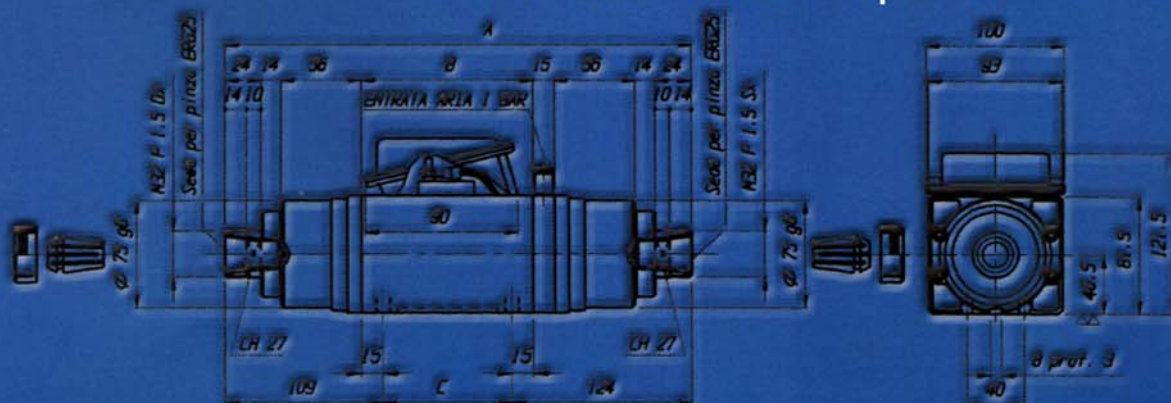




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СОДЕРЖАНИЕ

Pag.		Диапазон мощностей (Kw)	Диапазон скоростей (rpm)
2	 KNS21	0.10 ÷ 0.55	6000 ÷ 24000
5	 STK21	0.13 ÷ 0.75	6000 ÷ 24000
8	 EVS31/EVS40	0.13 ÷ 2.2	3000 ÷ 24000
12	 PE0 TMPE0	0.10 ÷ 0.40	6000 ÷ 24000
15	 PE1-PE2-TMPE1-TMPE2	0.10 ÷ 0.80	3000 ÷ 24000
20	 PE3-TMPE3	0.15 ÷ 2.20	3000 ÷ 24000
25	 PE4-TMPE4	0.65 ÷ 5.60	3000 ÷ 18000
30	 PE5-TMPE5	1.25 ÷ 7.00	3000 ÷ 18000
34	 TMPE6	3.40 ÷ 9.50	3000 ÷ 18000
37	 BIALBERO Двусторонний выход вала	0.15 ÷ 7.00	3000 ÷ 18000
43	 SQUADRATRICI Отрезная машина	0.65 ÷ 16.00	3000 ÷ 6000
49	 SERIE S Циркулярная пила	2.90 ÷ 19.00	1500 ÷ 6000
54	 SERIE TMA Автоматическая смена инструмента	3.6 ÷ 11.0	12000 ÷ 24000
58	 SERIE AF Шпиндели с водяным охлаждением	0.15 ÷ 1.8	24000 ÷ 40000
65	 SERIE CONVERTITORI STATICI Преобразователи частоты	0.55 ÷ 60	
73	RICAMBI Запасные части		

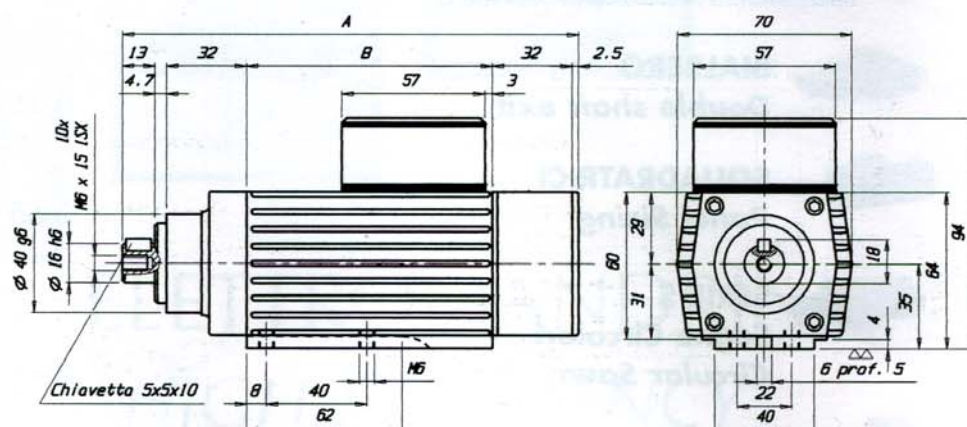


Serie KNS

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS ϕ	PESO WEIGHT (Kg)
KNS21 6/2	380	220	220/380	100	6000	0.09	0.40	0.7	0.7/0.40	0.65	1.8
KNS21 6/2	220	380	220/380	200	12000	0.16	1.10	0.64	1.10/0.64	0.70	1.8
KNS21 6/2	380	220	220/380	300	18000	0.22	1.00	1.73	1.73/1.00	0.70	1.8
KNS21 6/2	380	220	220/380	400	24000	0.30	1.20	2.10	2.10/1.20	0.70	1.8
KNS21 7/2	380	220	220/380	100	6000	0.11	0.49	0.85	0.85/0.49	0.65	2
KNS21 7/2	220	380	220/380	200	12000	0.22	1.50	0.85	1.50/0.85	0.70	2
KNS21 7/2	380	220	220/380	300	18000	0.33	1.20	2.10	2.10/1.20	0.70	2
KNS21 7/2	380	220	220/380	400	24000	0.40	1.40	2.40	2.40/1.40	0.70	2
KNS21 8.5/2	380	220	220/380	100	6000	0.22	0.86	1.50	1.50/0.86	0.65	2.5
KNS21 8.5/2	220	380	220/380	200	12000	0.37	2.30	1.30	2.30/1.30	0.70	2.5
KNS21 8.5/2	380	220	220/380	300	18000	0.55	1.85	3.20	3.20/1.85	0.70	2.5
KNS21 8.5/2	380	220	220/380	400	24000	0.55	1.8	3.20	3.20/1.85	0.70	2.5

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori KNS21



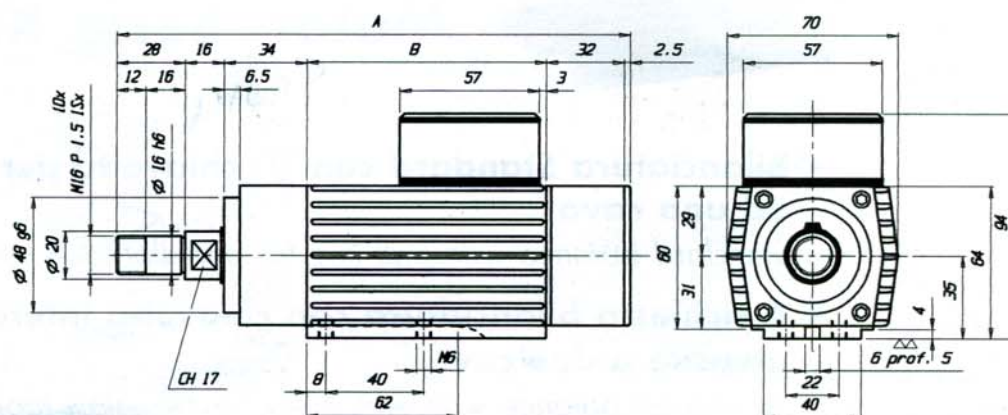
TIPO A B

KNS21 6/2	182	98
KNS21 7/2	182	98
KNS21 8.5/2	217	133

Sporgenza SC



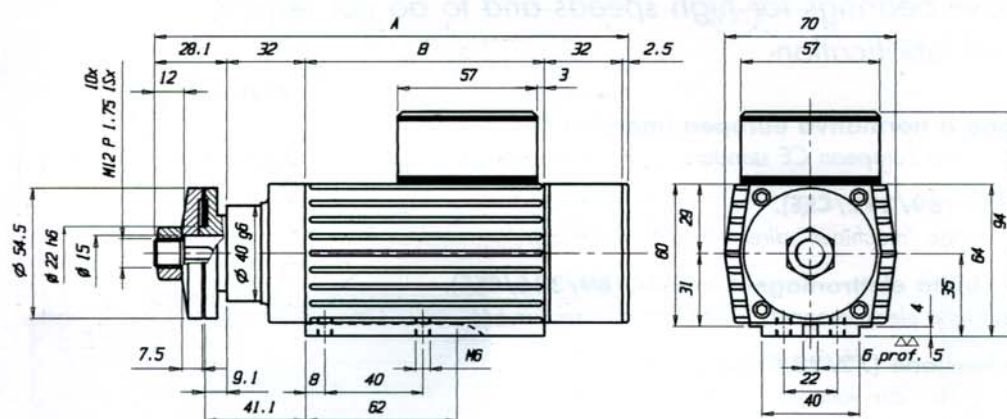
Motori KNS21



TIPO A B

KNS21 6/2	210.5	98
KNS21 7/2	210.5	98
KNS21 8.5/2	245.5	133

Sporgenza SF



TIPO A B

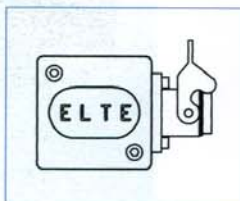
KNS21 6/2	192.5	98
KNS21 7/2	192.5	98
KNS21 8.5/2	227.5	133

Sporgenza SCF



Motori Serie KNS21

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.



A richiesta coprimorsettiera in alluminio 57x57 con connettore esterno come da disegno.
On request aluminium cable box 57x57 with external connector.

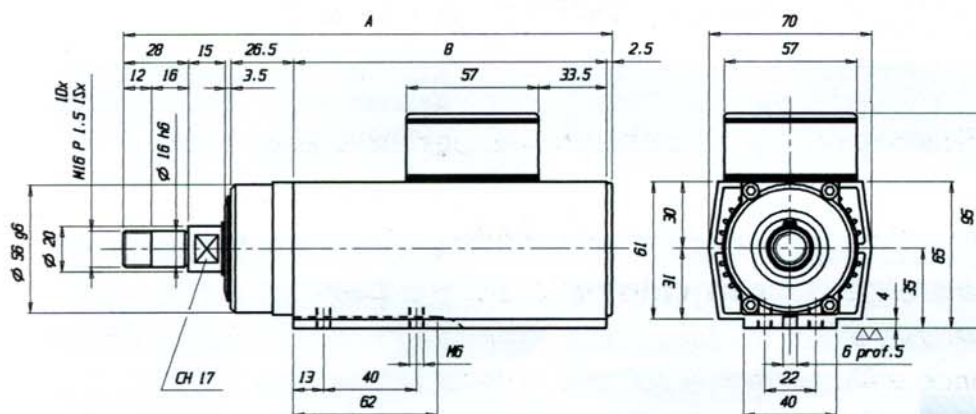




- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

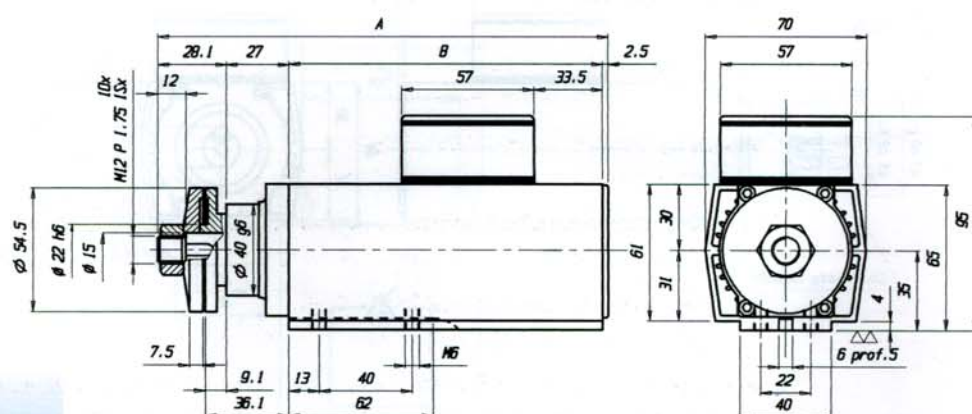
Sporgenza SC

• Motori STK21



TIPO	A	B
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STK21 6.5/2	210.5	135
STK21 9/2	245.5	170

Sporgenza SF

TIPO	A	B
------	---	---

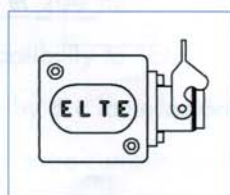
STK21 6.5/2	192.5	135
STK21 9/2	227.5	170

Sporgenza SCF



Motori Serie STK21

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.



A richiesta coprimorsettiera in alluminio 57x57 con connettore esterno come da disegno.
On request aluminium cable box 57x57 with external connector.

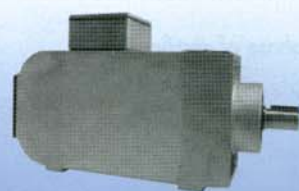
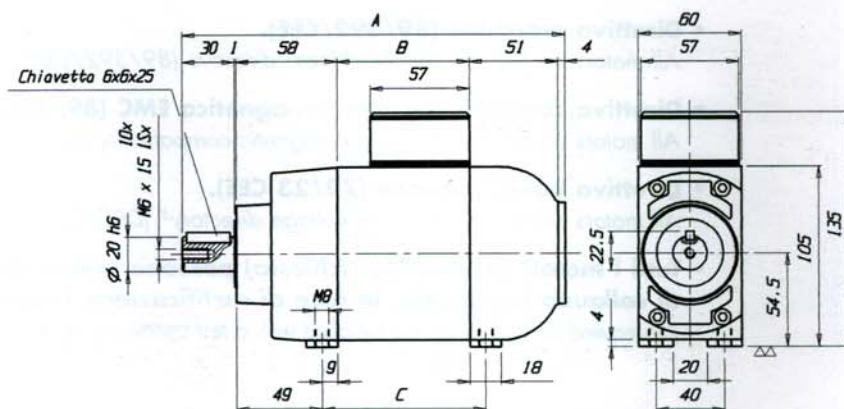


Serie EVS31/40

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS ϕ	PESO WEIGHT (Kg)
EVS31 6.5/2	380	220	220/380	100	6000	0.13	0.58	1.00	1.00/0.58	0.63	2.8
EVS31 6.5/2	220	380	220/380	200	12000	0.35	2.00	1.16	2.00/1.16	0.69	2.8
EVS31 6.5/2	380	220	220/380	300	18000	0.41	1.27	2.20	2.20/1.27	0.70	2.8
EVS31 6.5/2	380	220	220/380	400	24000	0.45	1.60	2.80	2.80/1.60	0.70	2.8
EVS31 9/2	380	220	220/380	100	6000	0.20	0.85	1.47	1.47/0.85	0.65	3.4
EVS31 9/2	220	380	220/380	200	12000	0.50	2.55	1.50	2.55/1.50	0.70	3.4
EVS31 9/2	380	220	220/380	300	18000	0.70	2.14	3.70	3.70/2.14	0.71	3.4
EVS31 9/2	380	220	220/380	400	24000	0.75	2.40	4.10	4.10/2.40	0.71	3.4
EVS40 9/2	220/380	220	380	50	3000	0.20	1.50/0.90	1.50	0.90	0.70	5.8
EVS40 9/2	380	220	220/380	100	6000	0.45	1.40	2.40	2.40/1.40	0.75	5.8
EVS40 9/2	220	380	220/380	200	12000	0.75	4.00	2.30	4.00/2.30	0.75	5.8
EVS40 9/2	380	220	220/380	300	18000	1.00	3.20	5.50	5.50/3.20	0.75	5.8
EVS40 9/2	380	220	220/380	400	24000	1.6	3.8	6.50	6.50/3.8	0.75	5.8
EVS40 12/2	220/380	220	380	50	3000	0.30	1.70/1.00	1.70	1.00	0.70	7
EVS40 12/2	380	220	220/380	100	6000	0.75	1.90	3.30	3.30/1.90	0.75	7
EVS40 12/2	220	380	220/380	200	12000	1.50	6.30	3.60	6.30/3.60	0.79	7
EVS40 12/2	380	220	220/380	300	18000	2.00	5.20	9.00	9.00/5.20	0.80	7
EVS40 12/2	380	220	220/380	400	24000	2.20	5.5	9.5	9.5/5.5	0.80	7
EVS40 14/2	220/380	220	380	50	3000	0.45	2.78/1.60	2.78	1.60	0.68	8.2
EVS40 14/2	380	220	220/380	100	6000	0.95	2.52	4.36	4.36/2.52	0.73	8.2
EVS40 14/2	220	380	220/380	200	12000	1.80	8.20	4.70	8.20/4.70	0.70	8.2
EVS40 14/2	380	220	220/380	300	18000	2.20	5.80	10.00	10.00/5.80	0.73	8.2
EVS40 14/2	380	220	220/380	400	24000	2.20	5.80	10.00	10.00/5.80	0.73	8.2

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori EVS31

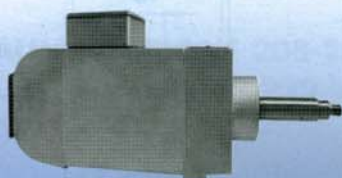
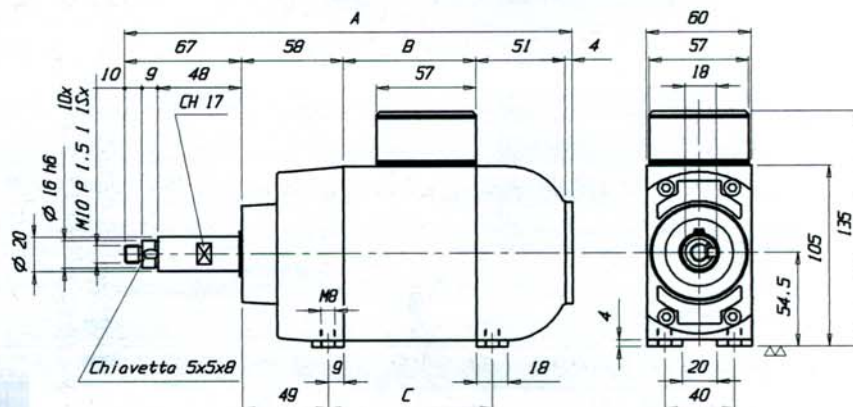


TIPO	A	B	C
EVS31 6.5/2	215	71	90
EVS31 9/2	245	101	120

Sporgenza SC



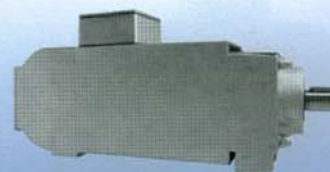
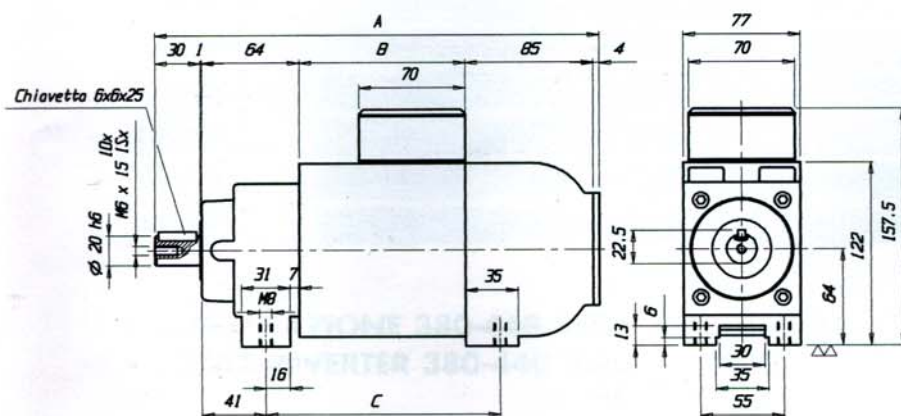
Motori EVS31/40



TIPO A B C

EVS31 6.5/2	251	71	90
EVS31 9/2	281	101	120

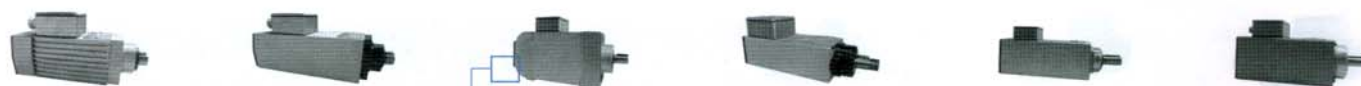
Sporgenza SLF



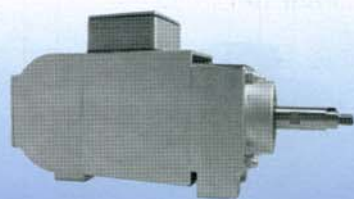
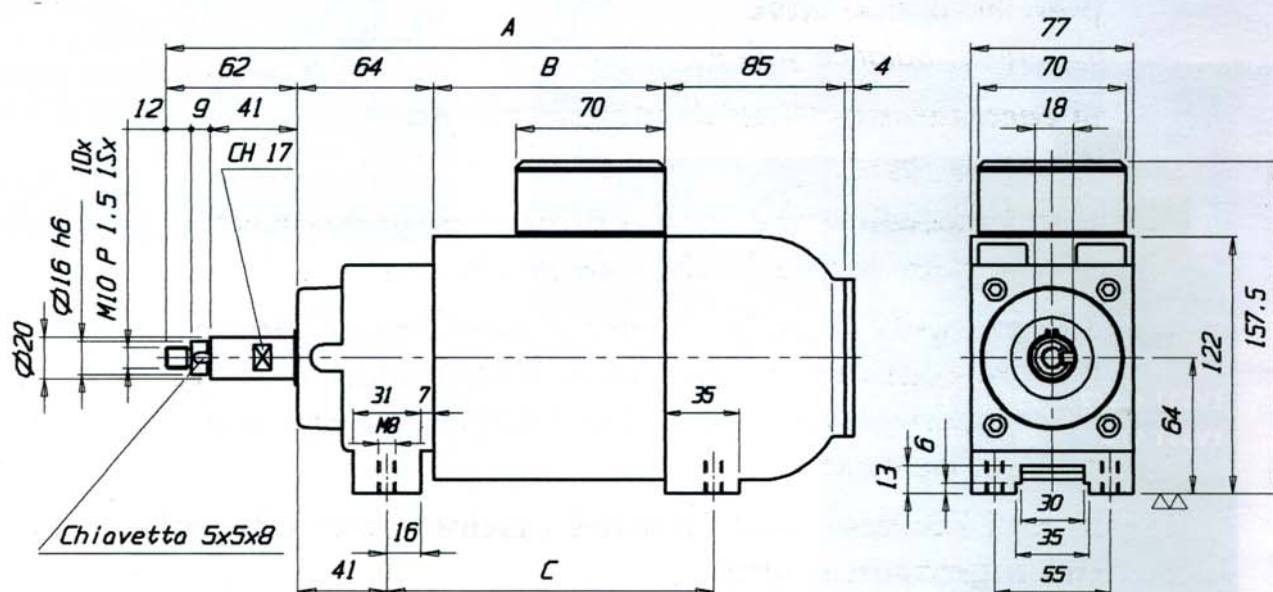
TIPO A B C

EVS40 9/2	288	104	150
EVS40 12/2	348	164	210
EVS40 14/2	348	164	210

Sporgenza SC



Motori EVS40



TIPO

A

B

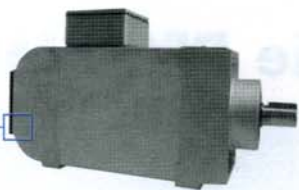
C

EVS40 9/2 319 104 150

EVS40 12/2 379 164 210

EVS40 14/2 379 164 210

Sporgenza SLF



Motori Serie EVS31/40

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
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- **Si raccomanda l'uso di utensili bilanciati**
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- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
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A richiesta coprimorsettiera in alluminio 57x57 con connettore esterno come da disegno.
On request aluminium cable box 57x57 with external connector.

