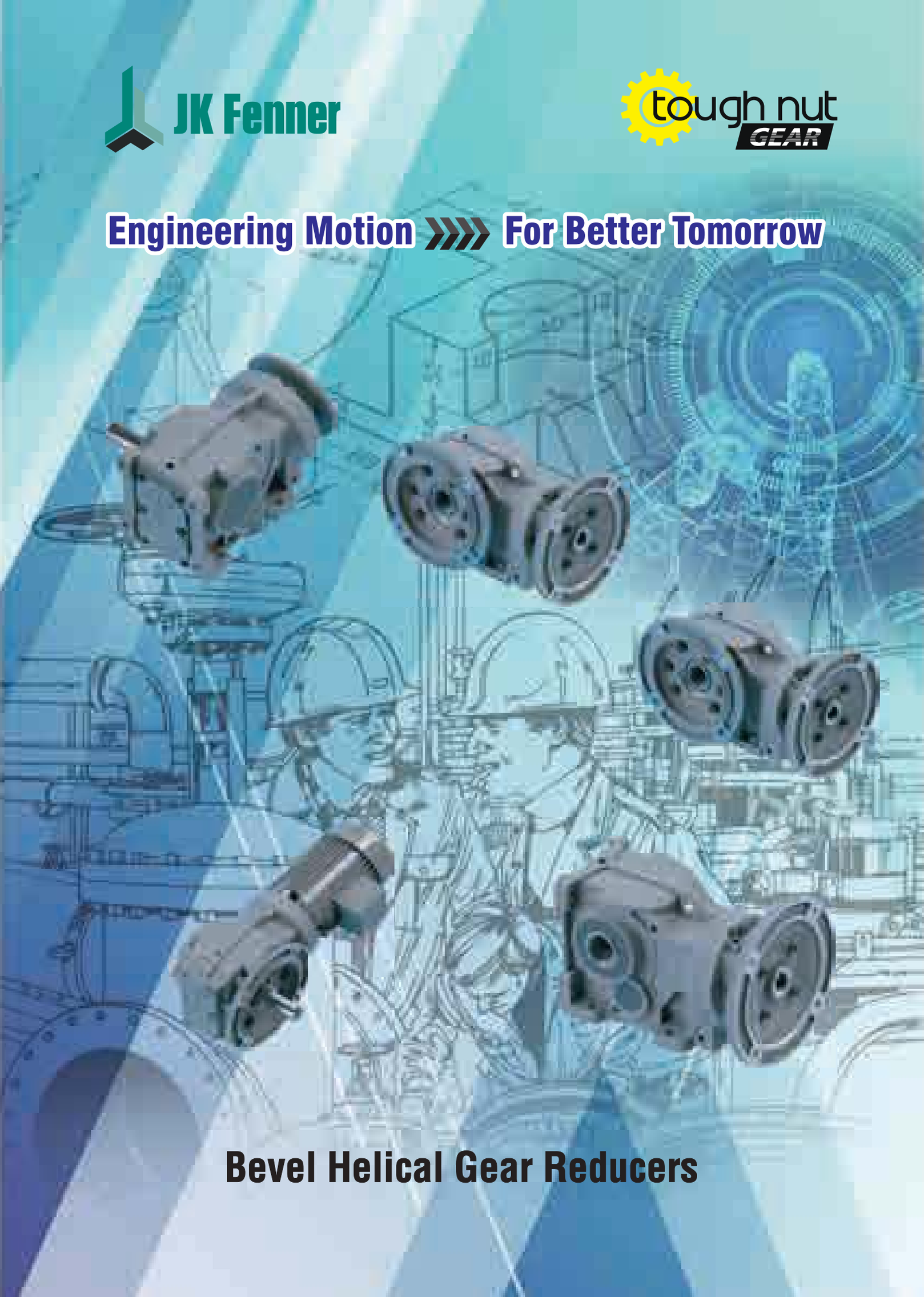
JK Fenner

tough nut GEAR

Engineering Motion »»» For Better Tomorrow



Bevel Helical Gear Reducers

JK Fenner

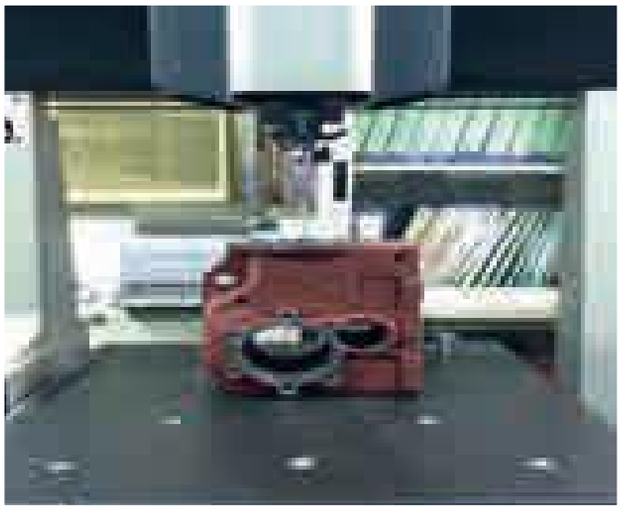


Table of Contents

1.1 Helical - Bevel Gear Reducers

Advantages

1

1>Design Concepts: The combination of standardization and modularization allowed interchangeability with international leading brands, while keeping structure rigidity and compactness.

2>Noise Level: Leveraging the advantage of high efficiency of helical gears and smooth transmission of worm gears, the reducers performs with higher stability and produces less noise when compared with regular helical gear units.

3>Ratios Selections: The ratio ranges between 8:1 ~ 215:1, providing more accommodation to ratio requirements than worm gear speed reducers.

4>Loading Capacity: Available with power ranges from 1/4HP up to 30HP, depending on different requirements and applications.

5>Tensile Strength: Pinion, gears and worm shafts are made with 20CrMo alloy steel plus carbonized treatment. The aluminum bronze worm wheel offers higher strength and endurance.

6>Space Efficiency: Provides 90 degree angle transmission similar to that of worm gear units to minimize space needed for installation.

7>Installation Flexibility: All models are designed for various mounting position (M1~M6) specified by customers.

8>Appearance Aesthetics: The reducers are designed with modern exterior while maintained high rigidity.

1.2 OPERATION MANUAL

· This operation manual is to help you install and operate speed reducer correctly. To avoid damages to the speed reducers, proper installation and operation is very crucial. This manual also includes official recommendations on maintenance for an extended lifespan of speed reducers.

· Every FENNER speed reducer passed strict inspection and testing before being properly packaged for shipping. Upon receipt of the speed reducer, please check for any shortage or damage of parts during transit. Please be sure to contact Fenner for identification of responsible carrier and made record of the issue. We are committed to excellence in quality and devoted to solving problems for our clients.

I. INSTALLATION

1. Flexible couplings are preferred when input shaft connects directly to the motor; gear couplings are preferred on the output shaft's connection to the application.
2. Install on a stable base with good air ventilation; the accessibility of oil filling / draining should be considered.
3. The input shaft of the reducer and the motor shaft should be in alignment within the tolerance allowance.
4. After installation, please turn the input shaft manually first to check for any locking.
5. No-load running test should be performed first; any abnormality should be corrected prior to regular operation.

II. Lubrication

1. The first oil change should be performed after 500 hrs of operation; subsequent oil change is needed every 2,500 hrs of operation. Nevertheless, a regular check on oil level and conditions are recommended.
2. Please fill only with compatible specifications of oil and do not mix oil of different specifications in a single unit.
3. The interior of the reducer should be flushed and drained before filling with fresh oil.
4. Please shut the reducer immediately for inspection if the temperature rises above 80°C or any abnormal noise occurred. Restart only after the issues identified and cleared.
5. Lubricant recommendation: MOBIL Gear 632, SHELL Omala 320, MOBIL Mobilube HD80W-90, SHELL Spirax E.P 90.
6. Unless specified otherwise by the customer, every FENNER speed reducer is supplied with appropriate amount of lubrication according to different installation position before shipping. If customer prefers to fill in the lubricant oil post shipment, please follow the instruction section of this catalog.

III. Storage

1. If the speed reducer is not for immediate installation, please keep the unit away from humidity and heat sources. After extended period of storage, please contact our service personnel for instruction on restoring the original performance prior to installation.

IV. Attachments the parts on reducer's shaft

1. Notice: Avoid heavy impact on shafts! It may cause bearing damages and undermines bearing performances. If bearings are to be replaced, we recommend heating method, which heats the bearing above 80℃ , that would allow a clear fit on the shafts and reduce the damage to the bearing. For the tolerance of shaft's diameter, please refer to the specification in catalog.
2. While installing the coupling, make sure to check the alignment of coupling and shaft of speed reducer properly to eliminate the damage on bearings and reduce to vibration frequency and abnormal wear.
3. To avoid overload on the bearings of output shaft, please refer to the OHL (overhung loading) in catalog. For exceeding axial load, please contact our service engineer for consultation.
4. The actual application of following factors such as input and output speed, direction of rotation, installation site and over axial and radial loading should be carefully examined.

V. Installation & Operation

1. The underlying factors should be taken into consideration:
   * Ambient temperature below 40℃
   * Location with good air ventilation
   * Proper positions for oil plug and drain plug
   * Sufficient space for periodical inspection, maintenance, and replacement
2. It is necessary for the unit to be installed on a flat, stable and rigid base for accurate alignment to prevent damages to the reducer's housing.
3. The suggested tolerance of flatness on base:
   * For size 50 or smaller, < 0.1mm/m
   * For size 60 or bigger, <0.2mm/m
4. To avoid the lubricant splash out during the transportation, breather plug with red pin inserted into air breathing hole. Please remove the red pin before start-up.
5. Before installation, please check the input horsepower and ratio to be the same as the punched name plate of reducer.

VI. Caution

Caution! The power should be turned off before removal or replacement of the reducer.

1. Oil level and quality lubricant is key point of daily maintenance. Please refer to our suggestion to change the lubricant periodically according to operation frequency site situation.
2. Check the alignment of coupling, the tightness of chain, and nuts and keep the reducer away from excessive dust and grease externally .

