

# Angletech

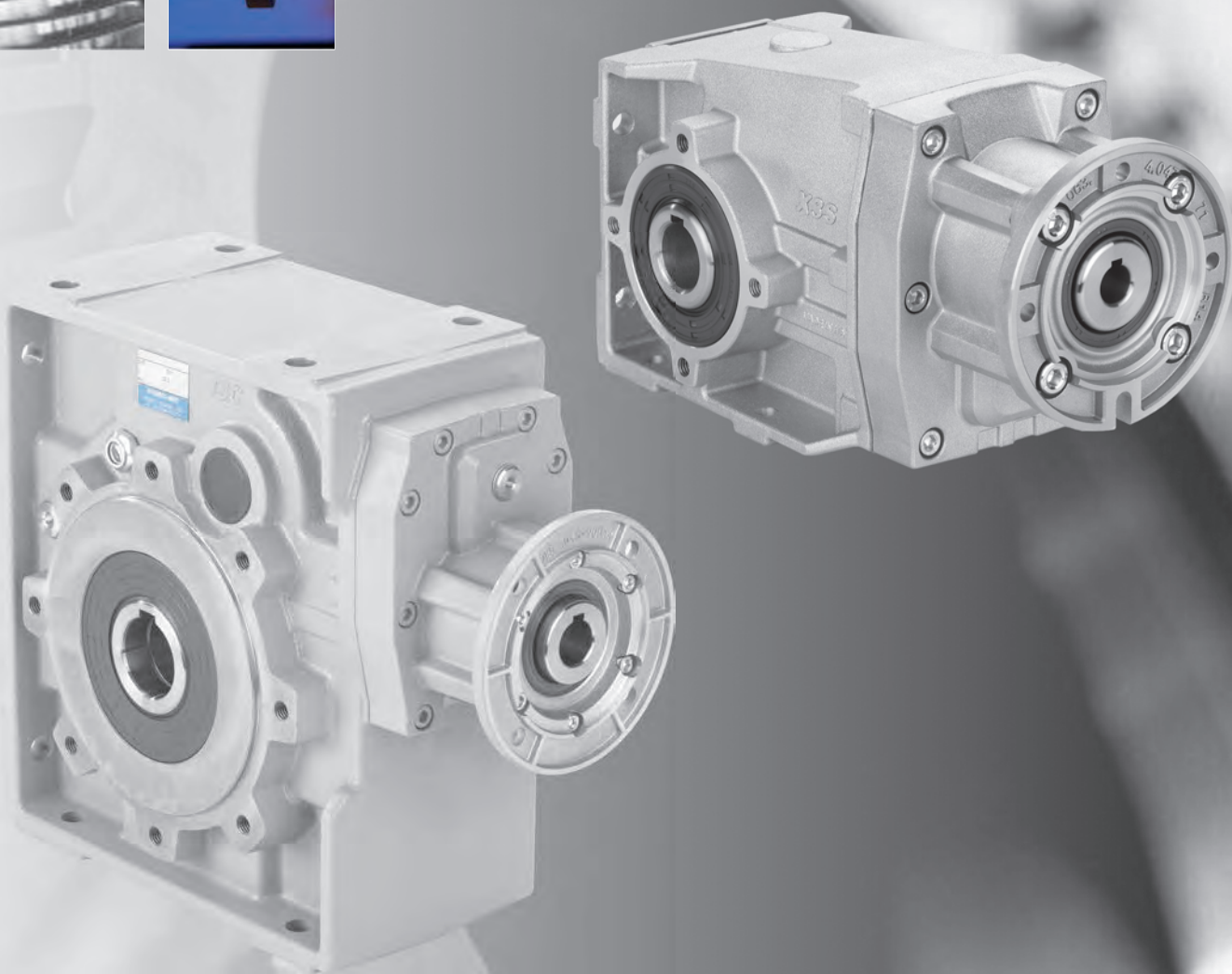
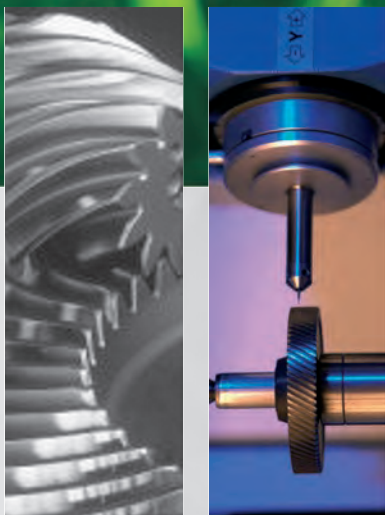
# Gears

Cat.: CT-BVM-X-HM017

## Helical-bevel gearboxes

Riduttori ortogonali  
0.06 ÷ 45kW

**Hypoid and grounded helical gears.  
Recover energy, with an high  
efficiency drive**



Made in Italy



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



# HYDRO · MEC

# Aluminum and cast iron helical bevel gearboxes

**A modular and compact product**  
**Very energy efficient drive**

## Removable inspection cover

Allows periodic inspection of gearing during routine maintenance

## Gears

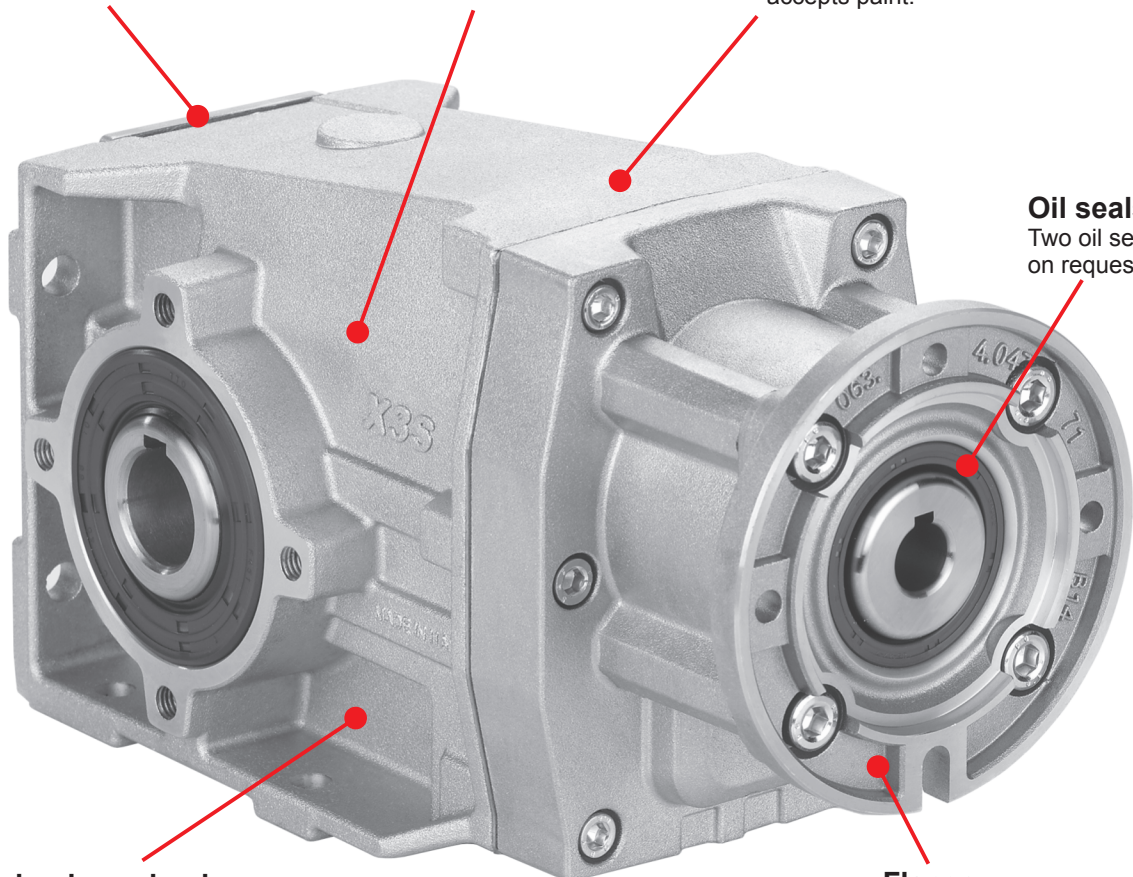
Hardened and ground gears

## Alloy housing

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

## Oil seals

Two oil seals on request



## Single-piece aluminum

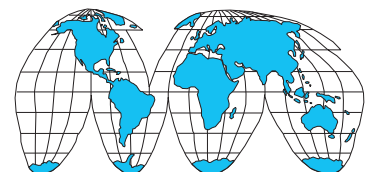
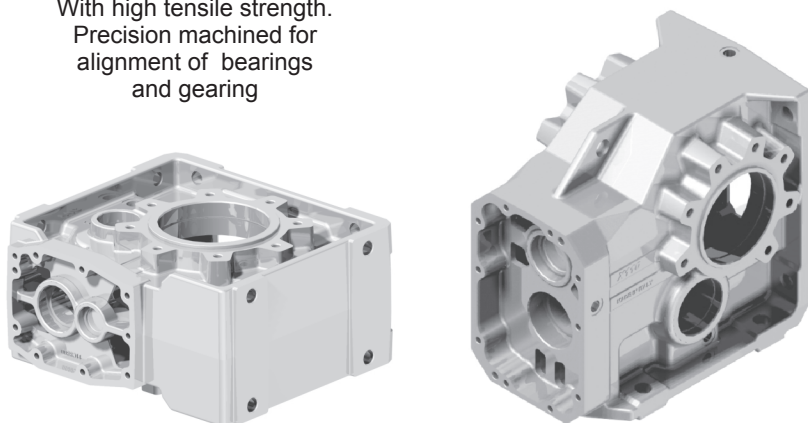
Combines light weight with high tensile strength. Precision machined for alignment of bearings and gearing

## Flange

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

## Cast Iron housing

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

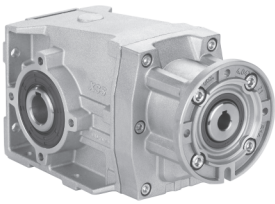


World wide sales network.

# Specific type datasheet on page...

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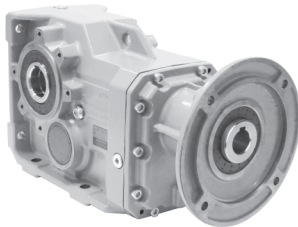
| 7-5                 | 7-7                 | 7-9                  | 7-11                 | 7-13                 | 7-15                 | 7-17                 | 7-19                 | 7-21                 |
|---------------------|---------------------|----------------------|----------------------|----------------------|----------------------|----------------------|----------------------|----------------------|
|                     |                     |                      |                      |                      |                      |                      |                      |                      |
| <b>X22S</b><br>50Nm | <b>X32S</b><br>90Nm | <b>X33S</b><br>100Nm | <b>X42A</b><br>150Nm | <b>X43A</b><br>160Nm | <b>X52A</b><br>250Nm | <b>X53A</b><br>250Nm | <b>X62A</b><br>410Nm | <b>X63A</b><br>410Nm |



Types / Tipi  
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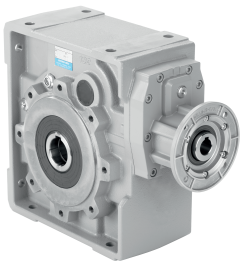
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|----------------------|----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|                      |                      |                       |                       |                       |                       |                       |                       |                       |                       |
| <b>X73C</b><br>675Nm | <b>X74C</b><br>675Nm | <b>X83C</b><br>1000Nm | <b>X84C</b><br>1000Nm | <b>X93C</b><br>1600Nm | <b>X94C</b><br>1650Nm | <b>X103</b><br>3000Nm | <b>X104</b><br>3000Nm | <b>X113</b><br>4500Nm | <b>X114</b><br>4600Nm |



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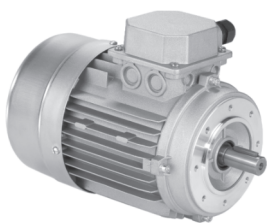
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|----------------------|----------------------|-----------------------|-----------------------|
|                      |                      |                       |                       |
| <b>113C</b><br>675Nm | <b>114C</b><br>675Nm | <b>133C</b><br>1000Nm | <b>134C</b><br>1000Nm |



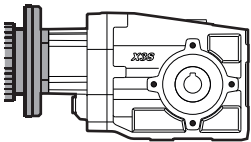
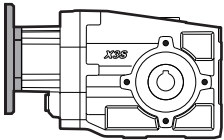
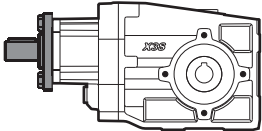
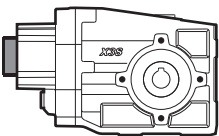
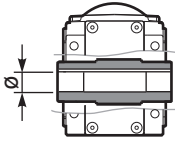
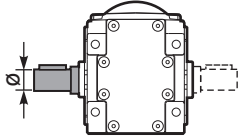
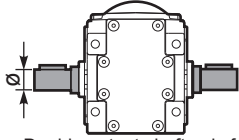
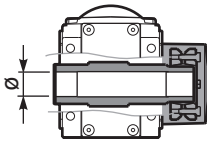
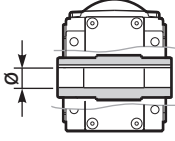
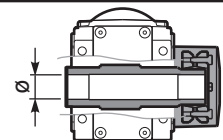
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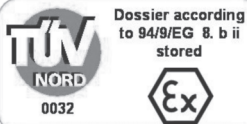
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|                   |                   |                   |                   |                   |                       |             |                     |                     |                     |
| <b>56A</b><br>56B | <b>63A</b><br>63B | <b>71A</b><br>71B | <b>80A</b><br>80B | <b>90S</b><br>90L | <b>100LA</b><br>100LB | <b>112M</b> | <b>132S</b><br>132M | <b>160M</b><br>160L | <b>180M</b><br>180L |

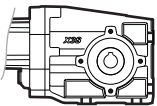
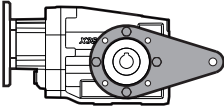
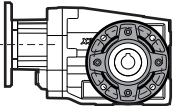
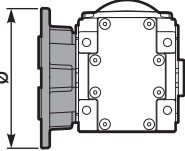




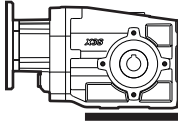


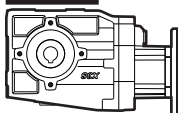
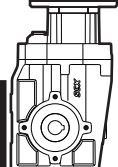
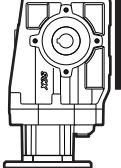
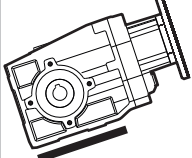
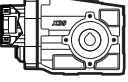
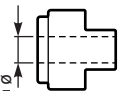


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| Type - Tipo - Typ<br>Type - Tipo   | Size - Grandezza - Grösse<br>Taille - Tomaño  | Mounting - Montaggio<br>Montage - Fixation<br>Tipo de montaje  | Rapporto - Ratio<br>Untersetzung<br>Reduction<br>Relacion   | Output shaft - Albero uscita<br>Ausgangsflansch<br>Arbre de sortie<br>Brida en solida   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
|--|---|--|---|---|------|---------------|------------------------|------------------------|------------------------|-----------|-----------|------------------------|------------------------|------------------------|------------------------|-----------|-----------|------------------------|------------------------|------------------------|------------------------|-----------|-----------|------------------------|------------------------|------------------------|------------------------|-----------|-----------|------------------------|------------------------|-----------|------------------------|------------------------|-----------|----------------|--------------|-----------|------------------|--------------|-----------|--------|--------------|-----------|-----------------------------|--------------|-----------|------------------|---------------|-----------|--------|---------------|-----------|--------|---------------|-----------|--------|---------------|-----------|--------|---------------|-----------|--------|---------------|-----------|----------------|--------------|-----------|--------|--------------|-----------|--------|--------------|-----------|--------------------------------------|--------------|-----------|--------|--------------|-----------|--------|--------------|-----------|--------|--------------|-----------|--------|--------------|
| <b>M</b>   | <b>X22S</b>   | <b>C</b>   | <b>4.83</b>   | <b>-A</b>   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <p>Helical-bevel gear<br/>Riduttori ortogonali</p>  <p>With IEC motor<br/><b>M</b></p>  <p>With motor flange<br/><b>P</b></p>  <p>With male input shaft<br/><b>R</b></p>  <p>Modular base<br/><b>B</b></p> <p>Not available for:<br/>X93C, X103,<br/>X104, X113,<br/>X114.</p> | <p><b>2</b> Stages<br/>Riduzioni<br/>Stufen<br/>Trains<br/>Etapas</p> <p><b>3</b> Stages<br/>Riduzioni<br/>Stufen<br/>Trains<br/>Etapas</p> <p><b>Aluminum</b><br/><b>Alluminio</b><br/><b>Aluminium</b><br/><b>Aluminio</b></p> <p><b>X22S</b><br/><b>X32S</b><br/><b>X42A</b><br/><b>X52A</b><br/><b>X62A</b></p> <p><b>X33S</b><br/><b>X43A</b><br/><b>X53A</b><br/><b>X63A</b></p> <p><b>3</b> Stages<br/>Riduzioni<br/>Stufen<br/>Trains<br/>Etapas</p> <p><b>4</b> Stages<br/>Riduzioni<br/>Stufen<br/>Trains<br/>Etapas</p> <p><b>Cast Iron</b><br/><b>Ghisa</b><br/><b>Grauguss</b><br/><b>Fonte</b><br/><b>Fundicion</b></p> <p><b>113C</b>    <b>114C</b><br/><b>133C</b>    <b>134C</b><br/><b>X73C</b>    <b>X74C</b><br/><b>X83C</b>    <b>X84C</b><br/><b>X93C</b>    <b>X94C</b><br/><b>X103</b>    <b>X104</b><br/><b>X113</b>    <b>X114</b></p> | <p>Hollow output shaft<br/><b>C</b></p>  <p>Single output shaft<br/><b>A</b></p>  <p>Double output shaft only for<br/>113/4C, 133/4C, X73/4C, X83/4C,<br/>X93/4C, X103/4 and X113/4<br/><b>B</b></p>  <p>Shrink Disk<br/>(only on the DX side)<br/><b>D</b></p>  <p>Only on request for Q.ty<br/>A richiesta per quantità</p> <p>Stainless steel hub<br/><b>I</b></p>  <p>Stainless steel hub<br/>Mozzo in acciaio Inox<br/>Edelstahlhohlwelle<br/>Moyeu en acier Inox<br/>Nucleo corona de<br/>acero Inox</p> <p>Only on request for Q.ty<br/>A richiesta per quantità</p> | <p>See technical<br/>data table</p> <p>Vedi tabella dati<br/>tecnici.</p> <p>Technisches<br/>Datenblatt<br/>beachten</p> <p>Voir Tableau<br/>données<br/>techniques</p> <p>Ver tabla datos<br/>técnicos</p> | <p>→ <b>STANDARD</b></p> <p>Hollow output shaft</p> <table border="1"> <tr> <td>X22S</td> <td>X73/4C X83/4C</td> </tr> <tr> <td><b>-A</b> ⇨ <b>∅18</b></td> <td><b>-F</b> ⇨ <b>∅40</b></td> </tr> <tr> <td><b>-B</b> ⇨ <b>∅20</b></td> <td>113C 114C</td> </tr> <tr> <td>X32S X33S</td> <td><b>-F</b> ⇨ <b>∅40</b></td> </tr> <tr> <td><b>-B</b> ⇨ <b>∅20</b></td> <td><b>-G</b> ⇨ <b>∅42</b></td> </tr> <tr> <td><b>-C</b> ⇨ <b>∅25</b></td> <td>133C 134C</td> </tr> <tr> <td>X42A X43A</td> <td><b>-F</b> ⇨ <b>∅40</b></td> </tr> <tr> <td><b>-C</b> ⇨ <b>∅25</b></td> <td><b>-H</b> ⇨ <b>∅45</b></td> </tr> <tr> <td><b>-D</b> ⇨ <b>∅30</b></td> <td>X93C X94C</td> </tr> <tr> <td>X52A X53A</td> <td><b>-H</b> ⇨ <b>∅45</b></td> </tr> <tr> <td><b>-D</b> ⇨ <b>∅30</b></td> <td><b>-J</b> ⇨ <b>∅50</b></td> </tr> <tr> <td><b>-E</b> ⇨ <b>∅35</b></td> <td>X103 X104</td> </tr> <tr> <td>X62A X63A</td> <td><b>-K</b> ⇨ <b>∅60</b></td> </tr> <tr> <td><b>-E</b> ⇨ <b>∅35</b></td> <td>X113 X114</td> </tr> <tr> <td><b>-F</b> ⇨ <b>∅40</b></td> <td><b>-T</b> ⇨ <b>∅70</b></td> </tr> </table> <p>Single and double output shaft</p> <table border="1"> <tr> <td><b>-I</b></td> <td>X22S<br/>X32/3S</td> <td>⇨ <b>∅20</b></td> </tr> <tr> <td><b>-L</b></td> <td>X32/3S<br/>X42/3A</td> <td>⇨ <b>∅25</b></td> </tr> <tr> <td><b>-M</b></td> <td>X52/3A</td> <td>⇨ <b>∅30</b></td> </tr> <tr> <td><b>-N</b></td> <td>X52/3A<br/>X62/3A<br/>X73/4A*</td> <td>⇨ <b>∅35</b></td> </tr> <tr> <td><b>-V</b></td> <td>X83/4A<br/>113/4C</td> <td>⇨ <b>∅40*</b></td> </tr> <tr> <td><b>-O</b></td> <td>113/4C</td> <td>⇨ <b>∅42*</b></td> </tr> <tr> <td><b>-P</b></td> <td>133/4C</td> <td>⇨ <b>∅45*</b></td> </tr> <tr> <td><b>-1</b></td> <td>X93/4C</td> <td>⇨ <b>∅50*</b></td> </tr> <tr> <td><b>-3</b></td> <td>X103/4</td> <td>⇨ <b>∅60*</b></td> </tr> <tr> <td><b>-5</b></td> <td>X113/4</td> <td>⇨ <b>∅70*</b></td> </tr> </table> <p>* Also available double output shaft</p>  <p>Shrink Disk</p> <table border="1"> <tr> <td><b>-U</b></td> <td>X22S<br/>X32/3S</td> <td>⇨ <b>∅20</b></td> </tr> <tr> <td><b>-Q</b></td> <td>X42/3A</td> <td>⇨ <b>∅30</b></td> </tr> <tr> <td><b>-R</b></td> <td>X52/3A</td> <td>⇨ <b>∅35</b></td> </tr> <tr> <td><b>-S</b></td> <td>X62/3A<br/>X73/4A<br/>X83/4A<br/>113/4C</td> <td>⇨ <b>∅40</b></td> </tr> <tr> <td><b>-6</b></td> <td>133/4C</td> <td>⇨ <b>∅45</b></td> </tr> <tr> <td><b>-7</b></td> <td>X93/4C</td> <td>⇨ <b>∅50</b></td> </tr> <tr> <td><b>-8</b></td> <td>X103/4</td> <td>⇨ <b>∅65</b></td> </tr> <tr> <td><b>-9</b></td> <td>X113/4</td> <td>⇨ <b>∅75</b></td> </tr> </table> | X22S | X73/4C X83/4C | <b>-A</b> ⇨ <b>∅18</b> | <b>-F</b> ⇨ <b>∅40</b> | <b>-B</b> ⇨ <b>∅20</b> | 113C 114C | X32S X33S | <b>-F</b> ⇨ <b>∅40</b> | <b>-B</b> ⇨ <b>∅20</b> | <b>-G</b> ⇨ <b>∅42</b> | <b>-C</b> ⇨ <b>∅25</b> | 133C 134C | X42A X43A | <b>-F</b> ⇨ <b>∅40</b> | <b>-C</b> ⇨ <b>∅25</b> | <b>-H</b> ⇨ <b>∅45</b> | <b>-D</b> ⇨ <b>∅30</b> | X93C X94C | X52A X53A | <b>-H</b> ⇨ <b>∅45</b> | <b>-D</b> ⇨ <b>∅30</b> | <b>-J</b> ⇨ <b>∅50</b> | <b>-E</b> ⇨ <b>∅35</b> | X103 X104 | X62A X63A | <b>-K</b> ⇨ <b>∅60</b> | <b>-E</b> ⇨ <b>∅35</b> | X113 X114 | <b>-F</b> ⇨ <b>∅40</b> | <b>-T</b> ⇨ <b>∅70</b> | <b>-I</b> | X22S<br>X32/3S | ⇨ <b>∅20</b> | <b>-L</b> | X32/3S<br>X42/3A | ⇨ <b>∅25</b> | <b>-M</b> | X52/3A | ⇨ <b>∅30</b> | <b>-N</b> | X52/3A<br>X62/3A<br>X73/4A* | ⇨ <b>∅35</b> | <b>-V</b> | X83/4A<br>113/4C | ⇨ <b>∅40*</b> | <b>-O</b> | 113/4C | ⇨ <b>∅42*</b> | <b>-P</b> | 133/4C | ⇨ <b>∅45*</b> | <b>-1</b> | X93/4C | ⇨ <b>∅50*</b> | <b>-3</b> | X103/4 | ⇨ <b>∅60*</b> | <b>-5</b> | X113/4 | ⇨ <b>∅70*</b> | <b>-U</b> | X22S<br>X32/3S | ⇨ <b>∅20</b> | <b>-Q</b> | X42/3A | ⇨ <b>∅30</b> | <b>-R</b> | X52/3A | ⇨ <b>∅35</b> | <b>-S</b> | X62/3A<br>X73/4A<br>X83/4A<br>113/4C | ⇨ <b>∅40</b> | <b>-6</b> | 133/4C | ⇨ <b>∅45</b> | <b>-7</b> | X93/4C | ⇨ <b>∅50</b> | <b>-8</b> | X103/4 | ⇨ <b>∅65</b> | <b>-9</b> | X113/4 | ⇨ <b>∅75</b> |
| X22S   | X73/4C X83/4C   |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-A</b> ⇨ <b>∅18</b>   | <b>-F</b> ⇨ <b>∅40</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-B</b> ⇨ <b>∅20</b>   | 113C 114C   |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| X32S X33S  | <b>-F</b> ⇨ <b>∅40</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-B</b> ⇨ <b>∅20</b>   | <b>-G</b> ⇨ <b>∅42</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-C</b> ⇨ <b>∅25</b>   | 133C 134C   |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| X42A X43A  | <b>-F</b> ⇨ <b>∅40</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-C</b> ⇨ <b>∅25</b>   | <b>-H</b> ⇨ <b>∅45</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-D</b> ⇨ <b>∅30</b>   | X93C X94C   |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| X52A X53A  | <b>-H</b> ⇨ <b>∅45</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-D</b> ⇨ <b>∅30</b>   | <b>-J</b> ⇨ <b>∅50</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-E</b> ⇨ <b>∅35</b>   | X103 X104   |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| X62A X63A  | <b>-K</b> ⇨ <b>∅60</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-E</b> ⇨ <b>∅35</b>   | X113 X114   |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-F</b> ⇨ <b>∅40</b>   | <b>-T</b> ⇨ <b>∅70</b>  |  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-I</b>  | X22S<br>X32/3S  | ⇨ <b>∅20</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-L</b>  | X32/3S<br>X42/3A  | ⇨ <b>∅25</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-M</b>  | X52/3A  | ⇨ <b>∅30</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-N</b>  | X52/3A<br>X62/3A<br>X73/4A*   | ⇨ <b>∅35</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-V</b>  | X83/4A<br>113/4C  | ⇨ <b>∅40*</b>  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-O</b>  | 113/4C  | ⇨ <b>∅42*</b>  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-P</b>  | 133/4C  | ⇨ <b>∅45*</b>  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-1</b>  | X93/4C  | ⇨ <b>∅50*</b>  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-3</b>  | X103/4  | ⇨ <b>∅60*</b>  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-5</b>  | X113/4  | ⇨ <b>∅70*</b>  |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-U</b>  | X22S<br>X32/3S  | ⇨ <b>∅20</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-Q</b>  | X42/3A  | ⇨ <b>∅30</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-R</b>  | X52/3A  | ⇨ <b>∅35</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-S</b>  | X62/3A<br>X73/4A<br>X83/4A<br>113/4C  | ⇨ <b>∅40</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-6</b>  | 133/4C  | ⇨ <b>∅45</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-7</b>  | X93/4C  | ⇨ <b>∅50</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-8</b>  | X103/4  | ⇨ <b>∅65</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |
| <b>-9</b>  | X113/4  | ⇨ <b>∅75</b>   |   |   |      |               |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |                        |                        |           |           |                        |                        |           |                        |                        |           |                |              |           |                  |              |           |        |              |           |                             |              |           |                  |               |           |        |               |           |        |               |           |        |               |           |        |               |           |        |               |           |                |              |           |        |              |           |        |              |           |                                      |              |           |        |              |           |        |              |           |        |              |           |        |              |



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.

| Type - Tipo - Typ<br>Type - Tipo   | Output flange<br>Flangia di uscita<br>Ausgangs Flansch<br>Bride de sortie<br>Brida en salida   | Motor size - Grandezza motore<br>Motor Grösse<br>Grandeur moteur - Tamaño motor  | Terminal box position<br>Posizione morsetteria<br>Klemmkastenlage<br>Position boîte à bornes<br>Posición caja de bornes   | Mounting position<br>Posizione montaggio<br>Einbaulage<br>Position de montage<br>Posición de montaje   | Coupling<br>Giunto<br>Kupplung<br>Joint<br>Juntura  |  |
|--|--|--|---|--|---|--|
| BR   | N  | -O   | B   | B3   | C   |  |
|  <p><b>FB</b><br/>Forma base<br/>Universal</p>  <p><b>BR</b><br/>Braccio d reazione<br/>Reaction arm</p>  <p><b>-F</b><br/>Flangia uscita<br/>output flange</p> |  <p><b>N</b> Senza flangia<br/>Without flange<br/>X22S</p> <p><b>0</b> ⇒ Ø110<br/><b>1</b> ⇒ Ø120<br/>X32S X33S</p> <p><b>1</b> ⇒ Ø120<br/><b>2</b> ⇒ Ø160<br/>X42-3A X52-3A<br/>X62-3A</p> <p><b>2</b> ⇒ Ø160<br/><b>3</b> ⇒ Ø200<br/><b>4</b> ⇒ Ø250<br/>X73C X74C<br/>X83C X84C</p> <p><b>4</b> ⇒ Ø250<br/>113C 114C<br/>X93C X94C</p> <p><b>C</b> ⇒ Ø280<br/><b>L</b> ⇒ Ø280<br/>133C 134C</p> <p><b>C</b> ⇒ Ø320<br/>X103 X104</p> <p><b>6</b> ⇒ Ø350<br/>X113 X114</p> <p><b>7</b> ⇒ Ø450</p> | <p><b>Flange Flangia</b></p> <p><b>B5</b></p> <p><b>-A</b>=56 (Ø120)<br/><b>-B</b>=63 (Ø140)<br/><b>-C</b>=71 (Ø160)<br/><b>-D</b>=80 (Ø200)<br/><b>-E</b>=90 (Ø200)<br/><b>-F</b>=100+112 (Ø250)<br/><b>-G</b>=132 (Ø300)<br/><b>-H</b>=160 (Ø350)<br/><b>-I</b>=180 (Ø350)<br/><b>-L</b>=200 (Ø400)<br/><b>CA</b>=225 (Ø450)</p> <p><b>B14</b></p> <p><b>-O</b>=56 (Ø80)<br/><b>-P</b>=63 (Ø90)<br/><b>-Q</b>=71 (Ø105)<br/><b>-R</b>=80 (Ø120)<br/><b>-T</b>=90 (Ø140)<br/><b>-U</b>=100+112 (Ø160)<br/><b>-V</b>=132 (Ø200)</p> <p><b>Type R Tipo R</b></p> <p>X22S X33S X43A</p> <p><b>-1</b> ⇒ Ø14<br/>X32S X42A X53A<br/>X63A X74C X84C<br/>114C 134C</p> <p><b>-2</b> ⇒ Ø19<br/>X52A X62A<br/>113C 133C<br/>X73C X83C X94C</p> <p><b>-3</b> ⇒ Ø24<br/>X93C X104 X114</p> <p><b>-4</b> ⇒ Ø28<br/>X103 X113</p> <p><b>-6</b> ⇒ Ø42</p> | <p><b>Without flange Senza flangia</b></p> <p>X22S X33S X43A</p> <p><b>-Z</b> ⇒ Ø9 (56B5)<br/><b>-0</b> ⇒ Ø11 (63B5)<br/><b>-1</b> ⇒ Ø14 (71B5)<br/>X32S X42A X53A<br/>X63A X74C X84C<br/>114C 134C</p> <p><b>-1</b> ⇒ Ø14 (71B5)<br/><b>-2</b> ⇒ Ø19 (80B5)<br/><b>-3</b> ⇒ Ø24 (90B5)<br/>X52A X62A<br/>113C 133C<br/>X73C X83C X94C</p> <p><b>-2</b> ⇒ Ø19 (80B5)<br/><b>-3</b> ⇒ Ø24 (90B5)<br/><b>-4</b> ⇒ Ø28 (100B5)</p> |  <p><b>A</b></p>  <p><b>B</b><br/>STANDARD</p>  <p><b>C</b></p>  <p><b>D</b></p> |  <p><b>B3</b><br/>STANDARD</p>  <p><b>B6</b></p>  <p><b>B7</b></p>  <p><b>B8</b></p>  <p><b>V5</b></p>  <p><b>V6</b></p>  <p><b>V8</b></p> | <p><b>0</b><br/>Without coupling<br/>Senza giunto</p>  <p><b>-</b><br/>Nothing indication:<br/>standard bore<br/>Nessuna indicazione:<br/>foro standard</p> <p>COUPLING</p>  <p><b>A</b> = 9mm<br/><b>B</b> = 11mm<br/><b>C</b> = 14mm<br/><b>D</b> = 19mm<br/><b>E</b> = 24mm<br/><b>F</b> = 28mm</p> |

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 / rotacion

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

Linear movement / traslazione / linearbewegung / translation / translacion

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

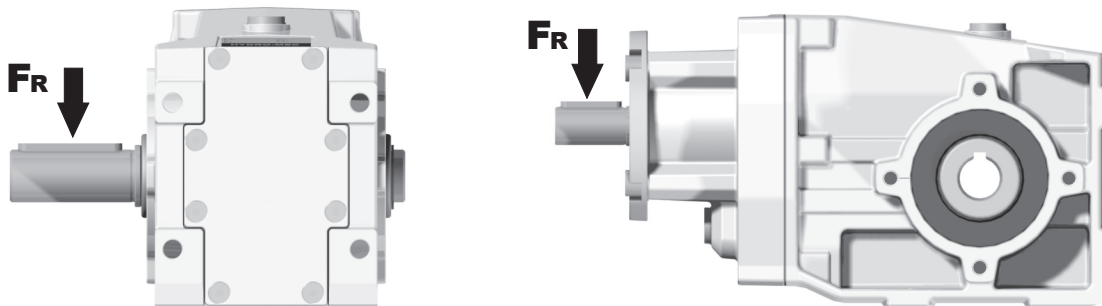
TORQUE / COPPIA / DREHMOMENT / COUPLE / PAR

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

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

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



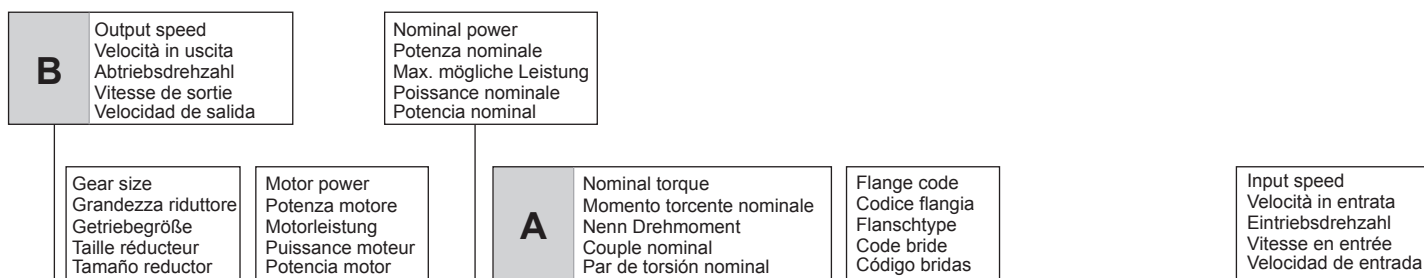
$$F_R [N] = \frac{M [Nm] \cdot 2000}{d [mm]} \cdot f_k$$

$$F_R [N] = \frac{M [lb in] \cdot 8.9}{d [in]} \cdot f_k$$

|                      |  |
|----------------------|--|
| <b>M</b>             | Momento torcente / Output torque / Abtriebsdrehmoment / Couple / Par torsion   |
| <b>d</b>             | Diametro primitivo / Diam. of driving element / Durchmesser der Abtriebseinheit / Diamètre primitif / Diámetro primitivo   |
| <b>f<sub>k</sub></b> | Coefficiente di trasformazione / Factor / Faktor / Coefficient de transmission / Coeficiente de transmisión<br><b>1.15</b> Ingranaggi / Gearwheels / Zahnrad / Engrenage / Engranaje<br><b>1.25</b> Catena / Chain sprockets / Antriebskette / Chaîne / Cadena<br><b>1.75</b> Cinghia Trapezoidale / Narrow v-belt pulley / Keilriemen / Courroie trap. / Correa trapezoidal<br><b>2.50</b> 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



**X22S** Angletech Gear **50Nm** Rating - Aluminum  
HELICAL-BEVEL GEARBOXES

**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.96** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i   | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code<br> |
|--|--------------|--|--|------------------------|--|---|----------------------------|----|-----------------------------|----|----|------------------|-----------------|
|  |              |  |  |                        |  |   | -B                         | -C | -O                          | -P | -Q |                  |                 |
| 289.7  | <b>4.83</b>  | 0.37                                   | 11.7                                     | 2.6                    | <b>0.95</b>                              | <b>30</b>                                 | 63                         | 71 | C                           | C  |    | 289              | 01              |
| 189.2  | <b>7.40</b>  | 0.37                                   | 17.9                                     | 1.7                    | <b>0.62</b>                              | <b>30</b>                                 |                            |    | C                           | C  |    | 287              | 02              |
| 146.2  | <b>9.58</b>  | 0.37                                   | 23.2                                     | 1.7                    | <b>0.64</b>                              | <b>40</b>                                 |                            |    | C                           | C  |    | 199              | 03              |
| 127.5  | <b>10.98</b> | 0.37                                   | 26.6                                     | 1.7                    | <b>0.63</b>                              | <b>45</b>                                 |                            |    | C                           | C  |    | 179              | 04              |



**fs**

| Type of load and starts per hour<br>Tipo di carico e avviamenti per ora                                    |                     | Oper. hours per day<br>Ore di funz. giorn. |      |      |
|--|---------------------|--|------|------|
|  |                     | 3 h  | 10 h | 24 h |
| Continuous or intermittent appl. with start / hour<br>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<br>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 |

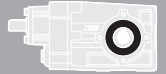
**D** Motor flange available  
Flange disponibili  
Erhältliche Motorflansche  
Brides disponibles  
Bridas disponibles

