

PASS STANDARD I STATION D

DIAMETER UP TO 88,9 MM



GUIDE ASSEMBLY

Screw M12

Springs for sheet thickness up to 6 mm

3 mm length adjustment
by using compensating shims

Keyway: 0-90°

Surface-hardened and polished punch guide
for sheet thickness up to 6 mm

Clamping-screw to fix the strippers

PUNCH BODY

Thread M12

Punch body made with premium H-PM®

STRIPPER

Interchangeable stripper plate

PASS STANDARD I STATION D

DIAMETER UP TO 88,9 MM

PART NO.

GUIDE ASSEMBLY		
	For all shapes	499D01

PUNCH BODY (H-PM®)		
	Round	4022D01
	Square	4022D02
	Rectangle	4022D03
	Oblong	4022D04
	O.D. Ground Special Shape	4022D0G
	EDM Required Special Shape	4022D0E

STRIPPER		
	Round	4032D01
	Square	4032D02
	Rectangle	4032D03
	Oblong	4032D04
	O.D. Ground Special Shape	4032D0G
	EDM Required Special Shape	4032D0E

DIE (HWS)		
	Round	4052D01
	Square	4052D02
	Rectangle	4052D03
	Oblong	4052D04
	O.D. Ground Special Shape	4052D0G
	EDM Required Special Shape	4052D0E



SPARE PARTS		ADDITIONAL COSTS FOR PUNCH
PU ejector Ø 3x6 (in punch)	4092P03	TICN coating
PU ejector Ø 6x10 (in punch)	4092P06	T-MAX coating
Set clamping-springs with screws	499D71	A-MAX coating
Guiding key with screws	499D63	WT-shear
		DOWT-shear
		2 PT-shear
		4 PT-shear
		Additional keyway
		Cutting part under 1,00 mm
SET OF COMPENSATING SHIMS FOR PUNCH		ADDITIONAL COSTS FOR PUNCH GUIDE
1x0,4 mm/1x0,8 mm/1x1,2 mm	499D3S1	Additional keyway
SET OF COMPENSATING SHIMS FOR DIE		ADDITIONAL COSTS FOR DIES
1x0,4 mm/1x0,8 mm/1x1,2 mm	499D2M1	H-PM® Quality
		Additional keyway

ps:®beta-V2® | STATION D

DIAMETER UP TO 88,9 MM



GUIDE ASSEMBLY

Screw M12

Springs for sheet thickness up to 6 mm

Oil channel for sheet lubrication

10 mm length adjustment in assembled state
by pressing the locking button

Keyway: 0-90°

Surface-hardened and polished punch guide
for sheet thickness up to 6 mm

Fast and easy clamping system for stripper



PUNCH BODY

Thread M12 with oil channel

Punch body made with premium H-PM®

STRIPPER

Interchangeable stripper plate

ps:®beta-V2® | STATION D

DIAMETER UP TO 88,9 MM

		PART NO.
GUIDE ASSEMBLY		
	For all shapes	4030D01
PUNCH BODY (H-PM®)		
	Round	4020D01
	Square	4020D02
	Rectangle	4020D03
	Oblong	4020D04
	O.D. Ground Special Shape	4020D0G
	EDM Required Special Shape	4020D0E
STRIPPER		
	Round	4040D01
	Square	4040D02
	Rectangle	4040D03
	Oblong	4040D04
	O.D. Ground Special Shape	4040D0G
	EDM Required Special Shape	4040D0E
DIE (HWS)		
	Round	4052D01
	Square	4052D02
	Rectangle	4052D03
	Oblong	4052D04
	O.D. Ground Special Shape	4052D0G
	EDM Required Special Shape	4052D0E



SPARE PARTS		ADDITIONAL COSTS FOR PUNCH
PU ejector Ø 3x6 (in punch)	4092P03	TiCN coating
PU ejector Ø 6x10 (in punch)	4092P06	T-MAX coating
		A-MAX coating
		WT-shear
		DOWT-shear
		2 PT-shear
		4 PT-shear
		Additional keyway
		Cutting part under 1,00 mm
COMPENSATING SHIM FOR PUNCH		ADDITIONAL COSTS FOR PUNCH GUIDE
Not necessary		Additional keyway
SET OF COMPENSATING SHIMS FOR DIE		ADDITIONAL COSTS FOR DIES
1x0,4 mm/1x0,8 mm/1x1,2 mm	499D2M1	H-PM® Quality
		Additional keyway