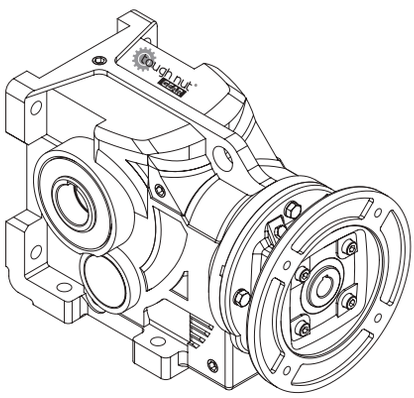
General Problems & Improvements

The following lists are general problem situations. In case that other problems happen, please contact us directly to get more information.

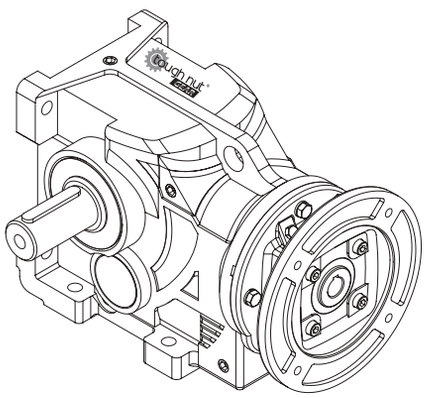
CAUSE	REASON	IMPROVEMENT
I. Overheat	1. Overload 2. Lubricant oil overfill or shortage 3. Improper lubricant oil 4. Extra friction on oil seal(lack of lubricant)	1. Adjust to proper loading 2. Add lubricant to the level of oil gauge 3. Chang proper lubricant oil 4. Lip lubricant at oil seal
II. Noise	1. Consistent noise { improper gears contact; bearing damaged 2. Screaming noise { bearing gap too small; lubricant oil shortage 3. Inconsistent noise { some object insert; bearing damaged	1. { Repair gears; Replace bearing 2. { Replace bearing; Fill in lubricant oil 3. { Remove debris & replace lubricant oil: Replace bearing
III. Vibration	1. Gear wear 2. Debris inside 3. Bearing worn-out or damaged 4. Bolt loose	1. Replace gear 2. Remove debris & replace lubricant oil 3. Replace bearing 4. Tighten bolt
IV. Oil Leakage	1. Oil seal damage 2. Gasket damage 3. Loose drain plug 4. Loose covers or flange	1. Replace oil seal 2. Replace gasket 3. Tighten drain plug 4. Tighten the bolts
V. Input and Output Shaft Fail	1. Gear-bound caused by overheat 2. Bearing damage 3. Debris between gears	1. Adjust or replace gears 2. Replace bearing 3. Remove debris; clean inside then replace lubricant oil
VI. Input shaft fail to drive output shaft	1. Gear wear 2. Damage to key connecting gear and output shaft 3. Input shaft rupture 4. Output shaft rupture	1. Replace gears 2. Replace key 3. Replace input shaft 4. Replace output shaft
VII. Gear Worn-out	1. Overload 2. Improper lubricant oil 3. Lubricant oil shortage 4. Excessive ambient temperature	1. Adjust to proper loading 2. Change proper lubricant oil 3. Refill lubricant oil 4. Ventilation improvement

2.1 Variants

Input Flange



FKHF



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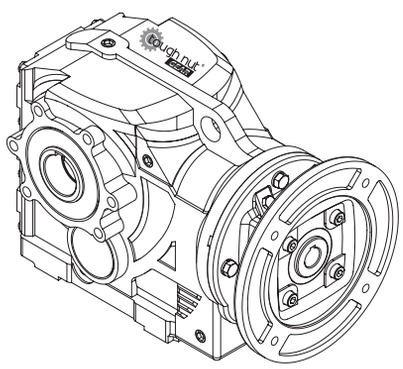

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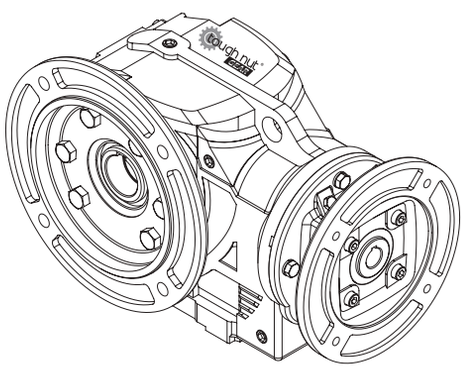

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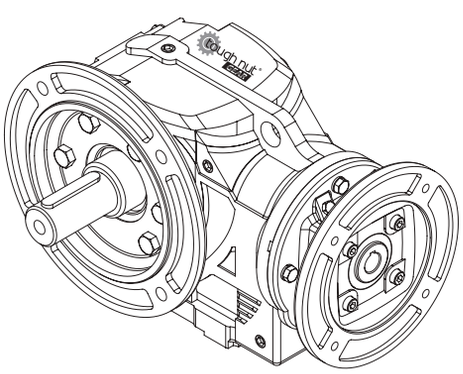

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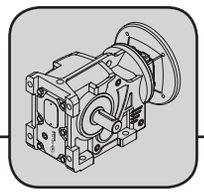
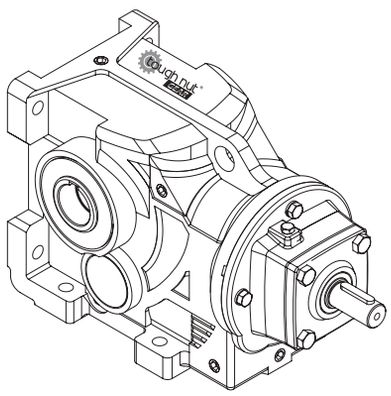


Solid Input Shaft



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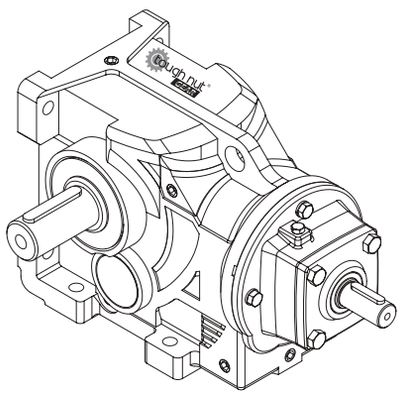

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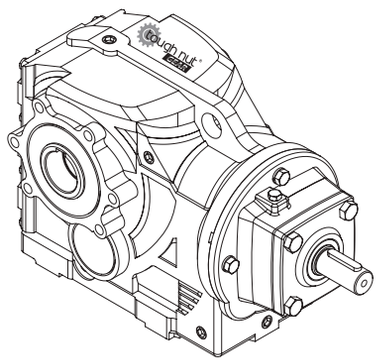

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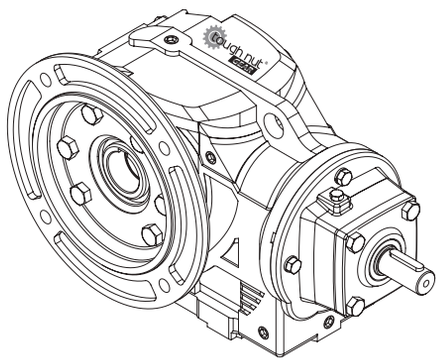

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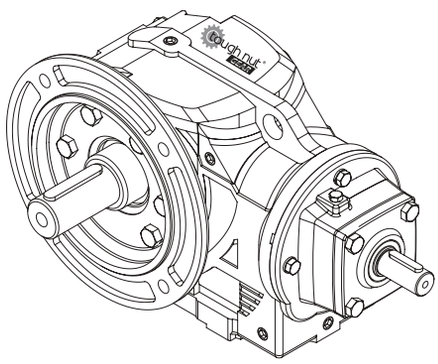
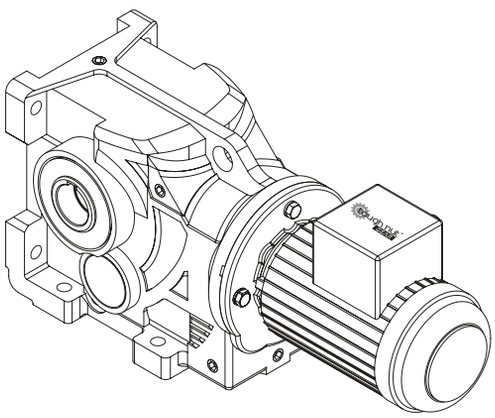


FKNS

Couple with Motor



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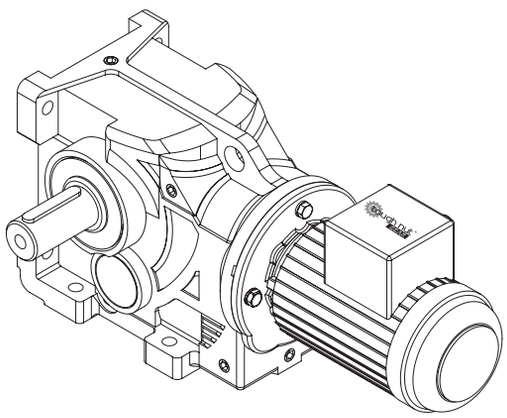

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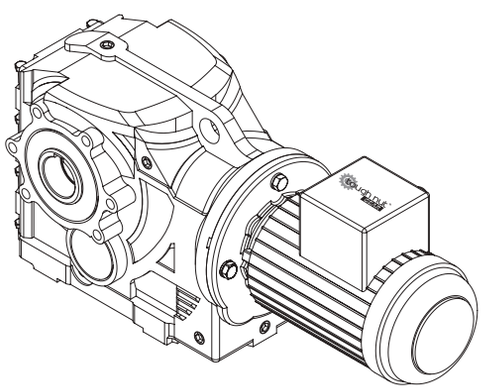

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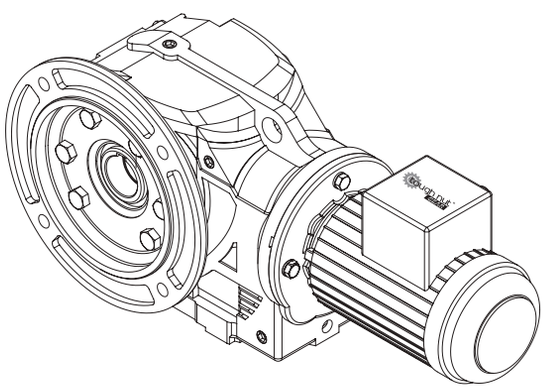