**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/-socket  
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

|          |  |  |  |   |  |
|----------|--|--|--|---|--|
| <b>A</b> | 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>B</b> | Select output speed  | Seleziona la velocità in uscita  | Ausgewählte Abtriebsdrehzahl   | Sélectionner la vitesse de sortie   | Seleccionar la velocidad de salida   |
| <b>C</b> | 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 |
| <b>D</b> | 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<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i   | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code |
|--|--------------|--|--|------------------------|--|---|----------------------------|----|-----------------------------|----|----|------------------|-------------|
|  |              |  |  |                        |  |   | -B                         | -C | -O                          | -P | -Q |                  |             |
| 290  | <b>4.83</b>  | 0.37                                   | 12                                       | 2.6                    | <b>0.95</b>                              | <b>30</b>                                 |                            |    | C                           | C  |    | 289              | 01          |
| 189  | <b>7.40</b>  | 0.37                                   | 18                                       | 1.7                    | <b>0.62</b>                              | <b>30</b>                                 |                            |    | C                           | C  |    | 287              | 02          |
| 146  | <b>9.58</b>  | 0.37                                   | 23                                       | 1.7                    | <b>0.64</b>                              | <b>40</b>                                 |                            |    | C                           | C  |    | 199              | 03          |
| 128  | <b>10.98</b> | 0.37                                   | 27                                       | 1.7                    | <b>0.63</b>                              | <b>45</b>                                 |                            |    | C                           | C  |    | 179              | 04          |
| 107  | <b>13.07</b> | 0.37                                   | 32                                       | 1.4                    | <b>0.53</b>                              | <b>45</b>                                 |                            |    | C                           | C  |    | 159              | 05          |
| 95   | <b>14.66</b> | 0.37                                   | 35                                       | 1.3                    | <b>0.47</b>                              | <b>45</b>                                 |                            |    | C                           | C  |    | 197              | 06          |
| 89   | <b>15.79</b> | 0.37                                   | 38                                       | 1.2                    | <b>0.44</b>                              | <b>45</b>                                 |                            |    | C                           | C  |    | 139              | 07          |
| 83   | <b>16.81</b> | 0.37                                   | 41                                       | 1.1                    | <b>0.41</b>                              | <b>45</b>                                 |                            |    | C                           | C  |    | 177              | 08          |
| 70   | <b>20.00</b> | 0.37                                   | 48                                       | 1.0                    | <b>0.37</b>                              | <b>48</b>                                 |                            |    | C                           | C  |    | 157              | 09          |
| 64   | <b>21.93</b> | 0.37                                   | 53                                       | 0.9                    | <b>0.35</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 109              | 10          |
| 58   | <b>24.18</b> | 0.25                                   | 39                                       | 1.3                    | <b>0.32</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 137              | 11          |
| 48.2   | <b>29.04</b> | 0.25                                   | 47                                       | 1.1                    | <b>0.26</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 99               | 12          |
| 41.7   | <b>33.57</b> | 0.18                                   | 42                                       | 1.2                    | <b>0.23</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 107              | 13          |
| 36.2   | <b>38.67</b> | 0.18                                   | 48                                       | 1.0                    | <b>0.20</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 79               | 14          |
| 31.5   | <b>44.44</b> | 0.18                                   | 55                                       | 0.9                    | <b>0.17</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 97               | 15          |
| 23.7   | <b>59.18</b> | 0.12                                   | 48                                       | 1.0                    | <b>0.13</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 77               | 16          |
| 19.9   | <b>70.24</b> | 0.09                                   | 45                                       | 1.1                    | <b>0.11</b>                              | <b>50</b>                                 |                            |    | C                           | C  |    | 67               | 17          |

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 **X22S** 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 **X22S** 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 **X22S** 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 **X22S** 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 **X22S** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |         |                       |         |     |
|---------------------|--|---------|---------|-----------------------|---------|-----|
|                     |  |         |         |                       |         |     |
| 0.25 LT             | 0.25 LT  | 0.25 LT | 0.25 LT | 0.43 LT               | 0.31 LT | Ask |
| AGIP Telium VSF 320 |  |         |         | SHELL Omala S4 WE 320 |         |     |

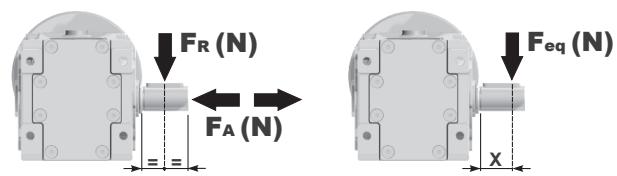
For all details on lubrication and plugs check our website **tab. 1**  
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

### RADIAL AND AXIAL LOADS

#### Output shaft

Albero di uscita

$$F_{eq} = F_R \cdot \frac{42}{X+23}$$

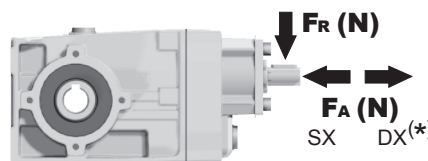


| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|--|-----|------|--|-----|------|
| 400                                    | 360 | 1800 | 100                                    | 440 | 2200 | 25                                     | 440 | 2200 |
| 250                                    | 380 | 1900 | 75                                     | 440 | 2200 | 15                                     | 440 | 2200 |
| 150                                    | 420 | 2100 | 50                                     | 440 | 2200 |  |     |      |

**FR** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

#### Input shaft

albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA  | FR  |
|--|-----|-----|
| 1400                                   | 140 | 700 |
| 900                                    | 160 | 800 |
| 500                                    | 190 | 950 |

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

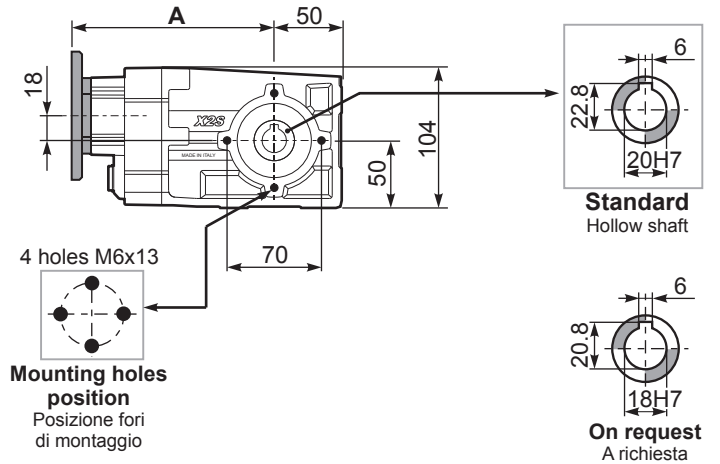
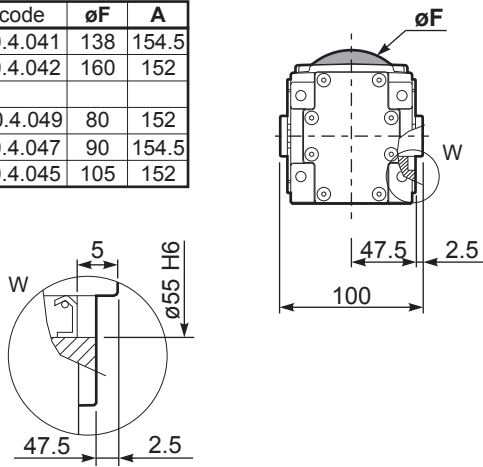
**tab. 2**



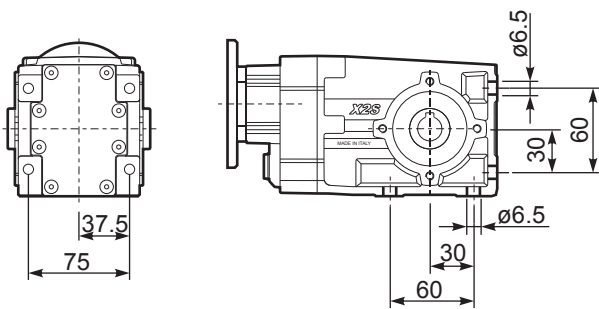
**PX22SC...** Basic Gearbox  
Riduttore base

**Gearbox weight** 3.70 kg  
peso riduttore

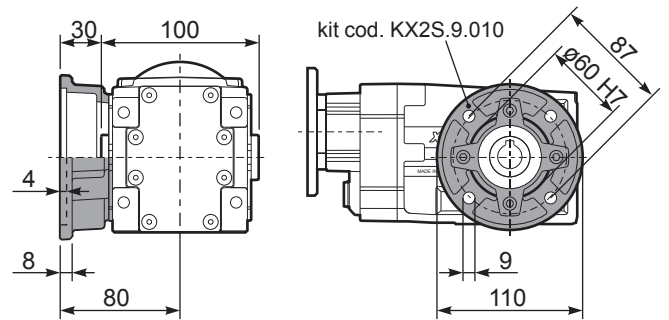
| M. flanges   | Kit code   | øF  | A     |
|--------------|------------|-----|-------|
| <b>63B5</b>  | K050.4.041 | 138 | 154.5 |
| <b>71B5</b>  | K050.4.042 | 160 | 152   |
| <b>56B14</b> | KC40.4.049 | 80  | 152   |
| <b>63B14</b> | K050.4.047 | 90  | 154.5 |
| <b>71B14</b> | K050.4.045 | 105 | 152   |



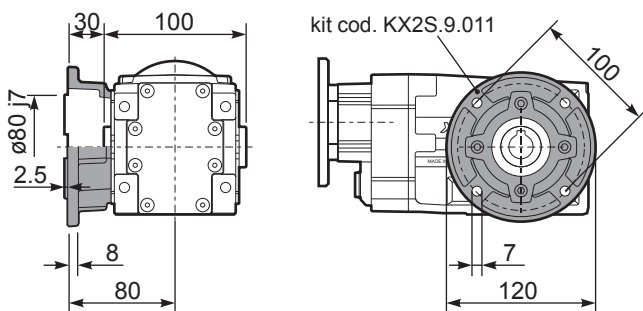
**PX22S...FB..** Feet  
Piedini



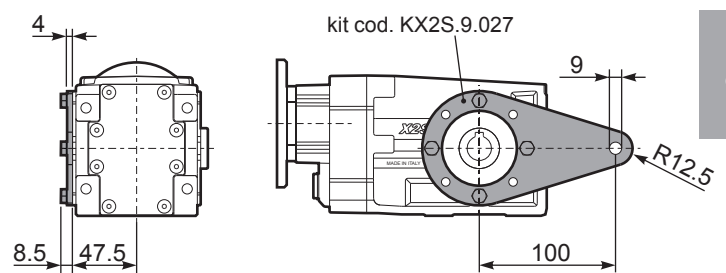
**PX22S...-F0..** Output flange  
Flangia uscita



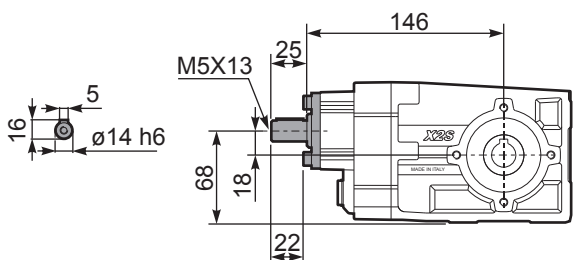
**PX22S...-F1..** Output flange  
Flangia uscita



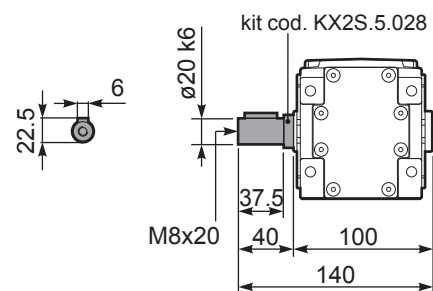
**PX22S...BR..** Reaction Arm  
Braccio di reazione

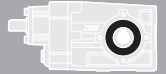


**RX22S..** Input shaft  
Albero in entrata



**PX22SA..** Single output shaft  
Albero semplice in uscita





**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.96** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i   | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    |    |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code     |            |    |
|--|--------------|--|--|------------------------|--|---|----------------------------|----|----|----|-----------------------------|----|----|------------------|-----------------|------------|----|
|  |              |  |  |                        |  |   | -B                         | -C | -D | -E | -Q                          | -R | -T |                  |                 |            |    |
|  |              |  |  |                        |  |   | 63                         | 71 | 80 | 90 | 71                          | 80 | 90 |                  |                 |            |    |
| 191  | <b>7.33</b>  | 1.5                                    | 72                                       | 1.0                    | 1.5                                      | 70  | B                          |    |    |    | C                           | C  |    | 289              | standard<br>ø20 | 01         |    |
| 125  | <b>11.22</b> | 1.1                                    | 80                                       | 1.1                    | 1.2                                      | 85  | B                          |    |    |    | C                           | C  |    | 287              |                 | 02         |    |
| 106  | <b>13.26</b> | 1.1                                    | 95                                       | 0.9                    | 0.98                                     | 85  | B                          |    |    |    | C                           | C  |    | 199              |                 | 03         |    |
| 91   | <b>15.37</b> | 1.1                                    | 110                                      | 0.8                    | 0.89                                     | 90  | B                          |    |    |    | C                           | C  |    | 179              |                 | 04         |    |
| 78   | <b>18.04</b> | 0.75                                   | 89                                       | 1.0                    | 0.76                                     | 90  | B                          |    |    |    | C                           | C  |    | 159              |                 | 05         |    |
| 69   | <b>20.30</b> | 0.75                                   | 100                                      | 0.9                    | 0.68                                     | 90  | B                          |    |    |    | C                           | C  |    | 197              |                 | 06         |    |
| 65   | <b>21.54</b> | 0.75                                   | 106                                      | 0.9                    | 0.64                                     | 90  | B                          |    |    |    | C                           | C  |    | 139              |                 | 07         |    |
| 59   | <b>23.53</b> | 0.55                                   | 85                                       | 1.1                    | 0.58                                     | 90  | B                          |    |    |    | C                           | C  |    | 177              |                 | 08         |    |
| 51   | <b>27.62</b> | 0.55                                   | 100                                      | 0.9                    | 0.50                                     | 90  | B                          |    |    |    | C                           | C  |    | 157              |                 | 09         |    |
| 47.6   | <b>29.40</b> | 0.55                                   | 106                                      | 0.8                    | 0.47                                     | 90  | B                          |    |    |    | C                           | C  |    | 109              |                 | On request | 10 |
| 42.5   | <b>32.97</b> | 0.37                                   | 80                                       | 1.1                    | 0.42                                     | 90  | B                          |    |    |    | C                           | C  |    | 137              |                 | 11         |    |
| 36.5   | <b>38.37</b> | 0.37                                   | 93                                       | 1.0                    | 0.36                                     | 90  | B                          |    |    |    | C                           | C  |    | 99               |                 | 12         |    |
| 31.1   | <b>45.00</b> | 0.25                                   | 73                                       | 1.2                    | 0.31                                     | 90  | B                          |    |    |    | C                           | C  |    | 107              |                 | 13         |    |
| 27.6   | <b>50.67</b> | 0.25                                   | 83                                       | 1.1                    | 0.27                                     | 90  | B                          |    |    |    | C                           | C  |    | 79               |                 | 14         |    |
| 23.8   | <b>58.73</b> | 0.18                                   | 73                                       | 1.2                    | 0.23                                     | 90  | B                          |    |    |    | C                           | C  |    | 97               |                 | 15         |    |
| 18.1   | <b>77.55</b> | 0.18                                   | 97                                       | 0.9                    | 0.18                                     | 90  | B                          |    |    |    | C                           | C  |    | 77               |                 | 16         |    |

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 **X32S** 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 **X32S** 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 **X32S** ist mit synthetischem Öl gefüllt und ist lebensdauer geschmiert. 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 **X32S** 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 **X32S** 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.

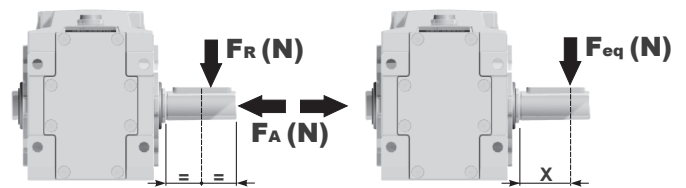
| Standard supplied   | For these mounting position specify in the order or add oil         |         |         |                       |         |     |  |
|---------------------|---|---------|---------|-----------------------|---------|-----|--|
|                     | Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |         |                       |         |     |  |
|                     |   |         |         |                       |         |     |  |
| B3                  | B6  | B7      | B8      | V5                    | V6      | V8  |  |
| 0.40 LT             | 0.60 LT   | 0.40 LT | 0.60 LT | 0.85 LT               | 0.60 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

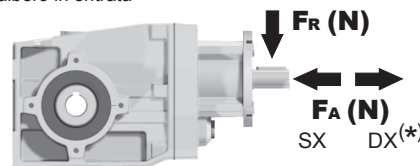
$$F_{eq} = F_R \cdot \frac{47.5}{X+28.5}$$



| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|--|-----|------|--|-----|------|
| 250                                    | 400 | 2000 | 75                                     | 560 | 2800 | 15                                     | 560 | 2800 |
| 150                                    | 450 | 2250 | 50                                     | 560 | 2800 |  |     |      |
| 100                                    | 500 | 2500 | 25                                     | 560 | 2800 |  |     |      |

**FR** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

**Input shaft**  
albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|
| 1400                                   | 240 | 1200 |
| 900                                    | 280 | 1400 |
| 500                                    | 340 | 1700 |

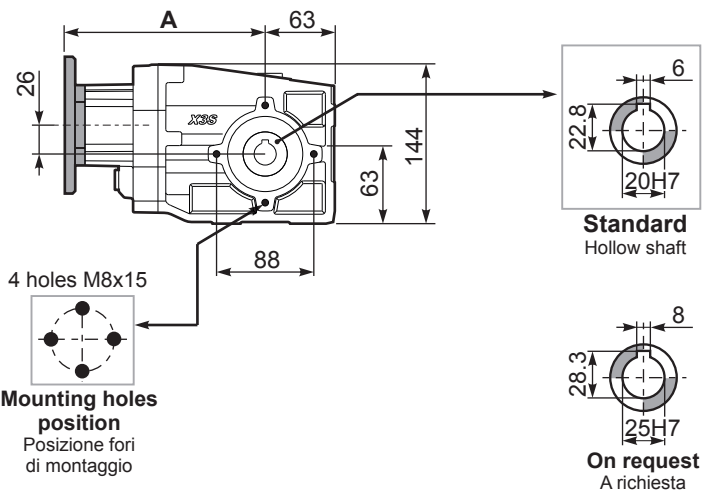
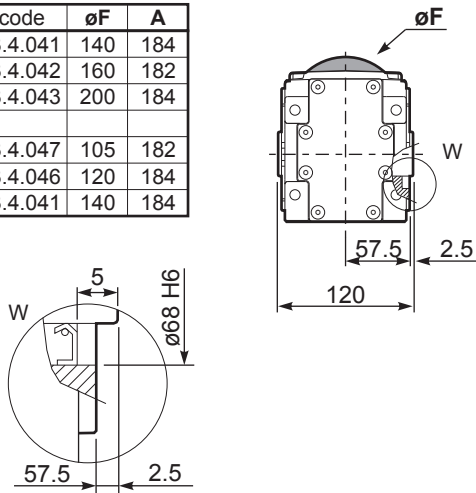
**\*Strong axial loads in the DX direction are not allowed.**  
Non sono consentiti forti carichi assiali con direzione DX

**tab. 2**

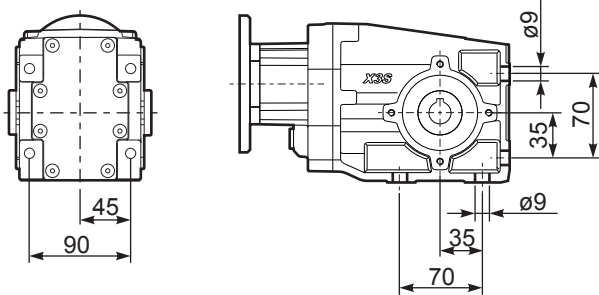
**PX32SC...** Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **6.30 kg**

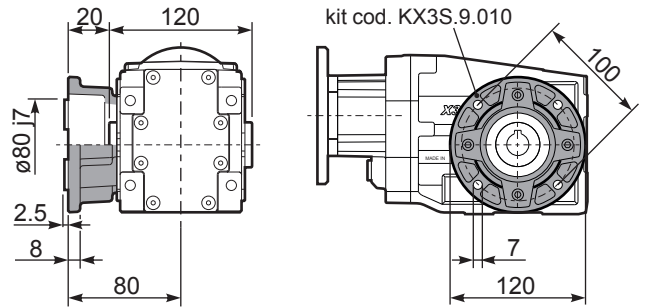
| M. flanges | Kit code   | øF  | A   |
|------------|------------|-----|-----|
| 63B5       | K063.4.041 | 140 | 184 |
| 71B5       | K063.4.042 | 160 | 182 |
| 80/90B5    | K063.4.043 | 200 | 184 |
| 71B14      | K063.4.047 | 105 | 182 |
| 80B14      | K063.4.046 | 120 | 184 |
| 90B14      | K063.4.041 | 140 | 184 |



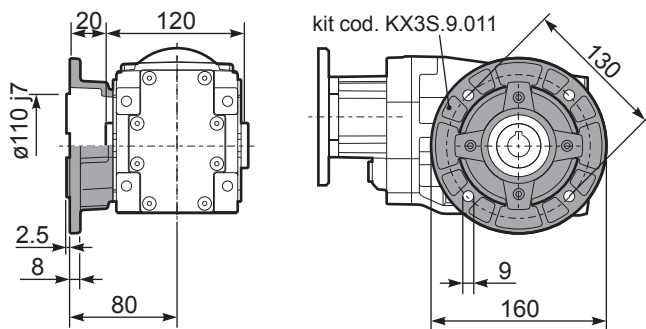
**PX32S...FB..** Feet  
Piedini



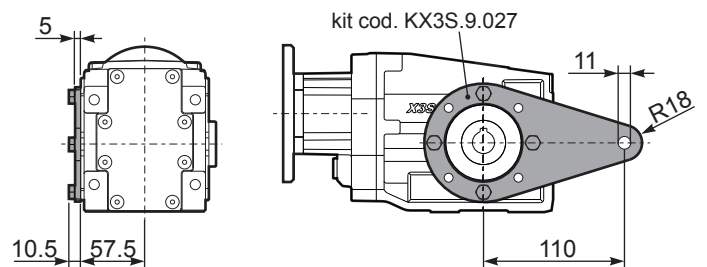
**PX32S...-F1..** Output flange  
Flangia uscita



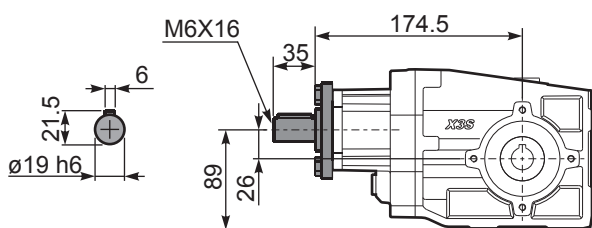
**PX32S...-F2..** Output flange  
Flangia uscita



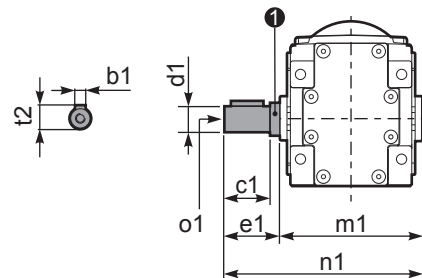
**PX32S...BR..** Reaction Arm  
Braccio di reazione



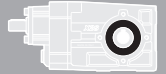
**RX32S...** Input shaft  
Albero in entrata



**PX32SA..** Single output shaft  
Albero semplice in uscita



| d1                           | b1 | c1   | e1   | m1    | n1  | t2   | o1    | ① kit code |
|------------------------------|----|------|------|-------|-----|------|-------|------------|
| ø20 <sup>-0.005/-0.020</sup> | 6  | 37.5 | 40   | 120   | 160 | 22.5 | M8x20 | KX2S.5.028 |
| ø25 <sup>-0.005/-0.020</sup> | 8  | 60   | 63.2 | 126.8 | 190 | 28   | M8x20 | K063.5.028 |



**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.94** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i    | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code<br> |
|--|---------------|--|--|------------------------|--|---|----------------------------|----|-----------------------------|----|----|------------------|-----------------|
|  |               |  |  |                        |  |   | -B                         | -C | -O                          | -P | -Q |                  |                 |
|  |               |  |  |                        |  |   | 63                         | 71 | 56                          | 63 | 71 |                  |                 |
| 38.7   | <b>36.17</b>  | 0.37                                   | 86                                       | 1.2                    | <b>0.43</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 17179            | 02              |
| 31.7   | <b>44.21</b>  | 0.37                                   | 105                                      | 1.0                    | <b>0.35</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 19139            | 03              |
| 27.6   | <b>50.68</b>  | 0.25                                   | 81                                       | 1.2                    | <b>0.31</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 17139            | 04              |
| 25.3   | <b>55.36</b>  | 0.25                                   | 89                                       | 1.1                    | <b>0.28</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 17177            | 05              |
| 23.2   | <b>60.31</b>  | 0.25                                   | 96                                       | 1.0                    | <b>0.26</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 15139            | 06              |
| 21.2   | <b>65.88</b>  | 0.25                                   | 105                                      | 0.9                    | <b>0.24</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 15177            | 07              |
| 19.4   | <b>72.25</b>  | 0.18                                   | 88                                       | 1.1                    | <b>0.22</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 10179            | 08              |
| 17.6   | <b>79.64</b>  | 0.18                                   | 97                                       | 1.0                    | <b>0.20</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 13177            | 09              |
| 15.2   | <b>92.31</b>  | 0.18                                   | 113                                      | 0.9                    | <b>0.17</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 15137            | 10              |
| 14.6   | <b>95.65</b>  | 0.18                                   | 117                                      | 0.9                    | <b>0.16</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 9179             | 11              |
| 13.8   | <b>101.23</b> | 0.12                                   | 80                                       | 1.2                    | <b>0.15</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 10139            | 12              |
| 11.0   | <b>127.37</b> | 0.12                                   | 101                                      | 1.0                    | <b>0.12</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 7179             | 13              |
| 9.3  | <b>151.16</b> | 0.09                                   | 95                                       | 1.0                    | <b>0.10</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 6179             | 14              |
| 7.8  | <b>178.46</b> | 0.09                                   | 113                                      | 0.9                    | <b>0.09</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 7139             | 15              |
| 6.6  | <b>211.79</b> | 0.06                                   | 88                                       | 1.1                    | <b>0.07</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 6139             | 16              |
| 6.1  | <b>231.37</b> | 0.06                                   | 96                                       | 1.0                    | <b>0.07</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 6177             | 17              |
| 5.1  | <b>273.16</b> | 0.06                                   | 113                                      | 0.9                    | <b>0.06</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 7137             | 18              |
| 4.3  | <b>324.18</b> | 0.06                                   | 134                                      | 0.7                    | <b>0.05</b>                              | <b>100</b>                                |                            |    | C                           | C  |    | 6137             | 19              |

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 **X33S** 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 **X33S** 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 **X33S** 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 **X33S** 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 **X33S** 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.

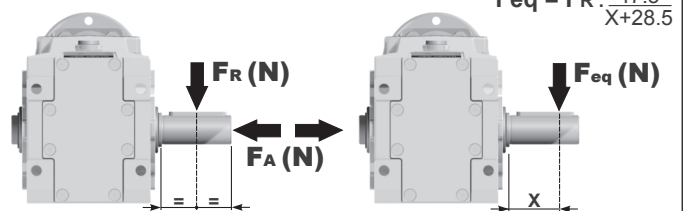
| Standard supplied   | For these mounting position specify in the order or add oil<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |         |                       |         |     |
|---------------------|--|---------|---------|-----------------------|---------|-----|
|                     |  |         |         |                       |         |     |
| B3                  | B6   | B7      | B8      | V5                    | V6      | V8  |
| 0.70 LT             | 0.65 LT  | 0.40 LT | 0.65 LT | 0.95 LT               | 0.65 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

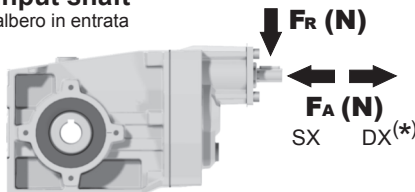


| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|--|-----|------|--|-----|------|
| 250                                    | 400 | 2000 | 75                                     | 560 | 2800 | 15                                     | 560 | 2800 |
| 150                                    | 450 | 2250 | 50                                     | 560 | 2800 |  |     |      |
| 100                                    | 500 | 2500 | 25                                     | 560 | 2800 |  |     |      |

**FR** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

#### Input shaft

albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA  | FR  |
|--|-----|-----|
| 1400                                   | 140 | 700 |
| 900                                    | 160 | 800 |
| 500                                    | 190 | 950 |

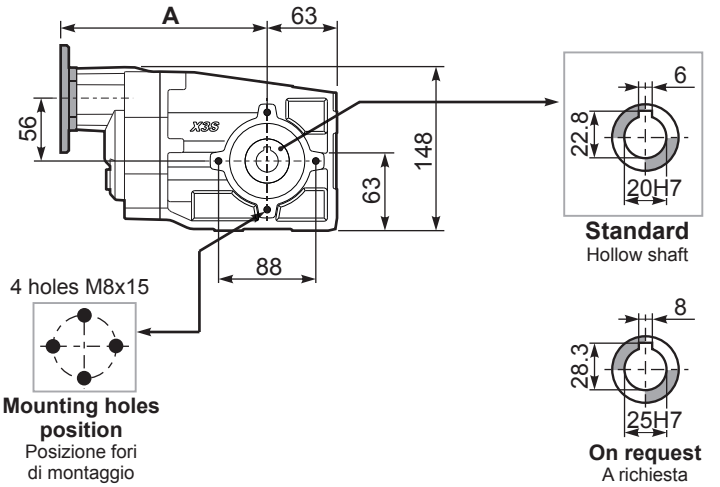
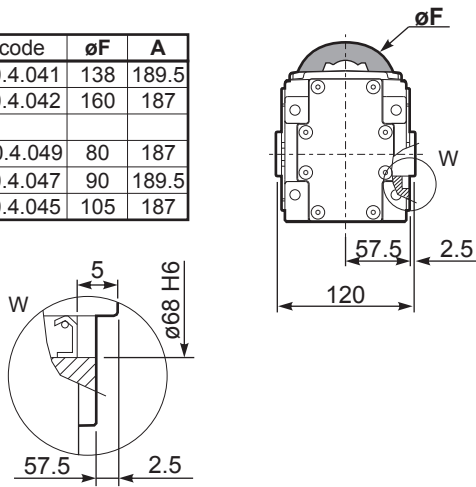
\*Strong axial loads in the DX direction are not allowed.  
Non sono consentiti forti carichi assiali con direzione DX

**tab. 2**

**PX33SC...** Basic Gearbox  
Riduttore base

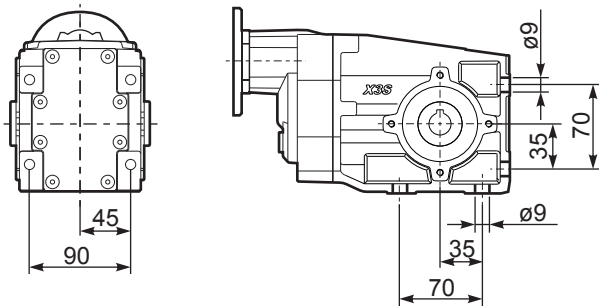
Gearbox weight  
peso riduttore **6.55 kg**

| M. flanges   | Kit code   | øF  | A     |
|--------------|------------|-----|-------|
| <b>63B5</b>  | K050.4.041 | 138 | 189.5 |
| <b>71B5</b>  | K050.4.042 | 160 | 187   |
| <b>56B14</b> | KC40.4.049 | 80  | 187   |
| <b>63B14</b> | K050.4.047 | 90  | 189.5 |
| <b>71B14</b> | K050.4.045 | 105 | 187   |

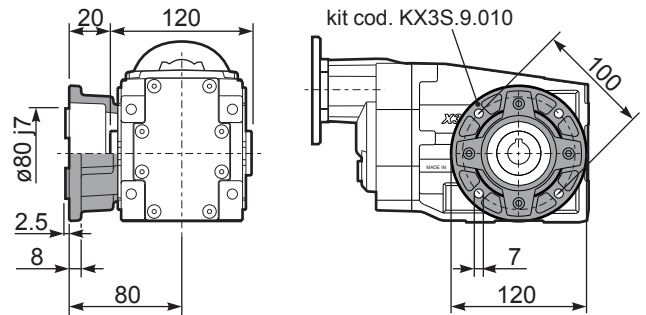


4 holes M8x15  
Mounting holes position  
Posizione fori di montaggio

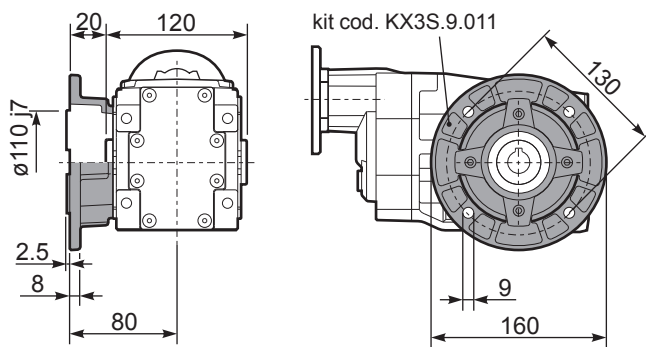
**PX33S...FB..** Feet  
Piedini



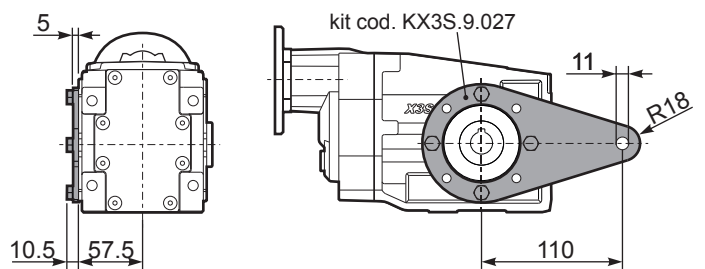
**PX33S...-F1..** Output flange  
Flangia uscita



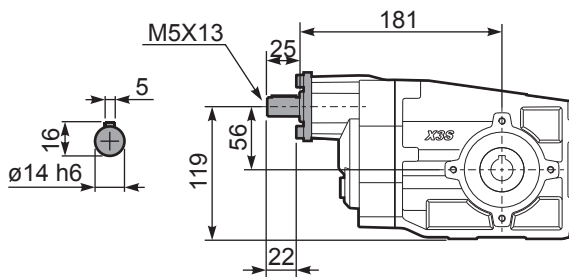
**PX33S...-F2..** Output flange  
Flangia uscita



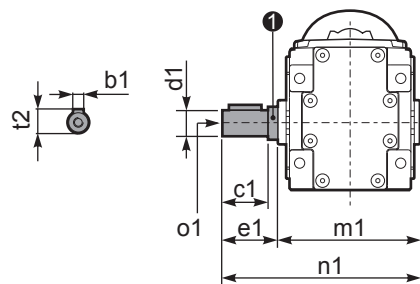
**PX33S...BR..** Reaction Arm  
Braccio di reazione



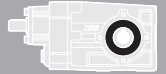
**RX33S...** Input shaft  
Albero in entrata



**PX33SA..** Single output shaft  
Albero semplice in uscita



| d1                           | b1 | c1   | e1   | m1    | n1  | t2   | o1    | 1 kit code |
|------------------------------|----|------|------|-------|-----|------|-------|------------|
| ø20 <sup>-0.005/-0.020</sup> | 6  | 37.5 | 40   | 120   | 160 | 22.5 | M8x20 | KX2S.5.028 |
| ø25 <sup>-0.005/-0.020</sup> | 8  | 60   | 63.2 | 126.8 | 190 | 28   | M8x20 | K063.5.028 |



**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.96** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i   | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    |    |    |     | Available B14 motor flanges |    |    |    | Output Shaft<br> | Ratios code |
|--|--------------|--|--|------------------------|--|---|----------------------------|----|----|----|-----|-----------------------------|----|----|----|------------------|-------------|
|  |              |  |  |                        |  |   | -B                         | -C | -D | -E | -F  | -Q                          | -R | -T | -U |                  |             |
|  |              |  |  |                        |  |   | 63                         | 71 | 80 | 90 | 100 | 112                         | 71 | 80 | 90 |                  |             |
| 192  | <b>7.29</b>  | 2.2                                    | 104                                      | 0.9                    | <b>2.0</b>                               | <b>95</b>                                 | B                          |    |    |    |     | C                           | C  |    |    | 2811             | 01          |
| 125  | <b>11.20</b> | 2.2                                    | 159                                      | 0.9                    | <b>2.0</b>                               | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 288              | 02          |
| 106  | <b>13.18</b> | 1.5                                    | 129                                      | 1.2                    | <b>1.7</b>                               | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 1911             | 03          |
| 92   | <b>15.27</b> | 1.1                                    | 109                                      | 1.4                    | <b>1.5</b>                               | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 1711             | 04          |
| 78   | <b>17.93</b> | 1.1                                    | 128                                      | 1.2                    | <b>1.3</b>                               | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 1511             | 05          |
| 69   | <b>20.25</b> | 1.1                                    | 145                                      | 1.0                    | <b>1.1</b>                               | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 198              | 06          |
| 65   | <b>21.40</b> | 1.1                                    | 153                                      | 1.0                    | <b>1.1</b>                               | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 1311             | 07          |
| 60   | <b>23.47</b> | 0.75                                   | 115                                      | 1.3                    | <b>0.98</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 178              | 08          |
| 51   | <b>27.55</b> | 0.75                                   | 135                                      | 1.1                    | <b>0.83</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 158              | 09          |
| 47.9   | <b>29.21</b> | 0.75                                   | 143                                      | 1.0                    | <b>0.78</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 1011             | 10          |
| 42.6   | <b>32.88</b> | 0.75                                   | 161                                      | 0.9                    | <b>0.70</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 138              | 11          |
| 36.7   | <b>38.12</b> | 0.55                                   | 138                                      | 1.1                    | <b>0.60</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 911              | 12          |
| 31.2   | <b>44.89</b> | 0.55                                   | 163                                      | 0.9                    | <b>0.51</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 108              | 13          |
| 27.8   | <b>50.34</b> | 0.37                                   | 122                                      | 1.1                    | <b>0.40</b>                              | <b>131</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 711              | 14          |
| 23.9   | <b>58.58</b> | 0.37                                   | 142                                      | 1.1                    | <b>0.39</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 98               | 15          |
| 18.1   | <b>77.36</b> | 0.25                                   | 126                                      | 1.2                    | <b>0.30</b>                              | <b>150</b>                                | B                          |    |    |    |     | C                           | C  |    |    | 78               | 16          |

Motor Flanges Available Flange Motore Disponibili Supplied with Reduction Bushing Fornito con Bussola di Riduzione Available on Request without reduction bushing Disponibile a Richiesta senza Bussola di Riduzione Motor Flange Holes Position Posizione Fori Flangia Motore

**EN** Unit **X42A** 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 **X42A** 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 **X42A** 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 **X42A** 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 **X42A** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |                       |         |         |     |
|---------------------|--|---------|-----------------------|---------|---------|-----|
|                     |  |         |                       |         |         |     |
| 0.60 LT             | 0.75 LT  | 0.50 LT | 0.70 LT               | 1.10 LT | 0.60 LT | Ask |
| AGIP Telium VSF 320 |  |         | SHELL Omala S4 WE 320 |         |         |     |

