CAT.AC8000PBROCHURE.7/21

SUMITOMO

CARBIDE - CBN - DIAMOND

Coated Grades for Steel Turning

AC8015P/AC8020P/AC8025P/AC8035P

P M K N S H

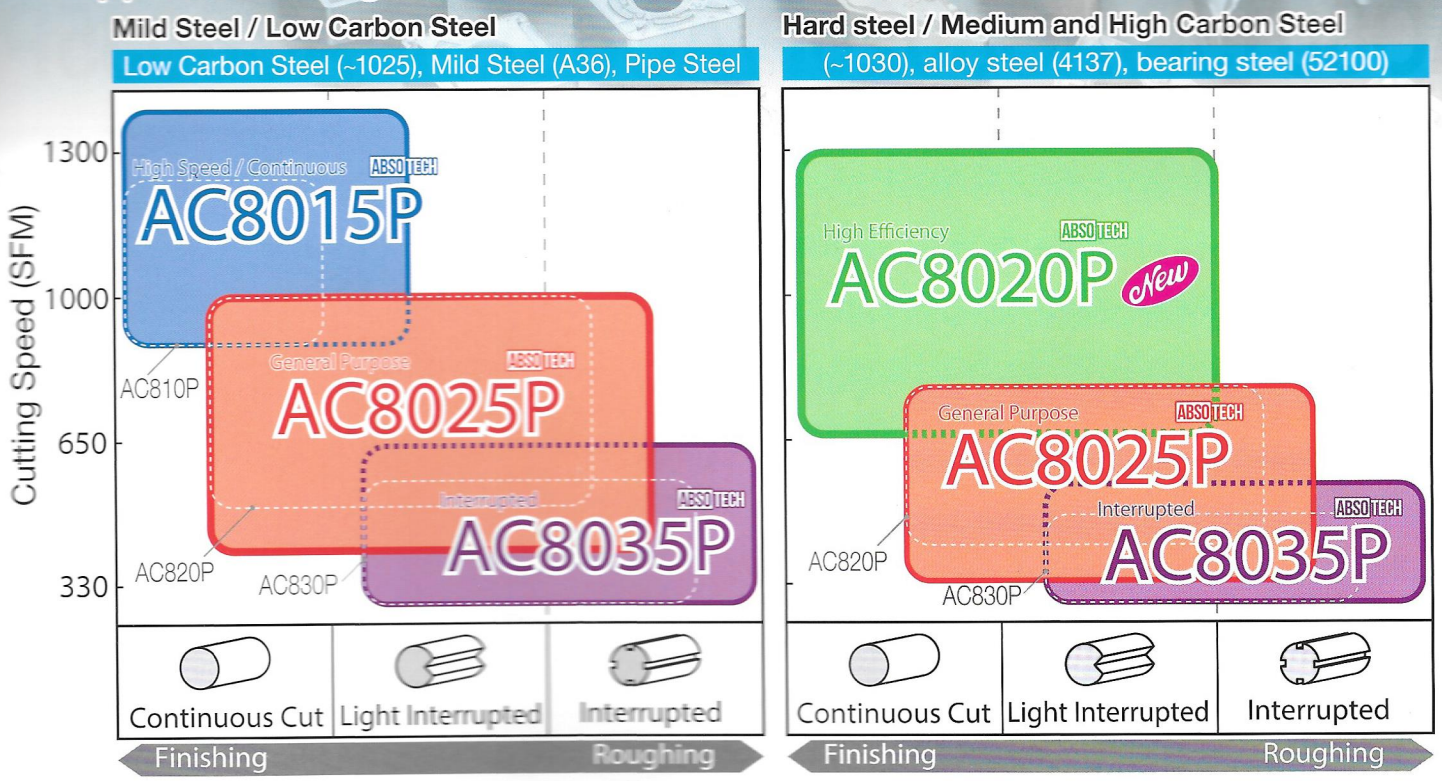
SUMITOMO ELECTRIC GROUP

Coated grades for Steel Turning

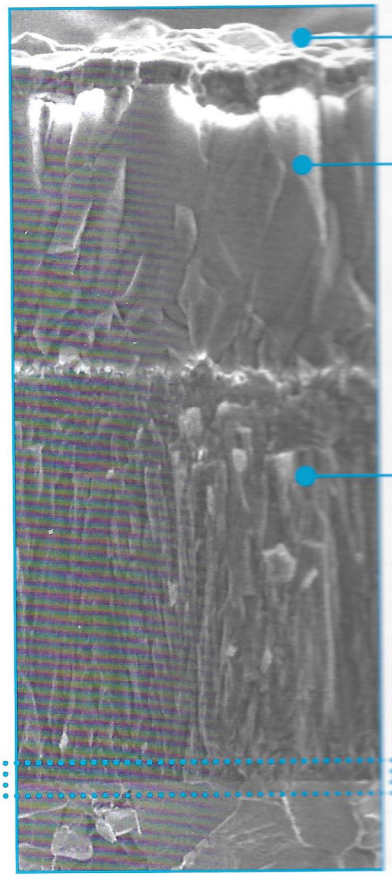
AC8015P/AC8020P/AC8025P/AC8035P

New

Application Range



AC8000P Series Features



Special surface treatment

Excellent chipping resistance
Greatly improved welding resistance

High-strength alumina layer

Crystal orientation direction control technology significantly improves film strength

High hardness fine grain TiCN layer

Significantly improved film hardness by making the crystal structure finer and more uniform

High adhesion technology

Greatly improved film adhesion strength by smoothing the interface between cemented carbide base material and film

AC8015P AC8035P

Stress Application

Crater wear / defect reduction

AC8025P

Smooth Surface

Suppression of welding and chipping

AC8020P New

Stress Application

Gold Surface

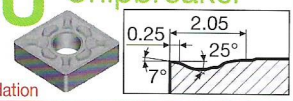
Chip control and improved visibility

AC8015P/AC8020P/AC8025P/AC8035P

■ Chipbreaker Selection Guide

1st Recommendation General Purpose Grade

AC8025P + **EGU** Chipbreaker (1st Recommendation)



Units (mm)	Better Wear Resistance		General Purpose	Better Toughness
Finish to Small Depth	EFE (1.40, 0.70, 20°)	ESE (1.5, 0.1, 17°, 5°)	ESU (1.3, 13°)	ESX (1.35, 0.2, 15°, 3°)
General Purpose	EGE (2.0, 0.25, 23°, 3°)		EGU (2.05, 0.25, 25°, 7°)	EUX (2.0, 0.25, 15°)
Rough to Larger Cutting Depth	EME (2.4, 0.3, 4°)		EMU (2.5, 0.3, 20°, 4°)	EMX (2.3, 0.2, 0.4, 20°, -15°)

High-Speed Continuous Machining of Mild Steel

AC8015P

Low Depth of Cut for Extended Tool Life	EFE	1.40, 0.70, 20°
High-Efficiency Finishing	ESE	1.5, 0.1, 17°, 5°

Interrupted Machining with Emphasis on Stability

AC8035P

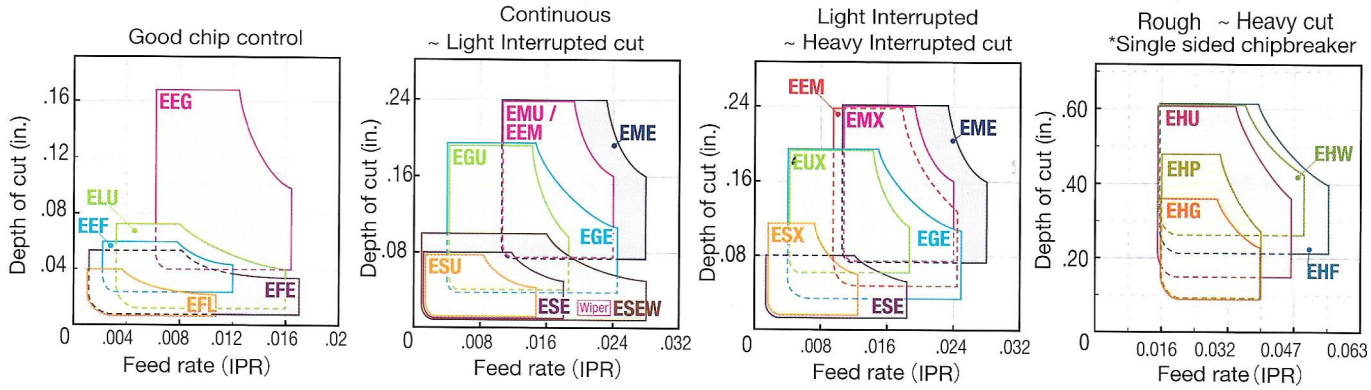
Extend Tool Life	EGU	2.05, 0.25, 25°, 7°
Stable Cutting	EUX	2.0, 0.25, 15°

High-Efficiency Machining of High-Hardness Materials and Forged Materials

AC8020P *New*

Increased Feed Rates	EGE	2.0, 0.25, 23°, 3°
Increased Cutting Speeds	EGU	2.05, 0.25, 25°, 7°

■ Chipbreaker Application Range

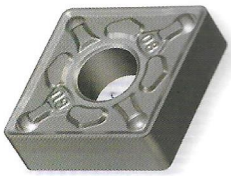


AC8015P

Grade for High Speed Machnining

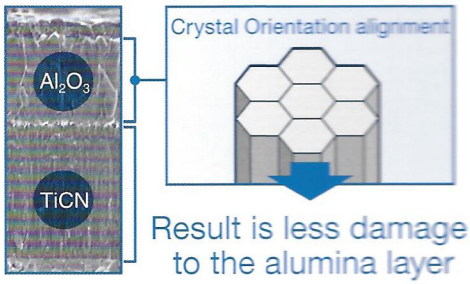
Suppresses crater damage due to chip scraping
Double crater wear resistance

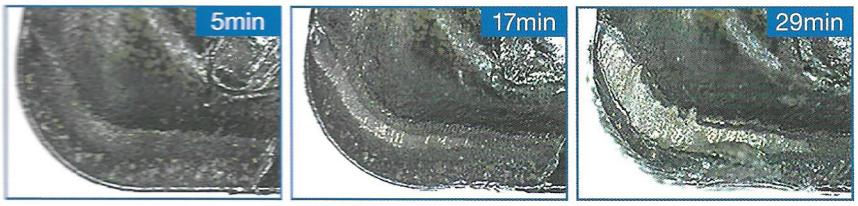
ABSOTECH | High-strength Alumina Layer | Excellent chipping resistance



Significantly reduced crater damage due to chip scraping and the impact of the crystal orientation of the alumina layer

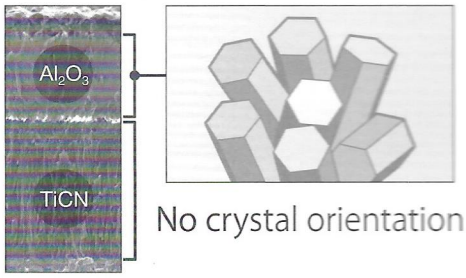
AC8015P



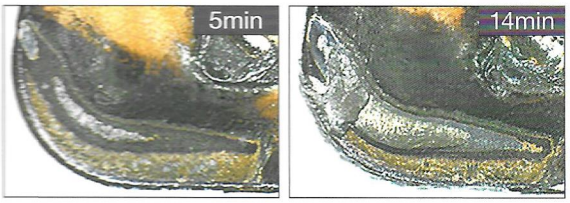


Minor Wear | TiCN layer exposed | Lifespan reached

Conventional Grade



No crystal orientation



TiCN layer exposed | Lifespan reached

Significant Crater Damage

Part Material : Bearing Steel (OD Continuous) Insert : CNMG432EGU-AC8015P
Cutting Conditions : v_c= 985SFM f = .0118 IPR a_p = .059" Wet

■ AC8015P Cutting Conditions

Insert	Chipbreaker	Soft steel, Low carbon steel (1010, etc.) Low alloy steel (4130, etc.) 180HB or less			High carbon steel (1045, etc.) High alloy steel (4137, etc.) 180HB or more		
		Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)	Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)
CNM□43□ TNM□33□ DNM□43□ TNM□43□ SNM□43□ WNM□43□	EFE	.004 - .050	.004 - .016	625 - 1650	.004 - .050	.004 - .016	450 - 1500
	ELU, ESU, ESE	.020 - .080	.004 - .016	550 - 1550	.020 - .080	.004 - .016	425 - 1400
	ESEW	.020 - .100	.004 - .024	550 - 1550	.020 - .100	.004 - .024	425 - 1400
	EGU, EGE, EUX	.030 - .200	.004 - .018	550 - 1550	.030 - .200	.004 - .018	425 - 1400
	EMU	.070 - .235	.008 - .024	450 - 1300	.070 - .235	.008 - .024	350 - 1150
	EME	.070 - .235	.008 - .028	450 - 1300	.070 - .235	.008 - .028	350 - 1150
	EHG	.120 - .315	.014 - .032	450 - 1300	.120 - .315	.014 - .032	350 - 1150
CNM□54□ SNM□54□	EGU, EGE, EUX	.030 - .200	.006 - .018	450 - 1300	.030 - .200	.006 - .018	350 - 1150
	EMU	.070 - .235	.008 - .024	450 - 1100	.070 - .235	.008 - .024	350 - 925
	EME	.060 - .275	.008 - .028	450 - 1100	.060 - .275	.008 - .028	350 - 925
	EHG	.120 - .315	.014 - .032	400 - 1000	.120 - .315	.014 - .032	300 - 825
CNM□64□ SNM□64□ CNM□86□ SNM□86□ DNM□54□ TNM□54□	EMU	.070 - .250	.008 - .024	450 - 1100	.070 - .250	.008 - .024	350 - 925
	EME	.080 - .315	.008 - .028	450 - 1100	.080 - .315	.008 - .028	350 - 925
	EHG	.120 - .350	.014 - .032	400 - 1000	.120 - .350	.014 - .032	300 - 825

AC8020P

Achieves both high wear resistance and stability chipping resistance more than **2.5 times**

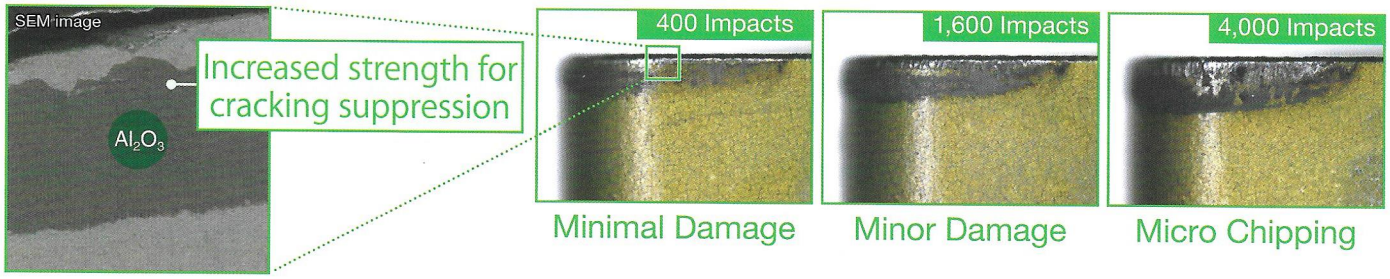
Grade for High Efficiency Machining

New

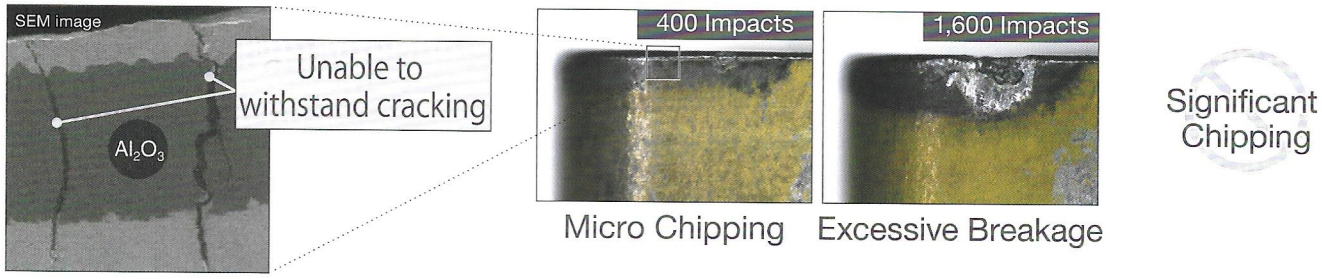
ABSOTECH | High-strength Alumina Layer | Excellent chipping resistance

Enhanced chip control from increased strength of the alumina layer

AC8020P



Conventional Grade



Part Material : Cr–Mo 4137 Steel Insert : CNMG432EGU-AC8020P
Cutting Conditions : v_c = 900 SFM f = .0118 IPR a_p = .059" Wet

■ AC8020P Cutting Conditions

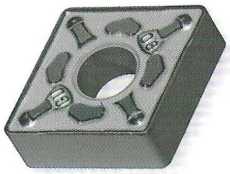
Insert	Chipbreaker	Soft steel, Low carbon steel (1010, etc.) Low alloy steel (4130, etc.) 180HB or less			High carbon steel (1045, etc.) High alloy steel (4137, etc.) 180HB or more		
		Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)	Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)
CNM□43□ TNM□33□ DNM□43□ TNM□43□ SNM□43□ WNM□43□	EFE	.004 - .050	.004 - .016	590 - 1475	.004 - .050	.004 - .016	425 - 1300
	ELU, ESU, ESE	.020 - .080	.004 - .016	525 - 1375	.020 - .080	.004 - .016	400 - 1200
	ESEW	.020 - .100	.004 - .024	525 - 1375	.020 - .100	.004 - .024	400 - 1200
	EGU, EGE, EUX	.030 - .200	.004 - .018	525 - 1375	.030 - .200	.004 - .018	400 - 1200
	EMU	.070 - .235	.008 - .024	450 - 1150	.070 - .235	.008 - .024	325 - 1000
	EME	.070 - .235	.008 - .028	450 - 1150	.070 - .235	.008 - .028	325 - 1000
	EHG	.120 - .315	.014 - .032	400 - 1080	.120 - .315	.014 - .032	325 - 1000
CNM□54□ SNM□54□	EGU, EGE, EUX	.030 - .200	.006 - .018	360 - 1150	.030 - .200	.006 - .018	325 - 1000
	EMU	.070 - .235	.008 - .024	400 - 980	.070 - .235	.008 - .024	325 - 825
	EME	.060 - .275	.008 - .028	400 - 980	.060 - .275	.008 - .028	325 - 825
	EHG	.120 - .315	.014 - .032	360 - 900	.120 - .315	.014 - .032	250 - 725
CNM□64□ SNM□64□ CNM□86□ SNM□86□ DNM□54□ TNM□54□	EMU	.070 - .250	.008 - .024	400 - 980	.070 - .250	.008 - .024	325 - 825
	EME	.080 - .315	.008 - .028	400 - 980	.080 - .315	.008 - .028	325 - 825
	EHG	.120 - .350	.014 - .032	360 - 900	.120 - .350	.014 - .032	250 - 725

AC8025P

General Purpose Grade

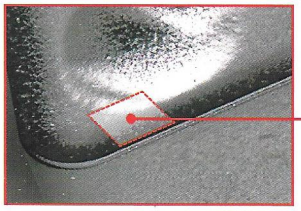
Double the adhesion and breakage resistance!

