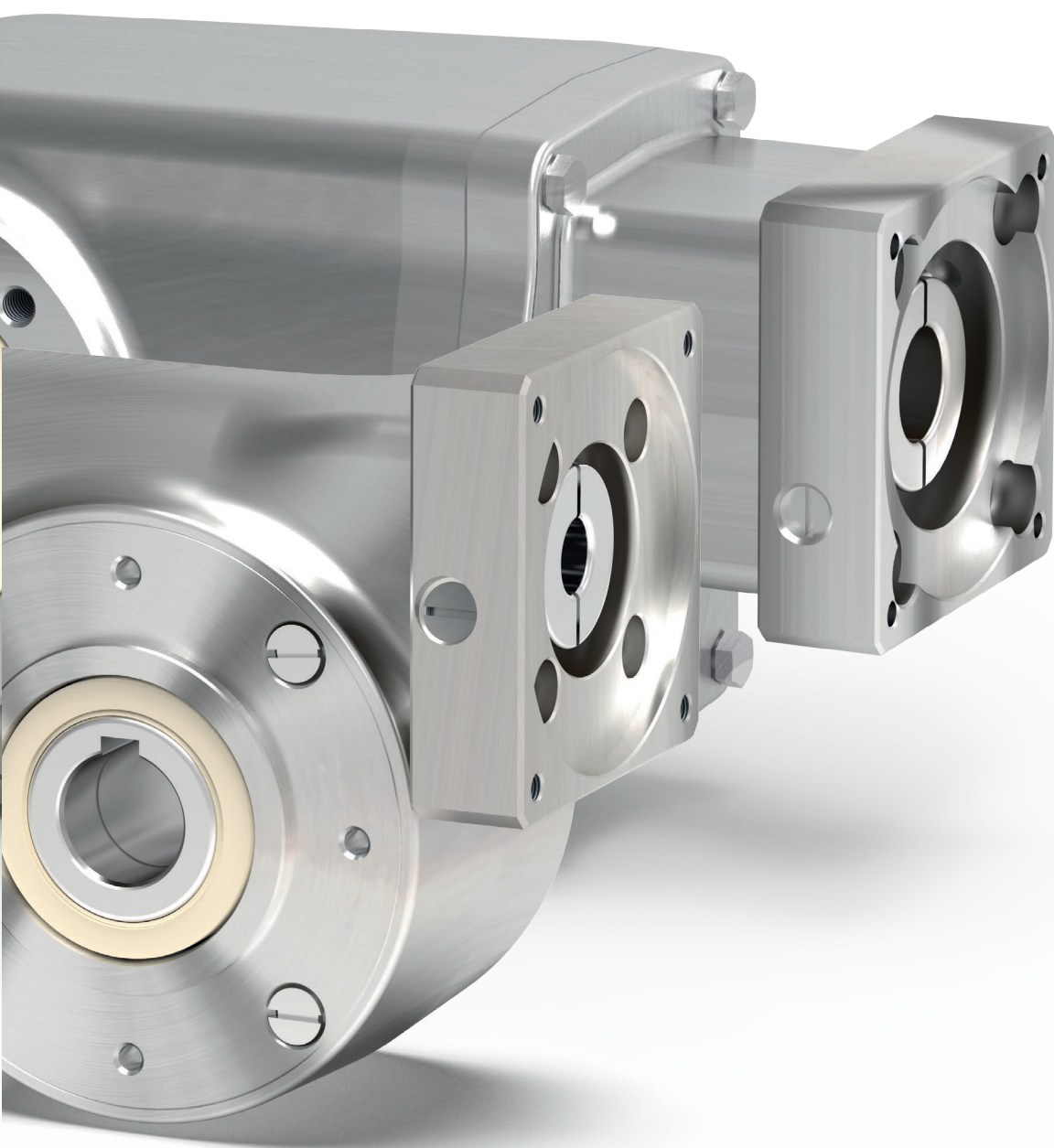


# WASHDOWN MOTORS AND DRIVES

**Brushless-Tech** Gearboxes for servomotor



**Certification**  
*Certificazione*

IP66

CE

NSF

COMPONENT

**On request**  
*A richiesta*

IP69k

***abaroadrive***

## UNIQUE FEATURES

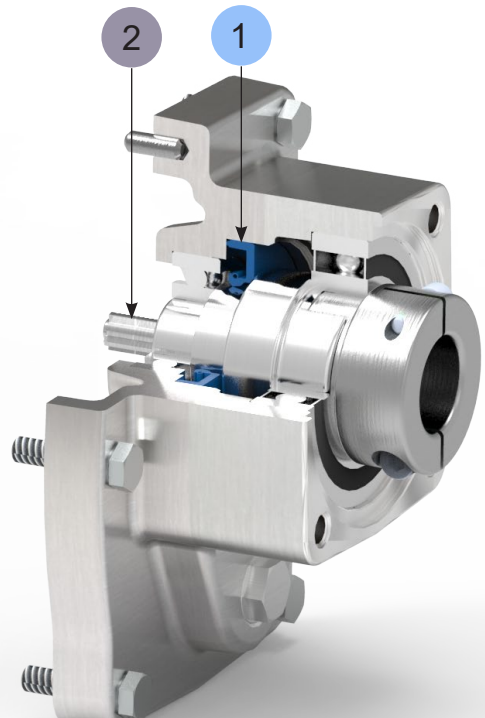
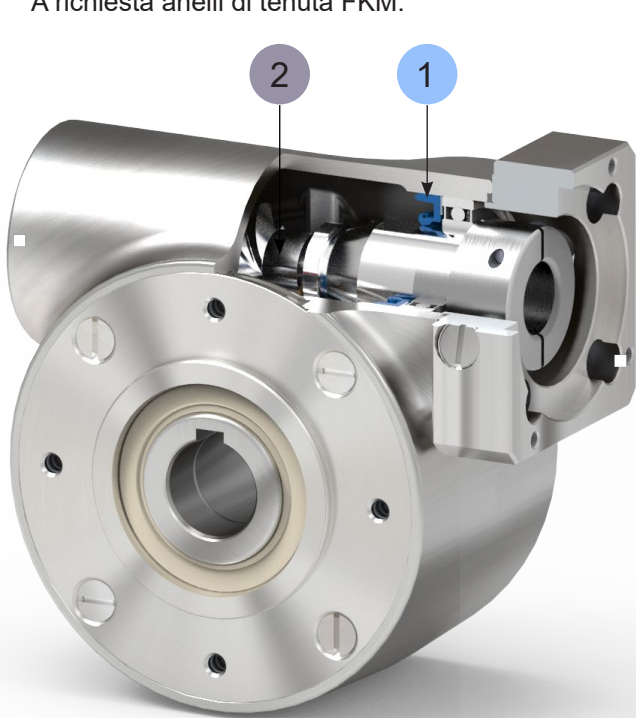
### Special input shaft design with internal seal for Brushless applications.

Design speciale dell'albero di entrata con guarnizione interna per applicazioni Brushless.

**1 Quality oil seals.**  
Anelli di tenuta di qualità.

**2 All grounded gears.**  
Tutti gli ingranaggi rettificati.

**On request FKM oil seals.**  
A richiesta anelli di tenuta FKM.



**All couplings on stock.**  
Giunti disponibili a magazzino.



**Flanges available for quantity.**  
**Drawings available to download on the web site for a quick production of small quantity.**  
Flange disponibili per quantità.  
Disegni scaricabili dal sito web per una rapida produzione di piccole quantità.