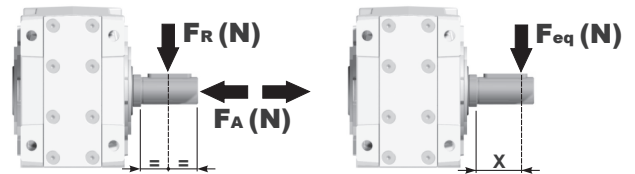
For all details on lubrication and plugs check our website [tab. 1](#)  
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

## RADIAL AND AXIAL LOADS

### Output shaft

Albero di uscita

$$F_{eq} = F_R \cdot \frac{54}{X+28}$$

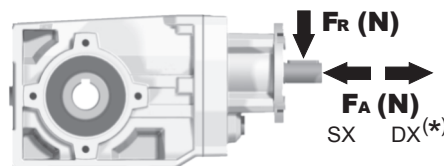


| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|--|-----|------|--|-----|------|
| 250                                    | 500 | 2500 | 75                                     | 800 | 4000 | 15                                     | 960 | 4800 |
| 150                                    | 600 | 3000 | 50                                     | 960 | 4800 |  |     |      |
| 100                                    | 700 | 3500 | 25                                     | 960 | 4800 |  |     |      |

**FR** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

### Input shaft

albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|
| 1400                                   | 240 | 1200 |
| 900                                    | 280 | 1400 |
| 500                                    | 340 | 1700 |

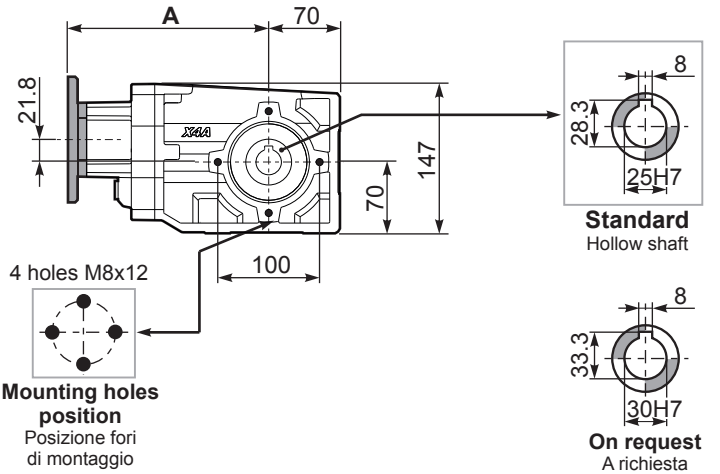
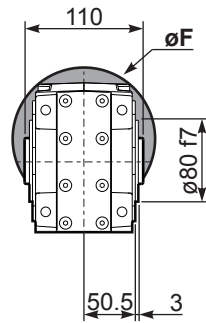
**\*Strong axial loads in the DX direction are not allowed.**  
Non sono consentiti forti carichi assiali con direzione DX

tab. 2

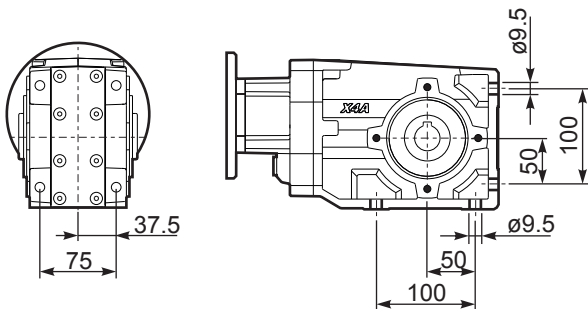
**PX42AC...** Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **7.82 kg**

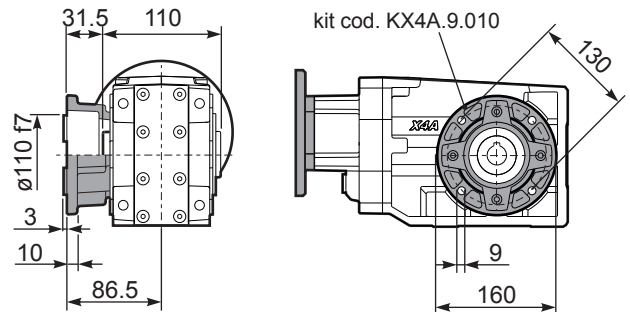
| M. flanges        | Kit code   | øF  | A     |
|-------------------|------------|-----|-------|
| <b>63B5</b>       | K063.4.041 | 140 | 199.5 |
| <b>71B5</b>       | K063.4.042 | 160 | 197.5 |
| <b>80/90B5</b>    | K063.4.043 | 200 | 199.5 |
| <b>100/112B5</b>  | KC40.4.043 | 250 | 214.3 |
| <b>71B14</b>      | K063.4.047 | 105 | 197.5 |
| <b>80B14</b>      | K063.4.046 | 120 | 199.5 |
| <b>90B14</b>      | K063.4.041 | 140 | 199.5 |
| <b>100/112B14</b> | KC40.4.041 | 160 | 214.3 |



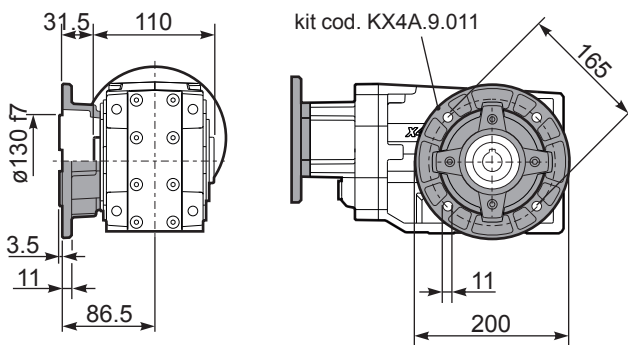
**PX42A...FB..** Feet  
Piedini



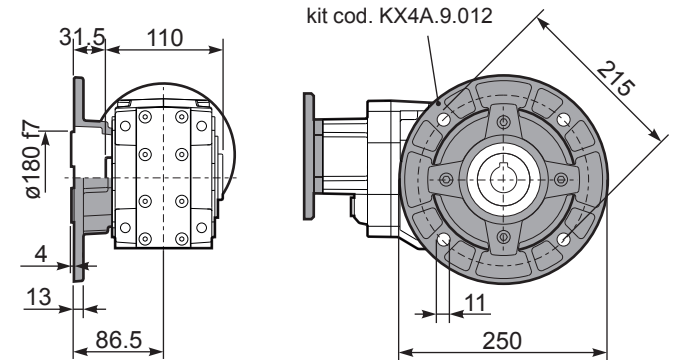
**PX42A...-F2..** Output flange  
Flangia uscita



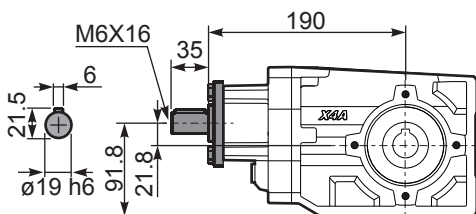
**PX42A...-F3..** Output flange  
Flangia uscita



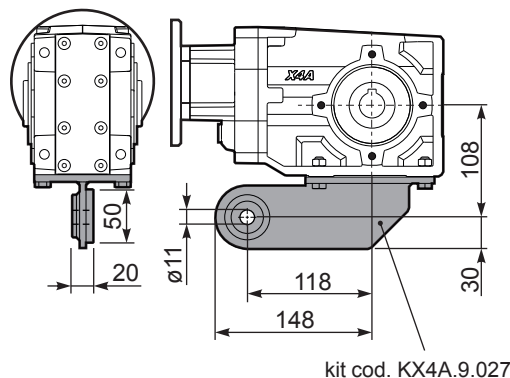
**PX42A...-F4..** Output flange  
Flangia uscita



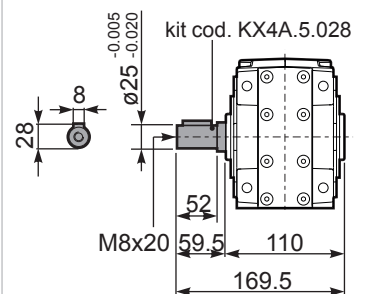
**RX42A...** Input shaft  
Albero in entrata

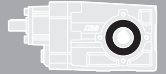


**PX42A...BR..** Reaction Arm  
Braccio di reazione



**PX42A...** Single output shaft  
Albero semplice in uscita





**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.94** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i    | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code |
|--|---------------|--|--|------------------------|--|---|----------------------------|----|-----------------------------|----|----|------------------|-------------|
|  |               |  |  |                        |  |   | -B                         | -C | -O                          | -P | -Q |                  |             |
|  |               |  |  |                        |  |   | 63                         | 71 | 56                          | 63 | 71 |                  |             |
| 27.8   | <b>50.35</b>  | 0.37                                   | 119                                      | 1.3                    | <b>0.46</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 171311           | 01          |
| 25.4   | <b>55.22</b>  | 0.37                                   | 131                                      | 1.1                    | <b>0.42</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 17178            | 02          |
| 23.4   | <b>59.92</b>  | 0.37                                   | 142                                      | 1.1                    | <b>0.39</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 151311           | 03          |
| 21.3   | <b>65.72</b>  | 0.37                                   | 156                                      | 1.0                    | <b>0.36</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 15178            | 04          |
| 19.5   | <b>71.78</b>  | 0.25                                   | 115                                      | 1.3                    | <b>0.33</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 101711           | 05          |
| 17.6   | <b>79.44</b>  | 0.25                                   | 127                                      | 1.2                    | <b>0.29</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 13178            | 06          |
| 15.2   | <b>92.08</b>  | 0.25                                   | 147                                      | 1.0                    | <b>0.25</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 15138            | 07          |
| 14.7   | <b>95.03</b>  | 0.25                                   | 152                                      | 1.0                    | <b>0.25</b>                              | <b>150</b>                                |                            |    | C                           | C  |    | 91711            | 08          |
| 11.1   | <b>126.55</b> | 0.18                                   | 155                                      | 1.0                    | <b>0.20</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 71711            | 09          |
| 10.5   | <b>133.15</b> | 0.18                                   | 163                                      | 1.0                    | <b>0.19</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 91311            | 10          |
| 9.3  | <b>150.18</b> | 0.12                                   | 119                                      | 1.3                    | <b>0.17</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 61711            | 11          |
| 7.9  | <b>177.30</b> | 0.12                                   | 140                                      | 1.1                    | <b>0.14</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 71311            | 12          |
| 6.7  | <b>210.42</b> | 0.09                                   | 133                                      | 1.2                    | <b>0.12</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 61311            | 13          |
| 6.1  | <b>230.79</b> | 0.09                                   | 146                                      | 1.1                    | <b>0.11</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 6178             | 14          |
| 5.1  | <b>272.47</b> | 0.06                                   | 113                                      | 1.4                    | <b>0.09</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 7138             | 15          |
| 4.3  | <b>323.37</b> | 0.06                                   | 134                                      | 1.2                    | <b>0.08</b>                              | <b>160</b>                                |                            |    | C                           | C  |    | 6138             | 16          |

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 **X43A** 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 **X43A** 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 **X43A** 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 **X43A** 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 **X43A** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |                       |         |         |     |
|---------------------|--|---------|-----------------------|---------|---------|-----|
|                     |  |         |                       |         |         |     |
| B3                  | B6   | B7      | B8                    | V5      | V6      | V8  |
| 0.80 LT             | 0.80 LT  | 0.60 LT | 0.80 LT               | 1.20 LT | 0.70 LT | Ask |
| AGIP Telium VSF 320 |  |         | SHELL Omala S4 WE 320 |         |         |     |

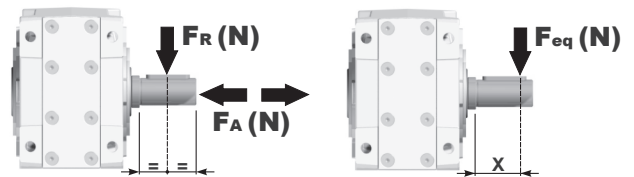
For all details on lubrication and plugs check our website **tab. 1**  
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

## RADIAL AND AXIAL LOADS

### Output shaft

Albero di uscita

$$F_{eq} = F_R \cdot \frac{54}{X+28}$$

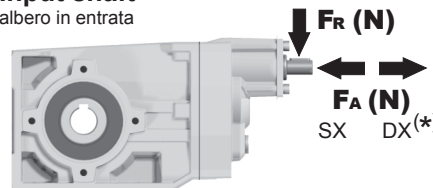


| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|--|-----|------|--|-----|------|
| 250                                    | 500 | 2500 | 75                                     | 800 | 4000 | 15                                     | 960 | 4800 |
| 150                                    | 600 | 3000 | 50                                     | 960 | 4800 |  |     |      |
| 100                                    | 700 | 3500 | 25                                     | 960 | 4800 |  |     |      |

**FR** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

### Input shaft

albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA<br>[N] | FR<br>[N] |
|--|-----------|-----------|
| 1400                                   | 140       | 700       |
| 900                                    | 160       | 800       |
| 500                                    | 190       | 950       |

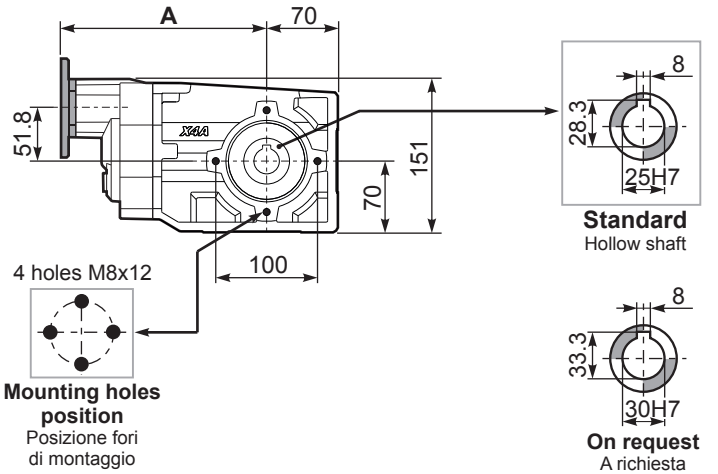
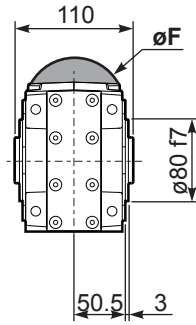
**\*Strong axial loads in the DX direction are not allowed.**  
Non sono consentiti forti carichi assiali con direzione DX



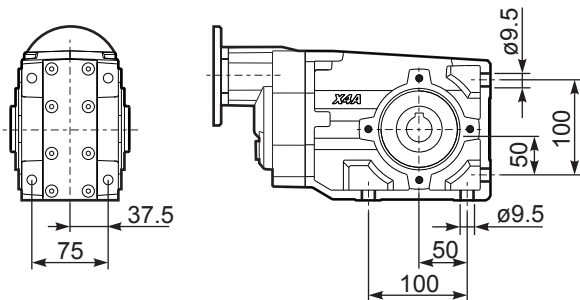
**PX43AC...** Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **7.93 kg**

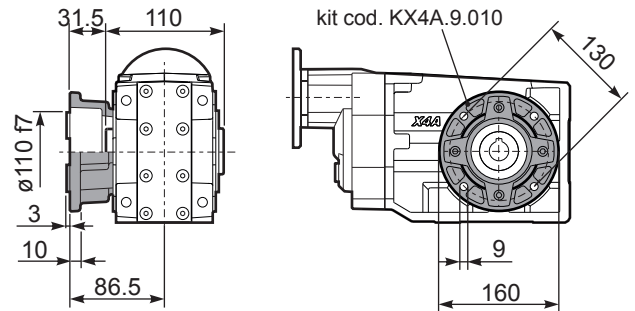
| M. flanges   | Kit code   | øF  | A     |
|--------------|------------|-----|-------|
| <b>63B5</b>  | K050.4.041 | 138 | 205   |
| <b>71B5</b>  | K050.4.042 | 160 | 202.5 |
| <b>56B14</b> | KC40.4.049 | 80  | 202.5 |
| <b>63B14</b> | K050.4.047 | 90  | 205   |
| <b>71B14</b> | K050.4.045 | 105 | 202.5 |



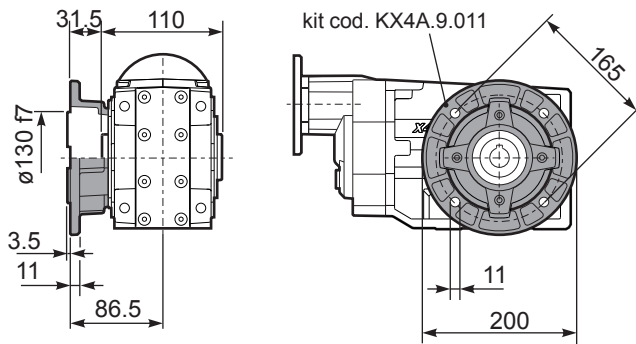
**PX43A...FB..** Feet  
Piedini



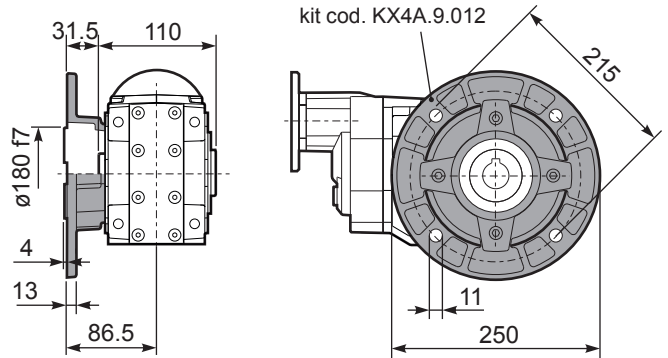
**PX43A...-F2..** Output flange  
Flangia uscita



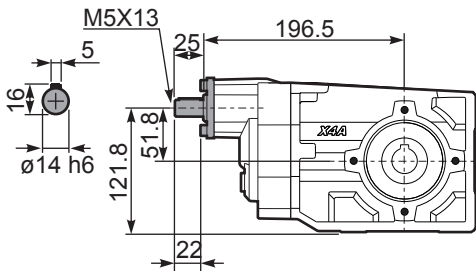
**PX43A...-F3..** Output flange  
Flangia uscita



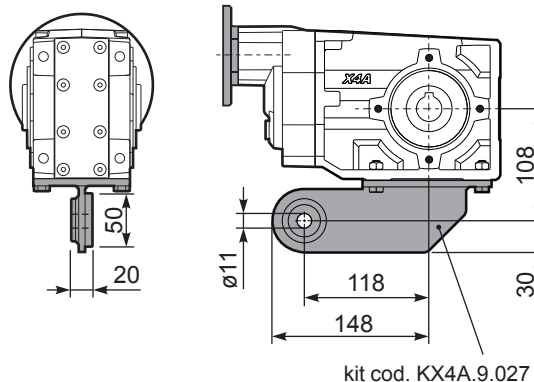
**PX43A...-F4..** Output flange  
Flangia uscita



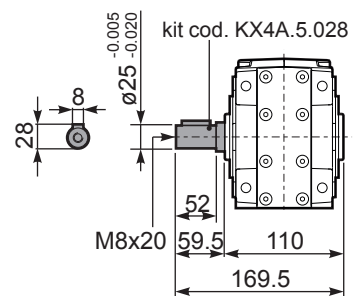
**RX43A...** Input shaft  
Albero in entrata

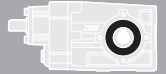


**PX43A...BR..** Reaction Arm  
Braccio di reazione



**PX43AA..** Single output shaft  
Albero semplice in uscita





**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.96** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i   | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    |    |            | Available B14 motor flanges |    |            | Output Shaft<br> | Ratios code |
|--|--------------|--|--|------------------------|--|---|----------------------------|----|----|------------|-----------------------------|----|------------|------------------|-------------|
|  |              |  |  |                        |  |   | -C                         | -D | -E | -F         | -R                          | -T | -U         |                  |             |
|  |              |  |  |                        |  |   | 71                         | 80 | 90 | 100<br>112 | 80                          | 90 | 100<br>112 |                  |             |
| 232  | <b>6.03</b>  | 3                                      | 116                                      | 1.2                    | <b>3.4</b>                               | <b>135</b>                                | B                          |    |    |            |                             |    |            | 3011             | 01          |
| 151  | <b>9.26</b>  | 3                                      | 179                                      | 0.9                    | <b>2.6</b>                               | <b>155</b>                                | B                          |    |    |            |                             |    |            | 308              | 02          |
| 123  | <b>11.36</b> | 3                                      | 219                                      | 1.0                    | <b>3.1</b>                               | <b>230</b>                                | B                          |    |    |            |                             |    |            | 2011             | 03          |
| 91   | <b>15.36</b> | 2.2                                    | 218                                      | 1.1                    | <b>2.5</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 1611             | 04          |
| 80   | <b>17.46</b> | 2.2                                    | 248                                      | 1.0                    | <b>2.2</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 208              | 05          |
| 70   | <b>19.97</b> | 2.2                                    | 284                                      | 0.9                    | <b>1.9</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 1311             | 06          |
| 59   | <b>23.60</b> | 1.5                                    | 231                                      | 1.1                    | <b>1.6</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 168              | 07          |
| 57   | <b>24.45</b> | 1.5                                    | 239                                      | 1.0                    | <b>1.6</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 1111             | 08          |
| 45.6   | <b>30.69</b> | 1.1                                    | 220                                      | 1.1                    | <b>1.2</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 138              | 09          |
| 39.6   | <b>35.35</b> | 1.1                                    | 253                                      | 1.0                    | <b>1.1</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 811              | 10          |
| 37.3   | <b>37.57</b> | 1.1                                    | 269                                      | 0.9                    | <b>1.0</b>                               | <b>250</b>                                | B                          |    |    |            |                             |    |            | 118              | 11          |
| 28.8   | <b>48.68</b> | 0.75                                   | 239                                      | 1.0                    | <b>0.78</b>                              | <b>250</b>                                | B                          |    |    |            |                             |    |            | 611              | 12          |
| 25.8   | <b>54.33</b> | 0.75                                   | 267                                      | 0.9                    | <b>0.70</b>                              | <b>250</b>                                | B                          |    |    |            |                             |    |            | 88               | 13          |
| 18.7   | <b>74.81</b> | 0.37                                   | 181                                      | 1.2                    | <b>0.43</b>                              | <b>210</b>                                | B                          |    |    |            |                             |    |            | 68               | 14          |

**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 **X52A** 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 **X52A** 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 **X52A** 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 **X52A** 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 **X52A** 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.

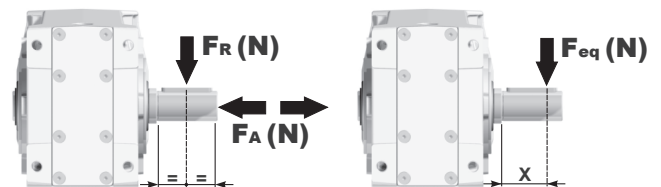
| Standard supplied          | For these mounting position specify in the order or add oil<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |           |           |                              |           |           |           |
|----------------------------|--|-----------|-----------|------------------------------|-----------|-----------|-----------|
|                            |  |           |           |                              |           |           |           |
| <b>B3</b>                  | <b>B6</b>  | <b>B7</b> | <b>B8</b> | <b>V5</b>                    | <b>V6</b> | <b>V8</b> | <b>V8</b> |
| 0.90 LT                    | 1.50LT   | 0.75 LT   | 1.40 LT   | 1.95 LT                      | 1.15 LT   | Ask       | Ask       |
| <b>AGIP</b> Telium VSF 320 |  |           |           | <b>SHELL</b> 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

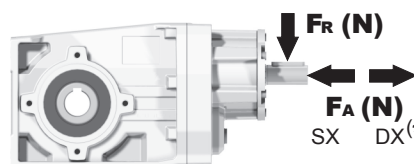
$$F_{eq} = F_R \cdot \frac{61.5}{X+31}$$



| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   |
|--|-----|------|--|------|------|--|------|------|
| <b>250</b>                             | 600 | 3000 | <b>75</b>                              | 820  | 4100 | <b>15</b>                              | 1660 | 8300 |
| <b>150</b>                             | 700 | 3500 | <b>50</b>                              | 960  | 4800 |  |      |      |
| <b>100</b>                             | 800 | 4000 | <b>25</b>                              | 1350 | 6750 |  |      |      |

**F<sub>R</sub>** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

**Input shaft**  
albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|
| <b>1400</b>                            | 450 | 2250 |
| <b>900</b>                             | 500 | 2500 |
| <b>500</b>                             | 600 | 3000 |

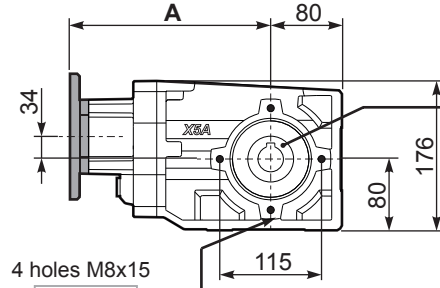
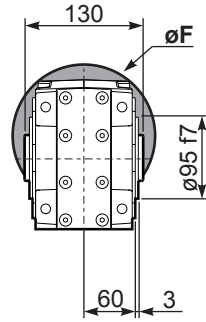
**\*Strong axial loads in the DX direction are not allowed.**  
Non sono consentiti forti carichi assiali con direzione DX

**tab. 2**

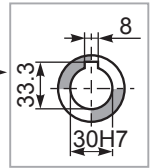
**PX52AC...** Basic Gearbox  
Riduttore base

Gearbox weight **12.80 kg**  
peso riduttore

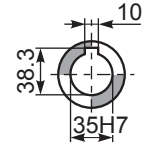
| M. flanges        | Kit code    | øF  | A   |
|-------------------|-------------|-----|-----|
| <b>71B5</b>       | KC023.4.041 | 160 | 234 |
| <b>80/90B5</b>    | KC023.4.042 | 200 | 236 |
| <b>100/112B5</b>  | KC023.4.043 | 250 | 245 |
| <b>80B14</b>      | KC085.4.046 | 120 | 236 |
| <b>90B14</b>      | KC085.4.045 | 140 | 236 |
| <b>100/112B14</b> | KC085.4.047 | 160 | 245 |



4 holes M8x15  
**Mounting holes position**  
Posizione fori di montaggio

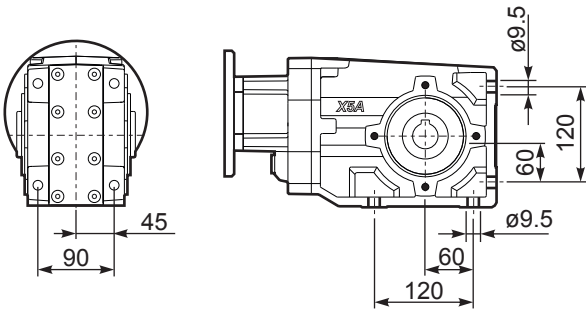


**Standard**  
Hollow shaft

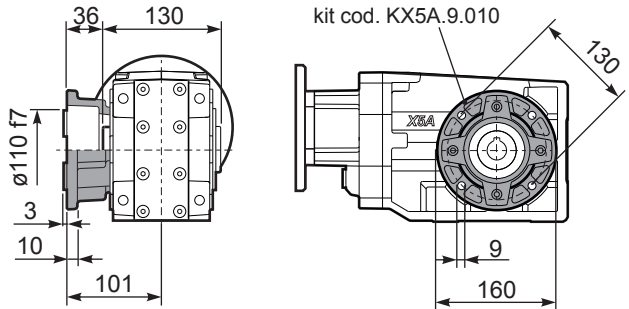


**On request**  
A richiesta

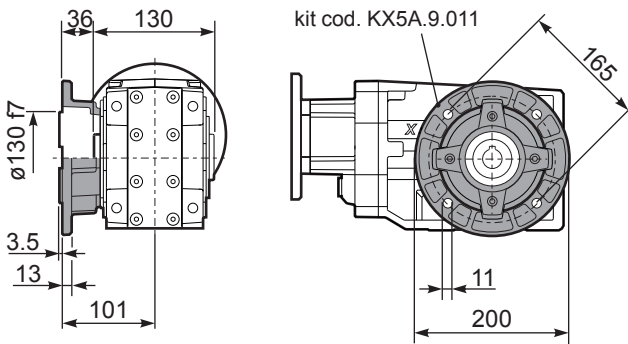
**PX52A...FB..** Feet  
Piedini



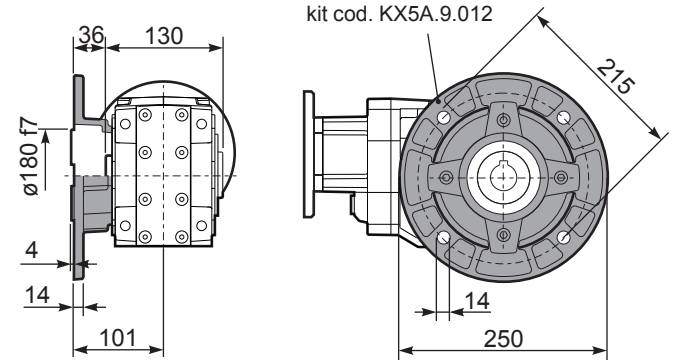
**PX52A...-F2..** Output flange  
Flangia uscita



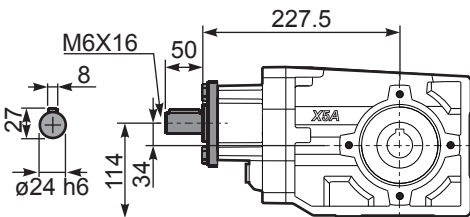
**PX52A...-F3..** Output flange  
Flangia uscita



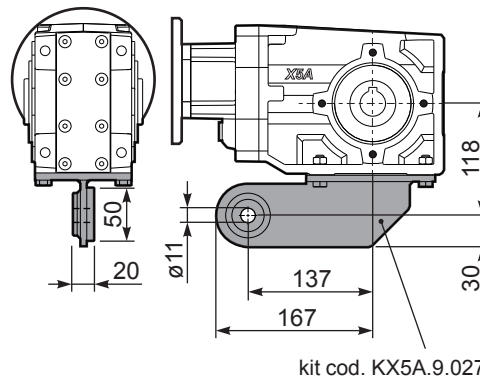
**PX52A...-F4..** Output flange  
Flangia uscita



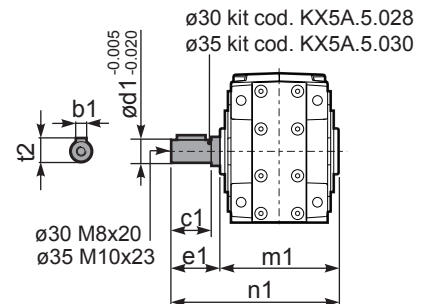
**RX52A...** Input shaft  
Albero in entrata



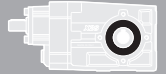
**PX52A...BR..** Reaction Arm  
Braccio di reazione



**PX52AA..** Single output shaft  
Albero semplice in uscita



|            | b1 | c1 | d1 | e1   | m1  | n1    | t2 |
|------------|----|----|----|------|-----|-------|----|
| <b>ø30</b> | 8  | 60 | 30 | 68   | 134 | 202   | 33 |
| <b>ø35</b> | 10 | 60 | 35 | 73.5 | 141 | 214.5 | 38 |



**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.94** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i    | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    |    |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code |
|--|---------------|--|--|------------------------|--|---|----------------------------|----|----|----|-----------------------------|----|----|------------------|-------------|
|  |               |  |  |                        |  |   | -B                         | -C | -D | -E | -Q                          | -R | -T |                  |             |
|  |               |  |  |                        |  |   | 63                         | 71 | 80 | 90 | 71                          | 80 | 90 |                  |             |
| 24.7   | <b>56.76</b>  | 0.55                                   | 201                                      | 1.2                    | 0.69                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 191311           | 01          |
| 21.3   | <b>65.79</b>  | 0.55                                   | 233                                      | 1.1                    | 0.59                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 171311           | 02          |
| 18.1   | <b>77.23</b>  | 0.55                                   | 274                                      | 0.9                    | 0.50                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 151311           | 03          |
| 16.0   | <b>87.23</b>  | 0.37                                   | 207                                      | 1.2                    | 0.45                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 19138            | 04          |
| 15.2   | <b>92.18</b>  | 0.37                                   | 219                                      | 1.1                    | 0.42                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 131311           | 05          |
| 13.9   | <b>100.47</b> | 0.37                                   | 238                                      | 1.0                    | 0.39                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 19811            | 06          |
| 12.0   | <b>116.45</b> | 0.37                                   | 276                                      | 0.9                    | 0.33                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 17811            | 07          |
| 11.1   | <b>125.82</b> | 0.25                                   | 201                                      | 1.2                    | 0.31                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 101311           | 08          |
| 9.9  | <b>141.66</b> | 0.25                                   | 227                                      | 1.1                    | 0.28                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 13138            | 09          |
| 8.6  | <b>163.16</b> | 0.25                                   | 261                                      | 1.0                    | 0.24                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 13811            | 10          |
| 7.8  | <b>178.96</b> | 0.18                                   | 219                                      | 1.1                    | 0.22                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 1788             | 11          |
| 7.2  | <b>193.36</b> | 0.18                                   | 237                                      | 1.1                    | 0.20                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 10138            | 12          |
| 6.5  | <b>216.84</b> | 0.18                                   | 265                                      | 0.9                    | 0.18                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 71311            | 13          |
| 5.5  | <b>252.36</b> | 0.12                                   | 200                                      | 1.3                    | 0.15                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 9138             | 14          |
| 4.8  | <b>290.67</b> | 0.12                                   | 230                                      | 1.1                    | 0.13                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 9811             | 15          |
| 4.2  | <b>333.23</b> | 0.12                                   | 263                                      | 0.9                    | 0.12                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 7138             | 16          |
| 3.6  | <b>383.82</b> | 0.12                                   | 303                                      | 0.8                    | 0.10                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 7811             | 17          |
| 3.1  | <b>446.70</b> | 0.12*                                  | 353                                      | 0.7                    | 0.09                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 988              | 18          |
| 2.4  | <b>589.85</b> | 0.12*                                  | 466                                      | 0.5                    | 0.07                                     | <b>250</b>                                | B                          |    |    |    | C                           | C  |    | 788              | 19          |

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

\* Power higher than the maximum one which can be supported by the gearbox. Select according to the torque M<sub>2R</sub>  
 Potenza superiore a quella massima sopportabile dal riduttore. Selezionare in base al momento torcente M<sub>2R</sub>

**EN** Unit **X53A** 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 **X53A** 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 **X53A** 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 **X53A** 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 **X53A** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |         |                       |         |     |
|---------------------|--|---------|---------|-----------------------|---------|-----|
|                     |  |         |         |                       |         |     |
| 1.30 LT             | 1.55 LT  | 0.85 LT | 1.45 LT | 2.10 LT               | 1.25 LT | Ask |
| AGIP Telium VSF 320 |  |         |         | SHELL Omala S4 WE 320 |         |     |

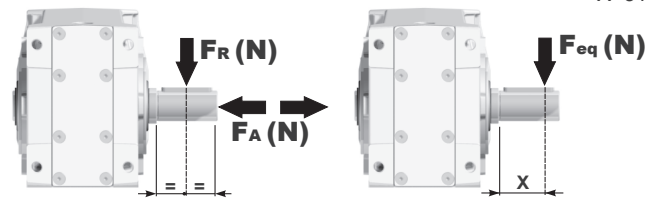
For all details on lubrication and plugs check our website **tab. 1**  
 Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

### RADIAL AND AXIAL LOADS

#### Output shaft

Albero di uscita

$$F_{eq} = F_R \cdot \frac{61.5}{X+31}$$

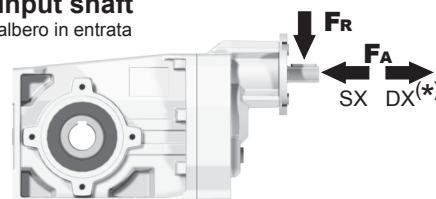


| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   |
|--|-----|------|--|------|------|--|------|------|
| 250                                    | 600 | 3000 | 75                                     | 820  | 4100 | 15                                     | 1660 | 8300 |
| 150                                    | 700 | 3500 | 50                                     | 960  | 4800 |  |      |      |
| 100                                    | 800 | 4000 | 25                                     | 1350 | 6750 |  |      |      |

**FR** On request taper roller bearings to increase radial loads.  
 A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

#### Input shaft

albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA<br>[N] | FR<br>[N] |
|--|-----------|-----------|
| 1400                                   | 400       | 2000      |
| 900                                    | 440       | 2200      |
| 500                                    | 440       | 2200      |

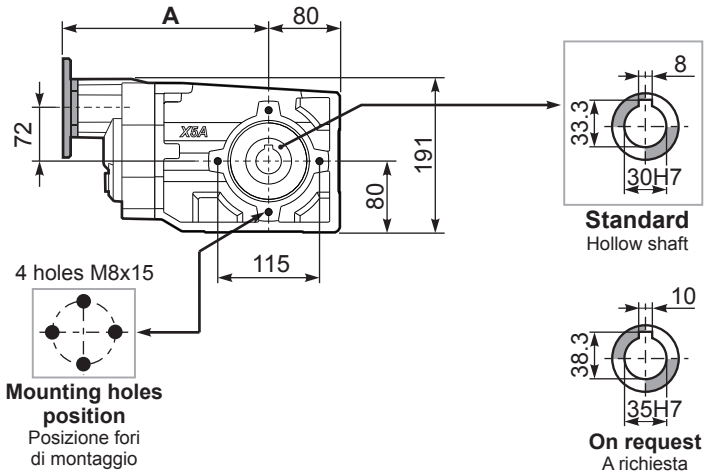
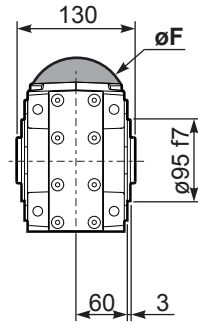
\*Strong axial loads in the DX direction are not allowed.  
 Non sono consentiti forti carichi assiali con direzione DX

**tab. 2**

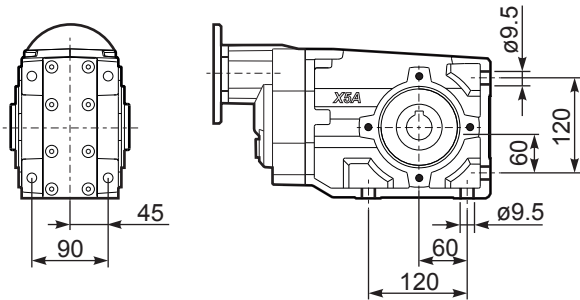
**PX53AC...** Basic Gearbox  
Riduttore base

Gearbox weight **12.65 kg**  
peso riduttore

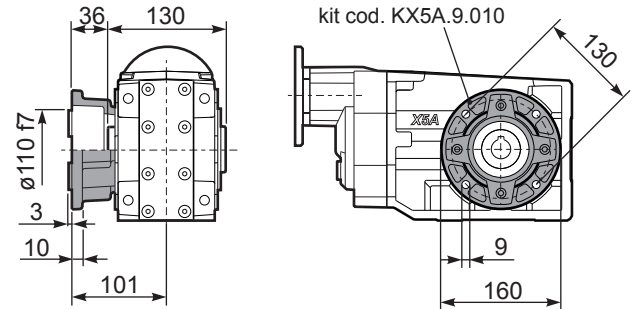
| M. flanges     | Kit code   | øF  | A   |
|----------------|------------|-----|-----|
| <b>63B5</b>    | K063.4.041 | 140 | 246 |
| <b>71B5</b>    | K063.4.042 | 160 | 244 |
| <b>80/90B5</b> | K063.4.043 | 200 | 246 |
| <b>71B14</b>   | K063.4.047 | 105 | 244 |
| <b>80B14</b>   | K063.4.046 | 120 | 246 |
| <b>90B14</b>   | K063.4.041 | 140 | 246 |



