

GERARDI

5

Single, Double
or Self-centering!

FMS

Morse e Cubi / *Vises & Vise Towers*

INDICE - INDEX

Art.	pages 5.
62	50
62K	67 - 69
81P	50
84U	31
90	35
99A	67 - 69
99B	67 - 69
99H	67 - 69
99S	67 - 69
220 G01	58
220 G02	58
220 G11	58
247T	35
375	61
512	57
296	6
547G	58
547K	58
566	62
571	62
800	38
800A	38
800B	38
800C	42
800D	38
800E	61
800G	42
800I	61
800Z	38
801	50
801G	61
801H	61
801I	61
801S	61
802	12 - 14 - 16 - 20 - 24 - 28 - 32 - 36 - 38
804	49
805	54
805A	54
805B	54
805C	54
805D	55
805DT	55
805E	55
805F	18 - 54 - 55
805G	18 - 55
805H	55
805I	55
805J	55
805K	55
805L	55
805M	55
805N	54 - 55
805O	54 - 55
805P	55
805Q	55
805R	55
805T	55
805U	31
805UA	31
805V	35
805VA	35
806	22
806A	22
806B	23
806C	23
806D	23
806E	23
806F	22
806G	23
806H	23
806M	23
806K	23
806SLD	23
806SLE	23
807	22
807A	22
808	22
808A	22
808B	22
810	56
810A	56
810B	56
810D	56
810DT	57
810E	57
810J	56 - 57
810K	57
810L	57
810M	57
810O	18 - 56 - 57
810P	57
810Q	31
810QA	31
810R	57
810T	57
810U	31
810UA	31
810UZ	31
810V	57
810W	27
810WA	27
810X	18 - 27
810XA	27
810Y	27
810YA	27
810Z	27
812	31
812A	31
812B	31
812C	31
813	31
813A	31
813C	31
814	56
815	31
815A	31
815C	31
818	52
821	53
822	53
823	59
823B	59
825	59
825A	61
825B	59
825C	59
827A	60
828A	60
829A	52
830	52
831	59
832	59
833	59
834	59
835	60
836	60
837	60
838	60
850B	61
850C	61
850E	61
850H	61
850P	61
850T	61
852	60
853	60
855	12
855A	12
855C	44
855D	12
855E	12
855F	12
860	14
860C	44
860D	14
860E	14
860F	14
863	16
863C	46
863D	16
863E	16
863F	16
864	18
865	20
865D	20
865E	20
865F	20
866	24
866D	24
866E	24
866F	24
867	28
867D	28
867E	28
867F	28
868	32
868D	32
868E	32
868F	32
870	36
870A	54
870C	46
870D	36
870E	36
870F	36
882A	38
890	62 - 65
890K/1	62
890K/2	63
890K/3	63
890K/4	64
891	62
892	62
900	40
900Y	40
983	3
DPG250	66
DIVIGER 205	68

VALIGETTA DI CAMPIONATURA FMS (Art.860)
FMS SAMPLE KIT CASE (Art.860)

Art. 983



Morsa / Vise Art. 860

Cod. 0.98.30000

Art. 860 - All'Interno - Inside:





SIMBOLOGIA DATI TECNICI
TECHNICAL DATA ICONS

GANASCE / JAWS


Piane / Straights


A gradino / With step


Oscillanti / Floating


Oscillanti con inserti regolabili / Floating with inserts adjustable


Prismatiche / Prismatic

POSSIBILITÀ / POSSIBILITY


Serraggio singolo / Single clamping


Serraggio doppio / Double clamping


Predisposizione Zero Point / Zero Point Ready


Cubi-morsa / Vise tower


Divisore Automatico / Automatic dividing head


Divisore Meccanico / Mechanical dividing head

PIASTRE GANASCE / JAW PLATES


Discendente / Pull down


Piana / Straight


Cambio rapido manuale / Quick manual change


GRIP / GRIP


Inserti GRIP / Inserti GRIP

PAGINE / PAGES


Lavorazioni a 5 assi / 5 axis machining


Accessori & Ricambi / Accessories & Spare Parts


Istruzioni corretto utilizzo / Instruction for a proper use


Diagrammi forze di serraggio / Clamping force diagrams


Sistema Idraulico / Hydraulic System

OPZIONI LAVORAZIONI EXTRA
OPTIONS FOR EXTRA MACHINING

Nei codici, **FMS** si riferisce agli articoli dei gruppi 5, 6 e 7.
In codes, **FMS** refers to articles in groups 5, 6 and 7.

Lavorazione extra / Extra machining	Cod.
AGGIUNTA di un foro calibrato / ADDITION of a calibrated hole	MAN-010-FMS
AGGIUNTA di una chiavetta calibrata / ADDITION of a calibrated key-way	MAN-020-FMS
PREDISPOZIONE SEMPLICE / SIMPLE SET UP	MAN-030-FMS
PREDISPOSIZIONE & MONTAGGIO COMPLETO / COMPLETE SET UP & MOUNTING	MAN-040-FMS
MONTAGGIO PARZIALE / PARTIAL ASSEMBLY	MAN-050-FMS

Lavorazione extra / Extra machining	Cod.
MONTAGGIO SEMPLICE / SIMPLE ASSEMBLY	MAN-060-FMS
MONTAGGIO ed ALLINEAMENTO (Standard) / (Standard) ASSEMBLY and ALIGNMENT	MAN-070-FMS
MONTAGGIO VERTICALE / COMPLETE VERTICAL ASSEMBLY	MAN-080-FMS
ALLINEAMENTO e CONTROLLO tramite DEA / ALIGNMENT and CONTROL by DEA \ CMM	MAN-090-FMS
TABULATO controllo DEA / PRINTOUT DEA control	MAN-100-FMS

Vedi pagina 5.70 per esempi applicativi - See page 5.70 for application examples

Morse e cubi morsa / Vises & vise-towers

FMS SERIES

Precisione / Accuracy
±0,02mm

HRC

Durezza / Hardened
HRC 58±2

Un sistema modulare flessibile con centinaia di ganasce disponibili

A Flexible modular system with hundreads of jaws available

Nata espressamente per i centri di lavoro, la gamma FMS permette ottimizzazioni di serraggio con riferimenti precisi in spazi contenuti, usure inesistenti e rigidità impensabile (spessore della base raddoppiato), possibilità di bloccare più pezzi contemporaneamente con l'ausilio di sistemi meccanici, pneumatici, elettrici o idraulici. Tutte sono disponibili/predisposte sia per piazzamenti verticali che orizzontali. Serraggi di qualsiasi lunghezza. La caratteristica (Brevettata) che meglio contraddistingue questa serie di morse consiste nella possibilità di trasformare ogni morsa singola (cioè adibita al serraggio di un singolo pezzo) in una morsa autocentrante con bloccaggio concentrico dall'esterno all'interno e viceversa e in morsa doppia tramite la semplice sostituzione delle ganasce sul corpo base universale. Tutto ciò ne suggerisce l'impiego in situazioni produttive caratterizzate da lotti di pezzi estremamente diversi fra loro riducendo tempi di set-up e garantendo un'accurata ripetibilità di posizionamento e quindi di precisione migliorando l'efficienza globale del sistema produttivo.

Born to be dedicated to machining centres, FMS series of vises allow workholdings with perfect alignment in a space saving design, extremely high wear resistence, with deflection reduced 2 times in respect to the STD modular vises (base thickness doubled), possibility to clamp more pieces simultaneously with mechanic, hydraulic pneumatic or electric devices. You can use them both for vertical and horizontal clamping without any price charge. Grip any work lenght. The feature (Pathented) which identifies this line of vises consists in the possibility to trasform each single vise (1 piece clamping) in a self-centering vise with possibility to block from outside to inside and viceversa and in a double vise through the simple substitution of the jaws on the universal vise body base. All that suggests their use in the production of lots of highly different pieces reducing set-up times and assuring very accurate repetability of workpiece position and precision, increasing the global efficiency of the production process.

SCAN IT TO SEE
THE WEB PAGE

5 YEARS WARRANTY

ESTREMA VERSATILITÀ
EXTREME VERSATILITY

•3 posizioni per la ganascia fissa; •Serraggio dall'esterno all'interno e viceversa; •Posizionamento verticale-orizzontale-laterale; •Collegamento: fianco a fianco, dorso a dorso, fianco a dorso; •Possibilità illimitata per ganasce speciali; •Sostituzione semplice e precisa delle ganasce; •Elemento di prolunga per pezzi fuori misura; •Sistema di serraggio meccanico, idraulico, pneumatico elettrico o con moltiplicatore di potenza, tramite comando manuale, a pedale o mediante pulsante elettrico (vedi pag. 12); •Costruzione solida e compatta e massima apertura rispetto alla sua lunghezza; •Flessioni praticamente ridotte di due volte rispetto alle precedenti morse modulari standard; •Accurata ripetibilità di posizionamento del pezzo da lavorare; •Precisioni geometriche con tolleranze entro 0,02 mm; •Protezione integrale dalla penetrazione di corpi estranei tramite piastre scorrevoli; •Possibilità di trasformazione di ogni morsa singola in morsa autocentrante o in morsa doppia tramite la semplice sostituzione delle ganasce sul corpo base universale. (ESEMPI APPLICATIVI A PAGINA 5.76).

•3 positions for the fixed jaw; •Outside to inside clamping and viceversa; •Vertically, horizontally and sideway vise positioning; •Side to side, back to back and back to side vise positioning; •Unlimited special jaws; •Simple and precise exchange of jaws; •Extension element for extra-long pieces; •Mechanic, hydraulic or pneumatic or electrical clamping system or with pressure multiplier, through manual, pedal or push botton board control (see page 12); •Space saving design, solid construction and maximum blocking ratio to total lenght; •Deflection reduced two times with respect to the STANDARD modular vises; •Very accurate repetability of workpiece position; •Geometrical accuracy with tollerances within 0,02 mm; •Integral protection from chips and dirty through sliding protection; •Possibility to trasform each single vise in a self-centering vise with possibility to block from outside to inside and vice versa and in a double vise through the simple substitution of the jaws on the universal vise body base. (APPLICATION EXAMPLES ON PAGE 5.76)







3 Morse in Una
3 Vises in One

Possibilità di trasformare ogni morsa singola in una morsa autocentrante con bloccaggio concentrico dall'esterno all'interno e viceversa e in morsa doppia tramite la semplice sostituzione delle ganasce sul corpo base universale.

Possibility to trasform each single vise in a self-centering vise with the possibility to block from outside to inside and viceversa and in a double vise through the simple substitution of the jaw on the universal vise body base.





Altissima rigidità
Highest rigidity

Base della morsa con una sezione doppia per garantire maggiore rigidità. Flessioni ridotte di due volte rispetto alle normali morse modulari standard. Disponibili cubi monoblocco.

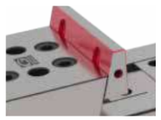
Higher vise base in order to guarantee a better rigidity. Bending reduced two times with respect to the standard modular vises. Available solid vise towers



Vite a doppio filetto
Double thread spindle

Vite principale (completamente protetta) con filetto destro e sinistro e slitte guidate lunghe quanto il corpo base con più chiavette per ganasce mobili

Completely protected main spindle with left and right thread and guided slides long ad the vise base with multiple movable jaw positions

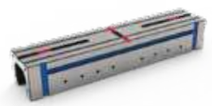




Riconfigurazione Rapidissima
Quickest Vise Resetting

Grazie alla piastra ganascia intercambiabile manualmente tramite sistema a pettine

Thanks to the quick interchangeable jaw plate through ground comb system

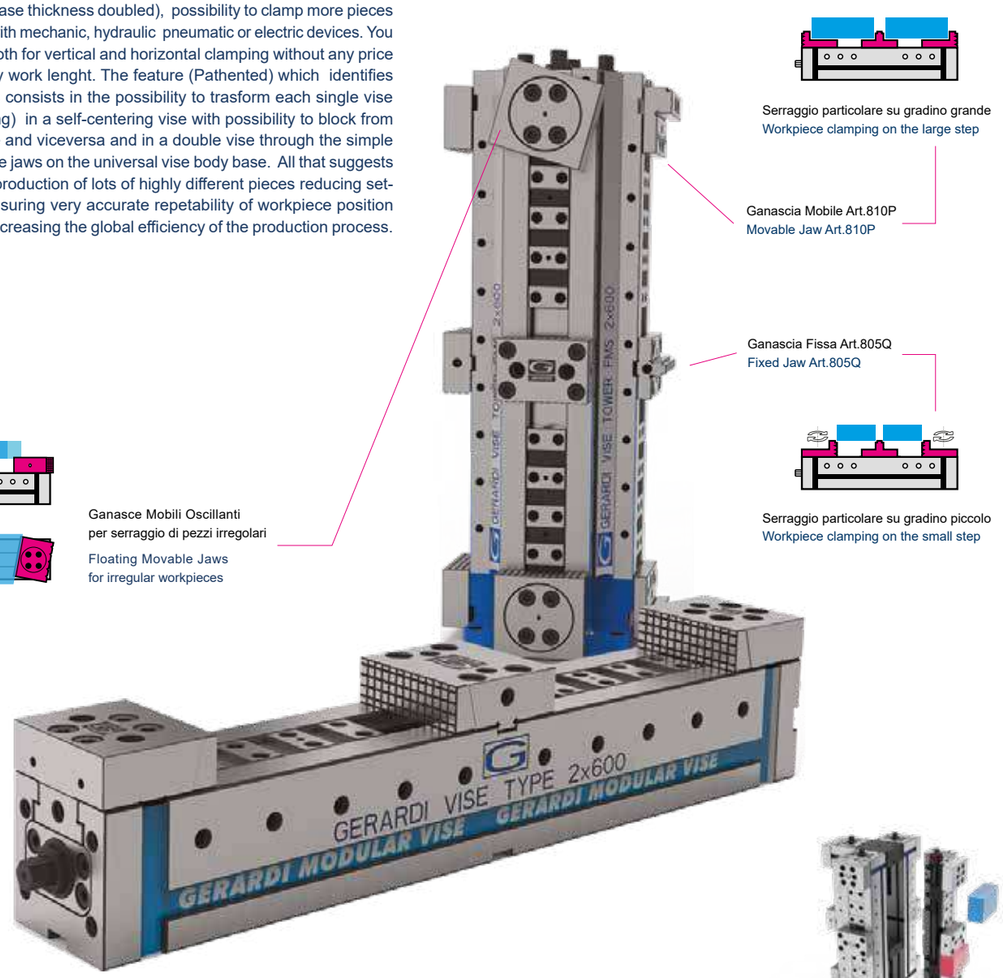


Chiavette di posizionamento
Positioning Keyways

Chiavette longitudinali e trasversali sia sulla base per il posizionamento orizzontale, sia in testa per il posizionamento verticale.

Longitudinal and cross keyways both on the base bottom surface for horizontal positioning and on the side for vertical positioning

Singole, Doppie o Autocentranti !
Single, Double or Self-centering !



Sistema a terza mano - Third hand service

Consente il carico e serraggio lieve del primo particolare da lavorare mentre viene caricato il secondo di dimensione maggiore. Molto utile con l'utilizzo verticale della morsa.

It allows the first workpiece loaded to be clamped lightly while the second workpiece is being loaded.Such device is useful especially with the vise vertically positioned

Staffe di ancoraggio / Vise holding clamps

NEW 2026

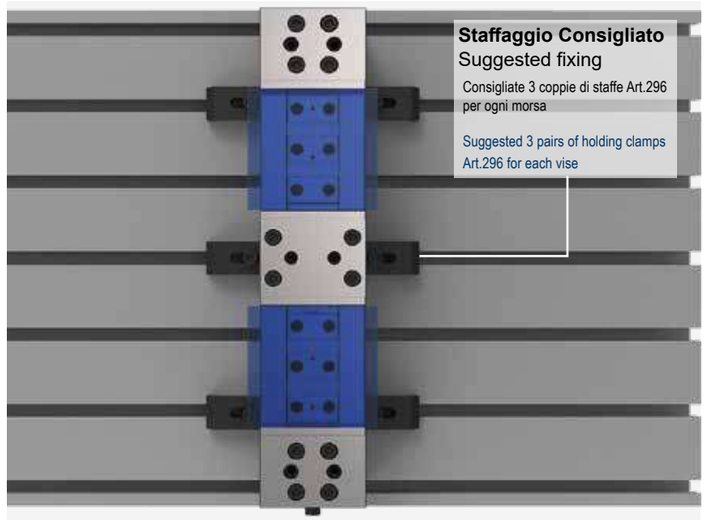
FMS

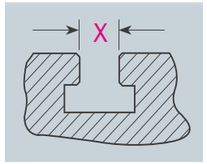
Coppia staffe di fissaggio Art.296, complete di vite e dado a “T”

Pair of vise holding clamps Art.296 complete of screw and “T” nuts

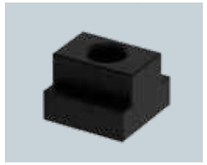
Esempio d’ordine per morsa tipo 3 su macchina con cave a T da 18mm: Art.296 T.3 X=18mm
Oppure con codice: 2.29.6300 X=18mm

Order example for Type 3 vise on machine with 18mm T-slots: Art.296 T.3 X=18mm
Also with code: 2.29.6300 X=18mm





Cava a T
T Slot
Specificare sempre la cava della vostra macchina
Always specify the machine T-slot dimension

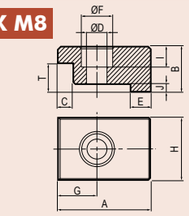


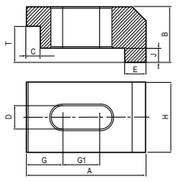
Art.287 (Pag.4.34)
Dadi a T - T Nuts
Per fissaggio morse alle cave a T della macchina
For vise clamping on the machine T-slots



Art.296
(Art.298 + Art.287)
Consigliate 3 coppie di staffe Art.296 per ogni morsa
Suggested 3 pairs of holding clamps Art.296 for each vise

Tipo (grandezza) Type (size)		1		1			2 - 3			4 - 5 - 6		
Art. 296 Coppia di staffe Holding clamps pair	Cava a T slot X	12	14	16	18	12*	14	16	16	18	20	18*	20	22	16	18	20	22	18*	20	22	16	18	20	22	18*	20	22
	T-nuts Ref. N°	8	9	10	11	12	13	14	20	21	22	32	39	40	20	21	22	23	32	39	40	20	21	22	23	32	39	40
	Filetto vite Screw thread	M8				M10			M12 *			M16			M12 *				M16			M12				M16 *		
1 X M8	A	50				50			50			50			76				76			86				86		
	B	24				24			24			24			30				30			40				40		
	C	6				6			6			6			6				6			10				10		
	Ø D	8,5				11			13			17			13				17			13				17		
	E	10				10			10			10			13				13			15				15		
	Ø F	14				-			-			-			-				-			-				-		
	G / G1	14				16/15			17,5/13			19/9			17/22				16/15			26/27				26/27		
	H	34				34			34			34			42				42			50				50		
	I	8				10			10			10			-				-			-				-		
	J	4				4			4			4			10				10			10				10		
	T ± 0,1	15				15			15			15			20				20			26				26		
	Cod.	2.29.61000 / M8				2.29.61000 / M10			2.29.61000 / M12			2.29.61000 / M16			2.29.63000 / M12				2.29.63000 / M16			2.29.65000 / M12				2.29.65000 / M16		





*Scelta consigliata - Suggested choice

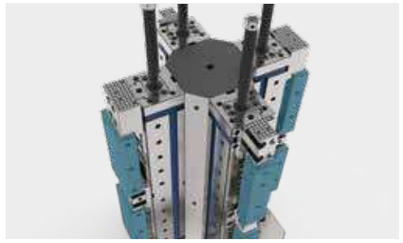
*Scelta NON consigliata - NO Suggested choice

Soluzioni personalizzate / Customized solutions

FMS

Soluzioni personalizzate a tutti i vostri problemi di serraggio

Customized solutions for all your clamping problems



Morse FMS automatizzate in verticale
FMS vises automated vertically mounted

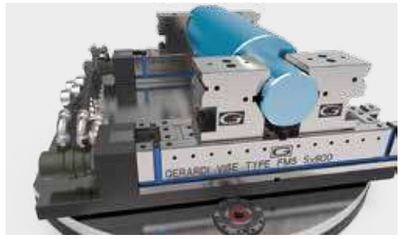
Gestione automatica di morse meccaniche grazie alla predisposizione per connessione con il robot. Lavorazioni del particolare su 3 lati con un unico serraggio evitando il riposizionamento ed una seconda ripresa del particolare da lavorare.
Automated machine setting thanks to the pre-fitting with robot connection. Workpiece machining on 3 sides with one clamping and so avoiding re-positioning and a second machining of the workpiece.



Morsa FMS con riduttore epicicloidale
FMS vise with epicyclic force reducer

Riduttore epicicloidale il quale consente di moltiplicare notevolmente la coppia sviluppata dal motore idraulico consentendo di arrivare a elevate forze di serraggio , fino a 480 kN

Epicyclic force reducer able to multiply greatly the torque generated by the hydraulic engine reaching a very high clamping force, maximum 480kN.



Serraggio automatico di grandi particolari tondi
Round workpieces automatic clamping

Sistema di serraggio meccanico con morse FMS per il serraggio di particolari tondi di grandi dimensioni controllato tramite centralina idraulica da CNC
Quick positioning and clamping with FMS vises of whole equipment on round Zero Point plate through pull-studs and centering pin.



Non solo per centri a 5 assi
Not only for 5th axis machines

Morsa autocentrante FMS su centro di lavoro verticale con ganasce personalizzate in alluminio.

Self Centering FMS vise with taylor made jaws aluminum mounted on Vertical CNC



Morse FMS in verticale con robot
FMS vises vertically mounted + robot

Assieme di morse FMS montate verticalmente su centro orizzontale gestite tramite robot anche per carico e scarico pezzi

FMS vises vertically mounted on horizontal machining center.
Both vise clamping and workpieces turnover are operated through automated robotic system.

TRE MORSE IN UNA
THREE VISES IN ONE

Acquista il modulo base universale. Una soluzione aperta per il lavoro di oggi pensando a quello di domani !

Buy the base body. A Versatile solution for present and future machining !

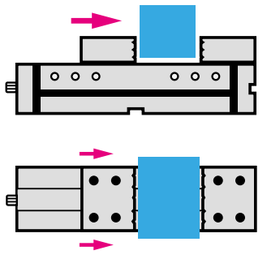
CORPO BASE Art.855
BASE BODY Art.855

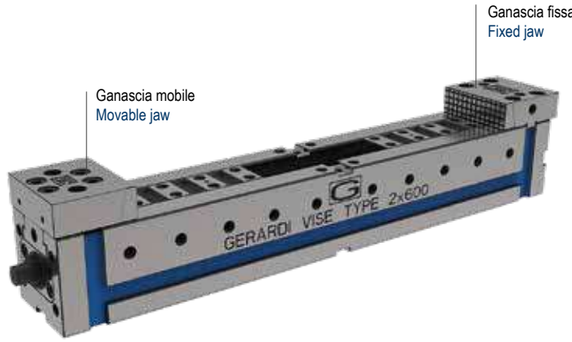
Modulo base universale
CENTINAIA DI GANASCE DISPONIBILI !!

Universal vise body module
HUNDREDS OF JAWS AVAILABLE !!

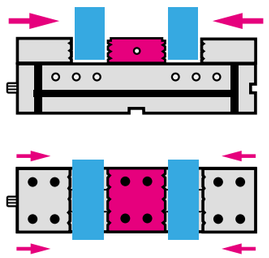


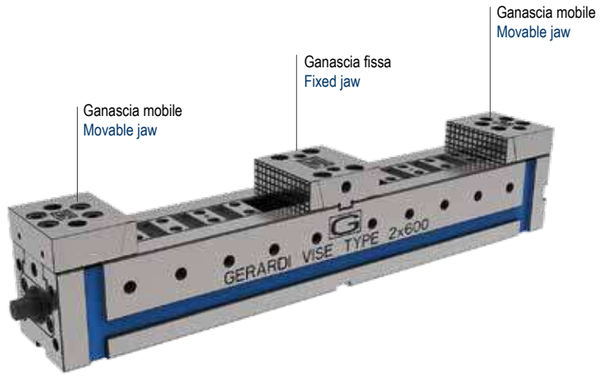
SERRAGGI SINGOLI
SINGLE CLAMPING



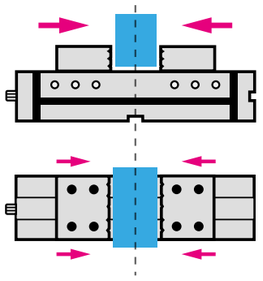


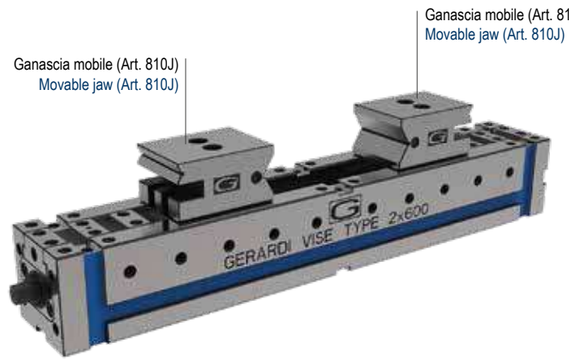
SERRAGGI DOPPI
DOUBLE CLAMPING



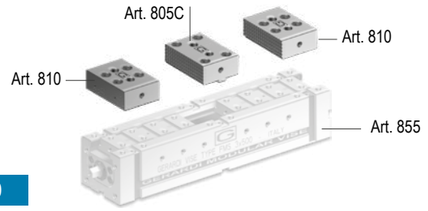


AUTOCENTRANTE
SELF-CENTERING

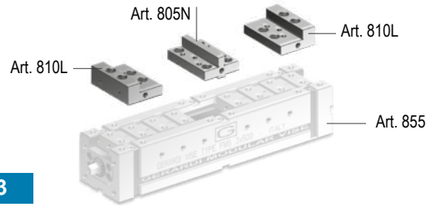




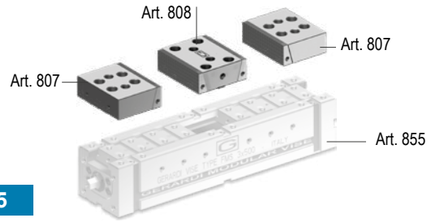
VERSIONI PER SERRAGGI DOPPI
DOUBLE CLAMPING CONFIGURATION



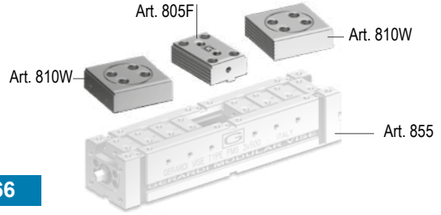
Art. 860



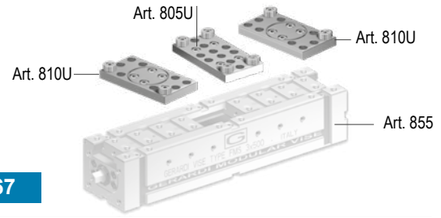
Art. 863



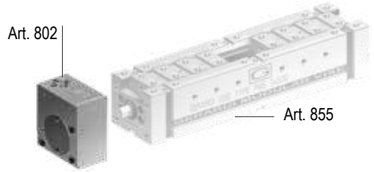
Art. 865



Art. 866

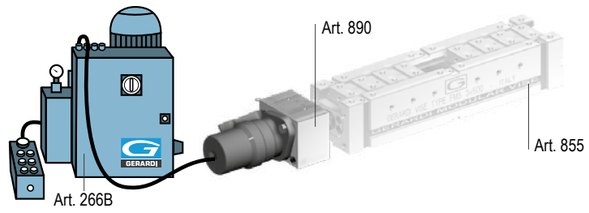


Art. 867



(Art. 855 + 802)

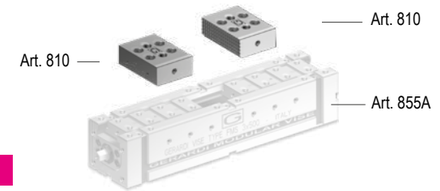
Art. 855D



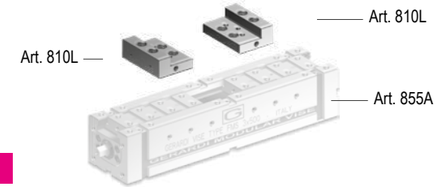
Art. 855F

(Art. 855 + 890 + 266B)

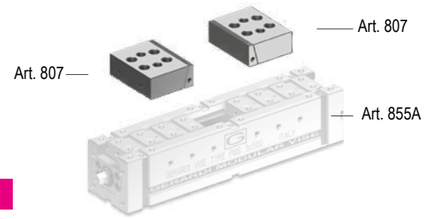
VERSIONI AUTOCENTRANTI
SELF-CENTERING TYPE



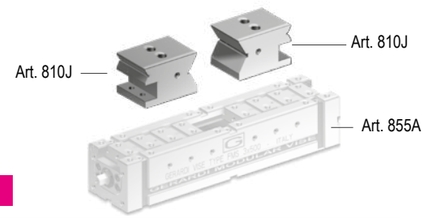
Art. 860A



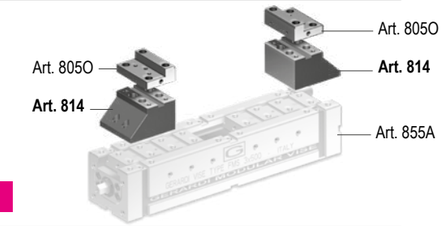
Art. 863A



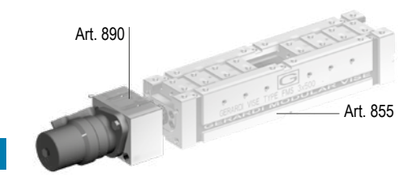
Art. 865A



Art. 870

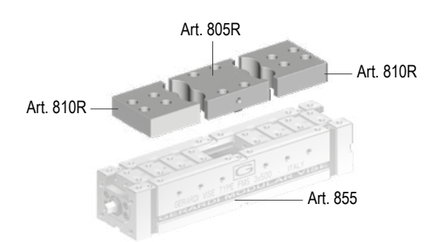


Art. 868A

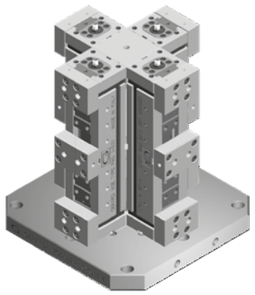


(Art. 855 + 890)

Art. 855E

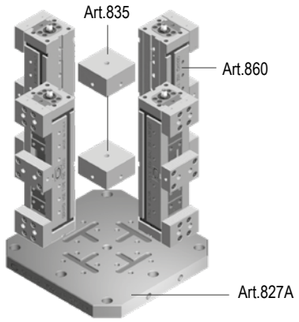


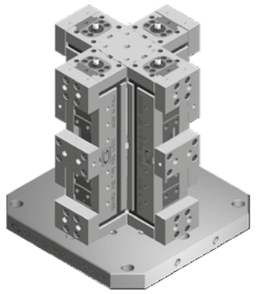
CUBI DI MORSE MONTATI A CROCE O DORSO A DORSO
VISE TOWERS CROSS OR BACK TO BACK MOUNTED



N° 4 MORSE FMS
montate a croce su piastra base (Art. 827A)
con distanziali (Art. 835)

N° 4 FMS VISES
cross-mounted on base plate (Art. 827A)
with spacers (Art. 835)



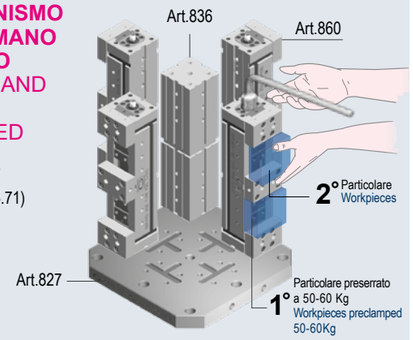


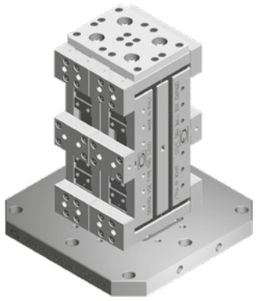
N° 4 MORSE FMS
montate a croce su piastra base (Art. 827A)
con supporto centrale (Art.836)

N° 4 FMS VISES
cross-mounted on base plate (Art.827A)
with center support (Art.836)

MECCANISMO TERZA MANO INCLUSO
THIRD HAND DEVICE INCLUDED

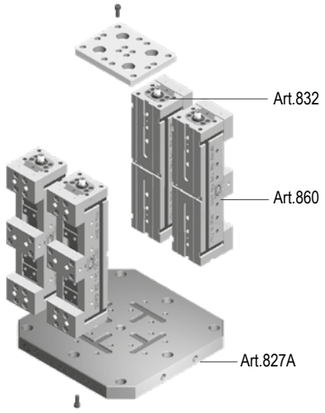
Art.850P
(Pag - Page 5.71)

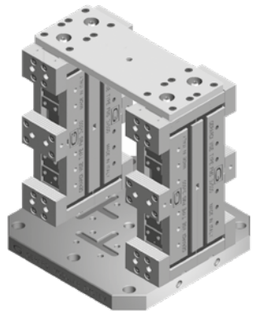




N° 4 MORSE FMS
montate dorso a dorso, fianco a fianco, su piastra base
(Art. 827) con piastra di collegamento (Art. 832)

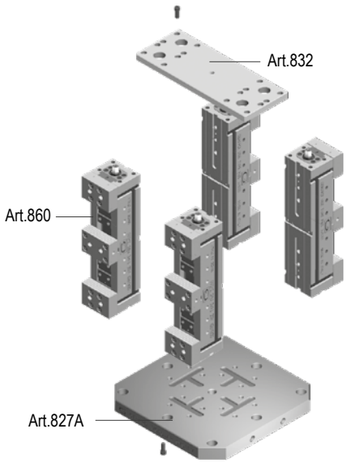
N° 4 FMS VISES
cross-mounted back-to-back,side by side, on base
plate (Art. 827) with connecting plate (Art. 832)





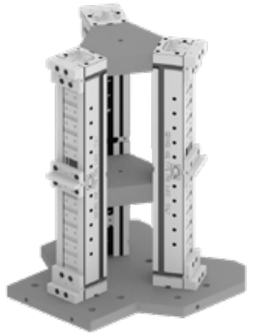
N° 4 MORSE FMS
montate dorso a dorso, su piastra base
(Art. 827A) con piastra di collegamento (Art. 832)

N° 4 FMS VISES
cross-mounted back-to-back,on base plate
(Art. 827A) with connecting plate (Art. 832)



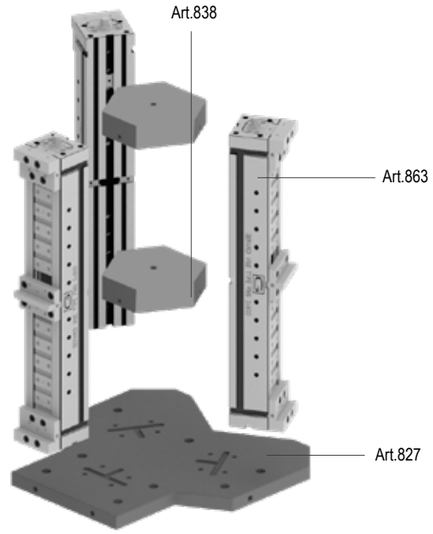
Montaggio ed allineamento morsa con distanziali, supporto centrale o piastra di collegamento (Vedi pag.5.3)
Vise and alignement mounted with spacers, center support or connecting plate (See page 5.3)

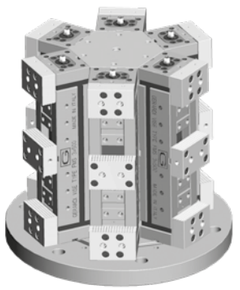
CUBI DI MORSE MONTATI VERTICALMENTE
VISE TOWERS VERTICALLY ASSEMBLED



N° 3 morse FMS
montate verticalmente su piastra base a Y (827)
con supporto centrale (Art. 838)

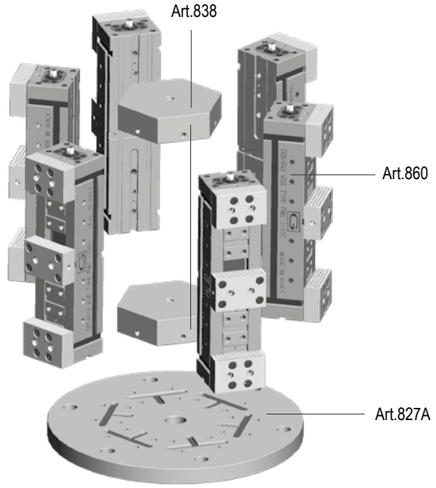
N° 3 FMS vises
vises vertically mounted on Y base plate (827A)
with exagon center support (Art. 838)

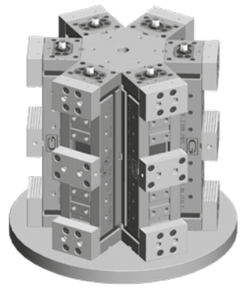




N° 6 morse FMS
montate verticalmente su piastra base (Art. 827A)
con distanziali esagonali (Art. 838)

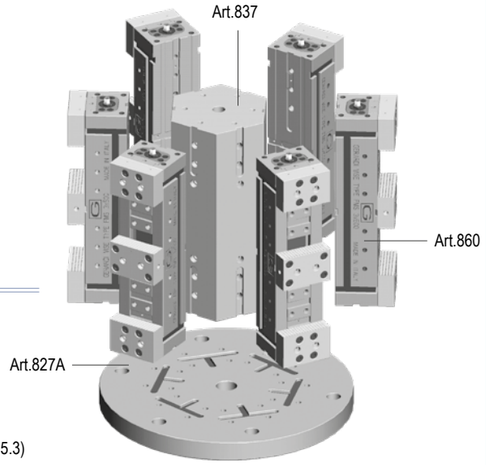
N° 6 FMS vises
vises vertically mounted on base plate (Art. 827A)
with exagon spacer (Art. 838)





N° 6 morse FMS montate verticalmente
su piastra base (Art. 827A)
con supporto centrale (Art. 837)

N° 6 FMS vises vertically mounted
on base plate (Art. 827A) with exagon
center support (Art. 837)



Montaggio ed allineamento morsa con distanziali, supporto centrale o piastra di collegamento (Vedi pag.5.3)
Vise and alignement mounted with spacers, center support or connecting plate (See page 5.3)

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura massima fra le slitte / Maximum opening between slides	A	56	68	96	116	136	156	136	136
Art. 855 Modulo base universale / Universal vise body module	C	70		90				100	
	D	200 + 32	300 + 32	300	400	500	600	400	500
Art. 855A Modulo base Autocentrante / Self-Centering vise body module	E	249	349	320	420	520	620	425	525
	G	75		95				125	
	R	74		94				124	
	S	69		89				99	
	T	72	116	102	142	182	222	132	182
	Y	277	377	360	460	560	660	470	570
	X	407	507	537	637	737	837	637	737
	kg	7	10	18	25	32	39	40	45
Art. 855	Cod.	5.85.51200	5.85.51300	5.85.52300	5.85.52400	5.85.52500	5.85.52600	5.85.53400	5.85.53500
Art. 855A	Cod.	5.85.5120A	5.85.5130A	5.85.5230A	5.85.5240A	5.85.5250A	5.85.5260A	5.85.5340A	5.85.5350A



CENTINAIA DI GANASCE DISPONIBILI !!
HUNDREDS OF JAWS AVAILABLE !!