# BRUSHLESS FLANGES FOR



## Aluminum worm gearboxes

Riduttore a vite senza fine in alluminio

Page 1



## Full stainless steel worm gearboxes

Riduttore a vite senza fine completamente in acciaio inox

Page 2



## Full stainless steel helical bevel gearboxes

Riduttore a coppia conica completamente in acciaio inox

Page 3



## Full stainless steel worm gearboxes

Riduttore a vite senza fine completamente in acciaio inox

Page 4



## Available kite , reduction bushing, coupling, flanges.

Kit disponibili, bussola di riduzione, giunto, flange.

Page 6



## Important notes

Important notes of the selection and lubrication  
Note importanti sulla selezione e sulla lubrificazione

Page 7, 8



## Instructions

Assembly motor instructions  
Istruzioni per il montaggio del motore

Page 9, 10

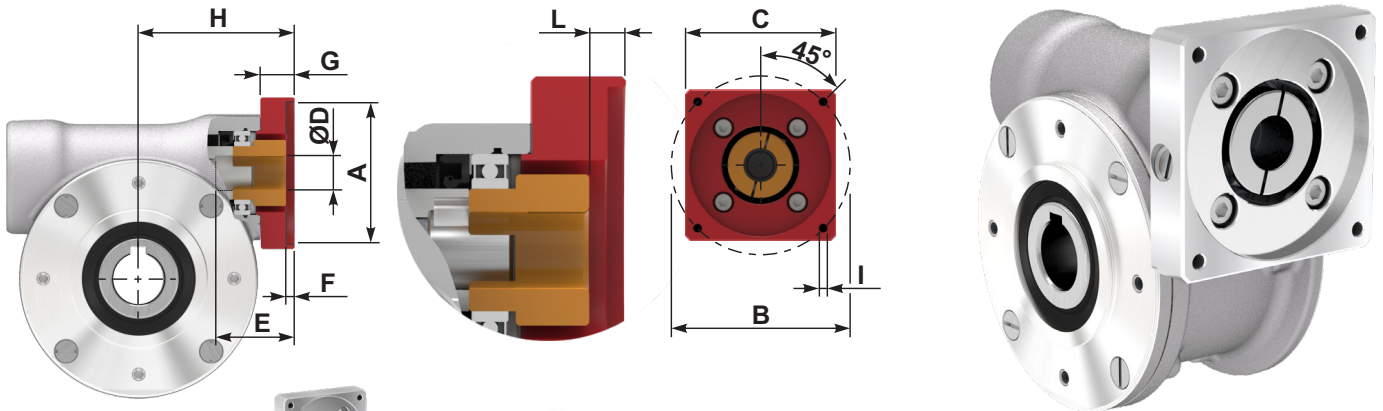
# VFD series

**D30**  
**D45**  
**D50**  
**D63**  
**D85**

## Brushless-Tech

### Aluminum worm gearboxes

Riduttori a vite senza fine in alluminio



Catalog Flange Code

Input flanges Kit Code

Bushing Kit Code

Coupling Kit Code

Motor shaft Ø

						A	B	C	ØD	E	F	G	L	I	H
<b>D30</b> 21Nm	<b>BA</b>	K0304071	KBR09/14G	K0305190L	Ø9	40	63	58	Ø14	30	4	20	4.7	M5x12	68
	<b>BC</b>	K0304072	KBR11/14G	K0305190L	Ø11	60	75	70	Ø14	30	4.5	20	4.7	M5x12	68
	<b>BB</b>	K0304073	-	K0305190L	Ø14	50	70	60	Ø14	32	4.5	28.5	13.2	M5x12	76.5
<b>D45</b> 41Nm	<b>BC</b>	KD504072	KBR11/14G	KC355190L	Ø11	60	75	70	Ø14	44	4.5	23	9	M5x12	79
	<b>BB</b>	KD504073	-	KC355190L	Ø14	50	70	70	Ø14	44	4.5	23	9	M5x12	79
	<b>BE</b>	KD504074	-	KC355190L	Ø14	80	100	85	Ø14	44	4.5	23	9	M6x12	79
	<b>BF</b>	KD504075	-	KC355190L	Ø14	95	115	100	Ø14	44	4.5	23	9	M8x12	79
<b>D50</b> 72Nm	<b>BD</b>	KD504078	-	KC355190L	Ø14	70	90	80	Ø14	44	4.5	23	9	M6x12	79
	<b>BC</b>	KD504072	KBR11/19G	K0505190L	Ø11	60	75	70	Ø19	48	4.5	23	9	M5x12	83.5
	<b>BC</b>	KD504072	KBR14/19G	K0505190L	Ø14	60	75	70	Ø19	48	4.5	23	9	M5x12	83.5
	<b>BB</b>	KD504073	KBR14/19G	K0505190L	Ø14	50	70	70	Ø19	48	4.5	23	9	M5x12	83.5
	<b>BE</b>	KD504074	KBR14/19G	K0505190L	Ø14	80	100	85	Ø19	48	4.5	23	9	M6x12	83.5
	<b>BF</b>	KD504075	-	K0505190L	Ø19	95	115	100	Ø19	48	4.5	23	9	M8x12	83.5
<b>D63</b> 147Nm	<b>BD</b>	KD504078	-	K0505190L	Ø19	70	90	80	Ø19	48	4.5	23	9	M6x12	83.5
	<b>BC</b>	KD634072	KBR14/22G	KC405190L	Ø14	60	75	90	Ø22	58	4.5	25	9	M5x12	104.5
	<b>BB</b>	KD634073	KBR14/22G	KC405190L	Ø14	50	70	80	Ø22	58	4.5	25	9	M5x12	104.5
	<b>BE</b>	KD634074	KBR14/22G	KC405190L	Ø14	80	100	85	Ø22	58	4.5	25	9	M6x12	104.5
	<b>BF</b>	KD634075	KBR19/22G	KC405190L	Ø19	95	115	100	Ø22	58	4.5	25	9	M8x12	104.5
	<b>BG</b>	KD634076	-	KC405190L	Ø22	110	145	130	Ø22	63	8	30	14	M8x14	109.5
<b>D85</b> 347Nm	<b>BD</b>	KD634078	KBR19/22G	KC405190L	Ø19	70	90	90	Ø22	58	4.5	25	9	M6x12	104.5
	<b>BF</b>	KD854075	KBR19/24G	KC505190L	Ø19	95	115	100	Ø24	60	4.5	26	9.5	M8x14	124.5
	<b>BG</b>	KD854076	KBR22/24G	KC505190L	Ø22	110	145	130	Ø24	64	8	30	13.5	M8x14	128.5
	<b>BH</b>	KD854077	-	KC505190L	Ø24	130	165	140	Ø24	60	5	26	9.5	M8x14	124.5
	<b>BD</b>	KD854078	KBR19/24G	KC505190L	Ø19	70	90	95	Ø24	60	4.5	26	9.5	M6x14	124.5