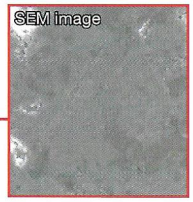
ABSOTECH Smooth Surface Absolute Reliability



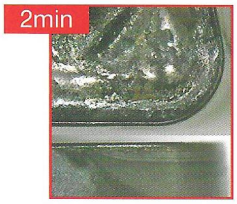
Improved tool surface smoothness and significantly reduced adhesions through special surface treatment

AC8025P

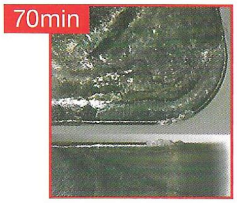


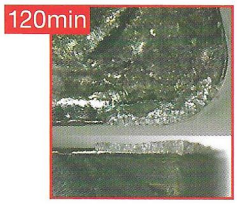


Ra0.04μm



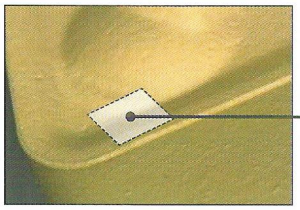
Normal Wear

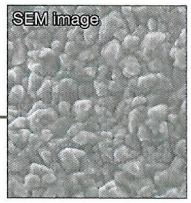




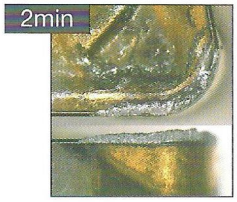
Controlled tool life during long cut time

Conventional

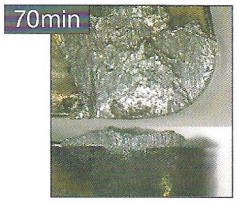




Ra0.4μm



Adhesions



Breakage

Unable to Continue

Part Material : Chrome-molybdenum Alloy Steel (End Face) Insert : CNMG432EGU-AC8025P
Cutting Conditions : v_c = 330 - 960 SFM f = .0118 IPR a_p = .059" Wet

AC8025P Cutting Conditions

Insert	Chipbreaker	Soft steel, Low carbon steel (1010, etc.) Low alloy steel (4130, etc.) 180HB or less			High carbon steel (1045, etc.) High alloy steel (4137, etc.) 180HB or more		
		Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)	Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)
CNM□43□ TNM□33□ DNM□43□ TNM□43□ SNM□43□ WNM□43□	EFE	.004 - .050	.004 - .016	500 - 1150	.004 - .050	.004 - .016	400 - 1000
	ELU, ESU, ESE	.020 - .080	.004 - .016	500 - 1150	.020 - .080	.004 - .016	400 - 1000
	ESEW	.020 - .100	.004 - .024	500 - 1150	.020 - .100	.004 - .024	400 - 1000
	EGU, EGE, EUX	.030 - .200	.004 - .018	500 - 1000	.030 - .200	.004 - .018	325 - 900
	EMU	.070 - .235	.008 - .024	425 - 925	.070 - .235	.008 - .024	250 - 750
	EME	.070 - .235	.008 - .028	425 - 925	.070 - .235	.008 - .028	250 - 750
	EHG	.120 - .315	.014 - .032	325 - 850	.120 - .315	.014 - .032	200 - 650
CNM□54□ SNM□54□	EGU, EGE, EUX	.030 - .200	.006 - .018	425 - 925	.030 - .200	.006 - .018	325 - 750
	EMU	.070 - .235	.008 - .024	325 - 850	.070 - .235	.008 - .024	250 - 700
	EME	.060 - .275	.008 - .028	325 - 850	.060 - .275	.008 - .028	250 - 700
	EHG	.120 - .315	.014 - .032	250 - 800	.120 - .315	.014 - .032	225 - 600
CNM□64□ SNM□64□ CNM□86□ SNM□86□ DNM□54□ TNM□54□	EMU	.070 - .250	.008 - .024	325 - 850	.070 - .250	.008 - .024	250 - 700
	EME	.080 - .315	.008 - .028	325 - 850	.080 - .315	.008 - .028	250 - 700
	EHG	.120 - .350	.014 - .032	250 - 800	.120 - .350	.014 - .032	225 - 600
	EHF	.175 - .535	.018 - .045	400 - 725	.175 - .535	.018 - .045	350 - 625

AC8035P

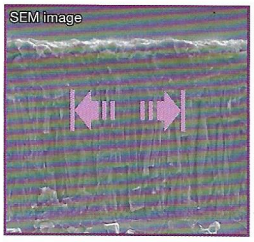
More than double the fracture resistance performance

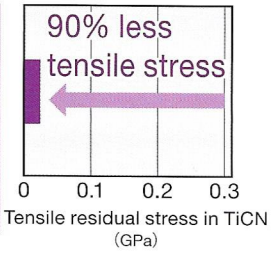
Grade for Interrupted Cutting

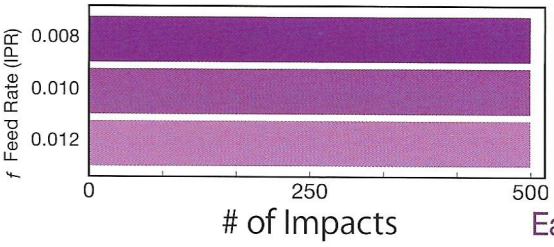
ABSOTECH | Coating Stress Control | Excellent Stability

Special surface treatment reduces tensile residual stress and significantly reduces chipping

AC8035P

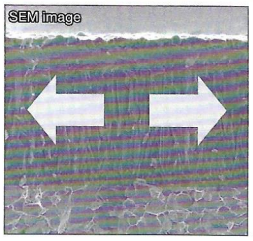


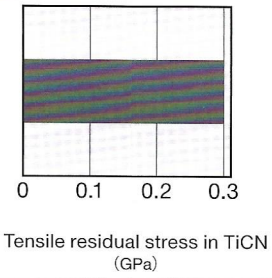


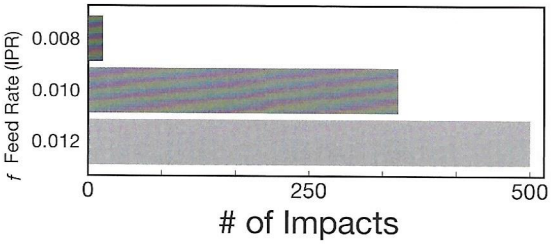


Each corner can continue

Conventional







Unable to continue

Part Material : 4137 Steel (External Interrupted) Insert : CNMG432EGU-AC8035P
Cutting Conditions : v_c = 530 SFM f = .0079 - .0118 IPR a_p = .079" Dry

■ AC8035P Cutting Conditions

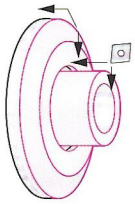
Insert	Chipbreaker	Soft steel, Low carbon steel (1010, etc.) Low alloy steel (4130, etc.) 180HB or less			High carbon steel (1045, etc.) High alloy steel (4137, etc.) 180HB or more		
		Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)	Depth of Cut (in.)	Feed Rate (IPR)	Speed vc (SFM)
CNM□43□ TNM□33□ DNM□43□ TNM□43□ SNM□43□ WNM□43□	EFE	.004" - .050"	.004" - .016"	400 - 1000	.004" - .050"	.004" - .016"	400 - 825
	ELU, ESU, ESE	.020" - .080"	.004" - .016"	400 - 1000	.020" - .080"	.004" - .016"	400 - 825
	ESEW	.020" - .100"	.004" - .024"	400 - 1000	.020" - .100"	.004" - .024"	325 - 650
	EGU, EGE, EUX	.030" - .200"	.004" - .018"	325 - 825	.030" - .200"	.004" - .018"	250 - 600
	EMU	.070" - .235"	.008" - .024"	325 - 825	.070" - .235"	.008" - .024"	250 - 600
	EME	.070" - .235"	.008" - .028"	325 - 650	.070" - .235"	.008" - .028"	225 - 525
	EHG	.120" - .315"	.014" - .032"	325 - 825	.120" - .315"	.014" - .032"	300 - 550
CNM□54□ SNM□54□	EGU, EGE, EUX	.030" - .200"	.006" - .018"	325 - 650	.030" - .200"	.006" - .018"	225 - 500
	EMU	.070" - .235"	.008" - .024"	325 - 650	.070" - .235"	.008" - .024"	225 - 500
	EME	.060" - .275"	.008" - .028"	250 - 600	.060" - .275"	.008" - .028"	200 - 450
	EHG	.120" - .315"	.014" - .032"	325 - 650	.120" - .315"	.014" - .032"	225 - 500
CNM□64□ SNM□64□ CNM□86□ SNM□86□ DNM□54□ TNM□54□	EMU	.070" - .250"	.008" - .024"	325 - 650	.070" - .250"	.008" - .024"	225 - 500
	EME	.080" - .315"	.008" - .028"	250 - 600	.080" - .315"	.008" - .028"	200 - 450
	EHG	.120" - .350"	.014" - .032"	400 - 625	.120" - .350"	.014" - .032"	300 - 525
	EHF	.175" - .535"	.018" - .045"	225 - 500	.175" - .535"	.018" - .045"	150 - 400

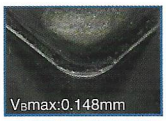
AC8015P Application Examples

4130 Steel — Gear

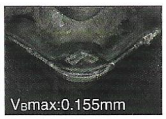
AC8015P

AC8015P ensures minimal wear and a 1.5x extension of tool life





AC8015P EUX
150 pieces



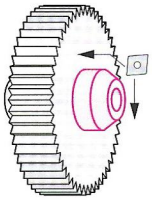
Comp's
100 pieces

Insert: CNMG433EUX-AC8015P Roughing
Cutting Conditions: v_c=920 sfm f=0.010 IPR a_p=0.08 - .1" Wet

4137 Steel — Ring gear

AC8015P

AC8015P ensures minimal crater wear and a 1.5x extension of tool life



AC8015P EGE
150 pieces

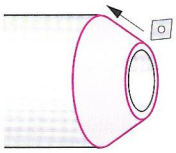
Comp's
100 pieces

Insert: CNMG433EGE-AC8015P
Cutting Conditions: v_c=655-855 sfm f=0.012 - .016 IPR a_p=0.06" Wet

4140 Steel — Pipe

AC8015P

AC8015P's excellent chipping resistance ensures minimal damage and a 2x extension of tool life



AC8015P EMU
25 pieces

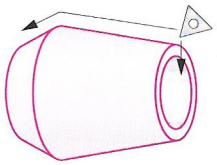
Comp's
12 pieces

Insert: CNMG433EMU-AC8015P Roughing
Cutting Conditions: v_c=520 sfm f=0.0178 IPR a_p=0.098" Wet

52100 Bearing Steel — Toolholder

AC8015P

AC8015P ensures minimal breakage and a 1.7x extension of tool life



AC8015P EGE
500 pieces

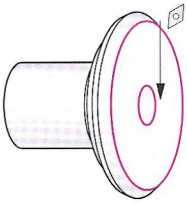
Comp's
300 pieces

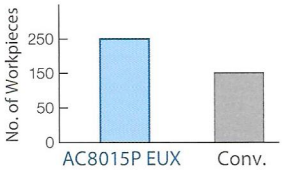
Insert: TNMG331EGE-AC8015P
Cutting Conditions: v_c=690-880 sfm f=0.0079 IPR a_p=0.13" Wet

1055 Steel — Hub

AC8015P

AC8015P ensures minimal wear and a 1.7x extension of tool life



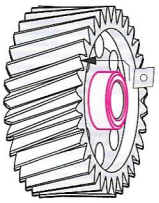


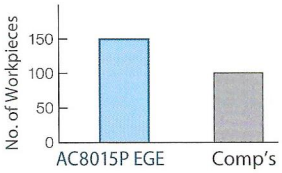
Insert: DNMG433EUX-AC8015P
Cutting Conditions: v_c=785 sfm f=0.02 IPR a_p=0.04 -.10" Wet

4137 Steel — Gear

AC8015P

AC8015P's excellent chipping resistance ensures minimal damage and a 1.5x extension of tool life



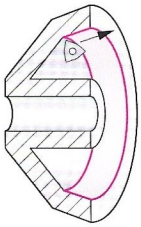


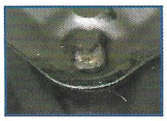
Insert: CNMG433EGE-AC8015P
Cutting Conditions: v_c=655-855 sfm f=0.012 - .016 IPR a_p=0.08" Wet

4118 Steel — CVT Part

AC8015P

AC8015P's excellent chipping resistance ensures minimal damage





AC8015P ESX
300 pieces

Conventional
300 pieces

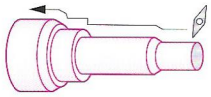
Insert: WNMG432ESX-AC8015P Mill-Scaled Work
Cutting Conditions: v_c=985 sfm f=0.008 - .011 IPR a_p=0.04" Wet

AC8015P/AC8020P/AC8025P/AC8035P

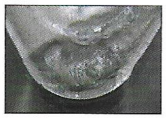
AC8020P Application Examples

Carbon Steel — CVJ Parts

Chip reduction, Tool life increased **1.7 times**



AC8020P ESE
100 Passes

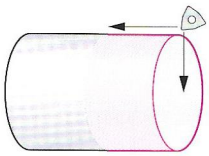


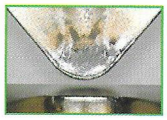
Conventional Insert
60 Passes

Insert : DNMG433ESE-AC8020P
Cutting Conditions : V_c= 720 SFM f= .0138 IPR a_p= .0394"
Wet

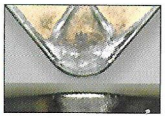
1035 Steel — Machine Tool Parts

Suppresses both crater wear and flank wear
Doubled tool life





AC8020P ESE
1,600 Passes

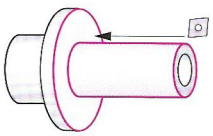


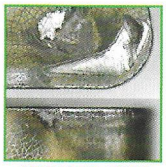
Conventional Insert
800 Passes

Insert : WNMG432ESE-AC8020P
Cutting Conditions : V_c= 790 SFM f= .009 IPR a_p= .0394"
Wet

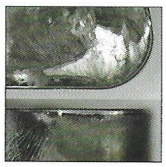
Cr–Mo steel — Transmission Parts

Crater wear reduced,
Tool life increased 1.5 times





AC8020P EGU
40 Passes

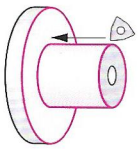


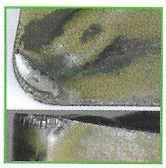
Conventional Insert
26 Passes

Insert : CNMG432EGU-AC8020P
Cutting Conditions : V_c= 820 SFM f= .0118 IPR a_p= .059"
Wet