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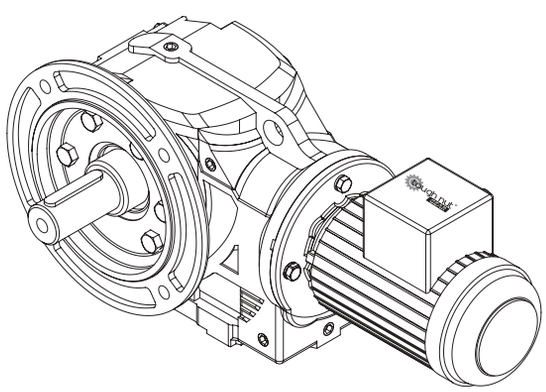

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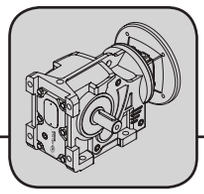
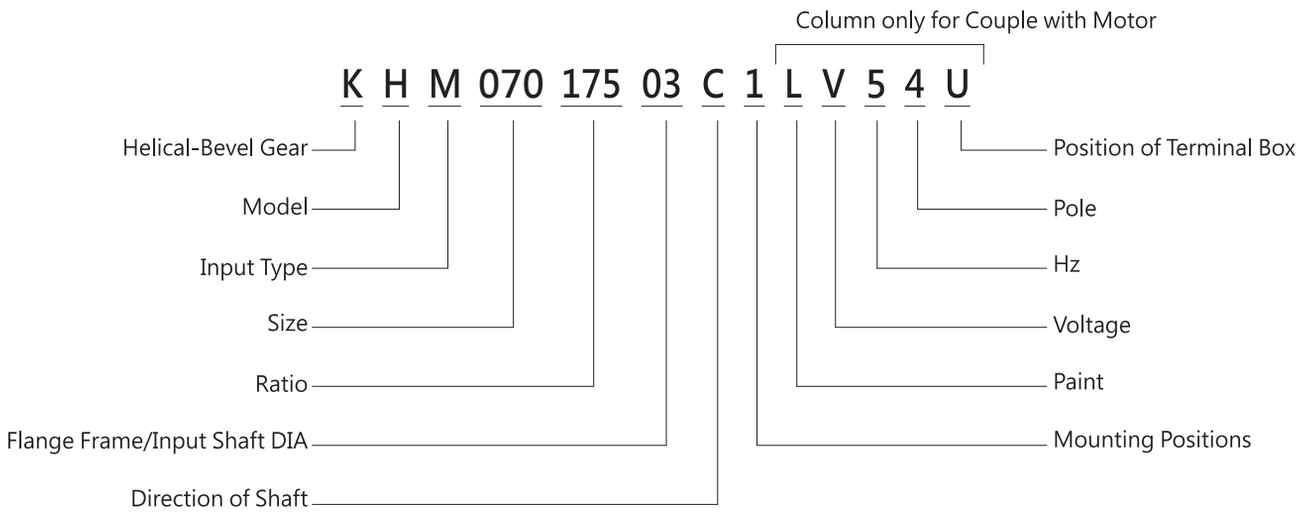


2.2 Order Code



Model

S Solid Output Shaft(Foot Mounting)
H Hollow Output Shaft(Foot Mounting)
N Solid Output Shaft With Mounting Flange
A Hollow Output Shaft
M Hollow Output Shaft With Mounting Flang

Input Type

F Input Flange IEC B5
B Input Flange IEC B14
N Input Flange NEMA
S Solid Input Shaft
M Couple With Motor

Size

30
35
40
40*
50
60
70
90

Ratio

005 : 1/5
⌇
215 : 1/215

Flange Frame/ Input Shaft DIA

IEC Standard 4-Pole	Input Shaft DIA
QQ : 1/4HP	16 : Ø 16
HH : 1/2HP	19 : Ø 24
01 : 1HP	24 : Ø 24
02 : 2HP	28 : Ø 28
03 : 3HP	38 : Ø 38
05 : 5HP	42 : Ø 42
07 : 7.5HP	
10 : 10HP	
15 : 15HP	
20 : 20HP	

Direction of Shaft

A、B、C

Mounting Positions

M1、M2、M3、M4、M5、M6

Paint

L : Blue

Voltage

2 : 220/380	C : 220/400	H : 200/346
4 : 240/415	D : 230/400	K : 208/220
5 : 220/440	E : 230/440	M : 208/240
A : 220/230	F : 240/480	N : 380/660
B : 220/240	G : 120/208	V : 208~480

Hz

5 : 50Hz

Pole

2 : 2P
4 : 4P
6 : 6P
8 : 8P

Position of Terminal Box

U、D、L、R

2.3 Permitted Combinations

FK90 , ne=1400 1/min													8000 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	100L	112M	132S	132M	160M	160L	180MC	180LC	200LC	Input shaft mm
9.8	8000	59170	143.55										Ø28
11	8000	55370	121.95										
13	8000	52460	107.04										Ø38
14	8000	51090	100.47										
15	8000	50000	95.48										
15	8000	48930	90.70										Ø42
17	8000	46960	82.38										
19	8000	45110	75.12										

Gear unit reduction ratio

Permitted overhung load at maximum output torque

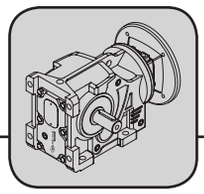
Maximum output torque

Output speed

Standard

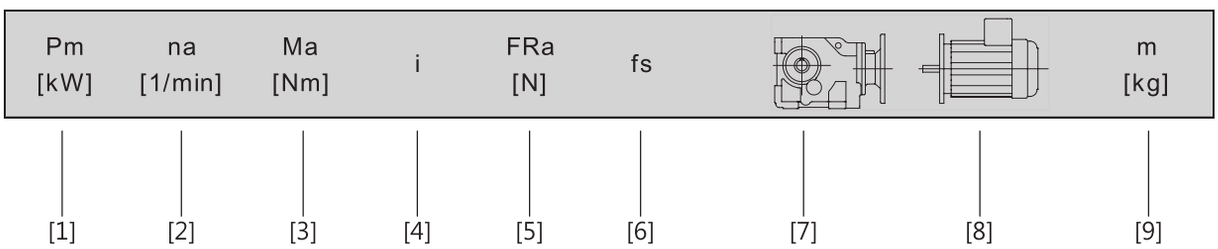
Input Flange / Solid Input Shaft - Standard

Couple with motor - Customization accepted
Please contact our customer service



2.4 Selection Tables

FK..F/..M



[1] Rated power driving motor

[2] Output speed

[3] Output torque

[4] Gear unit reduction ratio

[5] Permissible overhung load output side

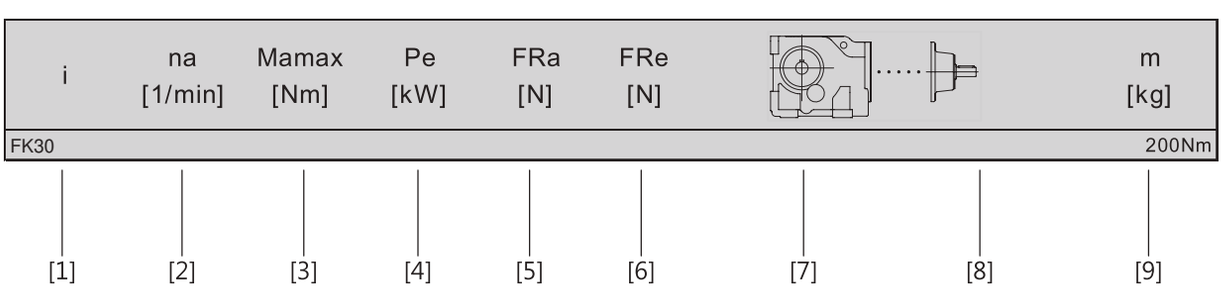
[6] Service factor

[7] Gear unit size

[8] Motor type

[9] Weight

FK..S



[1] Gear unit reduction ratio

[2] Output speed

[3] Maximum permitted output torque

[4] Calculated drive power of the gear unit

[5] Permitted overhung load at maximum output torque

[6] Permitted overhung load on the input side

[7] Gear unit size

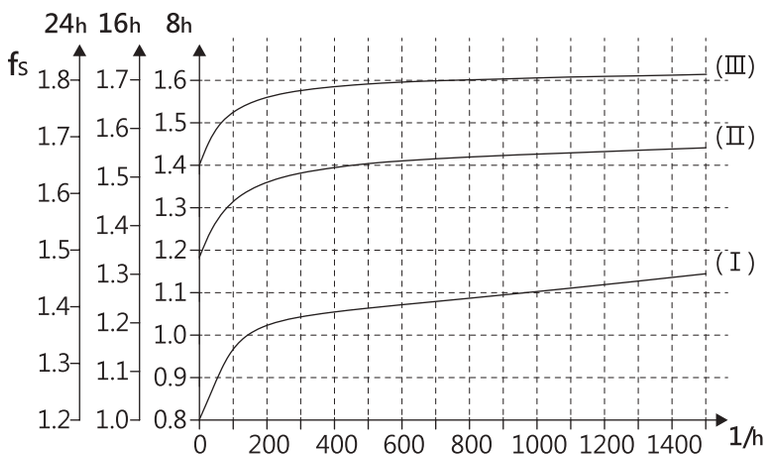
[8] Input shaft diameter

[9] Weight

2.5 Determining The Service Factor

The service factor is determined along with the daily operating time (hours/day), operating condition (continuous or intermittent) and level of load; for a proper gear selection, please determine the service factor accordingly.

$$Ma \times fs \leqq Mamax$$



Service Factor

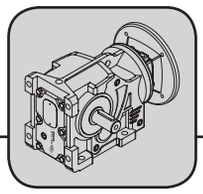
Load Classification

Ⅰ Light shock: mass acceleration factor ≦0.2

Ⅱ Moderate shock: mass acceleration factor ≦3

Ⅲ Heavy shock: mass acceleration factor ≦10

$$\text{Mass acceleration factor} = \frac{\text{all exterior moments of inertia}}{\text{moments of inertia drive motors}}$$



[All exterior moments of inertia] - recalculated to motor speed, formula

$$J_X = J \times \left(\frac{n}{n_M}\right)^2$$

J_X : mass moment of inertia scaled down to the motor shaft

J : mass moment of inertia with reference to the output speed of the gear unit

n : output speed of the gear unit

n_M : motor speed

Calculation of service factor

$$fs = \frac{Mamax}{Ma}$$

Mamax : the maximum permitted continuous torque

Ma : output torque of the gear unit

EX

If the mass acceleration factor is 2.5 (Moderate shocks Ⅱ), the operating time is 14 hours per day in an intermittent condition by 300 times per hour. We can acquire fs=1.51 from the fs chart; according to selection tables, we will know to select the gear unit with fs ≧ 1.51.