Fixing holes shifted by 35° Fori fissaggio motore ruotati a 35°



Fixing holes shifted by 30° Fori fissaggio motore ruotati a 30°



Fixing holes shifted by 25° Fori fissaggio motore ruotati a 25°

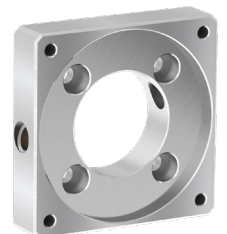
**Reduction bushing**  
Bussola di riduzione



**Coupling**  
Giunto



**Flange for servomotor**  
Flange per servomotori



**Available kits**  
Kit disponibili

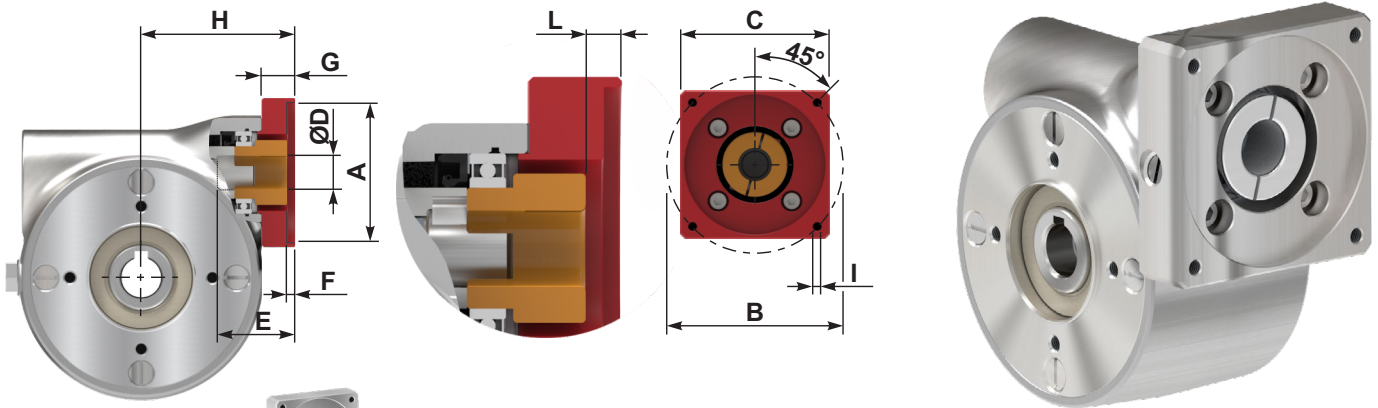
# Brushless-Tech

## Full stainless steel worm gearboxes

Riduttori a vite senza fine completamente in acciaio inox

N30  
N45  
N50  
N63  
N85

VFN  
series



	Catalog Flange Code	Input flanges Kit Code	Bushing Kit Code	Coupling Kit Code	Motor shaft Ø	Dimensions (mm)									
						A	B	C	ØD	E	F	G	L	I	H
<b>N30</b> 21Nm	BC	KI304072	KBR11/14G	K0305190L	Ø11	60	75	70	Ø14	30	4.5	20	4.7	M5x12	68
	BB	KI304073	-	K0305190L	Ø14	50	70	60	Ø14	32	4.5	28.5	13.2	M5x12	76.5
<b>N45</b> 41Nm	BC	KI504072	KBR11/14G	KC355190L	Ø11	60	75	70	Ø14	44	4.5	23	9	M5x12	79
	BB	KI504073	-	KC355190L	Ø14	50	70	70	Ø14	44	4.5	23	9	M5x12	79
	BE	KI504074	-	KC355190L	Ø14	80	100	85	Ø14	44	4.5	23	9	M6x12	79
	BF	KI504075	-	KC355190L	Ø14	95	115	100	Ø14	44	4.5	23	9	M8x12	79
<b>N50</b> 72Nm	BD	KI504078	-	KC355190L	Ø14	70	90	80	Ø14	44	4.5	23	9	M6x12	79
	BC	KI504072	KBR11/19G	K0505190L	Ø11	60	75	70	Ø19	48	4.5	23	9	M5x12	83.5
	BC	KI504072	KBR14/19G	K0505190L	Ø14	60	75	70	Ø19	48	4.5	23	9	M5x12	83.5
	BB	KI504073	KBR14/19G	K0505190L	Ø14	50	70	70	Ø19	48	4.5	23	9	M5x12	83.5
	BE	KI504074	KBR14/19G	K0505190L	Ø14	80	100	85	Ø19	48	4.5	23	9	M6x12	83.5
<b>N63</b> 147Nm	BF	KI504075	-	K0505190L	Ø19	95	115	100	Ø19	48	4.5	23	9	M8x12	83.5
	BD	KI504078	-	K0505190L	Ø19	70	90	80	Ø19	48	4.5	23	9	M6x12	83.5
	BC	KI634072	KBR14/22G	KC405190L	Ø14	60	75	90	Ø22	58	4.5	25	9	M5x12	104.5
	BB	KI634073	KBR14/22G	KC405190L	Ø14	50	70	80	Ø22	58	4.5	25	9	M5x12	104.5
	BE	KI634074	KBR14/22G	KC405190L	Ø14	80	100	85	Ø22	58	4.5	25	9	M6x12	104.5
	BF	KI634075	KBR19/22G	KC405190L	Ø19	95	115	100	Ø22	58	4.5	25	9	M8x12	104.5
<b>N85</b> 347Nm	BG	KI634076	-	KC405190L	Ø22	110	145	130	Ø22	63	8	30	14	M8x14	109.5
	BD	KI634078	KBR19/22G	KC405190L	Ø19	70	90	90	Ø22	58	4.5	25	9	M6x12	104.5
	BF	KI854075	KBR19/24G	KC505190L	Ø19	95	115	100	Ø24	60	4.5	26	9.5	M8x14	124.5
	BG	KI854076	KBR22/24G	KC505190L	Ø22	110	145	130	Ø24	64	8	30	13.5	M8x14	128.5
	BH	KI854077	-	KC505190L	Ø24	130	165	140	Ø24	60	5	26	9.5	M8x14	124.5
	BD	KI854078	KBR19/24G	KC505190L	Ø19	70	90	95	Ø24	60	4.5	26	9.5	M6x14	124.5