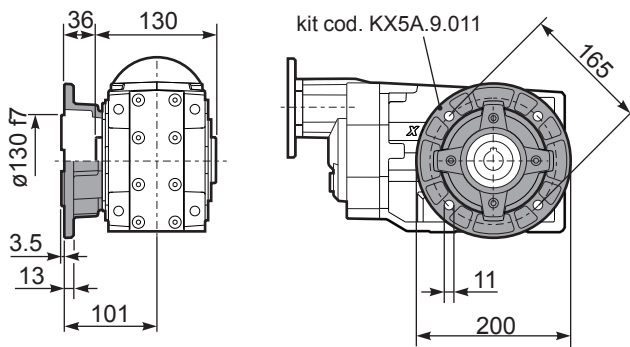
**PX53A...FB..** Feet  
Piedini



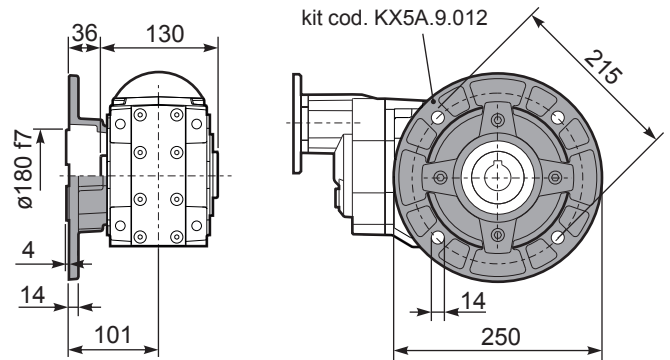
**PX53A...-F2..** Output flange  
Flangia uscita



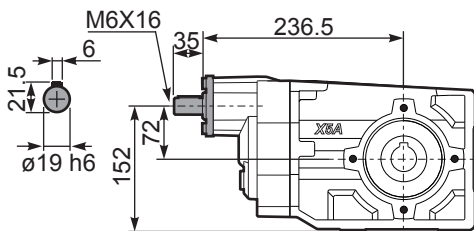
**PX53A...-F3..** Output flange  
Flangia uscita



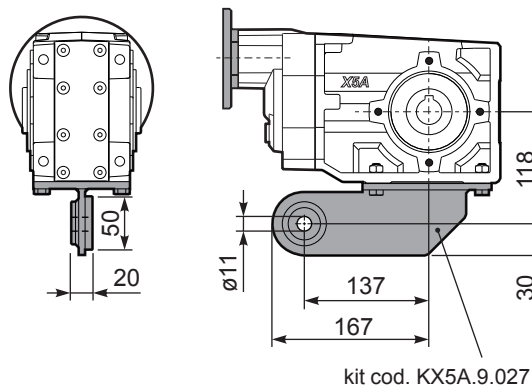
**PX53A...-F4..** Output flange  
Flangia uscita



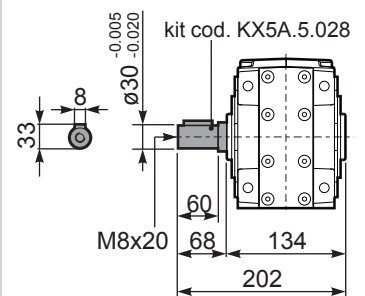
**RX53A...** Input shaft  
Albero in entrata

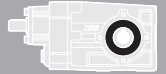


**PX53A...BR..** Reaction Arm  
Braccio di reazione



**PX53AA..** Single output shaft  
Albero semplice in uscita





**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.96** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i   | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    |    |            |     | Available B14 motor flanges |    |            |     | Output Shaft<br> | Ratios code |
|--|--------------|--|--|------------------------|--|---|----------------------------|----|----|------------|-----|-----------------------------|----|------------|-----|------------------|-------------|
|  |              |  |  |                        |  |   | -C                         | -D | -E | -F         | -G  | -R                          | -T | -U         | -V  |                  |             |
|  |              |  |  |                        |  |   | 71                         | 80 | 90 | 100<br>112 | 132 | 80                          | 90 | 100<br>112 | 132 |                  |             |
| 232  | <b>6.03</b>  | 5.5                                    | 211                                      | 1.1                    | <b>6.1</b>                               | <b>240</b>                                | B                          |    |    |            |     |                             |    |            |     | 3011             | 01          |
| 151  | <b>9.26</b>  | 4                                      | 238                                      | 1.1                    | <b>4.5</b>                               | <b>270</b>                                | B                          |    |    |            |     |                             |    |            |     | 308              | 02          |
| 123  | <b>11.36</b> | 4                                      | 291                                      | 1.2                    | <b>4.7</b>                               | <b>350</b>                                | B                          |    |    |            |     |                             |    |            |     | 2011             | 03          |
| 91   | <b>15.36</b> | 4                                      | 394                                      | 1.0                    | <b>3.8</b>                               | <b>385</b>                                | B                          |    |    |            |     |                             |    |            |     | 1611             | 04          |
| 80   | <b>17.46</b> | 4                                      | 448                                      | 0.9                    | <b>3.5</b>                               | <b>400</b>                                | B                          |    |    |            |     |                             |    |            |     | 208              | 05          |
| 70   | <b>19.97</b> | 3                                      | 386                                      | 1.1                    | <b>3.1</b>                               | <b>410</b>                                | B                          |    |    |            |     |                             |    |            |     | 1311             | 06          |
| 59   | <b>23.60</b> | 3                                      | 456                                      | 0.9                    | <b>2.7</b>                               | <b>410</b>                                | B                          |    |    |            |     |                             |    |            |     | 168              | 07          |
| 57   | <b>24.45</b> | 3                                      | 472                                      | 0.9                    | <b>2.6</b>                               | <b>410</b>                                | B                          |    |    |            |     |                             |    |            |     | 1111             | 08          |
| 45.6   | <b>30.69</b> | 2.2                                    | 436                                      | 0.9                    | <b>2.0</b>                               | <b>410</b>                                | B                          |    |    |            |     |                             |    |            |     | 138              | 09          |
| 39.6   | <b>35.35</b> | 1.5                                    | 346                                      | 1.2                    | <b>1.8</b>                               | <b>410</b>                                | B                          |    |    |            |     |                             |    |            |     | 811              | 10          |
| 37.3   | <b>37.57</b> | 1.5                                    | 368                                      | 1.1                    | <b>1.7</b>                               | <b>410</b>                                | B                          |    |    |            |     |                             |    |            |     | 118              | 11          |
| 28.8   | <b>48.68</b> | 1.1                                    | 348                                      | 1.0                    | <b>1.1</b>                               | <b>365</b>                                | B                          |    |    |            |     |                             |    |            |     | 611              | 12          |
| 25.8   | <b>54.33</b> | 1.1                                    | 389                                      | 1.1                    | <b>1.2</b>                               | <b>410</b>                                | B                          |    |    |            |     |                             |    |            |     | 88               | 13          |
| 18.7   | <b>74.81</b> | 0.75                                   | 367                                      | 1.0                    | <b>0.73</b>                              | <b>360</b>                                | B                          |    |    |            |     |                             |    |            |     | 68               | 14          |

**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 **X62A** 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 **X62A** 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 **X62A** 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 **X62A** 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 **X62A** 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.

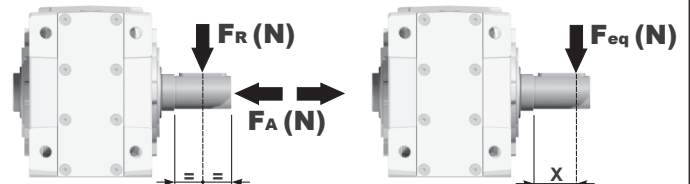
| Standard supplied          | For these mounting position specify in the order or add oil<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |           |           |                              |           |           |           |
|----------------------------|--|-----------|-----------|------------------------------|-----------|-----------|-----------|
|                            |  |           |           |                              |           |           |           |
| <b>B3</b>                  | <b>B6</b>  | <b>B7</b> | <b>B8</b> | <b>V5</b>                    | <b>V6</b> | <b>V8</b> | <b>V8</b> |
| 1.25 LT                    | 1.70 LT  | 0.95 LT   | 1.60 LT   | 2.45 LT                      | 1.50 LT   | Ask       | Ask       |
| <b>AGIP</b> Telium VSF 320 |  |           |           | <b>SHELL</b> 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

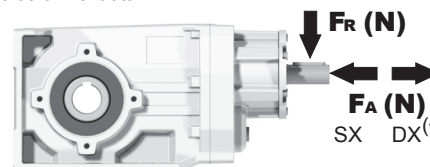
$$F_{eq} = F_R \cdot \frac{69}{X+39}$$



| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   |
|--|-----|------|--|------|------|--|------|------|
| <b>250</b>                             | 600 | 3000 | <b>75</b>                              | 890  | 4450 | <b>15</b>                              | 1660 | 8300 |
| <b>150</b>                             | 700 | 3500 | <b>50</b>                              | 1140 | 5700 |  |      |      |
| <b>100</b>                             | 780 | 3900 | <b>25</b>                              | 1330 | 6650 |  |      |      |

**FR** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.

**Input shaft**  
albero in entrata



| n <sub>1</sub><br>[min <sup>-1</sup> ] | FA  | FR   |
|--|-----|------|
| <b>1400</b>                            | 450 | 2250 |
| <b>900</b>                             | 500 | 2500 |
| <b>500</b>                             | 600 | 3000 |

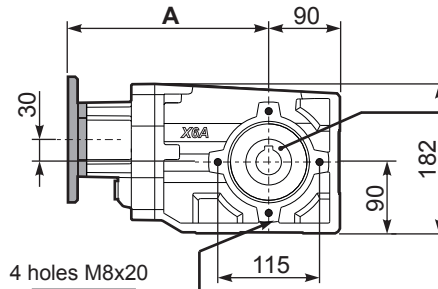
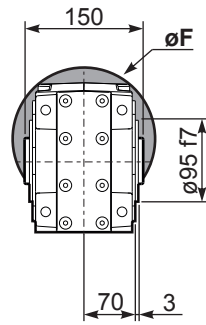
**\*Strong axial loads in the DX direction are not allowed.**  
Non sono consentiti forti carichi assiali con direzione DX

**tab. 2**

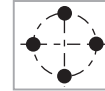
**PX62AC...** Basic Gearbox  
Riduttore base

Gearbox weight **15.80 kg**  
peso riduttore

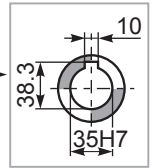
| M. flanges        | Kit code    | øF  | A   |
|-------------------|-------------|-----|-----|
| <b>71B5</b>       | KC023.4.041 | 160 | 253 |
| <b>80/90B5</b>    | KC023.4.042 | 200 | 255 |
| <b>100/112B5</b>  | KC023.4.043 | 250 | 264 |
| <b>132B5</b>      | KC50.4.043  | 300 | 282 |
| <b>80B14</b>      | KC085.4.046 | 120 | 255 |
| <b>90B14</b>      | KC085.4.045 | 140 | 255 |
| <b>100/112B14</b> | KC085.4.047 | 160 | 264 |
| <b>132B14</b>     | KC50.4.041  | 200 | 282 |



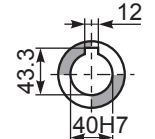
4 holes M8x20



**Mounting holes position**  
Posizione fori di montaggio

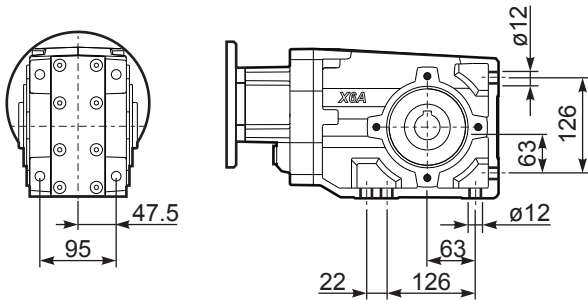


**Standard**  
Hollow shaft

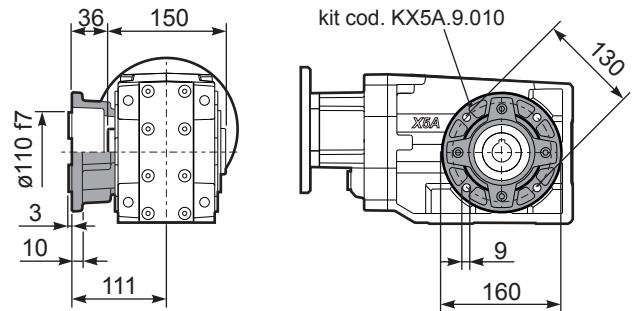


**On request**  
A richiesta

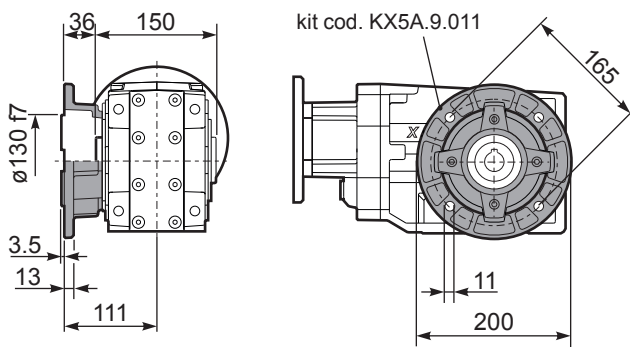
**PX62A...FB..** Feet  
Piedini



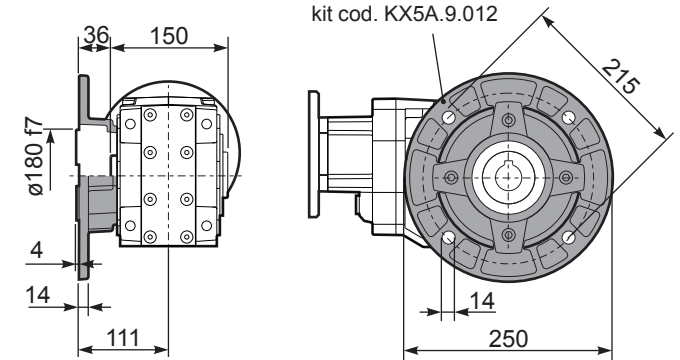
**PX62A...-F2..** Output flange  
Flangia uscita



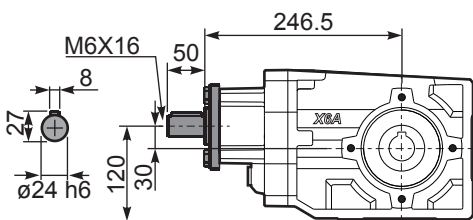
**PX62A...-F3..** Output flange  
Flangia uscita



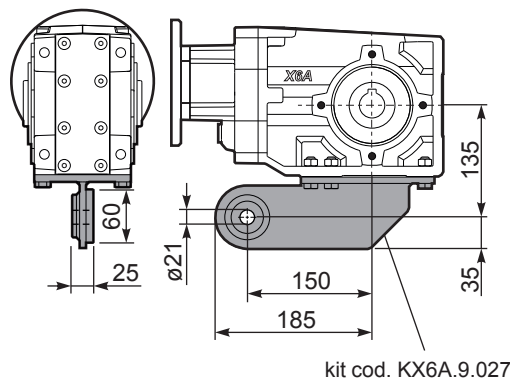
**PX62A...-F4..** Output flange  
Flangia uscita



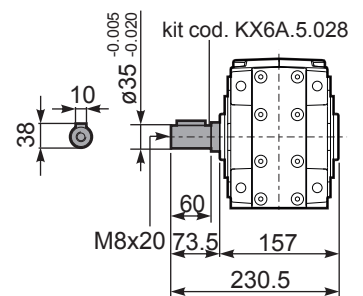
**RX62A...** Input shaft  
Albero in entrata

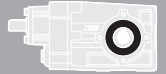


**PX62A...BR..** Reaction Arm  
Braccio di reazione



**PX62AA..** Single output shaft  
Albero semplice in uscita





**QUICK SELECTION / Selezione veloce** The dynamic efficiency is **0.94** for all ratios **input speed (n<sub>1</sub>) = 1400 min<sup>-1</sup>**

| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i    | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges |    |    |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code |
|--|---------------|--|--|------------------------|--|---|----------------------------|----|----|----|-----------------------------|----|----|------------------|-------------|
|  |               |  |  |                        |  |   | -B                         | -C | -D | -E | -Q                          | -R | -T |                  |             |
|  |               |  |  |                        |  |   | 63                         | 71 | 80 | 90 | 71                          | 80 | 90 |                  |             |
| 24.7   | <b>56.76</b>  | 1.1                                    | 398                                      | 1.0                    | <b>1.1</b>                               | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 191311           | 01          |
| 21.3   | <b>65.79</b>  | 0.75                                   | 316                                      | 1.3                    | <b>0.97</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 171311           | 02          |
| 18.1   | <b>77.23</b>  | 0.75                                   | 371                                      | 1.1                    | <b>0.83</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 151311           | 03          |
| 16.0   | <b>87.23</b>  | 0.75                                   | 420                                      | 1.0                    | <b>0.73</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 19138            | 04          |
| 15.2   | <b>92.18</b>  | 0.75                                   | 443                                      | 0.9                    | <b>0.69</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 131311           | 05          |
| 13.9   | <b>100.47</b> | 0.55                                   | 357                                      | 1.2                    | <b>0.64</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 19811            | 06          |
| 12.0   | <b>116.45</b> | 0.55                                   | 413                                      | 1.0                    | <b>0.55</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 17811            | 07          |
| 11.1   | <b>125.82</b> | 0.55                                   | 446                                      | 0.9                    | <b>0.51</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 101311           | 08          |
| 9.9  | <b>141.66</b> | 0.37                                   | 336                                      | 1.2                    | <b>0.45</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 13138            | 09          |
| 8.6  | <b>163.16</b> | 0.37                                   | 387                                      | 1.1                    | <b>0.39</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 13811            | 10          |
| 7.8  | <b>178.96</b> | 0.37                                   | 424                                      | 1.0                    | <b>0.36</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 1788             | 11          |
| 7.2  | <b>193.36</b> | 0.37                                   | 459                                      | 0.9                    | <b>0.33</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 10138            | 12          |
| 6.5  | <b>216.84</b> | 0.25                                   | 347                                      | 1.2                    | <b>0.29</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 71311            | 13          |
| 5.5  | <b>252.36</b> | 0.25                                   | 404                                      | 1.0                    | <b>0.25</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 9138             | 14          |
| 4.8  | <b>290.67</b> | 0.25                                   | 465                                      | 0.9                    | <b>0.22</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 9811             | 15          |
| 4.2  | <b>333.23</b> | 0.18                                   | 408                                      | 1.0                    | <b>0.19</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 7138             | 16          |
| 3.6  | <b>383.82</b> | 0.18                                   | 470                                      | 0.9                    | <b>0.17</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 7811             | 17          |
| 3.1  | <b>446.70</b> | 0.12                                   | 353                                      | 1.2                    | <b>0.14</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 988              | 18          |
| 2.4  | <b>589.85</b> | 0.12                                   | 466                                      | 0.9                    | <b>0.11</b>                              | <b>410</b>                                | B                          |    |    |    | C                           | C  |    | 788              | 19          |

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 **X63A** 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 **X63A** 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 **X63A** ist mit synthetischem Öl gefüllt und ist lebensdauer geschmiert. In Tabelle 1 ist die Schmiermenge und das empfohlene Schmiermittel angegeben. In Tabelle 2 sind die zulässigen Radial - und Axialbelastungen des Getriebes aufgeführt.

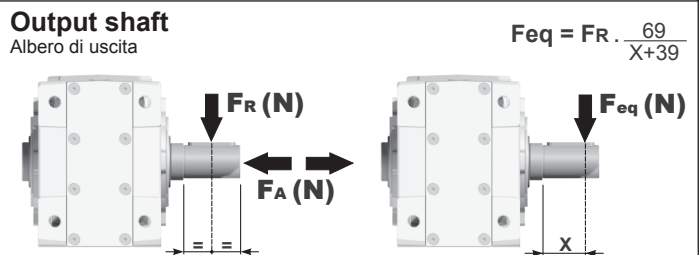
**F** Le réducteur **X63A** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien. Voir tableau 1 concernant les huiles et les quantités conseillées. Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

**E** El reductor tamaño **X63A** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |                       |         |         |     |
|---------------------|--|---------|-----------------------|---------|---------|-----|
|                     |  |         |                       |         |         |     |
| B3                  | B6   | B7      | B8                    | V5      | V6      | V8  |
| 1.80 LT             | 1.80 LT  | 1.05 LT | 1.70 LT               | 2.60 LT | 1.65 LT | Ask |
| AGIP Telium VSF 320 |  |         | SHELL Omala S4 WE 320 |         |         |     |

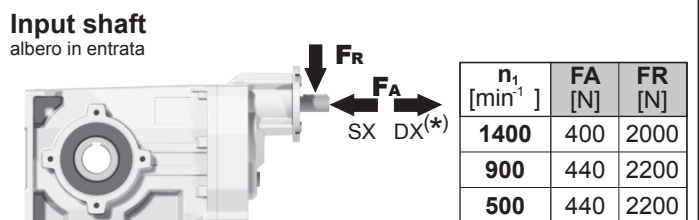
For all details on lubrication and plugs check our website **tab. 1**  
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

### RADIAL AND AXIAL LOADS



| n <sub>2</sub><br>[min <sup>-1</sup> ] | FA  | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   | n <sub>2</sub><br>[min <sup>-1</sup> ] | FA   | FR   |
|--|-----|------|--|------|------|--|------|------|
| 250                                    | 600 | 3000 | 75                                     | 890  | 4450 | 15                                     | 1660 | 8300 |
| 150                                    | 700 | 3500 | 50                                     | 1140 | 5700 |  |      |      |
| 100                                    | 780 | 3900 | 25                                     | 1330 | 6650 |  |      |      |

**F<sub>R</sub>** On request taper roller bearings to increase radial loads.  
A richiesta cuscinetti a rulli conici per aumentare i carichi radiali.



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

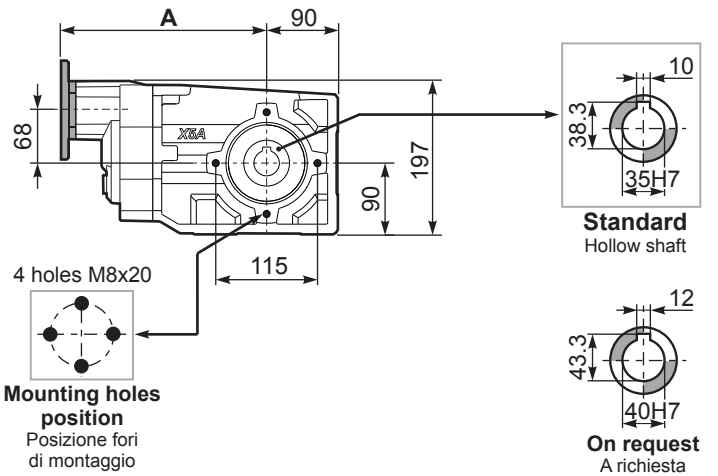
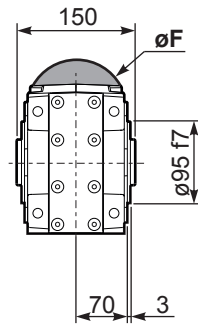
**tab. 2**



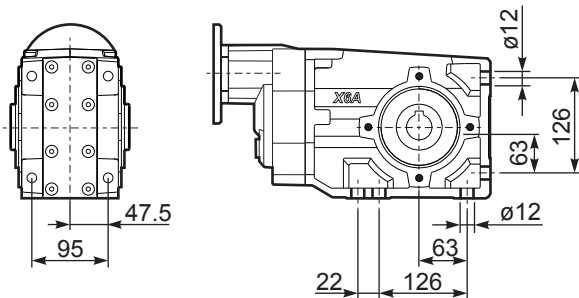
**PX63AC...** Basic Gearbox  
Riduttore base

Gearbox weight **15.98 kg**  
peso riduttore

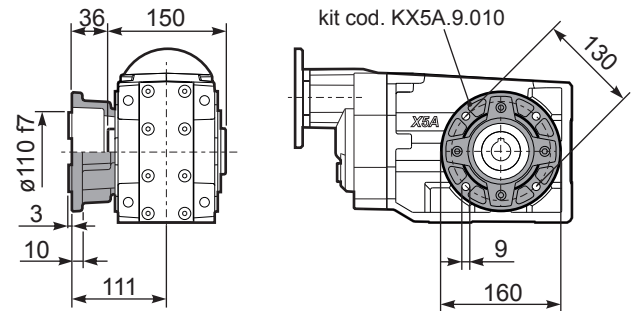
| M. flanges     | Kit code   | øF  | A   |
|----------------|------------|-----|-----|
| <b>63B5</b>    | K063.4.041 | 140 | 265 |
| <b>71B5</b>    | K063.4.042 | 160 | 263 |
| <b>80/90B5</b> | K063.4.043 | 200 | 265 |
| <b>71B14</b>   | K063.4.047 | 105 | 263 |
| <b>80B14</b>   | K063.4.046 | 120 | 265 |
| <b>90B14</b>   | K063.4.041 | 140 | 265 |



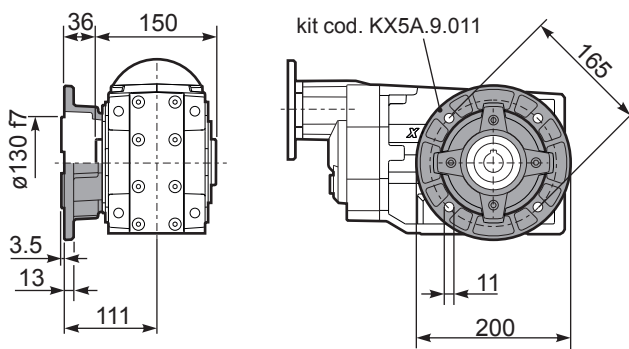
**PX63A...FB..** Feet  
Piedini



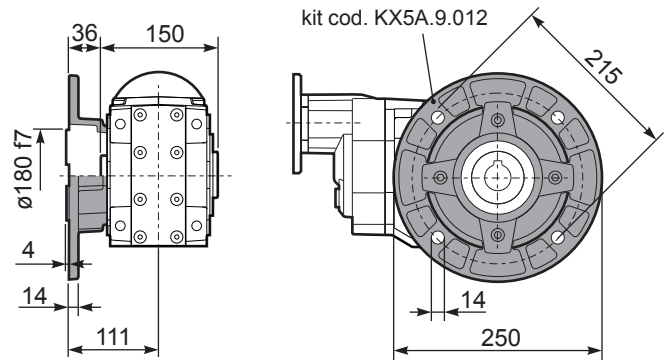
**PX63A...-F2..** Output flange  
Flangia uscita



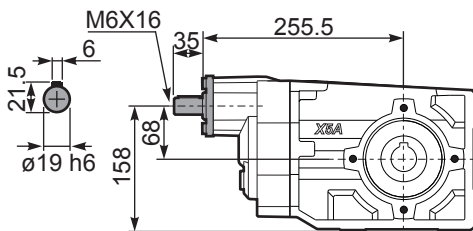
**PX63A...-F3..** Output flange  
Flangia uscita



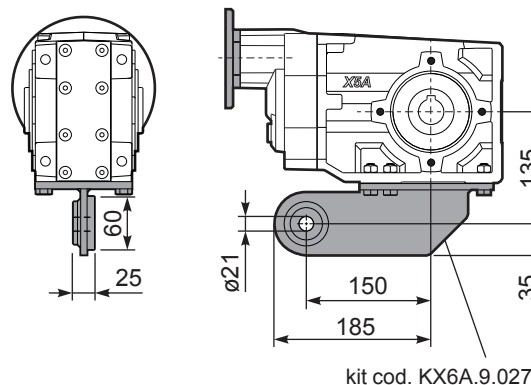
**PX63A...-F4..** Output flange  
Flangia uscita



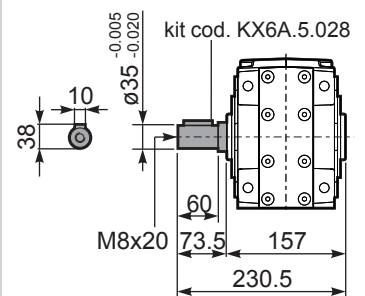
**RX63A...** Input shaft  
Albero in entrata



**PX63A...BR..** Reaction Arm  
Braccio di reazione



**PX63AA..** Single output shaft  
Albero semplice in uscita





## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$ | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |            |     | Available B14 motor flanges |    |            |     | Output Shaft<br>$\varnothing$ | Ratios code<br> |    |
|---|--------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|------------|-----|-----------------------------|----|------------|-----|-------------------------------|-----------------|----|
|   |              |                                 |                                   |                        |                                   |                                    | -C                         | -D | -E | -F         | -G  | -R                          | -T | -U         | -V  |                               |                 |    |
|   |              |                                 |                                   |                        |                                   |                                    | 71                         | 80 | 90 | 100<br>112 | 132 | 80                          | 90 | 100<br>112 | 132 |                               |                 |    |
| 176   | <b>7.94</b>  | 7.5                             | 369                               | 1.0                    | 7.5                               | 380                                | B                          |    |    |            |     |                             |    |            |     |                               | 302418          | 01 |
| 153   | <b>9.13</b>  | 7.5                             | 425                               | 0.9                    | 6.7                               | 390                                | B                          |    |    |            |     |                             |    |            |     |                               | 302416          | 02 |
| 131   | <b>10.66</b> | 5.5                             | 366                               | 1.1                    | 6.0                               | 410                                | B                          |    |    |            |     |                             |    |            |     |                               | 302414          | 03 |
| 94  | <b>14.97</b> | 5.5                             | 514                               | 1.1                    | 6.0                               | 580                                | B                          |    |    |            |     |                             |    |            |     |                               | 202418          | 04 |
| 81  | <b>17.21</b> | 5.5                             | 591                               | 1.0                    | 5.4                               | 600                                | B                          |    |    |            |     |                             |    |            |     |                               | 202416          | 05 |
| 69  | <b>20.24</b> | 5.5                             | 695                               | 1.0                    | 5.2                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 162418          | 06 |
| 60  | <b>23.27</b> | 4                               | 585                               | 1.2                    | 4.5                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 162416          | 07 |
| 53  | <b>26.31</b> | 4                               | 661                               | 1.0                    | 4.0                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 132418          | 08 |
| 46.3  | <b>30.25</b> | 4                               | 760                               | 0.9                    | 3.5                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 132416          | 09 |
| 39.6  | <b>35.32</b> | 3                               | 668                               | 1.0                    | 3.0                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 132414          | 10 |
| 37.8  | <b>37.03</b> | 3                               | 701                               | 1.0                    | 2.8                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 112416          | 11 |
| 32.4  | <b>43.23</b> | 2.2                             | 602                               | 1.1                    | 2.4                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 112414          | 12 |
| 30.1  | <b>46.58</b> | 2.2                             | 649                               | 1.0                    | 2.3                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 82418           | 13 |
| 26.1  | <b>53.55</b> | 2.2                             | 746                               | 0.9                    | 2.0                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 82416           | 14 |
| 22.4  | <b>62.52</b> | 1.5                             | 600                               | 1.1                    | 1.7                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 82414           | 15 |
| 19.0  | <b>73.75</b> | 1.1                             | 517                               | 1.1                    | 1.2                               | 580                                | B                          |    |    |            |     |                             |    |            |     |                               | 62416           | 16 |
| 16.3  | <b>86.09</b> | 1.1                             | 604                               | 1.1                    | 1.2                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                               | 62414           | 17 |

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 **X73C** 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 **X73C** 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 **X73C** 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 **X73C** 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 **X73C** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |                       |         |         |     |
|---------------------|--|---------|-----------------------|---------|---------|-----|
|                     |  |         |                       |         |         |     |
| 2.45 LT             | 2.55 LT  | 1.80 LT | 1.95 LT               | 4.05 LT | 2.55 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

$F_{eq} = FR \cdot \frac{178.5}{X+143.5}$

| $n_2$ | FA   | FR   | $n_2$ | FA   | FR   | $n_2$ | FA   | FR   |
|-------|------|------|-------|------|------|-------|------|------|
| 300   | 1360 | 6800 | 140   | 1480 | 7400 | 70    | 1720 | 8600 |
| 250   | 1400 | 7000 | 120   | 1520 | 7600 | 40    | 1840 | 9200 |
| 200   | 1440 | 7200 | 85    | 1560 | 7800 | 15    | 1920 | 9600 |

**On request reinforced bearings to increase loads.**  
A richiesta cuscinetti rinforzati per aumentare i carichi.

**Input shaft**  
Albero di entrata

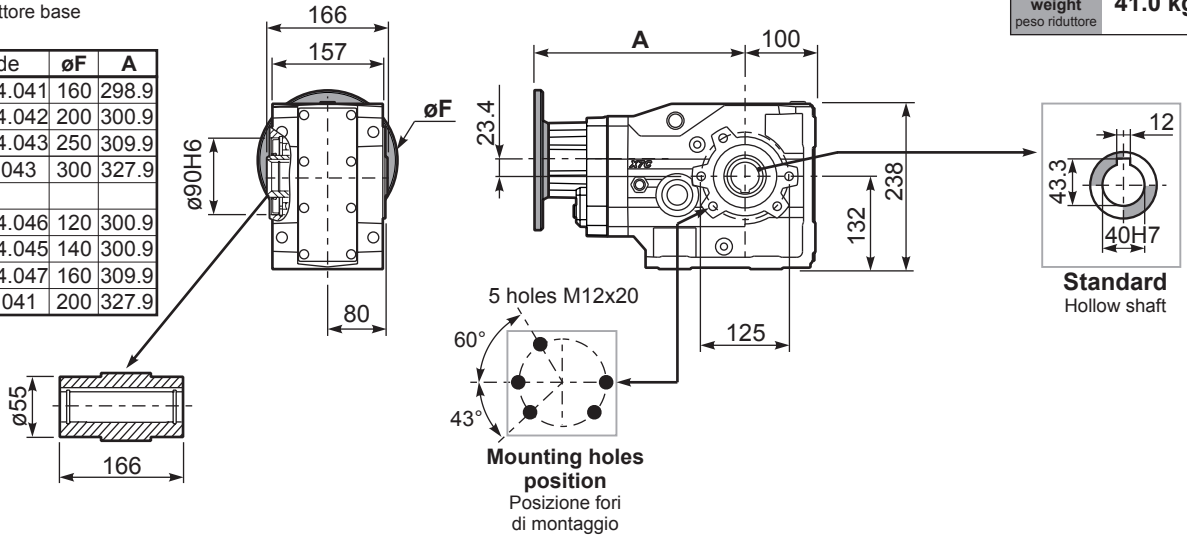
| $n_1$ | FA  | FR   |
|-------|-----|------|
| 1400  | 400 | 2000 |
| 900   | 440 | 2200 |
| 500   | 440 | 2200 |

tab. 2

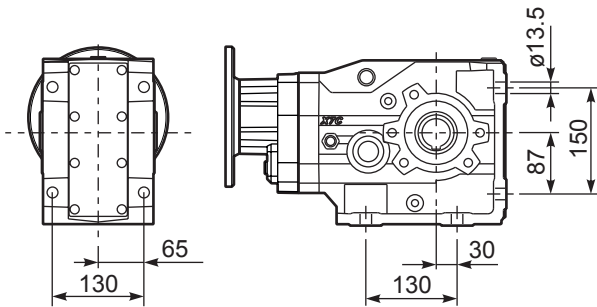
**PX73CC...** Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **41.0 kg**

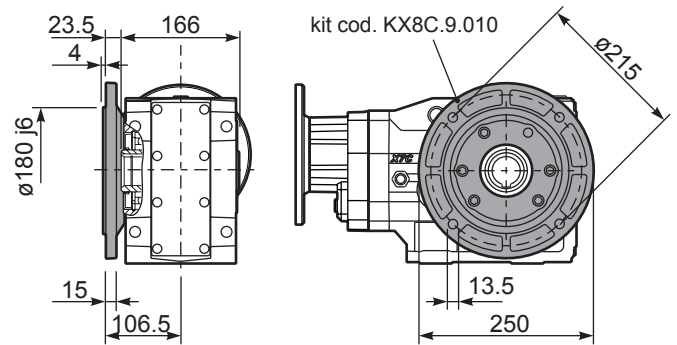
| M. flanges        | Kit code    | øF  | A     |
|-------------------|-------------|-----|-------|
| <b>71B5</b>       | KC023.4.041 | 160 | 298.9 |
| <b>80/90B5</b>    | KC023.4.042 | 200 | 300.9 |
| <b>100/112B5</b>  | KC023.4.043 | 250 | 309.9 |
| <b>132B5</b>      | KC50.4.043  | 300 | 327.9 |
| <b>80B14</b>      | KC085.4.046 | 120 | 300.9 |
| <b>90B14</b>      | KC085.4.045 | 140 | 300.9 |
| <b>100/112B14</b> | KC085.4.047 | 160 | 309.9 |
| <b>132B14</b>     | KC50.4.041  | 200 | 327.9 |



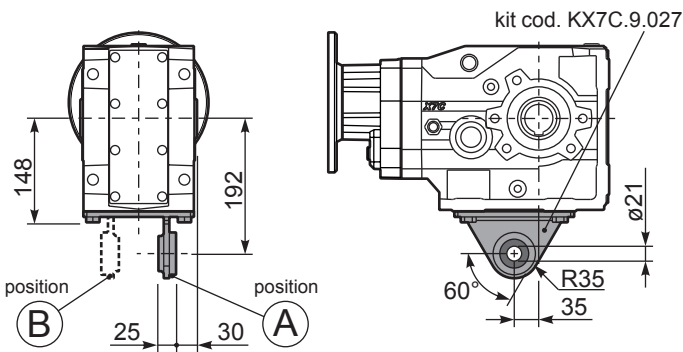
**PX73C...FB..** Feet  
Piedini



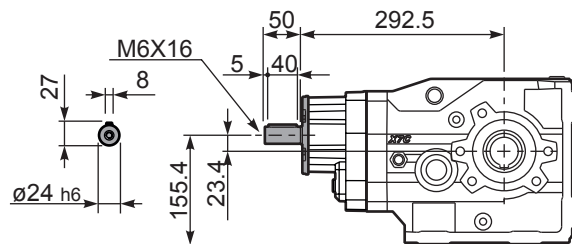
**PX73C...-F4..** Output flange  
Flangia uscita



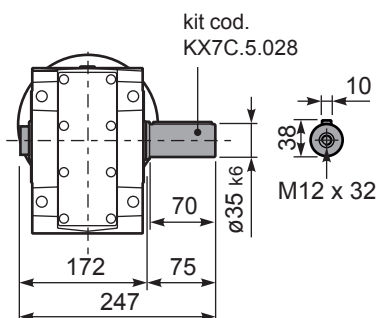
**PX73C...BR..** Reaction Arm  
Braccio di reazione



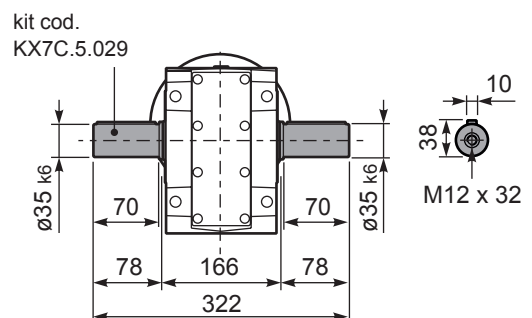
**RX73C...** Input shaft  
Albero in entrata



**PX73CA...** Single shaft  
Albero lento semplice



**PX73CB...** Double shaft  
Albero lento bisp.





## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code |
|---|---------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|----|-----------------------------|----|----|------------------|-------------|
|   |               |                                 |                                   |                        |                                   |                                    | -B                         | -C | -D | -E | -Q                          | -R | -T |                  |             |
|   |               |                                 |                                   |                        |                                   |                                    | 63                         | 71 | 80 | 90 | 71                          | 80 | 90 |                  |             |
| 18.7  | <b>74.79</b>  | 1.5                             | 704                               | 1.0                    | 1.4                               | 675                                | B                          |    |    |    | C                           | C  |    | 19132418         | 01          |
| 16.3  | <b>85.99</b>  | 1.1                             | 591                               | 1.1                    | 1.3                               | 675                                | B                          |    |    |    | C                           | C  |    | 19132416         | 02          |
| 14.0  | <b>99.66</b>  | 1.1                             | 685                               | 1.0                    | 1.1                               | 675                                | B                          |    |    |    | C                           | C  |    | 17132416         | 03          |
| 12.0  | <b>116.35</b> | 0.75                            | 548                               | 1.2                    | 0.92                              | 675                                | B                          |    |    |    | C                           | C  |    | 17132414         | 04          |
| 11.5  | <b>121.45</b> | 0.75                            | 572                               | 1.2                    | 0.89                              | 675                                | B                          |    |    |    | C                           | C  |    | 13132418         | 05          |
| 10.0  | <b>139.64</b> | 0.75                            | 658                               | 1.0                    | 0.77                              | 675                                | B                          |    |    |    | C                           | C  |    | 13132416         | 06          |
| 9.2   | <b>152.21</b> | 0.75                            | 717                               | 0.9                    | 0.71                              | 675                                | B                          |    |    |    | C                           | C  |    | 19082416         | 07          |
| 8.6   | <b>163.02</b> | 0.55                            | 567                               | 1.2                    | 0.66                              | 675                                | B                          |    |    |    | C                           | C  |    | 13132414         | 08          |
| 7.9   | <b>177.69</b> | 0.55                            | 618                               | 1.1                    | 0.61                              | 675                                | B                          |    |    |    | C                           | C  |    | 19082414         | 09          |
| 6.8   | <b>205.95</b> | 0.55                            | 716                               | 0.9                    | 0.52                              | 675                                | B                          |    |    |    | C                           | C  |    | 17082414         | 10          |
| 6.3   | <b>222.52</b> | 0.55                            | 774                               | 0.9                    | 0.48                              | 675                                | B                          |    |    |    | C                           | C  |    | 10132414         | 11          |
| 5.6   | <b>248.76</b> | 0.37                            | 578                               | 1.2                    | 0.43                              | 675                                | B                          |    |    |    | C                           | C  |    | 9132416          | 12          |
| 4.8   | <b>290.41</b> | 0.37                            | 675                               | 1.0                    | 0.37                              | 675                                | B                          |    |    |    | C                           | C  |    | 9132414          | 13          |
| 4.1   | <b>337.39</b> | 0.37                            | 784                               | 0.9                    | 0.32                              | 675                                | B                          |    |    |    | C                           | C  |    | 10082416         | 14          |
| 3.6   | <b>393.88</b> | 0.25                            | 618                               | 1.1                    | 0.27                              | 675                                | B                          |    |    |    | C                           | C  |    | 10082414         | 15          |
| 3.2   | <b>440.33</b> | 0.25                            | 690                               | 1.0                    | 0.24                              | 675                                | B                          |    |    |    | C                           | C  |    | 9082416          | 16          |
| 2.7   | <b>514.06</b> | 0.18                            | 616                               | 1.1                    | 0.21                              | 675                                | B                          |    |    |    | C                           | C  |    | 9082414          | 17          |
| 2.4   | <b>581.44</b> | 0.18                            | 697                               | 1.0                    | 0.18                              | 675                                | B                          |    |    |    | C                           | C  |    | 7082416          | 18          |
| 2.1   | <b>678.79</b> | 0.12                            | 526                               | 1.3                    | 0.16                              | 675                                | B                          |    |    |    | C                           | C  |    | 7082414          | 19          |

The dynamic efficiency is **0.92** for all ratios

**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 **X74C** 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 **X74C** 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 **X74C** 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 **X74C** 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 **X74C** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |                       |         |         |     |
|---------------------|--|---------|-----------------------|---------|---------|-----|
|                     |  |         |                       |         |         |     |
| 3.55 LT             | 2.65 LT  | 1.90 LT | 2.05 LT               | 4.25 LT | 2.65 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

$F_{eq} = F_R \cdot \frac{178.5}{X+143.5}$

| $n_2$ | FA   | FR   | $n_2$ | FA   | FR   | $n_2$ | FA   | FR   |
|-------|------|------|-------|------|------|-------|------|------|
| 300   | 1360 | 6800 | 140   | 1480 | 7400 | 70    | 1720 | 8600 |
| 250   | 1400 | 7000 | 120   | 1520 | 7600 | 40    | 1840 | 9200 |
| 200   | 1440 | 7200 | 85    | 1560 | 7800 | 15    | 1920 | 9600 |

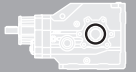
**On request reinforced bearings to increase loads.**  
A richiesta cuscinetti rinforzati per aumentare i carichi.

