



GROUP 404 STORAGE BINS




Page **258**

GROUP 405 WORKBENCHES




Pages **259 - 260**

GROUP 421 KEY STEEL




Page **261**

GROUP 425 CLAMPING FIXTURES



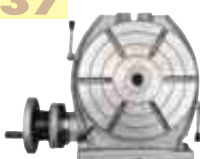
Pages **261 - 274**

GROUP 437 INDEXING UNITS



Page **275**

GROUP 437 ROTARY TABLES




Page **275**

GROUP 440 CHUCKS




Page **276**

GROUP 441 CHUCK KEYS



Page **277**

GROUP 442 CHUCK ARBORS



Page **277**

GROUP 443 TOGGLE CLAMPS



Pages **278 - 285**

GROUP 445 WORKSHOP VICES



Pages **286 - 287**

GROUP 445 MACHINE VICES



Pages **288 289**

GROUP 445 TOOLPOSTS




Pages **290 - 291**

GROUP 445 LATHE CARRIERS




Page **291**

GROUP 447 COOLANT HOSE



Page **292**

GROUP 448 BENCH SHEARS



Page **293**

GROUP 450 KNURLING TOOLS




Page **293**

GROUP 482 MORSE TAPER SLEEVES



Page **294**

GROUP 482 DRILL DRIFTS




Page **294**

GROUP 487 SOLID CENTRES




Page **295**

GROUP 488 REVOLVING CENTRES




Page **295**

GROUP 490 LATHE CHUCK JAWS



Page **296**

GROUP 495 WHEEL DRESSERS



Page **297**

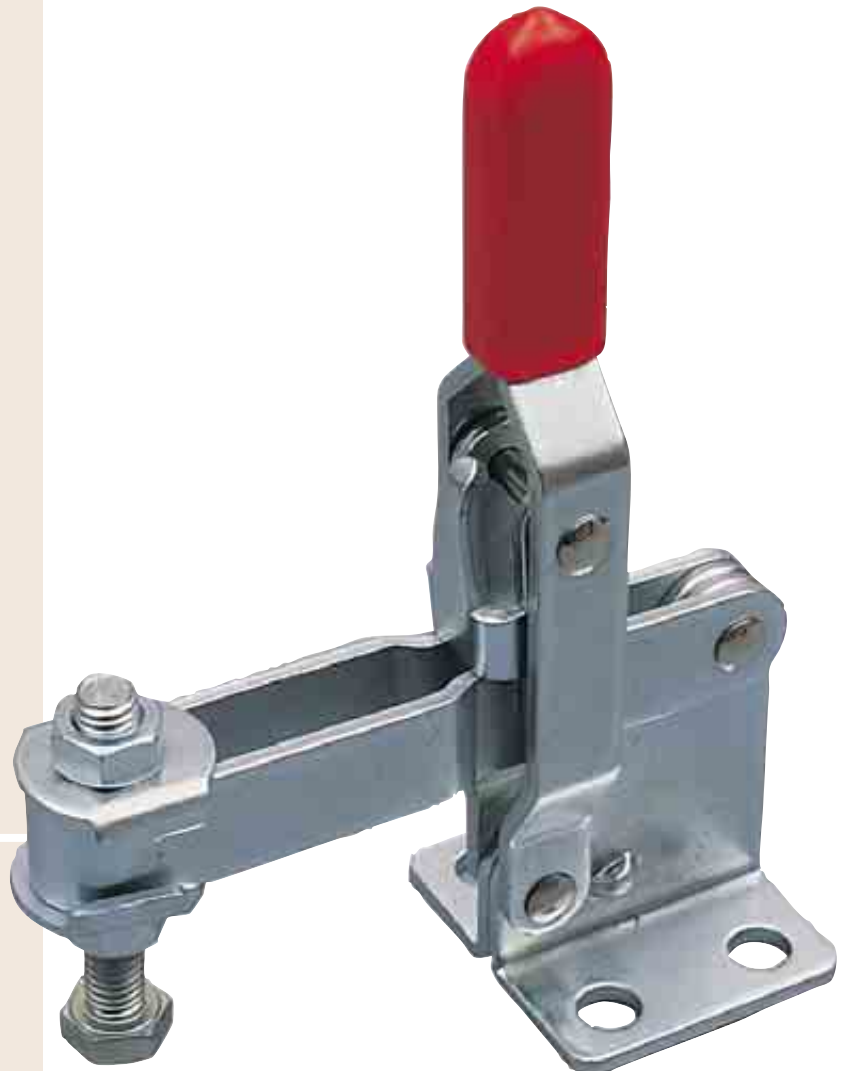
Section 4 Contents

4

Workshop Equipment

Section 4
Product Groups
404 - 495

Description	Group	Page
Bench Shears	448	293
Chuck Arbors	442	277
Chuck Keys	441	277
Chucks	440	276
Clamping Fixtures	425	261 - 274
Coolant Hose	447	292
Indexing Units	437	275
Key Steel	421	261
Knurling Tools	450	293
Lathe Chucks	475	294
Lathe Chuck Jaws	490	296
Morse Taper Sleeves	482	294
Revolving Centres	488	295
Rotary Tables	437	275
Solid Centres	487	295
Storage Bins	404	258
Toggle Clamps	443	278 - 285
Toolposts	445	290 - 291
Vices	445	286 - 289
Wheel Dressers	495	297
Workbenches & Cabinets	405	259 - 260



MATLOCK Plastic Storage Bins

Manufactured from high strength polypropylene. Fit on standard louvre panel, interlocking design.



EXTENDED RANGE

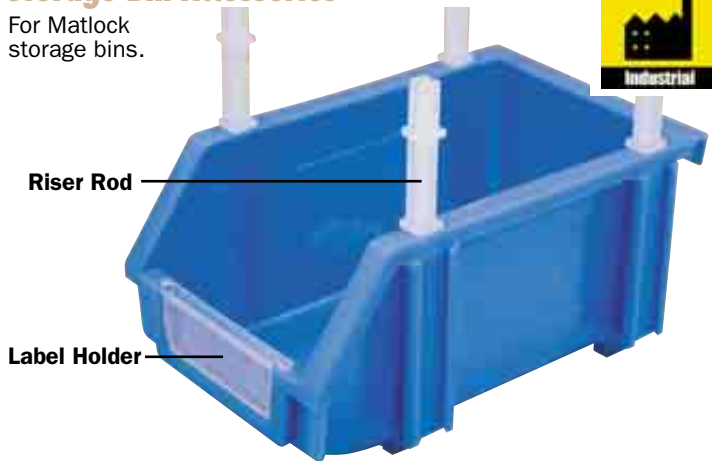
Workshop Equipment



Size	Dimensions L x W x H (mm)	Colour	Box Qty	Order Code MTL-404
No.0	130x85x53	Blue	300	-1000B
		Green		-1000G
		Red		-1000R
		Yellow		-1000Y
No.1	163x104x80	Blue	100	-1010B
		Green		-1010G
		Red		-1010R
		Yellow		-1010Y
No.2	237x157x132	Blue	64	-1020B
		Green		-1020G
		Red		-1020R
		Yellow		-1020Y
No.3	278x222x165	Blue	24	-1030B
		Green		-1030G
		Red		-1030R
		Yellow		-1030Y
No.3A	350x280x184	Blue	8	-1035B
		Green		-1035G
		Red		-1035R
		Yellow		-1035Y
No.4	425x280x184	Blue	12	-1040B
		Green		-1040G
		Red		-1040R
		Yellow		-1040Y
No.5	425x280x260	Blue	8	-1050B
		Green		-1050G
		Red		-1050R
		Yellow		-1050Y

Storage Bin Accessories

For Matlock storage bins.



Riser Rod

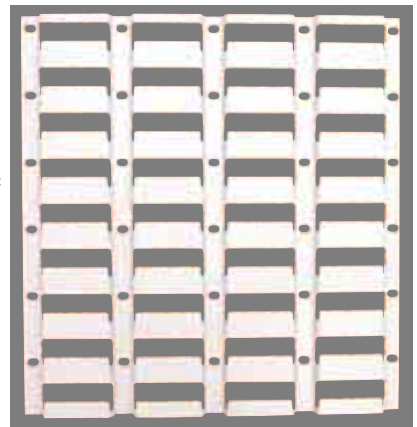
Label Holder

Description	Order Code MTL-404
Set of 4 Riser Rods	-9010K
Single Riser rod for No.3A, 4 & 5 Bins	-9020K
Label Holder For No.0 Bins	-3500K
Label Holder For No.1 Bins	-3510K
Label Holder For No.2 Bins	-3520K
Label Holder For No.3 & 4 Bins	-3530K
Label Holder For No.3A & 5 Bins	-3540K

Steel Louvred Panels

NEW

Pressed steel panels with high frequency louvres that will accept most makes of plastic storage bin. High frequency louvres allow bins to be hung in a high-density configuration in any mix of sizes/colours. The lip on the rear of the plastic storage bin sits securely over the louvre of the panel. The modular design allows storage bins to be easily removed and replaced when required.



Bins supplied separately.

Type	Width x Height (mm)	Order Code MTL-404
LP450	450 x 450	-2004P
LP900	450 x 900	-2009P
LP1600	450 x 1600	-2016P
LP1800	450 x 1800	-2018P

Parts, Component & Tool Storage Bins

High strength polypropylene Euro boxes with reinforced corners and rims and integral interlocking hinged lids. Smooth flat base allows silent movement on conveyors making them suitable for use in distribution centres or warehouse storage.

All containers feature ergonomic hand and can be sealed using security tags.

NEW

Available in 20, 40 or 54ltr capacities.



Capacity	Size (L x W x H) (mm)	Colour	Order Code MTL-404
20ltr	400 x 300 x 260	Blue	-2500K
40ltr	600 x 400 x 250		-2520K
54ltr	600 x 400 x 335		-2530K
20ltr	400 x 300 x 260	Grey	-2600K
40ltr	600 x 400 x 250		-2620K
54ltr	600 x 400 x 335		-2630K



SENATOR Cabinet with Shelf & Workbench

Manufactured from cold rolled steel plate with a hard wearing corrosion resistant powder coated finish. Hard wearing solid wooden work surface. Two shelves. Adjustable feet. Supplied with assembly instructions.
Maximum shelf capacity 20kg.
Maximum cabinet capacity 150kg.



SELF ASSEMBLY
Tools Required

Dimensions (W x D x H) Weight Order Code
838x508x852 25.5kg **SEN-405**
-5030K

Locking Cabinet & Workbench

Lockable storage cabinet with two shelves. Overall dimensions (W x D x H): 838 x 508 x 852mm.
Max shelf capacity 20kg.
Max cabinet capacity 150kg.



SELF ASSEMBLY
Tools Required

Dimensions WxDxH (mm) Weight Order Code
838x508x852 27.0kg **SEN-405**
-5020K

5 Drawer Cabinet & Workbench

The five drawers have a smooth action sliding mechanism.



SELF ASSEMBLY
Tools Required

Dimensions WxDxH (mm) Weight Order Code
838x508x852 43.0kg **SEN-405**
-5010K

Locking Cabinet with Shelf and Workbench

Lockable storage cabinet with two shelves and two open shelves for additional storage. Overall dimensions (W x D x H): 1372 x 508 x 865mm.
Max shelf/drawer capacity 25kg.
Max cabinet capacity 180kg.



NEW

Shelf Capacity
25kg
Uniformly Distributed Load

SELF ASSEMBLY
Tools Required

Dimensions W x D x H (mm) Weight Order Code
1372 x 508 x 865 48.5kg **SEN-405**
-5040K

5 Drawer Cabinet and Shelved Workbench

The five drawers have a smooth action sliding mechanism. Two open shelves for additional storage. Overall dimensions (W x D x H): 1372 x 508 x 865mm.
Max shelf drawer capacity 25kg.
Max cabinet capacity 180kg.



NEW

Shelf Capacity
25kg
Uniformly Distributed Load

SELF ASSEMBLY
Tools Required

Dimensions W x D x H (mm) Weight Order Code
1372 x 508 x 865 61.0kg **SEN-405**
-5050K

Workshop Equipment

KENNEDY 2 Drawer Workbench
QUALITY INDUSTRIAL TOOLING

Professional quality two drawer workbench constructed from heavy gauge steel for sturdy long-term use. Ideal for a range of workshop and industrial applications. Drawers are lockable and fitted with smooth glide drawer runners. Full length storage shelf. Quick and easy assembly. Powder coated finish.

Dimensions (W x D x H):
1500 x 640 x 865mm.



Shelf Capacity
40kg
Uniformly
Distributed Load

NEW

SELF ASSEMBLY
Tools
Required

Dimensions (W x D x H)	Order Code KEN-405
1500 x 640 x 865	-2320K

Workshop Equipment

SENATOR Home Improver Workbench & Vice
QUALITY TOOLING

Medium duty for hobby and DIY use. All steel body. Solid beech worktop with metric/imperial gauging scale and protractor markings. Easy to assemble. Sturdy splay legs with non-slip rubber feet. Four quick-change worktop functions. Supplied with four chuck blocks, assembly spanners and instructions.

Worktop width: 600mm.
Worktop depth (individual): 115mm.
Worktop depth (combined): 230mm.
Overall height: 800mm.
Width (when collapsed for storage): 280mm.
Maximum opening capacity: 140mm.
Maximum clamping capacity (with blocks): 285mm.
Weight capacity: 200kg/440lbs.



Transforms to an upright vice with jaws set at 90°.



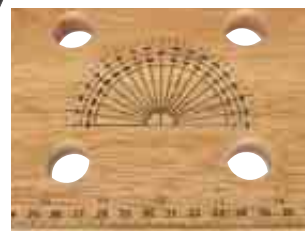
Transforms to a versatile sawhorse with jaws set at 45°.



Ideal for clamping pipe and other convex workpieces.



Transforms to a T vice. Independent arm adjustment allows the clamping of tapered objects.



Solid Beech worktop with protractor and rule markings.

Height (mm)	Width (mm)	Order Code
800	600	SEN-405 -9650K

KENNEDY Industrial
QUALITY INDUSTRIAL TOOLING **Key Steel**

High grade mild steel. Available in square or rectangular sections.
Metric manufactured from: **BS4235 Part 7 1972 grade steel** equivalent to **DIN 6885**.
Inch manufactured from: **BS46 PART 7 1958 grade steel**.
Length: 300mm and 12".
Other sizes available on request.

EXTENDED RANGE



Set Metric Square

Contents: 4, 5, 6, 8, 10 & 12m square.

No. of Pieces	Weight each	Order Code
6	850g	-0500K

Square — Metric

Type	Size	Weight each	Order Code
mm	2mm		-0020K
	3mm		-0030K
	4mm	40g	-0040K
	5mm	60g	-0050K
	6mm	90g	-0060K
	7mm	135g	-0070K
	8mm	160g	-0080K
	10mm	250g	-0100K
	12mm	350g	-0120K
	14mm	490g	-0140K
	16mm		-0160K
	18mm		-0180K
	20mm		-0200K
	22mm		-0220K
	25mm		-0250K

Square — Inch

Type	Size	Weight each	Order Code
inch	3/32"		-3060K
	1/8"	20g	-3080K
	5/32"		-3100K
	3/16"	60g	-3120K
	1/4"	100g	-3160K
	5/16"	160g	-3200K
	3/8"	220g	-3240K
	7/16"		-3280K
	1/2"	400g	-3320K
	3/4"	910g	-3480K
	5/8"		-3400K
	7/8"		-3560K
	1"		-3640K

Rectangular — Metric

Type	Size	Weight each	Order Code
mm	8 x 5mm		-0850K
	8 x 7mm	140g	-0870K
	10 x 8mm	200g	-1080K
	12 x 8mm	240g	-1280K
	12 x 10mm		-1300K
	14 x 9mm	310g	-1490K
	16 x 10mm	390g	-1610K
	18 x 11mm	490g	-1910K
	20 x 12mm	590g	-2120K
	22 x 14mm		-2400K
	25 x 14mm		-2420K
	28 x 16mm		-2550K
	32 x 18mm		-2650K
	36 x 20mm		-2700K

INDEXA Indexa T-Slot Clamping Kits

Designed to save set up time and solve most T-Slot clamping problems. All Components are manufactured from **S45C (JIS)/CK45 (DIN)** grade non-alloy carbon steel. Heat treated to HRC 28 - 32 and have a manganese phosphate surface finish. Supplied in a robust plastic case.

Contents:

Engineers Studs; (4 of each): 75, 100, 125, 150, 175 & 200mm long.

Step Blocks; (4 of each): 28, 35 & 98mm high.

Step Clamps; (2 off each): 64, 100 & 150mm long.

Extension Nuts; 4 off. **Flanged Nuts;** 6 off. **T- slot Nuts;** 6 off.



Indexa Multi Clamping Kits

Designed to save set up time and solve most machine clamping problems. All components are manufactured from **S45C (JIS)/CK45 (DIN)** grade non-alloy carbon steel. Heat treated to HRC 28 - 32 and have a manganese phosphate surface finish. Supplied in a robust plastic case.

Contents:

Stepped Clamps; (2 of each): 25 x 63mm, 100 x 32mm and 150 x 32mm.

Stepped Blocks; (2 of each): 1S, 2S and 3S.

Tapped End Plain Clamps; 100 x 30mm, 2 off.

Tapped End 'U' Clamps; 100mm long, 2 off.

Swan Necked Clamps; 120mm long, 2 off.

Plain Clamps; 100 x 30mm, 2 off.

Engineer's Studs; (4 of each): 50, 75, 100, 125, 150 and 200mm long.

Extension Nuts; 4 off. **Flanged Nuts;** 6 off. **T- slot Nuts;** 6 off.



T-Slot Size	Thread Size	Part Number	Weight each	Order Code
12mm	M10	TK10	9kg	-3610T
14mm	M12	TK12	10kg	-3612T
16mm	M14	TK14	11kg	-3614T
18mm	M16	TK16	14kg	-3616T
20mm	M18	TK18	20.5kg	-3618T

T-Slot Size	Thread Size	Part Number	Weight each	Order Code
18mm	M16	MCK116	19.5kg	-2966M

PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR



Designed to save set up time and solve most clamping problems. Manufactured to high standards. All step clamps are forged and hardened and the step blocks are made from high quality steel. All components (other than the studs) are heat treated and finished in black oxide. Available to suit a full range of metric and imperial T-Slot widths. Supplied in steel racks which can be wall mounted or fitted to workbenches for ease of storage (except M16 set which is supplied in wooden box).



Engineers Stud



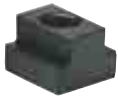
Step Block



Step Clamp



Flanged Nut



T-Slot Nut

Additional Step Clamps also available See Page 267



Extension Nut



58 Pieces Metric Sets (Quantity of each component part given in brackets)

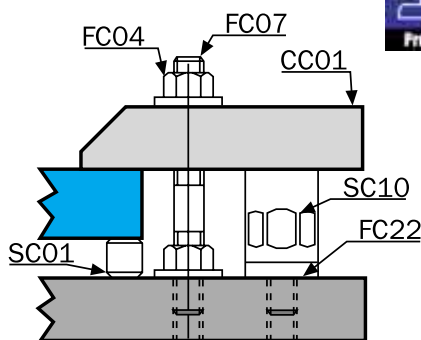
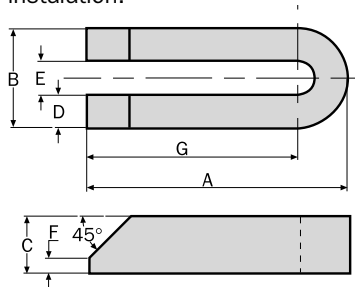
Product Number	Table Slot Size x W x L (mm)	Thread Size	Engineers Stud L x Thread L (mm)	Step Clamp L x W x H (mm)	Extension Nuts	Flange Nuts	Step Blocks (Pairs) H Adj. Range	Weight each	Order Code ATL-425
CK120100	12 x 18 x 14 (6)	M10	75 x 30 (4) 100 x 30 (4) 125 x 30 (4) 150 x 30 (4) 175 x 30 (4) 200 x 30 (4)	52 x 25 x 12 (2) 88 x 25 x 16 (2) 128 x 28 x 19 (2)	M10 x 30mm Long (4)	M10 x 15mm (6)	28 20 - 38 (4) 35 28 - 64 (4) 98 64 - 152 (4)	10kg	-1120K
CK140120	14 x 22 x 16 (6)	M12	75 x 35 (4) 100 x 35 (4) 125 x 35 (4) 150 x 35 (4) 175 x 35 (4) 200 x 35 (4)	64 x 28 x 12 (2) 100 x 32 x 19 (2) 150 x 32 x 22 (2)	M12 x 36mm Long (4)	M12 x 18mm (6)	28 20 - 38 (4) 35 28 - 64 (4) 98 64 - 152 (4)	12kg	-1140K
CK160140	16 x 25 x 18 (6)	M14	75 x 35 (4) 100 x 35 (4) 125 x 35 (4) 150 x 35 (4) 175 x 35 (4) 200 x 35 (4)	64 x 28 x 12 (2) 100 x 32 x 19 (2) 150 x 32 x 22 (2)	M14 x 42mm Long (4)	M14 x 21mm (6)	28 20 - 38 (4) 35 28 - 64 (4) 98 64 - 152 (4)	12kg	-1160K
CK180140	18 x 25 x 18 (6)	M14	75 x 35 (4) 100 x 35 (4) 125 x 35 (4) 150 x 35 (4) 175 x 35 (4) 200 x 35 (4)	64 x 28 x 12 (2) 100 x 32 x 19 (2) 150 x 32 x 22 (2)	M14 x 42mm Long (4)	M14 x 21mm (6)	28 20 - 38 (4) 35 28 - 64 (4) 98 64 - 152 (4)	12kg	-1180K
CK200160	20 x 28 x 20 (6)	M16	75 x 35 (4) 100 x 35 (4) 125 x 35 (4) 150 x 35 (4) 175 x 35 (4) 200 x 35 (4)	64 x 31 x 12 (2) 100 x 38 x 20 (2) 150 x 38 x 22 (2)	M16 x 48mm Long (4)	M16 x 24mm (6)	28 20 - 38 (4) 35 28 - 64 (4) 98 64 - 152 (4)	14kg	-1200K

58 Pieces Inch Sets (Quantity of each component part given in brackets)

Product Number	Table Slot Size x W x L (mm)	Thread Size	Engineers Stud L x Thread L (mm)	Step Clamp L x H x W (mm)	Extension Nuts	Flange Nuts	Step Blocks (Pairs) H Adj. Range	Weight each	Order Code ATL-425
CK500375	1/2" x 1 1/16" x 17/32" (6)	3/8" UNC	3" x 1 1/4" (4) 4" x 1 1/4" (4) 5" x 1 1/4" (4) 6" x 1 1/4" (4) 7" x 1 1/4" (4) 8" x 1 1/4" (4)	2" x 1" x 1/2" (2) 3 1/2" x 1 1/4" x 3/4" (2) 5" x 1 1/4" x 7/8" (2)	3/8" UNC x 1" Long (4)	3/8" UNC 7/16" (6)	1 1/8" 3/4" - 1 1/2" (4) 1 3/4" 1 1/8" - 2 1/2" (4) 3 7/8" 2 1/2" - 6" (4)	10kg	-1320K
CK62500	9/16" x 7/8" x 6/8" (6)	1/2" UNC	3" x 1 1/4" (4) 4" x 1 1/2" (4) 5" x 1 1/2" (4) 6" x 1 1/2" (4) 7" x 1 1/2" (4) 8" x 1 1/2" (4)	2 1/2" x 1 1/8" x 1/2" (2) 2" x 1 1/4" x 3/4" (2) 6" x 1 1/4" x 7/8" (2)	1/2" UNC x 1 1/4" Long (4)	1/2" UNC 13/16" (6)	1 1/8" 3/4" - 1 1/2" (4) 1 3/4" 1 1/8" - 2 1/2" (4) 3 7/8" 2 1/2" - 6" (4)	12kg	-1360K
CK62550	5/8" x 7/8" x 6/8" (6)	1/2" UNC	3" x 1 1/4" (4) 4" x 1 1/2" (4) 5" x 1 1/2" (4) 6" x 1 1/2" (4) 7" x 1 1/2" (4) 8" x 1 1/2" (4)	2 1/2" x 1 1/8" x 1/2" (2) 2" x 1 1/4" x 3/4" (2) 6" x 1 1/4" x 7/8" (2)	1/2" UNC x 1 1/4" Long (4)	1/2" UNC 13/16" (6)	1 1/8" 3/4" - 1 1/2" (4) 1 3/4" 1 1/8" - 2 1/2" (4) 3 7/8" 2 1/2" - 6" (4)	12kg	-1400K
CK750625	3/4" x 1 3/8" x 1 1/8" (6)	5/8" UNC	3" x 1 1/4" (4) 4" x 1 1/2" (4) 5" x 1 1/2" (4) 6" x 1 1/2" (4) 7" x 1 1/2" (4) 8" x 1 1/2" (4)	2 1/2" x 1 1/8" x 1/2" (2) 2" x 1 1/4" x 3/4" (2) 6" x 1 1/4" x 7/8" (2)	5/8" UNC x 1 5/8" Long (4)	5/8" UNC 13/16" (6)	1 1/8" 3/4" - 1 1/2" (4) 1 3/4" 1 1/8" - 2 1/2" (4) 3 7/8" 2 1/2" - 6" (4)	12kg	-1480K

INDEXA CC01 - U-Clamp

Open end permits quick and easy installation.



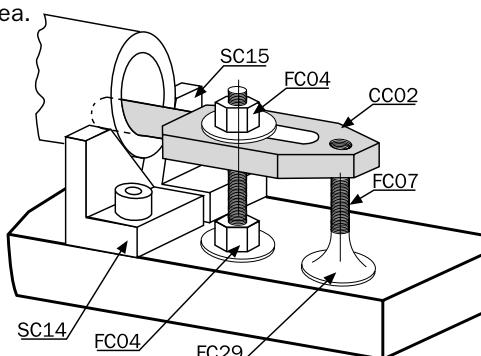
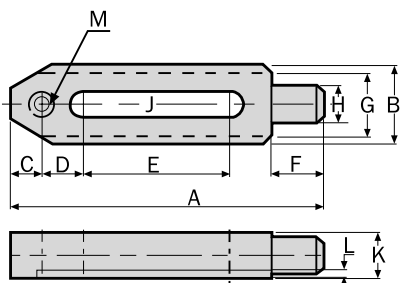
Material: Medium Carbon Steel.
Heat Treated To: HRC 32 - 38.
Surface Finish: Black Oxide.



Product Number	Length x Width A x B	Dimensions (mm)					Weight each	Order Code
		C	D	E	F	G		
CC010112	100 x 38mm	22	12.5	13	6	81	0.41kg	-1005D
CC010316	150 x 50mm	30	16.5	17	8	125	1.10kg	-1005J
CC010420	200 x 60mm	35	19.5	21	10	170	2.10kg	-1005M

CC02 - Bore Clamp

The cylindrical pin minimizes the contact area. This clamp is for clamping inside horizontal bores and onto concave surfaces.