Fixing holes shifted by 35° Fori fissaggio motore ruotati a 35°



Fixing holes shifted by 30° Fori fissaggio motore ruotati a 30°



Fixing holes shifted by 25° Fori fissaggio motore ruotati a 25°

### Viton seals with stainless steel 316L shield

Anelli di tenuta in viton con schermo protettivo in acciaio inox in AISI 316L



### Hardened and ground gears

Ingranaggi temprati e rettificati

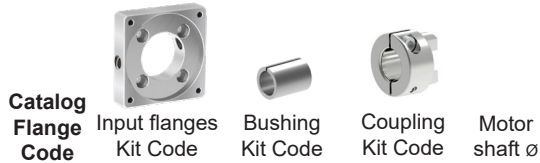
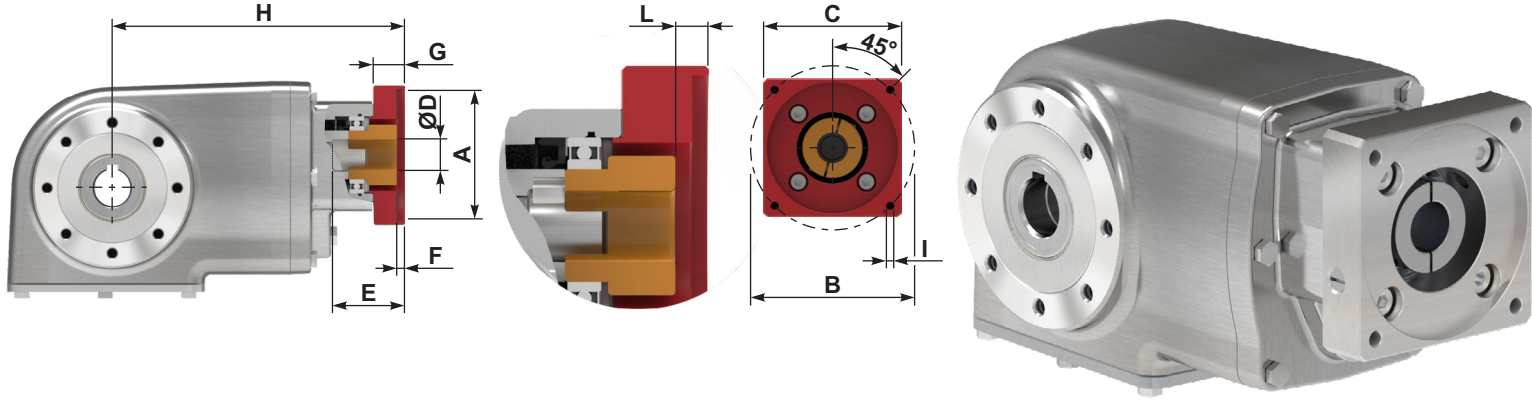


Feature  
Caratteristiche

## Brushless-Tech

# Full stainless steel helical bevel gearboxes

Riduttori a coppia conica completamente in acciaio inox



Catalog Flange Code	Input flanges Kit Code	Bushing Kit Code	Coupling Kit Code	Motor shaft $\varnothing$	A	B	C	$\varnothing D$	E	F	G	L	I	H			
								X42N	X63N	X74N							
<b>X43N</b> 136Nm	BC	KI504072	KBR11/14G	KC355190L	$\varnothing 11$	60	75	70	$\varnothing 14$	38	4.5	23	9	M5x12	211		
	BC	KI504072	-	KC355190L	$\varnothing 14$	60	75	70	$\varnothing 14$	38	4.5	23	9	M5x12	211		
	BB	KI504073	-	KC355190L	$\varnothing 14$	50	70	70	$\varnothing 14$	38	4.5	23	9	M5x12	211		
	BE	KI504074	-	KC355190L	$\varnothing 14$	80	100	85	$\varnothing 14$	38	4.5	23	9	M6x12	211		
	BF	KI504075	-	KC355190L	$\varnothing 14$	95	115	100	$\varnothing 14$	38	4.5	23	9	M8x12	211		
BD	KI504078	-	KC355190L	$\varnothing 14$	70	90	80	$\varnothing 14$	38	4.5	23	9	M6x12	211			
<b>X42N</b> 130Nm	BC	KI634072	KBR14/22G	KC405190L	$\varnothing 14$	60	75	90	$\varnothing 22$	55.5	4.5	25	8.5	M5x12	205.5	270	317
	BB	KI634073	KBR14/22G	KC405190L	$\varnothing 14$	50	70	80	$\varnothing 22$	55.5	4.5	25	8.5	M5x12	205.5	270	317
<b>X63N</b> 410Nm	BE	KI634074	KBR14/22G	KC405190L	$\varnothing 14$	80	100	85	$\varnothing 22$	55.5	4.5	25	8.5	M6x12	205.5	270	317
	BF	KI634075	KBR19/22G	KC405190L	$\varnothing 19$	95	115	100	$\varnothing 22$	55.5	4.5	25	8.5	M8x12	205.5	270	317
<b>X74N</b> 675Nm	BG	KI634076	-	KC405190L	$\varnothing 22$	110	145	130	$\varnothing 22$	60.5	8	30	13.5	M8x14	210.5	275	322
	BD	KI634078	KBR19/22G	KC405190L	$\varnothing 22$	70	90	90	$\varnothing 22$	55.5	4.5	25	8.5	M6x12	205.5	270	317
<b>X62N</b> 410Nm	BF	KI854075	KBR19/24G	KC505190L	$\varnothing 19$	95	115	100	$\varnothing 24$	58	4.5	26	9	M8x14	261	308	
	BG	KI854076	KBR22/24G	KC505190L	$\varnothing 22$	110	145	130	$\varnothing 24$	62	8	30	13	M8x14	265	312	
<b>X73N</b> 675Nm	BH	KI854077	-	KC505190L	$\varnothing 24$	130	165	140	$\varnothing 24$	58	5	26	9	M8x14	261	308	
	BD	KI854078	KBR19/24G	KC505190L	$\varnothing 19$	70	90	95	$\varnothing 24$	58	4.5	26	9	M6x14	261	308	



Fixing holes shifted by 35° Fori fissaggio motore ruotati a 35°



Fixing holes shifted by 30° Fori fissaggio motore ruotati a 30°



Fixing holes shifted by 25° Fori fissaggio motore ruotati a 25°

### Reduction bushing

Bussola di riduzione



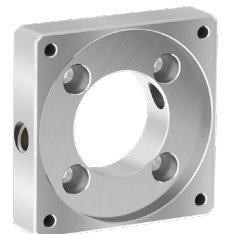
### Coupling

Giunto



### Flange for servomotor

Flange per servomotori



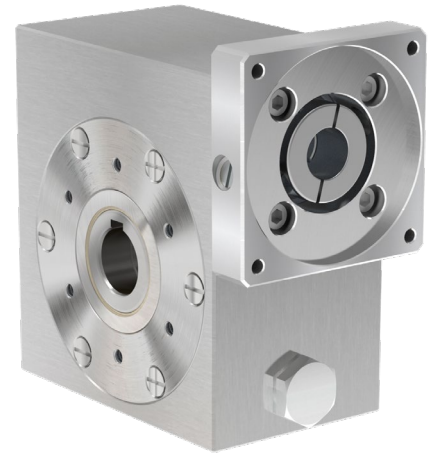
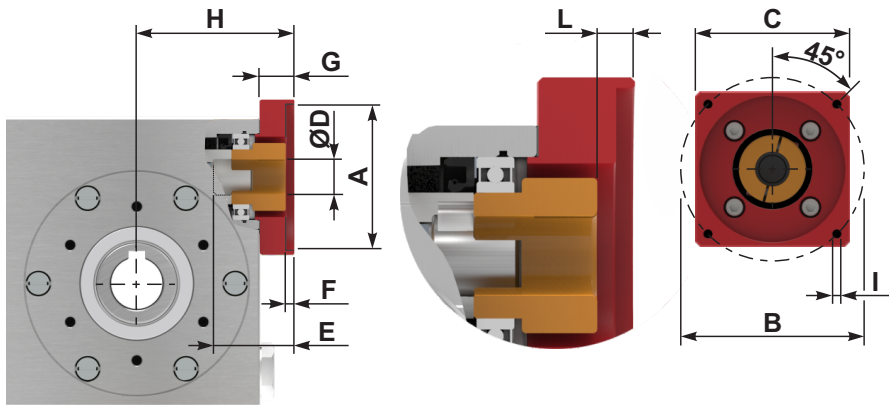
# Brushless-Tech