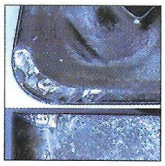
1045 Bearing Steel

Crater wear reduced,
Tool life increase 1.4 times





AC8020P ESU
230 Passes

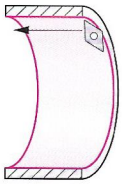


Conventional Insert
160 Passes

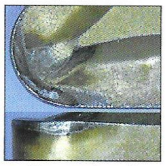
Insert : WNMG432ESU-AC8020P
Cutting Conditions : V_c= 750 SFM f= .0102 IPR a_p= .0394"
Wet

Alloy Bearing Steel

Stable processing with reduced flank wear
1.2 times longer life



AC8020P EGE
600 passes

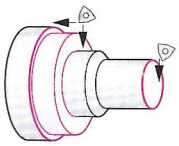


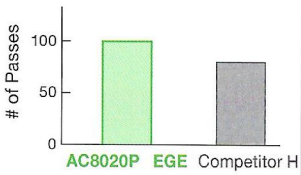
Competitor G
500 passes

Insert : DNMG433EGE-AC8020P
Cutting Conditions : V_c= 985 SFM f= .0118 IPR a_p= .0118"
Wet

Medium Carbon Steel — CVJ Parts

Stable processing with a life of 1.3 times

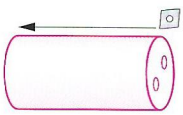


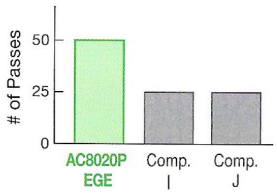


Insert : WNMG433EGE-AC8020P
Cutting Conditions : V_c= 990 SFM f= .0177 IRP a_p= .059"
Wet

4140 Steel — Auto Parts

Stable processing with reduced wear
Doubled life

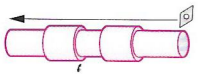




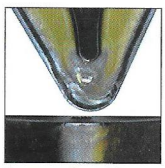
Insert : CNMG432EGE-AC8020P
Cutting Conditions : V_c= 620 SFM f= .0118 IPR a_p= .118"
Wet

Boron Steel Shaft

Reduced crater wear and chipping
Lifespan tripled



AC8020P EUX
220 Passes



Conventional Insert
70 Passes

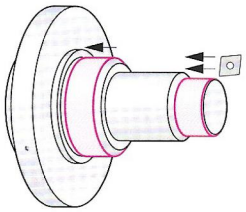
Insert : DNMG433EUX-AC8020P
Cutting Conditions : V_c= 750 SFM f= .0217 IPR a_p= .039"
Wet

AC8025P Application Examples

1045 Steel — Axle End

AC8025P

AC8025P ensures minimal crater wear.



AC8025P ENP 150 pieces

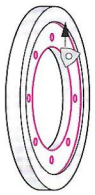
Competitor Insert 150 pieces

Insert: CNMM434ENP-AC8025P
Cutting Conditions: v_c=590 - 655 SFM f=0.017 - 0.022 IPR a_p=0.04 - 0.12" Wet

5115 Steel — Ring Gear

AC8025P

AC8025P ensures an 1.5x extension of tool life



AC8025P EME 150 pieces

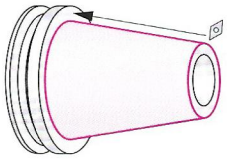
Competitor Insert 100 pieces

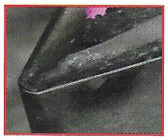
Insert: WNMG434EME-AC8025P
Cutting Conditions: v_c= 820 SFM f= .012 - .018 IPR a_p=.04 - 0.1" Wet

4120 Steel — Toolholder

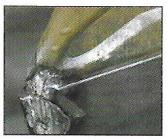
AC8025P

AC8025P's excellent chipping resistance ensures minimal damage





AC8025P EEM 100 pieces



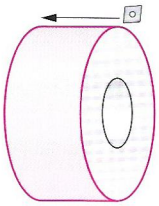
Competitor Insert 100 pieces

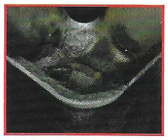
Insert: DNMG442EEM-AC8025P
Cutting Conditions: v_c=500 SFM f = .016 IPR a_p= .16" Wet

1045 Steel — Ring

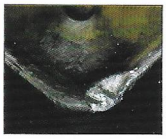
AC8025P

AC8025P ensures a 3x extension of tool life.





AC8025P EGE 450 pieces



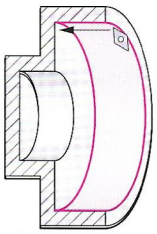
Competitor Insert 150 pieces

Insert: CNMG432EGE-AC8025P
Cutting Conditions: v_c=650 - 820 SFM f= .01 IPR a_p= .039" Wet

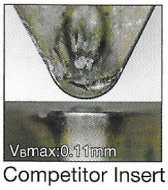
Soft Steel — Cylinder

AC8025P

AC8025P's excellent chipping resistance ensures minimal damage after attaining a 2x life



AC8025P ESU 200 pieces



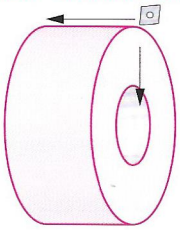
Competitor Insert 100 pieces

Insert: DCMT32.52ESU-AC8025P
Cutting Conditions: v_c=690 sfm f=0.006 IPR a_p=0.040" Wet

4320 Steel — Bushing

AC8025P

AC8025P ensures excellent flank wear resistance



AC8025P EME 200 pieces

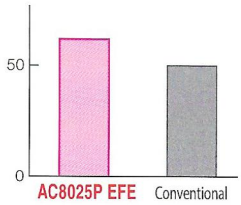
Competitor Insert 200 pieces

Insert: CNMG434EME-AC8025P
Cutting Conditions: v_c=850 SFM f= .019 - .039 IPR a_p= .06 - .08" Wet

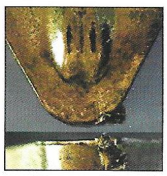
Soft Steel — Front Cover

AC8025P

AC8025P shows excellent finishing surface by the combination of EFE chipbreaker and ensures an 1.2x extension of tool life.



AC8025P EFE



Conventional

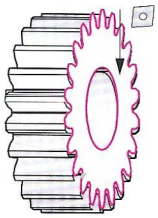
Insert: TNMG332EFE-AC8025P
Cutting Conditions: Facing: v_c=1475-1575 SFM f=.0098 - .0125 IPR a_p= .002 - .010" Wet
Internal: v_c=1310 SFM f=.008 - .012 IPR a_p= .008 - .012" Wet

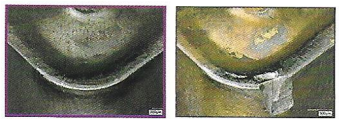
AC8035P Application Examples

1035 Steel — Planetary Pinion

AC8035P

AC8035P's excellent breakage resistance ensures minimal damage and a 1.5x extension of tool life





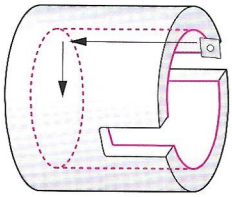
AC8035P EUX 300 pieces — Competitor Insert 200 pieces

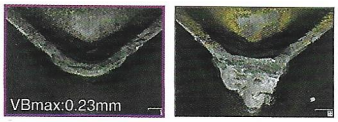
Insert: CNMG433EUX-AC8035P Interrupted
Cutting Conditions: v_c=590 SFM f=.012 IPR a_p=.080" Wet

1025 Steel — Automotive Part

AC8035P

AC8035P's excellent breakage resistance ensures minimal damage and an extended tool life





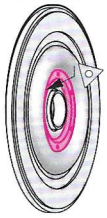
AC8035P EUX 120 pieces — Competitor Insert 120 pieces

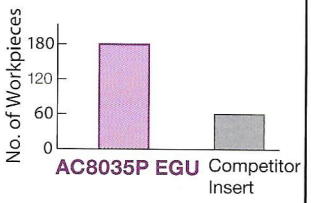
Insert: CNMG432EUX-AC8035P Interrupted
Cutting Conditions: v_c=330 - 425 SFM f=.008 IPR a_p=.040 - .125" Wet

Hot Rolled Steel — Flange

AC8035P

AC8035P's excellent chipping resistance ensures minimal damage and a 3x extension of tool life



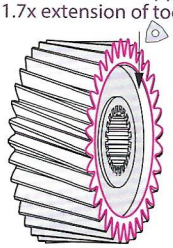


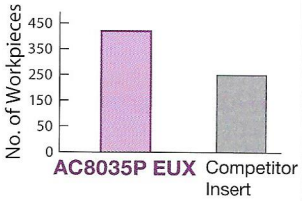
Insert: TNMG332EGU-AC8035P Roughing / Interrupted
Cutting Conditions: v_c= 330 SFM f=.012 IPR a_p=.060" Wet

NiCr Steel — Gear

AC8035P

AC8035P's excellent chipping resistance ensures minimal damage and a 1.7x extension of tool life



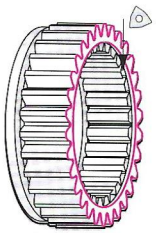


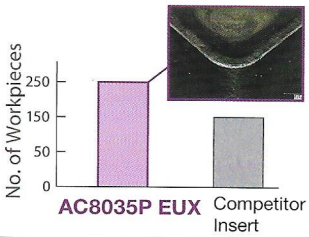
Insert: WNMG432EUX-AC8035P Roughing / Interrupted
Cutting Conditions: v_c= 590 SFM f=.006 - .016 IPR a_p=0.040" Wet

5120 Steel — Reverse gear

AC8035P

AC8035P's excellent chipping resistance ensures minimal damage and a 1.6x extension of tool life



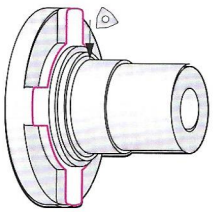


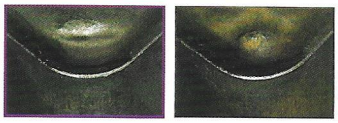
Insert: WNMG432EUX-AC8035P Roughing / Interrupted
Cutting Conditions: v_c= 755 SFM f=.006 - .012 IPR a_p=.040 - .080" Wet

5140 Steel — Flange

AC8035P

AC8035P's excellent chipping resistance ensures minimal damage and a 1.5x extension of tool life





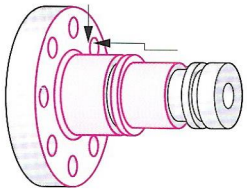
AC8035P EGU 90 pieces — Competitor Insert 60 pieces

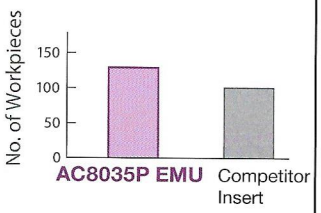
Insert: WNMG433EGU-AC8035P Roughing / Interrupted
Cutting Conditions: v_c= 260 - 655 SFM f=.008 IPR a_p=.040 - .060" Dry

Alloy Steel — Axle End

AC8035P

AC8035P's excellent chipping resistance ensures minimal damage and a 1.3x extension of tool life





Insert: CNMG644EMU-AC8035P Scaled Part/ Continuous to Interrupted
Cutting Conditions: v_c= 460 - 920 SFM f=.020 IPR a_p=.195" Dry

AC8015P/AC8020P/AC8025P/AC8035P - Negative Inserts

CNMG 80° Diamond/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Fine Finishing	EFL	CNMG322EFL			★		.3750	.1250	.0313	.1500
		CNMG431EFL		●	●		.5000	.1875	.0156	.2031
	10°	CNMG432EFL		●	●		.5000	.1875	.0313	.2031
Fine Finishing	ELU	CNMG321ELU	●	●	★		.3750	.1250	.0156	.1500
		CNMG322ELU	★	★	★		.3750	.1250	.0313	.1500
		CNMG431ELU	●	●	●	★	.5000	.1875	.0156	.2031
		CNMG432ELU	●	●	●	●	.5000	.1875	.0313	.2031
	10°	CNMG433ELU	★	●	★	★	.5000	.1875	.0469	.2031
Wiper Insert	ELUW	CNMG431ELUW	●	●	●		.5000	.1875	.0156	.2031
		CNMG432ELUW	●	●	●		.5000	.1875	.0313	.2031
	10°	CNMG433ELUW	●	●	●		.5000	.1875	.0469	.2031
Finishing	ESE	CNMG431ESE	●	●	●	●	.5000	.1875	.0156	.2031
		CNMG432ESE	●	●	●	●	.5000	.1875	.0313	.2031
	5°	CNMG433ESE	●	●	●	●	.5000	.1875	.0469	.2031
Wiper Insert	ESEW	CNMG331ESEW	★	★	★	★	.3750	.1875	.0156	.1500
		CNMG332ESEW	●	★	★	★	.3750	.1875	.0313	.1500
		CNMG431ESEW	●	●	●		.5000	.1875	.0156	.2031
		CNMG432ESEW	●	●	●		.5000	.1875	.0313	.2031
	5°	CNMG433ESEW		●	●		.5000	.1875	.0469	.2031
Finishing	EFE	CNMG321EFE	★	★	★	★	.3750	.1250	.0156	.1500
		CNMG322EFE	★	★	★	★	.3750	.1250	.0313	.1500
		CNMG331EFE	★	★	★	★	.3750	.1875	.0156	.1500
		CNMG332EFE	★	★	★	★	.3750	.1875	.0313	.1500
		CNMG430.5EFE	●	●	●	★	.5000	.1875	.0078	.2031
		CNMG431EFE	●	★	★	●	.5000	.1875	.0156	.2031
		CNMG432EFE	●	★	★	●	.5000	.1875	.0313	.2031
	20°	CNMG433EFE	●	●	★	●	.5000	.1875	.0469	.2031
Finishing	ESU	CNMG321ESU	★	●	★		.3750	.1250	.0156	.1500
		CNMG322ESU	★	●	★		.3750	.1250	.0313	.1500
		CNMG32.51ESU	★	★	★		.3750	.1563	.0156	.1500
		CNMG32.52ESU	★	★	★		.3750	.1563	.0313	.1500
		CNMG331ESU	★	★	★		.3750	.1875	.0156	.1500
		CNMG332ESU	★	★	★		.3750	.1875	.0313	.1500
		CNMG333ESU	★	★	★	★	.3750	.1875	.0469	.1500
		CNMG431ESU	●	●	●	●	.5000	.1875	.0156	.2031
		CNMG432ESU	●	●	●	●	.5000	.1875	.0313	.2031
	13°	CNMG433ESU	●	●	●	●	.5000	.1875	.0469	.2031
Finishing	EEF	CNMG431EEF	★	★	★	●	.5000	.1875	.0156	.2031
		CNMG432EEF	★	★	★	●	.5000	.1875	.0313	.2031
	20°	CNMG433EEF	★	●	★	●	.5000	.1875	.0469	.2031
Finishing	ESX	CNMG431ESX	●	●	●	●	.5000	.1875	.0156	.2031
		CNMG432ESX	●	●	●	●	.5000	.1875	.0313	.2031
	3°	CNMG433ESX	●	●	●	★	.5000	.1875	.0469	.2031
Light Cutting	EUP	CNMG431EUP			●	●	.5000	.1875	.0156	.2031
		CNMG432EUP			●	●	.5000	.1875	.0313	.2031
		CNMG433EUP				●	.5000	.1875	.0469	.2031
		CNMG542EUP			●	●	.6250	.2500	.0313	.2500
		CNMG543EUP			●	●	.6250	.2500	.0469	.2500
	10°	CNMG643EUP				●	.7500	.2500	.0469	.3126
Medium Cutting	EGU	CNMG321EGU	★	★	★	★	.3750	.1250	.0156	.1500
		CNMG322EGU	★	●	●	★	.3750	.1250	.0313	.1500
		CNMG331EGU			★		.3750	.1875	.0156	.1500
		CNMG332EGU			★		.3750	.1875	.0313	.1500
		CNMG333EGU	★	★	★	★	.3750	.1875	.0469	.1500
		CNMG431EGU	●	●	●	●	.5000	.1875	.0156	.2031
		CNMG432EGU	●	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EGU	●	●	●	●	.5000	.1875	.0469	.2031
		CNMG434EGU	★	★	★	★	.5000	.1875	.0625	.2031
		CNMG542EGU	●	●	●	●	.6250	.2500	.0313	.2500
		CNMG543EGU	●	●	●	●	.6250	.2500	.0469	.2500
	7°	CNMG544EGU	●	★	★	★	.6250	.2500	.0625	.2500
Wiper Insert	EGUW	CNMG432EGUW	●	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EGUW	●	●	●		.5000	.1875	.0469	.2031
	0°	CNMG543EGUW	●	●	●	●	.6250	.2500	.0469	.2500

