

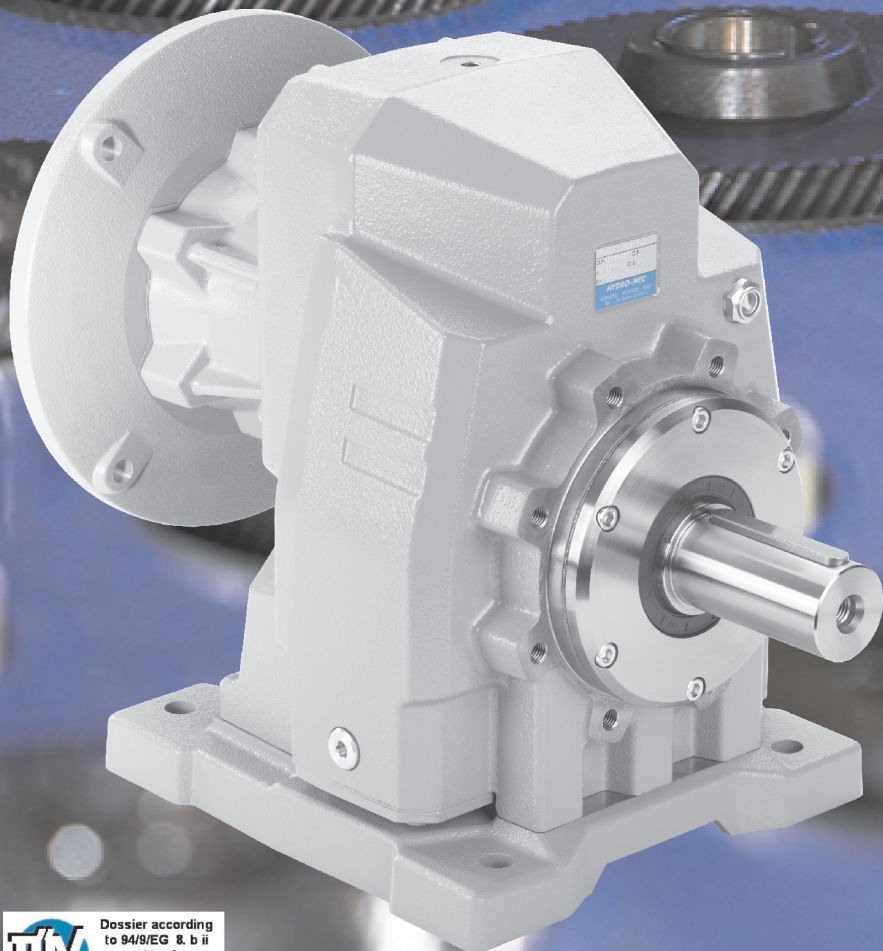
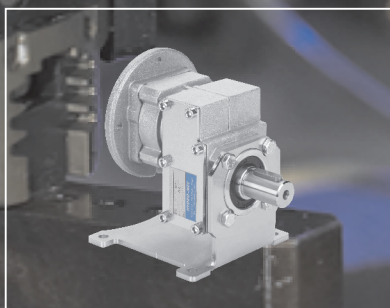
Coaxial -

Gears

Cat.: CT-RCM-WO-HM017

Coaxial gearboxes

Riduttori Coassiali
0.12 ÷ 45kW



Made in Italy



HYDRO · MEC

Aluminum one step gearboxes

A modular and compact product

3

Alloy housing

Is vacuum impregnated (MIL-STD 276) for protection and sealing. No secondary finish required but readily accepts paint

Flange

Fully modular to IEC and Compact integrated motor.
NEMA C flange

Gears

Hardened and ground gears.

Removable inspection cover

Allows periodic inspection of gearing during routine maintenance

Output shaft

With well proportioned bearings

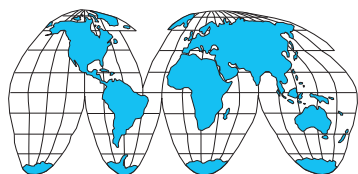
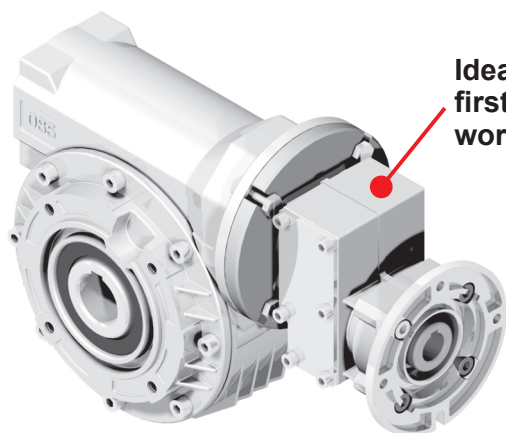
Feet

Removable feet.

Single-piece aluminum alloy housing

Combines light weight with high tensile strength. Precision machined for alignment of bearings and gearing

Ideal for use as first step with wormgearboxes.



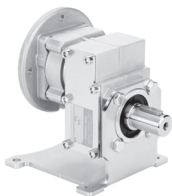
World wide sales network.

Lubricated for life with synthetic oil with operative range from -15° to $+130^{\circ}\text{C}$



Specific type datasheet on page...

On page / A pagina / Auf Seite / À la page / En la página

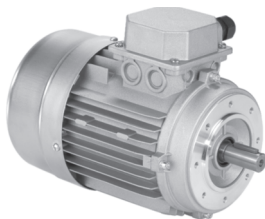


Types / Tipi
Tipen / Types
Tipos



3-5	3-7	3-9	3-11
211A 20Nm	311A 30Nm	411A 38Nm	511A 110Nm

On page / A pagina / Auf Seite / À la page / En la página



Types / Tipi
Tipen / Types
Tipos



M-1										
56A 56B	63A 63B	71A 71B	80A 80B	90S 90L	100LA 100LB	112M	132S 132M	160M 160L	180M 180L	

Type - Tipo - Typ
Type - Tipo

Size - Grandezza - Grösse
Taille - Tomafio

Mounting - Montaggio
Montage - Fixation
Tipo de montaje

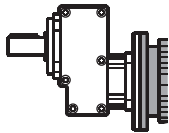
P

311A

-F

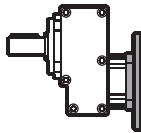
Aluminum one step gear
Riduttori in alluminio a uno stadio

1 Stages
Riduzioni
Stufen
Trains
Etapas



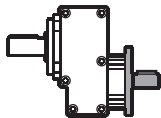
With IEC motor

M



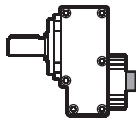
With motor flange

P



With male input shaft

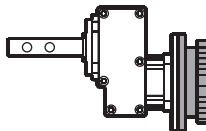
R



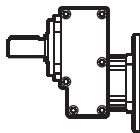
Modular Base

B

Special output shaft
Albero uscita speciale

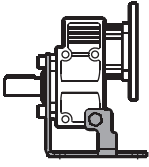


Only on request for Q.ty
A richiesta per quantità



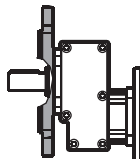
Without flange / feet

-N



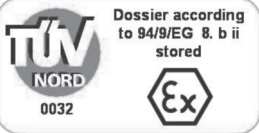
Mounted feet

H1

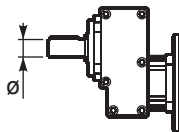
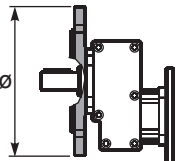
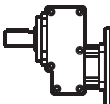
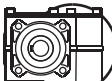
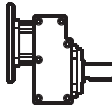
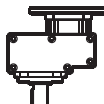
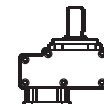


Output flange mounted

-F



On request we can deliver our products according to the ATEX
A richiesta possiamo fornire i nostri prodotti secondo le normative ATEX
Auf Anfrage können wir unsere Produkte den Richtlinien ATEX entsprechend liefern
Sur demande nos produits peuvent se conformer à la réglementation ATEX
A pedido, se pueden enviar nuestros productos de acuerdo con las normas ATEX.

Ratio - Rapporto Untersetzung Reduction Relaci3n	Output shaft Albero uscita Abtriebswelle Arbre de sortie Eje en salida	Output flange Flangia uscita Ausgangsflansch Bride de sortie Brida en salida	Motor size - Grandezza motore Motor Gr3sse Grandeur moteur - Tama1o motor	Terminal box position Posizione morsetteria Klemmkastenlage Position bo4te 2 bornes Posici3n caja de bornes	Mounting position Posizione montaggio Einbaulage Position de montage Posici3n de montaje	
2.84	S	2	-C	B	B3	
See technical data table Vedi tabella dati tecnici. Technisches Datenblatt beachten Voir Tableau donn3es techniques Ver tabla datos t3cnicos	 → STANDARD 211A S → ∅14 311A S → ∅14 C → ∅19 E → ∅24 411A S → ∅14 C → ∅19 E → ∅24 511A C → ∅19 E → ∅24 G → ∅28	 N Senza flangia Without flange 211A I → ∅105 Flangia integrata Integrated flange 311A 1 → ∅120 2 → ∅140 3 → ∅160 4 → ∅200 411A 1 → ∅120 2 → ∅140 3 → ∅160 4 → ∅200 511A 1 → ∅120 2 → ∅140 3 → ∅160 4 → ∅200 5 → ∅250	 Flange Flangia B5 -A =56 (∅120) -B =63 (∅140) -C =71 (∅160) -D =80 (∅200) -E =90 (∅200) -F =100+112 (∅250) -G =132 (∅300) B14 -O =56 (∅80) -P =63 (∅90) -Q =71 (∅105) -R =80 (∅120) -T =90 (∅140) -U =100+112 (∅160) -V =132 (∅200)	 Type R Tipo R 211A 311A -1 → ∅14 411A -2 → ∅19 511A -3 → ∅24 Without flange Senza flangia  211A 311A -Z → ∅9 (56B5) -0 → ∅11 (63B5) -1 → ∅14 (71B5) 411A -1 → ∅14 (71B5) -2 → ∅19 (80B5) -3 → ∅24 (90B5) 511A -2 → ∅19 (80B5) -3 → ∅24 (90B5) -4 → ∅28 (100B5)	 A  B STANDARD  C  D	 B3 STANDARD  B6  B7  B8  V5  V6

POTENZA RICHIESTA / REQUIRED POWER / ERFORDERLICHE LEISTUNG / PUISSANCE NECESSAIRE / POTENCIA NECESARIA

Lifting / sollevamento / hubantriebe / levage / elevación

$$P [KW] = \frac{M [Kg] \cdot g [9.81] \cdot v [m / s]}{1000}$$

Rotation / rotazione / drehung / rotation / rotation

$$P [KW] = \frac{M [Nm] \cdot n [rpm]}{9550}$$

Linear movement / traslazione / linearbewegung / translation / translacion

$$P [KW] = \frac{F [N] \cdot v [m / s]}{1000}$$

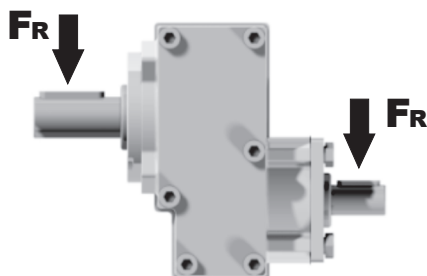
TORQUE / COPPIA / DREHMOMENT / COUPLE / PAR

$$M [Nm] = \frac{9550 \cdot P [KW]}{n [rpm]}$$

$$M [lb in] = \frac{63030 \cdot P [HP]}{n [rpm]}$$

RADIAL LOADS / CARICHI RADIALI / RADIALE - UND AXIALLASTEN / CHARGES RADIALES / CARGA RADIAL Y AXIAL

- Radial load generated by external transmissions keyed onto input and/or output shafts.
- Forza radiale generata da organi di trasmissione calettati sugli alberi di ingresso e/o uscita.
- Belastungen der Antriebs- bzw. Abtriebswellen durch von aussen eingebrachte Radiallasten.
- Charge radiale générée par la transmissions calés sur les entrées et / ou des arbres de sortie
- Cargas radiales, generada por transmisiones externas, aplicadas sobre los ejes de entrada y/o salida



$F_R \text{ [N]} = \frac{M \text{ [Nm]} \cdot 2000}{d \text{ [mm]}} \cdot f_k$		$F_R \text{ [N]} = \frac{M \text{ [lb in]} \cdot 8.9}{d \text{ [in]}} \cdot f_k$	
M	Momento torcente / Output torque / Abtriebsdrehmoment / Couple / Par torsion		
d	Diametro primitivo / Diam. of driving element / Durchmesser der Abtriebseinheit / Diamètre primitif / Diámetro primitivo		
f_k	Coefficiente di trasformazione / Factor / Faktor / Coefficient de transmission / Coeficiente de transmisión 1.15 Ingranaggi / Gearwheels / Zahnrad / Engrenage / Engranaje 1.25 Catena / Chain sprockets / Antriebskette / Chaîne / Cadena 1.75 Cinghia Trapezoidale / Narrow v-belt pulley / Keilriemen / Courroie trap. / Correa trapezoidal 2.50 Cinghia piatta / Flat-belt pulley / Flachzahnriem. / Courroie crantée / Correa plana		

- If your application requires higher radial loads, contact our technical office. Higher load may be possible.
- Nel caso la vostra applicazione richieda carichi radiali superiori consultare il nostro ufficio tecnico, valori maggiori possono essere accettati.
- Wenn Ihre Anwendung höhere Radialbelastungen erfordert, so wenden Sie sich bitte an unser technischen Büro.
- Si votre application demande des charges radiales supérieures, s'adresser à notre bureau technique.
- En el caso en que una aplicación exija una carga radial superior a la especificada en el catálogo, consultar a nuestra oficinas técnica.

How to select a gearbox / Come selezionare un riduttore / Wie wählt man ein Getriebe
Comment sélectionner un réducteur / Cómo seleccionar un reductor

B	Output speed Velocità in uscita Abtriebsdrehzahl Vitesse de sortie Velocidad de salida	Nominal power Potenza nominale Max. mögliche Leistung Poissance nominale Potencia nominal
	Gear size Grandezza riduttore Getriebegröße Taille réducteur Tamaño reductor	Motor power Potenza motore Motorleistung Puissance moteur Potencia motor
A	Nominal torque Momento torcente nominale Nenn Drehmoment Couple nominal Par de torsión nominal	Flange code Codice flangia Flanschtype Code bride Código bridas
		Input speed Velocità in entrata Eintriebsdrehzahl Vitesse en entrée Velocidad de entrada

311A

One step
30Nm

Rating - Aluminum ONE STEP GEARBOXES



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges		Available B14 motor flanges			Output Shaft		Notes
							-B	-C	-O	-P	-Q			Ratio code
892	1.57	0.37	3.9	3.3	1.24	13			C	C		2844		01
493	2.84	0.37	7.0	3.3	1.21	23			C	C		1954		02
426	3.29	0.37	8.1	3.2	1.18	26			C	C		1756	standard	03
362	3.87	0.37	9.6	2.9	1.08	28			C	C		1558	ø14	04

C	Ratio Rapporto Untersetzung Rapport de réduction Relación
----------	---

Transmitted torque Momento torcente trasmesso Mögliche Drehmomente Couple de sortie Par transmitido

Service factor Fattore di servizio Betriebsfaktor Facteur de service Factor de servicio

Output shaft diam. Diam. albero uscita Durchmesser abtriebswelle Diametre arbre lent Diametro eje de salida

Notes Note Anmerkungen Note Notas

fs		Oper. hours per day Ore di funz. giorn.		
Type of load and starts per hour Tipo di carico e avviamenti per ora		3 h	10 h	24 h
Continuous or intermittent appl. with start / hour Applicazione cont. o interm. con n.ro operazioni/ora	Uniform / Uniforme	0.8	1	1.25
	Moderate / Moderato	1	1.25	1.5
	Heavy / Forte	1.25	1.5	1.75
Intermittent application with start / hour Applicazione intermittente con n.ro operazioni/ora	Uniform / Uniforme	1	1.25	1.5
	Moderate / Moderato	1.25	1.5	1.75
	Heavy / Forte	1.5	1.75	2.15

D	Motor flange available Flange disponibili Erhältliche Motorflansche Bridas disponibles Bridas disponibles
B)	Mounting with reduction ring Montaggio con boccia di riduzione Reduzierhülsen Montage avec douille de réduction Montaje con casquillo de reducción
C)	Motor flangeholes position/terminal box position Posizione fori flangia/basetta motore Bohrungsposition am Motorflansch/-sockel Position trous bride/barrette à bornes moteur Posición agujeros brida / base motor
B)	Available without reduction bushes Disponibile anche senza boccia Auch ohne Reduzierbuchse verfügbar Disponible aussi sans douille de réduction Disponible tambien sin casquillo

A	Select required torque (according to service factor)	Seleziona la coppia desiderata (comprensiva del fattore di servizio)	Max. Drehmoment in Bezug zum Betriebsfaktor	Sélectionner le couple souhaité (comprenant le facteur de service)	Seleccionar el par deseado (incluyendo el factor de servicio)
B	Select output speed	Seleziona la velocità in uscita	Ausgewählte Abtriebsdrehzahl	Sélectionner la vitesse de sortie	Seleccionar la velocidad de salida
C	On the same line of selected geared motor, you can find the gear ratio	Sulla riga corrispondente alla motorizzazione prescelta si può rilevare il rapporto di riduzione	Auf der gleichen Linie wie die ausgewählte Motorleistung steht auch die Getriebeuntersetzung	Sur la ligne correspondante à la motorisation pré-choisie on peut relever le rapport de réduction	En la línea correspondiente al motor preseleccionado es posible encontrar la relación de reducción
D	Select motor flange available (if requested)	Scegli la flangia disponibile (se richiesta)	Erhältliche Motorflansche (auf Anfrage)	Choisir la bride disponible (si elle est demandée)	Seleccionar la brida disponible (sobre pedido)



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges				Output Shaft  standard ø14	Ratios code 
							-B	-C	-D	-E	-O	-P	-Q	-R		
682	2.05	0.37	5	2.0	0.73	10					C	C			1939	01
595	2.35	0.37	6	2.1	0.76	12					C	C			1740	02
500	2.80	0.37	7	2.0	0.75	14					C	C			1542	03
414	3.38	0.37	8	2.0	0.75	17					C	C			1344	04
298	4.70	0.37	12	1.7	0.64	20					C	C			1047	05
225	6.22	0.37	15	1.5	0.55	23					C	C			956	06
169	8.29	0.37	20	1.0	0.36	20					C	C			758	07
142	9.83	0.25	16	1.0	0.24	16					C	C			659	08

The dynamic efficiency is **0.98** for all ratios

 **Motor Flanges Available**
Flange Motore Disponibili

 **B) Supplied with Reduction Bushing**
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

 **C) Motor Flange Holes Position**
Posizione Fori Flangia Motore

EN Unit **211A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **211A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **211A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **211A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **211A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

LUBRICATION 211A Oil Quantity 0.05 Lt.

AGIP Telium VSF 320

SHELL Omala S4 WE 320

For all details on lubrication and plugs check our website

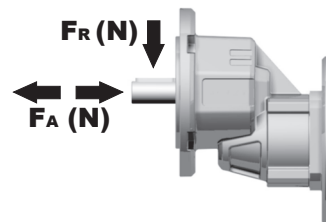
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS

Output shaft

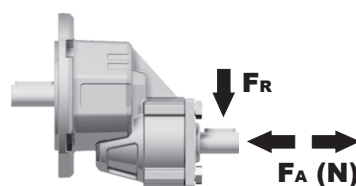
Albero di uscita



n_2	FA	FR
700	101	504
600	120	600
400	138	696
300	151	756
200	175	876
140	192	960

Input shaft

albero in entrata



n_1	FA	FR
1400	168	840
900	192	960

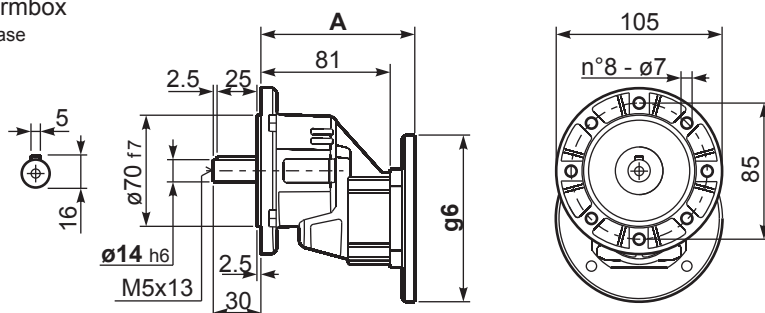
***Strong axial loads in the DX direction are not allowed.**
Non sono consentiti forti carichi assiali con direzione DX

tab. 2

P211A-F...

Basic wormbox
Riduttore base

Gearbox weight peso riduttore	1.40 kg
---	----------------

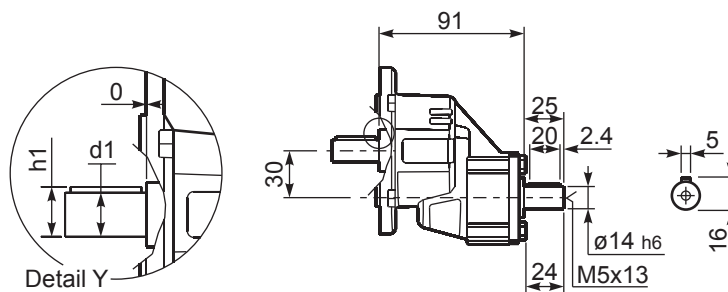


B5 Motor Flanges	A	g6	kit code
63 B5	99.5	138	K050.4.041
71 B5	97	160	K050.4.042

B14 Motor Flanges	A	g6	kit code
56 B14	97	80	KC40.4.049
63 B14	99.5	90	K050.4.047
71 B14	97	105	K050.4.045

R211A-F...

Basic wormbox
Riduttore base



***Available output shaft** / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	ø 14x30	5	16	M5x13



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges		Available B14 motor flanges			Output Shaft	Ratios code
							-B	-C	-O	-P	-Q		
891	1.57	0.37	4	3.3	1.2	13	63	71	C	C		2844	01
493	2.84	0.37	7	3.3	1.2	23			C	C		1954	02
425	3.29	0.37	8	3.2	1.2	26			C	C		1756	03
362	3.87	0.37	10	2.9	1.1	28			C	C		1558	04
303	4.62	0.37	11	2.6	0.97	30			C	C		1360	05
222	6.30	0.37	16	2.2	0.83	35			C	C		1063	06
170	8.22	0.37	20	1.9	0.69	38			C	C		974	07
129	10.86	0.37	27	1.0	0.39	28			C	C		776	08

The dynamic efficiency is **0.98** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **311A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **311A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **311A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **311A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **311A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

LUBRICATION 311A Oil Quantity 0.10 Lt.

AGIP Telium VSF 320

SHELL Omala S4 WE 320

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

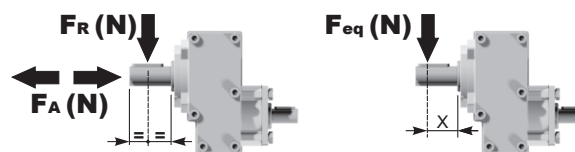
tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

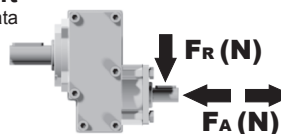
$$F_{eq} = F_R \cdot \frac{38.5}{X+18.5}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
700	120	640	400	160	800	200	200	1020
600	140	700	300	175	880	140	225	1120

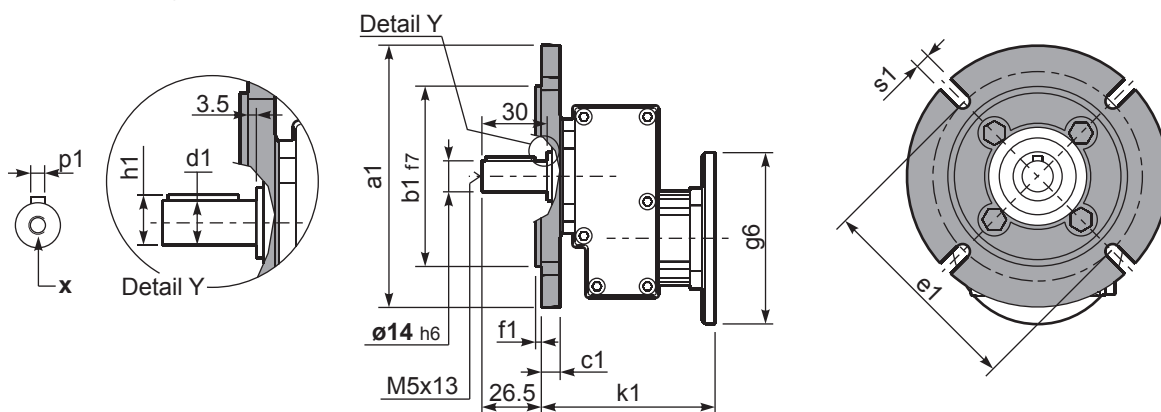
Input shaft

Albero in entrata



n_1	FA	FR
1400	180	860
900	200	980

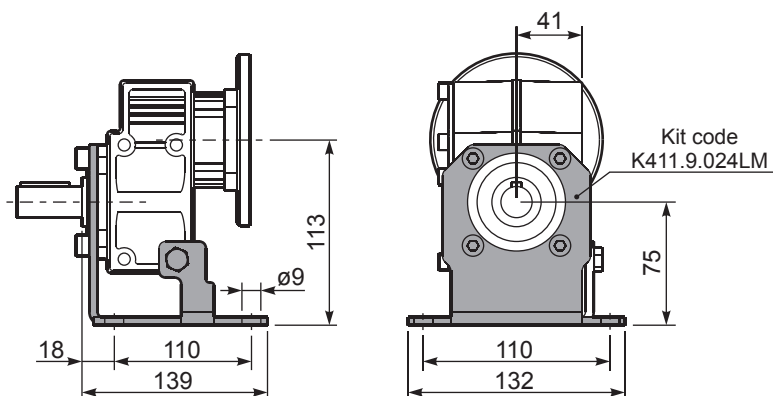
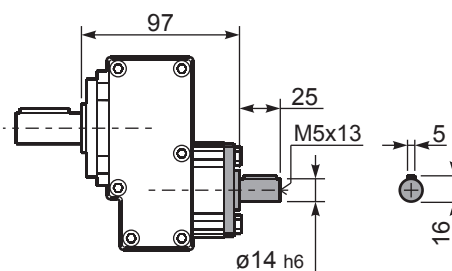
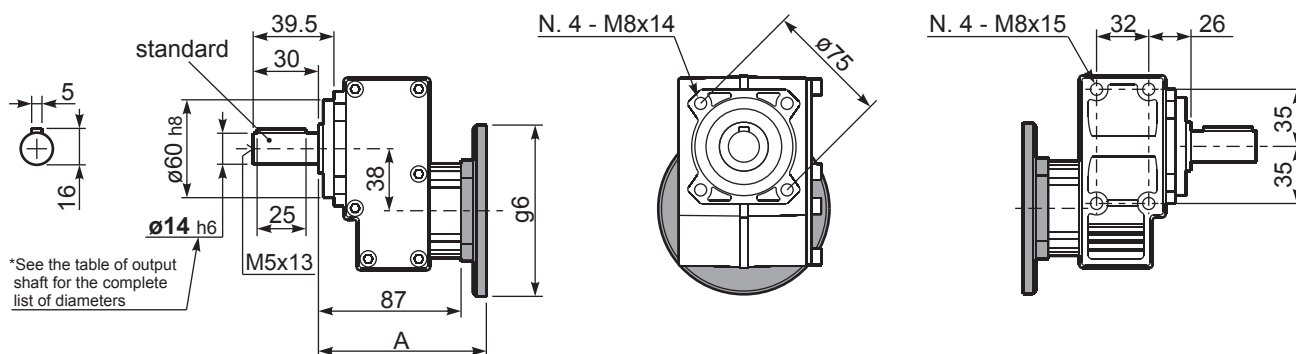
tab. 2

P311-F...Output flange
flange di uscitaGearbox
weight
peso riduttore**2.50 kg*****Available output shaft** / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 14x30	5	16	M5x13
On request A richiesta	Ø 19x40	6	21.5	M6x16
	Ø 24x40	8	27	M6x16

Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
120	80	11.5	100	3	9*	KC30.9.010
140	95	11.5	115	3	9	KC30.9.011
160	110	11.5	130	3.5	9	KC30.9.012
200	130	11.5	165	3.5	11	KC30.9.013

*Holes position
posizione fori**P311-H1...**With feet
Con piedini**R311-N...**Input Shaft
Albero in entrata**P311-N...**Basic gearbox
Riduttore base*See the table of output
shaft for the complete
list of diameters

B14 Motor Flanges	A	g6	k1	kit code
56 B14	103	80	106.5	KC40.4.049
63 B14	105.5	90	109	K050.4.047
71 B14	103	105	106.5	K050.4.045

B5 Motor Flanges	A	g6	k1	kit code
63 B5	105.5	138	109	K050.4.041
71 B5	103	160	106.5	K050.4.042



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges			Output Shaft 	Ratios code 
							-B	-C	-D	-E	-Q	-R	-T		
							63	71	80	90	71	80	90		
891	1.57	1.5	16	1.3	1.9	20	B				C	C		2844	01
493	2.84	1.5	28	1.2	1.8	35	B				C	C		1954	02
425	3.29	1.5	33	1.2	1.7	38	B				C	C		1756	03
362	3.87	1.5	39	1.0	1.5	40	B				C	C		1558	04
303	4.62	1.5	46	1.0	1.5	47	B				C	C		1360	05
222	6.30	1.1	46	1.0	1.1	46	B				C	C		1063	06
170	8.22	0.55	30	1.3	0.69	38	B				C	C		974	07
129	10.86	0.37	27	1.0	0.39	28	B				C	C		776	08

The dynamic efficiency is **0.98** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **411A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **411A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **411A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **411A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **411A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

LUBRICATION 411A Oil Quantity 0.10 Lt.

AGIP Telium VSF 320

SHELL Omala S4 WE 320

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

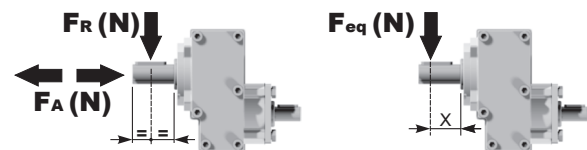
tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

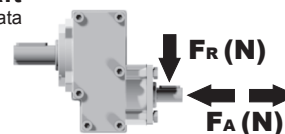
$$F_{eq} = F_R \cdot \frac{40}{X+20}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
700	182	910	400	230	1150	200	290	1450
600	200	1000	300	250	1250	140	320	1600

Input shaft

Albero in entrata



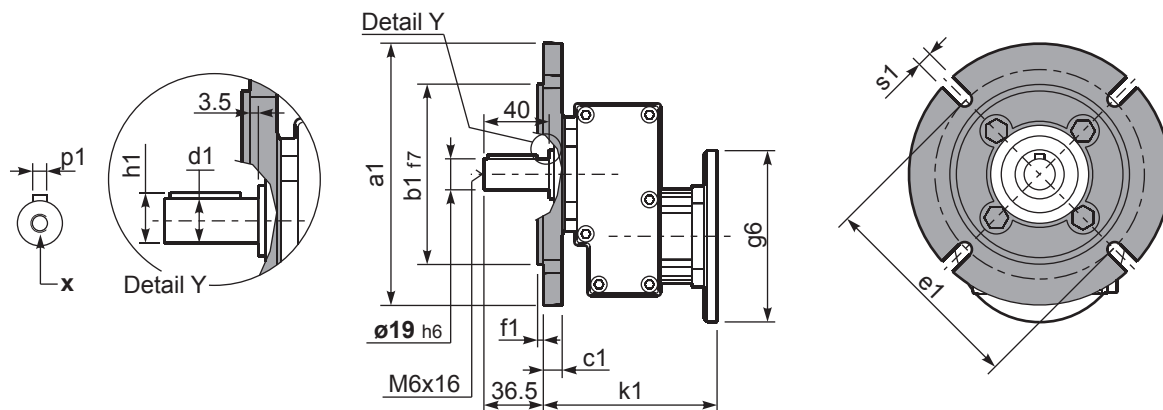
n_1	FA	FR
1400	240	1200
900	280	1400

tab. 2

P411-F...

Output flange
flange di uscitaGearbox
weight
peso riduttore

3.20 kg



*Available output shaft / Albero di uscita

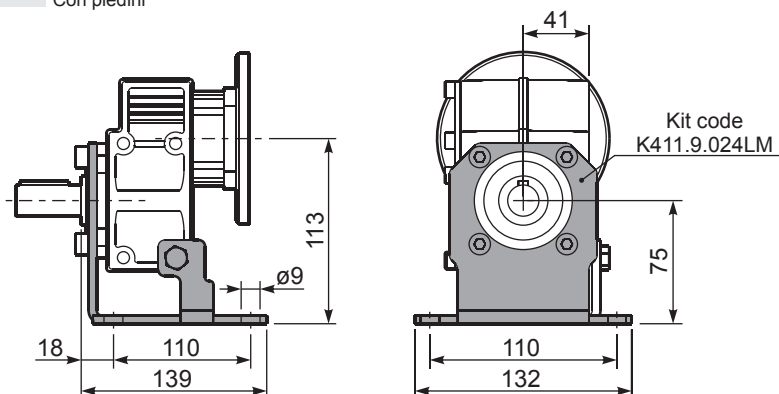
	Shaft - d1	p1	h1	x
Standard	Ø 19x40	6	21.5	M6x16
On request A richiesta	Ø 14x30	5	16	M5x13
	Ø 24x40	8	27	M6x16

Available output flanges / flange di uscita

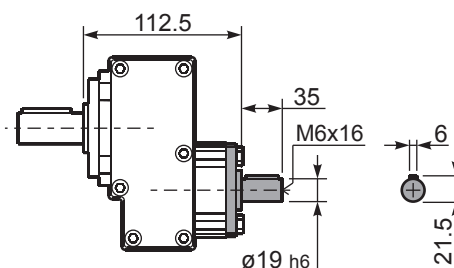
a1 Ø	b1	c1	e1	f1	s1	kit code
120	80	11.5	100	3	9*	KC30.9.010
140	95	11.5	115	3	9	KC30.9.011
160	110	11.5	130	3.5	9	KC30.9.012
200	130	11.5	165	3.5	11	KC30.9.013

*Holes position
posizione fori

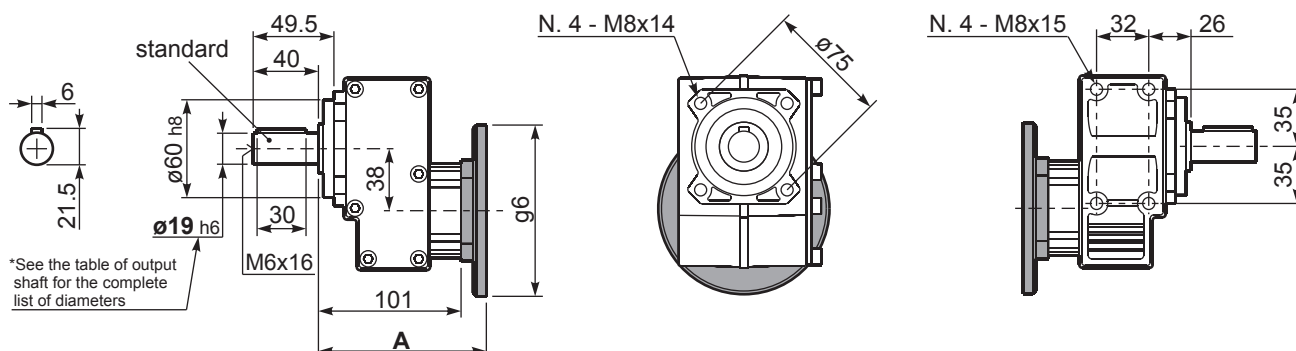
P411-H1...

With feet
Con piedini

R411-N...

Input Shaft
Albero in entrata

P411-N...

Basic gearbox
Riduttore base

B5 Motor Flanges	A	g6	k1	kit code
63 B5	121.5	140	125	K063.4.041
71 B5	119.5	160	123	K063.4.042
80/90 B5	121.5	200	125	K063.4.043

B14 Motor Flanges	A	g6	k1	kit code
71 B14	119.5	105	123	K063.4.047
80 B14	121.5	120	125	K063.4.046
90 B14	121.5	140	125	K063.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n ₂ [min ⁻¹]	Ratio i	Motor power P _{1M} [kW]	Output torque M _{2M} [Nm]	Service factor f.s.	Nominal power P _{1R} [kW]	Nominal torque M _{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges						
							-C	-D	-E	-F	-G	-R	-T	-U	-V			
							71	80	90	100 112	132	80	90	100 112	132			
1077	1.30	4	34	1.2	4.6	40	B								3039	standard ø28 On request ø19 ø24	01	
571	2.45	4	64	1.1	4.3	70	B							2049	02			
423	3.31	4	87	1.0	4.1	90	B							1653	03			
325	4.31	4	113	1.0	3.8	110	B							1356	04			
266	5.27	3	104	1.1	3.1	110	B							1158	05			
184	7.63	2.2	111	1.0	2.2	110	B							861	06			
133	10.50	1.1	77	1.0	1.1	80	B							663	07			
The dynamic efficiency is 0.98 for all ratios																		

The dynamic efficiency is 0.98 for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **511A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **511A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **511A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **511A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **511A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

LUBRICATION 511A Oil Quantity 0.29 Lt.