## Full stainless steel worm gearboxes

Riduttori a vite senza fine completamente in acciaio inox

130  
145  
150  
163  
185

VFI  
series



Catalog  
Flange  
Code

Input flanges  
Kit Code

Bushing  
Kit Code

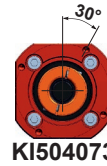
Coupling  
Kit Code

Motor  
shaft Ø

						A	B	C	ØD	E	F	G	L	I	H
<b>130</b> 21Nm	BC	KI304072	KBR11/14G	K0305190L	Ø11	60	75	70	Ø14	30	4.5	20	4.7	M5x12	68
	BB	KI304073	-	K0305190L	Ø14	50	70	60	Ø14	32	4.5	28.5	13.2	M5x12	76.5
<b>145</b> 41Nm	BC	KI504072	KBR11/14G	KC355190L	Ø11	60	75	70	Ø14	44	4.5	23	8.5	M5x12	78.5
	BB	KI504073	-	KC355190L	Ø14	50	70	70	Ø14	44	4.5	23	8.5	M5x12	78.5
	BE	KI504074	-	KC355190L	Ø14	80	100	85	Ø14	44	4.5	23	8.5	M6x12	78.5
	BF	KI504075	-	KC355190L	Ø14	95	115	110	Ø14	44	4.5	23	8.5	M8x12	78.5
	BD	KI504078	-	KC355190L	Ø14	70	90	80	Ø14	44	4.5	23	8.5	M6x12	78.5
<b>150</b> 72Nm	BC	KI504072	KBR11/19G	K0505190L	Ø11	60	75	70	Ø19	48	4.5	23	8.5	M5x12	83
	BC	KI504072	KBR14/19G	K0505190L	Ø14	60	75	70	Ø19	48	4.5	23	8.5	M5x12	83
	BB	KI504073	KBR14/19G	K0505190L	Ø14	50	70	70	Ø19	48	4.5	23	8.5	M5x12	83
	BE	KI504074	KBR14/19G	K0505190L	Ø14	80	100	85	Ø19	48	4.5	23	8.5	M6x12	83
	BF	KI504075	-	K0505190L	Ø19	95	115	100	Ø19	48	4.5	23	8.5	M8x12	83
	BD	KI504078	-	K0505190L	Ø19	70	90	80	Ø19	48	4.5	23	8.5	M6x12	83
<b>163</b> 147Nm	BC	KI634072	KBR14/22G	KC405190L	Ø14	60	75	90	Ø22	58	4.5	25	8.5	M5x12	104
	BB	KI634073	KBR14/22G	KC405190L	Ø14	50	70	80	Ø22	58	4.5	25	8.5	M5x12	104
	BE	KI634074	KBR14/22G	KC405190L	Ø14	80	100	85	Ø22	58	4.5	25	8.5	M6x12	104
	BF	KI634075	KBR19/22G	KC405190L	Ø19	95	115	100	Ø22	58	4.5	25	8.5	M8x12	104
	BG	KI634076	-	KC405190L	Ø22	110	145	130	Ø22	63	8	30	13.5	M8x14	109
	BD	KI634078	KBR19/22G	KC405190L	Ø19	70	90	90	Ø22	58	4.5	25	8.5	M6x12	104
<b>185</b> 347Nm	BF	KI854075	KBR19/24G	KC505190L	Ø19	95	115	100	Ø24	60	4.5	26	9	M8x14	124
	BG	KI854076	KBR22/24G	KC505190L	Ø22	110	145	130	Ø24	64	8	30	13	M8x14	128
	BH	KI854077	-	KC505190L	Ø24	130	165	140	Ø24	60	5	26	9	M8x14	124
	BD	KI854078	KBR19/24G	KC505190L	Ø19	70	90	95	Ø24	60	4.5	26	9	M6x14	124



Fixing holes shifted by 35° Fori fissaggio motore ruotati a 35°



Fixing holes shifted by 30° Fori fissaggio motore ruotati a 30°



Fixing holes shifted by 25° Fori fissaggio motore ruotati a 25°

### Viton seals with stainless steel 316L shield

Anelli di tenuta in viton con schermo protettivo in acciaio inox in AISI 316L



### Hardened and ground gears

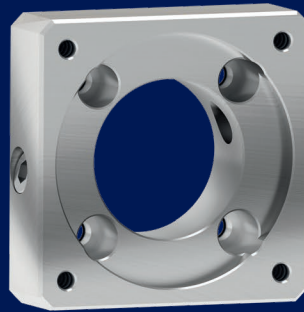
Ingranaggi temprati e rettificati



Feature  
Caratteristiche

# CLEAN-GEARTECH

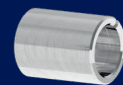
Brushless-Tech



**Flange for servomotor**  
Flange per servomotore



**Coupling**  
Giunto



**Reduction bushing**  
Bussola di riduzione



On request  
A richiesta

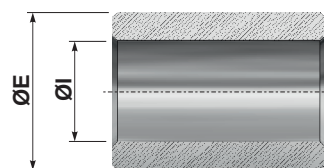


### Reduction bushings Bussole di riduzione



#### Reduction bushing dimensions Dimensioni bussola di riduzione

ØI	ØE	Code
Ø9	Ø14	KBR09/14G
Ø11	Ø14	KBR11/14G
Ø11	Ø19	KBR11/19G
Ø14	Ø19	KBR14/19G
Ø14	Ø22	KBR14/22G
Ø19	Ø22	KBR19/22G
Ø19	Ø24	KBR19/24G
Ø22	Ø24	KBR22/24G

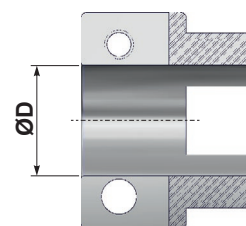


### Couplings Giunti

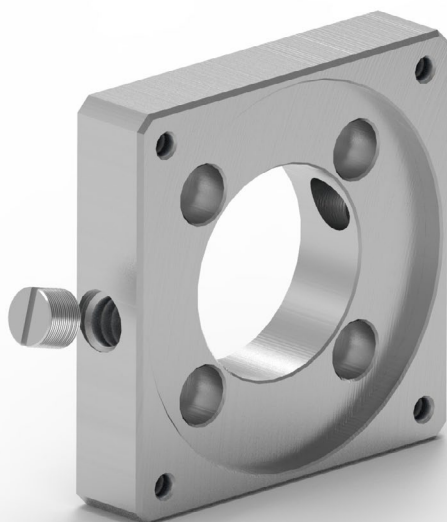


#### Coupling dimensions Dimensioni giunto

ØD	Code
Ø9	K0305190L
Ø14	KC355190L
Ø19	K0505190L
Ø22	KC405190L
Ø24	KC505190L

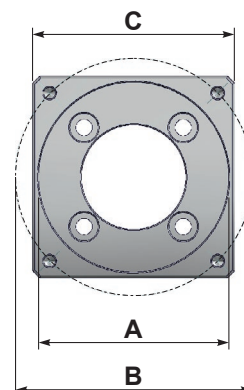


### Flanges for servomotor Flange per servomotore



#### Flange dimensions Dimensioni flangia

Catalog Flange Code	Code Kit flange		A	B	C
	ALUMINUM	STAINLESS STEEL			
BA	K0304071	NOT AVAILABLE	40	63	58
BC	K0304072	KI304072	60	75	70
BB	K0304073	KI304073	50	70	60
BC	KD504072	KI504072	60	75	70
BB	KD504073	KI504073	50	70	70
BE	KD504074	KI504074	80	100	85
BF	KD504075	KI504075	95	115	100
BD	KD504078	KI504078	70	90	80
BC	KD634072	KI634072	60	75	90
BB	KD634073	KI634073	50	70	80
BE	KD634074	KI634074	80	100	85
BF	KD634075	KI634075	95	115	100
BG	KD634076	KI634076	110	145	130
BD	KD634078	KI634078	70	90	90
BF	KD854075	KI854075	95	115	100
BG	KD854076	KI854076	110	145	130
BH	KD854077	KI854077	130	165	140
BD	KD854078	KI854078	70	90	95