●= NEW AC8020P Stocked item
★= NEW AC8020P Worldwide Warehouse item
●= USA Stocked item
★= Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

CNMG 80° Diamond/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
General Purpose	EGE	CNMG431EGE	●	●	●	●	.5000	.1875	.0156	.2031
		CNMG432EGE	●	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EGE	●	●	●	●	.5000	.1875	.0469	.2031
		CNMG434EGE	★	●	●	★	.5000	.1875	.0625	.2031
		CNMG542EGE	●	●	●	★	.6250	.2500	.0313	.2500
		CNMG543EGE	●	●	●	★	.6250	.2500	.0469	.2500
		CNMG544EGE	★	●	★	★	.6250	.2500	.0625	.2500
		CNMG643EGE	●	●	●	★	.7500	.2500	.0469	.3126
	3°	CNMG644EGE	★	★	●	★	.7500	.2500	.0625	.3126
General Purpose	EUX	CNMG321EUX				★	.3750	.1250	.0156	.1500
		CNMG322EUX				●	.3750	.1250	.0313	.1500
		CNMG431EUX	●	●	●	●	.5000	.1875	.0156	.2031
		CNMG432EUX	●	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EUX	●	●	●	●	.5000	.1875	.0469	.2031
		CNMG434EUX	●	●	●	★	.5000	.1875	.0625	.2031
		CNMG542EUX	●	●	●	★	.6250	.2500	.0313	.2500
		CNMG543EUX	●	●	●	●	.6250	.2500	.0469	.2500
		CNMG544EUX	●	★	★	★	.6250	.2500	.0625	.2500
		CNMG642EUX				●	.7500	.2500	.0313	.3126
		CNMG643EUX	●	★	●	●	.7500	.2500	.0469	.3126
	0°	CNMG644EUX	★	★	★	★	.7500	.2500	.0625	.3126
Medium Cutting	ENG	CNMG321ENG			★	★	.3750	.1250	.0156	.1500
		CNMG322ENG			●	★	.3750	.1250	.0313	.1500
		CNMG32.51ENG			★		.3750	.1563	.0156	.1500
		CNMG32.52ENG			★		.3750	.1563	.0313	.1500
		CNMG331ENG			★		.3750	.1875	.0156	.1500
		CNMG332ENG			★	★	.3750	.1875	.0313	.1500
		CNMG431ENG	●	★	●	●	.5000	.1875	.0156	.2031
		CNMG432ENG	●	★	●	●	.5000	.1875	.0313	.2031
		CNMG433ENG			●	●	.5000	.1875	.0469	.2031
		CNMG434ENG			★	★	.5000	.1875	.0625	.2031
		CNMG542ENG		★	●	●	.6250	.2500	.0313	.2500
		CNMG543ENG		★	●	●	.6250	.2500	.0469	.2500
		CNMG544ENG			★	★	.6250	.2500	.0625	.2500
		CNMG642ENG			●	●	.7500	.2500	.0313	.3126
		CNMG643ENG			●	●	.7500	.2500	.0469	.3126
	4°	CNMG644ENG			●	★	.7500	.2500	.0625	.3126
Medium Cutting	EEG	CNMG431EEG	★	●	●	●	.5000	.1875	.0156	.2031
		CNMG432EEG	★	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EEG	★	●	●	●	.5000	.1875	.0469	.2031
		CNMG542EEG	★	★	★	●	.6250	.2500	.0313	.2500
		CNMG543EEG	★	★	●	★	.6250	.2500	.0469	.2500
		CNMG544EEG	★	★	★	●	.6250	.2500	.0625	.2500
		CNMG643EEG	★	★	●	●	.7500	.2500	.0469	.3126
	0°	CNMG644EEG	★		★	●	.7500	.2500	.0625	.3126
Medium to Roughing	EMU	CNMG432EMU	●	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EMU	●	●	●	●	.5000	.1875	.0469	.2031
		CNMG434EMU	●	●	●	●	.5000	.1875	.0625	.2031
		CNMG542EMU	●	●	●	●	.6250	.2500	.0313	.2500
		CNMG543EMU	●	●	●	●	.6250	.2500	.0469	.2500
		CNMG544EMU	●	●	●	●	.6250	.2500	.0625	.2500
		CNMG642EMU	●			●	.7500	.2500	.0313	.3126
		CNMG643EMU	●	●	●	●	.7500	.2500	.0469	.3126
		CNMG644EMU	●	●	●	●	.7500	.2500	.0625	.3126
		CNMG646EMU	★	★	★	★	.7500	.2500	.0938	.3126
	4°	CNMG866EMU	●	★	●	★	1.000	.3750	.0938	.3622
Medium to Roughing	EEM	CNMG432EEM	★	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EEM	★	●	●	●	.5000	.1875	.0469	.2031
		CNMG434EEM	★	★	★	●	.5000	.1875	.0625	.2031
		CNMG542EEM	★	★	★	●	.6250	.2500	.0313	.2500
		CNMG543EEM	★	●	●	●	.6250	.2500	.0469	.2500
		CNMG544EEM	★	●	★	●	.6250	.2500	.0625	.2500
		CNMG643EEM	★	★	●	●	.7500	.2500	.0469	.3126
		CNMG644EEM	★	★	★	●	.7500	.2500	.0625	.3126
		CNMG646EEM	★	★	★	●	.7500	.2500	.0938	.3126
	0°	CNMG866EEM	★	★	★	★	1.000	.3750	.0938	.3622

See next page for negative inserts availbility continued

AC8015P/AC8020P/AC8025P/AC8035P - Negative Inserts

CNMG 80° Diamond/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium to Roughing	EME	CNMG432EME	●	●	●	●	.5000	.1875	.0313	.2031
		CNMG433EME	●	●	●	●	.5000	.1875	.0469	.2031
		CNMG434EME	★	●	●	★	.5000	.1875	.0625	.2031
		CNMG542EME	●	●	●	●	.6250	.2500	.0313	.2500
		CNMG543EME	●	●	●	●	.6250	.2500	.0469	.2500
		CNMG544EME	★	●	●	★	.6250	.2500	.0625	.2500
		CNMG643EME	★	●	●	●	.7500	.2500	.0469	.3126
		CNMG644EME	★	●	●	●	.7500	.2500	.0625	.3126
		CNMG646EME	★	★	★	★	.7500	.2500	.0938	.3126
	4°	CNMG866EME	●	★	●	★	1.000	.3750	.0938	.3622
Medium to Roughing	EMX	CNMG432EMX		●	●	●	.5000	.1875	.0313	.2031
		CNMG433EMX		●	●	●	.5000	.1875	.0469	.2031
		CNMG434EMX		●	●		.5000	.1875	.0625	.2031
		CNMG542EMX		●	●	●	.6250	.2500	.0313	.2500
		CNMG543EMX		●	●	●	.6250	.2500	.0469	.2500
		CNMG544EMX		●	●	●	.6250	.2500	.0625	.2500
		CNMG643EMX	●	●	●	●	.7500	.2500	.0469	.3126
	-15°	CNMG644EMX	●	●	●	●	.7500	.2500	.0625	.3126
Medium to Roughing	ENZ	CNMG431ENZ			★		.5000	.1875	.0156	.2031
		CNMG432ENZ			●	★	.5000	.1875	.0313	.2031
		CNMG433ENZ			★	★	.5000	.1875	.0469	.2031
		CNMG434ENZ			★		.5000	.1875	.0625	.2031
		CNMG542ENZ			●	★	.6250	.2500	.0313	.2500
		CNMG543ENZ	●		●	★	.6250	.2500	.0469	.2500
		CNMG544ENZ			★	★	.6250	.2500	.0625	.2500
		CNMG642ENZ			●	★	.7500	.2500	.0313	.3126
		CNMG643ENZ	●		●	●	.7500	.2500	.0469	.3126
	4°	CNMG644ENZ			●	●	.7500	.2500	.0625	.3126

CNMM 80° Diamond/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Rough to Heavy	ENP	CNMM432ENP	★	★	★	★	.5000	.1875	.0313	.2031
		CNMM433ENP	★	★	★	★	.5000	.1875	.0469	.2031
		CNMM434ENP	★	★	★	★	.5000	.1875	.0625	.2031
		CNMM542ENP			★	★	.6250	.2500	.0313	.2500
		CNMM543ENP	★	★	★	★	.6250	.2500	.0469	.2500
		CNMM544ENP	★	★	★	★	.6250	.2500	.0625	.2500
		CNMM642ENP			★	★	.7500	.2500	.0313	.3126
		CNMM643ENP	★		★	★	.7500	.2500	.0469	.3126
		CNMM644ENP	★	★	★	★	.7500	.2500	.0625	.3126
		CNMM646ENP	★	★	★	★	.7500	.2500	.0938	.3126
		CNMM856ENP			★		1.000	.3125	.0938	.3622
	0°	CNMM866ENP			★		1.000	.3750	.0938	.3622
Heavy	EHG	CNMM432EHG	●	★	●	★	.5000	.1875	.0313	.2031
		CNMM433EHG	●	★	●	★	.5000	.1875	.0469	.2031
		CNMM434EHG			★		.5000	.1875	.0625	.2031
		CNMM543EHG	★	★	★	★	.6250	.2500	.0469	.2500
		CNMM544EHG	★	★	★	★	.6250	.2500	.0625	.2500
		CNMM643EHG	★	★	●	★	.7500	.2500	.0469	.3126
		CNMM644EHG	●	★	★	★	.7500	.2500	.0625	.3126
	0°	CNMM646EHG	★	★	★	★	.7500	.2500	.0938	.3126
Heavy	EHP	CNMM432EHP			★	★	.5000	.1875	.0313	.2031
		CNMM433EHP			★	★	.5000	.1875	.0469	.2031
		CNMM434EHP			★	★	.5000	.1875	.0625	.2031
		CNMM542EHP			★	★	.6250	.2500	.0313	.2500
		CNMM543EHP			★	★	.6250	.2500	.0469	.2500
		CNMM544EHP			★	★	.6250	.2500	.0625	.2500
		CNMM642EHP			★	★	.7500	.2500	.0313	.3126
		CNMM643EHP			★	★	.7500	.2500	.0469	.3126
		CNMM644EHP			★	★	.7500	.2500	.0625	.3126
	0°	CNMM646EHP			★	★	.7500	.2500	.0938	.3126
Heavy	EHF	CNMM644EHF			★	★	.7500	.2500	.0625	.3126
		CNMM646EHF			★	★	.7500	.2500	.0938	.3126
		CNMM866EHF			★	★	1.000	.3750	.0938	.3622
	-15°	CNMM868EHF			★	★	1.000	.3750	.1250	.3622

●= NEW AC8020P Stocked item
★= NEW AC8020P Worldwide Warehouse item
●= USA Stocked item
★= Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

DNMG 55° Diamond/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Fine Finishing	EFL	DNMG431EFL		●	●		.5000	.1875	.0156	.2031
		DNMG432EFL		●	●		.5000	.1875	.0313	.2031
	10°	DNMG433EFL			★		.5000	.1875	.0469	.2031
Fine Finishing	EFE	DNMG331EFE	★	★	★	★	.3750	.1875	.0156	.1500
		DNMG332EFE	●	★	★	★	.3750	.1875	.0313	.1500
		DNMG333EFE	★	★	★	★	.3750	.1875	.0469	.1500
		DNMG430.5EFE	●	★	★	●	.5000	.1875	.0078	.2031
		DNMG431EFE	●	★	★	●	.5000	.1875	.0156	.2031
		DNMG432EFE	●	●	★	●	.5000	.1875	.0313	.2031
		DNMG433EFE	●	★	★	●	.5000	.1875	.0469	.2031
		DNMG440.5EFE	★	★	★	★	.5000	.2500	.0078	.2031
		DNMG441EFE	★	★	★	★	.5000	.2500	.0156	.2031
		DNMG442EFE	★	★	★	★	.5000	.2500	.0313	.2031
	20°	DNMG443EFE	★	★	★	★	.5000	.2500	.0469	.2031
Fine Finishing	ELU	DNMG331ELU	★	●	●		.3750	.1875	.0156	.1500
		DNMG332ELU	★	★	●		.3750	.1875	.0313	.1500
		DNMG430.5ELU	★	★	★		.5000	.1875	.0078	.2031
		DNMG431ELU	●	●	●	★	.5000	.1875	.0156	.2031
		DNMG432ELU	●	●	●	★	.5000	.1875	.0313	.2031
	10°	DNMG433ELU	●	★	★	★	.5000	.1875	.0469	.2031
Finishing	ESU	DNMG331ESU	★	●	●	★	.3750	.1875	.0156	.1500
		DNMG332ESU	●	●	●	★	.3750	.1875	.0313	.1500
		DNMG333ESU	★	★	●	★	.3750	.1875	.0469	.1500
		DNMG431ESU	●	●	●	●	.5000	.1875	.0156	.2031
		DNMG432ESU	●	●	●	●	.5000	.1875	.0313	.2031
		DNMG433ESU	●	●	●	●	.5000	.1875	.0469	.2031
		DNMG441ESU	★	★	★		.5000	.2500	.0156	.2031
		DNMG442ESU	★	★	★	★	.5000	.2500	.0313	.2031
	13°	DNMG443ESU	★	★	★	★	.5000	.2500	.0469	.2031
Finishing	ESE	DNMG332ESE	●	●	●	★	.3750	.1875	.0313	.1500
		DNMG431ESE	●	●	★	●	.5000	.1875	.0156	.2031
		DNMG432ESE	●	●	●	●	.5000	.1875	.0313	.2031
	5°	DNMG433ESE	●	●	●	●	.5000	.1875	.0469	.2031
Finishing	EEF	DNMG331EEF	★	★	★	★	.3750	.1875	.0156	.1500
		DNMG332EEF	★	●	★	★	.3750	.1875	.0313	.1500
		DNMG333EEF	★	★	★	★	.3750	.1875	.0469	.1500
		DNMG431EEF	★	★	★	●	.5000	.1875	.0156	.2031
		DNMG432EEF	★	★	★	●	.5000	.1875	.0313	.2031
		DNMG433EEF	★	★	★	★	.5000	.1875	.0469	.2031
		DNMG441EEF	★	★	★	★	.5000	.2500	.0156	.2031
		DNMG442EEF	★	★	★	★	.5000	.2500	.0313	.2031
	20°	DNMG443EEF	★	★	★	★	.5000	.2500	.0469	.2031
Finishing	ESX	DNMG431ESX	●	★	●	●	.5000	.1875	.0156	.2031
		DNMG432ESX	●	●	●	●	.5000	.1875	.0313	.2031
	3°	DNMG433ESX	●	★	★	●	.5000	.1875	.0469	.2031
Light Cutting	EUP	DNMG431EUP			●	●	.5000	.1875	.0156	.2031
		DNMG432EUP			●	●	.5000	.1875	.0313	.2031
	10°	DNMG433EUP				★	.5000	.1875	.0469	.2031
Medium Cutting	EGU	DNMG331EGU	★	●	●	★	.3750	.1875	.0156	.1500
		DNMG332EGU	★	●	●	●	.3750	.1875	.0313	.1500
		DNMG333EGU	★	★	★	★	.3750	.1875	.0469	.1500
		DNMG431EGU	●	●	●	●	.5000	.1875	.0156	.2031
		DNMG432EGU	●	●	●	●	.5000	.1875	.0313	.2031
		DNMG433EGU	●	●	●	●	.5000	.1875	.0469	.2031
		DNMG434EGU			★		.5000	.1875	.0625	.2031
		DNMG441EGU	★	★	★	★	.5000	.2500	.0156	.2031
		DNMG442EGU	★	★	★	★	.5000	.2500	.0313	.2031
		DNMG443EGU	★	★	★	★	.5000	.2500	.0469	.2031
	7°	DNMG444EGU			★		.5000	.2500	.0625	.2031
General Purpose	EGE	DNMG332EGE	●	●	●	●	.3750	.1875	.0313	.1500
		DNMG333EGE	●	●	●	★	.3750	.1875	.0469	.1500
		DNMG431EGE	●	●	●	★	.5000	.1875	.0156	.2031
		DNMG432EGE	●	●	●	●	.5000	.1875	.0313	.2031
		DNMG433EGE	●	●	●	●	.5000	.1875	.0469	.2031
		DNMG434EGE			★		.5000	.1875	.0625	.2031
		DNMG441EGE	★	★	★	★	.5000	.2500	.0156	.2031
		DNMG442EGE	★	★	★	★	.5000	.2500	.0313	.2031
		DNMG443EGE	★	★	★	★	.5000	.2500	.0469	.2031
	3°	DNMG444EGE	★	★	★	★	.5000	.2500	.0625	.2031