AGIP Telium VSF 320

SHELL Omala S4 WE 320

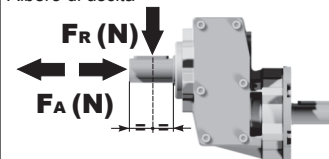
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

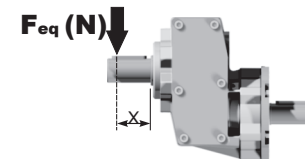
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



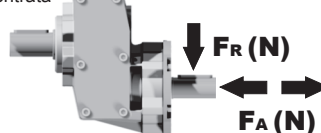
$$F_{eq} = F_R \cdot \frac{52.5}{X+22.5}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
700	294	1470	400	370	1850	200	460	2300
600	320	1600	300	400	2000	140	510	2550

Input shaft

Albero in entrata



n_1	FA	FR
1400	400	2000
900	440	2200

tab. 2



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n ₂ [min ⁻¹]	Ratio i	Motor power P _{1M} [kW]	Output torque M _{2M} [Nm]	Service factor f.s.	Nominal power P _{1R} [kW]	Nominal torque M _{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges						
							-C	-D	-E	-F	-G	-R	-T	-U	-V			
							71	80	90	100 112	132	80	90	100 112	132			
1077	1.30	4	34	1.2	4.6	40	B								3039	 standard ø28 On request ø19 ø24	01	
571	2.45	4	64	1.1	4.3	70	B							2049	02			
423	3.31	4	87	1.0	4.1	90	B							1653	03			
325	4.31	4	113	1.0	3.8	110	B							1356	04			
266	5.27	3	104	1.1	3.1	110	B							1158	05			
184	7.63	2.2	111	1.0	2.2	110	B							861	06			
133	10.50	1.1	77	1.0	1.1	80	B							663	07			
The dynamic efficiency is 0.98 for all ratios																		

The dynamic efficiency is 0.98 for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **511A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **511A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **511A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **511A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **511A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

LUBRICATION 511A Oil Quantity 0.29 Lt.

AGIP Telium VSF 320

SHELL Omala S4 WE 320

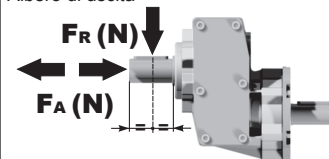
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

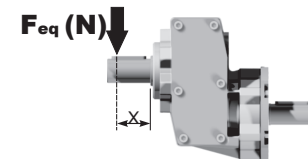
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



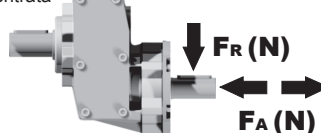
$$F_{eq} = F_R \cdot \frac{52.5}{X+22.5}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
700	294	1470	400	370	1850	200	460	2300
600	320	1600	300	400	2000	140	510	2550

Input shaft

Albero in entrata



n_1	FA	FR
1400	400	2000
900	440	2200

tab. 2

Aluminum in line gearboxes

A modular and compact product

Alloy housing

Is vacuum impregnated (MIL-STD 276) for protection and sealing. No secondary finish required but readily accepts paint

Flange

Fully modular to IEC and Compact integrated motor.
NEMA C flange

Removable inspection cover

Allows periodic inspection of gearing during routine maintenance

Oil seals

Two oil seals on request

Output shaft

With well proportioned bearings

Gears

Hardened and ground gears.

Feet

Removable feet.
With patented locking system.

Foot prints

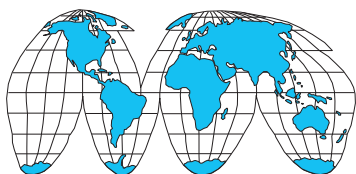
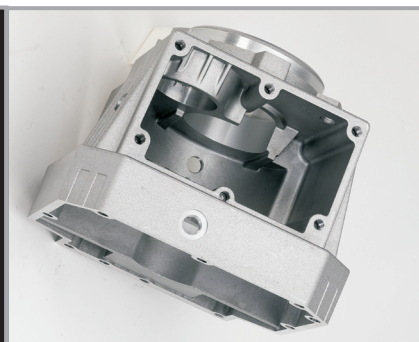
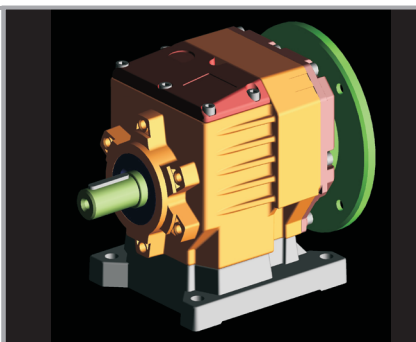
Compatible to the main standard of the market.

Lubricated for life with synthetic oil with operative range from -15° to $+130^{\circ}\text{C}$

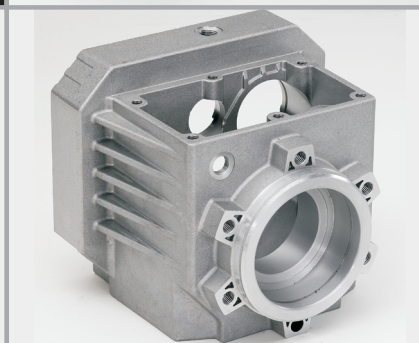
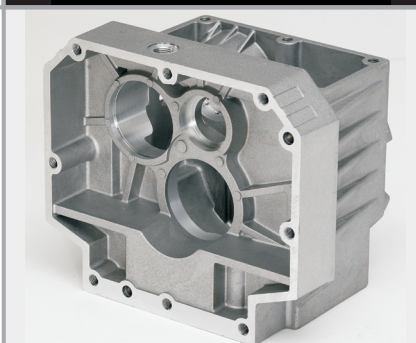


Single-piece aluminum alloy housing

Combines light weight with high tensile strength. Precision machined for alignment of bearings and gearing

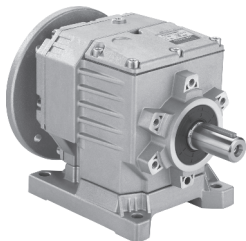


World wide sales network.



Specific type datasheet on page...

On page / A pagina / Auf Seite / À la page / En la página

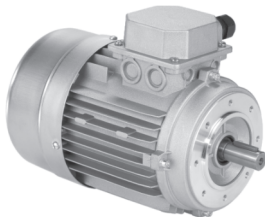


Types / Tipi
Tipen / Types
Tipos



4-5	4-7	4-9	4-11	4-13	4-15	4-17	4-19	4-21
202A 70Nm	302A 120Nm	402A 160Nm	403A 160Nm	452A 300Nm	502A 350Nm	503A 350Nm	602A 520Nm	603A 520Nm

On page / A pagina / Auf Seite / À la page / En la página



Types / Tipi
Tipen / Types
Tipos



M-1										
56A 56B	63A 63B	71A 71B	80A 80B	90S 90L	100LA 100LB	112M	132S 132M	160M 160L	180M 180L	

Type - Tipo - Typ
Type - Tipo

Size - Grandezza - Grösse
Taille - Tomaño

Mounting - Montaggio
Montage - Fixation
Tipo de montaje

P

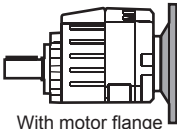
402A

-F

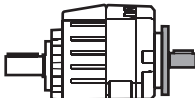
Aluminum coaxial gear boxes
Riduttori coassiali in alluminio



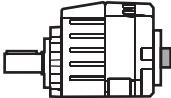
M



P



R



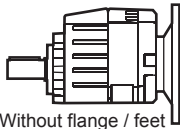
B

2 Stages
Riduzioni
Stufen
Trains
Etapas

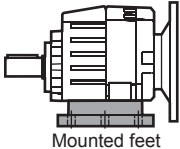
3 Stages
Riduzioni
Stufen
Trains
Etapas

202A
302A
402A
452A
502A
602A

403A
503A
603A



-N

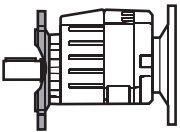


B..

Feet / piedini

Feet Code reference	G	H	R	L	L1	S
B1	112	18	85	110	87	50
B2	212/3	18	100	130	107.5	
S1	17	18	75	110	90+20	
S2	27	25	90	110	130	
M1	42/3	25	80	110+120	85	
L4	04	13	80	105		
L5	05	16	100	125		

You see feet code in the
chart of the dimensions
Vedi codice piede nella
tabella delle dimensioni



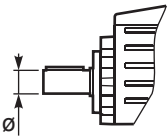
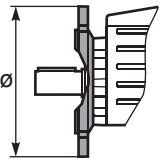
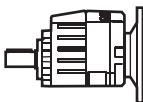
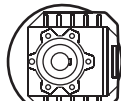
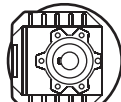
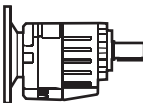
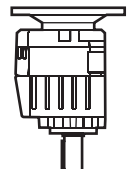
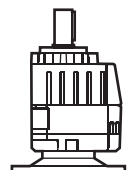
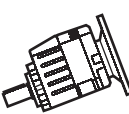
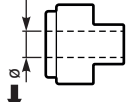
-F



Dossier according
to 94/9/EG 8. b ii
stored



On request we can deliver our products according to the ATEX
A richiesta possiamo fornire i nostri prodotti secondo le normative ATEX
Auf Anfrage können wir unsere Produkte den Richtlinien ATEX entsprechend liefern
Sur demande nos produits peuvent se conformer à la réglementation ATEX
A pedido, se pueden enviar nuestros productos de acuerdo con las normas ATEX.

Ratio - Rapporto Untersetzung Reduction Relación	Output shaft Albero uscita Abtriebswelle Arbre de sortie Eje en salida	Output flange Flangia uscita Ausgangsflansch Bride de sortie Brida en salida	Motor size - Grandezza motore Motor Grösse Grandeur moteur - Tamaño motor	Terminal box position Posizione morsettiera Klemmkastenlage Position boîte à bornes Posición caja de bornes	Mounting position Posizione montaggio Einbaulage Position de montage Posición de montaje	Coupling Giunto Kupplung Joint Juntura
7.33	V	2	-C	B	B3	-
See technical data table Vedi tabella dati tecnici Technisches Datenblatt beachten Voir Tableau données techniques Ver tabla datos técnicos	 → STANDARD 202A S ⇒ Ø14 B ⇒ Ø16 D ⇒ Ø20 V ⇒ Ø25 302A S ⇒ Ø14 B ⇒ Ø16 C ⇒ Ø19 D ⇒ Ø20 E ⇒ Ø24 V ⇒ Ø25 G ⇒ Ø28 402A 403A B ⇒ Ø16 C ⇒ Ø19 D ⇒ Ø20 E ⇒ Ø24 V ⇒ Ø25 452A 502A 503A E ⇒ Ø24 V ⇒ Ø25 G ⇒ Ø28 H ⇒ Ø30 I ⇒ Ø35 602A 603A G ⇒ Ø28 H ⇒ Ø30 I ⇒ Ø35 L ⇒ Ø38 M ⇒ Ø40	 N Senza flangia Without flange 202A 302A 1 ⇒ Ø120 2 ⇒ Ø140 3 ⇒ Ø160 4 ⇒ Ø200 402A 403A 1 ⇒ Ø120 2 ⇒ Ø140 3 ⇒ Ø160 4 ⇒ Ø200 5 ⇒ Ø250 452A 502A 503A 3 ⇒ Ø160 4 ⇒ Ø200 5 ⇒ Ø250 602A 603A 3 ⇒ Ø160 4 ⇒ Ø200 5 ⇒ Ø250	 Flange Flangia B5 -A =56 (Ø120) -B =63 (Ø140) -C =71 (Ø160) -D =80 (Ø200) -E =90 (Ø200) -F =100+112 (Ø250) -G =132 (Ø300) B14 -O =56 (Ø80) -P =63 (Ø90) -Q =71 (Ø105) -R =80 (Ø120) -T =90 (Ø140) -U =100+112 (Ø160) -V =132 (Ø200)  Type R Tipo R 202A 403A -1 ⇒ Ø14 302A 402A 503A 603A -2 ⇒ Ø19 452A 502A 602A -3 ⇒ Ø24  Without flange Senza flangia 202A 403A -Z ⇒ Ø9 (56B5) -0 ⇒ Ø11 (63B5) -1 ⇒ Ø14 (71B5) 302A 402A 503A 603A -1 ⇒ Ø14 (71B5) -2 ⇒ Ø19 (80B5) -3 ⇒ Ø24 (90B5) 452A 502A 602A -2 ⇒ Ø19 (80B5) -3 ⇒ Ø24 (90B5) -4 ⇒ Ø28 (100B5)	 A  B STANDARD  C  D	 B3 STANDARD  B6  B7  B8  V5  V6  V8	- Nothing indication: standard bore Nessuna indicazione: foro standard COUPLING  A = 9mm B = 11mm C = 14mm D = 19mm E = 24mm F = 28mm 0 Without coupling Senza giunto 

POTENZA RICHIESTA / REQUIRED POWER / ERFORDERLICHE LEISTUNG / PUISSANCE NECESSAIRE / POTENCIA NECESARIA

Lifting / sollevamento / hubantriebe / levage / elevación

$$P [KW] = \frac{M [Kg] \cdot g [9.81] \cdot v [m / s]}{1000}$$

Rotation / rotazione / drehung / rotation / rotation

$$P [KW] = \frac{M [Nm] \cdot n [rpm]}{9550}$$

Linear movement / traslazione / linearbewegung / translation / translacion

$$P [KW] = \frac{F [N] \cdot v [m / s]}{1000}$$

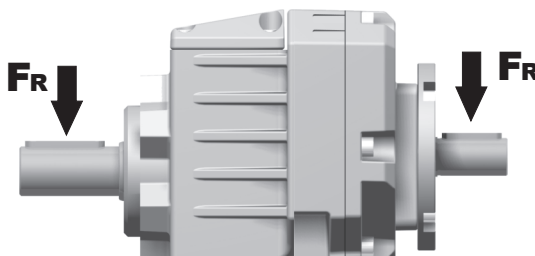
TORQUE / COPPIA / DREHMOMENT / COUPLE / PAR

$$M [Nm] = \frac{9550 \cdot P[KW]}{n [rpm]}$$

$$M [lb in] = \frac{63030 \cdot P[HP]}{n [rpm]}$$

RADIAL LOADS / CARICHI RADIALI / RADIALE - UND AXIALLASTEN / CHARGES RADIALES / CARGA RADIAL Y AXIAL

- Radial load generated by external transmissions keyed onto input and/or output shafts.
- Forza radiale generata da organi di trasmissione calettati sugli alberi di ingresso e/o uscita.
- Belastungen der Antriebs- bzw. Abtriebswellen durch von aussen eingebrachte Radiallasten.
- Charge radiale générée par la transmissions calés sur les entrées et / ou des arbres de sortie
- Cargas radiales, generada por transmisiones externas, aplicadas sobre los ejes de entrada y/o salida



$F_R \text{ [N]} = \frac{M \text{ [Nm]} \cdot 2000}{d \text{ [mm]}} \cdot f_k$		$F_R \text{ [N]} = \frac{M \text{ [lb in]} \cdot 8.9}{d \text{ [in]}} \cdot f_k$	
M	Momento torcente / Output torque / Abtriebsdrehmoment / Couple / Par torsion		
d	Diametro primitivo / Diam. of driving element / Durchmesser der Abtriebseinheit / Diamètre primitif / Diámetro primitivo		
f _k	Coefficiente di trasformazione / Factor / Faktor / Coefficient de transmission / Coeficiente de transmisión 1.15 Ingranaggi / Gearwheels / Zahnrad / Engrenage / Engranaje 1.25 Catena / Chain sprockets / Antriebskette / Chaîne / Cadena 1.75 Cinghia Trapezoidale / Narrow v-belt pulley / Keilriemen / Courroie trap. / Correa trapezoidal 2.50 Cinghia piatta / Flat-belt pulley / Flachzahnriem. / Courroie crantée / Correa plana		

- If your application requires higher radial loads, contact our technical office. Higher load may be possible.
- Nel caso la vostra applicazione richieda carichi radiali superiori consultare il nostro ufficio tecnico, valori maggiori possono essere accettati.
- Wenn Ihre Anwendung höhere Radialbelastungen erfordert, so wenden Sie sich bitte an unser technischen Büro.
- Si votre application demande des charges radiales supérieures, s'adresser à notre bureau technique.
- En el caso en que una aplicación exija una carga radial superior a la especificada en el catálogo, consultar a nuestra oficinas técnica.

How to select a gearbox / Come selezionare un riduttore / Wie wählt man ein Getriebe
Comment sélectionner un réducteur / Cómo seleccionar un reductor

B Output speed
Velocità in uscita
Abtriebsdrehzahl
Vitesse de sortie
Velocidad de salida

Nominal power
Potenza nominale
Max. mögliche Leistung
Puissance nominale
Potencia nominal

A Nominal torque
Momento torcente nominale
Nenn Drehmoment
Couple nominal
Par de torsión nominal

Flange code
Codice flangia
Flanschtype
Code bride
Código bridas

Input speed
Velocità in entrata
Eintriebsdrehzahl
Vitesse en entrée
Velocidad de entrada

Gear size
Grandezza riduttore
Getriebegröße
Taille réducteur
Tamaño reductor

Motor power
Potenza motore
Motorleistung
Puissance moteur
Potencia motor

402A

Coaxial - Gear
160Nm

Rating - Aluminum COAXIAL GEARBOXES

QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges				Output Shaft		Ratios code
							-B	-C	-D	-E	-Q	-R	-T	-U			
398	3.52	3	69	1.2	3.5	80	B	71	80*	90*	C	C		100	2821		01
320	4.37	3	86	1.0	3.1	90	B				C	C		112	2818		02
252	5.55	3	109	0.9	2.8	100	B				C	C			2813		03
220	6.36	2.2	92	1.0	2.3	95	B				C	C			1921		04
191	7.33	2.2	106	1.1	2.5	120	B				C	C			2812		05

C Ratio
Rapporto
Untersetzung
Rapport de réduction
Relación

Transmitted torque
Momento torcente trasmesso
Mögliche Drehmomente
Couple de sortie
Par transmitido

Service factor
Fattore di servizio
Betriebsfaktor
Facteur de service
Factor de servicio

Output shaft diam.
Diam. albero uscita
Durchmesser abtriebswelle
Diametre arbre lent
Diametro eje de salida

Notes
Note
Anmerkungen
Note
Notas

fs		Oper. hours per day Ore di funz. giorn.		
Type of load and starts per hour Tipo di carico e avviamenti per ora		3 h	10 h	24 h
Continuous or intermittent appl. with start / hour Applicazione cont. o interm. con n.ro operazioni/ora	Uniform / Uniforme	0.8	1	1.25
	Moderate / Moderato	1	1.25	1.5
	Heavy / Forte	1.25	1.5	1.75
Intermittent application with start / hour Applicazione intermittente con n.ro operazioni/ora	Uniform / Uniforme	1	1.25	1.5
	Moderate / Moderato	1.25	1.5	1.75
	Heavy / Forte	1.5	1.75	2.15

D		Motor flange available Flange disponibili Erhältliche Motorflansche Bridas disponibles Bridas disponibles
B)	Mounting with reduction ring Montaggio con boccia di riduzione Reduzierhülsen Montage avec douille de réduction Montaje con casquillo de reducción	
C)	Motor flangeholes position/terminal box position Posizione fori flangia/basetta motore Bohrungsposition am Motorflansch/-sockel Position trous bride/barrette à bornes moteur Posición agujeros brida / base motor	
B)	Available without reduction bushes Disponibile anche senza boccia Auch ohne Reduzierbuchse verfügbar Disponible aussi sans douille de réduction Disponible tambien sin casquillo	

A	Select required torque (according to service factor)	Seleziona la coppia desiderata (comprensiva del fattore di servizio)	Max. Drehmoment in Bezug zum Betriebsfaktor	Sélectionner le couple souhaité (comprenant le facteur de service)	Seleccionar el par deseado (incluyendo el factor de servicio)
B	Select output speed	Seleziona la velocità in uscita	Ausgewählte Abtriebsdrehzahl	Sélectionner la vitesse de sortie	Seleccionar la velocidad de salida
C	On the same line of selected geared motor, you can find the gear ratio	Sulla riga corrispondente alla motorizzazione prescelta si può rilevare il rapporto di riduzione	Auf der gleichen Linie wie die ausgewählte Motorleistung steht auch die Getriebeuntersetzung	Sur la ligne correspondante à la motorisation pré-choisie on peut relever le rapport de réduction	En la línea correspondiente al motor preseleccionado es posible encontrar la relación de reducción
D	Select motor flange available (if requested)	Scegli la flangia disponibile (se richiesta)	Erhältliche Motorflansche (auf Anfrage)	Choisir la bride disponible (si elle est demandée)	Seleccionar la brida disponible (sobre pedido)



QUICK SELECTION / Selezione veloce

The dynamic efficiency is **0.96** for all ratios

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges		Available B14 motor flanges			Output Shaft 	Ratios code 
							-B	-C	-O	-P	-Q		
							63	71*	56	63	71		
407	3.44	0.55**	12	2.0	1.1	25			C	C		2821	01
327	4.28	0.55**	15	1.9	1.1	30			C	C		2818	02
257	5.45	0.55**	20	2.0	1.1	40			C	C		2815	03
225	6.23	0.55**	23	2.0	1.1	45			C	C		1921	04
194	7.20	0.55**	26	1.9	1.1	50			C	C		2812	05
181	7.74	0.55**	28	1.8	0.99	50			C	C		1918	06
142	9.85	0.55**	36	1.7	0.93	60			C	C		1915	07
123	11.42	0.55**	41	1.5	0.80	60			C	C		1715	08
107	13.03	0.55**	47	1.3	0.70	60			C	C		1912	09
93	15.10	0.37	37	1.6	0.61	60			C	C		1712	10
86	16.20	0.37	39	1.5	0.57	60			C	C		1910	11
75	18.78	0.37	45	1.3	0.49	60			C	C		1710	12
66	21.15	0.37	51	1.2	0.43	60			C	C		1312	13
64	21.84	0.37	53	1.1	0.42	60			C	C		1015	14
53	26.31	0.37	64	0.9	0.35	60			C	C		1310	15
48.5	28.88	0.37	70	1.0	0.37	70			C	C		1012	16
39	35.91	0.37	87	0.8	0.30	70			C	C		1010	17
37.1	37.69	0.25	62	1.1	0.28	70			C	C		912	18
29.9	46.87	0.25	77	0.9	0.23	70			C	C		910	19
28.1	49.76	0.25	81	0.9	0.21	70			C	C		712	20
22.6	61.89	0.18	77	0.9	0.17	70			C	C		710	21

** Concerning a reduced dimensions electric motor.
Riferito a motore con grandezza ridotta

* Nel montaggio P la flangia può superare l'ingombro massimo dei piedi. Eventualmente utilizzare la flangia B14
* In the P mounting the B5 motor flange can exceed the foot maximum dimensions. Possibly use the flange B14

Motor Flanges Available
Flangia Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **202A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **202A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **202A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **202A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **202A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

LUBRICATION 202A Oil Quantity 0.15 Lt.

AGIP Telium VSF 320

SHELL Omala S4 WE 320

For all details on lubrication and plugs check our website

tab. 1

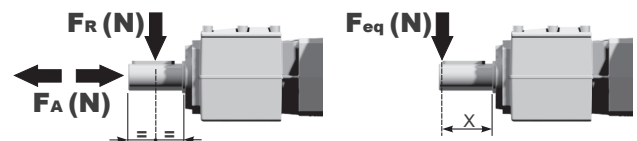
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

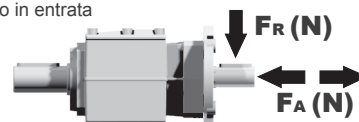
$$F_{eq} = F_R \cdot \frac{35.7}{X+20.7}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	140	700	140	246	1320	70	340	1700
250	151	756	120	270	1350	40	380	1900
200	185	924	85	300	1500	15	-	-

Input shaft

Albero in entrata



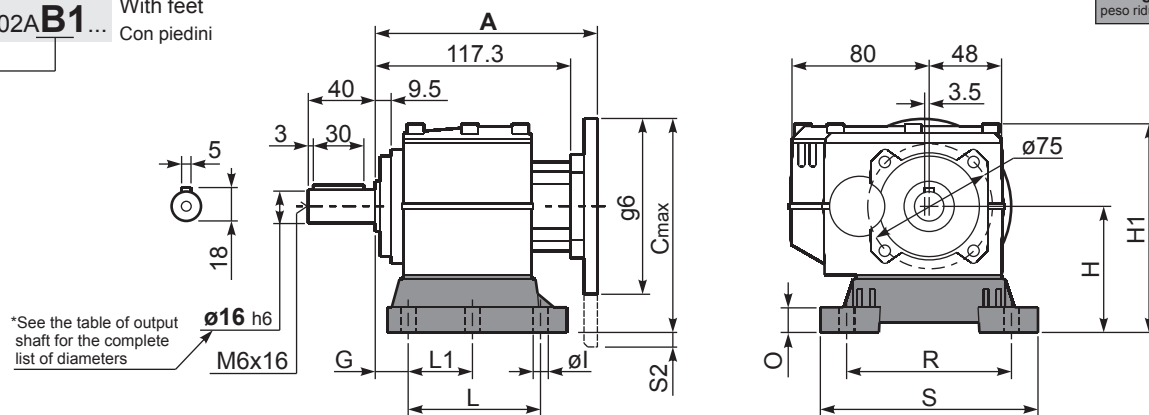
n_1	FA	FR
1400	140	700
900	160	800
500	190	950

tab. 2

Gearbox weight
peso riduttore

With flange **3.3 kg**
With feet **3.7 Kg**

P202A-B1... With feet
Con piedini



*See the table of output shaft for the complete list of diameters

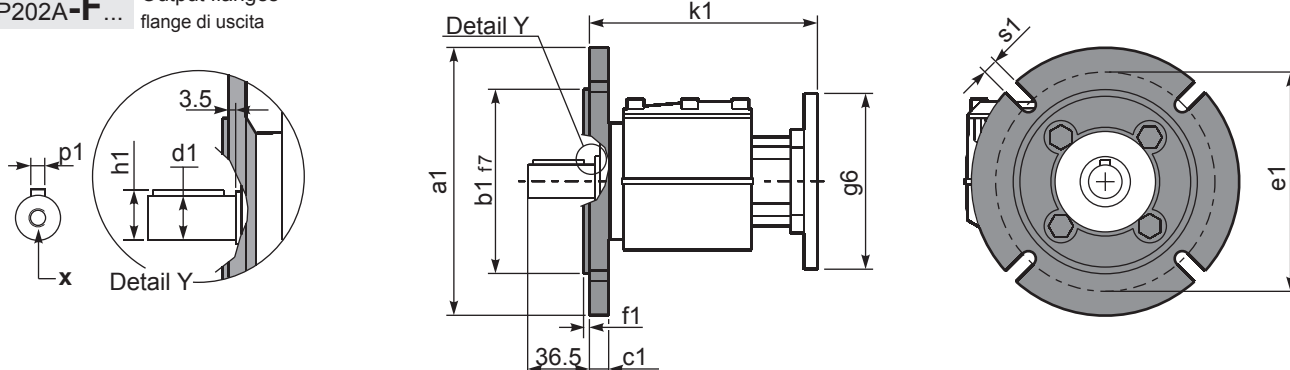
Feet Code	Market reference	G	H	R	L	L1	S	H1	O	Ø1	S2 only with motor flange	B5 max. Flange	kit code
B1	112	18	85	110	87	50	130	133	15	9	-	-	KC30.9.022
B2	212/3	18	100	130	107.5	60	155	145	5	11	-	-	KC30.9.023LM
S1	17-32	18	75	110	110	50	130	123	15	9	-	63B5	KC30.9.024
L3	03	12.5	65	91	60	-	105	149	5	9	11.5	71B5	KC30.9.026LM
L4	04	13	80	105	76	-	132	165	5	9	-	-	KC30.9.027LM

Other feet are available, see our web site
Sono disponibili altri piedini, consulta il nostro sito web

A see on page bottom

Most popular types
Tipi più diffusi

P202A-F... Output flanges
flange di uscita



*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 16x40	5	18	M6x16
On request A richiesta	Ø 14x30	5	16	M6x16
	Ø 20x40	6	22.5	M8x19
	Ø 25x50	8	28	M8x19

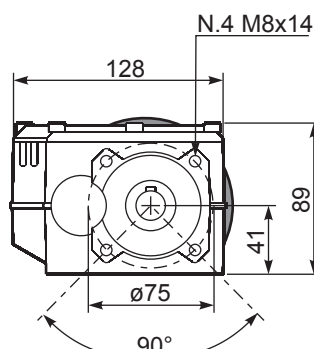
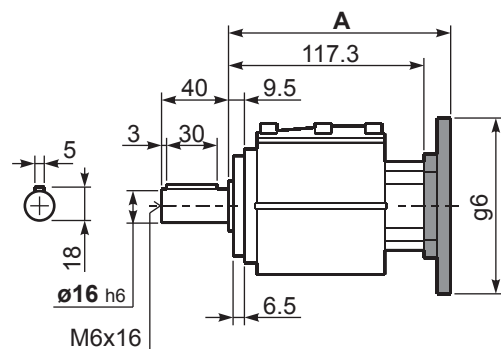
Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
120	80	11.5	100	3	9*	KC30.9.010
140	95	11.5	115	3	9	KC30.9.011
160	110	11.5	130	3.5	9	KC30.9.012
200	130	11.5	165	3.5	11	KC30.9.013

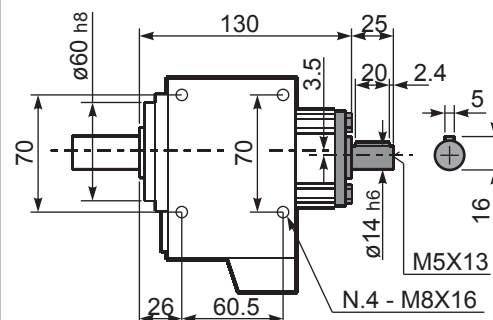
* Holes position
Posizione fori

With flange and feet only on request.
Ask for compatibility

P202A-N... Basic gearbox
Riduttore base



R202A-N... Input Shaft
Albero in entrata



B5 Motor Flanges	A	C _{max}	g6	k1	kit code
63 B5	135.8	170	140	139.3	K050.4.041
71 B5	133.3	180	160	136.8	K050.4.042

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
56 B14	133.3	139	80	136.8	KC40.4.049
63 B14	135.8	146	90	139.3	K050.4.047
71 B14	133.3	152.5	105	136.8	K050.4.045



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges			Output Shaft 	Output Shaft 	Ratios code 
							-B	-C	-D	-E	-Q	-R	-T			
							63	71*	80*	90*	71	80	90			
407	3.44	1.5	34	1.0	1.6	35	B				C	C		2821		01
327	4.28	1.5	42	1.0	1.4	40	B				C	C		2818		02
257	5.45	1.5	53	1.0	1.5	52	B				C	C		2815		03
225	6.23	1.5	61	1.1	1.7	70	B				C	C		1921		04
194	7.20	1.5	71	1.0	1.5	70	B				C	C		2812		05
181	7.74	1.5	76	1.1	1.6	80	B				C	C		1918	standard ø20	06
142	9.85	1.5	97	1.0	1.5	95	B				C	C		1915		07
123	11.42	1.5	112	1.0	1.5	115	B				C	C		1715		08
107	13.03	1.1	93	1.2	1.3	114	B				C	C		1912	ø14	09
93	15.10	1.1	108	1.1	1.2	114	B				C	C		1712	ø16	10
86	16.20	0.75	80	1.3	1.0	107	B				C	C		1910	ø19	11
75	18.78	0.75	92	1.2	0.87	107	B				C	C		1710	ø20	12
66	21.15	0.75	104	1.1	0.82	114	B				C	C		1312	ø24	13
64	21.84	0.75	107	1.1	0.83	119	B				C	C		1015	ø25	14
53	26.31	0.55	95	1.1	0.62	107	B				C	C		1310	ø28	15
48.5	28.88	0.55	105	1.1	0.60	114	B				C	C		1012	On request	16
39	35.91	0.37	87	1.2	0.46	107	B				C	C		1010		17
37.1	37.69	0.37	91	1.1	0.41	102	B				C	C		912		18
29.9	46.87	0.37	113	0.9	0.35	107	B				C	C		910		19
28.1	49.76	0.25	81	1.2	0.31	101	B				C	C		712		20
22.6	61.89	0.25	101	1.1	0.26	107	B				C	C		710		21

The dynamic efficiency is **0.96** for all ratios

*Nel montaggio P la flangia può superare l'ingombro massimo dei piedi. Eventualmente utilizzare la flangia B14
* In the P mounting the B5 motor flange can exceed the foot maximum dimensions. Possibly use the flange B14

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **302A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **302A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **302A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **302A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **302A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

LUBRICATION 302A Oil Quantity 0.15 Lt.

AGIP Telium VSF 320

SHELL Omala S4 WE 320

For all details on lubrication and plugs check our website

tab. 1

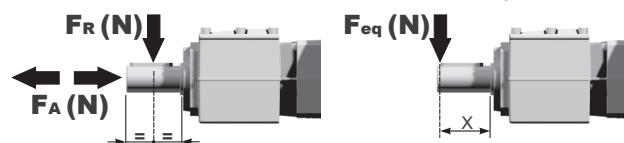
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

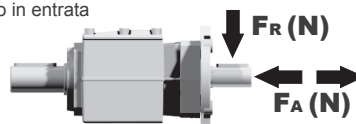
$$F_{eq} = F_R \cdot \frac{35.7}{X+20.7}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	140	700	140	246	1320	70	340	1700
250	151	756	120	270	1350	40	380	1900
200	185	924	85	300	1500	15	-	-

Input shaft

Albero in entrata



n_1	FA	FR
1400	226	1130
900	264	1320
500	322	1610

tab. 2



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges				Output Shaft		
							-B	-C	-D	-E	-F	-Q	-R	-T	-U			Ratios code
							63	71	80*	90*	100*	71	80	90	100			
398	3.52	3	68	1.2	3.5	80	B					C	C			2821		01
321	4.37	3	84	1.1	3.1	90	B					C	C			2818		02
252	5.56	3	107	0.9	2.7	100	B					C	C			2813		03
220	6.36	2.2	90	1.1	2.3	95	B					C	C			1921		04
191	7.33	2.2	104	1.2	2.5	120	B					C	C			2812		05
177	7.89	2.2	112	1.1	2.3	120	B					C	C			1918		06
139	10.06	2.2	143	1.0	2.3	150	B					C	C			1913		08
120	11.66	1.5	114	1.5	2.3	174	B					C	C			1713	standard	09
106	13.26	1.5	130	1.2	1.8	160	B					C	C			1912	ø25	10
102	13.68	1.5	134	1.1	1.6	144	B					C	C			1513		25
91	15.37	1.5	151	1.1	1.6	160	B					C	C			1712	ø16	11
86	16.20	1.5	159	0.9	1.3	138	B					C	C			1910	ø19	12
78	18.04	1.5	177	0.9	1.4	160	B					C	C			1512	ø20	23
75	18.78	1.1	134	1.0	1.1	138	B					C	C			1710	ø24	24
65	21.54	1.1	154	1.0	1.1	160	B					C	C			1312	On request	14
63	22.29	1.1	160	1.0	1.1	167	B					C	C			1013		15
53	26.31	0.75	129	1.1	0.80	138	B					C	C			1310		16
47.6	29.40	0.75	144	1.1	0.83	160	B					C	C			1012		17
39	35.91	0.55	130	1.1	0.59	138	B					C	C			1010		18
36.5	38.37	0.55	139	1.2	0.64	160	B					C	C			912		19
29.9	46.87	0.55	170	0.8	0.45	138	B					C	C			910		20
27.6	50.67	0.37	123	1.1	0.40	132	B					C	C			712		21
22.6	61.89	0.37	150	0.9	0.34	138	B					C	C			710		22

The dynamic efficiency is **0.96** for all ratios

*Nel montaggio P la flangia può superare l'ingombro massimo dei piedi. Eventualmente utilizzare la flangia B14
* In the P mounting the B5 motor flange can exceed the foot maximum dimensions. Possibly use the flange B14

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **402A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **402A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **402A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **402A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **402A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

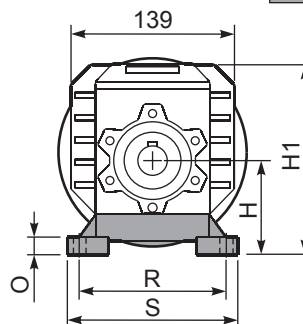
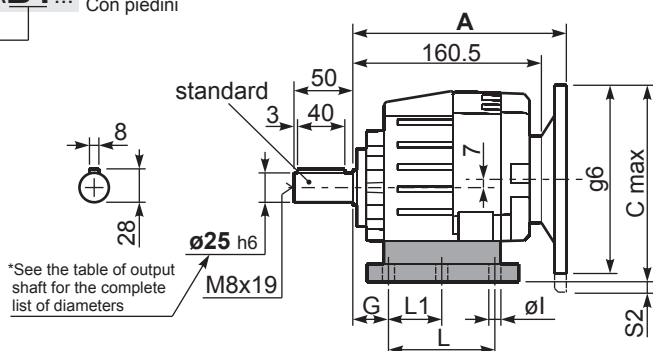
Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
B3	B6	B7	B8	V5	V6	V8
0.25 LT	0.30 LT	0.40 LT	0.40 LT	0.40 LT	0.50 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS								
Output shaft Albero di uscita			$F_{eq} = F_R \cdot \frac{46}{X+21}$					
n_2	F_A	F_R	n_2	F_A	F_R	n_2	F_A	F_R
300	310	1550	140	406	2030	70	540	2700
250	330	1650	120	448	2240	40	600	3000
200	360	1800	85	480	2400	15	600	3000
Input shaft Albero in entrata								
n_1	F_A	F_R						
1400	240	1200						
900	280	1400						
500	340	1700						

tab. 2

P402A-B1... With feet
Con piediniGearbox weight
peso riduttore With flange **5.7 kg**
With feet **5.9 kg**

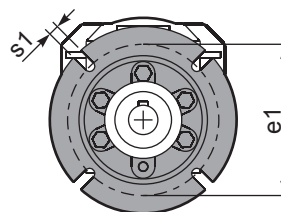
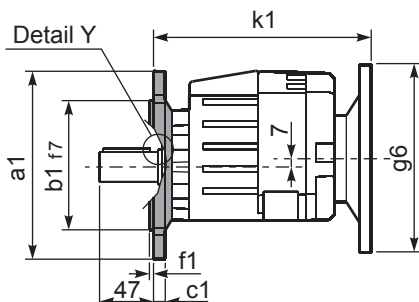
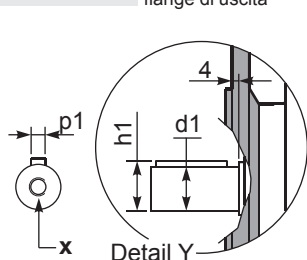
Feet / piedini