2.6 Tolerances

Shaft heights

The following tolerances apply to the indicated dimensions:

h	≦ 250 mm	→ -0.5 mm
h	> 250 mm	→ -1 mm

Foot-mounted gear units: Check the mounted motor because it may project below the mounting surface.

Shaft ends

Diameter tolerance:

Ø	≦ 50 mm	→ k6
Ø	> 50 mm	→ m6

Center bores

Ø	> 24...30 mm	→ M10	Ø	> 50...85 mm	→ M20
Ø	> 30...38 mm	→ M12	Ø	> 85...130 mm	→ M24
Ø	> 38...50 mm	→ M16			

Hollow shafts

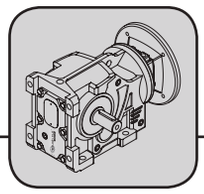
Diameter tolerance:

Ø H7

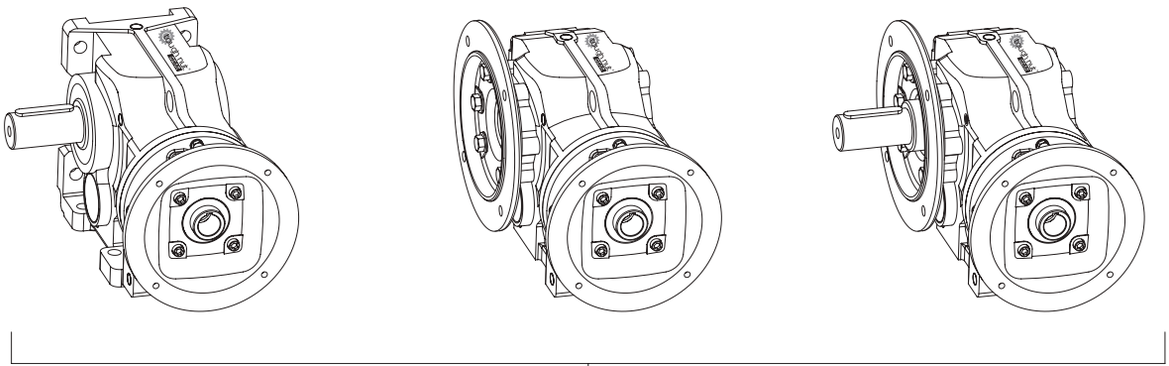
Output Flanges

Centering shoulder tolerance:

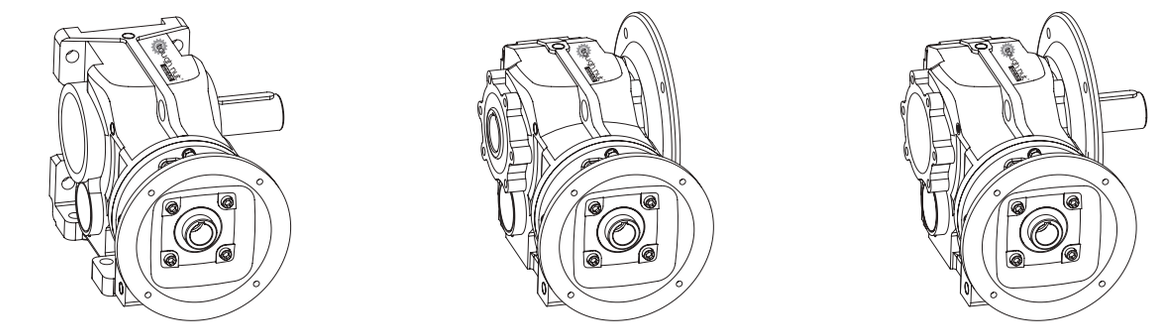
Ø	≦ 230 mm	→ j6
Ø	> 230 mm	→ h6



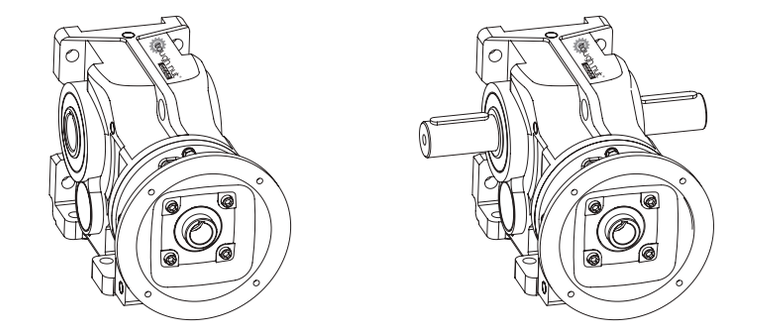
2.7 Direction of Shaft



A



B



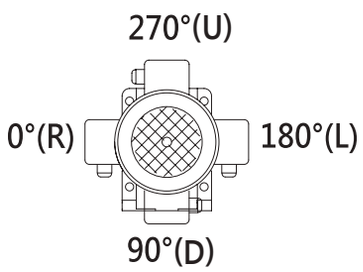
C

2.8 Mounting Positions

FKS../FHK..30-90

Position of Terminal Box

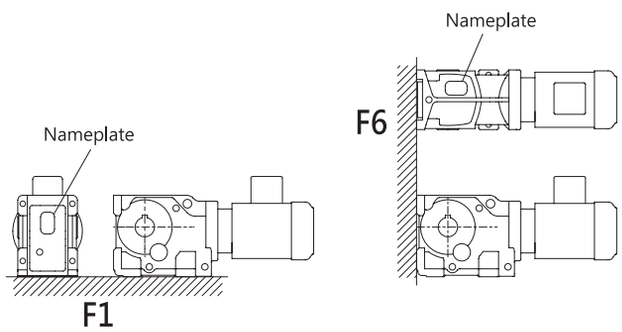
Standard position "U", unless specific requirements