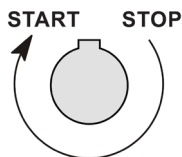
## Several factors should be considered before selecting the appropriate gearbox for :

Diversi fattori devono essere considerati prima di selezionare il riduttore appropriato per:

**1** motor speeds from 0 to 1500 rpm, you can use the rating in our Clean-Geartech general catalog.  
Velocità del motore da 0 a 1500 giri/min, vedere la selezione nel nostro catalogo generale Clean-Geartech.

**2** Applications having frequent starts and stops.  
Applicazioni con avviamenti e arresti frequenti.

**3** Quick inversion of rotation.  
Veloci inversioni di rotazione.



**N30** 21 Nm VFN series  
Full stainless steel round worm gearboxes  
Riduttori a vite senza fine tondo completamente in acciaio inox

Output speed $n_2$ [min <sup>-1</sup> ]	Ratio i	Motor power $P_{in}$ [kW]	Output torque $M_{2a}$ [Nm]	Service factor f <sub>s</sub>	Nominal power $P_{2n}$ [kW]	Nominal torque $M_{2R}$ [Nm]	B5 motor flanges		B14 motor flanges		Dynamic efficiency RD	Tooth module [mm]	Ratio code
							-	-	-O 56	P 63			
280	5	0.18	5	3.3	0.60	17			B-C		82	1.26	09
200	7	0.18	7	2.4	0.44	17			B-C		80	1.44	01
140	10	0.18	10	1.8	0.32	17			B-C		78	1.44	02
93	15	0.18	13	1.4	0.25	19			B-C		73	1.44	03
70	20	0.18	17	1.1	0.20	19			B-C		70	1.09	04
47	30	0.12	15	1.4	0.17	21			B-C		62	1.44	05
35	40	0.12	19	1.1	0.13	20			B-C		57	1.09	06
23	61	0.09	19	1.1	0.10	20			B-C		50	0.72	07
17.5	80	0.06	16	1.0	0.06	16			B-C		48	0.56	08
14	100	0.06*	16	0.5	0.03	8			B-C		40	0.45	10

\* Power higher than the maximum one which can be supported by the gearbox. Select according to the torque  $M_{2R}$ .  
Potenza superiore a quella massima sopportabile dal riduttore. Selezionare in base al momento torcente  $M_{2R}$ .

### Service factor - Worm gears / Fattore di servizio - Ingranaggi a vite senza fine

Type of load and starts per hour Tipo di carico e avviamenti per ora	Oper. hours per day Ore di funz. giorn.			
		<2 h	2 ÷ 8 h	8 ÷ 16 h
Continuous or intermittent appl. with start / hour Applicazione cont. o interm. con n.ro operazioni/ora <b>h ≤ 10</b>	Uniform / Uniforme	0.9	1	1.25
	Moderate / Moderato	1	1.25	1.5
	Heavy / Forte	1.25	1.5	1.75
Intermittent application with start / hour Applicazione intermittente con n.ro operazioni/ora <b>h &gt; 10</b>	Uniform / Uniforme	1.25	1.5	1.75
	Moderate / Moderato	1.5	1.75	2
	Heavy / Forte	1.75	2	2.25

### Service factor - Gears / Fattore di servizio - Ingranaggi

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

## Add a second service factor for:

Aggiungere un secondo fattore di servizio per:

**4** Motor speeds from 1500 to 3000 rpm: Consider a reduction of the nominal torque  $M_{2R}$  of 20%.  
Velocità del motore da 1500 a 3000 giri/min: Considerare una riduzione della coppia nominale  $M_{2R}$  del 20%.

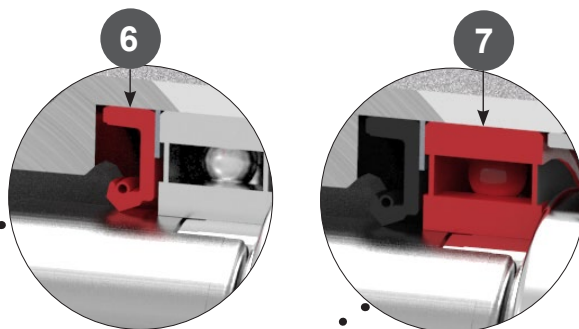
**5** Motor with speeds over 3000rpm please contact us.  
Velocità del motore oltre 3000 giri/min, contattateci.

## Special options on request on the gearbox

Opzioni speciali a richiesta sul riduttore

**6** ON REQUEST for speeds above 2000 rpm FKM oil seal are used on coupling configuration.  
A RICHIESTA per velocità al di sopra di 2000 giri/min in ingresso sul giunto usare anello di tenuta in FKM.

**7** With high speed C3 bearings are suggested.  
Con alte velocità si consigliano cuscinetti con gioco C3.

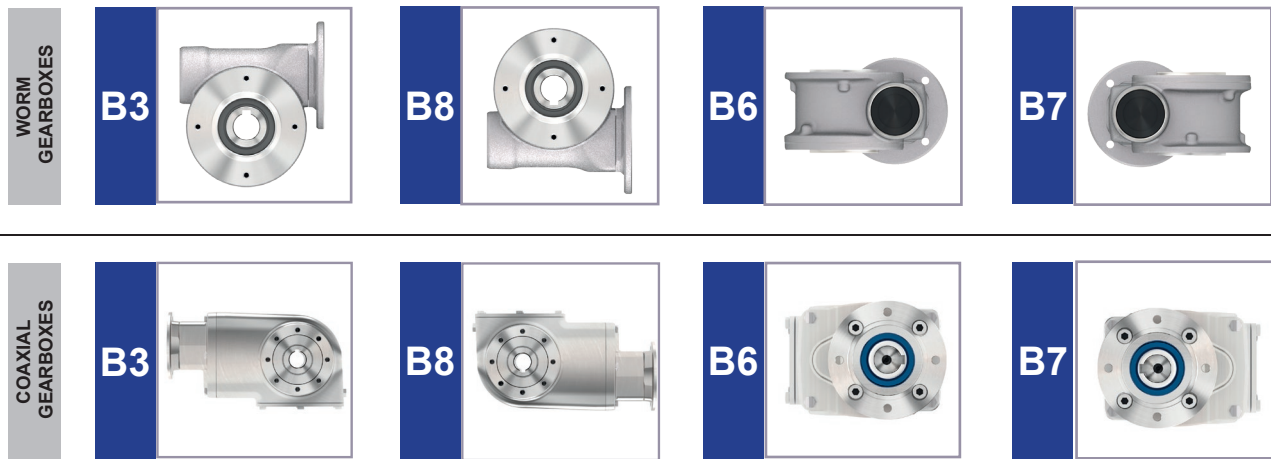


## Suggested mounting position are as follows

Le posizioni di montaggio suggerite sono le seguenti

With high input speeds above 2000 rpm Oil breather plugs are suggested as internal pressure can rise. In some critical cases the oil quantity that are indicated in our website on the lubrication pages, may need to reduced. So please contact us.