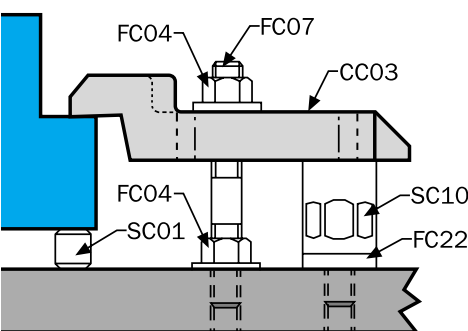
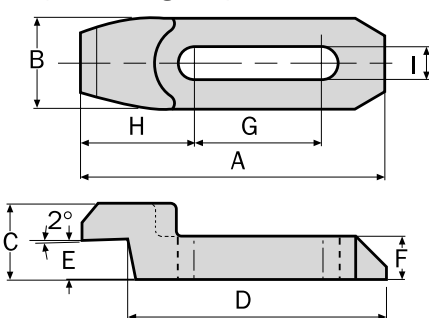
Material: Medium Carbon Steel.
Heat Treated To: HR C32 - 38.
Surface Finish: Black Oxide.



Product Number	Length x Width A x B	Dimensions (mm)									Weight each	Order Code	
		C	D	E	F	G	H	J	K	L			M
CC020112	150 x 38mm	15	20	70	25	30	18	13	22	4	M12	0.58kg	-1010D
CC020216	150 x 48mm	20	25	40	35	40	24	17	32	5	M16	1.12kg	-1010G

CC03 - Swan Necked Clamp

Low profile design helps eliminate cutter interference.



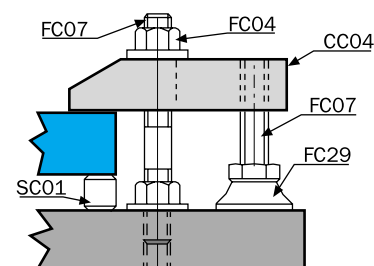
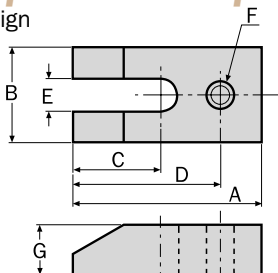
Material: Medium Carbon Steel.
Heat Treated To: HRC 32 - 38.
Surface Finish: Black Oxide.



Product Number	Length x Width A x B	Dimensions (mm)							Weight each	Order Code
		C	D	E	F	G	H	I		
CC030112	120 x 36mm	30	102	16	17	50	45	13	0.49kg	-1015H
CC030216	150 x 48mm	48	130	25	25	55	60	17	1.30kg	-1015K
CC030320	175 x 60mm	60	150	30	30	65	70	21	2.26kg	-1015N

CC04 - Tapped End U-Clamp

Open end design permits easy assembly.



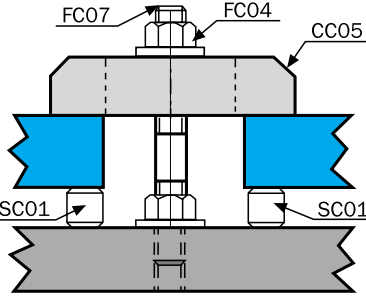
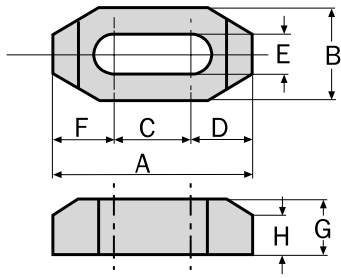
Material: Medium Carbon Steel.
Heat Treated To: HRC 32 - 38.
Surface Finish: Black Oxide.



Product Number	Length x Width A x B	Dimensions (mm)					Weight each	Order Code
		C	D	E	F	G		
CC040616	150 x 50mm	95	130	17	M16	25	1.06kg	-1020R

GROUP 425 CLAMPING FIXTURES

CC05 - Plain Clamp



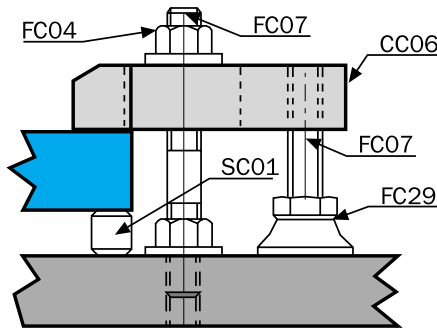
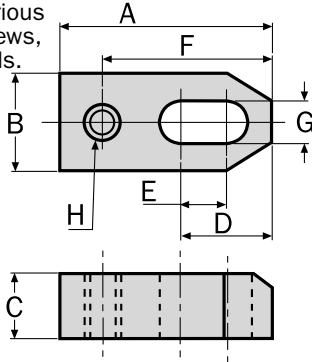
Material: Medium Carbon Steel.
Heat Treated To: HRC 32 - 38.
Surface Finish: Black Oxide.



Product Number	Length x Width		Dimensions (mm)						Weight each	Order Code
	A x B	C	D	E	F	G	H			
CC050112	65 x 32mm	25	20.0	13	20.0	19	13	0.22kg	-1025D	
CC050212	100 x 32mm	40	30.0	13	30.0	19	13	0.33kg	-1025G	
CC050316	80 x 38mm	24	28.0	17	28.0	22	14	0.34kg	-1025J	
CC050416	125 x 38mm	41	42.0	17	42.0	22	14	0.57kg	-1025M	
CC050520	100 x 38mm	32	34.0	21	34.0	22	14	0.41kg	-1025P	
CC050620	125 x 38mm	40	42.5	21	42.5	25	15	0.62kg	-1025R	

CC06 - Tapped End Plain Clamp

For use with various knobs, jack screws, clamps and pads.

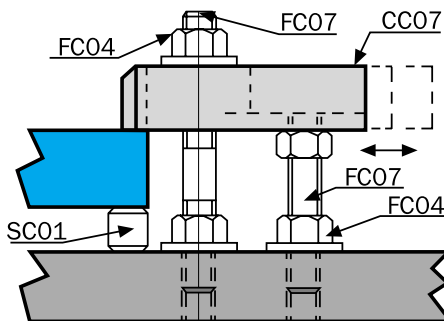
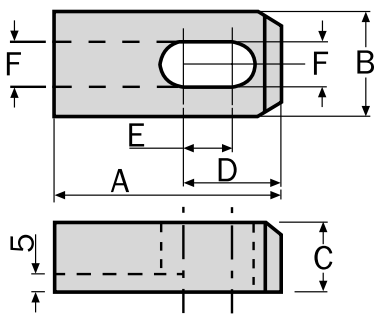


Material: Medium Carbon Steel.
Heat Treated To: HRC 32 - 38.
Surface Finish: Black Oxide.



Product Number	Length x Width		Dimensions (mm)						Weight each	Order Code
	A x B	C	D	E	F	G	H			
CC060112	65 x 32mm	19	32	14	52	13	M12	0.22kg	-1030D	
CC060212	80 x 32mm	19	48	25	69	13	M12	0.27kg	-1030F	
CC060312	100 x 32mm	19	60	40	89	13	M12	0.33kg	-1030H	
CC060416	80 x 38mm	19	40	17	65	17	M16	0.32kg	-1030J	
CC060516	100 x 38mm	25	55	30	85	17	M16	0.53kg	-1030L	
CC060616	125 x 38mm	25	70	45	110	17	M16	0.65kg	-1030N	
CC060720	150 x 50mm	25	82	50	134	21	M20	1.10kg	-1030P	
CC060820	200 x 50mm	25	112	80	184	21	M20	1.90kg	-1030R	

CC07 - Slotted End Clamp



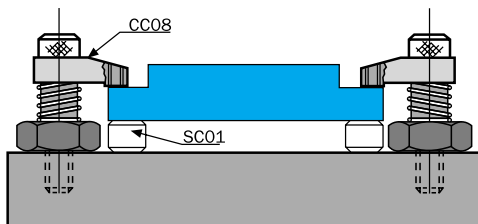
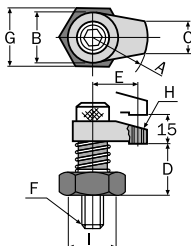
Material: Medium Carbon Steel.
Hardness: HRC 32 - 38.
Surface Finish: Black Oxide.



Product Number	Length x Width		Dimensions (mm)				Weight each	Order Code
	A x B	C	D	E	F			
CC070212	80 x 32mm	22	48	25	13	0.31kg	-1035F	
CC070616	125 x 38mm	25	70	45	17	0.65kg	-1035N	

CC08 - Swing Clamp

A small clamp with good holding power, ideal for tight spaces, full swing away feature permits easy part loading.



Material: Case Hardened Steel.
Hardness: HRC 38 - 42.
Surface Finish: Black Oxide.



Product Number	Length x Width		Dimensions (mm)						Weight each	Order Code
	A x B	C	D	E	F	G	H	I		
CC080112	30 x 28mm	16	40	-	M12	29	-	21	0.29kg	-1040D
CC080212	50 x 32mm	20	45	40	M12	36	M12	26	0.50kg	-1040G
CC080316	60 x 40mm	25	45	45	M16	41	M16	32	0.75kg	-1040J

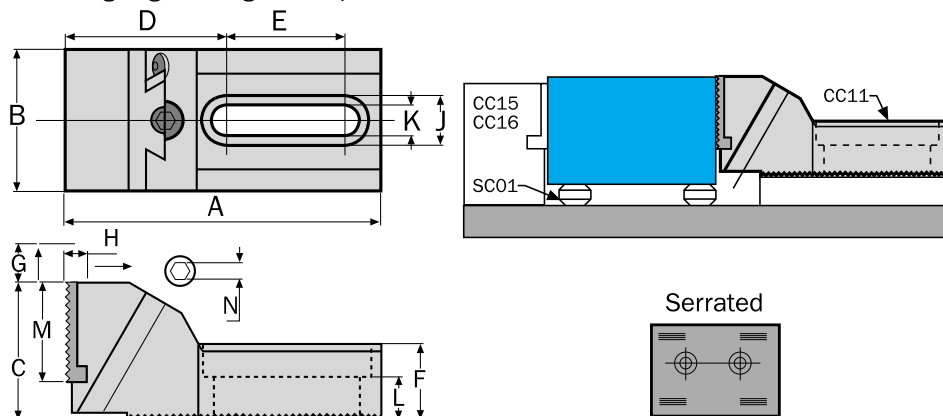
Workshop Equipment

INDEXA CC11 - Free Vice Jaw

Clamping force in 2 directions, with serrated jaws for holding large or irregular shapes.



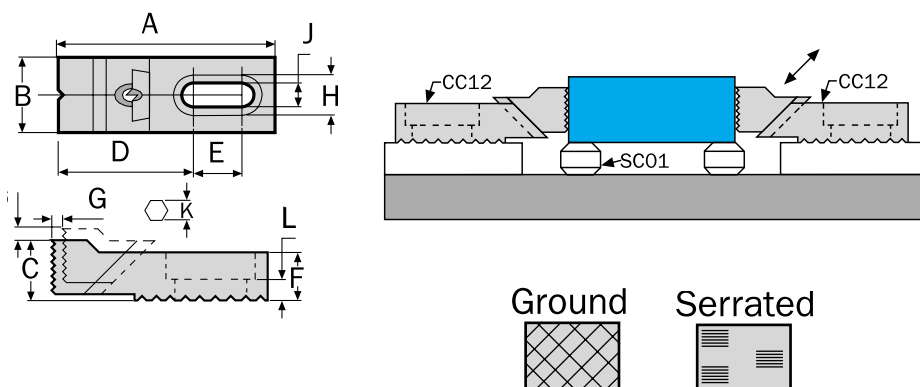
Material: Body: Grey Cast Iron.
Jaw: Medium Carbon Steel EN8D.
Hardness: Jaw Only: HRC 45 - 48.
Surface Finish: Jaw: Black Oxide.



Product Number	Type	Length x Width A x B	Dimensions (mm)											Weight each	Order Code
			C	D	E	F	G	H	J	K	L	M	N		
CC110112	Serrated	133 x 60mm	54.5	68	50	32	16	6	22	13	16.8	42	10	2.0kg	-1045D

CC12 —Adjustable Clamp

Low profile clamp that keeps top surfaces clear for machining. Ideal for rough or finished parts.



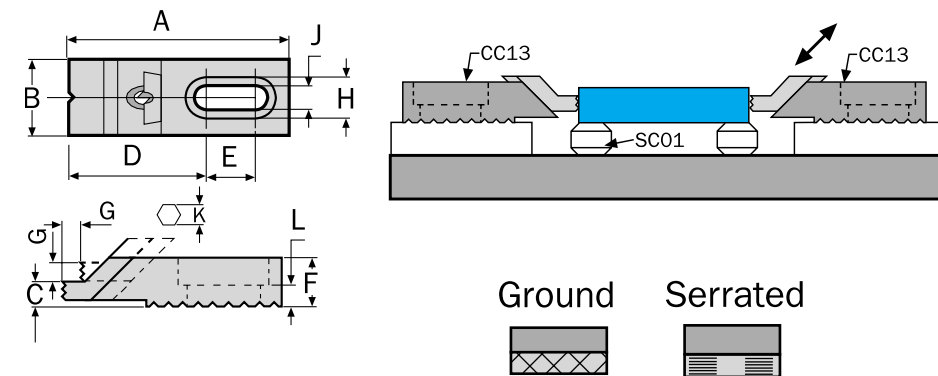
Material: Medium Carbon Steel.
Hardness: Jaw Only: HRC 38.
Surface Finish: Black Oxide.
Jaws: Surface treated with high frequency quenching.



Product Number	Type	Length x Width x Height A x B x C	Dimensions (mm)											Weight each	Order Code
			D	E	F	G	H	J	K	L					
CC120108	Serrated	73.45 x 25 x 18mm	46.95	16.5	16	7	14	8.5	4	7	0.18kg	-1050D			
CC120212		106.64 x 35 x 27.5mm	62.14	30.0	22	12	20	13.5	6	9	0.52kg	-1050F			
CC120316		134.64 x 40 x 37.5mm	82.14	35.0	30	14	26	17.0	8	13	1.02kg	-1050H			
CC120512	Ground	104.64 x 35 x 27.5mm	62.14	30.0	22	12	20	13.5	6	9	0.52kg	-1050M			
CC120616		134.64 x 40 x 37.5mm	82.14	35.0	30	14	26	17.0	8	13	1.02kg	-1050R			

CC13 - Adjustable Stepped Clamp

Low profile clamp for holding thin parts and keeping top surfaces clear for machining.



Material: Medium Carbon Steel.
Heat Treated To: HRC 38.
Surface Finish: Black Oxide.
Jaws: Surface treated with high frequency quenching.



Product Number	Type	Length x Width x Height A x B x C	Dimensions (mm)											Weight each	Order Code
			D	E	F	G	H	J	K	L					
CC130108	Serrated	73.45 x 25 x 18mm	46.95	16.5	16.5	7	14	8.5	5	7	0.18kg	-1055D			
CC130212		106.64 x 35 x 27.5mm	64.14	30.0	22.0	12	20	13.5	6	9	0.52kg	-1055F			
CC130316		133.14 x 40 x 14mm	90.00	30.0	30.0	14	26	17.0	8	13	0.85kg	-1055H			
CC130512	Ground	105 x 35 x 27.5mm	64.14	26.0	22.0	12	20	13.5	6	9	0.52kg	-1055M			

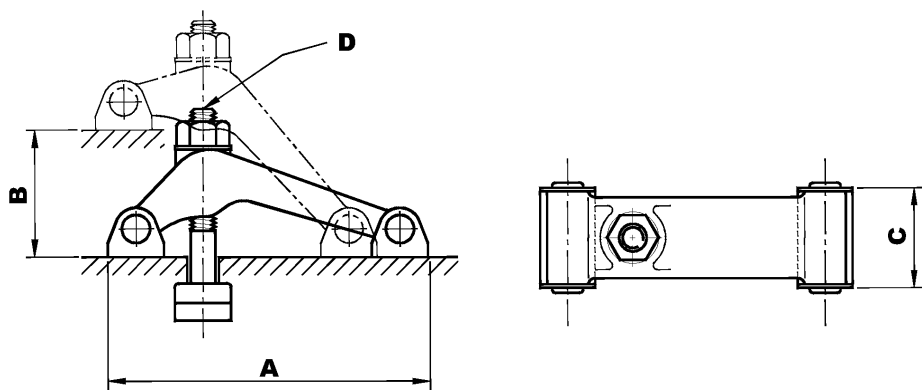
PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

Workshop Equipment

INDEXA CC19 - Forged Swivel Clamp



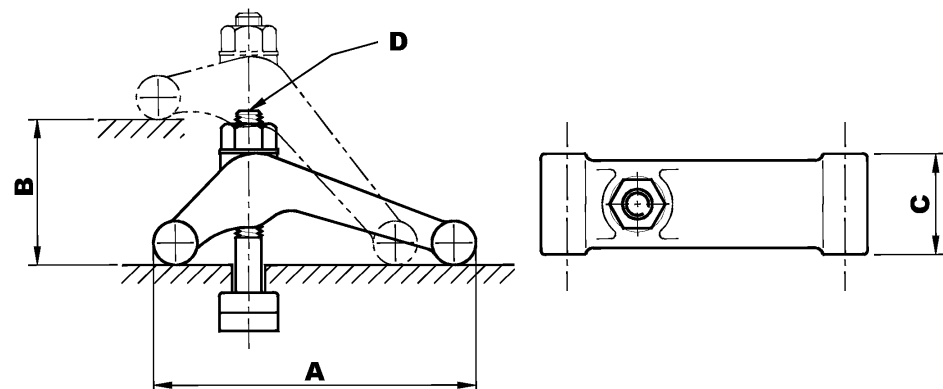
Material: Medium Carbon Steel/Steel Forging.
Heat Treated To: 32 - 38°.
Surface Finish: Black Oxide.



Product Number	Length x Width A x B	Dimensions (mm)		Weight each	Order Code
		C	D		
CC19-NC50	131 x 75mm	46.5	M12-125	1.50kg	IND-425 -1085D

CC20 - Forged Swivel Clamp

Workshop Equipment

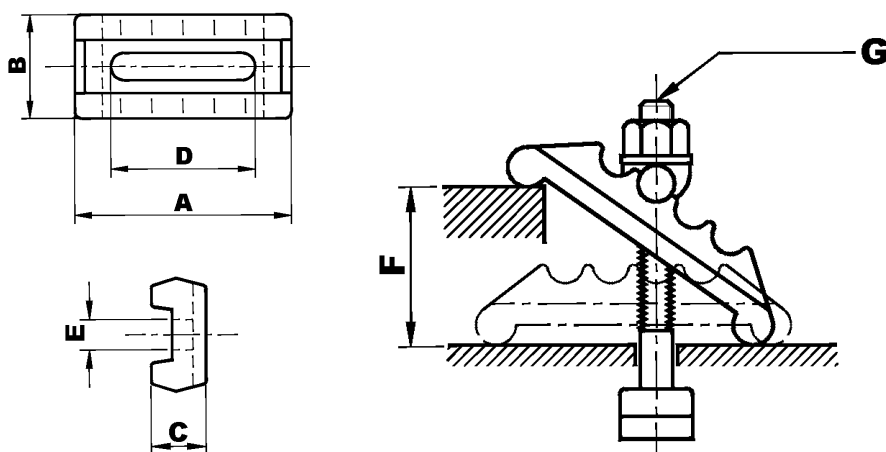


Material: Medium Carbon Steel/Steel Forging.
Heat Treated To: 32 - 38°.
Surface Finish: Black Oxide.



Product Number	Length x Width A x B	Dimensions (mm)		Weight each	Order Code
		C	D		
CC20-NC6	150 x 85mm	52	M16-150	2.42kg	IND-425 -1090M
CC20-NC8	194 x 105mm	58	M20-175	4.50kg	IND-425 -1090T

CC21 - Swivel Rack Clamp



Material: Medium Carbon Steel/Steel Forging.
Surface Finish: Black Oxide.

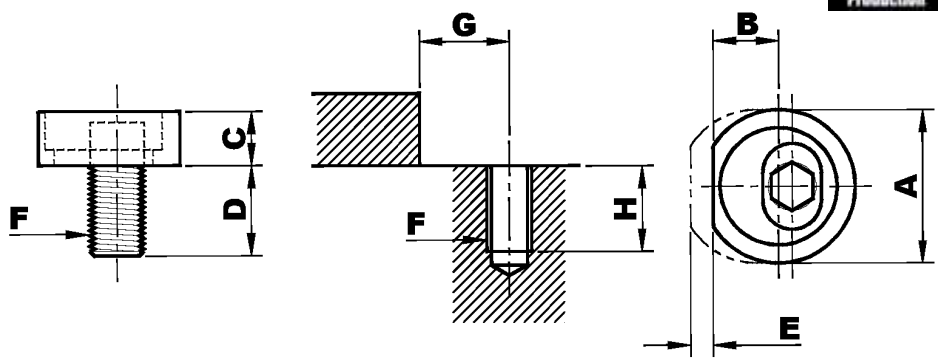


Product Number	Length x Width A x B	Dimensions (mm)					Weight each	Order Code
		C	D	E	F	G		
CC21-0216	125 x 56mm	33	84	18	65	M16	2.10kg	IND-425 -1095M

INDEXA CC24 - Eccentric Cam Lock

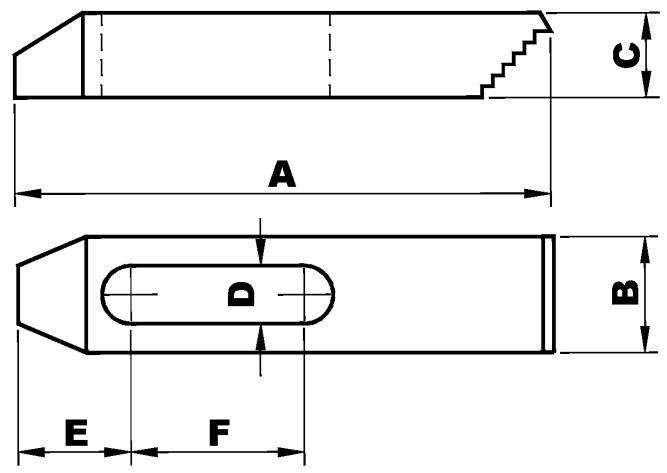


Material: Medium Carbon Steel.
Hardness: HRC 35.
Surface Finish: Black Oxide.



Product Number	Dimensions (mm)								Weight each	Order Code
	A	B	C	D	E	F	G	H		
CC240210	26	11.8	8	14.3	4	M10	12.5	22	.03kg	-1110C
CC240312	30	13.5	9	19	5	M12	14.5	22	.06kg	-1110G
CC240416	38	16.0	12	23	6	M16	17.5	26	.12kg	-1110P

CC25 - Step Clamp



Material: Medium Carbon Steel.
Hardness: HRC 32 - 38.
Surface Finish: Black Oxide.

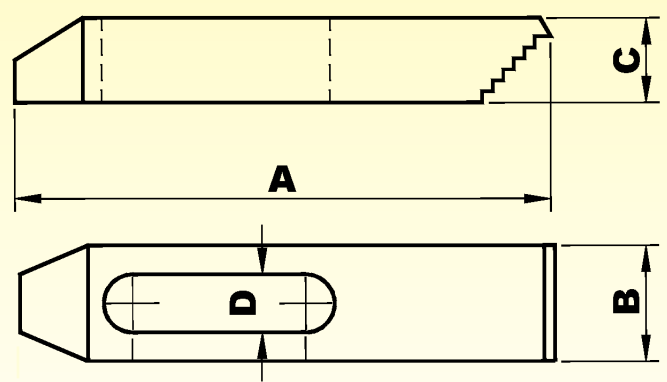


Product Number	Length x Width A x B	Dimensions (mm)				To Suit Stud Size	Weight each	Order Code
		C	D	E	F			
CC251463	63 x 25mm	13	15	20	14	M14	0.12kg	-1130C
CC2514100	100 x 32mm	19	15	29	34	M14	0.38kg	-1130G
CC2514150	150 x 32mm	22	15	32	50	M14	0.68kg	-1130J
CC2516100	100 x 32mm	19	17	31	26	M16	0.42kg	-1135G
CC2516150	150 x 30mm	22	17	40	47	M16	0.72kg	-1135J

ATLAS Step Clamp
WORKHOLDERS



Material: Medium Carbon Steel.
Hardness: HRC 32 - 38.
Surface Finish: Black Oxide.



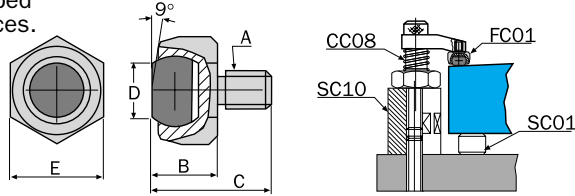
Product Number	To Suit Stud Size	Dimensions (mm)				Order Code
		A x B	C	D	ATL-425	
SC105225	M10/3/8" UNC	52 x 22	12	11	-2020K	
SC108825		88 x 25	16	11	-2040K	
SC1012828		128 x 28	19	11	-2060K	
SC126428	M12/1/2" UNC	64 x 28	12	13	-2120K	
SC1210032		100 x 32	19	13	-2140K	
SC1215032		150 x 32	22	13	-2160K	
SC146428	M14	64 x 28	12	15	-2220K	
SC1410032		100 x 35	19	15	-2240K	
SC1415032		150 x 32	22	15	-2260K	
CK180140	M14	64 x 28	12		-2320K	
CK180140		100 x 32	19		-2340K	
CK180140		150 x 32	22		-2360K	
SC166431	M16/5/8" UNC	64 x 32	12	17	-2420K	
SC1610038		100 x 38	20	17	-2440K	
SC1615038		150 x 38	22	17	-2460K	

PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

Workshop Equipment

INDEXA FC01 -
Plain Ball End

Precision swivel ball that can be used either as a contact bolt or rest pad. As contact pads these swivel ball units are ideal for evenly distributing clamping pressure on sloped or uneven surfaces.



Product Number	Thread A	Dimensions (mm)					Weight each
		B	C	D	E		
FC010216	M16 x 2.00	26	42	14	27	0.14kg	



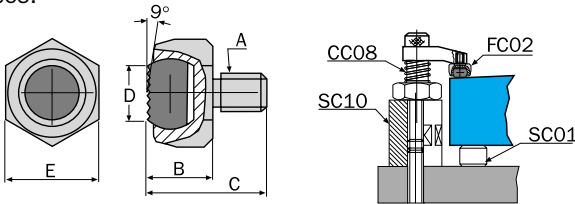
Material:
Body - Medium Carbon Steel.
Ball - Through Hardened Steel **EN 31**.
Hardness:
Bolt - HRC 35.
Ball - HRC 62.
Surface Finish:
Black Oxide.



Order Code
IND-425
-2010R

FC02 - Seratted Ball End

Precision swivel ball that can be used either as a contact bolt or rest pad. As contact pads these swivel ball units are ideal for evenly distributing clamping pressure on sloped or uneven surfaces.