Feet Code	Market reference	G	H	R	L	L1	S	H1	O	Øl	S2 only with motor flange	B5 max. Flange	kit code
B1	112	18	85	110	87	50	130	167	15	-	8 80/90B5 33 100/112B5	-	KC35.9.021
B2	212/3	18	100	130	107.5	60	155	182	17	11	18 100/112B5	-	KC40.9.025
S1	17	18	75	110	90÷110	50	145	155	15	9	18 80/90B5 43 100/112B5	-	KC40.9.022
S2	27	25	90	110	130	-	145	172	20	9	3 80/90B5 28 100/112B5	-	KC40.9.024
H2	022-223	25	100	110	115	-	145	182	20	9	18 100/112B5	-	KC40.9.026
M1	42/3	25	80	110÷120	85	-	145	162	15	9	13 80/90B5 38 100/112B5	-	KC40.9.023
L4	04	13	80	105	76	-	132	162	5	10	13 80/90B5 38 100/112B5	-	KC35.9.023LM
L5	05	16	100	125	90	-	150	182	6	12	18 100/112B5	-	KC40.9.027LM

Other feet are available, see our web site
Sono disponibili altri piedini, consulta il nostro sito web

A see on page bottom

Most popular types
Tipi più diffusi

P402A-F... Output flanges
flange di uscita

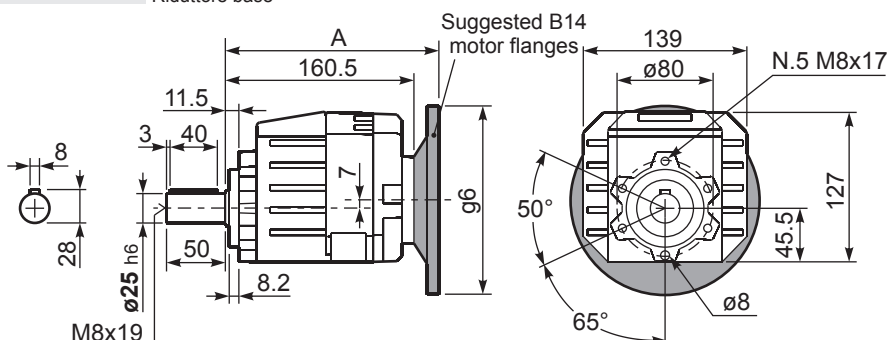
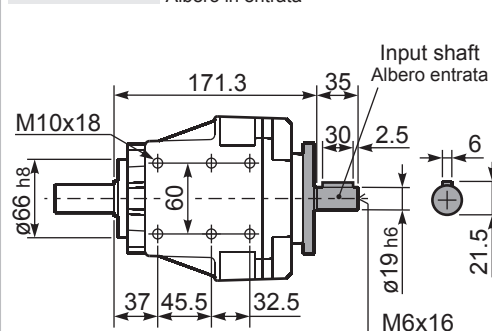
*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 25x50	8	28	M8x19
On request A richiesta	Ø 16x40	5	18	M6x16
	Ø 19x40	6	21.5	M6x16
	Ø 20x40	6	22.5	M8x19
	Ø 24x50	8	27	M8x19

Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
120	80	10	100	3	7	KC40.9.010
140	95	10	115	3	9	KC40.9.011
160	110	10	130	3.5	9	KC40.9.012
200	130	11	165	3.5	11	KC40.9.013
250	180	11.5	215	3.5	14	KC40.9.014

With flange and feet only on request.
Ask for compatibility

P402A-N... Basic gearbox
Riduttore baseR402A-N... Input Shaft
Albero in entrata

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
63 B5	181	177	140	185	K063.4.041
71 B5	179	187	160	183	K063.4.042
80/90 B5	181	207	200	185	K063.4.043
100/112 B5	195.8	232	250	199.8	KC40.4.043

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
71 B14	179	159.5	105	183	K063.4.047
80 B14	181	167	120	185	K063.4.046
90 B14	181	177	140	185	K063.4.041
100/112 B14	195.8	187	160	199.8	KC40.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges		Available B14 motor flanges			Output Shaft 	Ratios code 
							-B	-C	-O	-P	-Q		
							63	71	56	63	71		
36.5	38.40	0.37	91	1.9	0.71	175			C	C		171713	02
32.0	43.69	0.37	104	1.4	0.53	149			C	C		191712	03
27.6	50.64	0.37	120	1.3	0.49	160			C	C		171712	04
26.2	53.36	0.37	127	1.1	0.40	138			C	C		191710	05
22.9	61.21	0.37	145	1.1	0.41	160			C	C		191312	06
22.6	61.85	0.37	147	0.9	0.35	138			C	C		171710	07
19.7	70.95	0.37	168	1.0	0.35	160			C	C		131712	08
19.1	73.43	0.37	174	1.0	0.37	175			C	C		101713	09
18.7	74.77	0.25	120	1.2	0.29	138			C	C		191310	10
16.2	86.66	0.25	139	1.0	0.25	138			C	C		131710	11
14.5	96.85	0.25	155	1.0	0.26	160			C	C		101712	12
13.6	102.89	0.25	165	1.1	0.27	180			C	C		101313	13
11.1	126.40	0.18	155	1.0	0.20	160			C	C		91712	17
10.3	135.69	0.18	166	1.0	0.18	160			C	C		101312	15
8.4	165.74	0.12	131	1.1	0.13	138			C	C		101310	16
7.9	177.09	0.12	140	1.1	0.14	160			C	C		91312	18
6.5	216.31	0.09	136	1.0	0.10	138			C	C		91310	19

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **403A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **403A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **403A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

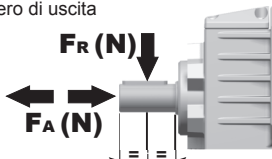
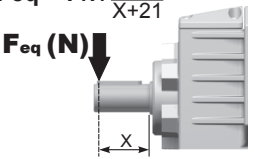
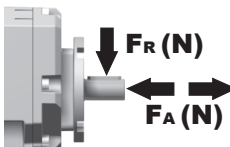
F Le réducteur **403A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **403A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

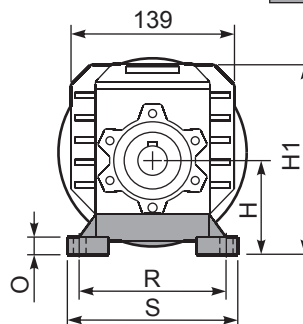
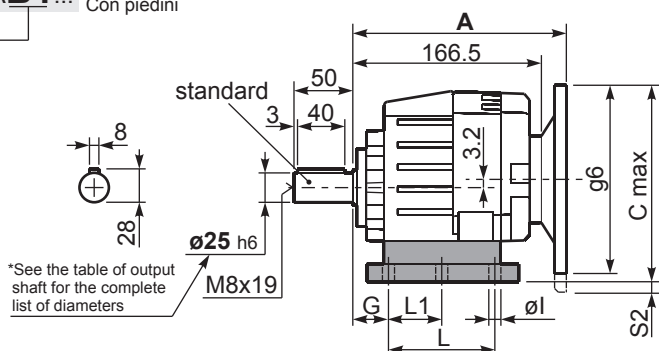
Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
B3	B6	B7	B8	V5	V6	V8
0.30 LT	0.35 LT	0.45 LT	0.45 LT	0.45 LT	0.55 LT	Ask
AGIP Telium VSF 320			SHELL Omala S4 WE 320			

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS									
Output shaft Albero di uscita					$F_{eq} = F_R \cdot \frac{46}{X+21}$				
									
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR	
300	310	1550	140	406	2030	70	540	2700	
250	330	1650	120	448	2240	40	600	3000	
200	360	1800	85	480	2400	15	600	3000	
Input shaft Albero in entrata									
n_1	FA	FR	n_1	FA	FR	n_1	FA	FR	
1400	140	700	900	160	800	500	190	950	

tab. 2

P403A-B1... With feet
Con piediniGearbox weight
peso riduttore With flange **6.1 kg**
With feet **6.3 kg**

Feet / piedini

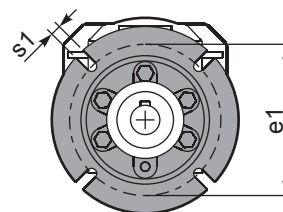
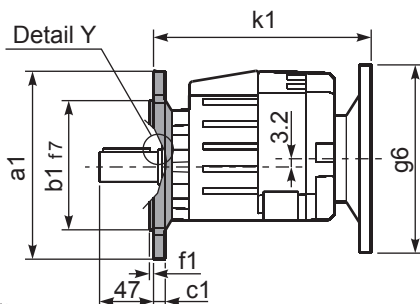
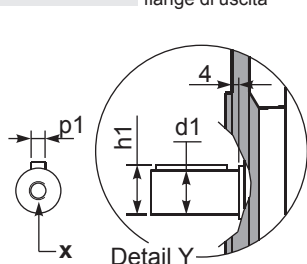
Feet Code	Market reference	G	H	R	L	L1	S	H1	O	Øl	S2 only with motor flange	B5 max. Flange	kit code
B1	112	18	85	110	87	50	130	167	15	-	-	-	KC35.9.021
B2	212/3	18	100	130	107.5	60	155	182	17	11	-	-	KC40.9.025
S1	17	18	75	110	90÷110	50	145	155	15	9	2 80/90B5	-	KC40.9.022
S2	27	25	90	110	130	-	145	172	20	9	-	-	KC40.9.024
H2	022-223	25	100	110	115	-	145	182	20	9	-	-	KC40.9.026
M1	42/3	25	80	110÷120	85	-	145	162	15	9	-	-	KC40.9.023
L4	04	13	80	105	76	-	132	162	5	10	-	-	KC35.9.023LM
L5	05	16	100	125	90	-	150	182	6	12	-	-	KC40.9.027LM

Other feet are available, see our web site
Sono disponibili altri piedini, consulta il nostro sito web

A see on page bottom

Most popular types
Tipi più diffusi

4

P403A-F... Output flanges
flange di uscita

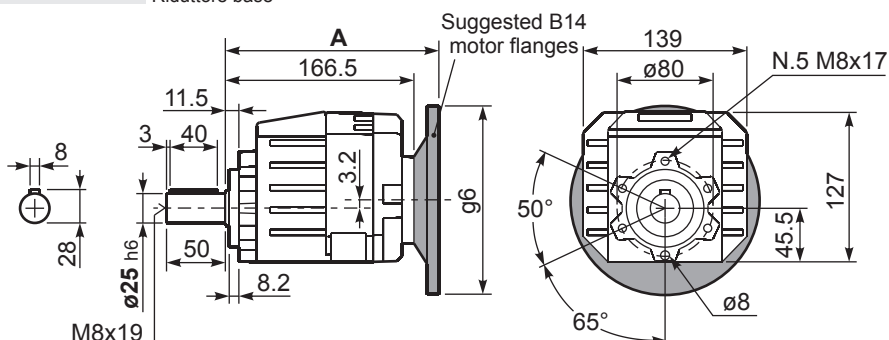
*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 25x50	8	28	M8x19
On request A richiesta	Ø 16x40	5	18	M6x16
	Ø 19x40	6	21.5	M6x16
	Ø 20x40	6	22.5	M8x19
	Ø 24x50	8	27	M8x19

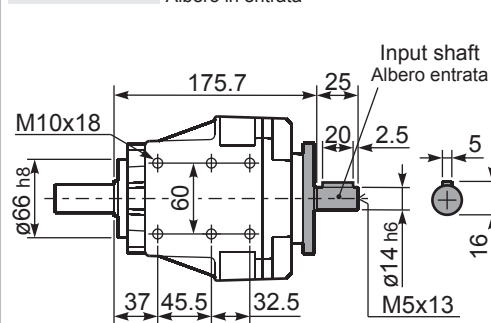
Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
120	80	10	100	3	7	KC40.9.010
140	95	10	115	3	9	KC40.9.011
160	110	10	130	3.5	9	KC40.9.012
200	130	11	165	3.5	11	KC40.9.013
250	180	11.5	215	3.5	14	KC40.9.014

With flange and feet only on request.
Ask for compatibility

P403A-N... Basic gearbox
Riduttore base

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
63 B5	185	173.2	140	189	K050.4.041
71 B5	182.5	183.2	160	186.5	K050.4.042

R403A-N... Input Shaft
Albero in entrata

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
56 B14	182.5	143.2	80	186.5	KC40.4.049
63 B14	185	148.2	90	189	K050.4.047
71 B14	182.5	155.7	105	186.5	K050.4.045



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges				Output Shaft		
							-C	-D	-E	-F	-G	-R	-T	-U	-V			Ratios code
							71	80	90	100	112	132	80	90	100	112		
388	3.61	4	93	1.6	6.3	150	B									3018		01
331	4.23	4	108	1.6	6.1	170	B									3016		02
279	5.01	4	129	1.6	6.1	200	B									3014		03
231	6.07	4	156	1.6	6.3	250	B									3012		04
206	6.81	4	175	1.6	6.2	277	B									2018		05
176	7.96	4	204	1.5	5.8	300	B									2016	standard ø30	06
148	9.45	4	242	1.3	4.9	304	B									2014		07
122	11.43	4	293	1.0	4.0	300	B									2012		08
99	14.21	3	274	1.0	2.8	265	B									2010	ø24	09
84	16.62	3	321	0.9	2.8	304	B									1314		10
70	20.10	2.2	286	1.0	2.3	300	B									1312		11
56	24.98	1.85	302	0.9	1.6	265	B									1310	ø28	12
47.6	29.41	1.5	288	1.1	1.6	304	B									814	ø35	13
39.3	35.58	1.5	349	0.9	1.3	300	B									812	On request	14
34.6	40.50	1.1	290	1.0	1.1	290	B									614		15
31.7	44.23	1.1	316	0.8	0.92	265	B									810		16
28.6	49.00	0.75	240	1.2	0.93	300	B									612		17
23.0	60.90	0.75	299	0.9	0.66	265	B									610		18

The dynamic efficiency is **0.96** for all ratios

*Nel montaggio P la flangia può superare l'ingombro massimo dei piedi. Eventualmente utilizzare la flangia B14

* In the P mounting the B5 motor flange can exceed the foot maximum dimensions. Possibly use the flange B14

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **452A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **452A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **452A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **452A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **452A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
B3	B6	B7	B8	V5	V6	V8
0.31 LT	0.31 LT	0.31 LT	0.31 LT	0.31 LT	0.31 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

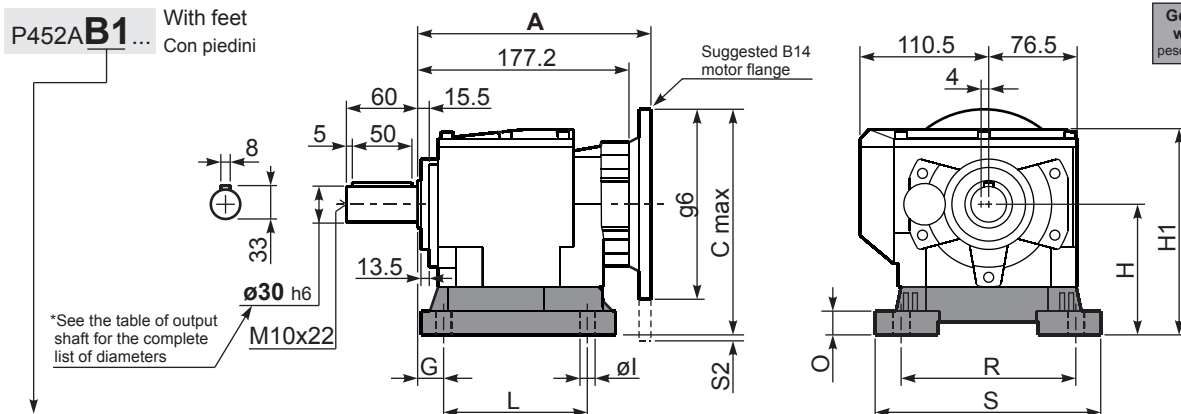
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS		
Output shaft / Albero di uscita		
		$F_{eq} = F_R \cdot \frac{51}{X+21}$
$F_R(N)$	$F_A(N)$	X
n_2	FA	FR
300	415	2070
250	430	2160
200	470	2340
n_2	FA	FR
140	540	2700
120	560	2790
85	630	3150
n_2	FA	FR
70	700	3510
40	810	4050
15	900	4500
Input shaft / Albero in entrata		
	$F_R(N)$	$F_A(N)$
n_1	FA	FR
1400	400	2000
900	440	2200
500	440	2200

tab. 2

P452A-B1...

With feet
Con piediniGearbox weight
peso riduttore With flange 8.7 kg
With feet 8.9 Kg

Feet / piedini

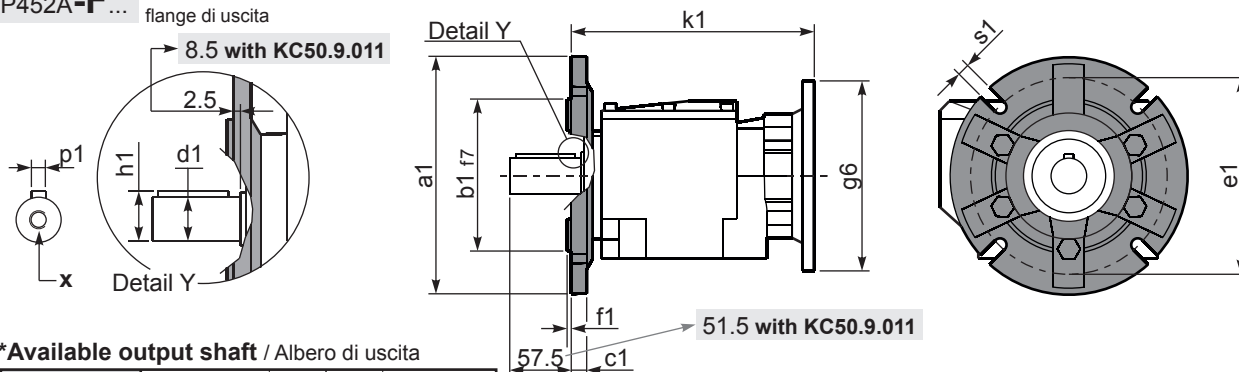
Feet Code	Market reference	G	H	R	L	S	H1	O	ØI	S2 only with motor flange	B5 max. Flange	kit code
B3	312/3	18	110	160	130	190	173	20	11	15 100/112B5 40 132B5	-	KC50.9.024
B4	30/35	20	130	180	149.5	216	193	18	14	20 132B5	-	KC60.9.024
S4	47-57	30	115	135	165	170	178	24	13.5	-	80/90B5	KC50.9.022
H3	023-233	30	130	135	135	185	193	25	14	20 132B5	-	KC50.9.025
M2	52/3	30	110	135+150	100	190	173	18	11	15 100/112B5 40 132B5	-	KC50.9.023
L6	06	19	125	160	106	205	188	8	14	25 132B5	-	KC50.9.026LM
E2	2202/3	13	100	135	192	164	163	6	14	-	71B5	KC50.9.027LM
P4	142	35	142	130	145	160	205	8	14	8 132B5	-	KC50.9.028LM

Other feet are available, see our web site
Sono disponibili altri piedini, consulta il nostro sito web

A see on page bottom

Most popular types
Tipi più diffusi

P452A-F...

Output flanges
flange di uscita

*Available output shaft / Albero di uscita

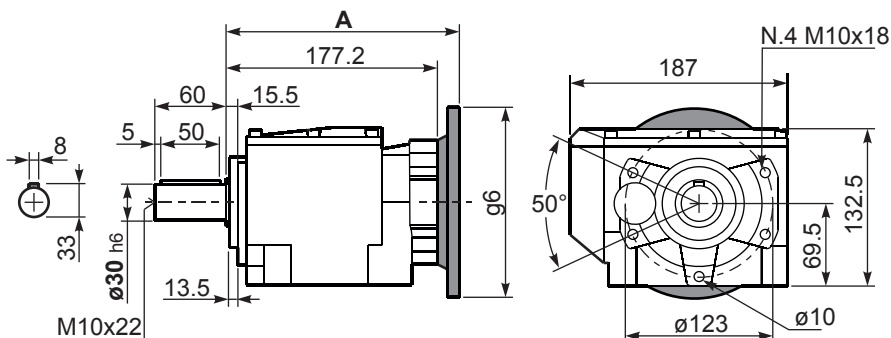
	Shaft - d1	p1	h1	x
Standard	Ø 30x60	8	33	M10x22
On request A richiesta	Ø 24x50	8	27	M8x19
	Ø 25x50	8	28	M8x19
	Ø 28x60	8	31	M8x19
	Ø 35x60	10	38	M10x22

Available output flanges / flange di uscita

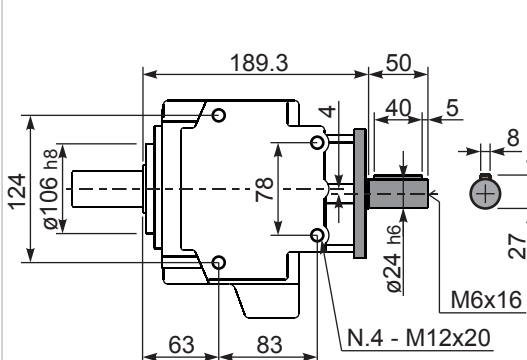
a1 Ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

With flange and feet only on request.
Ask for compatibility

P452A-N...

Basic gearbox
Riduttore base

R452A-N...

Input Shaft
Albero in entrata

B5 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
71 B5	195.7	222	160	198.2	KC023.4.041	204.2
80/90 B5	197.7	242	200	200.2	KC023.4.042	206.2
100/112 B5	206.7	267	250	209.2	KC023.4.043	215.2
132 B5	224.7	292	300	227.2	KC50.4.043	233.2

B14 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
80 B14	197.7	202	120	200.2	KC085.4.046	206.2
90 B14	197.7	212	140	200.2	KC085.4.045	206.2
100/112 B14	206.7	222	160	209.2	KC085.4.047	215.2
132 B14	224.7	242	200	227.2	KC50.4.041	233.2



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges				Output Shaft 	Output Shaft 	Ratios code 
							-C	-D	-E	-F	-G	-R	-T	-U	-V			
							71	80	90	100	112	80	90	100	112			
388	3.61	5.5	127	1.2	6.3	150	B									3018		01
331	4.23	5.5	148	1.1	6.1	170	B									3016		02
279	5.01	5.5	176	1.1	6.1	200	B									3014		03
231	6.07	5.5	213	1.2	6.3	250	B									3012		04
206	6.81	5.5	239	1.3	6.7	300	B									2018		05
176	7.96	5.5	279	1.2	6.3	330	B									2016		07
148	9.45	5.5	331	1.1	5.7	354	B									2014	standard	08
122	11.43	4	293	1.1	4.4	326	B									2012	ø30	09
99	14.21	3	274	0.9	2.7	250	B									2010		10
84	16.62	3	321	1.1	3.3	354	B									1314	ø24	11
70	20.10	2.2	286	1.1	2.5	326	B									1312	ø25	12
57	24.61	2.2	350	0.9	2.0	326	B									1112	ø28	20
56	24.98	1.5	245	1.0	1.5	250	B									1310	ø35	13
47.6	29.41	1.5	288	1.2	1.8	354	B									814	On request	14
39.3	35.58	1.5	349	0.9	1.4	326	B									812		15
34.6	40.50	1.1	290	1.0	1.1	295	B									614		16
31.7	44.23	1.1	316	0.8	0.86	250	B									810		17
28.6	49.00	1.1	351	0.9	1.0	326	B									612		18
23.0	60.90	0.75	299	0.8	0.63	250	B									610		19

The dynamic efficiency is **0.96** for all ratios

*Nel montaggio P la flangia può superare l'ingombro massimo dei piedi. Eventualmente utilizzare la flangia B14

* In the P mounting the B5 motor flange can exceed the foot maximum dimensions. Possibly use the flange B14

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **502A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **502A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **502A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **502A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **502A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
B3	B6	B7	B8	V5	V6	V8
0.45 LT	0.55 LT	1.00 LT	1.10 LT	1.10 LT	1.15 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website

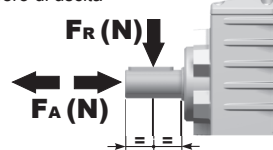
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

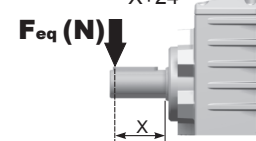
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



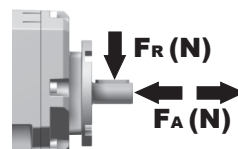
$$F_{eq} = F_R \cdot \frac{54}{X+24}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	460	2300	140	600	3000	70	780	3900
250	480	2400	120	620	3100	40	900	4500
200	520	2600	85	700	3500	15	1000	5000

Input shaft

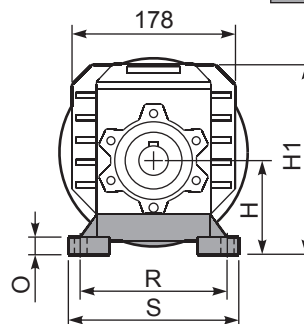
Albero in entrata



n_1	FA	FR
1400	450	2250
900	500	2500
500	600	3000

tab. 2

Gearbox weight peso riduttore	With flange	11.7 kg
	With feet	11.9 Kg



Feet Code	Market reference	G	H	R	L	S	H1	O	Øl	S2 only with motor flange	B5 max. Flange	kit code
B3	312/3	18	110	160	130	190	211.5	20	11	10 100/112B5 35 132B5	-	KC50.9.024
B4	30/35	20	130	180	149.5	216	231.5	18	14	15 132B5	-	KC60.9.024
S4	47-57	30	115	135	165	170	216.5	24	13.5	5 100/112B5 30 132B5	-	KC50.9.022
H3	023-233	30	130	135	135	185	231.5	25	14	15 132B5	-	KC50.9.025
M2	52/3	30	110	135+150	100	190	211.5	18	11	10 100/112B5 35 132B5	-	KC50.9.023
L6	06	19	125	160	106	205	226.5	8	14	20 132B5	-	KC50.9.026LM
E2	2202/3	13	100	135	192	164	201.5	6	14	20 100/112B5 45 132B5	-	KC50.9.027LM
P4	142	35	142	130	145	160	243.5	8	14	3 132B5	-	KC50.9.028LM

 Most popular types
Tipi più diffusi

flange di uscita

Technical drawing of the output shaft assembly. The drawing includes a front view on the left showing a circular flange with a central hole of diameter d_1 and a mounting flange with diameter p_1 . A side view on the right shows the shaft with dimensions a_1 , b_1 , f_1 , c_1 , 57.5 , 51.5 (with KC50.9.011), 5.3 , g_6 , and k_1 . A circular detail view labeled 'Detail Y' shows a cross-section of the shaft with dimensions 8.5 (with KC50.9.011) and 2.5 . The shaft has a central hole of diameter d_1 and a mounting flange with diameter p_1 .

Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	ø 30x60	8	33	M10x22
On request A richiesta	ø 24x50	8	27	M8x19
	ø 25x50	8	28	M8x19
	ø 28x60	8	31	M8x19
	ø 35x60	10	38	M10x22

a1 ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

With flange and feet only on request.
Ask for compatibility

[illegible][illegible]4-16



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges			Output Shaft 	Ratios code 
							-B	-C	-D	-E	-Q	-R	-T		
							63	71	80	90	71	80	90		
35.2	39.79	1.5	382	1.0	1.5	373	B				C	C		191316	01
29.6	47.22	1.1	331	1.1	1.2	354	B				C	C		191314	02
25.6	54.73	1.1	384	0.9	1.0	354	B				C	C		171314	03
21.1	66.22	0.75	318	1.0	0.77	326	B				C	C		171312	04
18.3	76.69	0.75	369	1.0	0.72	354	B				C	C		131314	05
16.7	83.59	0.55	297	1.2	0.66	354	B				C	C		190814	06
15.1	92.78	0.55	329	1.0	0.55	326	B				C	C		131312	07
13.4	104.68	0.55	371	1.0	0.53	354	B				C	C		101314	08
11.9	117.22	0.37	278	1.2	0.43	326	B				C	C		170812	09
11.1	126.65	0.37	300	1.1	0.40	326	B				C	C		101312	10
10.2	136.62	0.37	324	1.1	0.40	354	B				C	C		91314	11
8.5	165.29	0.25	264	1.2	0.31	326	B				C	C		91312	12
7.8	180.40	0.25	289	1.2	0.31	354	B				C	C		71314	13
6.4	218.26	0.25	349	0.9	0.23	326	B				C	C		71312	14
5.8	241.82	0.25	387	0.9	0.23	354	B				C	C		90814	15
4.8	292.57	0.18	358	0.9	0.17	326	B				C	C		90812	16
4.4	319.32	0.18	391	0.9	0.17	354	B				C	C		70814	17
3.6	386.33	0.12	305	1.1	0.13	326	B				C	C		70812	18
2.9	480.16	0.12	380	0.7	0.08	250	B				C	C		70810	19

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **503A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **503A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **503A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

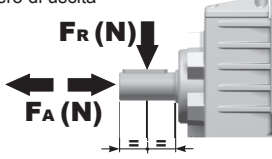
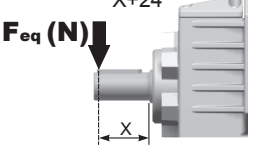
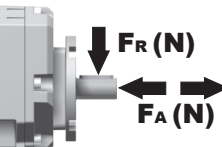
F Le réducteur **503A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **503A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
B3	B6	B7	B8	V5	V6	V8
0.75 LT	0.75 LT	1.05 LT	1.15 LT	1.20 LT	1.20 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

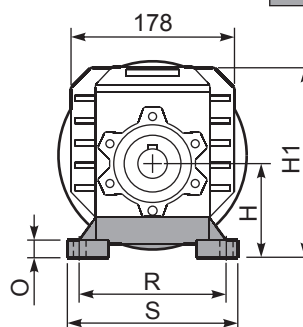
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS								
Output shaft Albero di uscita			$F_{eq} = F_R \cdot \frac{54}{X+24}$					
								
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	460	2300	140	600	3000	70	780	3900
250	480	2400	120	620	3100	40	900	4500
200	520	2600	85	700	3500	15	1000	5000
Input shaft Albero in entrata								
n_1	FA	FR	n_1	FA	FR	n_1	FA	FR
1400	400	2000	900	440	2200	500	440	2200

tab. 2

Gearbox weight	With flange	11.9 kg
peso riduttore	With feet	12.1 Kg



Foot Code	Market reference	G	H	R	L	S	H1	O	øI	S2 only with motor flange	B5 max. Flange	kit code
B3	312/3	18	110	160	130	190	211.5	20	11	-	-	KC50.9.024
B4	30/35	20	130	180	149.5	216	231.5	18	14	-	-	KC60.9.024
S4	47-57	30	115	135	165	170	216.5	24	13.5	-	-	KC50.9.022
H3	023-233	30	130	135	135	185	231.5	25	14	-	-	KC50.9.025
M2	52/3	30	110	135-150	100	190	211.5	18	11	-	-	KC50.9.023
L6	06	19	125	160	106	205	226.5	8	14	-	-	KC50.9.026LM
E2	2202/3	13	100	135	192	164	201.5	6	14	-	-	KC50.9.027LM
P4	142	35	142	130	145	160	243.5	8	14	-	-	KC50.9.028LM

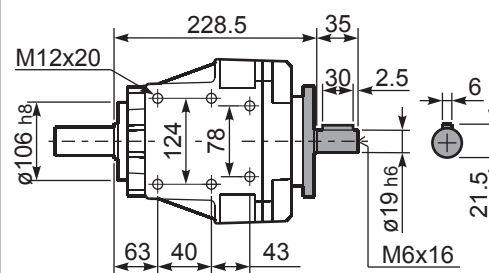
 Most popular types
Tipi più diffusi

Technical drawing of the output shaft assembly for the KC50.9.011 motor. The drawing includes a top view, a side view, and a detailed view of the shaft connection. The top view shows the shaft diameter d_1 and the mounting flange diameter 8.5. The side view shows the shaft length a_1 , the mounting flange thickness b_1 , and the shaft diameter d_1 . The detailed view shows the shaft connection with a key and a nut, with dimensions 57.5, f_1 , c_1 , and 51.5. The drawing is labeled "Available output shaft / Albero di uscita".

	Shaft - d1	p1	h1	x
Standard	ø 30x60	8	33	M10x22
On request A richiesta	ø 24x50	8	27	M8x19
	ø 25x50	8	28	M8x19
	ø 28x60	8	31	M8x19
	ø 35x60	10	38	M10x22

a1 ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

With flange and feet only on request.
Ask for compatibility

[illegible]

B5 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
63 B5	238	227	140	240.5	K063.4.041	246.5
71 B5	236	237	160	238.5	K063.4.042	244.5
80/90 B5	238	257	200	240.5	K063.4.043	246.5



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges				Output Shaft		
							-C	-D	-E	-F	-G	-R	-T	-U	-V			Ratios code
							71	80	90	100	112	132	80	90	100	112		
388	3.61	7.5	171	1.1	7.6	180	B									3018		01
331	4.23	7.5	200	1.1	8.0	220	B									3016		02
279	5.01	7.5	238	1.1	7.9	260	B									3014		03
231	6.07	7.5	288	1.0	7.6	300	B									3012		04
206	6.81	7.5	323	1.1	7.9	350	B									2018		05
176	7.96	7.5	378	1.0	7.1	370	B									2016		07
148	9.45	5.5	331	1.2	6.5	400	B									2014	standard	08
122	11.43	5.5	401	1.0	5.5	415	B									2012	ø35	09
100	14.00	4	359	1.2	4.7	435	B									1316		10
84	16.62	4	426	1.2	4.7	515	B									1314	ø28	11
70	20.10	4	515	1.0	4.0	520	B									1312	ø30	12
57	24.61	3	475	1.1	3.2	520	B									1112	ø38	20
47.6	29.41	2.2	418	1.1	2.3	450	B									814	ø40	14
39.3	35.58	1.85	431	1.2	2.2	520	B									812	On request	15
34.6	40.50	1.1	290	1.1	1.2	320	B									614		16
31.7	44.23	1.5	433	0.9	1.4	400	B									810		17
28.6	49.00	1.1	351	1.1	1.2	400	B									612		18
23.0	60.90	1.1	436	0.9	1.0	400	B									610		19

The dynamic efficiency is **0.96** for all ratios

*Nel montaggio P la flangia può superare l'ingombro massimo dei piedi. Eventualmente utilizzare la flangia B14
* In the P mounting the B5 motor flange can exceed the foot maximum dimensions. Possibly use the flange B14

A Motor Flanges Available
Flange Motore Disponibili

B Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **602A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **602A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **602A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **602A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **602A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
B3	B6	B7	B8	V5	V6	V8
0.55 LT	0.85 LT	1.10 LT	1.20 LT	1.20 LT	1.25 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

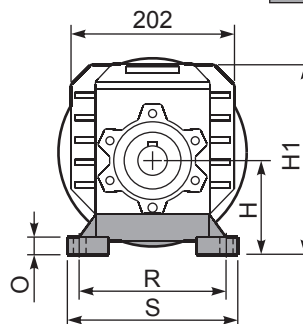
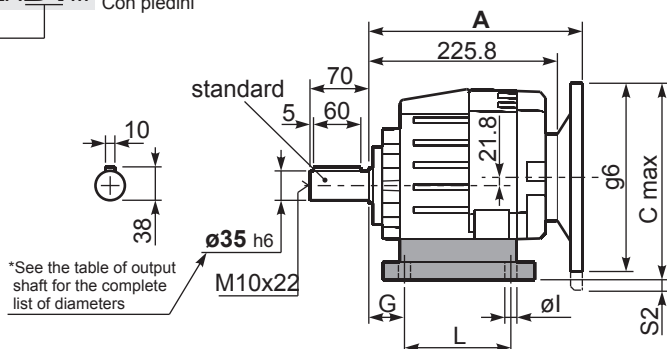
tab. 1

RADIAL AND AXIAL LOADS									
Output shaft Albero di uscita					$F_{eq} = F_R \cdot \frac{60.5}{X+25.5}$				
n_2	F_A	F_R	n_2	F_A	F_R	n_2	F_A	F_R	
300	560	2800	140	740	3700	70	890	4200	
250	600	3000	120	760	3800	40	1160	5800	
200	640	3200	85	840	4000	15	1300	6500	
Input shaft Albero in entrata									
n_1	F_A	F_R	n_1	F_A	F_R	n_1	F_A	F_R	
1400	450	2250	900	500	2500	500	600	3000	

tab. 2

P602A **B1** ...