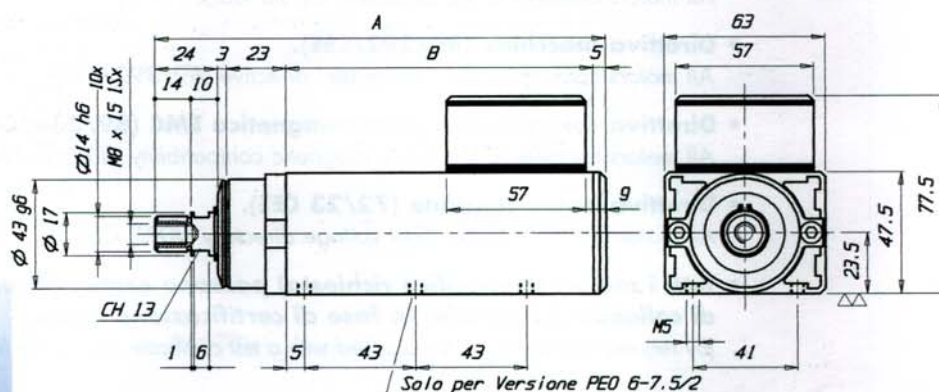


Serie PEO TMPEO

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS ϕ	PESO WEIGHT (Kg)
PEO 3.5/2	220	380	220/380	200	12000	0.08	0.60	0.34	0.60/0.34	0.65	1.2
PEO 3.5/2	380	220	220/380	300	18000	0.12	0.45	0.78	0.78/0.45	0.69	1.2
PEO 3.5/2	380	220	220/380	400	24000	0.15	0.52	0.90	0.90/0.52	0.70	1.2
PEO 6/2	380	220	220/380	100	6000	0.05	0.26	0.45	0.45/0.26	0.61	1.5
PEO 6/2	220	380	220/380	200	12000	0.15	0.80	0.45	0.80/0.45	0.68	1.5
PEO 6/2	380	220	220/380	300	18000	0.30	1.00	1.70	1.70/1.00	0.70	1.5
PEO 6/2	380	220	220/380	400	24000	0.35	1.10	1.90	1.90/1.10	0.70	1.5
PEO 7.5/2	380	220	220/380	100	6000	0.07	0.32	0.55	0.55/0.32	0.61	1.8
PEO 7.5/2	220	380	220/380	200	12000	0.18	1.20	0.69	1.20/0.69	0.64	1.8
PEO 7.5/2	380	220	220/380	300	18000	0.35	1.00	1.70	1.70/1.00	0.70	1.8
PEO 7.5/2	380	220	220/380	400	24000	0.40	1.20	2.10	2.10/1.20	0.70	1.8
TMPEO 3.5/2	220	380	220/380	200	12000	0.08	0.60	0.34	0.60/0.34	0.65	1.4
TMPEO 3.5/2	380	220	220/380	300	18000	0.12	0.45	0.78	0.78/0.45	0.69	1.4
TMPEO 3.5/2	380	220	220/380	400	24000	0.15	0.52	0.90	0.90/0.52	0.70	1.4
TMPEO 6/2	380	220	220/380	100	6000	0.05	0.26	0.45	0.45/0.26	0.61	1.7
TMPEO 6/2	220	380	220/380	200	12000	0.15	0.80	0.45	0.80/0.45	0.68	1.7
TMPEO 6/2	380	220	220/380	300	18000	0.30	1.00	1.70	1.70/1.00	0.70	1.7
TMPEO 6/2	380	220	220/380	400	24 000	0.35	1.10	1.90	1.90/1.10	0.70	1.7
TMPEO 7.5/2	380	220	220/380	100	6000	0.07	0.32	0.55	0.55/0.32	0.61	2
TMPEO 7.5/2	220	380	220/380	200	12000	0.18	1.20	0.69	1.20/0.69	0.64	2
TMPEO 7.5/2	380	220	220/380	300	18000	0.35	1.00	1.70	1.70/1.00	0.70	2
TMPEO 7.5/2	380	220	220/380	400	24000	0.40	1.20	2.10	2.10/1.20	0.70	2

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori PEO



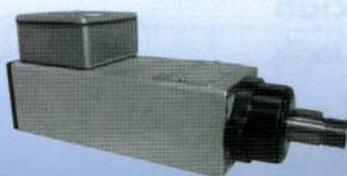
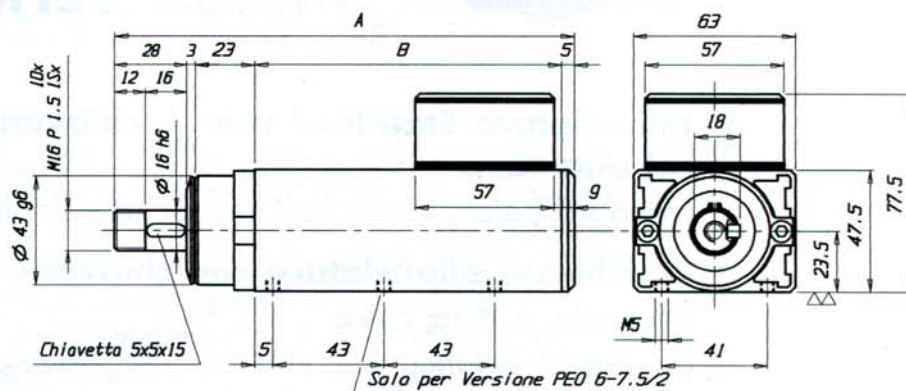
TIPO A B

PEO 3.5/2	174	119
PEO 6/2	199	144
PEO 7.5/2	214	159

Sporgenza SL

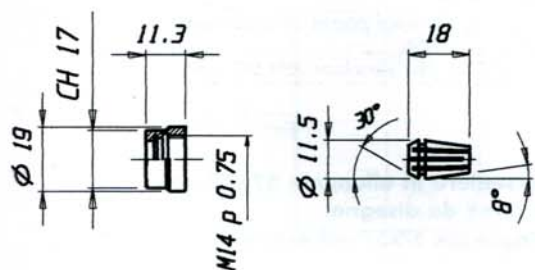
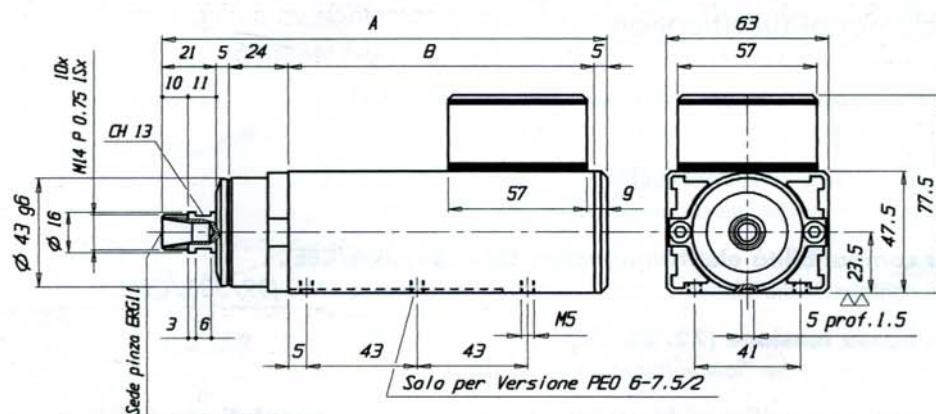


Motori PEO e TMPEO



TIPO	A	B
PEO 3.5/2	178	119
PEO 6/2	203	144
PEO 7.5/2	218	159

Sporgenza SF



NB: Pinza e Ghiera vengono forniti a richiesta.
Be careful: collet and ring nut only by your request.



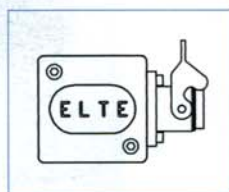
TIPO	A	B
TMPEO 3.5/2	174	119
TMPEO 6/2	199	144
TMPEO 7.5/2	214	159

**Sporgenza
per pinza ERG 11**



Motori Serie PEO TMPEO

- **Bilanciatura Standard con 1/2 chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.

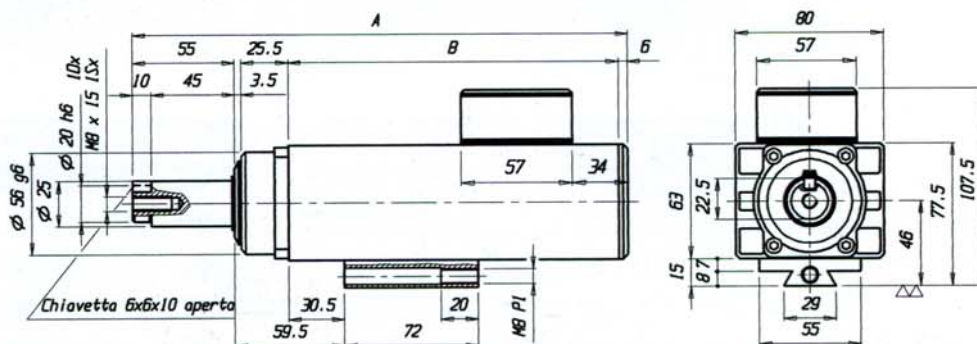


A richiesta coprimorsettiera in alluminio 57x57 con connettore esterno come da disegno.
On request aluminium cable box 57x57 with external connector.





Motori PE1-2



TIPO

A

B

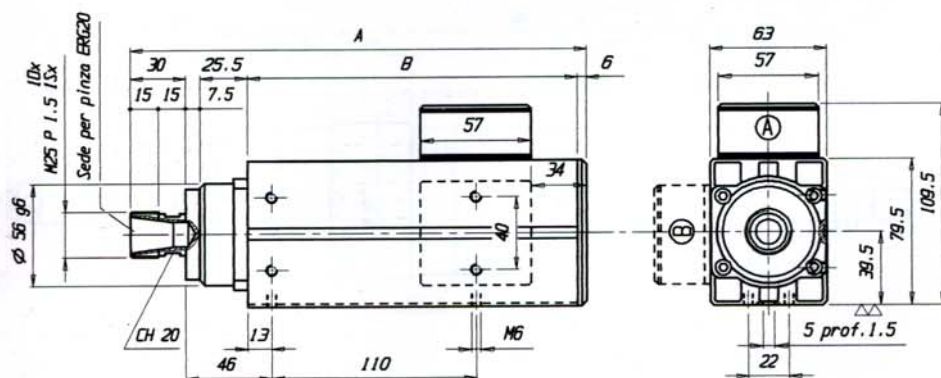
PE1 6/2 268 178

PE1 7/2 268 178

PE1 8.5/2 268 178

PE2 9/2 287 197

Sporgenza SL



TIPO

A

B

TMPE1 7/2 254 185

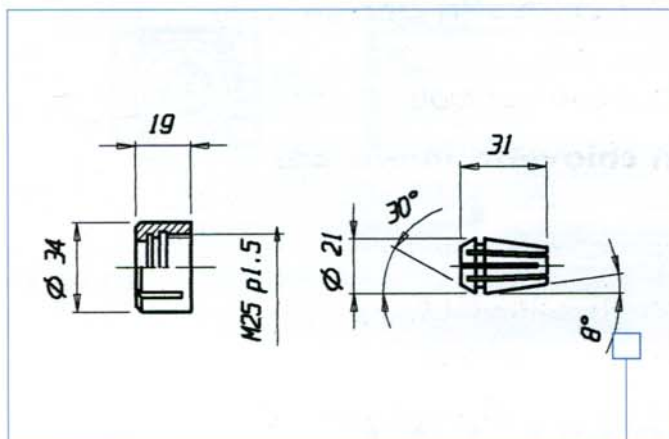
TMPE2 9/2 274 205

**Sporgenza per pinza
ERG20**

Su richiesta in posizione "B" con forature lato largo.
Attention standard terminal board on "A" position with fixing
holes on narrow part; by request terminal board on pos. "B" with
fixing holes on wide part.



Motori TM PE1-2

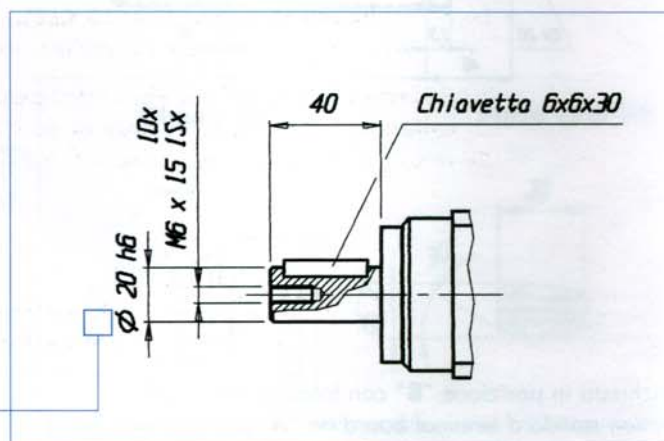


Ghiera GE 20
Pinza ERG 20

Diametri min. 1 max. 13

NB: Pinza e Ghiera vengono forniti a richiesta.

Be careful: collet and ring nut only by your request.

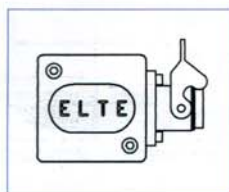


**Versione TM PE con
sporgenza d'albero SC**



Motori Serie PE1-2 TM PE1-2

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.



A richiesta coprimorsettiera in alluminio 57x57 con connettore esterno come da disegno.
On request aluminium cable box 57x57 with external connector.

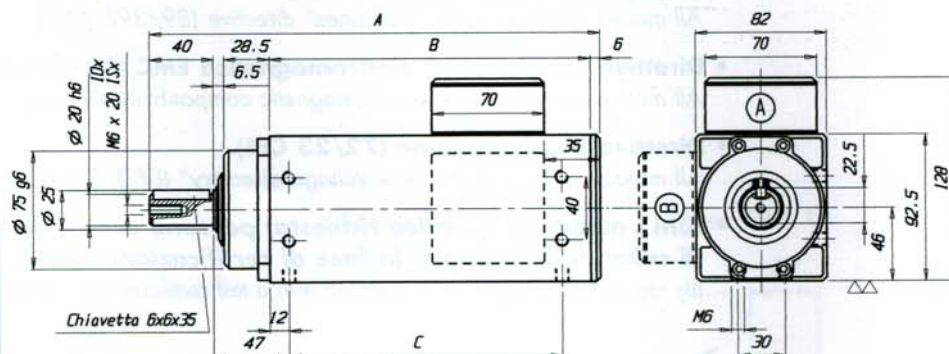


Serie PE3 TM PE3

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)		COS φ	PESO WEIGHT (Kg)	
PE3 7/2	220/380	220	380	50	3000	0.15	1.35/0.78	0.35	0.78	0.68	3.7
PE3 7/2	380	220	220/380	100	6000	0.30	1.00	1.73	1.73/1.00	0.68	3.7
PE3 7/2	220	380	220/380	200	12000	0.60	3.41	1.97	3.41/1.97	0.68	3.7
PE3 7/2	380	220	220/380	300	18000	0.85	2.70	4.60	4.60/2.70	0.70	3.7
PE3 7/2	380	220	220/380	400	24000	1	2.5	4.2	4.2/2.5	0.70	3.7
PE3 9/2	220/380	220	380	50	3000	0.20	1.50/0.90	1.50	0.90	0.70	4.8
PE3 9/2	380	220	220/380	100	6000	0.45	1.40	2.40	2.40/1.40	0.75	4.8
PE3 9/2	220	380	220/380	200	12000	0.75	4.00	2.30	4.00/2.30	0.75	4.8
PE3 9/2	380	220	220/380	300	18000	1.00	3.20	5.50	5.50/3.20	0.75	4.8
PE3 9/2	380	220	220/380	400	24000	1.1	3.20	5.50	5.50/3.20	0.75	4.8
PE3 12/2	220/380	220	380	50	3000	0.30	1.70/1.00	1.70	1.00	0.70	6.5
PE3 12/2	380	220	220/380	100	6000	0.75	1.90	3.30	3.30/1.90	0.75	6.5
PE3 12/2	220	380	220/380	200	12000	1.50	6.30	3.60	6.30/3.60	0.79	6.5
PE3 12/2	380	220	220/380	300	18000	2.00	5.20	9.00	9.00/5.20	0.80	6.5
PE3 12/2	380	220	220/380	400	24000	2.2	5.5	9.5	9.5/5.5	0.80	6.5
PE3 14/2	220/380	220	380	50	3000	0.45	2.78/1.60	2.78	1.60	0.68	7.5
PE3 14/2	380	220	220/380	100	6000	0.95	2.52	4.36	4.36/2.52	0.73	7.5
PE3 14/2	220	380	220/380	200	12000	1.80	8.20	4.70	8.20/4.70	0.70	7.5
PE3 14/2	380	220	220/380	300	18000	2.20	5.80	10.00	10.00/5.80	0.73	7.5
PE3 14/2	380	220	220/380	400	24000	2.20	5.80	10.00	10.00/5.80	0.73	7.5
TMPE3 9/2	220/380	220	380	50	3000	0.20	1.50/0.90	1.50	0.90	0.70	5.5
TMPE3 9/2	380	220	220/380	100	6000	0.45	1.40	2.40	2.40/1.40	0.75	5.5
TMPE3 9/2	220	380	220/380	200	12000	0.75	4.00	2.30	4.00/2.30	0.75	5.5
TMPE3 9/2	380	220	220/380	300	18000	1.00	3.20	5.50	5.50/3.20	0.75	5.5
TMPE3 9/2	380	220	220/380	400	24000	1.1	3.20	5.50	5.50/3.20	0.75	5.5
TMPE3 12/2	220/380	220	380	50	3000	0.30	1.70/1.00	1.70	1.00	0.70	8
TMPE3 12/2	380	220	220/380	100	6000	0.75	1.90	3.30	3.30/1.90	0.75	8
TMPE3 12/2	220	380	220/380	200	12000	1.50	6.30	3.60	6.30/3.60	0.79	8
TMPE3 12/2	380	220	220/380	300	18000	2.00	5.20	9.00	9.00/5.20	0.80	8
TMPE3 12/2	380	220	220/380	400	24000	2.2	5.50	9.50	9.50/5.50	0.80	8

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori PE3



NB: Posizione morsettiera standard come da posizione "A" con forature lato stretto. Su richiesta in posizione "B" con forature lato largo.

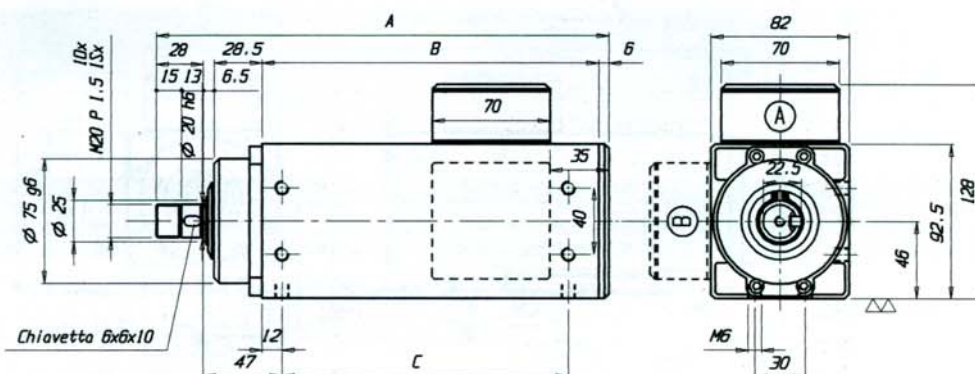
Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.

TIPO	A	B	C
PE3 7/2	261	180	150
PE3 9/2	281	200	170
PE3 12/2	321	240	170
PE3 14/2	321	240	170

Sporgenza SC

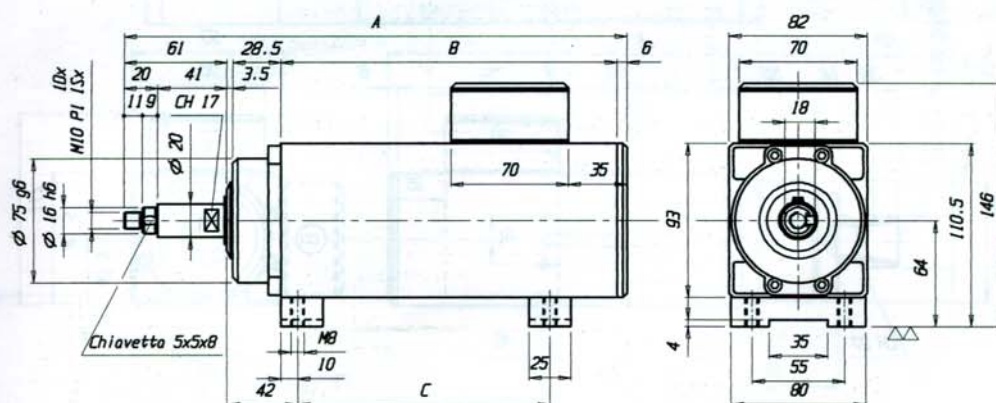


Motori Serie PE3



TIPO	A	B	C
PE3 7/2	249	180	150
PE3 9/2	269	200	170
PE3 12/2	309	240	170
PE3 14/2	309	240	170

Sporgenza SF



TIPO	A	B	C
PE3 7/2	249	180	90
PE3 9/2	299	200	150
PE3 12/2	339	240	150
PE3 14/2	339	240	150

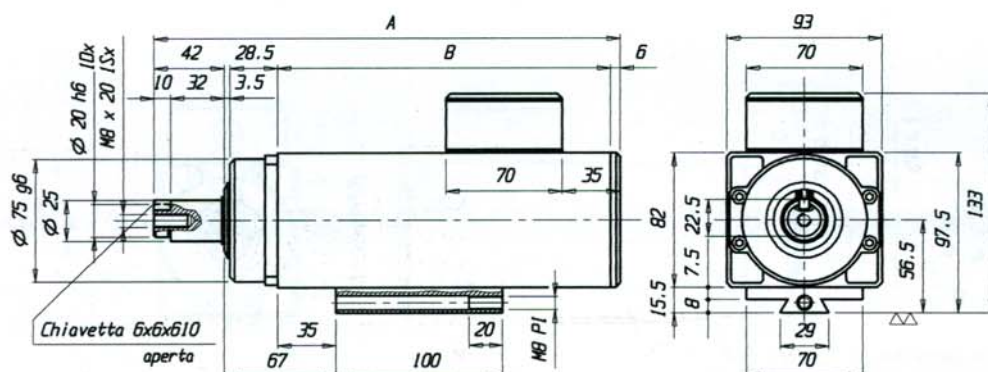
Sporgenza SLF

NB: Posizione morsettiera standard come da posizione "A" con forature lato destro. Su richiesta in posizione "B" con forature lato largo.

Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.



Motori PE3

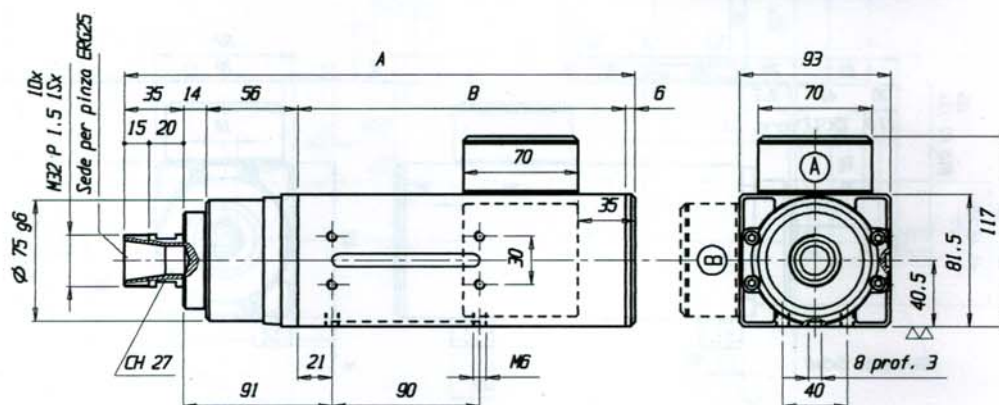


TIPO A B

PE3 7/2	260	180
PE3 9/2	280	200
PE3 12/2	320	240
PE3 14/2	320	240

Sporgenza SL

Motori TM PE3



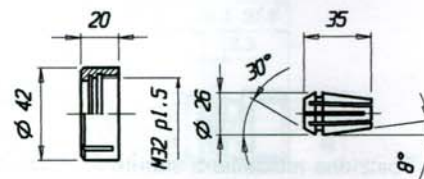
TIPO A B

TMPE3 9/2	311	200
TMPE3 12/2	351	240

Sporgenza per pinza
ERG 25

Ghiera GS 25

Pinza ERG 25

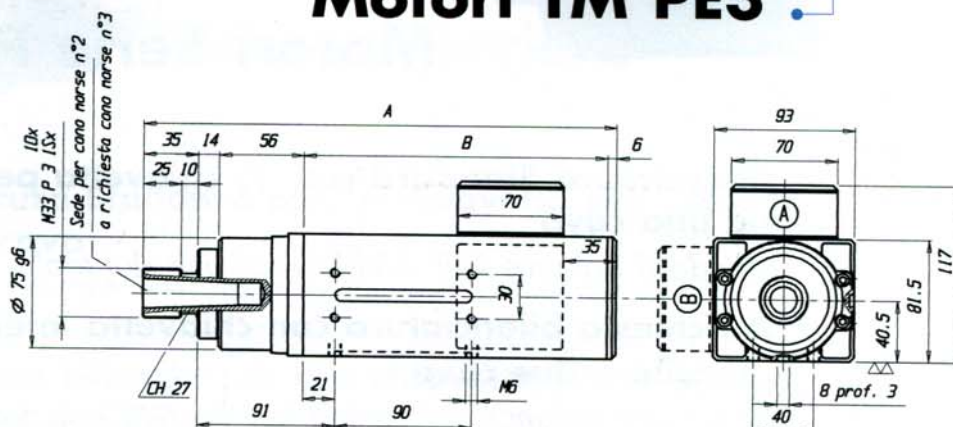


Diametri Min. 1 Max. 16

NB: Pinza e Ghiera vengono forniti a richiesta.
Be careful: collet and ring nut only by your request.

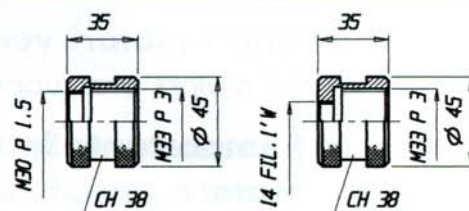


Motori TM PE3



TIPO	A	B
TMPE3 9/2	311	200
TMPE3 12/2	351	240

Sporgenza per Cono Morse 2-3

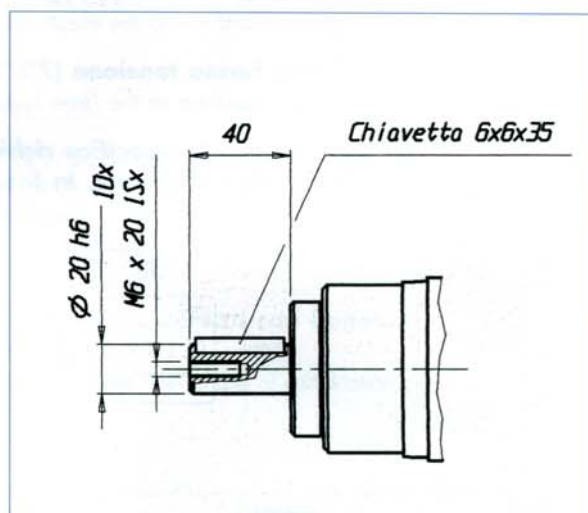


Ghiere per Cono Morse n° 2-3

NB: Pinza e Ghiera vengono forniti a richiesta.
Be careful: collet and ring nut only by your request.

NB: Posizione morsettieria standard come da posizione "A" con forature lato stretto. Su richiesta in posizione "B" con forature lato largo.

Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.

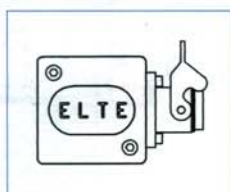


Versione TM PE3 con sporgenza d'albero SC



Motori Serie PE3 TM PE3

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.



A richiesta coprimorsettiera in alluminio 57x57 con connettore esterno come da disegno.
On request aluminium cable box 57x57 with external connector.



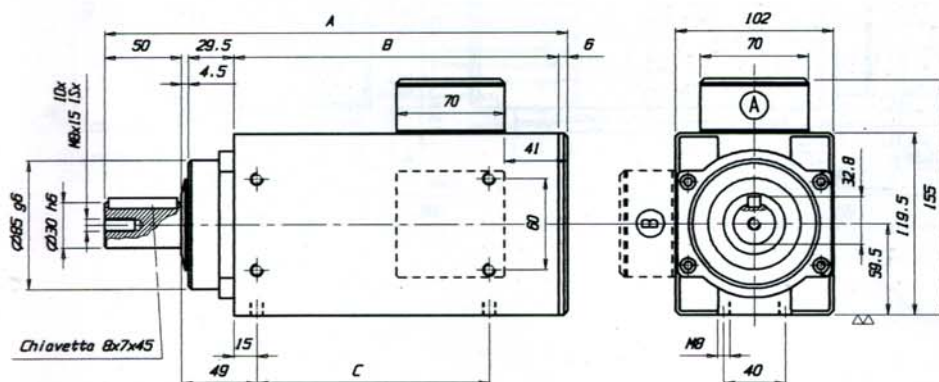


Serie PE4 TM PE4

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)		COS ϕ	PESO WEIGHT (Kg)	
PE4 10/2	220/380	220	380	50	3000	0.65	3.30/1.90	3.30	1.90	0.72	8
PE4 10/2	380	220	220/380	100	6000	1.10	2.80	4.90	4.90/2.80	0.77	8
PE4 10/2	220	380	220/380	200	12000	2.20	9.70	5.60	9.70/5.60	0.77	8
PE4 10/2	380	220	220/380	300	18000	3.30	7.90	13.70	13.70/7.90	0.80	8
PE4 10/2	380	220	220/380	400	24000	3.3	7.90	13.70	13.70/7.9	0.80	8
PE4 11/2	220/380	220	380	50	3000	0.75	3.50/2.00	3.50	2.00	0.74	8.8
PE4 11/2	380	220	220/380	100	6000	1.50	3.80	6.60	6.60/3.80	0.75	8.8
PE4 11/2	220	380	220/380	200	12000	2.60	10.40	6.00	10.40/6.00	0.83	8.8
PE4 11/2	380	220	220/380	300	18000	3.30	7.80	13.40	13.40/7.80	0.82	8.8
PE4 11/2	380	220	220/380	400	24000	3.30	7.80	13.40	13.40/7.80	0.82	8.8
PE4 13/2	220/380	220	380	50	3000	1.00	4.90/2.85	4.90	2.85	0.77	10.2
PE4 13/2	380	220	220/380	100	6000	2.00	4.45	7.70	7.70/4.45	0.82	10.2
PE4 13/2	220	380	220/380	200	12000	3.00	12.50	7.20	12.50/7.20	0.80	10.2
PE4 13/2	380	220	220/380	300	18000	4.00	9.50	16.40	16.40/9.50	0.80	10.2
PE4 13/2	380	220	220/380	400	24000	4.00	9.50	16.40	16.40/9.50	0.80	10.2
PE4 14/2	220/380	220	380	50	3000	1.10	5.50/3.15	5.50	3.15	0.72	11
PE4 14/2	380	220	220/380	100	6000	2.20	5.50	9.50	9.50/5.50	0.77	11
PE4 14/2	220	380	220/380	200	12000	3.70	15.00	8.70	15.00/8.70	0.78	11
PE4 14/2	380	220	220/380	300	18000	5.60	11.50	20.00	20.00/11.5	0.85	11
PE4 14/2	380	220	220/380	400	24000	5.60	11.50	20.00	20/11.5	0.85	11
TMPE4 10/2	220/380	220	380	50	3000	0.65	3.30/1.90	3.30	1.90	0.72	10.5
TMPE4 10/2	380	220	220/380	100	6000	1.10	2.80	4.90	4.90/2.80	0.77	10.5
TMPE4 10/2	220	380	220/380	200	12000	2.20	9.70	5.60	9.70/5.60	0.77	10.5
TMPE4 10/2	380	220	220/380	300	18000	3.30	7.90	13.70	13.70/7.9	0.80	10.5
TMPE4 10/2	380	220	220/380	400	24000	3.30	7.90	13.70	13.70/7.9	0.80	10.5
TMPE4 14/2	220/380	220	380	50	3000	1.10	5.50/3.15	5.50	3.15	0.72	12.5
TMPE4 14/2	380	220	220/380	100	6000	2.20	5.50	9.50	9.50/5.50	0.77	12.5
TMPE4 14/2	220	380	220/380	200	12000	3.70	15.00	8.70	15.00/8.7	0.78	12.5
TMPE4 14/2	380	220	220/380	300	18 000	5.60	11.50	20.00	20.00/11.5	0.85	12.5
TMPE4 14/2	380	220	220/380	400	24000	5.60	11.50	20.00	20.00/11.5	0.85	12.5

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori PE4



NB: Posizione morsetteria standard come da posizione "A" con forature lato stretto. Su richiesta in posizione "B" con forature lato largo.

Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.

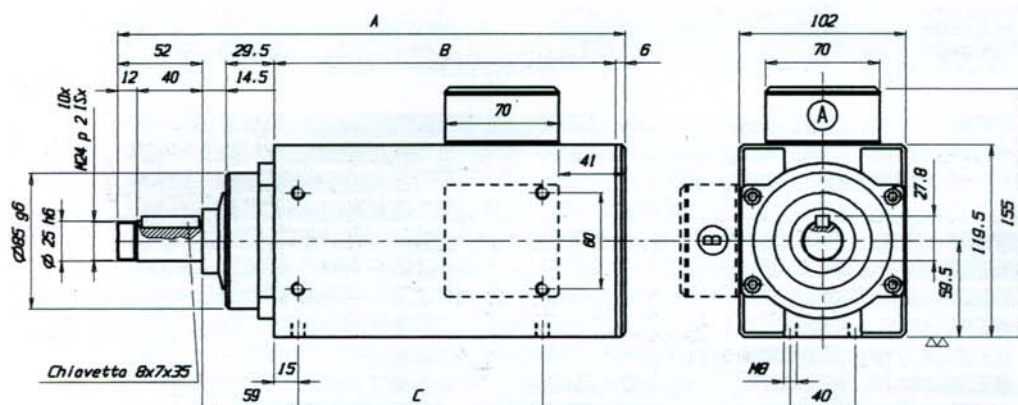


TIPO	A	B	C
PE4 10/2	300	210	150
PE4 11/2	340	250	200
PE4 13/2	340	250	200
PE4 14/2	340	250	200

Sporgenza SC



Motori PE4

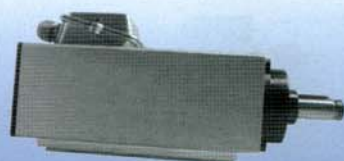
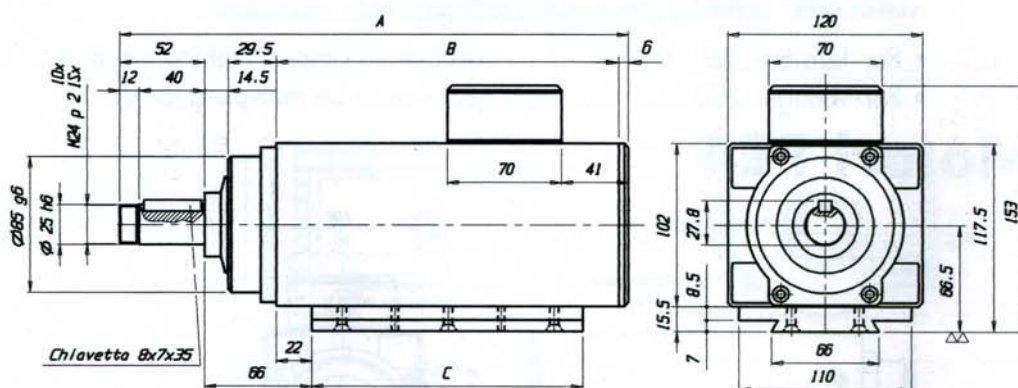


NB: Posizione morsetteria standard come da posizione "A" con forature lato stretto. Su richiesta in posizione "B" con forature lato largo.

Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.

TIPO	A	B	C
PE4 10/2	312	210	150
PE4 11/2	352	250	200
PE4 13/2	352	250	200
PE4 14/2	352	250	200

Sporgenza SF



TIPO	A	B	C
PE4 10/2	312	210	165
PE4 11/2	352	250	205
PE4 13/2	352	250	205
PE4 14/2	352	250	205

Sporgenza SFC



Sporgenza per pinza ERG 25

Diametri Min. 1 Max. 16

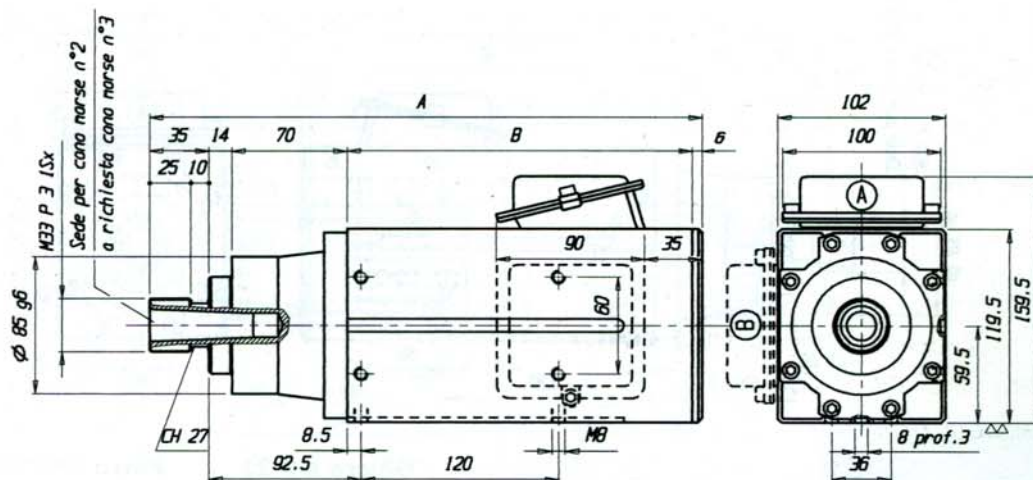
Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.

Diametri Min. 2 Max. 20

Sporgenza per pinza ERG 32



Motori TM PE4



NB: Posizione morsetteria standard come da posizione "A" con forature lato stretto. Su richiesta in posizione "B" con forature lato largo.

Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.

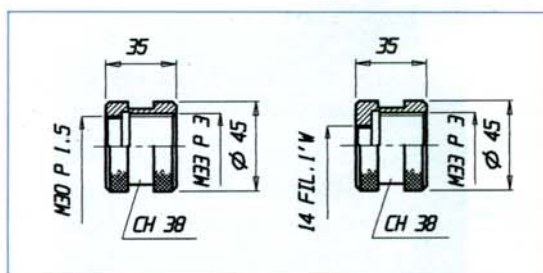
NB: Pinza e Ghiera vengono forniti a richiesta.

Be careful: collet and ring nut only by your request.

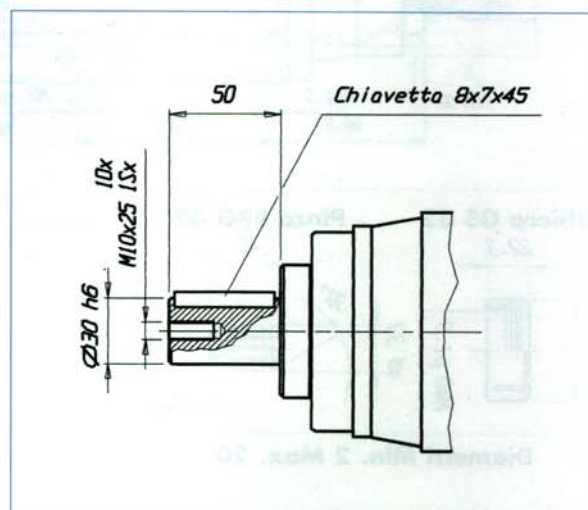


TIPO	A	B
TMPE4 10/2	335	210
TMPE4 14/2	375	250

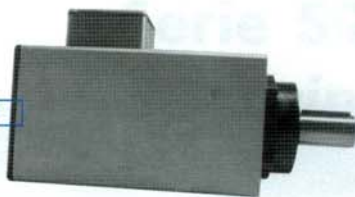
Sporgenza per cono morse 2-3



Ghiere per Cono Morse n° 2-3

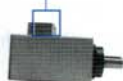


Versione TM PE con sporgenza d'albero SC



Motori Serie PE4 TM PE4

- **Bilanciatura Standard con 1/2 chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.

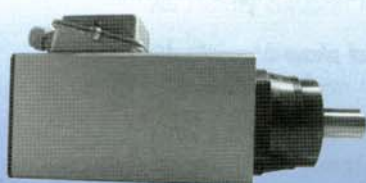
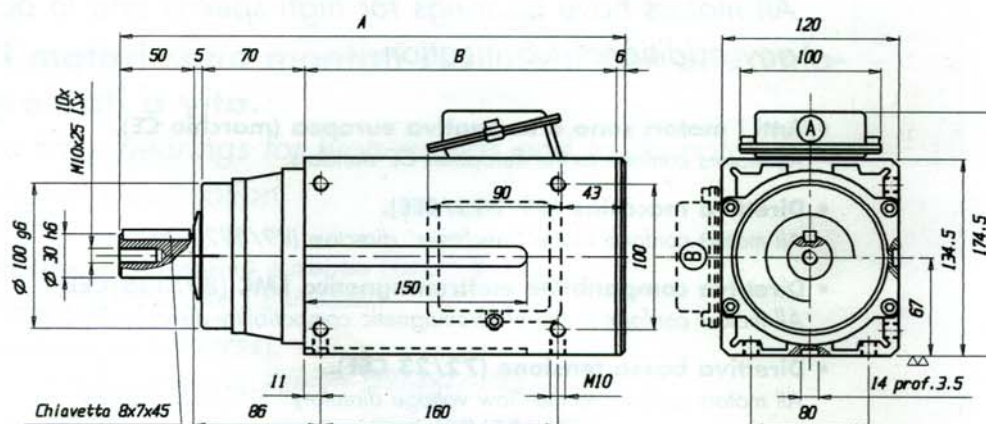


Serie PE5 TM PE5

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)		ASSORB. ABSORB. (amp)		COS ϕ	PESO WEIGHT (Kg)
PE5 10/2	220/380	220	380	50	3000	1.25	5.60/3.20	5.60	3.20	0.78	9.5
PE5 10/2	380	220	220/380	100	6000	1.90	4.35	7.55	7.55/4.35	0.83	9.5
PE5 10/2	220	380	220/380	200	12000	3.00	12.3	7.10	12.3/7.10	0.80	9.5
PE5 10/2	380	220	220/380	300	18000	4.50	10	18	18/10	0.81	9.5
PE5 10/2	380	220	220/380	400	24000	4.50	10	18	18/10	0.81	9.5
PE5 14/2	220/380	220	380	50	3000	3.00	11.5/6.60	11.50	6.60	0.82	17
PE5 14/2	380	220	220/380	100	6000	3.30	7.40	12.80	12.80/7.40	0.82	17
PE5 14/2	220	380	220/380	200	12000	4.50	18.2	10.60	18.2/10.60	0.85	17
PE5 14/2	380	220	220/380	300	18000	7.00	14.50	25.00	25.0/14.50	0.86	17
PE5 14/2	380	220	220/380	400	24000	7.00	14.50	25.00	25.0/14.5	0.86	17
TMPE5 10/2	220/380	220	380	50	3000	1.25	5.60/3.20	5.60	3.20	0.78	9.5
TMPE5 10/2	380	220	220/380	100	6000	1.90	4.35	7.55	7.55/4.35	0.83	9.5
TMPE5 10/2	220	380	220/380	200	12000	3.00	12.3	7.10	12.3/7.10	0.80	9.5
TMPE5 10/2	380	220	220/380	300	18000	4.50	10	18	18/10	0.81	9.5
TMPE5 10/2	380	220	220/380	400	24000	4.50	10	18	18/10	0.91	9.5
TMPE5 14/2	220/380	220	380	50	3000	3.00	11.5/6.60	11.50	6.60	0.82	17
TMPE5 14/2	380	220	220/380	100	6000	3.30	7.40	12.80	12.80/7.40	0.82	17
TMPE5 14/2	220	380	220/380	200	12000	4.50	18.2	10.60	18.2/10.60	0.85	17
TMPE5 14/2	380	220	220/380	300	18 000	7.00	14.50	25.00	25.0/14.50	0.86	17
TMPE5 14/2	380	220	220/380	400	24000	7.00	14.50	25	25/14.50	0.86	17

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori PE5



TIPO	A	B
PE5 10/2	341	210
PE5 14/2	381	250

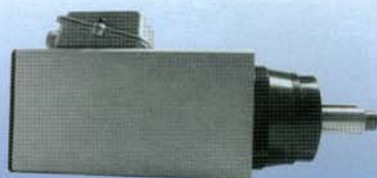
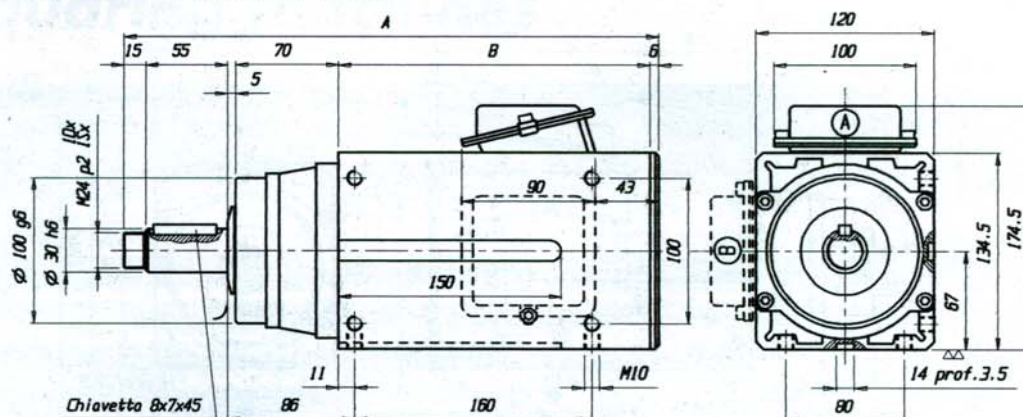
Sporgenza SC

NB: Posizione morsettiera standard come da posizione "A" con forature lato stretto. Su richiesta in posizione "B" con forature lato largo.

Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.



Motori TM PE5

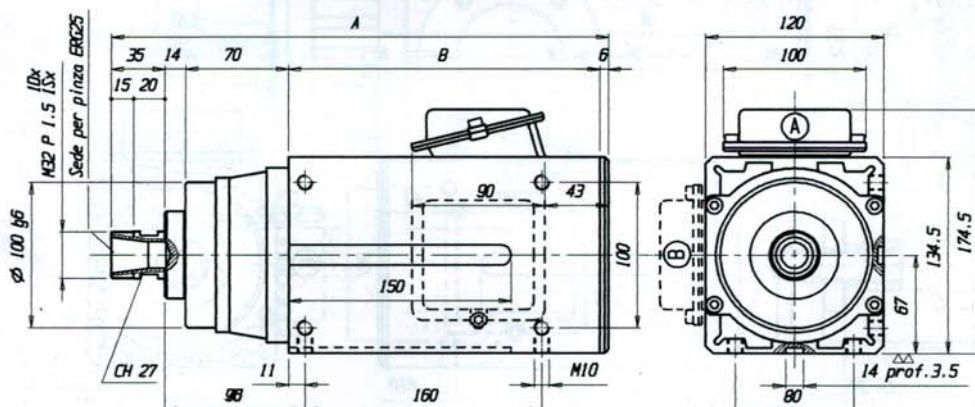


TIPO	A	B
PE5 10/2	361	210
PE5 14/2	401	250

Sporgenza SF

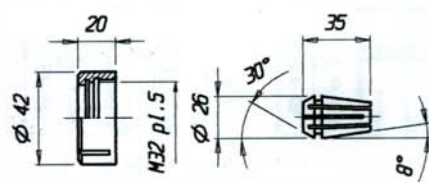
NB: Posizione morsetteria standard come da posizione "A" con forature lato stretto. Su richiesta in posizione "B" con forature lato largo.

Attention standard terminal board on "A" position with fixing holes on narrow part; by request terminal board on pos. "B" with fixing holes on wide part.



Ghiera GS 25

Pinza ERG 25



Diametri Min. 1 Max. 16

NB: Pinza e Ghiera vengono forniti a richiesta.

Be careful: collet and ring nut only by your request.



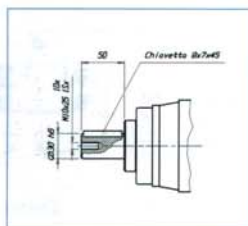
TIPO	A	B
TMPE5 10/2	335	210
TMPE5 14/2	375	250

Sporgenza per pinza ERG 25



Motori Serie PE5 TM PE5

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cava**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.



Versione TM PE con sporgenza d'albero SC

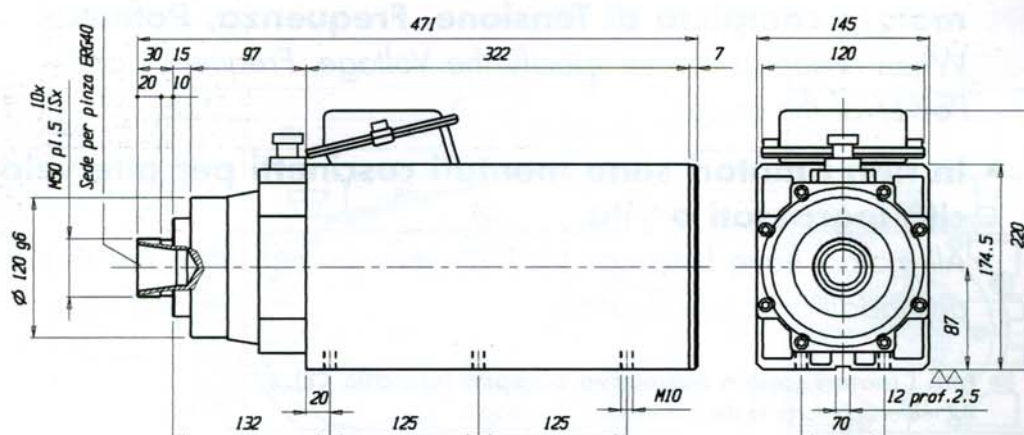


Serie TM PE6

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS ϕ	PESO WEIGHT (Kg)
TMPE6 15/2	220/380	220	380	50	3000	3.40	13.6/7.8	13.6	7.8	0.83	28
TMPE6 15/2	380	220	220/380	100	6000	5.60	11.5	19.9	19.9/11.5	0.84	28
TMPE6 15/2	220	380	220/380	200	12000	8.50	32.7	18.9	32.7/18.9	0.84	28
TMPE6 15/2	380	220	220/380	300	18000	9.50	21.00	36.40	36.4/21.0	0.84	28
TMPE6 15/2	380	220	220/380	400	24000	9.50	21.00	36.40	36.4/21.0	0.84	28

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

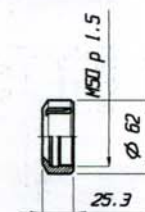
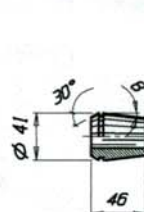
Motori TM PE6



Sporgenza per pinza
ERG 40

Ghiera GS 40

Pinza ERG 40



Diametri Min. 3 Max. 30

NB: Pinza e Ghiera vengono forniti a richiesta.
Be careful: collet and ring nut only by your request.



Sporgenza per cono morsa 2-3



Motori Serie TM PE6

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.





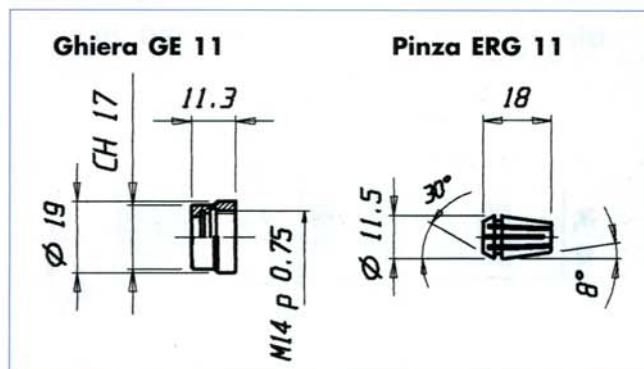
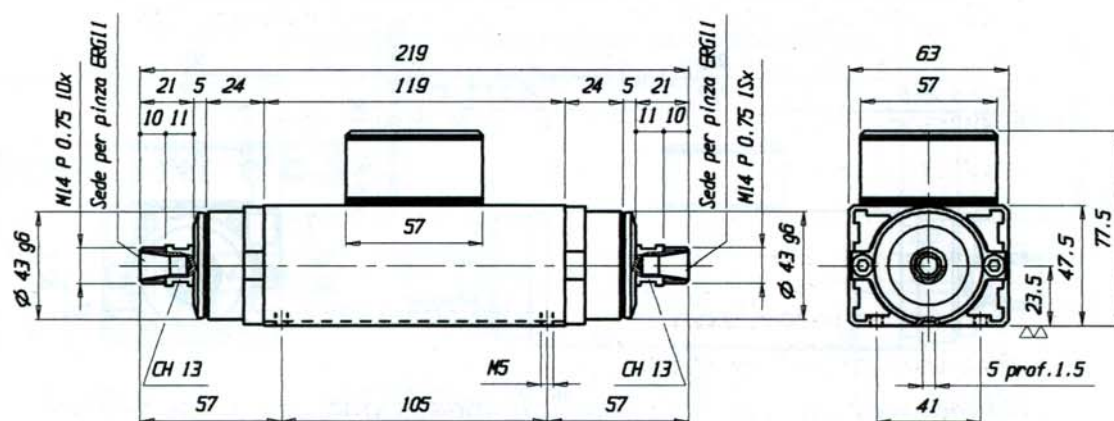
BIALBERO

Double shaft exit

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS ϕ	PESO WEIGHT (Kg)
TMPEO 6/2	220	380	220/380	200	12000	0.15	0.80	0.45	0.80/0.45	0.70	2
TMPEO 6/2	380	220	220/380	300	18000	0.16	0.70	1.20	1.20/0.70	0.70	2

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori TM PEO 6/2



Diametri Min. 1 Max. 7



NB: Motore senza ventilazione

Attention: engine without ventilation

NB: Pinza e Ghiera vengono forniti a richiesta.

Be careful: collet and ring nut only by your request.

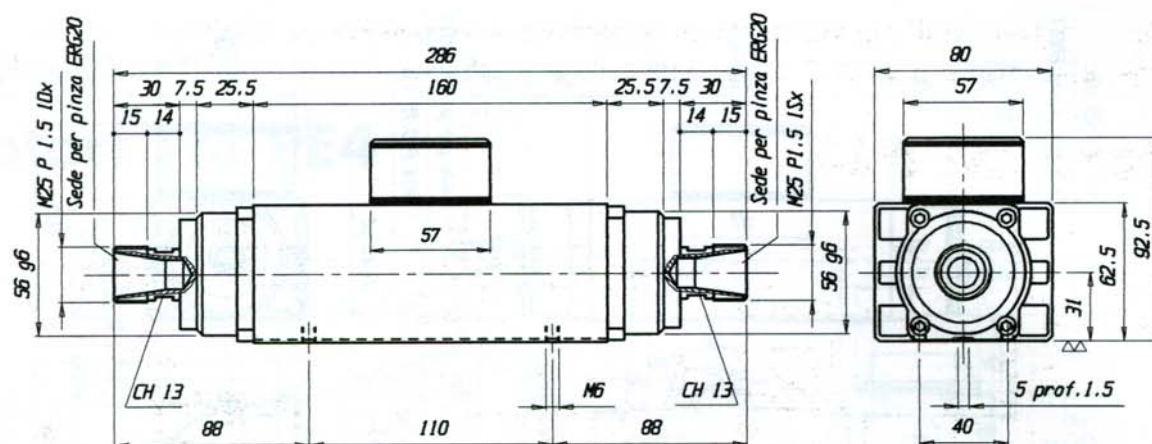
BIALBERO

Double shaft exit

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS ϕ	PESO WEIGHT (Kg)
TMPE2 9/2	220	380	220/380	200	12000	0.22	1.30	0.75	1.30/0.75	0.70	4.5
TMPE2 9/2	380	220	220/380	300	18000	0.30	1.05	1.80	1.80/1.05	0.73	4.5

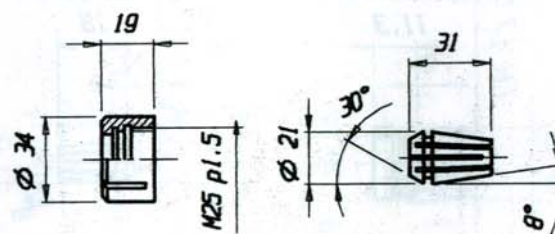
- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori TM PE2 9/2



Ghiera GE 20

Pinza ERG 20



Diametri Min. 1 Max. 7

NB: Motore senza ventilazione

Attention: engine without ventilation

NB: Pinza e Ghiera vengono forniti a richiesta.

Be careful: collet and ring nut only by your request.



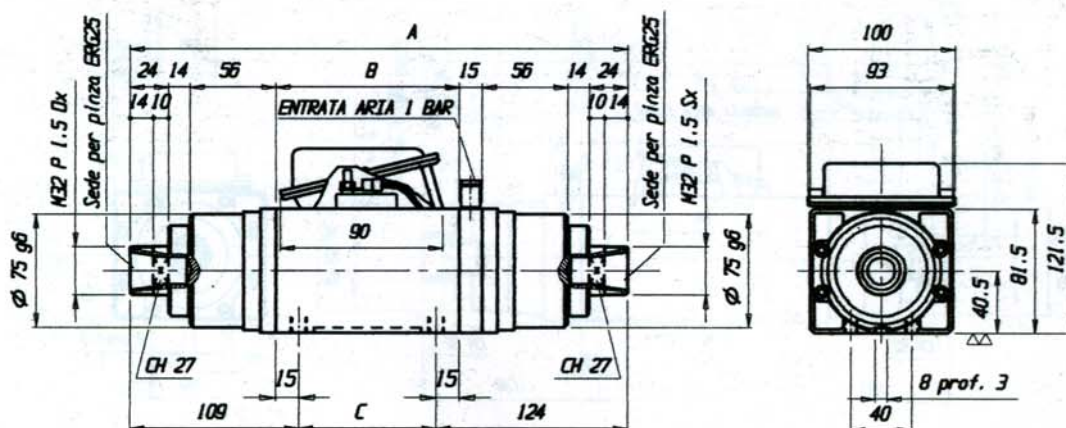
BIALBERO

Double shaft exit

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS ϕ	PESO WEIGHT (Kg)
TMPE3 9/2	220/380	220	380	50	3000	0.20	1.50/0.90	1.50	0.90	0.70	7.5
TMPE3 9/2	380	220	220/380	100	6000	0.45	1.40	2.40	2.40/1.40	0.75	7.5
TMPE3 9/2	220	380	220/380	200	12000	0.75	4.00	2.30	4.00/2.30	0.75	7.5
TMPE3 9/2	380	220	220/380	300	18000	1.00	3.20	5.50	5.50/3.20	0.75	7.5
TMPE3 12/2	220/380	220	380	50	3000	0.30	1.70/1.00	1.70	1.00	0.70	9
TMPE3 12/2	380	220	220/380	100	6000	0.75	1.90	3.30	3.30/1.90	0.75	9
TMPE3 12/2	220	380	220/380	200	12000	1.50	6.30	3.60	6.30/3.60	0.80	9
TMPE3 12/2	380	220	220/380	300	18000	2.00	5.20	9.00	9.00/5.20	0.80	9

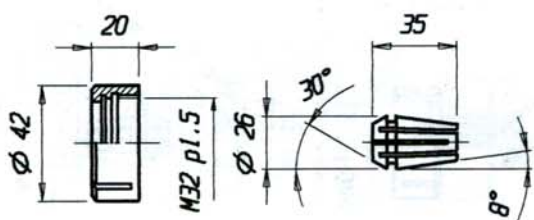
- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori TM PE3



Ghiera GS 25

Pinza ERG 25



Diametri Min. 1 Max. 16

NB: Ventilazione ad aria compressa
By careful: compressed air cooling

NB: Pinza e Ghiera vengono forniti a richiesta.
Be careful: collet and ring nut only by your request.



TIPO	A	B	C
TMPE3 9/2	323	120	90
TMPE3 12/2	353	150	120



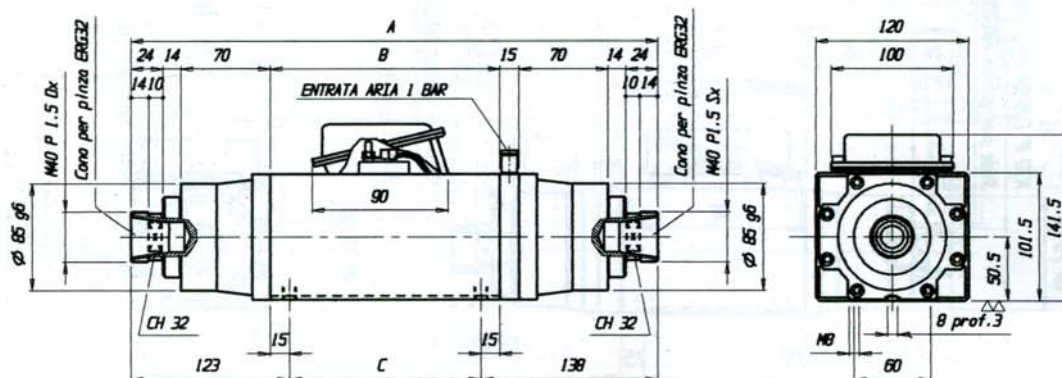
BIALBERO

Double shaft exit

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS φ	PESO WEIGHT (Kg)
TMPE4 10/2	220/380	220	380	50	3000	0.65	3.30/1.90	3.30	1.90	0.72	14.5
TMPE4 10/2	380	220	220/380	100	6000	1.10	2.80	4.90	4.90/2.80	0.77	14.5
TMPE4 10/2	220	380	220/380	200	12000	2.20	9.70	5.60	9.70/5.60	0.77	14.5
TMPE4 10/2	380	220	220/380	300	18000	3.30	7.90	13.70	13.70/7.90	0.80	14.5
TMPE4 14/2	220/380	220	380	50	3000	1.10	5.50/3.15	5.50	3.15	0.72	16
TMPE4 14/2	380	220	220/380	100	6000	2.20	5.50	9.50	9.50/5.50	0.77	16
TMPE4 14/2	220	380	220/380	200	12000	3.70	15.00	8.70	15.00/8.70	0.78	16
TMPE4 14/2	380	220	220/380	300	18000	5.60	11.5	20.00	20.00/11.5	0.85	16

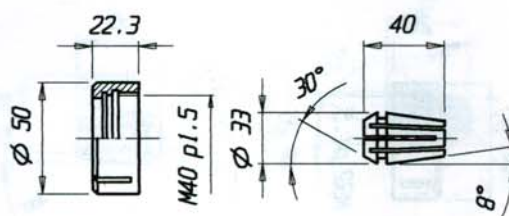
- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori TM PE4



Ghiera GS 32

Pinza ERG 32



Diametri Min. 2 Max. 20

NB: Ventilazione ad aria compressa

By careful: compressed air cooling

NB: Pinza e Ghiera vengono forniti a richiesta.

Be careful: collet and ring nut only by your request.



TIPO A B C

TMPE4 10/2	371	140	110
TMPE4 14/2	411	180	150

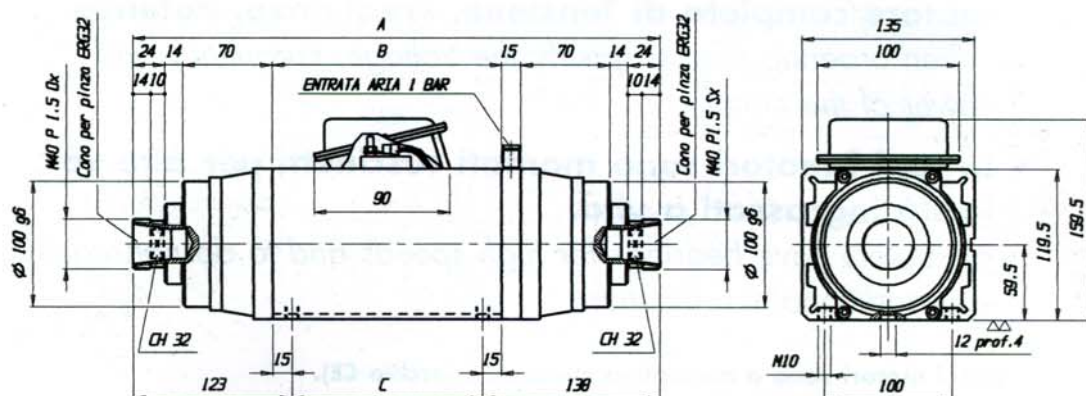
.BIALBERO

Double shaft exit

TIPO TYPE	TENSIONE VOLTAGE (VOLT)			FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)			COS φ	PESO WEIGHT (Kg)
TMPE5 10/2	220/380	220	380	50	3000	1.25	5.60/3.20	5.60	3.20	0.78	17.5
TMPE5 10/2	380	220	220/380	100	6000	1.90	4.40	7.55	7.55/4.40	0.83	17.5
TMPE5 10/2	220	380	220/380	200	12000	3.00	12.30	7.10	12.3/7.10	0.80	17.5
TMPE5 10/2	380	220	220/380	300	18000	4.50	10.5	18.00	18.0/10.5	0.81	17.5
TMPE5 14/2	220/380	220	380	50	3000	3.00	11.5/6.60	11.5	6.60	0.82	20.5
TMPE5 14/2	380	220	220/380	100	6000	3.30	7.40	12.80	12.80/7.40	0.82	20.5
TMPE5 14/2	220	380	220/380	200	12000	4.50	18.20	10.6	18.20/10.6	0.85	20.5
TMPE5 14/2	380	220	220/380	300	18000	7.00	14.50	25.00	25.0/14.50	0.86	20.5

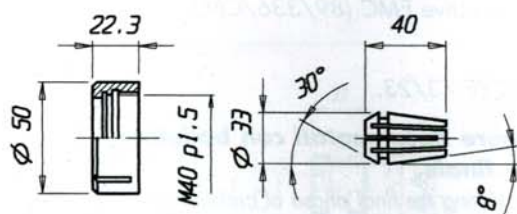
- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

.Motori TM PE5



Ghiera GS 32

Pinza ERG 32



Diametri Min. 2 Max. 20

NB: Ventilazione ad aria compressa

By careful: compressed air cooling

NB: Pinza e Ghiera vengono forniti a richiesta.

Be careful: collet and ring nut only by your request.