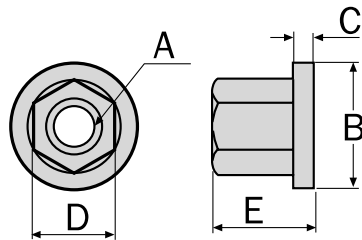
Product Number	Thread A	Dimensions (mm)					Weight each
		B	C	D	E		
FC010112	M12 x 1.75	22	35	12	22	0.070kg	
FC010216	M16 x 2.00	26	42	14	27	0.14kg	

Material:
Body - Medium Carbon Steel.
Ball - Through Hardened Steel **EN 31**.
Hardness:
Bolt - HRC 35.
Ball - HRC 62.
Surface Finish:
Black Oxide.



Order Code
IND-425
-2015J
-2015R

FC04 Flanged Nut



Product Number	Thread A	Dimensions (mm)					Weight each
		B	C	D	E		
FC040110	M10	22	3	17	13	0.020kg	
FC040212	M12	28	4	19	17	0.040kg	
FC040214	M14	28	4	22	17	0.040kg	
FC040316	M16	33	5	24	20	0.060kg	
FC040420	M20	40	6	30	25	0.110kg	

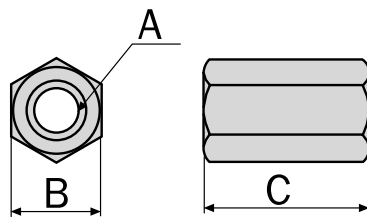
Material: Medium Carbon Steel.
Hardness:
HRC 30 - 35.
Surface Finish:
Black Oxide.



Order Code
IND-425
-2025G
-2025K
-2025M
-2025P
-2025T

FC05 - Extension Nut

Extends the length of clamping studs.



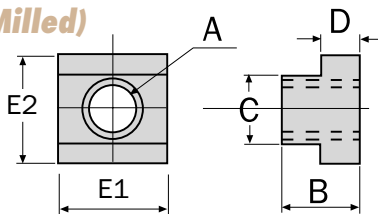
Product Number	Size A	Dimensions (mm)			Weight each
		B	C		
FC050110	M10	17	30	0.030kg	
FC050212	M12	19	36	0.046kg	
FC050314	M14	22	42	0.065kg	
FC050316	M16	24	48	0.110kg	
FC050420	M20	30	60	0.220kg	

Material: Medium Carbon Steel.
Hardness: HRC 30 - 35.
Surface Finish:
Black Oxide.



Order Code
IND-425
-2030F
-2030K
-2030M
-2030N
-2030R

FC06 - T-Slot Nut (Milled)



Product Number	Size A	Dimensions (mm)						Weight each
		B	C	D	E1	E2		
FC060110	M10	14.0	11.8	7.0	22	18.0	0.022kg	
FC060212	M12	16.0	13.8	8.0	28	22.0	0.048kg	
FC050314	M14	16.0	15.8	8.0	28	25.0	0.057kg	
FC060316	M16	20.0	17.7	10.5	30	28.5	0.085kg	
FC060420	M20	25.0	22.0	14.0	38	36.0	0.190kg	

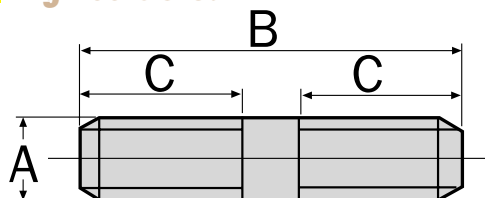
Material: Medium Carbon Steel.
Hardness:
HRC 30 - 35.
Surface Finish:
Black Oxide.



Order Code
IND-425
-2035G
-2035K
-2035M
-2035P
-2035T

Workshop Equipment

INDEXA FC07 - Engineers Stud



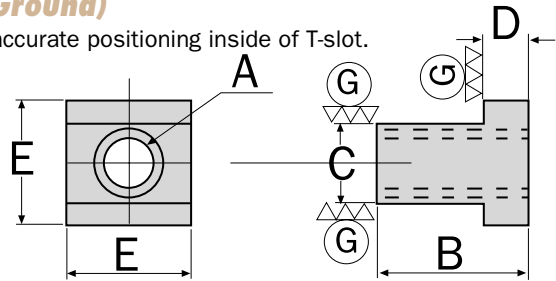
Material: Medium Carbon Steel.
Hardness: HRC 30 - 35.
Surface Finish: Black Oxide.



Product Number	Size A x B	Dimension C	Weight each	Order Code IND-425
FC070110	M10 x 50mm	22	30g	-2120S
FC070210	M10 x 75mm	30	42g	-2125S
FC070310	M10 x 100mm	38	55g	-2130S
FC070510	M10 x 150mm	50	90g	-2140S
FC070612	M12 x 50mm	22	40g	-2145S
FC070712	M12 x 75mm	30	60g	-2150S
FC070812	M12 x 100mm	38	80g	-2155S
FC070912	M12 x 125mm	38	100g	-2160S
FC071012	M12 x 150mm	50	125g	-2165S
FC071112	M12 x 200mm	65	160g	-2170S
FC071212	M12 x 300mm	80	240g	-2175S
FC071214	M14 x 75mm	30	65g	-2176S
FC071214	M14 x 100mm	38	85g	-2177A
FC071214	M14 x 125mm	38		-2177G
FC071214	M14 x 150mm	50	130g	-2177K
FC071214	M14 x 200mm	65	165g	-2177T
FC071316	M16 x 75mm	20	120g	-2180S
FC071416	M16 x 100mm	38	145g	-2185S
FC071516	M16 x 125mm	38	180g	-2190S
FC071616	M16 x 150mm	50	230g	-2195S
FC071616	M16 x 175mm	50	240g	-2197S
FC071716	M16 x 200mm	65	290g	-2200S
FC071816	M16 x 250mm	65	350g	-2205S
FC071916	M16 x 300mm	80	450g	-2210S
FC072016	M16 x 400mm	100	580g	-2215S
FC072116	M16 x 500mm	100	700g	-2220S
FC072220	M20 x 75mm	30	170g	-2225S
FC072320	M20 x 100mm	38	230g	-2230S
FC072420	M20 x 125mm	38	280g	-2235S
FC072520	M20 x 150mm	50	360g	-2240S
FC072620	M20 x 200mm	65	450g	-2245S
FC072720	M20 x 250mm	65	550g	-2250S
FC072820	M20 x 300mm	80	700g	-2255S
FC072920	M20 x 400mm	100	880g	-2260S
FC073020	M20 x 500mm	100	1100g	-2265S

FC08 - T-Slot Nut (Ground)

Ground surfaces provide accurate positioning inside of T-slot.



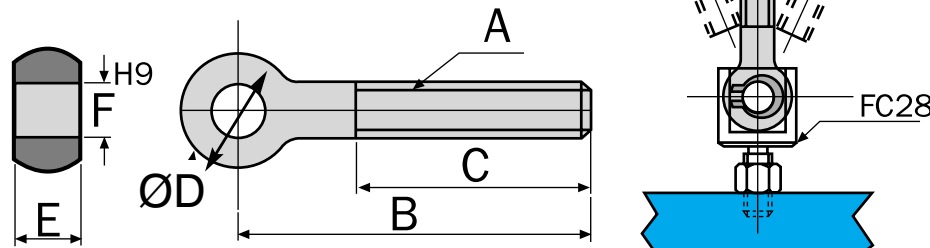
Material: Medium Carbon Steel.
Hardness: HRC 30 - 35.



Product Number	Thread A	Dimensions (mm)				Weight each	Order Code IND-425
		B	C (h6)	D	E		
FC008112	M12	22	14	8	22	45g	-2505J
FC008216	M16	30	18	10	28	80g	-2505R

FC09 - Swing Bolt

Reamed hole for smooth swivelling.



Material: Medium Carbon Steel.
Hardness: HRC 30 - 35.



Product Number	Size A x B	Dimensions (mm)				Weight each	Order Code IND-425
		C	D	E	F		
FC040110	M10 x 75mm	40	20	12	10	60g	-2510E
FC090210	M10 x 100mm	40	20	12	10	80g	-2510H
FC090412	M12 x 100mm	60	25	14	12	120g	-2510N
FC090516	M16 x 125mm	60	32	17	16	250g	-2510P
FC090616	M16 x 150mm	75	32	17	16	300g	-2510R

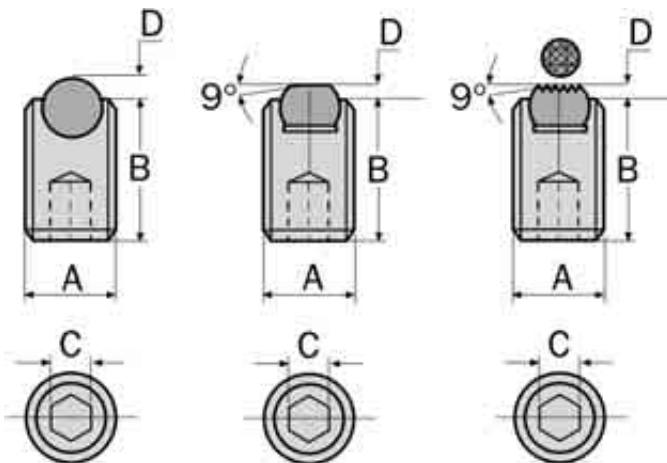
PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

Workshop Equipment

INDEXA FC16 - Swivel Clamping Screw



Material:
Body - Medium Carbon Steel **EN198**.
Point - Through Hardened Steel **EN 31**.
Hardness:
Body - HRC 32 - 38.
Point - HRC 62.
Surface Finish:
Point - Hardened and Ground.



EXTENDED RANGE

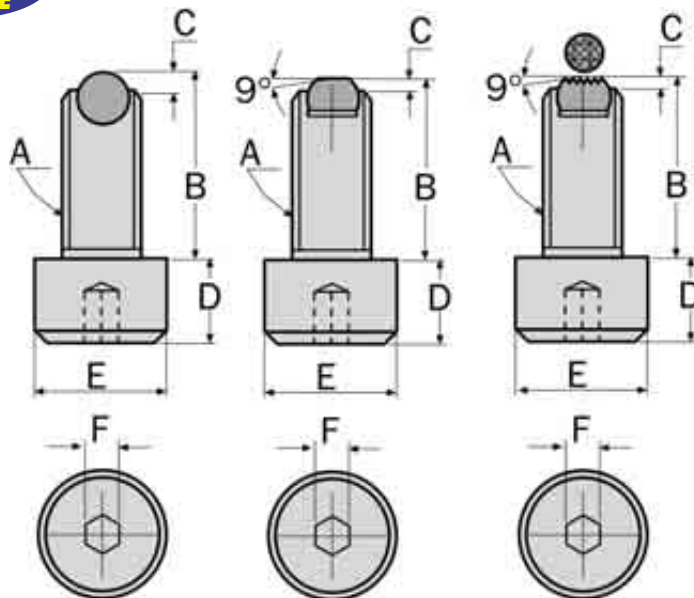


Ball Point Dog Point Serrated Point

Ball Point					Dog Point			Serrated Point			
Thread x Length A x B	mm C	Weight each	Product Number	mm D	Order Code IND-425	Product Number	mm D	Order Code IND-425	Product Number	mm D	Order Code IND-425
M6 x 15mm	3	2.4g	FC160206	1.4	-2610H						
M6 x 25mm	3	3.8g	FC160306	1.4	-2610N						
M8 x 12mm	4	3.2g	FC160408	1.9	-2615D	FC162208	0.6	-2645D			
M8 x 20mm	4	5.8g	FC160508	1.9	-2615H	FC162308	0.6	-2645H			
M8 x 30mm	4	9.0g	FC160608	1.9	-2615N						
M10 x 15mm	5	6.7g	FC160710	2.4	-2620D						
M10 x 25mm	5	11.2g	FC160810	2.4	-2620H	FC162610	0.7	-2650H			
M10 x 35mm	5	16.2g				FC162710	0.7	-2650N			
M12 x 30mm	6	20.0g				FC162912	0.9	-2655H			
M12 x 50mm	6	40.0g	FC161312	2.9	-2625T						
M16 x 55mm	8	55.0g				FC163516	1.0	-2660R			
M16 x 65mm	8	65.0g							FC165416	1.0	-2690T

FC17 - Swivel Shoulder Clamping Screw

EXTENDED RANGE



Material:
Body - Medium Carbon Steel **EN198**.
Point - Through Hardened Steel **EN 31**.
Hardness:
Body - HRC 32 - 38.
Point - HRC 62.
Surface Finish:
Point - Hardened and Ground.



Ball Point Dog Point Serrated Point

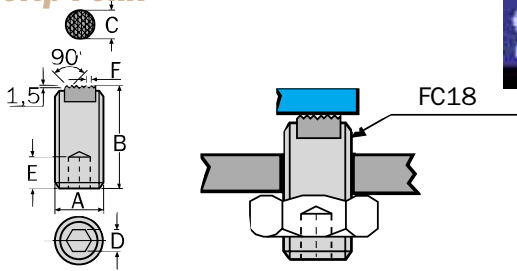
Ball Point					Dog Point			Serrated Point			
Thread x L A x B (mm)	Dimensions D E F	Weight each	Product Number	mm C	Order Code IND-425	Product Number	mm C	Order Code IND-425	Product Number	mm C	Order Code IND-425
M6 x 25	6 10 5	7.4g							FC173606	0.5	-2770H
M8 x 40	8 13 6	24g	FC170608	1.9	-2725N						
M12 x 45	12 18 10	50g				FC172812	0.9	-2760H	FC174512	0.9	-2785H
M12 x 65	12 18 10	70g	FC171212	2.9	-2735N						
M12 x 80	12 18 10	83g				FC173012	0.9	-2760R			
M16 x 40	16 24 14	90g	FC171212	2.9	-2740D						
M16 x 50	16 24 14	110g				FC173216	1.0	-2765H			

PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

Workshop Equipment

INDEXA FC18 - Grip Point Screw

Multipurpose work support and clamping unit, ideal for rough parts.



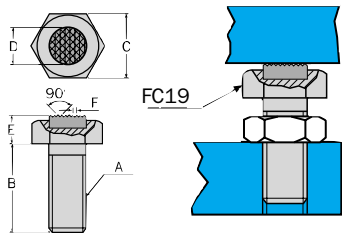
Material: Medium Carbon Steel **EN19B**.
Hardness: HRC 32 - 38.
 Tooth plate HRC 60.
Serrated Surface: Induction Hardened.
Surface Finish: Black Oxide.



Product Number	Thread x Length A x B	Dimensions (mm)				Weight each	Order Code
		C	D	E	F		
FC180110	M10 x 25mm	6.5	5	4	2.3	15g	IND-425 -2825D
FC180616	M16 x 50mm	11.5	8	6	3.0	78g	-2825R

FC19 - Grip Head Screw

Multipurpose work support and clamping unit, ideal for rough parts.



Material: Medium Carbon Steel **EN19B**.
Hardness: HRC 32 - 38.
 Tooth plate HRC 60.

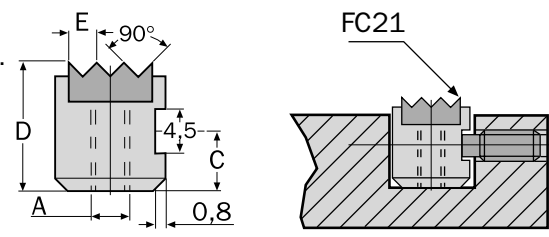
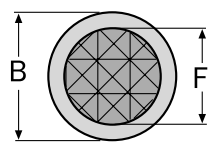
Serrated Surface: Induction Hardened.
Surface Finish: Black Oxide.



Product Number	Thread x Length A x B	Dimensions (mm)				Weight each	Order Code
		C	D	E	F		
FC190208	M8 x 25mm	13	9.5	7.3	3.0	15g	IND-425 -2830G
FC190310	M10 x 25mm	17	12.7	8.4	3.0	30g	-2830J
FC190512	M12 x 25mm	19	15.9	9.5	3.0	35g	-2830N
FC190816	M16 x 50mm	24	19.1	12.0	3.0	100g	-2830T

FC21 - Round Grip Pad

Multipurpose work support and clamping unit, ideal for rough parts.



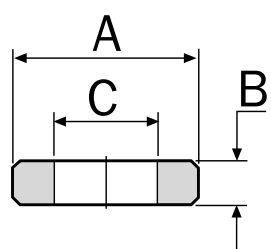
Material: Hardened Steel **EN16M**.
Hardness: HRC 60.
Surface Finish: Black Oxide.



Product Number	Thread x Dia A x B	Dimensions (mm)				Weight each	Order Code
		C	D	E	F		
FC210110	M5 x 10mm	3.4	10	2.3	8.1	5g	IND-425 -2840D
FC210212	M6 x 12mm	4.0	12	3.0	9.6	8g	-2840G
FC210525	M6 x 25mm	4.0	12	3.0	19.5	40g	-2840P

FC22 - Spacer

For use with jig components for increasing height or extending length.

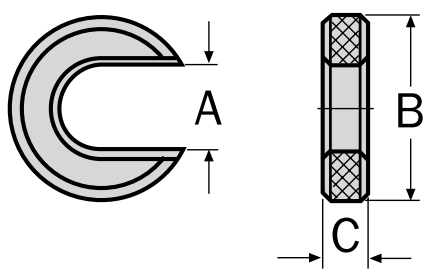


Material: Medium Carbon Steel.
Hardness: HRC 40.



Product Number	Dimensions (mm)			Weight each	Order Code
	A	B	C		
FC220616	50	5	17	70g	IND-425 -2845P
FC220716	50	10	17	350g	-2845T

FC23 - 'C' Washer



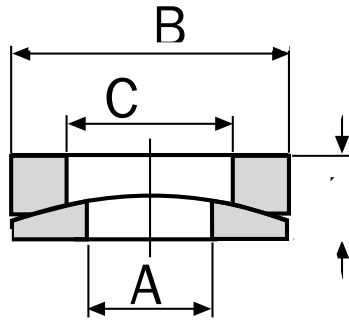
Material: Medium Carbon Steel.
Hardness: HRC 40.
Surface Finish: Black Oxide.



Product Number	Dimensions (mm)			Weight each	Order Code
	A	B	C		
CC010212	13	55	10	150g	IND-425 -2850G

INDEXA FC25 - Spherical Washer Set

2 piece washer set that compensates whenever a stud and clamping surface are not exactly perpendicular.



Material: Medium Carbon Steel.
Hardness: HRC 38.
Surface Finish: Black Oxide.

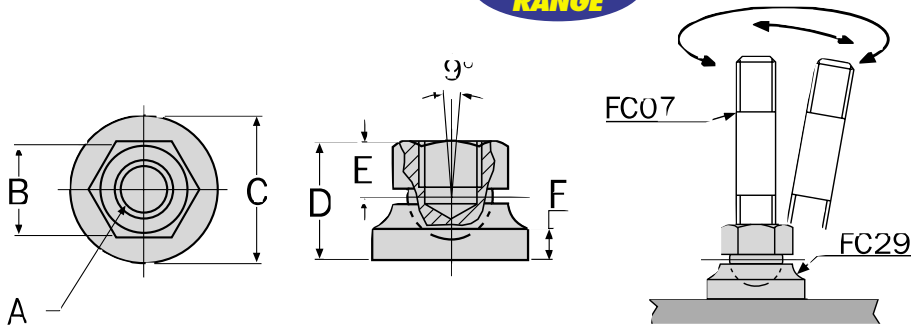


Product Number	Dimensions (mm)				Weight each	Order Code
	A	B	C	D		
FC250112	13	26	15	7.5	20g	-2860D
FC250216	17	32	19	9.0	30g	-2860G
FC250320	21	40	23	12.0	50g	-2860L

FC29 - Swivel Foot

Used for supporting uneven surfaces.

EXTENDED RANGE

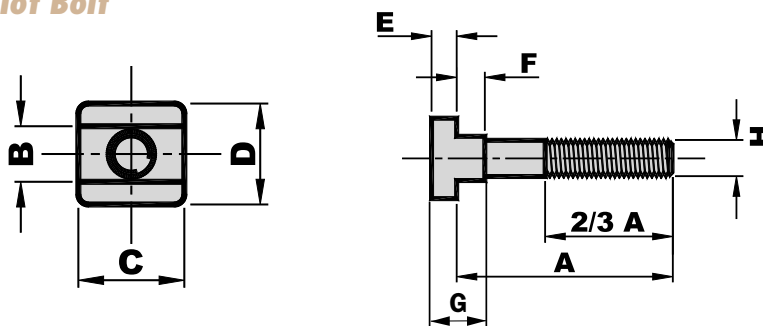


Material: Medium Carbon Steel.
Hardness: HRC 32 - 38.
Surface Finish: Black Oxide.



Product Number	Size	Dimensions (mm)					Weight each	Order Code
		A	B	C	D	E		
FC290112	M12	19	35	24	11	7	80g	-2870D
FC290216	M16	24	40	29	13	8	150g	-2870G

FC40 - T-Slot Bolt



Material: Medium Carbon Steel.
Hardness: HRC 32 - 38.
Surface Finish: Black Oxide.



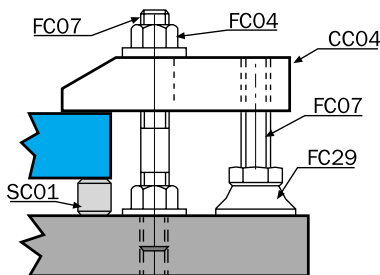
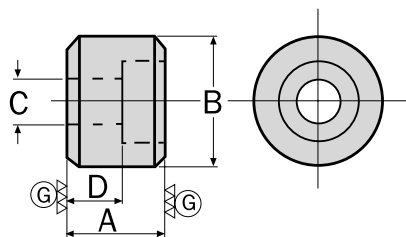
Product Number	Dimensions (mm)								Weight each	Order Code
	A	B	C	D	E	F	G	H		
FC40-1250	50								54g	-2900D
FC40-1275	75								57g	-2900F
FC40-12100	100								110g	-2900H
FC40-12125	125	12	26	22	7	6	13	M12	125g	-2900K
FC40-12150	150								140g	-2900M
FC40-12175	175								170g	-2900P
FC40-12200	200								185g	-2900R
FC40-1650	50								130g	-2910D
FC40-1675	75								160g	-2910F
FC40-16100	100								200g	-2910H
FC40-16125	125	16	32	27	8	8	16	M16	230g	-2910K
FC40-16150	150								270g	-2910M
FC40-16175	175								305g	-2910P
FC40-16200	200								325g	-2910R
FC40-2075	75								290g	-2920F
FC40-20100	100								350g	-2920H
FC40-20125	125	20	40	30	11	11	22	M20	400g	-2920K
FC40-20150	150								455g	-2920M
FC40-20175	175								505g	-2920P
FC40-20200	200								560g	-2920R
FC40-24150	150	24	50	44	16	15	31	M24	775g	-2930M
FC40-24200	200								925g	-2930R

Workshop Equipment

INDEXA SC01 - Support Spacer

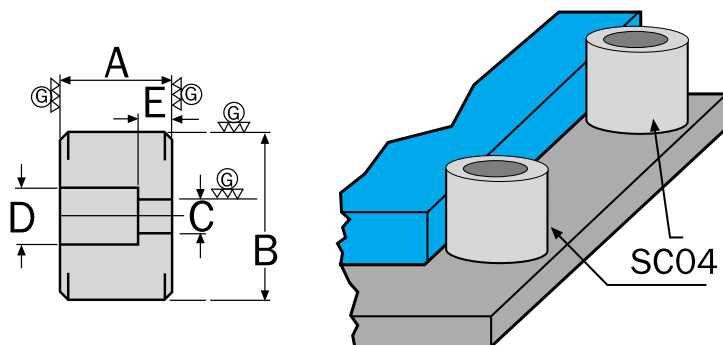


Material: Medium Carbon Steel.
Hardness: HRC 40.
Surface Finish: Black Oxide.



Product Number	Height x Diameter A (±0.01) x B	Dimensions (mm)		Weight each	Order Code
		C	D		
SC010112	30 x 40mm	M12	17	240g	IND-425 -3005D

SC04 - Location Collar

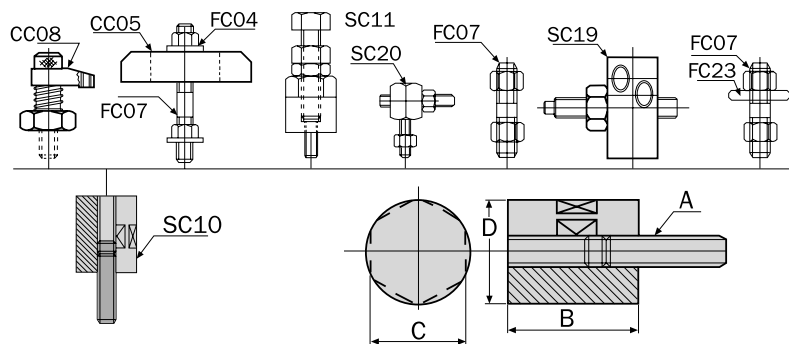


Material: Medium Carbon Steel.
Hardness: HRC 40.
Surface Finish: Black Oxide.



Product Number	Height x Diameter A (±0.01) x B (±0.01)	Dimensions (mm)			Weight each	Order Code
		C	D	E		
SC040112	30 x 40mm	∅ 12	∅ 20	12	240g	IND-425 -3020D
SC040212	40 x 40mm	∅ 12	∅ 20	12	320g	IND-425 -3020F

SC10 - Extension Pillar

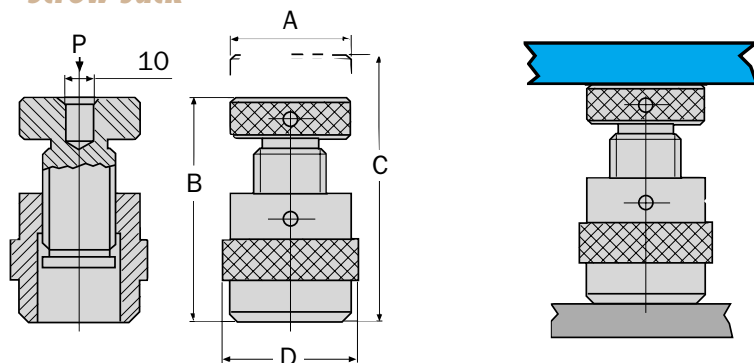


Material: Medium Carbon Steel.
Hardness: HRC 40.
Surface Finish: Black Oxide.



Product Number	Height x Diameter A x B	Dimensions (mm)		Weight each	Order Code
		C	D		
SC100265	M12 x 65	36	40	540g	IND-425 -3050F
SC100450	M16 x 50	46	50	820g	IND-425 -3050J

SC11A - Screw Jack



Material: Medium Carbon Steel.
Hardness: HRC 40.
Surface Finish: Black Oxide.