Art. 855D (Art. 855 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier



Cod.	5.85.5D120	5.85.5D130	5.85.5D230	5.85.5D240	5.85.5D250	5.85.5D260	5.85.5D340	5.85.5D350

Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

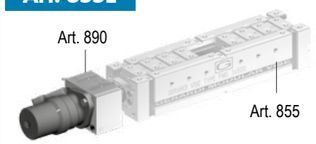
Art. 802



Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

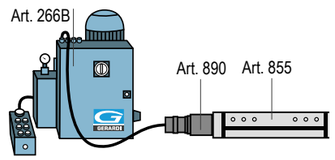
Art. 855E (Art. 855 + 890) Morsa + motore idraulico / Vise + hydraulic motor



Cod.	5.85.5E120	5.85.5E130	5.85.5E230	5.85.5E240	5.85.5E250	5.85.5E260	5.85.5E340	5.85.5E350

Meccanica con predisposizione elettroidraulicacompleta di motore, piastra, boccola e finecorsa

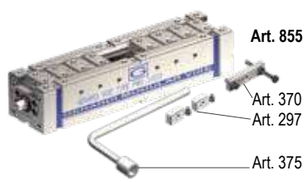
Art. 855F (Art. 855 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit



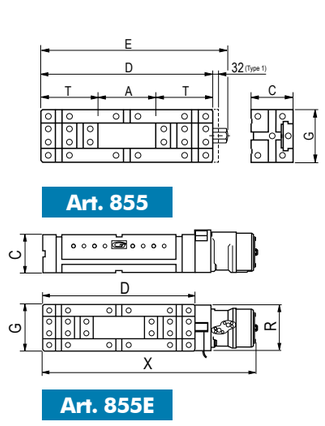
Cod.	5.85.5F120	5.85.5F130	5.85.5F230	5.85.5F240	5.85.5F250	5.85.5F260	5.85.5F340	5.85.5F350

Meccanica elettroidraulica completa di centralina idraulica apparecchiatura elettrica con pulsantiera

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



		3			4				5			6		
		30 kN			30 kN				32 kN			32 kN		
	A	136	136	136	188	168	148	128	152	216	252	316	280	244
	C		100			120				140			160	
	D	600	700	800	500	600	700	800	600	700	800	800	900	1000
	E	625	725	825	525	625	725	825	625	725	825	825	925	1025
	G		125			145				170			190	
	R		124			144				169			189	
	S		99			119				139			159	
	T	232	282	332	156	216	276	336	174	242	274	242	310	378
	Y	670	770	870	570	670	770	870	-	-	-	-	-	-
	X	837	937	1037	737	837	937	1037	837	937	1037	1037	1137	1237
	kg	50	55	60	66	72	80	88	115	125	135	170	190	210
Art. 855	Cod.	5.85.53600	5.85.53700	5.85.53800	5.85.54500	5.85.54600	5.85.54700	5.85.54800	5.85.55600	5.85.55700	5.85.55800	5.85.56800	5.85.56900	5.85.56100
Art. 855A	Cod.	5.85.5360A	5.85.5370A	5.85.5380A	5.85.5450A	5.85.5460A	5.85.5470A	5.85.5480A	5.85.5560A	5.85.5570A	5.85.5580A	5.85.5680A	5.85.5690A	5.85.5610A

Art. 855D (Art. 855 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.85.5D360	5.85.5D370	5.85.5D380	5.85.5D450	5.85.5D460	5.85.5D470	5.85.5D480	5.85.5D560	5.85.5D570	5.85.5D580	5.85.5D680	5.85.5D690	5.85.5D610

Art. 802 Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 855E (Art. 855 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.85.5E360	5.85.5E370	5.85.5E380	5.85.5E450	5.85.5E460	5.85.5E470	5.85.5E480	5.85.5E560	5.85.5E570	5.85.5E580	5.85.5E680	5.85.5E690	5.85.5E610

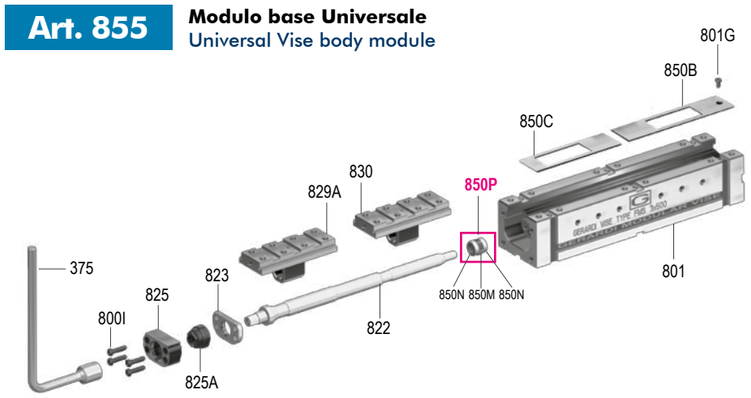
Mechanical with prepared hydraulic connection complete with motor plate,bushing and proximity switch

Art. 855F (Art. 855 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.85.5F360	5.85.5F370	5.85.5F380	5.85.5F450	5.85.5F460	5.85.5F470	5.85.5F480	5.85.5F560	5.85.5F570	5.85.5F580	5.85.5F680	5.85.5F690	5.85.5F610

Mechanical with elettrohydraulicpower-pack ready to work

Art. 855 **Modulo base Universale**
Universal Vise body module

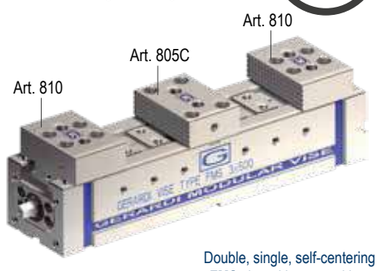


Art.	Pag.	Art.	Pag.
375	4.35	850C	5.61
800I	5.61	850P	5.72
801G	5.61	-	-
801I	5.61	-	-
822	5.53	-	-
823	5.59	-	-
825	5.59	-	-
825A	5.61	-	-
829A	5.52	-	-
830	5.52	-	-
850B	5.61	-	-

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura massima / Maximum opening	A	2 x 16	2 x 66	2 x 54	2 x 104	2 x 154	2 x 204	2 x 74	2 x 124
	B	25		30				40	
	C	70		90				100	
	D	232	332	300	400	500	600	400	500
	E	249	349	320	420	520	620	425	525
	G	75		95				125	
	J	56		64				84	
	W	74		94				124	
	kg	9	12	22	29	35	42	44	49
	Cod.	5.86.01200	5.86.01300	5.86.02300	5.86.02400	5.86.02500	5.86.02600	5.86.03400	5.86.03500

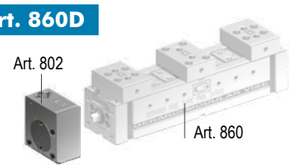
Art. 860

Morsa **FMS** doppia, singola, autocentrante con ganasce zigrinate



Double, single, self-centering **FMS** vise with serrated jaws

Art. 860D



(Art. 860 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.0D120	5.86.0D130	5.86.0D230	5.86.0D240	5.86.0D250	5.86.0D260	5.86.0D340	5.86.0D350

Art. 802

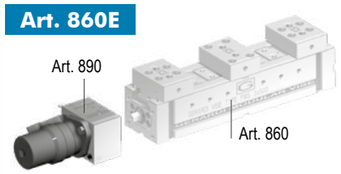


Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

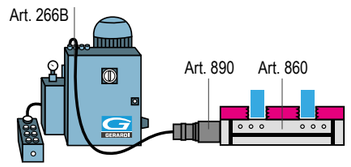
Art. 860E



(Art. 860 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.0E120	5.86.0E130	5.86.0E230	5.86.0E240	5.86.0E250	5.86.0E260	5.86.0E340	5.86.0E350

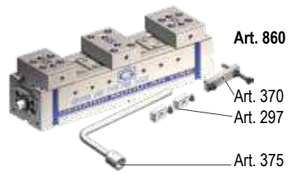
Art. 860F



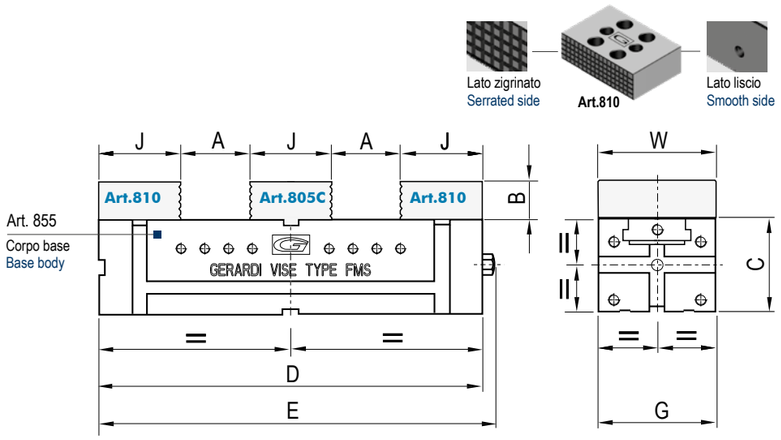
(Art. 860 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.86.0F120	5.86.0F130	5.86.0F230	5.86.0F240	5.86.0F250	5.86.0F260	5.86.0F340	5.86.0F350

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



3			4				5			6		
30 kN			30 kN				32 kN			32 kN		
2 x 174	2 x 224	2 x 274	2 x 103	2 x 153	2 x 203	2 x 253	2 x 138	2 x 188	2 x 238	2 x 238	2 x 288	2 x 338
	40			50				60			60	
	100			120				140			160	
600	700	800	500	600	700	800	600	700	800	800	900	1000
625	725	825	525	625	725	825	625	725	825	825	925	1025
	125			145				170			190	
	84			98				108			108	
	124			144				169			189	
54	59	64	71	79	88	96	130	140	150	210	230	250
5.86.03600	5.86.03700	5.86.03800	5.86.04500	5.86.04600	5.86.04700	5.86.04800	5.86.05600	5.86.05700	5.86.05800	5.86.06800	5.86.06900	5.86.06100

Art. 860D

(Art. 860 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.0D360	5.86.0D370	5.86.0D380	5.86.0D450	5.86.0D460	5.86.0D470	5.86.0D480	5.86.0D560	5.86.0D570	5.86.0D580	5.86.0D680	5.86.0D690	5.86.0D610

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 860E

(Art. 860 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.0E360	5.86.0E370	5.86.0E380	5.86.0E450	5.86.0E460	5.86.0E470	5.86.0E480	5.86.0E560	5.86.0E570	5.86.0E580	5.86.0E680	5.86.0E690	5.86.0E610

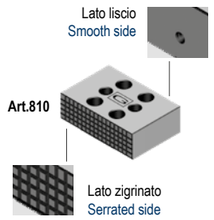
Art. 860F

(Art. 860 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

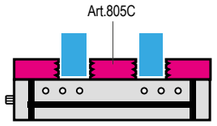
Cod.	5.86.0F360	5.86.0F370	5.86.0F380	5.86.0F450	5.86.0F460	5.86.0F470	5.86.0F480	5.86.0F560	5.86.0F570	5.86.0F580	5.86.0F680	5.86.0F690	5.86.0F610

Art. 860

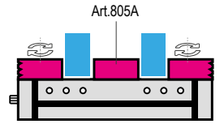
Esempi applicativi ganasce:
Jaw application examples:



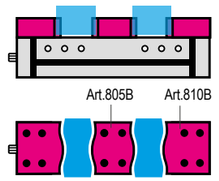
Ganascia Mobile reversibile
Reverible movable jaw



Ganascia Zigrinata Art.805C
Serrated Jaw Art.805C



Ganascia Liscia Art.805A
Smooth Jaw Art.805A



Ganasce Lavorabil Art.805B + Art.810B
Soft Jaws Art.805B + Art.810B

Art.	Pag.
810	5.56
805C	5.54
805A	5.54
805B	5.54
810B	5.56

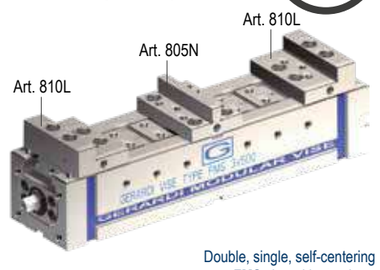
Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura massima / Maximum opening	A	2 x 60	2 x 110	2 x 118	2 x 168	2 x 218	2 x 268	2 x 162	2 x 212
	B	25		30				40	
	C	70		90				100	
	D	232	332	300	400	500	600	400	500
	E	249	349	320	420	520	620	425	525
	G	75		95				125	
	J	56		64				84	
	J1	22		24				30	
	J2	16		16				16	
	W	74		94				124	
	kg	8	11	20	27	33	40	40	45
	Cod.	5.86.31200	5.86.31300	5.86.32300	5.86.32400	5.86.32500	5.86.32600	5.86.33400	5.86.33500

Tipo (grandezza) morsa / Vise type (size)		3			4				5			6		
	kN	30 kN			30 kN				32 kN			32 kN		
Apertura massima / Maximum opening	A	2 x 262	2 x 312	2 x 362	2 x 204	2 x 254	2 x 304	2 x 354	2 x 254	2 x 304	2 x 354	2 x 354	2 x 404	2 x 454
	B	40			50				60			60		
	C	100			120				140			160		
	D	600	700	800	500	600	700	800	600	700	800	800	900	1000
	E	625	725	825	525	625	725	825	625	725	825	825	925	1025
	G	125			145				170			190		
	J	84			98				108			108		
	J1	30			38				38			38		
	J2	16			16				16			16		
	W	124			144				169			189		
	kg	50	55	60	68	76	85	93	124	134	144	200	220	240
	Cod.	5.86.33600	5.86.33700	5.86.33800	5.86.34500	5.86.34600	5.86.34700	5.86.34800	5.86.35600	5.86.35700	5.86.35800	5.86.36800	5.86.36900	5.86.36100

Art. 863

3 in 1 VISES SINGLE / DOUBLE / SELF-CENTERING

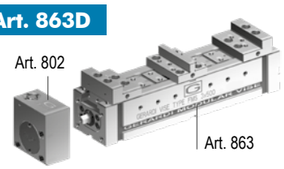
Morsa **FMS** doppia, singola, autocentrante con ganasce a gradino



Double, single, self-centering **FMS** vise with step jaws

Art. 863D

(Art. 863 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier



Cod.	5.86.3D120	5.86.3D130	5.86.3D230	5.86.3D240	5.86.3D250	5.86.3D260	5.86.3D340	5.86.3D350

Art. 802

Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

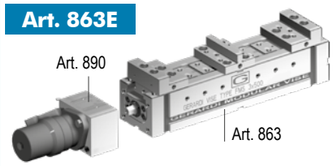


Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

Art. 863E

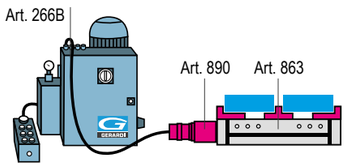
(Art. 863 + 890) Morsa + motore idraulico / Vise + hydraulic motor



Cod.	5.86.3E120	5.86.3E130	5.86.3E230	5.86.3E240	5.86.3E250	5.86.3E260	5.86.3E340	5.86.3E350

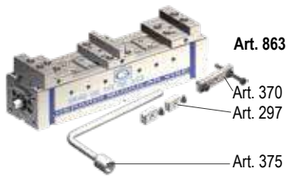
Art. 863F

(Art. 863 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

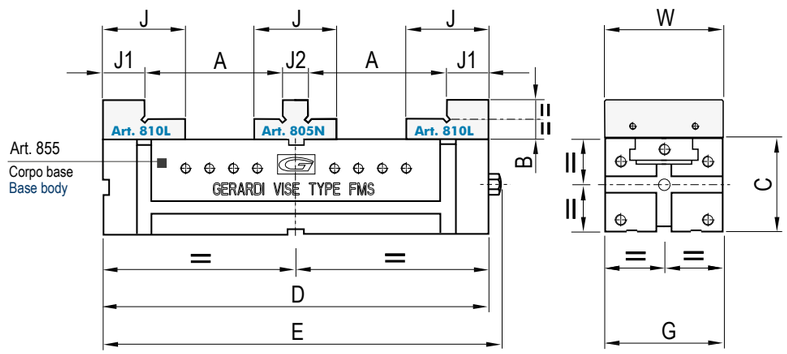


Cod.	5.86.3F120	5.86.3F130	5.86.3F230	5.86.3F240	5.86.3F250	5.86.3F260	5.86.3F340	5.86.3F350

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297



Art. 863D

(Art. 863 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.3D360	5.86.3D370	5.86.3D380	5.86.3D450	5.86.3D460	5.86.3D470	5.86.3D480	5.86.3D560	5.86.3D570	5.86.3D580	5.86.3D680	5.86.3D690	5.86.3D610

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 863E

(Art. 863 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.3E360	5.86.3E370	5.86.3E380	5.86.3E450	5.86.3E460	5.86.3E470	5.86.3E480	5.86.3E560	5.86.3E570	5.86.3E580	5.86.3E680	5.86.3E690	5.86.3E610

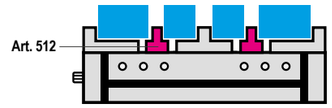
Art. 863F

(Art. 863 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

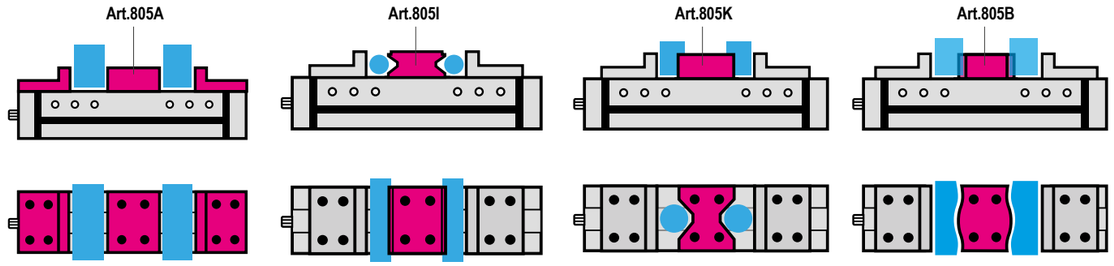
Cod.	5.86.3F360	5.86.3F370	5.86.3F380	5.86.3F450	5.86.3F460	5.86.3F470	5.86.3F480	5.86.3F560	5.86.3F570	5.86.3F580	5.86.3F680	5.86.3F690	5.86.3F610

Art. 863

Esempi applicativi ganasce:
Jaw application examples:



Serraggio simultaneo di 4 pezzi con ganascia intermedia
4 Workpieces simultaneous clamping with intermediate jaw



Ganasce liscie per fissaggio centrale
Smooth jaws for central fixed

Ganascia primatica orizzontale per fissaggio centrale
Horizontal prismatic jaws for central fixed

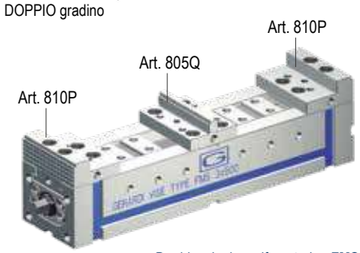
Ganascia prismatica verticale per fissaggio centrale
Vertical prismatic jaw for central fixed

Ganascia lavorabile per fissaggio centrale
Soft jaws for central fixed

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura massima / Maximum opening	A	2 x 32	2 x 82	2 x 54	2 x 104	2 x 154	2 x 204	2 x 77	2 x 127
	A1	2 x 84	2 x 134	2 x 118	2 x 168	2 x 218	2 x 268	2 x 162	2 x 212
	B	25		30				40	
	C	70		90				100	
	D	232	332	300	400	500	600	400	500
	E	249	349	320	420	520	620	425	525
	G	75		95				125	
	J	56		64				84	
	J1	24		24				30	
	J2	16		16				16	
	W	74		94				124	
	kg	8	11	20	27	33	40	40	45
	Cod.	5.86.41200	5.86.41300	5.86.42300	5.86.42400	5.86.42500	5.86.42600	5.86.43400	5.86.43500

Art. 864

Morsa **FMS** doppia, singola, autocentrante con ganasce a DOPPIO gradino



Double, single, self-centering **FMS** vise with DOUBLE step jaws

Art. 805F

Ganascia fissa con doppio gradino 3x5 LISCIA

Fixed jaw with double 3x5 step SMOOTH



Cod.	5.80.5F100	5.80.5F200	5.80.5F300

Art. 805G

Ganascia fissa con doppio gradino 3x5 ZIGRINATA

Fixed jaw with double 3x5 step SERRATED

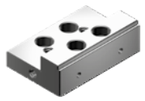


Cod.	5.80.5G100	5.80.5G200	5.80.5G300

Art. 810O

Ganascia mobile con gradino piccolo e grande

Movable jaw with small and large step

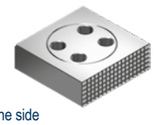


Cod.	5.81.0O100	5.81.0O200	5.81.0O300

Art. 810X

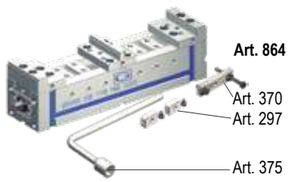
Ganascia mobile oscillante con gradino 3x5 zigrinata da un lato con albero a gradino (**Art. 810Z**)

Floating movable jaw with 3x5 step one side serrated with step block pin (**Art. 810Z**)

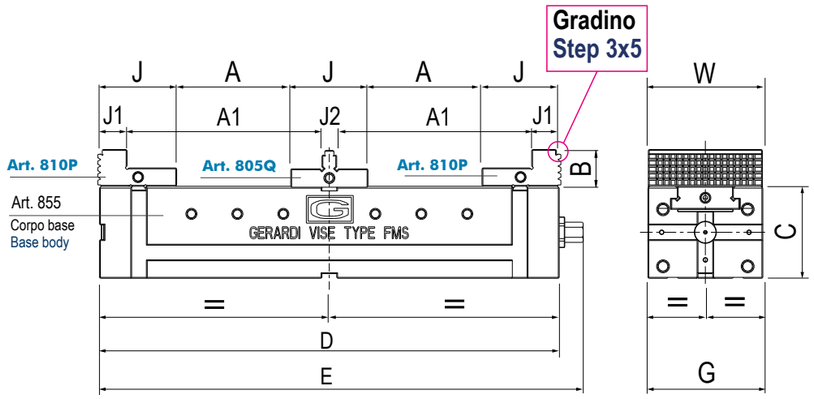


Cod.	5.81.0X100	5.81.0X200	5.81.0X300

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



		3			4				5			6		
		30 kN			30 kN				32 kN			32 kN		
A		2 x 177	2 x 227	2 x 277	2 x 103	2 x 153	2 x 203	2 x 253	2 x 138	2 x 188	2 x 238	2 x 238	2 x 288	2 x 338
A1		2 x 262	2 x 312	2 x 362	2 x 204	2 x 254	2 x 304	2 x 354	2 x 254	2 x 304	2 x 354	2 x 354	2 x 404	2 x 454
B		40			50				60			60		
C		100			120				140			160		
D	600	700	800	500	600	700	800	600	700	800	800	900	1000	
E	625	725	825	525	625	725	825	625	725	825	825	925	1025	
G		125			145				170			190		
J		84			98				108			108		
J1		30			38				38			38		
J2		16			16				16			16		
W		124			144				169			189		
kg	50	55	60	68	76	85	93	124	134	144	200	220	240	
Cod.	5.86.43600	5.86.43700	5.86.43800	5.86.44500	5.86.44600	5.86.44700	5.86.44800	5.86.45600	5.86.45700	5.86.45800	5.86.46800	5.86.46900	5.86.46100	

Art. 805F

Cod.	5.80.5F300	5.80.5F400	5.80.5F500	5.80.5F300

Art. 805G

Cod.	5.80.5G300	5.80.5G400	5.80.5G500	5.80.5G600

Art. 810O

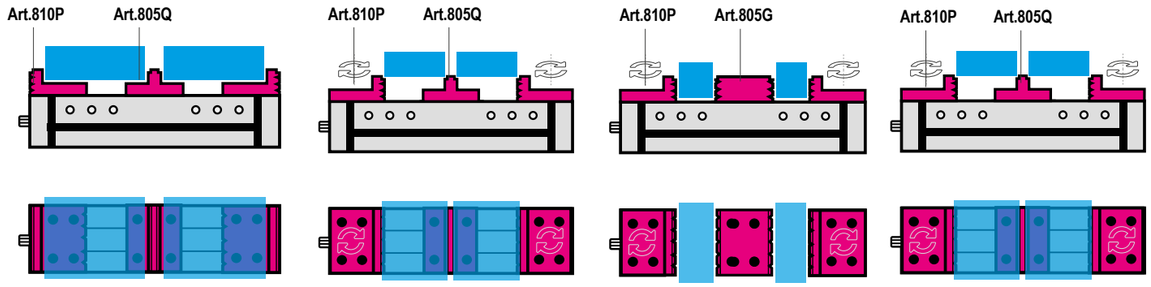
Cod.	5.81.0O300	5.81.0O400	5.81.0O500	5.81.0O600

Art. 810X

Cod.	5.81.0X300	5.81.0X400	5.81.0X500	5.81.0X600

Art. 864

Esempi applicativi ganasce a doppio gradino:
Double step jaw application examples:



Utilizzo del gradino standard per alzare il particolare rispetto alla base

Use the main step for raising the workpiece

Per utilizzare il 2° gradino (3x5) ruotare le ganasce mobili di 180°

In order to use the second 3x5mm step turn the movable jaw 180°

Per sfruttare il lato zigrinato delle ganasce mobili Art.810P sostituisci la ganascia fissa centrale con l'Art.805G

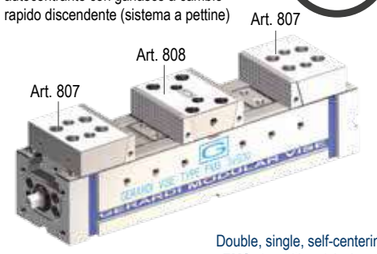
To exploit the serrated side of the movable jaws Art.810P change the fixed central jaw with Art.805G

Tipo (grandezza) morsa / Vise type (size)		1	2				3	
	kN	25 kN	25 kN				30 kN	
Apertura massima / Maximum opening	A	2 x 52	2 x 30	2 x 80	2 x 130	2 x 180	2 x 46	2 x 96
	B	25	30				40	
	C	70	90				100	
	D	332	300	400	500	600	400	500
	E	349	320	420	520	620	425	525
	G	75	95				125	
	J	63	76				98	
	J1	70	88				111	
	W	74	94				124	
	kg	12	23	30	36	43	46	51
	Cod.	5.86.51300	5.86.52300	5.86.52400	5.86.52500	5.86.52600	5.86.53400	5.86.53500

Art. 865

3 in 1 VISES SINGLE / DOUBLE / SELF-CENTERING

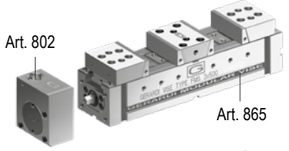
Morsa **FMS** doppia, singola, autocentrante con ganasce a cambio rapido discendente (sistema a pettine)



Double, single, self-centering **FMS** vise with quick change pull down jaws (comb system)

Art. 865D

(Art. 865 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier



Cod.	5.86.5D130	5.86.5D230	5.86.5D240	5.86.5D250	5.86.5D260	5.86.5D340	5.86.5D350

Art. 802

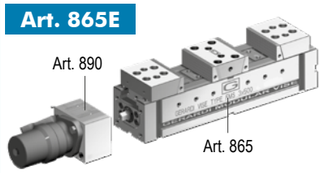


Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

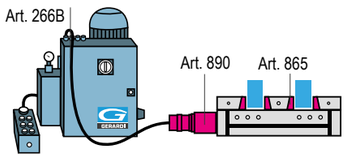
Art. 865E



(Art. 865 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.5E130	5.86.5E230	5.86.5E240	5.86.5E250	5.86.5E260	5.86.5E340	5.86.5E350

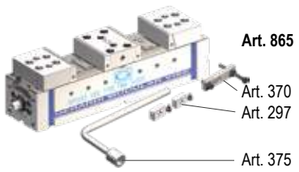
Art. 865F



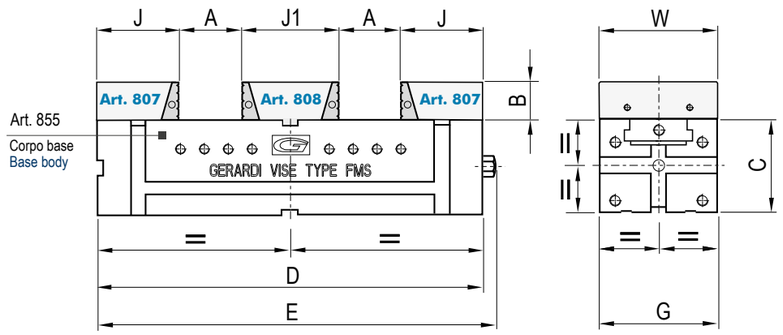
(Art. 865 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.86.5F130	5.86.5F230	5.86.5F240	5.86.5F250	5.86.5F260	5.86.5F340	5.86.5F350

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



		3			4				5			6		
		30 kN			30 kN				32 kN			32 kN		
A		2 x 146	2 x 196	2 x 246	2 x 65	2 x 115	2 x 165	2 x 215	2 x 90	2 x 140	2 x 190	2 x 216	2 x 256	2 x 316
B		40			50				60			60		
C		100			120				140			160		
D		600	700	800	500	600	700	800	600	700	800	800	900	1000
E		625	725	825	525	625	725	825	625	725	825	825	925	1025
G		125			145				170			190		
J		98			117				132			119		
J1		111			136				155			130		
W		124			144				169			189		
kg		54	59	64	74	82	91	99	134	144	154	215	235	255
Cod.		5.86.53600	5.86.53700	5.86.53800	5.86.54500	5.86.54600	5.86.54700	5.86.54800	5.86.55600	5.86.55700	5.86.55800	5.86.56800	5.86.56900	5.86.56100

Art. 865D

(Art. 865 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.5D360	5.86.5D370	5.86.5D380	5.86.5D450	5.86.5D460	5.86.5D470	5.86.5D480	5.86.5D560	5.86.5D570	5.86.5D580	5.86.5D680	5.86.5D690	5.86.5D610

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 865E

(Art. 865 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.5E360	5.86.5E370	5.86.5E380	5.86.5E450	5.86.5E460	5.86.5E470	5.86.5E480	5.86.5E560	5.86.5E570	5.86.5E580	5.86.5E680	5.86.5E690	5.86.5E610

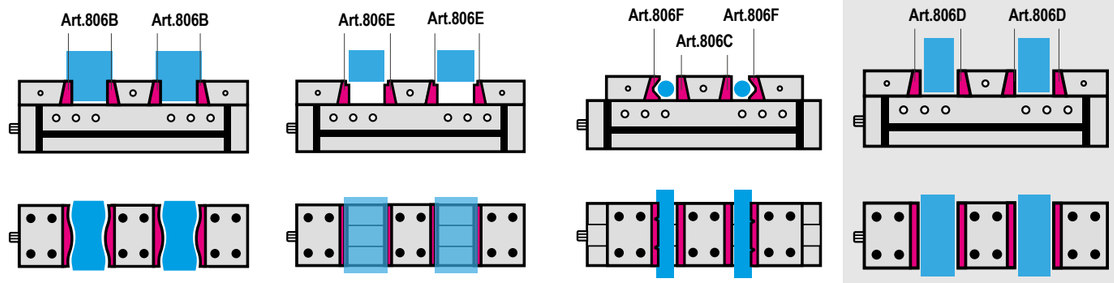
Art. 865F

(Art. 865 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.86.5F360	5.86.5F370	5.86.5F380	5.86.5F450	5.86.5F460	5.86.5F470	5.86.5F480	5.86.5F560	5.86.5F570	5.86.5F580	5.86.5F680	5.86.5F690	5.86.5F610

Art. 865

Esempi applicativi piastre ganasce:
Jaw plates application examples:



Piastre ganasce lavorabili Art.806B
Soft machineable Jaw plates Art.806B

Piastre ganasce a gradino Art.806E
Step jaw plates Art.806E

2 piastre ganasce Art.806F + 2 Art.806C
2 jaw plates Art.806F + 2 Art.806C

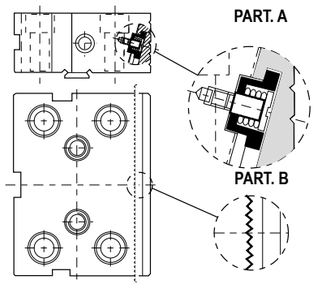
Configurazione standard / Standard configuration

Piastre ganasce zigrinate Art.806D
Serrated jaw plates Art.806D

CORPI GANASCE FMS & PIASTRE GANASCE INTERCAMBIABILI RAPIDE
FMS COMB JAW BODIES & QUICK INTERCHANGEABLE JAW PLATES

Tipo (grandezza) / Type (size)		1	2	3	4	5	6
Art. 806* Ganascia fissa con piastra ganascia zigrinata intercambiabile rapida. Fixed jaw with quick interchangeable serrated jaw plate	Cod.	5.80.61000	5.80.62000	5.80.63000	5.80.64000	5.80.65000	5.80.66000
Art. 807* Ganascia mobile con piastra ganascia zigrinata intercambiabile rapida. Movable jaw with quick interchangeable serrated jaw plate	Cod.	5.80.71000	5.80.72000	5.80.73000	5.80.74000	5.80.75000	5.80.76000
Art. 808* Ganascia fissa doppia con piastre ganasce zigrinate intercambiabili rapide. Double fixed jaw with quick interchangeable serrated jaw plate	Cod.	5.80.81000	5.80.82000	5.80.83000	5.80.84000	5.80.85000	5.80.86000
Art. 806A Corpo ganascia fissa per piastra ganascia intercambiabile rapida. Fixed jaw body for quick interchangeable jaw plate	Cod.	5.80.6A100	5.80.6A200	5.80.6A300	5.80.6A400	5.80.6A500	5.80.6A600
Art. 807A Corpo ganascia mobile per piastra ganascia intercambiabile rapida. Movable jaw body for quick interchangeable jaw plate	Cod.	5.80.7A100	5.80.7A200	5.80.7A300	5.80.7A400	5.80.7A500	5.80.7A600
Art. 808A Corpo ganascia fissa doppia per piastre ganasce intercambiabili rapide. Double fixed jaw body for quick interchangeable jaw plate	Cod.	5.80.8A100	5.80.8A200	5.80.8A300	5.80.8A400	5.80.8A500	5.80.8A600
Art. 808B Corpo ganascia fissa doppia ridotta per piastre ganasce intercambiabili rapide. Double fixed jaw body narrow for quick interchangeable jaw plate	Cod.	5.80.8B100	5.80.8B200	5.80.8B300	5.80.8B400	5.80.8B500	5.80.8B600

* Viti per fissaggio a richiesta Fixing screws on request



RAPIDA SOSTITUZIONE DELLE PIASTRE GANASCE DISCENDENTI SENZA BISOGNO DI ALCUN UTENSILE

Il nuovo sistema con piastre ganasce intercambiabili, conferisce alla morsa FMS un ulteriore aumento di flessibilità dato dalla rapidità di sostituzione delle piastre ganasce e dalla precisione di riposizionamento.
La rapidità di sostituzione delle piastre ganasce è resa possibile dal nuovo sistema con perno a molla (**PART. A**), mentre le righe prismatiche (**PART. B**) effettuate con mola sagomata sui piani d'appoggio rendono possibile un riposizionamento di elevata precisione. La vasta gamma di piastre ganasce intercambiabili va a soddisfare le più svariate esigenze di lavorazione.