ps:®beta-V2® SLITTING TOOL I STATION D



GUIDE ASSEMBLY

Screw M12

Springs for sheet thickness up to 6 mm

Oil channel for sheet lubrication

10 mm length adjustment in assembled state
by pressing the locking button

Keyway: 0-90°

Surface-hardened and polished punch guide
for sheet thickness up to 6 mm

Fast and easy clamping system for stripper



SLITTING TOOL ADAPTER

4 fixing threads M6

Thread M12 with oil channel

SLITTING TOOL

Punch body made with premium H-PM®



STRIPPER

Interchangeable stripper plate

ps:®beta-v2® SLITTING TOOL I STATION D

		PART NO.
GUIDE ASSEMBLY		
	For all shapes	4030D01
SLITTING TOOL ADAPTER		
	For all shapes	4220DT00
SLITTING TOOL (MAX. 6,35X85) / (H-PM®)		
	Rectangle	4020DT03
	Oblong	4020DT04
	Trapezoid G09	4020DT0G
	Double Trapezoid E03	4020DT0E
STRIPPER		
	Rectangle	4040DT03
	Oblong	4040DT04
	Trapezoid G09	4040DT0G
	Double Trapezoid E03	4040DT0E
REVERSIBLE PLATE ADAPTER		
		4390DT00
REVERSIBLE PLATE (H-PM®)		
	Rectangle	4052DT03
	Oblong	4052DT04
	Trapezoid G09	4052DT0G
	Double Trapezoid E03	4052DT0E



SPARE PARTS		ADDITIONAL COSTS FOR PUNCH
PU ejector Ø 3x6 (in punch)	4092P03	TICN coating
PU ejector Ø 6x10 (in punch)	4092P06	T-MAX coating
		A-MAX coating
		WT-shear
		DOWT-shear
		2 PT-shear
		4 PT-shear
		Additional keyway
		Cutting part under 1,00 mm
COMPENSATING SHIM FOR SLITTING TOOL ADAPTER		ADDITIONAL COSTS FOR PUNCH GUIDE
Not necessary		Additional keyway
SET OF COMPENSATING SHIMS FOR REVERSIBLE PLATE		ADDITIONAL COSTS FOR DIES
1x0,4 mm/1x0,8 mm/1x1,2 mm	499DT60	Additional keyway

ps:®beta-V2® SLITTING TOOL I STATION D CLOSE TO CLAMP



GUIDE ASSEMBLY

Screw M12

Springs for sheet thickness up to 6 mm

Oil channel for sheet lubrication

10 mm length adjustment in assembled state
by pressing the locking button

Keyway: 0-90°

Surface-hardened and polished punch guide
for sheet thickness up to 6 mm

Fast and easy clamping system for stripper



SLITTING TOOL ADAPTER

4 fixing threads M6

Thread M12 with oil channel

SLITTING TOOL

Punch body made with premium H-PM®



STRIPPER

Interchangeable stripper plate

One or two-sided relief for punching close to clamp

ps:®beta-V2® SLITTING TOOL I STATION D

CLOSE TO CLAMP

PART NO.

GUIDE ASSEMBLY		
	For all shapes	4030DTP01

SLITTING TOOL ADAPTER		
	For all shapes	4220DT00

SLITTING TOOL (MAX. 6,35X85) / (H-PM®)		
	Rectangle	4020DT03
	Oblong	4020DT04
	Trapezoid G09	4020DT0G
	Double Trapezoid E03	4020DT0E

STRIPPER ONE-SIDED FREE		
	Rectangle	4040DTP03-1
	Oblong	4040DTP04-1
	Trapezoid G09	4040DTP0G-1
	Double Trapezoid E03	4040DTP0E-1

STRIPPER TWO-SIDED FREE		
	Rectangle	4040DTP03-2
	Oblong	4040DTP04-2
	Trapezoid G09	4040DTP0G-2
	Double Trapezoid E03	4040DTP0E-2

DIE ONE-SIDED FREE (HWS)		
	Rectangle	4052DTP03-1
	Oblong	4052DTP04-1
	Trapezoid G09	4052DTP0G-1
	Double Trapezoid E03	4052DTP0E-1

DIE TWO-SIDED FREE (HWS)		
	Rectangle	4052DTP03-2
	Oblong	4052DTP04-2
	Trapezoid G09	4052DTP0G-2
	Double Trapezoid E03	4052DTP0E-2

SPARE PARTS		ADDITIONAL COSTS FOR PUNCH
PU ejector Ø 3x6 (in punch)	4092P03	TiCN coating
PU ejector Ø 6x10 (in punch)	4092P06	T-MAX coating

A-MAX coating
WT-shear
DOWT-shear
2 PT-shear
4 PT-shear

Additional keyway

Cutting part under 1,00 mm

COMPENSATING SHIM FOR SLITTING TOOL ADAPTER		ADDITIONAL COSTS FOR PUNCH GUIDE
Not necessary		Additional keyway

SET OF COMPENSATING SHIMS FOR DIE		ADDITIONAL COSTS FOR DIES
1x0,4 mm/1x0,8 mm/1x1,2 mm	499D2M1	H-PM® Quality
		Additional keyway



Function:

The ps:®clean-cut for THICK TURRET machines was developed to obtain slitting perforations without any witness marks.