Product Number	Diameter x Height A x B (Min)	Dimensions (mm)		Holding Load (kN)	Weight each	Order Code
		C	D			
SC20032050	32 x 40mm	60	32	72	230g	IND-425 -3057D
SC20070140	65 x 100mm	165	70	135	274g	IND-425 -3057P

PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

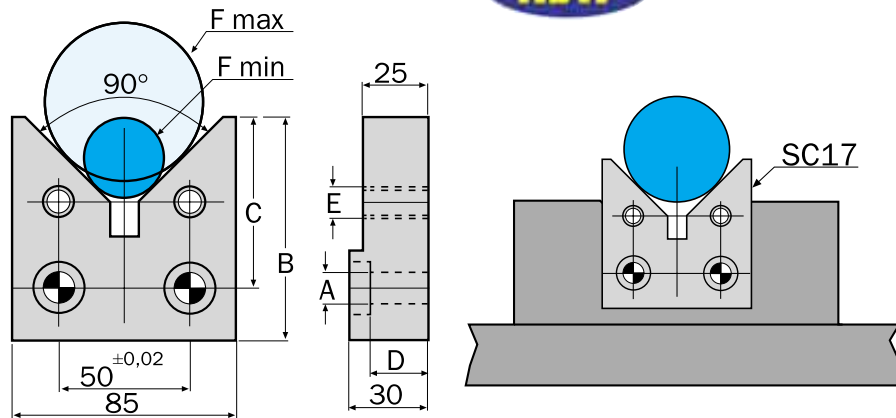
Workshop Equipment

INDEXA SC17 - Vee Block

NEW

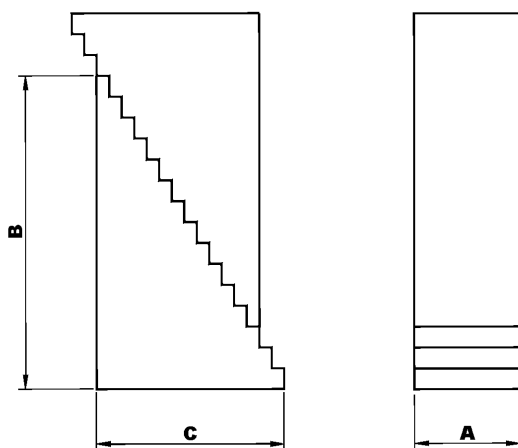


Material: Medium Carbon Steel EN9. Induction Hardened.



Product Number	Size A (F7) x B x C	Dimensions (mm)				Weight each	Order Code
		E	D	F (max)	F (min)		
SC170112	Ø 12 x 85 x 65mm	M12	22	80	15	1.25kg	IND-425 -3085E

SU25 - Step Block

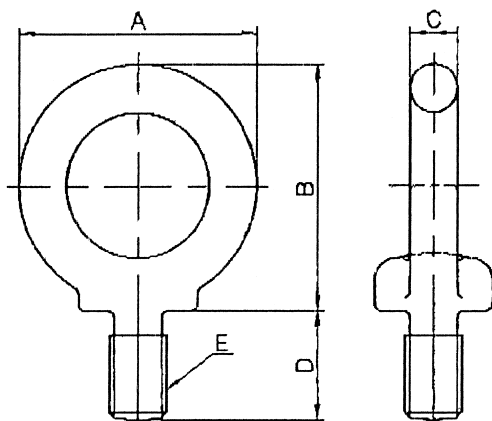


Material: Medium Carbon Steel.
Hardness: HRC 32 - 36.
Surface Finish: Black Oxide.



Product Number	Supporting Height	Dimensions (mm)			Weight each	Order Code
		A	B	C		
SU252530	19 - 49		29	17	0.05kg	-3125E
SU252545	28 - 68	25	45	27	0.12kg	-3125H
SU252597	58 - 150		97.5	57	0.50kg	-3125L
SU253259	38 - 90		59	35	0.24kg	-3132J
SU253297	58 - 150	32	97.5	57	0.62kg	-3132L
SU2532139	82 - 210		139	81	1.32kg	-3132P

SEB - Shoulder Eye Bolt



Product Number	Thread (E)	Dimensions (mm)				Load	Weight each	Order Code
		A	B	C	D			
SEB1017	M10	41	41.5	8	18	150kg	0.063kg	IND-425 -3210S
SEB1220	M12	50	51	10	22	220kg	0.125kg	-3212S
SEB1525	M16	60	60	12.5	27	450kg	0.216kg	-3216S
SEB2030	M20	72	71	16	30	630kg	0.4kg	-3220S

Workshop Equipment



INDEXA Type 5821 Horizontal & Vertical Indexing Unit

Ideal for milling, drilling, jig boring and related tool room machining operations. Indexing accuracy ± 120 sec.

Simple and compact construction allows two types of dividing:

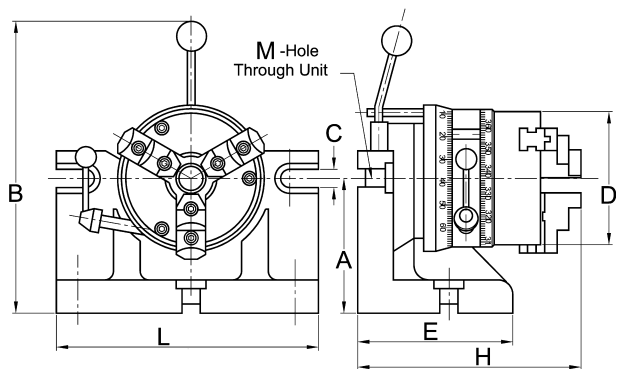
Angular Indexing

Through the graduation ring from 0° to 360° in increments of 1°.

Basic Indexing

By means of catch device. This permits divisions of 2, 3, 4, 6, 8, 12 and 24 without disassembly.

Fitted with standard 3-jaw self-centring scroll chuck with 2-piece reversible jaws, model - 0400K has a special design allowing the use of 5C collets.



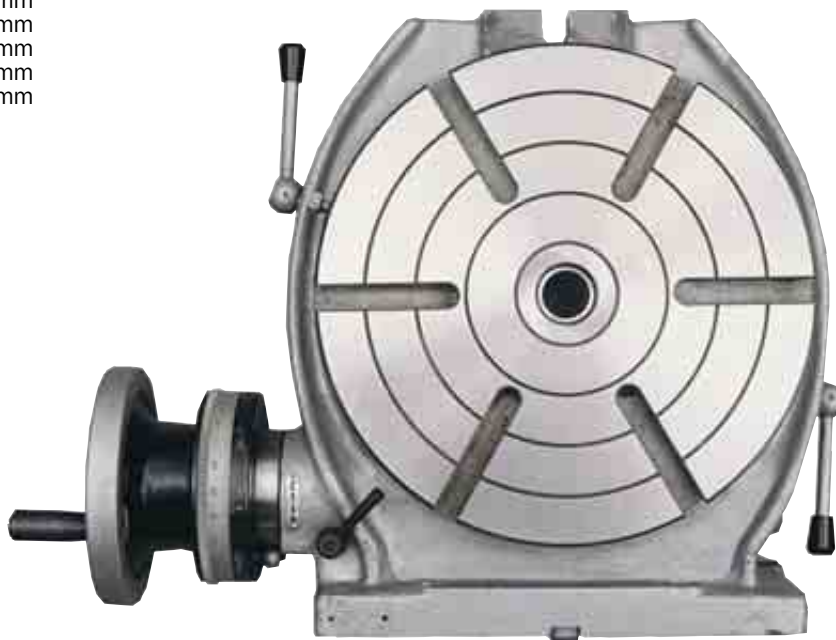
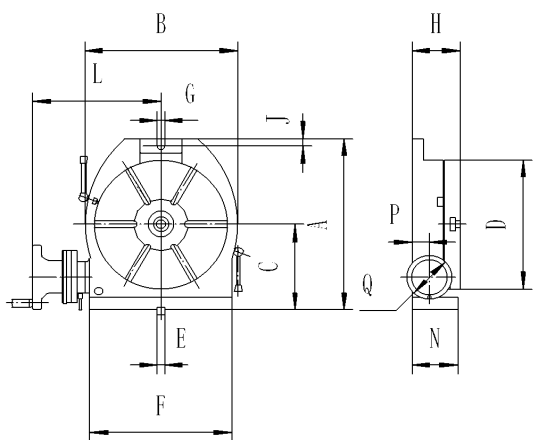
Chuck Diameter	Dimensions (mm)										Weight each	Order Code
	A	G	B	C	E	F	H	L	M			
125mm	100	167	254	14	14	130	215	206	25.0	17.8kg	-0400K	
160mm	125	210	303	14	14	145	245	214	20.2	34.0kg	-0410K	
200mm	160	265	384	18	18	160	300	244	26.5	58.0kg	-0420K	
250mm	200	330	473	18	18	185	340	277	38.2	94.0kg	-0430K	

Type SOPP Horizontal & Vertical Rotary Table

With a disengageable worm gear which allows rapid indexing. One rotation of handle equals four degrees on collar. The table is made of high grade cast iron. Works as an indexing unit in the vertical position as well as a conventional rotary table for circular cutting, boring or angle setting, etc. Optional dividing plates are available separately.

Accuracy:

- Parallelism of clamping surface to base: 0.020mm
- Flatness of clamping surface: 0.015mm
- True running cylindrical centre bore: 0.020mm
- True running of tapered centre bore: 0.020mm
- Squareness of clamping surface to centre slot: 0.010mm



Optional Extras

Description	Order Code
Dividing Plate for INDEXA Rotary Tables	IND-437 -1000K

Rotary Tables

Diameter D	Max. Capacity C	Centre Hole M	Dimensions (mm)											No. of T-slots	Weight each	Order Code
			A	B	E	F	G	H	J	L	N	P	Q			
200mm	150	3 MT	285	236	14	208	14	100	15	211	99	48	125	4	42kg	-0500K
250mm	170	3 MT	328	286	14	253	14	110	16	241	106	48	125	6	57kg	-0510K
320mm	210	4 MT	410	360	18	320	18	120	16	273	118	48	140	6	92kg	-0520K

KOBE  **Drill Chuck**

Fully hardened and ground for durability and wear resistance. Suitable for use with portable power tools.



Capacity (mm)	Mount	Weight each	Order Code KBE-440
1.0 - 10.0	3/8" - 24F		-2010A
1.5 - 13.0	3/8" - 24F		-2020B
1.5 - 13.0	1/2" - 20F		-2030C

Drill Chuck

For use with portable power tools. Female mount. Supplied with key. UNF keyed chuck, hardened and ground for durability and wear resistance. For use with reversible drills. Excellent value for money.



Capacity (mm)	Mount	Weight each	Order Code KBE-440
1.0 - 10.0	3/8" - 24F	135g	-1010A
1.5 - 13.0	3/8" - 24F	270g	-1020B
1.5 - 13.0	1/2" - 20F	270g	-1030C

KENNEDY  **Extra Keyless Drill Chuck**

Designed for use on cordless screwdrivers, cordless and corded drills. Unique gripping mechanism engages automatically when tightened. Fully hardened and ground jaws protect against work surface abrasion. Through drilled for use on reversible drills.



Capacity (mm)	Mount	Weight each	Order Code KEN-440
1 - 10	3/8" - 24F		-4720K
1.5 - 13	3/8" - 24F		-4760K
1 - 10	1/2" - 20F		-4700K
1.5 - 13	1/2" - 20F		-4740K

Standard Duty Industrial Keyed Drill Chuck

Fully hardened and ground for durability and wear resistance. Suitable for use with portable power tools. Supplied with key. Manufactured to **DIN 6349**.



*Primarily for use with hand operated machines

Capacity (mm)	Mounting	Maximum Diameter	Weight each	Order Code KEN-440
0.5 - 8	3/8" x 24F	30.0	140g	-2260K
0.8 - 10.0	3/8" x 24F	34.0	240g	-2360K
0.8 - 10.0*	3/8" x 24M	34.0	250g	-2370K
0.8 - 10.0*	1/2" x 20F	34.0	220g	-2380K
1.5 - 13.0	3/8" x 24F	42.7	390g	-2460K
1.5 - 13.0	3/8" x 24M	42.7	430g	-2470K
1.5 - 13.0	1/2" x 20F	42.7	390g	-2480K

Heavy Duty Industrial Keyed Drill Chuck

Fully hardened and ground working parts. The jaws are centre ground for alignment and concentricity. Key holes and teeth are fully hardened for durability and wear resistance. To correctly tighten your keyed drill chuck use all key holes in turn to guarantee even pressure and maximum grip. Suitable for use on machine tools and all types of industrial power tools. Supplied with key.



Manufactured to **DIN 6349**.

* Primarily for use with hand operated machines.

† Not suitable for reversing drills.

Capacity (mm)	Mounting	Maximum Diameter	Weight each	Order Code KEN-440
0.5 - 4	0JT	26.0	110g	-1060K
0.5 - 6.5	1JT	30.0	140g	-1110K
0.5 - 6.5	3/8"-24F †	30.0	140g	-1160K
1.0 - 10.0	2JT	42.7	430g	-1320K
1.0 - 10.0*	3/8"-24F †	38.0	270g	-1360K
1.0 - 10.0*	1/2"-20F †	38.0	270g	-1380K
1.0 - 10.0	1/2"-20F †	42.7	420g	-1390K
0.8 - 10.0	DIN-B12	42.7	400g	-5020K
1.0 - 13.0	2JT	52.0	760g	-1420K
1.0 - 13.0	6JT	52.0	730g	-1440K
1.0 - 13.0	33JT	52.0	740g	-1450K
1.5 - 13.0	DIN-B12	52.7	750g	-5060K
1.0 - 13.0	DIN-B16	52.7	780g	-5080K
1.0 - 16.0	3JT	56.5	970g	-1530K
1.5 - 13.0	1/2"-20F	42.8	270g	-4640K
1.5 - 13.0	3/8"-24F †	42.5	420g	-1460K
1.5 - 13.0	1/2"-20F †	46.0	530g	-1480K
3.0 - 16.0	DIN-B16	56.5	890g	-5100K
3.0 - 16.0*	1/2"-20F †	50.0	610g	-1580K
5.0 - 20.0	3JT	65.0	1300g	-1630K
5.0 - 20.0	DIN-B22	65.0	1335g	-5120K

Spiro-Rapid Clamping Keyless Drill Chuck

Allows quick tool change, while maintaining high precision and high concentricity. Fully hardened jaws, sleeve and retaining ring for durability and wear resistance. Self-tightening.



Capacity (mm)	Mount	Maximum Diameter	Weight each	Order Code KEN-440
4.0	1JT	28.0	150g	-3010K
8.0	1JT	38.0	440g	-3110K
10.0	2JT	43.0	720g	-3220K
13.0	2JT	50.0	1000g	-3320K
13.0	6JT	50.0	1000g	-3340K
16.0	6JT	55.0	1200g	-3440K

Supra-Rapid Clamping Industrial Keyless Drill Chuck

Fully hardened and ground working parts. The jaws are centre ground for alignment concentricity. Robustly designed for durability and wear resistance in the most arduous of industrial applications on stationary drilling machines. Unsuitable for reversing drills.

EXTENDED RANGE



Capacity (mm)	Mount	Maximum Diameter	Weight each	Order Code KEN-440
10.0	2JT	42.5	670g	-4120K
10.0	DIN-B12	42.5	670g	-5220K
10.0	DIN-B16	42.5	690g	-5240K
13.0	6JT	46.0	920g	-4240K
13.0	1/2" - 20F	46.0	660g	-4280K
13.0	DIN-B12	46.0	900g	-5260K
13.0	DIN-B16	46.0	940g	-5280K
16.0	6JT	51.0	1100g	-4340K
16.0	DIN-B16	51.0	1090g	-5300K

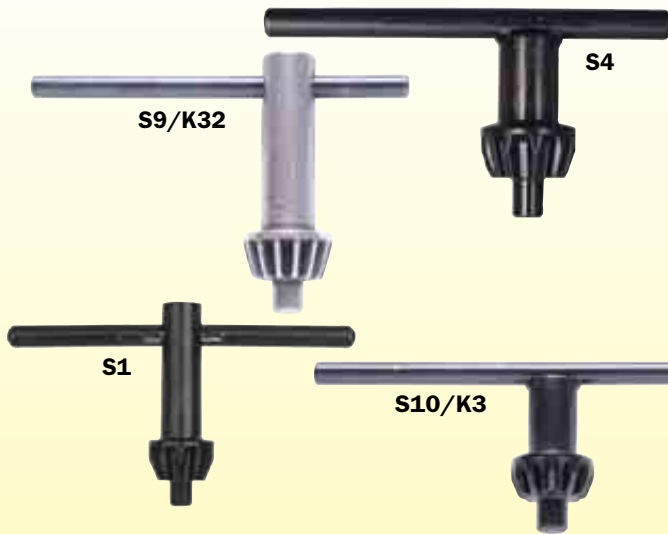
Extra-RV Drill Chuck

Radial locking. Suitable for use on impact drills. Maintains full gripping pressure on the drill bit during hammer drilling. Compensates and absorbs the vibration and forces produced when hammer drilling, unlike rigid gripping chucks, preventing drill slippage and providing consistent performance under severe conditions. Fully hardened and ground jaws protect against work surface abrasion. Through drilled for use on reversible drills.



Capacity (mm)	Mount	Maximum Diameter	Weight each	Order Code KEN-440
13.0	3/8" - 24F	42.8	310g	-3860K
13.0	1/2" - 20F	42.8	310g	-3880K

Suitable for use with all industrial keyed chucks (including Rohm* and Jacobs).



Ref No.	For Use With Chuck Number	Jacobs Equivalent	Weight each	Order Code KEN-441
S1	440-106/111/116 & 226 *4, 6, 6M & 8M	-	20g	-0020K
S2	440-132/136/138/139/146/148/236/237/238/246/247/248 & all Supercraft Chucks *10S, 10, 10M, 13S & 13M	K8/10	50g	-0040K
S3	440-142/144/145/153 & 158	-	70g	-0060K
S4	440-163 *20 & 26	-	160g	-0080K
S7	1 Series	K1	20g	-0140K
S8	31 Series & 8½N	K30S	50g	-0160K
S9	32 & 33 Series, 11N	K32	60g	-0180K
S13	36 Series, 16, 18N	K4	150g	-0260K
S14	¼", ⅝", ⅜" Multicraft	KG	20g	-0280K
S18	7 Series	K7	30g	-0360K
S10	3 & 6 Series, 14N	K3	90g	-0400K
K2	2 Series	K2	40g	-1020K

Industrial Drill Chuck Arbors

Precision machined, fully hardened and ground to give maximum surface contact.

Morse Taper Drive to Jacobs Taper



Description	Overall Length	Weight each	Order Code KEN-442
No.1 MT x 1JT	90mm	70g	-9110K
No.1 MT x 2JT	95mm	80g	-9120K
No.1 MT x 6JT	96mm	100g	-9160K
No.1 MT x 33JT	95mm	90g	-9190K
No.2 MT x 1JT	100mm	150g	-9210K
No.2 MT x 2JT	105mm	160g	-9220K
No.2 MT x 3JT	115mm	220g	-9230K
No.2 MT x 4JT	125mm	370g	-9240K
No.2 MT x 6JT	110mm	180g	-9260K
No.2 MT x 33JT	110mm	180g	-9290K
No.3 MT x 1JT	120mm	310g	-9310K
No.3 MT x 2JT	125mm	330g	-9320K
No.3 MT x 3JT	135mm	380g	-9330K
No.3 MT x 4JT	145mm	520g	-9340K
No.3 MT x 6JT	130mm	340g	-9360K
No.3 MT x 33JT	125mm	340g	-9390K
No.4 MT x 2JT	135mm	700g	-9420K
No.4 MT x 3JT	160mm	730g	-9430K
No.4 MT x 6JT	155mm	690g	-9460K
No.4 MT x 33JT	155mm	680g	-9490K
No.5 MT x 3JT	190mm	1700g	-9530K

Bridgeport Drive to Jacobs Taper



Description	Overall Length	Weight each	Order Code KEN-442
R8 x 1JT	130mm	420g	-9610K
R8 x 2JT	135mm	440g	-9620K
R8 x 3JT	145mm	510g	-9630K
R8 x 6JT	135mm	450g	-9660K
R8 x 33JT	135mm	460g	-9690K

Morse Taper Drive to Threaded



Description	Overall Length	Weight each	Order Code KEN-442
No.1 MT ½ x 20	92mm	100g	-1120K
No.1 MT ⅜ x 24	95mm	80g	-1380K
No.2 MT ½ x 20	105mm	170g	-2120K
No.2 MT ⅜ x 24	105mm	170g	-2380K
No.2 MT ⅝ x 16	105mm	180g	-2580K
No.3 MT ½ x 20	125mm	360g	-3120K
No.3 MT ⅝ x 16	125mm	370g	-3580K

KD Type - Morse Taper Shank to Din Taper Arbors

Fully hardened and ground Morse Taper to **DIN 228**. Chuck taper to **DIN 238**.



Morse Taper	Chuck Taper	Overall length	Order Code KEN-442
No.2 MT	B12	106.5mm	-5220K
No.2 MT	B16	111.5mm	-5260K
No.3 MT	B12	125.0mm	-5320K
No.3 MT	B16	134.0mm	-5360K
No.4 MT	B16	159.0mm	-5420K
No.4 MT	B22	176.0mm	-5460K

SDS Adaptor

Complete with retaining screw for reserve action. Suitable for use in rotary mode only.

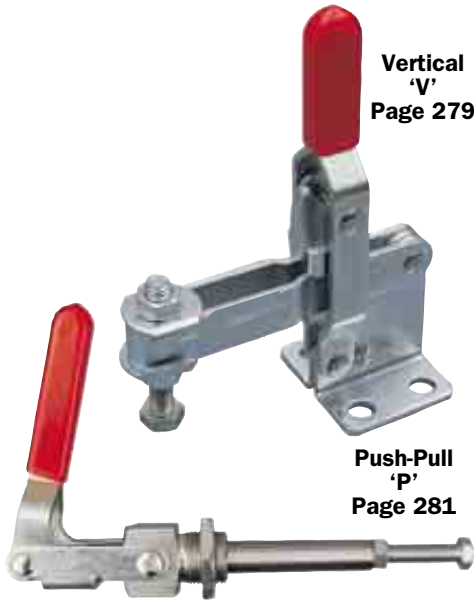


Description	Overall Length	Weight each	Order Code KEN-442
SDS ½"x20	75mm	40g	-9000K

Workshop Equipment

Indexa-Seiki fixed grip toggle clamps form a complete range suitable for countless applications including holding components in jigs and fixtures, clamping loads etc.

Selection - Clamp Type



Vertical 'V'
Page 279

Push-Pull 'P'
Page 281

Vertical
For general application in automotive and other heavy industries where trouble free life and robust construction are required. Force applied downward, 90° to bar.

Horizontal
For general application in areas where a lower profile and unobstructiveness are required. Force applied downward, 90° to bar.

Push-Pull
Clamps lock in extended and retracted positions. Force applied in line with spindle (straight line action).

Latch
Suitable for applications such as sealing chamber doors, lids of mould closures. Latch bolts are threaded to allow easy adjustment.

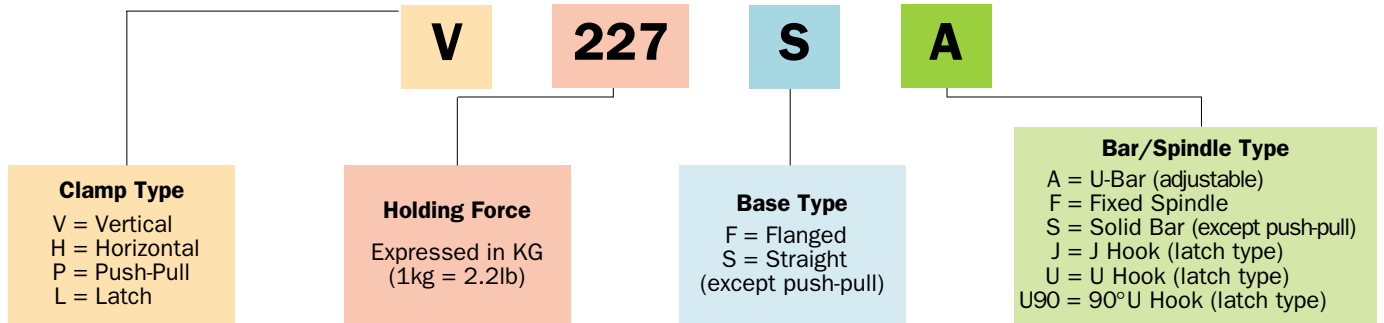


Horizontal 'H'
Page 280



Latch 'L'
Page 280

Selection by Product Number



Flanged 'F'

Selection - Base Type

Flanged
Suitable for bolting or welding the clamp on to a flat surface.

Straight
Suitable for mounting on to an outside face or edge of workpiece.



Straight 'S'

Selection - Bar/Spindle Type

U-Bar

Clamping spindle can be adjusted along length of bar.

Fixed Spindle

Clamping spindle is in a fixed position on the arm.

Solid Bar

Clamping spindle and retainer are supplied loose to allow the arm to be cut to length and welded in desired position.

Threaded Spindle

Used for push-pull type of clamp.

U-Hook

Threaded for easy adjustment.

J-Hook

Locks directly regardless of angle of hook.

90° U Hook

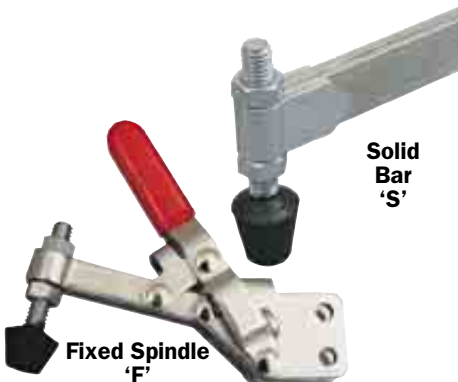
Locks at 90° to clamp.



U-Bar 'A'



Threaded Spindle 'handle position'



Solid Bar 'S'

Fixed Spindle 'F'



U-Hook 'U'

90° U-Hook 'U90'



J-Hook 'J'

Workshop Equipment



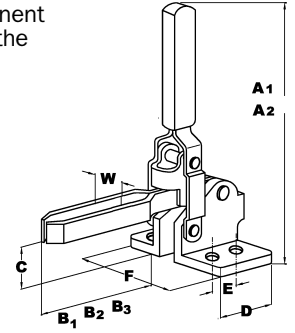
INDEXA Vertical Industrial Toggle Clamp

Designed to improve performance in fabrication and engineering clamping applications. The rapid clamping/unclamping made possible by the use of toggle clamps can greatly reduce machine/operator 'down-time' during all stages of production.