**Input shaft**  
Albero in entrata

| $n_1$ | FA  | FR   |
|-------|-----|------|
| 1400  | 240 | 1200 |
| 900   | 280 | 1400 |
| 500   | 310 | 1700 |

tab. 2





## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>$f.s.$ | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |            |     | Available B14 motor flanges |    |            |     | Output Shaft<br><br>$\varnothing$ | Ratios code<br> |    |
|---|---------------|---------------------------------|-----------------------------------|--------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|------------|-----|-----------------------------|----|------------|-----|-----------------------------------|-----------------|----|
|   |               |                                 |                                   |                          |                                   |                                    | -C                         | -D | -E | -F         | -G  | -R                          | -T | -U         | -V  |                                   |                 |    |
|   |               |                                 |                                   |                          |                                   |                                    | 71                         | 80 | 90 | 100<br>112 | 132 | 80                          | 90 | 100<br>112 | 132 |                                   |                 |    |
| 145   | <b>9.69</b>   | 9                               | 560                               | 1.3                      | <b>12.2</b>                       | <b>755</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 302418          | 01 |
| 126   | <b>11.09</b>  | 9                               | 641                               | 1.1                      | <b>9.6</b>                        | <b>680</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 302416          | 02 |
| 108   | <b>12.90</b>  | 9                               | 746                               | 1.1                      | <b>9.6</b>                        | <b>790</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 302414          | 03 |
| 77  | <b>18.26</b>  | 7.5                             | 849                               | 1.1                      | <b>8.0</b>                        | <b>935</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 202418          | 04 |
| 67  | <b>20.91</b>  | 7.5                             | 972                               | 1.0                      | <b>7.5</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 202416          | 05 |
| 58  | <b>24.32</b>  | 5.5                             | 835                               | 1.2                      | <b>6.4</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 202414          | 06 |
| 49.5  | <b>28.27</b>  | 5.5                             | 971                               | 1.0                      | <b>5.5</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 162416          | 07 |
| 42.6  | <b>32.88</b>  | 4                               | 826                               | 1.2                      | <b>4.7</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 162414          | 08 |
| 38.1  | <b>36.76</b>  | 4                               | 924                               | 1.1                      | <b>4.2</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 132416          | 09 |
| 32.7  | <b>42.76</b>  | 3                               | 809                               | 1.2                      | <b>3.6</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 132414          | 10 |
| 31.1  | <b>45.00</b>  | 3                               | 851                               | 1.2                      | <b>3.5</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 112416          | 11 |
| 26.8  | <b>52.33</b>  | 3                               | 990                               | 1.0                      | <b>3.0</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 112414          | 12 |
| 24.6  | <b>56.82</b>  | 2.2                             | 791                               | 1.1                      | <b>2.3</b>                        | <b>850</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 82418           | 13 |
| 21.5  | <b>65.07</b>  | 2.2                             | 906                               | 1.1                      | <b>2.3</b>                        | <b>975</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 82416           | 14 |
| 18.5  | <b>75.68</b>  | 2.2                             | 1054                              | 0.9                      | <b>2.1</b>                        | <b>1000</b>                        | B                          |    |    |            |     |                             |    |            |     |                                   | 82414           | 15 |
| 15.6  | <b>89.61</b>  | 1.1                             | 628                               | 1.1                      | <b>1.2</b>                        | <b>710</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 62416           | 16 |
| 13.4  | <b>104.22</b> | 1.1                             | 731                               | 1.1                      | <b>1.2</b>                        | <b>820</b>                         | B                          |    |    |            |     |                             |    |            |     |                                   | 62414           | 17 |

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 **X83C** 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 **X83C** 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 **X83C** 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 **X83C** 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 **X83C** 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.

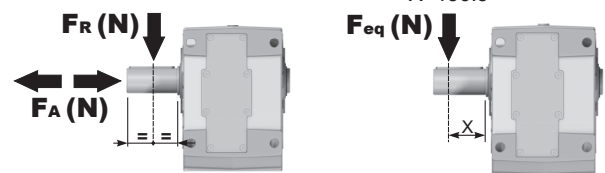
|           |           |           |           |           |           |           |
|-----------|-----------|-----------|-----------|-----------|-----------|-----------|
|           |           |           |           |           |           |           |
| <b>B3</b> | <b>B6</b> | <b>B7</b> | <b>B8</b> | <b>V5</b> | <b>V6</b> | <b>V8</b> |
| 2.80 LT   | 3.10 LT   | 2.00 LT   | 2.50 LT   | 4.95 LT   | 2.80 LT   | Ask       |

**AGIP Blasias 460**

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



$$F_{eq} = F_R \cdot \frac{196.5}{X + 156.5}$$

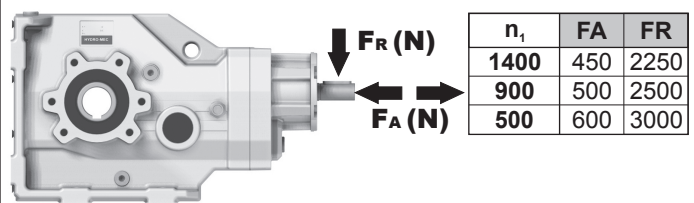
| $n_2$ | FA   | FR   | $n_2$ | FA   | FR   | $n_2$ | FA   | FR    |
|-------|------|------|-------|------|------|-------|------|-------|
| 300   | 1700 | 8500 | 140   | 1860 | 9300 | 70    | 2160 | 10800 |
| 250   | 1760 | 8800 | 120   | 1900 | 9500 | 40    | 2300 | 11500 |
| 200   | 1800 | 9000 | 85    | 1960 | 9800 | 15    | 2400 | 12000 |

**On request reinforced bearings to increase loads.**

A richiesta cuscinetti rinforzati per aumentare i carichi.

**Input shaft**

Albero in entrata



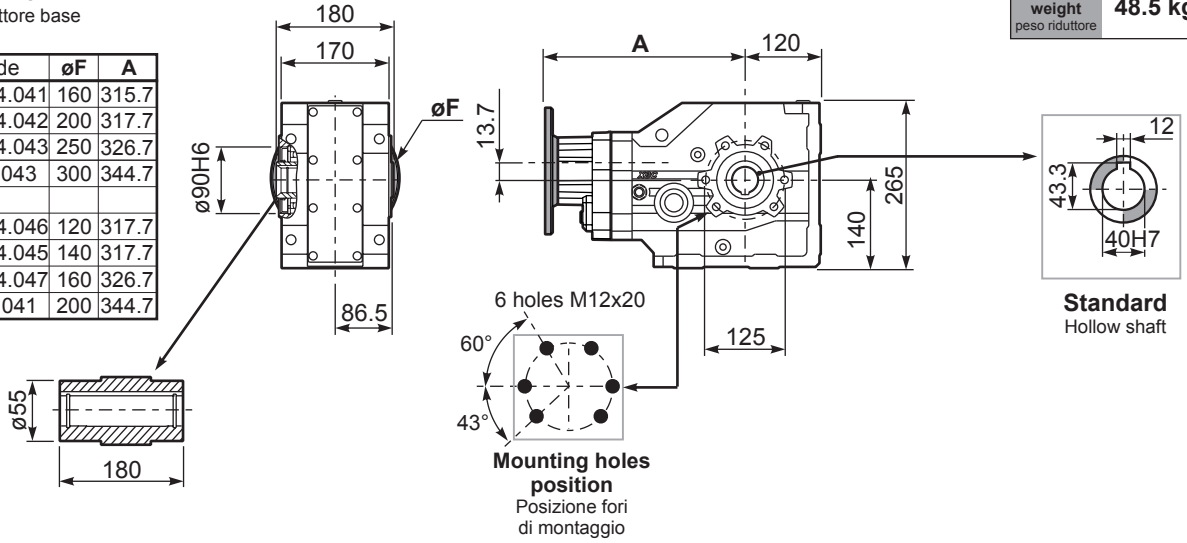
| $n_1$ | FA  | FR   |
|-------|-----|------|
| 1400  | 450 | 2250 |
| 900   | 500 | 2500 |
| 500   | 600 | 3000 |

tab. 2

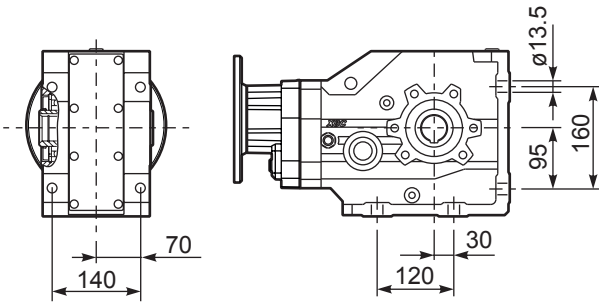
**PX83CC...** Basic gearbox  
Riduttore base

Gearbox weight  
peso riduttore **48.5 kg**

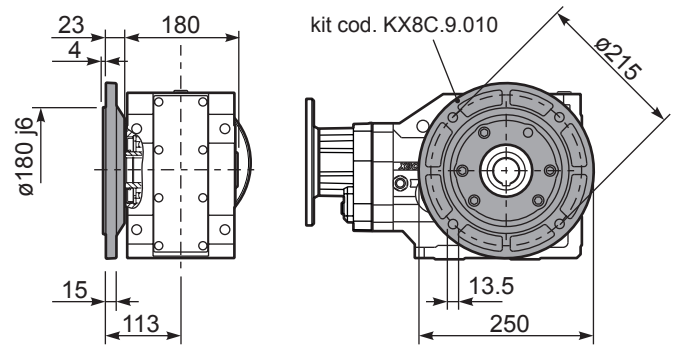
| M. flanges | Kit code    | øF  | A     |
|------------|-------------|-----|-------|
| 71B5       | KC023.4.041 | 160 | 315.7 |
| 80/90B5    | KC023.4.042 | 200 | 317.7 |
| 100/112B5  | KC023.4.043 | 250 | 326.7 |
| 132B5      | KC50.4.043  | 300 | 344.7 |
| 80B14      | KC085.4.046 | 120 | 317.7 |
| 90B14      | KC085.4.045 | 140 | 317.7 |
| 100/112B14 | KC085.4.047 | 160 | 326.7 |
| 132B14     | KC50.4.041  | 200 | 344.7 |



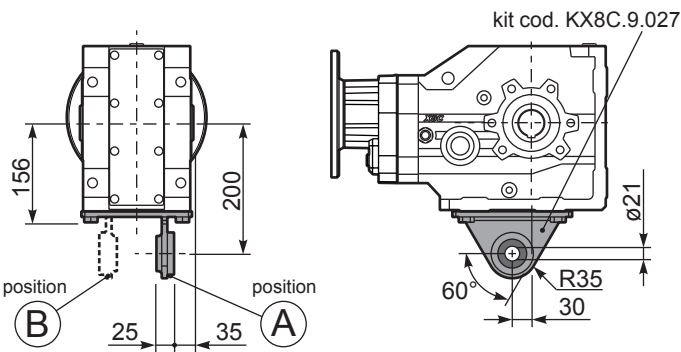
**PX83C...FB..** Feet  
Piedini



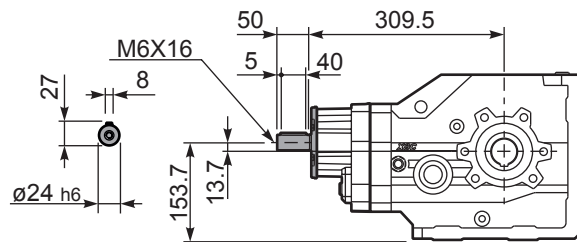
**PX83C...-F4..** Output flange  
Flangia uscita



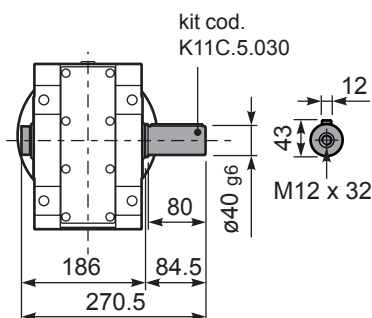
**PX83C...BR..** Reaction Arm  
Braccio di reazione



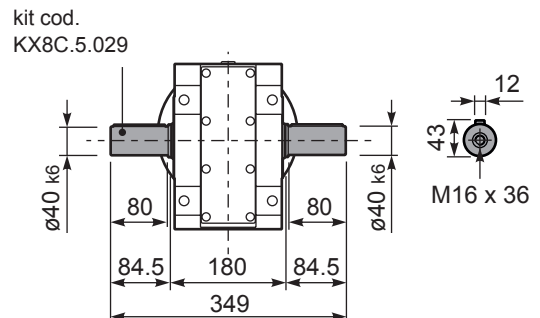
**RX83C...** Input shaft  
Albero in entrata



**PX83CA...** Single shaft  
Albero lento semplice



**PX83CB...** Double shaft  
Albero lento bisp.





### QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code |
|---|---------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|----|-----------------------------|----|----|------------------|-------------|
|   |               |                                 |                                   |                        |                                   |                                    | -B                         | -C | -D | -E | -Q                          | -R | -T |                  |             |
|   |               |                                 |                                   |                        |                                   |                                    | 63                         | 71 | 80 | 90 | 71                          | 80 | 90 |                  |             |
| 15.3  | <b>91.23</b>  | 1.5                             | 858                               | 1.2                    | 1.7                               | 1000                               | B                          |    |    |    | C                           | C  |    | 19132418         | 01          |
| 13.4  | <b>104.48</b> | 1.5                             | 983                               | 1.0                    | 1.5                               | 1000                               | B                          |    |    |    | C                           | C  |    | 19132416         | 02          |
| 11.6  | <b>121.10</b> | 1.5                             | 1139                              | 0.9                    | 1.3                               | 1000                               | B                          |    |    |    | C                           | C  |    | 17132416         | 03          |
| 9.9   | <b>140.84</b> | 1.1                             | 968                               | 1.0                    | 1.1                               | 1000                               | B                          |    |    |    | C                           | C  |    | 17132414         | 04          |
| 8.5   | <b>165.32</b> | 1.1                             | 1136                              | 0.9                    | 0.96                              | 1000                               | B                          |    |    |    | C                           | C  |    | 15132414         | 05          |
| 7.6   | <b>184.94</b> | 0.75                            | 872                               | 1.1                    | 0.86                              | 1000                               | B                          |    |    |    | C                           | C  |    | 19082416         | 06          |
| 7.1   | <b>197.34</b> | 0.75                            | 930                               | 1.1                    | 0.81                              | 1000                               | B                          |    |    |    | C                           | C  |    | 13132414         | 07          |
| 6.5   | <b>215.10</b> | 0.75                            | 1014                              | 1.0                    | 0.74                              | 1000                               | B                          |    |    |    | C                           | C  |    | 19082414         | 08          |
| 6.0   | <b>231.60</b> | 0.55                            | 805                               | 1.2                    | 0.69                              | 1000                               | B                          |    |    |    | C                           | C  |    | 10132416         | 09          |
| 5.6   | <b>249.31</b> | 0.55                            | 867                               | 1.2                    | 0.64                              | 1000                               | B                          |    |    |    | C                           | C  |    | 17082414         | 10          |
| 5.2   | <b>269.37</b> | 0.55                            | 937                               | 1.1                    | 0.59                              | 1000                               | B                          |    |    |    | C                           | C  |    | 10132414         | 11          |
| 4.8   | <b>292.64</b> | 0.55                            | 1018                              | 1.0                    | 0.54                              | 1000                               | B                          |    |    |    | C                           | C  |    | 15082414         | 12          |
| 4.6   | <b>302.26</b> | 0.55                            | 1051                              | 1.0                    | 0.53                              | 1000                               | B                          |    |    |    | C                           | C  |    | 9132416          | 13          |
| 4.0   | <b>349.30</b> | 0.37                            | 812                               | 1.2                    | 0.46                              | 1000                               | B                          |    |    |    | C                           | C  |    | 13082414         | 14          |
| 3.5   | <b>399.12</b> | 0.37                            | 928                               | 1.1                    | 0.40                              | 1000                               | B                          |    |    |    | C                           | C  |    | 7132416          | 15          |
| 2.9   | <b>476.80</b> | 0.37                            | 1108                              | 0.9                    | 0.33                              | 1000                               | B                          |    |    |    | C                           | C  |    | 10082414         | 16          |
| 2.2   | <b>622.28</b> | 0.25                            | 976                               | 1.0                    | 0.26                              | 1000                               | B                          |    |    |    | C                           | C  |    | 9082414          | 17          |
| 1.7   | <b>821.70</b> | 0.18                            | 985                               | 1.0                    | 0.19                              | 1000                               | B                          |    |    |    | C                           | C  |    | 7082414          | 18          |

standard  $\phi 40$

The dynamic efficiency is **0.92** 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 **X84C** 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 **X84C** 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 **X84C** 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 **X84C** 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 **X84C** 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.

|           |           |           |           |           |           |           |
|-----------|-----------|-----------|-----------|-----------|-----------|-----------|
|           |           |           |           |           |           |           |
| <b>B3</b> | <b>B6</b> | <b>B7</b> | <b>B8</b> | <b>V5</b> | <b>V6</b> | <b>V8</b> |
| 4.25 LT   | 3.20 LT   | 2.10 LT   | 2.60 LT   | 5.20 LT   | 2.90 LT   | Ask       |

AGIP Blasias 460

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

$F_{eq} = FR \cdot \frac{196.5}{X + 156.5}$

**Input shaft**  
Albero in entrata

| $n_2$ | FA   | FR   | $n_2$ | FA   | FR   | $n_2$ | FA   | FR    |
|-------|------|------|-------|------|------|-------|------|-------|
| 300   | 1700 | 8500 | 140   | 1860 | 9300 | 70    | 2160 | 10800 |
| 250   | 1760 | 8800 | 120   | 1900 | 9500 | 40    | 2300 | 11500 |
| 200   | 1800 | 9000 | 85    | 1960 | 9800 | 15    | 2400 | 12000 |

**On request reinforced bearings to increase loads.**  
A richiesta cuscinetti rinforzati per aumentare i carichi.

| $n_1$ | FA  | FR   |
|-------|-----|------|
| 1400  | 400 | 2000 |
| 900   | 440 | 2200 |
| 500   | 440 | 2200 |

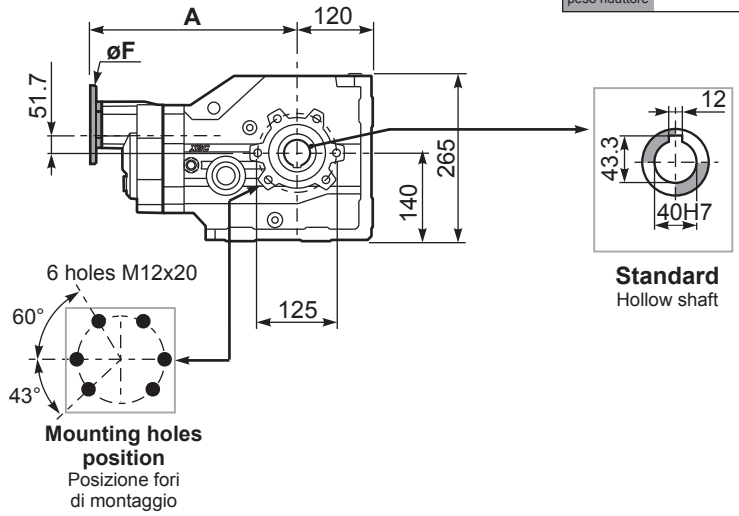
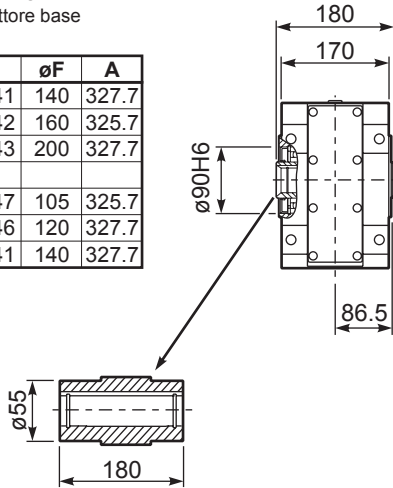
tab. 2



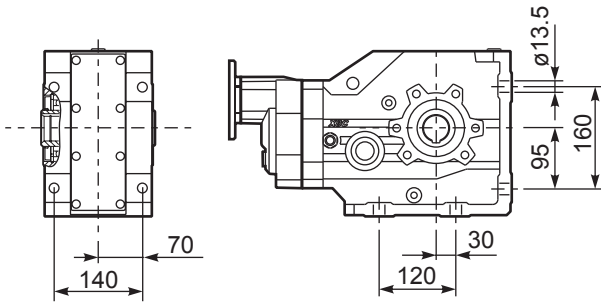
**PX84CC...** Basic gearbox  
Riduttore base

Gearbox weight  
peso riduttore **46.5 kg**

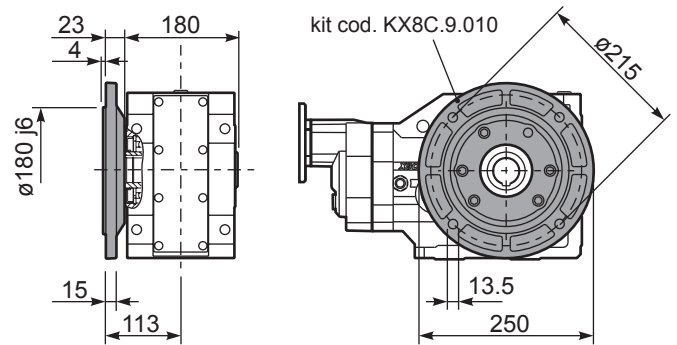
| M. flanges     | Kit code   | øF  | A     |
|----------------|------------|-----|-------|
| <b>63B5</b>    | K063.4.041 | 140 | 327.7 |
| <b>71B5</b>    | K063.4.042 | 160 | 325.7 |
| <b>80/90B5</b> | K063.4.043 | 200 | 327.7 |
| <b>71B14</b>   | K063.4.047 | 105 | 325.7 |
| <b>80B14</b>   | K063.4.046 | 120 | 327.7 |
| <b>90B14</b>   | K063.4.041 | 140 | 327.7 |



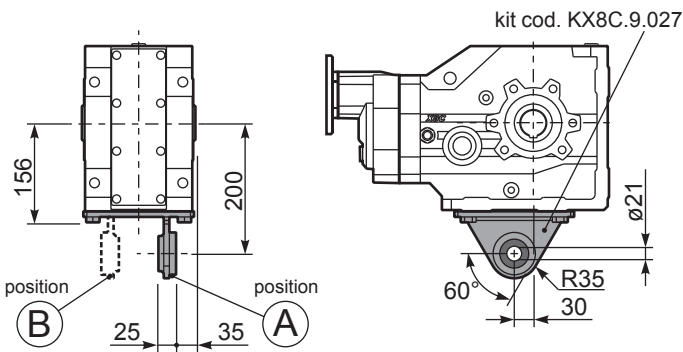
**PX84C...FB..** Feet  
Piedini



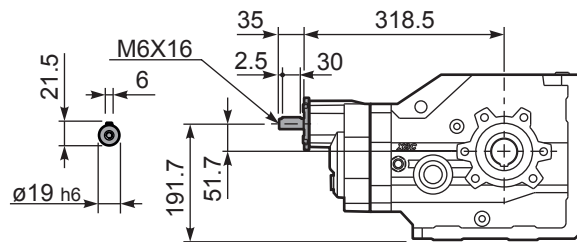
**PX84C...-F4..** Output flange  
Flangia uscita



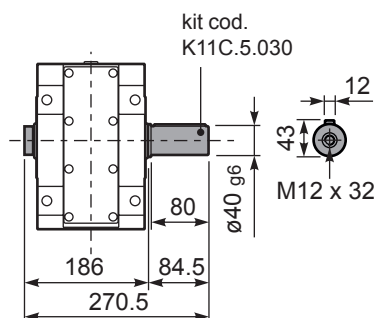
**PX84C...BR..** Reaction Arm  
Braccio di reazione



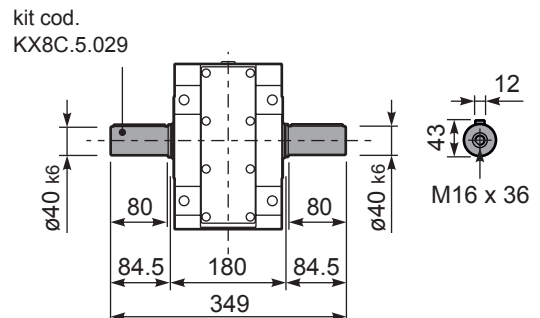
**RX84C...** Input shaft  
Albero in entrata

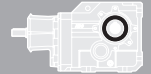


**PX84CA...** Single shaft  
Albero lento semplice



**PX84CB...** Double shaft  
Albero lento bisp.





## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$ | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | B5<br>motor flanges |     |     |     | B14<br>motor flanges |   |   |        | Output Shaft<br>                         | Ratios code<br> |
|---|--------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|---------------------|-----|-----|-----|----------------------|---|---|--------|--|-----------------|
|   |              |                                 |                                   |                        |                                   |                                    | -F                  | -G  | -H  | -I  | -                    | - | - | -      |  |                 |
|   |              |                                 |                                   |                        |                                   |                                    | 100<br>112          | 132 | 160 | 180 | -                    | - | - | -      |  |                 |
| 236   | <b>5.94</b>  | 22                              | 806                               | 1.0                    | <b>21.0</b>                       | <b>800</b>                         | B                   |     |     |     |                      |   |   | 302915 | standard<br>ø50<br><br>ø45<br>On request | 01              |
| 196   | <b>7.13</b>  | 18.5                            | 812                               | 1.0                    | <b>17.9</b>                       | <b>820</b>                         | B                   |     |     |     |                      |   |   | 302913 |  | 02              |
| 163   | <b>8.58</b>  | 18.5                            | 977                               | 1.0                    | <b>17.3</b>                       | <b>950</b>                         | B                   |     |     |     |                      |   |   | 302911 |  | 03              |
| 125   | <b>11.20</b> | 15                              | 1033                              | 1.0                    | <b>13.9</b>                       | <b>1000</b>                        | B                   |     |     |     |                      |   |   | 202915 |  | 04              |
| 104   | <b>13.43</b> | 15                              | 1239                              | 1.1                    | <b>15.7</b>                       | <b>1350</b>                        | B                   |     |     |     |                      |   |   | 202913 |  | 05              |
| 92  | <b>15.15</b> | 15                              | 1397                              | 1.0                    | <b>14.4</b>                       | <b>1400</b>                        | B                   |     |     |     |                      |   |   | 162915 |  | 06              |
| 87  | <b>16.17</b> | 15                              | 1492                              | 1.0                    | <b>14.0</b>                       | <b>1450</b>                        | B                   |     |     |     |                      |   |   | 202911 |  | 07              |
| 77  | <b>18.16</b> | 15                              | 1675                              | 0.9                    | <b>13.3</b>                       | <b>1550</b>                        | B                   |     |     |     |                      |   |   | 162913 |  | 08              |
| 71  | <b>19.70</b> | 11                              | 1335                              | 1.2                    | <b>12.3</b>                       | <b>1550</b>                        | B                   |     |     |     |                      |   |   | 132915 |  | 09              |
| 64  | <b>21.87</b> | 11                              | 1482                              | 1.1                    | <b>11.4</b>                       | <b>1600</b>                        | B                   |     |     |     |                      |   |   | 162911 |  | 10              |
| 59  | <b>23.62</b> | 11                              | 1600                              | 1.0                    | <b>10.6</b>                       | <b>1600</b>                        | B                   |     |     |     |                      |   |   | 132913 |  | 11              |
| 48.4  | <b>28.91</b> | 9                               | 1671                              | 1.0                    | <b>8.6</b>                        | <b>1600</b>                        | B                   |     |     |     |                      |   |   | 112913 |  | 12              |
| 40.2  | <b>34.81</b> | 7.5                             | 1618                              | 1.0                    | <b>7.2</b>                        | <b>1600</b>                        | B                   |     |     |     |                      |   |   | 112911 |  | 13              |
| 33.5  | <b>41.81</b> | 5.5                             | 1436                              | 1.1                    | <b>6.0</b>                        | <b>1600</b>                        | B                   |     |     |     |                      |   |   | 82913  |  | 14              |
| 27.8  | <b>50.34</b> | 5.5                             | 1729                              | 0.9                    | <b>5.0</b>                        | <b>1600</b>                        | B                   |     |     |     |                      |   |   | 82911  |  | 15              |

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 **X93C** 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 **X93C** 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 **X93C** 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 **X93C** 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 **X93C** 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.

| Standard supplied | For these mounting position specify in the order or add oil<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |         |         |         |     |
|-------------------|--|---------|---------|---------|---------|-----|
|                   |  |         |         |         |         |     |
| B3                | B6   | B7      | B8      | V5      | V6      | V8  |
| 4.20 LT           | 3.60 LT  | 4.40 LT | 5.10 LT | 7.10 LT | 5.00 LT | Ask |
| AGIP Blasias 460  |  |         |         |         |         |     |

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

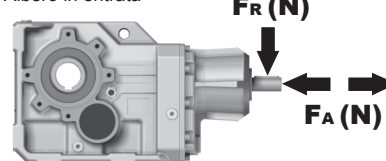
## RADIAL AND AXIAL LOADS

**Output shaft**  
Albero di uscita



| $n_2$ | FA   | FR    | $n_2$ | FA   | FR    | $n_2$ | FA   | FR    |
|-------|------|-------|-------|------|-------|-------|------|-------|
| 300   | 1800 | 9000  | 140   | 2700 | 13500 | 70    | 3020 | 15100 |
| 250   | 2400 | 12000 | 120   | 2800 | 14000 | 40    | 3200 | 16000 |
| 200   | 2600 | 13000 | 85    | 2900 | 14500 | 15    | 3500 | 17500 |

**Input shaft**  
Albero in entrata



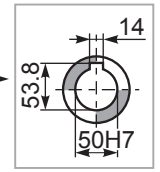
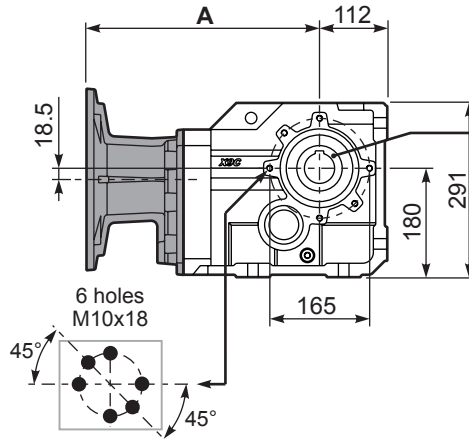
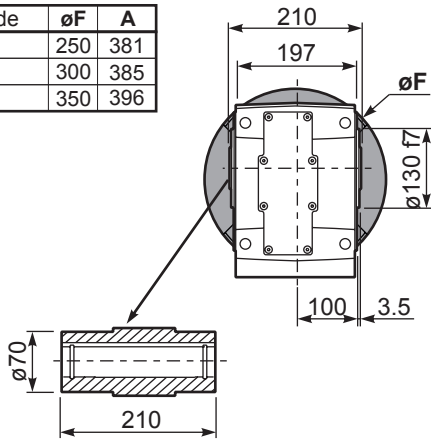
| $n_1$ | FA  | FR   |
|-------|-----|------|
| 1400  | 700 | 3500 |
| 900   | 840 | 4200 |
| 500   | 900 | 4500 |

**tab. 2**

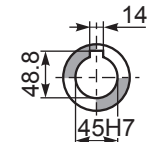
**PX93CC...** Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **75.0 kg**

| M. flanges | Kit code | øF  | A   |
|------------|----------|-----|-----|
| 100/112B5  | -        | 250 | 381 |
| 132B5      | -        | 300 | 385 |
| 160/180B5  | -        | 350 | 396 |



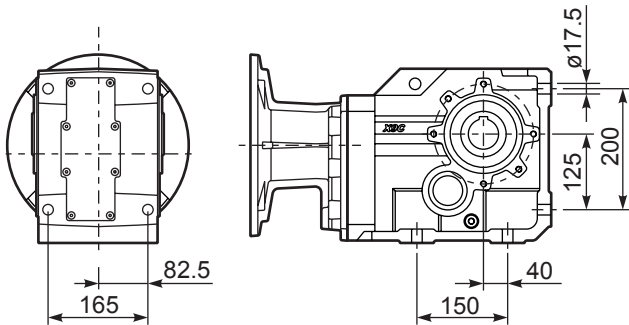
**Standard**  
Hollow shaft



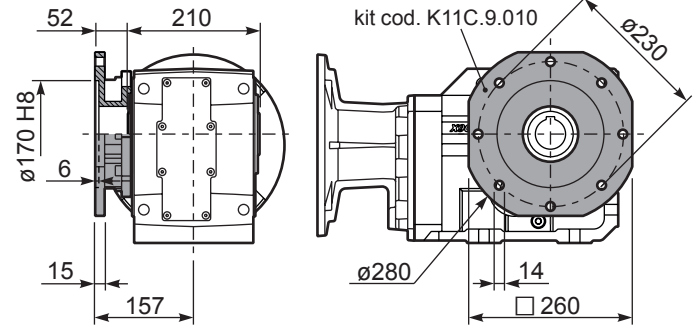
**On request**  
A richiesta

**Mounting holes position**  
Posizione fori di montaggio

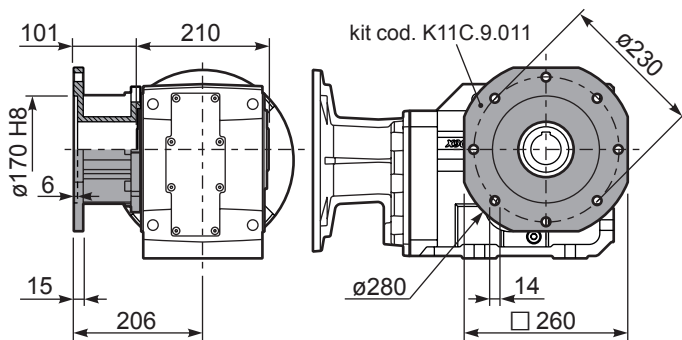
**PX93C...FB..** Feet  
Piedini



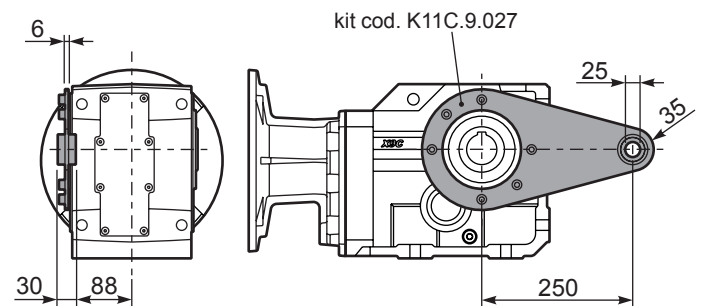
**PX93C...-FC..** Output flange  
Flangia uscita