See next page for negative inserts availbility continued

AC8015P/AC8020P/AC8025P/AC8035P - Negative Inserts

DNMG 55° Diamond/Negative Cont'd

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
General Purpose	EUX	DNMG332EUX	★	★	★	★	.3750	.1875	.0313	.1500
		DNMG431EUX	●	●	●	●	.5000	.1875	.0156	.2031
		DNMG432EUX	●	●	●	●	.5000	.1875	.0313	.2031
		DNMG433EUX	●	★	●	★	.5000	.1875	.0469	.2031
		DNMG441EUX	★	★	★	★	.5000	.2500	.0156	.2031
		DNMG442EUX	★	★	★	★	.5000	.2500	.0313	.2031
		DNMG443EUX	★	★	★	★	.5000	.2500	.0469	.2031
	0°	DNMG444EUX			★		.5000	.2500	.0625	.2031
Medium Cutting	ENG	DNMG331ENG			●	★	.3750	.1875	.0156	.1500
		DNMG332ENG			●	●	.3750	.1875	.0313	.1500
		DNMG431ENG		●	●	●	.5000	.1875	.0156	.2031
		DNMG432ENG	●	●	●	●	.5000	.1875	.0313	.2031
		DNMG433ENG			★	★	.5000	.1875	.0469	.2031
		DNMG441ENG			★		.5000	.2500	.0156	.2031
		DNMG442ENG			★	★	.5000	.2500	.0313	.2031
		DNMG443ENG			★		.5000	.2500	.0469	.2031
		DNMG444ENG			★		.5000	.2500	.0625	.2031
		DNMG542ENG		●	●	●	.6250	.2500	.0313	.2500
	0°	DNMG543ENG		●	●	●	.6250	.2500	.0469	.2500
Medium Cutting	EEG	DNMG332EEG	★	★	★	★	.3750	.1875	.0313	.1500
		DNMG333EEG	★	★	★	★	.3750	.1875	.0469	.1500
		DNMG431EEG	★	★	●	●	.5000	.1875	.0156	.2031
		DNMG432EEG	★	●	●	●	.5000	.1875	.0313	.2031
		DNMG433EEG	★	★	★	★	.5000	.1875	.0469	.2031
		DNMG441EEG	★	★	★	★	.5000	.2500	.0156	.2031
		DNMG442EEG	★	★	★	★	.5000	.2500	.0313	.2031
	0°	DNMG443EEG	★	★	★	★	.5000	.2500	.0469	.2031
Roughing	EMU	DNMG432EMU	●	●	●	●	.5000	.1875	.0313	.2031
		DNMG433EMU	●	●	●	★	.5000	.1875	.0469	.2031
		DNMG434EMU			★	★	.5000	.1875	.0625	.2031
		DNMG442EMU	★	★	★	★	.5000	.2500	.0313	.2031
		DNMG443EMU	★	★	★	★	.5000	.2500	.0469	.2031
	4°	DNMG444EMU			★		.5000	.2500	.0625	.2031
Roughing	EEM	DNMG432EEM	★	★	●	●	.5000	.1875	.0313	.2031
		DNMG433EEM	★	★	★	★	.5000	.1875	.0469	.2031
		DNMG434EEM			★	★	.5000	.1875	.0625	.2031
		DNMG442EEM	★	★	★	★	.5000	.2500	.0313	.2031
	0°	DNMG443EEM	★	★	★	★	.5000	.2500	.0469	.2031
Roughing	EME	DNMG432EME	●	●	●	●	.5000	.1875	.0313	.2031
		DNMG433EME	★	●	●	★	.5000	.1875	.0469	.2031
		DNMG434EME		●	★		.5000	.1875	.0625	.2031
		DNMG442EME	★	★	★	★	.5000	.2500	.0313	.2031
		DNMG443EME	★	★	★	★	.5000	.2500	.0469	.2031
	4°	DNMG444EME	★	★	★	★	.5000	.2500	.0625	.2031
Roughing	EMX	DNMG432EMX		●	●	●	.5000	.1875	.0313	.2031
		DNMG433EMX		★	●	●	.5000	.1875	.0469	.2031
		DNMG434EMX				●	.5000	.1875	.0625	.2031
		DNMG442EMX		★	★		.5000	.2500	.0313	.2031
	-15°	DNMG443EMX		★	★		.5000	.2500	.0469	.2031
Medium to Roughing	ENZ	DNMG431ENZ			★	●	.5000	.1875	.0156	.2031
		DNMG432ENZ			●	●	.5000	.1875	.0313	.2031
		DNMG433ENZ			●	★	.5000	.1875	.0469	.2031
		DNMG442ENZ			★		.5000	.2500	.0313	.2031
		DNMG443ENZ			★		.5000	.2500	.0469	.2031
		DNMG542ENZ			●	●	.6250	.2500	.0313	.2500
		DNMG543ENZ			●	●	.6250	.2500	.0469	.2500
	4°	DNMG544ENZ			●	●	.6250	.2500	.0625	.2500
Roughing	HM	DNMG431RHM		★	★		.5000	.1875	.0156	.2031
	15°	DNMG432RHM		★	★		.5000	.1875	.0313	.2031

DNM L/R 55° Diamond/Negative

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium to Roughing	HM	DNML431EHM			★		.5000	.1875	.0156	.2031
		DNML432EHM			★		.5000	.1875	.0313	.2031
		DNMR431EHM	★		★		.5000	.1875	.0156	.2031
	15°	DNMR431EHM	★		★		.5000	.1875	.0313	.2031

DNMM 55° Diamond/Negative

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Rough to Heavy	ENP	DNMM431ENP			★	★	.5000	.1875	.0156	.2031
		DNMM432ENP	★	★	★	★	.5000	.1875	.0313	.2031
		DNMM433ENP	★	★	★	★	.5000	.1875	.0469	.2031
		DNMM434ENP	★	★	★		.5000	.1875	.0625	.2031
		DNMM441ENP			★		.5000	.2500	.0156	.2031
		DNMM442ENP	★	★	★	★	.5000	.2500	.0313	.2031
		DNMM443ENP	★	★	★	★	.5000	.2500	.0469	.2031
	0°	DNMM444ENP	★	★	★		.5000	.2500	.0625	.2031
Heavy	EHP	DNMM431EHP			★	★	.5000	.1875	.0156	.2031
		DNMM432EHP			★	★	.5000	.1875	.0313	.2031
		DNMM433EHP			★	★	.5000	.1875	.0469	.2031
		DNMM434EHP			★		.5000	.1875	.0625	.2031
		DNMM441EHP			★		.5000	.2500	.0156	.2031
		DNMM442EHP			★	★	.5000	.2500	.0313	.2031
		DNMM443EHP			★	★	.5000	.2500	.0469	.2031
	0°	DNMM444EHP			★		.5000	.2500	.0625	.2031

DNMX 55° Diamond/Negative

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing Wiper Insert	ESEW	DNMX331ESEW	●	★	★	★	.3750	.1875	.0156	.1500
		DNMX332ESEW	●	★	●	★	.3750	.1875	.0313	.1500
		DNMX333ESEW	★	★	★	★	.3750	.1875	.0469	.1500
		DNMX431ESEW	●	●	●		.5000	.1875	.0156	.2031
		DNMX432ESEW	●	●	●		.5000	.1875	.0313	.2031
	5°	DNMX433ESEW	★	★	●		.5000	.1875	.0469	.2031
Medium	EGUW	DNMX432EGUW	●	●	●		.5000	.1875	.0313	.2031
	7°	DNMX433EGUW	●	●	●		.5000	.1875	.0469	.2031

RNMG Round Type/Negative

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Roughing		RNMG43ENT				●	.5000	.1875		.2031
		RNMG54ENU				●	.6250	.2500		.2500
		RNMG64ENV				●	.7500	.2500	—	.3126
		RNMG84ENY				●	1.000	.2500		.3622
		RNMG86ENY				●	1.000	.3750		.3622

SNMG 90° Square/Negative

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Fine Cutting	EFL	SNMG432EFL			●		.5000	.1875	.0313	.2031
	10°									
Finishing	EFE	SNMG322EFE	●				.3750	.125	.0313	.1500
		SNMG431EFE	★	★	★	●	.5000	.1875	.0156	.2031
		SNMG432EFE	★	★	★	●	.5000	.1875	.0313	.2031
	20°	SNMG433EFE	★	★	★	●	.5000	.1875	.0469	.2031
Fine Finishing	ELU	SNMG432ELU	★	★	★		.5000	.1875	.0313	.2031
	10°	SNMG433ELU	●	★	★		.5000	.1875	.0469	.2031
Finishing	ESU	SNMG432ESU	●	★	●	●	.5000	.1875	.0313	.2031
	13°									
Finishing	ESE	SNMG432ESE	●	★	★	●	.5000	.1875	.0313	.2031
	5°	SNMG433ESE	★	●	●	★	.5000	.1875	.0469	.2031
Finishing	EEF	SNMG431EEF	★	★	★	★	.5000	.1875	.0156	.2031
	20°	SNMG432EEF	★	★	★	●	.5000	.1875	.0313	.2031
Finishing	ESX	SNMG432ESX	●	●	●	●	.5000	.1875	.0313	.2031
	3°	SNMG433ESX	●	★	★	★	.5000	.1875	.0469	.2031

●= NEW AC8020P Stocked item
★= NEW AC8020P Worldwide Warehouse item
●= USA Stocked item
★= Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

See next page for negative inserts availbility continued

AC8015P/AC8020P/AC8025P/AC8035P - Negative Inserts

SNMG 90° Square/Negative Cont'd

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Light Cutting	EUP	SNMG431EUP				●	.5000	.1875	.0156	.2031
		SNMG432EUP			●	●	.5000	.1875	.0313	.2031
		SNMG433EUP				★	.5000	.1875	.0469	.2031
Medium Cutting	EGU	SNMG321EGU		●	●		.3750	.1250	.0156	.1500
		SNMG322EGU	★	★	★	★	.3750	.1250	.0313	.1500
		SNMG431EGU	★	★	●	★	.5000	.1875	.0156	.2031
		SNMG432EGU	●	●	●	●	.5000	.1875	.0313	.2031
		SNMG433EGU	●	●	●	★	.5000	.1875	.0469	.2031
		SNMG434EGU	★	●	●	★	.5000	.1875	.0625	.2031
		SNMG542EGU	★	★	★	●	.6250	.2500	.0313	.2500
		SNMG543EGU	★	★	●	●	.6250	.2500	.0469	.2500
		SNMG544EGU	★	★	★	●	.6250	.2500	.0625	.2500
General Purpose	EGE	SNMG432EGE	●	★	●	★	.5000	.1875	.0313	.2031
		SNMG433EGE	★	★	★	★	.5000	.1875	.0469	.2031
		SNMG434EGE	●	★	●	★	.5000	.1875	.0625	.2031
		SNMG542EGE	★	★	★	●	.6250	.2500	.0313	.2500
		SNMG543EGE	●	●	★	●	.6250	.2500	.0469	.2500
		SNMG544EGE	●	●	●	●	.6250	.2500	.0625	.2500
General Purpose	EUX	SNMG322EUX				●	.3750	.1250	.0313	.1500
		SNMG431EUX				★	.5000	.1875	.0156	.2031
		SNMG432EUX	★	★	●	●	.5000	.1875	.0313	.2031
		SNMG433EUX	★	●	●	●	.5000	.1875	.0469	.2031
		SNMG434EUX	●	★	●	●	.5000	.1875	.0625	.2031
		SNMG643EUX	★	●	●	●	.7500	.2500	.0469	.3126
		SNMG644EUX	★	★	●	★	.7500	.2500	.0625	.3126
Medium Cutting	ENG	SNMG322ENG			●	●	.3750	.1250	.0313	.1500
		SNMG432ENG	●		●	●	.5000	.1875	.0313	.2031
		SNMG433ENG			★	★	.5000	.1875	.0469	.2031
		SNMG434ENG				★	.5000	.1875	.0625	.2031
		SNMG543ENG			●	●	.6250	.2500	.0469	.2500
		SNMG643ENG			●	●	.7500	.2500	.0469	.3126
		SNMG644ENG			●	●	.7500	.2500	.0625	.3126
		SNMG866ENG			●	★	1.000	.3750	.0938	.3622
Medium Cutting	EEG	SNMG431EEG	★	★	★	●	.5000	.1875	.0156	.2031
		SNMG432EEG	★	★	●	●	.5000	.1875	.0313	.2031
		SNMG433EEG	★	★	★	●	.5000	.1875	.0469	.2031
		SNMG542EEG	★	★	★	●	.6250	.2500	.0313	.2500
		SNMG543EEG	●	●	★	●	.6250	.2500	.0469	.2500
		SNMG544EEG	★	★	★	●	.6250	.2500	.0625	.2500
		SNMG643EEG	★	★	★	●	.7500	.2500	.0469	.3126
		SNMG644EEG	★	★	★	●	.7500	.2500	.0625	.3126
Roughing	EMU	SNMG432EMU	●	●	●	●	.5000	.1875	.0313	.2031
		SNMG433EMU	★	★	●	●	.5000	.1875	.0469	.2031
		SNMG434EMU	★	★	●	●	.5000	.1875	.0625	.2031
		SNMG542EMU	★	★	★	●	.6250	.2500	.0313	.2500
		SNMG543EMU	●	●	●	●	.6250	.2500	.0469	.2500
		SNMG544EMU	★	●	●	●	.6250	.2500	.0625	.2500
		SNMG643EMU	★	●	●	●	.7500	.2500	.0469	.3126
		SNMG644EMU	●	●	●	●	.7500	.2500	.0625	.3126
		SNMG646EMU	★	●	★	★	.7500	.2500	.0938	.3126
		SNMG866EMU	★	●	●	●	1.000	.3750	.0938	.3622
Roughing	EEM	SNMG432EEM	★	★	●	●	.5000	.1875	.0313	.2031
		SNMG433EEM	★	★	★	●	.5000	.1875	.0469	.2031
		SNMG542EEM	★	★	★	●	.6250	.2500	.0313	.2500
		SNMG543EEM	★	★	★	●	.6250	.2500	.0469	.2500
		SNMG544EEM	★	★	★	●	.6250	.2500	.0625	.2500
		SNMG643EEM	★	★	★	●	.7500	.2500	.0469	.3126
		SNMG644EEM	★	★	★	●	.7500	.2500	.0625	.3126
		SNMG646EEM	★	★	★	★	.7500	.2500	.0938	.3126
		SNMG866EEM	★	★	★	●	1.000	.3750	.0938	.3622
Roughing	HM	SNMG432LHM		★			.5000	.1875	.0313	.2031
		SNMG432RHM		★			.5000	.1875	.0313	.2031
		SNML432EHM	★	★	★	★	.5000	.1875	.0313	.2031
		SNMR432EHM	★	★	★	★	.5000	.1875	.0313	.2031

SNMG 90° Square/Negative Cont'd

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Roughing	EME	SNMG432EME	★	★	●	★	.5000	.1875	.0313	.2031
		SNMG433EME	●	★	●	★	.5000	.1875	.0469	.2031
		SNMG434EME	●	★	●	★	.5000	.1875	.0625	.2031
		SNMG542EME	★	★	★	★	.6250	.2500	.0313	.2500
		SNMG543EME	●	●	●	★	.6250	.2500	.0469	.2500
		SNMG544EME	●	★	●	★	.6250	.2500	.0625	.2500
		SNMG643EME	★	●	●	●	.7500	.2500	.0469	.3126
		SNMG644EME	●	●	●	●	.7500	.2500	.0625	.3126
		SNMG646EME	★	★	★	★	.7500	.2500	.0938	.3126
		SNMG866EME	★	★	●	★	1.000	.3750	.0938	.3622
Roughing	EMX	SNMG432EMX		★	★	●	.5000	.1875	.0313	.2031
		SNMG433EMX		●	●	★	.5000	.1875	.0469	.2031
		SNMG434EMX		★	●		.5000	.1875	.0625	.2031
		SNMG543EMX		●	●	●	.6250	.2500	.0469	.2500
		SNMG544EMX		●	●	★	.6250	.2500	.0625	.2500
		SNMG643EMX	●	●	●	●	.7500	.2500	.0469	.3126
		SNMG644EMX	●	●	●	●	.7500	.2500	.0625	.3126
Medium to Roughing	ENZ	SNMG432ENZ			●	★	.5000	.1875	.0313	.2031
		SNMG433ENZ			★	★	.5000	.1875	.0469	.2031
		SNMG434ENZ			★	●	.5000	.1875	.0625	.2031
		SNMG543ENZ			★	●	.6250	.2500	.0469	.2500
		SNMG544ENZ				●	.6250	.2500	.0625	.2500
		SNMG642ENZ				●	.7500	.2500	.0313	.3126
		SNMG643ENZ			★	●	.7500	.2500	.0469	.3126
		SNMG644ENZ			★	★	.7500	.2500	.0625	.3126
		SNMG866ENZ				●	1.000	.3750	.0938	.3622