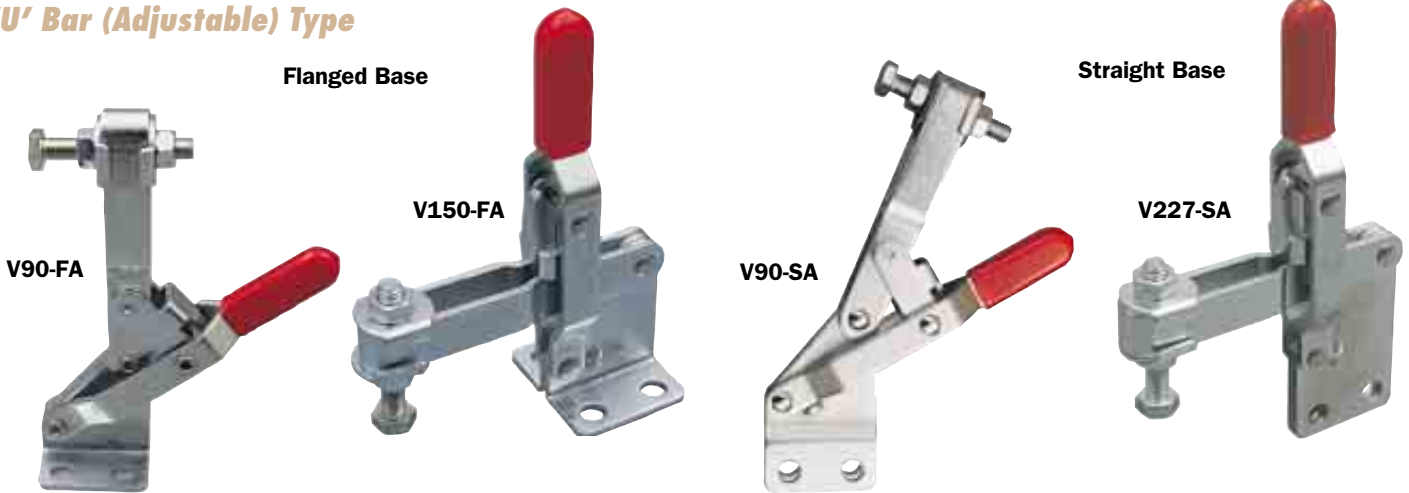
Clamping Capacity - the forces stated are the maximum loads that can be applied without causing permanent deformation. Due to leverage ratios, the holding capacity will be greatest at the point on the bar nearest to the handle of the clamp and forces stated have been achieved at this point.

Vertical Clamp Dimensions (mm)

Holding Capacity	A ₁ Flanged Base	A ₂ Straight Base	B ₁ Adj. Bar	B ₂ Fixed Bar	B ₃ Solid Bar	C Flanged Base	D	E	F Flanged Base	W
50kg	75.0	83.8	24.5	—	—	19.0	25.4	15.9	33.3	5.2
90kg	95.2	107.1	33.2	33.2	—	23.0	25.4	12.7	39.7	6.4
150kg	139.0	160.0	63.0	—	—	38.0	43.0	33.0	50.0	11.0
227kg	139.7	154.0	71.4	—	57.2	31.8	34.9	31.8	46.0	8.3
300kg	285.0	330.0	120.0	—	—	50.0	60.0	30.0	77.0	13.5
450kg	225.4	257.5	125.4	—	—	50.8	50.8	31.8	64.2	13.5
550kg	304.8	352.4	153.0	—	153.0	82.6	76.2	50.8	95.2	16.7

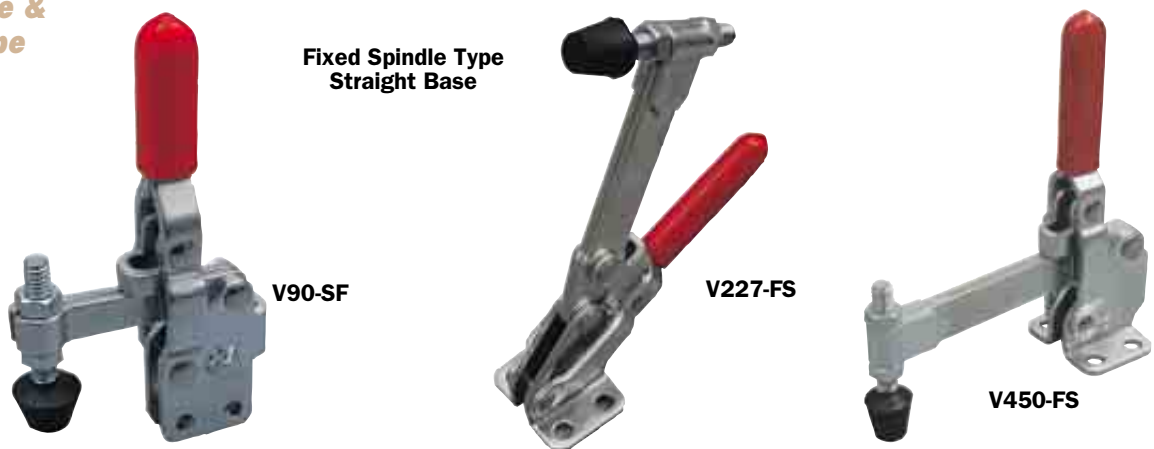


'U' Bar (Adjustable) Type



Product Number	Holding Capacity	Movement		Base Type	Supplied With	Weight each	Order Code IND-443
		Handle	Bar				
V50-FA	50kg	56°	100°	Flanged	Tipped Spindle (No.10) and Flanged Washer	60g	-1020K
V90-FA	90kg	60°	100°		Spindle (1/4") and Flanged Washer	320g	-1220K
V150-FA	150kg	45°	94°		Hex Head Spindle (M8) and Bolt Retainer	355g	-1420K
V227-FA	227kg	60°	100°		Tipped Spindle (5/16") and Flanged Washer	1250g	-1620K
V300-FA	300kg	67°	140°		Hex Head Spindle (M10)	1140g	-1720K
V450-FA	450kg	70°	135°	Straight	Hex Head Spindle (1/2") and Flanged Washer	170g	-1270K
V550-FA	550kg	60°	140°		Hex Head Spindle (5/8") and Flanged Washer	320g	-1370K
V340-FA	340kg	58°	105°		Tipped Spindle (3/8") and Flanged Washer	355g	-1470K
V90-SA	90kg	60°	100°		Spindle (1/4") and Flanged Washer	1250g	-1770K
V150-SA	150kg	45°	94°		Hex Head Spindle (M8) and Bolt Retainer		
V227-SA	227kg	60°	100°	Tipped Spindle (5/16") and Flanged Washer			
V450-SA	450kg	70°	135°	Hex Head Spindle (5/8") and Flanged Washer			

Fixed Spindle & Solid Bar Type

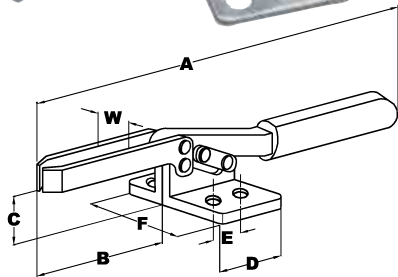
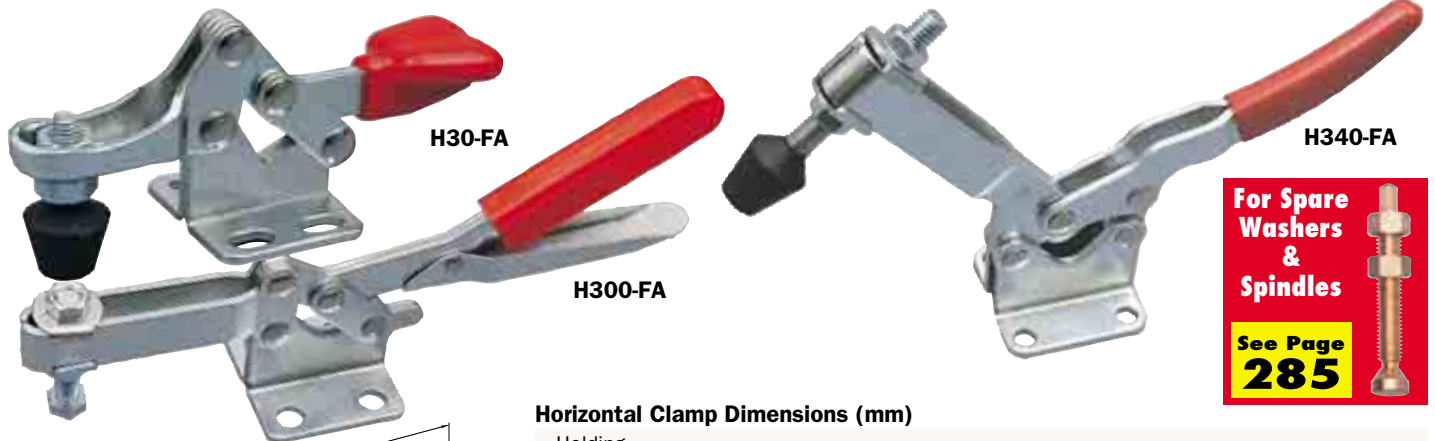


Product Number	Holding Capacity	Movement		Base Type	Supplied With	Weight each	Order Code IND-443
		Handle	Bar				
V90-FF	90kg	60°	100°	Flanged	Fixed Spindle (1/4")	170g	-1120K
V90-SF	90kg	60°	100°	Straight	Fixed Spindle (1/4")	170g	-1170K
V227-FS	227kg	60°	100°	Flanged	Solid Bar Hex Head (5/16") and Bolt Retainer*	340g	-1520K
V450-FS	450kg	70°	135°		Solid Bar Hex Head Spindle (1/2") and Bolt Retainer*	1250g	-1820K
V550-FS	550kg	60°	140°		Solid Bar Hex Head Spindle (5/8") and Bolt Retainer*	2540g	-1940K
V227-SS	227kg	60°	100°	Straight	Solid Bar Tipped Spindle (5/16") and Bolt Retainer*	340g	-1570K
V450-SS	450kg	70°	135°		Solid Bar Hex Head Spindle (5/8") and Bolt Retainer*	1250g	-1870K

* Bolt retainer supplied to be welded by user

INDEXA Horizontal Industrial Toggle Clamp

With a low profile design suitable for use in applications requiring increased access to the actual workpiece. Available in eight sizes for general application in areas where a lower profile is required. Force applied downwards 90° to bar.



Horizontal Clamp Dimensions (mm)

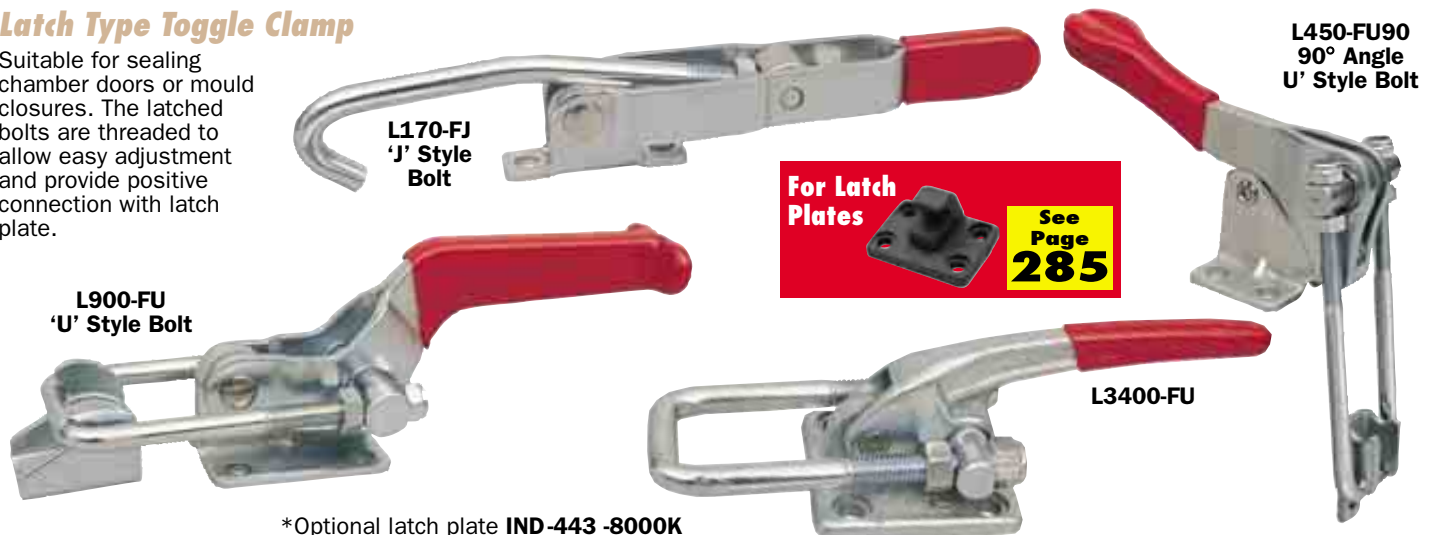
Holding Capacity	A	B	C	D	E	F	W
30kg	76.5	28.0	12.5	24.0	11.5	28.5	8.5
90kg	138.0	55.0	25.4	37.0	25.4	36.0	7.4
227kg	168.0	70.0	34.9	38.0	25.4	35.0	8.3
300kg	270.0	85.0	36.5	58.0	34.0	60.0	11.0
340kg	262.0	107.5	46.9	57.1	41.3	57.2	11.0
400kg	240.0	60.0	54.0	70.0	42.0	50.0	12.6
500kg	270.0	91.2	38.0	58.0	37.0	70.0	11.0
636kg	272.0	76.2	51.0	90.0		48.0	12.7

Product Number	Holding Capacity	Movement Handle	Bar	Base Type	Supplied with	Weight each	Order Code
H65-FA	75kg	76°	94°	Flanged	Hex Head Spindle (M5) Moulded PVC Handles	100g	-1960K
H86-FA	150kg	76°	94°		Hex Head Spindle (M6) Moulded PVC Handles	230g	-1970K
H217-FA	250kg	76°	94°		Hex Head Spindle (M8) Moulded PVC Handles	430g	-1980K
H30-FA	30kg	88°	80°	Flanged	Tipped Spindle (M4)	40g	-2020K
H90-FA	90kg	60°	85°		Tipped Spindle (1/4") and Flanged Washer	130g	-2120K
H227-FA	227kg	65°	90°		Tipped Spindle (5/16") and Flanged Washer	255g	-2220K
H300-FA	300kg	85°	80°		Hexagon Head Spindle (3/8") and Flanged Washer	490g	-2320K
H340-FA	340kg	50°	85°		Tipped Spindle (3/8") and Flanged Washer	640g	-2420K
H400-FA	400kg	85°	84°		Tipped Spindle (3/8") and Flanged Washer	600g	-2520K
H500-FA	500kg	85°	65°		Hexagon Head Spindle (M10) and Flanged Washer	450g	-2620K
H636-FA	636kg	94°	91°		Hexagon Head Spindle (1/2") and Flanged Washer**	1220g	-2720K

**Single mounting centre hole 13mm diameter for 'Tee' bolt mounting

Latch Type Toggle Clamp

Suitable for sealing chamber doors or mould closures. The latched bolts are threaded to allow easy adjustment and provide positive connection with latch plate.



*Optional latch plate IND-443-8000K

Product Number	Holding Capacity	Drawing Movement	Drawing Adjust	Base Type	Description	Weight each	Order Code
L164-FU	164kg	30mm	9.9mm	Flanged	U-Style Bolt	80g	-4070K
L318-FU	318kg	45mm	9.6mm		U-Style Bolt	225g	-4010K
L900-FU	900kg	80mm	23.8mm		U-Style Bolt	680g	-4130K
L1818-FU	1818kg	88.9mm	19mm		U-Style Bolt*	1260g	-4170K
L3400-FU	3400kg	55.6mm	28.6mm		U-Style Bolt*	1480g	-4210K
L170-FJ	170kg	100mm	6.5mm	Flanged	J-Style Bolt	270g	-4030K
L170-FJ	170kg	105mm	35mm		J-Style Bolt	255g	-4050K
L340-FJ	340kg	140mm	40mm		J-Style Bolt	340g	-4190K
L225-FU90	225kg	25mm	15mm	Flanged	90° Angle U-Style Bolt	113g	-4090K
L450-FU90	450kg	65mm	33mm		90° Angle U-Style Bolt	250g	-4110K
L900-FU90	900kg	45mm	40mm		90° Angle U-Style Bolt	700g	-4150K

Workshop Equipment



INDEXA Push Pull Industrial Toggle Clamp

The straight line action which gives these plunger-style clamps extremely high loading capacities whilst maintaining compactness. These clamps also lock in the open position which allows a 'pull' to be exerted (for instance, in use with foam moulds). All models have tapped spindles for use with adjustable spindles.

Base Mounted Type (Flanged)

Base Mounted Type - 45° Handle

P227-F45
P386-F45
P680-F45



Base Mounted Type - 45° Handle

P386-180F



Base Mounted Type - 90° Handle

P227-F90
P386-F90
P680-F90



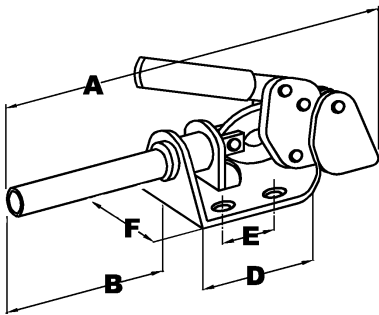
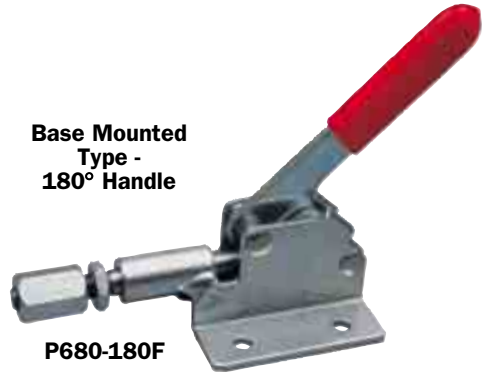
For More Spindles



See Page 285

Base Mounted Type - 180° Handle

P680-180F

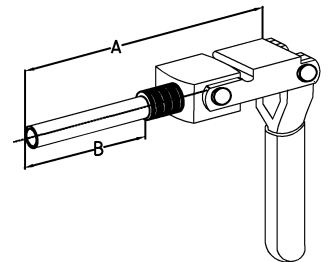
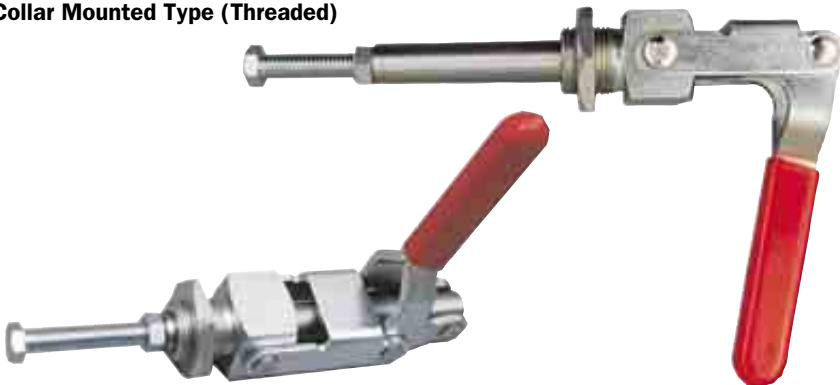


Dimensions (mm)

Holding Capacity	A — Excluding Handle	B	C	D	E	F
45kg	72.2	38.9	9.5	33.3	15.0	27.0
50kg	71.9	16.9	13.0	49.0	24.0	42.0
136kg	138.0	47.0	24.6	48.0	35.0	56.0
160kg	146.0	76.0	15.5	70.0	40.0	72.0
200kg	124.5	41.5	14.0	48.0	40.0	50.0
227kg	125.4	52.4	19.0	52.4	35.0	57.2
295kg	204.0	112.0	17.7	92.0	60.0	83.0
386kg	158.8	81.0	23.8	58.8	41.4	57.2
680kg	238.2	120.8	35.0	73.2	50.8	71.4
1136kg	178.6	50.8	12.5	127.8	34.9	56.2
1136kg	178.6	50.8	12.5	127.8	41.3 (6 holes)	56.2
1600kg	310.0	87.0	47.0	227.0	80.0	107.0

Product Number	Holding Capacity	Spindle Thread	Handle Movement	Handle Position	Base Type	Supplied With	Weight each	Order Code
P45-F45	45kg	1/4" UNC x 12 Deep	190°			Nylon Spindle	50g	-3030K
P136-F45	136kg	M8	180°			Hexagon Head Spindle	300g	-3060K
P200-F45	180kg	M8 x 1.25	144.5°			Hexagon Head Spindle	345g	-3090K
P180-FA	180kg	M8 x 1.25	145°			Hexagon Head Spindle	35g	-3100K
P227-F45	227kg	M8	180°	45°	Flanged	Hexagon Head Spindle	340g	-3120K
P386-F45	386kg	M10	180°	Extended	Flanged	Hexagon Head Spindle	580g	-3180K
P680-F45	680kg	M12	180°			Hexagon Head Spindle	1480g	-3240K
P1136-F45	1136kg	M10	180°			Hexagon Head Spindle	935g	-3300K
P227-F90	227kg	M8 x 30 Deep	180°	90°	Flanged	Hexagon Head Spindle	340g	-3150K
P386-F90	386kg	M10 x 40 Deep	180°	Extended	Flanged	Hexagon Head Spindle	580g	-3210K
P680-F90	680kg	M12 x 50 Deep	180°			Hexagon Head Spindle	1480g	-3270K
P50-180F	50kg	M5	66°	180°	Flanged	Hexagon Head Spindle	100g	-3700K
P386-180F	160kg	M10	45°	Extended	Flanged	Hexagon Head Spindle	454g	-3730K
P680-180F	295kg	1/2" UNC	45°			Hexagon Head Spindle	1270g	-3760K

Collar Mounted Type (Threaded)



Dimensions (mm)

Holding Capacity	A — Excluding Handle	B
91kg	30.3	20.6
136kg	115.0	37.7
318kg	169.5	65.3

Product Number	Holding Capacity	Spindle Thread	Collar Thread	Handle Movement	Base Type	Supplied with	Weight each	Order Code
P91-FT	91kg	1/4" UNC	M16	180°		Nylon Spindle	113g	-3530K
P136-FT	136kg	5/16" UNC	M20	180°	Flanged	Hexagon Head Spindle	270g	-3560K
P318-FT	318kg	3/8" UNC	M27	180°		Hexagon Head Spindle	690g	-3590K

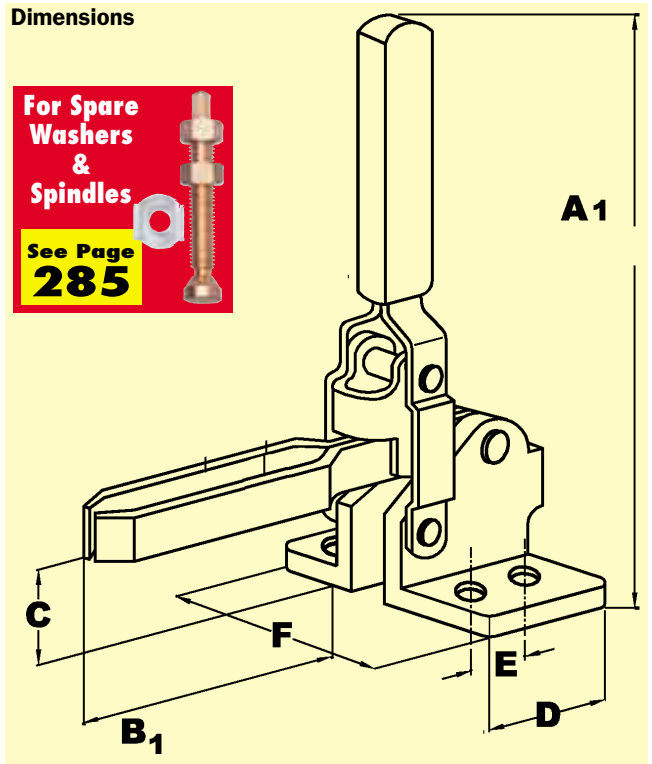
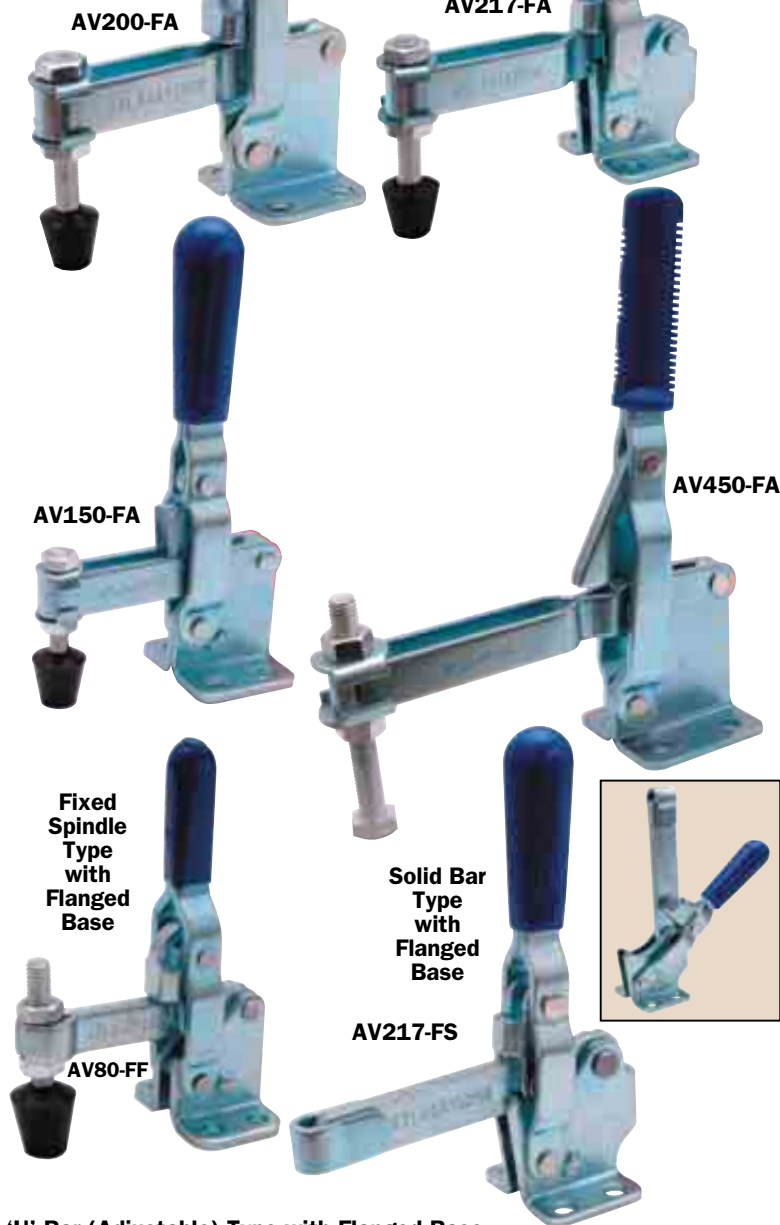
* Bolt retainer supplied to be welded by user

PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

GROUP
443 TOGGLE CLAMPS

ATLAS Vertical Industrial
WORKHOLDERS Toggle Clamp

Designed to improve performance in fabrication and engineering clamping applications. The rapid clamping/unclamping made possible by the use of toggle clamps can greatly reduce machine/operator 'down-time' during all stages of production.