Gearbox weight peso riduttore	With flange	14.1 kg
	With feet	14.5 kg



Feet / piedini

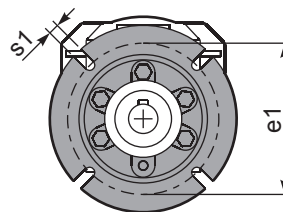
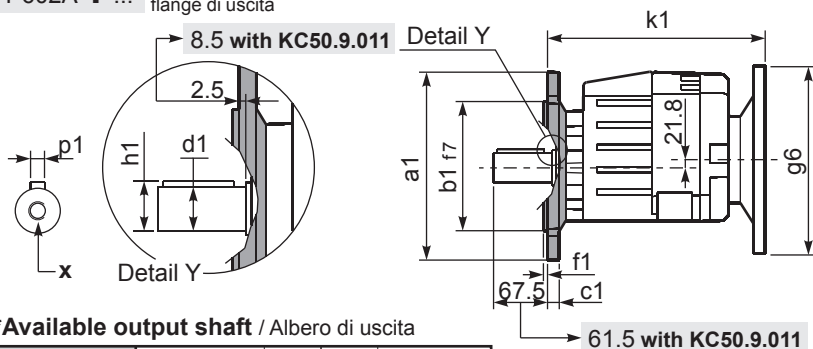
Feet Code	Market reference	G	H	R	L	S	H1	O	Øl	S2 only with motor flange	B5 max. Flange	kit code
B4	412/3	20	130	180	149.5	216	233	18	14	-	-	KC60.9.024
S4	47-57	30	115	135	165	170	218	24	13.5	13 132B5	-	KC50.9.022
M3	62/3	35	120	170±185	110	230	223	20	14	8 132B5	-	KC60.9.023
S7	77	35	140	170	205	204	243	8	14	-	-	KC60.9.029LM
H4	024-243	35	155	170	150	225	258	30	14	-	-	KC60.9.025
L6	06	19	125	160	106	205	228	8	14	3 132B5	-	KC50.9.026LM
E3	2302/3	19.5	125	170	240	205	228	8	14	-	100/112B5	KC60.9.026LM
P6	162	40	162	160	205	200	265	8	14	-	-	KC60.9.027LM
B5	352/3	23.5	115	170	130	205	218	8	14	13 132B5	-	KC60.9.021LM

Other feet are available,
see our web site
Sono disponibili altri piedini,
consulta il nostro sito web

A see on page bottom

 Most popular types
Tipi più diffusi

P602A-F... Output flanges
flange di uscita



***Available output shaft** / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	ø 35x70	10	38	M10x22
On request A richiesta	ø 28x60	8	31	M8x20
	ø 30x60	8	33	M10x22
	ø 38x70	10	41	M10x25
	ø 40x80	12	43	M12x28

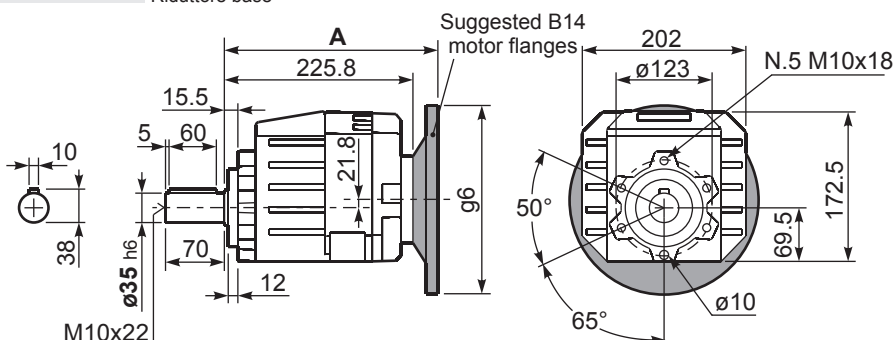
Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

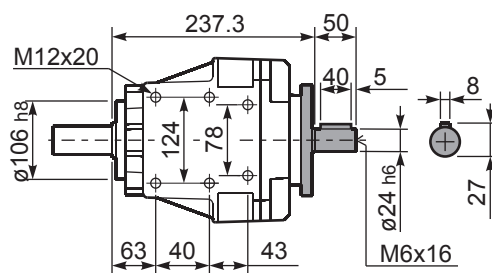
With flange and feet only on request.
Ask for compatibility

With flange and feet
only on request.
Ask for compatibility

P602A-N...	Basic gearbox Riduttore base
------------	---------------------------------



R602A-N... Input Shaft
Albero in entrata



B5 Motor Flanges	A	C_{max}	g6	k1	kit code	k1 with KC50.9.011
71 B5	244.3	263.8	160	246.8	KC023.4.041	252.8
80/90 B5	246.3	283.8	200	248.8	KC023.4.042	254.8
100/112 B5	255.3	308.8	250	257.8	KC023.4.043	263.8
132 B5	273.3	333.8	300	275.8	KC50.4.043	281.8



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges			Output Shaft 	Ratios code
							-B	-C	-D	-E	-Q	-R	-T		
							63	71	80	90	71	80	90		
35.2	39.79	1.5	382	1.1	1.7	434	B				C	C		191316	05
29.6	47.22	1.5	453	1.1	1.7	515	B				C	C		191314	06
25.6	54.73	1.5	525	1.0	1.5	515	B				C	C		171314	07
24.5	57.13	1.5	548	0.9	1.4	520	B				C	C		191312	08
21.1	66.22	1.1	464	1.1	1.2	520	B				C	C		171312	09
19.7	71.01	1.1	498	0.9	0.96	435	B				C	C		191310	10
18.3	76.69	1.1	538	1.0	1.0	515	B				C	C		131314	11
17.0	82.30	0.75	396	1.1	0.82	435	B				C	C		171310	12
16.7	83.59	0.75	402	1.1	0.82	440	B				C	C		190814	13
15.1	92.78	0.75	446	1.2	0.87	520	B				C	C		131312	14
13.4	104.68	0.75	503	1.0	0.77	515	B				C	C		101314	15
11.9	117.22	0.75	564	0.9	0.69	520	B				C	C		170812	16
11.1	126.65	0.55	449	1.2	0.64	520	B				C	C		101312	17
10.3	135.74	0.55	482	0.9	0.51	440	B				C	C		130814	18
9.6	145.68	0.37	346	1.3	0.47	435	B				C	C		170810	19
8.9	157.40	0.37	373	1.2	0.43	435	B				C	C		101310	20
8.5	165.29	0.37	392	1.3	0.49	520	B				C	C		91312	21
7.6	185.29	0.37	439	1.0	0.37	440	B				C	C		100814	22
6.8	205.43	0.37	487	0.9	0.33	435	B				C	C		91310	23
6.2	224.18	0.37	532	1.0	0.36	520	B				C	C		100812	24
5.8	241.82	0.25	387	1.1	0.28	440	B				C	C		90814	25
5.0	278.62	0.25	446	1.0	0.24	435	B				C	C		100810	26
4.8	292.57	0.25	468	1.1	0.28	520	B				C	C		90812	27
3.9	363.63	0.18	445	1.0	0.19	435	B				C	C		90810	28

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **603A** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary. See table 1 for lubrication and recommended quantity. In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **603A** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione. Vedi tab.1 per oli e quantità consigliati. In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **603A** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert. In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben. In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **603A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien. Voir tableau 1 concernant les huiles et les quantités conseillées. Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **603A** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
B3	B6	B7	B8	V5	V6	V8
0.75 LT	0.90 LT	1.15 LT	1.25 LT	1.30 LT	1.35 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website

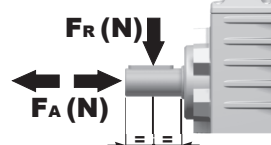
tab. 1

Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

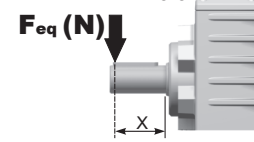
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



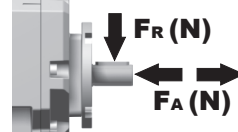
$$F_{eq} = FR \cdot \frac{60.5}{X+25.5}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	560	2800	140	740	3700	70	890	4200
250	600	3000	120	760	3800	40	1160	5800
200	640	3200	85	840	4000	15	1300	6500

Input shaft

Albero in entrata



n_1	FA	FR
1400	400	2000
900	440	2200
500	440	2200

tab. 2

Gearbox weight	With flange	14.3 kg
peso riduttore	With feet	14.7 Kg



Feet Code	Market reference	G	H	R	L	S	H1	O	Øl	S2 only with motor flange	B5 max. Flange	kit code
B4	412/3	20	130	180	149.5	216	233	18	14	-	-	KC60.9.024
S4	47-57	30	115	135	165	170	218	24	13.5	-	-	KC50.9.022
M3	62/3	35	120	170-185	110	230	223	20	14	-	-	KC60.9.023
S7	77	35	140	170	205	204	243	8	14	-	-	KC60.9.029LM
H4	024-243	35	155	170	150	225	258	30	14	-	-	KC60.9.025
L6	06	19	125	160	106	205	228	8	14	-	-	KC50.9.026LM
E3	2302/3	19.5	125	170	240	205	228	8	14	-	-	KC60.9.026LM
P6	162	40	162	160	205	200	265	8	14	-	-	KC60.9.027LM
B5	352/3	23.5	115	170	130	205	218	8	14	-	-	KC60.9.021LM

 Most popular types
Tipi più diffusi

Technical drawing of the KC50.9.011 motor. The drawing includes a front view (left) and a side view (right). The front view shows a circular motor body with a central shaft. Dimensions include: $p1$ (shaft diameter), x (shaft length), $h1$ (total height), $d1$ (base diameter), and 2.5 (base thickness). The side view shows the motor's profile with dimensions: $k1$ (total length), $a1$ (height to base), $b1$ (height to shaft center), $f7$ (shaft diameter), 15.5 (base thickness), $g6$ (flange diameter), $f1$ (flange thickness), $c1$ (base width), and 67.5 (base height). A circular inset labeled 'Detail Y' provides a magnified view of the base and shaft connection area, showing a dimension of 8.5 with KC50.9.011.

***Available output shaft** / Albero di uscita

61.5 with KC50.9.011

***Available output shaft / Albero di uscita**

	Shaft - d1	p1	h1	x
Standard	ø 35x70	10	38	M10x22
On request A richiesta	ø 28x60	8	31	M8x20
	ø 30x60	8	33	M10x22
	ø 38x70	10	41	M10x25
	ø 40x80	12	43	M12x28

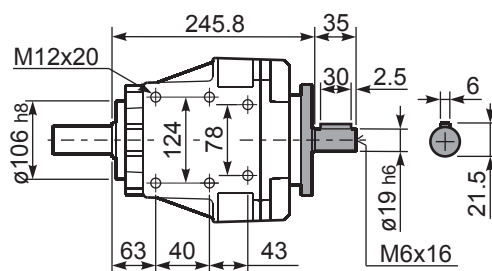
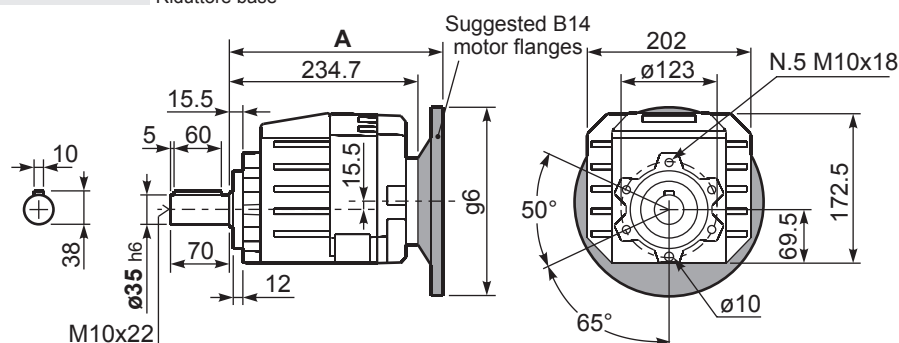
Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

With flange and feet only on request.
Ask for compatibility

With flange and feet
only on request.
Ask for compatibility

R603A-N... Input Shaft
Albero in entrata

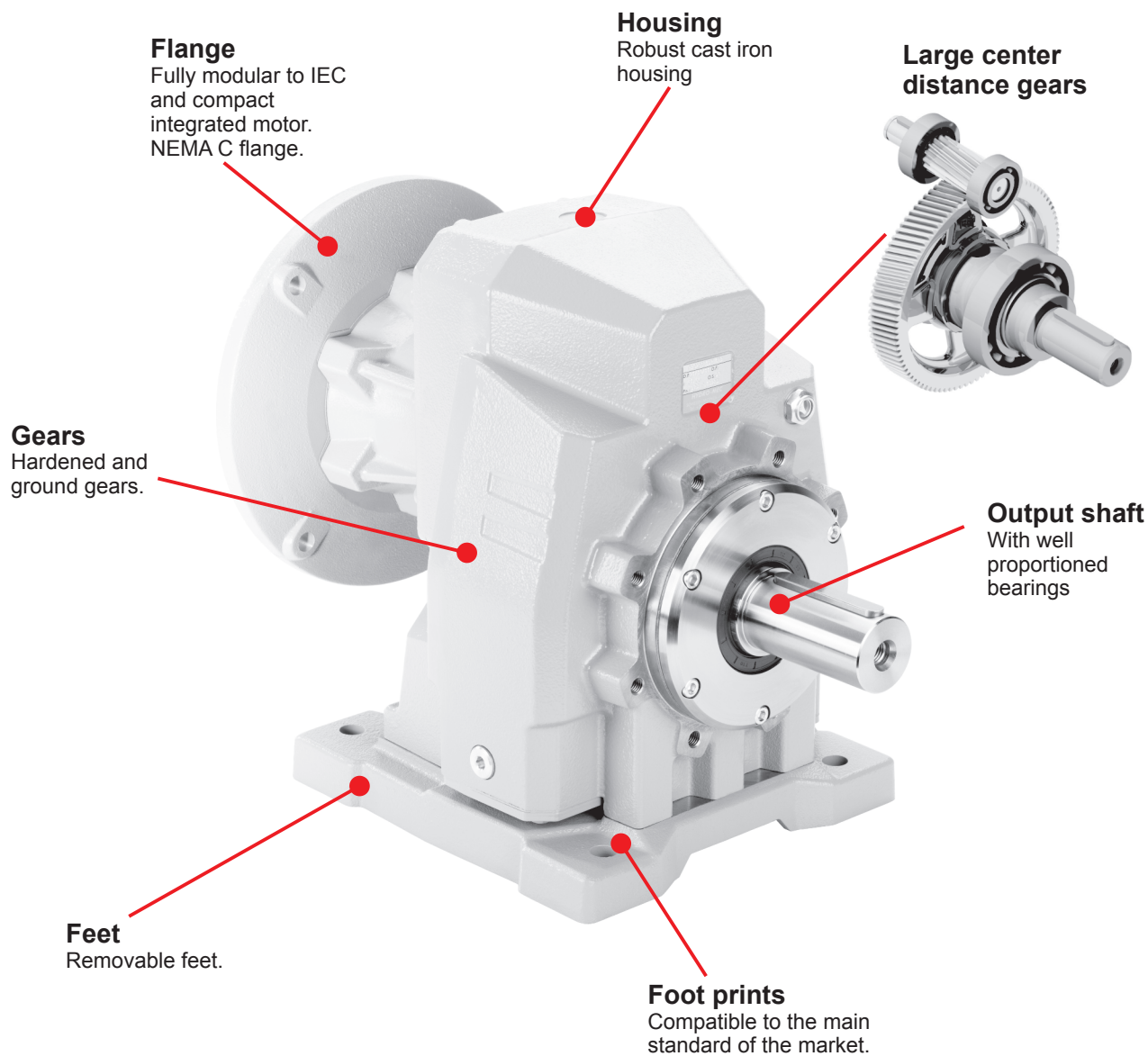


B5 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
63 B5	255.2	247.5	140	257.7	K063.4.041	263.7
71 B5	253.2	257.5	160	255.7	K063.4.042	261.7
80/90 B5	255.2	277.5	200	257.7	K063.4.043	263.7

B14 Motor Flanges	A	C_{max}	g6	k1	kit code	k1 with KC50.9.011
71 B14	253.2	230	105	255.7	K063.4.047	261.7
80 B14	255.2	237.5	120	257.7	K063.4.046	263.7
90 B14	255.2	247.5	140	257.7	K063.4.041	263.7

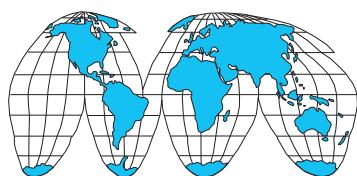
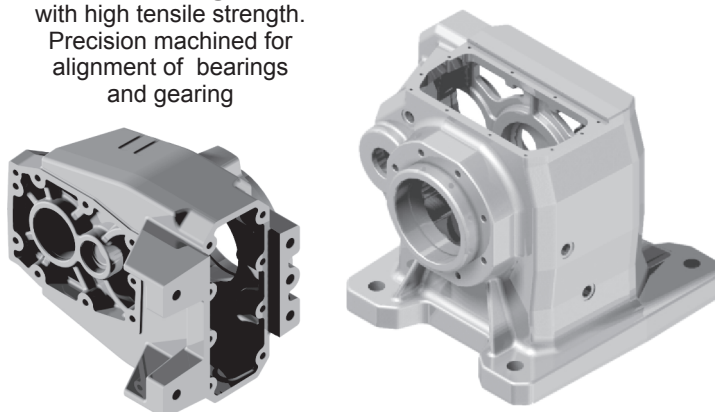
Cast iron in line gearboxes

A modular and compact product



Single-piece Cast Iron housing

with high tensile strength.
Precision machined for alignment of bearings and gearing

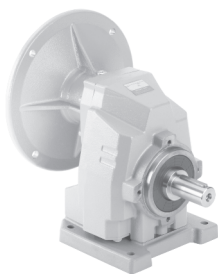


World wide sales network.

Specific type datasheet on page...

On page / A pagina / Auf Seite / À la page / En la página

1 Stage

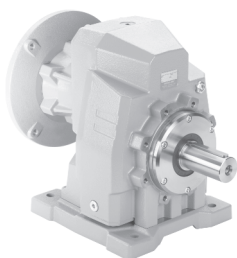


Types / Tipi
Tipen / Types
Tipos

5-5	5-11	5-17	5-23	5-29
501C 225Nm	701C 380Nm	801C 670Nm	851C 700Nm	901C 1175Nm

On page / A pagina / Auf Seite / À la page / En la página

2 and 3 Stages

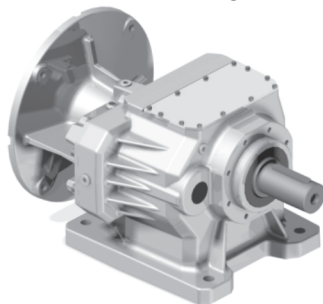


Types / Tipi
Tipen / Types
Tipos

5-7	5-9	5-13	5-15	5-19	5-21	5-25	5-27	5-31	5-33
502C 320Nm	503C 320Nm	702C 675Nm	703C 675Nm	802C 900Nm	803C 900Nm	852C 1600Nm	853C 1800Nm	902C 2100Nm	903C 2100Nm

On page / A pagina / Auf Seite / À la page / En la página

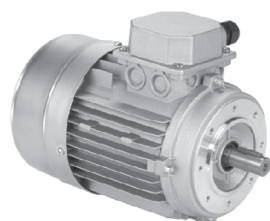
2 and 3 Stages



Types / Tipi
Tipen / Types
Tipos

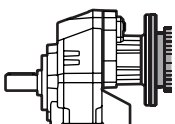
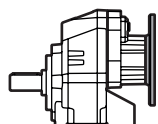
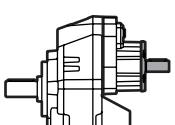
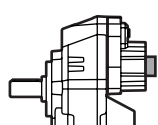
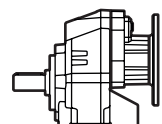
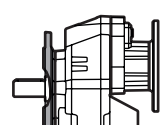
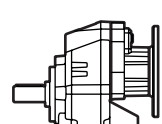
5-35	5-37	5-39	5-41
1002 2900Nm	1003 3000Nm	1102 4500Nm	1103 4600Nm

On page / A pagina / Auf Seite / À la page / En la página



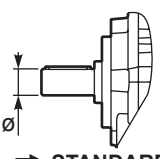
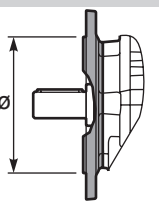
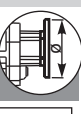
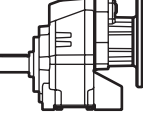
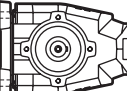
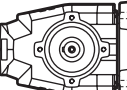
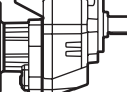
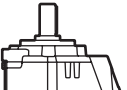
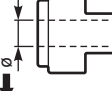
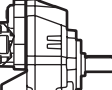
Types / Tipi
Tipen / Types
Tipos

M-1										
56A 56B	63A 63B	71A 71B	80A 80B	90S 90L	100LA 100LB	112M	132S 132M	160M 160L	180M 180L	

Type - Tipo - Typ Type - Tipo	Size - Grandezza - Grösse Taille - Tomafio	Mounting - Montaggio Montage - Fixation Tipo de montaje	Ratio - Rapporto Untersetzung Reduction Relación																																													
P	702C	-F	6.57																																													
Cast iron coaxial gear boxes Riduttori coassiali in Ghisa  With IEC motor M  With motor flange P  With male input shaft R  Modular base B Not available for: 701C, 801C, 851C, 901C, 852C, 902C, 1002 , 1102, 1003 , 1103 . 1 Stage Riduzione Stufe Trains Etapas 501C 701C 801C 851C 901C 2 Stages Riduzioni Stufen Trains Etapas 502C 702C 802C 852C 902C 1002 1102 3 Stages Riduzioni Stufen Trains Etapas 503C 703C 803C 853C 903C 1003 1103  Without flange / feet -N  Output flange mounted -F  Mounted feet B.. Feet / piedini <table><tr><th>Feet Code</th><th>Market reference</th><th>G</th><th>H</th><th>R</th><th>L</th></tr><tr><td>B1</td><td>112</td><td>18</td><td>85</td><td>110</td><td></td></tr><tr><td>B2</td><td>212/3</td><td>18</td><td>100</td><td>130</td><td></td></tr><tr><td>S1</td><td>17</td><td>18</td><td>75</td><td>110</td><td></td></tr><tr><td>S2</td><td>27</td><td>25</td><td>90</td><td></td><td></td></tr><tr><td>M1</td><td>42/3</td><td>25</td><td>80</td><td></td><td></td></tr><tr><td>L4</td><td>04</td><td>13</td><td>80</td><td></td><td></td></tr><tr><td>L5</td><td>05</td><td>16</td><td>100</td><td></td><td></td></tr></table> You see feet code in the chart of the dimensions Vedi codice piede nella tabella delle dimensioni See technical data table Vedi tabella dati tecnici. Technisches Datenblatt beachten Voir Tableau données techniques Ver tabla datos técnicos	Feet Code	Market reference	G	H	R	L	B1	112	18	85	110		B2	212/3	18	100	130		S1	17	18	75	110		S2	27	25	90			M1	42/3	25	80			L4	04	13	80			L5	05	16	100		
Feet Code	Market reference	G	H	R	L																																											
B1	112	18	85	110																																												
B2	212/3	18	100	130																																												
S1	17	18	75	110																																												
S2	27	25	90																																													
M1	42/3	25	80																																													
L4	04	13	80																																													
L5	05	16	100																																													



On request we can deliver our products according to the ATEX
A richiesta possiamo fornire i nostri prodotti secondo le normative ATEX
Auf Anfrage können wir unsere Produkte den Richtlinien ATEX entsprechend liefern
Sur demande nos produits peuvent se conformer à la réglementation ATEX
A pedido, se pueden enviar nuestros productos de acuerdo con las normas ATEX.

Output shaft Albero uscita Abtriebswelle Arbre de sortie Eje en salida	Output flange Flangia uscita Ausgangsflansch Bride de sortie Brida en salida	Motor size - Grandezza motore Motor Grösse Grandeur moteur - Tamaño motor	Terminal box position Posizione morsetti Klemmkastenlage Position boîte à bornes Posición caja de bornes	Mounting position Posizione montaggio Einbaulage Position de montage Posición de montaje	Coupling Giunto Kupplung Joint Juntura
H	4	-F	B	B3	-
 → STANDARD 501C 502C 503C H → Ø30 I → Ø35 701C 702C 703C I → Ø35 L → Ø38 M → Ø40 801C 802C 803C M → Ø40 P → Ø50 851C 852C 853C P → Ø50 J → Ø60 901C 902C 903C P → Ø50 J → Ø60 1002 1003 J → Ø60 1102 1103 A → Ø70	 → STANDARD N Senza flangia Without flange 501C 502C 503C 3 → Ø160 4 → Ø200 5 → Ø250 701C 702C 703C 4 → Ø200 5 → Ø250 801C 802C 803C 5 → Ø250 6 → Ø300 851C 852C 853C 6 → Ø300 7 → Ø350 901C 902C 903C 1002 1003 6 → Ø300 7 → Ø350 8 → Ø450 1102 1103 7 → Ø350 8 → Ø450	 Flange Flangia B5 -A=56 (Ø120) -B=63 (Ø140) -C=71 (Ø160) -D=80 (Ø200) -E=90 (Ø200) -F=100÷112 (Ø250) -G=132 (Ø300) -H=160 (Ø350) -I=180 (Ø350) -L=200 (Ø400) CA=225 (Ø450) B14 -O=56 (Ø80) -P=63 (Ø90) -Q=71 (Ø105) -R=80 (Ø120) -T=90 (Ø140) -U=100÷112 (Ø160) -V=132 (Ø200)  Type R Tipo R 503C -1 → Ø14 502C 703C 803C -2 → Ø19 702C 802C 853C 903C -3 → Ø24 852C 902C 1003 1103 -4 → Ø28 1002 1102 -6 → Ø42	 A  B STANDARD  C  D	 B3 STANDARD  B6  B7  B8  V5  V6  V8	- Nothing indication: standard bore Nessuna indicazione: foro standard COUPLING  A = 9mm B = 11mm C = 14mm D = 19mm E = 24mm F = 28mm 0 Without coupling Senza giunto 

POTENZA RICHIESTA / REQUIRED POWER / ERFORDERLICHE LEISTUNG / PUISSANCE NECESSAIRE / POTENCIA NECESARIA

Lifting / sollevamento / hubantriebe / levage / elevación

$$P [KW] = \frac{M [Kg] \cdot g [9.81] \cdot v [m / s]}{1000}$$

Rotation / rotazione / drehung / rotation / rotation

$$P [KW] = \frac{M [Nm] \cdot n [rpm]}{9550}$$

Linear movement / traslazione / linearbewegung / translation / translacion

$$P [KW] = \frac{F [N] \cdot v [m / s]}{1000}$$

TORQUE / COPPIA / DREHMOMENT / COUPLE / PAR

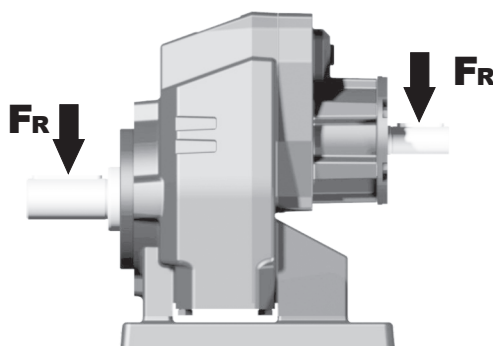
$$M [Nm] = \frac{9550 \cdot P[KW]}{n [rpm]}$$

$$M [lb in] = \frac{63030 \cdot P[HP]}{n [rpm]}$$

5

RADIAL LOADS / CARICHI RADIALI / RADIALE - UND AXIALLASTEN / CHARGES RADIALES / CARGA RADIAL Y AXIAL

- Radial load generated by external transmissions keyed onto input and/or output shafts.
- Forza radiale generata da organi di trasmissione calettati sugli alberi di ingresso e/o uscita.
- Belastungen der Antriebs- bzw. Abtriebswellen durch von aussen eingebrachte Radiallasten.
- Charge radiale générée par la transmissions calés sur les entrées et / ou des arbres de sortie
- Cargas radiales, generada por transmisiones externas, aplicadas sobre los ejes de entrada y/o salida



$F_R [N] = \frac{M [Nm] \cdot 2000}{d [mm]} \cdot f_k$		$F_R [N] = \frac{M [lb in] \cdot 8.9}{d [in]} \cdot f_k$	
M	Momento torcente / Output torque / Abtriebsdrehmoment / Couple / Par torsion		
d	Diametro primitivo / Diam. of driving element / Durchmesser der Abtriebseinheit / Diamètre primitif / Diámetro primitivo		
f_k	Coefficiente di trasformazione / Factor / Faktor / Coefficient de transmission / Coeficiente de transmisión 1.15 Ingranaggi / Gearwheels / Zahnrad / Engrenage / Engranaje 1.25 Catena / Chain sprockets / Antriebskette / Chaîne / Cadena 1.75 Cinghia Trapezoidale / Narrow v-belt pulley / Keilriemen / Courroie trap. / Correa trapezoidal 2.50 Cinghia piatta / Flat-belt pulley / Flachzahnriem. / Courroie crantée / Correa plana		

- If your application requires higher radial loads, contact our technical office. Higher load may be possible.
- Nel caso la vostra applicazione richieda carichi radiali superiori consultare il nostro ufficio tecnico, valori maggiori possono essere accettati.
- Wenn Ihre Anwendung höhere Radialbelastungen erfordert, so wenden Sie sich bitte an unser technischen Büro.
- Si votre application demande des charges radiales supérieures, s'adresser à notre bureau technique.
- En el caso en que una aplicación exija una carga radial superior a la especificada en el catálogo, consultar a nuestra oficinas técnica.

How to select a gearbox / Come selezionare un riduttore / Wie wählt man ein Getriebe
Comment sélectionner un réducteur / Cómo seleccionar un reductor

B Output speed
Velocità in uscita
Abtriebsdrehzahl
Vitesse de sortie
Velocidad de salida

Nominal power
Potenza nominale
Max. mögliche Leistung
Puissance nominale
Potencia nominal

A Nominal torque
Momento torcente nominale
Nenn Drehmoment
Couple nominal
Par de torsión nominal

Flange code
Codice flangia
Flanschtype
Code bride
Código bridas

Input speed
Velocità in entrata
Eintriebsdrehzahl
Vitesse en entrée
Velocidad de entrada

Gear size
Grandezza riduttore
Getriebegröße
Taille réducteur
Tamaño reductor

Motor power
Potenza motore
Motorleistung
Puissance moteur
Potencia motor

702C

Coaxial - Gear
675Nm

Rating - Cast Iron COAXIAL GEARBOXES

QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges				Output Shaft	Notes
							-C	-D	-E	-F	-G	-R	-T	-U	-V		
213	6.57	7.5	312	1.2	8.8	380	B									3018	01
185	7.56	7.5	359	1.1	7.9	390	B									3016	02
159	8.82	7.5	419	1.0	7.1	410	B									3014	03
113	12.39	7.5	588	1.0	7.2	580	B									2018	04
98	14.24	5.5	499	1.2	6.4	600	B									2016	05

C Ratio
Rapporto
Untersetzung
Rapport de réduction
Relación

Transmitted torque
Momento torcente trasmesso
Mögliche Drehmomente
Couple de sortie
Par transmitido

Service factor
Fattore di servizio
Betriebsfaktor
Facteur de service
Factor de servicio

Output shaft diam.
Diam. albero uscita
Durchmesser abtriebswelle
Diametre arbre lent
Diametro eje de salida

Notes
Note
Anmerkungen
Note
Notas

fs		Oper. hours per day Ore di funz. giorn.		
Type of load and starts per hour Tipo di carico e avviamenti per ora		3 h	10 h	24 h
Continuous or intermittent appl. with start / hour Applicazione cont. o interm. con n.ro operazioni/ora	Uniform / Uniforme	0.8	1	1.25
	Moderate / Moderato	1	1.25	1.5
	Heavy / Forte	1.25	1.5	1.75
Intermittent application with start / hour Applicazione intermittente con n.ro operazioni/ora	Uniform / Uniforme	1	1.25	1.5
	Moderate / Moderato	1.25	1.5	1.75
	Heavy / Forte	1.5	1.75	2.15

D	Motor flange available Flange disponibili Erhältliche Motorflansche Bridas disponibles Bridas disponibles
B)	Mounting with reduction ring Montaggio con boccia di riduzione Reduzierhülsen Montage avec douille de réduction Montaje con casquillo de reducción
C)	Motor flangeholes position/terminal box position Posizione fori flangia/basetta motore Bohrungsposition am Motorflansch/-sockel Position trous bride/barrette à bornes moteur Posición agujeros brida / base motor
B)	Available without reduction bushes Disponibile anche senza boccia Auch ohne Reduzierbuchse verfügbar Disponible aussi sans douille de réduction Disponible tambien sin casquillo

A	Select required torque (according to service factor)	Seleziona la coppia desiderata (comprensiva del fattore di servizio)	Max. Drehmoment in Bezug zum Betriebsfaktor	Sélectionner le couple souhaité (comprenant le facteur de service)	Seleccionar el par deseado (incluyendo el factor de servicio)
B	Select output speed	Seleziona la velocità in uscita	Ausgewählte Abtriebsdrehzahl	Sélectionner la vitesse de sortie	Seleccionar la velocidad de salida
C	On the same line of selected geared motor, you can find the gear ratio	Sulla riga corrispondente alla motorizzazione prescelta si può rilevare il rapporto di riduzione	Auf der gleichen Linie wie die ausgewählte Motorleistung steht auch die Getriebeuntersetzung	Sur la ligne correspondante à la motorisation pré-choisie on peut relever le rapport de réduction	En la línea correspondiente al motor preseleccionado es posible encontrar la relación de reducción
D	Select motor flange available (if requested)	Scegli la flangia disponibile (se richiesta)	Erhältliche Motorflansche (auf Anfrage)	Choisir la bride disponible (si elle est demandée)	Seleccionar la brida disponible (sobre pedido)



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges			Available B14 motor flanges			Output Shaft 	Output Shaft 	Ratios code 
							-D	-E	-F	-R	-T	-U			
							80	90	100 112	80	90	100 112			
481	2.91	4	76	1.8	7.2	140	B	B		B	B		3499	standard	01
373	3.75	4	98	1.6	6.4	160	B	B		B	B		28105	ø30	02
263	5.33	4	140	1.2	4.8	170	B	B		B	B		21112		03
219	6.39	4	167	1.0	4.0	170	B	B		B	B		18115	ø35	04
178	7.85	4	205	1.1	4.3	225	B	B		B	B		13102	On request	05

The dynamic efficiency is **0.98** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **501C** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **501C** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **501C** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **501C** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **501C** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
1.25 LT	0.80 LT	0.80 LT	0.70 LT	1.40 LT	0.80 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website

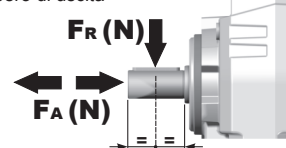
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

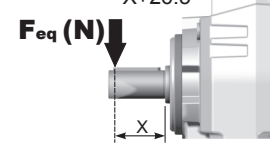
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



$$F_{eq} = F_R \cdot \frac{56.5}{X+26.5}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	500	2500	140	640	3200	70	820	4100
250	540	2700	120	680	3400	40	1020	5100
200	580	2900	85	760	3800	15	1100	5500

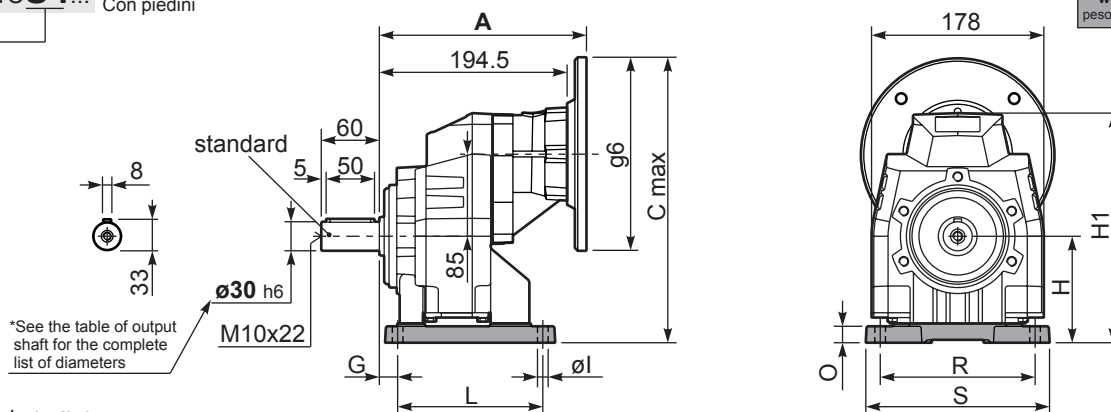
On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

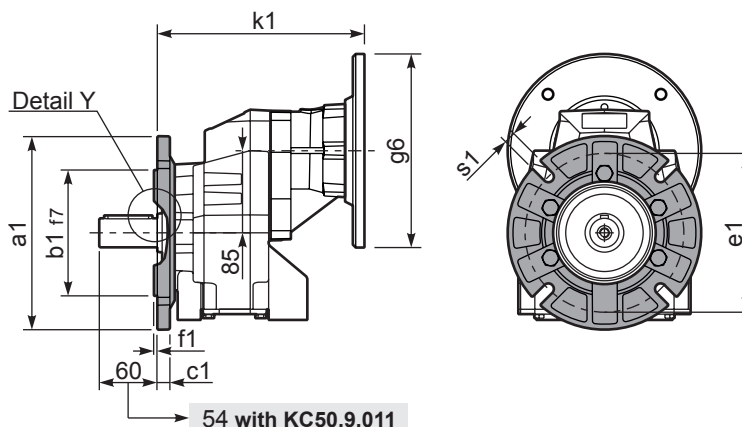
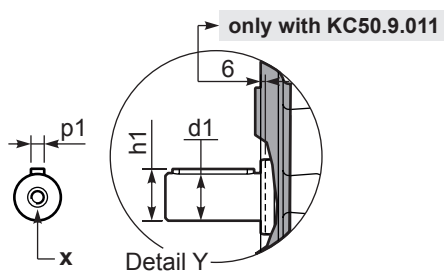
tab. 2

With feet
Con piedini

Gearbox weight peso riduttore	With flange	20.0 kg
	With feet	22.0 kg

[illegible]

Output flanges
flange di uscita

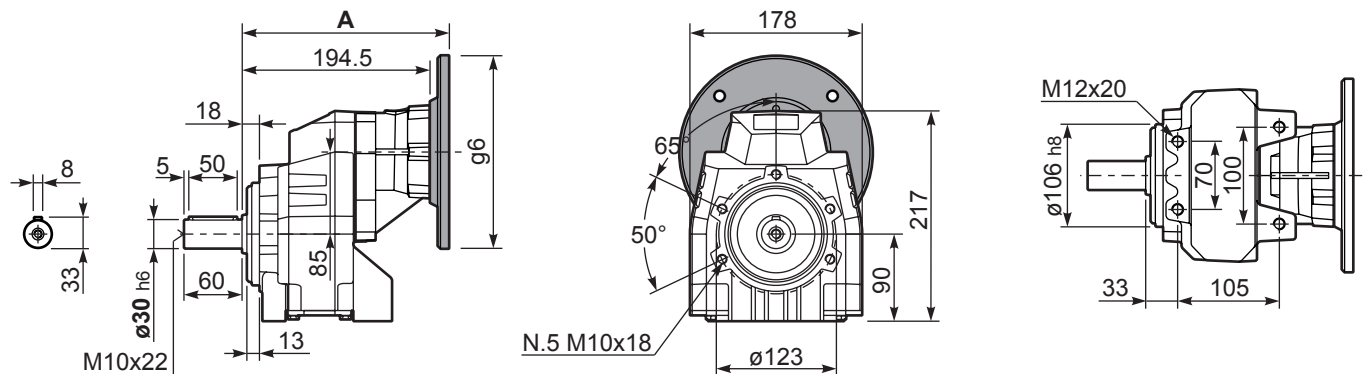


	Shaft - d1	p1	h1	x
Standard	ø 30x60	8	33	M10x22
On request A richiesta	ø 35x70	10	38	M10x22
	-	-	-	-

a1 Ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

With flange and feet only on request.
Ask for compatibility.