SNMM 90° Square/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Roughing	ENP	SNMM432ENP	★	★	★	★	.5000	.1875	.0313	.2031
		SNMM433ENP	★	★	★	★	.5000	.1875	.0469	.2031
		SNMM434ENP	★	★	★	★	.5000	.1875	.0625	.2031
		SNMM435ENP		★	★		.5000	.1875	.0781	.2031
		SNMM543ENP	★	★	★		.6250	.2500	.0469	.2500
		SNMM544ENP	★	★	★		.6250	.2500	.0625	.2500
		SNMM643ENP	★	★	★	★	.7500	.2500	.0469	.3126
		SNMM644ENP	★	★	★	★	.7500	.2500	.0625	.3126
		SNMM856ENP	★	★	★	★	1.000	.3125	.0938	.3622
		SNMM866ENP	★	★	★		1.000	.3750	.0938	.3622
		SNMM1066ENP		★			1.250	.3750	.0938	.3465
Heavy	EHG	SNMM432EHG	★	★	★	●	.5000	.1875	.0313	.2031
		SNMM433EHG	★	★	●	★	.5000	.1875	.0469	.2031
		SNMM434EHG	★	★	★	★	.5000	.1875	.0625	.2031
		SNMM544EHG	★	★	★		.6250	.2500	.0625	.2500
		SNMM643EHG	★	★	●	●	.7500	.2500	.0469	.3126
		SNMM644EHG	★	★	★	●	.7500	.2500	.0625	.3126
		SNMM646EHG	★	★	●	★	.7500	.2500	.0938	.3126
Heavy	EHP	SNMM432EHP			★	★	.5000	.1875	.0313	.2031
		SNMM433EHP			★	★	.5000	.1875	.0469	.2031
		SNMM434EHP			★	★	.5000	.1875	.0625	.2031
		SNMM643EHP			★	●	.7500	.2500	.0469	.3126
		SNMM644EHP			★	★	.7500	.2500	.0625	.3126
		SNMM856EHP	★	★	★	★	1.000	.3125	.0938	.3622
		SNMM866EHP	★	★	★		1.000	.3750	.0938	.3622
		SNMM1066EHP	★	★	★		1.250	.3750	.0938	.3465
Heavy	EHU	SNMM856EHU	★	★	★		1.000	.3125	.0938	.3622
		SNMM866EHU	★	★	★		1.000	.3750	.0938	.3622
		SNMM1066EHU	★	★	★		1.250	.3750	.0938	.3465
	EHW	SNMM856EHW	★	★	★		1.000	.3125	.0938	.3622
		SNMM866EHW	★	★	★		1.000	.3750	.0938	.3622
		SNMM1066EHW	★	★	★		1.250	.3750	.0938	.3465
	EHS	SNMM1066ENS	★		★		1.250	.3750	.0938	.3465
Heavy	EHF	SNMM644EHF			★	★	.7500	.2500	.0625	.3126
		SNMM646EHF			★	★	.7500	.2500	.0938	.3126
		SNMM856EHF			★	★	1.000	.3125	.0938	.3622
		SNMM858EHF			★	★	1.000	.3125	.1250	.3622
		SNMM866EHF			★	★	1.000	.3750	.0938	.3622
		SNMM868EHF			★	★	1.000	.3750	.1250	.3622
		SNMM1066EHF			★	★	1.250	.3750	.0938	.3465

●= NEW AC8020P Stocked item
★= NEW AC8020P Worldwide Warehouse item
●= USA Stocked item
★= Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

AC8015P/AC8020P/AC8025P/AC8035P - Negative Inserts

TNMG Triangle/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Fine Finishing	EFL	TNMG331EFL			●		.3750	.1875	.0156	.1500
	10°	TNMG332EFL			●		.3750	.1875	.0313	.1500
	EFE	TNMG330.5EFE	★	★	★	●	.3750	.1875	.0078	.1500
		TNMG331EFE	★	★	★	●	.3750	.1875	.0156	.1500
		TNMG332EFE	★	★	★	●	.3750	.1875	.0313	.1500
	20°	TNMG333EFE	★	★	★	●	.3750	.1875	.0469	.1500
	ELU	TNMG331ELU	●	★	●	★	.3750	.1875	.0156	.1500
		TNMG332ELU	●	★	●	★	.3750	.1875	.0313	.1500
	10°	TNMG333ELU	★	★	●	★	.3750	.1875	.0469	.1500
Finishing	ESU	TNMG321ESU		●	●	●	.3750	.1250	.0156	.1500
		TNMG322ESU		●	●	●	.3750	.1250	.0313	.1500
		TNMG331ESU	●	●	●	★	.3750	.1875	.0156	.1500
		TNMG332ESU	●	●	●	★	.3750	.1875	.0313	.1500
	13°	TNMG333ESU	●	★	●	★	.3750	.1875	.0469	.1500
Finishing	ESE	TNMG331ESE	★	★	●	★	.3750	.1875	.0156	.1500
		TNMG332ESE	●	●	●	★	.3750	.1875	.0313	.1500
		TNMG333ESE	●	●	★	★	.3750	.1875	.0469	.1500
		TNMG431ESE	●	★	★	★	.5000	.1875	.0156	.2031
		TNMG432ESE	●	★	★	●	.5000	.1875	.0313	.2031
	5°	TNMG433ESE	●	★	★	●	.5000	.1875	.0469	.2031
Finishing	EEF	TNMG331EEF	★	★	★	●	.3750	.1875	.0156	.1500
	20°	TNMG332EEF	★	★	★	●	.3750	.1875	.0313	.1500
Finishing	ESX	TNMG321ESX	★	★	●	●	.3750	.1250	.0156	.1500
		TNMG322ESX	★	★	●	●	.3750	.1250	.0313	.1500
		TNMG331ESX	●	★	★	●	.3750	.1875	.0156	.1500
		TNMG332ESX	●	★	●	●	.3750	.1875	.0313	.1500
		TNMG431ESX	●	●	●	●	.5000	.1875	.0156	.2031
		TNMG432ESX	●	★	●	●	.5000	.1875	.0313	.2031
	3°	TNMG433ESX	●	★	●	★	.5000	.1875	.0469	.2031
Light Cutting	EUP	TNMG331EUP			●	●	.3750	.1875	.0156	.1500
		TNMG332EUP			●	●	.3750	.1875	.0313	.1500
		TNMG432EUP			●	●	.5000	.1875	.0313	.2031
	10°	TNMG433EUP				●	.5000	.1875	.0469	.2031
Medium Cutting	EGU	TNMG331EGU	★	●	●	●	.3750	.1875	.0156	.1500
		TNMG332EGU	●	●	●	●	.3750	.1875	.0313	.1500
		TNMG333EGU	●	●	●	●	.3750	.1875	.0469	.1500
		TNMG334EGU	★	★	★	★	.3750	.1875	.0625	.1500
		TNMG431EGU		●	●		.5000	.1875	.0156	.2031
		TNMG432EGU	●	●	●	●	.5000	.1875	.0313	.2031
	7°	TNMG433EGU	●	●	●	★	.5000	.1875	.0469	.2031
Medium Cutting	EGE	TNMG331EGE	★	★	●	●	.3750	.1875	.0156	.1500
		TNMG332EGE	●	●	●	★	.3750	.1875	.0313	.1500
		TNMG333EGE	●	●	●	★	.3750	.1875	.0469	.1500
		TNMG432EGE	●	●	●	●	.5000	.1875	.0313	.2031
	3°	TNMG433EGE	★	●	●	●	.5000	.1875	.0469	.2031
Medium Cutting	EUX	TNMG321EUX			●		.3750	.1250	.0156	.1500
		TNMG322EUX			●		.3750	.1250	.0313	.1500
		TNMG331EUX	★	★	●	★	.3750	.1875	.0156	.1500
		TNMG332EUX	●	★	●	●	.3750	.1875	.0313	.1500
		TNMG333EUX	★	★	●	★	.3750	.1875	.0469	.1500
		TNMG432EUX	●	★	●	●	.5000	.1875	.0313	.2031
	0°	TNMG433EUX	●	★	★	●	.5000	.1875	.0469	.2031
Medium Cutting	ENG	TNMG321ENG			●		.3750	.1250	.0156	.1500
		TNMG322ENG			●	●	.3750	.1250	.0313	.1500
		TNMG331ENG			★	★	.3750	.1875	.0156	.1500
		TNMG332ENG			●	●	.3750	.1875	.0313	.1500
		TNMG333ENG			★	★	.3750	.1875	.0469	.1500
		TNMG334ENG			★	★	.3750	.1875	.0625	.1500
		TNMG432ENG		●	●	●	.5000	.1875	.0313	.2031
		TNMG433ENG	●	●	●	●	.5000	.1875	.0469	.2031
		TNMG434ENG				●	.5000	.1875	.0625	.2031
		TNMG542ENG		●	●	●	.6250	.2500	.0313	.2500
		TNMG543ENG		●	●	●	.6250	.2500	.0469	.2500
		TNMG544ENG		●	●	●	.6250	.2500	.0625	.2500
	4°	TNMG666ENG			●	●	.7500	.3750	.0938	.3126

TNMG Triangle/Negative Cont'd

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium Cutting	EEG	TNMG331EEG	★	★	●	●	.3750	.1875	.0156	.1500
		TNMG332EEG	●	★	●	●	.3750	.1875	.0313	.1500
	0°	TNMG333EEG	★	★	★	●	.3750	.1875	.0469	.1500
Roughing	EMU	TNMG332EMU	●	●	●	●	.3750	.1875	.0313	.1500
		TNMG333EMU	●	★	★	●	.3750	.1875	.0469	.1500
		TNMG432EMU	●	●	●	●	.5000	.1875	.0313	.2031
		TNMG433EMU	●	●	●	●	.5000	.1875	.0469	.2031
		TNMG434EMU	●	★	●	●	.5000	.1875	.0625	.2031
		TNMG543EMU	●	●	●	●	.6250	.2500	.0469	.2500
	4°	TNMG544EMU	●	●	●	●	.6250	.2500	.0625	.2500
Roughing	EEM	TNMG332EEM	★	★	●	●	.3750	.1875	.0313	.1500
		TNMG333EEM	★	★	★	●	.3750	.1875	.0469	.1500
	0°	TNMG666EEM	●		★	●	.7500	.3750	.0938	.3126
Roughing	EME	TNMG332EME	★	★	●	★	.3750	.1875	.0313	.1500
		TNMG333EME	★	★	★	★	.3750	.1875	.0469	.1500
		TNMG432EME	●	●	●	●	.5000	.1875	.0313	.2031
		TNMG433EME	●	★	●	●	.5000	.1875	.0469	.2031
	4°	TNMG434EME	★	★	●	●	.5000	.1875	.0625	.2031
Roughing	EMX	TNMG332EMX		★	★	●	.3750	.1875	.0313	.1500
		TNMG333EMX		★	★	★	.3750	.1875	.0469	.1500
		TNMG432EMX		★	●	●	.5000	.1875	.0313	.2031
	-15°	TNMG433EMX		★	★	●	.5000	.1875	.0469	.2031
Rough Cutting	ENZ	TNMG322ENZ				●	.3750	.1250	.0313	.1500
		TNMG323ENZ				●	.3750	.1250	.0469	.1500
		TNMG331ENZ			★		.3750	.1875	.0156	.1500
		TNMG332ENZ			●	●	.3750	.1875	.0313	.1500
		TNMG333ENZ			★	★	.3750	.1875	.0469	.1500
		TNMG334ENZ			★		.3750	.1875	.0625	.1500
		TNMG335ENZ			★	★	.3750	.1875	.0781	.1500
		TNMG432ENZ			●	●	.5000	.1875	.0313	.2031
		TNMG433ENZ			★	●	.5000	.1875	.0469	.2031
		TNMG434ENZ			●	●	.5000	.1875	.0625	.2031
		TNMG444ENZ				★	.5000	.250	.0625	.2031
		TNMG542ENZ			●	●	.6250	.2500	.0313	.2500
		TNMG543ENZ			●	●	.6250	.2500	.0469	.2500
		TNMG544ENZ			●	●	.6250	.2500	.0625	.2500
		TNMG548ENZ				●	.6250	.2500	.1250	.2500
	4°	TNMG666ENZ			●	●	.7500	.3750	.0938	.3126

TNM R/L Triangle/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Heavy	R/L HM	TNMR331EHM	★		★	★	.3750	.1875	.0156	.1500
		TNMR332EHM	★		★	★	.3750	.1875	.0313	.1500
		TNMR431EHM	★		★	★	.5000	.1875	.0156	.2031
		TNMR432EHM	★		★	★	.5000	.1875	.0313	.2031
		TNML331EHM	★		★	★	.3750	.1875	.0156	.1500
		TNML332EHM	★		★	★	.3750	.1875	.0313	.1500
		TNML431EHM	★		★	★	.5000	.1875	.0156	.2031
		TNML432EHM	★		★	★	.5000	.1875	.0313	.2031
		TNMG331 L/R HM		★			.3750	.1875	.0156	.1500
		TNMG332 L/R HM		★			.3750	.1875	.0313	.1500
		TNMG431 L/R HM		★			.5000	.1875	.0156	.2031
	15°	TNMG432 L/R HM		★			.5000	.1875	.0313	.2031

TNMM Triangle/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Heavy	ENP	TNMM331ENP			★		.3750	.1875	.0156	.1500
		TNMM332ENP			★	●	.3750	.1875	.0313	.1500
		TNMM333ENP			★	★	.3750	.1875	.0469	.1500
		TNMM432ENP			★	★	.5000	.1875	.0313	.2031
		TNMM433ENP			★	★	.5000	.1875	.0469	.2031
		TNMM434ENP			★	★	.5000	.1875	.0625	.2031
		TNMM543ENP			★		.6250	.2500	.0469	.2500
	0°	TNMM544ENP			★		.6250	.2500	.0625	.2500
Heavy	EHG	TNMM432EHG			●	●	.5000	.1875	.0313	.2031
		TNMM433EHG			●	★	.5000	.1875	.0469	.2031
	3°	TNMM434EHG			●	★	.5000	.1875	.0625	.2031
Heavy	EHP	TNMM332EHP			★	★	.3750	.1875	.0313	.1500
		TNMM333EHP			★	★	.3750	.1875	.0469	.1500
		TNMM432EHP			★	★	.5000	.1875	.0313	.2031
		TNMM433EHP			★	★	.5000	.1875	.0469	.2031
		TNMM434EHP			★		.5000	.1875	.0625	.2031
		TNMM543EHP			★	★	.6250	.2500	.0469	.2500
	0°	TNMM544EHP			★	★	.6250	.2500	.0625	.2500

● = NEW AC8020P Stocked item
★ = NEW AC8020P Worldwide Warehouse item
● = USA Stocked item
★ = Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

See next page for negative inserts availbility continued

AC8015P/AC8020P/AC8025P/AC8035P - Negative Inserts

TRM 55° Triangle/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Fine Finishing	EFL 10°	TRM551704-FL			★		.3937	.1968	.0156	.0846
		TRM551708-FL			★		.3937	.1968	.0313	.0846
Fine Finishing	ELU 10°	TRM551704-LU	●		●		.3937	.1968	.0156	.0846
		TRM551708-LU	●		●		.3937	.1968	.0313	.0846
		TRM551712-LU	●		●		.3937	.1968	.0469	.0846
Medium Finishing	ESU 13°	TRM551704-SU			★		.3937	.1968	.0156	.0846
		TRM551708-SU			★		.3937	.1968	.0313	.0846
		TRM551712-SU			●		.3937	.1968	.0469	.0846
Medium	EGU 7°	TRM551704-GU			●		.3937	.1968	.0156	.0846
		TRM551708-GU			●		.3937	.1968	.0313	.0846
		TRM551712-GU	●		●		.3937	.1968	.0469	.0846