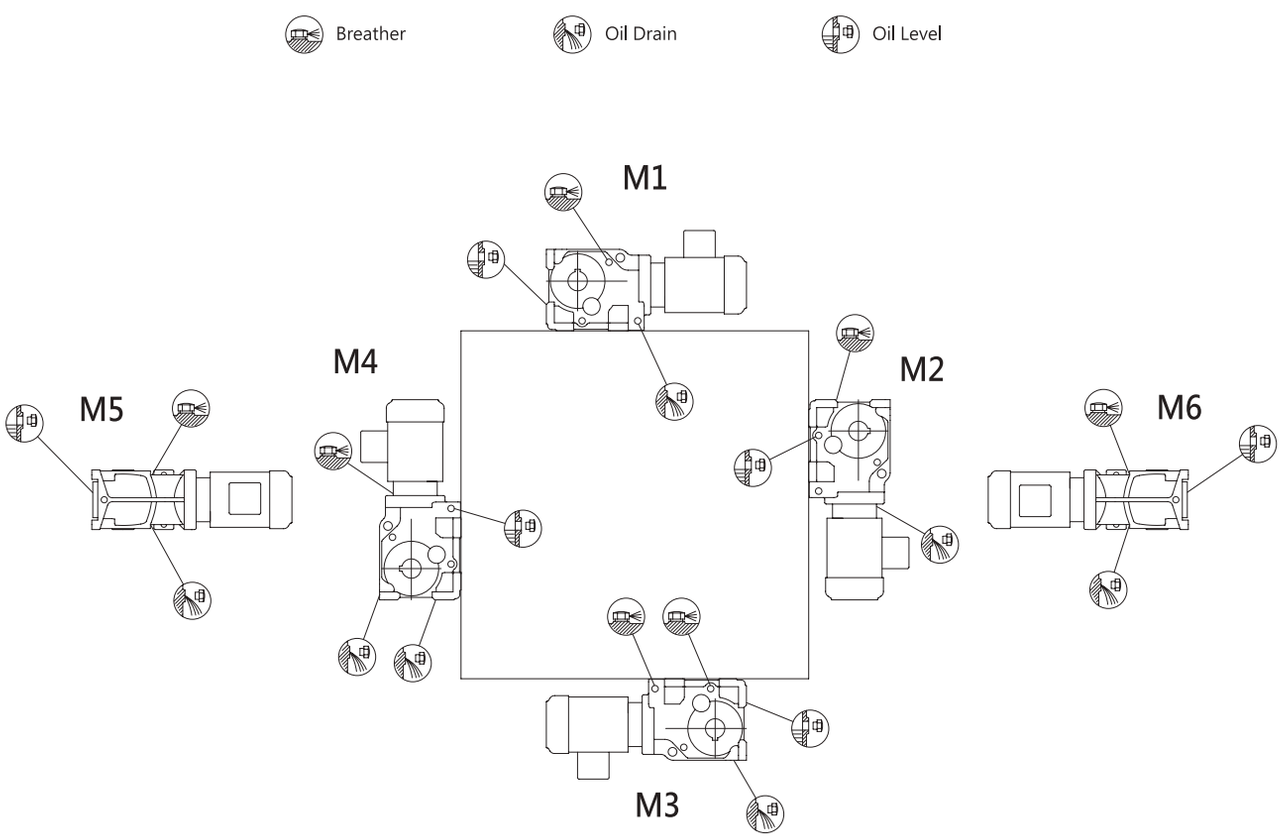


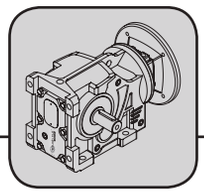
Mounting Surface

Standard mounting surface F1, unless specific requirements

The position of plug and nameplate might vary depanding on the mounting surface



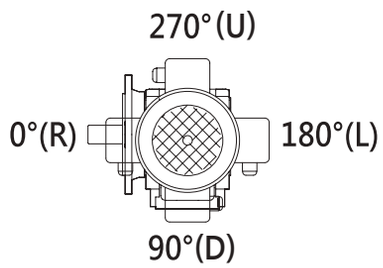


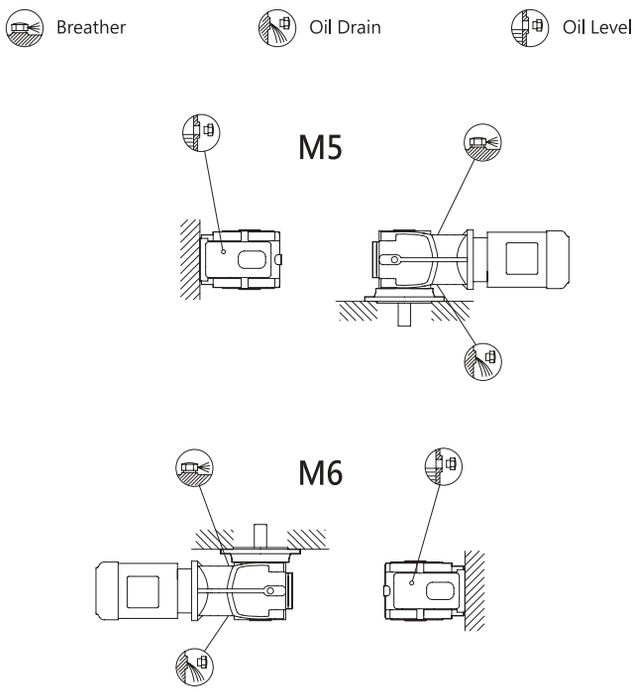


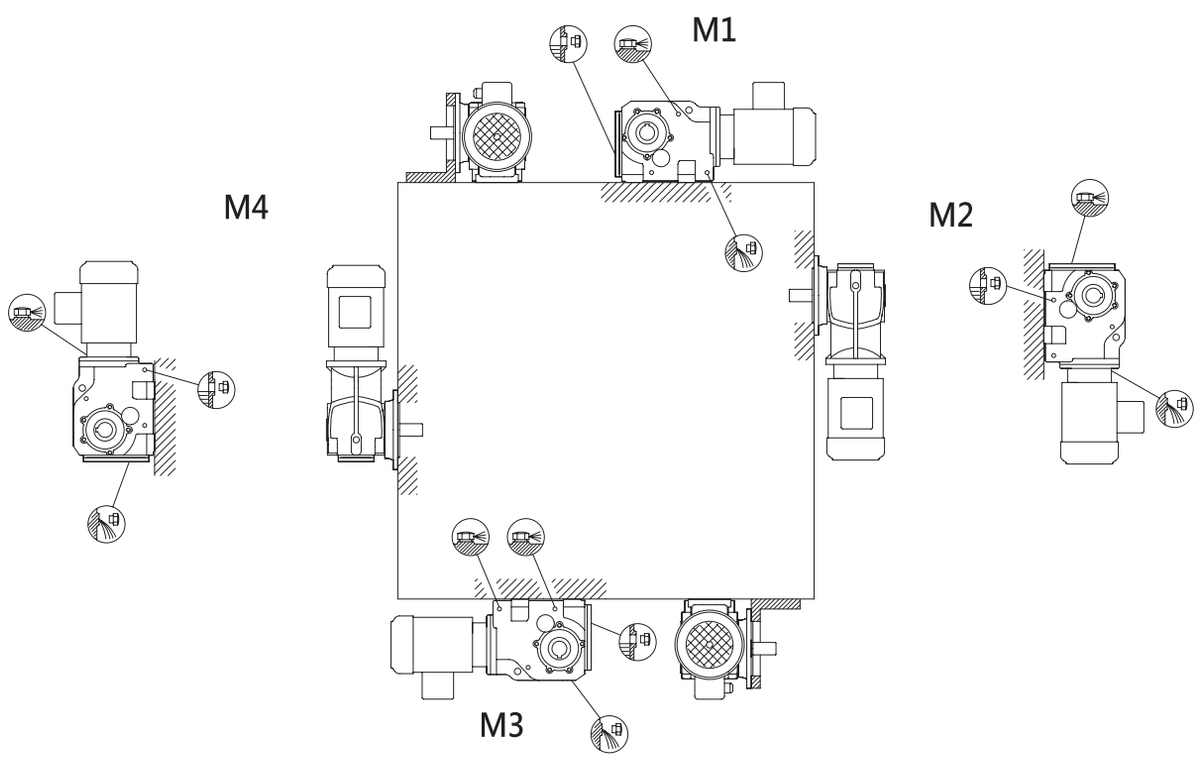
FKA../FKN../FKM../FKT..30-90

Position of Terminal Box

Standard position "U", unless specific requirements







2

2.9 Lubricant Volume

Lubricant Volume & Lubricant Selection

Standard Load, Input 600 RPM or more.				
Temperature(C°)	CPC	ISO VG	Mobil	Shell
-30～-15	HD 100	VG 100	Mobilgear 627	Omala 100
-15～-3	HD 150	VG 150	Mobilgear 629	Omala 150
-3～23	HD 220	VG 220	Mobilgear 630	Omala 220
23～40	HD 320	VG 320	Mobilgear 632	Omala 320
40～80	HD 460	VG 460	Mobilgear 634	Omala 460

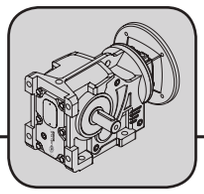
		Heavy Load, Input 600 RPM or more.		
Temperature(C°)	CPC	ISO VG	Mobil	Shell
-30～-15	HD 150	VG 150	Mobilgear 629	Omala 150
-15～-3	HD 220	VG 220	Mobilgear 630	Omala 220
-3～23	HD 320	VG 320	Mobilgear 632	Omala 320
23～40	HD 460	VG 460	Mobilgear 634	Omala 460
40～80	HD 680	VG 680	Mobilgear 636	Omala 680

output RPM<100R.P.M, please use CPC HD-220 E.P. lubricant or equivalent

output PRM<100R.P.M, please use CPC HD-320 E.P. lubricant or equivalent

Lubricant Volume (L)						
Gear unit	M1	M2	M3	M4	M5	M6
FK30	0.50	1.00	1.00	1.40	1.00	1.00
FK35	0.80	1.30	1.60	2.15	1.60	1.60
FK40	1.30	2.30	2.70	3.15	2.90	2.70
FK40*	1.10	2.40	2.70	3.70	2.60	2.60
FK50	2.10	4.10	4.60	5.90	4.40	4.40
FK60	3.70	8.20	8.80	11.1	8.00	8.00
FK70	7.00	14.7	15.7	20.0	15.7	15.7
FK90	10.0	20.5	24.0	32.4	24.0	24.0

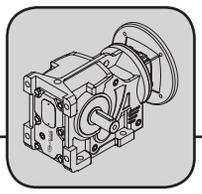
RECOMMENDATIONS



3.1 1400Rpm Permitted Combinations

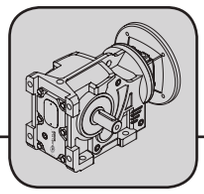
FK30 , ne=1400 1/min							200 Nm	Input bore aft
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L	mm
9.3	200	5530	150.47					Ø16
10	200	5300	134.96					
12	200	5000	116.28					
13	200	4830	106.21					
15	200	4580	92.84					
17	200	4400	83.69					
19	200	4220	75.58					
21	200	4040	67.80					
23	200	3830	59.67					
28	200	3550	49.51					
31	200	3390	44.46					
37	200	3170	37.97					Ø19
43	197	2960	32.19					
53	190	2740	26.40					
54	187	2530	25.73					
61	187	2400	23.10					
71	186	2220	19.73					
84	185	2040	16.73					
91	177	2200	15.32					
107	177	2040	13.08					
126	177	1880	11.09					
154	176	1700	9.09					
176	176	1380	7.96					
206	167	1310	6.80					
243	158	1230	5.76					
296	148	1140	4.73					

FK35 , ne=1400 1/min									400 Nm	Input bore aft
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L	100L	112M	mm
11	400	5630	130.79							Ø16
12	400	5350	116.81							
13	400	5180	108.86							
14	400	4910	96.90							
16	400	4660	86.89							Ø19
18	400	4380	76.33							
20	400	4250	71.78							
24	400	3890	58.99							
26	388	3710	53.29							
30	384	3530	47.08							
34	381	3310	41.36							
36	373	3240	38.89							
45	351	2970	31.35							
48	338	2940	28.88							
53	337	2770	26.30							
57	335	2680	24.73							
68	302	2620	20.65							
76	300	2450	18.36							
82	283	2460	16.99							
107	275	2150	13.13							
130	256	2030	10.80							
141	237	2060	9.95							
197	212	1840	7.11							
239	199	1720	5.85							



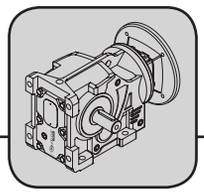
FK40 , ne=1400 1/mi									600 Nm	Input shaft mm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L	100L	112M	
9.3	600	7470	149.93							Ø19
11	600	7010	130.88							
12	600	6650	118.43							
13	600	6360	108.29							
15	600	5960	95.70							
17	600	5580	84.31							
20	600	4990	69.12							
21	600	4820	65.13							
25	600	4400	56.22							
30	600	4410	47.35							
32	580	3790	44.43							
34	577	4220	41.71							
41	575	3730	34.20							
43	572	3610	32.22							
50	500	3710	27.82							
54	470	3170	25.76							
63	444	3000	22.24							
80	406	2760	17.57							Ø24
110	397	2790	12.75							
127	385	2610	11.00							
161	370	2330	8.69							

FK40* , ne=1400 1/min									820 Nm	Input shaft mm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L	100L	112M	
9.4	820	9560	149.56							Ø19
11	820	8840	130.56							
12	820	8330	118.14							
13	820	7360	108.03							
15	793	6930	95.46							
17	764	6660	84.10							
20	720	6280	68.95							
22	707	6170	64.97							
25	676	5910	56.09							
30	687	5430	46.33							
32	630	5500	44.32							
37	648	5110	37.98							
39	636	5020	35.79							
42	578	5040	33.26							
45	609	4810	30.90							
51	545	4750	27.27							
54	535	4670	25.70							
57	567	4480	24.42							Ø24
63	512	4460	22.18							
80	477	4160	17.53							
99	482	3800	14.16							
115	461	3640	12.22							
145	429	3390	9.66							