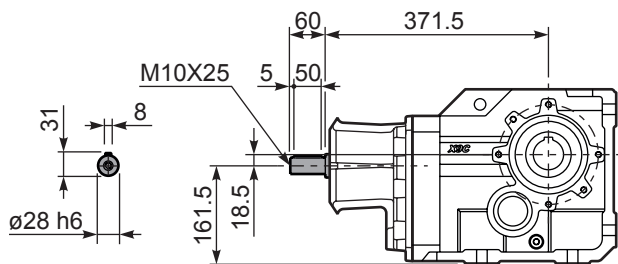
**PX93C...-FL..** Output flange  
Flangia uscita



**PX93C...BR..** Reaction Arm  
Braccio di reazione

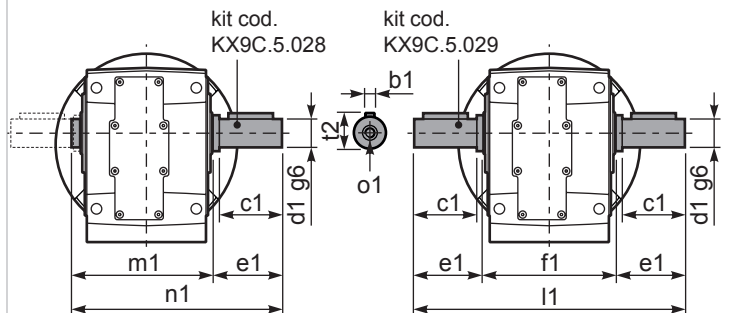


**RX93C...** Input shaft  
Albero in entrata



**PX93CA...** Single shaft  
Albero lento semplice

**PX93CB...** Double shaft  
Albero lento bisp.



|          | b1 | c1  | d1 | e1  | f1  | l1  | m1  | n1  | t2   | o1  |
|----------|----|-----|----|-----|-----|-----|-----|-----|------|-----|
| Standard | 14 | 100 | 50 | 105 | 210 | 420 | 218 | 323 | 53.5 | M16 |
| -        | -  | -   | -  | -   | -   | -   | -   | -   | -    | -   |



## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |            |     | Available B14 motor flanges |    |            |     | Output Shaft<br> | Ratios code |
|---|---------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|------------|-----|-----------------------------|----|------------|-----|------------------|-------------|
|   |               |                                 |                                   |                        |                                   |                                    | -C                         | -D | -E | -F         | -G  | -R                          | -T | -U         | -V  |                  |             |
|   |               |                                 |                                   |                        |                                   |                                    | 71                         | 80 | 90 | 100<br>112 | 132 | 80                          | 90 | 100<br>112 | 132 |                  |             |
| 45.6  | <b>30.70</b>  | 7.5                             | 1399                              | 1.1                    | 8.3                               | 1600                               | B                          |    |    |            |     |                             |    |            |     | 30132913         | 01          |
| 37.9  | <b>36.97</b>  | 7.5                             | 1685                              | 0.9                    | 6.9                               | 1600                               | B                          |    |    |            |     |                             |    |            |     | 30132911         | 02          |
| 29.0  | <b>48.26</b>  | 5.5                             | 1625                              | 1.0                    | 5.3                               | 1600                               | B                          |    |    |            |     |                             |    |            |     | 20132915         | 03          |
| 24.2  | <b>57.86</b>  | 4                               | 1425                              | 1.1                    | 4.4                               | 1600                               | B                          |    |    |            |     |                             |    |            |     | 20132913         | 04          |
| 21.5  | <b>65.24</b>  | 4                               | 1607                              | 1.0                    | 3.9                               | 1600                               | B                          |    |    |            |     |                             |    |            |     | 16132915         | 05          |
| 20.1  | <b>69.68</b>  | 4                               | 1716                              | 1.0                    | 3.8                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 20132911         | 06          |
| 17.9  | <b>78.23</b>  | 3                               | 1450                              | 1.1                    | 3.4                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 16132913         | 07          |
| 16.5  | <b>84.85</b>  | 3                               | 1573                              | 1.0                    | 3.0                               | 1600                               | B                          |    |    |            |     |                             |    |            |     | 13132915         | 08          |
| 14.9  | <b>94.20</b>  | 3                               | 1747                              | 0.9                    | 2.8                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 16132911         | 09          |
| 13.8  | <b>101.74</b> | 3                               | 1886                              | 0.9                    | 2.6                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 13132913         | 10          |
| 11.4  | <b>122.51</b> | 2.2                             | 1672                              | 1.0                    | 2.1                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 13132911         | 11          |
| 9.3   | <b>149.95</b> | 1.5                             | 1411                              | 1.2                    | 1.8                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 11132911         | 12          |
| 7.8   | <b>180.09</b> | 1.5                             | 1694                              | 1.0                    | 1.5                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 8132913          | 13          |
| 6.8   | <b>206.81</b> | 1.1                             | 1421                              | 1.1                    | 1.2                               | 1600                               | B                          |    |    |            |     |                             |    |            |     | 6132915          | 14          |
| 6.5   | <b>216.85</b> | 1.1                             | 1490                              | 1.1                    | 1.2                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 8132911          | 15          |
| 5.6   | <b>247.99</b> | 1.1                             | 1704                              | 1.0                    | 1.1                               | 1650                               | B                          |    |    |            |     |                             |    |            |     | 6132913          | 16          |
| 4.7   | <b>298.61</b> | 0.75                            | 1407                              | 1.2                    | 0.88                              | 1650                               | B                          |    |    |            |     |                             |    |            |     | 6132911          | 17          |

The dynamic efficiency is **0.92** 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 **X94C** 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 **X94C** 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 **X94C** 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 **X94C** 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 **X94C** 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.

| Standard supplied | For these mounting position specify in the order or add oil<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |         |         |         |     |
|-------------------|--|---------|---------|---------|---------|-----|
|                   |  |         |         |         |         |     |
| B3                | B6   | B7      | B8      | V5      | V6      | V8  |
| 4.50 LT           | 3.80 LT  | 4.50 LT | 5.30 LT | 7.60 LT | 5.30 LT | Ask |
| AGIP Blasias 460  |  |         |         |         |         |     |

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

$$F_{eq} = FR \cdot \frac{218}{X+168}$$

| $n_2$ | FA   | FR    | $n_2$ | FA   | FR    | $n_2$ | FA   | FR    |
|-------|------|-------|-------|------|-------|-------|------|-------|
| 300   | 1800 | 9000  | 140   | 2700 | 13500 | 70    | 3020 | 15100 |
| 250   | 2400 | 12000 | 120   | 2800 | 14000 | 40    | 3200 | 16000 |
| 200   | 2600 | 13000 | 85    | 2900 | 14500 | 15    | 3500 | 17500 |

**Input shaft**  
Albero di entrata

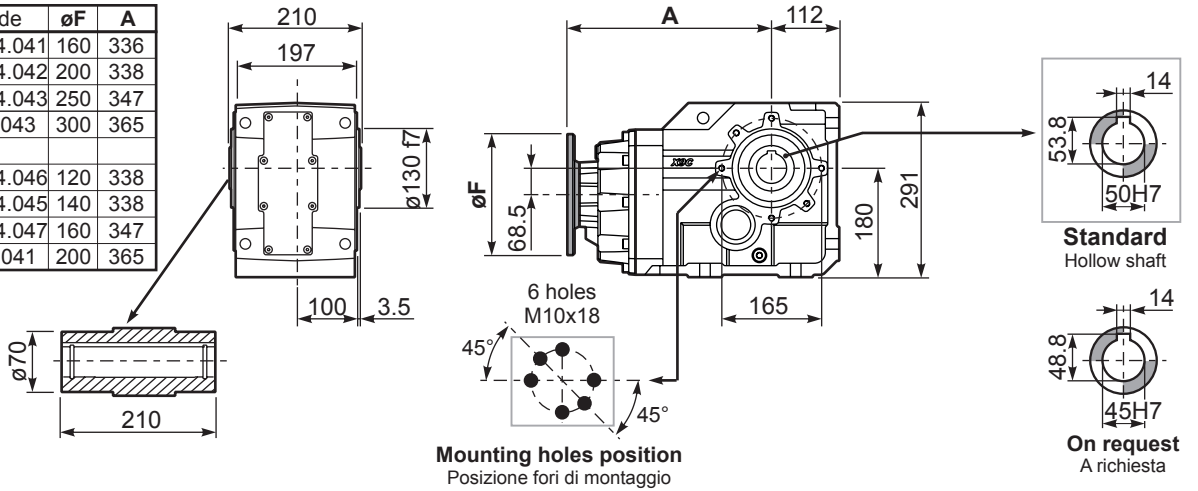
| $n_1$ | FA  | FR   |
|-------|-----|------|
| 1400  | 450 | 2250 |
| 900   | 500 | 2500 |
| 500   | 600 | 3000 |

tab. 2

**PX94CC...** Basic Gearbox  
Riduttore base

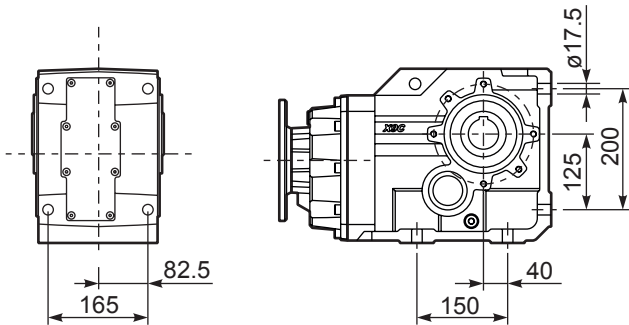
Gearbox weight **68.5 kg**  
peso riduttore

| M. flanges        | Kit code    | øF  | A   |
|-------------------|-------------|-----|-----|
| <b>71B5</b>       | KC023.4.041 | 160 | 336 |
| <b>80/90B5</b>    | KC023.4.042 | 200 | 338 |
| <b>100/112B5</b>  | KC023.4.043 | 250 | 347 |
| <b>132B5</b>      | KC50.4.043  | 300 | 365 |
| <b>80B14</b>      | KC085.4.046 | 120 | 338 |
| <b>90B14</b>      | KC085.4.045 | 140 | 338 |
| <b>100/112B14</b> | KC085.4.047 | 160 | 347 |
| <b>132B14</b>     | KC50.4.041  | 200 | 365 |

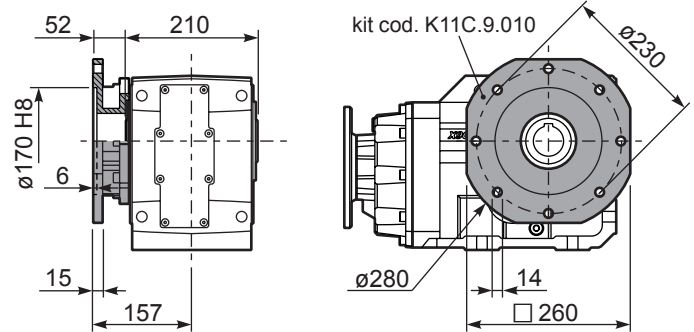


**Mounting holes position**  
Posizione fori di montaggio

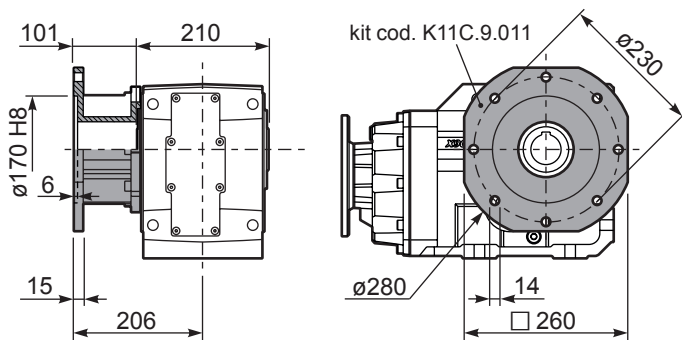
**PX94C...FB..** Feet  
Piedini



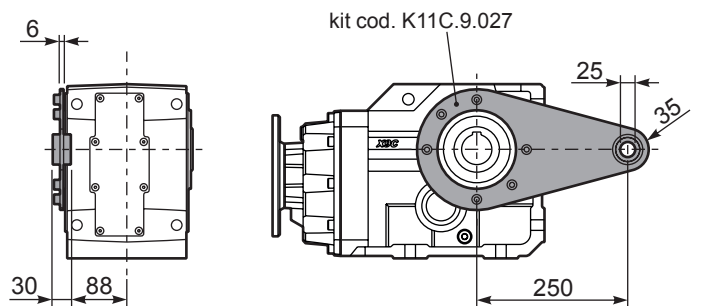
**PX94C...-FC..** Output flange  
Flangia uscita



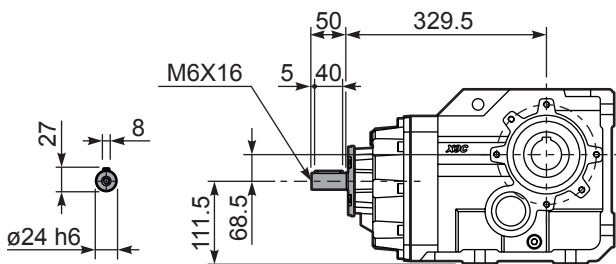
**PX94C...-FL..** Output flange  
Flangia uscita



**PX94C...BR..** Reaction Arm  
Braccio di reazione

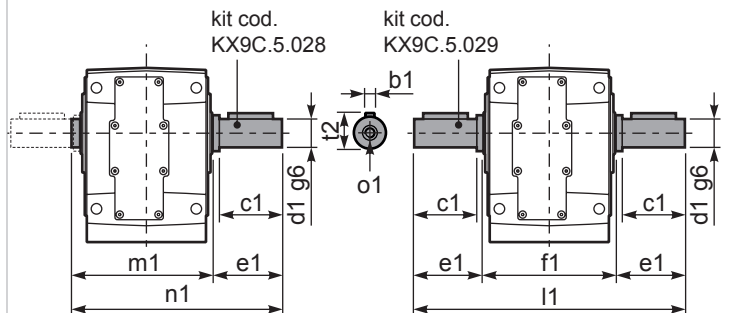


**RX94C...** Input shaft  
Albero in entrata

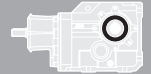


**PX94CA...** Single shaft  
Albero lento semplice

**PX94CB...** Double shaft  
Albero lento bisp.



|          | b1 | c1  | d1 | e1  | f1  | l1  | m1  | n1  | t2   | o1  |
|----------|----|-----|----|-----|-----|-----|-----|-----|------|-----|
| Standard | 14 | 100 | 50 | 105 | 210 | 420 | 218 | 323 | 53.5 | M16 |
| -        | -  | -   | -  | -   | -   | -   | -   | -   | -    | -   |



## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$ | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>$f.s.$ | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | B5<br>motor flanges |     |     |     | B14<br>motor flanges |   |   |        | Output Shaft<br> | Ratios code |
|---|--------------|---------------------------------|-----------------------------------|--------------------------|-----------------------------------|------------------------------------|---------------------|-----|-----|-----|----------------------|---|---|--------|------------------|-------------|
|   |              |                                 |                                   |                          |                                   |                                    | -G                  | -H  | -I  | -L  | -                    | - | - | -      |                  |             |
|   |              |                                 |                                   |                          |                                   |                                    | 132                 | 160 | 180 | 200 | -                    | - | - | -      |                  |             |
| 219   | <b>6.39</b>  | 30                              | 1180                              | 1.1                      | <b>31.7</b>                       | <b>1300</b>                        |                     |     |     |     |                      |   |   | 392914 | 01               |             |
| 200   | <b>7.00</b>  | 30                              | 1292                              | 1.1                      | <b>31.2</b>                       | <b>1400</b>                        |                     |     |     |     |                      |   |   | 392913 | 02               |             |
| 164   | <b>8.55</b>  | 30                              | 1578                              | 1.0                      | <b>27.4</b>                       | <b>1500</b>                        |                     |     |     |     |                      |   |   | 392911 | 03               |             |
| 140   | <b>10.01</b> | 22                              | 1357                              | 1.2                      | <b>24.9</b>                       | <b>1600</b>                        |                     |     |     |     |                      |   |   | 302914 | 04               |             |
| 128   | <b>10.97</b> | 22                              | 1486                              | 1.1                      | <b>24.2</b>                       | <b>1700</b>                        |                     |     |     |     |                      |   |   | 302913 | 05               |             |
| 105   | <b>13.39</b> | 22                              | 1815                              | 1.2                      | <b>24.5</b>                       | <b>2100</b>                        |                     |     |     |     |                      |   |   | 302911 | 06               |             |
| 89  | <b>15.71</b> | 22                              | 2130                              | 1.0                      | <b>21.8</b>                       | <b>2200</b>                        |                     |     |     |     |                      |   |   | 222914 | 07               |             |
| 81  | <b>17.21</b> | 22                              | 2333                              | 1.0                      | <b>20.8</b>                       | <b>2300</b>                        |                     |     |     |     |                      |   |   | 222913 | 08               |             |
| 67  | <b>21.02</b> | 18.5                            | 2394                              | 1.0                      | <b>17.8</b>                       | <b>2400</b>                        |                     |     |     |     |                      |   |   | 222911 | 09               |             |
| 59  | <b>23.73</b> | 18.5                            | 2703                              | 1.0                      | <b>17.1</b>                       | <b>2600</b>                        |                     |     |     |     |                      |   |   | 162914 | 10               |             |
| 54  | <b>25.99</b> | 18.5                            | 2960                              | 0.9                      | <b>16.8</b>                       | <b>2800</b>                        |                     |     |     |     |                      |   |   | 162913 | 11               |             |
| 50  | <b>27.93</b> | 15                              | 2576                              | 1.1                      | <b>16.2</b>                       | <b>2900</b>                        |                     |     |     |     |                      |   |   | 142914 | 12               |             |
| 45.8  | <b>30.59</b> | 15                              | 2822                              | 1.0                      | <b>14.8</b>                       | <b>2900</b>                        |                     |     |     |     |                      |   |   | 142913 | 13               |             |
| 44.1  | <b>31.74</b> | 15                              | 2928                              | 1.0                      | <b>14.2</b>                       | <b>2900</b>                        |                     |     |     |     |                      |   |   | 162911 | 14               |             |
| 37.5  | <b>37.36</b> | 11                              | 2532                              | 1.1                      | <b>12.1</b>                       | <b>2900</b>                        |                     |     |     |     |                      |   |   | 142911 | 15               |             |
| 33.8  | <b>41.37</b> | 11                              | 2804                              | 1.0                      | <b>10.9</b>                       | <b>2900</b>                        |                     |     |     |     |                      |   |   | 102914 | 16               |             |
| 30.9  | <b>45.31</b> | 9                               | 2618                              | 1.1                      | <b>10.0</b>                       | <b>2900</b>                        |                     |     |     |     |                      |   |   | 102913 | 17               |             |
| 25.3  | <b>55.33</b> | 7.5                             | 2573                              | 1.2                      | <b>8.5</b>                        | <b>3000</b>                        |                     |     |     |     |                      |   |   | 102911 | 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 **X103** 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 **X103** 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 **X103** 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 **X103** 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 **X103** 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.

| Standard supplied | For these mounting position specify in the order or add oil<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |          |         |          |         |     |
|-------------------|--|----------|---------|----------|---------|-----|
|                   |  |          |         |          |         |     |
| 11.50 LT          | 5.50 LT  | 10.50 LT | 7.50 LT | 13.50 LT | 9.50 LT | Ask |
| AGIP Blasias 460  |  |          |         |          |         |     |

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

$F_{eq} = FR \cdot \frac{253}{X+193}$

| $n_2$ | FA   | FR    | $n_2$ | FA   | FR    | $n_2$ | FA   | FR    |
|-------|------|-------|-------|------|-------|-------|------|-------|
| 300   | 2000 | 10000 | 140   | 2800 | 14000 | 70    | 3500 | 17500 |
| 250   | 2500 | 12500 | 120   | 3000 | 15000 | 40    | 4200 | 21000 |
| 200   | 2700 | 13500 | 85    | 3200 | 16000 | 15    | 5400 | 27000 |

**Input shaft**  
Albero in entrata

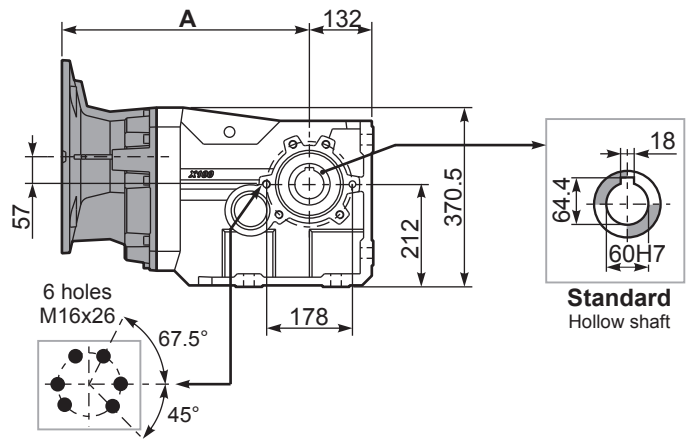
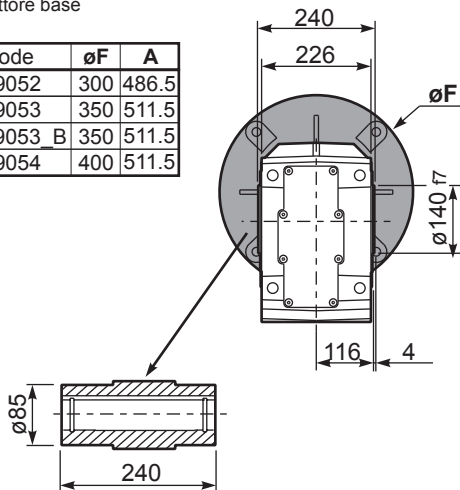
| $n_1$ | FA   | FR   |
|-------|------|------|
| 1400  | 1120 | 5600 |
| 900   | 1220 | 6100 |
| 500   | 1300 | 6500 |

**tab. 2**

**PX103C...** Basic Gearbox  
Riduttore base

Gearbox weight **125 kg**  
peso riduttore

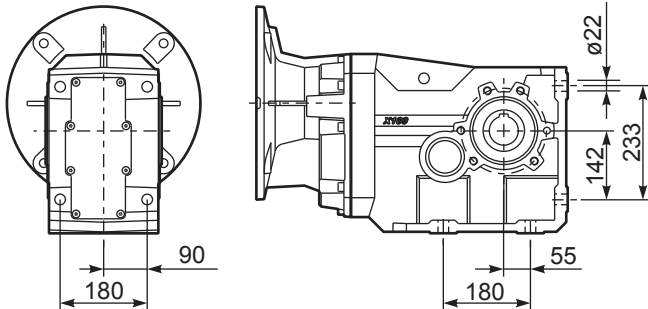
| M. flanges   | Kit code    | øF  | A     |
|--------------|-------------|-----|-------|
| <b>132B5</b> | KC1109052   | 300 | 486.5 |
| <b>160B5</b> | KC1109053   | 350 | 511.5 |
| <b>180B5</b> | KC1109053_B | 350 | 511.5 |
| <b>200B5</b> | KC1109054   | 400 | 511.5 |



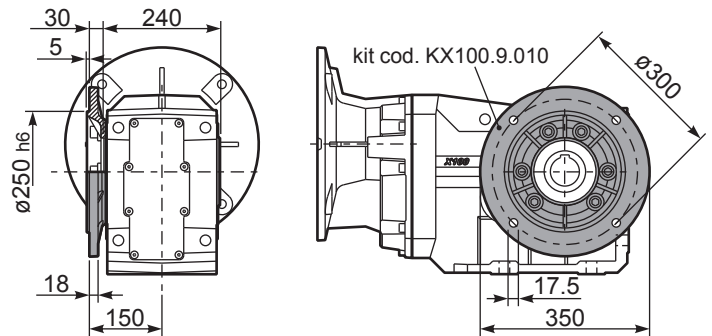
**Mounting holes position**  
Posizione fori di montaggio

**Standard**  
Hollow shaft

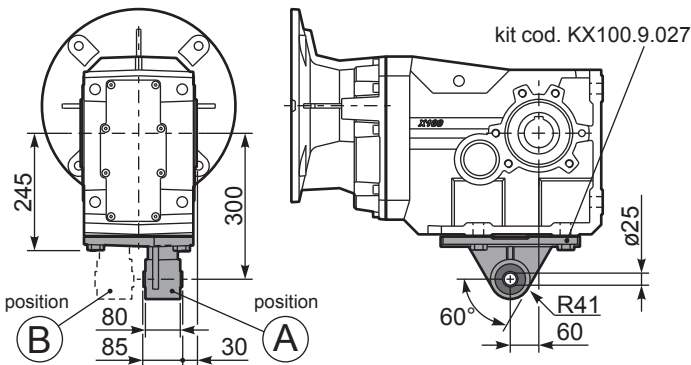
**PX103...FB..** Feet  
Piedini



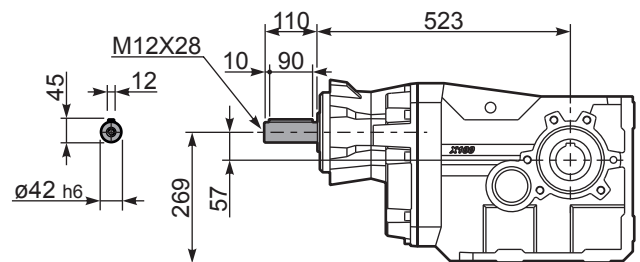
**PX103...-F6..** Output flange  
Flangia uscita



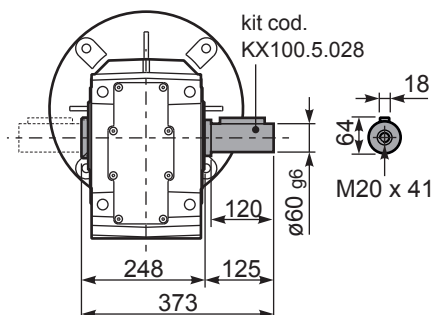
**PX103...BR..** Reaction Arm  
Braccio di reazione



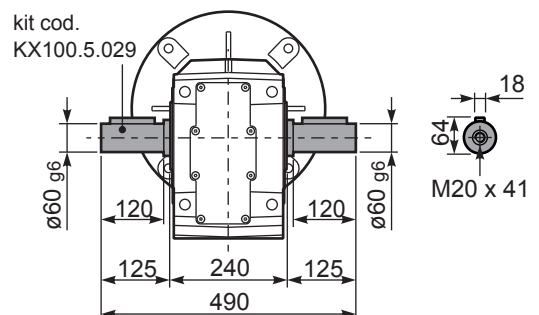
**RX103...** Input shaft  
Albero in entrata

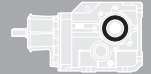


**PX103A...** Single shaft  
Albero lento semplice



**PX103B...** Double shaft  
Albero lento bisp.





## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |     | B14 motor flanges    |   |   |          | Output Shaft<br> | Ratios code<br> |
|---|---------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|-----|----------------------|---|---|----------|------------------|-----------------|
|   |               |                                 |                                   |                        |                                   |                                    | -F                         | -G  | -                    | - | - |          |                  |                 |
|   |               |                                 |                                   |                        |                                   |                                    | 100                        | 132 | -                    | - | - |          |                  |                 |
| 28.8  | <b>48.57</b>  | 9                               | 2750                              | 1.1                    | 9.5                               | 2900                               | B                          |     | <b>not available</b> |   |   | 30142911 | 01               |                 |
| 20.5  | <b>68.43</b>  | 7.5                             | 3118                              | 1.0                    | 7.0                               | 3000                               | B                          |     |                      |   |   | 20142914 | 02               |                 |
| 18.7  | <b>74.95</b>  | 5.5                             | 2523                              | 1.2                    | 6.4                               | 3000                               | B                          |     |                      |   |   | 20142913 | 03               |                 |
| 15.1  | <b>92.53</b>  | 5.5                             | 3115                              | 1.0                    | 5.2                               | 3000                               | B                          |     |                      |   |   | 16142914 | 04               |                 |
| 13.8  | <b>101.33</b> | 4                               | 2496                              | 1.2                    | 4.7                               | 3000                               | B                          |     |                      |   |   | 16142913 | 05               |                 |
| 11.6  | <b>120.33</b> | 4                               | 2963                              | 1.0                    | 4.0                               | 3000                               | B                          |     |                      |   |   | 13142914 | 06               |                 |
| 11.3  | <b>123.75</b> | 4                               | 3048                              | 1.0                    | 3.9                               | 3000                               | B                          |     |                      |   |   | 16142911 | 07               |                 |
| 10.6  | <b>131.78</b> | 4                               | 3245                              | 0.9                    | 3.6                               | 3000                               | B                          |     |                      |   |   | 13142913 | 08               |                 |
| 9.5   | <b>147.28</b> | 3                               | 2731                              | 1.1                    | 3.2                               | 3000                               | B                          |     |                      |   |   | 11142914 | 09               |                 |
| 8.7   | <b>161.30</b> | 3                               | 2990                              | 1.0                    | 3.0                               | 3000                               | B                          |     |                      |   |   | 11142913 | 10               |                 |
| 7.1   | <b>196.98</b> | 2.2                             | 2689                              | 1.1                    | 2.4                               | 3000                               | B                          |     |                      |   |   | 11142911 | 11               |                 |
| 6.6   | <b>212.99</b> | 2.2                             | 2907                              | 1.0                    | 2.2                               | 3000                               | B                          |     |                      |   |   | 8142914  | 12               |                 |
| 6.0   | <b>233.26</b> | 2.2                             | 3184                              | 0.9                    | 2.0                               | 3000                               | B                          |     |                      |   |   | 8142913  | 13               |                 |
| 4.9   | <b>284.86</b> | 2.2                             | 3889                              | 0.8                    | 1.7                               | 3000                               | B                          |     |                      |   |   | 8142911  | 14               |                 |

The dynamic efficiency is **0.92** 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 **X104** 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 **X104** 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 **X104** 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 **X104** 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 **X104** 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.

| 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  |
| 12.00 LT          | 6.00 LT   | 11.50 LT | 8.00 LT | 14.50 LT | 11.00 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                  |      |       |                                       |      |       |       |      |       |
|---|------|-------|---------------------------------------|------|-------|-------|------|-------|
| <b>Output shaft</b><br>Albero di uscita |      |       | $F_{eq} = FR \cdot \frac{253}{X+193}$ |      |       |       |      |       |
|   |      |       |                                       |      |       |       |      |       |
| $n_2$                                   | FA   | FR    | $n_2$                                 | FA   | FR    | $n_2$ | FA   | FR    |
| 300                                     | 2000 | 10000 | 140                                   | 2800 | 14000 | 70    | 3500 | 17500 |
| 250                                     | 2500 | 12500 | 120                                   | 3000 | 15000 | 40    | 4200 | 21000 |
| 200                                     | 2700 | 13500 | 85                                    | 3200 | 16000 | 15    | 5400 | 27000 |
| <b>Input shaft</b><br>Albero in entrata |      |       |                                       |      |       |       |      |       |
| $n_1$                                   | FA   | FR    |                                       |      |       |       |      |       |
| 1400                                    | 700  | 3500  |                                       |      |       |       |      |       |
| 900                                     | 840  | 4200  |                                       |      |       |       |      |       |
| 500                                     | 900  | 4500  |                                       |      |       |       |      |       |

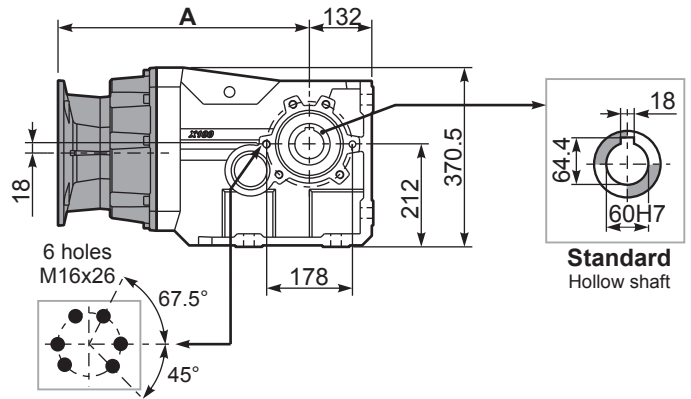
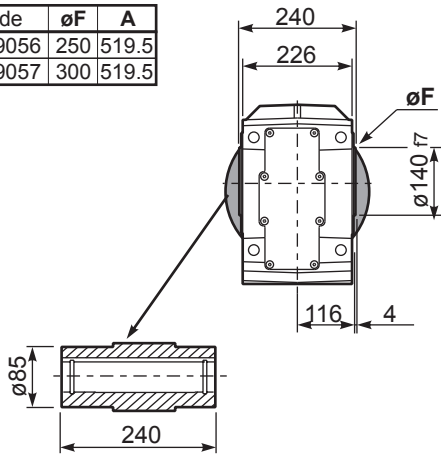
tab. 2



**PX104C...** Basic Gearbox  
Riduttore base

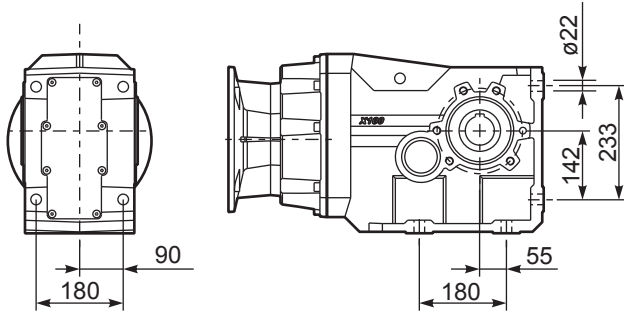
Gearbox weight **118 kg**  
peso riduttore

| M. flanges | Kit code  | øF  | A     |
|------------|-----------|-----|-------|
| 100/112B5  | KC1109056 | 250 | 519.5 |
| 132B5      | KC1109057 | 300 | 519.5 |

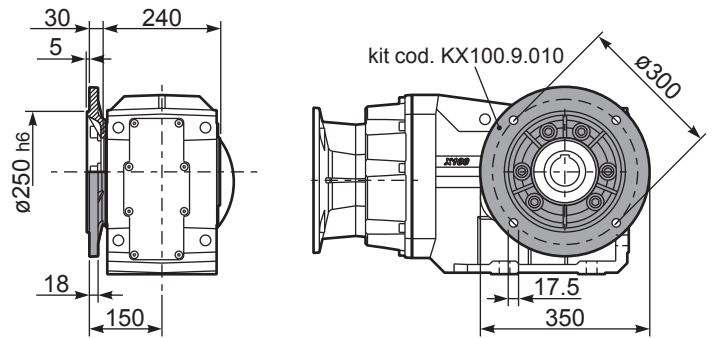


**Mounting holes position**  
Posizione fori di montaggio

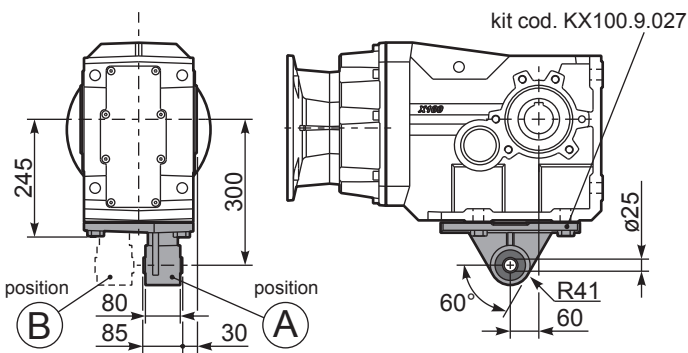
**PX104...FB..** Feet  
Piedini



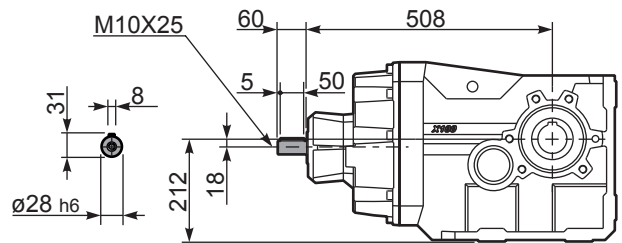
**PX104...-F6..** Output flange  
Flangia uscita



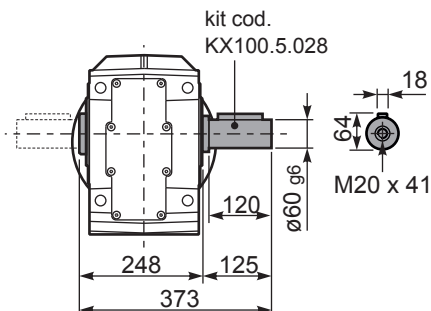
**PX104...BR..** Reaction Arm  
Braccio di reazione



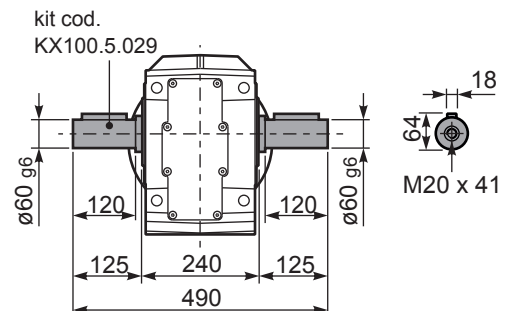
**RX104...** Input shaft  
Albero in entrata