VNMG 35° Diamond/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Fine Cutting	EFL 10°	VNMG331EFL			●		.3750	.1875	.0156	.1500
		VNMG332EFL		●	●		.3750	.1875	.0313	.1500
	EFE 20°	VNMG330.5EFE	★	★	★	★	.3750	.1875	.0078	.1500
		VNMG331EFE	●	★	★	★	.3750	.1875	.0156	.1500
		VNMG332EFE	★	●	★	★	.3750	.1875	.0313	.1500
		VNMG333EFE	★	★	★	★	.3750	.1875	.0469	.1500
Finishing	ELU 10°	VNMG331ELU	●	●	●		.3750	.1875	.0156	.1500
		VNMG332ELU	●	●	●		.3750	.1875	.0313	.1500
		VNMG333ELU	●	★			.3750	.1875	.0469	.1500
	ESU 13°	VNMG331ESU	●	●	●	●	.3750	.1875	.0156	.1500
		VNMG332ESU	●	●	●	●	.3750	.1875	.0313	.1500
	ESE 5°	VNMG331ESE	●	●	●	★	.3750	.1875	.0156	.1500
		VNMG332ESE	●	●	●	●	.3750	.1875	.0313	.1500
Finishing	EEF 20°	VNMG330.5EEF	★	★	★	★	.3750	.1875	.0078	.1500
		VNMG331EEF	★	●	★	★	.3750	.1875	.0156	.1500
		VNMG332EEF	★	●	●	★	.3750	.1875	.0313	.1500
Light - Medium	ESX 3°	VNMG331ESX	●	●	●	●	.3750	.1875	.0156	.1500
		VNMG332ESX	●	●	●	●	.3750	.1875	.0313	.1500
	EUP 10°	VNMG331EUP			●	●	.3750	.1875	.0156	.1500
		VNMG332EUP			●	●	.3750	.1875	.0313	.1500
Medium	EGU 7°	VNMG331EGU	●	●	●	●	.3750	.1875	.0156	.1500
		VNMG332EGU	●	●	●	●	.3750	.1875	.0313	.1500
		VNMG333EGU	★	●	●	●	.3750	.1875	.0469	.1500
	EGE 3°	VNMG331EGE	●	●	●	★	.3750	.1875	.0156	.1500
		VNMG332EGE	●	●	●	★	.3750	.1875	.0313	.1500
		VNMG333EGE	●	★	●	★	.3750	.1875	.0469	.1500
Medium	EUX 0°	VNMG331EUX	●	★	●	●	.3750	.1875	.0156	.1500
		VNMG332EUX	●	●	●	●	.3750	.1875	.0313	.1500
		VNMG333EUX	●	★	●	★	.3750	.1875	.0469	.1500
	ENG 4°	VNMG331ENG	●		●	●	.3750	.1875	.0156	.1500
		VNMG332ENG	●		●	●	.3750	.1875	.0313	.1500
Medium	EEG 0°	VNMG331EEG	★	★	★	●	.3750	.1875	.0156	.1500
		VNMG332EEG	★	★	★	●	.3750	.1875	.0313	.1500
		VNMG333EEG	★	★	★	●	.3750	.1875	.0469	.1500
Medium to Rough	ENZ 4°	VNMG331ENZ			★	●	.3750	.1875	.0156	.1500
		VNMG332ENZ			●	●	.3750	.1875	.0313	.1500
		VNMG333ENZ			●	★	.3750	.1875	.0469	.1500
		VNMG432ENZ		●	●	●	.5000	.1875	.0313	.2031
		VNMG433ENZ		●	●	●	.5000	.1875	.0469	.2031

WNMG Trigon/Negative

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Fine Finishing	EFL 10°	WNMG431EFL			●		.5000	.1875	.0156	.2031
		WNMG432EFL			●		.5000	.1875	.0313	.2031
	EFE 20°	WNMG331EFE	★	★	★	★	.3750	.1875	.0156	.1500
		WNMG332EFE	★	★	★	●	.3750	.1875	.0313	.1500
		WNMG430.5EFE	★	★	★	●	.3750	.1875	.0078	.2031
		WNMG431EFE	★	●	★	●	.5000	.1875	.0156	.2031
		WNMG432EFE	★	●	★	●	.5000	.1875	.0313	.2031
		WNMG433EFE	★	●	★	●	.5000	.1875	.0469	.2031
Finishing	ELU 10°	WNMG331ELU	★	●	●	★	.3750	.1875	.0156	.1500
		WNMG332ELU	★	●	●	★	.3750	.1875	.0313	.1500
		WNMG333ELU	★	★	★	★	.3750	.1875	.0469	.1500
		WNMG431ELU	●	●	●	★	.5000	.1875	.0156	.2031
		WNMG432ELU	●	●	●	★	.5000	.1875	.0313	.2031
		WNMG433ELU	●	●	●	★	.5000	.1875	.0469	.2031
Wiper Insert	ELUW 10°	WNMG331ELUW	●	★	●		.3750	.1875	.0156	.1500
		WNMG332ELUW	●	★	●		.3750	.1875	.0313	.1500
		WNMG431ELUW	●	●	●		.5000	.1875	.0156	.2031
		WNMG432ELUW	●	●	●		.5000	.1875	.0313	.2031
		WNMG433ELUW	●	★	●		.5000	.1875	.0469	.2031

WNMG Trigon/Negative Cont'd

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ESU 13°	WNMG32.51ESU			★		.3750	.1563	.0156	.1500
		WNMG32.52ESU			★		.3750	.1563	.0313	.1500
		WNMG331ESU	●	●	●	●	.3750	.1875	.0156	.1500
		WNMG332ESU	●	★	●	●	.3750	.1875	.0313	.1500
		WNMG333ESU	★	★	●	★	.3750	.1875	.0469	.1500
		WNMG431ESU	●	●	●	●	.5000	.1875	.0156	.2031
		WNMG432ESU	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433ESU	●	★	●	★	.5000	.1875	.0469	.2031
Finishing	ESE 5°	WNMG431ESE	●	●	●	★	.5000	.1875	.0156	.2031
		WNMG432ESE	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433ESE	●	●	●	★	.5000	.1875	.0469	.2031
Wiper Insert	ESEW 5°	WNMG331ESEW	★	★	●	★	.3750	.1875	.0156	.1500
		WNMG332ESEW	●	●	●	★	.3750	.1875	.0313	.1500
		WNMG431ESEW	★	●	★		.5000	.1875	.0156	.2031
		WNMG432ESEW	●	●	●		.5000	.1875	.0313	.2031
		WNMG433ESEW	★	●	●		.5000	.1875	.0469	.2031
Finishing	EEF 20°	WNMG331EEF	★	★	★	★	.3750	.1875	.0156	.1500
		WNMG332EEF	★	★	★	●	.3750	.1875	.0313	.1500
		WNMG431EEF	★	★	★	●	.5000	.1875	.0156	.2031
		WNMG432EEF	★	★	★	●	.5000	.1875	.0313	.2031
Finishing	ESX 3°	WNMG431ESX	●	★	●	●	.5000	.1875	.0156	.2031
		WNMG432ESX	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433ESX	●	★	●	●	.5000	.1875	.0469	.2031
Light	EUP 10°	WNMG432EUP			●	●	.5000	.1875	.0313	.2031
Medium Cutting	EGU 7°	WNMG331EGU	★	★	●	★	.3750	.1875	.0156	.1500
		WNMG332EGU	★	●	●	●	.3750	.1875	.0313	.1500
		WNMG333EGU	★	★	●	★	.3750	.1875	.0469	.1500
		WNMG431EGU	●	★	●	●	.5000	.1875	.0156	.2031
		WNMG432EGU	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433EGU	●	●	●	●	.5000	.1875	.0469	.2031
Wiper Insert	EGUW 7°	WNMG332EGUW	★	●	●	●	.3750	.1875	.0313	.1500
		WNMG432EGUW	●	●	●		.5000	.1875	.0313	.2031
		WNMG433EGUW	●	●	●		.5000	.1875	.0469	.2031
Medium Cutting	EGE 3°	WNMG332EGE	●	★	●	●	.3750	.1875	.0313	.1500
		WNMG333EGE	●	★	●	★	.3750	.1875	.0469	.1500
		WNMG431EGE	★	★	★	●	.5000	.1875	.0156	.2031
		WNMG432EGE	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433EGE	●	●	●	●	.5000	.1875	.0469	.2031
		WNMG434EGE	★	★	●	★	.5000	.1875	.0625	.2031
	EUX 0°	WNMG431EUX	●	★	●	●	.5000	.1875	.0156	.2031
		WNMG432EUX	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433EUX	●	●	●	●	.5000	.1875	.0469	.2031
Medium Cutting	ENG 4°	WNMG32.51ENG			★		.3750	.1563	.0156	.1500
		WNMG32.52ENG			★		.3750	.1563	.0313	.1500
		WNMG331ENG			★		.3750	.1875	.0156	.1500
		WNMG332ENG			★		.3750	.1875	.0313	.1500
		WNMG431ENG	●	●	●	●	.5000	.1875	.0156	.2031
		WNMG432ENG	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433ENG			●	●	.5000	.1875	.0469	.2031
		WNMG543ENG		●	●	●	.6250	.2500	.0469	.2500
Medium Cutting	EEG 0°	WNMG332EEG	★	●	●	●	.3750	.1875	.0313	.1500
		WNMG333EEG	★	★	●	★	.3750	.1875	.0469	.1500
		WNMG431EEG	★	★	★	●	.5000	.1875	.0156	.2031
		WNMG432EEG	★	★	●	●	.5000	.1875	.0313	.2031
		WNMG433EEG	★	●	★	●	.5000	.1875	.0469	.2031
Roughing	EMU 4°	WNMG332EMU	●	●	●	●	.3750	.1875	.0313	.1500
		WNMG333EMU	●	●	●	★	.3750	.1875	.0469	.1500
		WNMG432EMU	●	●	●	★	.5000	.1875	.0313	.2031
		WNMG433EMU	●	●	●	●	.5000	.1875	.0469	.2031
		WNMG434EMU	★	★	★		.5000	.1875	.0625	.2031
		WNMG543EMU	●	●	●	●	.6250	.250	.0469	.2500
Roughing	EEM 0°	WNMG432EEM	★	★	●	●	.5000	.1875	.0313	.2031
		WNMG433EEM	★	●	★	●	.5000	.1875	.0469	.2031
Roughing	EME 4°	WNMG332EME	★	●	●	●	.3750	.1875	.0313	.1500
		WNMG333EME	★	●	●	★	.3750	.1875	.0469	.1500
		WNMG432EME	●	●	●	●	.5000	.1875	.0313	.2031
		WNMG433EME	★	●	●	●	.5000	.1875	.0469	.2031
		WNMG434EME	●		●	★	.5000	.1875	.0625	.2031
Roughing	EMX -15°	WNMG432EMX		★	●	●	.5000	.1875	.0313	.2031
		WNMG433EMX		★	●	●	.5000	.1875	.0469	.2031
Roughing	ENZ 4°	WNMG431ENZ			●	★	.5000	.1875	.0156	.2031
		WNMG432ENZ			●	★	.5000	.1875	.0313	.2031
		WNMG433ENZ			★	★	.5000	.1875	.0469	.2031

● = NEW AC8020P Stocked item
★ = NEW AC8020P Worldwide Warehouse item
● = USA Stocked item
★ = Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

AC8015P/AC8020P/AC8025P/AC8035P - Postive Inserts

CCMT 80° Diamond/ 7° Relief Angle

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU	CCMT21.50.5ELU	●	●	●		.2500	.0937	.0078	.1102
		CCMT21.51ELU	●	●	●		.2500	.0937	.0156	.1102
		CCMT32.51ELU	●	●	●		.3750	.1563	.0156	.1732
	15°	CCMT32.52ELU	●	●	●		.3750	.1563	.0313	.1732
Wiper	ELUW	CCMT32.51ELUW	●	●	●		.3750	.1563	.0156	.1732
	15°	CCMT32.52ELUW	●	●	●		.3750	.1563	.0313	.1732
Light Cutting	ELB	CCMT21.50.5ELB		●	●	●	.2500	.0937	.0078	.1102
		CCMT21.51ELB		●	●	●	.2500	.0937	.0156	.1102
		CCMT21.52ELB		●	●	●	.2500	.0937	.0313	.1102
		CCMT32.50.5ELB		●	●	●	.3750	.1563	.0078	.1732
		CCMT32.51ELB		●	●	●	.3750	.1563	.0156	.1732
	15°	CCMT32.52ELB		●	●	●	.3750	.1563	.0313	.1732
Light Cutting	ESU	CCMT21.50.5ESU	★	●	●	●	.2500	.0937	.0078	.1102
		CCMT21.51ESU	●	●	●	●	.2500	.0937	.0156	.1102
		CCMT21.52ESU	●	●	●	●	.2500	.0937	.0313	.1102
		CCMT32.50.5ESU	★	●	●	●	.3750	.1563	.0078	.1732
		CCMT32.51ESU	●	●	●	●	.3750	.1563	.0156	.1732
		CCMT32.52ESU	●	●	●	●	.3750	.1563	.0313	.1732
		CCMT431ESU	★	●	●	●	.5000	.1875	.0156	.2165
	8°	CCMT432ESU	★	●	●	●	.5000	.1875	.0313	.2165
Light Cutting	ENK	CCMT21.51ENK	●		●	●	.2500	.0937	.0156	.1102
		CCMT21.52ENK	●		●	●	.2500	.0937	.0313	.1102
		CCMT32.51ENK	●		●	●	.3750	.1563	.0156	.1732
		CCMT32.52ENK	●		●	●	.3750	.1563	.0313	.1732
		CCMT431ENK			●	●	.5000	.1875	.0156	.2165
	8°	CCMT432ENK			●	●	.5000	.1875	.0313	.2165
Light Cutting	EFM	CCMT21.51EFM			●		.2500	.0937	.0156	.1102
		CCMT2.521EFM			★		.3125	.0937	.0156	.1339
		CCMT322EFM			★		.3750	.1250	.0313	.1732
	6°	CCMT432EFM			★		.5000	.1875	.0313	.2165
Medium Cutting	EGU New	CCMT21.51EGU	●	●	●	●	.2500	.0937	.0156	.1102
		CCMT21.52EGU	●	●	●	●	.2500	.0937	.0313	.1102
		CCMT32.51EGU	●	●	●	●	.3750	.1563	.0156	.1732
		CCMT32.52EGU	●	●	●	●	.3750	.1563	.0313	.1732
	8°	CCMT432EGU	★	●	●	●	.5000	.1875	.0313	.2165
Medium	EMU	CCMT32.51EMU	●	●	●		.3750	.1563	.0156	.1732
	0°	CCMT32.52EMU	●	●	●	●	.3750	.1563	.0313	.1732

CPMT 80° Diamond/11° Relief Angle

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU	CPMT2.51.51ELU	★	★	★		.3125	.0937	.0156	.1339
		CPMT321ELU	★	★	●		.3750	.1250	.0156	.1732
	15°	CPMT322ELU	★	★	★		.3750	.1250	.0313	.1732
Wiper	ELUW	CPMT321ELUW	★	★	★		.3750	.1250	.0156	.1732
	15°	CPMT322ELUW	★	★	★		.3750	.1250	.0313	.1732
Light	ELB	CPMT2.51.51ELB		★	★	●	.3125	.0937	.0156	.1339
		CPMT321ELB		★	★	●	.3750	.1250	.0156	.1732
	15°	CPMT322ELB		★	★	●	.3750	.1250	.0313	.1732
Light Cutting	ESU	CPMT21.51ESU	●	●	●		.2500	.0937	.0156	.1102
		CPMT21.52ESU	●	●	●		.2500	.0937	.0313	.1102
		CPMT2.51.51ESU	★	★	●	★	.3125	.0937	.0156	.1339
		CPMT2.51.52ESU	★	★	●	★	.3125	.0937	.0313	.1339
		CPMT321ESU	★	★	●	●	.3750	.1250	.0156	.1732
		CPMT322ESU	★	★	●	●	.3750	.1250	.0313	.1732
		CPMT32.51ESU	●	●	●		.3750	.1563	.0156	.1732
	8°	CPMT32.52ESU	●	●	●		.3750	.1563	.0313	.1732
Medium	EGU New	CPMT321EGU	★	●	●	★	.3750	.1250	.0156	.1732
		CPMT322EGU	★	●	●	★	.3750	.1250	.0313	.1732
	8°									
Medium	EMU	CPMT2.51.51EMU	★	★	●		.3125	.0937	.0156	.1339
		CPMT2.51.52EMU	★	★	●		.3125	.0937	.0313	.1339
		CPMT321EMU	★	★	★		.3750	.1250	.0156	.1732
	0°	CPMT322EMU	★	★	★		.3750	.1250	.0313	.1732

●= NEW AC8020P Stocked item
★= NEW AC8020P Worldwide Warehouse item
●= USA Stocked item
★= Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

DCMT 55° Diamond/ 7° Relief Angle

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU	DCMT21.50.5ELU	★	★	★		.2500	.0937	.0078	.1102
		DCMT21.51ELU	●	●	●		.2500	.0937	.0156	.1102
		DCMT32.50.5ELU	★	★	★		.3750	.1563	.0078	.1732
		DCMT32.51ELU	●	●	★		.3750	.1563	.0156	.1732
	15°	DCMT32.52ELU	●	●	●		.3750	.1563	.0313	.1732
Light Cutting	ELB	DCMT21.50.5ELB		●	●	●	.2500	.0937	.0078	.1102
		DCMT21.51ELB		●	●	●	.2500	.0937	.0156	.1102
		DCMT21.52ELB		●	●	●	.2500	.0937	.0313	.1102
		DCMT32.50.5ELB		★	●	●	.3750	.1563	.0078	.1732
		DCMT32.51ELB		●	●	●	.3750	.1563	.0156	.1732
	15°	DCMT32.52ELB	●	●	●	●	.3750	.1563	.0313	.1732
Light Cutting	ESU	DCMT21.50.5ESU	★	★	●	★	.2500	.0937	.0078	.1102
		DCMT21.51ESU	●	●	●	●	.2500	.0937	.0156	.1102
		DCMT21.52ESU	●	●	●	●	.2500	.0937	.0313	.1102
		DCMT32.50.5ESU	★	●	●	●	.3750	.1563	.0078	.1732
		DCMT32.51ESU	●	●	●	●	.3750	.1563	.0156	.1732
	8°	DCMT32.52ESU	●	●	●	●	.3750	.1563	.0313	.1732
Light	ENK	DCMT21.51ENK			●	●	.2500	.0937	.0156	.1102
		DCMT32.51ENK			●	●	.3750	.1563	.0156	.1732
	8°	DCMT32.52ENK			●	●	.3750	.1563	.0313	.1732
Medium Cutting	EGU New	DCMT21.51EGU	●	●	●	●	.2500	.0937	.0156	.1102
		DCMT21.52EGU	★	●	●	★	.2500	.0937	.0313	.1102
		DCMT32.50.5EGU		●	●		.3750	.1563	.0078	.1732
		DCMT32.51EGU	★	●	●	●	.3750	.1563	.0156	.1732
	8°	DCMT32.52EGU	●	●	●	●	.3750	.1563	.0313	.1732
	EMU	DCMT32.51EMU	●	★	●		.3750	.1563	.0156	.1732
	0°	DCMT32.52EMU	●	●	●	●	.3750	.1563	.0313	.1732

