed per Insert by Width Range				Grades			Coolant
Material	Brinnell Hardness	SFM	0.063	.087-.094	.122-.161	.188-.250	TT6030	TT8020	TT9030		
Aluminum	6061-T6, 7075-T6, 2024	-	700 - 800	.001-.004	.002-.007	.002-.008	.003-.009	1			Yes
Cast Iron	Gray	150 - 250	300 - 600	.001-.004	.002-.006	.002-.007	.003-.008	1		2	No
	Nodular		250 - 500								
Steel	Low Carbon 1018, 8620	100 - 250	400 - 700	.001-.004	.002-.006	.002-.007	.003-.008		1	2	No
	High Carbon F-6180	250 - 400	300 - 600								
	Alloyed Steel 4140, 4340	150 - 300	300 - 500								
	Tool Steel A-6, D-1, D-2	Up to 300									
Stainless Steel	300 Series, 304, 316	-	300 - 500	.001-.004	.002-.006	.002-.006	.003-.006		1	2	May not be required at high speeds
	400 Series 15-5 PH	Up to 320	350 - 550								
	13-8 PH	-	200 - 400								
Nickel Alloys	Inconel, Hastelloy, Waspalloy	-	70-100	.001-.003	.002-.005	.002-.005	.002-.005		2	1	Yes
Titanium	6AL-4V	-	100 - 130	.001-.003	.002-.005	.002-.005	.002-.005		1	2	Yes



For radial depths of cut (CDX) less than 1/4 of cutter diameter (DC), increase feed rates by the following %

Depth of Cut (CDX) x Cutter Dia. (DC)	1/4	1/6	1/8	1/10	1/20
Increase Feed Rate by	0%	15%	30%	45%	100%

Insert Loading Procedure

1. Be sure insert pockets are free of dirt prior to assembly.
2. Manually place insert into seat and tap into position using a plastic hammer.



Insert Removal Procedure

1. To remove inserts from the cutter body, first, place insert extractor into space behind the insert.
2. Turn the extractor 90° until the insert is dislodged from the pocket.
3. One extractor is provided with each cutter.



Cutter Mounting

When using drive flange-style cutter bodies, the use of a drive flange set is highly recommended to provide more bearing surface for the drive key. Without the drive flange set, the drive flange key or arbor may be damaged when the cutter is run at high speeds.