The typical nibbling slitting tool leaves marks that can be seen and are noticeable. These marks normally have to be polished manually to be removed.



When using the ps:®clean-cut no witness marks are made and only smooth and clean cuts can be seen - without the need of additional rework.

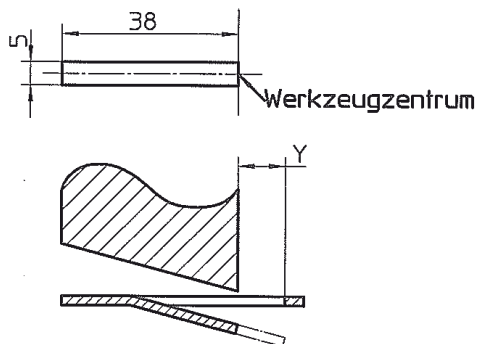


Functional principle of the tool:

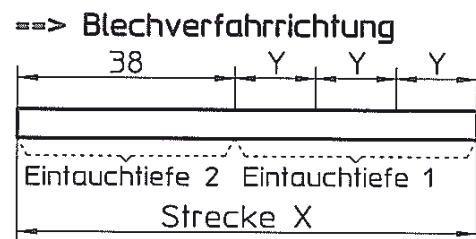
Continuous slitting. The shavings will be guided within the die and will be separated into pieces with the second slitting unit.

Programming information:

The punch shape rectangle 5x38 is located asymmetrically to the tool center. Thus, the beginning of the slitting point is located at the tool center. The endpoint of the slit is transferred by 38 mm to the tool center.



The way X will be cut with a punching depth 1 (continuous slit - see sketch). The last hit has to be programmed with a punching depth 2 (deep hit - see sketch), in order to specify the way length exactly and remove the remaining slug out of the tool.



Technical handling of the tool:

The upper part has got a total length of 208,5 mm (see drawing 499110001).

The die is spring-loaded and 4 mm higher (see drawing 499110001).

The result of this is the increasing programming working position of minimum 4 mm (better would be 6 mm).

Step 1:

The punching depth 1 (continuous slitting) has to be determined by fine adjustment on the machine. In this case the slit on the sheet upper side must have a length of 32 to 37 mm. For this reason one sheet sample (size ~ 60 x 60 mm to 100 x 100 mm) should be placed by hand onto the die. After the test hit the station can be returned to changing position and the sheet can be removed.

WARNING: Please do not use a complete sheet plate in the clamp for test hits, as manual removal of the sheet is almost impossible.

Step 2:

The punching depth 2 (deep end hit) has to be determined by fine adjustment on the machine.

In this case the slug must be punched 2,0 to 3,0 mm into the die on the short side of the whisper shear.

(Theoretical calculation: punching depth 1 + sheet thickness + 2 to 3 mm)

ps:®clean-cut

FOR MACHINE TYPE THICK TURRET - STATION D

		PART-NO.
COMPLETE TOOL		
		499110001
COMPLETE UPPER PART		
		499110001-1
COMPLETE DIE		
		499110001-2
SPARE PARTS TO UPPER ASSY		
Punch insert (Re 5x38)		499110040
Stripper plate		499110030
SPARE PARTS TO DIE ASSY		
Die plate		199110050
Guillotine unit cpl. incl. slitting plate		199110001-3
Slitting plate - top		199110140
Slitting plate - bottom		199110150
Set springs for die plate		199110903
Set shoulder screws for die plate		199110904



TECHNICAL INFORMATION		ADDITIONAL COSTS FOR SLITTING BLADE
Aluminium:	0,5 - 1,2 mm (step: 16 mm)	TiCN coating (for stainless steel-sheet)
Steel:	0,5 - 1,2 mm (step: 16 mm)	A-MAX coating (for aluminium sheet)
Stainless steel:	0,5 - 1,2 mm (step: 16 mm)	T-MAX coating (for zinc steel)
Aluminium:	1,25 - 1,5 mm (step: 12 mm)	
Steel:	1,25 - 1,5 mm (step: 12 mm)	
Aluminium:	1,6 - 2,0 mm (step: 10 mm)	
		ADDITIONAL COSTS FOR STRIPPER
		Polished version for low-scratch material handling

MAX. REGRINDING LENGTH		ADDITIONAL COSTS FOR DIE PLATE
Punch: (Lmin = 201,5 mm)	7 mm	Polished version for low-scratch material handling
Die plate: (Hmin = 33,5 mm)	0,5 mm	