TIPO	A	B	C
TMPE5 10/2	371	140	110
TMPE5 14/2	411	180	150



Motori BIALBERO **Double shaft exit**

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**
Standard balance with half key for one slot tools.
- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**
By request balance with entire key for two slots tools.
- **Si raccomanda l'uso di utensili bilanciati**
We strictly recommend the use of balanced tools.
- **Tutti i motori vengono forniti privi di pressacavo**
All motors are supplied without the plastic gland.
- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**
When ordering please specify the Voltage, Frequency and Power of the motor.
- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**
All motors have bearings for high speeds and to do not require any additional lubrication.
- **Tutti i motori sono a normativa europea (marchio CE).**
All motors conform to the European CE standards.
- **Direttiva macchine (89/392/CEE).**
All motors conform to the "machines" directive (89/392/CEE).
- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).
- **Direttiva bassa tensione (72/23 CEE).**
All motors conform to the "low voltage directory" (DPT) CEE 73/23.
- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**
(By request) all motors can be supplied with a test certificate, during the final phase of certification.



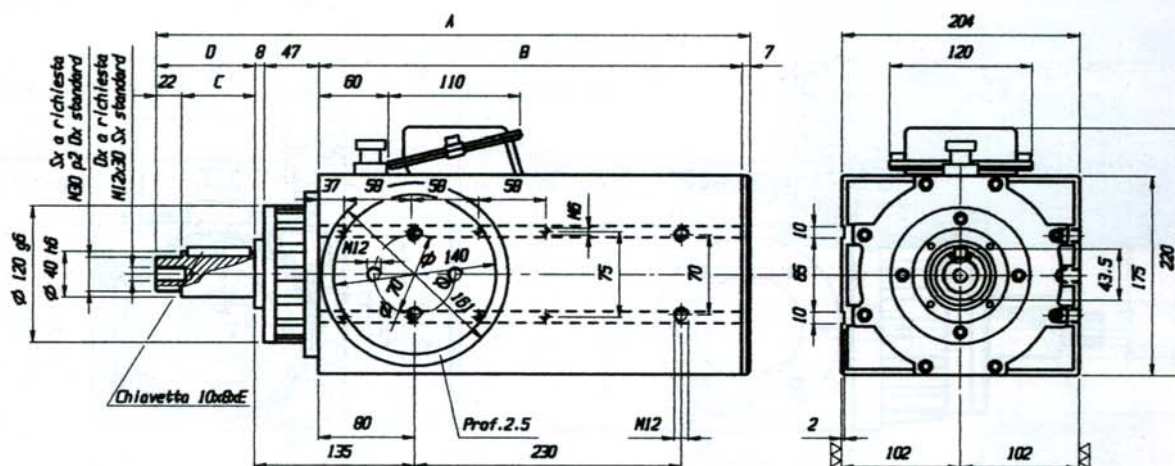
Serie SQUADRATICI.

Squaring machines

TIPO TYPE	TENSIONE VOLTAGE (VOLT)	FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)	COS ϕ	PESO WEIGHT (Kg)
PE7 11/2	220/380	50	3000	4.0	15.7/9.1	0.82	38
	380Δ	100	6000	5.8	12.9	0.84	
PE7 15/2	220/380	50	3000	5.6	20.2/11.7	0.80	45
	380Δ	100	6000	8.2	17.7	0.85	
PE7 17/2	220/380	50	3000	6.2	24.0/13.8	0.80	50
	380Δ	100	6000	8.8	19.6	0.82	

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Motori PE7



TIPO	A	B	C	D	E
PE7 11/2	512	365	63	85	50
PE7 11/2	542	365	93	115	80
PE7 11/2	567	365	118	140	100
PE7 15/2	512	365	63	85	50
PE7 15/2	542	365	93	115	80
PE7 15/2	567	365	118	140	100
PE7 17/2	562	415	63	85	50
PE7 17/2	592	415	93	115	80
PE7 17/2	617	415	118	140	100



Motori SQUADRATICI **Squaring machines**

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**

Standard balance with half key for one slot tools.

- **A richiesta bilanciatura con chiavetta intera per utensile a due cave**

By request balance with entire key for two slots tools.

- **Si raccomanda l'uso di utensili bilanciati**

We strictly recommend the use of balanced tools.

- **Tutti i motori vengono forniti privi di pressacavo**

All motors are supplied without the plastic gland.

- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**

When ordering please specify the Voltage, Frequency and Power of the motor.

- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**

All motors have bearings for high speeds and to do not require any additional lubrication.

- **Tutti i motori sono a normativa europea (marchio CE).**

All motors conform to the European CE standards.

- **Direttiva macchine (89/392/CEE).**

All motors conform to the "machines" directive (89/392/CEE).

- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**

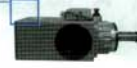
All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).

- **Direttiva bassa tensione (72/23 CEE).**

All motors conform to the "low voltage directory" (DPT) CEE 73/23.

- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**

(By request) all motors can be supplied with a test certificate, during the final phase of certification.





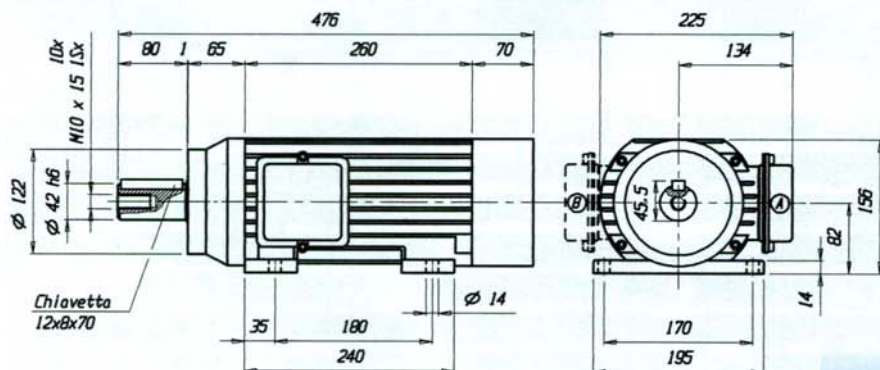
Motori Serie S.

TIPO TYPE	TENSIONE VOLTAGE (VOLT)	FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)	COS ϕ	PESO WEIGHT (Kg)
S1 13/2	220/380	50	3000	2.90	11.5/6.6	0.83	25
	380Δ	100	6000	4.80	10.90	0.83	
S1 17/2	220/380	50	3000	4.00	15.5/8.90	0.83	27
	380Δ	100	6000	6.65	14.9	0.84	
S1 13/4	220/380	50	1500	2.20	9.3/5.3	0.80	25
	380Δ	100	3000	3.60	8.2	0.82	
S1 17/4	220/380	50	1500	3.00	11.8/6.80	0.80	27
	380Δ	100	3000	4.50	10.2	0.82	
S2 14/2	220/380	50	3000	5.20	20.0/11.4	0.82	45
	380Δ	100	6000	7.30	16.2	0.83	
S2 18/2	220/380	50	3000	7.00	27.0/15.6	0.82	60
	380Δ	100	6000	9.20	20.0	0.83	
S2 14/4	220/380	50	1500	3.70	14.9/8.6	0.80	45
	380Δ	100	3000	5.40	12.0	0.82	
S2 18/4	220/380	50	1500	4.50	17.7/10.2	0.80	60
	380Δ	100	3000	6.35	14.0	0.82	
S3 9/2	220/380	50	3000	5.50	20.1/11.6	0.86	55
	380Δ	100	6000	8.50	17.8	0.86	
S3 12/2	220/380	50	3000	7.10	26.0/15.0	0.87	57
	380Δ	100	6000	11.3	23.5	0.87	
S3 14/2	220/380	50	3000	8.80	32.5/18.8	0.87	60
	380Δ	100	6000	12.6	26.5	0.87	
S3 16/2	220/380	50	3000	10.5	39.0/22.5	0.87	62
	380Δ	100	6000	14.3	30	0.87	
S3 20/2	220/380	50	3000	14.2	53.7/31.0	0.87	65
	380Δ	100	6000	19.0	40	0.87	
S3 12/4	220/380	50	1500	5.20	20.8/12.0	0.83	57
	380Δ	100	3000	6.30	14	0.83	
S3 16/4	220/380	50	1500	7.10	27.7/16.0	0.83	60
	380Δ	100	3000	8.40	18.5	0.84	
S3 18/4	220/380	50	1500	8.50	34.6/20	0.83	62
	380Δ	100	3000	10.2	23	0.84	
S3 20/4	220/380	50	1500	10.5	41.6/24.0	0.83	65
	380Δ	100	3000	12.2	26.9	0.84	

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.



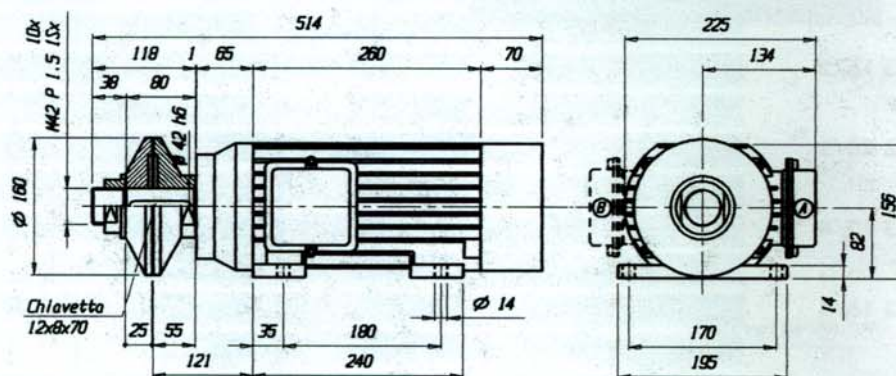
Motori S1



Sporgenza SC

NB: Posizione morsettiera standard "A" lato destro. Su richiesta in posizione "B" lato sinistro.

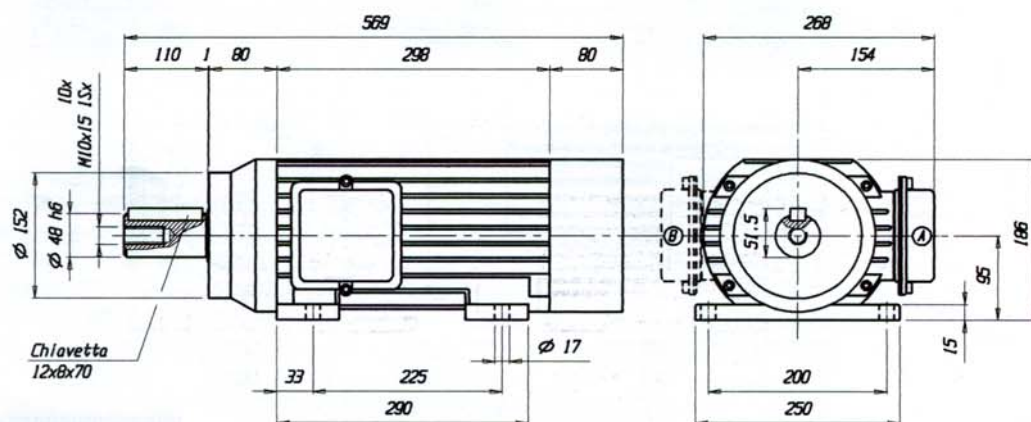
Attention standard terminal board on "A" position with fixing holes on right side; by request terminal board on pos. "B" on left side.



**Sporgenza SCF
e Flange**



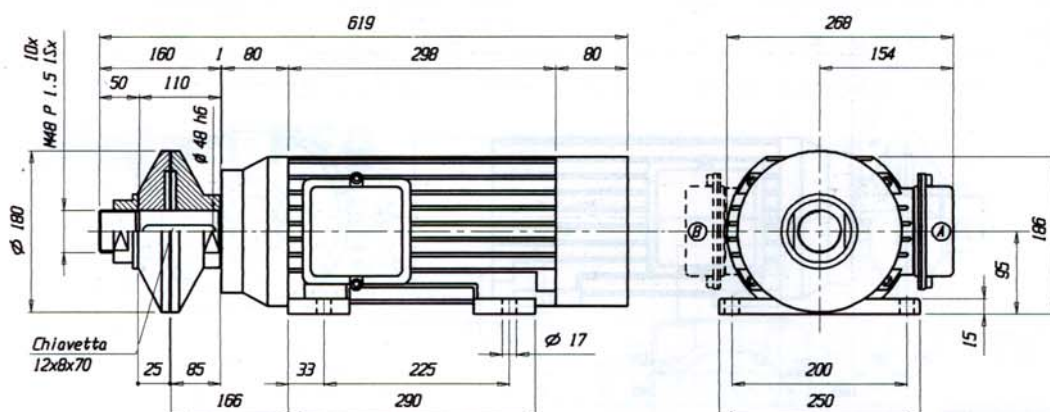
Motori S2



Sporgenza SC

NB: Posizione morsetteria standard "A" lato destro. Su richiesta in posizione "B" lato sinistro.

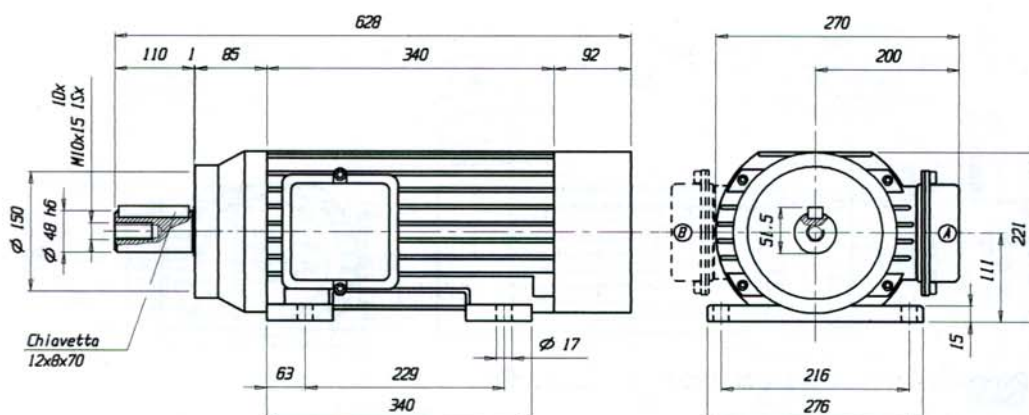
Attention standard terminal board on "A" position with fixing holes on right side; by request terminal board on pos. "B" on left side.



Sporgenza SCF e Flange



Motori S3

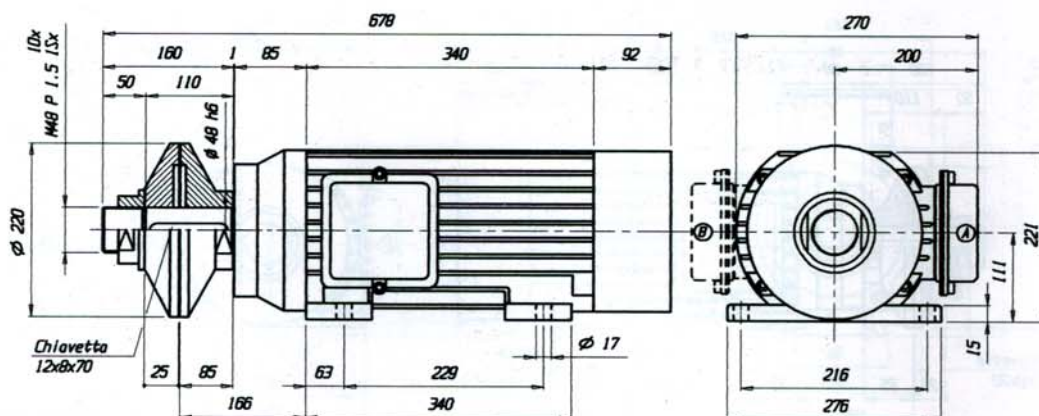


NB: Posizione morsetteria standard "A" lato destro. Su richiesta in posizione "B" lato sinistro.

Attention standard terminal board on "A" position with fixing holes on right side; by request terminal board on pos. "B" on left side.



Sporgenza SC



**Sporgenza SCF
e Flange**



Motori Serie S

- **Bilanciatura Standard con $1/2$ chiavetta per utensile ad una cava**

Standard balance with half key for one slot tools.

- **A richiesta bilanciatura con chiavetta intera per utensile a due cava**

By request balance with entire key for two slots tools.

- **Si raccomanda l'uso di utensili bilanciati**

We strictly recommend the use of balanced tools.

- **Tutti i motori vengono forniti privi di pressacavo**

All motors are supplied without the plastic gland.

- **È importante in sede d'ordine specificare il tipo di motore completa di Tensione, Frequenza, Potenza.**

When ordering please specify the Voltage, Frequency and Power of the motor.

- **In tutti i motori sono montati cuscinetti per alte velocità ingrassati a vita.**

All motors have bearings for high speeds and to do not require any additional lubrication.

- **Tutti i motori sono a normativa europea (marchio CE).**

All motors conform to the European CE standards.

- **Direttiva macchine (89/392/CEE).**

All motors conform to the "machines" directive (89/392/CEE).

- **Direttiva compatibilità elettromagnetica EMC (89/336/CEE).**

All motors conform to the electromagnetic compatibility directive EMC (89/336/CEE).

- **Direttiva bassa tensione (72/23 CEE).**

All motors conform to the "low voltage directory" (DPT) CEE 73/23.

- **Tutti i motori (a specifica richiesta) possono essere documentati con bollettini di collaudo funzionale, in fase di certificazione finale.**

(By request) all motors can be supplied with a test certificate, during the final phase of certification.



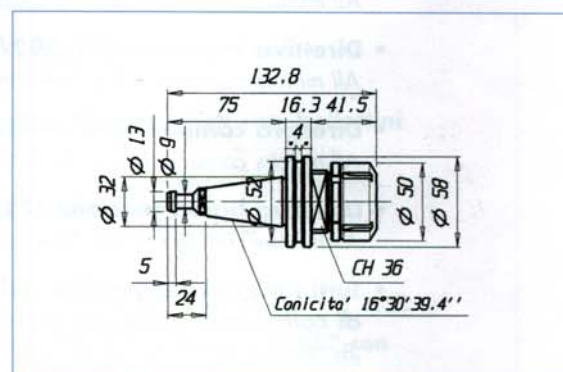
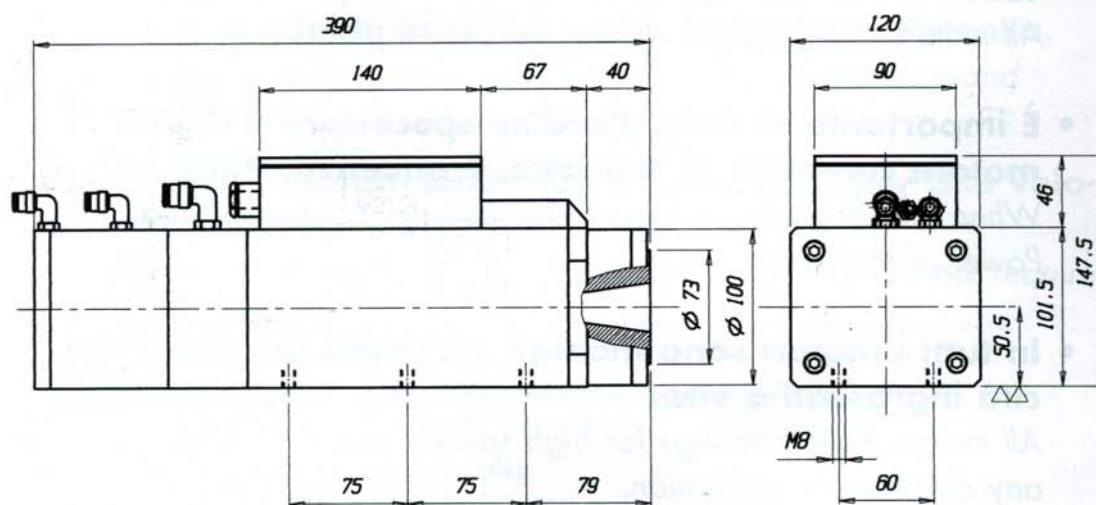


Serie Elettromandrini TMA cambio utensile automatico *automatic tool change*

TIPO TYPE	TENSIONE VOLTAGE (VOLT)	FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)	COS ϕ	PESO WEIGHT (Kg)
TMA 4 10/2	350	200/300	12000/18000	3.6	8.6	0.82	16
TMA 4 10/2	350	200/400	12000/24000	3.6	8.6	0.82	16

- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

Elettromandrini TMA4



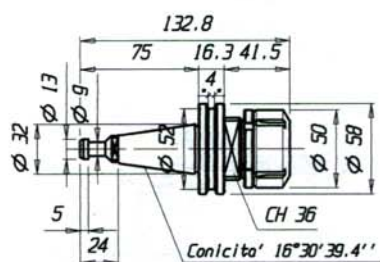
Con ISO 30 con attacco per pinza ERG 32

NB: La versione a 24000 giri richiede l'utilizzo di cuscinetti ceramici.
Important: ceramic ball-bearings required for 24000 rpm.



- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

• Elettromandrini TMA5



NB: La versione a 24000 giri richiede l'utilizzo di cuscinetti ceramici.
Important: ceramic ball-bearings required for 24000 rpm.



- Per Tensioni 230/400 VOLT l'assorbimento amperometrico va moltiplicato per 0.95.
- For Voltages 230/400 the amps ABS. has to be multiplied for 0.95.

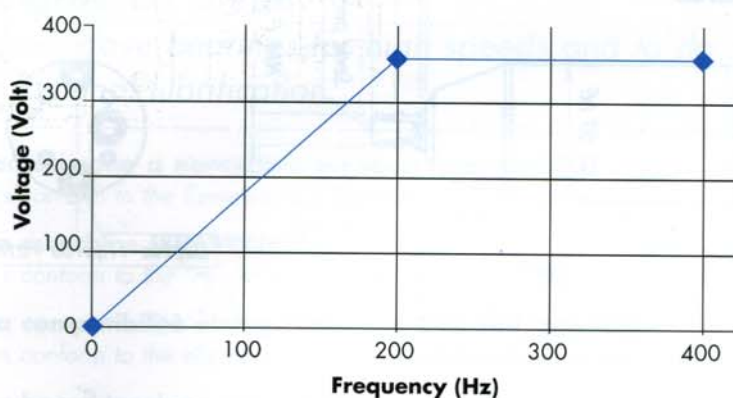
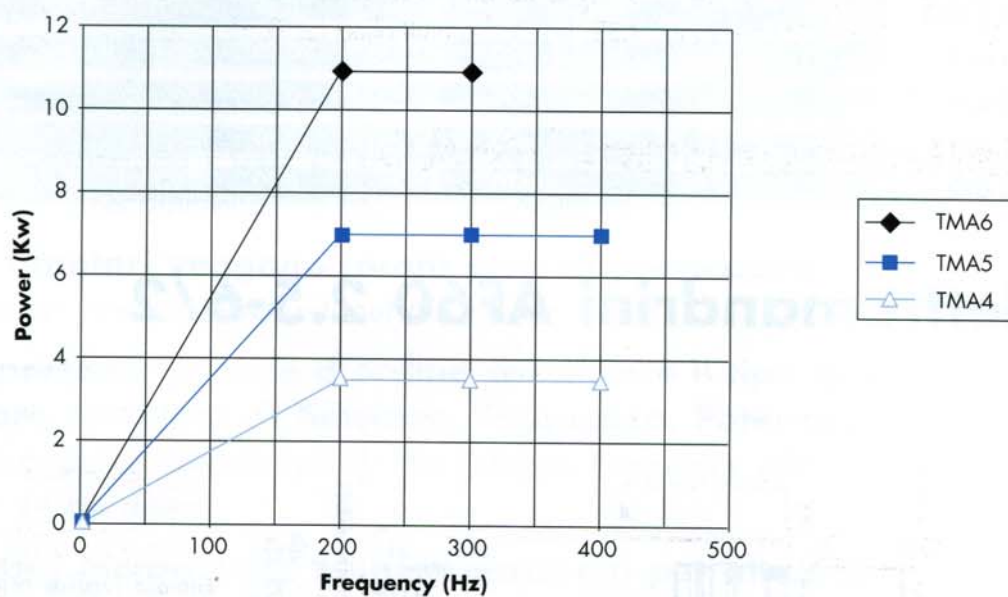
Con ISO 40 con attacco per pinza ERG 40



Serie Elettromandrini TMA cambio utensile automatico

Curve di potenza a frequenza variabili da Inverter.