QUICK HAND CHANGE OF PULL- DOWN JAW PLATES - NO TOOLS NEEDED

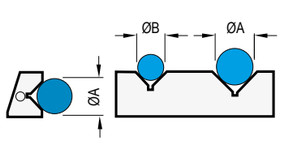
The new system with quick interchangeable jaw plates, increase the FMS vise flexibility, and feature the quick jaw plates replacement and their high precision repositioning. The quickness of the jaw plates replacement is allowed by the new system of pin with spring (**PART. A**), while the prismatic grooves (**PART. B**), made with shaped grind wheel on the surface plates, allow a perfect repositioning. The wide range of interchangeable jaws plates can satisfy the most varied workholding needs.

Art. 806F Piastra ganascia intercambiabile prismatica a pettine. Prismatic comb interchangeable jaw plate

Solo 2 per morsa!! Just 2 pcs each vise!!

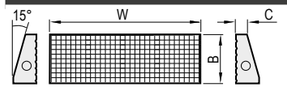
Cod.		5.80.6F100	5.80.6F200	5.80.6F300	5.80.6F400	5.80.6F500	5.80.6F600

Piastra ganascia intercambiabile prismatica a pettine
Per serraggi autocentranti è necessario ordinare n. 2 piastrine prismatiche
Prismatic comb interchangeable jaw plate
For self-centering clamping is necessary to order n. 2 prismatic jaws



Ø Min / Max							
	A	6 / 16	9 / 24	13 / 38	15 / 40	15 / 42	15 / 42
	B	4 / 10	7 / 18	9 / 24	9 / 24	9 / 24	9 / 24

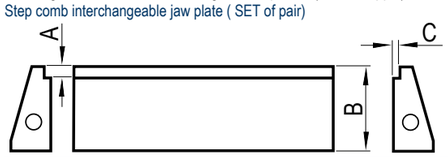
PIASTRE GANASCE INTERCAMBIABILI RAPIDE
QUICK INTERCHANGEABLE JAW PLATES



Tipo (grandezza) / Type (size)		1	2	3	4	5	6
	W	73	93	123	143	168	188
	B	25	30	40	50	60	60
	C	10	10	11	11	16	16
Art. 806B Piastra ganascia lavorabile a pettine. Soft comb jaw plate	Cod.	5.80.6B100	5.80.6B200	5.80.6B300	5.80.6B400	5.80.6B500	5.80.6B600
Art. 806C Piastra ganascia liscia a pettine. Smooth comb jaw plate	Cod.	5.80.6C100	5.80.6C200	5.80.6C300	5.80.6C400	5.80.6C500	5.80.6C600
Art. 806D Piastra ganascia zigrinata a pettine. Serrated comb jaw plate	Cod.	5.80.6D100	5.80.6D200	5.80.6D300	5.80.6D400	5.80.6D500	5.80.6D600
Art. 806E Piastra ganascia a gradino a pettine. Step comb jaw plate	Cod.	5.80.6E100	5.80.6E200	5.80.6E300	5.80.6E400	5.80.6E500	5.80.6E600

KIT RISPARMIO - SAVING KIT

Piastra ganascia intercambiabile a gradino a pettine (SET di coppie)
Step comb interchangeable jaw plate (SET of pair)



A	Set di 8 pezzi / Set of 8 pcs.	3	3	3	3	3	3
		5	5	5	5	5	5
		8	8	8	8	8	8
		13	13	13	13	13	13
	Set di 10 pezzi / Set of 10 pcs.	-	18	18	18	18	18
		-	-	23	23	23	23
		-	-	28	28	28	28
B		25	30	40	50	60	60
C		3	3	3	3	3	3
Cod.		5.80.6E112	5.80.6E212	5.80.6E312	5.80.6E412	5.80.6E512	5.80.6E612

Art. 806SLD Piastra ganascia scaricata a pettine. Discharged comb jaw plate

Art. 806SLE Piastra ganascia con gradino scaricata a pettine. Discharged step comb jaw plate

A	28	38	48	58	63	95
B	12	12	12	12	12	12
C	14	18	32	42	47	79
H	8	8	8	8	8	8
Cod.	5.80.6SLD1	5.80.6SLD2	5.80.6SLD3	5.80.6SLD4	5.80.6SLD5	5.80.6SLD6
Cod.	5.80.6SLE1	5.80.6SLE2	5.80.6SLE3	5.80.6SLE4	5.80.6SLE5	5.80.6SLE6

Art. 806K Piastra ganascia a gradino a pettine con inserti GRIP. Comb step jaw plate with GRIP inserts

C	14	18	32	42	47	79
H	23	33	43	53	58	73
Cod.	5.80.6K100	5.80.6K200	5.80.6K300	5.80.6K400	5.80.6K500	5.80.6K600

Art. 806G Piastra ganascia a pettine con arresto a 90°. 90° comb jaw plate

1 per stazione di serraggio !! 1 pc per clamping station !!

Cod.	5.80.6G100	5.80.6G200	5.80.6G300	5.80.6G400	5.80.6G500	5.80.6G600

Art. 806H Piastra ganascia bombata a pettine. Round comb jaw plate

Cod.	5.80.6H100	5.80.6H200	5.80.6H300	5.80.6H400	5.80.6H500	5.80.6H600

Art. 806M Piastra ganascia a pettine per angolo di 30° o 45°. 30° or 45° angle comb jaw plate

1 per stazione di serraggio !! 1 pc per clamping station !!

Cod.	5.80.6M100	5.80.6M200	5.80.6M300	5.80.6M400	5.80.6M500	5.80.6M600

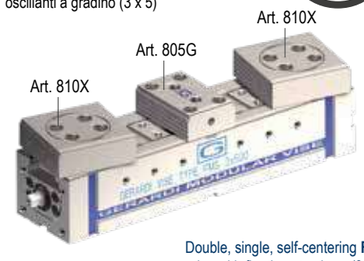
Tipo (grandezza) morsa / Vise type (size)		1	2				3	
	kN	25 kN	25 kN				30 kN	
Apertura massima / Maximum opening	A	2 x 52	2 x 30	2 x 80	2 x 130	2 x 180	2 x 46	2 x 96
	B	25	30				40	
	C	70	90				100	
	D	332	300	400	500	600	400	500
	E	349	320	420	520	620	425	525
	G	75	95				125	
	J	63	76				98	
	J1	70	88				111	
	W	74	94				124	
	kg	12	23	30	36	43	46	51
	Cod.	5.86.61300	5.86.62300	5.86.62400	5.86.62500	5.86.62600	5.86.63400	5.86.63500

Tipo (grandezza) morsa / Vise type (size)		3			4				5			6		
	kN	30 kN			30 kN				32 kN			32 kN		
Apertura massima / Maximum opening	A	2 x 152	2 x 202	2 x 252	2 x 73	2 x 123	2 x 173	2 x 223	2 x 111	2 x 161	2 x 211	2 x 203	2 x 235	2 x 303
	B	40			50				60			60		
	C	100			120				140			160		
	D	600	700	800	500	600	700	800	600	700	800	800	900	1000
	E	625	725	825	525	625	725	825	625	725	825	825	925	1025
	G	125			145				170			190		
	J	106			128				135			143		
	J1	84			98				108			108		
	W	124			144				169			189		
	kg	54	59	64	74	82	91	99	134	144	154	215	235	255
	Cod.	5.86.63600	5.86.63700	5.86.63800	5.86.64500	5.86.64600	5.86.64700	5.86.64800	5.86.65600	5.86.65700	5.86.65800	5.86.66800	5.86.66900	5.86.66100

Art. 866

3 in 1 VISES SINGLE / DOUBLE / SELF-CENTERING

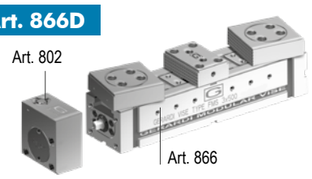
Morsa **FMS** doppia, singola, autocentrante con ganasce oscillanti a gradino (3 x 5)



Double, single, self-centering **FMS** vise with floating step jaws (3 x 5)

Art. 866D

(Art. 866 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier



Cod.	5.86.6D130	5.86.6D230	5.86.6D240	5.86.6D250	5.86.6D260	5.86.6D340	5.86.6D350

Art. 802

Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

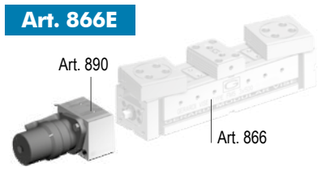
Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**



Cod.	5.80.21000	5.80.22000	5.80.23000

Art. 866E

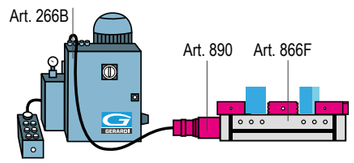
(Art. 866 + 890) Morsa + motore idraulico / Vise + hydraulic motor



Cod.	5.86.6E130	5.86.6E230	5.86.6E240	5.86.6E250	5.86.6E260	5.86.6E340	5.86.6E350

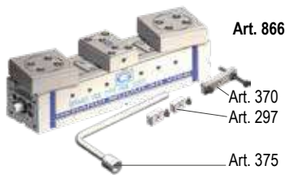
Art. 866F

(Art. 866 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

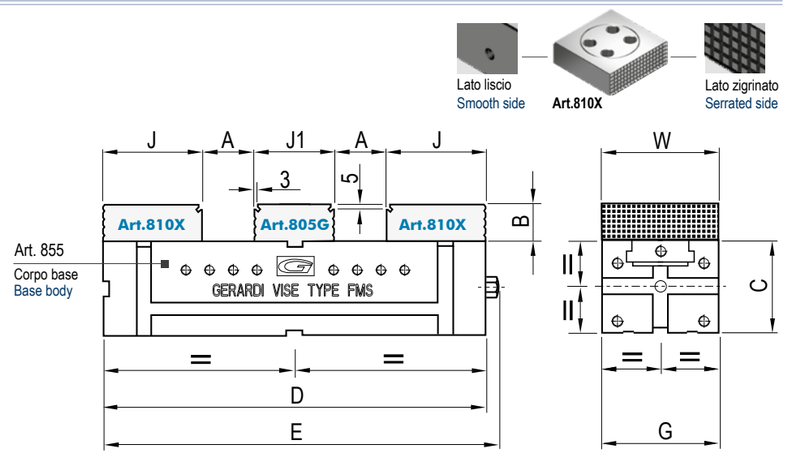


Cod.	5.86.6F130	5.86.6F230	5.86.6F240	5.86.6F250	5.86.6F260	5.86.6F340	5.86.6F350

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



Art. 866D

(Art. 866 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.6D360	5.86.6D370	5.86.6D380	5.86.6D450	5.86.6D460	5.86.6D470	5.86.6D480	5.86.6D560	5.86.6D570	5.86.6D580	5.86.6D680	5.86.6D690	5.86.6D610

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 866E

(Art. 866 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.6E360	5.86.6E370	5.86.6E380	5.86.6E450	5.86.6E460	5.86.6E470	5.86.6E480	5.86.6E560	5.86.6E570	5.86.6E580	5.86.6E680	5.86.6E690	5.86.6E610

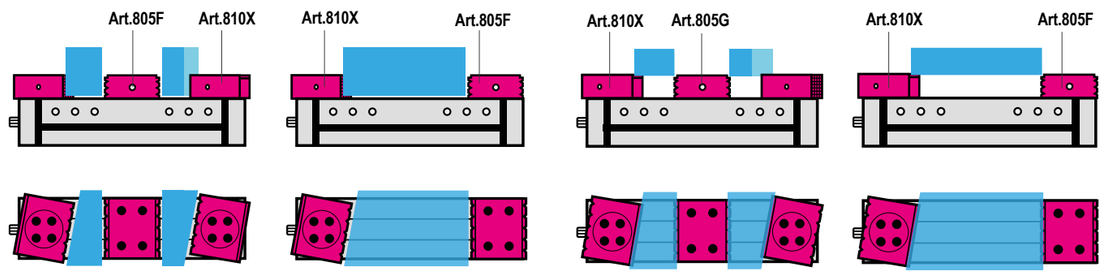
Art. 866F

(Art. 866 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.86.6F360	5.86.6F370	5.86.6F380	5.86.6F450	5.86.6F460	5.86.6F470	5.86.6F480	5.86.6F560	5.86.6F570	5.86.6F580	5.86.6F680	5.86.6F690	5.86.6F610

Art. 866

Esempi applicativi ganasce oscillanti:
Floating Jaws application examples:



Serraggio di particolari grezzi - Rough workpieces clamping

Serraggio di particolari sul gradino - Rough workpieces clamping on step

FUNZIONAMENTO DELLE GANASCE MOBILI OSCILLANTI
THE OPERATION OF MOVABLE JAWS

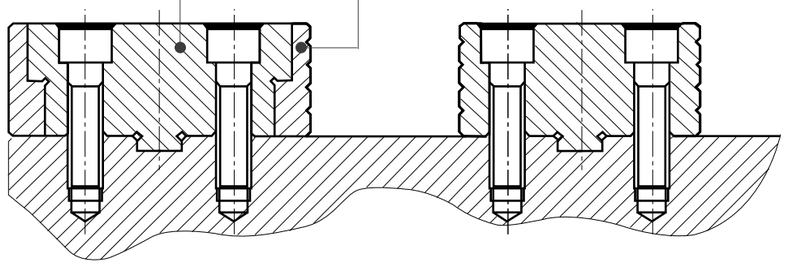
Art. 810Z

Albero a gradino per ganasce mobili oscillanti
Step block pin for floating movable jaw

Art. 810W

Ganascia mobile oscillante zigrinata da un lato, con albero a gradino (Art. 810Z)
Floating movable jaw one side serrated with step block pin (Art. 810Z)

Fig. 1 Pic. 1



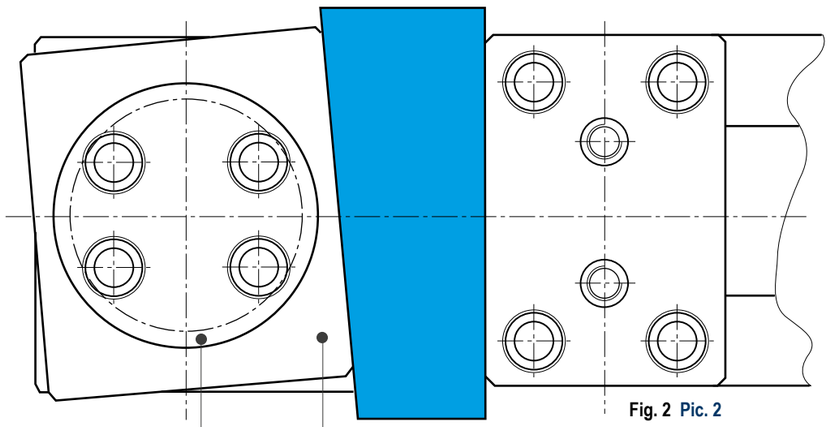


Fig. 2 Pic. 2

Art. 810Z

Albero a gradino per ganasce mobili oscillanti
Step block pin for floating movable jaw

Art. 810W

Ganascia mobile oscillante zigrinata da un lato, con albero a gradino (Art. 810Z)
Floating movable jaw one side serrated with step block pin (Art. 810Z)

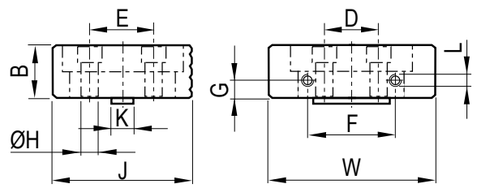
Le ganasce mobili oscillanti consentono il serraggio di pezzi di forma irregolare i cui lati non risultino paralleli (**Fig. 2**). Questo è reso possibile dall'albero a gradino (**Art. 810Z - Fig. 1**), posto al centro della ganascia, che pur permettendo la rotazione della ganascia, ne mantiene la precisione ed evita il sollevamento del pezzo mentre viene lavorato.
Il tutto a garanzia di un serraggio in piena sicurezza.

Floating movable jaws allow to clamp workpieces with irregular shapes whose sides are not parallels (**Pic. 2**). In fact thanks to the step block spindle (**Art. 810Z - Pic. 1**), positioned in the centre of the jaw body, the jaw can float and guarantee at the same time maximum precision and no tilting of the parts while being worked. The safety of the workholding is guaranteed.

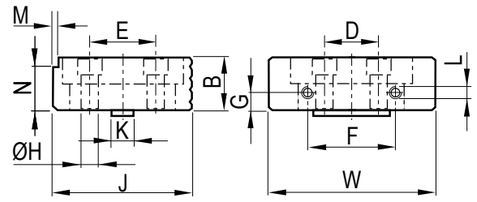
GANASCE MOBILI OSCILLANTI
FLOATING MOVABLE JAWS

Tipo (grandezza) / Type (size)	1	2	3	4	5	6
Art. 810W* Ganascia mobile oscillante zigrinata da un lato con albero a gradino (**Art. 810Z**) / Floating movable jaw one side serrated with step block pin (**Art. 810Z**)	Cod. 5.81.0W100	5.81.0W200	5.81.0W300	5.81.0W400	5.81.0W500	5.81.0W600
Art. 810X* Ganascia mobile oscillante con gradino 3x5 zigrinata da un lato con albero a gradino (**Art. 810Z**) / Floating movable jaw with 3x5 step one side serrated with step block pin (**Art. 810Z**)	Cod. 5.81.0X100	5.81.0X200	5.81.0X300	5.81.0X400	5.81.0X500	5.81.0X600
Art. 810Y* Ganascia mobile oscillante con gradino 3x5 con albero a gradino (**Art. 810Z**) / Floating movable jaw with 3x5 step with step block pin (**Art. 810Z**)	Cod. 5.81.0Y100	5.81.0Y200	5.81.0Y300	5.81.0Y400	5.81.0Y500	5.81.0Y600
* Set viti per fissaggio a richiesta - Set of fixing screws on request						
Art. 810Z Albero a gradino per ganasce mobili oscillanti / Step block pin for floating movable jaw	Cod. 5.81.0Z100	5.81.0Z200	5.81.0Z300	5.81.0Z400	5.81.0Z500	5.81.0Z600
Art. 810WA Corpo ganascia mobile oscillante zigrinata da un lato / Body floating movable jaw one side serrated	Cod. 5.81.0WA10	5.81.0WA20	5.81.0WA30	5.81.0WA40	5.81.0WA50	5.81.0WA60
Art. 810XA Corpo ganascia mobile oscillante con gradino 3x5 zigrinata da un lato / Body floating movable jaw with 3x5 step one side serrated	Cod. 5.81.0XA10	5.81.0XA20	5.81.0XA30	5.81.0XA40	5.81.0XA50	5.81.0XA60
Art. 810YA Corpo ganascia mobile oscillante con gradino 3x5 / Body floating movable jaw with 3x5 step	Cod. 5.81.0YA10	5.81.0YA20	5.81.0YA30	5.81.0YA40	5.81.0YA50	5.81.0YA60

Art. 810W



Art. 810X

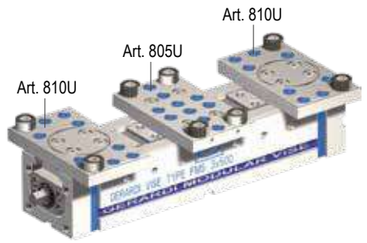


Tipo (grandezza) morsa / Vise (type) size

mm	1	2	3	4	5	6	Tolleranze / Tolerance
B	25	30	40	50	60		- 0,02
D	20	25	38	48	44	54	-
E	32	40	50	60	68	68	-
F	40	50		65		100	-
G	10		15	20	25		-
H	9	11	13	17		22	-
L	M5	M6					-
K	16						H7
M	5						± 0,01
N	3						± 0,02
J	72	84	106	128	135	143	- 0,02
W	74	94	124	144	169	189	-

Art. 867

Morsa **FMS** doppia, singola, autocentrante con ganasce oscillanti con inserti regolabili

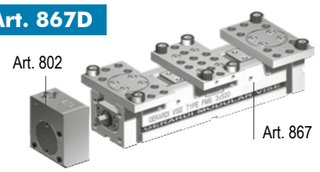


Double, single, self-centering **FMS** vise with floating jaws with adjustable inserts

Tipo (grandezza) morsa / Vise type (size)	1	2				3	
kN	25 kN	25 kN				30 kN	
A1	91	91	141	191	241	141	191
B	20	20				20	
C	70	90				100	
D	332	300	400	500	600	400	500
E	349	320	420	520	620	425	525
G	75	95				125	
J1	50	50				70	
J2	25	25				35	
Ø	30 (H = 16)	30 (H = 16)				30 (H = 16)	
W	100	120				170	
kg	11	20	27	33	40	40	45
Cod.	5.86.71300	5.86.72300	5.86.72400	5.86.72500	5.86.72600	5.86.73400	5.86.73500

Tipo (grandezza) morsa / Vise type (size)	3			4				5			6		
kN	30 kN			30 kN				32 kN			32 kN		
A1	241	291	341	191	241	291	341	231	281	331	331	381	431
B	20			30				35			35		
C	100			120				140			160		
D	600	700	800	500	600	700	800	600	700	800	800	900	1000
E	625	725	825	525	625	725	825	625	725	825	825	925	1025
G	125			145				170			190		
J1	70			80				100			100		
J2	35			40				40			40		
Ø	30 (H = 16)			30 (H = 16)				40 (H = 30)			40 (H = 30)		
W	170			220				250			300		
kg	50	55	60	68	76	85	93	124	134	144	200	220	240
Cod.	5.86.73600	5.86.73700	5.86.73800	5.86.74500	5.86.74600	5.86.74700	5.86.74800	5.86.75600	5.86.75700	5.86.75800	5.86.76800	5.86.76900	5.86.76100

Art. 867D



(Art. 867 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.7D130	5.86.7D230	5.86.7D240	5.86.7D250	5.86.7D260	5.86.7D340	5.86.7D350

Art. 802



Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

Art. 867D

(Art. 867 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

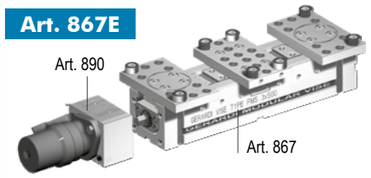
Cod.	5.86.7D360	5.86.7D370	5.86.7D380	5.86.7D450	5.86.7D460	5.86.7D470	5.86.7D480	5.86.7D560	5.86.7D570	5.86.7D580	5.86.7D680	5.86.7D690	5.86.7D610

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 867E



(Art. 867 + 890) Morsa + motore idraulico / Vise + hydraulic motor

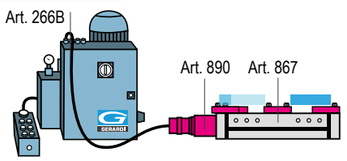
Cod.	5.86.7E130	5.86.7D230	5.86.7E240	5.86.7E250	5.86.7E260	5.86.7E340	5.86.7E350

Art. 867E

(Art. 867 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.7E360	5.86.7E370	5.86.7E380	5.86.7E450	5.86.7E460	5.86.7E470	5.86.7E480	5.86.7E560	5.86.7E570	5.86.7E580	5.86.7E680	5.86.7E690	5.86.7E610

Art. 867F



(Art. 867 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

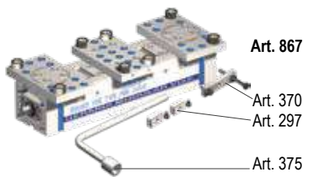
Cod.	5.86.7F130	5.86.7F230	5.86.7F240	5.86.7F250	5.86.7F260	5.86.7F340	5.86.7F350

Art. 867F

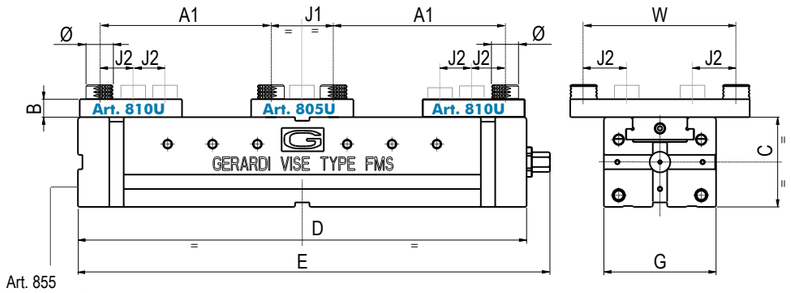
(Art. 867 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.86.7F360	5.86.7F370	5.86.7F380	5.86.7F450	5.86.7F460	5.86.7F470	5.86.7F480	5.86.7F560	5.86.7F570	5.86.7F580	5.86.7F680	5.86.7F690	5.86.7F610

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



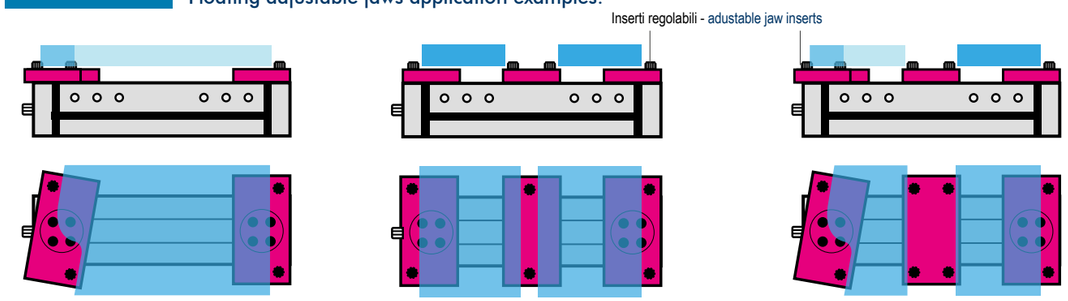
Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



Art. 855
Corpo base / Base body

Art. 867 Esempi applicativi ganasce oscillanti regolabili:

Floating adjustable jaws application examples:



4 inserti - 4 jaw inserts

6 inserti - 6 jaw inserts

8 inserti - 8 jaw inserts

FUNZIONAMENTO DELLE GANASCE MOBILI OSCILLANTI CON INSERTI

HOW TO OPERATE FLOATING MOVABLE JAWS WITH INSERTS



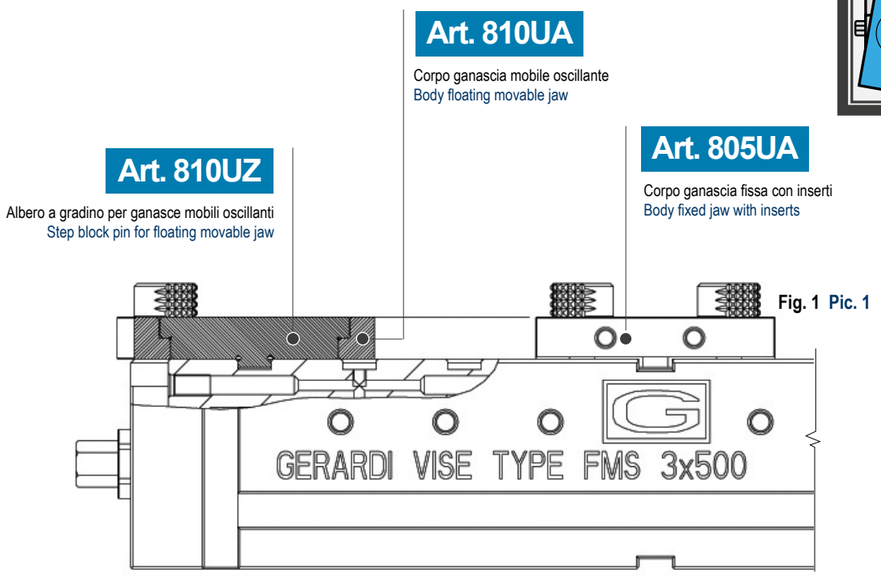


Fig. 1 Pic. 1

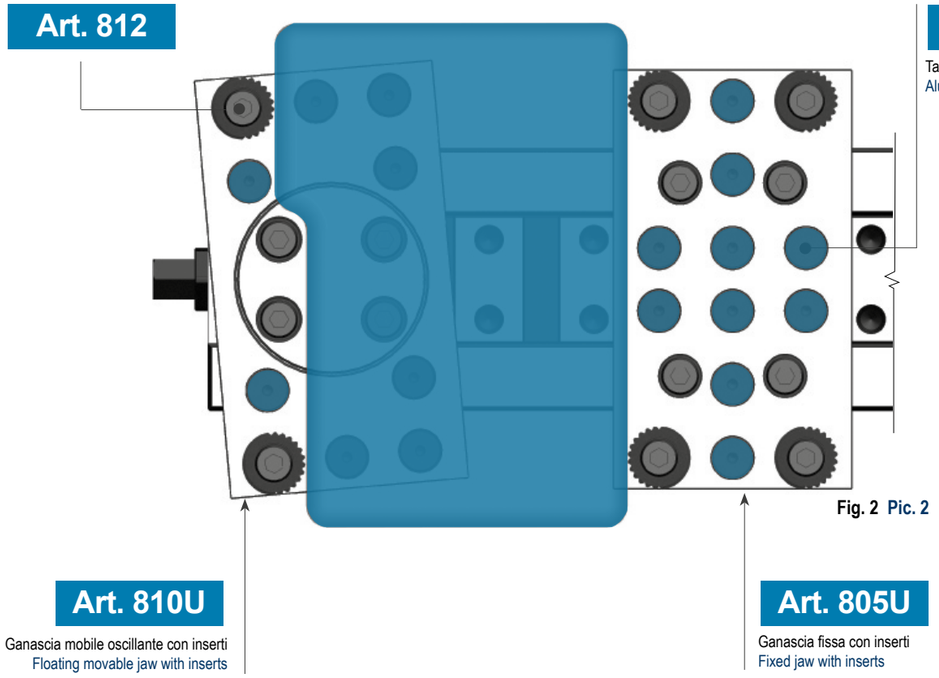


Fig. 2 Pic. 2

Le ganasce mobili oscillanti consentono il serraggio di pezzi di forma irregolare i cui lati non risultino paralleli (**Fig. 2**). Questo è reso possibile dall'albero a gradino (**Art. 810UZ - Fig. 1**), posto al centro della ganascia, che pur permettendo la rotazione della ganascia, ne mantiene la precisione ed evita il sollevamento del pezzo mentre viene lavorato.
Il tutto a garanzia di un serraggio in piena sicurezza. Gli inserti estremizzano ulteriormente la versatilità delle ganasce mobili oscillanti della morsa FMS.

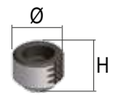
Floating movable jaws allow to clamp workpieces with irregular shapes whose sides are not parallels (**Pic. 2**).In fact thanks to the step block spindle (**Art. 810UZ - Pic. 1**), positioned in the centre of the jaw body, the jaw can float and guarantee at the same time maximum precision and no tilting of the parts while being worked.
The safety of the workholding is guaranteed. The insert further increase the versatility of the FMS floating movable jaws.