Basic gearbox
Riduttore base



B14 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
80 B14	215	260	120	215	KC085.4.046	221
90 B14	215	270	140	215	KC085.4.045	221
100/112 B14	224	280	160	224	KC085.4.047	230



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges					Output Shaft 	Ratios code
							-B	-C	-D	-E	-F	-Q	-R	-T	-U			
							63	71	80	90	100 112	71	80	90	100 112			
167	8.38	4	215	1.0	4.1	225	B					C	C			2821	standard ø30	01
139	10.04	3	194	1.2	3.7	240	B					C	C			2818		02
114	12.33	3	238	1.1	3.2	260	B					C	C			2813		03
92	15.16	2.2	215	1.2	2.6	260	B					C	C			1921		04
80	17.57	2.2	250	1.1	2.3	270	B					C	C			1721		05
77	18.16	2.2	258	1.1	2.4	290	B					C	C			1918		06
67	21.05	2.2	299	1.1	2.3	320	B					C	C			1718		07
63	22.30	2.2	317	1.0	2.2	320	B					C	C			1913		08
57	24.70	1.5	242	1.3	2.0	320	B					C	C			1518		09
54	25.85	1.5	253	1.3	1.9	320	B					C	C			1713		10
47.5	29.49	1.5	289	1.1	1.7	320	B					C	C			1318	On request ø35	11
46.1	30.34	1.5	297	1.1	1.6	320	B					C	C			1513		12
41.7	33.60	1.1	240	1.0	1.1	250	B					C	C			1021		13
38.7	36.21	1.1	259	1.2	1.3	320	B					C	C			1313		14
34.8	40.25	1.1	288	1.0	1.1	300	B					C	C			1018		15
28.3	49.43	1.1	354	0.9	0.99	320	B					C	C			1013		16
26.7	52.53	0.75	258	1.0	0.76	260	B					C	C			918		17
21.7	64.51	0.75	317	1.0	0.75	315	B					C	C			913		18
20.2	69.37	0.37	168	1.1	0.42	190	B					C	C			718		19
16.4	85.19	0.37	206	1.1	0.41	230	B					C	C			713		20

The dynamic efficiency is **0.96** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **502C** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **502C** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **502C** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **502C** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **502C** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

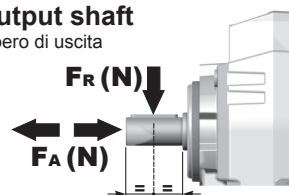
Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
B3	B6	B7	B8	V5	V6	V8
1.25 LT	0.80 LT	0.80 LT	0.70 LT	1.40 LT	0.80 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website **tab. 1**
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

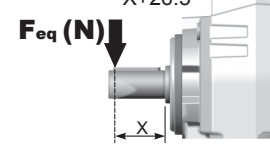
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



$$F_{eq} = F_R \cdot \frac{56.5}{X+26.5}$$



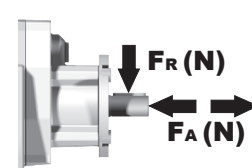
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	500	2500	140	640	3200	70	820	4100
250	540	2700	120	680	3400	40	1020	5100
200	580	2900	85	760	3800	15	1100	5500

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

Input shaft

Albero in entrata

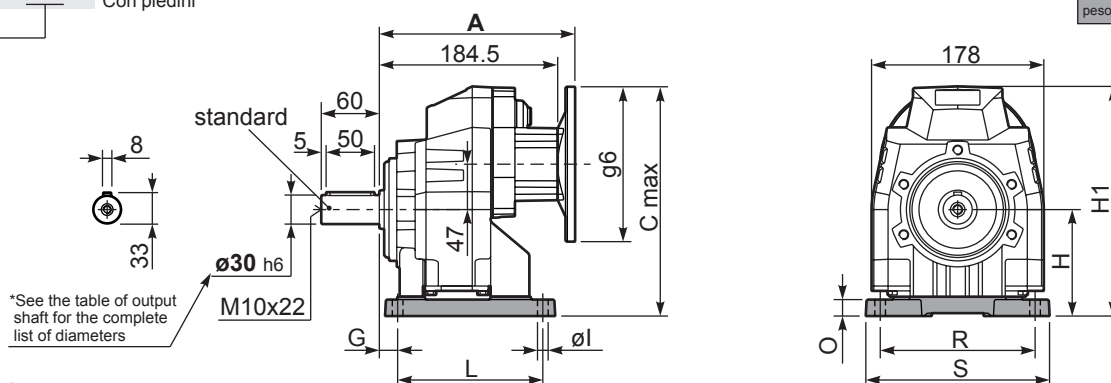


n_1	FA	FR
1400	240	1200
900	280	1400
500	340	1700

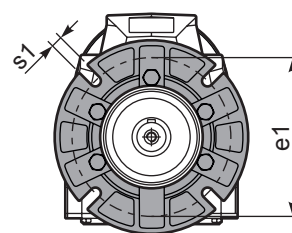
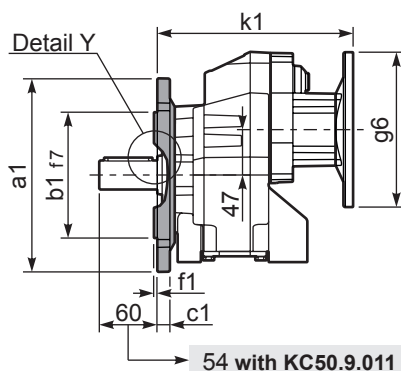
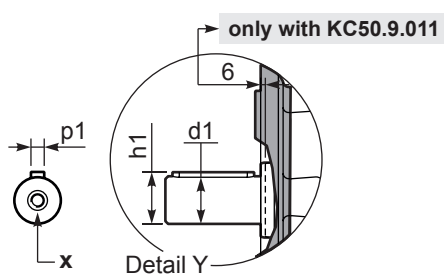
tab. 2

With feet
Con piedini

Gearbox weight peso riduttore	With flange	15.0 kg
	With feet	17.0 kg

[illegible]

Output flanges
flange di uscita

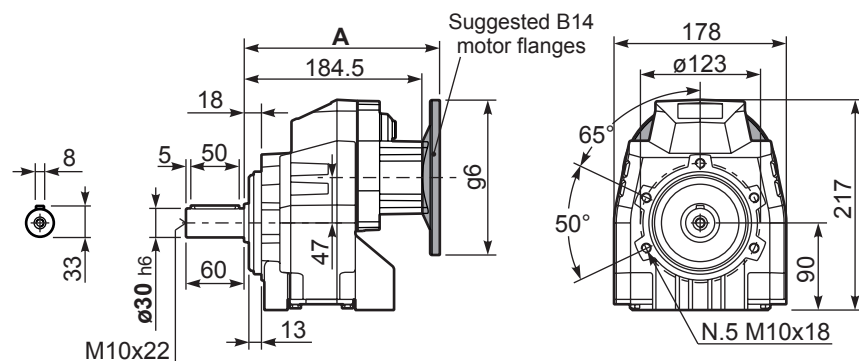


	Shaft - d1	p1	h1	x
Standard	ø 30x60	8	33	M10x22
On request A richiesta	ø 35x70	10	38	M10x22
	-	-	-	-

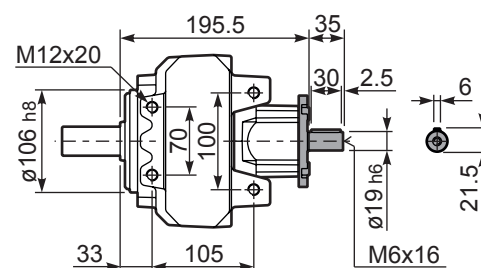
a1 Ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

With flange and feet only on request.
Ask for compatibility

Basic gearbox
Riduttore base



Input Shaft
Albero in entrata



B5 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
63 B5	205	232	140	205	K063.4.041	211
71 B5	203	242	160	203	K063.4.042	209
80/90 B5	205	262	200	205	K063.4.043	211
100/112 B5	220.3	287	250	220.3	KC40.4.043	226.3

B14 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
71 B14	203	214.5	105	203	K063.4.047	209
80 B14	205	222	120	205	K063.4.046	211
90 B14	205	232	140	205	K063.4.041	211
100/112 B14	220.3	242	160	220.3	KC40.4.041	226.3



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges		Available B14 motor flanges			Output Shaft 	Ratios code
							-B	-C	-O	-P	-Q		
							63	71	56	63	71		
18.8	74.33	0.37	176	1.8	0.67	320			C	C		191313	01
17.0	82.56	0.37	196	1.6	0.60	320			C	C		151318	02
16.0	87.48	0.37	207	1.5	0.57	320			C	C		131713	03
13.8	101.40	0.37	240	1.3	0.49	320			C	C		151313	04
11.4	122.57	0.37	291	1.1	0.41	320			C	C		131313	05
10.1	138.59	0.37	329	1.0	0.36	320			C	C		101318	06
8.7	160.82	0.25	257	1.2	0.31	320			C	C		91713	07
8.2	170.20	0.25	272	1.2	0.29	320			C	C		101313	08
7.6	183.48	0.25	294	1.1	0.27	320			C	C		91318	09
6.5	214.15	0.18	262	1.2	0.23	320			C	C		71713	10
6.2	225.33	0.18	276	1.2	0.22	320			C	C		91313	11
5.7	244.32	0.18	299	1.1	0.20	320			C	C		71318	12
5.5	254.15	0.18	311	1.0	0.20	320			C	C		61713	13
4.8	289.96	0.18	355	0.9	0.17	320			C	C		61318	14
4.7	300.05	0.18	367	0.9	0.17	320			C	C		71313	15
3.9	356.09	0.12	282	1.1	0.14	320			C	C		61313	16

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **503C** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **503C** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **503C** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **503C** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **503C** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

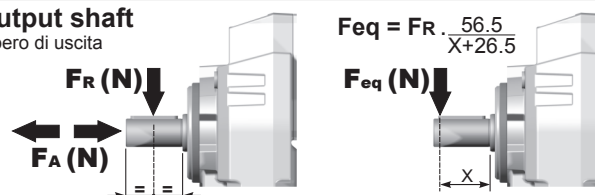
Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
B3	B6	B7	B8	V5	V6	V8
1.35 LT	0.80 LT	0.80 LT	0.70 LT	1.50 LT	0.85 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS

Output shaft
Albero di uscita

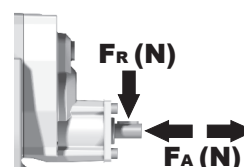


n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	500	2500	140	640	3200	70	820	4100
250	540	2700	120	680	3400	40	1020	5100
200	580	2900	85	760	3800	15	1100	5500

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

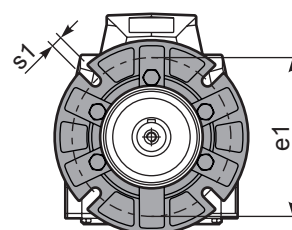
Input shaft
Albero in entrata



n_1	FA	FR
1400	140	700
900	160	800
500	190	950

tab. 2

Gearbox weight	With flange	15.0 kg
peso riduttore	With feet	17.0 Kg

P503C-F...[illegible]

a1 Ø	b1	c1	e1	f1	s1	kit code
160	110	14	130	3.5	11	KC50.9.011
200	130	13	165	3.5	11	KC50.9.012
250	180	15.5	215	4	14	KC50.9.013

With flange and feet only on request. Ask for compatibility

P503C-N...

R503C-N..

Technical drawing of the B14 motor flange showing front, side, and top views with dimensions.

Front View Dimensions:

- Overall width: 192
- Overall height: 178
- Flange diameter: $\varnothing 123$
- Flange thickness: 96
- Mounting hole diameter: $\varnothing 30 \text{ h6}$
- Mounting hole pitch: 178
- Mounting hole offset: 18
- Mounting hole diameter: 8
- Mounting hole pitch: 33
- Mounting hole offset: 5
- Mounting hole diameter: 50
- Mounting hole offset: 60
- Mounting hole diameter: 17
- Mounting hole offset: 13

Side View Dimensions:

- Overall width: 192
- Overall height: 178
- Flange diameter: $\varnothing 123$
- Flange thickness: 96
- Mounting hole diameter: $\varnothing 30 \text{ h6}$
- Mounting hole pitch: 178
- Mounting hole offset: 18
- Mounting hole diameter: 8
- Mounting hole pitch: 33
- Mounting hole offset: 5
- Mounting hole diameter: 50
- Mounting hole offset: 60
- Mounting hole diameter: 17
- Mounting hole offset: 13

Top View Dimensions:

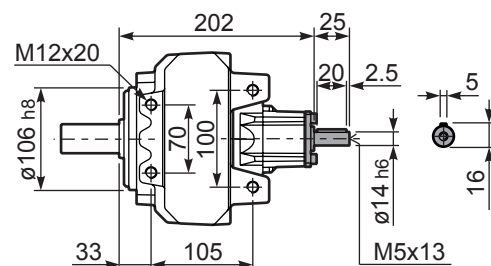
- Overall width: 192
- Overall height: 178
- Flange diameter: $\varnothing 123$
- Flange thickness: 96
- Mounting hole diameter: $\varnothing 30 \text{ h6}$
- Mounting hole pitch: 178
- Mounting hole offset: 18
- Mounting hole diameter: 8
- Mounting hole pitch: 33
- Mounting hole offset: 5
- Mounting hole diameter: 50
- Mounting hole offset: 60
- Mounting hole diameter: 17
- Mounting hole offset: 13

Other Dimensions:

- Mounting hole diameter: 8
- Mounting hole pitch: 33
- Mounting hole offset: 5
- Mounting hole diameter: 50
- Mounting hole offset: 60
- Mounting hole diameter: 17
- Mounting hole offset: 13

Notes:

- Suggested B14 motor flanges
- N.5 M10x18



B5 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
63 B5	210.5	202	140	210.5	K050.4.041	216.5
71 B5	208	212	160	208	K050.4.042	214

B14 Motor Flanges	A	C _{max}	g6	k1	kit code	k1 with KC50.9.011
56 B14	208	172	80	208	KC40.4.049	214
63 B14	210.5	177	90	210.5	K050.4.047	216.5
71 B14	208	184.5	105	208	K050.4.045	214



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges -G 132	B14 motor flanges - - - - - - - -	Output Shaft $\emptyset$	Ratios code
507	2.76	9	166	1.6	14.4	265	not available	not available	2980	01
395	3.54	9	213	1.3	11.6	275			2485	02
277	5.06	9	304	1.0	8.6	290			1891	03
241	5.81	7.5	281	1.2	8.5	330			1693	04
206	6.79	7.5	329	1.2	8.4	380			1495	05

The dynamic efficiency is **0.98** for all ratios

On request

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **701C** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary. See table 1 for lubrication and recommended quantity. In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **701C** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione. Vedi tab.1 per oli e quantità consigliati. In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **701C** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert. In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben. In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **701C** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien. Voir tableau 1 concernant les huiles et les quantités conseillées. Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **701C** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
B3	B6	B7	B8	V5	V6	V8
1.85 LT	1.40 LT	1.40 LT	1.30 LT	2.25 LT	1.60 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

For all details on lubrication and plugs check our website

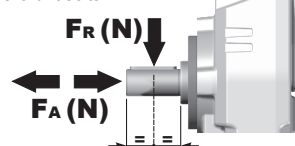
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

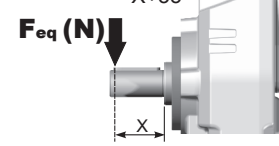
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



$$F_{eq} = FR \cdot \frac{70}{X+35}$$



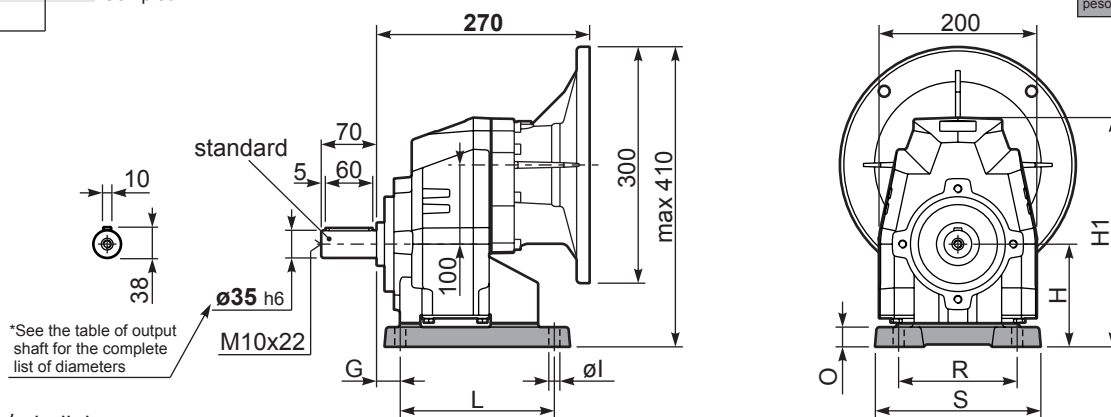
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	680	3400	140	960	4800	70	1300	6500
250	760	3800	120	1040	5200	40	1460	7300
200	900	4500	85	1120	5600	15	1800	9000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

tab. 2

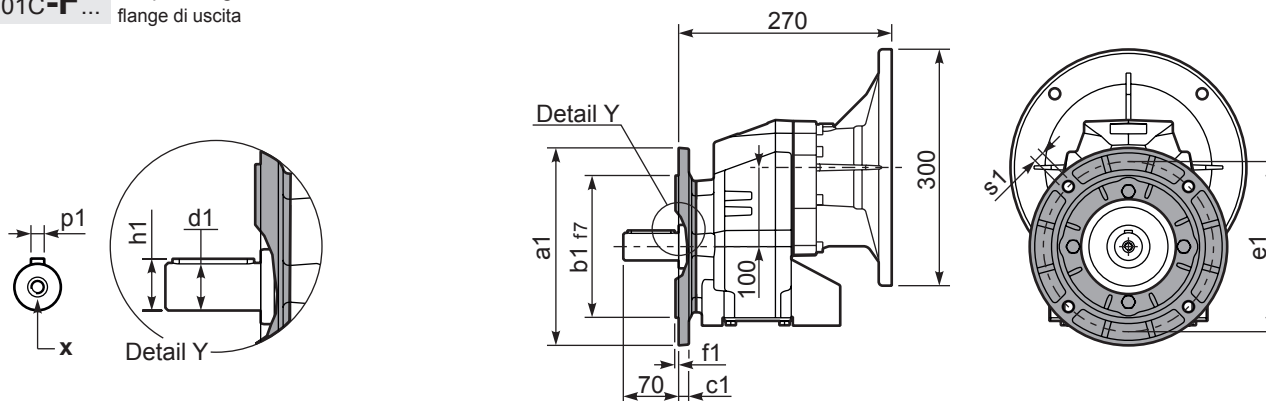
P701C-S6...

With feet
Con piediniGearbox
weight
peso riduttore
With flange 36.0 kg
With feet 39.5 kg

Feet / piedini

Feet Code	Market reference	G	H	R	L	S	H1	O	Øl	B5 max. Flange	kit code
B4	412/3	19.5	130	180	149.5	216	290	25	14	-	KC70.9.022
S6	67	30	130	150	195	210	290	25	14	-	KC70.9.024
H5	025/253	35	160	170	175	220	320	30	16	-	KC70.9.023
-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-

P701C-F...

Output flanges
flange di uscita

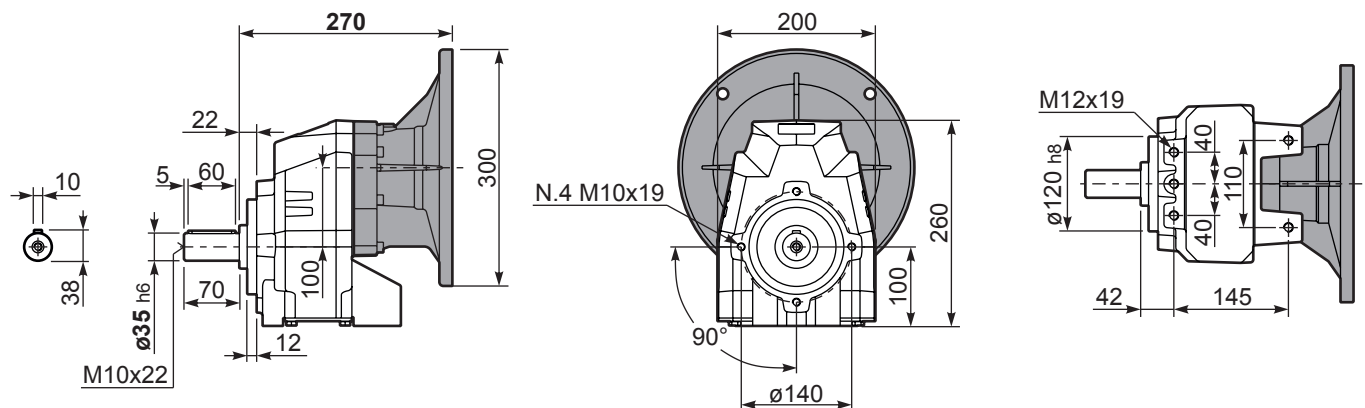
*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 35x70	10	38	M10x22
On request A richiesta	Ø 38x70	10	41	M10x25
	Ø 40x80	12	43	M12x28

Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code	
200	130	11	165	3.5	11	KC70.9.012	 With flange and feet only on request. Ask for compatibility
250	180	13	215	4	14	KC70.9.013	
-	-	-	-	-	-	-	

P701C-N...

Basic gearbox
Riduttore base



QUICK SELECTION / Selezione veloce

 input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges				Output Shaft 	Output Shaft 	Ratios code 
							-C	-D	-E	-F	-G	-R	-T	-U	-V			
							71	80	90	100 112	132	80	90	100 112	132			
213	6.57	7.5	312	1.2	8.8	380	B									3018		01
185	7.56	7.5	358	1.1	7.9	390	B									3016		02
159	8.82	7.5	419	1.0	7.1	410	B									3014		03
113	12.39	7.5	588	1.0	7.2	580	B									2018		04
98	14.24	5.5	499	1.2	6.4	600	B									2016	standard ø35	05
84	16.75	5.5	587	1.1	6.1	665	B									1618		06
73	19.25	5.5	675	1.0	5.4	675	B									1616		07
64	21.78	4	558	1.2	4.7	675	B									1318	ø38	08
56	25.04	4	642	1.1	4.1	675	B									1316		09
47.9	29.23	4	750	0.9	3.5	675	B									1314	On request	10
45.7	30.65	3	592	1.1	3.4	675	B									1116		11
39.1	35.78	3	691	1.0	2.9	675	B									1114		12
36.3	38.55	2.2	548	1.1	2.3	580	B									818		13
31.6	44.32	2.2	630	1.1	2.3	665	B									816		14
27.1	51.74	2.2	735	0.9	2.0	675	B									814		15
22.9	61.03	1.1	437	1.1	1.2	480	B									616		16
19.6	71.25	1.1	510	1.1	1.2	560	B									614		17

 The dynamic efficiency is **0.96** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **702C** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary. See table 1 for lubrication and recommended quantity. In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **702C** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione. Vedi tab.1 per oli e quantità consigliati. In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **702C** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert. In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben. In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur **702C** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien. Voir tableau 1 concernant les huiles et les quantités conseillées. Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

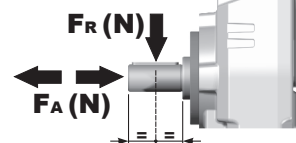
E El reductor tamaño **702C** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

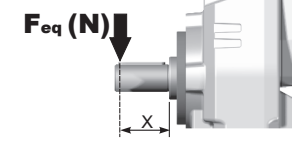
Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
B3	B6	B7	B8	V5	V6	V8
2.10 LT	1.40 LT	1.40 LT	1.30 LT	2.25 LT	1.60 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

 For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS

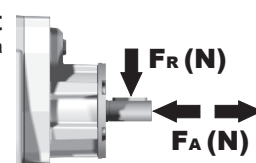
Output shaft
Albero di uscita


$$F_{eq} = F_R \cdot \frac{70}{X+35}$$


n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	680	3400	140	960	4800	70	1300	6500
250	760	3800	120	1040	5200	40	1460	7300
200	900	4500	85	1120	5600	15	1800	9000

On request reinforced bearings to increase loads.

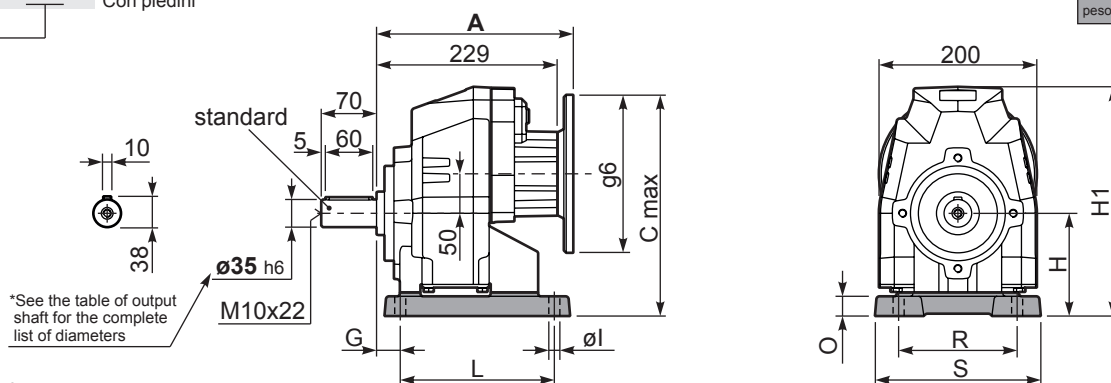
A richiesta cuscinetti rinforzati per aumentare i carichi.

Input shaft
Albero in entrata


n_1	FA	FR
1400	400	2000
900	440	2200
500	440	2200

tab. 2

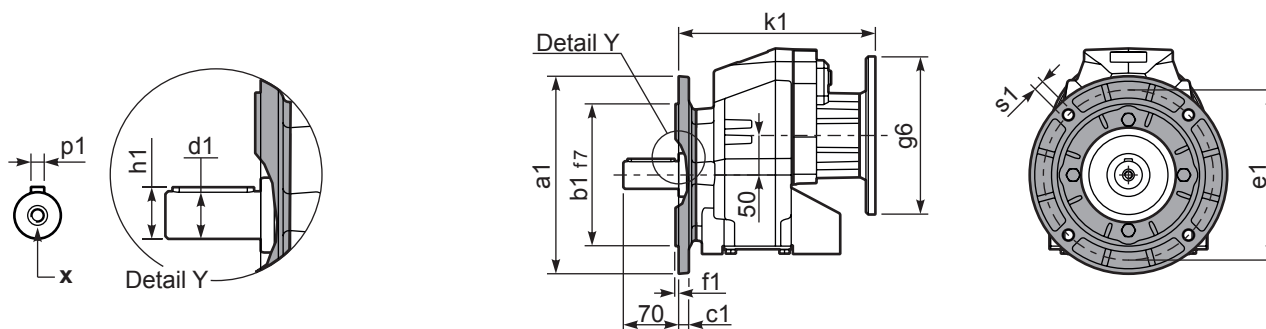
P702C-S6...

With feet
Con piediniGearbox weight
peso riduttore
With flange 30.0 kg
With feet 33.5 kg

Feet / piedini

Feet Code	Market reference	G	H	R	L	S	H1	O	Øl	B5 max. Flange	kit code
B4	412/3	19.5	130	180	149.5	216	290	25	14	-	KC70.9.022
S6	67	30	130	150	195	210	290	25	14	-	KC70.9.024
H5	025/253	35	160	170	175	220	320	30	16	-	KC70.9.023
-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-

P702C-F...

Output flanges
flange di uscita

*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 35x70	10	38	M10x22
On request A richiesta	Ø 38x70	10	41	M10x25
	Ø 40x80	12	43	M12x28

Available output flanges / flange di uscita

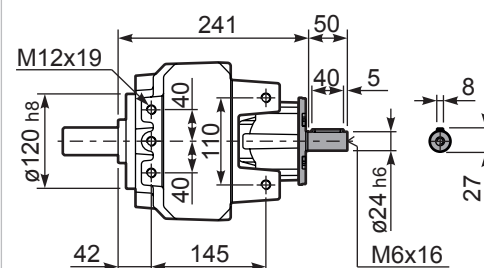
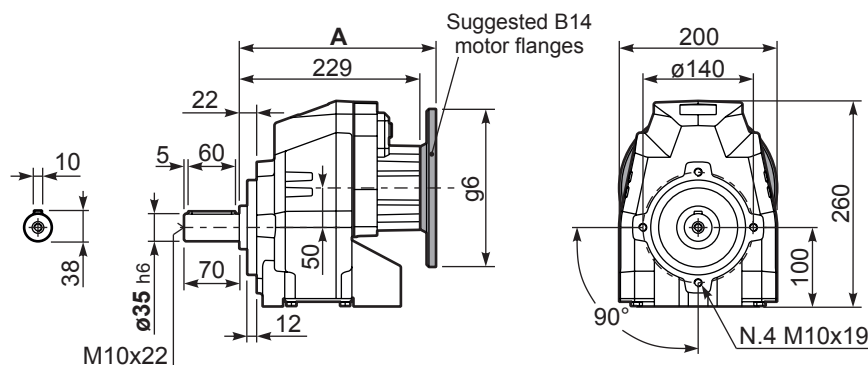
a1 Ø	b1	c1	e1	f1	s1	kit code
200	130	11	165	3.5	11	KC70.9.012
250	180	13	215	4	14	KC70.9.013
-	-	-	-	-	-	-

With flange and feet only on request. Ask for compatibility

P702C-N...

Basic gearbox
Riduttore base

R702C-N...

Input Shaft
Albero in entrata

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
71 B5	247.5	290	160	247.5	KC023.4.041
80/90 B5	249.5	310	200	249.5	KC023.4.042
100/112 B5	258.5	335	250	258.5	KC023.4.043
132 B5	276.5	360	300	276.5	KC50.4.043

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
80 B14	249.5	270	120	249.5	KC085.4.046
90 B14	249.5	280	140	249.5	KC085.4.045
100/112 B14	258.5	290	160	258.5	KC085.4.047
132 B14	276.5	310	200	276.5	KC50.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges			Output Shaft  $\varnothing$	Ratios code 
							-B	-C	-D	-E	-Q	-R	-T		
							63	71	80	90	71	80	90		
22.6	61.89	1.5	594	1.1	1.7	675	B				C	C		191318	01
19.7	71.16	1.5	683	1.0	1.5	675	B				C	C		191316	02
17.0	82.48	1.5	792	0.9	1.3	675	B				C	C		171316	03
14.5	96.29	1.1	675	1.0	1.1	675	B				C	C		171314	04
13.9	100.51	1.1	705	1.0	1.0	675	B				C	C		131318	05
12.1	115.56	0.75	556	1.2	0.91	675	B				C	C		131316	06
11.1	125.96	0.75	606	1.1	0.82	665	B				C	C		190816	07
10.4	134.91	0.75	649	1.0	0.78	675	B				C	C		131314	08
9.5	147.05	0.75	707	1.0	0.72	675	B				C	C		190814	09
8.2	170.44	0.55	605	1.1	0.62	675	B				C	C		170814	10
7.6	184.15	0.55	653	1.0	0.57	675	B				C	C		101314	11
6.8	205.87	0.55	730	0.9	0.51	675	B				C	C		91316	12
5.8	240.34	0.37	570	1.2	0.44	675	B				C	C		91314	13
5.0	279.22	0.37	662	1.0	0.37	665	B				C	C		100816	14
4.3	325.97	0.37	773	0.9	0.32	675	B				C	C		100814	15
3.8	364.41	0.25	583	1.1	0.28	665	B				C	C		90816	16
3.3	425.43	0.25	681	1.0	0.25	675	B				C	C		90814	17
2.9	481.19	0.18	589	1.1	0.22	665	B				C	C		70816	18
2.5	561.76	0.18	687	1.0	0.19	675	B				C	C		70814	19

The dynamic efficiency is **0.94** for all ratios

 **Motor Flanges Available**
Flange Motore Disponibili

 **B) Supplied with Reduction Bushing**
Fornito con Bussola di Riduzione

 **B) Available on Request without reduction bushing**
Disponibile a Richiesta senza Bussola di Riduzione

 **C) Motor Flange Holes Position**
Posizione Fori Flangia Motore

EN Unit **703C** is supplied with synthetic oil for lifetime lubrication, no maintenance is necessary.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore **703C** viene fornito completo di olio sintetico per la lubrificazione permanente e non necessita di alcuna manutenzione.
Vedi tab.1 per oli e quantità consigliati.
In tab.2 sono presenti i carichi radiali e assiali applicabili al riduttore.

D Das Getriebe **703C** ist mit synthetischem Öl gefüllt und ist lebensdauergeschmiert.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial- und Axialbelastungen des Getriebes aufgeführt.

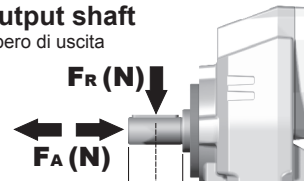
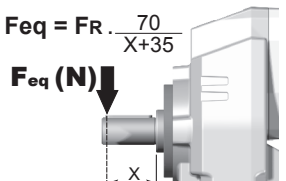
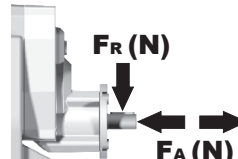
F Le réducteur **703C** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

E El reductor tamaño **703C** se suministra, lubricado de por vida con aceite sintético y no requieren mantenimiento alguna.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

Standard supplied	For these mounting position specify in the order or add oil Per queste posizioni specificare in fase d'ordine o aggiungere olio					
						
B3	B6	B7	B8	V5	V6	V8
2.20 LT	1.40 LT	1.40 LT	1.30 LT	2.40 LT	1.70 LT	Ask
AGIP Telium VSF 320				SHELL Omala S4 WE 320		

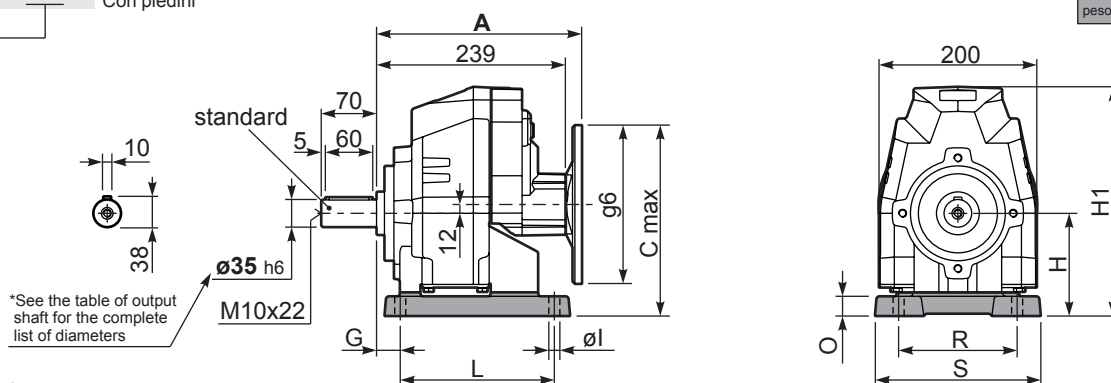
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS								
Output shaft Albero di uscita			$F_{eq} = F_R \cdot \frac{70}{X+35}$					
								
n_2	F_A	F_R	n_2	F_A	F_R	n_2	F_A	F_R
300	680	3400	140	960	4800	70	1300	6500
250	760	3800	120	1040	5200	40	1460	7300
200	900	4500	85	1120	5600	15	1800	9000
On request reinforced bearings to increase loads. A richiesta cuscinetti rinforzati per aumentare i carichi.								
Input shaft Albero in entrata								
n_1	F_A	F_R	n_1	F_A	F_R	n_1	F_A	F_R
1400	240	1200	900	280	1400	500	310	1700

tab. 2

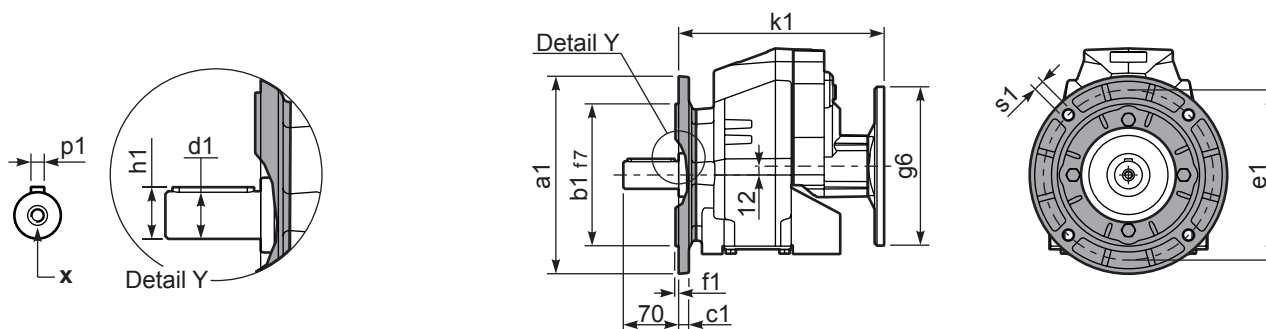
P703C-S6...

With feet
Con piediniGearbox weight
peso riduttore With flange **30.0 kg**
With feet **33.5 kg**

Feet / piedini

Feet Code	Market reference	G	H	R	L	S	H1	O	Øl	B5 max. Flange	kit code
B4	412/3	19.5	130	180	149.5	216	290	25	14	-	KC70.9.022
S6	67	30	130	150	195	210	290	25	14	-	KC70.9.024
H5	025/253	35	160	170	175	220	320	30	16	-	KC70.9.023
-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-

P703C-F...

Output flanges
flange di uscita

*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 35x70	10	38	M10x22
On request A richiesta	Ø 38x70	10	41	M10x25
	Ø 40x80	12	43	M12x28

Available output flanges / flange di uscita

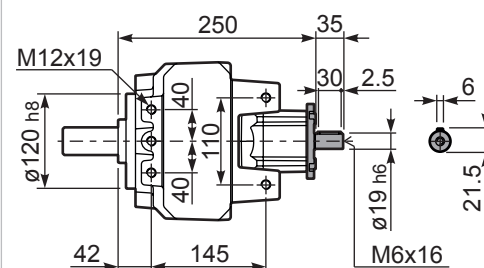
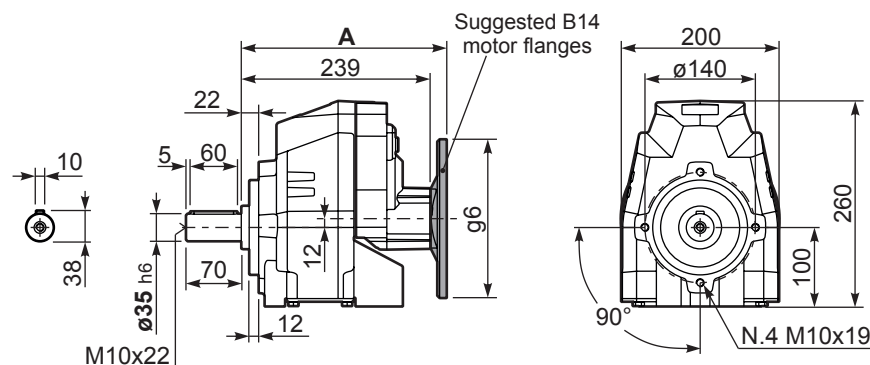
a1 Ø	b1	c1	e1	f1	s1	kit code
200	130	11	165	3.5	11	KC70.9.012
250	180	13	215	4	14	KC70.9.013
-	-	-	-	-	-	-

With flange and feet only on request. Ask for compatibility

P703C-N...