For Spare Washers & Spindles
See Page **285**

'U' Bar (Adjustable) Type with Flanged Base

Product Number	A1 Flanged Base	B1 Flanged Base	C Flanged Base	D	E	F Flanged Base
AV50-FA	75.0	24.5	19.0	25.4	15.9	39.7
AV90-FA	93.0	39.0	23.0	29.0	14.0	28.0
AV150-FA	143.0	44.0	31.0	19.0	12.7	42.0
AV200-FA	139.0	63.0	38.0	43.0	24.0	50.0
AV217-FA	139.7	71.4	31.8	34.9	19.0	46.0
AV450-FA	272.0	125.0	62.0	70.0	40.0	70.0

Fixed Spindle Type with Flanged Base

Product Number	A1 Flanged Base	B1 Flanged Base	C Flanged Base	D	E	F Flanged Base
AV80-FF	100.0	27.0	23.8	25.4	12.7	39.7
AV217-FS	139.7	57.2	31.8	34.9	19.0	46.0

'U' Bar (Adjustable) Type with Flanged Base

Product Number	Holding Capacity	Movement Handle	Bar	Base Type	Supplied With	Weight each	Order Code
AV50-FA	50kg	56°	100°	Flanged	Tipped Spindle (M5) and Flanged Washers	60g	-1020K
AV90-FA**	90kg	60°	100°		Spindle (M6) and Bolt Retainer	115g	-1220K
AV150-FA	150kg	70°	108°		Hex Head Spindle (M6) Moulded PVC Handle	230g	-1970K
AV200-FA	200kg	45°	94°		Hex Head Spindle (M8) and Flanged Washers	370g	-1320K
AV217-FA	217kg	60°	100°		Tipped Spindle (M8) and Flanged Washers	310g	-1420K
AV450-FA	450kg	70°	135°		Hex Head Spindle (M12) and Flanged Washers	1220g	-1720K

** Model AV90-FA has Side Flange - All other FA models listed have Flat Flanges

Fixed Spindle Type with Flanged Base

Product Number	Holding Capacity	Movement Handle	Bar	Base Type	Supplied With	Weight each	Order Code
AV80-FF	90kg	60°	100°	Flanged	Fixed Spindle (M8)	170g	-1120K
AV217-FS	217kg	60°	100°		Solid Bar and Bolt Retainer (M8)*	310g	-1520K

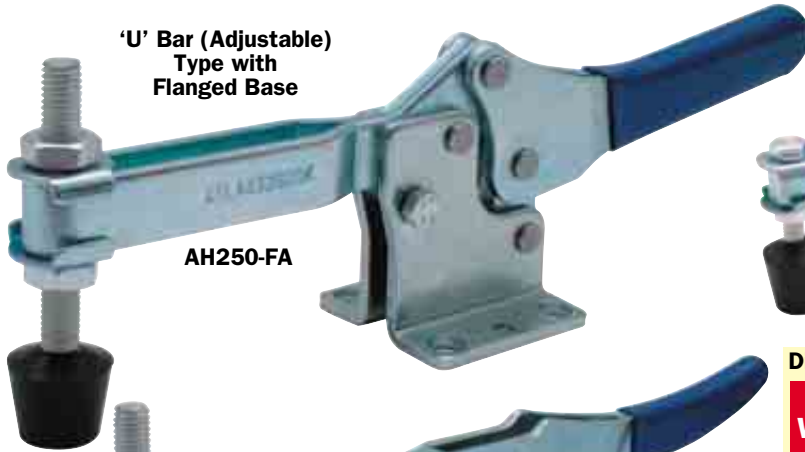
* Please Note that the bolt retainer supplied needs to be welded in to position by the user

Workshop Equipment



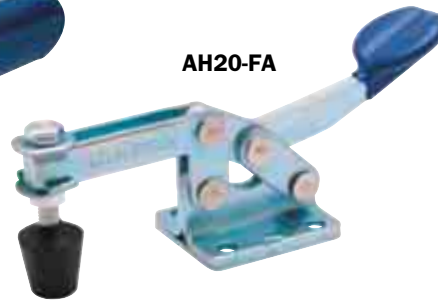
ATLAS Horizontal Industrial
WORKHOLDERS Toggle Clamps

With a low profile design suitable for use in applications requiring increased access to the actual workpiece. Available in eight sizes for general application in areas where a lower profile is required. Force applied downwards 90° to bar.



'U' Bar (Adjustable)
Type with
Flanged Base

AH250-FA



AH20-FA



AH340-FA

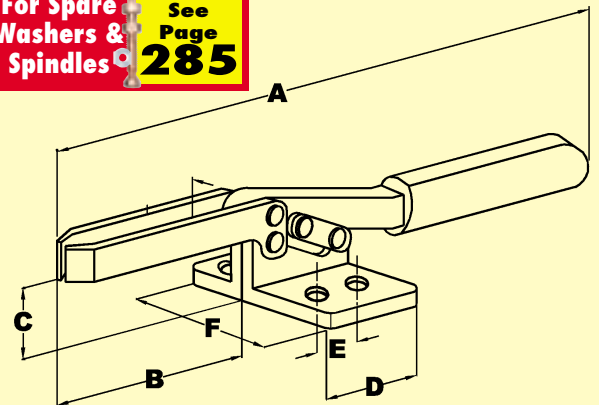


AH80-FA



Dimensions

For Spare Washers & Spindles See Page 285



Product Number	A	B	C	D	E	F
AH20-FA	110.0	37.5	24.8	36.5	24.0	30.0
AH80-FA	138.1	55.0	25.4	36.5	25.4	38.0
AH217-FA	168.0	70.0	34.9	38.0	53.4	35.0
AH250-FA	274.0	108.0	45.0	59.0	41.2	59.0
AH340-FA	263.5	108.0	44.4	57.2	41.3	57.2

Product Number	Holding Capacity	Movement Handle	Movement Bar	Base Type	Supplied with	Weight each	Order Code
AH20-FA	30kg	88°	80°	Flanged	Tipped Spindle (M6) and Flanged Washers	100g	-2020K
AH80-FA	80kg	60°	85°		Tipped Spindle (M6) and Flanged Washers	130g	-2120K
AH217-FA	217kg	65°	90°		Tipped Spindle (M8) and Flanged Washers	312g	-2220K
AH250-FA	250kg	94°	76°		Hexagon Head Spindle (M10) and Flanged Washers	500g	-2620K
AH340-FA	340kg	50°	85°		Tipped Spindle (M10) and Flanged Washers	265g	-2420K

Latch Type Toggle Clamps

Suitable for sealing chamber doors or mould closures. The latched bolts are threaded to allow easy adjustment and provide positive connection with latch plate.



'U' Style Bolt
Type with
Flanged Base

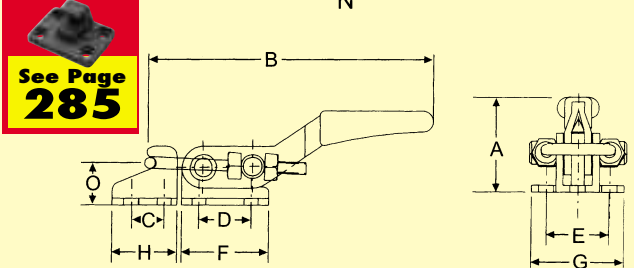
AL900-FU

AL165-FU

AL320-FU

Dimensions

For Latch Plates See Page 285



Product Number	A	B	C	D	E	F	G	H	J	J ₁	K	L	N	O
AL165-FU	36	88	9.9	16	19	26	28	45	4.3	4.3	19	13.2	3.3	12
AL320-FU	45	151.6	14	19	31.8	39.6	44.5	25	6.8	6.8	25.4	17.5	4	17
AL900-FU	70.6	190	19	41.4	38	60.5	54	38	8.4	8.4	44.5	30.0	8	24

Product Number	Holding Capacity	Drawing Movement	Drawing Adjust	Base Type	Description	Weight each	Order Code
AL165-FU	165kg	30mm	9.9mm	Flanged	U-Style Bolt	68g	-4070K
AL320-FU	320kg	45mm	9.6mm		U-Style Bolt	225g	-4010K
AL900-FU	900kg	80mm	23.8mm		U-Style Bolt	650g	-4130K

PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

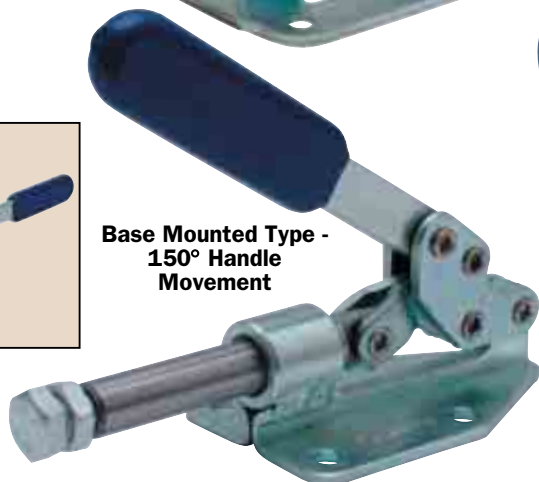
GROUP 443 TOGGLE CLAMPS

ATLAS Push Pull Industrial WORKHOLDERS Toggle Clamps

The straight line action which gives these plunger-style clamps extremely high loading capacities whilst maintaining compactness. These clamps also lock in the open position which allows a 'pull' to be exerted (for instance, in use with foam moulds). All models have tapped spindles for use with adjustable spindles.



Base Mounted Type - 180° Handle

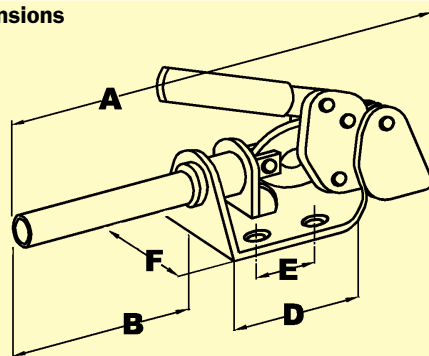


Base Mounted Type - 150° Handle Movement



Base Mounted Type - 190° Handle Movement

Dimensions



Product Number	A—Excl. Handle	B	C	D	E	F
AP136	138.1	49.2	24.6	88.9	34.9	55.6
AP200	124.5	41.5	14.0	83.0	40.0	50.0
AP227	151.0	63.0	15.0	88.0	32.0	63.0

For Spare Spindles

See Page 285



Product Number	Holding Capacity	Spindle Thread	Handle Movement	Handle Position	Base Type	Supplied With	Weight each	Order Code
AP136	136kg	M8	180°			Hexagon Head Spindle	285g	-3060K
AP200	200kg	M8 x 1.25	150°	45°	Flanged	Hexagon Head Spindle	330g	-3090K
AP227	227kg	M8 x 30 Deep	190°	Extended		Hexagon Head Spindle	540g	-3150K

INDEXA Heavy Duty Weldable Toggle Clamps

Hold down action suitable for high production automotive type applications. Heavy duty forged components with hardened and ground pivot points. The users provide their own handle and bar and weld them to the clamp which is then welded to a base. The flexible mounting of these clamps allows them to be used in situations where standard clamps are not effective.



For Welders

See Group 880



Holding Capacity	Base Width	Clamp Height with Handle	Weight each	Order Code
700kg	28mm	110mm	808g	-5010K
700kg	45mm	130mm	915g	-5030K
1100kg	35mm	140mm	1468g	-5050K
1100kg	50mm	170mm	1574g	-5070K





INDEXA Latch Plates

For use with latch type toggle clamps.



Base Size	Hook Width	Order Code
80 x 55mm	22mm	-8000K

Flanged Washers

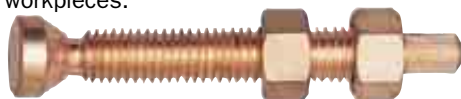
For use in conjunction with all spindles on clamps with adjustable 'U' bars.



To fit Spindle	Weight each	Order Code
$3/16$ " (No. 10)	2g	-8720K
$1/4$ "	4g	-8740K
$5/16$ " (M8)	10g	-8780K
$3/8$ " (M10)	15g	-8800K

Swivel Foot Spindles

As Neoprene capped but suitable for clamping onto irregular shapes or angled workpieces.



Size	Length	Weight each	Order Code
$1/4$ " UNC	2 1/4"	18g	-8500K
$5/16$ " UNC	2 3/4"	31g	-8520K
$3/8$ " UNC	3"	47g	-8540K
$1/2$ " UNC	4"	115g	-8560K

Neoprene Capped Spindles

For use with adjustable 'U' bar type clamps and solid bar type clamps that have bolt retainers.



Size	Length	Weight each	Order Code
M4 x 0.7	25mm	5g	-8020K
M8 x 1.25	63mm	34g	-8100K
M10 x 1.5	85mm	64g	-8140K
No 10UNC	1 3/8"	9g	-8200K
$1/4$ " UNC	1 3/4"	16g	-8220K
$5/16$ " UNC	2 1/2"	31g	-8260K
$3/8$ " UNC	3 1/2"	58g	-8300K

Neoprene Caps

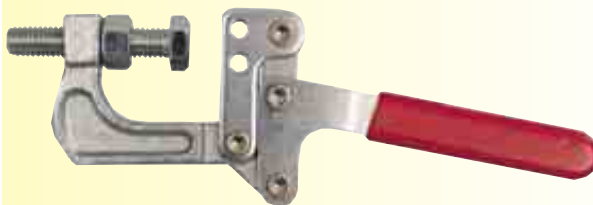
For standard adjustable spindles.



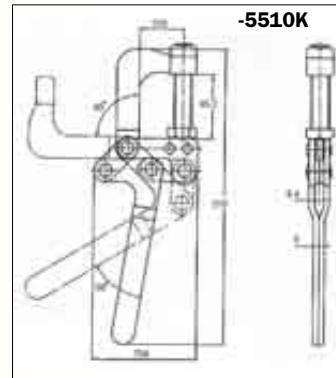
To fit Spindle	Weight each	Order Code
$1/4$ "	8g	-8600K
$5/16$ "	15g	-8620K
$3/8$ "	24g	-8640K
$1/2$ "	45g	-8660K

Cam Type Toggle G-Clamp (Pull Back Clamp)

To securely fix the clamp into position the base can be welded to the work surface.

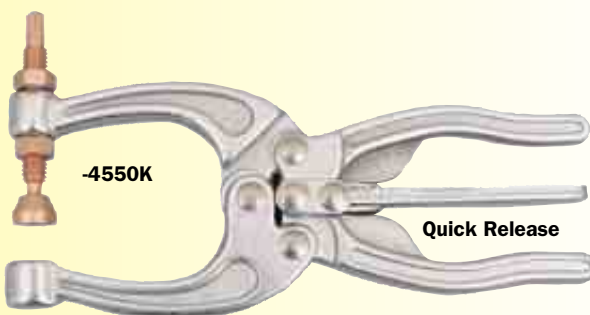


Holding Capacity	Jaw Opening	Jaw Movement	Handle Movement	Order Code
340kg	45.2mm	90°	50°	-5510K

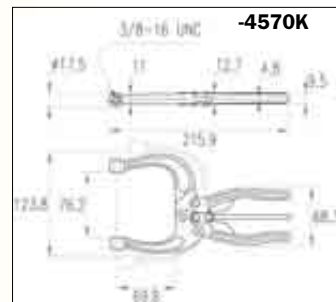
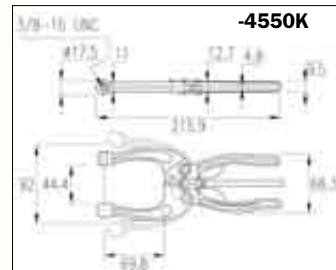
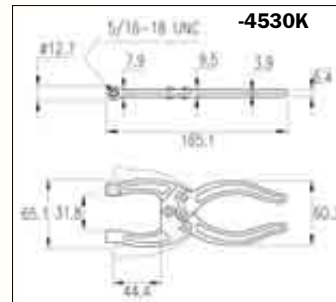
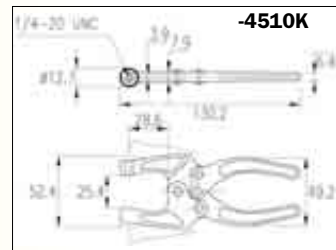


Toggle Pliers

Toggle pliers have the advantage of a pivoting jaw mechanism to allow a deep throat depth to open and close easily when clamping awkward profiles such as steel angle section. The jaw spindle can be pre-set to achieve the optimum clamping distance and pressure and so is most useful for repetitive clamping applications.



Holding Capacity	Jaw Opening Min	Jaw Opening Max	Standard Spindle Supplied	Order Code
90kg	25.4	52.4	Hex. Head	-4510K
159kg	31.8	65.1	Hex. Head	-4530K
318kg	44.4	92.0	Swivel	-4550K
318kg	76.2	123.8	Hex. Head & Swivel	-4570K

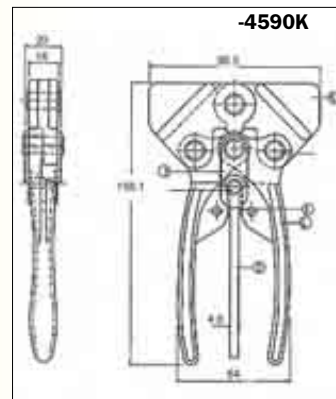


"Stub" Type Toggle Pliers

With two stub arms for easy linking to special jaw extensions.



Holding Capacity	Closed Head Width (mm)	Overall Length	Order Code
318kg	95.6	156.1	-4590K



Workshop Equipment

GROUP 445 VICES

SENATOR Engineer's
QUALITY TOOLING Vice

Manufactured from the highest quality castings with precision cut screw mechanisms and precision machined jaws. Suitable for workshop, automotive and engineering use.

Workshop Vice

American pattern bench mounting, steel vice with anvil suitable for workshop, garage and machine-shop use. Fixed base directly mounts onto work bench. Cast iron body with steel jaws and a cross drilled threaded handle with adjustable T-bar for extra leverage.



Do Not Strike With A Hammer

Opening (mm)	Jaw Width (mm)	Weight each	Order Code
100 (4")	75 (3")	9.2kg	-1030K
140 (5½")	100 (4")	9.5kg	-1040K
170 (6½")	125 (5")	18.0kg	-1050K
190 (7½")	150 (6")	27.0kg	-1060K



Replacement Jaws (Pairs)

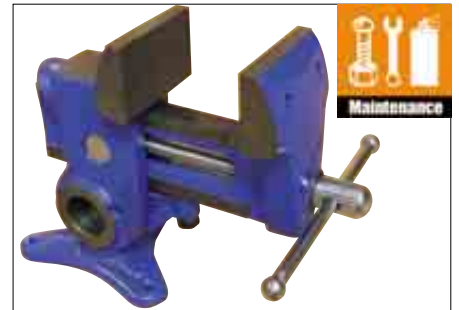
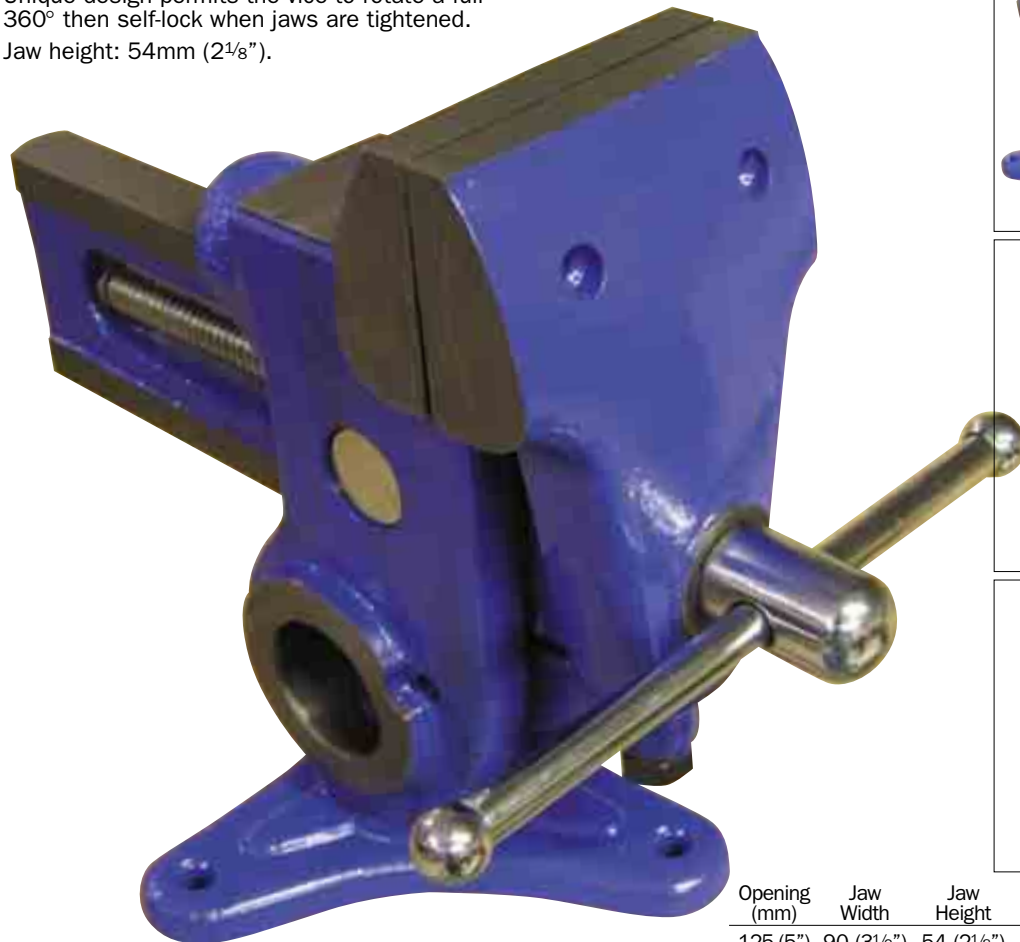
Engineers Vice Size	Weight each	Order Code
To suit 75mm jaw width	1.4kg	-1030K
To suit 100mm jaw width	1.8kg	-1040K
To suit 125mm jaw width	2.0kg	-1050K
To suit 150mm jaw width	2.3kg	-1060K

Opening (mm)	Jaw Width (mm)	Weight each	Order Code
145 (5¾")	100 (4")	13.5kg	-2040K
200 (8")	150 (6")	14.0kg	-2060K

Workshop Equipment

125mm (5") Universal Vice

Can be bench mounted either vertically or horizontally. Unique design permits the vice to rotate a full 360° then self-lock when jaws are tightened. Jaw height: 54mm (2¼").



Opening (mm)	Jaw Width	Jaw Height	Weight each	Order Code
125 (5")	90 (3½")	54 (2¼")	8.2kg	-4050K

SENATOR *Portable Bench Vice*
QUALITY TOOLING

Lightweight and portable with a swivel base and light duty anvil. Ideal for model makers, DIY and light industrial use. Can be fitted to any convenient work surface. Solid cast grey iron body with steel guide rods and main screw.



Opening (mm)	Jaw Width	Weight each	Order Code
70 (2¾")	60	2.8kg	SEN-445 -0600K

Woodworking Vice - Quick Release

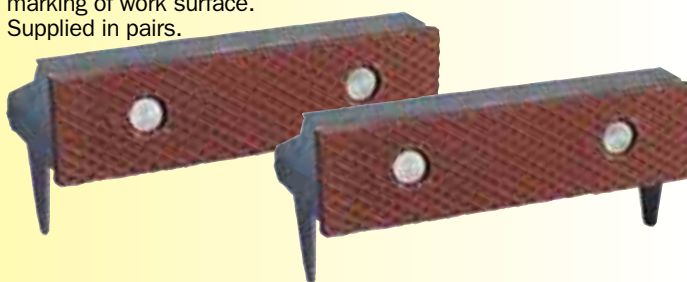
Manufactured with a close grained cast iron body, steel lead screw, and handle and guides which are chrome plated. The quick release mechanism is engaged using a trigger action. Clamping control is returned to the screw upon release of the trigger. Designed for bench mounting. Fitted with a front dog, which when used in conjunction with a bench stop, allows oversize work to be held secure.



Opening (mm)	Jaw Width (mm)	Weight each	Order Code
200 (8")	180 (7")	8.25kg	SEN-445 -3070K
250 (10")	230 (9")	16.7kg	-3090K

KENNEDY *Fibre Grips*
QUALITY INDUSTRIAL TOOLING

Fibre-faced aluminium vice jaws for use with copper, aluminium, brass and wooden workpieces to prevent marking of work surface. Supplied in pairs.



Width (mm)	Weight each	Order Code
76 (3")	165g	-0300K
90 (3½")	180g	-0350K
100 (4")	180g	-0400K
110 (4½")	230g	-0420K
115 (4½")	245g	-0450K
127 (5")	245g	-0500K
133 (5¼")	260g	-0520K
150 (6")	280g	-0600K

Magnetic Vice Jaws

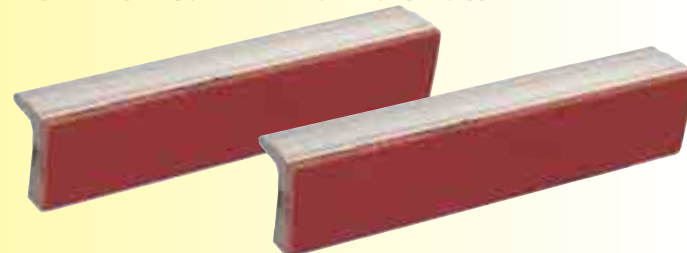
Suitable for all steel and iron vices - engineers, fitters, machine. Quick and easy to fit and remove.

Profiled Aluminium



Width (mm)	Weight each	Order Code
75 (3")	125g	-1300K
100 (4")	165g	-1400K
125 (5")	210g	-1500K
150 (6")	250g	-1600K

Aluminium Jaw with a Fibre Face



Width (mm)	Weight each	Order Code
75 (3")	115g	-2300K
100 (4")	160g	-2400K
125 (5")	195g	-2500K
150 (6")	235g	-2600K

Aluminium Jaw with a Rubber Face



Width (mm)	Weight each	Order Code
75 (3")	120g	-3300K
100 (4")	160g	-3400K
125 (5")	210g	-3500K
150 (6")	250g	-3600K

INDEXA Drill Press Vices
Quick Grip



Fixed Jaw

Quick acting cam can be set instantly to hold work. Fixed jaw with V-block to handle flat or round pieces, vertically or horizontally. Jaw inserts are hardened and ground. The heavy base can be clamped down to a milling machine or drill press.