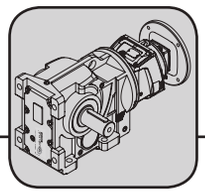
FK50 , ne=1400 1/min									1550 Nm	Input bore aft
na [1/min]	Mamax [Nm]	FRa [N]	i	80	90L	100L	112M	132S		mm
7.2	1451	16730	194.36							Ø16
7.8	1345	16080	180.17							
8.7	1200	15120	160.76							
9.7	1076	14240	144.13							
11	918	13000	122.94							
13	816	12120	109.30							
14	1550	11520	100.66							
16	1550	10740	90.08							
18	1550	9760	78.07							
22	1550	8490	64.06							Ø24
25	1506	8130	57.05							
27	1457	7870	51.18							
30	1422	7680	47.12							
35	1351	7300	39.76							Ø38
46	1233	6050	30.48							
51	1194	5860	27.34							
56	1165	5710	25.17							
62	1140	6150	22.57							
66	1107	5430	21.24							
69	1103	5960	20.24							
75	1076	5810	18.64							
89	1023	5520	15.73							
116	934	4580	12.06							
129	904	4430	10.81							
141	882	4330	9.96							
167	838	4110	8.40							

FK60 , ne=1400 1/min										2700 Nm	Input bore aft
na [1/min]	Mamax [Nm]	FRa [N]	i	80	90L	100L	112M	132S	132M	160M	mm
6.5	1602	23400	214.50								Ø19
7.4	1422	22030	190.38								
7.8	1346	21420	180.32								
9.2	1132	19540	151.59								
11	2700	17900	129.25								
12	2700	16960	117.56								
13	2700	16140	108.00								
15	2700	14830	93.84								Ø28
17	2663	13930	82.86								
19	2595	13150	72.35								Ø38
23	2517	12250	61.42								
26	2454	11550	53.63								
28	2426	11240	50.45								
32	2358	10500	43.31								
35	2319	8620	39.60								
43	2275	7530	32.41								Ø42
49	2184	7230	28.30								
53	2145	7100	26.63								
61	2049	6780	22.86								
67	1994	6600	20.90								
89	1829	6050	15.66								
109	1722	5700	12.82								
125	1654	5470	11.19								
133	1624	5370	10.53								
155	1551	5130	9.04								
169	1510	5000	8.27								

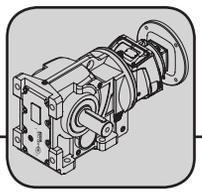


FK70 , ne=1400 1/min										4300 Nm	Input bs aft mm
na [1/min]	Mamax [Nm]	FRa [N]	i	100L	112M	132S	132M	160M	160L	180M	
8.0	4300	38060	174.75								Ø28
9.1	4300	35890	154.10								
10	4300	34370	140.71								
12	4300	31800	119.87								Ø38
12	4300	30800	112.43								
14	4300	29230	101.37								
16	4300	27450	89.79								
17	4300	25830	80.07								
20	4300	24330	71.78								
22	4300	22960	64.72								
26	4300	20420	52.96								Ø42
30	3266	21880	47.16								
33	3274	20560	42.28								
37	3280	19360	38.12								
45	3295	17110	31.19								
59	3948	13410	23.92								Ø48
66	3814	12960	21.33								
73	3692	12540	19.12								
81	3579	12160	17.24								
99	3369	11450	14.11								
111	2826	11310	12.56								
124	2735	10950	11.26								
138	2651	10610	10.16								
168	2496	9990	8.31								

FK90 , ne=1400 1/min													8000 Nm	Input bs aft mm
na [1/min]	Mamax [Nm]	FRa [N]	i	100L	112M	132S	132M	160M	160L	180M	180L	200L	225S	225M	
9.8	8000	59170	143.55												Ø28
11	8000	55370	121.95												
13	8000	52460	107.04												Ø38
14	8000	51090	100.47												
15	8000	50000	95.48												
15	8000	48930	90.70												Ø42
17	8000	46960	82.38												
19	8000	45110	75.12												
21	8000	42710	66.33												Ø48
24	8000	40150	57.78												
31	7700	36840	45.81												
33	7600	35630	41.96												
37	7400	34510	37.96												
43	7200	32630	32.59												
47	7100	31490	29.71												
61	6800	28500	22.86												
71	6600	27100	19.84												
87	6450	24840	16.13												
96	6400	23740	14.59												
130	5900	19890	10.77												
161	5400	19010	8.67												



FK35FH25 , ne=1400 1/min							400 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L
		3	3				
0.14	400	5590	10364				
0.16	400	5590	8561				
0.18	400	5590	7672				
0.20	400	5590	6987				
0.24	400	5590	5929				
0.28	400	5590	5011				
0.30	400	5590	4644				
0.34	400	5590	4085				
0.39	400	5590	3589				
0.45	400	5590	3081				
0.50	400	5590	2784				
0.59	400	5590	2366				
0.68	400	5590	2072				
0.77	400	5590	1821				
0.85	400	5590	1645				
0.97	400	5590	1445				
		3	2				
1.1	400	5590	1306				
1.2	400	5590	1177				
1.3	400	5590	1063				
1.5	400	5590	953				
1.7	400	5590	842				
2.0	400	5590	707				
2.1	400	5590	651				
2.5	400	5590	552				
2.8	400	5590	508				
3.1	400	5590	456				
3.6	400	5590	390				
4.0	400	5590	351				
4.8	400	5590	289				
5.7	400	5590	245				
6.3	400	5590	223				
6.9	400	5590	202				
8.0	400	5590	175				
9.3	400	5590	151				
11	400	5590	128				
13	400	5590	106				
14	400	5590	98				



FK40FH25 , ne=1400 1/min							600 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L
		3	3				
0.12	600	7500	11665				
0.14	600	7500	10056				
0.15	600	7500	9563				
0.17	600	7500	8473				
0.18	600	7500	7634				
0.21	600	7500	6725				
0.25	600	7500	5513				
0.28	600	7500	4993				
0.31	600	7500	4547				
0.36	600	7500	3925				
0.41	600	7500	3421				
0.46	600	7500	3038				
0.48	600	7500	2937				
0.55	600	7500	2558				
0.62	600	7500	2253				
0.67	600	7500	2084				
0.76	600	7500	1836				
		3	2				
0.83	600	7500	1693				
0.92	600	7500	1527				
1.0	600	7500	1378				
1.1	600	7500	1242				
1.4	600	7500	1022				
1.6	600	7500	903				
1.8	600	7500	795				
2.0	600	7500	700				
2.3	600	7500	621				
2.5	600	7500	556				
2.9	600	7500	489				
3.3	600	7500	421				
3.9	600	7500	363				
4.4	600	7500	319				
5.0	600	7500	281				
5.8	600	7500	240				
6.4	600	7500	217				
7.1	600	7500	197				
8.4	600	7500	167				
9.7	600	7500	144				
11	600	7500	128				
13	600	7500	111				
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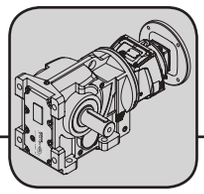
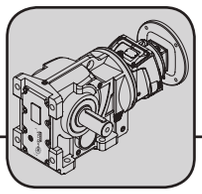
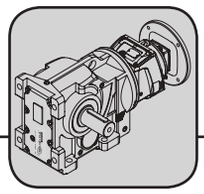


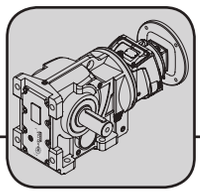
FK40*FH25 , ne=1400 1/min							820 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L
0.12	820	9500	11636				
0.14	820	9500	10031				
0.15	820	9500	9539				
0.17	820	9500	8224				
0.19	820	9500	7318				
0.22	820	9500	6447				
0.25	820	9500	5500				
0.29	820	9500	4813				
0.33	820	9500	4299				
0.38	820	9500	3725				
0.43	820	9500	3235				
0.48	820	9500	2930				
0.56	820	9500	2503				
0.62	820	9500	2248				
0.71	820	9500	1959				
0.77	820	9500	1858				
0.82	820	9500	1708				
0.92	820	9500	1523				
1.0	820	9500	1374				
1.2	820	9500	1135				
1.4	820	9500	1023				
1.6	820	9500	901				
1.7	820	9500	809				
2.0	820	9500	691				
2.3	820	9500	605				
2.6	820	9500	544				
2.8	820	9500	496				
3.2	820	9500	444				
3.6	820	9500	394				
3.9	820	9500	359				
4.3	820	9500	323				
5.1	820	9500	273				
5.7	820	9500	245				
6.3	820	9500	222				
7.3	820	9500	191				
8.5	820	9500	165				
9.9	820	9500	142				
11	820	9500	124				



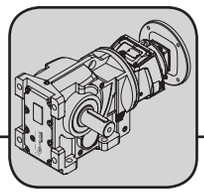
FK50FH25 , ne=1400 1/min							1550 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L
		3	3				
0.09	1550	13720	15123				
0.10	1550	13720	13928				
0.12	1550	13720	12007				
0.14	1550	13720	10117				
0.15	1550	13720	9054				
0.17	1550	13720	8245				
0.22	1550	13720	6438				
0.24	1550	13720	5863				
0.27	1550	13720	5110				
0.31	1550	13720	4472				
0.35	1550	13720	3983				
0.39	1550	13720	3573				
0.45	1550	13720	3082				
0.51	1550	13720	2765				
0.57	1550	13720	2461				
		3	2				
0.63	1550	13720	2207				
0.70	1550	13720	2008				
0.81	1550	13720	1724				
0.90	1550	13720	1557				
1.0	1550	13720	1398				
1.1	1550	13720	1254				
1.3	1550	13720	1041				
1.5	1550	13720	916				
1.7	1550	13720	806				
1.9	1550	13720	746				
2.3	1550	13720	616				
2.5	1550	13720	553				
2.9	1550	13720	485				
3.2	1550	13720	435				
3.8	1550	13720	369				
4.3	1550	13720	328				
4.8	1550	13720	294				
5.5	1550	13720	252				
6.2	1550	13720	226				
7.2	1550	13720	194				
8.0	1550	13720	175				
9.2	1550	13720	152				