Basic gearbox
Riduttore base

R703C-N...

Input Shaft
Albero in entrata

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
63 B5	259.5	242	140	259.5	K063.4.041
71 B5	257.5	252	160	257.5	K063.4.042
80/90 B5	259.5	272	200	259.5	K063.4.043

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
71 B14	257.5	224.5	105	257.5	K063.4.047
80 B14	259.5	232	120	259.5	K063.4.046
90 B14	259.5	242	140	259.5	K063.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges -G 132	B14 motor flanges - - - - - - - -	Output Shaft $\emptyset$ Ratios code
227	6.17	9	371	1.2	10.9	450		not available	18111 standard 01
198	7.06	9	425	1.4	12.7	600			16113 ø40 02
170	8.21	9	494	1.4	12.2	670			14115 ø50 03

The dynamic efficiency is **0.98** for all ratios

On request

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **801C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **801C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **801C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **801C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **801C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

B3	B6	B7	B8	V5	V6	V8
3.20 LT	1.90 LT	1.90 LT	1.55 LT	3.20 LT	2.20 LT	Ask

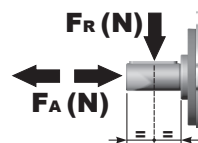
AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

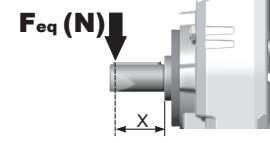
tab. 1

RADIAL AND AXIAL LOADS

Output shaft
Albero di uscita



$$F_{eq} = F_R \cdot \frac{80.5}{X+40.5}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	1200	6000	140	1600	8000	70	2200	11000
250	1400	7000	120	1800	9000	40	2600	13000
200	1500	7500	85	2000	10000	15	3000	15000

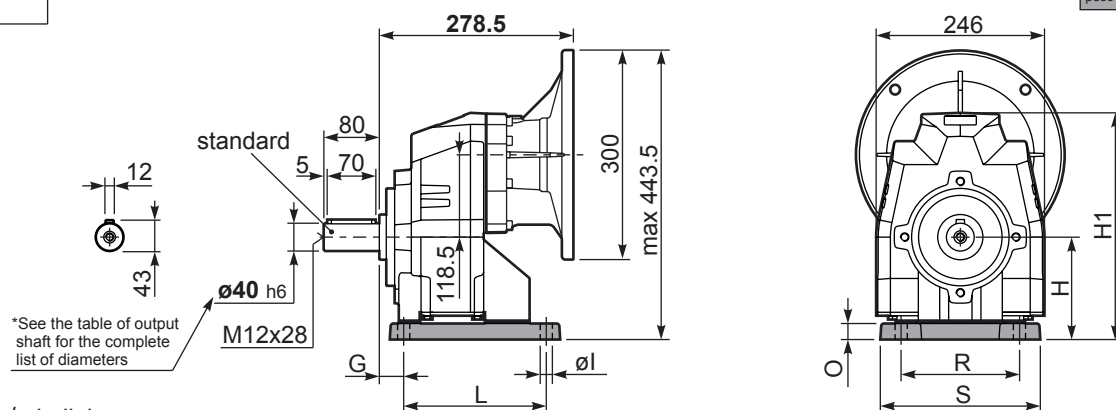
On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

tab. 2

P801C **S7** ... With feet
Con piedini

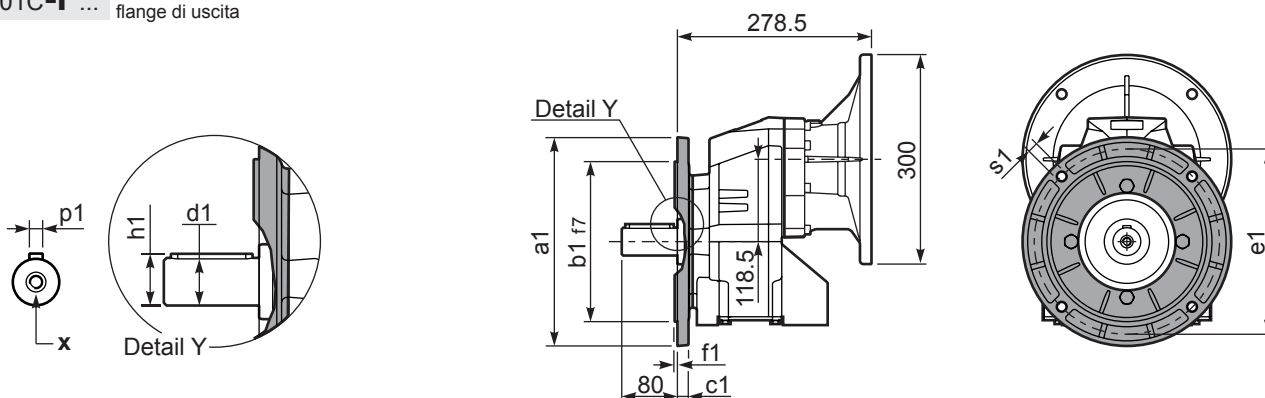
Gearbox weight peso riduttore	With flange 45.5 kg
	With feet 49.5 kg



Feet / piedini

[illegible]

P801C-F...	Output flanges flange di uscita
------------	------------------------------------



***Available output shaft** / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	ø 40x80	12	43	M12x28
On request A richiesta	ø 50x100 -	14 -	53.5 -	M16x36 -

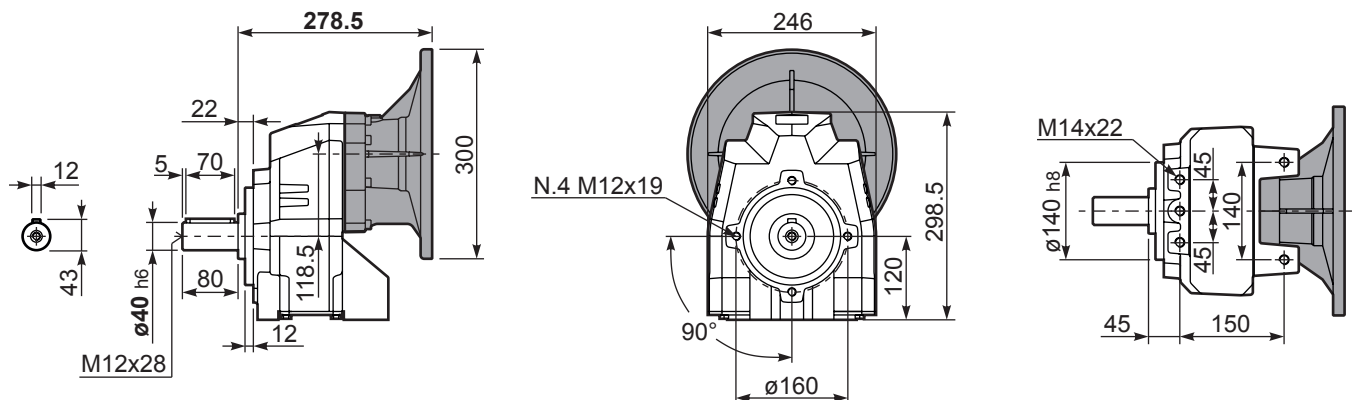
Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
250	180	13	215	4	14	KC80.9.013
300	230	16	265	4	14	KC80.9.014
-	-	-	-	-	-	-


 With flange and feet only on request.
 Ask for compatibility

With flange and feet
only on request.
Ask for compatibility

P801C-N...	Basic gearbox Riduttore base
------------	---------------------------------





QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges				Output Shaft 	Output Shaft 	Ratios code
							-C	-D	-E	-F	-G	-R	-T	-U	-V			
							71	80	90	100	112	132	80	90	100	112		
175	8.02	9	473	1.1	9.9	520	B										3018	01
152	9.18	9	541	1.1	9.8	590	B										3016	02
131	10.68	9	630	1.1	9.7	680	B										3014	03
93	15.11	7.5	717	1.1	7.8	775	B										2018	04
81	17.30	7.5	821	1.1	7.8	885	B										2016	05
70	20.13	7.5	955	0.9	6.8	900	B										2014	06
60	23.39	5.5	820	1.1	5.9	900	B										1616	07
51	27.21	5.5	954	0.9	5.1	900	B										1614	08
46.0	30.42	4	780	1.2	4.5	900	B										1316	09
39.6	35.38	4	907	1.0	3.9	900	B										1314	10
37.6	37.24	3	719	1.2	3.7	895	B										1116	11
32.3	43.31	3	836	1.1	3.2	900	B										1114	12
29.8	47.02	2.2	668	1.1	2.3	705	B										818	13
26.0	53.85	2.2	765	1.1	2.3	810	B										816	14
22.4	62.63	2.2	890	1.0	2.2	900	B										814	15
18.9	74.16	1.1	531	1.1	1.2	585	B										616	16
16.2	86.25	1.1	617	1.1	1.2	680	B										614	17

The dynamic efficiency is 0.96 for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **802C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **802C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **802C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **802C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **802C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

B3	B6	B7	B8	V5	V6	V8
3.20 LT	1.90 LT	1.90 LT	1.55 LT	3.20 LT	2.20 LT	Ask

AGIP Blasias 460

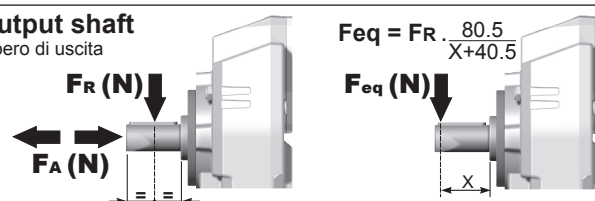
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



$$F_{eq} = F_R \cdot \frac{80.5}{X+40.5}$$

$$F_{eq} (N)$$

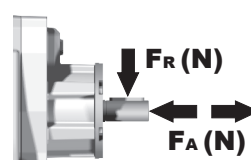
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	1200	6000	140	1600	8000	70	2200	11000
250	1400	7000	120	1800	9000	40	2600	13000
200	1500	7500	85	2000	10000	15	3000	15000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

Input shaft

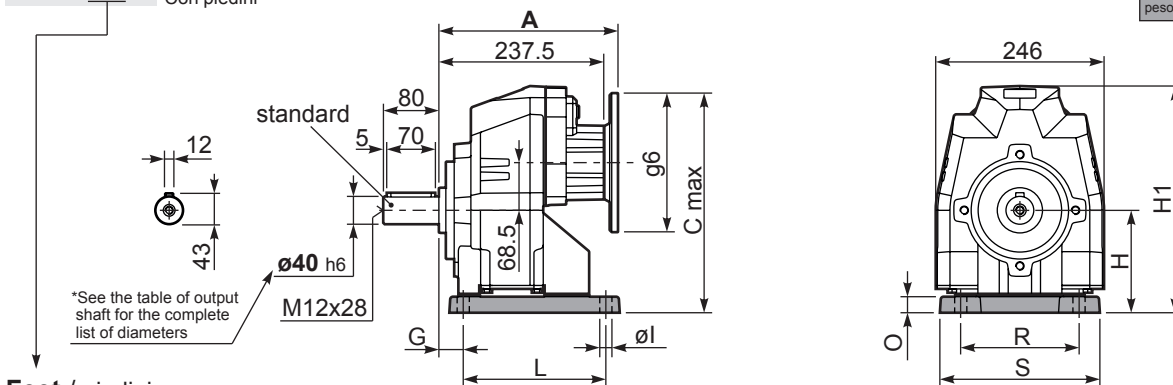
Albero in entrata



n_1	FA	FR
1400	450	2250
900	500	2500
500	600	3000

tab. 2

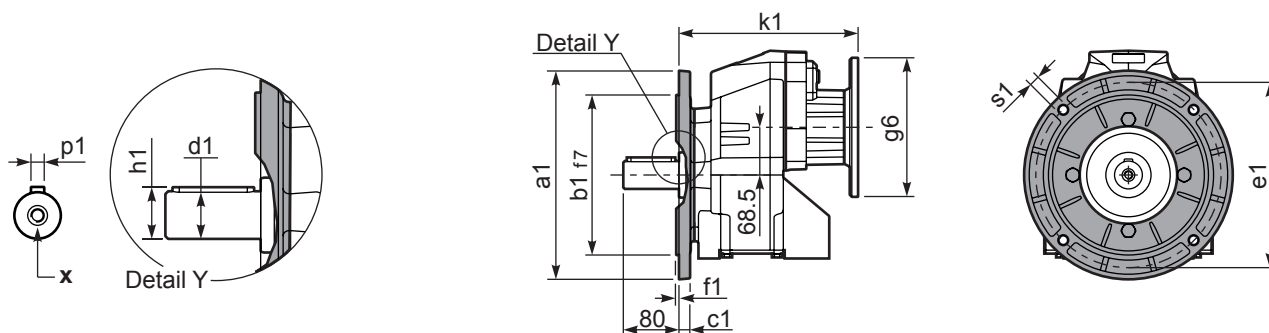
P802C-S7 ...

With feet
Con piediniGearbox weight
peso riduttore With flange **39.5 kg**
With feet **43.5 kg**

Feet / piedini

Feet Code	Market reference	G	H	R	L	S	H1	O	ØI	B5 max. Flange	kit code
B5	512/3	25	155	225	156	270	333.5	30	18	-	KC80.9.022
S7	77	35	140	170	205	230	318.5	18	17.5	-	KC80.9.024
H6	026/263	40	175	215	215	265	353.5	30	16	-	KC80.9.023
-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-

P802C-F ...

Output flanges
flange di uscita

*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 40x80	12	43	M12x28
On request A richiesta	Ø 50x100	14	53.5	M16x36
	-	-	-	-

Available output flanges / flange di uscita

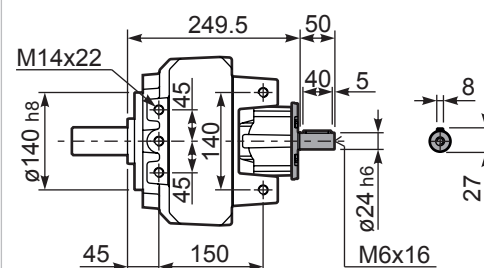
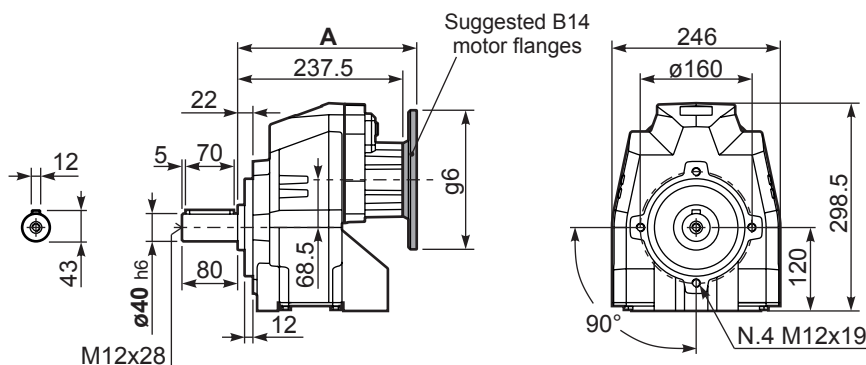
a1 Ø	b1	c1	e1	f1	s1	kit code
250	180	13	215	4	14	KC80.9.013
300	230	16	265	4	14	KC80.9.014
-	-	-	-	-	-	-

With flange and feet
only on request.
Ask for compatibility

P802C-N...

Basic gearbox
Riduttore base

R802C-N...

Input Shaft
Albero in entrata

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
71 B5	256	323.5	160	256	KC023.4.041
80/90 B5	258	343.5	200	258	KC023.4.042
100/112 B5	267	368.5	250	267	KC023.4.043
132 B5	285	393.5	300	285	KC50.4.043

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
80 B14	258	303.5	120	258	KC085.4.046
90 B14	258	313.5	140	258	KC085.4.045
100/112 B14	267	323.5	160	267	KC085.4.047
132 B14	285	343.5	200	285	KC50.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				Available B14 motor flanges			Output Shaft  $\varnothing$	Ratios code 
							-B	-C	-D	-E	-Q	-R	-T		
							63	71	80	90	71	80	90		
18.5	75.50	1.5	725	1.1	1.7	825	B				C	C		191318	01
16.2	86.47	1.5	830	1.1	1.6	900	B				C	C		191316	02
14.0	100.22	1.5	962	0.9	1.4	900	B				C	C		171316	03
12.0	116.56	1.1	817	1.1	1.2	900	B				C	C		171314	04
10.2	136.82	1.1	959	0.9	1.0	900	B				C	C		151314	05
9.1	153.05	0.75	736	1.1	0.83	810	B				C	C		190816	06
8.6	163.31	0.75	785	1.1	0.86	900	B				C	C		131314	07
7.9	178.01	0.75	856	1.1	0.79	900	B				C	C		190814	08
7.3	191.67	0.75	922	1.0	0.73	900	B				C	C		101316	09
6.8	206.32	0.75	992	0.9	0.68	900	B				C	C		170814	10
6.3	222.92	0.55	791	1.1	0.63	900	B				C	C		101314	11
5.8	242.18	0.55	859	1.0	0.58	900	B				C	C		150814	12
5.6	250.15	0.55	888	1.0	0.56	900	B				C	C		91316	13
4.8	289.08	0.55	1026	0.9	0.49	900	B				C	C		130814	14
4.2	330.31	0.37	783	1.1	0.42	890	B				C	C		71316	15
3.5	394.59	0.37	936	1.0	0.36	900	B				C	C		100814	16
2.7	514.99	0.25	824	1.1	0.27	900	B				C	C		90814	17
2.1	680.03	0.18	832	1.1	0.21	900	B				C	C		70814	18

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

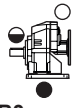
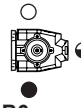
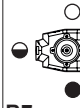
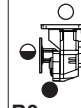
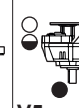
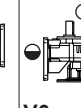
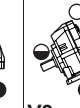
EN Unit **803C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **803C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **803C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **803C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **803C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

						
B3	B6	B7	B8	V5	V6	V8
3.30 LT	1.90 LT	1.90 LT	1.55 LT	3.40 LT	2.30 LT	Ask

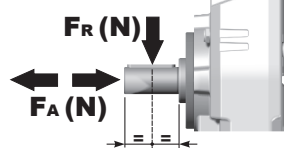
AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

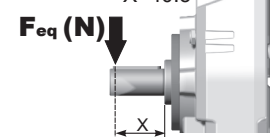
tab. 1

RADIAL AND AXIAL LOADS

Output shaft
Albero di uscita



$$F_{eq} = F_R \cdot \frac{80.5}{X+40.5}$$

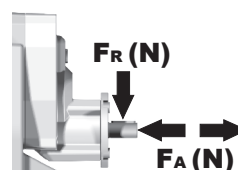


n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	1200	6000	140	1600	8000	70	2200	11000
250	1400	7000	120	1800	9000	40	2600	13000
200	1500	7500	85	2000	10000	15	3000	15000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

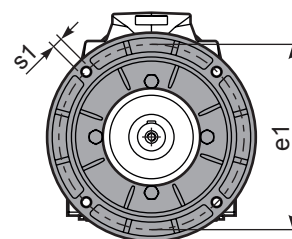
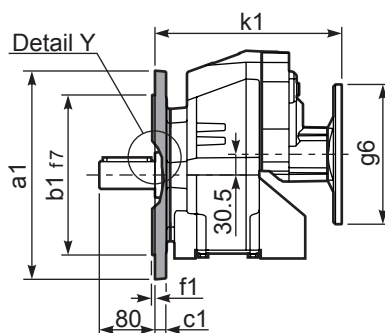
Input shaft
Albero in entrata



n_1	FA	FR
1400	400	2000
900	440	2200
500	440	2200

tab. 2

Gearbox weight peso riduttore	With flange	39.5 kg
	With feet	43.5 kg

P803C-F...

	Shaft - d1	p1	h1	x
Standard	ø 40x80	12	43	M12x28
On request A richiesta	ø 50x100 -	14 -	53.5 -	M16x36 -

a1 Ø	b1	c1	e1	f1	s1	kit code
250	180	13	215	4	14	KC80.9.013
300	230	16	265	4	14	KC80.9.014
-	-	-	-	-	-	-



With flange and feet
only on request.
Ask for compatibility

P803C-N...

R803C-N..

Technical drawing of the B14 motor flange, showing side and front views with dimensions in millimeters.

Side View Dimensions:

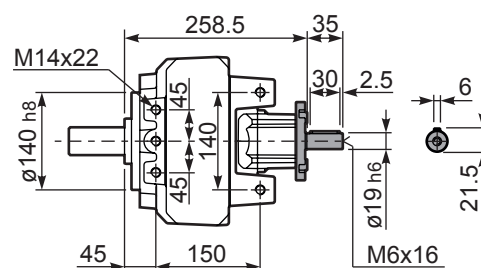
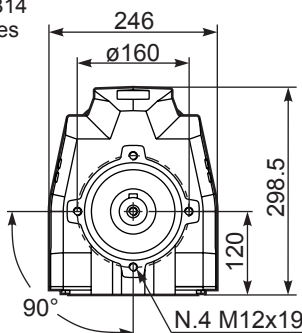
- Overall width: 247.5
- Flange diameter: $\phi 160$
- Flange thickness: 9.6
- Mounting hole diameter: $\phi 40 \text{ h6}$
- Mounting hole pitch: 12
- Mounting hole offset: 43
- Flange offset: 22
- Flange offset: 5
- Flange offset: 70
- Flange offset: 30.5
- Flange offset: 80
- Flange offset: 12

Front View Dimensions:

- Overall width: 246
- Overall height: 298.5
- Mounting hole pitch: 120
- Mounting hole offset: 90°
- Mounting hole offset: N.4 M12x19

Notes:

- Suggested B14 motor flanges
- M12x28



B5 Motor Flanges	A	C _{max}	g6	k1	kit code
63 B5	268	275.5	140	268	K063.4.041
71 B5	266	285.5	160	266	K063.4.042
80/90 B5	268	305.5	200	268	K063.4.043

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
71 B14	266	258	105	266	K063.4.047
80 B14	268	265.5	120	268	K063.4.046
90 B14	268	275.5	140	268	K063.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges		B14 motor flanges				Output Shaft 	Ratios code
							-H	-I	-	-	-	-		
							160	180	-	-	-	-		
412	3.40	22	480	1.3	26.4	600			not available				1551	standard ø50 ø60 On request
343	4.08	22	575	1.2	25.7	700							1353	
285	4.91	22	693	1.0	21.3	700							1154	

The dynamic efficiency is **0.98** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **851C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **851C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **851C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **851C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **851C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

B3	B6	B7	B8	V5	V6	V8
5.30 LT	3.60 LT	3.60 LT	2.80 LT	5.80 LT	4.10 LT	Ask

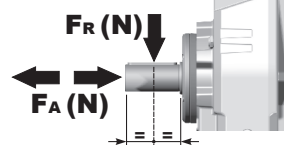
AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

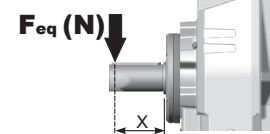
tab. 1

RADIAL AND AXIAL LOADS

Output shaft
Albero di uscita



$$F_{eq} = F_R \cdot \frac{88.5}{X+38.5}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	1800	9000	140	2400	12000	70	3000	15000
250	2000	10000	120	2600	13000	40	3200	16000
200	2200	11000	85	2800	14000	15	4000	20000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

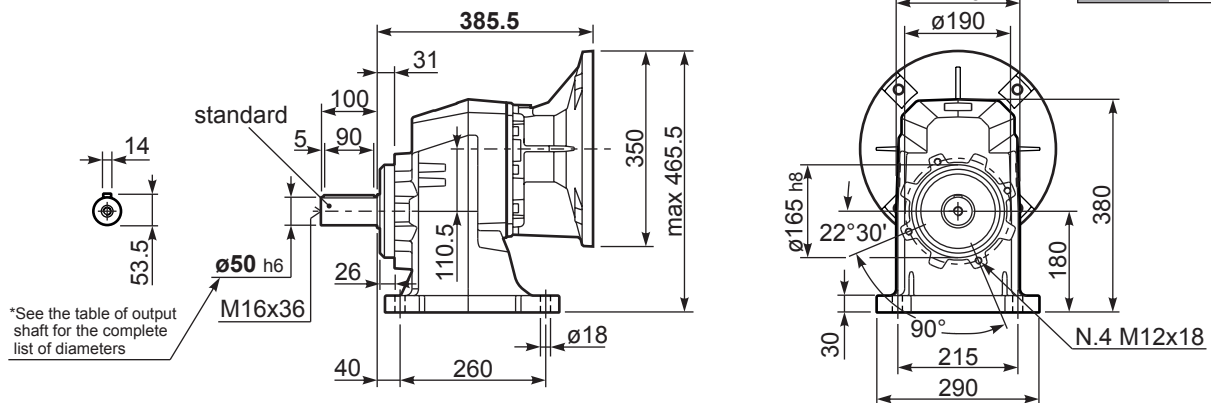
tab. 2

P851C**S8**...

With foot
Con piedine

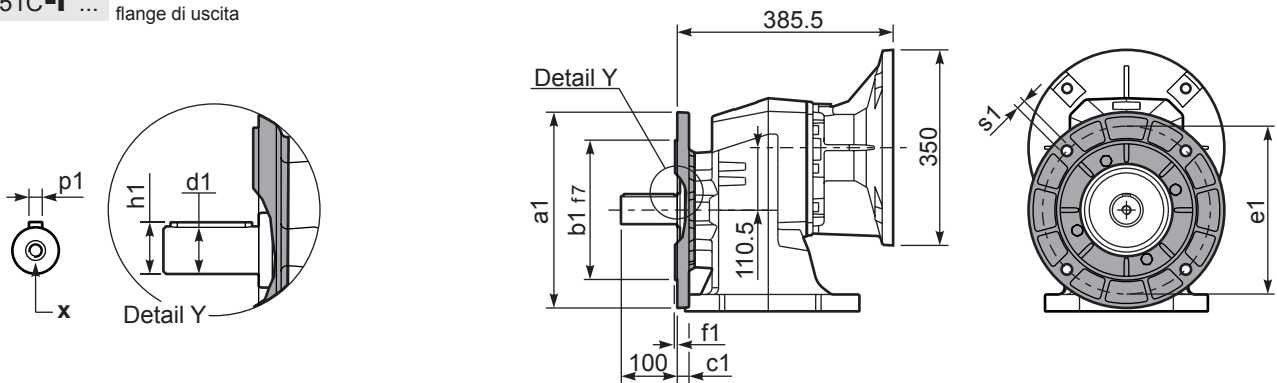
Gearbox weight
peso riduttore

With flange	90.0 kg
With feet	80.5 kg



P851C-F...

Output flanges
flange di uscita



***Available output shaft / Albero di uscita**

	Shaft - d1	p1	h1	x
Standard	ø 50x100	14	53.5	M16x36
On request A richiesta	ø 60x120 -	18 -	64 -	M20x42 -

Available output flanges / flange di uscita

a1 ø	b1	c1	e1	f1	s1	kit code
300	230	21	265	4	14	KC90.9.014
350	250	21	300	5	18	KC90.9.015
-	-	-	-	-	-	-



All flanges are compatible with the foot



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	B5 motor flanges				B14 motor flanges				Output Shaft 	Ratios code
							-F	-G	-H	-I	-	-	-	-		
							100 112	132	160	180	-	-	-	-		
317	4.42	22	611	1.1	24.2	700	B				not available				3015	01
264	5.30	22	733	1.0	20.2	700	B								3013	02
219	6.38	18.5	742	1.1	19.1	800	B								3011	03
168	8.33	15	784	1.0	14.7	800	B								2015	04
140	9.99	15	940	1.0	13.8	900	B								2013	05
124	11.26	15	1060	1.0	14.9	1100	B								1615	06
116	12.03	15	1132	1.1	15.2	1200	B								2011	07
104	13.50	15	1271	1.1	15.8	1400	B								1613	08
96	14.65	15	1378	1.1	15.6	1500	B								1315	09
86	16.26	15	1531	1.0	14.1	1500	B								1611	10
80	17.56	11	1214	1.2	13.0	1500	B								1313	11
65	21.50	11	1486	1.1	11.4	1600	B								1113	12
54	25.88	9	1526	1.0	9.4	1600	B								1111	13
45.0	31.09	7.5	1475	1.0	7.2	1460	B								813	14
37.4	37.43	5.5	1312	1.2	6.5	1600	B								811	15

The dynamic efficiency is **0.96** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

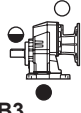
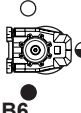
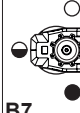
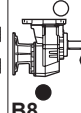
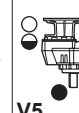
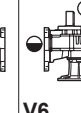
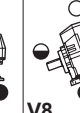
EN Unit **852C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **852C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **852C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **852C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **852C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

						
5.40 LT	3.60 LT	3.60 LT	2.80 LT	5.90 LT	4.20 LT	Ask

AGIP Blasias 460

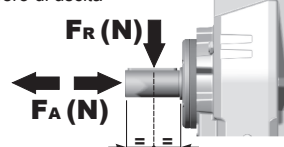
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

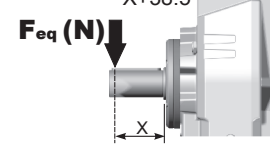
RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



$$F_{eq} = F_R \cdot \frac{88.5}{X+38.5}$$



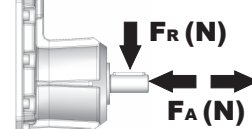
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	1800	9000	140	2400	12000	70	3000	15000
250	2000	10000	120	2600	13000	40	3200	16000
200	2200	11000	85	2800	14000	15	4000	20000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

Input shaft

Albero in entrata



n_1	FA	FR
1400	700	3500
900	840	4200
500	900	4500

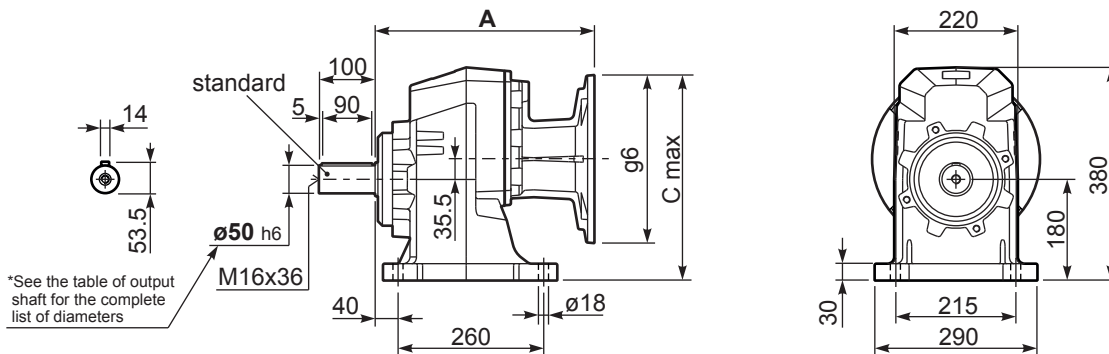
tab. 2

P852C**S8**...

With foot
Con piedino

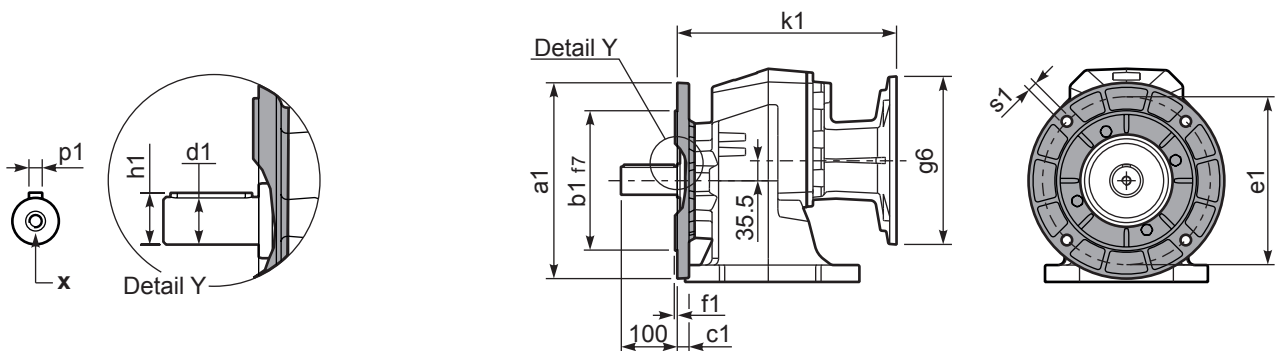
Gearbox weight
peso riduttore

With flange	86.0 kg
With feet	76.5 kg



P852C-F..

Output flanges
flange di uscita



***Available output shaft / Albero di uscita**

	Shaft - d1	p1	h1	x
Standard	ø 50x100	14	53.5	M16x36
On request A richiesta	ø 60x120 -	18 -	64 -	M20x42 -

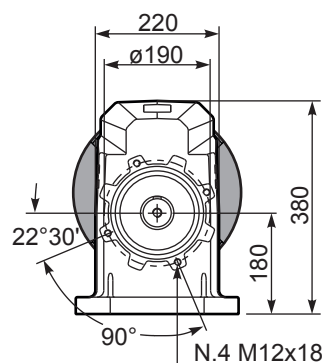
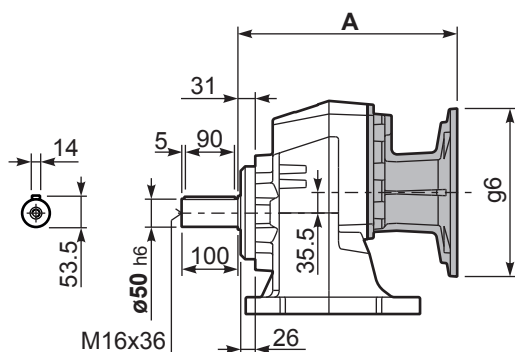
Available output flanges / flange di uscita

a1 ø	b1	c1	e1	f1	s1	kit code	 All flanges are compatible with the foot
300	230	21	265	4	14	KC90.9.014	
350	250	21	300	5	18	KC90.9.015	
-	-	-	-	-	-	-	

All flanges are compatible with the foot

P852C**S8**...

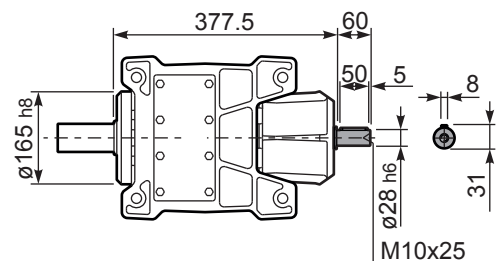
Basic gearbox
Riduttore base



B5 Motor Flanges	A	C_{max}	g6	k1	kit code
100/112 B5	387	340.5	250	387	-
132 B5	391	365.5	300	391	-
160/180 B5	402	390.5	350	402	-

R852CS8..

Input Shaft
Albero in entrata





QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n ₂ [min ⁻¹]	Ratio i	Motor power P _{1M} [kW]	Output torque M _{2M} [Nm]	Service factor f.s.	Nominal power P _{1R} [kW]	Nominal torque M _{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges					 Output Shaft	 Ratios code
							-C	-D	-E	-F	-G	-R	-T	-U	-V			
							71	80	90	100 112	132	80	90	100 112	132			
32.5	43.03	5.5	1478	1.1	5.8	1600	B								201313	 standard ø50 ø60 On request	01	
28.9	48.52	5.5	1667	0.9	5.0	1550	B								161315		02	
27.0	51.81	4	1302	1.2	4.8	1600	B								201311		03	
24.1	58.17	4	1462	1.1	4.3	1600	B								161313		04	
22.2	63.09	4	1585	1.0	3.8	1550	B								131315		05	
20.0	70.05	4	1760	1.0	4.0	1800	B								161311		06	
18.5	75.65	4	1901	0.9	3.7	1800	B								131313		07	
15.4	91.09	3	1723	1.0	3.1	1800	B								131311		08	
12.6	111.50	2.2	1553	1.2	2.5	1800	B								111311		09	
10.5	133.91	2.2	1865	1.0	2.1	1800	B								81313		10	
8.7	161.24	1.5	1548	1.2	1.7	1800	B								81311		11	
7.6	184.40	1.1	1293	1.1	1.2	1450	B								61313		12	
6.3	222.04	1.1	1557	1.1	1.2	1750	B								61311		13	

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **853C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **853C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **853C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **853C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **853C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

B3	B6	B7	B8	V5	V6	V8
5.50 LT	3.80 LT	3.80 LT	3.20 LT	7.00 LT	4.60 LT	Ask

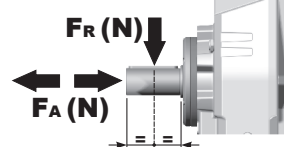
AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

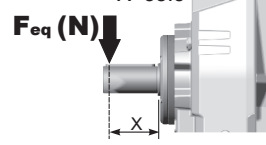
tab. 1

RADIAL AND AXIAL LOADS

Output shaft
Albero di uscita



$$F_{eq} = F_R \cdot \frac{88.5}{X+38.5}$$

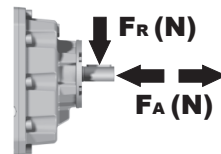


n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	1800	9000	140	2400	12000	70	3000	15000
250	2000	10000	120	2600	13000	40	3200	16000
200	2200	11000	85	2800	14000	15	4000	20000

On request reinforced bearings to increase loads.