Jaw Width	Jaw Height	Maximum Opening	Weight each	Order Code
80mm	30mm	80mm	5.2kg	-0170K
100mm	35mm	100mm	8.9kg	-0180K

Sliding Jaw

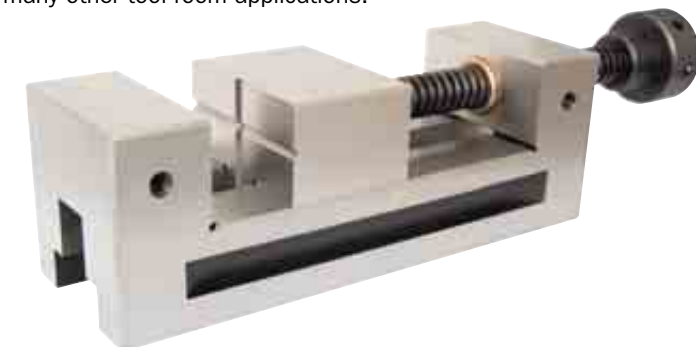
Recessed, replaceable jaws. Quick-acting cam gives instant settings by moving sliding steel bar attached to inside jaw. With cut-out base for clear through drilling. Hardened and ground lever arm locking mechanism. Heavy base can be clamped down to a milling machine or drill press. Adjustable clamping pressure.



Jaw Width	Max. Opening	Overall Length	Base Width	Weight each	Order Code
80mm	80mm	222mm	120mm	4.0kg	-0110K
100mm	125mm	293mm	160mm	7.0kg	-0120K
125mm	150mm	327mm	185mm	10.0kg	-0130K
160mm	160mm	380mm	224mm	15.5	-0140K

Precision Toolmaker's Vices

Squareness and parallelism to within **0.003mm**. Designed for precision grinding and many other tool room applications.



Jaw Dimension Width x Opening x Height	Overall Length	Weight each	Order Code
50 x 65 x 25mm	150	3.00kg	-0400K
73 x 100 x 35mm	205	5.00kg	-0430K
100 x 125 x 45mm	255	13.00kg	-0450K

ATLAS Machine
WORKHOLDERS Vices



Machine Vices without Swivel Base

Manufactured in accordance with high quality criteria.

Designed for general purpose milling, planing and drilling applications.

Machine Vices with Swivel Base Type

Also available complete with a swivel base designed for milling, planing and drilling applications.

Graduated to 1°.



Swivel Base Type

Jaws are fully ground in pairs

Jaw Width	Max. Opening	Jaw Height	O/all Dimension L x W x H	Weight each	Order Code
Without Swivel Base					
100mm	80	35	245 x 115 x 89	8kg	-0100K
160mm	125	51	411 x 187 x 120	34kg	-0150K
200mm	160	63	440 x 220 x 140	46kg	-0200K
With Swivel Base					
100mm	80	35	195 x 145 x 110	17kg	-1100K
160mm	125	51	411 x 187 x 167	43kg	-1150K
200mm	160	63	440 x 220 x 187	57kg	-1200K

Spare Jaws to suit Atlas Machine Vices

Width	Order Code
	ATL-445
100mm	-1040K
160mm	-1060K
200mm	-1080K

Toolmaker's Vice - V-Groove Jaw

Made from alloy steel, case hardened. With a quick release mechanism.

Accuracy:
0.005mm.



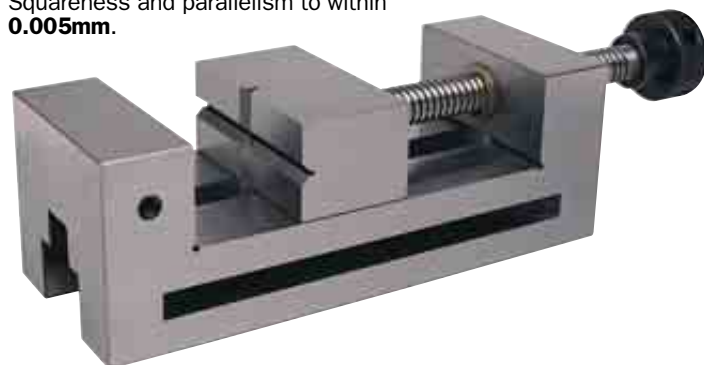
Jaw Dimension Width x Opening x Height	Overall Length	Weight each	Order Code
50 x 65 x 25mm	135	3kg	-0310K

Toolmaker's Vices

Manufactured from high carbon steel, precision ground on all faces. Phosphor bronze bush, 90° vee on clamping jaws.

Standard Precision Toolmakers Vices

Squareness and parallelism to within **0.005mm**.



Jaw Dimension Width x Opening x Height	Overall Length	Weight each	Order Code
63 x 85 x 32mm	185	3.80kg	-2010K
100 x 125 x 45mm	255	13.00kg	-2050K

INDEXA Drill Press Vices

Available in four different jaw widths. For drilling, light milling, vertical and horizontal work. One grooved and one plain replaceable jaw for square and hexagonal shapes across flats or corners, thin strips and discs. Jaws and lead screw are hardened and ground.



Jaw Width	Jaw Opening	Order Code
85mm	70mm	-0010K
100mm	85mm	-0020K
120mm	120mm	-0030K
150mm	150mm	-0040K

SENATOR Drill Press Vices

Suitable for use on pillar/bench drills to steady the workpiece in all light duty drilling applications for the garage or small workshop. Cast construction with machined slots which are spaced to fit all popular drill stand bases. Cross drilled handle with sliding T bar for extra leverage.

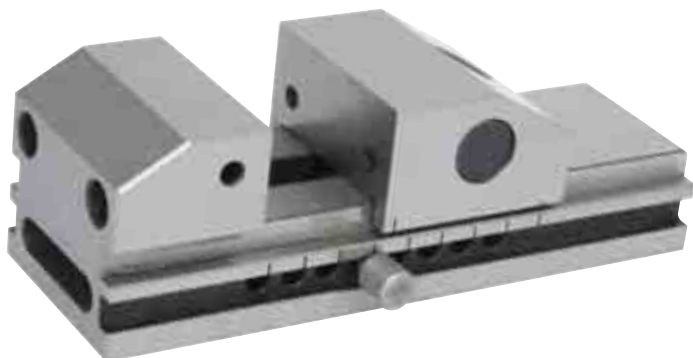


Jaw Width	Maximum Opening	Jaw Height	O/all Dimension Length x Height	Weight each	Order Code
75mm	55	23	200 x 45	1.90kg	-0750K
100mm	95	25	250 x 55	3.25kg	-1000K

Toolmaker's Vices - Plain Jaw

Manufactured from high quality alloy steel, case hardened to HRC 58 - 62. For wire cutting, machining, measurement and inspection. With a dowel pin quick release mechanism with linear scale for accurate alignment.

Accuracy: 0.003mm.

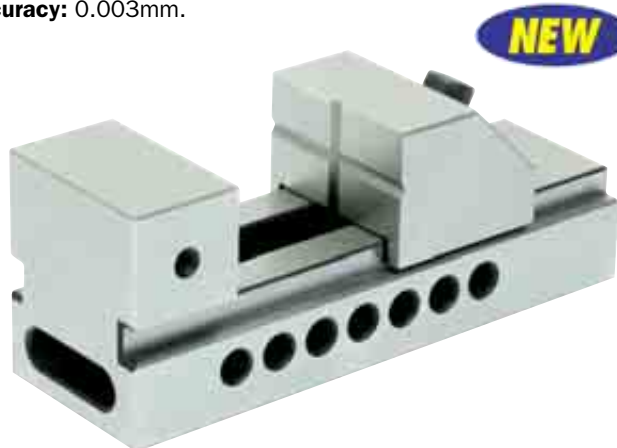


Jaw Dimension Width x Opening x Height	Overall Length	Weight each	Order Code
60 x 80 x 28mm	175mm	3.9kg	-0200K
75 x 100 x 40mm	220mm	7.9kg	-0210K

Toolmaker's Vice - V-Groove Jaw

Manufactured from high quality alloy steel, case hardened to HRC 58 - 62. With a rack quick release mechanism.

Accuracy: 0.003mm.



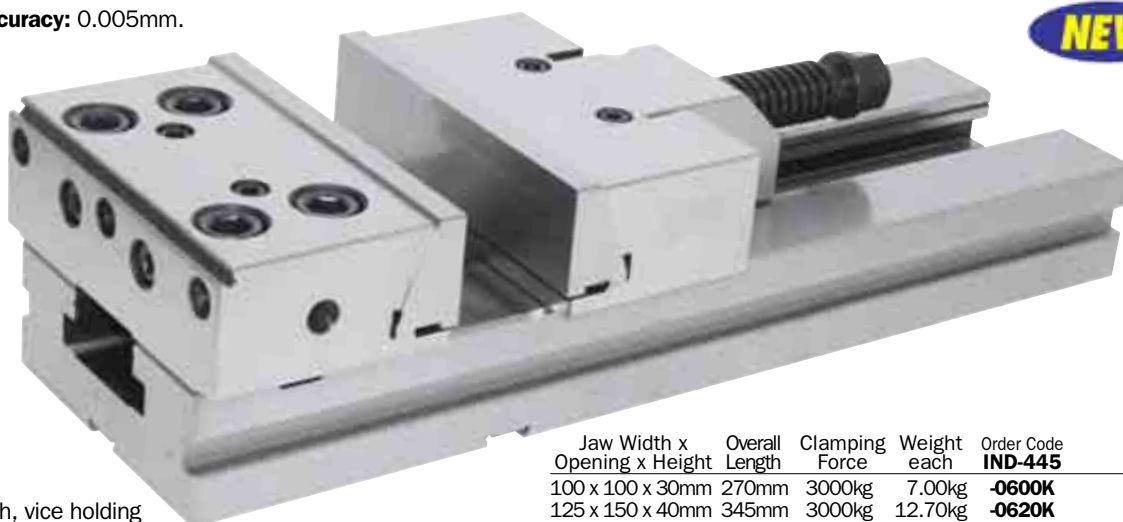
Jaw Dimension Width x Opening x Height	Overall Length	Weight each	Order Code
50 x 78 x 30mm	155mm	3.00kg	-0310K

Modular Precision Machine Vices

Precision modular vices are designed to be used on standard and CNC machines for precision grinding and milling. The vice could be set up individually or work in multiples, on tables or pallets depending on the machined material dimensions. Made from hardened high grade alloy steel.

Parallelism: 0.005mm.

Perpendicular accuracy: 0.005mm.



Accessories:
L-wrench, T-wrench, vice holding clamp, work stop with main bolt, positioning key-nuts etc.

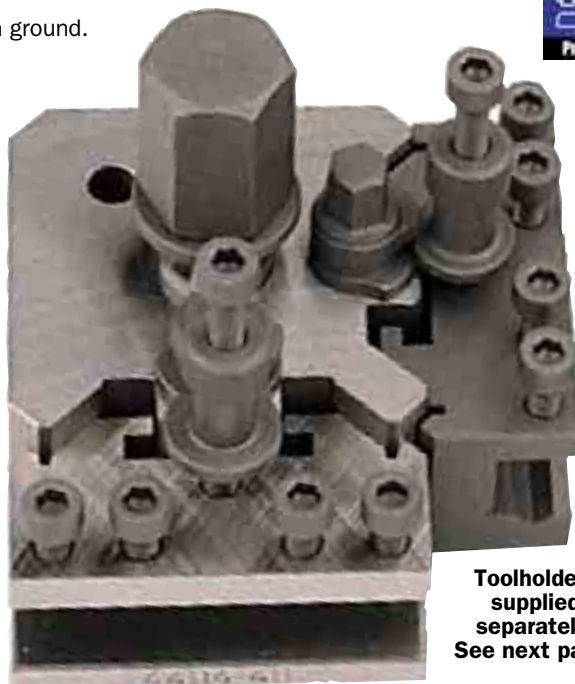
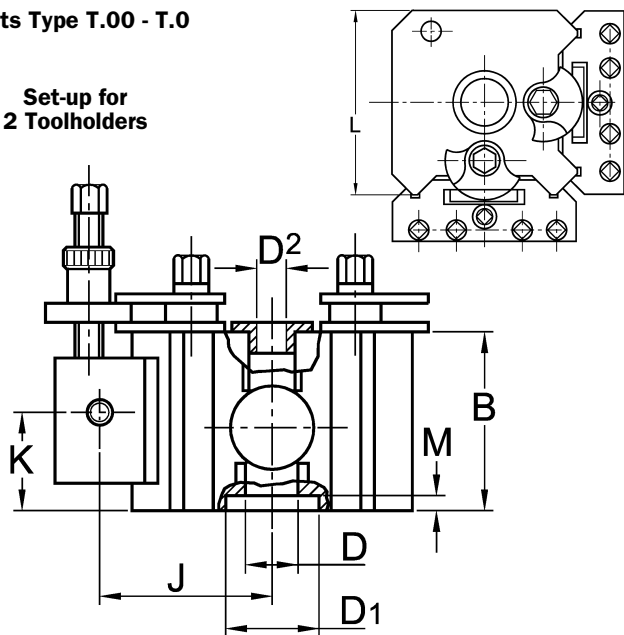
Jaw Width x Opening x Height	Overall Length	Clamping Force	Weight each	Order Code
100 x 100 x 30mm	270mm	3000kg	7.00kg	-0600K
125 x 150 x 40mm	345mm	3000kg	12.70kg	-0620K
150 x 200 x 50mm	420mm	5000kg	25.60kg	-0640K
150 x 300 x 50mm	520mm	5000kg	29.50kg	-0660K

Made of alloy case steel. All working surfaces are hardened and precision ground.



Toolposts Type T.00 - T.0

Set-up for
2 Toolholders



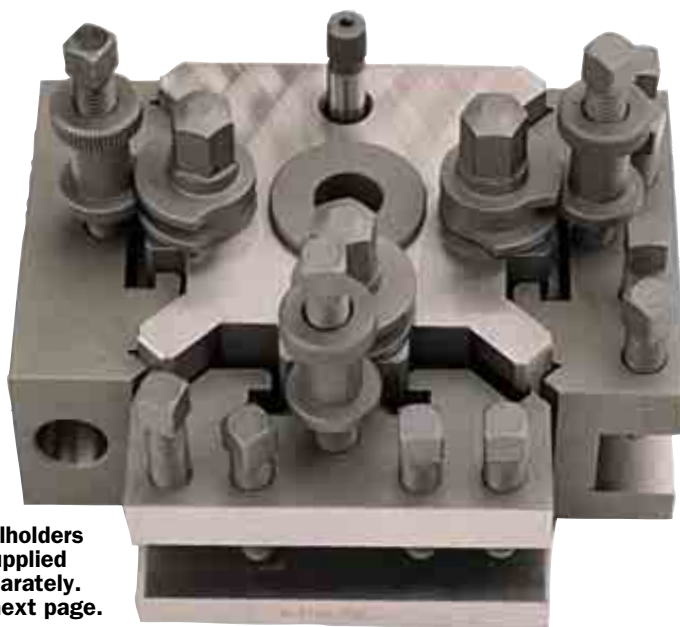
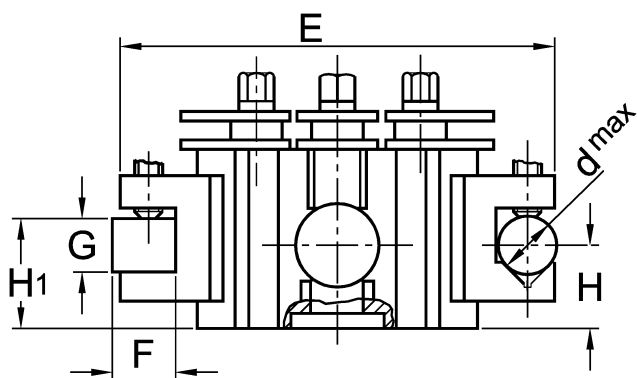
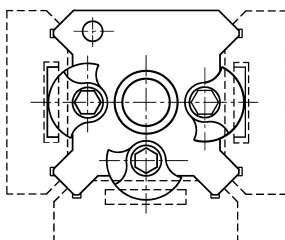
Toolholders
supplied
separately.
See next page.

Type	No. of Toolholders	Lathe Capacity	B	D1 Dia.	M Depth	D	E	G	F	H1 Max	H1 Min.
T.00M	2	Up to 89mm	37.0	-	-	11.2	-	10	11	27	17
T.00B	2	Up to 89mm	42.0	-	-	16.0	-	10	11	32	17
T.0	3	Up to 114mm	51.0	22.22	5.0	19.0	124	13	13	36.5	20.5

Type	Bar dia. d Max.	H Max.	H Min.	Taper	J	K Max.	K Min.	L	D2	Weight each	Order Code IND-445
T.00M	11.0	22.5	12.5	-	-	-	-	58.0	-	0.90kg	-4800K
T.0	16.0	32.0	16.0	1	52.5	28.5	16.0	73.0	16.0	2.00kg	-4820K

Toolposts Type T.1 - T.3

Set-up for
3 Toolholders



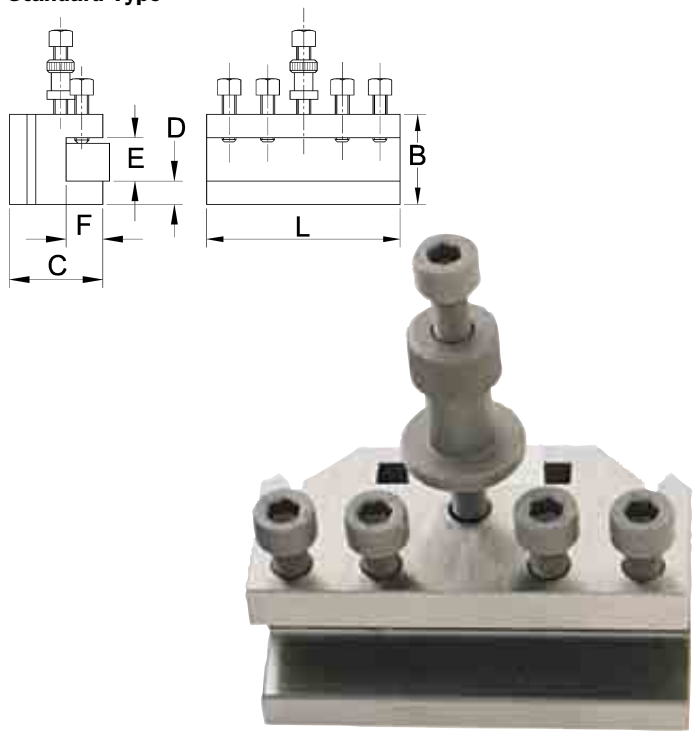
Toolholders
supplied
separately.
See next page.

Type	No. of Toolholders	Lathe Capacity	B	D1 Dia.	M Depth	D	E	G	F	H1 Max	H1 Min.
T.1	3	114 to 127mm	63.5	31.75	6.5	19.0	124	19	13	46	30
T.1X	3	114 to 127mm	73.0	31.75	6.5	19.0	124	19	13	57	35
T.2	3	127 to 203mm	71.5	44.45	8.0	25.5	159	19	19	54	36.5
T.2T	3	127 to 203mm	76.0	44.45	8.0	25.5	168	25.5	25.5	58.5	39.5
T.3	3	203 to 292mm	92.0	50.80	9.5	25.5	203	31.5	22.5	73	51

Type	Bar dia. d Max.	H Max.	H Min.	Taper	J	K Max.	K Min.	L	D2	Weight each	Order Code IND-445
T.1	16.0	44.5	25.5	1	52.5	41.0	22.0	73.0	16.0	2.30kg	-4830K
T.1X	16.0	54.0	32.0	1 & 2	52.5	51.0	28.5	73.0	16.0	2.60kg	-4840K
T.2	19.0	46.0	24.0	2	65.0	47.5	27.0	98.5	16.0	4.60kg	-4850K
T.2T	19.0	50.0	24.0	2 & 3	70.0	47.5	27.0	106.5	16.0	5.80kg	-4860K
T.3	25.5	51.0	28.5	3	85.5	58.5	36.5	125.5	22.0	10.8kg	-4870K

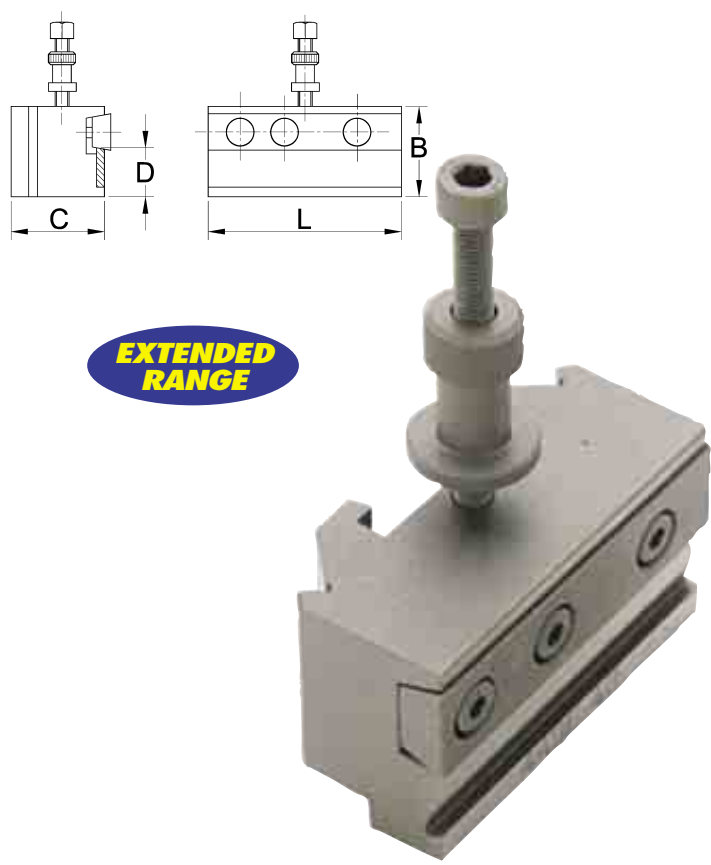
INDEXA Toolholders for Quick Change Toolpost

Standard Type



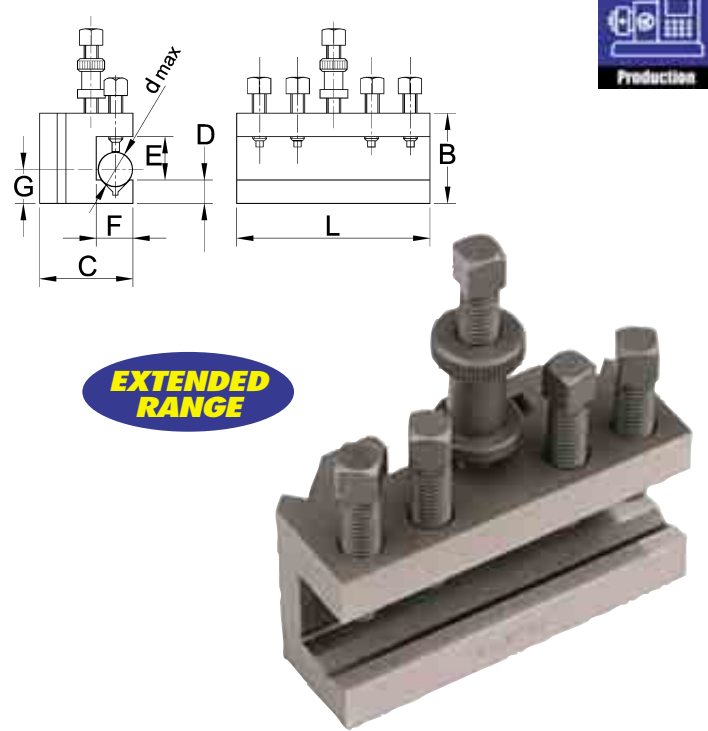
Used On	L (mm)	B	C	D	E	F	Order Code
T.00	58.0	27.0	28.0	7.0	13.0	11	-5010K
T.0	73.0	35.0	32.0	8.0	16.0	14	-5020K
T.1	73.0	44.5	32.0	11.0	22.0	14	-5030K
T.2	98.5	50.0	40.0	12.0	22.0	19	-5040K
T.2T	98.5	57.0	40.0	14.0	28.5	19	-5050K
T.3	124.0	70.0	48.5	17.5	35.0	23	-5060K

Parting Off Type



Used On	L (mm)	B	C	D	Order Code
T.0/T.1	73.0	47.5	32.0	27.0	-5370K
T.2	98.5	57.0	39.5	33.5	-5380K
T.3	124.0	70.0	48.5	33.5	-5390K

Vee Type



Used On	L (mm)	B	C	D	E	F	G	d Max	Order Code
T.00	58.0	27.0	28.0	8.0	13.0	11	13.5	11.0	-5110K
T.1	73.0	44.5	32.0	11.0	22.0	14	24.0	16.0	-5130K
T.2	98.5	50.0	40.0	14.0	22.0	19	24.0	19.0	-5140K
T.2T	98.5	57.0	40.0	14.0	28.5	19	24.0	19.0	-5150K
T.3	124.0	70.0	48.5	17.5	35.0	23	28.5	25.5	-5160K

Industrial Lathe Carriers

Available with straight or bent tail. Manufactured from high grade, malleable cast iron with high tensile strength. Smooth action square head clamping screw.

Straight



Type	Capacity	Weight each	Order Code
Straight	12.5mm	0.10kg	-9000K
	19.0mm	0.15kg	-9010K
	25.0mm	0.30kg	-9020K
	38.0mm	0.70kg	-9040K
	50.0mm	1.50kg	-9060K

Bent



Type	Capacity	Weight each	Order Code
Bent	12.5mm	0.10kg	-9200K
	19.0mm	0.15kg	-9210K
	25.0mm	0.30kg	-9220K
	38.0mm	0.70kg	-9240K
	50.0mm	1.50kg	-9260K

PRODUCTS ARE ONLY AVAILABLE VIA YOUR DISTRIBUTOR

Workshop Equipment



INDEXA Modular Coolant Hose System

Modular coolant hose system is ideal for coolants, fluids and air lines. Suitable for all wet machining, spark erosion and air line operations up to 50psi air and 30psi liquid. Flow direction is easily and accurately positioned with no spring-back. All parts are fully interchangeable and fully replaceable if a single section is damaged. Manufactured from acetal - non-conductive and chemical resistant. Available with 1/4", 1/2" and 3/4" bore. Hose is green, all other fittings are orange. Threaded fittings are fully compatible with BSPT.