DPMT 55° Diamond/ 11° Relief Angle

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Light	ESU	DPMT21.51ESU		●	●		.2500	.0937	.0156	.1102
		DPMT32.51ESU		●	●		.3750	.1563	.0156	.1732
	0°	DPMT32.52ESU		●	●		.3750	.1563	.0313	.1732

RCMT Round Type/ 7° Relief Angle

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium to Roughing	RX	RCMT100300	★	★	★	★	.394	.1250		.1732
		RCMT120400	●	●	●	●	.472	.1875		.1732
		RCMT160600	●	★	★	●	.630	.2500		.1969
		RCMT200600	●	★	★	●	.787	.2500	—	.2559
	-15°	RCMT250700	●	●	★	●	.984	.313		.2992
	ERH	RCMT120400ERH	★	★	★	★	.472	.1875		.1732
		RCMT160600ERH	★	★	★	★	.630	.2500		.1969
	-15°	RCMT200600ERH	★	★	★	★	.787	.2500		.2559

RCMX Round Type/ 7° Relief Angle

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Roughing	RP	RCMX100300	★	★	★	●	.394	.1250		.1417
		RCMX120400	●	★	★	●	.472	.1875		.1654
		RCMX160600	●	★	★	●	.630	.2500		.2047
		RCMX200600	★	★	★	●	.787	.2500	—	.2559
		RCMX250700	●	●	★	★	.984	.313		.2835
	-15°	RCMX320900	★	●	★		1.259	.3750		.374

SCMT 90° Square/ 7° Relief Angle

	Chipbreaker	Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU	SCMT32.51ELU	●	★	●		.3750	.1563	.0156	.1732
	15°	SCMT32.52ELU	●	★	●		.3750	.1563	.0313	.1732
	ELB	SCMT32.51ELB		★	●	●	.3750	.1563	.0156	.1732
	15°	SCMT32.52ELB		★	●	●	.3750	.1563	.0313	.1732
Light Cutting	ENK	SCMT32.52ENK			●	●	.3750	.1563	.0313	.1732
		SCMT431ENK			●	●	.5000	.1875	.0156	.2165
		SCMT432ENK			●	●	.5000	.1875	.0313	.2165
		SCMT433ENK				●	.5000	.1875	.0469	.2165
	ESU	SCMT32.51ESU	●	★	●	★	.3750	.1563	.0156	.1732
		SCMT32.52ESU	●	●	●	●	.3750	.1563	.0313	.1732
		SCMT431ESU	★	●	●	●	.5000	.1875	.0156	.2165
	8°	SCMT432ESU	★	●	●	●	.5000	.1875	.0313	.2165
Medium	EGU New	SCMT32.51EGU	●	★	●	★	.3750	.1563	.0156	.1732
		SCMT32.52EGU	●	●	●	●	.3750	.1563	.0313	.1732
	8°	SCMT432EGU	★	●	●	★	.5000	.1875	.0313	.2165
	EMU	SCMT32.52EMU	●	★	●		.3750	.1563	.0313	.1732
	0°	SCMT432EMU	●	★	★		.5000	.1875	.0313	.2165

See next page for positive inserts availbility continued

AC8015P/AC8020P/AC8025P/AC8035P - Postive Inserts

SPMT 90° Square/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU	SPMT321ELU	★	★	★		.3750	.1250	.0156	.1732
		SPMT322ELU	●	★	★		.3750	.1250	.0313	
Light Cutting	ELB	SPMT321ELB		★	★	●	.3750	.1250	.0156	
		SPMT322ELB		★	★	●	.3750	.1250	.0313	
Light to Medium Cutting	ENF	SPMT321ENF			★	★	.3750	.1250	.0156	
		SPMT322ENF			★	●	.3750	.1250	.0313	

SPMR 90° Square/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Light	ENF	SPMR321ENF			★	★	.3750	.1250	.0156	—
		SPMR322ENF			★	●	.3750	.1250	.0313	
		SPMR421ENF			★	●	.5000	.1250	.0156	
		SPMR422ENF			★	●	.5000	.1250	.0313	
		SPMR423ENF			★		.5000	.1250	.0469	
Light to Medium	EUJ	SPMR321EUJ			★		.3750	.1250	.0156	
		SPMR322EUJ			★	★	.3750	.1250	.0313	
		SPMR421EUJ			★		.5000	.1250	.0156	
		SPMR422EUJ			★	★	.5000	.1250	.0313	

SPG 90° Square/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium		SPG422		●	●		.5000	.1250	.0313	—
		SPG423		●	●		.5000	.1250	.0469	
		SPG432		●	●		.5000	.1875	.0313	
		SPG433		●	●		.5000	.1875	.0469	
		SPG632		●	●		.7500	.1875	.0313	
		SPG633		●	●		.7500	.1875	.0469	
		SPG634		●	●		.7500	.1875	.0625	

SPMN 90° Square/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium		SPMN322		●	●		.3750	.1250	.0313	—
		SPMN421		●	●		.5000	.1250	.0156	
		SPMN422		●	●		.5000	.1250	.0313	
		SPMN634		●	●		.7500	.1875	.0625	

TBGT Triangle/ 5° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	LFX	TBGT520.5LFX			●		.1563	.0625	.0078	.0866
		TBGT521LFX			●		.1563	.0625	.0156	.0866
Finish - Light	W	TBGT520.5L			●		.1563	.0625	.0078	.0866
		TBGT521L			●		.1563	.0625	.0156	.0866

TCMT Triangle/ 7° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU	TCMT21.51ELU	●	★	★		.2500	.0937	.0156	.1102
		TCMT21.52ELU	●	★	★		.2500	.0937	.0313	.1102
Light Cutting	ELB	TCMT21.51ELB		★	●	●	.2500	.0937	.0156	.1102
		TCMT21.52ELB		●	●	●	.2500	.0937	.0313	.1102
	ESU	TCMT21.51ESU	●	●	●	●	.2500	.0937	.0156	.1102
		TCMT21.52ESU	●	●	●	●	.2500	.0937	.0313	.1102
		TCMT32.51ESU	●	●	●	●	.3750	.1563	.0156	.1693
		TCMT32.52ESU	●	●	●	●	.3750	.1563	.0313	.1693
	ENK	TCMT21.51ENK	●		●	●	.2500	.0937	.0156	.1102
		TCMT21.52ENK	●		●	●	.2500	.0937	.0313	.1102
		TCMT32.51ENK	●		●	●	.3750	.1563	.0156	.1693
		TCMT32.52ENK	●		●	●	.3750	.1563	.0313	.1693
		TCMT32.53ENK			●		.3750	.1563	.0469	.1693

TPMT Triangle/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU	TPMT1.81.50.5ELU	★	★	★		.2189	.0937	.0078	.1102
		TPMT1.81.51ELU	★	●	★		.2189	.0937	.0156	.1102
		TPMT221ELU	●	★	●		.2500	.1250	.0156	.1339
		TPMT222ELU	★	★	●		.2500	.1250	.0313	.1339
Light	ELB	TPMT630.5ELB		★	●	●	.1875	.0937	.0078	.0945
		TPMT631ELB		★	●	●	.1875	.0937	.0156	.0945
		TPMT1.81.50.5ELB		★	●	●	.2189	.0937	.0078	.1102
		TPMT1.81.51ELB		★	●	●	.2189	.0937	.0156	.1102
		TPMT220.5ELB		★	●	●	.2500	.1250	.0078	.1339
		TPMT221ELB		★	●	●	.2500	.1250	.0156	.1339
		TPMT222ELB		●	●	●	.2500	.1250	.0313	.1339
		TPMT321ELB		●	●	●	.3750	.1250	.0156	.1732
		TPMT322ELB		●	★	●	.3750	.1250	.0313	.1732
		TPMT331ELB		★	●	●	.3750	.1875	.0156	.1732
		TPMT332ELB		★	●	●	.3750	.1875	.0313	.1732
Light	ESU	TPMT1.81.50.5ESU		●	●		.2189	.0937	.0078	.1102
		TPMT1.81.51ESU		●	●		.2189	.0937	.0156	.1102
		TPMT21.50.5ESU	●	●	●		.2500	.0937	.0078	.1339
		TPMT21.51ESU	●	●	●		.2500	.0937	.0156	.1339
		TPMT21.52ESU	●	●	●		.2500	.0937	.0313	.1339
		TPMT220.5ESU	★	●	●	★	.2500	.1250	.0078	.1339
		TPMT221ESU	●	●	●	★	.2500	.1250	.0156	.1339
		TPMT222ESU	●	★	●	★	.2500	.1250	.0313	.1339
		TPMT32.51ESU	●	●	●		.3750	.1563	.0156	.1732
		TPMT32.52ESU	●	●	●		.3750	.1563	.0313	.1732
		TPMT331ESU	★	★	●	●	.3750	.1875	.0156	.1732
		TPMT332ESU	★	●	●	●	.3750	.1875	.0313	.1732
Medium	EGU (New)	TPMT221EGU	★	●	●	★	.2500	.1250	.0156	.1339
		TPMT222EGU	●	●	●	★	.2500	.1250	.0313	.1339
		TPMT331EGU	★	●	●	●	.3750	.1875	.0156	.1732
		TPMT332EGU	★	●	●	★	.3750	.1875	.0313	.1732
Light to Medium	EMU	TPMT221EMU	★	★	★		.2500	.1250	.0156	.1339
		TPMT222EMU	●	★	●		.2500	.1250	.0313	.1339
		TPMT331EMU	●	★	●		.3750	.1875	.0156	.1732
		TPMT332EMU	★	★	●		.3750	.1875	.0313	.1732
	ENF	TPMT221ENF			●	●	.2500	.1250	.0156	.1339
		TPMT222ENF			●	●	.2500	.1250	.0313	.1339
		TPMT331ENF			●	●	.3750	.1875	.0156	.1732
		TPMT332ENF			●	●	.3750	.1875	.0313	.1732

● = NEW AC8020P Stocked item
★ = NEW AC8020P Worldwide Warehouse item
● = USA Stocked item
★ = Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

See next page for positive inserts availbility continued

AC8015P/AC8020P/AC8025P/AC8035P - Postive Inserts

TPMN Triangle/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium		TPMN321		●	●		.3750	.1250	.0156	—
		TPMN322		●	●		.3750	.1250	.0313	
		TPMN432		●	●		.5000	.1875	.0313	
		TPMN433		●	●		.5000	.1875	.0469	

TPMR Triangle/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Light	ENF  0°	TPMR221ENF			●	★	.2500	.1250	.0156	—
		TPMR222ENF	●		●	★	.2500	.1250	.0313	
		TPMR321ENF			●	●	.3750	.1250	.0156	
		TPMR322ENF	●		●	●	.3750	.1250	.0313	
		TPMR323ENF			●	●	.3750	.1250	.0469	
		TPMR432ENF			●	●	.5000	.1875	.0313	
		TPMR433ENF			●	●	.5000	.1875	.0469	
Light to Medium	EUJ  0°	TPMR221EUJ			★	★	.2500	.1250	.0156	
		TPMR222EUJ			★	★	.2500	.1250	.0313	
		TPMR321EUJ			★	★	.3750	.1250	.0156	
		TPMR322EUJ			●	★	.3750	.1250	.0313	

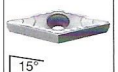
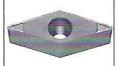
TPG Triangle/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Medium Cutting		TPG221		●	●		.2500	.1250	.0156	—
		TPG222		●	●		.2500	.1250	.0313	
		TPG321		●	●		.3750	.1250	.0156	
		TPG322		●	●		.3750	.1250	.0313	
		TPG323		●	●		.3750	.1250	.0469	
		TPG324		●	●		.3750	.1250	.0625	
		TPG332		●	●		.3750	.1875	.0313	
		TPG431		●	●		.5000	.1875	.0156	
		TPG432		●	●		.5000	.1875	.0313	
		TPG433		●	●		.5000	.1875	.0469	
		TPG434		●	●		.5000	.1875	.0625	
		TPG436			●		.5000	.1875	.0938	

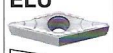
●= NEW AC8020P Stocked item
★= NEW AC8020P Worldwide Warehouse item
●= USA Stocked item
★= Worldwide Warehouse item

* AVAILBILITY SUBJECT TO CHANGE.

VBMT 35° Diamond/ 5° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU  15°	VBMT221ELU	●	★	★		.2500	.1250	.0156	.1102
		VBMT222ELU	★	★	★		.2500	.1250	.0313	.1102
		VBMT331ELU	●	●	●		.3750	.1875	.0156	.1732
		VBMT332ELU	●	●	●		.3750	.1875	.0313	.1732
Light	ELB  15°	VBMT220.5ELB		★	★	●	.2500	.1250	.0078	.1102
		VBMT221ELB		★	★	●	.2500	.1250	.0156	.1102
		VBMT222ELB		●	★	●	.2500	.1250	.0313	.1102
		VBMT331ELB		●	●	●	.3750	.1875	.0156	.1732
		VBMT332ELB		●	●	●	.3750	.1875	.0313	.1732
		VBMT333ELB		★	★	●	.3750	.1875	.0469	.1732
Light	ESU  8°	VBMT221ESU	●	●	●		.2500	.1250	.0156	.1102
		VBMT222ESU	●	●	●		.2500	.1250	.0313	.1102
		VBMT331ESU	●	●	●	★	.3750	.1875	.0156	.1732
		VBMT332ESU	●	●	●	●	.3750	.1875	.0313	.1732
		VBMT333ESU	★	★	★		.3750	.1875	.0469	.1732
Light	ENK  8°	VBMT332ENK			●		.3750	.1875	.0313	.1732
Medium	EGU New  8°	VBMT221EGU	●	●	●	★	.2500	.1250	.0156	.1102
		VBMT222EGU	●	●	●	★	.2500	.1250	.0313	.1102
		VBMT331EGU	●	●	●	★	.3750	.1875	.0156	.1732
		VBMT332EGU	●	●	●	●	.3750	.1875	.0313	.1732

VCMT 35° Diamond/ 7° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Finishing	ELU  15°	VCMT331ELU	●	●	●		.3750	.1875	.0156	.1732
		VCMT332ELU	●	★	●		.3750	.1875	.0313	.1732
Light Cutting	ELB  15°	VCMT630.5ELB		★	★	●	.1875	.0937	.0078	.0906
		VCMT631ELB		★	●	●	.1875	.0937	.0156	.0906
		VCMT331ELB		★	●	●	.3750	.1875	.0156	.1732
		VCMT332ELB		★	●	●	.3750	.1875	.0313	.1732
	ESU  8°	VCMT221ESU		★	★		.2500	.1250	.0156	.1102
		VCMT222ESU		★	★		.2500	.1250	.0313	.1102
		VCMT331ESU	●	●	●	★	.3750	.1875	.0156	.1732
		VCMT332ESU	●	●	●	★	.3750	.1875	.0313	.1732
	ENK  8°	VCMT331ENK			●	●	.3750	.1875	.0156	.1732
		VCMT332ENK			●	●	.3750	.1875	.0313	.1732
Medium	EGU New  8°	VCMT331EGU	●	●	●	●	.3750	.1875	.0156	.1732
		VCMT332EGU	●	●	●	★	.3750	.1875	.0313	.1732

WPMT 80° Trigon/ 11° Relief Angle

Chipbreaker		Sumitomo Catalog Number	AC8015P	AC8020P	AC8025P	AC8035P	Inscribed Circle	Thickness	Nose Radius	Insert Hole Diameter
Light	ELB  15°	WPMT110204N-LB		★	●	★	.2500	.0937	.0156	.1102
		WPMT160308N-LB		★	●	★	.3750	.1250	.0313	.1732

AC8000P PRODUCT PAGE

SUMITOMO

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