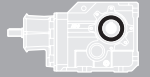


**PX104A...** Single shaft  
Albero lento semplice



**PX104B...** Double shaft  
Albero lento bisp.





**QUICK SELECTION / Selezione veloce**

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$ | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | B5<br>motor flanges |     |     |     |     | B14<br>motor flanges |   |        | Output Shaft<br> | Ratios code |
|---|--------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|---------------------|-----|-----|-----|-----|----------------------|---|--------|------------------|-------------|
|   |              |                                 |                                   |                        |                                   |                                    | -G                  | -H  | -I  | -L  | CA  | -                    | - | -      |                  |             |
|   |              |                                 |                                   |                        |                                   |                                    | 132                 | 160 | 180 | 200 | 225 | -                    | - | -      |                  |             |
| 219   | <b>6.39</b>  | 45                              | 1757                              | 1.4                    | <b>61.0</b>                       | <b>2500</b>                        |                     |     |     |     |     |                      |   | 392914 | 01               |             |
| 200   | <b>7.00</b>  | 45                              | 1925                              | 1.4                    | <b>59.0</b>                       | <b>2650</b>                        |                     |     |     |     |     |                      |   | 392913 | 02               |             |
| 164   | <b>8.55</b>  | 45                              | 2350                              | 1.2                    | <b>51.1</b>                       | <b>2800</b>                        |                     |     |     |     |     |                      |   | 392911 | 03               |             |
| 140   | <b>10.01</b> | 45                              | 2752                              | 1.2                    | <b>49.8</b>                       | <b>3200</b>                        |                     |     |     |     |     |                      |   | 302914 | 04               |             |
| 128   | <b>10.97</b> | 45                              | 3014                              | 1.1                    | <b>45.5</b>                       | <b>3200</b>                        |                     |     |     |     |     |                      |   | 302913 | 05               |             |
| 105   | <b>13.39</b> | 37                              | 3025                              | 1.1                    | <b>39.6</b>                       | <b>3400</b>                        |                     |     |     |     |     |                      |   | 302911 | 06               |             |
| 89  | <b>15.71</b> | 37                              | 3550                              | 1.0                    | <b>34.7</b>                       | <b>3500</b>                        |                     |     |     |     |     |                      |   | 222914 | 07               |             |
| 81  | <b>17.21</b> | 37                              | 3888                              | 1.0                    | <b>33.5</b>                       | <b>3700</b>                        |                     |     |     |     |     |                      |   | 222913 | 08               |             |
| 67  | <b>21.02</b> | 30                              | 3877                              | 1.0                    | <b>29.7</b>                       | <b>4000</b>                        |                     |     |     |     |     |                      |   | 222911 | 09               |             |
| 59  | <b>23.73</b> | 30                              | 4378                              | 0.9                    | <b>26.9</b>                       | <b>4100</b>                        |                     |     |     |     |     |                      |   | 162914 | 10               |             |
| 54  | <b>25.99</b> | 22                              | 3523                              | 1.2                    | <b>25.8</b>                       | <b>4300</b>                        |                     |     |     |     |     |                      |   | 162913 | 11               |             |
| 50  | <b>27.93</b> | 22                              | 3786                              | 1.1                    | <b>24.0</b>                       | <b>4300</b>                        |                     |     |     |     |     |                      |   | 142914 | 12               |             |
| 45.8  | <b>30.59</b> | 22                              | 4146                              | 1.1                    | <b>22.9</b>                       | <b>4500</b>                        |                     |     |     |     |     |                      |   | 142913 | 13               |             |
| 44.1  | <b>31.74</b> | 22                              | 4302                              | 1.0                    | <b>22.1</b>                       | <b>4500</b>                        |                     |     |     |     |     |                      |   | 162911 | 14               |             |
| 37.5  | <b>37.36</b> | 18.5                            | 4255                              | 1.1                    | <b>18.8</b>                       | <b>4500</b>                        |                     |     |     |     |     |                      |   | 142911 | 15               |             |
| 33.8  | <b>41.37</b> | 18.5                            | 4712                              | 1.0                    | <b>17.0</b>                       | <b>4500</b>                        |                     |     |     |     |     |                      |   | 102914 | 16               |             |
| 30.9  | <b>45.31</b> | 15                              | 4179                              | 1.1                    | <b>15.5</b>                       | <b>4500</b>                        |                     |     |     |     |     |                      |   | 102913 | 17               |             |
| 25.3  | <b>55.33</b> | 11                              | 3750                              | 1.2                    | <b>12.7</b>                       | <b>4500</b>                        |                     |     |     |     |     |                      |   | 102911 | 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 **X113** 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 **X113** è fornito privo di lubrificazione con tappi di sfio, 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 **X113** 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 **X113** 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 **X113** 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.

| Standard supplied | For these mounting position specify in the order or add oil<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |          |          |          |          |     |
|-------------------|--|----------|----------|----------|----------|-----|
|                   |  |          |          |          |          |     |
| 13.50 LT          | 8.00 LT  | 15.50 LT | 14.50 LT | 22.00 LT | 13.00 LT | Ask |
| AGIP Blasias 460  |  |          |          |          |          |     |

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

$F_{eq} = FR \cdot \frac{325.5}{X+255.5}$

| $n_2$ | FA   | FR    | $n_2$ | FA   | FR    | $n_2$ | FA   | FR    |
|-------|------|-------|-------|------|-------|-------|------|-------|
| 300   | 2100 | 10500 | 140   | 3100 | 15500 | 70    | 4200 | 21000 |
| 250   | 2600 | 13000 | 120   | 3240 | 16200 | 40    | 5600 | 28000 |
| 200   | 3000 | 15000 | 85    | 3600 | 18000 | 15    | 8000 | 40000 |

**Input shaft**  
Albero in entrata

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

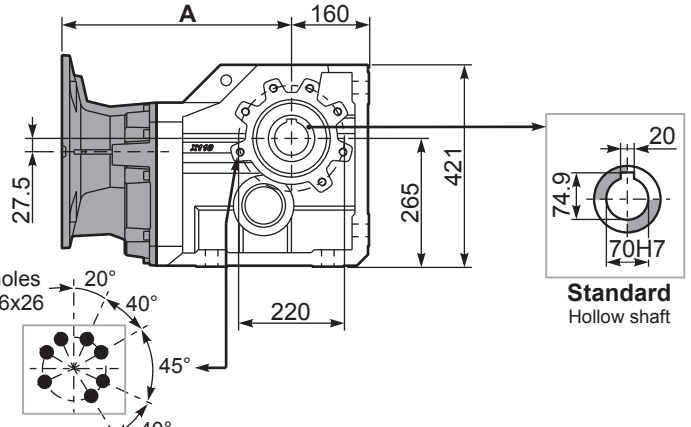
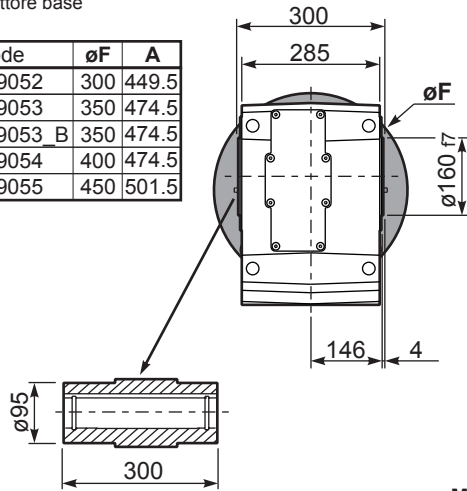
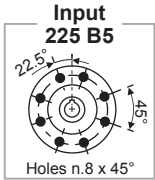
**tab. 2**

**PX113C...**

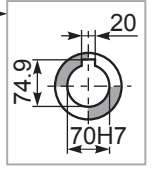
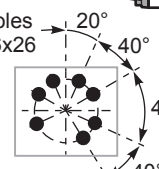
Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **170 kg**

| M. flanges   | Kit code    | øF  | A     |
|--------------|-------------|-----|-------|
| <b>132B5</b> | KC1109052   | 300 | 449.5 |
| <b>160B5</b> | KC1109053   | 350 | 474.5 |
| <b>180B5</b> | KC1109053_B | 350 | 474.5 |
| <b>200B5</b> | KC1109054   | 400 | 474.5 |
| <b>225B5</b> | KC1109055   | 450 | 501.5 |

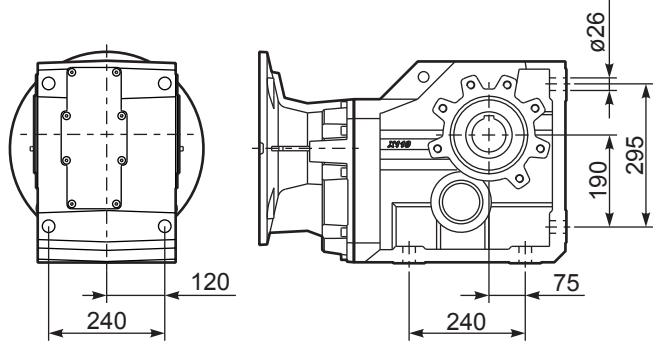


**Mounting holes position**  
Posizione fori di montaggio



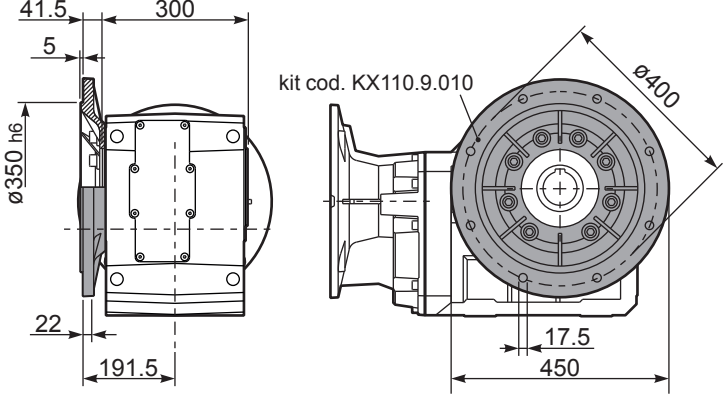
**PX113...FB..**

Feet  
Piedini



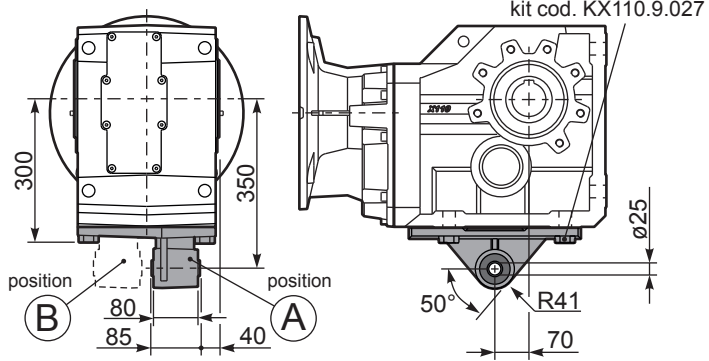
**PX113...-F7..**

Output flange  
Flangia uscita



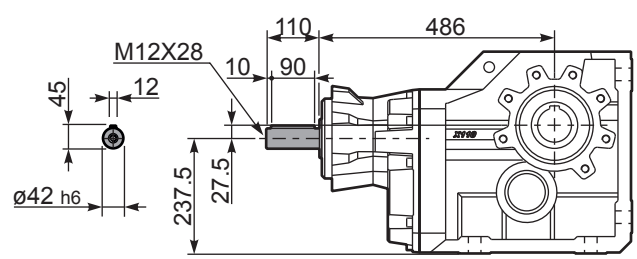
**PX113...BR..**

Reaction Arm  
Braccio di reazione



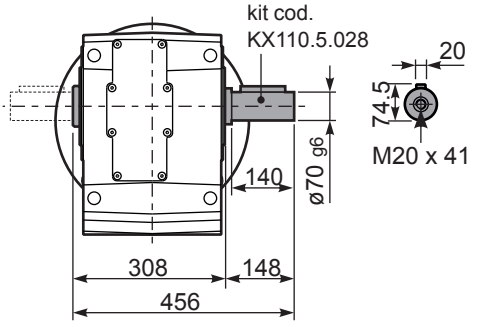
**RX113...**

Input shaft  
Albero in entrata



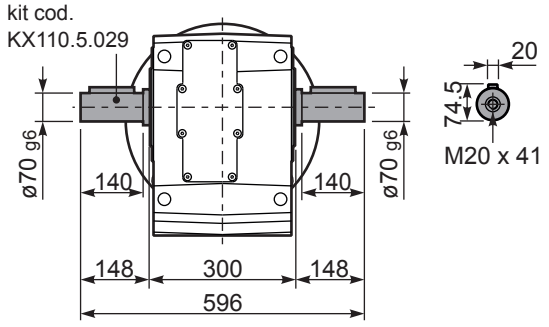
**PX113A...**

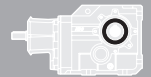
Single shaft  
Albero lento semplice



**PX113B...**

Double shaft  
Albero lento bisp.





**QUICK SELECTION / Selezione veloce**

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | B5<br>motor flanges |     |     | B14<br>motor flanges |   |   | Output Shaft<br> | Ratios code |
|---|---------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|---------------------|-----|-----|----------------------|---|---|------------------|-------------|
|   |               |                                 |                                   |                        |                                   |                                    | -F                  | -G  | -H  | -                    | - | - |                  |             |
|   |               |                                 |                                   |                        |                                   |                                    | 100<br>112          | 132 | 160 | -                    | - | - |                  |             |
| 28.8  | <b>48.57</b>  | 15                              | 4390                              | 1.0                    | <b>14.8</b>                       | <b>4500</b>                        | B                   |     |     |                      |   |   | 30142911         | 01          |
| 20.5  | <b>68.43</b>  | 11                              | 4545                              | 1.0                    | <b>10.7</b>                       | <b>4600</b>                        | B                   |     |     |                      |   |   | 20142914         | 02          |
| 18.7  | <b>74.95</b>  | 11                              | 4977                              | 0.9                    | <b>9.8</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 20142913         | 03          |
| 15.1  | <b>92.53</b>  | 7.5                             | 4216                              | 1.1                    | <b>7.9</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 16142914         | 04          |
| 13.8  | <b>101.33</b> | 7.5                             | 4617                              | 1.0                    | <b>7.2</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 16142913         | 05          |
| 11.6  | <b>120.33</b> | 5.5                             | 4051                              | 1.1                    | <b>6.1</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 13142914         | 06          |
| 11.3  | <b>123.75</b> | 5.5                             | 4166                              | 1.1                    | <b>5.8</b>                        | <b>4500</b>                        | B                   |     |     |                      |   |   | 16142911         | 07          |
| 10.6  | <b>131.78</b> | 5.5                             | 4436                              | 1.0                    | <b>5.6</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 13142913         | 08          |
| 9.5   | <b>147.28</b> | 5.5                             | 4958                              | 0.9                    | <b>5.0</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 11142914         | 09          |
| 8.7   | <b>161.30</b> | 4                               | 3972                              | 1.2                    | <b>4.5</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 11142913         | 10          |
| 7.1   | <b>196.98</b> | 3                               | 3652                              | 1.2                    | <b>3.6</b>                        | <b>4500</b>                        | B                   |     |     |                      |   |   | 11142911         | 11          |
| 6.6   | <b>212.99</b> | 3                               | 3949                              | 1.2                    | <b>3.4</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 8142914          | 12          |
| 6.0   | <b>233.26</b> | 3                               | 4324                              | 1.1                    | <b>3.1</b>                        | <b>4600</b>                        | B                   |     |     |                      |   |   | 8142913          | 13          |
| 4.9   | <b>284.86</b> | 2.2                             | 3889                              | 1.2                    | <b>2.5</b>                        | <b>4500</b>                        | B                   |     |     |                      |   |   | 8142911          | 14          |

The dynamic efficiency is **0.92** 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 **X114** 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 **X114** 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 **X114** 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 **X114** 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 **X114** 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.

| Standard supplied | For these mounting position specify in the order or add oil         |           |           |           |           |           |
|-------------------|---|-----------|-----------|-----------|-----------|-----------|
|                   | Per queste posizioni specificare in fase d'ordine o aggiungere olio |           |           |           |           |           |
|                   |   |           |           |           |           |           |
| <b>B3</b>         | <b>B6</b>   | <b>B7</b> | <b>B8</b> | <b>V5</b> | <b>V6</b> | <b>V8</b> |
| 14.50 LT          | 8.50 LT   | 16.50 LT  | 16.00 LT  | 23.00 LT  | 14.50 LT  | Ask       |

AGIP Blasias 460

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

$F_{eq} = FR \cdot \frac{325.5}{X+255.5}$

| $n_2$      | FA   | FR    | $n_2$      | FA   | FR    | $n_2$     | FA   | FR    |
|------------|------|-------|------------|------|-------|-----------|------|-------|
| <b>300</b> | 2100 | 10500 | <b>140</b> | 3100 | 15500 | <b>70</b> | 4200 | 21000 |
| <b>250</b> | 2600 | 13000 | <b>120</b> | 3240 | 16200 | <b>40</b> | 5600 | 28000 |
| <b>200</b> | 3000 | 15000 | <b>85</b>  | 3600 | 18000 | <b>15</b> | 8000 | 40000 |

**Input shaft**  
Albero in entrata

| $n_1$       | FA  | FR   |
|-------------|-----|------|
| <b>1400</b> | 700 | 3500 |
| <b>900</b>  | 840 | 4200 |
| <b>500</b>  | 900 | 4500 |

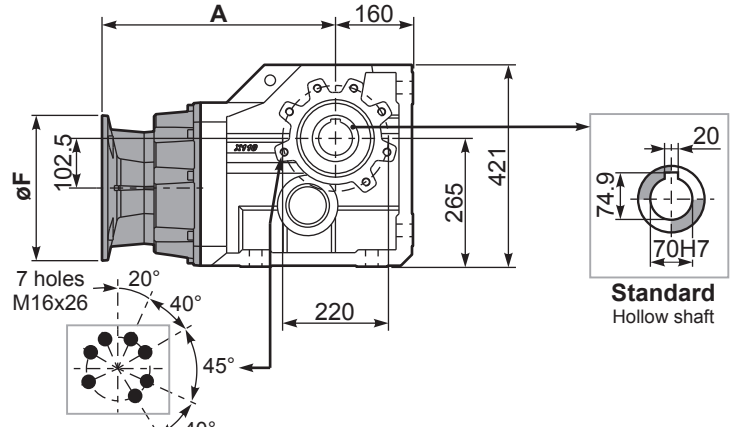
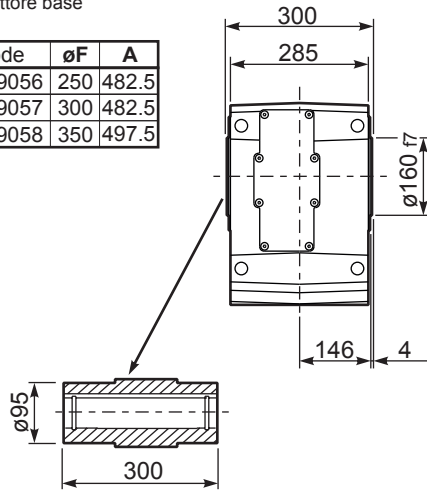
**tab. 2**

**PX114C...**

Basic Gearbox  
Riduttore base

Gearbox weight **161 kg**  
peso riduttore

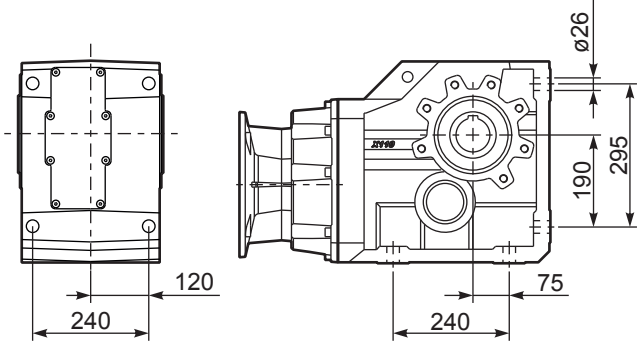
| M. flanges       | Kit code  | øF  | A     |
|------------------|-----------|-----|-------|
| <b>100/112B5</b> | KC1109056 | 250 | 482.5 |
| <b>132B5</b>     | KC1109057 | 300 | 482.5 |
| <b>160B5</b>     | KC1109058 | 350 | 497.5 |



**Mounting holes position**  
Posizione fori di montaggio

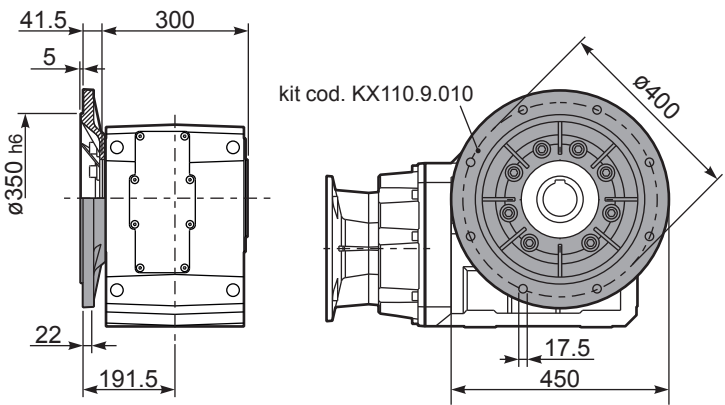
**PX114...FB..**

Feet  
Piedini



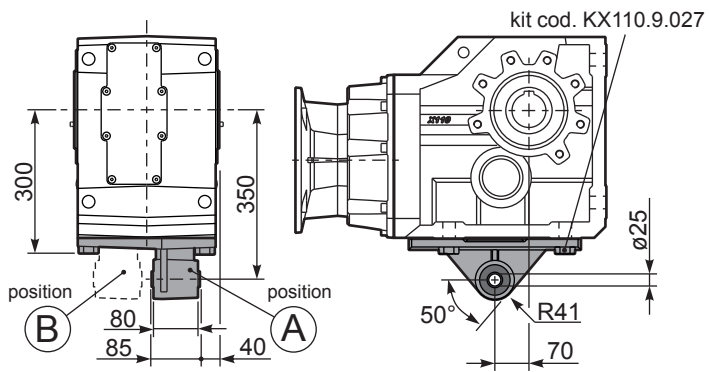
**PX114...-F7..**

Output flange  
Flangia uscita



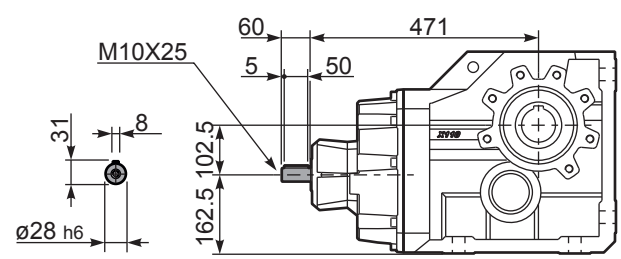
**PX114...BR..**

Reaction Arm  
Braccio di reazione



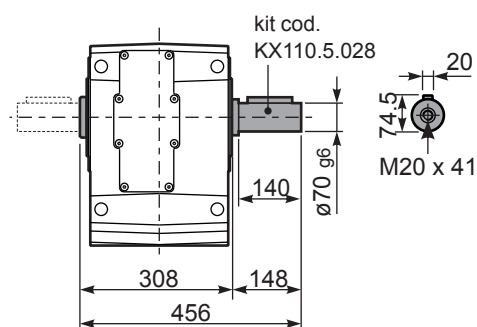
**RX114...**

Input shaft  
Albero in entrata



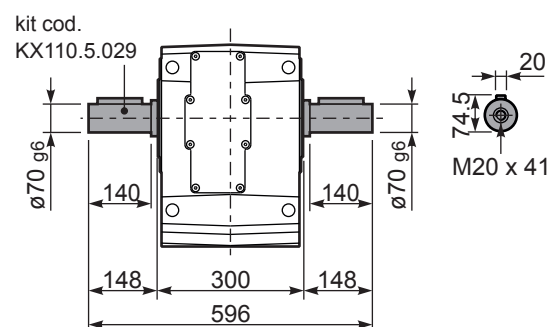
**PX114A...**

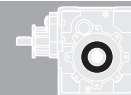
Single shaft  
Albero lento semplice



**PX114B...**

Double shaft  
Albero lento bisp.





## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$ | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |            |     | Available B14 motor flanges |    |            |     | Output Shaft<br> | Ratios code |    |
|---|--------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|------------|-----|-----------------------------|----|------------|-----|------------------|-------------|----|
|   |              |                                 |                                   |                        |                                   |                                    | -C                         | -D | -E | -F         | -G  | -R                          | -T | -U         | -V  |                  |             |    |
|   |              |                                 |                                   |                        |                                   |                                    | 71                         | 80 | 90 | 100<br>112 | 132 | 80                          | 90 | 100<br>112 | 132 |                  |             |    |
| 176   | <b>7.94</b>  | 7.5                             | 369                               | 1.0                    | 7.5                               | 380                                | B                          |    |    |            |     |                             |    |            |     |                  | 302418      | 01 |
| 153   | <b>9.13</b>  | 7.5                             | 425                               | 0.9                    | 6.7                               | 390                                | B                          |    |    |            |     |                             |    |            |     |                  | 302416      | 02 |
| 131   | <b>10.66</b> | 5.5                             | 366                               | 1.1                    | 6.0                               | 410                                | B                          |    |    |            |     |                             |    |            |     |                  | 302414      | 03 |
| 94  | <b>14.97</b> | 5.5                             | 514                               | 1.1                    | 6.0                               | 580                                | B                          |    |    |            |     |                             |    |            |     |                  | 202418      | 04 |
| 81  | <b>17.21</b> | 5.5                             | 591                               | 1.0                    | 5.4                               | 600                                | B                          |    |    |            |     |                             |    |            |     |                  | 202416      | 05 |
| 69  | <b>20.24</b> | 5.5                             | 695                               | 1.0                    | 5.2                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 162418      | 06 |
| 60  | <b>23.27</b> | 4                               | 585                               | 1.2                    | 4.5                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 162416      | 07 |
| 53  | <b>26.31</b> | 4                               | 661                               | 1.0                    | 4.0                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 132418      | 08 |
| 46.3  | <b>30.25</b> | 4                               | 760                               | 0.9                    | 3.5                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 132416      | 09 |
| 39.6  | <b>35.32</b> | 3                               | 668                               | 1.0                    | 3.0                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 132414      | 10 |
| 37.8  | <b>37.03</b> | 3                               | 701                               | 1.0                    | 2.8                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 112416      | 11 |
| 32.4  | <b>43.23</b> | 2.2                             | 602                               | 1.1                    | 2.4                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 112414      | 12 |
| 30.1  | <b>46.58</b> | 2.2                             | 649                               | 1.0                    | 2.3                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 82418       | 13 |
| 26.1  | <b>53.55</b> | 2.2                             | 746                               | 0.9                    | 2.0                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 82416       | 14 |
| 22.4  | <b>62.52</b> | 1.5                             | 600                               | 1.1                    | 1.7                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 82414       | 15 |
| 19.0  | <b>73.75</b> | 1.1                             | 517                               | 1.1                    | 1.2                               | 580                                | B                          |    |    |            |     |                             |    |            |     |                  | 62416       | 16 |
| 16.3  | <b>86.09</b> | 1.1                             | 604                               | 1.1                    | 1.2                               | 675                                | B                          |    |    |            |     |                             |    |            |     |                  | 62414       | 17 |

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 **113C** 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 **113C** 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 **113C** 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.

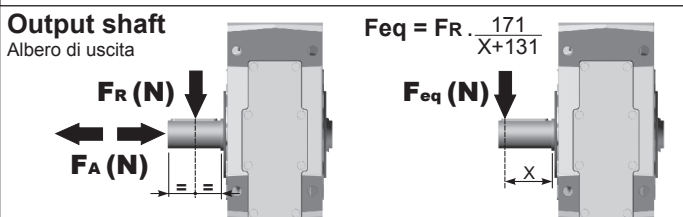
**F** Le réducteur **113C** est fourni complet avec de l'huile synthétique pour la lubrification permanente et ne nécessite aucun entretien. Voir tableau 1 concernant les huiles et les quantités conseillées. Les charges radiales et axiales applicables au réducteur sont précisées dans le tableau 2.

**E** El reductor tamaño **113C** 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<br>Per queste posizioni specificare in fase d'ordine o aggiungere olio |         |         |                       |         |     |
|---------------------|--|---------|---------|-----------------------|---------|-----|
|                     |  |         |         |                       |         |     |
| B3                  | B6   | B7      | B8      | V5                    | V6      | V8  |
| 4.00 LT             | 2.60 LT  | 2.60 LT | 2.60 LT | 5.15 LT               | 2.20 LT | Ask |
| AGIP Telium VSF 320 |  |         |         | SHELL Omala S4 WE 320 |         |     |

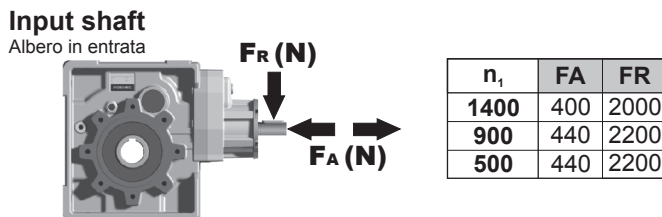
For all details on lubrication and plugs check our website [tab. 1](#)  
Per maggiori dettagli su lubrificazione e tappi olio vedi il nostro sito web

## RADIAL AND AXIAL LOADS



| $n_2$ | FA  | FR   | $n_2$ | FA   | FR   | $n_2$ | FA   | FR   |
|-------|-----|------|-------|------|------|-------|------|------|
| 300   | 640 | 3200 | 140   | 860  | 4300 | 70    | 1080 | 5400 |
| 250   | 700 | 3500 | 120   | 900  | 4500 | 40    | 1300 | 6500 |
| 200   | 740 | 3700 | 85    | 1000 | 5000 | 15    | 1840 | 9200 |

On request reinforced bearings to increase loads.  
A richiesta cuscinetti rinforzati per aumentare i carichi.

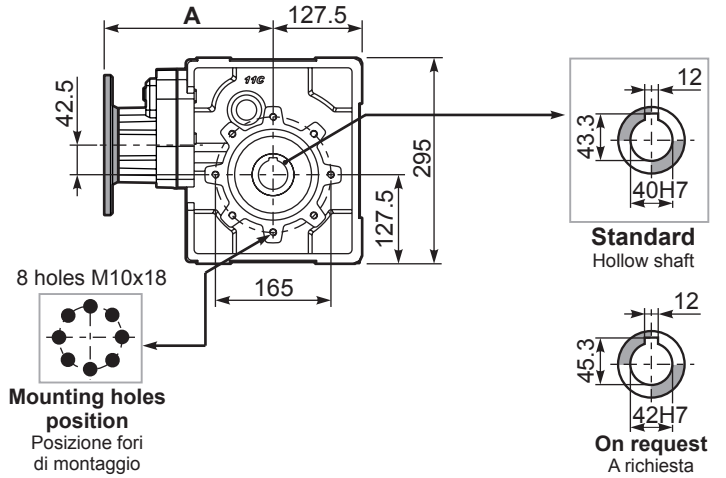
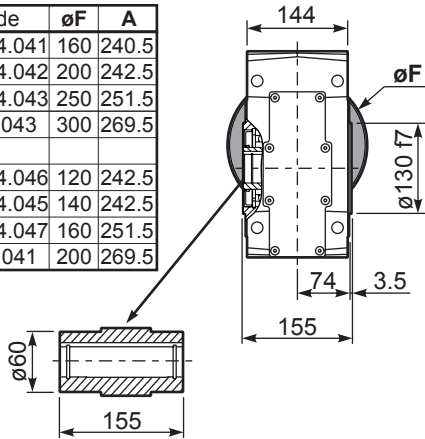


tab. 2

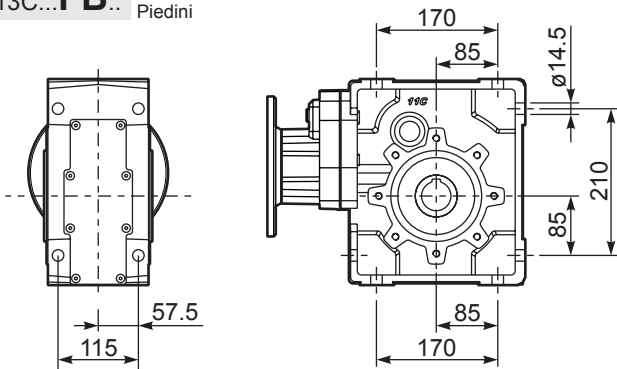
**P113CC...** Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **38.0 kg**

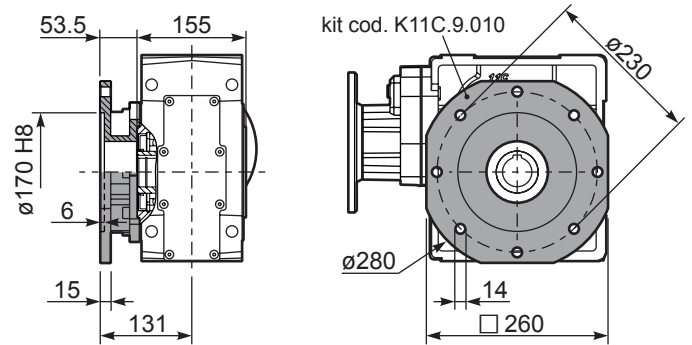
| M. flanges | Kit code    | øF  | A     |
|------------|-------------|-----|-------|
| 71B5       | KC023.4.041 | 160 | 240.5 |
| 80/90B5    | KC023.4.042 | 200 | 242.5 |
| 100/112B5  | KC023.4.043 | 250 | 251.5 |
| 132B5      | KC50.4.043  | 300 | 269.5 |
| 80B14      | KC085.4.046 | 120 | 242.5 |
| 90B14      | KC085.4.045 | 140 | 242.5 |
| 100/112B14 | KC085.4.047 | 160 | 251.5 |
| 132B14     | KC50.4.041  | 200 | 269.5 |



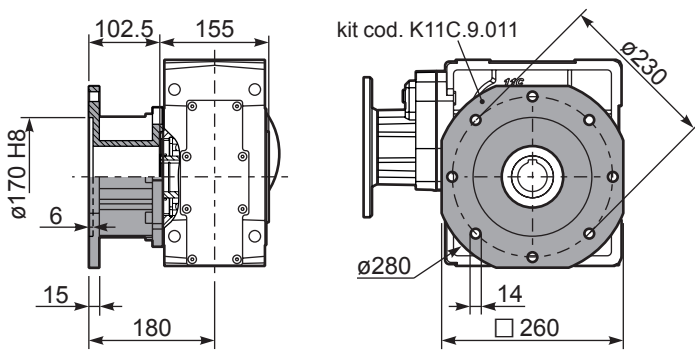
**P113C...FB..** Feet  
Piedini



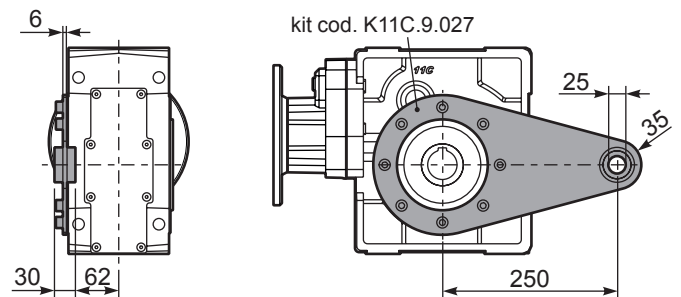
**P113C...-FC..** Output flange  
Flangia uscita



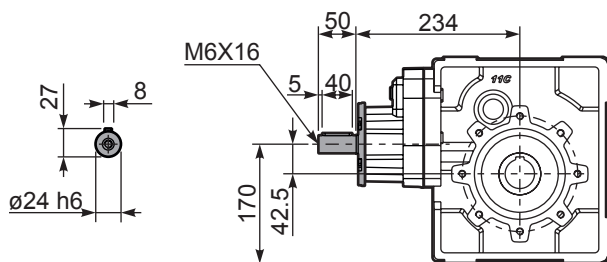
**P113C...-FL..** Output flange  
Flangia uscita



**P113C...BR..** Reaction Arm  
Braccio di reazione

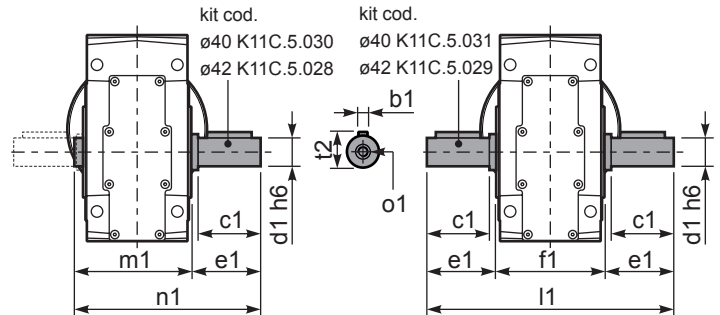


**R113C...** Input shaft  
Albero in entrata

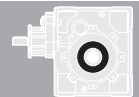


**P113CA...** Single shaft  
Albero lento semplice

**P113CB...** Double shaft  
Albero lento bisp.



|                | b1 | c1 | d1 | e1   | f1  | l1  | m1    | n1  | t2 | o1  |
|----------------|----|----|----|------|-----|-----|-------|-----|----|-----|
| ø40 Standard   | 12 | 80 | 40 | 84.5 | 155 | 324 | 164.5 | 249 | 43 | M12 |
| ø42 On request | 12 | 80 | 42 | 84.5 | 155 | 324 | 164.5 | 249 | 45 | M16 |



## QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |    | Available B14 motor flanges |    |            | Output Shaft<br> | Ratios code |
|---|---------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|----|-----------------------------|----|------------|------------------|-------------|
|   |               |                                 |                                   |                        |                                   |                                    | -B                         | -C | -D | -E | -Q                          | -R | -T         |                  |             |
|   |               |                                 |                                   |                        |                                   |                                    | 63                         | 71 | 80 | 90 | 71                          | 80 | 90         |                  |             |
| 18.7  | <b>74.79</b>  | 1.5                             | 704                               | 1.0                    | 1.4                               | 675                                | B                          |    |    |    | C                           | C  |            | 19132418         | 01          |
| 16.3  | <b>85.99</b>  | 1.1                             | 591                               | 1.1                    | 1.3                               | 675                                | B                          |    |    |    | C                           | C  |            | 19132416         | 02          |
| 14.0  | <b>99.66</b>  | 1.1                             | 685                               | 1.0                    | 1.1                               | 675                                | B                          |    |    |    | C                           | C  |            | 17132416         | 03          |
| 12.0  | <b>116.35</b> | 0.75                            | 548                               | 1.2                    | 0.92                              | 675                                | B                          |    |    |    | C                           | C  |            | 17132414         | 04          |
| 11.5  | <b>121.45</b> | 0.75                            | 572                               | 1.2                    | 0.89                              | 675                                | B                          |    |    |    | C                           | C  |            | 13132418         | 05          |
| 10.0  | <b>139.64</b> | 0.75                            | 658                               | 1.0                    | 0.77                              | 675                                | B                          |    |    |    | C                           | C  |            | 13132416         | 06          |
| 9.2   | <b>152.21</b> | 0.75                            | 717                               | 0.9                    | 0.71                              | 675                                | B                          |    |    |    | C                           | C  |            | 19082416         | 07          |
| 8.6   | <b>163.02</b> | 0.55                            | 567                               | 1.2                    | 0.66                              | 675                                | B                          |    |    |    | C                           | C  |            | 13132414         | 08          |
| 7.9   | <b>177.69</b> | 0.55                            | 618                               | 1.1                    | 0.61                              | 675                                | B                          |    |    |    | C                           | C  |            | 19082414         | 09          |
| 6.8   | <b>205.95</b> | 0.55                            | 716                               | 0.9                    | 0.52                              | 675                                | B                          |    |    |    | C                           | C  |            | 17082414         | 10          |
| 6.3   | <b>222.52</b> | 0.55                            | 774                               | 0.9                    | 0.48                              | 675                                | B                          |    |    |    | C                           | C  | On request | 10132414         | 11          |
| 5.6   | <b>248.76</b> | 0.37                            | 578                               | 1.2                    | 0.43                              | 675                                | B                          |    |    |    | C                           | C  |            | 9132416          | 12          |
| 4.8   | <b>290.41</b> | 0.37                            | 675                               | 1.0                    | 0.37                              | 675                                | B                          |    |    |    | C                           | C  |            | 9132414          | 13          |
| 4.1   | <b>337.39</b> | 0.37                            | 784                               | 0.9                    | 0.32                              | 675                                | B                          |    |    |    | C                           | C  |            | 10082416         | 14          |
| 3.6   | <b>393.88</b> | 0.25                            | 618                               | 1.1                    | 0.27                              | 675                                | B                          |    |    |    | C                           | C  |            | 10082414         | 15          |
| 3.2   | <b>440.33</b> | 0.25                            | 690                               | 1.0                    | 0.24                              | 675                                | B                          |    |    |    | C                           | C  |            | 9082416          | 16          |
| 2.7   | <b>514.06</b> | 0.18                            | 616                               | 1.1                    | 0.21                              | 675                                | B                          |    |    |    | C                           | C  |            | 9082414          | 17          |
| 2.4   | <b>581.44</b> | 0.18                            | 697                               | 1.0                    | 0.18                              | 675                                | B                          |    |    |    | C                           | C  |            | 7082416          | 18          |
| 2.1   | <b>678.79</b> | 0.12                            | 526                               | 1.3                    | 0.16                              | 675                                | B                          |    |    |    | C                           | C  |            | 7082414          | 19          |