Power curves at variable frequencies from Inverter.



Si raccomanda l'uso di utensili bilanciati

We strictly recommend the use of balanced tools.



TMA 4
3.6 Kw



TMA 5
7 Kw

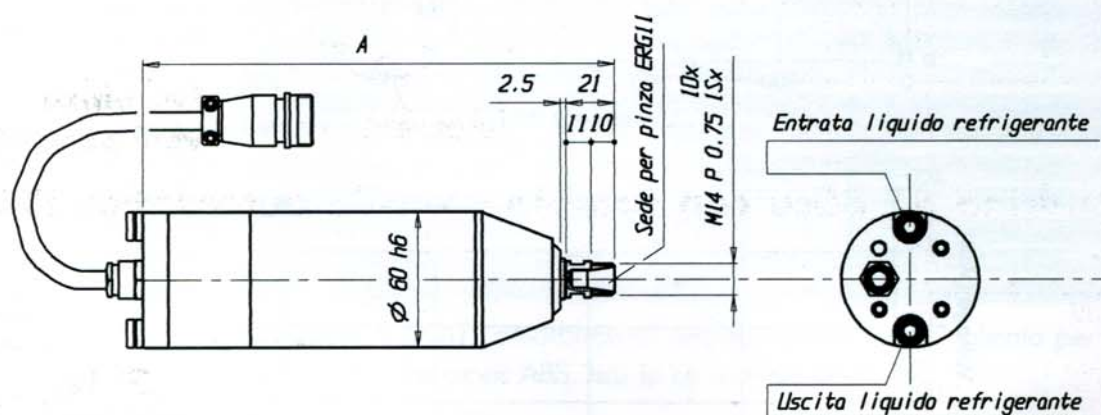


TMA 6
11 Kw

Serie AF

TIPO TYPE	TENSIONE VOLTAGE (VOLT)	FREQU. AL GINOCCHIO (HZ)	FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)	COS ϕ	PESO WEIGHT (Kg)
AF60 2.5/2	220	300	400	24000	0.25	1.8	0.70	2
AF60 2.5/2	380	300	400	24000	0.25	1.0	0.70	2
AF60 2.5/2	220	400	670	40000	0.28	2.0	0.70	2
AF60 2.5/2	380	400	670	40000	0.28	1.1	0.70	2
AF60 6/2	220	300	400	24000	0.50	2.6	0.75	2.5
AF60 6/2	380	300	400	24000	0.50	1.5	0.75	2.5
AF60 6/2	220	400	670	40000	0.70	3.0	0.75	2.5
AF60 6/2	380	400	670	40000	0.70	1.7	0.75	2.5

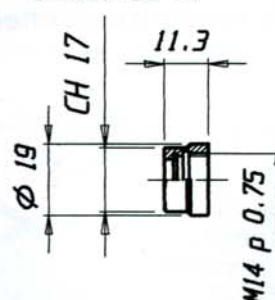
Elettromandrini AF60 2.5-6/2



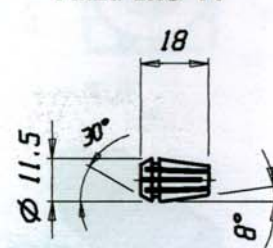
TIPO A

AF60 2.5/2	167.5
AF60 6/2	202.5

Ghiera GE 11



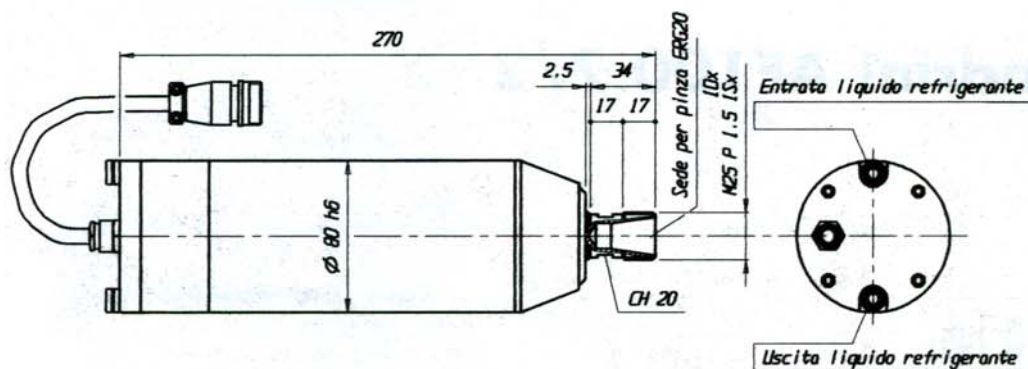
Pinza ERG 11



NB: Pinza e Ghiera vengono forniti a richiesta.
Be careful: collet and ring nut only by your request.

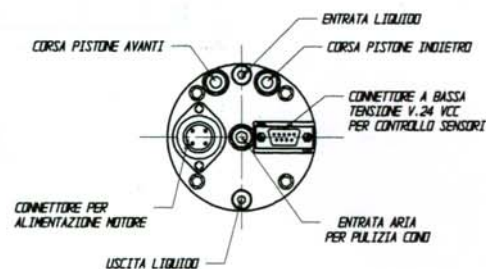
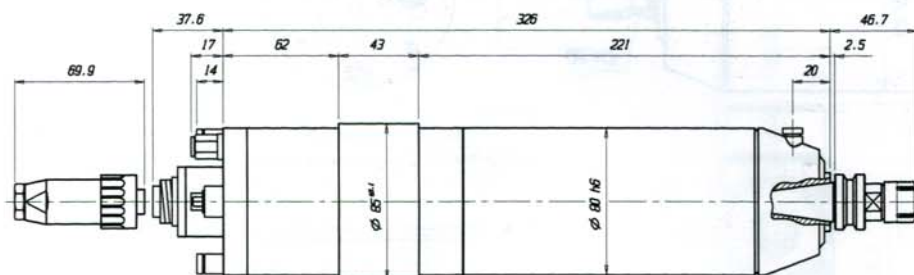


TIPO TYPE	TENSIONE VOLTAGE (VOLT)	FREQU. AL GINOCCHIO (HZ)	FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)	COS φ	PESO WEIGHT (Kg)
AF80 9/2	220	300	400	24000	1.1	5.2	0.75	6.5
AF80 9/2 CU	220	300	400	24000	1.1	5.2	0.75	6.5
AF80 9/2	380	300	400	24000	1.1	3.0	0.75	6.5
AF80 9/2 CU	380	300	400	24000	1.1	3.0	0.75	6.5
AF80 9/2	220	300	670	40000	1.4	5.8	0.75	6.5
AF80 9/2 CU	220	300	670	40000	1.4	5.8	0.75	6.5
AF80 9/2	380	400	670	40000	1.4	3.3	0.75	6.5
AF80 9/2 CU	380	400	670	40000	1.4	3.3	0.75	6.5

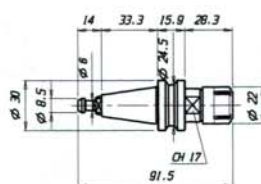


**Per pinza
vedi pag. 60**

Elettromandrino AF 80cu con cambio utensile automatico ISO 20



AF80



Con ISO 20 con attacco per pinza ERG 20

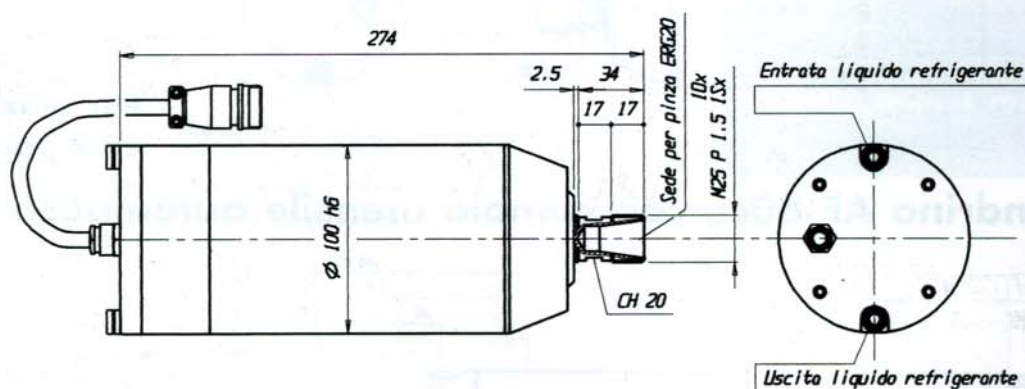


AF80 cu

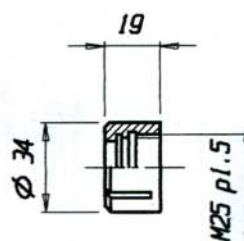
Serie AF

TIPO TYPE	TENSIONE VOLTAGE (VOLT)	FREQU. AL GINOCCHIO (HZ)	FREQU. (HZ)	GIRI (rpm)	POT. RESA OUT. POW. (KW)	ASSORB. ABSORB. (amp)	COS ϕ	PESO WEIGHT (Kg)
AF100 7/2	220	300	400	24000	1.8	7.8	0.80	8
AF100 7/2	380	300	400	24000	1.8	4.5	0.80	8
AF100 7/2	220	400	670	40000	2.3	8.5	0.80	8
AF100 7/2	380	400	670	40000	2.3	4.9	0.80	8

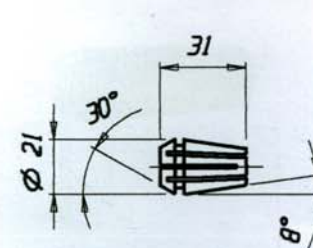
Elettromandrini AF100 7/2



Ghiera GE 20



Pinza ERG 20



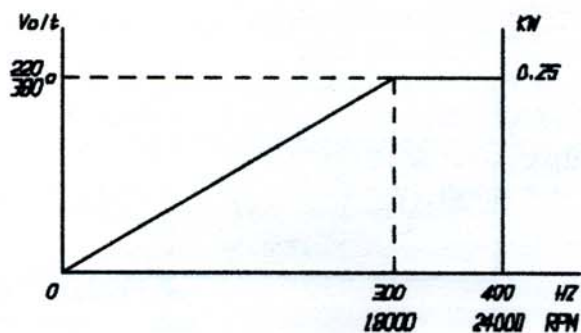
NB: Pinza e Ghiera vengono forniti a richiesta.
Be careful: collet and ring nut only by your request.



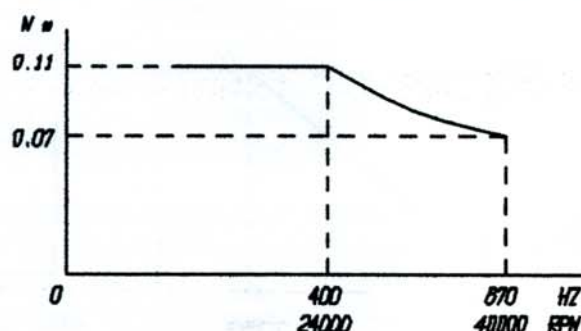
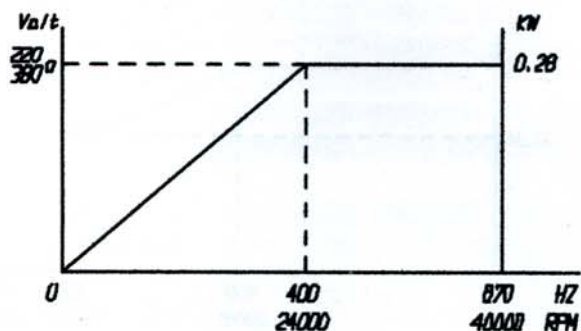
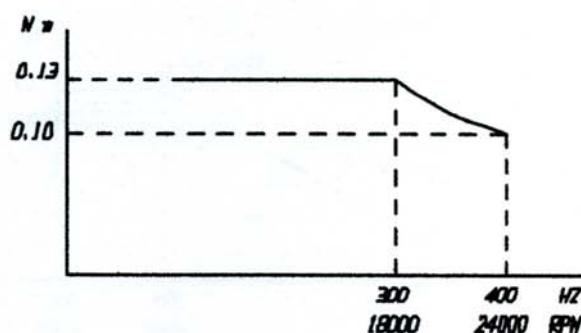
Serie AF

AF 60 2.5/2

CURVE DI POTENZA
Power Curves

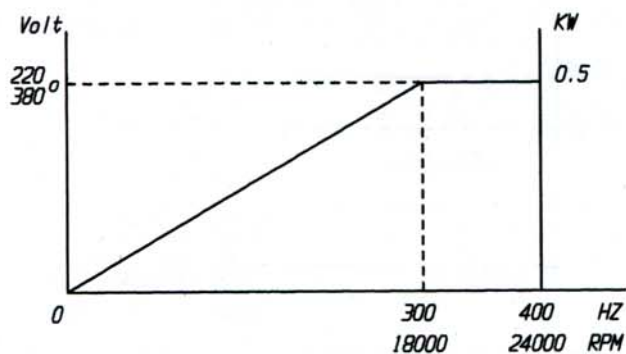


CURVE DELLA COPPIA
Torque Curves

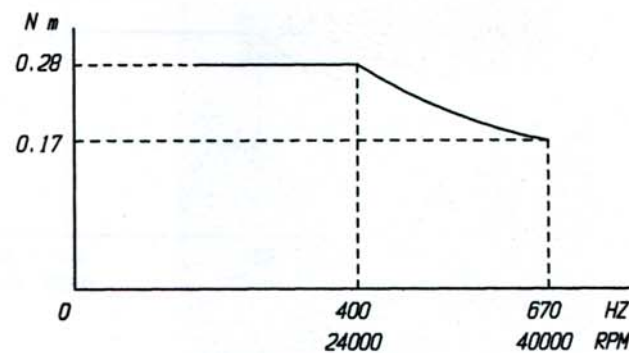
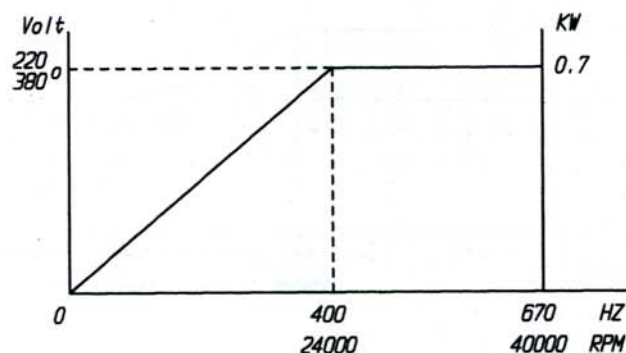
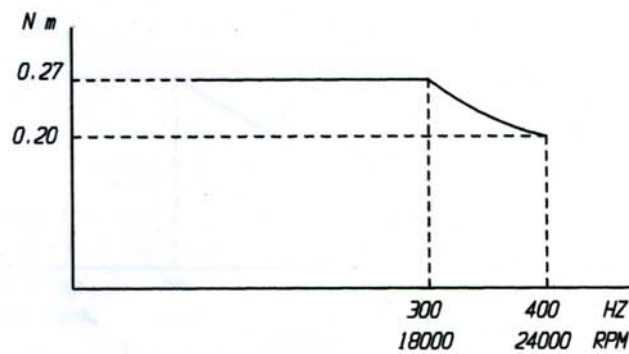


AF 60 6/2

CURVE DI POTENZA
Power Curves



CURVE DELLA COPPIA
Torque Curves

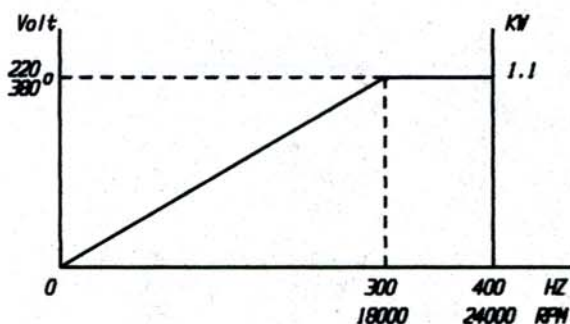




Serie AF

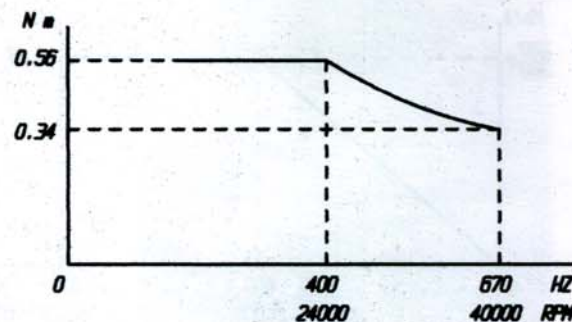
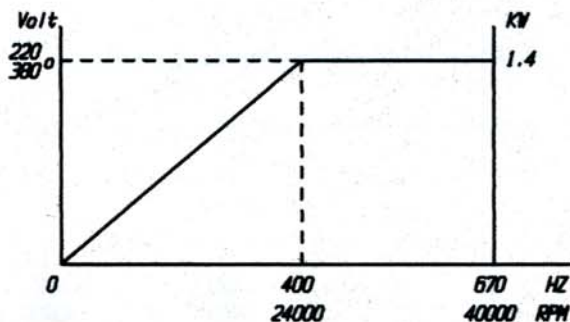
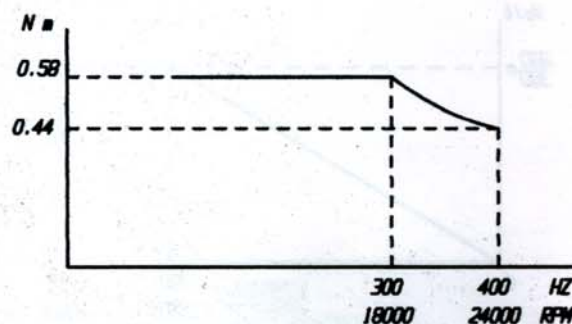
AF 80 9/2

CURVE DI POTENZA
Power Curves



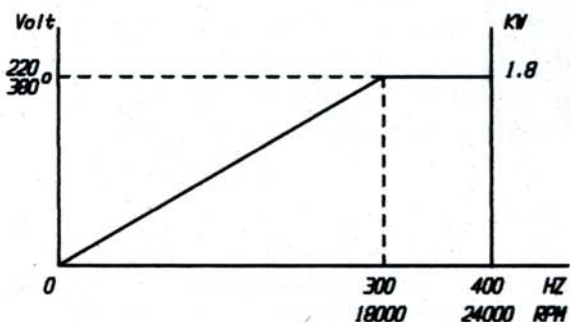
AF 80 9/2 CU

CURVE DELLA COPPIA
Torque Curves

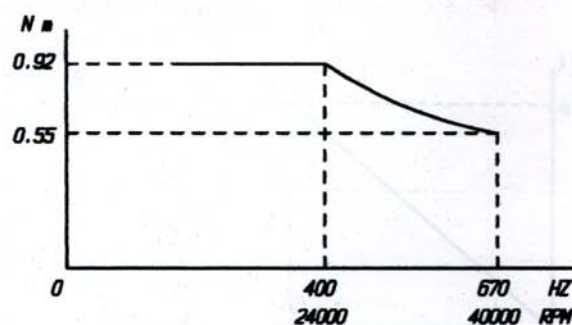
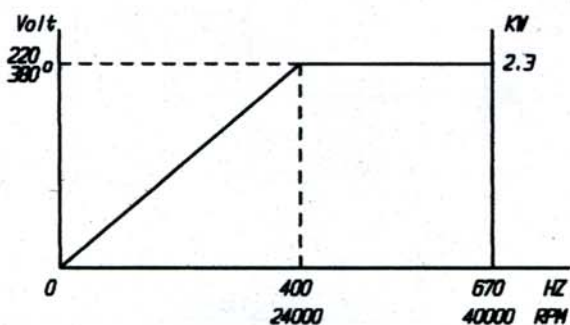
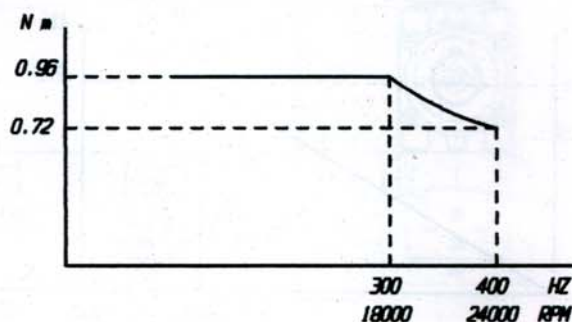