Con velocità di ingresso elevate superiori a 2000 giri/min si consiglia l'uso di tappi di sfiato olio poiché la pressione interna può aumentare. In alcuni casi critici potrebbe essere necessario ridurre la quantità di olio indicata nel nostro sito relativa alla lubrificazione. Quindi per favore contattaci.



## SUGGESTED POSITION

### Vertical positions are critical

Le posizioni verticali sono critiche

These position required 2Z or 2RS bearings.

Queste posizioni richiedono l'utilizzo di cuscinetti 2Z o 2RS.

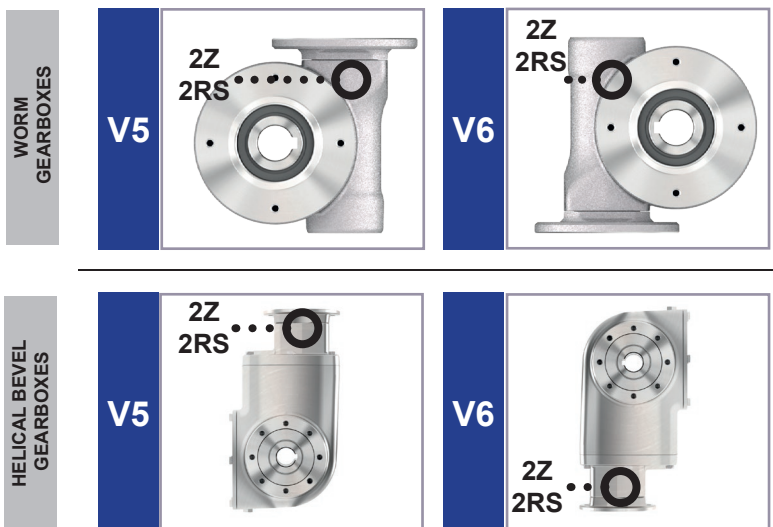
#### V6/H6

MOST  
CRITICAL

Continuous duty with high start and stop is not suggested. In this condition the correct functioning of lower oil seal becomes critical.

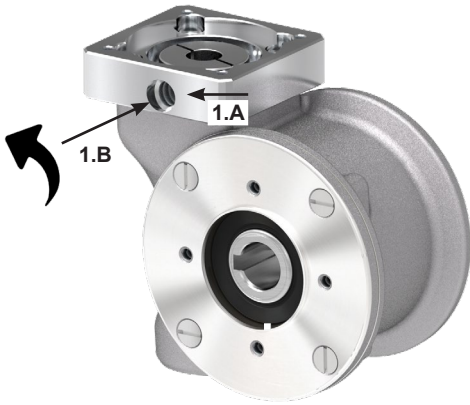
Il servizio continuo con avvii e arresti frequenti non è consigliato.

In questa condizione il corretto funzionamento dell'anello di tenuta inferiore diventa critico.



### MOST CRITICAL V6

1



1.A

**Remove the protection screws on the input flange.**

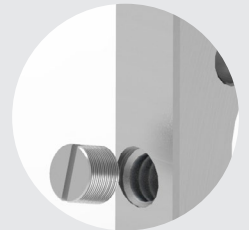
Rimuovere le viti di protezione sulla flangia motore.



1.B

**Loosen the fastening screws of the coupling.**

Allentare le viti di serraggio del giunto.



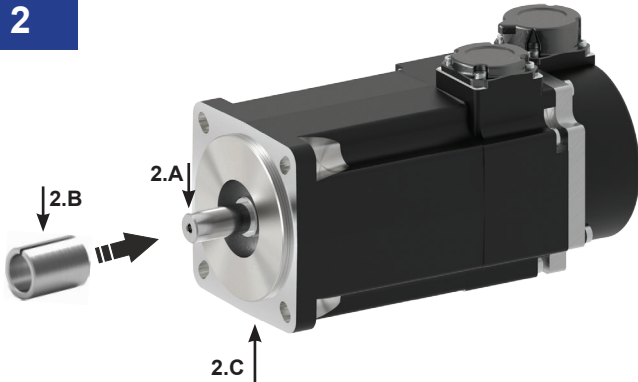
CHECK  
2.A

**Motor shaft without key.**

Albero motore senza linguetta.



2



2.B

**Only if used with reduction bushing.**

**Mount the reduction bushing with a rubber hammer.**

Se prevista la bussola di riduzione. Utilizzare un martello di gomma per il montaggio.

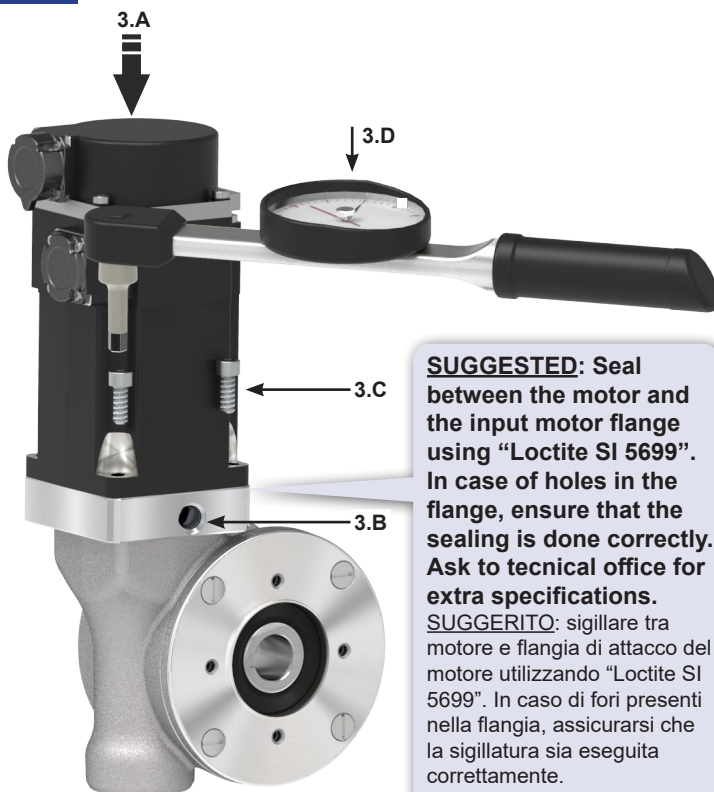


CHECK  
2.C

**Clean the contact surface on the motor flange and input flange.**

Pulire le superfici di contatto della flangia motore e flangia riduttore.

3



CHECK  
3.A

**Place the gearbox with the hollow shaft that has to be connected with the motor (input shaft) facing up. The gearbox has to be without load and the output shaft has to be free to rotate.**

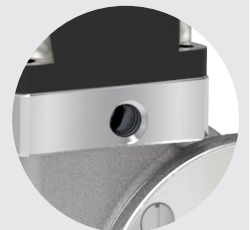
Posizionare il riduttore con l'albero cavo di accoppiamento al motore (albero entrata) rivolto verso l'alto. Il riduttore non deve essere collegato a nessun carico e l'albero di uscita deve essere libero di ruotare.