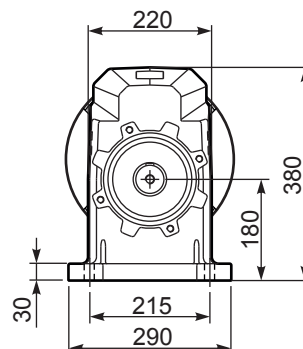
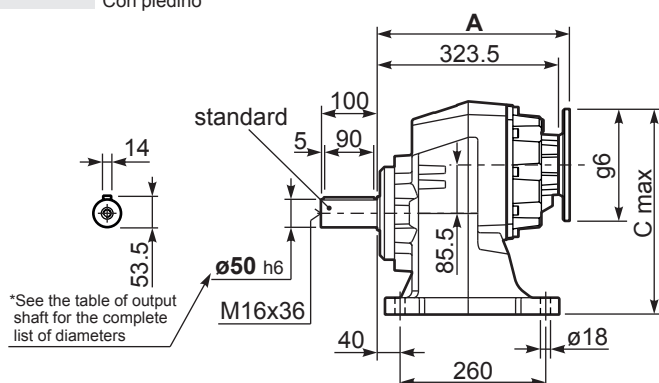
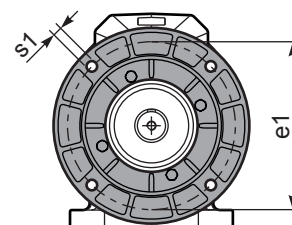
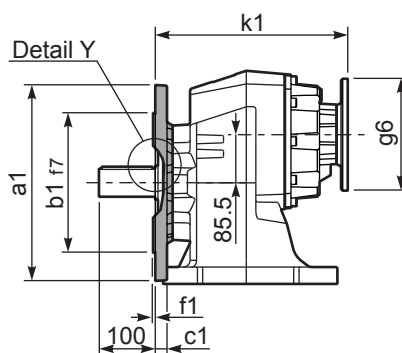
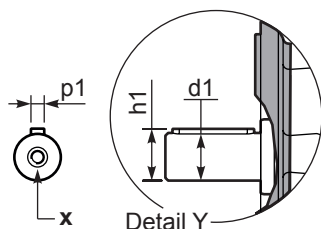
A richiesta cuscinetti rinforzati per aumentare i carichi.

Input shaft
Albero in entrata



n_1	FA	FR
1400	450	2250
900	500	2500
500	600	3000

tab. 2

P853C**S8**...With foot
Con piedinoGearbox
weight
peso riduttoreWith flange **80.5 kg**
With feet **71.0 kg**P853C-**F**...Output flanges
flange di uscita

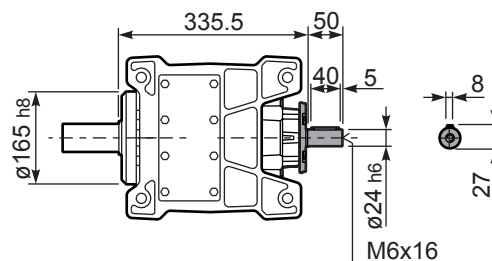
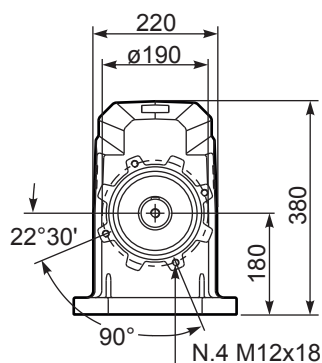
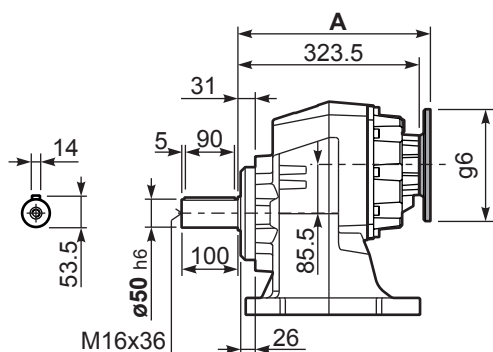
*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 50x100	14	53.5	M16x36
On request A richiesta	Ø 60x120	18	64	M20x42
	-	-	-	-

Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
300	230	21	265	4	14	KC90.9.014
350	250	21	300	5	18	KC90.9.015
-	-	-	-	-	-	-

All flanges are compatible with the foot

P853C**S8**...Basic gearbox
Riduttore baseR853C**S8**...Input Shaft
Albero in entrata

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
71 B5	342	345.5	160	342	KC023.4.041
80/90 B5	344	365.5	200	344	KC023.4.042
100/112 B5	353	390.5	250	353	KC023.4.043
132 B5	371	415.5	300	371	KC50.4.043

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
80 B14	344	325.5	120	344	KC085.4.046
90 B14	344	335.5	140	344	KC085.4.045
100/112 B14	353	345.5	160	353	KC085.4.047
132 B14	371	365.5	200	371	KC50.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges		B14 motor flanges				Output Shaft		
							-H	-I	-	-	-	-			Ratios code
							160	180	-	-	-	-			
528	2.65	22	374	1.7	36.7	650			not available				2361	standard	01
409	3.42	22	483	1.6	32.8	750							1965	ø60	02
304	4.60	22	649	1.5	30.9	950							1569		03
256	5.46	22	771	1.3	27.4	1000							1371	ø50	04
211	6.64	22	937	1.3	26.5	1175							1173	On request	05

The dynamic efficiency is **0.98** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **901C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **901C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **901C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **901C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **901C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético. Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

B3	B6	B7	B8	V5	V6	V8
5.90 LT	3.80 LT	3.80 LT	3.50 LT	6.80 LT	4.50 LT	Ask

AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS

Output shaft
Albero di uscita

F_R (N)
 F_A (N)

$$F_{eq} = F_R \cdot \frac{88.5}{X+38.5}$$

F_{eq} (N)

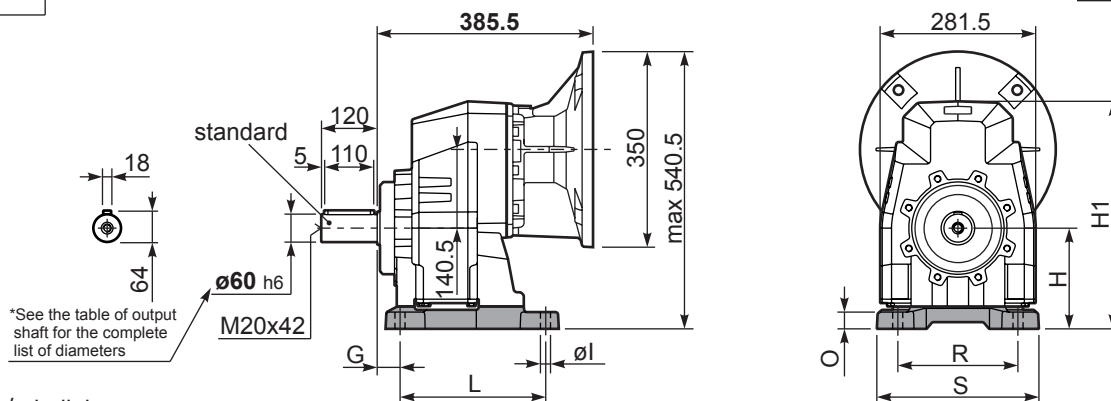
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	2070	10350	140	2760	13800	70	3450	17250
250	2300	11500	120	2990	14950	40	3680	18400
200	2530	12650	85	3220	16100	15	4600	23000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

tab. 2

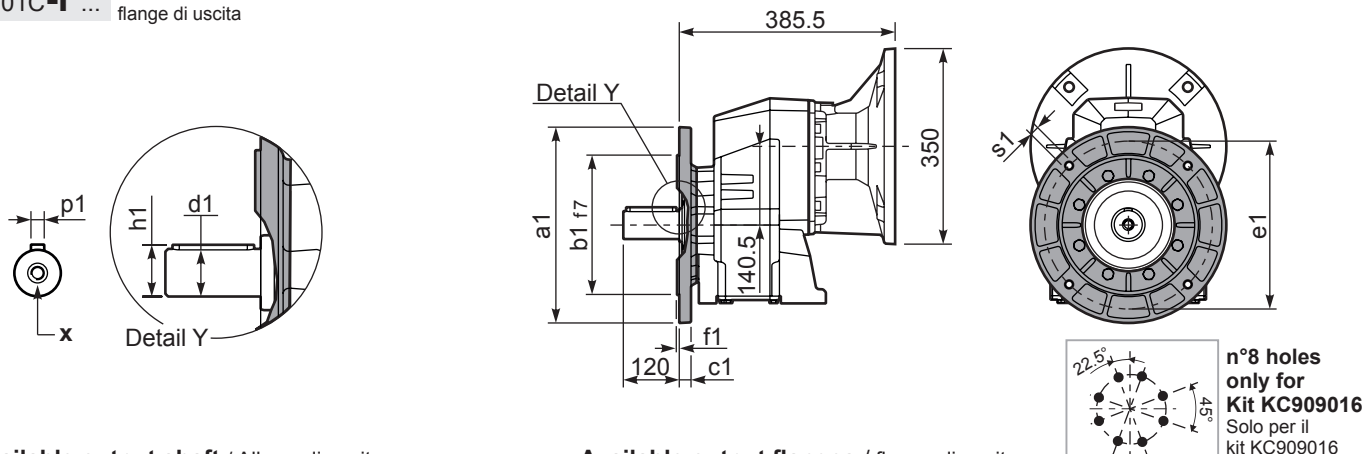
P901C-S8...

With feet
Con piediniGearbox
weight
peso riduttoreWith flange **102 kg**
With feet **110.5 kg**

Feet / piedini

Feet Code	Market reference	G	H	R	L	S	H1	O	Øl	B5 max. Flange	kit code
B6	612/3	25	195	250	180	300	422	25	18	-	KC90.9.022
B7	702/3	25	210	300	165	350	437	30	22	-	KC90.9.027
S8	87	40	180	215	260	290	407	30	18	-	KC90.9.024
S9	97	40	225	250	310	340	452	45	22	-	KC90.9.026
H7	027/273	40	225	250	245	300	452	55	22	-	KC90.9.023
HS	-	40	175	215	260	290	402	25	18	-	KC90.9.025

P901C-F...

Output flanges
flange di uscita

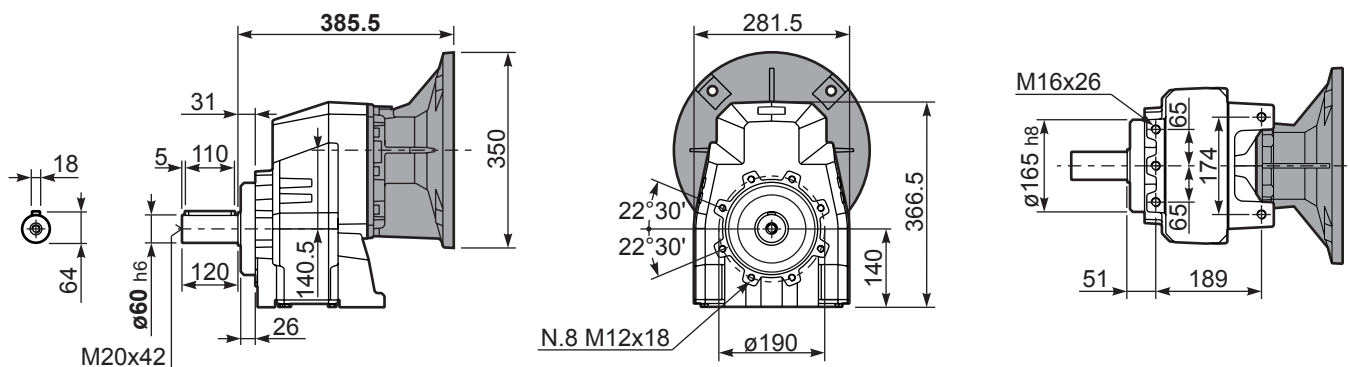
*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 60x120	18	64	M20x42
On request A richiesta	Ø 50x100	14	53.5	M16x36
	-	-	-	-

Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code	
300	230	21	265	4	14	KC90.9.014	With flange and feet only on request. Ask for compatibility
350	250	21	300	5	18	KC90.9.015	
450	350	22	400	5	18	KC90.9.016	

P901C-N...

Basic gearbox
Riduttore base



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	B5 motor flanges				B14 motor flanges				Output Shaft 	Ratios code
							-F	-G	-H	-I	-	-	-	-		
							100 112	132	160	180	-	-	-	-		
234	5.98	22	827	1.2	25.5	1000	B				not available				3015	01
197	7.10	22	982	1.2	25.3	1175	B								3013	02
162	8.63	22	1193	1.1	23.9	1350	B								3011	03
124	11.27	18.5	1310	1.1	20.3	1500	B								2015	04
105	13.38	18.5	1555	1.1	19.4	1700	B								2013	05
92	15.24	18.5	1771	1.1	19.0	1900	B								1615	06
86	16.26	18.5	1889	1.1	19.7	2100	B								2011	07
77	18.09	18.5	2102	1.0	17.7	2100	B								1613	08
71	19.82	15	1865	1.1	15.9	2060	B								1315	09
64	21.98	15	2069	1.0	14.6	2100	B								1611	10
60	23.53	15	2214	0.9	13.6	2100	B								1313	11
58	24.25	11	1677	1.2	12.2	1940	B								1115	12
48.6	28.80	11	1991	1.1	11.1	2100	B								1113	13
40.0	34.99	9	2063	1.0	9.2	2100	B								1111	14
33.6	41.64	7.5	1976	1.0	7.2	1960	B								813	15
27.7	50.60	5.5	1774	1.2	6.3	2100	B								811	16

The dynamic efficiency is **0.96** for all ratios

 **Motor Flanges Available**
Flange Motore Disponibile

 **B) Supplied with Reduction Bushing**
Fornito con Bussola di Riduzione

 **B) Available on Request without reduction bushing**
Disponibile a Richiesta senza Bussola di Riduzione

 **C) Motor Flange Holes Position**
Posizione Fori Flangia Motore

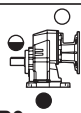
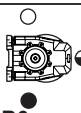
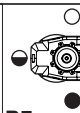
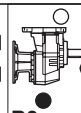
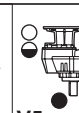
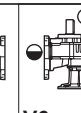
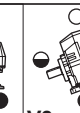
EN Unit **902C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **902C** è fornito privo di lubrificazione con tappi di sfato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **902C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben.
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **902C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **902C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

						
B3	B6	B7	B8	V5	V6	V8
5.90 LT	3.80 LT	3.80 LT	3.40 LT	6.70 LT	4.40 LT	Ask

AGIP Blasias 460

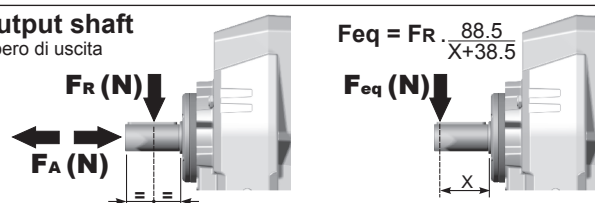
For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita



$$F_{eq} = F_R \cdot \frac{88.5}{x+38.5}$$

$$F_{eq} (N)$$

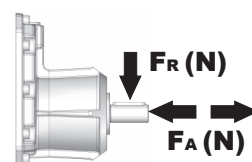
n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	2070	10350	140	2760	13800	70	3450	17250
250	2300	11500	120	2990	14950	40	3680	18400
200	2530	12650	85	3220	16100	15	4600	23000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

Input shaft

Albero in entrata



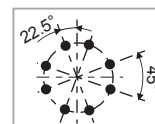
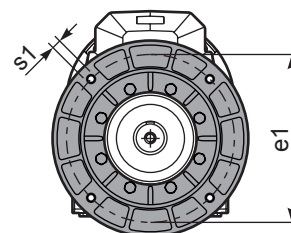
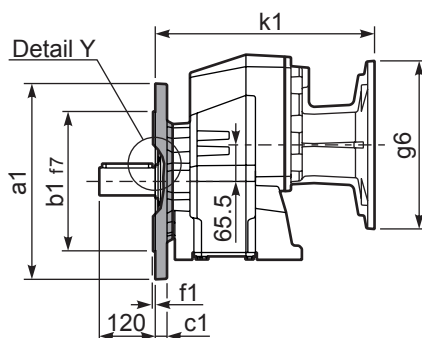
n_1	FA	FR
1400	700	3500
900	840	4200
500	900	4500

tab. 2

Gearbox weight peso riduttore	With flange 98.5 kg With feet 107.0 kg
---	---



Feet Code	Market reference	G	H	R	L	S	H1	O	øI	B5 max. Flange	kit code
B6	612/3	25	195	250	180	300	422	25	18	-	KC90.9.022
B7	702/3	25	210	300	165	350	437	30	22	-	KC90.9.027
S8	87	40	180	215	260	290	407	30	18	-	KC90.9.024
S9	97	40	225	250	310	340	452	45	22	-	KC90.9.026
H7	027/273	40	225	250	245	300	452	55	22	-	KC90.9.023
HS	-	40	175	215	260	290	402	25	18	-	KC90.9.025



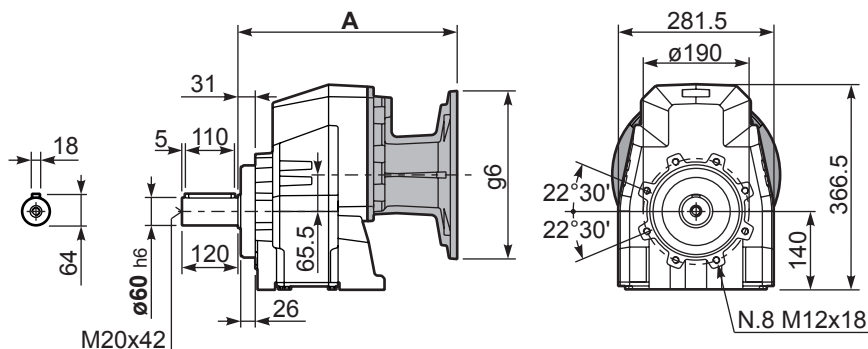
**n° 8 holes
only for
Kit KC909016**
Solo per il
kit KC909016

	Shaft - d1	p1	h1	x
Standard	ø 60x120	18	64	M20x42
On request A richiesta	ø 50x100	14	53.5	M16x36
	-	-	-	-

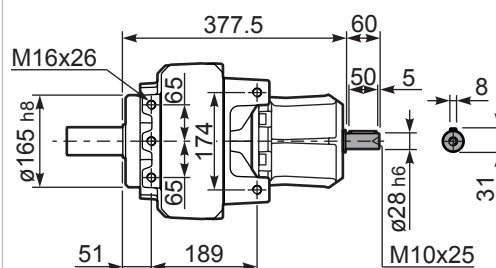
a1 Ø	b1	c1	e1	f1	s1	kit code
300	230	21	265	4	14	KC90.9.014
350	250	21	300	5	18	KC90.9.015
450	350	22	400	5	18	KC90.9.016

With flange and feet only on request. Ask for compatibility.

Input Shaft
Albero in entrata



B5 Motor Flanges	A	C_{max}	g6	k1	kit code
100/112 B5	387	415.5	250	387	-
132 B5	391	440.5	300	391	-
160/180 B5	402	465.5	350	402	-





QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n ₂ [min ⁻¹]	Ratio i	Motor power P _{1M} [kW]	Output torque M _{2M} [Nm]	Service factor f.s.	Nominal power P _{1R} [kW]	Nominal torque M _{2R} [Nm]	Available B5 motor flanges					Available B14 motor flanges					Output Shaft 	 Ratios code
							-C	-D	-E	-F	-G	-R	-T	-U	-V			
							71	80	90	100 112	132	80	90	100 112	132			
28.8	48.55	7.5	2257	0.9	6.7	2100	B								201315	standard ø60	01	
24.3	57.64	5.5	1980	1.1	5.7	2100	B								201313		02	
21.3	65.64	5.5	2255	0.9	5.0	2100	B								161315		03	
20.0	70.04	4	1760	1.2	4.7	2100	B								201311		04	
18.0	77.93	4	1958	1.1	4.2	2100	B								161313		05	
16.4	85.36	4	2145	1.0	3.8	2100	B								131315		06	
14.8	94.70	4	2380	0.9	3.5	2100	B								161311		07	
13.8	101.35	3	1917	1.1	3.2	2100	B								131313		ø50	08
11.4	123.15	3	2330	0.9	2.7	2100	B								131311		On request	09
9.3	150.73	2.2	2100	1.0	2.2	2100	B								111311			10
7.8	179.39	1.5	1722	1.2	1.8	2100	B								81313		11	
6.4	217.98	1.5	2093	1.0	1.5	2100	B								81311		12	
5.7	247.03	1.1	1732	1.1	1.2	1950	B								61313		13	
4.7	300.17	1.1	2105	1.0	1.1	2100	B								61311		14	

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **903C** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **903C** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **903C** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **903C** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **903C** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

						
B3	B6	B7	B8	V5	V6	V8
6.00 LT	4.10 LT	4.10 LT	3.70 LT	7.30 LT	4.90 LT	Ask

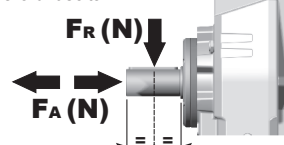
AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

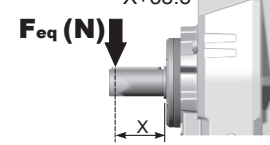
tab. 1

RADIAL AND AXIAL LOADS

Output shaft
Albero di uscita



$$F_{eq} = F_R \cdot \frac{88.5}{X+38.5}$$

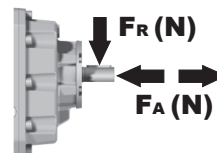


n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	2070	10350	140	2760	13800	70	3450	17250
250	2300	11500	120	2990	14950	40	3680	18400
200	2530	12650	85	3220	16100	15	4600	23000

On request reinforced bearings to increase loads.

A richiesta cuscinetti rinforzati per aumentare i carichi.

Input shaft
Albero in entrata



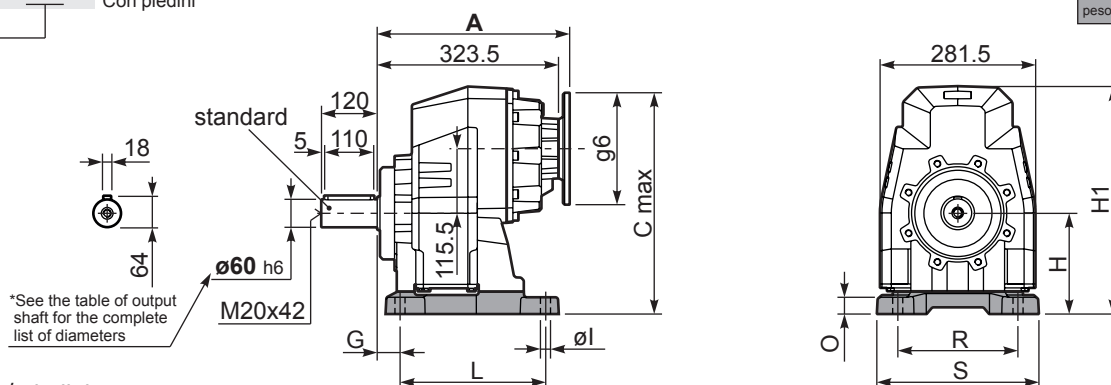
n_1	FA	FR
1400	450	2250
900	500	2500
500	600	3000

tab. 2

P903C**S8**...

With feet
Con piedini

Gearbox weight	With flange 86.0 kg
peso riduttore	With feet 94.5 Kg

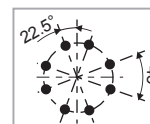
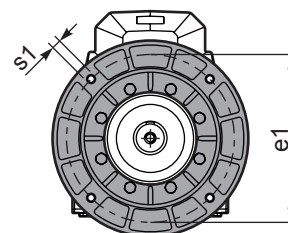
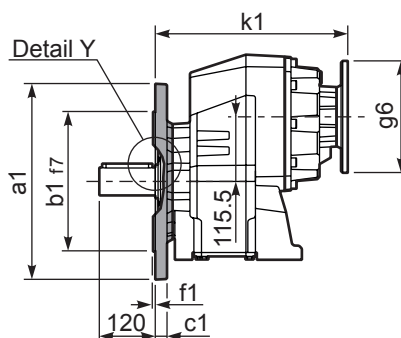
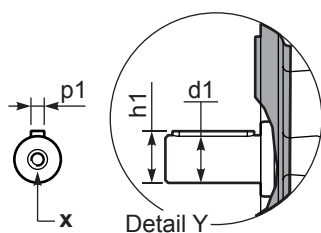


Feet / piedi

Feet Code	Market reference	G	H	R	L	S	H1	O	øI	B5 max. Flange	kit code
B6	612/3	25	195	250	180	300	422	25	18	-	KC90.9.022
B7	702/3	25	210	300	165	350	437	30	22	-	KC90.9.027
S8	87	40	180	215	260	290	407	30	18	-	KC90.9.024
S9	97	40	225	250	310	340	452	45	22	-	KC90.9.026
H7	027/273	40	225	250	245	300	452	55	22	-	KC90.9.023
HS	-	40	175	215	260	290	402	25	18	-	KC90.9.025

P903C-F..

Output flanges
flange di uscita



**n° 8 holes
only for
Kit KC909016**
Solo per il
kit KC909016

***Available output shaft** / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	ø 60x120	18	64	M20x42
On request A richiesta	ø 50x100	14	53.5	M16x36
	-	-	-	-

Available output flanges / flange di uscita

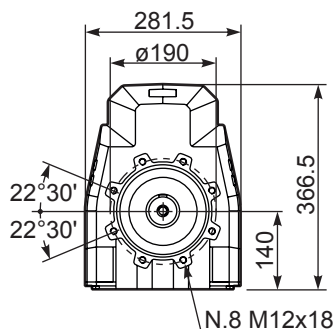
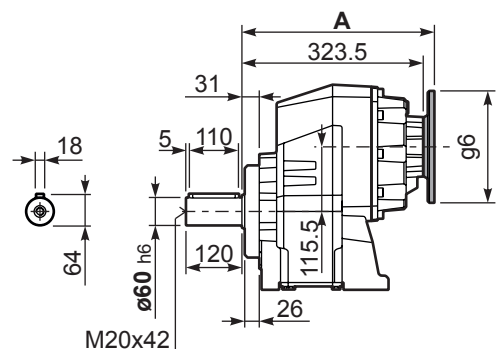
a1 Ø	b1	c1	e1	f1	s1	kit code
300	230	21	265	4	14	KC90.9.014
350	250	21	300	5	18	KC90.9.015
450	350	22	400	5	18	KC90.9.016

With flange and feet only on request. Ask for compatibility

With flange and feet
only on request.
Ask for compatibility

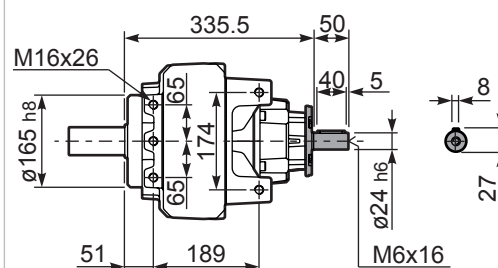
P903C-N...

Basic gearbox
Riduttore base



R903C-N..

Input Shaft
- Albero in entrata



B5 Motor Flanges	A	C _{max}	g6	k1	kit code
71 B5	342	420.5	160	342	KC023.4.041
80/90 B5	344	440.5	200	344	KC023.4.042
100/112 B5	353	465.5	250	353	KC023.4.043
132 B5	371	490.5	300	371	KC50.4.043

B14 Motor Flanges	A	C _{max}	g6	k1	kit code
80 B14	344	400.5	120	344	KC085.4.04
90 B14	344	410.5	140	344	KC085.4.04
100/112 B14	353	420.5	160	353	KC085.4.04
132 B14	371	440.5	200	371	KC50.4.041



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	B5 motor flanges				B14 motor flanges					Output Shaft $\emptyset$	Ratios code
							-G	-H	-I	-L	-	-	-	-			
							132	160	180	200	-	-	-	-			
294	4.75	30	895	1.8	53.0	1650									3914		01
269	5.21	30	980	1.8	51.3	1750									3913		02
220	6.36	30	1197	1.6	45.6	1900									3911		03
188	7.45	30	1401	1.5	43.1	2100									3014		04
172	8.15	30	1535	1.4	39.3	2100									3013		05
141	9.96	30	1874	1.2	33.7	2200									3011		06
120	11.69	30	2200	1.0	30.1	2300									2214		07
109	12.80	30	2409	1.0	27.4	2300									2213		08
90	15.63	22	2161	1.1	23.5	2400									2211	standard $\emptyset 60$	09
79	17.65	22	2441	1.1	22.5	2600									1614		10
72	19.33	22	2673	1.1	22.9	2900									1613		11
67	20.77	22	2872	1.0	21.3	2900									1414		12
62	22.75	18.5	2643	1.1	19.5	2900									1413		13
59	23.60	18.5	2743	1.1	18.8	2900									1611		14
50	27.78	15	2615	1.1	15.9	2900									1411		15
45.5	30.76	15	2896	1.0	14.4	2900									1014		16
41.6	33.69	11	2330	1.2	13.1	2900									1013		17
34.0	41.15	11	2845	1.0	10.8	2900									1011		18

The dynamic efficiency is **0.96** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **1002** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **1002** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **1002** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **1002** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **1002** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético.
Ver tabla 1, para cantidades y aceites recomendados.
En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

B3	B6	B7	B8	V5	V6	V8
4.50 LT	8.00 LT	5.50 LT	6.00 LT	10.00 LT	7.50 LT	Ask

AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

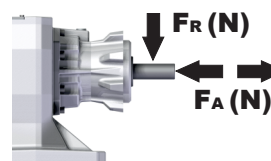
$$F_{eq} = F_R \cdot \frac{117}{X+57}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	2300	11500	140	2980	14900	70	3660	18300
250	2480	12400	120	3180	15900	40	4220	21100
200	2680	13400	85	3440	17200	15	4820	24100

Input shaft

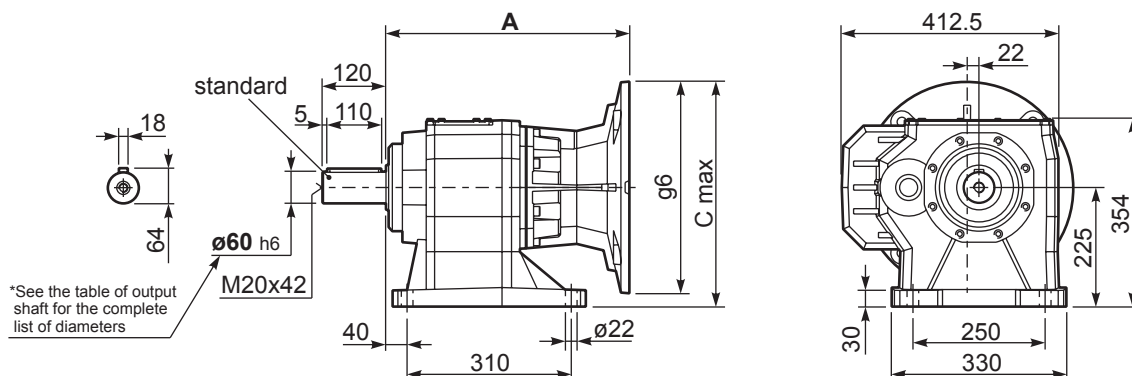
Albero in entrata



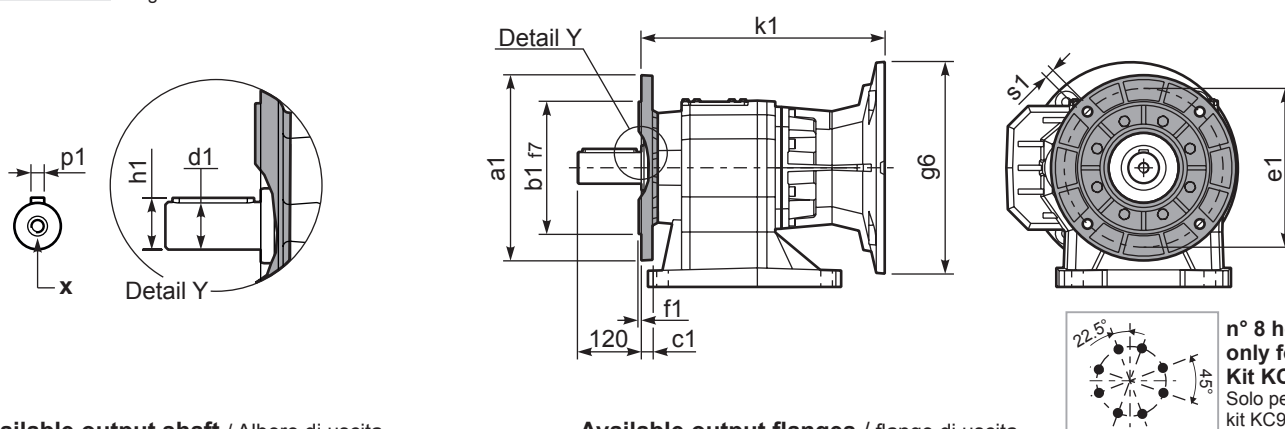
n_1	FA	FR
1400	1120	5600
900	1220	6100
500	1300	6500

tab. 2

P1002S9...

With foot
Con piedinoGearbox weight
peso riduttore 120.0 kg

P1002-F...

Output flanges
flange di uscita

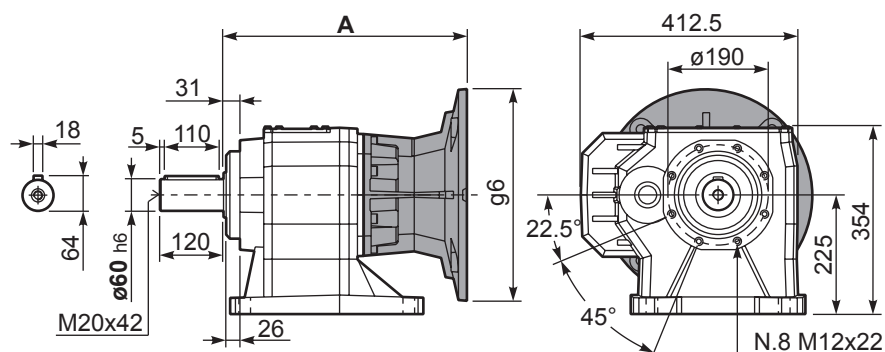
*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 60x120	18	64	M20x42
On request A richiesta	-	-	-	-

Available output flanges / flange di uscita

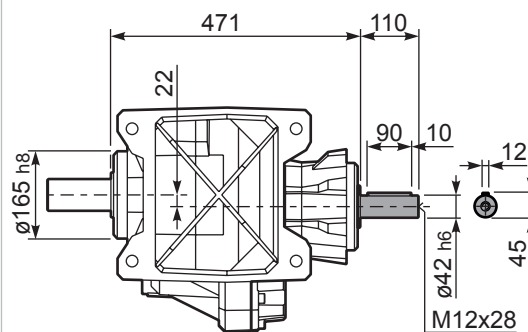
a1 Ø	b1	c1	e1	f1	s1	kit code	
300	230	21	265	4	14	KC90.9.014	 All flanges are compatible with the foot
350	250	21	300	5	18	KC90.9.015	
450	350	22	400	5	18	KC90.9.016	

P1002S9...

Basic gearbox
Riduttore base

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
132 B5	435	375	300	435	KC1109052
160 B5	460	400	350	460	KC1109053
180 B5	460	400	350	460	KC1109053_B
200 B5	460	425	400	460	KC1109054

R1002S9...

Input Shaft
Albero in entrata



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	B5 motor flanges			B14 motor flanges				Output Shaft 	 Ratios code
							-F	-G	-H	-	-	-			
							100 112	132	160	-	-	-			
38.8	36.11	11	2447	1.2	12.5	2900	B			not available			301411	standard ø60	01
27.5	50.89	9	2941	1.0	9.2	3000	B						201414		02
25.1	55.73	7.5	2591	1.2	8.4	3000	B						201413		03
20.3	68.80	7.5	3199	0.9	6.8	3000	B						161414		04
18.6	75.35	5.5	2589	1.2	6.2	3000	B						161413		05
15.6	89.47	5.5	3074	1.0	5.2	3000	B						131414		06
15.2	92.02	5.5	3161	0.9	5.1	3000	B						161411		07
14.3	97.99	4	2462	1.2	4.8	3000	B						131413		08
12.8	109.52	4	2752	1.1	4.3	3000	B						111414		09
11.7	119.94	4	3014	1.0	3.9	3000	B						111413		10
9.6	146.47	3	2771	1.1	3.2	3000	B						111411		11
8.8	158.37	3	2996	1.0	3.0	3000	B						81414		12
8.1	173.45	2.2	2416	1.2	2.7	3000	B						81413		13
6.6	211.82	2.2	2951	1.0	2.2	3000	B						81411		14

The dynamic efficiency is **0.94** for all ratios

 **Motor Flanges Available**
Flange Motore Disponibili

 **B) Supplied with Reduction Bushing**
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

 **C) Motor Flange Holes Position**
Posizione Fori Flangia Motore

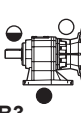
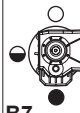
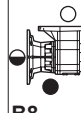
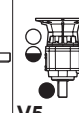
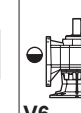
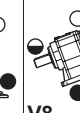
EN Unit **1003** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **1003** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **1003** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **1003** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **1003** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

						
B3	B6	B7	B8	V5	V6	V8
5.00 LT	9.00 LT	6.50 LT	6.50 LT	11.00 LT	9.00 LT	Ask

AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

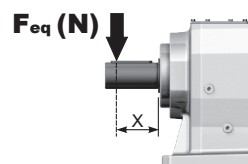
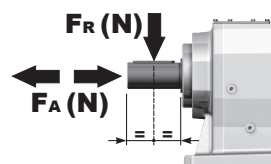
tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

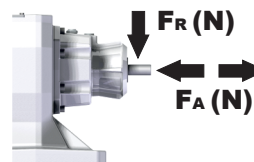
$$F_{eq} = F_R \cdot \frac{117}{X+57}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	2300	11500	140	2980	14900	70	3660	18300
250	2480	12400	120	3180	15900	40	4220	21100
200	2680	13400	85	3440	17200	15	4820	24100

Input shaft

Albero in entrata



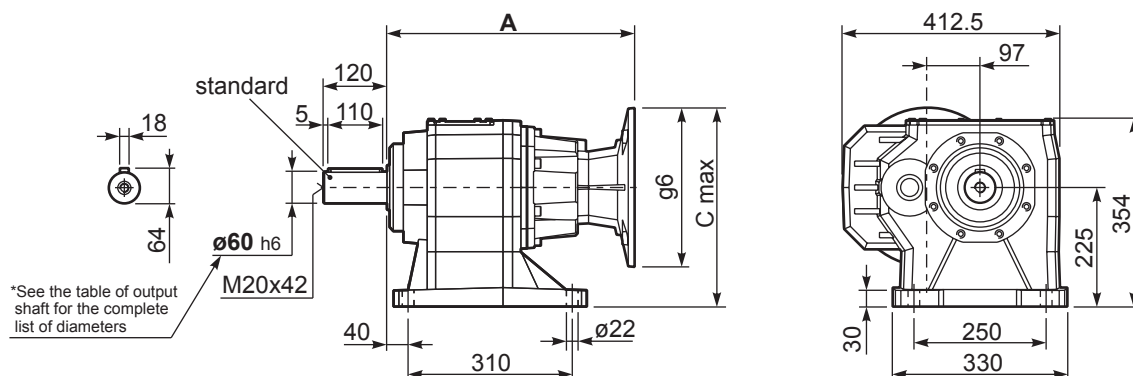
n_1	FA	FR
1400	700	3500
900	840	4200
500	900	4500

tab. 2

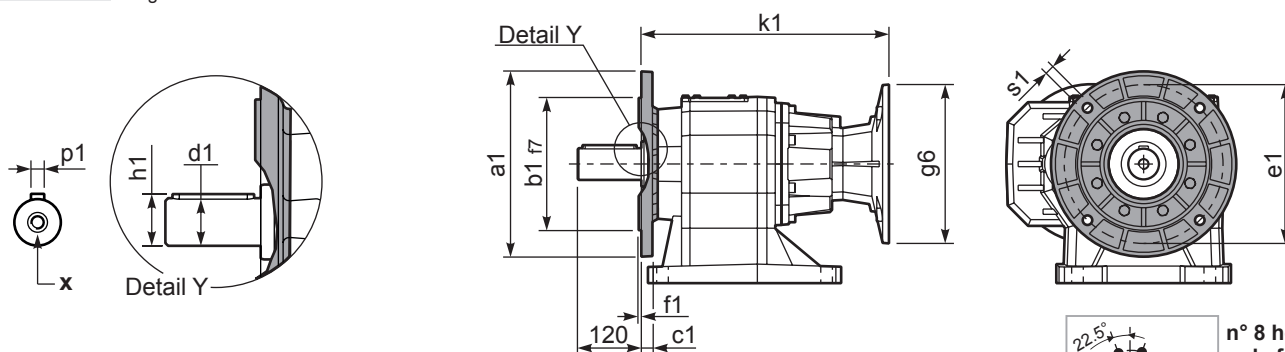
P1003S9...