FK60FH25 , ne=1400 1/min									2700 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L	100L	112M
		3	3						
0.09	2700	23422	14839						
0.11	2700	23422	12971						
0.12	2700	23422	11916						
0.14	2700	23422	10354						
0.15	2700	23422	9142						
0.18	2700	23422	7982						
0.20	2700	23422	6917						
0.24	2700	23422	5947						
0.27	2700	23422	5251						
0.31	2700	23422	4585						
0.33	2700	23422	4257						
0.39	2700	23422	3614						
0.44	2700	23422	3155						
0.51	2700	23422	2772						
0.58	2700	23422	2420						
0.63	2700	23422	2226						
		3	2						
0.68	2700	23422	2047						
0.78	2700	23422	1787						
0.84	2700	23422	1665						
0.99	2700	23422	1414						
1.1	2700	23422	1234						
1.3	2700	23422	1070						
1.4	2700	23422	978						
1.7	2700	23422	811						
1.9	2700	23422	728						
2.1	2700	23422	657						
2.5	2700	23422	562						
2.9	2700	23422	488						
3.2	2700	23422	432						
3.7	2700	23422	375						
4.2	2700	23422	331						
4.8	2700	23422	294						
5.7	2700	23422	245						
6.1	2700	23422	228						
6.9	2700	23422	201						
7.7	2700	23422	181						
8.9	2700	23422	158						
9.9	2700	23422	142						



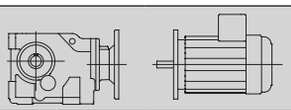
FK70FH25 , ne=1400 1/min									4300 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	63	71	80	90L	100L	112M
		3	3						
0.08	4300	38063	18129						
0.09	4300	38063	16260						
0.09	4300	38063	15130						
0.10	4300	38063	14191						
0.11	4300	38063	13226						
0.13	4300	38063	11185						
0.14	4300	38063	10106						
0.15	4300	38063	9061						
0.17	4300	38063	8169						
0.20	4300	38063	6990						
0.24	4300	38063	5953						
0.26	4300	38063	5337						
0.30	4300	38063	4665						
0.35	4300	38063	4053						
0.41	4300	38063	3420						
0.43	4300	38063	3239						
0.50	4300	38063	2775						
		3	2						
0.57	4300	38063	2457						
0.67	4300	38063	2078						
0.76	4300	38063	1843						
0.85	4300	38063	1640						
0.95	4300	38063	1471						
1.15	4300	38063	1219						
1.2	4300	38063	1165						
1.3	4300	38063	1044						
1.6	4300	38063	878						
1.8	4300	38063	770						
2.2	4300	38063	642						
2.4	4300	38063	579						
2.9	4300	38063	487						
3.7	4300	38063	380						
4.1	4300	38063	341						
4.6	4300	38063	307						
5.4	4300	38063	259						
6.1	4300	38063	229						
6.8	4300	38063	205						

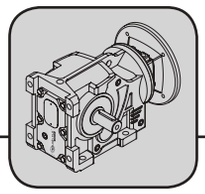


FK90FH25 , ne=1400 1/min									8000 Nm
na [1/min]	Mamax [Nm]	FRa [N]	i	71	80	90L	100L	112M	132S
		3	3						
0.10	8000	59170	14135						
0.11	8000	59170	12492						
0.13	8000	59170	10569						
0.15	8000	59170	9340						
0.17	8000	59170	8287						
0.19	8000	59170	7339						
0.23	8000	59170	6179						
0.25	8000	59170	5642						
0.28	8000	59170	5020						
0.31	8000	59170	4478						
0.36	8000	59170	3899						
0.41	8000	59170	3423						
0.46	8000	59170	3053						
0.53	8000	59170	2634						
0.61	8000	59170	2292						
0.67	8000	59170	2082						
		3	2						
0.77	8000	59170	1809						
0.87	8000	59170	1611						
0.99	8000	59170	1414						
1.2	8000	59170	1198						
1.4	8000	59170	992						
1.8	8000	59170	786						
2.0	8000	59170	685						
2.3	8000	59170	605						
2.7	8000	59170	524						
3.1	8000	59170	458						
3.6	8000	59170	393						
3.9	8000	59170	359						
4.4	8000	59170	317						
5.1	8000	59170	276						
5.6	8000	59170	249						
6.5	8000	59170	216						
7.3	8000	59170	193						
8.1	8000	59170	173						
9.0	8000	59170	156						
9.9	8000	59170	142						

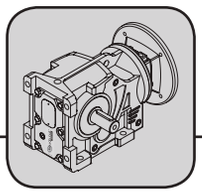
3.2 1400Rpm Selection Tables

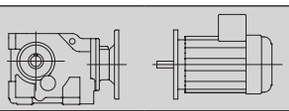
FK..F/..M

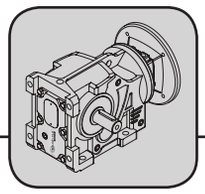
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs		m [kg]
0.12 (0.16HP)	0.20	4763	6990	38063	0.81		
	0.24	4057	5953	38063	0.95		
	0.26	3637	5337	38063	1.06		
	0.30	3179	4665	38063	1.22		
	0.35	2762	4053	38063	1.40		
	0.41	2331	3420	38063	1.66		174.4
	0.43	2219	3239	38063	1.69		164.4
	0.50	1891	2775	38063	2.05		154.2
	0.57	1726	2457	38063	2.23	FK70 FH30 63	185.7
	0.67	1468	2078	38063	2.64		171.7
	0.76	1295	1843	38063	3.08		
	0.85	1153	1640	38063	3.46		
	0.95	1035	1471	38063	3.73		
	1.15	855	1219	38063	4.50		
	1.20	818	1165	38063	4.87		
	1.34	734	1044	38063	5.25		
	0.34	2770	4257	23422	0.81		
	0.39	2463	3614	23422	0.99		
	0.44	2150	3155	23422	1.13		
	0.51	1889	2772	23422	1.29		
	0.58	1649	2420	23422	1.47		
	0.63	1517	2226	23422	1.60		115.8
	0.68	1438	2047	23422	1.74		105.6
	0.78	1255	1787	23422	2.00		101.6
	0.84	1171	1665	23422	2.07	KF60 FH30 63	123.8
	0.99	995	1414	23422	2.44		109.9
	1.13	867	1234	23422	2.89		
	1.31	752	1070	23422	3.33		
	1.43	687	978	23422	3.64		
	1.73	569	811	23422	4.24		
	1.92	511	728	23422	4.90		
	2.13	462	657	23422	5.42		
	0.57	1677	2461	13720	0.83		
	0.63	1551	2207	13720	0.93		
	0.70	1411	2008	13720	1.02		
	0.81	1211	1724	13720	1.19		
	0.90	1094	1557	13720	1.31		
	1.00	982	1398	13720	1.46		67.2
	1.12	881	1254	13720	1.63		63.1
	1.35	731	1041	13720	1.97		63.2
	1.53	643	916	13720	2.23	FK50 FH25 63	75.1
	1.74	566	806	13720	2.54		70
	1.97	500	746	13720	2.65		
	2.27	433	616	13720	3.32		
	2.53	388	553	13720	3.70		
	2.89	341	485	13720	4.22		
	3.22	306	435	13720	4.70		
	3.80	259	369	13720	5.55		
	1.23	798	1135	9500	0.95		
	1.37	718	1023	9500	1.02		
	1.55	633	901	9500	1.20		
	1.73	568	809	9500	1.34		
	2.03	485	691	9500	1.57		
	2.31	425	605	9500	1.79	FK40* FH25	40.5
	2.58	382	544	9500	1.99		38.4
	2.82	349	496	9500	2.18	63	37.8
	3.15	312	444	9500	2.44		43.8
	3.56	277	394	9500	2.75		41.2



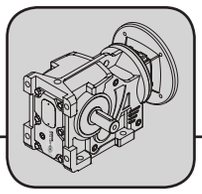
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.12 (0.16HP)	3.90	252	359	9500	3.02			
	4.34	227	323	9500	3.35			
	5.12	192	273	9500	3.96			
	5.72	172	245	9500	4.42			
	6.30	156	222	9500	4.87			
	7.31	134	191	9500	5.65			
	1.55	635	903	7500	0.88			
	1.76	559	795	7500	1.00			
	2.00	492	700	7500	1.13			
	2.25	437	621	7500	1.24			
	2.52	390	556	7500	1.43			
	2.86	344	489	7500	1.62			36.9
	3.33	296	421	7500	1.88			35.2
	3.85	255	363	7500	2.18	FK40 FH25	63	34.5
	4.39	224	319	7500	2.48			40
	4.98	197	281	7500	2.82			38.1
	5.83	169	240	7500	3.30			
	6.45	153	217	7500	3.65			
	7.11	138	197	7500	4.02			
	8.39	117	167	7500	4.75			
	9.74	101	144	7500	5.51			
	2.50	394	552	5590	0.92			
	2.75	357	508	5590	1.00			
	3.07	321	456	5590	1.12			
	3.59	274	390	5590	1.31			
	3.98	247	351	5590	1.45			29.9
	4.84	203	289	5590	1.76			29.2
	5.71	172	245	5590	2.08	FK35 FH25	63	28.8
	6.27	157	223	5590	2.28			33.2
	6.94	142	202	5590	2.53			31.2
	7.98	123	175	5590	2.91			
	9.25	106	151	5590	3.37			
	10.91	90	128	5590	3.97			
	13.25	74	106	5590	4.83			
	14.58	67	96	5590	5.31			
	9.36	112	150	16880	7.39			31.9
								30.4
						FK40*	63	29.1
								35.1
								32.6
	9.34	112	150	9890	5.41			27.9
								26.2
						FK40	63	25.5
								30.9
								28.9
	10.70	98	131	6940	4.12			21
	11.99	87	117	6700	4.62			20.2
	12.86	81	109	6560	4.96	FK35	63	19.6
	14.45	72	97	6330	5.57			23.8
								22.3
	9.30	112	150	5880	1.79			
	10.37	101	135	5690	2.00			
	12.04	87	116	5450	2.32			14.4
	13.18	79	106	5310	2.54			13.8
	15.08	69	93	5100	2.91	FK30	63	13.1
	16.73	62	84	4940	3.22			15.5
	18.52	56	76	4790	3.57			14.7
	20.65	51	68	4630	3.98			