GANASCE FISSE & MOBILI FMS

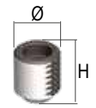
FMS FIXED AND MOVABLE JAWS

Tipo (grandezza) / Type (size)		1	2	3	4	5	6
Art. 810U* Ganascia mobile regolabile oscillante con inserti / Floating movable jaw with inserts		Cod. 5.81.0U100	5.81.0U200	5.81.0U300	5.81.0U400	5.81.0U500	5.81.0U600
* Set viti per fissaggio a richiesta - Set of fixing screws on request							
Art. 810UA Corpo ganascia mobile oscillante / Body floating movable jaw		Cod. 5.81.0UA10	5.81.0UA20	5.81.0UA30	5.81.0UA40	5.81.0UA50	5.81.0UA60
Art. 810UZ* Albero a gradino per ganasce mobili oscillanti / Step block pin for floating movable jaw		Cod. 5.81.0UZ10	5.81.0UZ20	5.81.0UZ30	5.81.0UZ40	5.81.0UZ50	5.81.0UZ60
* Set viti per fissaggio a richiesta - Set of fixing screws on request							
Art. 810Q* Ganascia mobile regolabile con inserti / Movable jaw with inserts		Cod. 5.81.0Q100	5.81.0Q200	5.81.0Q300	5.81.0Q400	5.81.0Q500	5.81.0Q600
* Set viti per fissaggio a richiesta - Set of fixing screws on request							
Art. 810QA Corpo ganascia regolabile mobile per inserti / Body movable jaw for inserts		Cod. 5.81.0QA10	5.81.0QA20	5.81.0QA03	5.81.0QA40	5.81.0QA50	5.81.0QA60
Art. 805U* Ganascia fissa regolabile con inserti / Fixed jaw with inserts		Cod. 5.80.5U100	5.80.5U200	5.80.5U300	5.80.5U400	5.80.5U500	5.80.5U600
* Set viti per fissaggio a richiesta - Set of fixing screws on request							
Art. 805UA Corpo ganascia fissa regolabile per inserti / Body fixed jaw per inserti		Cod. 5.80.5UA10	5.80.5UA20	5.80.5UA30	5.80.5UA40	5.80.5UA50	5.80.5UA60

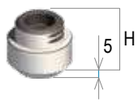
		Ø	30	40
		H	16	30
Art. 812	Inserto liscio e zigrinato / Smooth and serrated insert	Cod.	5.81.21000	5.81.25000
Art. 812A	Inserto liscio / Smooth insert	Cod.	5.81.2A100	5.81.2A500
Art. 812C	Inserto zigrinato / Serrated insert	Cod.	5.81.2C100	5.81.2C500



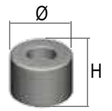
		Ø	30	40
		H	28	50
Art. 813	Inserto liscio e zigrinato alto / Smooth and serrated high insert	Cod.	5.81.31000	5.81.35000
Art. 813A	Inserto liscio alto / Smooth high insert	Cod.	5.81.3A100	5.81.3A500
Art. 813C	Inserto zigrinato alto / Serrated high insert	Cod.	5.81.3C100	5.81.3C500



		H	16	30
Art. 815	Inserto liscio e zigrinato a gradino / Pair of smooth and serrated step insert	Cod.	5.81.51000	5.81.55000
Art. 815A	Inserto liscio a gradino / Smooth step insert	Cod.	5.81.5A100	5.81.5A500
Art. 815C	Inserto zigrinato a gradino / Serrated step insert	Cod.	5.81.5C100	5.81.5C500



		Ø	40	60
		H	40	60
Art. 812B	Inserto in acciaio lavorabile / Insert in machineable steel metal	Cod.	5.81.2B100	5.81.2B500

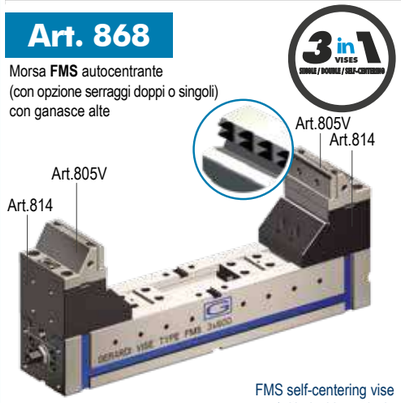


Art. 84U	Tappo in alluminio (EXTRA) / Aluminum cap (ETRA)	Cod.	5.84.U1000	5.84.U5000



Art. 868

Morsa **FMS** autocentrante
(con opzione serraggi doppi o singoli)
con ganasce alte



FMS self-centering vise
(with double or single
clamping option) with high jaws

Tipo (grandezza) morsa / Vise type (size)	1		2				3	
kN	25 kN		25 kN				30 kN	
A	130	230	182	282	382	482	244	344
B	99,5		117				137	
C	70		90				100	
D	232	332	300	400	500	600	400	500
E	249	349	320	420	520	620	425	525
F	169,5		207				237	
G	75		95				125	
H	75		85				98	
L	56		64				84	
J3	76	76	101				132	
J4	55	55	63				82	
X	39,5		47				57	
W	74		94				124	
kg	-		-				-	
Cod.	5.86.81200	5.86.81300	5.86.82300	5.86.82400	5.86.82500	5.86.82600	5.86.83400	5.86.83500

	3			4				5			6		
	30 kN			30 kN				32 kN			32 kN		
A	444	544	644	316	416	516	616	396	496	596	596	696	796
B	137			171				186			246		
C	100			120				140			160		
D	600	700	800	500	600	700	800	600	700	800	800	900	1000
E	625	725	825	525	625	725	825	625	725	825	825	925	1025
F	237			291				326			406		
G	125			145				170			190		
H	98			128				138			180		
L	84			97				107			107		
J3	132			154				169			189		
J4	82			96				106			106		
X	57			64				66			86		
W	124			144				169			189		
kg	-			-				-			-		
Cod.	5.86.83600	5.86.83700	5.86.83800	5.86.84500	5.86.84600	5.86.84700	5.86.84800	5.86.85600	5.86.85700	5.86.85800	5.86.86800	5.86.86900	5.86.86100
													7.687

Art. 868D



(Art. 868 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.8D120	5.86.8D130	5.86.8D230	5.86.8D240	5.86.8D250	5.86.8D260	5.86.8D340	5.86.8D350

Art. 802



Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

Art. 868E

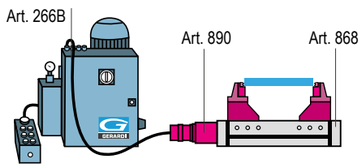


(Art. 868 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.86.8E120	5.86.8E130	5.86.8E230	5.86.8E240	5.86.8E250	5.86.8E260	5.86.8E340	5.86.8E350

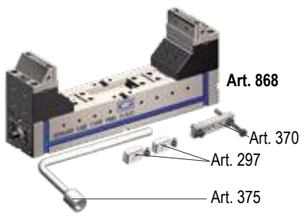
Art. 868F

(Art. 868 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit



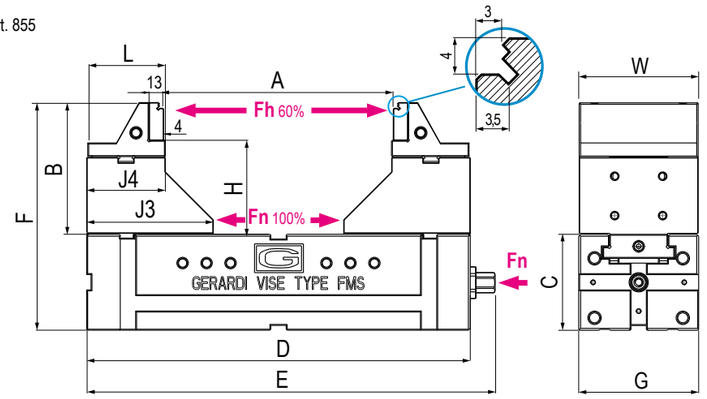
Cod.	5.86.8F120	5.86.8F130	5.86.8F230	5.86.8F240	5.86.8F250	5.86.8F260	5.86.8F340	5.86.8F350

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375

Art. 855



Art. 868D

(Art. 868 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.86.8D360	5.86.8D370	5.86.8D380	5.86.8D450	5.86.8D460	5.86.8D470	5.86.8D480	5.86.8D560	5.86.8D570	5.86.8D580	5.86.8D680	5.86.8D690	5.86.8D610

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 868E

(Art. 868 + 890) Morsa + motore idraulico / Vise + hydraulic motor

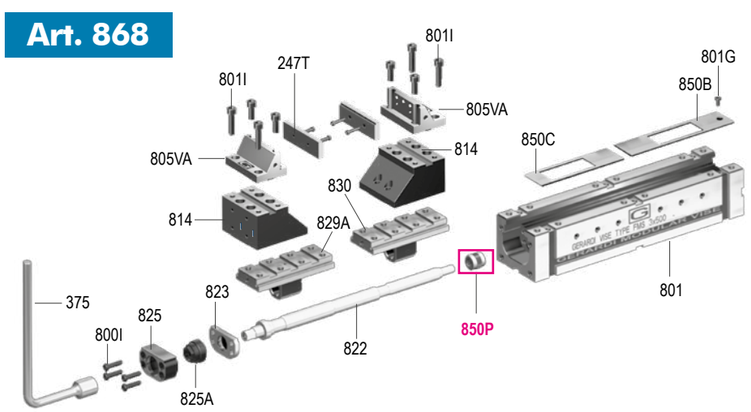
Cod.	5.86.8E360	5.86.8E370	5.86.8E380	5.86.8E450	5.86.8E460	5.86.8E470	5.86.8E480	5.86.8E560	5.86.8E570	5.86.8E580	5.86.8E680	5.86.8E690	5.86.8E610

Art. 868F

(Art. 868 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.86.8F360	5.86.8F370	5.86.8F380	5.86.8F450	5.86.8F460	5.86.8F470	5.86.8F480	5.86.8F560	5.86.8F570	5.86.8F580	5.86.8F680	5.86.8F690	5.86.8F610

Art. 868

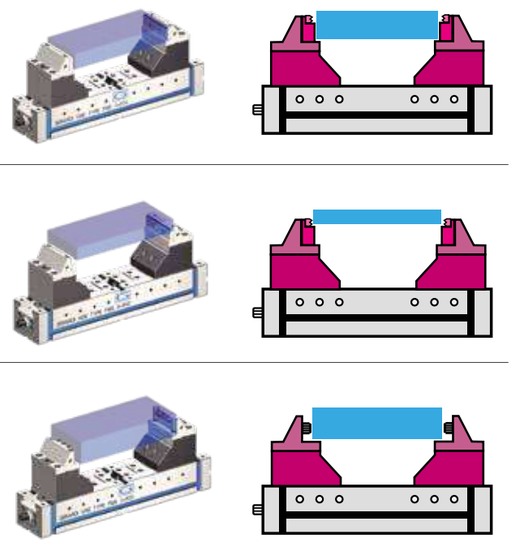


Art.	Pag.
375	4.35
800I	5.61
801	5.50
801G	5.61
801I	5.61
810J	5.56
822	5.53
823	5.59
825	5.59
825A	5.61
829A	5.52

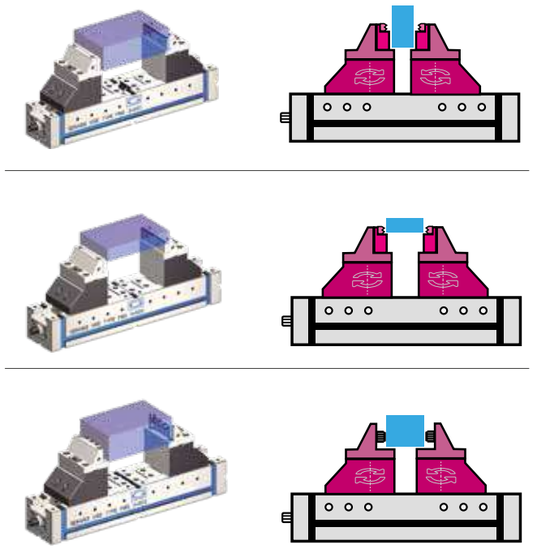
Art.	Pag.
830	5.52
850B	5.61
850C	5.61
850P	5.72
814	5.56
805VA	5.35
247T	5.35
-	-
-	-
-	-
-	-

POSSIBILI COMBINAZIONI DELLA MORSA Art.868
POSSIBLE ARRANGEMENTS OF THE Art.868 VISE

Orientamento base mobile Art.814 per massima apertura ganasce
Movable base Art.814 oriented for the maximum jaws opening



Orientamento base mobile Art.814 per chiusura ganasce a zero
Movable base Art.814 oriented in order to close jaws completely



Art. 868

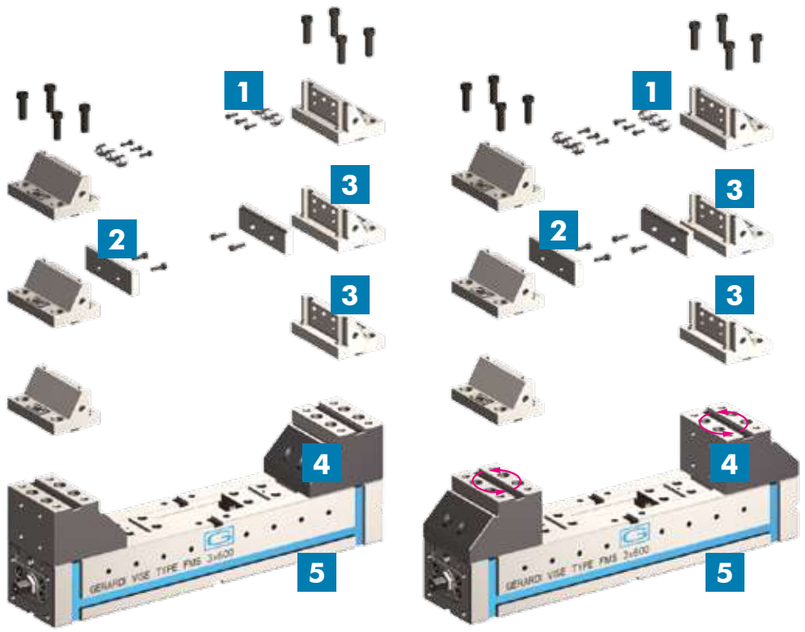
1 Art.90
PUNTALE TEMPRATO GRIP
HARDENED GRIP POINT

2 Art.247T
PIASTRINA PIANA GRIP
STRAIGHT JAW PLATE GRIP

3 Art.805VA
CORPO GANASCIA
JAW PLATE BODY

4 Art.814
BASE PER GANASCE FISSE
BASE FOR FIXED JAWS

5 Art.855
CORPO BASE CUBO
CUBE BASE BODY



Possibilità di utilizzo di qualsiasi ganascia fissa FMS anzichè del corpo ganascia 805V. Possibilità di due posizioni per ciascuna ganascia fissa e per base ganascia mobile Art.814
Possibility to use each FMS fixed jaw instead of jaw body Art.805V. Possibility of two positions (at 180°) for each fixed jaw and for movable base jaw Art.814

GANASCE & PIASTRE GANASCE PER Art.868
JAWS & JAW PLATES FOR Art.868

Tipo (grandezza) / Type (size)	1	2	3	4	5	6

Art. 805V*
Ganascia per piastrine e puntali
Jaw for plates and points



Cod.	5.80.5V100	5.80.5V200	5.80.5V300	5.80.5V400	5.80.5V500	5.80.5V600

* Viti per fissaggio a richiesta Fixing screws on request

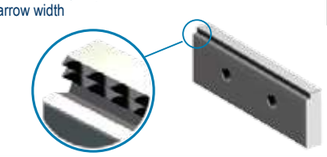
Art. 90
Puntale temprato GRIP
Hardened GRIP Insert



Cod.	5.90.10000

Art. 247T (W2)
Piastra piana temprata GRIP
con larghezza ridotta
Hardened straight jaw plate GRIP
with narrow width





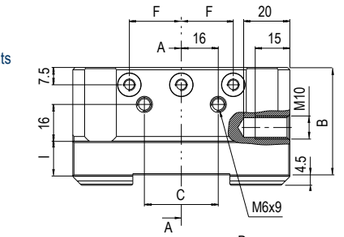
Cod.	4.24.7T100	4.24.7T200	4.24.7T300	4.24.7T400	4.24.7T500	4.24.7T600

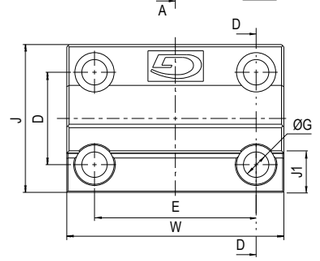
Per qualsiasi piastra piana speciale, raddoppiare il prezzo
For specia l taylor made straighr jaw plate double the price

PIASTRE GANASCE "GRIP" JAW PLATES

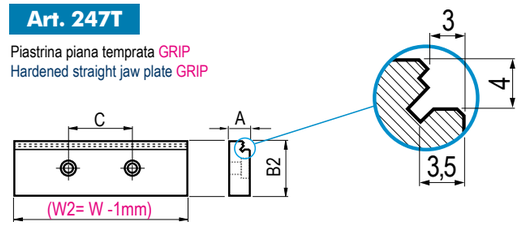
MINOR SUPERFICIE DI CONTATTO + PRESSIONE DI SERRAGGIO
LESS SURFACE CONTACT + CLAMPING PRESSURE

Art. 805VA
Corpo Ganascia
Jaw for plates and points

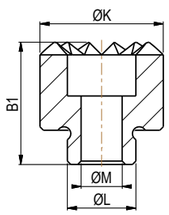




Art. 247T
Piastrina piana temprata GRIP
Hardened straight jaw plate GRIP



Art. 90
Puntale temprato GRIP
Hardened GRIP Point



mm	1	2	3	4	5	6
W	74	94	124	144	169	189
A	12	12	13	13	18	
B	39,5	47	57	61	66	86
B2	24,5	32	39	43	48	56
C	25	32	50	50	76	90
D	32	40	50	60	68	68
E	56	70	92	108	126	144
F	2X26	3x20	3x25	4x20	4x25	4x30
ØG	9	11	13	17	17	21
I	15	15	18	18	18	20
J	56	64	84	97	107	107
J1	17					
ØK	-	18				-
ØL	-	10 h8				-
ØM	-	6				-

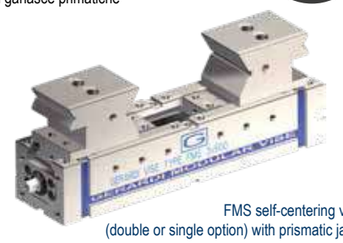
Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura minima - massima / minimum - maximum Aperture	A	10 / 25	10 / 25	20 / 50	20 / 50	20 / 50	20 / 50	40 / 100	40 / 100
Apertura minima - massima / minimum - maximum Aperture	A1	10 / 15	10 / 15	10 / 25	10 / 25	10 / 25	10 / 25	25 / 50	25 / 50
	B	34		55				90	
	C	70		90				100	
	D	232	332	300	400	500	600	400	500
	E	249	349	320	420	520	620	425	525
	F	104		145				190	
	G	75		95				125	
	J	48	60	102				132	
	W	50		75				100	
	kg	9	12	23	30	63	43	47	52
	Cod.	5.87.01200	5.87.01300	5.87.02300	5.87.02400	5.87.02500	5.87.02600	5.87.03400	5.87.03500

		3			4				5			6		
		30 kN			30 kN				32 kN			32 kN		
A		40 / 100	40 / 100	40 / 100	40 / 150	40 / 150	40 / 150	40 / 150	63 / 200	65 / 240	80 / 280	100 / 300	120 / 350	140 / 400
A1		25 / 50	25 / 50	25 / 50	30 / 60	30 / 60	30 / 60	30 / 60	35 / 70	35 / 70	35 / 80	40 / 140	40 / 140	40 / 140
B		90			132				171	191	226	250	275	300
C		100			120				140			160		
D		600	700	800	500	600	700	800	600	700	800	800	900	1000
E		625	725	825	525	625	725	825	625	725	825	825	925	1025
F		190			252				311	331	366	410	435	460
G		125			145				170			190		
J		132			156				176			174		
W		100			132				140			160		
kg		57	62	67	74	82	91	99	135	145	155	225	245	265
Cod.		5.87.03600	5.87.03700	5.87.03800	5.87.04500	5.87.04600	5.87.04700	5.87.04800	5.87.05600	5.87.05700	5.87.05800	5.87.06800	5.87.06900	5.87.06100

Art. 870

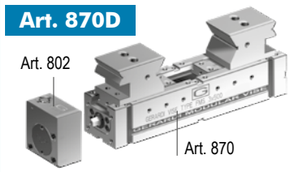
3 in 1 VISES SINGLE / DOUBLE / SELF-CENTERING

Morsa **FMS** autocentrante
(opzione doppia o singola)
con ganasce primatiche



FMS self-centering vise
(double or single option) with prismatic jaws

Art. 870D



(Art. 870 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.87.0D120	5.87.0D130	5.87.0D230	5.87.0D240	5.87.0D250	5.87.0D260	5.87.0D340	5.87.0D350

Art. 802

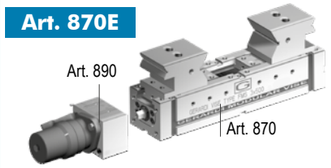


Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission

Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

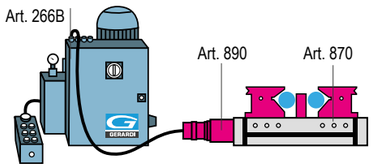
Art. 870E



(Art. 870 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.87.0E120	5.87.0E130	5.87.0E230	5.87.0E240	5.87.0E250	5.87.0E260	5.87.0E340	5.87.0E350

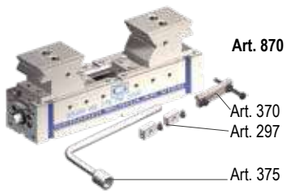
Art. 870F



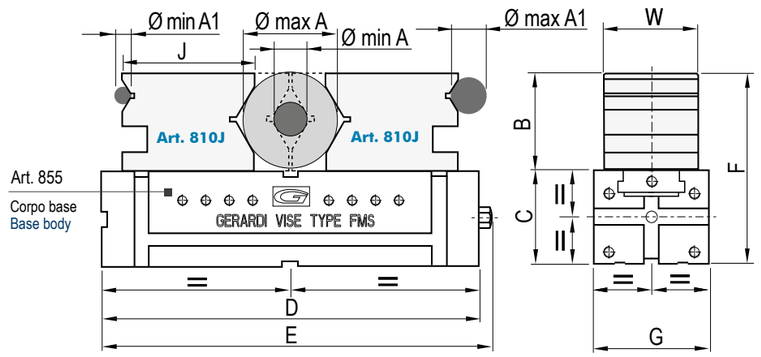
(Art. 870 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.87.0F120	5.87.0F130	5.87.0F230	5.87.0F240	5.87.0F250	5.87.0F260	5.87.0F340	5.87.0F350

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



Art. 870D

(Art. 870 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

Cod.	5.87.0D360	5.87.0D370	5.87.0D380	5.87.0D450	5.87.0D460	5.87.0D470	5.87.0D480	5.87.0D560	5.87.0D570	5.87.0D580	5.87.0D680	5.87.0D690	5.87.0D610

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 870E

(Art. 870 + 890) Morsa + motore idraulico / Vise + hydraulic motor

Cod.	5.87.0E360	5.87.0E370	5.87.0E380	5.87.0E450	5.87.0E460	5.87.0E470	5.87.0E480	5.87.0E560	5.87.0E570	5.87.0E580	5.87.0E680	5.87.0E690	5.87.0E610

Art. 870F

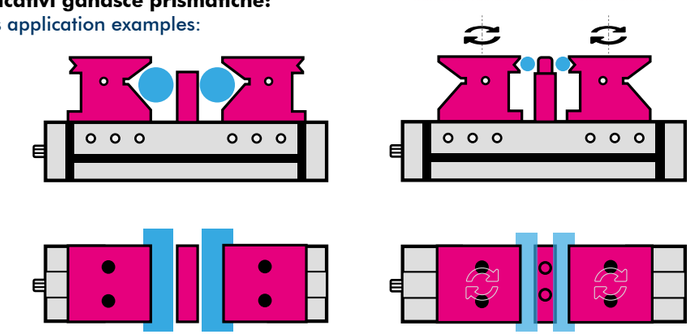
(Art. 870 + 890 + 266B) Morsa + motore idraulico + centralina / Vise + hydraulic motor + power unit

Cod.	5.87.0F360	5.87.0F370	5.87.0F380	5.87.0F450	5.87.0F460	5.87.0F470	5.87.0F480	5.87.0F560	5.87.0F570	5.87.0F580	5.87.0F680	5.87.0F690	5.87.0F610

Art. 870

Esempi applicativi ganasce prismatiche:
Prismatic jaws application examples:

Ganascie ruotate di 180° - Jaws rotated 180°





Art. 870A

Pag.5.54 Page. 5.54

Per il serraggio di 2 particolari tondi contemporaneamente per mezzo della ganascia intermedia alta Art.870A
For clamping 2 round workpieces simultaneously by intermediate high jaw Art.870A

N.B: Realizzabili versioni speciali per diametro **Max.1500** - Special Types available on request for **up to Ø1500**

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura massima / Maximum opening	A	85	185	170	270	370	470	230	330
Minima apertura interno-esterno / Minimum opening inside-outside	A1	115 / 200	115 / 300	130 / 300	130 / 400	130 / 500	130 / 600	170 / 400	170 / 500

Art. 800

SPECIFICA SOLO PER SERRAGGI SINGOLI
SPECIFIC FOR SINGLE CLAMPING ONLY

Morsa a Serraggio Meccanico solo per serraggi singoli



Mechanical Clamping vise only for single clamping

B		25			30			40	
C		70			90			100	
D	232	332	300	400	500	600	400	500	
E	249	349	320	420	520	620	425	525	
G		75			95			125	
W		74			94			124	
kg	7	10	18	25	32	39	40	45	
Cod.	5.80.01200	5.80.01300	5.80.02300	5.80.02400	5.80.02500	5.80.02600	5.80.03400	5.80.03500	

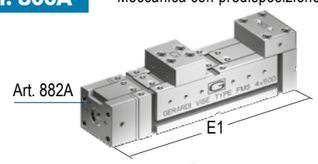
Art. 800Z

Corpo morsa
Vise body

Cod.	5.80.0Z120	5.80.0Z130	5.80.0Z230	5.80.0Z240	5.80.0Z250	5.80.0Z260	5.80.0Z340	5.80.0Z350

Art. 800A

Meccanica con predisposizione idraulica solo per serraggi singoli / Mechanical with prepared hydraulic connection only for single clamping



E1	273	373	370,5	470,5	570,5	670,5	485	585
Cod.	5.80.0A120	5.80.0A130	5.80.0A230	5.80.0A240	5.80.0A250	5.80.0A260	5.80.0A340	5.80.0A350

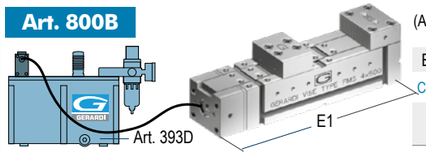
Connettore Idraulico - Hydraulic Connexion

Art. 882A



Corsa - Stroke mm	4	7	10
Superficie - Surface cm^2	6	21	21
Pressione - Pressure bar	417	119	143

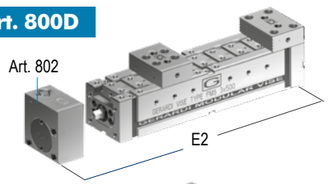
Art. 800B



(Art. 800A + Art.393) Morsa + centralina a comando manuale singolo / Vise + power unit with single manual control

E1	273	373	370,5	470,5	570,5	670,5	485	585
Cod.	5.80.0B120	5.80.0B130	5.80.0B230	5.80.0B240	5.80.0B250	5.80.0B260	5.80.0B340	5.80.0B350

Art. 800D



(Art. 800 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

E2	277	377	360	460	560	660	470	570
Nm	Max 20		Max 25				Max 20	
Cod.	5.80.0D120	5.80.0D130	5.80.0D230	5.80.0D240	5.80.0D250	5.80.0D260	5.80.0D340	5.80.0D350

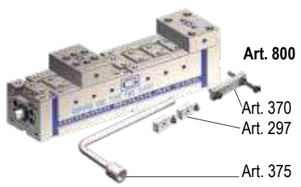
Art. 802



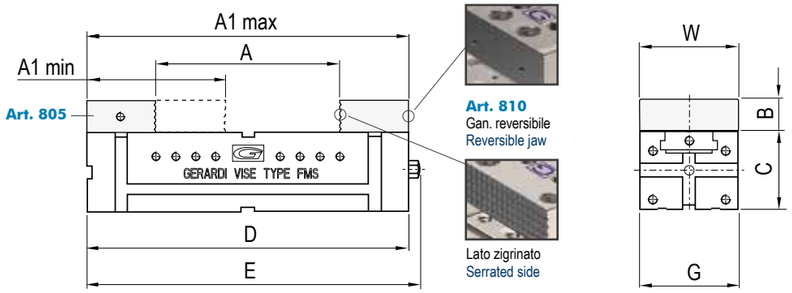
Moltiplicatore di coppia con rinvio angolare - Mechanical with torque multiplier with angular transmission
Chiave dinamometrica Art.357 **(Consigliata)** - Torque wrench Art.357 **(Suggested)**

Cod.	5.80.21000	5.80.22000	5.80.23000

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



		3			4				5			6		
		30 kN			30 kN				32 kN			32 kN		
A	430	530	630	300	400	500	600	380	480	580	580	680	780	
A1	170 / 600	170 / 700	170 / 800	200 / 500	200 / 600	200 / 700	200 / 800	220 / 600	220 / 700	220 / 800	220 / 800	220 / 800	220 / 100	
B		40			50				60			60		
C		100			120				140			160		
D	600	700	800	500	600	700	800	600	700	800	800	900	1000	
E	625	725	825	525	625	725	825	625	725	825	825	925	1025	
G		125			145				170			190		
W		124			144				169			189		
kg	50	55	60	66	72	80	88	115	125	135	170	190	210	
Cod.	5.80.03600	5.80.03700	5.80.03800	5.80.04500	5.80.04600	5.80.04700	5.80.04800	5.80.05600	5.80.05700	5.80.05800	5.80.06800	5.80.06900	5.80.06100	

Art. 800Z

Cod.	5.80.0Z360	5.80.0Z370	5.80.0Z380	5.80.0Z450	5.80.0Z460	5.80.0Z470	5.80.0Z480	5.80.0Z560	5.80.0Z570	5.80.0Z580	5.80.0Z680	5.80.0Z690	5.80.0Z610	

Art. 800A

Meccanica con predisposizione idraulica solo per serraggi singoli / Mechanical with prepared hydraulic connection only for single clamping

E1	685	785	885	585	685	785	885	-	-	-	-	-	-	
Cod.	5.80.0A360	5.80.0A370	5.80.0A380	5.80.0A450	5.80.0A460	5.80.0A470	5.80.0A480	5.80.0A560	5.80.0A570	5.80.0A580	5.80.0A680	5.80.0A690	5.80.0A610	

Art. 882A

Connettore Idraulico - Hydraulic Connexion

		10			10				-			-		
		21			21				-			-		
		143			143				-			-		

Art. 800B

(Art. 800A + Art.393) Morsa + centralina a comando manuale singolo / Vise + power unit with single manual control

E1	685	785	885	585	685	785	885	-	-	-	-	-	-	
Cod.	5.80.0B360	5.80.0B370	5.80.0B380	5.80.0B450	5.80.0B460	5.80.0B470	5.80.0B480	5.80.0B560	5.80.0B570	5.80.0B580	5.80.0B680	5.80.0B690	5.80.0B610	

Art. 800D

(Art. 800 + 802) Morsa + moltiplicatore di coppia / Vise + torque multiplier

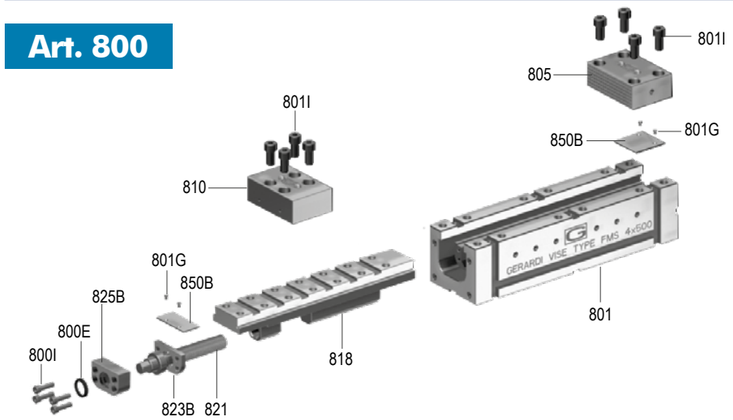
E2	670	770	870	570	670	770	870	685	785	885	-	-	-	
Nm	Max 20			Max 20				Max 20			Max 20			
Cod.	5.80.0D360	5.80.0D370	5.80.0D380	5.80.0D450	5.80.0D460	5.80.0D470	5.80.0D480	5.80.0D560	5.80.0D570	5.80.0D580	5.80.0D680	5.80.0D690	5.80.0D610	

Art. 802

Moltiplicatore di coppia con rivio angolare - Mechanical with torque multiplier with angular transmission

Cod.	5.80.23000	5.80.24000	5.80.25000	5.80.26000

Art. 800



Art.	Pag.	Art.	Pag.
800E	5.61	850B	5.61
800I	5.61	-	-
801	5.50	-	-
801G	5.61	-	-
801I	5.61	-	-
805	5.54	-	-
810	5.56	-	-
818	5.52	-	-
821	5.53	-	-
823B	5.59	-	-
825B	5.59	-	-

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN							40 kN	
Apertura massima / Maximum opening	A	-	-	-	-	-	-	232	332
Art. 900	B	-		-				40	
Morsa a Serraggio Meccanico con Limitatore di Forza solo per serraggi singoli	C	-		-				100	
	D	-	-	-	-	-	-	510	610
	E	-	-	-	-	-	-	400	500
	G	-		-				125	
	W	-		-				124	
	kg	-	-	-	-	-	-	-	44
	Cod.	-	-	-	-	-	-	5.90.03400	5.90.03500
SPECIFICA SOLO PER SERRAGGI SINGOLI		**ATTUALMENTE NON DISPONIBILI** - CURRENTLY NOT AVAILABLE							
SPECIFIC FOR SINGLE CLAMPING ONLY									



Mechanical Clamping vise with Limiting Device only for single clamping

Questa morsa, pur essendo parte del programma FMS, non è predisposta per serraggi doppi o autocentranti

AMPLIA LE TUE APPLICAZIONI TRAMITE GLI ACCESSORI MODULARI !