AF 100 7/2

CURVE DI POTENZA
Power Curves



CURVE DELLA COPPIA
Torque Curves

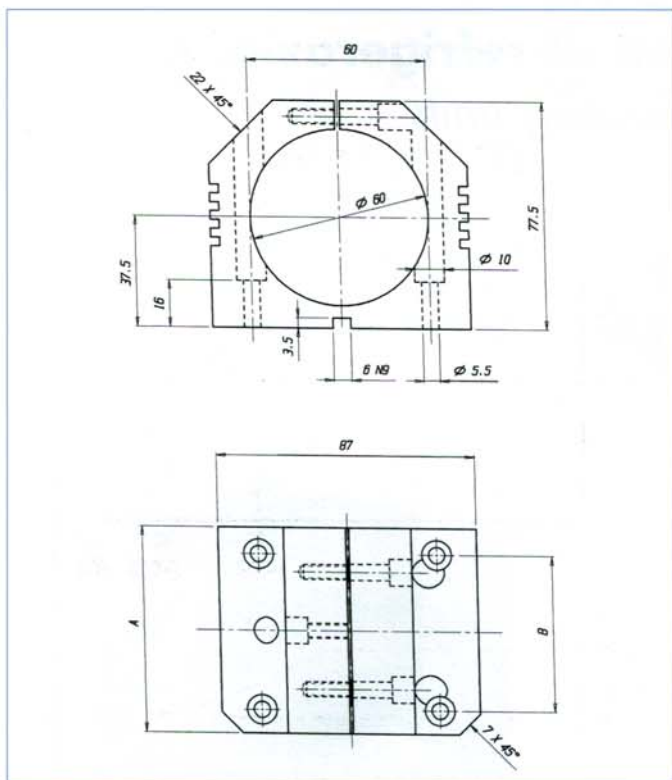




Serie AF

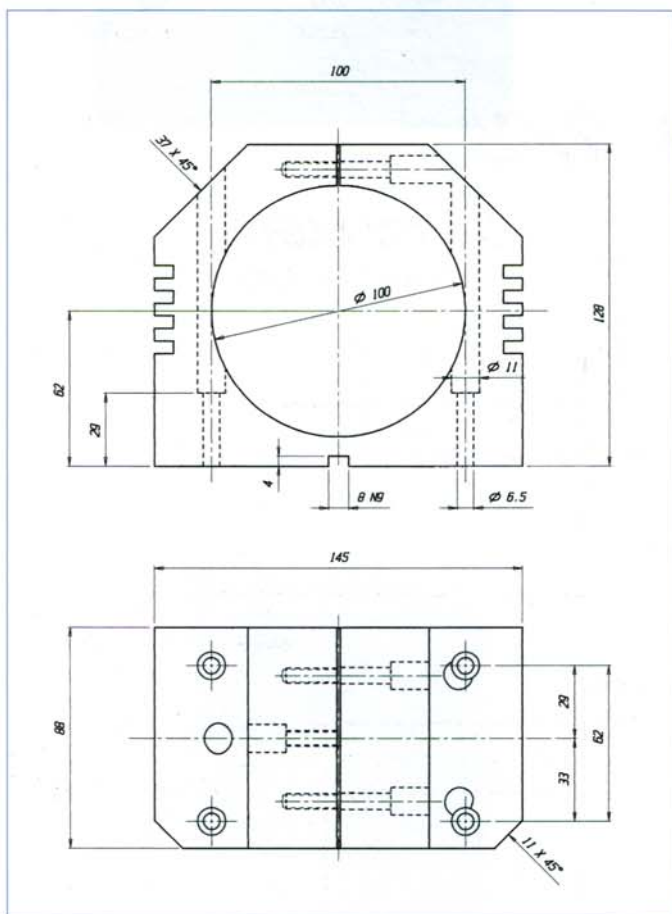
Dimensioni dei supporti per mandrini

Dimensions of the spindle holders

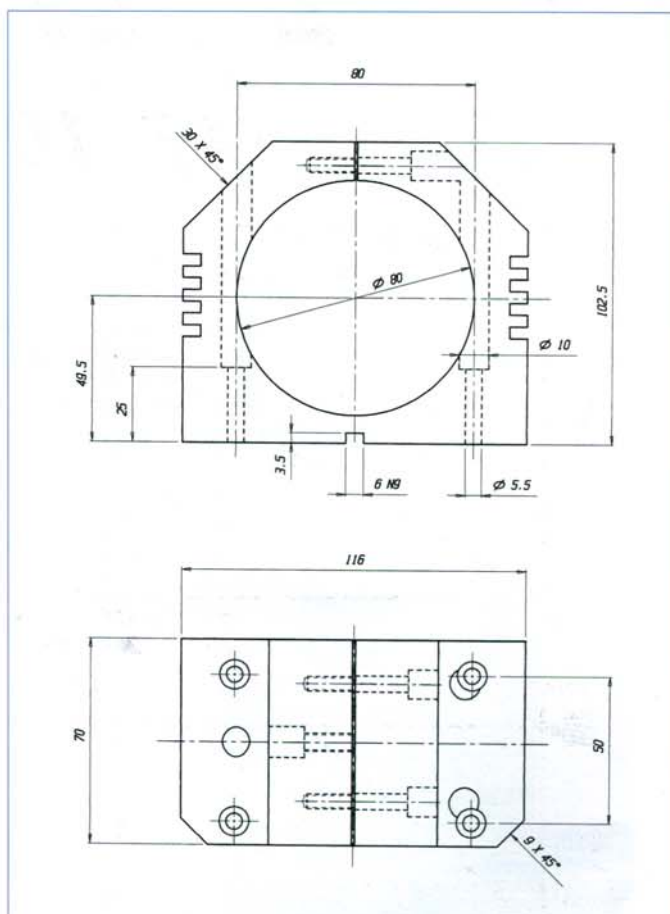


AF60

TIPO	A	B
AF60 2.5/2	50	33
AF60 6/2	70	53



AF80



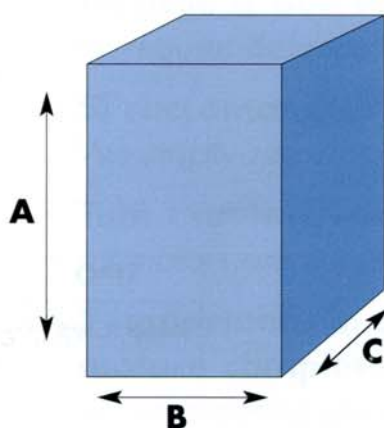
AF100



Serie AF

Vasche di refrigerazione

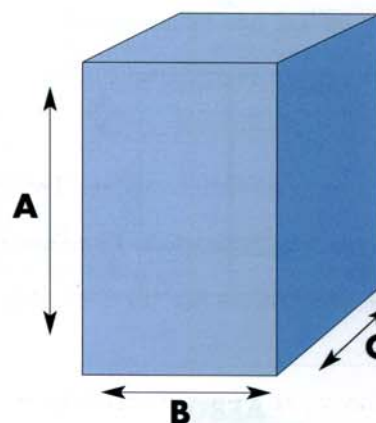
Refrigerating units

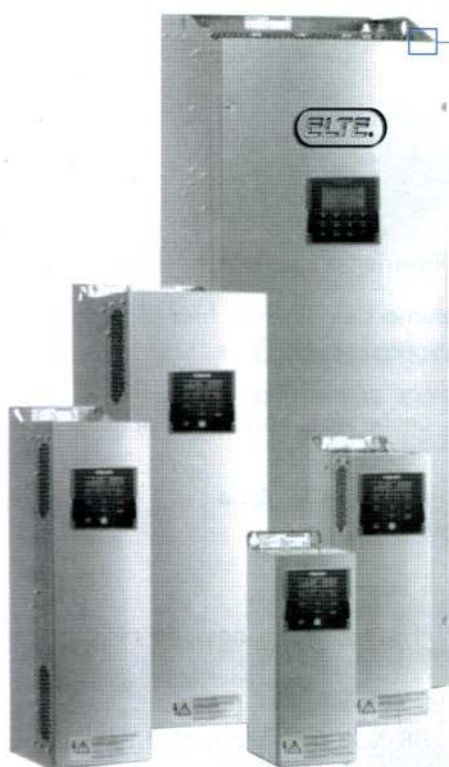


TIPO	A	B	C
AF60 AF80	40	48	23



TIPO	A	B	C
AF100 AF80 CU	65	40	40





• **Serie** **Convertitori statici da** **0.55 Kw a 60Kw** **Inverter**

TESTATO E MARCATO **ELTE** CHE GARANTISCE IL FUNZIONAMENTO ALLE MASSIME PRESTAZIONI CON I PROPRI MANDRINI

Tecnologia affidabile, compatto, robusto facile da usare.

Caratteristiche:

Inverter vettoriale con calcolo del vettore in automatico ogni millisecondo verso il motore, calcolando anche i relativi cavi di connessione, utilizzando i valori istantanei misurati:

Il processore Vacon si basa sul controllo vettoriale Sensorless con modello matematico di simulazione e sul circuito ASIC. Il controllo vettoriale avviene sfruttando il sistema di coordinate del flusso magnetico di statore. Il calcolo rimane così insensibile alle variazioni delle grandezze elettriche del motore.

- L'errore sulla velocità in situazione stazionaria è inferiore a 0.5 %.
- Il tempo di risposta della coppia è inferiore a 10 ms.
- Non c'è oscillazione di coppia.
- Non è sensibile a vibrazioni di risonanza.
- Coppia di spunto elevata: 200 %.
- Corrente di spunto elevata: 2.5 x ict.
- Adatto anche a sistemi multi- motore.
- Massima frequenza d'uscita 7.200 Hz.
- Filtro doppia gabbia per compatibilità "EMC" EN50081-2 (interno).
- Reattanza di linea trifase a pacco lamellare a.c (interna). Diminuisce le armoniche verso rete del 30%, protegge l'Inverter da extracorrenti e impurità di linea, diminuisce la corrente d'ingresso, etc.
- Filtro lato motore (interno).
- Chopper di frenatura (interno) dimensionato per frenare fino al 150 % in frequenza massima d'uscita fino a 7.200 Hz.

- Frequenza di commutazione verso il motore da 1 a 16 KHz tarabile linearmente da tastiera, rende silenzioso il motore fornendo un'onda sinusoidale senza creare problemi di disturbi.
- Disponibili due relè configurabili con contatti da 3° 220 / 240 Vca.
- Tastiera alfanumerica estraibile multi-lingua (Tedesco- Italiana – Francese – Inglese- Spagnolo, etc).
- Seriale RS 232 per programmazione/diagnostica da tastiera PC.
- Possibilità di tarare il motore con tensione e frequenze d'uscita a scelta (es. Inverter alimentato a 380Vca può alimentare uno o più mandrini a 220Vca 800 Hz, etc) reimpostandole all'interno dell' Inverter fino al massimo di 8 tipi diversi.
- Possibilità di mantenere costante nel tempo il valore di tensione in uscita, anche con variazioni di tensioni d'ingresso (alimentazione rete).
- Applicazione multi- tabella per gestire fino a 8 motori diversi con un unico Inverter.
- Software per gestione con controllo P.I. interno.
- L'Inverter permette di usare cavi motore con lunghezza massima fino a 200 mt senza usare nessuna reattanza esterna per l'abbassamento del fattore capacitivo dei cavi.
- Possibilità di avere l'Inverter sia in versione IP-20 che IP-54 con tensioni trifasi da 208 % - 15 % fino a 690 Vca +15.
- Tutti gli Inverter Vacom sono marchiati CE UL e c- UL standard produttivo ISO- 9001 (soddisfa in termini di sicurezza EN50178, EN60204-1, FI, GOST R).

Inverter VACON serie CXS

TIPO TYPE	COPPIA COSTANTE		COPPIA VARIABILE		PESO (Kg)	Induttanza di linea trifase filtro e toroide per EMS unità di frenata interna
	Potenza (Kw)	Corrente motore (A)	Potenza (Kw)	Corrente motore (A)		
0.75CXS2	0.75	4.7	1.1	5.6	4.5	INCLUSO
1.1CXS2	1.1	5.6	1.5	7	4.5	INCLUSO
1.5CXS2	1.5	7	2.2	10	4.5	INCLUSO
2.2CXS2	2.2	10	3	13	7	INCLUSO
3CXS2	3	13	4	16	7	INCLUSO
4CXS2	4	16	5.5	22	7	INCLUSO
5.5CXS2	5.5	22	7.5	30	7	INCLUSO

- ALIMENTAZIONE 208-230 VOLT Hz 50/60 3~.
- USCITA INVERTER 220 VOLT Hz 1900.

TIPO TYPE	COPPIA COSTANTE		COPPIA VARIABILE		PESO (Kg)	Induttanza di linea trifase filtro e toroide per EMS unità di frenata interna
	Potenza (Kw)	Corrente motore (A)	Potenza (Kw)	Corrente motore (A)		
0.75CXS4	0.75	2.5	1.1	3.5	4.5	INCLUSO
1.1CXS4	1.1	3.5	1.5	4.5	4.5	INCLUSO
1.5CXS4	1.5	4.5	2.2	6.5	4.5	INCLUSO
2.2CXS4	2.2	6.5	3	8	4.5	INCLUSO
3CXS4	3	8	4	10	4.5	INCLUSO
4CXS4	4	10	5.5	13	7	INCLUSO
5.5CXS4	5.5	13	7.5	18	7	INCLUSO
7.5CXS4	7.5	18	11	24	7	INCLUSO
11CXS4	11	24	15	32	7	INCLUSO
15CXS4	15	32	18.5	42	21	INCLUSO
18.5CXS4	18.5	42	22	48	21	INCLUSO
22CXS4	22	48	30	60	21	INCLUSO

- ALIMENTAZIONE 380-440 VOLT Hz 50/60 3~.
- USCITA INVERTER 380-440 VOLT Hz 1900.

La **ELTE** s.r.l. utilizza, oltre la serie sopra indicata, Inverters sperimentati sui propri mandrini e risultanti di ottima qualità della **EUROTHERM DRIVES** e **BERGES** i quali possono essere normalmente forniti su richiesta.

Installazione degli INVERTERS

Raffreddamento

Per assicurare una efficace circolazione dell'aria lo spazio libero attorno all'inverter deve avere determinate dimensioni (vedi Tab.1). Qualora si volessero montare unità multiple una sopra l'altra la distanza deve essere uguale a $b+c$.

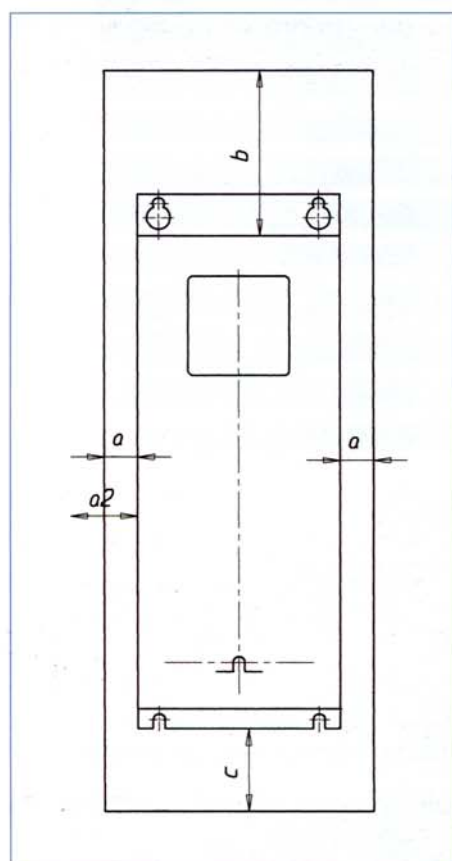
Spazio di Installazione

TIPO INVERTERS	DIMENSIONI (mm)			
	a	a ₁	b	c
0.55 - 1.5 CXS2 0.75 - 3 CXS4	20	10	100	50
2.2 - 1.5 CXS2 4 - 22 CXS4	20	10	120	60

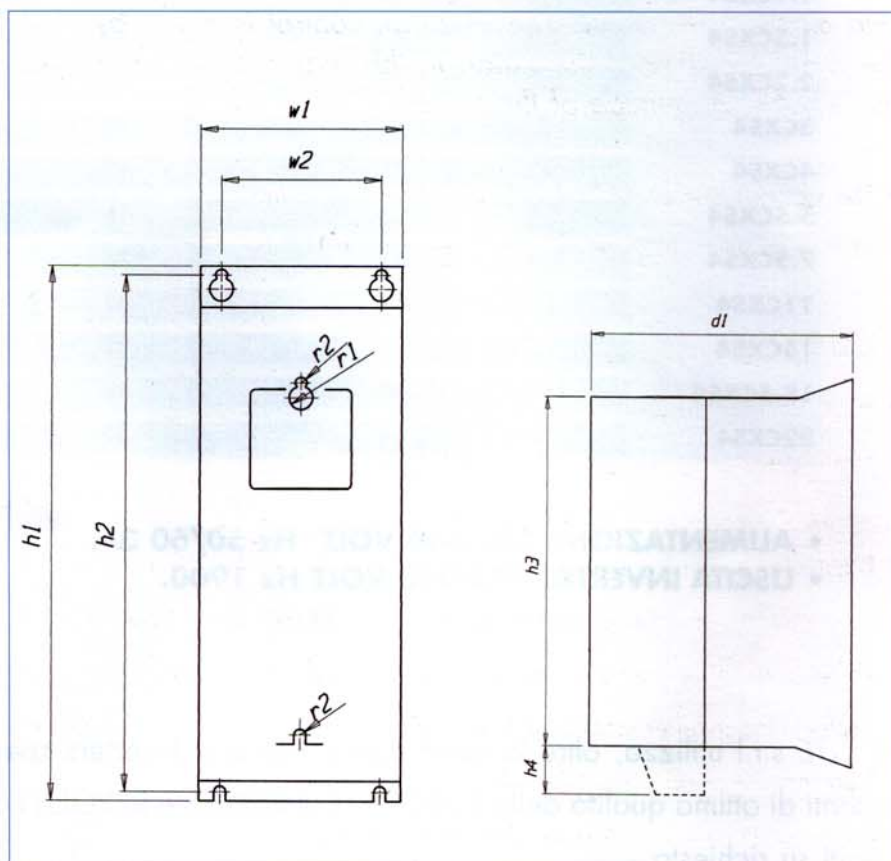
Dimensioni di Montaggio

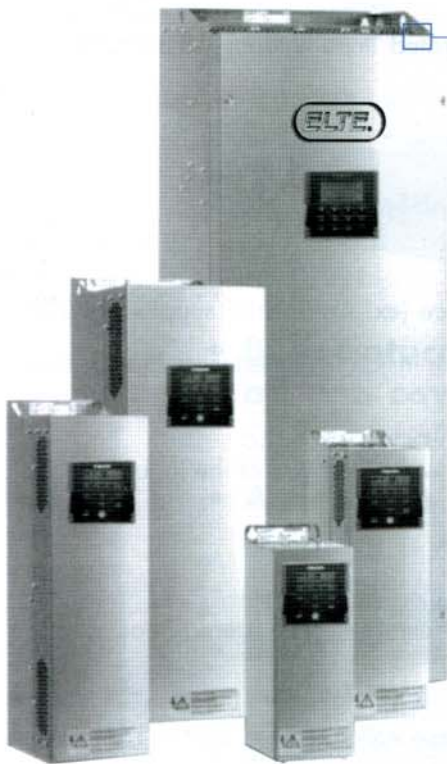
TIPO INVERTERS	DIMENSIONI (mm)								
	w ₁	w ₂	h ₁	h ₂	h ₃	h ₄	d ₁	r ₁	r ₂
0.75 - 3 CXS4 0.55 - 1.5 CXS2	120	95	343	333	305	-	150	7	3.5
4 - 11 CXS4 2.2 - 5.5 CXS2	135	95	430	420	390	-	205	7	3.5
15 - 22 CXS4 7.5 - 15 CXS2	185	140	595	580	550	-	215	9	4.5

Tab. 1



Tab. 2





• Static frequency converters (Inverters) 0.55 Kw until 60Kw

TESTED AND MARKED **ELTE** WHICH ENSURES THE OPERATION AT THE MAXIMUM PERFORMANCES WITH ITS OWN ELECTRIC SPINDLES

RELIABLE TECHNOLOGY, COMPACT, STRONG, EASY TO USE

Characteristics:

Vectorial inverter with calculation of the Vector in automatic each millisecond to the motor, by calculating also the related connection cables, by using the instantaneous values measured: The Vacon processor is based on the vectorial control Sensorless with mathematic model of emulation and on the ASIC circuit. The vectorial control is made by exploiting the system of coordinates of the magnetic flow of the stator. In this way the calculation remains insensitive to the variation of the electric magnitude of the motor.

- The on speed error under fixed situation is lower than 0.5.
- The response time of the torque is lower than 10 ms.
- No torque oscillation.
- Not sensitive to resonance vibrations.
- High starting torque: 200 %.
- High breakaway starting current: $2.5 \times I_{ct}$.
- Suitable also for multi-motor systems.
- Maximum output frequency 7.200 hz.
- Double cage filter for compatibility to "EMC" EN50081-2 (Internal).
- Three phase line reactance by a.c lamellar packet (internal). It reduces the harmonics to the mains by 30%, protects the inverter against extra-currents and line impurities, it reduces the input current etc.
- Filter on the motor side (internal).
- Braking chopper (internal) sized to brake up to 150%.

- Maximum frequency up to 7.200 Hz.
- Commutation frequency to the motor from 1 to 16 KHz which can be calibrated linearly from the keyboard; it makes the motor silenced, providing a sinusoidal wave with no interferences.
- Two configurable relays with contacts from 3a 220/240 Vca are available.
- Multilanguage extractable alphanumeric keyboard (German-Italian-French-English-Spanish, etc.).
- Serial RS 232 for programming/diagnostics from keyboard to PC.
- Possibility to calibrate the motor with output voltages and frequencies by choice (ex. An inverter supplied at 380 Vac may supply one or more spindles at 220 Vac 800 Hz, etc.) presetting them inside the inverter up to maximum of 8 different types.
- Possibility to keep constant along the time the value of the output voltage, also with variations of the input voltages (mains power supply).
- Management software with an internal P.I control.
- The Inverter allows to use motor cables with maximum length up to 200 mt without using any external reactance to reduce the capacitive factor of the cables.
- Possibility to receive the inverter either in Version IP-20 or IP-54 with three-phase voltages from 208 – 15% up to 690 Vca +15.
- All Vacon inverters are marked CE UL and c-UL., manufacturing standard ISO-9001 (it meets the safety terms EN50178, EN60204-1, FI, GOST R).

Inverter VACON serie CXS

TYPE	TORQUE COSTANT		TORQUE VARIABLE		WEIGHT (Kg)	Three-Phase inductance filter and toroid for EMS internal braking
	Power (Kw)	Current motor (A)	Power (Kw)	Current motor (A)		
0.75CXS2	0.75	4.7	1.1	5.6	4.5	INCLUDED
1.1CXS2	1.1	5.6	1.5	7	4.5	INCLUDED
1.5CXS2	1.5	7	2.2	10	4.5	INCLUDED
2.2CXS2	2.2	10	3	13	7	INCLUDED
3CXS2	3	13	4	16	7	INCLUDED
4CXS2	4	16	5.5	22	7	INCLUDED
5.5CXS2	5.5	22	7.5	30	7	INCLUDED

- INPUT 208-230 VOLT Hz 50/60 3~.
- OUTPUT INVERTER 220 VOLT Hz 1900.

TYPE	TORQUE COSTANT		TORQUE VARIABLE		WEIGHT (Kg)	Three-Phase inductance filter and toroid for EMS internal braking
	Power (Kw)	Current motor (A)	Power (Kw)	Current motor (A)		
0.75CXS4	0.75	2.5	1.1	3.5	4.5	INCLUDED
1.1CXS4	1.1	3.5	1.5	4.5	4.5	INCLUDED
1.5CXS4	1.5	4.5	2.2	6.5	4.5	INCLUDED
2.2CXS4	2.2	6.5	3	8	4.5	INCLUDED
3CXS4	3	8	4	10	4.5	INCLUDED
4CXS4	4	10	5.5	13	7	INCLUDED
5.5CXS4	5.5	13	7.5	18	7	INCLUDED
7.5CXS4	7.5	18	11	24	7	INCLUDED
11CXS4	11	24	15	32	7	INCLUDED
15CXS4	15	32	18.5	42	21	INCLUDED
18.5CXS4	18.5	42	22	48	21	INCLUDED
22CXS4	22	48	30	60	21	INCLUDED

- INPUT 380-440 VOLT Hz 50/60 3~.
- OUTPUT INVERTER 380-440 VOLT Hz 1900.