The dynamic efficiency is **0.92** 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 **114C** 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 **114C** 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 **114C** ist mit synthetischem Öl gefüllt und ist lebensdauer geschmiert. 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 **114C** 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 **114C** 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  |
| 4.10 LT             | 2.70 LT   | 2.70 LT | 2.70 LT | 5.30 LT               | 2.35 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

$F_{eq} = F_R \cdot \frac{171}{X+131}$

| $n_2$ | FA  | FR   | $n_2$ | FA   | FR   | $n_2$ | FA   | FR   |
|-------|-----|------|-------|------|------|-------|------|------|
| 300   | 640 | 3200 | 140   | 860  | 4300 | 70    | 1080 | 5400 |
| 250   | 700 | 3500 | 120   | 900  | 4500 | 40    | 1300 | 6500 |
| 200   | 740 | 3700 | 85    | 1000 | 5000 | 15    | 1840 | 9200 |

**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   | 310 | 1700 |

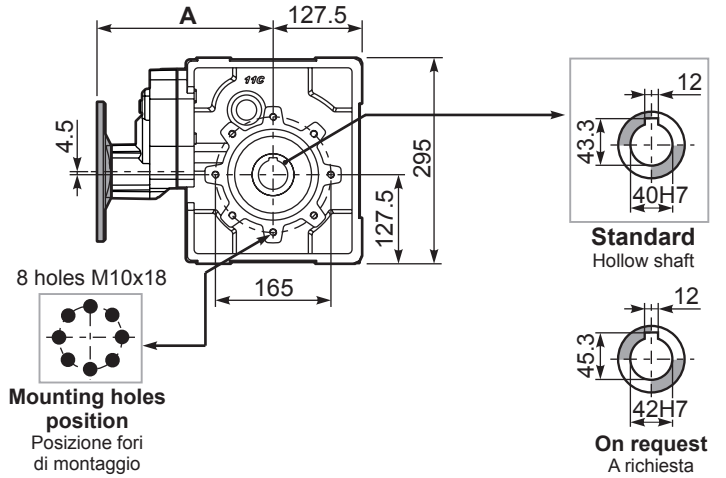
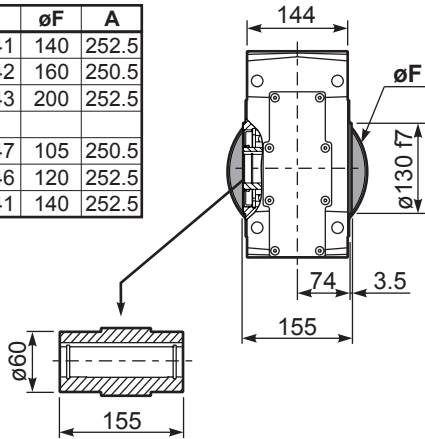
tab. 2



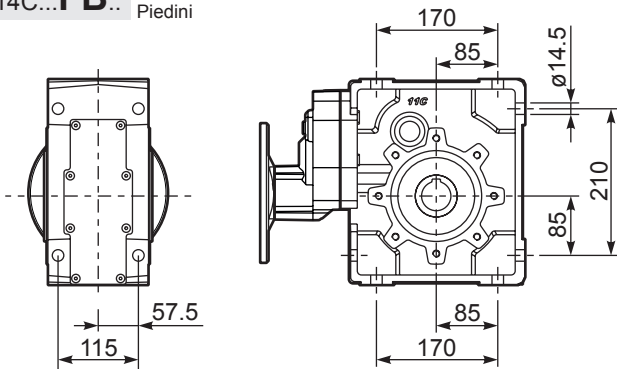
**P114CC...** Basic Gearbox  
Riduttore base

Gearbox weight  
peso riduttore **38.0 kg**

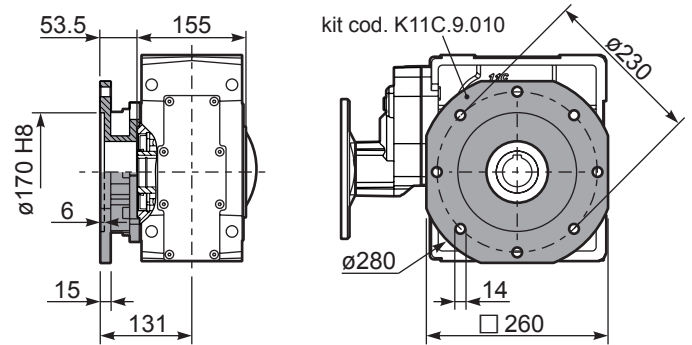
| M. flanges | Kit code   | øF  | A     |
|------------|------------|-----|-------|
| 63B5       | K063.4.041 | 140 | 252.5 |
| 71B5       | K063.4.042 | 160 | 250.5 |
| 80/90B5    | K063.4.043 | 200 | 252.5 |
| 71B14      | K063.4.047 | 105 | 250.5 |
| 80B14      | K063.4.046 | 120 | 252.5 |
| 90B14      | K063.4.041 | 140 | 252.5 |



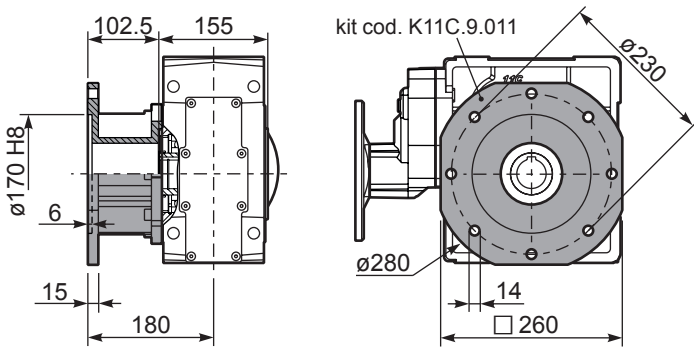
**P114C...FB..** Feet  
Piedini



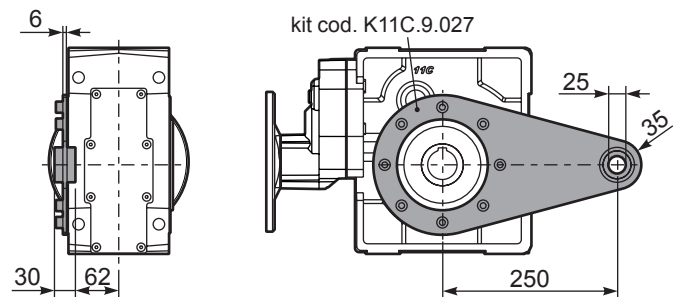
**P114C...-FC..** Output flange  
Flangia uscita



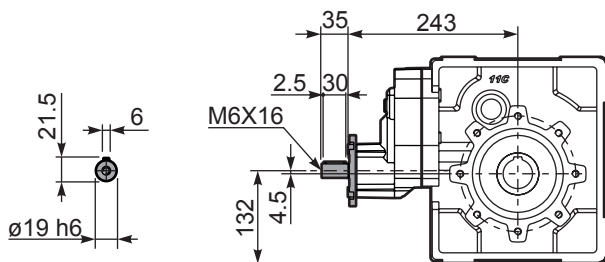
**P114C...-FL..** Output flange  
Flangia uscita



**P114C...BR..** Reaction Arm  
Braccio di reazione

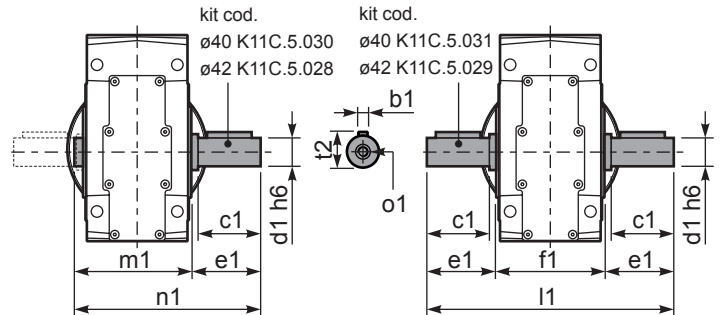


**R114C...** Input shaft  
Albero in entrata

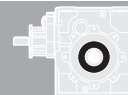


**P114CA...** Single shaft  
Albero lento semplice

**P114CB...** Double shaft  
Albero lento bisp.



|                | b1 | c1 | d1 | e1   | f1  | l1  | m1    | n1  | t2 | o1  |
|----------------|----|----|----|------|-----|-----|-------|-----|----|-----|
| ø40 Standard   | 12 | 80 | 40 | 84.5 | 155 | 324 | 164.5 | 249 | 43 | M12 |
| ø42 On request | 12 | 80 | 42 | 84.5 | 155 | 324 | 164.5 | 249 | 45 | M16 |



| ■ QUICK SELECTION / Selezione veloce                   |               |  |  |                        |  |   | input speed (n <sub>1</sub> ) = 1400 min <sup>-1</sup> |    |    |            |     |                             |    |            |     |                               |                 |
|--|---------------|--|--|------------------------|--|---|--|----|----|------------|-----|-----------------------------|----|------------|-----|-------------------------------|-----------------|
| Output Speed<br>n <sub>2</sub><br>[min <sup>-1</sup> ] | Ratio<br>i    | Motor power<br>P <sub>1M</sub><br>[kW] | Output torque<br>M <sub>2M</sub><br>[Nm] | Service factor<br>f.s. | Nominal power<br>P <sub>1R</sub><br>[kW] | Nominal torque<br>M <sub>2R</sub><br>[Nm] | Available B5 motor flanges                             |    |    |            |     | Available B14 motor flanges |    |            |     | Output Shaft<br>$\varnothing$ | Ratios code<br> |
|  |               |  |  |                        |  |   | -C   | -D | -E | -F         | -G  | -R                          | -T | -U         | -V  |                               |                 |
|  |               |  |  |                        |  |   | 71   | 80 | 90 | 100<br>112 | 132 | 80                          | 90 | 100<br>112 | 132 |                               |                 |
| 145  | <b>9.69</b>   | 9                                      | 560                                      | 1.3                    | <b>12.2</b>                              | <b>755</b>                                | B  |    |    |            |     |                             |    |            |     | 302418                        | 01              |
| 126  | <b>11.09</b>  | 9                                      | 641                                      | 1.1                    | <b>9.6</b>                               | <b>680</b>                                | B  |    |    |            |     |                             |    |            |     | 302416                        | 02              |
| 108  | <b>12.90</b>  | 9                                      | 746                                      | 1.1                    | <b>9.6</b>                               | <b>790</b>                                | B  |    |    |            |     |                             |    |            |     | 302414                        | 03              |
| 77   | <b>18.26</b>  | 7.5                                    | 849                                      | 1.1                    | <b>8.0</b>                               | <b>935</b>                                | B  |    |    |            |     |                             |    |            |     | 202418                        | 04              |
| 67   | <b>20.91</b>  | 7.5                                    | 972                                      | 1.0                    | <b>7.5</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 202416                        | 05              |
| 58   | <b>24.32</b>  | 5.5                                    | 835                                      | 1.2                    | <b>6.4</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 202414                        | 06              |
| 49.5   | <b>28.27</b>  | 5.5                                    | 971                                      | 1.0                    | <b>5.5</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 162416                        | 07              |
| 42.6   | <b>32.88</b>  | 4                                      | 826                                      | 1.2                    | <b>4.7</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 162414                        | 08              |
| 38.1   | <b>36.76</b>  | 4                                      | 924                                      | 1.1                    | <b>4.2</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 132416                        | 09              |
| 32.7   | <b>42.76</b>  | 3                                      | 809                                      | 1.2                    | <b>3.6</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 132414                        | 10              |
| 31.1   | <b>45.00</b>  | 3                                      | 851                                      | 1.2                    | <b>3.5</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 112416                        | 11              |
| 26.8   | <b>52.33</b>  | 3                                      | 990                                      | 1.0                    | <b>3.0</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 112414                        | 12              |
| 24.6   | <b>56.82</b>  | 2.2                                    | 791                                      | 1.1                    | <b>2.3</b>                               | <b>850</b>                                | B  |    |    |            |     |                             |    |            |     | 82418                         | 13              |
| 21.5   | <b>65.07</b>  | 2.2                                    | 906                                      | 1.1                    | <b>2.3</b>                               | <b>975</b>                                | B  |    |    |            |     |                             |    |            |     | 82416                         | 14              |
| 18.5   | <b>75.68</b>  | 2.2                                    | 1054                                     | 0.9                    | <b>2.1</b>                               | <b>1000</b>                               | B  |    |    |            |     |                             |    |            |     | 82414                         | 15              |
| 15.6   | <b>89.61</b>  | 1.1                                    | 628                                      | 1.1                    | <b>1.2</b>                               | <b>710</b>                                | B  |    |    |            |     |                             |    |            |     | 62416                         | 16              |
| 13.4   | <b>104.22</b> | 1.1                                    | 731                                      | 1.1                    | <b>1.2</b>                               | <b>820</b>                                | B  |    |    |            |     |                             |    |            |     | 62414                         | 17              |

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 133C 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 133C 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 133C 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 133C 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 133C 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 | 4.30 LT | 4.30 LT | 3.30 LT | 7.40 LT | 3.10 LT | Ask |

**AGIP Blasias 460**

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

$F_{eq} = FR \cdot \frac{184.5}{X+144.5}$

| n <sub>2</sub> | FA  | FR   | n <sub>2</sub> | FA   | FR   | n <sub>2</sub> | FA   | FR    |
|----------------|-----|------|----------------|------|------|----------------|------|-------|
| 300            | 800 | 4000 | 140            | 1120 | 5600 | 70             | 1400 | 7000  |
| 250            | 900 | 4500 | 120            | 1200 | 6000 | 40             | 1700 | 8500  |
| 200            | 960 | 4800 | 85             | 1300 | 6500 | 15             | 2400 | 12000 |

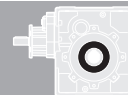
**On request reinforced bearings to increase loads.**  
A richiesta cuscinetti rinforzati per aumentare i carichi.

**Input shaft**  
Albero in entrata

| n <sub>1</sub> | FA  | FR   |
|----------------|-----|------|
| 1400           | 450 | 2250 |
| 900            | 500 | 2500 |
| 500            | 600 | 3000 |

tab. 2





### QUICK SELECTION / Selezione veloce

input speed ( $n_1$ ) = 1400 min<sup>-1</sup>

| Output Speed<br>$n_2$<br>[min <sup>-1</sup> ] | Ratio<br>$i$  | Motor power<br>$P_{1M}$<br>[kW] | Output torque<br>$M_{2M}$<br>[Nm] | Service factor<br>f.s. | Nominal power<br>$P_{1R}$<br>[kW] | Nominal torque<br>$M_{2R}$<br>[Nm] | Available B5 motor flanges |    |    |    | Available B14 motor flanges |    |    | Output Shaft<br> | Ratios code |
|---|---------------|---------------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------------------|----------------------------|----|----|----|-----------------------------|----|----|------------------|-------------|
|   |               |                                 |                                   |                        |                                   |                                    | -B                         | -C | -D | -E | -Q                          | -R | -T |                  |             |
|   |               |                                 |                                   |                        |                                   |                                    | 63                         | 71 | 80 | 90 | 71                          | 80 | 90 |                  |             |
| 15.3  | <b>91.23</b>  | 1.5                             | 858                               | 1.2                    | 1.7                               | 1000                               | B                          |    |    |    | C                           | C  |    | 19132418         | 01          |
| 13.4  | <b>104.48</b> | 1.5                             | 983                               | 1.0                    | 1.5                               | 1000                               | B                          |    |    |    | C                           | C  |    | 19132416         | 02          |
| 11.6  | <b>121.10</b> | 1.5                             | 1139                              | 0.9                    | 1.3                               | 1000                               | B                          |    |    |    | C                           | C  |    | 17132416         | 03          |
| 9.9   | <b>140.84</b> | 1.1                             | 968                               | 1.0                    | 1.1                               | 1000                               | B                          |    |    |    | C                           | C  |    | 17132414         | 04          |
| 8.5   | <b>165.32</b> | 1.1                             | 1136                              | 0.9                    | 0.96                              | 1000                               | B                          |    |    |    | C                           | C  |    | 15132414         | 05          |
| 7.6   | <b>184.94</b> | 0.75                            | 872                               | 1.1                    | 0.86                              | 1000                               | B                          |    |    |    | C                           | C  |    | 19082416         | 06          |
| 7.1   | <b>197.34</b> | 0.75                            | 930                               | 1.1                    | 0.81                              | 1000                               | B                          |    |    |    | C                           | C  |    | 13132414         | 07          |
| 6.5   | <b>215.10</b> | 0.75                            | 1014                              | 1.0                    | 0.74                              | 1000                               | B                          |    |    |    | C                           | C  |    | 19082414         | 08          |
| 6.0   | <b>231.60</b> | 0.55                            | 805                               | 1.2                    | 0.69                              | 1000                               | B                          |    |    |    | C                           | C  |    | 10132416         | 09          |
| 5.6   | <b>249.31</b> | 0.55                            | 867                               | 1.2                    | 0.64                              | 1000                               | B                          |    |    |    | C                           | C  |    | 17082414         | 10          |
| 5.2   | <b>269.37</b> | 0.55                            | 937                               | 1.1                    | 0.59                              | 1000                               | B                          |    |    |    | C                           | C  |    | 10132414         | 11          |
| 4.8   | <b>292.64</b> | 0.55                            | 1018                              | 1.0                    | 0.54                              | 1000                               | B                          |    |    |    | C                           | C  |    | 15082414         | 12          |
| 4.6   | <b>302.26</b> | 0.55                            | 1051                              | 1.0                    | 0.53                              | 1000                               | B                          |    |    |    | C                           | C  |    | 9132416          | 13          |
| 4.0   | <b>349.30</b> | 0.37                            | 812                               | 1.2                    | 0.46                              | 1000                               | B                          |    |    |    | C                           | C  |    | 13082414         | 14          |
| 3.5   | <b>399.12</b> | 0.37                            | 928                               | 1.1                    | 0.40                              | 1000                               | B                          |    |    |    | C                           | C  |    | 7132416          | 15          |
| 2.9   | <b>476.80</b> | 0.37                            | 1108                              | 0.9                    | 0.33                              | 1000                               | B                          |    |    |    | C                           | C  |    | 10082414         | 16          |
| 2.2   | <b>622.28</b> | 0.25                            | 976                               | 1.0                    | 0.26                              | 1000                               | B                          |    |    |    | C                           | C  |    | 9082414          | 17          |
| 1.7   | <b>821.70</b> | 0.18                            | 985                               | 1.0                    | 0.19                              | 1000                               | B                          |    |    |    | C                           | C  |    | 7082414          | 18          |

The dynamic efficiency is 0.92 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 134C 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 134C 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 134C 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 134C 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 134C 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  |
|---------|---------|---------|---------|---------|---------|-----|
| 6.10 LT | 4.40 LT | 4.40 LT | 3.40 LT | 7.50 LT | 3.20 LT | Ask |

**AGIP Blasias 460**

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

$F_{eq} = FR \cdot \frac{184.5}{X+144.5}$

| $n_2$ | FA  | FR   | $n_2$ | FA   | FR   | $n_2$ | FA   | FR    |
|-------|-----|------|-------|------|------|-------|------|-------|
| 300   | 800 | 4000 | 140   | 1120 | 5600 | 70    | 1400 | 7000  |
| 250   | 900 | 4500 | 120   | 1200 | 6000 | 40    | 1700 | 8500  |
| 200   | 960 | 4800 | 85    | 1300 | 6500 | 15    | 2400 | 12000 |

**On request reinforced bearings to increase loads.**  
A richiesta cuscinetti rinforzati per aumentare i carichi.

**Input shaft**  
Albero in entrata

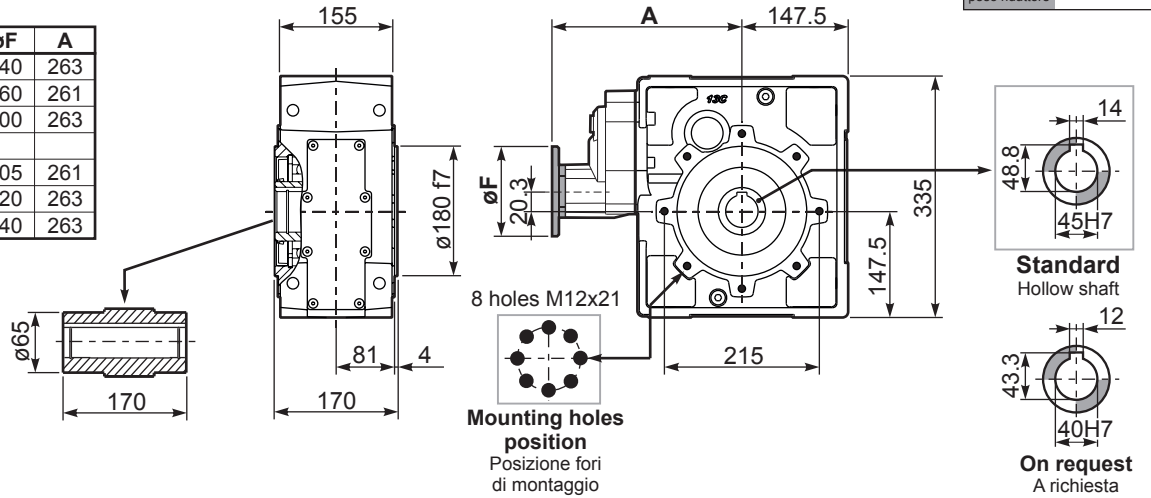
| $n_1$ | FA  | FR   |
|-------|-----|------|
| 1400  | 400 | 2000 |
| 900   | 440 | 2200 |
| 500   | 440 | 2200 |

**tab. 2**

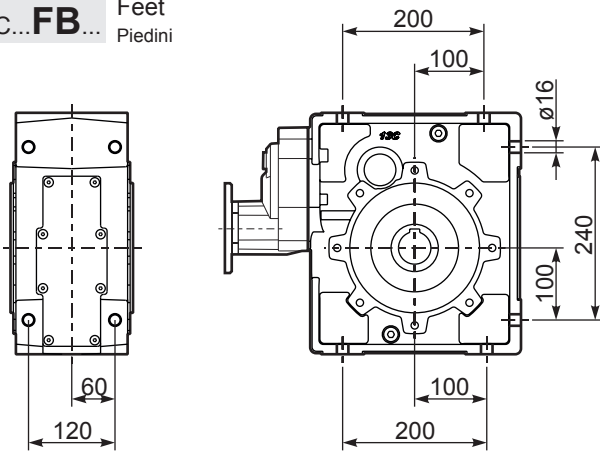
**P134CC...** Basic gearbox  
Riduttore base

Gearbox weight  
peso riduttore **53.5 kg**

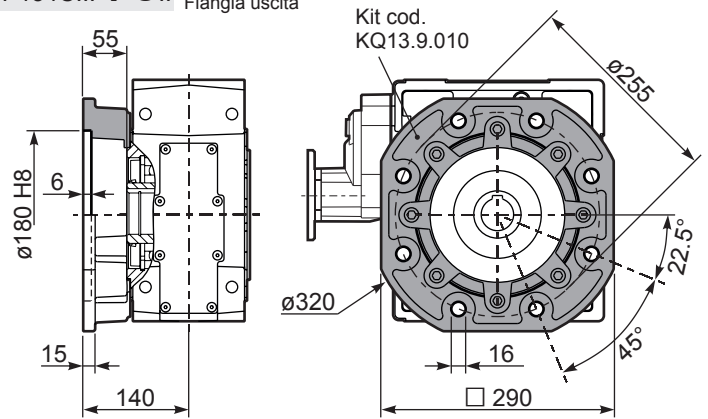
| M. flanges     | Kit code   | øF  | A   |
|----------------|------------|-----|-----|
| <b>63B5</b>    | K063.4.041 | 140 | 263 |
| <b>71B5</b>    | K063.4.042 | 160 | 261 |
| <b>80/90B5</b> | K063.4.043 | 200 | 263 |
| <b>71B14</b>   | K063.4.047 | 105 | 261 |
| <b>80B14</b>   | K063.4.046 | 120 | 263 |
| <b>90B14</b>   | K063.4.041 | 140 | 263 |



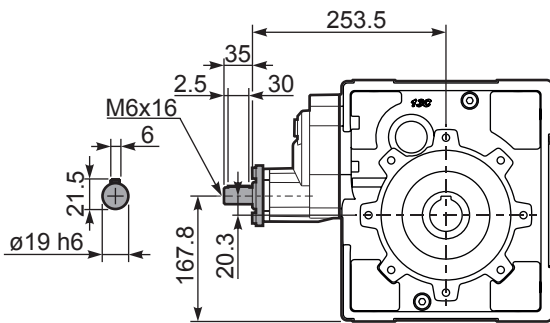
**P134C...FB...** Feet  
Piedini



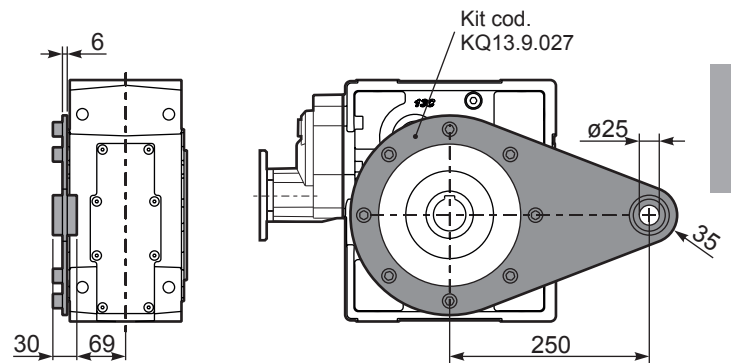
**P134C...-FC..** Output flange  
Flangia uscita



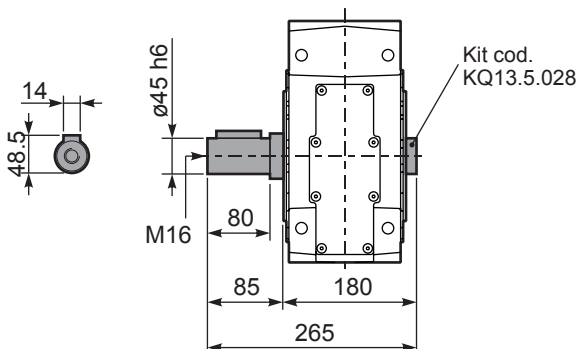
**R134C...** Input Shaft  
Albero in entrata



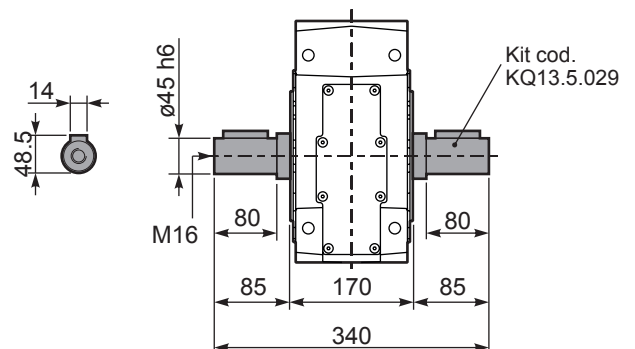
**P134C...BR..** Reaction arm  
Braccio di reazione

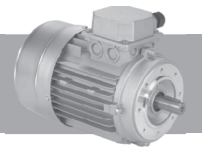


**P134CA..** Single output Shaft  
Albero lento semplice



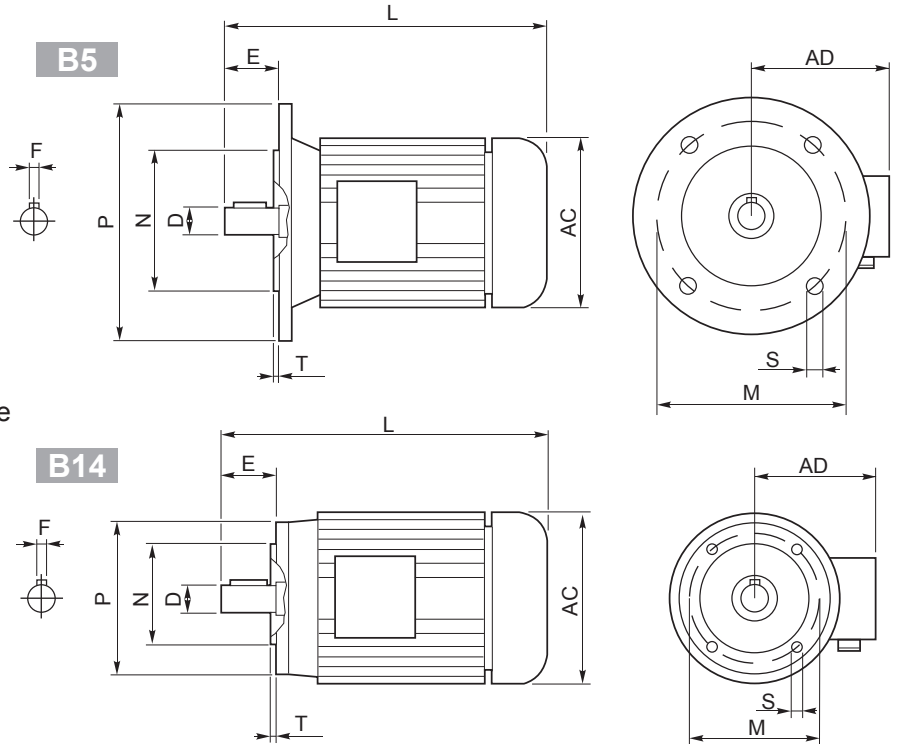
**P134CB..** Double Input Shaft  
Albero lento bisporgente





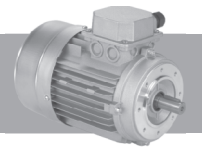
- 1) 230/400V - 50Hz three-phase asynchronous induction motor
- 2) Class F insulation
- 3) S1 duty
- 4) IP 55 protection
- 5) Not painted
- 6) Hard plastic sleeve to protect output shaft during the transportation

- 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



Outside dimensions and weight may be different according to manufacturers.  
 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 <sub>(400V)</sub> | kW             | Nm   | A <sub>(400V)</sub> | kW             | Nm   | A <sub>(400V)</sub> | 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                | —              | —    | —                   | 9      | 3  | 20  | 199 | 108 | 96  | 80  | 100 | 120 | 7    | 2.5 | 50  | 65  | 80  | M5  | 2.5 | 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                | 11     | 4  | 23  | 208 | 120 | 99  | 95  | 115 | 140 | 9.5  | 3   | 60  | 75  | 90  | M5  | 2.5 | 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                | 14     | 5  | 30  | 255 | 141 | 107 | 110 | 130 | 160 | 9.5  | 3.5 | 70  | 85  | 105 | M6  | 2.5 | 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                | 19     | 6  | 40  | 296 | 159 | 127 | 130 | 165 | 200 | 11.5 | 3.5 | 80  | 100 | 120 | M6  | 3   | 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                | 24     | 8  | 50  | 330 | 170 | 135 | 130 | 165 | 200 | 11.5 | 3.5 | 95  | 115 | 140 | M8  | 3   | 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                | —              | —    | —                   | 28     | 8  | 60  | -   | 190 | 148 | 180 | 215 | 250 | 13   | 4   | 110 | 130 | 160 | M8  | 3.5 | 22   |
| 112 M  | 4.0            | 13.4 | 8.10                | 4.0            | 26.7 | 8.55                | 2.2            | 22.6 | 5.30                | 28     | 8  | 60  | 381 | 210 | 164 | 180 | 215 | 250 | 13   | 4   | 110 | 130 | 160 | M8  | 3.5 | 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   |
| 132 S  | 7.5            | 24.9 | 15.3                | 7.5            | 49.4 | 15.0                | 4.0            | 40.0 | 9.13                | 38     | 10 | 80  | 455 | 244 | 180 | 230 | 265 | 300 | 14   | 4   | 130 | 165 | 200 | M10 | 4   | 51   |
| 132 M  | —              | —    | —                   | 7.5            | 49.4 | 15.0                | —              | —    | —                   | 38     | 10 | 80  | 500 | 244 | 180 | 230 | 265 | 300 | 14   | 4   | 130 | 165 | 200 | M10 | 4   | 51   |
| 132 M  | —              | —    | —                   | 9              | 61.4 | 18.5                | —              | —    | —                   | 38     | 10 | 80  | 500 | 244 | 180 | 230 | 265 | 300 | 14   | 4   | 130 | 165 | 200 | M10 | 4   | 51   |
| 160 M  | —              | —    | —                   | 11             | 72   | 21.5                | —              | —    | —                   | 42     | 12 | 110 | 613 | 335 | 246 | 250 | 300 | 350 | 18   | 5   | —   | —   | —   | —   | —   | 79.2 |
| 160 L  | —              | —    | —                   | 15             | 98   | 29                  | —              | —    | —                   | 42     | 12 | 110 | 657 | 335 | 246 | 250 | 300 | 350 | 18   | 5   | —   | —   | —   | —   | —   | 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                  | —              | —    | —                   | 48     | 14 | 110 | 712 | 366 | 266 | 250 | 300 | 350 | 19   | 5   | —   | —   | —   | —   | —   | 170  |
| 200 L  | —              | —    | —                   | 30             | 196  | 53                  | —              | —    | —                   | 55     | 16 | 110 | 780 | 405 | 341 | 300 | 350 | 400 | 19   | 5   | —   | —   | —   | —   | —   | 240  |
| 225 S  | —              | —    | —                   | 37             | 240  | 69                  | —              | —    | —                   | 60     | 18 | 140 | 888 | 463 | 360 | 350 | 400 | 450 | 19   | 5   | —   | —   | —   | —   | —   | 305  |
| 225 M  | —              | —    | —                   | 45             | 292  | 84                  | —              | —    | —                   | 60     | 18 | 140 | 888 | 463 | 360 | 350 | 400 | 450 | 19   | 5   | —   | —   | —   | —   | —   | 310  |



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

**Isolamento**

CI.F Standard  
Specificare in sede di ordinazione classe di isolamento diversa.

**Isolierung**

CI.F Standard.  
Davon abweichende Isolierungsklasse im Auftrag angeben.

**Isolement**

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

**Aislamiento**

CI.F standard.  
Especificar al efectuar el pedido la clase diferente de aislamiento.

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

**Connections**

**Collegamenti**

**Verbindungselemente**

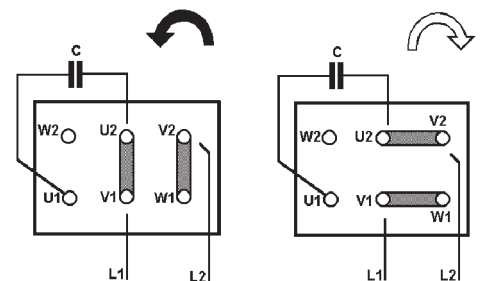
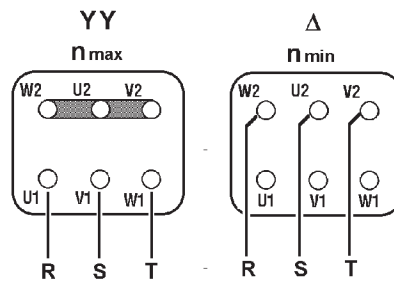
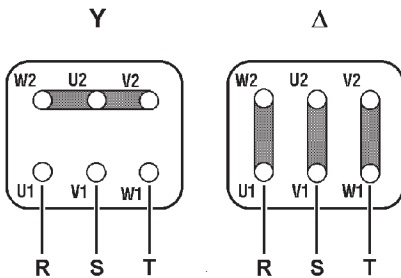
**Branchements**

**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









### 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.

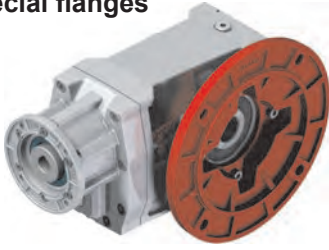
La garanzia decade nel caso in cui siano state eseguite riparazioni o apportate modifiche senza nostro consenso scritto.

**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

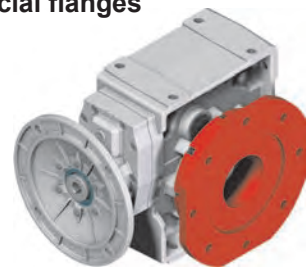
Special flanges



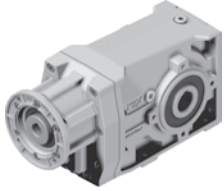
Stainless steel output shafts



Special flanges



|            |      |
|------------|------|
| Color      | RAL  |
| light grey | 7035 |

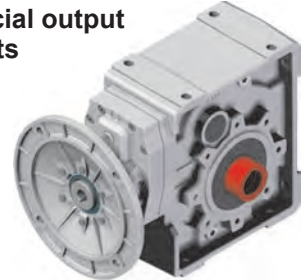


Special paint - Anticorrosive paint

Special output shafts



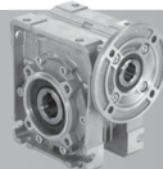
Special output shafts



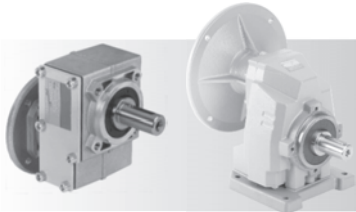
## Others HYDRO-MEC products



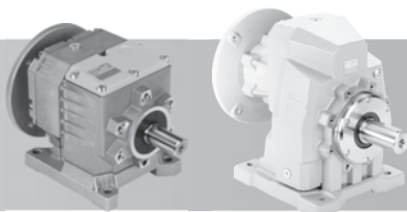
Worm gearboxes  
Rid. a vite senza fine



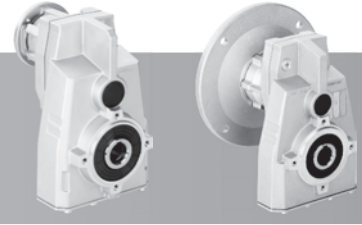
Square worm gearboxes  
Rid. a vite senza fine quadro



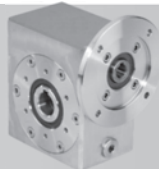
One step gearboxes  
Riduttori ad uno stadio



Coaxial gearboxes  
Riduttori coassiali



Shaft mounted gearboxes  
Riduttori pendolari



Stainless steel worm gearboxes  
Rid. a vite senza fine Inox

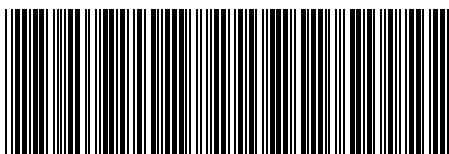


Stainless steel one step gearbox  
Riduttore uno stadio Inox

## 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](mailto:hydromec@hydromec.com)  
Website: [www.hydromec.com](http://www.hydromec.com)



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