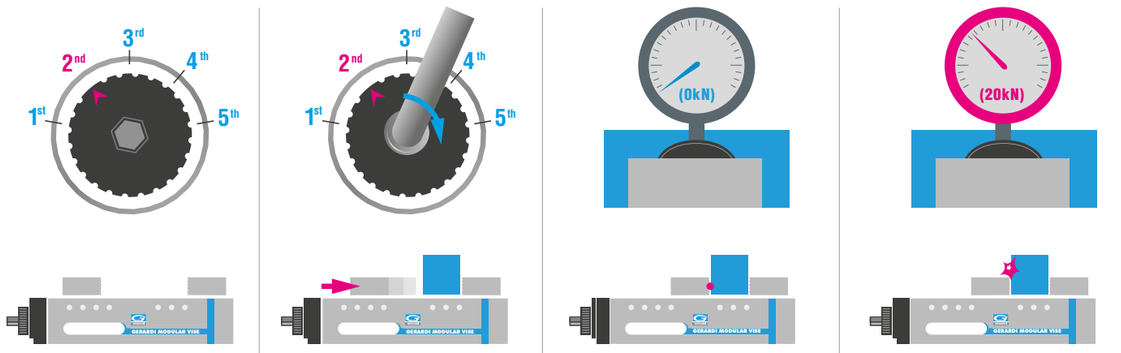
Art. 900Y



Modulo per serraggio idraulico
Module for hydraulic clamping

Cod.	-	-	5.90.0Y300	
	ATTUALMENTE NON DISPONIBILI - CURRENTLY NOT AVAILABLE			

FUNZIONAMENTO LIMITATORE DI FORZA - HOW TO USE THE LIMITING DEVICE



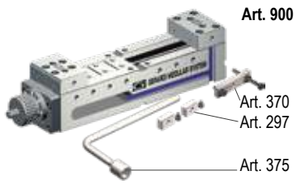
1 Scegliere forza di serraggio tramite ghiera limitatore di forza.
Presetting of the clamping force through the clamping limiter

2 Rapido avvicinamento ganascia mobile al pezzo da serrare
Quick approach of the jaw to the workpiece

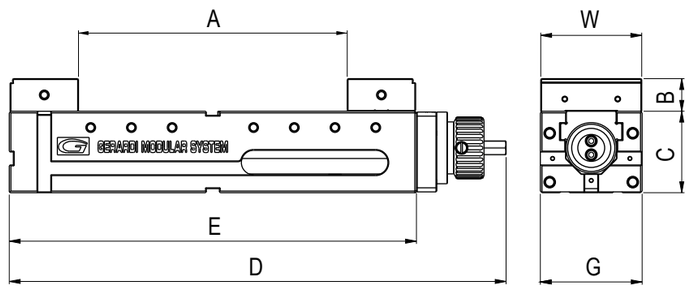
3 Contatto ganascia-particolare e sblocco frizione limitatore di forza.
First contact jaw-workpiece and clamping limiter friction release

4 Avvio meccanismo moltiplica forza
Fermarsi a fine corsa.
Force multiplier device start.
At the end-stroke stop clamping.

Dotazione standard:
- 2 arresti laterali Art. 370
- 1 coppia di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 chiave a pipa Art. 375



Standard equipment:
- 2 workstops Art. 370
- 1 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 box wrench Art. 375



	3			4				5			6		
	40 kN			46 kN				49 kN					
A	432	532	632	304	404	505	605	384	484	584	-	-	-
B		40			50				60			-	
C		100			120				140			-	
D	710	810	910	610	710	810	910	710	810	910	-	-	-
E	600	700	800	500	600	700	800	600	700	800	-	-	-
G		125			145				170			-	
W		124			144				169			-	
kg	-	-	-	57	-	-	-	99	-	-	-	-	-
Cod.	5.90.03600	5.90.03700	5.90.03800	5.90.04500	5.90.04600	5.90.04700	5.90.04800	5.90.05600	5.90.05700	5.90.05800	-	-	-
											ATTUALMENTE NON DISPONIBILI CURRENTLY NOT AVAILABLE		

This type of vise even if it is part of the FMS series is not suitable for double or self-centering clamping

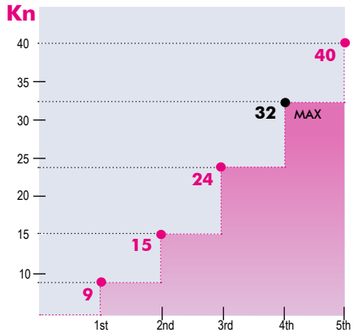
UPGRADE YOUR VISE APPLICATIONS THROUGH MODULAR ACCESSORIES !

Art. 900Y

Cod.	5.90.0Y300	5.90.0Y300	5.90.0Y300	-
				ATTUALMENTE NON DISPONIBILI CURRENTLY NOT AVAILABLE

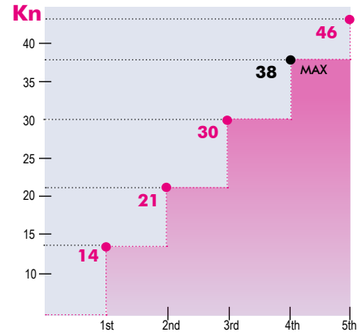
Diagrammi forze di serraggio - Diagrams with clamping force

Morse tipo 3
Vises type
VITE: Ø 24 mm / Ø 30 mm PASSO: 2 mm
SCREW: Ø 24 mm / Ø 30 mm PITCH: 2 mm
Chiave dinamometrica / Torque wrench



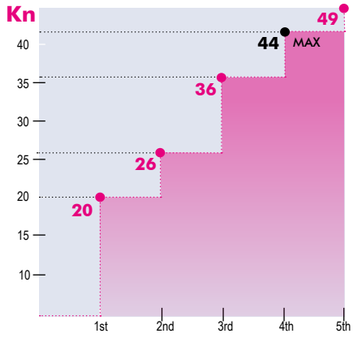
Posizioni ghiera limitatore / Fixed nut positions

Morse tipo 4
Vises type
VITE: Ø 24 mm / Ø 30 mm PASSO: 2 mm
SCREW: Ø 24 mm / Ø 30 mm PITCH: 2 mm
Chiave dinamometrica / Torque wrench



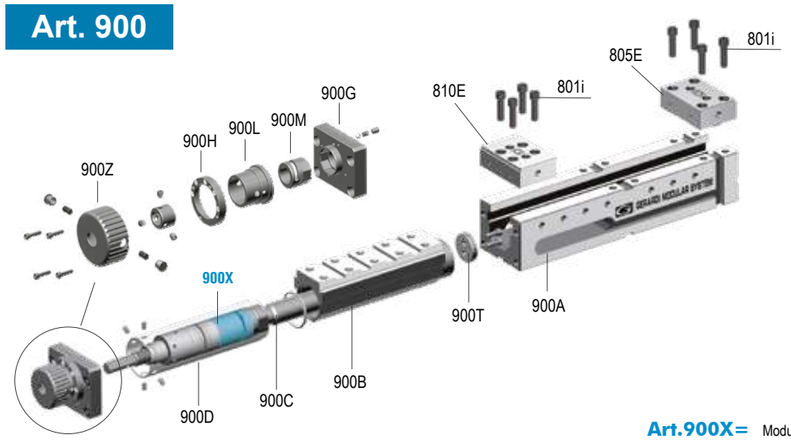
Posizioni ghiera limitatore / Fixed nut positions

Morse tipo 5
Vises type
VITE: Ø 24 mm / Ø 30 mm PASSO: 2 mm
SCREW: Ø 24 mm / Ø 30 mm PITCH: 2 mm
Chiave dinamometrica / Torque wrench



Posizioni ghiera limitatore / Fixed nut positions

Art. 900



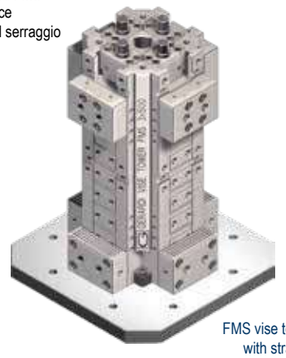
Art.	Pag.
900Y	40
810E	57
805E	55



Art.900X= Modulo per serraggio meccanico - Module for mechanical clamping

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura massima / Max. opening	A	85	185	170	270	370	470	230	330
Art. 800C	A1	115		130				170	
	B	25		30				40	
	D	200	300	300	400	500	600	400	500
	E	232	332	320	420	520	620	425	525
	G1	120		175				210	
	L	300		350				400	
	M	33		33				38	
	W	74		94				124	
	kg	30	45	53	70	88	106	90	112
	Cod.	5.80.0C120	5.80.0C130	5.80.0C230	5.80.0C240	5.80.0C250	5.80.0C260	5.80.0C340	5.80.0C350
Art. 800G	Cod.	5.80.0G120	5.80.0G130	5.80.0G230	5.80.0G240	5.80.0G250	5.80.0G260	5.80.0G340	5.80.0G350

Cubo-morsa FMS
con ganasce
piane per il serraggio
di 4 pezzi



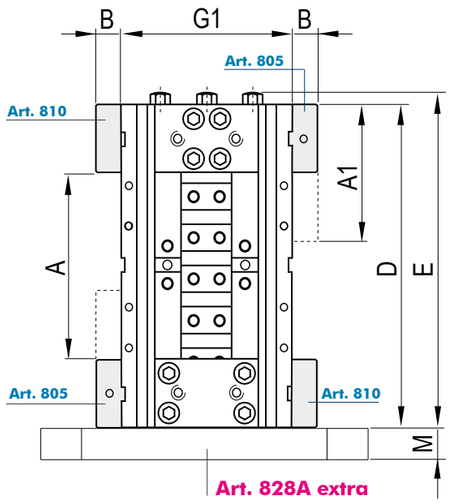
FMS vise tower
with straight
jaws for 4
clamping stations

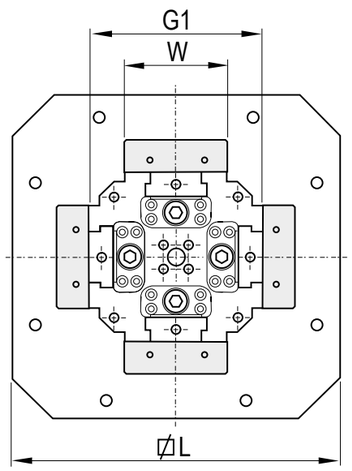
SPECIFICA SOLO PER SERRAGGI SINGOLI
SPECIFIC FOR SINGLE CLAMPING ONLY

Questa morsa, pur essendo parte del programma FMS, non è predisposta per serraggi doppi o autocentranti

Modulo base cubo morsa FMS (senza ganasce)
FMS vise tower base (without jaws)

GANASCE REVERSIBILI
REVERSIBLE JAWS

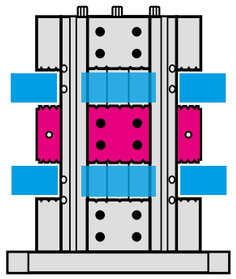






Dotazione standard per Art. 800C
- 1 chiave a pipa Art. 375
- 4 arresti laterali Art. 370
- 2 coppie di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 golfare di sollevamento Art. 848
- Imballo in cassa di legno

Standard equipment for Art. 800C
- 1 box wrench Art. 375
- 4 workstops Art. 370
- 2 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 lifting hook Art. 848
- Wooden box packaging

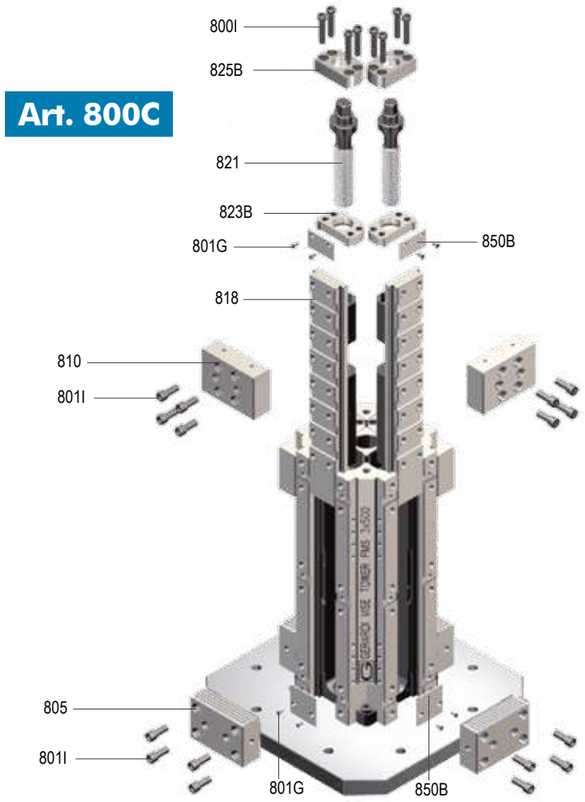


		3			4				5			6		
		30 kN			30 kN				32 kN			32 kN		
	A	430	530	630	300	400	500	600	380	480	580	480	580	680
	A1	170			509				630			810		
	B	40			50				60			60		
	D	600	700	800	500	600	700	800	600	700	800	800	900	1000
	E	625	725	825	525	625	725	825	625	725	825	825	925	1025
	G1	210			245				280			290		
	L	400			450				500			550		
	M	38			38				38			38		
	W	124			144				169			189		
	kg	135	157	180	180	210	252	288	260	303	340	500	562	625
	Cod.	5.80.0C360	5.80.0C370	5.80.0C380	5.80.0C450	5.80.0C460	5.80.0C470	5.80.0C480	5.80.0C560	5.80.0C570	5.80.0C580	5.80.0C680	5.80.0C690	5.80.0C610
	Cod.	5.80.0G360	5.80.0G370	5.80.0G380	5.80.0G450	5.80.0G460	5.80.0G470	5.80.0G480	5.80.0G560	5.80.0G570	5.80.0G580	5.80.0G680	5.80.0G690	5.80.0G610

This type of vise even if it is part of the FMS series is not suitable for double or self-centering clamping

GANASCE REVERSIBILI
REVERSIBLE JAWS

Art. 800C



Esploso di cubo-morsa FMS con ganasce piane per il serraggio di 4 pezzi
Explose of FMS vise tower with straight jaws for 4 clamping stations

Art.	Pag.	Art.	Pag.
800I	5.61	-	-
801G	5.61	-	-
801I	5.61	-	-
810	5.56	-	-
818	5.52	-	-
821	5.53	-	-
823B	5.59	-	-
825B	5.59	-	-
850B	5.61	-	-
-	-	-	-
-	-	-	-

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
	kN	25 kN		25 kN				30 kN	
Apertura massima / Max. opening	A	2 x 16	2 x 66	2 x 54	2 x 104	2 x 154	2 x 204	2 x 74	2 x 124
Art. 860C	B	25		30				40	
Cubo-morsa FMS doppio per il serraggio di 8 pezzi	D	200	300	300	400	500	600	400	500
	E	232	332	320	420	520	620	425	525
	G1	120		175				210	
	L	300		350				400	
	M	33		33				38	
	W	74		94				124	
	kg	30	45	53	70	88	106	90	112
	Cod.	5.86.0C120	5.86.0C130	5.86.0C230	5.86.0C240	5.86.0C250	5.86.0C260	5.86.0C340	5.86.0C350
Art. 855C	Cod.	5.85.5C120	5.85.5C130	5.85.5C230	5.85.5C240	5.85.5C250	5.85.5C260	5.85.5C340	5.85.5C350

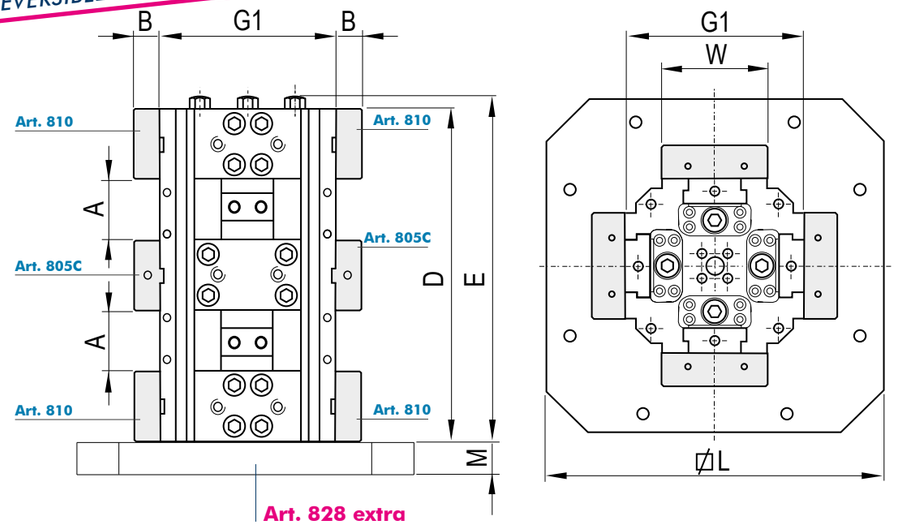


Double FMS vise tower for 8 clamping stations

Modulo base cubo morsa FMS doppia (senza ganasce)
FMS Double vise tower base (without jaws)

3			**4**				**5**			**6**		
30 kN			30 kN				32 kN			32 kN		
2 x 174	2 x 224	2 x 274	2 x 103	2 x 153	2 x 203	2 x 253	2 x 138	2 x 188	2 x 238	2 x 238	2 x 288	2 x 338
40			50				60			60		
600	700	800	500	600	700	800	600	700	800	800	900	1000
625	725	825	525	625	725	825	625	725	825	825	925	1025
210			245				280			290		
400			450				500			550		
38			38				38			38		
124			144				169			189		
135	157	180	180	210	252	288	260	303	340	500	562	625
Cod. 5.86.0C360	5.86.0C370	5.86.0C380	5.86.0C450	5.86.0C460	5.86.0C470	5.86.0C480	5.86.0C560	5.86.0C570	5.86.0C580	5.86.0C680	5.86.0C690	5.86.0C610
Cod. 5.85.5C360	5.85.5C370	5.85.5C380	5.85.5C450	5.85.5C460	5.85.5C470	5.85.5C480	5.85.5C560	5.85.5C570	5.85.5C580	5.85.5C680	5.85.5C690	5.85.5C610

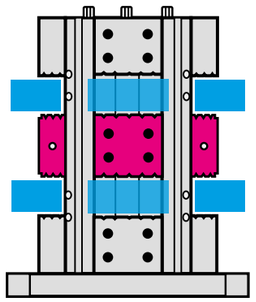
GANASCE REVERSIBILI
REVERSIBLE JAWS





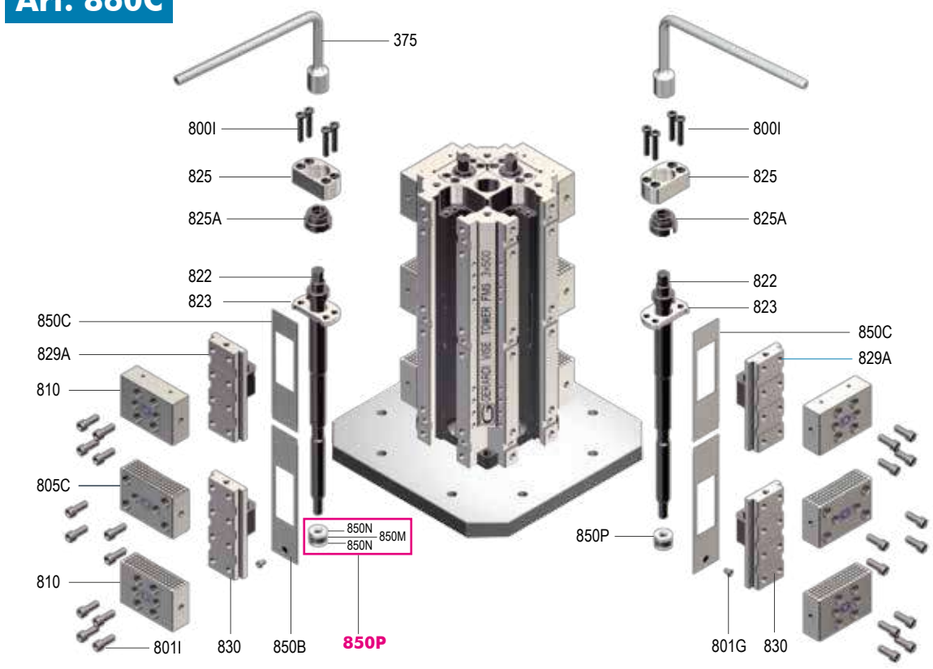
Dotazione standard per Art. 860C
- 1 chiave a pipa Art. 375
- 4 arresti laterali Art. 370
- 2 coppie di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 golfare di sollevamento Art. 848
- Imballo in cassa di legno
- Meccanismo 3a mano

Standard equipment for Art. 860C
- 1 box wrench Art. 375
- 4 workstops Art. 370
- 2 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 lifting hook Art. 848
- Wooden box packaging
- Third hand device



GANASCE REVERSIBILI
REVERSIBLE JAWS

Art. 860C



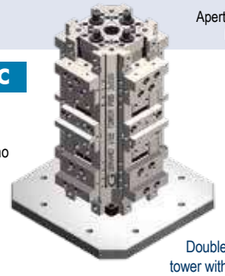
Art.	Pag.
375	4.35
800I	5.61
801G	5.61
801I	5.61
805C	5.54
810	5.56
822	5.53
823	5.59
825	5.59
825A	5.61
829A	5.52
830	5.52
850B	5.61
850C	5.61
850P	5.61
-	-
-	-

Tipo (grandezza) morsa / Vise type (size)		1		2				3	
kN		25 kN		25 kN				30 kN	
Apertura massima / Max. opening	A	2 x 60	2 x 110	2 x 118	2 x 168	2 x 218	2 x 268	2 x 162	2 x 212
Art. 863C	Cod.	5.86.3C120	5.86.3C130	5.86.3C230	5.86.3C240	5.86.3C250	5.86.3C260	5.86.3C340	5.86.3C350
Ø Apertura Minima / Massima Ø Minimum - Max Opening	A	10 / 25		10 / 50				25 / 100	
Art. 870C	Cod.	5.87.0C120	5.87.0C130	5.87.0C230	5.87.0C240	5.87.0C250	5.87.0C260	5.87.0C340	5.87.0C350
D		200	300	300	400	500	600	400	500
E		232	332	320	420	520	620	425	525
G1		120		175				210	
L		300		350				400	
M		33		33				38	
W		74		94				124	
W1		60		75				100	
kg		42	63	68	90	113	130	118	147

		3			4				5			6		
		30 kN			30 kN				32 kN			32 kN		
Apertura massima / Max. opening	A	2 x 262	2 x 312	2 x 362	2 x 204	2 x 254	2 x 304	2 x 354	2 x 254	2 x 304	2 x 354	2 x 354	2 x 404	2 x 454
Art. 863C	Cod.	5.86.3C360	5.86.3C370	5.86.3C380	5.86.3C450	5.86.3C460	5.86.3C470	5.86.3C480	5.86.3C560	5.86.3C570	5.86.3C580	5.86.3C680	5.86.3C690	5.86.3C610
Ø Apertura Minima / Massima Ø Minimum - Max Opening	A	25 / 100			30 / 150				35 / 200			40 / 300		
Art. 870C	Cod.	5.87.0C360	5.87.0C370	5.87.0C380	5.87.0C450	5.87.0C460	5.87.0C470	5.87.0C480	5.87.0C560	5.87.0C570	5.87.0C580	5.87.0C680	5.87.0C690	5.87.0C610
D		600	700	800	500	600	700	800	600	700	800	800	900	1000
E		625	725	825	525	625	725	825	625	725	825	825	925	1025
G1		210			245				280			290		
L		400			450				500			550		
M		38			38				38			38		
W		124			144				169			189		
W1		100			132				140			160		
kg		177	206	236	242	290	339	388	328	383	437	656	738	820

Art. 863C

Cubo morsa FMS doppio con ganasce a gradino per il serraggio di 8 pezzi



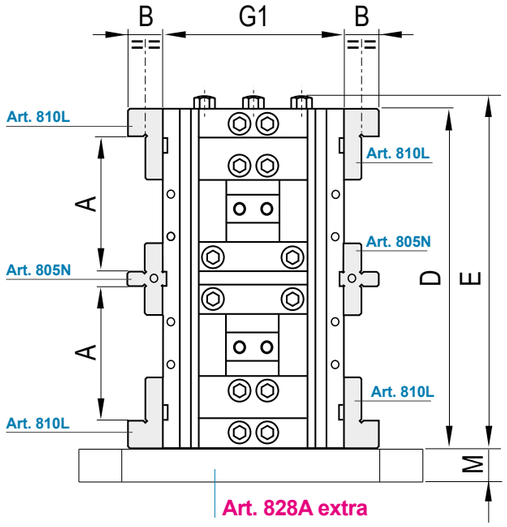
Double FMS vise tower with step-type jaws for 8 clamping stations

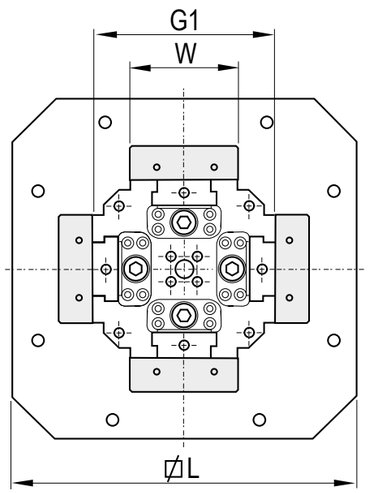
Art. 870C

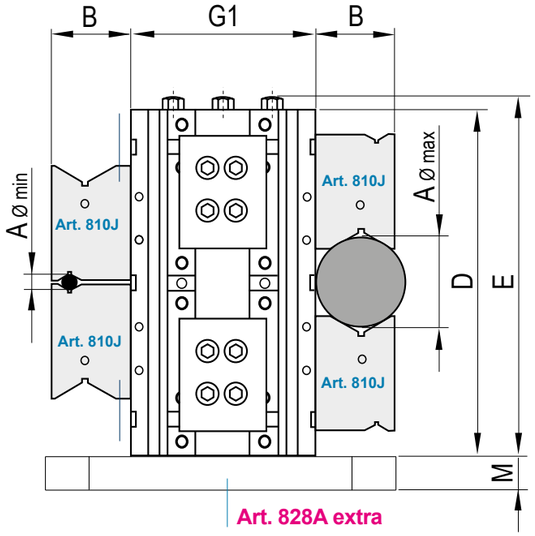
Cubo morsa FMS autocentrante con ganasce prismatiche

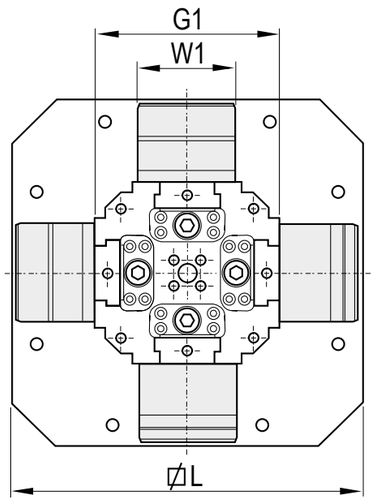


Self-centering FMS vise tower with prismatic jaws





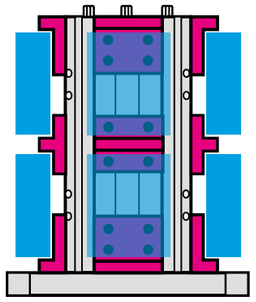


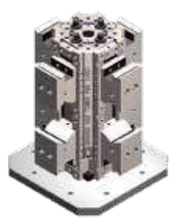




Dotazione standard per Art. 860C
- 1 chiave a pipa Art. 375
- 4 arresti laterali Art. 370
- 2 coppie di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 golfare di sollevamento Art. 848
- Imballo in cassa di legno
- Meccanismo 3a mano

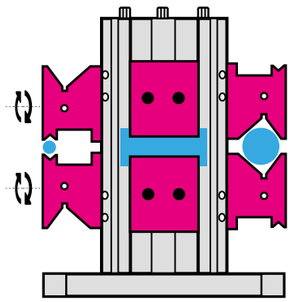
Standard equipment for Art. 860C
- 1 box wrench Art. 375
- 4 workstops Art. 370
- 2 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 lifting hook Art. 848
- Wooden box packaging
- Third hand device





Dotazione standard per Art. 863C e Art. 870C:
- 1 chiave a pipa Art. 375
- 4 arresti laterali Art. 370
- 2 coppie di tasselli di posizionamento per cava da 16 mm Art. 297
- 1 golfare di sollevamento Art. 848
- Imballo in cassetta di legno
- Meccanismo 3a mano

Standard equipment for Art. 863C and Art. 870C:
- 1 box wrench Art. 375
- 4 workstops Art. 370
- 2 pair of positioning key-nuts for 16 mm slot Art. 297
- 1 lifting hook Art. 848
- Packaging wooden box
- Third hand device



COMPONENTI PER CUBO FMS
SPARE PARTS FOR FMS CUBE

Art. 855C





Precisione / Accuracy

±0,02mm



Durezza / Hardened

HRC 58±2

1 Art.800I
VITI PER GANASCE
SCREWS FOR JAWS

2 Art.825A
GHIERA
NUT

3 Art.825B
PIASTRA DI CONTENIMENTO
SCREW HOLDING PLATE

4 Art.823
PIASTRA INTERMEDIA
MIDDLE PLATE

5 Art.804
CORPO BASE CUBO
CUBE BASE BODY

6 Art.822
VITE DI BLOCCAGGIO
MAIN SCREW

7 Art.850C
RIPARO
PROTECTION

8 Art.850B
RIPARO LATO VITE
PROTECTION SIDE SCREW

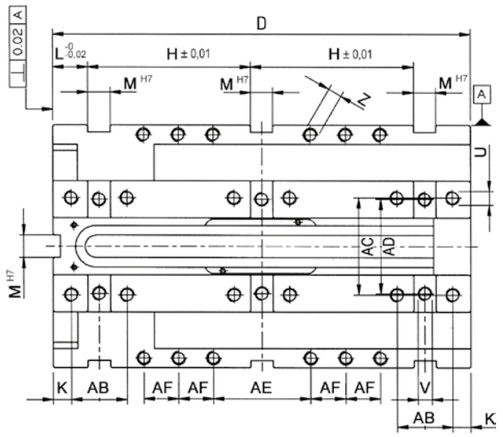
9 Art.830
SLITTA FILETTO DESTRO
SLIDE WITH RIGHT THREAD

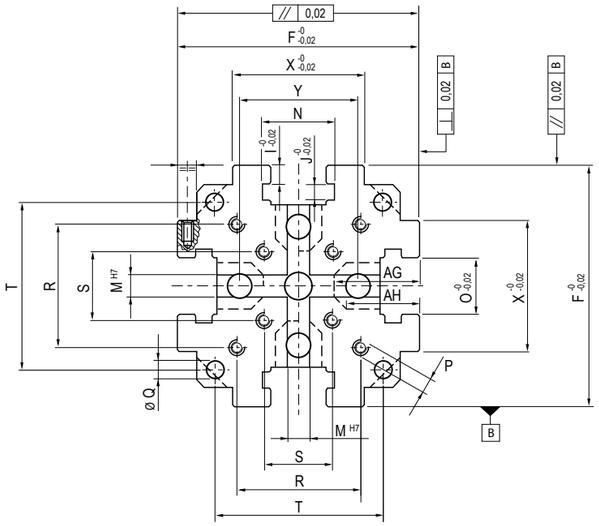
10 Art.829A
SLITTA FILETTO SINISTRO
SLIDE WITH LEFT THREAD

11 Art.850P
DISPOSITIVO TERZA MANO
THIRD HAND DEVICE

Tipo (grandezza) Type (size)	1		2				3					4				5			6		
Larghezza base / Base lenght	200	300	300	400	500	600	400	500	600	700	800	500	600	700	800	600	700	800	800	900	1000
Art. 804 Cod.	5.80. 41200	5.80. 41300	5.80. 42300	5.80. 42400	5.80. 42500	5.80. 42600	5.80. 43400	5.80. 43500	5.80. 43600	5.80. 43700	5.80. 43800	5.80. 44500	5.80. 44600	5.80. 44700	5.80. 44800	5.80. 45600	5.80. 45700	5.80. 45800	5.80. 46800	5.80. 46900	5.80. 46100
D	200	300	300	400	300	400	400	500	600	700	800	500	600	700	800	600	700	800	800	900	1000
F	140		175				210					245				280			290		
H	71	121	117	167	217	267	157	207	257	307	357	200	250	300	350	245	295	345	345	395	445
I	10		13				13					20				20			20		
J	10		12				12					18				18			18		
K	13		13				13					20				20			20		
L	21		25				35					42				47			47		
M	16		16				16					16				16			16		
N	45		53				76					86				96			110		
O	35		41				61					71				81			94		
P	M10		M12				M12					M16				M16			M20		
Q	11		13				13					13				17			17		
R	-		100				120					150				150			150		
S	-		40				40					40				50			50		
T	-		120				16					16				16			210		
U	M8		M10				M12					M16				M16			M20		
V	M8		M10				M12					M12				M12			M12		
Z	M10		M10				M10					M10				M10			M10		
X	75		95				125					145				170			190		
Y	70		85				110					125				140			130		
AB	32		40				50					60				68			68		
AC	56		70				92					108				126			144		
AD	56		68				92					106				126			144		
AE	50	70	70				100					100				100			125		
AF	10	25	50				50					50				50			50		
AG	49		62				62					80				95			105		
AH	41		53				72					70				82			95		



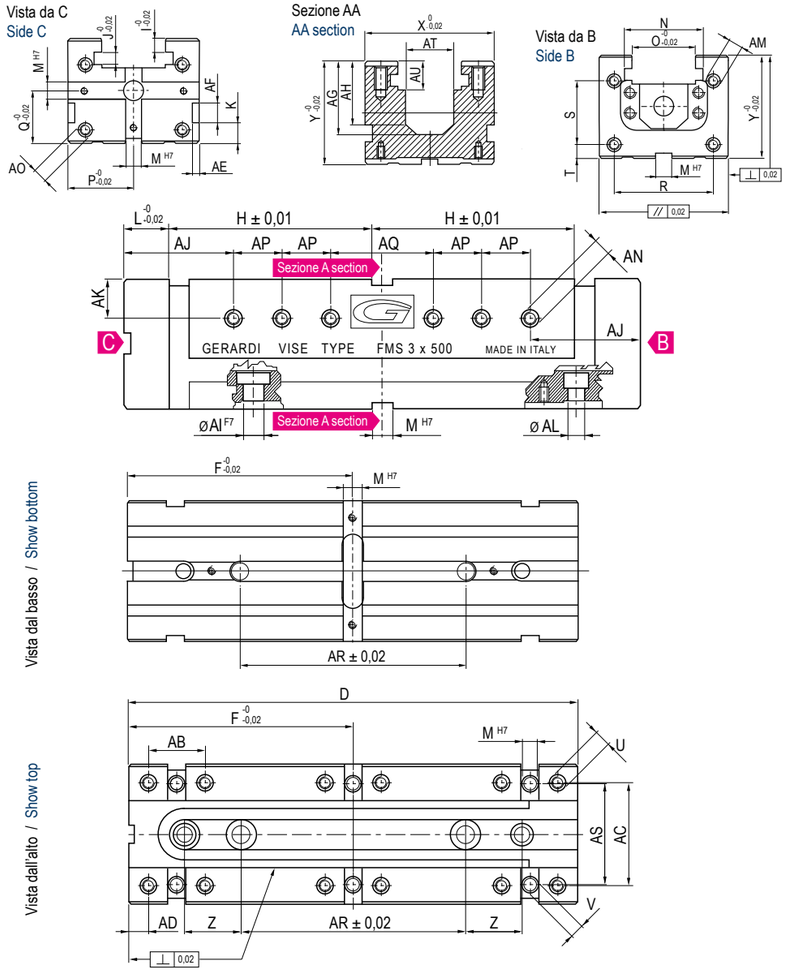




Tipo (grandezza) morsa / Vise type (size)