In addition to above mentioned Inverters, **ELITE** srl can also offer high-quality Inverters **EUROTHERM DRIVES** and **BERGES** which have been tested with our electric spindles.

Installation of the INVERTERS

For assuring proper cooling air circulation the space around the Inverter should have determinate dimensions. See under mentioned table for dimensions. If multiple units are to be installed above each other, the dimensions must be B + C and air from outlet lower unit must be directed away from inlet of the upper unit.

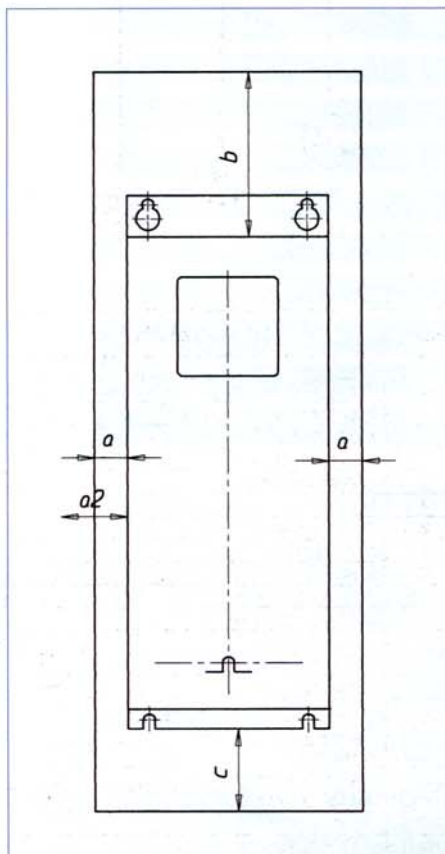
Installation space dimensions

TYPE Frequency Converter	DIMENSIONS (mm)			
	a	a ₂	b	c
0.55 - 1.5 CXS2 0.75 - 3 CXS4	20	10	100	50
2.2 - 1.5 CXS2 4 - 22 CXS4	20	10	120	60

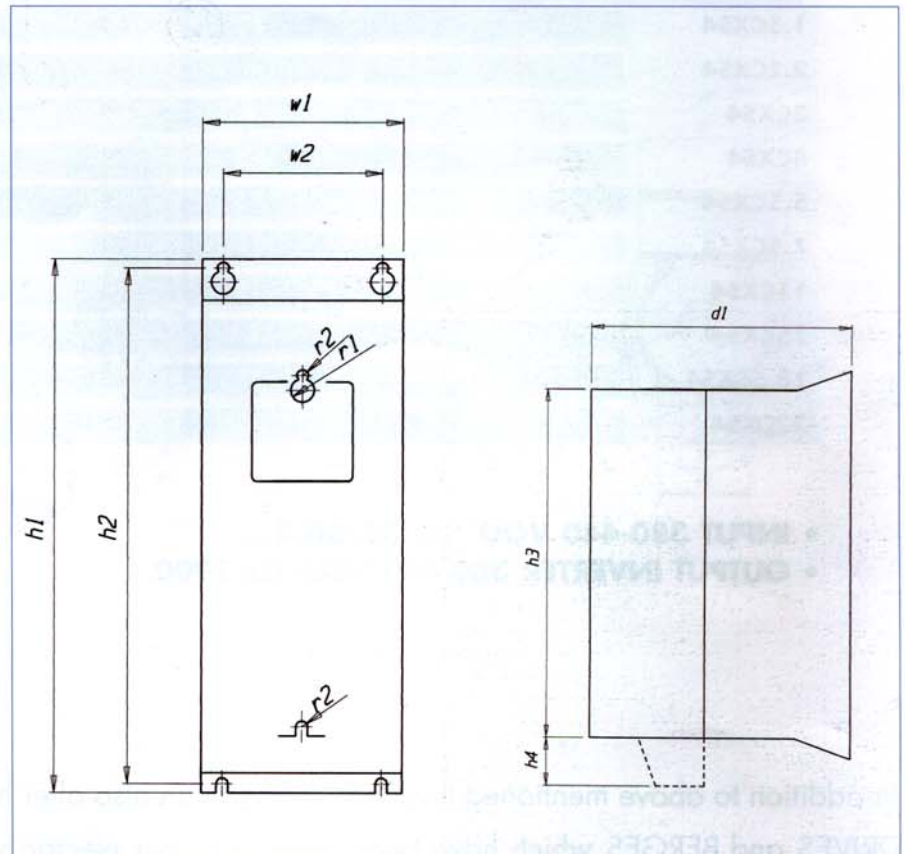
Mounting dimensions

TYPE Frequency Converter	DIMENSIONS (mm)								
	w ₁	w ₂	h ₁	h ₂	h ₃	h ₄	d ₁	r ₁	r ₂
0.75 - 3 CXS4 0.55 - 1.5 CXS2	120	95	343	333	305	-	150	7	3.5
4 - 11 CXS4 2.2 - 5.5 CXS2	135	95	430	420	390	-	205	7	3.5
15 - 22 CXS4 7.5 - 15 CXS2	185	140	595	580	550	-	215	9	4.5

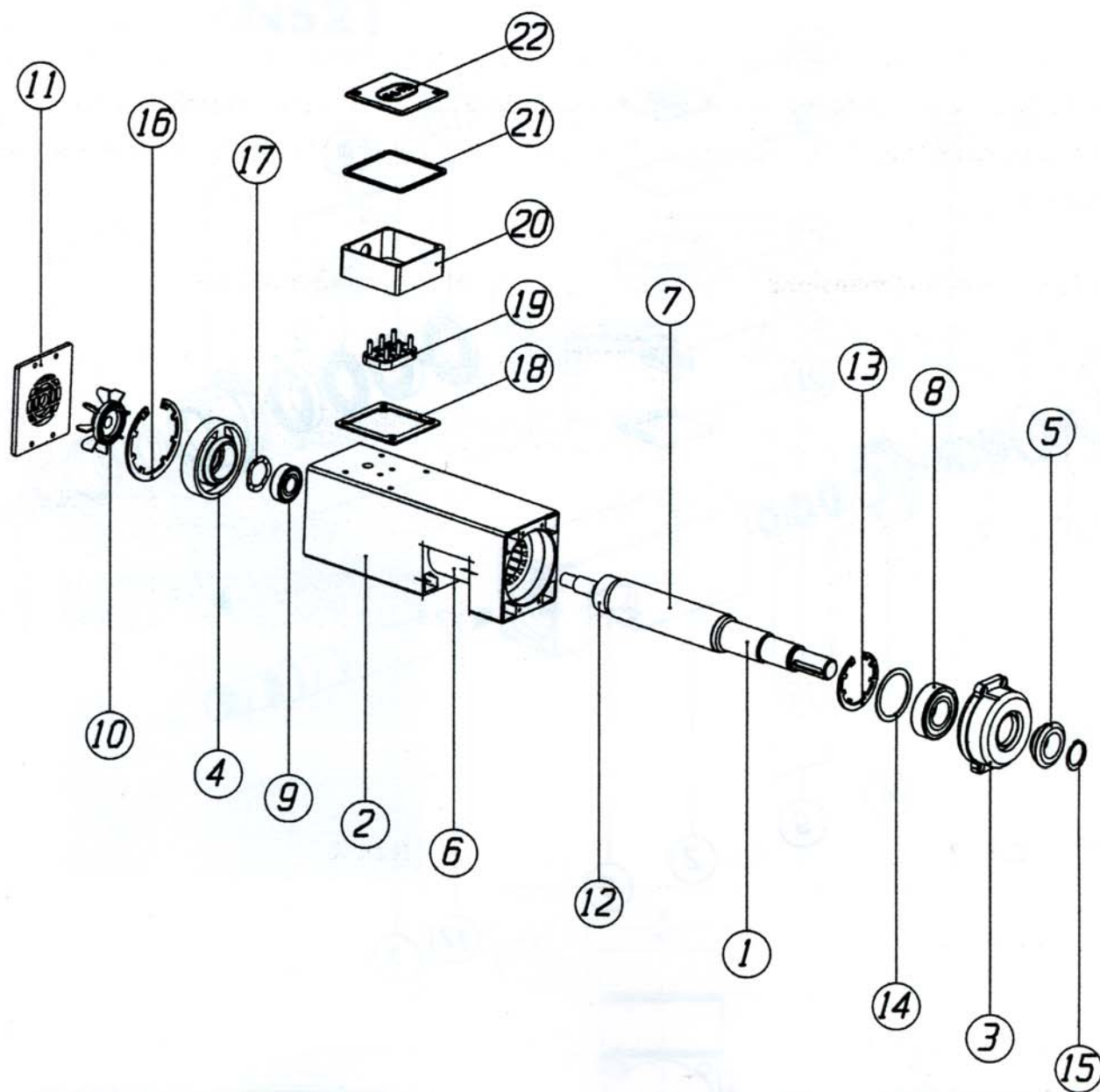
Tab. 1



Tab. 2



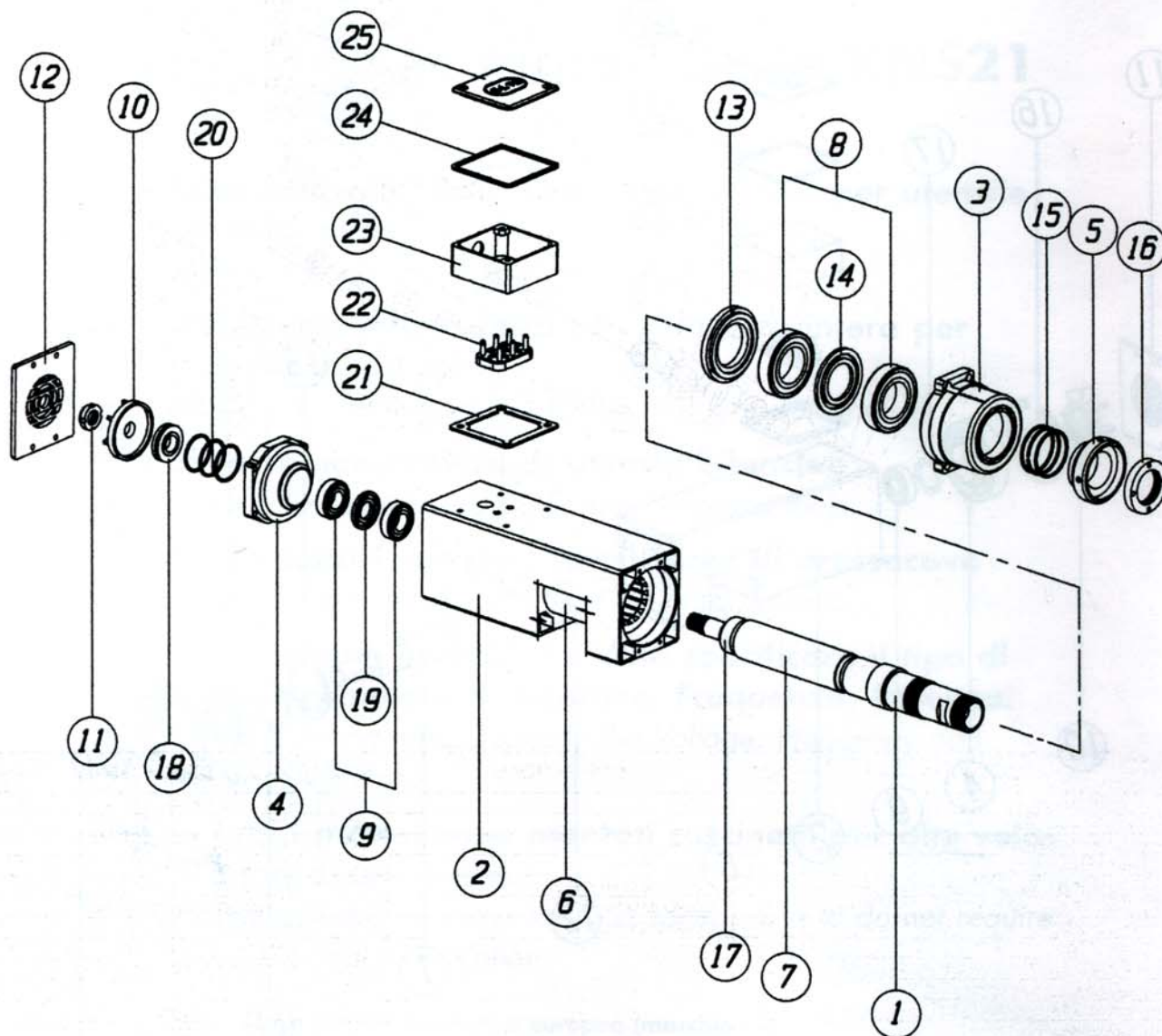
RICAMBI - SPARE PARTS PE



POS.	DESCRIZIONE
1	ALBERO
2	CARCASSA
3	COPERCHIO ANTERIORE
4	COPERCHIO POSTERIORE
5	LABIRINTO
6	STATORE AVVOLTO
7	ROTORE
8	CUSCINETTO ANTERIORE
9	CUSCINETTO POSTERIORE
10	VENTOLA
11	PIASTRINA COPRIVENTOLA
12	BUSSOLA DI BILANCIATURA
13	SEGER PER INTERNI
14	DISTANZIALE
15	SEGER
16	SEGER PER INTERNI
17	MOLLA DI COMPENSAZIONE
18	GUARNIZIONE BASE
19	MORSETTIERA
20	COPRIMORSETTIERA
21	GUARNIZIONE COPERCHIO
22	GUARNIZIONE COPRIMORSETTIERA

POS.	DESCRIZIONE
1	SHAFT
2	FRAME
3	FRONT COVER
4	REAR COVER
5	LABIRYNTH SEAL
6	WOUND STATOR
7	ROTOR
8	FRONT BEARING
9	REAR BEARING
10	FAN
11	FAN COVER PLATE
12	BALANCING BUSH
13	"O" RING
14	DISTANCE RING
15	"O" RING
16	"O" RING
17	COMPENSATION SPRING
18	GASKET
19	TERMINAL BOARD
20	TERMINAL COVER
21	COVER GASKET
22	TERMINAL BOARD GASKET

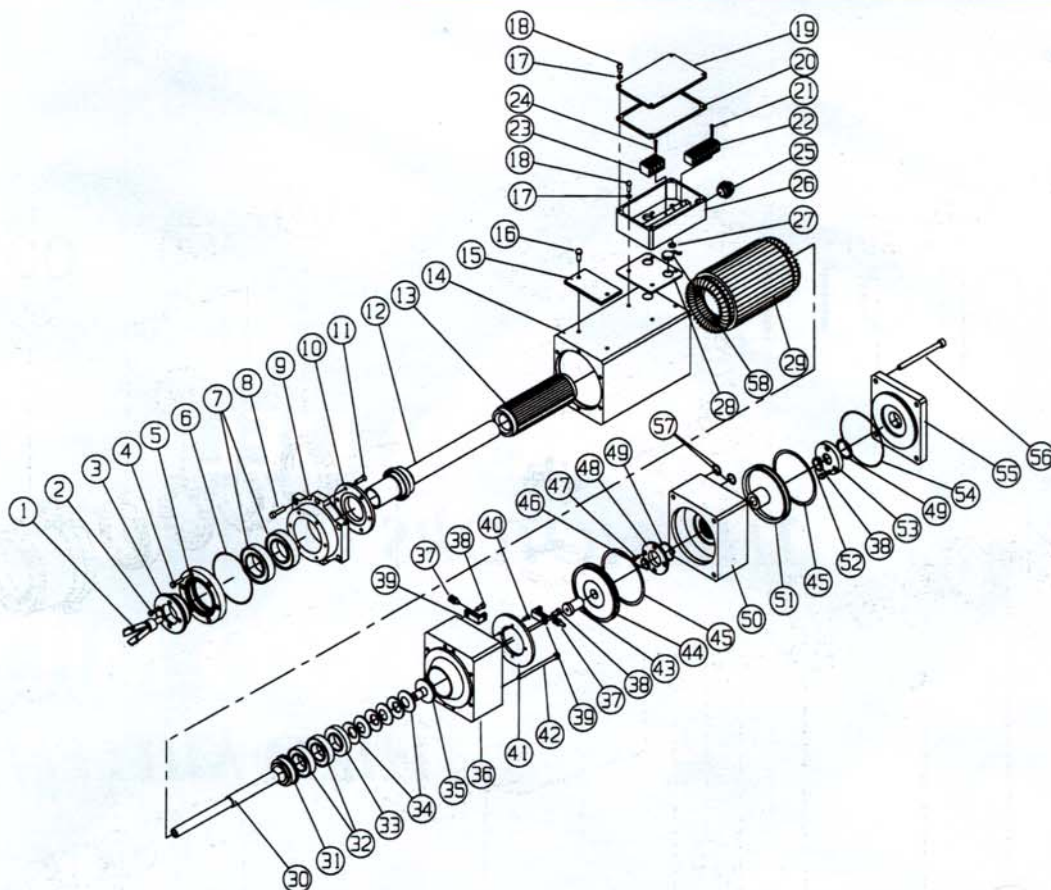
RICAMBI - SPARE PARTS TM PE



POS.	DESCRIZIONE
1	ALBERO
2	CARCASSA
3	COPERCHIO ANTERIORE
4	COPERCHIO POSTERIORE
5	LABIRINTO
6	STATORE AVVOLTO
7	ROTORE
8	COPPIA CUSCINETTO ANTERIORE
9	COPPIA CUSCINETTO POSTERIORE
10	VENTOLA
11	GHIERA AUTOBLOCCANTE
12	PIASTRINA COPRIVENTOLA
13	GHIERA BLOCCA COPPIA
14	DISTANZIALE
15	SEGMENTI LAMELLARI
16	CONTROGHIERA ANTERIORE
17	BUSSOLA DI BILANCIATURA
18	GHIERA BLOCCA COPPIA
19	DISTANZIALE
20	SEGMENTI LAMELLARI
21	GUARNIZIONE BASE
22	MORSETTIERA
23	COPRIMORSETTIERA
24	GUARNIZIONE COPERCHIO
25	GUARNIZIONE COPRIMORSETTIERA

POS.	DESCRIZIONE
1	SHAFT
2	FRAME
3	FRONT COVER
4	REAR COVER
5	LABIRYNTH SEAL
6	WOUND STATOR
7	ROTOR
8	FRONT PAIR OF BEARINGS
9	REAR PAIR OF BEARINGS
10	FAN
11	SELFLOCKING NUT
12	FANCOVER PLATE
13	BEARINGS - LOCKING NUT
14	DISTANCE RING
15	LOMELLAR SEGMENTS
16	FRONT NUT
17	BALANCING BUSH
18	BEARINGS - LOCKING NUT
19	DISTANCE RING
20	LAMELLAR SEGMENTS
21	GASKET
22	TERMINAL BOARD
23	TERMINAL COVER
24	COVER GASKET
25	TERMINAL BOARD COVER

RICAMBI - SPARE PARTS TMA



POS.	DESCRIZIONE	POS.	DESCRIZIONE	POS.	DESCRIZIONE
1	PINZA CAMBIO RAPIDO	21	VITE M3x16	41	FLANGIA CHIUSURA ARIA
2	VITE M4x14	22	MORSETTO MK3/8	42	VITE M6x80
3	GHIERA LABIRINTO	23	VITE M3x20	43	PERNO BLOCC. PISTONE
4	VITE M5x20	24	MORSETTO BK4	44	PISTONE INFERIORE
5	FLANGIA ANTERIORE	25	PRESSACAVO NYLON 3/4"	45	GUARNIZIONE OR 6375
6	GUARNIZIONE OR 2350	26	CORPO Basetta MOTORE	46	GUARNIZIONE OR 2068
7	CUSCINETTI	27	GUARNIZIONE OR 109	47	VITE M4x12
8	VITE M6x20	28	GUARNIZIONE SCATOLA MORSETTIERA	48	FLANGIA TEFLON DM.30
9	CORPO CALOTTA INFERIORE	29	STATORE	49	GUARNIZIONE OR 3118
10	FLANGIA POSTERIORE	30	ALBERINO BLOCC., SBLOCC.	50	CALOTTA DOPPIA CILINDRO SBLOC.
11	VITE M5x16	31	DISTANZIALE ROTORE	51	PISTONE SUPERIORE
12	ALBERO MOTORE FRESA	32	CUSCINETTO	52	GUARNIZIONE OR 3081
13	ROTORE	33	GHIERA BLOCCAGGIO CUSCINETTO	53	GUARNIZIONE IN TELFON
14	CARCASSA MOTORE	34	MOLLA A TAZZA	54	GUARNIZIONE OR 2400
15	TARGA IDENTIFICAZIONE MOTORE	35	PERNO MOLLE	55	CALOTTA CILINDRO SBLOCCAGGIO
16	RIVETTO	36	COPERCHIO POSTERIORE	56	VITE M10x100
17	RONDELLA DENTELLATA	37	INTER. DI PROSSIMITÀ MB5 26 PFAKL	57	GUARNIZIONE OR 2021
18	VITE M5x14	38	VITE M5x12	58	SONDA TERMICA
19	COPERCHIO MORSETTIERA	39	STAFFA INTERRUETTORE		
20	GUARNIZIONE COPERCHIO MORSETTIERA	40	VITE M4x10		

POS.	DESCRIZIONE	POS.	DESCRIZIONE	POS.	DESCRIZIONE
1	SPRING COLLET	21	SCREW M3x16	41	AIR FLANGE CHOKING
2	SCREW M4x14	22	TERMINAL MK3/8	42	SCREW M6x80
3	LOCK NUT	23	SCREW M3x20	43	PISTON CLAMPING NUT
4	SCREW M5x20	24	TERMINAL BK4	44	LOWER PISTON
5	FRONT FLANGE	25	GLAND	45	"O" RING 6375
6	"O" RING 2350	26	TERMINAL BOARD CASING	46	"O" RING 2068
7	PAIR OF AC BEARINGS	27	"O" RING 109	47	SCREW M4x12
8	SCREW M6x20	28	TERMINAL BOARD GASKET	48	TEFLON FLANGE
9	FRONT BARINGS SUPPORT	29	STATOR	49	"O" RING 3118
10	REAR FLANGE	30	CLAMPING COLLET INTR. SHAFT	50	TOP CYLINDER
11	SCREW M5x16	31	ROTOR SPACER	51	PISTON
12	SHAFT	32	BEARING	52	"O" RING 3081
13	ROTOR	33	BEARING CLAMPING NUT	53	GASKET
14	MOTOR CASING	34	WASHER	54	"O" RING 2400
15	NAMEPLATE	35	SPRINGS PIN	55	COVER
16	RIVET	36	REAR COVER	56	SCREW M10x100
17	WASHER	37	SENSOR	57	"O" RING 2021
18	SCREW M5x14	38	SCREW M5x12	58	PNP THERMAL PROTECTION
19	TERMINAL BOARD COVER	39	SWITCH BRACKET		
20	TERMINAL BOARD GASKET	40	SCREW M4x10		