With foot
Con piedinoGearbox
weight
peso riduttore

116 kg



P1003-F...

Output flanges
flange di uscita

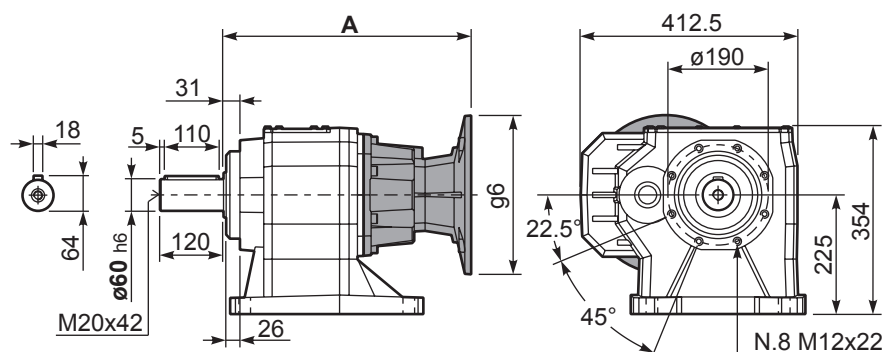
*Available output shaft / Albero di uscita

	Shaft - d1	p1	h1	x
Standard	Ø 60x120	18	64	M20x42
On request A richiesta	-	-	-	-

Available output flanges / flange di uscita

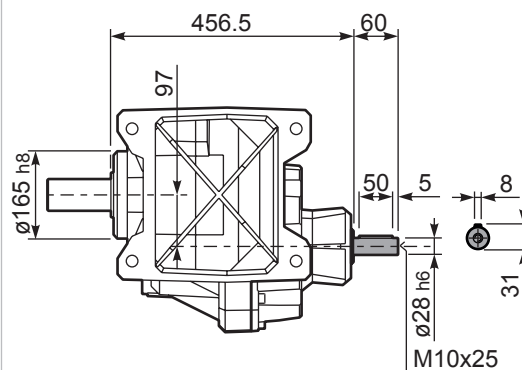
a1 Ø	b1	c1	e1	f1	s1	kit code	
300	230	21	265	4	14	KC90.9.014	 All flanges are compatible with the foot
350	250	21	300	5	18	KC90.9.015	
450	350	22	400	5	18	KC90.9.016	

P1003S9...

Basic gearbox
Riduttore base

B5 Motor Flanges	A	C _{max}	g6	k1	kit code
100/112 B5	468	350	250	468	KC1109056
132 B5	468	375	300	468	KC1109057
160 B5	483	400	350	483	KC1109058

R1003S9...

Input Shaft
Albero in entrata



QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	B5 motor flanges					B14 motor flanges			Output Shaft 	Ratios code 
							-G	-H	-I	-L	CA	-	-	-		
							132	160	180	200	225	-	-	-		
294	4.75	45	1333	2.0	86.7	2700									3914	01
269	5.21	45	1460	1.9	82.1	2800									3913	02
220	6.36	45	1783	1.7	72.0	3000									3911	03
188	7.45	45	2088	1.6	67.7	3300									3014	04
172	8.15	45	2287	1.5	63.7	3400									3013	05
141	9.96	45	2792	1.3	55.2	3600									3011	06
120	11.69	45	3277	1.2	49.7	3800									2214	07
109	12.80	45	3589	1.1	47.7	4000									2213	08
90	15.63	45	4383	1.0	42.0	4300									2211	09
79	17.65	37	4068	1.1	38.9	4500									1614	10
72	19.33	37	4455	1.0	35.6	4500									1613	11
67	20.77	30	3910	1.2	33.1	4500									1414	12
62	22.75	30	4282	1.1	30.2	4500									1413	13
59	23.60	30	4443	1.0	29.1	4500									1611	14
50	27.78	22	3842	1.2	24.7	4500									1411	15
45.5	30.76	22	4255	1.1	22.3	4500									1014	16
41.6	33.69	22	4660	1.0	20.4	4500									1013	17
34.0	41.15	18.5	4781	0.9	16.7	4500									1011	18

The dynamic efficiency is **0.96** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

EN Unit **1102** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **1102** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **1102** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **1102** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **1102** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

						
B3	B6	B7	B8	V5	V6	V8
6.50 LT	12.50 LT	7.50 LT	8.50 LT	14.50 LT	11.50 LT	Ask

AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

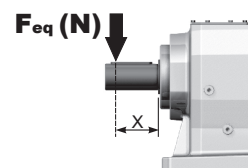
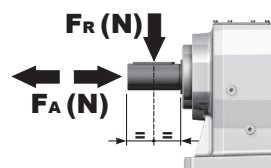
tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

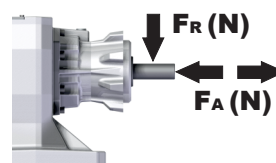
$$F_{eq} = F_R \cdot \frac{138}{X+68}$$



n_2	FA	FR	n_2	FA	FR	n_2	FA	FR
300	2600	13000	140	3300	16500	70	4300	21500
250	2700	13500	120	3500	17500	40	5000	25000
200	3000	15000	85	3900	19500	15	5900	29500

Input shaft

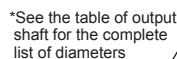
Albero in entrata



n_1	FA	FR
1400	1120	5600
900	1220	6100
500	1300	6500

tab. 2

Gearbox weight peso riduttore	165 kg
---	---------------



Technical drawing of the 1000 series motor showing front, side, and detail views with dimensions.

Front View (Left): Shows the circular motor frame with dimensions $p1$ (terminal spacing) and x (center-to-center distance).

Side View (Middle): Shows the motor profile with dimensions $a1$ (total height), $b1$ (height to top of terminal box), $f7$ (height to base of terminal box), $h1$ (height of terminal box), $d1$ (terminal box width), $k1$ (total length), and $g6$ (height of base flange).

Detail Y (Top Left): A circular detail view of the terminal box connection, showing dimensions $h1$ and $d1$.

Detail Y (Bottom): A side detail view of the terminal box connection, showing dimensions $f1$ (height to top of terminal box) and $c1$ (height to base of terminal box).

Top View (Right): Shows the circular motor frame with dimensions $s1$ (terminal spacing) and $e1$ (total width).

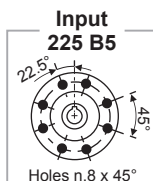
	Shaft - d1	p1	h1	x
Standard	ø 70x140	20	74.5	M20x42
On request A richiesta	-	-	-	-

a1 Ø	b1	c1	e1	f1	s1	kit code
350	250	21	300	5	18	KC110.9.015
450	350	22	400	5	18	KC110.9.016
-	-	-	-	-	-	-



All flanges are compatible with the foot

B5 Motor Flanges	A	C_{max}	g6	k1	kit code
132 B5	485.5	400	300	485.5	KC1109052
160 B5	510.5	425	350	510.5	KC1109053
180 B5	510.5	425	350	510.5	KC1109053_B
200 B5	510.5	450	400	510.5	KC1109054
225 B5	537.5	475	450	537.5	KC1109055





QUICK SELECTION / Selezione veloce

input speed (n_1) = 1400 min⁻¹

Output Speed n_2 [min ⁻¹]	Ratio i	Motor power P_{1M} [kW]	Output torque M_{2M} [Nm]	Service factor f.s.	Nominal power P_{1R} [kW]	Nominal torque M_{2R} [Nm]	Available B5 motor flanges				B14 motor flanges			Output Shaft  $\varnothing$	Ratios code 
							-F	-G	-H	-I	-	-	-		
							100 112	132	160	180	-	-	-		
38.8	36.11	18.5	4113	1.1	19.4	4500	B				not available			301411	01
27.5	50.89	15	4694	1.0	14.1	4600	B							201414	02
25.1	55.73	11	3777	1.2	12.9	4600	B							201413	03
20.3	68.80	11	4662	1.0	10.4	4600	B							161414	04
18.6	75.35	9	4354	1.1	9.5	4600	B							161413	05
15.6	89.47	7.5	4160	1.1	8.0	4600	B							131414	06
15.2	92.02	7.5	4278	1.1	7.6	4500	B							161411	07
14.3	97.99	7.5	4556	1.0	7.3	4600	B							131413	08
12.8	109.52	5.5	3762	1.2	6.6	4600	B							111414	09
11.7	119.94	5.5	4120	1.1	6.0	4600	B							111413	10
9.6	146.47	4	3681	1.2	4.8	4500	B							111411	11
8.8	158.37	4	3980	1.2	4.5	4600	B							81414	12
8.1	173.45	4	4359	1.1	4.1	4600	B							81413	13
6.6	211.82	3	4007	1.1	3.3	4500	B							81411	14

The dynamic efficiency is **0.94** for all ratios

Motor Flanges Available
Flange Motore Disponibili

B) Supplied with Reduction Bushing
Fornito con Bussola di Riduzione

B) Available on Request without reduction bushing
Disponibile a Richiesta senza Bussola di Riduzione

C) Motor Flange Holes Position
Posizione Fori Flangia Motore

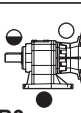
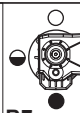
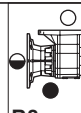
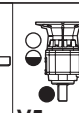
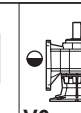
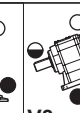
EN Unit **1103** is supplied without lubricant and equipped with a breather, level and drain plugs. User can add mineral oil keeping existing plugs. Should the user wish to fill it with synthetic oil, it is recommended to replace the existing plugs with a closed plug.
See table 1 for lubrication and recommended quantity.
In table 2 please see possible radial loads and axial loads on the gearbox.

I Il riduttore tipo **1103** è fornito privo di lubrificazione con tappi di sfiato, livello e scarico olio. L'utente può immettere olio minerale mantenendo i tappi esistenti. Se immetterà olio sintetico, dovrà sostituire i tappi esistenti con altri tipo chiuso.
Tab.1 per oli e quantità consigliati.
Tab.2 carichi radiali e assiali applicabili al riduttore.

D Das Getriebe der Baugröße **1103** wird ohne Schmiermittel geliefert. Es ist jedoch mit Einfüllschraube, Überdruckventil und Ablassschraube ausgerüstet. Das benötigte mineralische Öl kann über die Einfüllschraube eingefüllt werden. Sollte synthetisches Öl bevorzugt werden, so ist sind das eingebaute Überdruckventil durch eine geschlossenen Schraube zu ersetzen.
In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben
In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

F Le réducteur de type **1103** est fourni sans lubrification et avec un bouchon de remplissage, de niveau et d'évacuation de l'huile. L'utilisateur peut y verser de l'huile minérale en conservant les bouchons existants. S'il y versera de l'huile synthétique, il devra substituer les bouchons existants avec d'autres bouchons de type fermé.
Voir tableau 1 concernant les huiles et les quantités conseillées.
Voir tableau 2 concernant les charges radiales et axiales applicables au réducteur

E El reductor tamaño **1103** se suministra sin lubricante, provisto de tapones de respiración, nivel y descarga de aceite. El usuario puede utilizar aceite mineral, manteniendo los tapones existentes. Si prefiere utilizar aceite sintético deberá sustituir los tapones existentes por tapones ciegos. La prerreducción se suministra con tapones ciegos, lubricado de por vida con aceite sintético. Ver tabla 1, para cantidades y aceites recomendados. En la tabla 2, se encuentran las cargas radiales y axiales admitidas por el reductor.

						
B3	B6	B7	B8	V5	V6	V8
7.00 LT	13.00 LT	8.00 LT	9.00 LT	16.00 LT	13.50 LT	Ask

AGIP Blasias 460

For all details on lubrication and plugs check our website
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

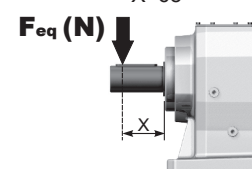
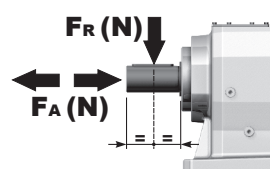
tab. 1

RADIAL AND AXIAL LOADS

Output shaft

Albero di uscita

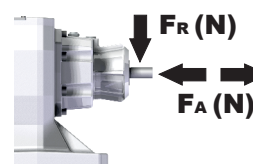
$$F_{eq} = F_R \cdot \frac{138}{X+68}$$



n_2	F_A	F_R	n_2	F_A	F_R	n_2	F_A	F_R
300	2600	13000	140	3300	16500	70	4300	21500
250	2700	13500	120	3500	17500	40	5000	25000
200	3000	15000	85	3900	19500	15	5900	29500

Input shaft

Albero in entrata



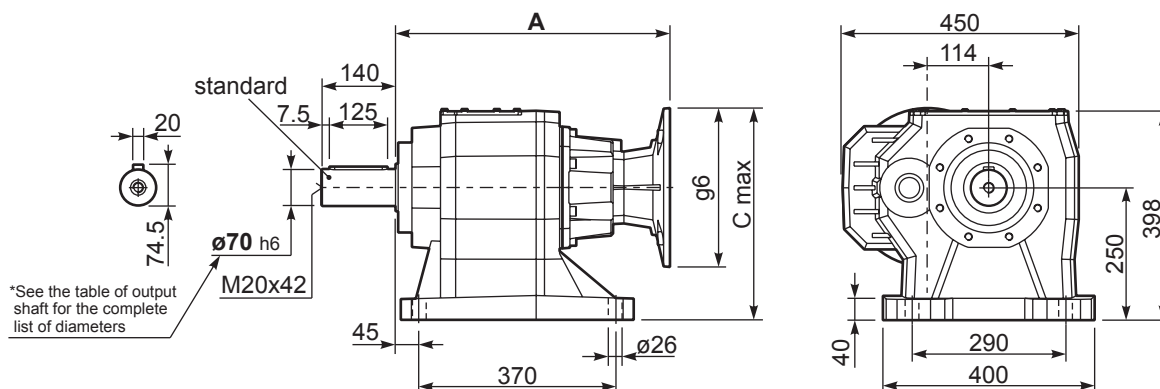
n_1	F_A	F_R
1400	700	3500
900	840	4200
500	900	4500

tab. 2

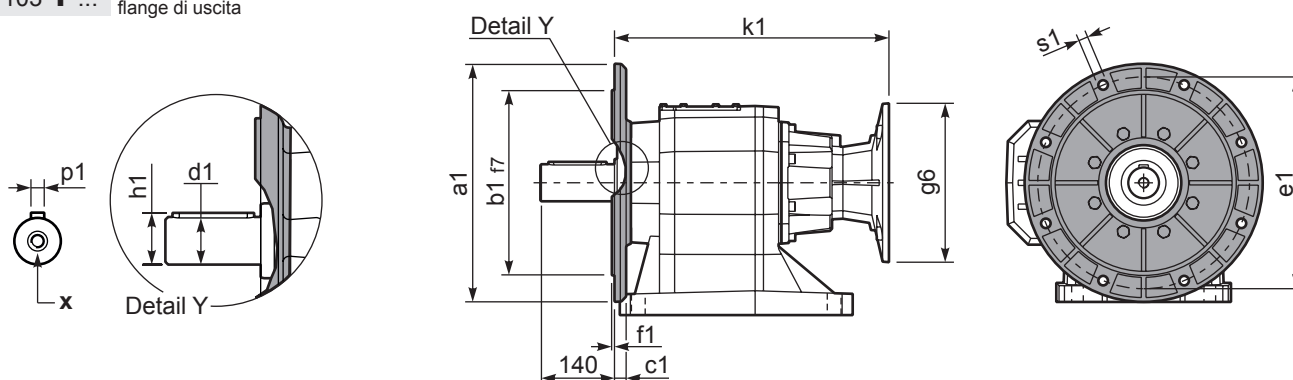
P1103S0...

With foot
Con piedinoGearbox
weight
peso riduttore

156 kg



P1103-F...

Output flanges
flange di uscita

*Available output shaft / Albero di uscita

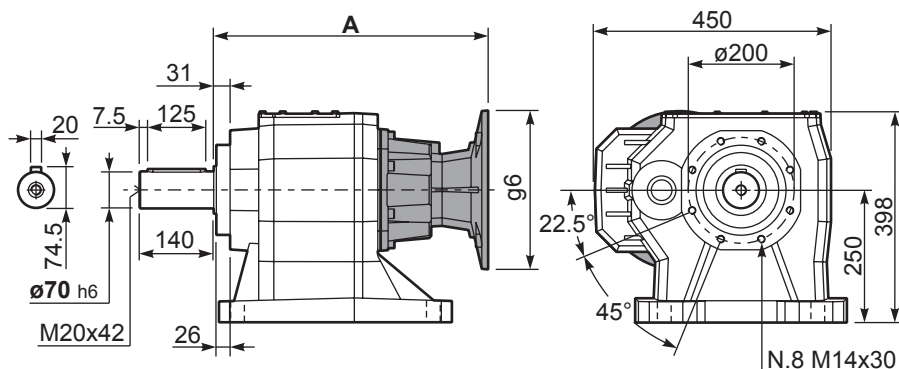
	Shaft - d1	p1	h1	x
Standard	Ø 70x140	20	74.5	M20x42
On request A richiesta	-	-	-	-

Available output flanges / flange di uscita

a1 Ø	b1	c1	e1	f1	s1	kit code
350	250	21	300	5	18	KC110.9.015
450	350	22	400	5	18	KC110.9.016
-	-	-	-	-	-	-

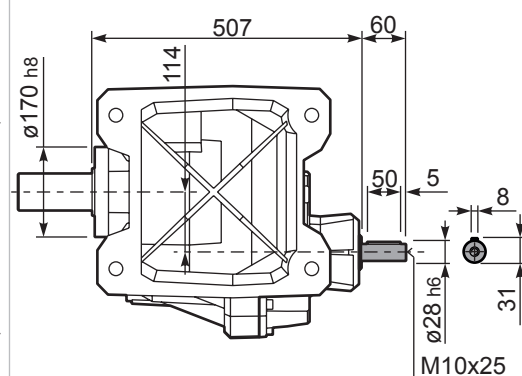
All flanges are compatible with the foot

P1103S0...

Basic gearbox
Riduttore base

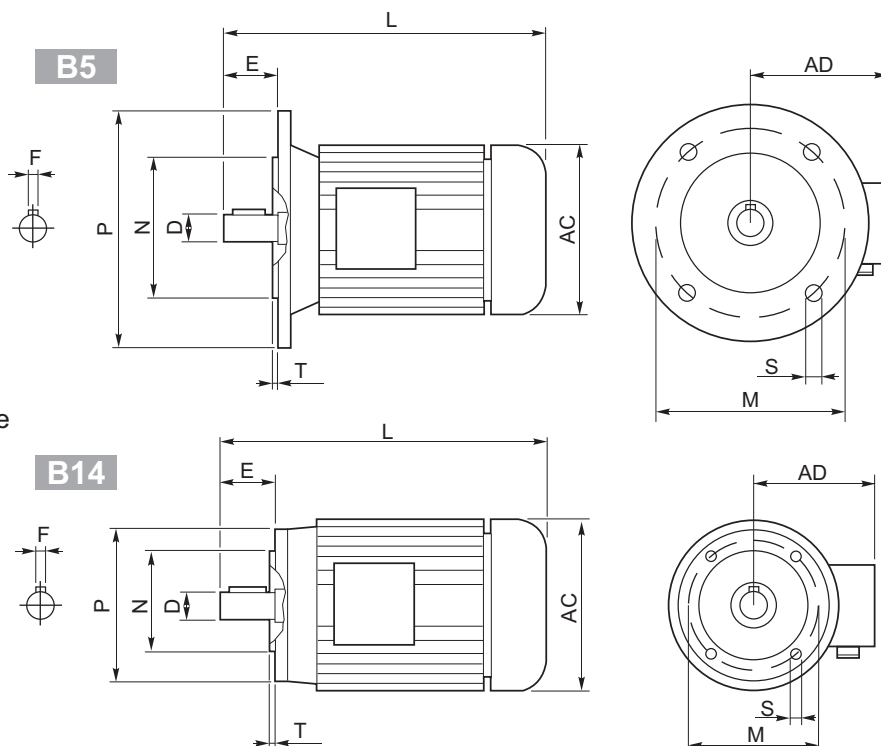
B5 Motor Flanges	A	C _{max}	g6	k1	kit code
100/112 B5	518.5	375	250	518.5	KC1109056
132 B5	518.5	400	300	518.5	KC1109057
160 B5	533.5	425	350	533.5	KC1109058
180 B5	533.5	425	350	533.5	KC1109058_B

R1103S0...

Input Shaft
Albero in entrata



- 1) 230/400V - 50Hz motore trifase asincrono
- 2) Isolamento Classe F
- 3) S1 servizio continuo
- 4) Protezione IP 55
- 5) Non verniciato
- 6) Manicotto di protezione per l'albero motore



Le dimensioni esterne e il peso sono indicative, possono variare tra i vari costruttori.

	2 poli / poles			4 poli / poles			6 poli / poles			B5-B14						B5					B14					Kg
	kW	Nm	A (400V)	kW	Nm	A (400V)	kW	Nm	A (400V)	D	F	E	L	AC	AD	N	M	P	S	T	N	M	P	S	T	
56 A	0.09	0.32	0.38	0.06	0.44	0.27	—	—	—	9	3	20	199	108	96	80	100	120	7	2.5	50	65	80	M5	2.5	2.7
56 B	0.12	0.42	0.46	0.09	0.67	0.37	—	—	—																	2.9
63 A	0.18	0.63	0.60	0.12	0.84	0.50	0.09	0.99	0.57	11	4	23	208	120	99	95	115	140	9.5	3	60	75	90	M5	2.5	3.8
63 B	0.25	0.87	0.76	0.18	1.30	0.69	0.12	1.32	0.74																	4.2
71 A	0.37	1.30	1.00	0.25	1.70	0.91	0.18	1.90	0.80	14	5	30	-	130	104	110	130	160	9.5	3.5	70	85	105	M6	2.5	5.9
71 B	0.55	1.90	1.54	0.37	2.52	1.14	0.25	2.72	1.10				255	141	107											6.5
80 A	0.75	2.60	1.85	0.55	3.77	1.51	0.37	3.84	1.18	19	6	40	296	159	127	130	165	200	11.5	3.5	80	100	120	M6	3	8.5
80 B	1.1	3.90	2.64	0.75	5.11	2.57	0.55	5.84	1.80																	10
90 S	1.5	5.00	3.31	1.1	7.45	2.78	0.75	7.92	2.32	24	8	50	-	170	135	130	165	200	11.5	3.5	95	115	140	M8	3	12.5
90 L	2.2	7.50	4.46	1.5	10.2	3.61	1.1	11.6	3.45				330													15
100 LA	3.0	10.0	6.28	2.2	14.8	5.07	1.5	15.4	3.88	28	8	60	-	190	148	180	215	250	13	4	110	130	160	M8	3.5	20
100 LB	—	—	—	3.0	20.1	6.66	—	—	—				22													
112 M	4.0	13.4	8.10	4.0	26.7	8.55	2.2	22.6	5.30				381	210	164											35
132 S	5.5	18.3	11.2	5.5	36.5	11.4	3.0	30.2	7.20	38	10	80	455	244	180	230	265	300	14	4	130	165	200	M10	4	41
		7.5	24.9										15.3													500
132 M	—	—	—	7.5	49.4	15.0	4.0	40.0	9.13				500													51
				9	61.4	18.5																				
160 M	—	—	—	11	72	21.5	—	—	—	42	12	110	613	335	246	250	300	350	18	5	—	—	—	—	—	79.2
160 L	—	—	—	15	98	29	—	—	—				657													97.5
180 M	—	—	—	18.5	121	35.5	—	—	—	48	14	110	712	366	266	250	300	350	19	5	—	—	—	—	—	170
180 L	—	—	—	22	144	42	—	—	—				780													405
200 L	—	—	—	30	196	53	—	—	—	60	18	140	888	463	360	350	400	450	19	5	—	—	—	—	—	305
225 S	—	—	—	37	240	69	—	—	—																	
225 M	—	—	—	45	292	84	—	—	—																	

**Protection**

Standard IP55

Please specify on purchase orders if you need a higher IP protection class.

Grado di protezione

IP55 Standard

Specificare in sede di ordinazione per IP superiore.

Schutzart

IP55 Standard.

Höheren IP Grad bitte im Auftrag angeben.

Degré de protection

IP55 standard.

Au moment de la commande, spécifiez si vous souhaitez IP supérieur.

Grado de protección

IP55 standard.

Especificar en el pedido cuando necesiten protección IP superior.

Insulation

Standard Cl.F

To be specified upon placing the order if different insulation is required.

Isolamento

Cl.F Standard

Specificare in sede di ordinazione classe di isolamento diversa.

Isolierung

Cl.F Standard.

Davon abweichende Isolierungsklasse im Auftrag angeben.

Isolement

Cl.F Standard.

Au moment de la commande, spécifiez si vous souhaitez une classe d'isolement différente.

Aislamiento

Cl.F standard.

Especificar al efectuar el pedido la clase diferente de aislamiento.

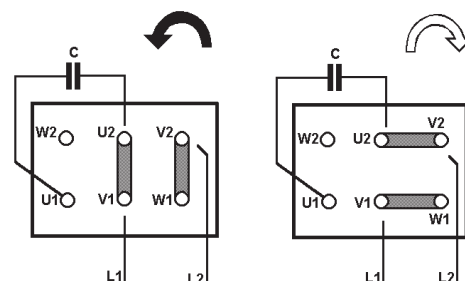
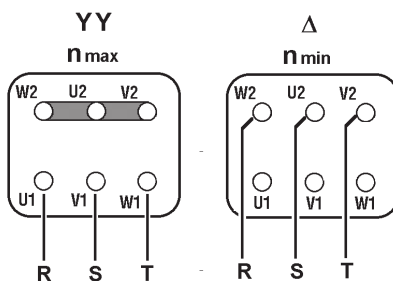
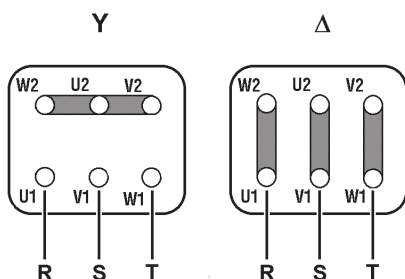
Insulation / Isolamento Isolierung / Aislamiento		E	B	F	H
Max. temp.	C°	120°	130°	155°	175°
	F*	248°	266°	311°	347°

Connections**Collegamenti****Verbindungselemente****Branchements****Conexiones**

Threephase asynchronous single polarity
Asincrono trifase singola polarità
Asynchronmotor 3-ph eine Drehzahl
Moteur triphasé à une vitesse
Asincrono trifasico de una velocidad

Threephase asynchronous double polarity
Asincrono trifase doppia polarità
Asynchronmotor 3-ph doppelte Drehzahl
Moteur triphasé à deux vitesses
Asincrono trifasico de dos velocidades

Single phase asynchronous
Asincrono monofase
Einphasen-Asynchronmotor
Moteur monophasé
Asincrono monofasico



[illegible]

Please Read Carefully

The following WARNING and CAUTION information is supplied to you for your protection and to provide you with many years of trouble free and safe operation of your product.

Read ALL instructions prior to operating reducer. Injury to personnel or reducer failure may be caused by improper installation, maintenance or operation.

WARNING:

- Written authorization is required to operate or use reducers in man lift or people moving devices.
- Check to make sure that certain applications do not exceed the allowable load capacities published in the current catalog.
- Buyer shall be solely responsible for determining the adequacy of the product for any and all uses to which Buyer shall apply the product. The application by Buyer shall not be subject to any implied warranty of fitness for a particular purpose.
- For safety, Buyer or User should provide protective guards over all shaft extensions and any moving apparatus mounted thereon. The User is responsible for checking all applicable safety codes in his area and providing suitable guards. Failure to do so may result in bodily injury and/or damage to equipment.
- Gearboxes operating in high position should have a protective shield for any possible parts falling down for casual accidents where people are moving under them.
- Hot oil and reducers can cause severe burns. Use extreme care when removing lubrication plugs and vents.
- Make certain that the power supply is disconnected before attempting to service or remove any components. Lock out the power supply and tag it to prevent unexpected application power.
- Reducers are not to be considered fail safe or self-locking devices. If these features are required, a properly sized, independent holding device should be utilized. Reducers should not be used as a brake.
- Any brakes that are used in conjunction with a reducer must be sized or positioned in such a way so as to not subject the reducer to loads beyond the catalog rating.
- Lifting supports including eyebolts are to be used for vertically lifting the gearbox only and not other associated attachments or motors.
- Use of an oil with an EP additive on units with backstops may prevent proper operation of the backstop. Injury to personnel, damage to the reducer or other equipment may result.
- Overhung loads subject shaft bearings and shafts to stress which may cause premature bearing failure and or shaft breakage from bending fatigue, if not sized properly.

SELLING CONDITIONS

Warranty for manufacturing defects will expire one-year the invoicing date. Hydro-Mec will replace or repair defective parts but will not accept any further changes for direct or indirect damages of any kind. The warranty will become null and void if repairs or changes are carried out without our prior written authorization.

Our company will not be responsible for any direct or indirect damages, caused by a wrong use of the products or for not observing the catalogue/web indication

Leggere attentamente

Le seguenti raccomandazioni sono fondamentali per la vostra protezione e per garantirvi molti anni di sicuro funzionamento del vostro prodotto senza alcun problema.

Leggere attentamente tutte le istruzioni prima di azionare il riduttore. L'inappropriata installazione, manutenzione o funzionamento del riduttore può causare incidenti al personale addetto e danni al riduttore stesso.

ATTENZIONE:

- E' richiesta autorizzazione scritta per azionare riduttori in ascensori o dispositivi per il movimento delle persone.
- Controllare che alcune applicazioni non eccedano la massima capacità di carico ammessa pubblicata in questo catalogo.
- L'acquirente è l'unico responsabile per la determinazione dell'adeguatezza del prodotto per qualcuna o tutte le utilizzazioni che l'acquirente stesso farà del riduttore. L'applicazione dell'acquirente non potrà essere soggetta ad alcuna implicita garanzia di montaggio per uno scopo particolare.
- Per ragioni di sicurezza l'acquirente dovrà provvedere a porre protezioni adeguate su tutta la lunghezza dell'albero a tutti gli organi in movimento. L'utilizzatore è responsabile del controllo di tutti i codici di sicurezza e la predisposizione di protezioni adeguate. In assenza di tali precauzioni si possono verificare incidenti alle persone e danni agli apparati.
- Su riduttori installati in posizioni elevate utilizzare protezioni adeguate per qualsiasi distacco accidentale di parti nel caso di passaggio di persone al di sotto.
- Olio e riduttori bollenti possono causare gravi ustioni. Usare estrema cautela nella rimozione dei tappi e delle ventole.
- Assicurarsi che la corrente di alimentazione sia scollegata prima di riparare o rimuovere alcun componente. Chiudere l'alimentazione e contrassegnare tale operazione per evitare accensioni accidentali.
- I riduttori non devono essere considerati esenti da guasti o a bloccaggio automatico. Se sono indispensabili queste caratteristiche, deve essere utilizzato un dispositivo indipendente della dimensione adatta. I riduttori non devono essere utilizzati come freni.
- Qualsiasi freno sia utilizzato insieme al riduttore deve essere della giusta grandezza e posizionato in modo da non causare carichi eccessivi non previsti dai dati forniti nel catalogo.
- I dispositivi di sollevamento come le golfare devono essere usati solo per sollevare verticalmente il riduttore e non altri dispositivi associati o motori.
- L'utilizzo di un olio con un additivo EP su gruppi provvisti di dispositivo di arresto possono inficiare l'uso corretto del freno e provocare danni alle persone, alle cose ed al riduttore stesso nonché ad altri apparecchi.
- I Carichi sospesi assoggettano i cuscinetti della vite e la vite stessa a sollecitazioni che possono causare, se non adeguatamente dimensionati, l'usura prematura dei cuscinetti e/o la rottura della vite a causa della resistenza alla flessione.

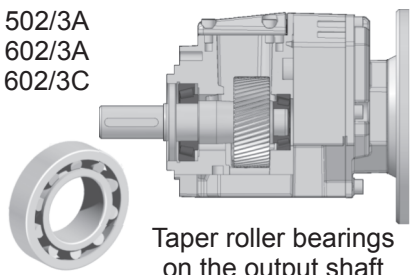
CONDIZIONI DI VENDITA

La garanzia relativa a difetti di costruzione ha la durata di un anno dalla data di fatturazione della merce. Tale garanzia comporta per Hydro-mec l'onere della sostituzione o riparazione delle parti difettose ma non ammette ulteriori addebiti per eventuali danni diretti o indiretti di qualsiasi natura. La garanzia decade nel caso in cui siano state eseguite riparazioni o apportate modifiche senza nostro consenso scritto.

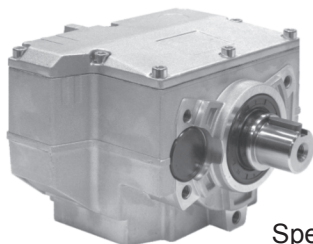
La nostra ditta non si ritiene responsabile per eventuali danni diretti o indiretti derivanti da un uso improprio dei prodotti e dalla mancata osservanza delle indicazioni riportate a catalogo o web..

New options available

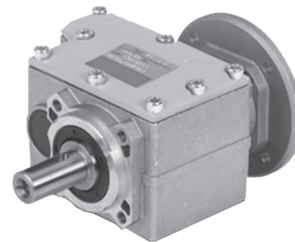
502/3A
602/3A
602/3C



Taper roller bearings
on the output shaft

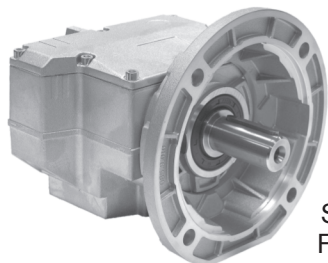


Special
output shaft

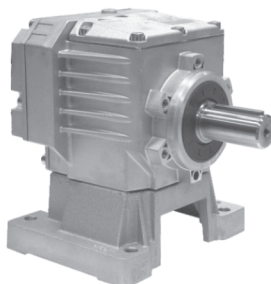


202A
302A
452A

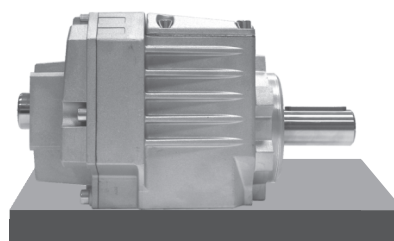
Special Compact types



Special
Flanges



Special
Feet



Compact base locking

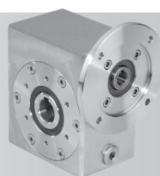
Others HYDRO-MEC products



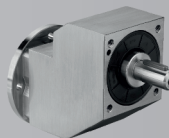
Worm gearboxes
Rid. a vite senza fine



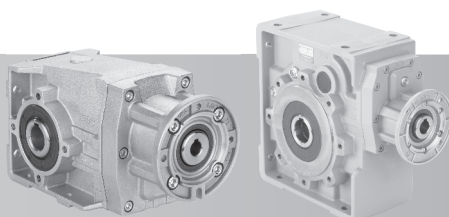
Square worm gearboxes
Rid. a vite senza fine quadro



Stainless steel worm gearboxes
Rid. a vite senza fine Inox



Stainless steel one step gearbox
Riduttore uno stadio Inox

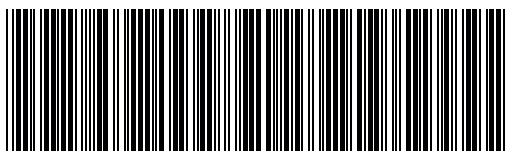


Helical bevel gearboxes
Rid. a coppia conica

Distributed From:

HYDRO-MEC

Via della tecnica, 19
36050 SOVIZZO (VI) ITALY
Tel.: +39 0444 551911
Fax: +39 0444 536139
e-mail: hydromec@hydromec.com
Website: www.hydromec.com



* CT - RCM- WO- HM0 1 7