Art. 801

Base morsa FMS. Disegni e tabella dimensionale
FMS vise base body. Drawing and table dimension



	1		2	
kg	4,7	7,3	12,8	19
Cod.	5.80. 11200	5.80. 11300	5.80. 12300	5.80. 12400
D	200	300	300	400
F	100	150	150	200
H	71	121	117	167
I	10		13	
J	10		12	
K	15		20	
L	21		25	
M	16		16	
N	45		53	
O	35		41	
P	37,5		47,5	
Q	35		45	
R	52		70	
S	30		48	
T	20		22	
U	M8		M10	
V	M8		M10	
Z	50		50	
X	75		95	
Y	70		90	
AB	32		40	
AC	56		70	
AD	13		13	
AE	4		6	
AF	16		16	
AG	49		62	
AH	41		53	
AI	Ø 16 X 2		Ø 16 X 2	
AJ	55		65	
AK	20		27	
AL	Ø 11		Ø 13	
	n°0	n°2	n° 2	n° 2
AM	M10		M10	
AN	M10		M10	
	n°8	n°12	n° 12	n° 16
AO	M10		M10	
AP	20	25	50	
AQ	50	70	70	
AR	100	200	200	
AS	56		68	
AT	28		34	
AU	23		28	

	2		3					4				5			6		
kg	23	27	26	31	39	46	52	47	56	65	75	71	82	94	140	156	174
Cod.	5.80. 12500	5.80. 12600	5.80. 13400	5.80. 13500	5.80. 13600	5.80. 13700	5.80. 13800	5.80. 14500	5.80. 14600	5.80. 14700	5.80. 14800	5.80. 15600	5.80. 15700	5.80. 15800	5.80. 16800	5.80. 16900	5.80. 16100
D	500	600	400	500	600	700	800	500	600	700	800	600	700	800	800	900	1000
F	250	300	200	250	300	350	400	250	300	350	400	300	350	400	400	450	500
H	217	267	157	207	257	307	357	200	250	300	350	245	295	345	345	395	445
I	13				13				20				20			20	
J	12				12				18				18			18	
K	20				20				20				26			26	
L	25				35				42				47			47	
M	16				16				16				16			16	
N	53				76				86				96			110	
O	41				61				71				82			94	
P	47,5				62,5				72,5				85			95	
Q	45				50				60				70			80	
R	70				92				108				126			144	
S	48				62				72				92			100	
T	22				13				16				18			20	
U	M10				M12				M16				M16			M20	
V	M10				M12				M12				M12			M12	
Z	50				50				50				50			50	
X	95				125				145				170			190	
Y	90				100				120				140			160	
AB	40				50				60				68			68	
AC	70				92				108				126			144	
AD	13				18				20				21			20	
AE	6				6				10				10			10	
AF	16				16				16				16			16	
AG	62				72				80				95			105	
AH	53				62				70				82			95	
AI	Ø 16 x 2				Ø 16 x 2				Ø 16 x 2				Ø 16 x 2			Ø 16 x 2	
AJ	65				100				100				100			125	
AK	27				32				40				48			58	
AL	Ø 13				Ø 13				Ø 13				Ø 17			Ø 17	
	n° 4	n° 6	n° 2	n° 4	n° 6	n° 8	n° 10	n° 4	n° 6	n° 8	n° 10	n° 6	n° 8	n° 10	n° 10	n° 12	n° 14
AM	M10				M12				M12				M16			M20	
AN	M10				M10M				M10				M10				
	n° 20	n° 24	n° 8	n° 12	n° 16	n° 20	n° 24	n° 12	n° 16	n° 20	n° 24	n° 16	n° 20	n° 24	n° 24	n° 28	n° 32
AO	M10				M12				M16				M16			M20	
AP	50				50				50				50			50	
AQ	70				100				100				100			125	
AR	200				200				200			400	400	600	400	400	400
AS	68				92				106				126			144	
AT	34				44				44				52			49	
AU	28				28				41				41			41	

PIASTRE D'INTERFACCIA ZERO POINT

ZERO POINT CONNECTING PLATES

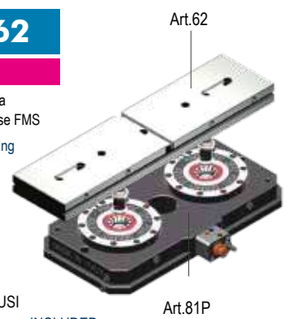
Tipo (grandezza) / Type (size)

Art. 62

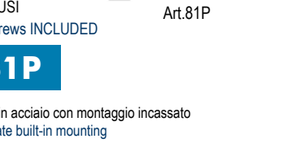
FMS

Piastra di interfaccia
Zero Point per morse FMS

Zero Point connecting
plate for FMS vises

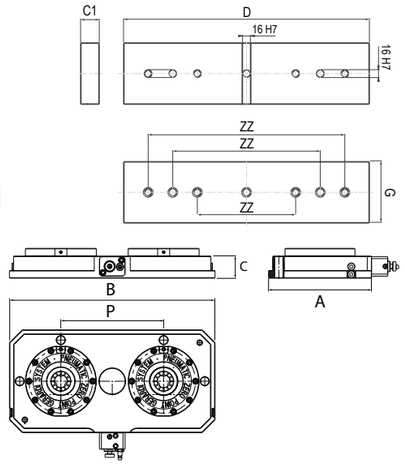


Tiranti e viti INCLUSI
Pull Studs and screws INCLUDED



Art. 81P

Piastra Zero Point in acciaio con montaggio incassato
Zero Point steel plate built-in mounting



	1		2	
D	232	332	300	400
G	75		95	
C1	38		38	
ZZ	200 / 300		200 / 300 / 400	
kg	5	7	11	13,4
Cod.	5.62.12000	5.62.13000	5.62.23000	5.62.24000
A	200		200	
B	400		400	
C	43		43	
Art. 665	Tipo / Type T.2		Tipo / Type T.2	
P	200		200	
kg	29		29	
Cod.	9.81.P2040S2		9.81.P2040S2	

	2		3					4				5			6		
D	500	600	400	500	600	700	800	500	600	700	800	600	700	800	800	900	1000
G	95		125					145				170			190		
C1	38		53					38				38			38		
ZZ	200 / 300 / 400		200 / 300 / 400					200 / 300 / 400				200 / 300 / 400			200 / 300 / 400		
kg	16,1	18,9	13,9	17,8	21,5	25,1	28,5	20,8	25	29,3	33,5	29	34	39	44	49	55
Cod.	5.62.25000	5.62.26000	5.62.34000	5.62.35000	5.62.36000	5.62.37000	5.62.38000	5.62.45000	5.62.46000	5.62.47000	5.62.48000	5.62.56000	5.62.57000	5.62.58000	5.62.68000	5.62.69000	5.62.61000
A	200		200	200	200	200		200	200	200		200	200		250	250	
B	600		400	500	600	800		500	600	800		600	800		800	1000	
C	43		43					43				43			43		
Art. 665	Tipo / Type T.2		Tipo / Type T.2					Tipo / Type T.2				Tipo / Type T.2			Tipo / Type T.3		
P	300		200	250	200x2		300x2	250	200x2		300x2	200x2		300x2	300x2		400x2
kg	42		29	41	42		59	41	42		59	42		59	68,5		81,5
Cod.	9.81.P2060S2		9.81. P2040S2	9.81. P2060S2	9.81.P2060S3		9.81. P2080S3	9.81. P2060S2	9.81.P2060S3		9.81. P2080S3	9.81.P2060S3		9.81. P2080S3	9.81.P32580S3		9.81. P325100S3

Tipo (grandezza) Type (size)	1		2				3					4				5			6		
Larghezza base / Base lenght	200	300	300	400	500	600	400	500	600	700	800	500	600	700	800	600	700	800	800	900	1000

Art. 818

Slitta integrale lunga
Solid long slide



Cod.	5.81. 81200	5.81. 81300	5.81. 82300	5.81. 82400	5.81. 82500	5.81. 82600	5.81. 83400	5.81. 83500	5.81. 83600	5.81. 83700	5.81. 83800	5.81. 84500	5.81. 84600	5.81. 84700	5.81. 84800	5.81. 85600	5.81. 85700	5.81. 85800	5.81. 86800	5.81. 86900	5.81. 86100
A	18		24				30					30				36			36		
A1	18		18				24					24				30			30		
A2	24		24				30					30				36			36		
B	35		45				50					60				70			80		
C	170	264	256	356	456	556	346	446	546	646	746	435	535	635	735	525	625	725	725	825	925
D	M8		M10				M12					M16				M16			M20		
E	72	116	102	142	182	222	132	182	232	282	332	156	216	276	336	174	242	310	242	310	378
F	48,5		61,5				71					80				95			106		
G	15	18	23				33					40				45			45		
H	2	3	2	3	4	5	2	3	4	5	6	2	3	4	5	2	3	4	2	3	4
I	10		13				13					20				20			20		
J	10		12				12					18				18			18		
K	-	-	5	7	9		5					5				6			9		
L	44		51				74					84				95			108		
M	16		16				16					16				16			16		
N	20		23				33					40				45			45		
O	35		41				61					71				82			94		
S	26	32	40				50					60				68			68		
T	20		25				38					44				44			54		
V	27		33				43					43				51			48		
W	10	16	24				34					44				52			52		

Art. 829A

Slitta con filetto destro
Slide with right thread



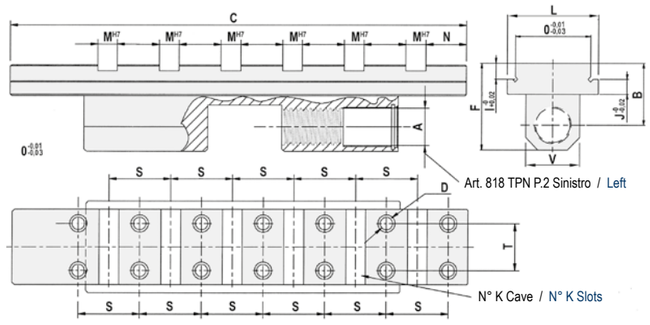
Cod.	5.82. 9A120	5.82. 9A130	5.82. 9A230	5.82. 9A240	5.82. 9A250	5.82. 9A260	5.82. 9A340	5.82. 9A350	5.82. 9A360	5.82. 9A370	5.82. 9A380	5.82. 9A450	5.82. 9A460	5.82. 9A470	5.82. 9A480	5.82. 9A560	5.82. 9A570	5.82. 9A580	5.82. 9A680	5.82. 9A690	5.82. 9A610

Art. 830

Slitta con filetto sinistro
Slide with left thread



Cod.	5.83. 01200	5.83. 01300	5.83. 02300	5.83. 02400	5.83. 02500	5.83. 02600	5.83. 03400	5.83. 03500	5.83. 03600	5.83. 03700	5.83. 03800	5.83. 04500	5.83. 04600	5.83. 04700	5.83. 04800	5.83. 05600	5.83. 05700	5.83. 05800	5.83. 06800	5.83. 06900	5.83. 06100



Tipo (grandezza) Type (size)	1		2				3					4				5			6		
Larghezza base / Base lenght	200	300	300	400	500	600	400	500	600	700	800	500	600	700	800	600	700	800	800	900	1000

Art. 821

Vite di bloccaggio con filetto sinistro
Main screw left thread



Cod.	5.82.11300		5.82.12600				5.82.14800					5.82.14800				5.82.16100			5.82.16100		
A	18		24				30					30				36			36		
A1	18		18				24					24				30			30		
A2	20		24				30					30				36			36		
B	16		16				19					19				19			19		
C	-		-				-					-				-			-		
D	35		35				45					45				48			48		
E	20		25				30					30				30			30		
F	82		33				42					42				115			115		
G	13		12				16					16				15			15		
H	152		135				136					186				225			225		
I	65		90				118					118				135			135		
J	14		12				15					15				20			20		
K	5		12				26					26				55			55		
L	55		9				11					11				80			80		
M	14		19				24					24				30			30		
N	242	333	308	399	500	600	414	499	599	699	822	499	599	699	797	610	700	790	790	881	961
O	12	17	25	32	52	52	25	35	54	87	121	35	54	87	121	47	71	101	101	81	100
P	65	84	84	98	116	151	123	123	140	124	118	123	140	124	118	176	158	140	140	205	187
Q	32	66	66	106	134	164	82	132	160	226	282	132	160	226	282	124	192	256	256	245	308
R	68	85	75	94	116	136	118	118	140	124	118	118	140	124	118	176	158	140	140	205	187
S	44	6	38	49	62	77	41	66	80	113	136	66	80	113	136	62	96	128	128	120	154
T	32		32				38					38				45			45		
U	21		15	20			25					25				25			25		
AA	10		10				15					15				22			22		
AB	10		10				12					12				15			15		

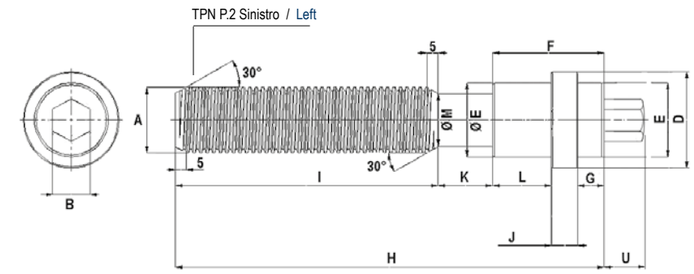
Art. 822

Vite di bloccaggio con filetto destro e sinistro
Main screw right and left thread

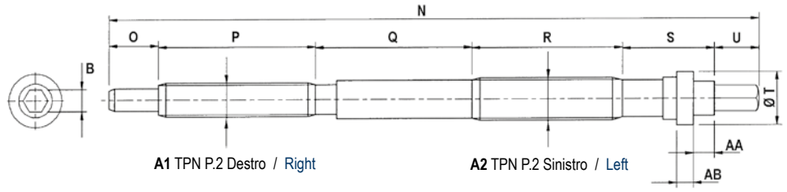
Viti con esagono maschio o femmina a seconda delle dimensioni
Screw available with external or internal exagon



Cod.	5.82. 21200	5.82. 21300	5.82. 22300	5.82. 22400	5.82. 22500	5.82. 22600	5.82. 23400	5.82. 23500	5.82. 23600	5.82. 23700	5.82. 23800	5.82. 23500	5.82. 23600	5.82. 23700	5.82. 23800	5.82. 25600	5.82. 25700	5.82. 25800	5.82. 26800	5.82. 26900	5.82. 26100



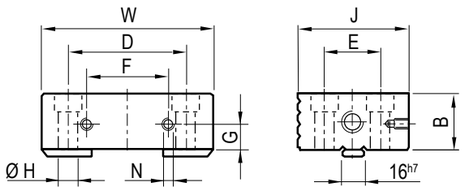
Passo Filetto - Thread Pitch	
TYPE	PITCH
T1 / T2 / T3	P2
T5x6	P2
T5x7	P2
T5x8	P3
T5x6	P3



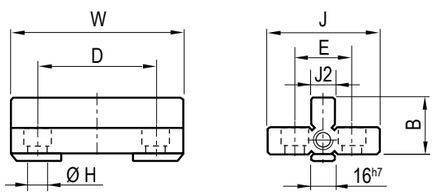
GANASCE FISSE PER MORSE FMS
FIXED JAWS FOR FMS VISES

Tipo (grandezza) / Type (size)		1	2	3	4	5	6
Art. 805* Ganascia fissa zigrinata da un lato / Fixed jaw one side serrated		Cod. 5.80.51000	5.80.52000	5.80.53000	5.80.54000	5.80.55000	5.80.56000
Art. 805A* Ganascia fissa liscia / Smooth fixed jaw		Cod. 5.80.5A100	5.80.5A200	5.80.5A300	5.80.5A400	5.80.5A500	5.80.5A600
Art. 805B* Ganascia fissa dolce / Soft fixed jaw		Cod. 5.80.5B100	5.80.5B200	5.80.5B300	5.80.5B400	5.80.5B500	5.80.5B600
Art. 805C* Ganascia fissa zigrinata da ambo i lati / Fixed jaw serrated on both sides		Cod. 5.80.5C100	5.80.5C200	5.80.5C300	5.80.5C400	5.80.5C500	5.80.5C600
Art. 870A* Ganascia fissa intermedia alta / Fixed Intermediate high jaw		Cod. 5.87.0A100	5.87.0A200	5.87.0A300	5.87.0A400	5.87.0A500	5.87.0A600

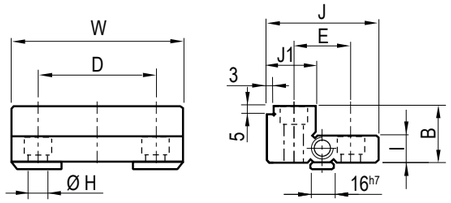
Art. 805 (Montata su Art. 860) / (Assembled on Art. 860)



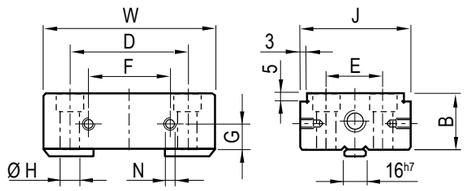
Art. 805N (Montata su Art. 863) / (Assembled on Art. 863)



Art. 805O Ganascia fissa con gradino piccolo e grande / Fixed jaw with small and large step



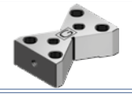
Art. 805F (Montata su Art. 866) / (Assembled on Art. 866)



Tipo (grandezza) morsa / Vise (type) size

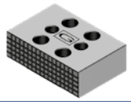
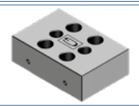
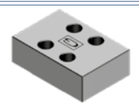
mm	1	2	3	4	5	6	Tolleranze Tolerance
W	74	94	124	144	169	189	-
J	56	64	84	98	108	108	- 0,02
J1	24	24	30	38	38	38	
J2	16	16	16	16	16	16	
B	25	30	40	50	60	60	- 0,02
D	56	70	92	108	126	144	-
E	32	40	50	60	68	68	-
F	40	50	65	65	65	100	-
G	10	10	15	20	25	25	-
H	9	11	13	17	17	22	-
I	12,5	15	20	25	30	30	- 0,02
N	M5	M6	M6	M6	M6	M6	-

* Set viti per fissaggio a richiesta - Fixing screws set on request

Tipo (grandezza) / Type (size)		1	2	3	4	5	6
Art. 805D* Ganascia fissa con gradino 3x5 zigrinata da un lato / Fixed jaw with 3x5 step on side serrated		Cod. 5.80.5D100	5.80.5D200	5.80.5D300	5.80.5D400	5.80.5D500	5.80.5D600
Art. 805E* Ganascia fissa con gradino 3x5 liscia / Fixed jaw with 3x5 step smooth		Cod. 5.80.5E100	5.80.5E200	5.80.5E300	5.80.5E400	5.80.5E500	5.80.5E600
Art. 805F* Ganascia fissa con doppio gradino 3x5 liscia / Fixed jaw with double 3x5 step smooth		Cod. 5.80.5F100	5.80.5F200	5.80.5F300	5.80.5F400	5.80.5F500	5.80.5F600
Art. 805G* Ganascia fissa con doppio gradino 3x5 zigrinata / Fixed jaw with double 3x5 step serrated		Cod. 5.80.5G100	5.80.5G200	5.80.5G300	5.80.5G400	5.80.5G500	5.80.5G600
Art. 805H* Ganascia fissa con prisma verticale / Fixed jaw with vertical prism		Cod. 5.80.5H100	5.80.5H200	5.80.5H300	5.80.5H400	5.80.5H500	5.80.5H600
Art. 805I* Ganascia fissa con doppio prisma verticale / Fixed jaw with double vertical prism		Cod. 5.80.5I100	5.80.5I200	5.80.5I300	5.80.5I400	5.80.5I500	5.80.5I600
Art. 805J* Ganascia fissa con prisma orizzontale / Fixed jaw with horizontal prism		Cod. 5.80.5J100	5.80.5J200	5.80.5J300	5.80.5J400	5.80.5J500	5.80.5J600
Art. 805K* Ganascia fissa con doppio prisma orizzontale / Fixed jaw with double horizontal prism		Cod. 5.80.5K100	5.80.5K200	5.80.5K300	5.80.5K400	5.80.5K500	5.80.5K600
Art. 805L* Ganascia fissa con gradino / Step fixed jaw		Cod. 5.80.5L100	5.80.5L200	5.80.5L300	5.80.5L400	5.80.5L500	5.80.5L600
Art. 805M* Ganascia fissa con gradino zigrinata da un lato / Step fixed jaw one side serrated		Cod. 5.80.5M100	5.80.5M200	5.80.5M300	5.80.5M400	5.80.5M500	5.80.5M600
Art. 805N* Ganascia fissa con doppio gradino / Fixed jaw with double step		Cod. 5.80.5N100	5.80.5N200	5.80.5N300	5.80.5N400	5.80.5N500	5.80.5N600
Art. 805O* Ganascia fissa con gradino piccolo e grande liscia da un lato / Fixed jaw with small and large step on side smooth		Cod. 5.80.5O100	5.80.5O200	5.80.5O300	5.80.5O400	5.80.5O500	5.80.5O600
Art. 805P* Ganascia fissa con gradino piccolo e grande zigrin. da un lato / Fixed jaw with small and large step one side serrated		Cod. 5.80.5P100	5.80.5P200	5.80.5P300	5.80.5P400	5.80.5P500	5.80.5P600
Art. 805Q* Ganascia fissa doppia con gradino piccolo e grande / Double fixed jaw with small and large step		Cod. 5.80.5Q100	5.80.5Q200	5.80.5Q300	5.80.5Q400	5.80.5Q500	5.80.5Q600
Art. 805R* Ganascia fissa in alluminio / Fixed jaw aluminium		Cod. 5.80.5R100	5.80.5R200	5.80.5R300	5.80.5R400	5.80.5R500	5.80.5R600
Art. 805T* Ganascia fissa doppia GRIP per forti serraggi / GRIP Double fixed jaw for strongest clamping		Cod. 5.80.5T100	5.80.5T200	5.80.5T300	5.80.5T400	5.80.5T500	5.80.5T600
Art. 805DT* Ganascia fissa a coda di rondine / Dove tail fixed jaw		Richiedere scheda tecnica - Technical data sheet on request Cod. 5.80.5DT10	5.80.5DT20	5.80.5DT30	5.80.5DT40	5.80.5DT50	5.80.5DT60

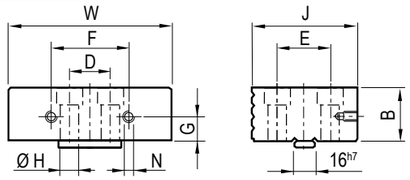
* Set viti per fissaggio a richiesta - Set of fixing screws on request

GANASCE MOBILI PER MORSE FMS
MOVABLE JAWS FOR FMS VISES

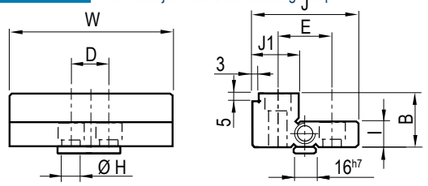
Tipo (grandezza) / Type (size)		1	2	3	4	5	6
Art. 810* Ganascia mobile zigrinata da un lato / Movable jaw one side serrated		Cod. 5.81.01000	5.81.02000	5.81.03000	5.81.04000	5.81.05000	5.81.06000
Art. 810A* Ganascia mobile liscia / Smooth movable jaw		Cod. 5.81.0A100	5.81.0A200	5.81.0A300	5.81.0A400	5.81.0A500	5.81.0A600
Art. 810B* Ganascia mobile dolce / Soft movable jaw		Cod. 5.81.0B100	5.81.0B200	5.81.0B300	5.81.0B400	5.81.0B500	5.81.0B600
Art. 810D* Ganascia mobile con gradino 3x5 zigrinata da un lato / Movable jaw with 3x5 step on side serrated		Cod. 5.81.0D100	5.81.0D200	5.81.0D300	5.81.0D400	5.81.0D500	5.81.0D600
Art. 814* Base mobile per ganasce fisse / Movable base for fixed jaws		Cod. 5.81.41200 / 5.81.41300	5.81.42000	5.81.43000	5.81.44000	5.81.45000	5.81.4.6000

Predisposizione per tutte le ganasce FMS fisse - Fit all FMS fixed jaws

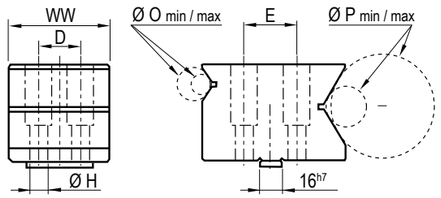
Art. 810 (Montata su Art. 860) / (Assembled on Art. 860)



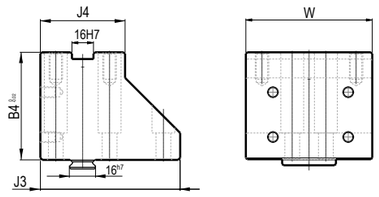
Art. 810O Ganascia mobile con gradino piccolo e grande / Movable jaw with small and large step



Art. 810J (Montata su Art. 870) / (Assembled on Art. 870)

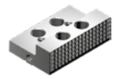
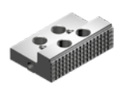
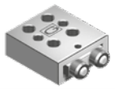


Art. 814 Base mobile per ganasce fisse - Movable base for fixed jaws



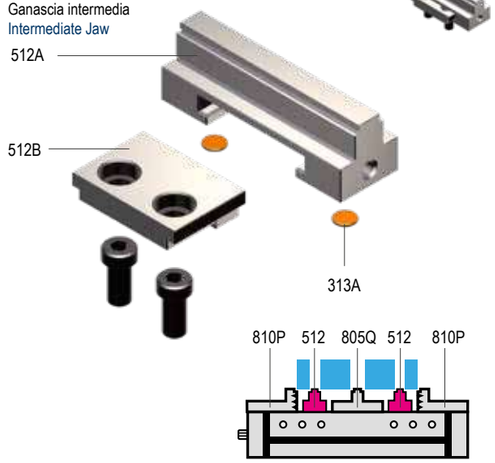
Tipo / Type	1x200	1x300	2	3	4	5	6	Tolleranze Tolerance
W	74		94	124	144	169	189	-
WW	60		75	100	132	140	160	-
B	25		30	40	50	60	60	- 0,02
B4	60		80	90	110	120	160	- 0,02
D	20		25	38	44	44	54	-
E	26	32	40	50	60	68	68	-
F	40		50	65	65	65	100	-
G	10		10	15	20	25	25	-
H	9		11	13	17	17	22	-
I	12,5		15	20	25	30	30	- 0,02
J	56		64	84	98	108	108	- 0,02
J1	24		24	30	38	38	38	- 0,02
J3	76	76	104	134	158	169	189	-
J4	55		63	83	97	106	107	-
N	M5		M6	M6	M6	M6	M6	-
Ø O	10 / 15		20 / 30	25 / 30	20 / 60	35 / 70	40 / 80	-
Ø P	10 / 25		20 / 50	40 / 100	45 / 150	63 / 200	73 / 300	-

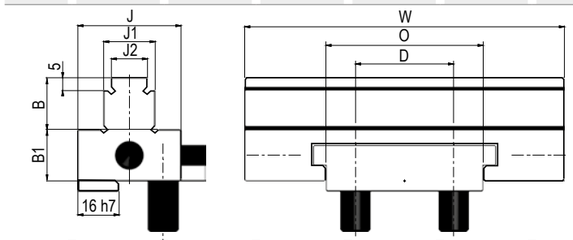
* Set viti per fissaggio a richiesta - Fixing screws set on request

Tipo (grandezza) / Type (size)		1	2	3	4	5	6
Art. 810E* Ganascia mobile con gradino 3x5 liscia / Movable jaw with 3x5 step smooth		Cod. 5.81.0E100	5.81.0E200	5.81.0E300	5.81.0E400	5.81.0E500	5.81.0E600
Art. 810J* Ganascia mobile prismatica per tondi liscia / Prismatic movable jaw for round parts smooth		Cod. 5.81.0J100	5.81.0J200	5.81.0J300	5.81.0J400	5.81.0J500	5.81.0J600
Art. 810K* Ganascia mobile prismatica per tondi zigrinata / Prismatic movable jaw for round parts serrated		Cod. 5.81.0K100	5.81.0K200	5.81.0K300	5.81.0K400	5.81.0K500	5.81.0K600
Art. 810L* Ganascia mobile con gradino / Step movable jaw		Cod. 5.81.0L100	5.81.0L200	5.81.0L300	5.81.0L400	5.81.0L500	5.81.0L600
Art. 810M* Ganascia mobile con gradino zigrinata da un lato / Step movable jaw one side serrated		Cod. 5.81.0M100	5.81.0M200	5.81.0M300	5.81.0M400	5.81.0M500	5.81.0M600
Art. 810O* Ganascia mobile con gradino piccolo e grande / Movable jaw with small and large step		Cod. 5.81.0O100	5.81.0O200	5.81.0O300	5.81.0O400	5.81.0O500	5.81.0O600
Art. 810P* Ganascia mobile con gradino piccolo e grande zigrin. da un lato / Movable jaw with small and large step one side serrated		Cod. 5.81.0P100	5.81.0P200	5.81.0P300	5.81.0P400	5.81.0P500	5.81.0P600
Art. 810R* Ganascia mobile in alluminio / Movable jaw aluminium		Cod. 5.81.0R100	5.81.0R200	5.81.0R300	5.81.0R400	5.81.0R500	5.81.0R600
Art. 810T* Ganascia mobile GRIP per forti serraggi / GRIP movable jaw for strongest clamping		Cod. 5.81.0T100	5.81.0T200	5.81.0T300	5.81.0T400	5.81.0T500	5.81.0T600
Art. 810DT Ganascia mobile a coda di rondine / Dove tail movable jaw		Richiedere scheda tecnica - Technical data sheet on request Cod. 5.81.0DT10	5.81.0DT20	5.81.0DT30	5.81.0DT40	5.81.0DT50	5.81.0DT60
Art. 810V* Ganascia mobile con segmenti oscillanti / Movable jaw with floating inserts		Cod. 5.81.0V100	5.81.0V200	5.81.0V300	5.81.0V400	5.81.0V500	5.81.0V600

Art. 512* Ganascia intermedia / Intermediate Jaw





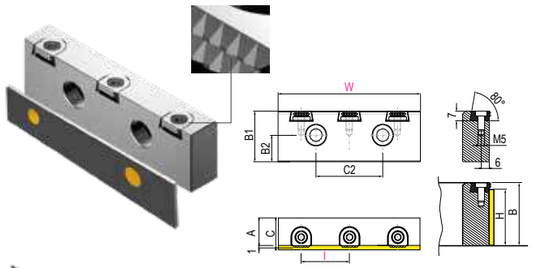


Type	1	2	3	4	5	6
W	74	94	124	144	169	189
J	25	35	40	40	50	50
J1	15	15	20	20	30	30
J2	9	9	14	14	19	19
B / B1	12,5	15	20	25	30	30
D	20	25	38	44	44	54
O	34	40	60	70	81	93

* Set viti per fissaggio a richiesta - Set of fixing screws on request

PIASTRE GANASCE PIANE CON INSERTI GRIP
STRAIGHT INSERT GRIP JAW PLATES

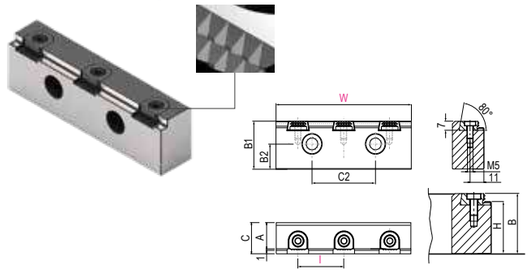
Art. 547G Piastra Piana con inserti GRIP
Straight plate with GRIP inserts



Dotazione Standard - Standard Equipment
1 pc. Art.414R parallela magnetica - 1 pc. Art.414R magnetic parallel

Tipe Type	1	2	3	4	5	6
W	74	94	124	144	169	189
I	26	33	23,5	29,5	23	27
C	22,7	22,7	22,7	22,7	22,7	22,7
C2	40	50	65	65	65	100
B	25	30	40	50	60	60
B1	25	30	40	50	60	60
B2	**10**	**10**	**15**	**20**	**25**	**25**
A	**20**	**20**	**20**	**20**	**20**	**20**
H	**20**	**25**	**35**	**45**	**55**	**55**
Cod.	5.54.7G100	5.54.7G200	5.54.7G300	5.54.7G400	5.54.7G500	5.54.7G600

Art. 547K Piastra Piana a gradino integrale con inserti GRIP
Straight integral step plate with GRIP inserts



Tipe Type	1	2	3	4	5	6
W	74	94	124	144	169	189
I	26	33	23,5	29,5	23	27
C	25	25	25	25	25	25
C2	40	50	65	65	65	10
B	25	30	40	50	60	60
B1	25	30	40	50	60	60
B2	**10**	**10**	**15**	**20**	**25**	**25**
A	**20**	**20**	**20**	**20**	**20**	**20**
H	**20**	**25**	**35**	**45**	**55**	**55**
Cod.	5.54.7K100	5.54.7K200	5.54.7K300	5.54.7K400	5.54.7K500	5.54.7K600

INSERTI GRIP PER MORSE FMS
INSERT GRIP JAW PLATES FOR FMS VISES

Art. 220 G01

Per materiali di durezza normale
For standard workpieces hardness clamping

Cod.	4.22.01000 / G01

Art. 220 G02

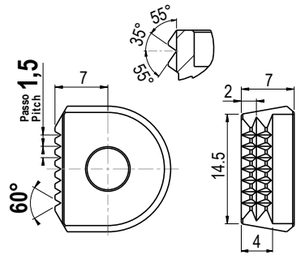
Per materiali di notevole durezza.
For hardened workpieces clamping

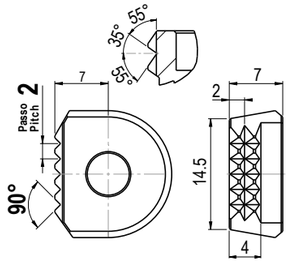
Cod.	4.22.01000 / G02

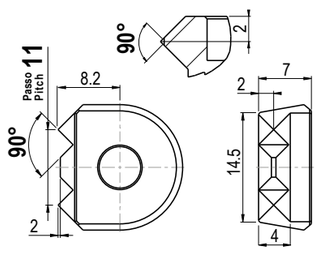
Art. 220 G11

Per materiali teneri
For soft material clamping

Cod.	4.22.01000 / G11







Tipo / Type	1	2	3	4	5	6
 Art.547G - Art.547K	3 pcs each	3 pcs each	5 pcs each	5 pcs each	7 pcs each	7 pcs each
Viti a testa bassa M5 x 10mm Low head screws M5 x 10mm	 3 pcs each	 3 pcs each	 5 pcs each	 5 pcs each	 7 pcs each	 7 pcs each