CHECK  
3.B

**Before mounting the motor, check the screw is aligned with the hole on the input motor flange.**

Prima di montare il motore, assicurarsi che la vite del giunto sia allineata con il foro sulla flangia riduttore.



3.C

**For fixing the motor, apply anti-loosening paste on screw thread, employ Arexons 52A70 strong thread lock or similar.**

Per il fissaggio del motore, applicare un prodotto anti-svitamento sui filetti delle viti, utilizzare un freno filetto forte tipo Arexons 52A70 o similare.



3.D

**Tighten the screws according to table torque values.**

**Recommended the class screws 8.8.**

Serrare le viti in base ai valori in tabella. Consigliato le viti di classe 8.8.

Screw Vite	TS [Nm]
M4	3
M5	6
M6	10
M8	25
M10	45

**SUGGESTED: Seal between the motor and the input motor flange using "Loctite SI 5699". In case of holes in the flange, ensure that the sealing is done correctly. Ask to technical office for extra specifications.**

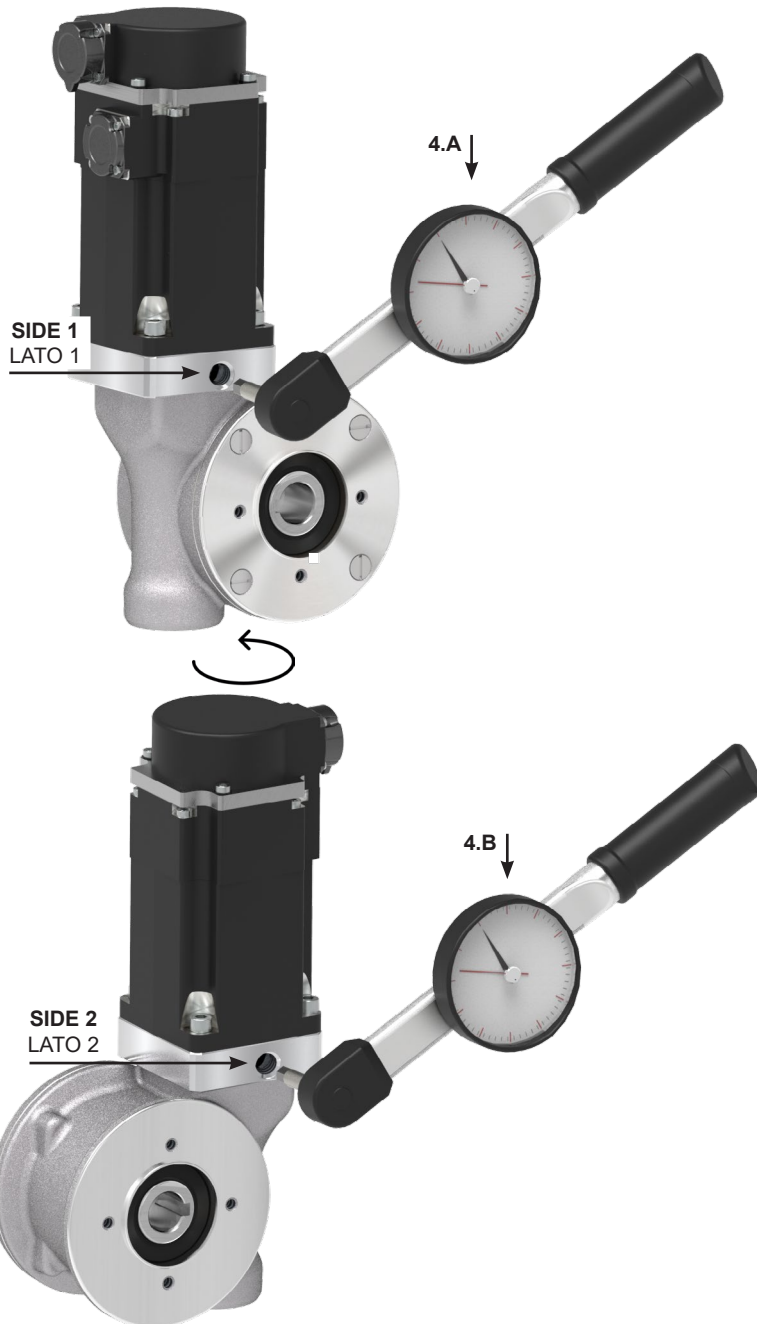
**SUGGERITO: sigillare tra motore e flangia di attacco del motore utilizzando "Loctite SI 5699". In caso di fori presenti nella flangia, assicurarsi che la sigillatura sia eseguita correttamente. Si consiglia di consultare l'ufficio tecnico per ulteriori specifiche.**

# Motor assembly instructions

Istruzioni per il montaggio del motore

Instructions  
Istruzioni

4



4.A

**Tighten the screws (SC) according to the torque (TS) reported in the table.**

**(SC) Socked-head screw (Allen screw), class screws 8.8 .**

Stringere le viti (SC) del giunto in base alla coppia di serraggio (TS) riportata nella tabella.

(SC) Vite a testa cilindrica esagono incassato (Brogola), classe 8.8 .

Coupling kit code	SC	TS [Nm]
K0305190L	M4x14	3.5
KC355190L	M4x14	3.5
K0505190L	M5x16	6
KC405190L	M5x16	6
KC505190L	M6x20	10



4.B

**First tighten on side 1 and side 2, repeat the tightening a second round on both sides.**

Stringere una prima volta sul lato 1 e sul lato 2, ripetere il serraggio una seconda volta su entrambi i lati.

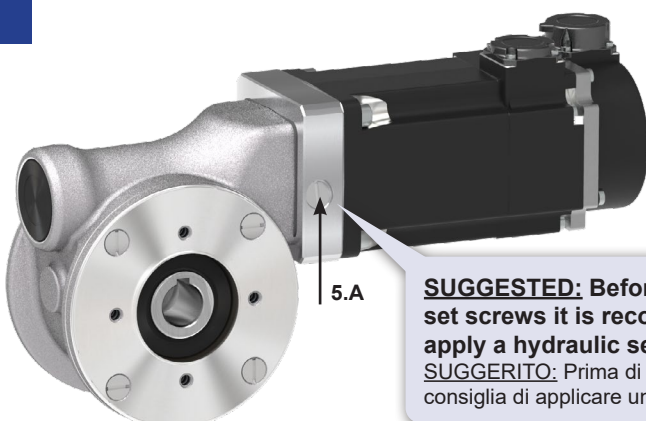


CHECK

**Exceed the torque fixing the locking bolt can damage the coupling.**

Il superamento della coppia di serraggio della vite di bloccaggio può danneggiare il dispositivo di accoppiamento

5



CHECK  
5.A

**Reset the protection screws.**

Riposizionare le viti di protezione.

**SUGGESTED:** Before tightening the set screws it is recommended to apply a hydraulic sealant.

**SUGGERITO:** Prima di serrare i grani si consiglia di applicare un sigillante idraulico.







**CLEAN-GEARTECH**



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Larrondo-Beheko Etorbidea, 4-P2 - 48180 LOIU - Bizkaia - SPAIN  
Tel. +34 946.765.423 - [comercial@abaroadrive.com](mailto:comercial@abaroadrive.com)  
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