Starter Packs

Contents	Weight each	Order Code
1/4" Bore		
12" Hose		
4 Nozzles	40g	-6910K
2 Connectors		
1/2" Bore		
13" Hose		
3 Nozzles	91g	-7910K
2 Connectors		
3/4" Bore		
14" Hose		
2 Nozzles	126g	-8910K
1 Connectors		

Tube Segments



Bore Size	Weight each	Order Code
11" Lengths (Green)		
1/4"	40g	-6210K
1/2"	69g	-7210K
3/4"	102g	-8210K
25ft Bulk Pack (Green)		
1/4"	886g	-6250K
1/2"	1637g	-7250K
3/4"	2381g	-8250K

Modular Manifold Kits



Description	Bore Size	Weight each	Order Code
IND-447			
4 x T-Pieces	1/4"	109g	-6450K
1 x Plug			
1 x Bracket	1/2"	98g	-7450K
4 x Screws			

Modular Coolant Hose System

Threaded Spigots

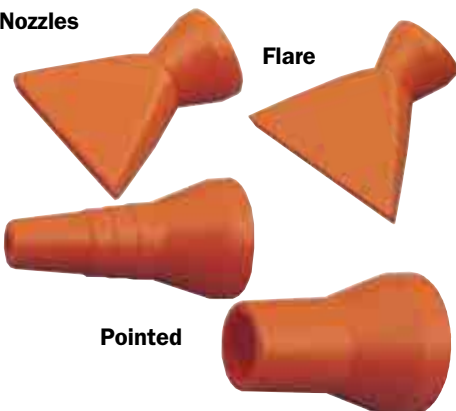


Male Spigot



Bore Size	Inlet Size	Weight each	Order Code
1/4"	1/8" NPT Female	2g	-6710K
	1/4" NPT Female	2g	-6730K
1/4"	1/8" NPT Male	2g	-6170K
	1/4" NPT Male	2g	-6190K
1/2"	3/8" NPT Male	7g	-7170K
	1/2" NPT Male	7g	-7190K
3/4"	1/2" NPT Female	7g	-7730K
	3/4" NPT Male	10g	-8170K

Nozzles



Type	Size	Weight each	Order Code
1/4" Bore			
Pointed	1/16"	5g	-6610K
	1/8"	5g	-6630K
	3/16"	5g	-6640K
	1/4"	5g	-6650K
Flare	1"	5g	-6670K
1/2" Bore			
Pointed	1/4"	5g	-7610K
	3/8"	5g	-7630K
	1/2"	5g	-7650K
Flare	1 3/4"	5g	-7670K
	2 1/2"	5g	-7690K
3/4" Bore			
Pointed	5/8"	10g	-8610K
Flare	3/4"	10g	-8630K
Flare	3"	10g	-8650K

Plastic Valves

1/4 turn fitting.



Bore Size	Inlet Type	Weight each	Order Code
IND-447			
1/4"	In-line	10g	-6050K
1/2"	In-line	30g	-7050K

Metal Ball Valves

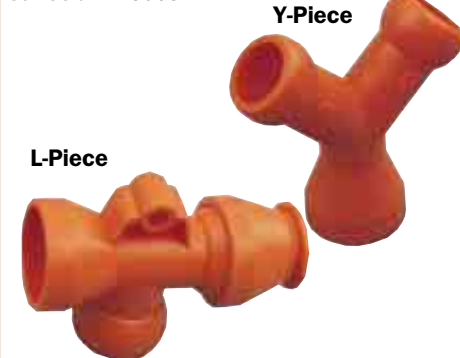
Threaded fitting 1/4 turn.



NPT Threads	Weight each	Order Code
IND-447		
1/8" x 1/8"	81g	-6070K
1/4" x 1/4"	80g	-6090K
3/8" x 3/8"	76g	-7070K
1/2" x 1/2"	114g	-7090K
3/4" x 3/4"		-8070K

Modular Coolant Hose System

Junction Pieces



Type	Weight each	Order Code
IND-447		
1/4" Bore		
Y-Piece	3g	-6310K
T-Piece	3g	-6350K
L-Piece	4g	-6370K
1/2" Bore		
Y-Piece	9g	-7310K
T-Piece	9g	-7350K
L-Piece	12g	-7370K

Junction Reducers

Type	Weight each	Order Code
IND-447		
1/2" Bore		
1/2" to 2 x 1/4"	4g	-7330K
1/2" to 1/4"	3g	-7510K
3/4" Bore		
3/4" to 1/2"	5g	-8510K

Quick Set Machine Shields

14" (3/4" bore) hose length. Suitable for small machine tools. Fully adjustable with magnetic base.



Visor Size	Weight each	Order Code
IND-447		
Shield (Complete)		
6" x 8"	500g	-0250K
7 1/2" x 10"	570g	-0260K
Replacement Visor		
6" x 8"	200g	-0350K
7 1/2" x 10"	250g	-0360K

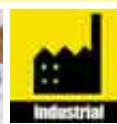
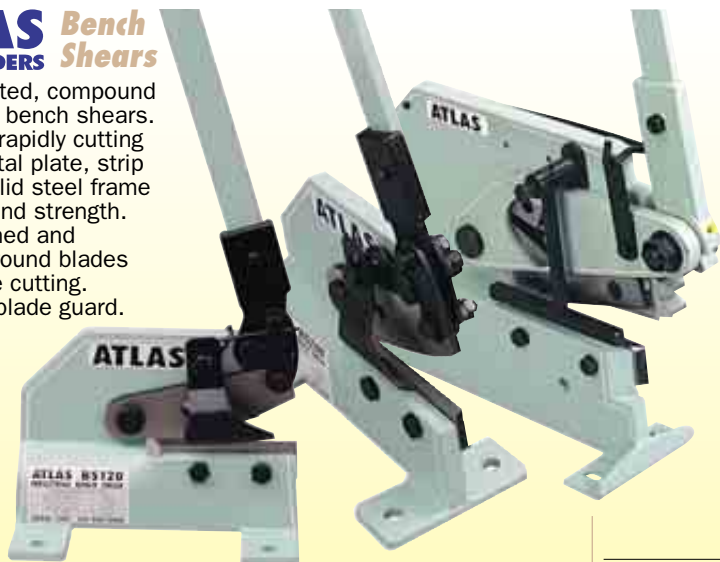
Quick Action Assembly Pliers

Bore Size	Weight each	Order Code
IND-447		
1/4"		-0010K
1/2"		-0020K

Workshop Equipment

ATLAS Bench WORKHOLDERS Shears

Hand operated, compound lever action bench shears. Capable of rapidly cutting through metal plate, strip and bar. Solid steel frame for rigidity and strength. With hardened and precision ground blades for accurate cutting. Adjustable blade guard.



Model Number	Plate	Maximum Strip	Bar	Jaw Width	Weight each	Order Code
BS120	4mm	5 x 70	10	120	8.3kg	-1200K
BS200	6mm	7 x 70	13	200	19.0kg	-2000K
BS406	8mm	10 x 100	16	200	43.0kg	-3000K

Type	Weight each	Order Code
Top Blade for ATL-448-1200K Shear	445g	ATL-567
Bottom Blade for ATL-448-1200K Shear	250g	-3100K
Top Blade for ATL-448-2000K Shear	1.4kg	-3150K
Bottom Blade for ATL-448-2000K Shear	790g	-3160K
Top Blade for ATL-448-3000K Shear	430g	-3200K
Bottom Blade for ATL-448-3000K Shear	220g	-3210K

JHL Single Knurl Toolholder

Machine ground high grade steel, black mottle finish. Fitted as standard with medium pitch straight hand knurl. Right, left and checkered also available separately, see table below. For use with knurl size 3/4" x 1/4" x 1/4".



Size	Knurls Fitted	Weight each	Order Code
1/2" x 1/2" x 4"	-1510B	140g	JHL-450 -8050F

3/4" x 1/4" x 1/4" Knurls to Suit Toolholder Above

Capacity (mm)	Weight each	Order Code JHL-450		
		Coarse	Medium	Fine
Straight	10g	-1500A	-1510B	-1520C
Right Hand	10g	-1600A	-1610B	-1620C
Left Hand	10g	-1700A	-1710B	-1720C
Checkered	10g	-1800A	-1810B	-1820C

Six Knurl Toolholder

Machine ground high grade steel, black mottle finish. Revolving head.

For use with knurl size 3/4" x 3/8" x 1/4".



Size	Knurls Fitted	Weight each	Order Code
1/2" x 1 1/8" x 6 1/2"	-1110B & -1210B	640g	JHL-450 -8000A

Two Knurl Toolholder

Machine ground high grade steel, black mottle finish. Self-adjusting head. For use with knurl size 3/4" x 3/8" x 1/4".



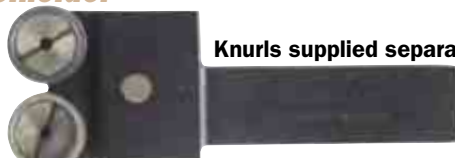
Size	Knurls Fitted	Weight each	Order Code
1/2" x 7/8" x 6 1/2"	-1110B & -1210B	290g	JHL-450 -8020C

3/4" x 3/8" x 1/4" Knurls to Suit Toolholders Above

Capacity (mm)	Weight each	Order Code JHL-450		
		Coarse	Medium	Fine
Straight	10g	-1000A	-1010B	-1020C
Right Hand	10g	-1100A	-1110B	-1120C
Left Hand	10g	-1200A	-1210B	-1220C
Checkered	10g	-1300A	-1310B	-1320C

Two Knurl Toolholder

Side knurling up to a face or shoulder. For use with knurl size 25 x 10 x 16mm.



Knurls supplied separately

Size	Knurls Fitted	Weight each	Order Code
20 x 25 x 85mm	-3110B & -3210B	900g	JHL-450 -8040E

25 x 10 x 16mm Knurls to Suit Toolholder Above

Capacity (mm)	Weight each	Order Code JHL-450		
		Coarse	Medium	Fine
Straight	10g	-3000A	-3010B	-3020C
Right Hand	10g	-3100A	-3110B	-3120C
Left Hand	10g	-3200A	-3210B	-3220C

Two Knurl Toolholder

Machine ground high grade steel, black mottle finish. Self-adjusting head. For use with knurl size 5/8" x 5/16" x 7/32".



Knurls supplied separately

Size	Knurls Fitted	Weight each	Order Code
3/8" x 7/8" x 5 1/2"	Supplied separately	390g	JHL-450 -8030D

5/8" x 5/16" x 7/32" Knurls to Suit Toolholder Above

Capacity (mm)	Weight each	Order Code JHL-450		
		Coarse	Medium	Fine
Straight	10g	-2000A	-2010B	-2020C
Right Hand	10g	-2100A	-2110B	-2120C
Left Hand	10g	-2200A	-2210B	-2220C
Checkered	10g	-2300A	-2310B	-2320C

Six Knurl Toolholder

Machine ground high grade steel, black mottle finish. Revolving head. For use with knurl size 5/8" x 3/16" x 1/4".



Knurls supplied separately

Size	Knurls Fitted	Weight each	Order Code
1/2" x 7/8" x 6 1/2"	-2610B & -2710B	930g	JHL-450 -8010B

5/8" x 3/16" x 1/4" Knurls to Suit Toolholder Above

Capacity (mm)	Weight each	Order Code JHL-450		
		Coarse	Medium	Fine
Straight	10g	-2500A	-2510B	-2520C
Right Hand	10g	-2600A	-2610B	-2620C
Left Hand	10g	-2700A	-2710B	-2720C
Checkered	10g	-2800A	-2810B	-

INDEXA Self-Centring Geared
Scroll Lathe Chucks

Produced to a well proven design for universal application. Scrolls are forged, balanced and hardened. Thread flanks are ground on both sides. All models have grease nipples for easy lubrication and are supplied with two sets of solid jaws - internal and external stepped.



**Cast Iron 3 Jaw Plain Back Chuck
DIN 6350 (form A).**

Three jaw plain back with adaptor recess.

Type 3204
Rear mounting.

Type 3274
Front mounting.



NEW

Chuck Size (mm)	Through Hole	Weight each	Order Code IND-475	
			Type 3204 Rear Mount	Type 3274 Front Mount
80	16	1.51kg	-1010K	-
85	18	1.70kg	-	-1220K
100	20	2.98kg	-1030K	-
125	32	4.84kg	-1040K	-1240K
160	42	9.78kg	-1060K	-1260K
200	55	16.0kg	-1070K	-1270K
250	76	27.9kg	-1080K	-1280K
315	103	47.5kg	-1090K	-1290K

**Cast Iron 3 Jaw Plain Back Chuck
DIN 6350 (form A).**

Three jaw plain back with adaptor recess.

Type 3275
Front mounting, reversible jaws.



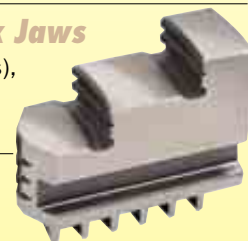
NEW

Chuck Size (mm)	Through Hole	Weight each	Order Code IND-475
160	42	10.8kg	-1460K
200	55	17.5kg	-1470K

Outside Type Hard Lathe Chuck Jaws

For self-centring lathe chucks (3200 series), supplied in sets of 3.

Chuck Dia (mm)	Order Code IND-490
125	-1030K
160	-1050K
200	-1060K
250	-1070K



KENNEDY Morse Taper
QUALITY INDUSTRIAL TOOLING Tooling

A range of quality traditional workholding equipment. Manufactured from high quality steel and case hardened all over. All sleeves and sockets are fully hardened and ground internally and externally. **ISO 238 BS 1660 : 2.**



Drill Sleeves

To allow taper shank tooling to be used in machine spindles with a larger taper shank.



Taper Inside x Outside	Length (mm)	Weight each	Order Code KEN-482
1 x 2 MT	95	110g	-2120K
1 x 3 MT	97	220g	-2130K
1 x 4 MT	120	560g	-2140K
1 x 5 MT	152	1500g	-2150K
2 x 3 MT	110	200g	-2230K
2 x 4 MT	123	490g	-2240K
2 x 5 MT	155	1500g	-2250K
3 x 4 MT	140	430g	-2340K
3 x 5 MT	155	1200g	-2350K
4 x 5 MT	170	1100g	-2450K
4 x 6 MT	215	3600g	-2460K
5 x 6 MT	225	2800g	-2560K

Extension Sockets



Taper Inside x Outside	Length (mm)	Weight each	Order Code KEN-482
1 x 1 MT	145	275g	-4110K
1 x 2 MT	160	290g	-4120K
2 x 1 MT	175	300g	-4210K
2 x 2 MT	175	390g	-4220K
2 x 3 MT	194	710g	-4230K
3 x 2 MT	194	620g	-4320K
3 x 3 MT	230	750g	-4330K
3 x 4 MT	255	1400g	-4340K
4 x 3 MT	255	1500g	-4430K
4 x 5 MT	300	3000g	-4450K
5 x 4 MT	300	2500g	-4540K

Drill Drifts

To release Morse Taper Tooling without damaging machine socket or tools.



To Release Morse Taper	Weight each	Order Code KEN-482
0	40g	-9500K
1 & 2	80g	-9520K
3	220g	-9530K
3 & 5	380g	-9540K
5 & 6	760g	-9560K

Drill Sleeve & Drift Set

Set of three drill sleeves 1 - 2, 2 - 3, 3 - 4MT. Fully hardened and ground inside and out. Two drill drifts to release 1MT/2MT and 3MT/4MT.



No. of Pieces	Description	Weight Set	Order Code KEN-482
5	As above		-9900K

Workshop Equipment

KENNEDY Standard Duty
QUALITY INDUSTRIAL TOOLING® **Revolving Centres**

Manufactured from high alloy steel hardened and tempered then precision ground externally. Precision bearings are fitted as standard and the centres have a 60° point. Mounting Tapers are accurate to **DIN228** Form A, Tolerance Class AT5.



Maximum runout:
No.1 to 4 taper: 0.005mm.
No.5 to 6 taper: 0.010mm.

Morse Taper	Max rpm	Radial Load (rpm)		Axial Load (rpm)		Weight each	Order Code
		@100 (kgf)	@max (kgf)	@100 (kgf)	@3000 (kgf)		
No.1	7000	80	32	250	50	0.37kg	-1010K
No.2	7000	200	55	275	60	0.43kg	-1020K
No.3	6000	300	70	400	70	0.67kg	-1030K
No.4	5000	600	75	500	125	1.23kg	-1040K
No.5	4000	800	280	570	230	3.00kg	-1050K

Heavy Duty Revolving Centres

Manufactured from high alloy steel, heat treated and precision ground. Fitted with heavy duty precision taper roller and thrust bearings to support both radial and axial loads. The 60° point is ground after assembly for absolute concentricity. Designed for heavy load and high production applications where durability is the main criteria. Mounting Tapers are accurate to **DIN228** Form A, Tolerance Class AT5.



Maximum runout:
No.2 to 5 taper: 0.005mm.
No.6 taper: 0.010mm.

Morse Taper	Max rpm	Radial Load (rpm)		Axial Load (rpm)		Weight each	Order Code
		@100 (kgf)	@max (kgf)	@100 (kgf)	@3000 (kgf)		
No.2	5500	260	82	580	190	0.59kg	-2020K
No.3	4000	480	180	810	270	1.35kg	-2030K
No.4	3000	800	270	1300	400	2.69kg	-2040K
No.5	2500	1050	500	1600	490	5.64kg	-2050K

Industrial Solid Centres

Manufactured from high quality tool steel, hardened and ground with 60° point and spanner flats as standard. Mounting Tapers are accurate to **DIN228** Form A, Tolerance Class AT5.



Morse Taper	Diameter (mm)	Across Flats	Length (mm)	Weight each	Order Code
No.1	12.20	10	78	60g	-1010K
No.2	18.00	13	90	200g	-1020K
No.3	24.10	19	138	300g	-1030K
No.4	31.60	24	138	450g	-1040K

ATLAS Standard Duty
WORKHOLDERS® **Revolving Centres**

Manufactured from high alloy steel hardened and tempered then precision ground externally. Precision bearings are fitted as standard and the centres have a 60° point.

Maximum runout: 0.005mm.



REVOLVING & SOLID CENTRES

Standard Duty Interchangeable Revolving Centre Sets



Manufactured from high alloy steel, precision ground internally and externally with pre-lubricated bearings. A versatile revolving centre with interchangeable points for a wide variety of applications. Ideal for toolroom or manufacture of small turned components. Points fit into body by means of a taper and are removed by use of the drift key supplied. All mating surfaces are precision ground and the set is supplied in a varnished wooden storage box.

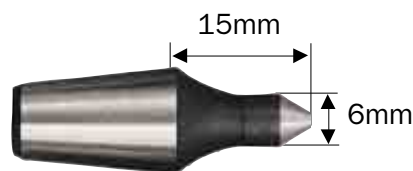
Morse Taper	Axial Load at 100rpm	Radial Load at 100rpm	Max rpm	Max Runout
No. 2	200Kgf	100Kgf	4000	0.005mm
No. 3	400Kgf	200Kgf	3000	0.005mm



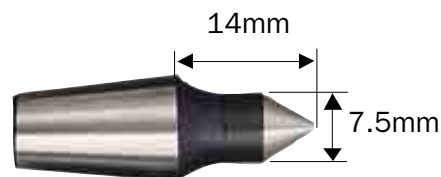
Morse Taper	Length (mm)	Diameter (mm)	Weight each	Order Code
No.2	124	33	0.85kg	-1320K
No.3	152	42	1.10kg	-1330K

Interchangeable Points

A complete range of interchangeable points to complement the revolving centre sets.



60° Point: 1 off



60° Point: 1 off

Description	Weight each	Order Code
60° Point x 6mm Dia.	20g	-1020K
60° Point x 7.5mm Dia.	20g	-1030K

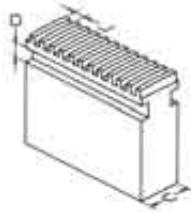


Workshop Equipment

GROUP 490 LATHE CHUCK JAWS

KENNEDY *Scroll*
QUALITY INDUSTRIAL TOOLING **Jaws**

To Suit Pratt Burnard Chucks
For Standard, Super Precision, Griptru.
All steel (type 78), Pratt Burnard old type
(Inch) and Hardinge chucks.



Chuck Type	Jaw Code (Refer to Diameter)
Standard, Griptru, Super Precision	B, C, E, G, J, M, P, Q, R
All Steel (Type 78)	L, O
Burnard	I, K, N
Pratt Old Type	H
Hardinge/Pratt Type	F

3 Jaw Sets

EXTENDED RANGE



3 PIECES

4 and 6 jaw sets available on request

Jaw Code	Chuck Diameter	Dimensions (mm)			Order Code
		C	D	J	KEN-490
EJC	100mm	14.10	4.85	5.08	-1030K
EJE	125mm	15.75	8.03	6.35	-1050K
EJF	125mm	14.10	4.85	6.35	-1060K
EJG	160mm	18.79	8.03	6.35	-1070K
EJJ	200mm	20.62	9.53	8.46	-1100K
EJL	230mm	25.40	9.52	8.46	-1120K
EJM	250mm	25.40	11.10	8.46	-1130K
EJP	315mm	28.19	12.88	8.46	-1160K

Scroll Jaws

To suit Pratt Burnard metric chucks
(Standard Accuracy and Super Precision).

3 Jaw Sets

3 PIECES



4 and 6 jaw sets available on request

Jaw Code	Chuck Diameter	Dimensions (mm)			Order Code
		C	D	J	KEN-490
EK16	160mm	18	7	6	-6030K
EK20	200mm	22	8	8	-6040K
EK25	250mm	25	8	8	-6050K
EK32	315mm	32	12	10	-6060K

Scroll Jaws

To suit Toolmex/
Bison chucks.

3 Jaw Sets

3 PIECES



Jaw Code	Chuck Diameter	Dimensions (mm)			Order Code
		C	D	J	KEN-490
EN10	100mm	15	6	6	-6200K
EN13	125mm	20	8	7	-6220K
EN16	160mm	20	8	8	-6230K
EN20	200mm	25	10	8	-6240K
EN25	250mm	28	12	9	-6250K
EN32	315mm	32	12	10	-6260K

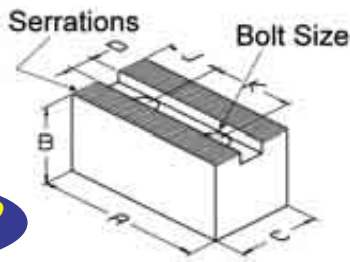
Serrated Soft Jaws

To suit metric serrated power chucks (Kitagawa/Howa/Matsumoto/Pratt Burnard/SMW/Autoblok etc.).

3 Jaw Sets

3 PIECES

EXTENDED RANGE



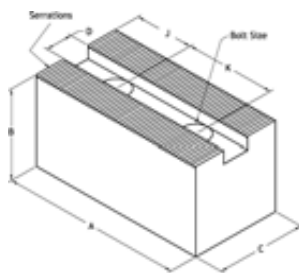
Jaw Code	Chuck Diameter	Dimensions (mm)				K/J Bolt	Serrations	Order Code
		A	B	C	D			KEN-490
BO06	165mm	72	38	32	12	20/15/M10	1.5mm x 60	-5560K
DJ06	165mm	72	57	32	12	20/15/M10	1.5mm x 60	-5860K
PT06	165mm	82	32	32	12	20/15/M10	1.5mm x 60	-2060K
BO08	210mm	95	44	32	14	25/25/M12	1.5mm x 60	-5580K
DJ08	210mm	95	70	32	14	25/25/M12	1.5mm x 60	-5880K
PT08	210mm	102	44	32	14	25/20/M12	1.5mm x 60	-2080K
BO10	254mm	110	40	40	16	30/30/M12	1.5mm x 60	-5600K
DJ10	254mm	110	80	40	16	30/30/M12	1.5mm x 60	-5900K
DK10	254mm	90	60	40	16	30/21/M12	1.5mm x 60	-5970K
PT10	254mm	125	40	40	16	30/30/M12	1.5mm x 60	-2100K
DK11	254mm	110	60	40	16	30/21/M12	1.5mm x 60	-5980K
BO12	315mm	130	50	50	18	30/40/M14	1.5mm x 60	-5620K
DJ12	315mm	130	80	50	18	30/40/M14	1.5mm x 60	-5920K
BR13	315mm	130	50	50	21	30/40/M16	1.5mm x 60	-5700K
DJ13	315mm	130	80	50	21	30/40/M16	1.5mm x 60	-5930K
BO15	380mm	165	76	64	22	43/37/M20	1.5mm x 60	-5650K
DJ15	380mm	165	127	64	22	43/37/M20	1.5mm x 60	-5950K

Serrated Soft Jaws

To suit inch serrated power chucks (Berg/Forkardt/Rohm/Pratt Burnard/SMW/Autoblok etc.).

3 Piece Set

3 PIECES



Jaw Code	Chuck Diameter	Dimensions (mm)				K/J Bolt	Serrations	Order Code
		A	B	C	D			KEN-490
BN90	165/200mm	90	60	40	17.0	22/15/M12	1/16" x 90	-5090K
BN12	250/315mm	120	80	50	21.0	28/20/M16	1/16" x 90	-5120K
BN23	400/500/630mm	155	89	64	25.5	35/30/M20	3/32" x 90	-5230K

Workshop Equipment

KENNEDY *Huntington Type*
QUALITY INDUSTRIAL TOOLING® *Wheel Dressers*

With improved quick release cutter wheel design which reduces down-time when changing wheels. Ergonomically designed cast iron handle and case hardened, polished cutters. Suitable for cleaning, sharpening and truing grinding wheels.



Type	For Wheel Diameter	Weight each	Order Code KEN-495
No.0	Up to 510mm (20")	0.85kg	-0100K
No.1	Up to 760mm (30")	1.00kg	-0110K
No.2	Over 760mm (30")	2.50kg	-0120K

Replacement Wheel Sets



Description	Weight per 10 Sets	Order Code KEN-495
Spare Wheels for Type No.0	0.45kg	-1000K
Spare Wheels for Type No.1	0.53kg	-1010K
Spare Wheels for Type No.2	2.90kg	-1020K

Replacement Parts

Description	Weight per 10	Order Code KEN-495
Side Bush for Type No.0		-2000K
Cutter Bush for Type No.1		-2010K
Cutter Bush for Type No.2		-2020K
Spare Spindle for Type No.0		-3000K
Spare Spindle for Type No.1		-3010K
Spare Spindle for Type No.2		-3020K
Side Washer for Type No.1		-4010K
Side Washer for Type No.2		-4020K



Diamond Point Wheel Dressing Tools

Single Point Tools

For general use with diamond point.
1/2" x 6" holder size.



Product Number	Diamond Size, Carat	For use on Wheel	Weight each	Order Code KEN-496
SP50	0.50	180mm (7")	160g	-0050K
SP75	0.75	255mm (10")	160g	-0070K
SP100	1.00	355mm (14")	170g	-0100K
SP150	1.50	460mm (18")	170g	-0150K
SP200	2.00	600mm (24")	170g	-0200K

SENATOR *Diamond*
QUALITY TOOLING® *Dressers*



For truing and dressing grinding wheels. Truing is the process of aligning the periphery of the grinding wheel so that it runs concentric with its axis of rotation. This allows accurate and precise relative motion between the grinding wheel and the part being ground. Dressing removes dulled abrasives and foreign material that has been embedded into the wheel. This allows the wheel to cut properly. These tools are mainly used to true straight-faced wheels.

3 Piece Set

For medium duty use. 1/2" dia. x 6" (**-9100K**).

Wheel Size (mm)	Carat Size	Weight each	Order Code SEN-496
Up to 150	0.25		-0250K
Up to 180	0.50		-0500K
Up to 250	0.75		-0750K
Up to 350	1.00		-1000K
Up to 500	1.50		-1500K
Up to 600	2.00		-2000K
3 Piece Set 0.5, 0.75 & 1 Carat Set			-9100K