PIASTRE PER MORSE FMS
PLATES FOR FMS VISES

Tipo (grandezza) / Type	1	2	3	4	5	6

Art. 823
Piastra intermedia per Art. 855
Middle plate for Art. 855

Art. 823B
Piastra intermedia per Art. 800
Middle plate for Art. 800



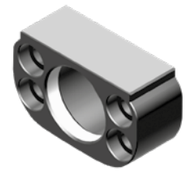
Cod.	5.82.31000	5.82.32000	5.82.33000	5.82.34000	5.82.35000	5.82.36000

Cod.	5.82.3B100	5.82.3B200	5.82.3B300	5.82.3B400	5.82.3B500	5.82.3B600

Art. 825
Piastra di contenimento vite per morsa FMS per Art. 855
Screw holding plate for FMS vise for Art. 855

Art. 825B
Piastra di contenimento vite per morsa FMS per Art. 800
Screw holding plate for FMS vise for Art. 800

Art. 825C
Piastra di contenimento vite per morsa FMS per Art. 855W
Screw holding plate for FMS vise for Art. 855W

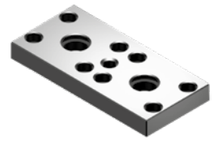


Cod.	5.82.51000	5.82.52000	5.82.53000	5.82.54000	5.82.55000	5.82.56000

Cod.	5.82.5B100	5.82.5B200	5.82.5B300	5.82.5B400	5.82.5B500	5.82.5B600

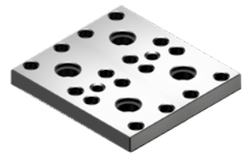
Cod.	5.82.5C100	5.82.5C200	5.82.5C300	5.82.5C400	5.82.5C500	5.82.5C600

Art. 831
Piastra di collegamento per **2** morse FMS
montate verticalmente dorso a dorso o fianco a fianco
Connecting plate for **2** FMS vises
vertcally mounted back-to-back or side by side



Cod.	5.83.11000	5.83.12000	5.83.13000	5.83.14000	5.83.15000	5.83.16000

Art. 832
Piastra di collegamento per **4** morse FMS montate verticalmente dorso a dorso o fianco a fianco
Connecting plate for **4** FMS vises
vertcally mounted back-to-back or side by side



Cod.	5.83.21000	5.83.22000	5.83.23000	5.83.24000	5.83.25000	5.83.26000

Art. 833
Piastra di collegamento personalizzata per **2** morse FMS
Connecting plate for **2** FMS vises tailor made

Cod.	5.83.31000	5.83.32000	5.83.33000	5.83.34000	5.83.35000	5.83.36000

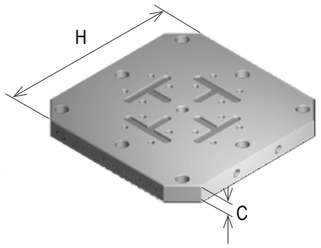
Art. 834
Piastra di collegamento personalizzata per **4** morse FMS
Connecting plate for **4** FMS vises tailor made

Cod.	5.83.41000	5.83.42000	5.83.43000	5.83.44000	5.83.45000	5.83.46000

PIASTRE BASE PER MORSE FMS
BASE PLATES FOR FMS VISES

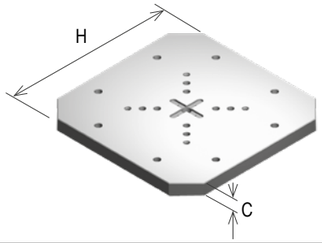
Tipo (grandezza) / Type (size)	1	2	3	4	5	6	7

Art. 827A
Piastra base pesonalizzata per una o più morse
Bussola di centraggio Art. 852 compresa
Tailor made head plate for one or more vises
Centering bushing Art. 852 included



	1	2	3	4	5	6	7
H	300	350	400	450	500	630	800
C	33	33	38	38	38	38	38
Kg	21,5	29,5	43,5	55	70	112	181
Cod.	5.82.7A100	5.82.7A200	5.82.7A300	5.82.7A400	5.82.7A500	5.82.7A600	5.82.7A700

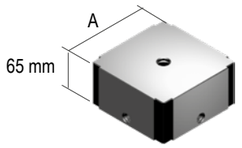
Art. 828A
Piastra base personalizzata per cubo morsa
bussola di centraggio Art. 852 compresa
Tailor made head plate for vise tower
Centering bushing Art. 852 included



	1	2	3	4	5	6	7
H	300	350	400	450	500	630	800
C	33	33	38	38	38	38	38
Kg	22	30	44,5	56,5	71	113	182
Cod.	5.82.8A100	5.82.8A200	5.82.8A300	5.82.8A400	5.82.8A500	5.82.8A600	5.82.8A700

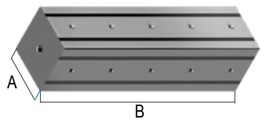
Tipo (grandezza) / Type (size)	1	2	3	4	5	6

Art. 835
Distanziale quadrato per **4** morse FMS
Square spacer for **4** FMS vises



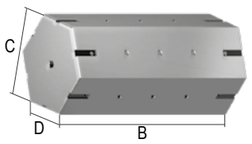
	1	2	3	4	5	6
A	75	95	125	145	170	190
Cod.	5.83.51000	5.83.52000	5.83.53000	5.83.54000	5.83.55000	5.83.56000

Art. 836
Supporto quadrato per **4** morse FMS
Square support for **4** FMS vises



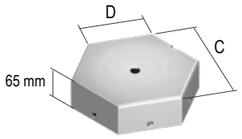
	1	2	3	4	5	6
A	75	95	125	145	170	190
B	200	300	400	500	600	800
Cod.	5.83.61000	5.83.62000	5.83.63000	5.83.64000	5.83.65000	5.83.66000

Art. 837
Supporto esagonale per **6** morse FMS
Exagon support for **6** FMS vises



	1	2	3	4	5	6
B	200	300	400	500	600	800
C	132	170	220	255	300	335
D	76 ~	98 ~	127 ~	147 ~	173 ~	193 ~
Cod.	5.83.71000	5.83.72000	5.83.73000	5.83.74000	5.83.75000	5.83.76000

Art. 838
Distanziale esagonale per **6** morse FMS
Exagon spacer for **6** FMS vises



	1	2	3	4	5	6
C	132	170	220	255	300	335
D	76 ~	98 ~	127 ~	147 ~	173 ~	193 ~
Cod.	5.83.81000	5.83.82000	5.83.83000	5.83.84000	5.83.85000	5.83.86000

Art. 852
Bussola di centraggio per piastra base
Centering bushing for base plate



	1	2	3	4	5	6
Cod.	5.85.21000	5.85.22000	5.85.23000	5.85.24000	5.85.25000	5.85.26000

Art. 853
Centraggio orizzontale per cubo FMS
Horizontal centering for FMS cube



	1	2	3	4	5	6
Cod.	5.85.31000	5.85.32000	5.85.33000	5.85.34000	5.85.35000	5.85.36000

Tipo (grandezza) / Type (size)	1	2	3	4	5	6

Art. 825A
Ghiera per morse e cubi FMS
Nut for FMS vises and cubes



	1	2	3	4	5	6
Cod.	5.82.5A100	5.82.5A200	5.82.5A300	5.82.5A400	5.82.5A500	5.82.5A600

Art. 850B
Riparo lato vite
Protection side screw



	1	2	3	4	5	6
Cod.	5.85.0B100	5.85.0B200	5.85.0B300	5.85.0B400	5.85.0B500	5.85.0B600

Art. 850C
Riparo
Protection



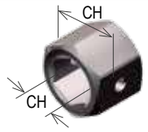
	1	2	3	4	5	6
Cod.	5.85.0C100	5.85.0C200	5.85.0C300	5.85.0C400	5.85.0C500	5.85.0C600

Art. 850P
Dispositivo "**Terza Mano**"
"**Third Hand**" device



	1	2	3	4	5	6
Cod.	5.85.0P100	5.85.0P200	5.85.0P300	5.85.0P400	5.85.0P500	5.85.0P600

Art. 850E
Bussola esagonale per innesto automatico
Hexagonal bushing for automatic connection



	1	2	3	4	5	6
CH	12 / 22	14 / 24	19 / 30	19 / 30	27 / 40	27 / 40
Cod.	5.85.0E100	5.85.0E200	5.85.0E300	5.85.0E400	5.85.0E500	5.85.0E600

Art. 850T
Distanziale per morsa solo autocentrante
Spacer for Self-centering vise only



	1	2	3	4	5	6
Cod.	5.85.0T100	5.85.0T200	5.85.0T300	5.85.0T400	5.85.0T500	5.85.0T600

Art. 850H
Chiave esagonale per morsa FMS e cubo
Hexagonal wrench for FMS vise and cube



	1	2	3	4	5	6
Cod.	5.85.0H100		5.85.0H300		5.85.0H500	

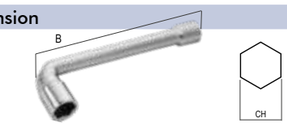
Art. 801S
Piastrina di collegamento slitte morsa
Slides vise connecting plate



	1	2	3	4	5	6
Cod.	5.80.1S100	5.80.1S200	5.80.1S300	5.80.1S400	5.80.1S500	5.80.1S600

Dimensioni / Dimension	CH	B	CH	B	CH	B	CH	B	CH	B	CH	B
	16	250	16	250	19	250	19	250	19	250	19	250
Cod.	4.37.516250		4.37.516250		4.37.519250		4.37.519250		4.37.519250		4.37.519250	

Art.375
Chiave a pipa
Box wrench



RICAMBI PER MORSE Art.800 - SPARE PARTS FOR VISES Art.800

	1	2	3	4	5	6
Cod.	5.80.0E100	5.80.0E200	5.80.0E300	5.80.0E400	5.80.0E500	5.80.0E600

Art. 800E
Guarnizione per slitta integrale
O ring for solid slide



Art. 801G
Grano di bloccaggio protezione centrale
Setscrew for clamping central protection



	1	2	3	4	5	6
Cod.	5.80.1G100	5.80.1G200	5.80.1G300	5.80.1G400	5.80.1G500	5.80.1G600

Art. 800I
Vite tcei per ganasce
Hex.socket head screw for jawsw

Art. 801H
Vite tcei per ganasce a gradino
Hex.socket head screw for step jaws

Art. 801I
Vite tcei per piastra di contenimento
Hex.socket head screw for screw holding plate



	1	2	3	4	5	6
Cod.	5.80.0I100	5.80.0I200	5.80.0I300	5.80.0I400	5.80.0I500	5.80.0I600
Cod.	5.80.1H100	5.80.1H200	5.80.1H300	5.80.1H400	5.80.1H500	5.80.1H600
Cod.	5.80.1I100	5.80.1I200	5.80.1I300	5.80.1I400	5.80.1I500	5.80.1I600

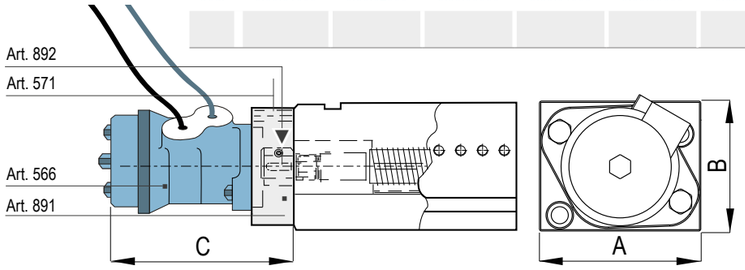
SERVOCOMANDI OLEODINAMICI PER MOTORI IDRAULICI
ELECTRO-HYDRAULIC POWER PACK FOR HYDRAULIC MOTORS

Tipo (grandezza) / Type (size)	1	2	3	4	5	6
Art. 566 *Motore idraulico / Hydraulic motor*	0MM32	OMP80	OMR200	OMR200	OMR200	OMR200
bar				140		
A mm	75	130	123	145	168	188
B mm	70	100	104	119	139	159
C mm	175	234	244	246	261	261
Cod.	5.89.01000	5.89.02000	5.89.03000	5.89.04000	5.89.05000	5.89.06000

Art.890

Art. 566 + Art. 571 + Art. 891 + Art. 892

Motore idraulico completo di piastra d' interfaccia, boccola e fine corsa elettronico regolabile
Hydraulic motor complete with connecting plate, bushing and adjustable electronic proximity switch



Cod.	5.89.11000	5.89.12000	5.89.13000	5.89.14000	5.89.15000	5.89.16000

Art. 891
Piastra attacco motore idraulico / Hydraulic motor mounting plate

Cod.	5.89.21000	5.89.22000	5.89.23000	5.89.24000	5.89.25000	5.89.26000

Art. 892
Boccola di trascinamento vite motore / Drive bushing screw-motor

Cod.	5.56.61000	5.56.62000	5.56.63000	5.56.63000	5.56.63000	5.56.63000

Art. 566
Motore Idraulico / Hydraulic motor

Cod.	5.57.11000	5.57.12000	5.57.13000	5.57.14000	5.57.15000	5.57.16000

Art. 571
Fine corsa elettronico / Electronic proximity switch

Tipo (grandezza) / Type (size)	1	2	3	4	5	6
Passo vite / screw pitch mm	2	2	2	2	3	3
bar	130	100	100	100	120	120
l/min	5	10	20	20	20	20
Cod.	5.89.0K101	5.89.0K201	5.89.0K301	5.89.0K401	5.89.0K501	5.89.0K601

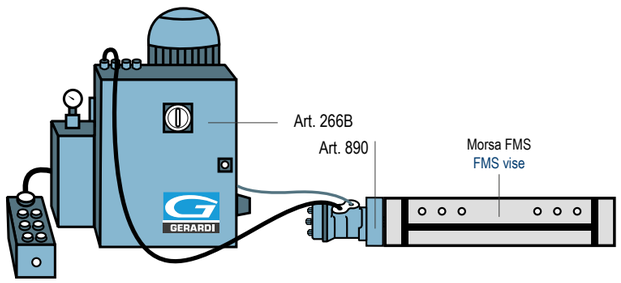
Art.890K/1

Art. 266B + Art. 890

Kit per automazione morse FMS
Kit for FMS vises automation.

DATI TECNICI:
IDROMOTORE: Art.566
Motore elettrico Kw 5.5
Portata Min. 40 litri al minuto
Velocotà apertura-chiusura morsa da calcolarsi in base al digramma idromotore (vedi pag. 5.65)
Per il diagramma forza di serraggio vedi pag. 5.74
Pressione massima di esercizio: 140 bar

TECHNICAL DATA:
HYDRAULIC MOTOR Art.566
Electric motor kW 5,5
Oil pumps: 40l/min
Opening and closing speed of vise to be calculated from hydraulic motor diagram at page 5.65
For clamping forces diagram see pag. 5.75
Max operating pressure: 140 bar



COMPOSIZIONE COMPLETA DI:
- ☐ N° 1 servocomando Art. 890
- ☐ N° 1 centralina elettroidraulica Art. 266B/1
- ☐ Comando manuale elettrico da pulsantiera con chiusura ed apertura indipendente, singola o simultanea
- ☐ Regolazione forza di bloccaggio desiderata
- ☐ Fine corsa elettronico regolabile

COMPOSITION COMPLETE OF:
- ☐ N° 1 hydraulic servo unit Art. 890
- ☐ N° 1 electro-hydraulic power pack Art. 266B/1
- ☐ Electrically controlled by manual switch board
- ☐ Adjustable clamping force as required
- ☐ Adjustable elettronic proximity switch

Tubi e cavi di collegamento elettrici ed idraulici con massima lunghezza 1600 mm / Hydraulic pipes and electrical cables with max lenght 1600 mm

SERVOCOMANDI OLEODINAMICI PER MOTORI IDRAULICI
ELECTRO-HYDRAULIC POWER PACK FOR HYDRAULIC MOTORS

Tipo (grandezza) / Type (size)	1	2	3	4	5	6
Passo vite / screw pitch mm	2	2	2	2	3	3
bar	130	100	100	100	120	120
l/min	10	20	40	40	40	40
Cod.	5.89.0K102	5.89.0K202	5.89.0K302	5.89.0K402	5.89.0K502	5.89.0K602

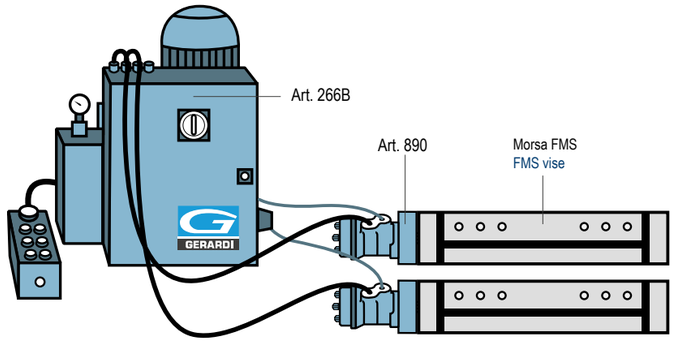
Art.890K/2

Art. 266B + 2 Art. 890

Kit per automazione morse FMS
Kit for FMS vises automation.

DATI TECNICI:
IDROMOTORE: Art.566
Motore elettrico Kw 5.5
Portata Min. 40 litri al minuto
Velocotà apertura-chiusura morsa da calcolarsi in base al digramma idromotore (vedi pag. 5.65)
Per il diagramma forza di serraggio vedi pag. 5.74
Pressione massima di esercizio: 140 bar

TECHNICAL DATA:
HYDRAULIC MOTOR Art.566
Electric motor kW 5,5
Oil pumps: 40l/min
Opening and closing speed of vise to be calculated from hydraulic motor diagram at page 5.65
For clamping forces diagram see pag. 5.75
Max operating pressure: 140 bar



COMPOSIZIONE COMPLETA DI:
- ☐ N° 2 servocomandi Art. 89
- ☐ N° 1 centralina elettroidraulica Art. 266B/1
- ☐ Comando manuale elettrico da pulsantiera con chiusura ed apertura indipendente, singola o simultanea
- ☐ Regolazione forza di bloccaggio desiderata
- ☐ Fine corsa elettronico regolabile

COMPOSITION COMPLETE OF:
- ☐ N° 2 hydraulic servo units Art. 890
- ☐ N° 1 electro-hydraulic power pack Art. 266B/1
- ☐ Electrically controlled by manual switch board
- ☐ Adjustable clamping force as required
- ☐ Adjustable elettronic proximity switch

Tubi e cavi di collegamento elettrici ed idraulici con massima lunghezza 1600 mm / Hydraulic pipes and electrical cables with max lenght 1600 mm

Tipo (grandezza) / Type (size)	1	2	3	4	5	6
Passo vite / screw pitch mm	2	2	2	2	3	3
bar	130	100	100	100	120	120
l/min	15	30	60	60	60	60
Cod.	5.89.0K103	5.89.0K203	5.89.0K303	5.89.0K403	5.89.0K503	5.89.0K603

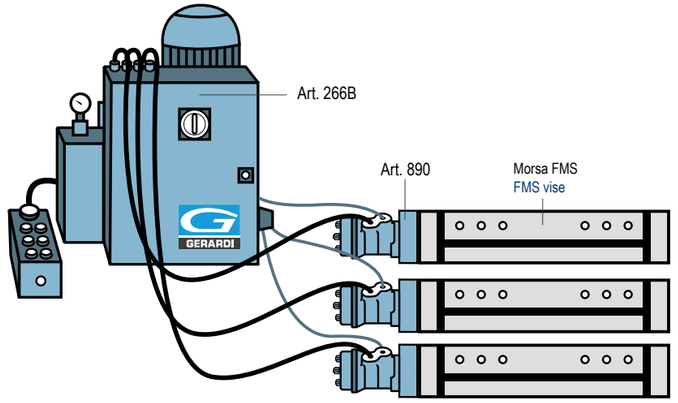
Art.890K/3

Art. 266B + 3 Art. 890

Kit per automazione morse FMS
Kit for FMS vises automation.

DATI TECNICI:
IDROMOTORE: Art.566
Motore elettrico Kw 5.5
Portata Min. 40 litri al minuto
Velocotà apertura-chiusura morsa da calcolarsi in base al digramma idromotore (vedi pag. 5.65)
Per il diagramma forza di serraggio vedi pag. 5.74
Pressione massima di esercizio: 140 bar

TECHNICAL DATA:
HYDRAULIC MOTOR Art.566
Electric motor kW 5,5
Oil pumps: 40l/min
Opening and closing speed of vise to be calculated from hydraulic motor diagram at page 5.65
For clamping forces diagram see pag. 5.75
Max operating pressure: 140 bar



COMPOSIZIONE COMPLETA DI:
- ☐ N° 3 servocomandi Art. 89
- ☐ N° 1 centralina elettroidraulica Art. 266B/1
- ☐ Comando manuale elettrico da pulsantiera con chiusura ed apertura indipendente, singola o simultanea
- ☐ Regolazione forza di bloccaggio desiderata
- ☐ Fine corsa elettronico regolabile

COMPOSITION COMPLETE OF:
- ☐ N° 3 hydraulic servo units Art. 890
- ☐ N° 1 electro-hydraulic power pack Art. 266B/1
- ☐ Electrically controlled by manual switch board
- ☐ Adjustable clamping force as required
- ☐ Adjustable elettronic proximity switch

Tubi e cavi di collegamento elettrici ed idraulici con massima lunghezza 1600 mm / Hydraulic pipes and electrical cables with max lenght 1600 mm

SERVOCOMANDI OLEODINAMICI PER MOTORI IDRAULICI
ELECTRO-HYDRAULIC POWER PACK FOR HYDRAULIC MOTORS

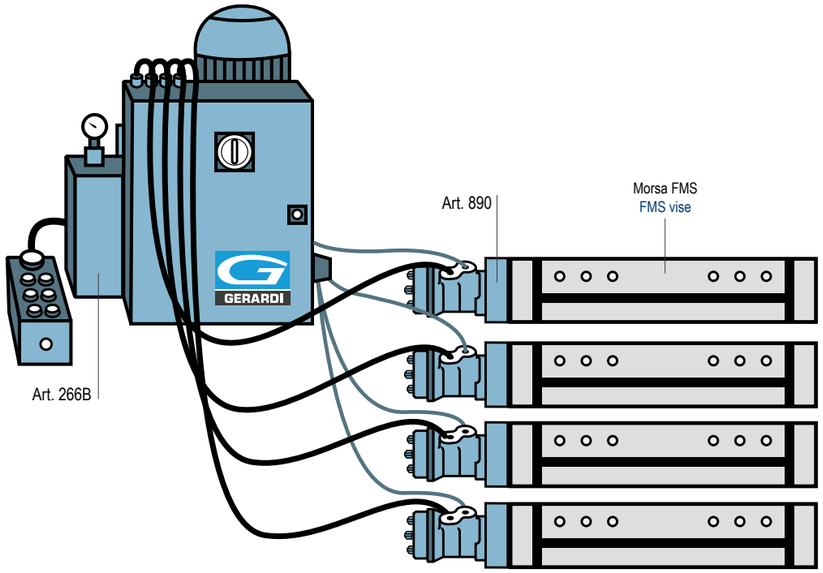
Tipo (grandezza) / Type (size)		1	2	3	4	5	6
	Passo vite / screw pitch mm	2	2	2	2	3	3
	bar	130	100	100	100	120	120
	l/min	20	40	80	80	80	80
Art.890K/4	Cod.	5.89.0K104	5.89.0K204	5.89.0K304	5.89.0K404	5.89.0K504	5.89.0K604

Art. 266B + 4 Art. 890

Kit per automazione morse FMS
Kit for FMS vises automation.

DATI TECNICI:
IDROMOTORE: Art.566
Motore elettrico Kw 5.5
Portata Min. 40 litri al minuto
Velocotà apertura-chiusura morsa da calcolarsi in base al digramma idromotore (vedi pag. 5.65)
Per il diagramma forza di serraggio vedi pag. 5.74
Pressione massima di esercizio: 140 bar

TECHNICAL DATA:
HYDRAULIC MOTOR Art.566
Electric motor kW 5,5
Oil pumps: 40l/min
Opening and closing speed of vise to be calculated from hydraulic motor diagram at page 5.65
For clamping forces diagram see pag. 5.75
Max operating pressure: 140 bar



COMPOSIZIONE COMPLETA DI:
- N° 3 servocomandi Art. 89
- N° 1 centralina elettroidraulica Art. 266B/1
- Comando manuale elettrico da pulsantiera con chiusura ed apertura indipendente, singola o simultanea
- Regolazione forza di bloccaggio desiderata
- Fine corsa elettronico regolabile

COMPOSITION COMPLETE OF:
- N° 3 hydraulic servo units Art. 890
- N° 1 electro-hydraulic power pack Art. 266B/1
- Electrically controlled by manual switch board
- Adjustable clamping force as required
- Adjustable elettronic proximity switch

Riduttore epicicloidale il quale consente di moltplicare notevolmente la coppia sviluppata dal motore idraulico consentendo di arrivare a elevate forze di serraggio , fino a 480 kN

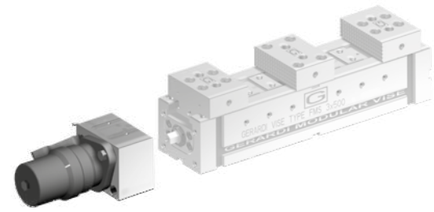
Epicyclic force reducer able to multiply greatly the torque generated by the hydraulic engine reaching a very high clamping force, maximum 480kN.



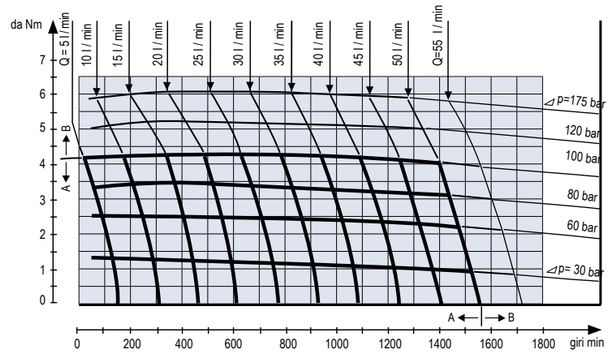
Tubi e cavi di collegamento elettrici ed idraulici con massima lunghezza 1600 mm / Hydraulic pipes and electrical cables with max lenght 1600 mm

DIAGRAMMI COPPIE MOTORI IDRAULICI
HYDRAULIC MOTOR TORQUE DIAGRAMS

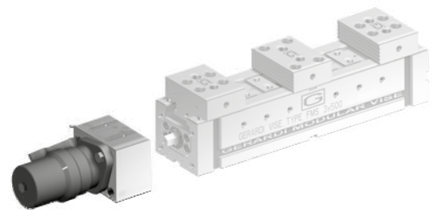
Art.890 (Art.890) Motore idraulico / (Art.890) Hydraulic motor



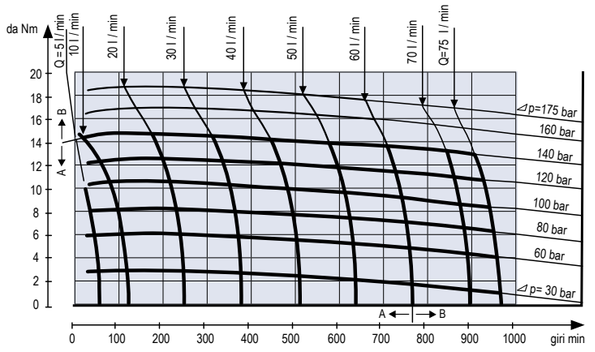
OMR 32
Morse FMS tipo 1 / Type 1 FMS vises



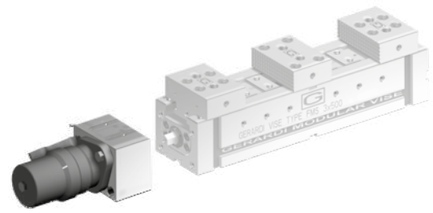
Art.890 (Art.890) Motore idraulico / (Art.890) Hydraulic motor



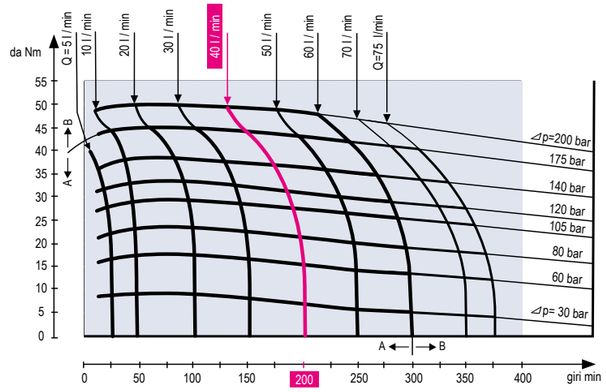
OMR 80
Morse FMS tipo 2 / Type 2 FMS vises



Art.890 (Art.890) Motore idraulico / (Art.890) Hydraulic motor



OMR 200
Morse FMS tipo 3 - 4 - 5 - 6 Type 3 - 4 - 5 - 6 FMS vises



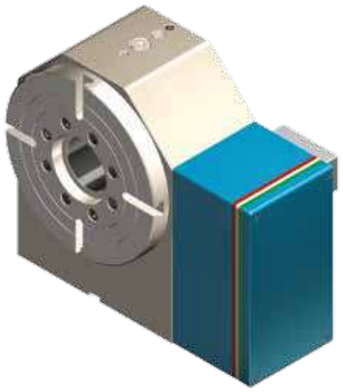
VELOCITA' = Passo vite x giri/min (dati dalla portata di olio in l/min) - 25% circa per attriti e resistenze varie.
Esempio: Vite passo 2 mm; Giri 200/min (ipotizzando una portata olio di 40 l/min); V = 2 X 200 = 400 - 25% = **300 mm/min per una morsa.**
Per più morse dividere la velocità ottenuta per il numero delle morse impiegate.

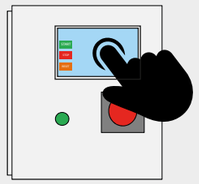
SPEED = Screw pitch x RPM (that you get from oil pump of 40 l/min) about - 25% for friction and other resistance.
Example: Screw pitch 2mm; RPM 200/min (taking in consideration oil pump of 40 l/min); V = 2 x 200 = 400 - 25% = **300 mm/min for one vise.**
For more vises divide the speed obtained by the number of vises used.

DIVISORE AUTOMATICO DPG 250
AUTOMATIC DIVIDING HEAD DPG 250

Divisore automatico
Automatic dividing head

DPG 250





PROGRAMMAZIONE **TOUCH SCREEN**
FACILE ED INTUITIVA O TRAMITE COLLEGAMENTO DIRETTO AL CNC

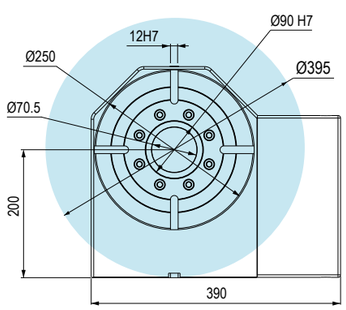
EASY AND INTUITIVE **TOUCH SCREEN**
PROGRAMMING OR THROUGH DIRECT CONNECTION TO THE CNC

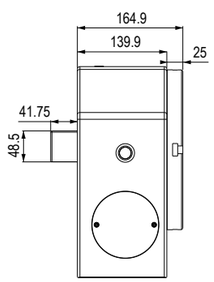
- Installazione semplice (alimentazione 220V)
- Corona in bronzo speciale
- Controsupporto semplice
- Vite senza fine in acciaio temprato e rettificato
- Vite e corona in bagno d'olio
- Cuscinetti a vite precaricati
- Cuscinetto anteriore a rulli incrociati sovradimensionato
- Recupero gioco con avvicinamento assiale
- Completa tenuta stagna ai liquidi con possibilità di pressurizzazione
- Possibilità di montare motori di tutte le marche
- Dimensioni esterne contenute
- Finestra di controlli liquidi e condensa
- Lavorazione in posizionamento a 360°

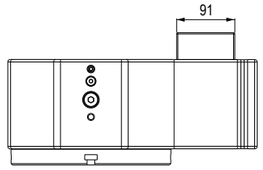
- Easy installation (220V)
- Special bronze crown
- Simple tailstock
- Worm screw in hardened ground steel
- Bath lubrication Screw and Crown
- Pre-loaded screw bearings
- Over-dimensioned crossed-roller front bearing
- Play recover with axial approach
- Watertight seal with possibility of pressurization
- Possibility to mount motors of all brands
- Reduced external dimensions
- Condensation and liquid control window
- 360° work positioning

Dati tecnici Technical Data		
Diametro del divisore Dividing head diameter		250 mm
Diametro del foro passante Cleareance hole diameter		70,5 mm
Altezza punte Center height		200 mm
Dimensione della scanalatura a T T-Slot width		12 mm
Sistema di bloccaggio Clamping system		Idraulico Hydraulic
Forza frenante Clamping torque		3000 Nm
Motore Servo motor		3000 Max.g/min
Minimo incremento Minimum increment		0,002
Velocità di rotazione Rotation speed		33,3 Giri/min
Rapporti vite/corona Speed reduction ratio (screw/gear)		1/90
Rapporti vite/motore Speed reduction ratio (screw/motor)		1/180
Precisione Indexing accuracy		±10 Sec.
Ripetibilità Repeatability		4 Sec.
Max. carico di lavoro sul divisore Max. allowable work weight on the dividing head	Verticale Vertical	Kg.550
	Orizzontale Horizontal	Kg.1500
Max. carico di spinta applicabile sul divisore Max. allowable tool load on the dividing head	F	N 25000
	L F	FxL Nm 1000
	F L Q	FxL Nm 2200
Rapporti vite/corona Speed reduction ratio (screw/gear)	Verticale Vertical	10,5 Kg. m²
Coppia in lavoro Driving torque	Corona dentata Worm gear	698 Nm
Kg		110
Cod.		8.DP.G2500

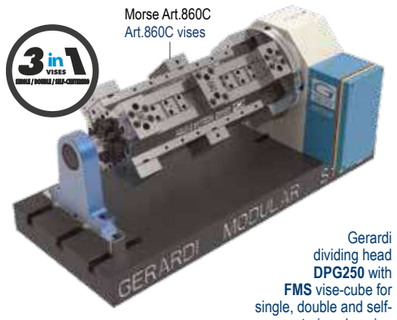
DPG 250







Tipo (grandezza) / Type (size)		**1**		**2**				**3**				
	kN	25 kN		25 kN				30 kN				
Divisore Gerardi **DPG250** con cubo-morsa **FMS** per serraggi singoli, doppi o autocentranti	D	200	300	300	400	500	600	400	500	600	700	800
	G1	120		175				210				
	W	74		94				124				
	Cod.	5.DP.G25000	5.DP.G25010	5.DP.G25020	5.DP.G25030	5.DP.G25040	5.DP.G25050	5.DP.G25060	5.DP.G25070	5.DP.G25080	5.DP.G25090	5.DP.G25011



Gerardi dividing head **DPG250** with **FMS** vise-cube for single, double and self-centering clamping

Nel caso si disponga di un proprio divisore, il prezzo dell'attrezzatura potrebbe subire variazioni
In case you already have a diviger, the price may be revised

UPGRADE YOUR VISE APPLICATIONS THROUGH MODULAR ACCESSORIES !

Art. 99A

Supporto
Support



Cod.	5.99.A1000

Art. 99B

Perno di centraggio completo di sistema d'allineamento
Horizontal centering pin with alignement system



Cod.	5.99.B1000	5.99.B2000	5.99.B3000

Art. 99H

Distanziale per supporto
Spacer support



Cod.	5.99.H1000

Art. 62K
DPG 250

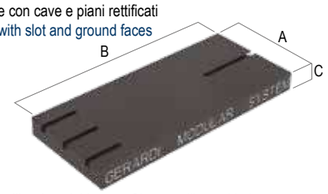
Piastra di interfaccia per cubo FMS completa di sistema d'allineamento
Connecting plate with alignement systemfor FMS



Cod.	5.62.K801A5	5.62.K801A6	5.62.K801A7

Art. 99S

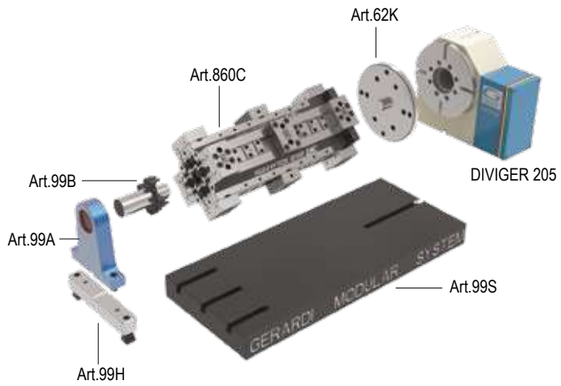
Piastra base con cave e piani rettificati
Base plate with slot and ground faces

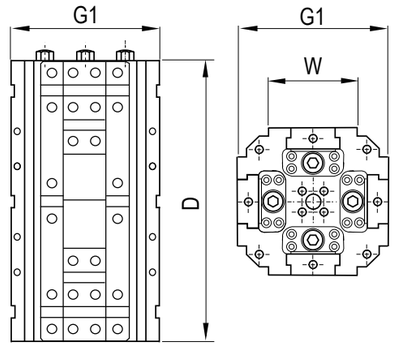


Dimensioni B mm Dimension B mm	A	C	Kg	Cod.	
650	400	50	102	7.99.S065S	
950	400	50	149	7.99.S095S	
1250	400	50	195	7.99.S125S	

Cave o fori calibrati su richiesta - Slot or calibrated holes on request

Disponibili quote "**B**" a step di 50mm - Available dimension "**B**" in steps of 50mm





DIVISORE MECCANICO DIVIGER 205
MECHANICAL DIVIDING HEAD DIVIGER 205

Divisore automatico
Automatic dividing head

DIVIGER 205



Dati tecnici Technical Data	
Diametro del divisore Dividing head diameter	220 mm
Diametro del foro passante Cleareance hole diameter	85 mm
Altezza centrale Center height	200 mm
Dimensione della scanalatura a T T-Slot width	-
Sistema di bloccaggio Clamping system	Meccanico Mechanical
Minimo incremento Minimum increment	1°
Precisione Indexing accuracy	±10 Sec.
Coppia in lavoro Driving torque	3000 Nm
Kg	93
Cod.	7.66.73000

DIVISORE MECCANICO, SENZA CAVI O IDRAULICA, PERMACCHINE A CNC

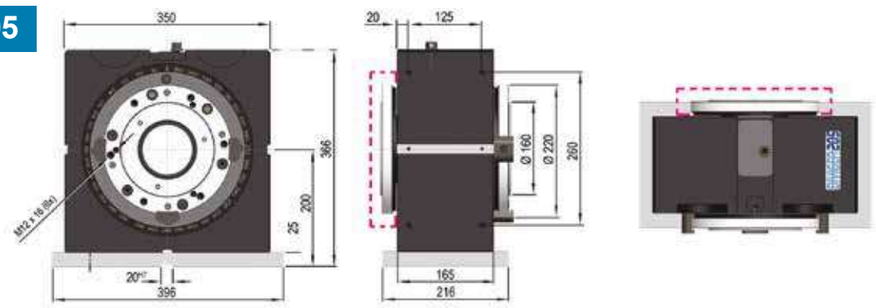
MECHANICAL DIVIDING HEAD, WITHOUT ELECTRICAL CABLES OR HYDRAULIC, FOR CNC MILLING MACHINE

- Maggiore efficienza nella lavorazione su più lati
- Completamente autonomo dalla macchina
- Elevato momento torcente
- Divisione manuale o automatica tramite mandrino macchina
- 360 posizioni
- Serraggio simultaneo di due particolari grazie alla doppia flangia
- lavorazione su 5 facce senza contropunta
- Lavorazione a barra grazie al mandrino cavo
- Utilizzabile orizzontalmente o verticalmente
- Cambio tramite serraggio a cuneo

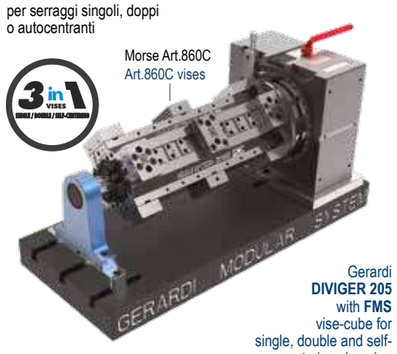
- Cost-effective on multiple-sides machining
- Machine independent
- High holding torque
- Dividing manually or automatically using the machine spindle
- 360 x 1° division
- Simultaneous clamping of 2 workpieces thanks to the dual flange
- 5 faces machining without counter-holder
- Bar machining due to hollow spindle
- To be used horizontaly or vertically
- Quick change through wedge clamping



DIVIGER 205



Tipo (grandezza) / Type (size)		**1**		**2**				**3**				
	kN	25 kN		25 kN				30 kN				
Divisore Gerardi **DIVIGER 205** con cubo-morsa **FMS** per serraggi singoli, doppi o autocentranti	D	200	300	300	400	500	600	400	500	600	700	800
	G1	120		175				210				
	W	74		94				124				
	Cod.	5.DI.V20500	5.DI.V20510	5.DI.V20520	5.DI.V20530	5.DI.V20540	5.DI.V20550	5.DI.V20560	5.DI.V20570	5.DI.V20580	5.DI.V20590	5.DI.V20511



Gerardi **DIVIGER 205** with **FMS** vise-cube for single, double and self-centering clamping

Nel caso si disponga di un proprio divisore, il prezzo dell'attrezzatura potrebbe subire variazioni
In case you already have a diviger, the price could be modified

UPGRADE YOUR VISE APPLICATIONS THROUGH MODULAR ACCESSORIES !

Art. 99A

Supporto
Support



Cod.	5.99.A1000

Art. 99B

Perno di centraggio completo di sistema d'allineamento
Horizontal centering pin with alignement system



Cod.	5.99.B1000	5.99.B2000	5.99.B3000

Art. 99H

Distanziale per supporto
Spacer support



Cod.	5.99.H1000

Art. 62K
DIVIGER 205

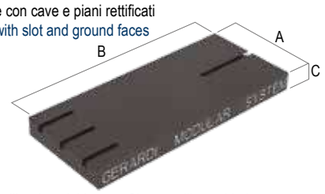
Piastra di interfaccia per cubo FMS completa di sistema d'allineamento
Connecting plate with alignement systemfor FMS



Cod.	5.62.K801A5	5.62.K801A6	5.62.K801A7

Art. 99S

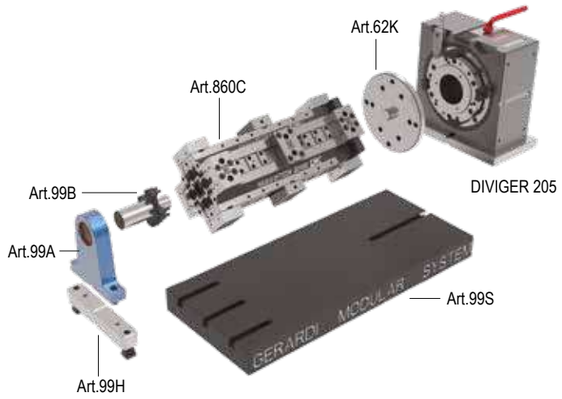
Piastra base con cave e piani rettificati
Base plate with slot and ground faces

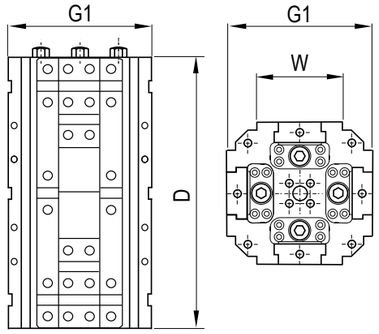


Dimensioni B mm Dimension B mm	A	C	Kg	Cod.	
650	400	50	102	7.99.S065S	
950	400	50	149	7.99.S095S	
1250	400	50	195	7.99.S125S	

Cave o fori calibrati su richiesta - Slot or calibrated holes on request

Disponibili quote "**B**" a step di 50mm - Available dimension "**B**" in steps of 50mm





PREDISPOSIZIONE e MONTAGGIO MORSE su CUBI LAVORATI
TOMBSTONES SET-UP and VISES MOUNTING on MACHINED TOMBSTONES

Art. 57C — **Cubo lavorato** / Machined cube



Dim. A=250 / B=400 / H=660

Cod. 8.53.C00081

Art. 864 — **Tipo di morsa** / Vise type



Art.864 Tipo 3x500

Cod. 5.86.43500

Numero morse / Vises number x 4

+

Predisposizione e montaggio completo
Complete set up & mounting



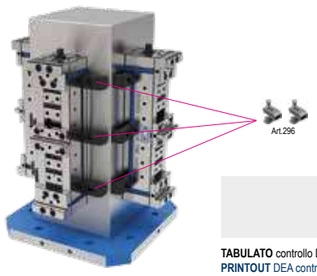
Cod. MAN-040-FMS

Per morsa / each vise

+

Realizzazione di fori filettati o fori di fissaggio (da un minimo di 4 a un massimo di 6), fori calibrati o chiavette (da un minimo di 2 a un massimo di 3).
Creation of threaded holes or screw holes (minimum 4 and maximum 6), calibrated holes or key-ways (minimum 2 and maximum 3).

Cubo con morse
Cube with vises



=

TABULATO controllo DEA - MAN-100-FMS :
PRINTOUT DEA control - MAN-100-FMS :

PREDISPOSIZIONE e MONTAGGIO MORSE su CUBO a RETICOLO
TOMBSTONES SET-UP and VISES MOUNTING on 2 GRID TOMBSTONES

Art. 53F — **Cubo a reticolo** / Grid tombstone



Dim. A=250 / B=400 / H=660

Cod. 8.53.F00081

Art. 864 — **Tipo di morsa** / Vise type



Art.864 Tipo 3x500

Cod. 5.86.43500

Numero morse / Vises number x 4

+

Montaggio ed allineamento (standard)
(Standard) Assembly and alignment



Cod. MAN-070-FMS

Per morsa / each vise

+

Montaggio di una o più morse e/o attrezzature già predisposte tra loro comprensivo di controllo manuale. Il prezzo di listino comprende manodopera, viti, staffe e tasselli per singola morsa.
Assembly of one or more vises or equipments already interfaced between themselves complete of manual check. The list price includes working hours, screws, holding clamps and key-nuts for only one vise.

Art. 750 — **Cubo con morse** / Cube with vises



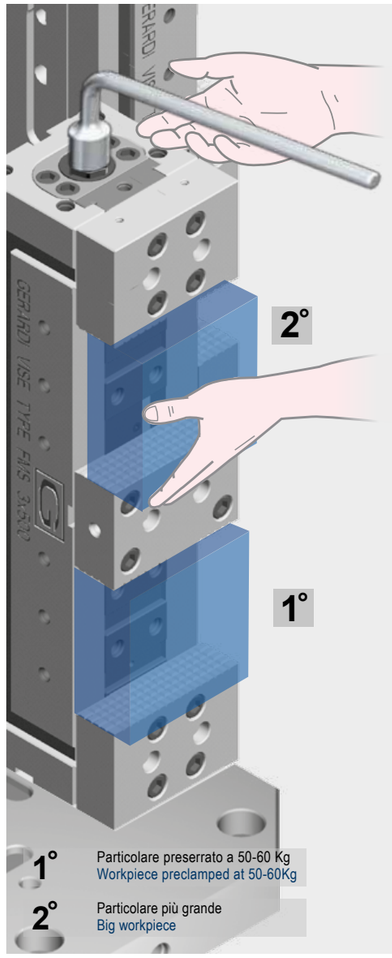
Art.750 Type 3

Cod. 1.75.03300

=

TABULATO controllo DEA - MAN-100-FMS :
PRINTOUT DEA control - MAN-100-FMS :

DISPOSITIVO TERZA MANO PER MORSE FMS DOPPIE
THIRD HAND ACCESSORY FOR DOUBLE FMS VISES



1° Particolare preserrato a 50-60 Kg
Workpiece preclamped at 50-60Kg

2° Particolare più grande
Big workpiece

DISPOSITIVO TERZA MANO PER MORSE FMS DOPPIE

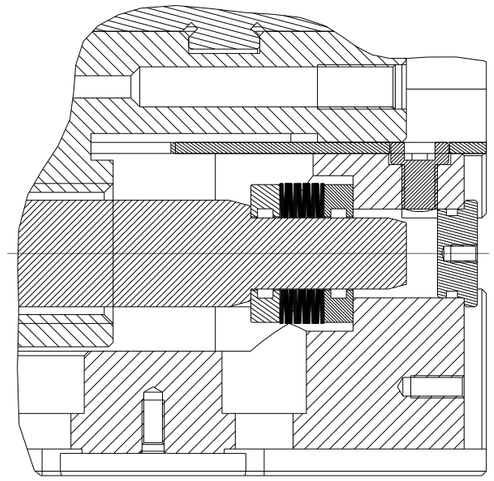
Il meccanismo "Terza mano" nella morsa in versione a doppia stazione, consente il carico e serraggio lieve del primo pezzo (dalla parte opposta alla chiave nella stazione inferiore della morsa), mentre nel frattempo viene caricato il secondo pezzo di dimensione maggiore (da cui la denominazione "Terza mano"). Tale dispositivo risulta particolarmente utile quando la morsa viene usata in posizione verticale. Con il dispositivo "Terza mano", i due particolari da lavorare possono essere di dimensioni diverse con uno scarto massimo fra loro di 2 mm.
Il meccanismo "Terza mano" standard ha una spinta di max 50 Kg.Volendo ottenere una spinta maggiore, basta sostituire le molle in dotazione con altre di maggior potenza (attenzione però a mantenere la stessa quota di altezza del pacchetto molle) oppure aggiungendo un altro distanziale di max. 3mm
N.B: sostituendo le molle o aggiungendo un distanziale extra bisogna tener presente che il maggior precarico comporterà lo stesso carico di spinta anche girando la vite Art.822 a vuoto.

Non volendo il meccanismo "Terza Mano", il tutto puo' essere semplicemente rimosso togliendo le molle con i relativi distanziali dalla loro sede naturale.

Attenzione!! Assicurarsi che Art.850N rimanga fissato nella morsa per proteggere l'eventuale entrata di trucioli.

THIRD HAND DEVICE FOR DOUBLE STATION FMS VISES

The "Third Hand" device in the double station vise configuration, allows the first workpiece loaded to be gripped/clamped lightly with a little pressure (on the opposite side of the wrench and then in the lower vise station), while the second workpiece (bigger than first) is being loaded (from here the "third Hand" denomination). Such device is useful especially with the vise vertically positioned.
With the "Third Hand" device the two workpiece can be up to 2 mm different in gripping width.
The standard "Third Hand" device has a max pressure of 50 Kg.
In order to reach a higher clamping power it is enough to preload by changing the standard springs with more powerful ones or by adding a pacer (max 3 mm). Be careful that remains the same spring and spacer packing height dimensions.
P.S: By changing springs or adding extra spacer remember that the higher preload will give the same resistance (given by the more powerful preload) even just turning the main screw Art.822 freely.
If the "Third Hand" device is not required, it could be simply removed by taking away the springs and their spacers from their standard position.
Attention!! *Make sure that the* **Art.850N** *remains fixed in the vise to provide protection from dirt getting inside the vise.*



Art.850P



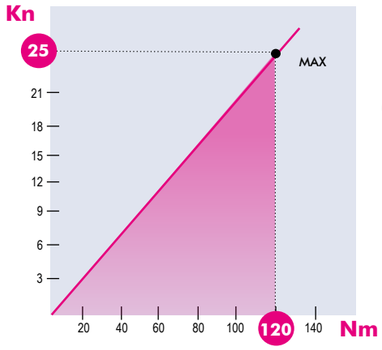
Diagrammi di serraggio / *Clamping diagrams*

FMS

Diagrammi di serraggio meccanico con chiave dinamometrica

Mechanical clamping diagrams with torque wrench **Art. 357**

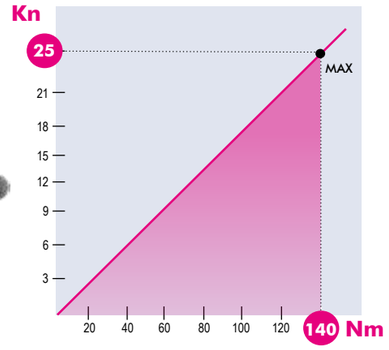
Morse tipo 1
Vises type
VITE: TPF 18 / 20 mm PASSO: 2 mm
SCREW: TPF 18 / 20 mm PITCH: 2 mm



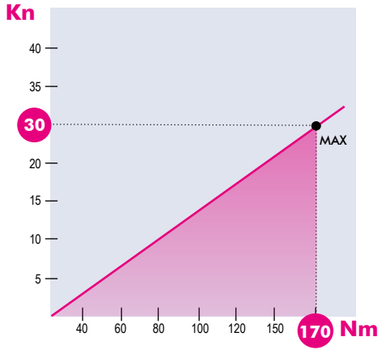


Art. 357

Morse tipo 2
Vises type
VITE: TPF 18 / 24 mm PASSO: 2 mm
SCREW: TPF 18 / 24 mm PITCH: 2 mm



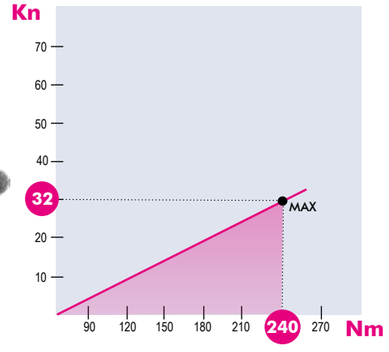
Morse tipo 3-4
Vises type
VITE: TPF 24 / 30 mm PASSO: 2 mm
SCREW: TPF 24 / 30 mm PITCH: 2 mm





Art. 357

Morse tipo 5-6
Vises type
VITE: TPF 30 / 36 mm PASSO: 3 mm
SCREW: TPF 30 / 36 mm PITCH: 3 mm



NB: Alcuni fattori, come la lubrificazione, lo staffaggio, gli attriti ed altro, possono modificare i valori indicati fino a ± 10%. Per un corretto utilizzo non superare i valori indicati nel grafico
Some factor as lubrication, clamping on the machine table, frictions and more can modify above values within a ± 10% range. For optimum operation do not exceed chart values.

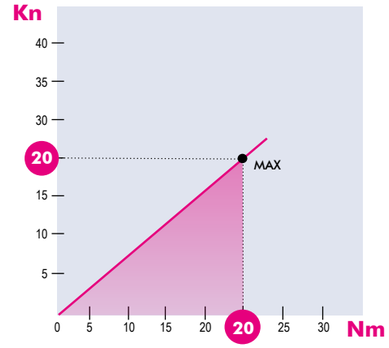
Diagrammi serraggio / *Clamping diagrams*

FMS

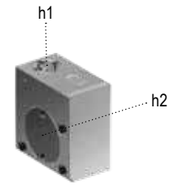
Diagrammi di serraggio meccanico con moltiplicatore di potenza

Mechanical clamping diagrams with pressure multiplier **Art. 802**

Morse tipo 1
Vises type
VITE: TPF 18 / 20 mm PASSO: 2 mm
SCREW: TPF 18 / 20 mm PITCH: 2 mm
Rapporto trasmissione: 9:1
Gear ratio: 9:1
Type 1 Cod. 5.80.21000

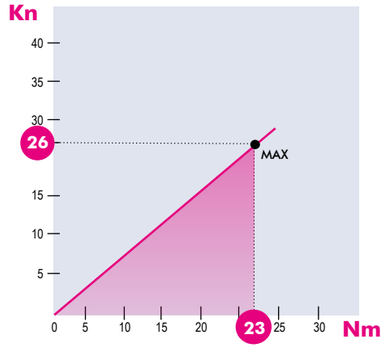


RATIO = h1 : h2



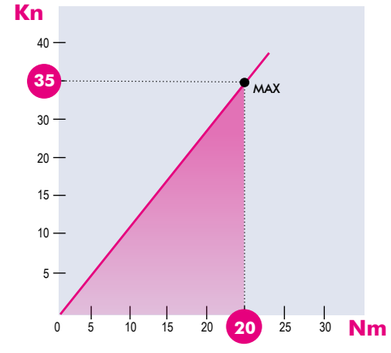
Art. 802

Morse tipo 2
Vises type
VITE: TPF 18 / 24 mm PASSO: 2 mm
SCREW: TPF 18 / 24 mm PITCH: 2 mm
Rapporto trasmissione: 7:1
Gear ratio: 7:1
Type 2 Cod. 5.80.22000

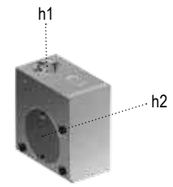


RATIO = h1 : h2

Morse tipo 3-4
Vises type
VITE: TPF 24 / 30 mm PASSO: 2 mm
SCREW: TPF 24 / 30 mm PITCH: 2 mm
Rapporto trasmissione: 7:1
Gear ratio: 7:1
Type 3 Cod. 5.80.23000 **Type 4** Cod. 5.80.24000

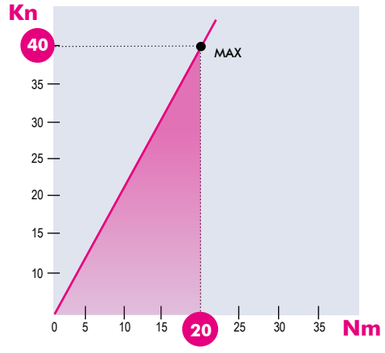


RATIO = h1 : h2



Art. 802

Morse tipo 5-6
Vises type
VITE: TPF 30 / 36 mm PASSO: 3 mm
SCREW: TPF 30 / 36 mm PITCH: 3 mm
Rapporto trasmissione: 7:1
Gear ratio: 7:1
Type 5 Cod. 5.80.25000 **Type 6** Cod. 5.80.26000



RATIO = h1 : h2

NB: Alcuni fattori, come la lubrificazione, lo staffaggio, gli attriti ed altro, possono modificare i valori indicati fino a ± 10%. Per un corretto utilizzo non superare i valori indicati nel grafico
Some factor as lubrication, clamping on the machine table, frictions and more can modify above values within a ± 10% range. For optimum operation do not exceed chart values.

Diagrammi serraggio / *Clamping diagrams*

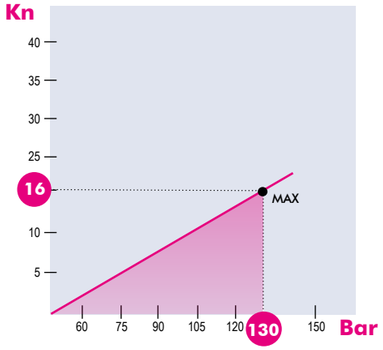
FMS

Diagrammi di serraggio meccanico tramite motore idraulico

Mechanical clamping diagrams through hydraulic motor **Art. 890**

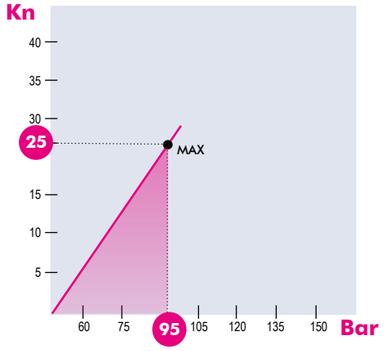
Morse tipo **1**
Vises type

VITE: TPF 18 / 20 mm PASSO: 2 mm
SCREW: TPF 18 / 20 mm PITCH: 2 mm
Motore idraulico tipo **OMM 32**
Hydraulic motor type **OMM 32**





Art. 890

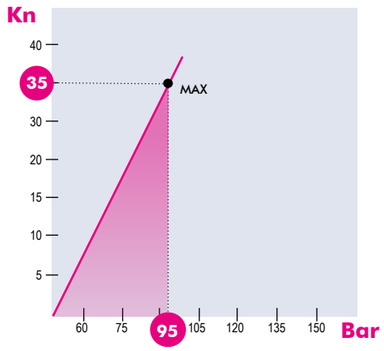


Morse tipo **2**
Vises type

VITE: TPF 18 / 24 mm PASSO: 2 mm
SCREW: TPF 18 / 24 mm PITCH: 2 mm
Motore idraulico tipo **OMP 80**
Hydraulic motor type **OMP 80**

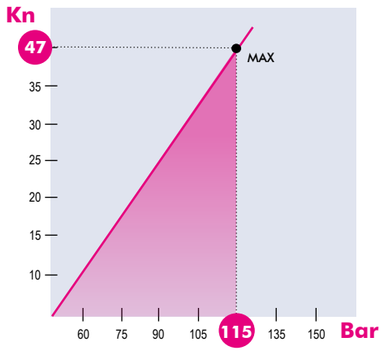
Morse tipo **3-4**
Vises type

VITE: TPF 24 / 30 mm PASSO: 2 mm
SCREW: TPF 24 / 30 mm PITCH: 2 mm
Motore idraulico tipo **OMR 200**
Hydraulic motor type **OMR 200**





Art. 890



Morse tipo **5-6**
Vises type

VITE: TPF 30 / 36 mm PASSO: 3 mm
SCREW: TPF 30 / 36 mm PITCH: 3 mm
Motore idraulico tipo **OMR 200**
Hydraulic motor type **OMR 200**

ATTENZIONE! Azionamento idraulico ma serraggio meccanico (PIU' SICURO) - IMPORTANT! Hydraulic control, but mechanical clamping (SAFER)

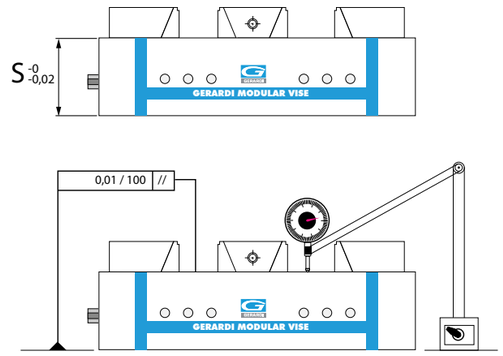
NB: Alcuni fattori, come la lubrificazione, lo staffaggio, gli attriti ed altro, possono modificare i valori indicati fino a ± 10%. Per un corretto utilizzo non superare i valori indicati nel grafico
Some factor as lubrication, clamping on the machine table, frictions and more can modify above values within a ± 10% range. For optimum operation do not exceed chart values.

ISTRUZIONI PER UN CORRETTO UTILIZZO
ISTRUCTIONS FOR A PROPER USE

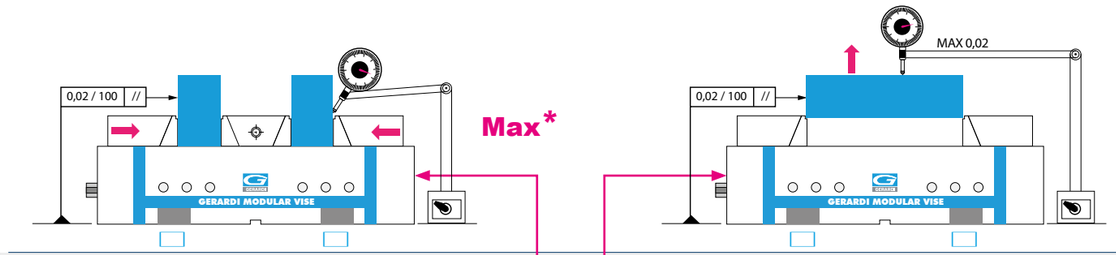
Libretto Istruzioni / Instruction Book

Scansiona il QR code e scarica le istruzioni complete
Scan the QR code to download the complete instructions

TOLLERANZE GEOMETRICHE / GEOMETRIC ACCURACIES



TOLLERANZE DINAMICHE / DINAMIC ACCURACIES



Morsa ancorata con 2 coppie di staffe Art.296
Vise clamped with n. 2 pairs of Art.296

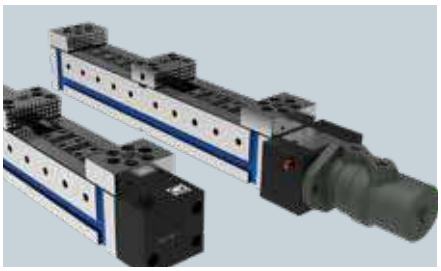
Morsa ancorata con 2 coppie di staffe Art.296
Vise clamped with n. 2 pairs of Art.296

Art 865		* Coppia applicata - Torque Nm	Forza di serraggio - Clamping power
Morsa tipo 1	Vise type 1	120	2500 Kgf
Morsa tipo 2	Vise type 2	140	2500 Kgf
Morsa tipo 3	Vise type 3	180	3000 Kgf
Morsa tipo 4	Vise type 4	180	3000 Kgf
Morsa tipo 5	Vise type 5	240	3200 Kgf
Morsa tipo 6	Vise type 6	240	3200 Kgf

* Max coppia applicabile per non superare i valori consigliati

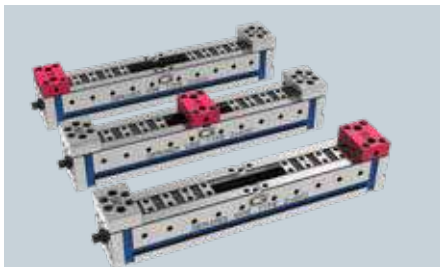
1 kgf . m = 9.806

ESTREMA VERSATILITY
EXTREME VERSATILITY



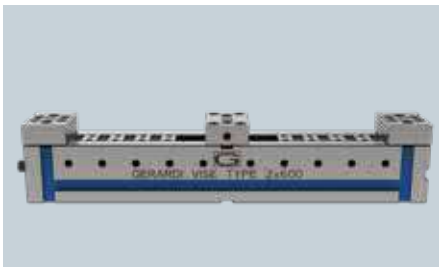
Sistema di serraggio meccanico, idraulico, pneumatico elettrico o con moltiplicatore di potenza, tramite comando manuale, a pedale o mediante pulsante elettrico (vedi pag. 12)

Mechanic, hydraulic or pneumatic or electrical clamping system or with pressure multiplier, through manual, pedal or push botton board control (see page 12)



3 posizioni per la ganascia fissa

3 positions for the fixed jaw



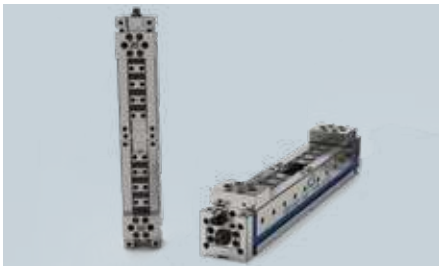
Costruzione solida e compatta e massma apertura rispetto alla sua lunghezza

Space saving design, solid construction and maximum blocking ratio to total lenght



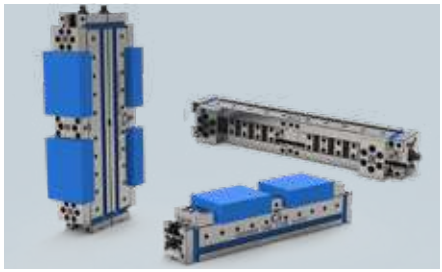
Serraggio dall'esterno all'interno e viceversa

Outside to inside clamping and viceversa



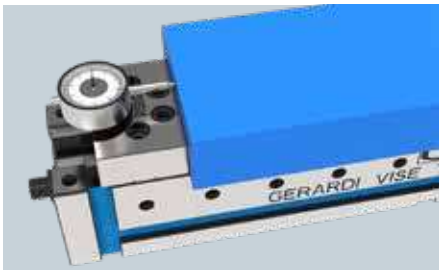
Precisioni geometriche con tolleranze entro 0,02mm

Geometrical accuracy with tollerances within 0,02 mm



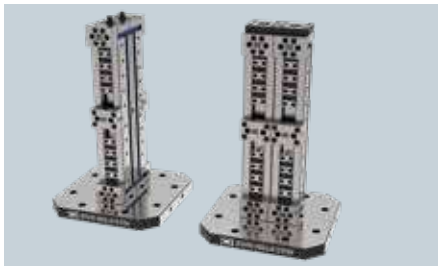
Posizionamento verticale-orizzontale laterale grazie alle chiavette longitudinali e trasversali sia sulla base che in testa

Vertically, horizontally and sideway vise positioning by the



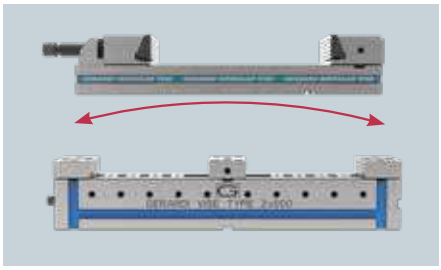
Accurata ripetibilità di posizionamento dei particolari da lavorare

Very accurate repetibility of workpieces position



Collegamento: fianco a fianco, dorso a dorso

Side by side, back to back vise positioning



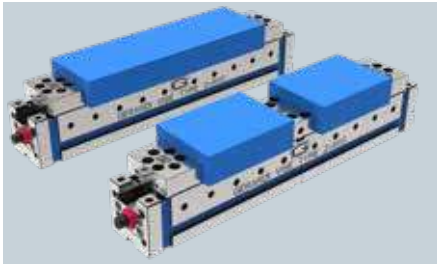
Flessioni ridotte di due volte rispetto alle morse modulari STANDARD

Bending reduced two times with respect to the STANDARD modular vises



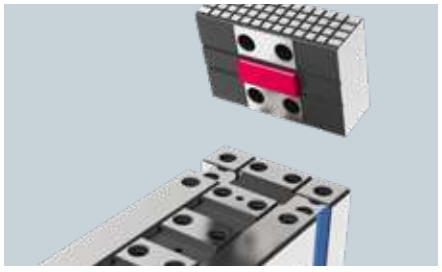
Possibilità illimitata per ganasce speciali

Unlimited range of special jaws



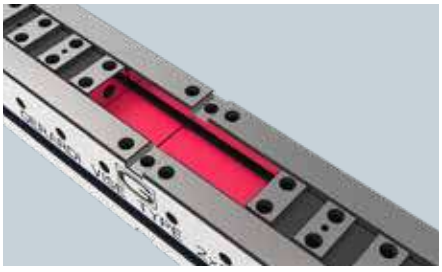
Trasformazione da autocentrante a doppia tramite la sostituzione delle ganasce sul corpo base universale e tramite la ghiera di regolazione.

Trasform each single vise in a self-centering with possibility to block from outside to inside and vice versa and in a double vise through the substitution of the jaws on the universal vise body base and by the setting nut.



Sostituzione semplice e precisa delle ganasce

Simple and precise exchange of jaws



Protezione integrale dalla penetrazione di corpi estranei tramite piastre scorrevvoli

Integral protection from chips and dirty through sliding protections