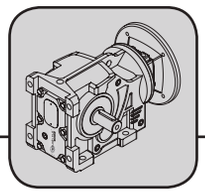
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.12 (0.16HP)	23.46	45	60	4450	4.52			
	28.28	37	50	4200	5.45			
0.18 (0.25HP)	0.30	4769	4665	38063	0.81			
	0.35	4143	4053	38063	0.93			
	0.41	3496	3420	38063	1.11			
	0.43	3328	3239	38063	1.13			
	0.50	2837	2775	38063	1.36			
	0.57	2588	2457	38063	1.49			174.4
	0.67	2202	2078	38063	1.76			164.4
	0.76	1942	1843	38063	2.05	FK70 FH30	63	154.2
	0.85	1729	1640	38063	2.31			185.7
	0.95	1543	1471	38063	2.49			171.7
	1.15	1313	1219	38063	3.00			
	1.20	1228	1165	38063	3.25			
	1.34	1101	1044	38063	3.50			
	1.60	925	878	38063	4.31			
	1.82	812	770	38063	4.91			
	2.18	676	642	38063	5.90			
	0.51	2834	2772	23422	0.86			
	0.58	2474	2420	23422	0.98			
	0.63	2276	2226	23422	1.07			
	0.68	2157	2047	23422	1.16			
	0.78	1883	1787	23422	1.33			
	0.84	1756	1665	23422	0.99			115.8
	0.99	1492	1414	23422	1.17			105.6
	1.13	1301	1234	23422	1.93	FK30 FH30	63	101.6
	1.31	1127	1070	23422	2.22			123.8
	1.43	1031	978	23422	2.43			109.9
	1.73	853	811	23422	2.83			
	1.92	767	728	23422	3.27			
	2.13	693	657	23422	3.62			
	2.49	593	562	23422	4.23			
	2.87	514	488	23422	4.87			
	3.24	455	432	23422	5.50			
	0.90	1641	1557	13720	0.88			
	1.00	1473	1398	13720	0.98			
	1.12	1322	1254	13720	1.09			
	1.35	1097	1041	13720	1.31			
	1.53	965	916	13720	1.49			
	1.74	849	806	13720	1.69			67.2
	1.88	750	746	13720	1.77			63.1
	2.27	649	616	13720	2.22	FK50 FH25	63	63.2
	2.53	583	553	13720	2.47			75.1
	2.89	511	485	13720	2.81			70
	3.22	458	435	13720	3.14			
	3.80	388	369	13720	3.70			
	4.26	346	328	13720	4.15			
	4.75	310	294	13720	4.63			
	5.55	266	252	13720	5.41			
	1.55	949	901	9500	0.80			
	1.73	853	809	9500	0.89			
	2.03	728	691	9500	1.04			
	2.31	638	605	9500	1.19			
	2.58	573	544	9500	1.33			
	2.82	523	496	9500	1.45			
	3.15	468	444	9500	1.62			40.5
	3.56	415	394	9500	1.83			38.4
	3.90	378	359	9500	2.01	FK40* FH25	63	37.8



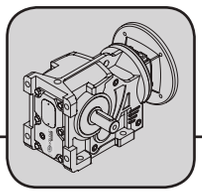
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.18	4.34	340	323	9500	2.23	FK40* FG25		43.8
(0.25HP)	5.12	288	273	9500	2.64			41.2
	5.72	258	245	9500	2.95			
	6.30	234	222	9500	3.24			
	7.31	202	191	9500	3.77			
	8.51	173	165	9500	4.38			
	9.87	150	142	9500	5.08			
	11.33	130	124	9500	5.84			
	2.25	656	621	7500	0.82			
	2.52	585	556	7500	0.95			
	2.86	516	489	7500	1.08			
	3.33	444	421	7500	1.25			
	3.85	383	363	7500	1.45			
	4.39	336	319	7500	1.66			36.9
	4.98	296	281	7500	1.88			35.2
	5.83	253	240	7500	2.20	FK40 FH25	63	34.5
	6.45	229	217	7500	2.43			40
	7.11	207	197	7500	2.68			38.1
	8.39	176	167	7500	3.16			
	9.74	152	144	7500	3.67			
	10.96	135	128	7500	4.13			
	12.58	117	111	7500	4.74			
	14.98	99	93	7500	5.65			
	3.59	411	390	5590	0.87			
	3.98	370	351	5590	0.97			
	4.84	305	289	5590	1.17			29.9
	5.71	259	245	5590	1.39			29.2
	6.27	235	223	5590	1.52	FK35 FH25	63	28.8
	6.94	213	202	5590	1.68			33.2
	7.98	185	175	5590	1.94			31.2
	9.25	159	151	5590	2.25			
	10.91	135	128	5590	2.65			
	13.25	111	106	5590	3.22			
	14.58	101	96	5590	3.54			
	9.36	168	150	16300	4.93			31.9
	10.72	146	131	15800	5.65			30.4
						FK40*	63	29.1
								35.1
								32.6
	9.34	168	150	9630	3.61			27.9
	10.70	147	131	9270	4.10			26.2
	11.82	133	118	9010	4.56	FK40	63	25.5
	12.93	121	108	8770	4.97			30.9
	14.63	107	96	8460	5.64			28.9
	10.70	147	131	6740	2.75			
	11.99	131	117	6530	3.08			21
	12.86	122	109	6400	3.30			20.2
	14.45	109	97	6190	3.71	FK35	63	19.6
	16.11	97	87	6000	4.14			23.8
	18.34	86	76	5780	4.71			22.3
	19.51	80	72	5670	5.01			
	9.30	169	150	5660	1.20			
	10.37	151	135	5500	1.33			
	12.04	130	116	5280	1.55			
	13.18	119	106	5160	1.69			
	15.08	104	93	4970	1.94			14.4
	16.73	94	84	4820	2.15			13.8
	18.52	85	76	4680	2.38	FK30	63	13.1

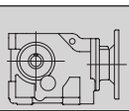
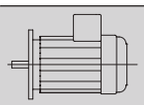


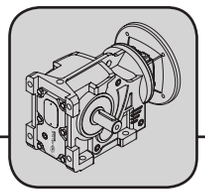
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.18	20.65	76	68	4540	2.65	FK30		15.5
(0.25HP)	23.46	67	60	4370	3.01			14.7
	28.28	56	50	4130	3.63			
	31.49	50	44	4000	4.04			
	36.87	43	38	3810	4.74			
	43.49	36	32	3620	5.51			
0.25	0.25	8011	5642	59172	0.87			
(0.34HP)	0.28	7128	5020	59172	0.98			
	0.31	6358	4478	59172	1.09			
	0.36	5536	3899	59172	1.26			
	0.41	4859	3423	59172	1.43			298
	0.46	4334	3053	59172	1.60			264
	0.53	3740	2634	59172	1.86	FK90 FH40	71	245
	0.61	3254	2292	59172	2.14			288
	0.67	2956	2082	59172	2.35			261
	0.77	2648	1809	59172	2.71			
	0.87	2358	1611	59172	3.04			
	0.99	2070	1414	59172	3.46			
	1.17	1754	1198	59172	4.09			
	0.41	4855	3420	38063	0.80			
	0.43	4623	3239	38063	0.81			
	0.50	3940	2775	38063	0.98			
	0.57	3595	2457	38063	1.07			
	0.67	3059	2078	38063	1.27			
	0.76	2698	1843	38063	1.48			174.4
	0.85	2401	1640	38063	1.66			164.4
	0.95	2157	1471	38063	1.79	FH70 FH30	71	154.2
	1.15	1782	1219	38063	2.16			185.7
	1.20	1705	1165	38063	2.34			171.7
	1.34	1529	1044	38063	2.52			
	1.60	1284	878	38063	3.11			
	1.82	1128	770	38063	3.54			
	2.18	939	642	38063	4.25			
	2.42	847	579	38063	4.71			
	2.87	713	487	38063	5.59			
	0.68	2996	2047	23422	0.84			
	0.78	2615	1787	23422	0.96			
	0.84	2440	1665	23422	0.99			
	0.99	2072	1414	23422	1.17			
	1.13	1807	1234	23422	1.39			
	1.31	1566	1070	23422	1.60			
	1.43	1432	978	23422	1.75			115.8
	1.73	1185	811	23422	2.04			105.6
	1.92	1065	728	23422	2.35	FK60 FH30	71	101.6
	2.13	962	657	23422	2.60			123.8
	2.49	823	562	23422	3.04			109.9
	2.87	714	488	23422	3.51			
	3.24	632	432	23422	3.96			
	3.74	549	375	23422	4.57			
	4.23	484	331	23422	5.17			
	4.76	430	294	23422	5.82			
	1.35	1523	1041	13720	0.94			
	1.53	1340	916	13720	1.07			
	1.74	1180	806	13720	1.22			
	1.88	1041	746	13720	1.27			
	2.27	901	616	13720	1.59			
	2.53	809	553	13720	1.78			67.2
	2.89	710	485	13720	2.03	FK50 FH25		63.1



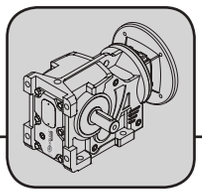
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.25 (0.34HP)	3.22	636	435	13720	2.26	FK50 FH25	71	63.2
	3.80	540	369	13720	2.66			75.1
	4.26	481	328	13720	2.99			70
	4.75	431	294	13720	3.33			
	5.55	369	252	13720	3.89			
	6.19	331	226	13720	4.34			
	7.22	284	194	13720	5.06			
	7.98	257	175	13720	5.60			
	2.31	886	605	9500	0.86			
	2.58	796	544	9500	0.96			
	2.82	726	496	9500	1.05			
	3.15	650	444	9500	1.17			
	3.56	576	394	9500	1.32			
	3.90	525	359	9500	1.45			40.5
	4.34	472	323	9500	1.61			38.4
	5.12	400	273	9500	1.90	FK40* FH25	71	37.8
	5.72	358	245	9500	2.12			43.8
	6.30	325	222	9500	2.34			41.2
	7.31	280	191	9500	2.71			
	8.51	241	165	9500	3.16			
	9.87	208	142	9500	3.66			
	11.33	181	124	9500	4.20			
	3.33	616	421	7500	0.90			
	3.85	532	363	7500	1.05			
	4.39	467	319	7500	1.19			
	4.98	411	281	7500	1.35			
	5.83	351	240	7500	1.58			36.9
	6.45	318	217	7500	1.75			35.2
	7.11	288	197	7500	1.93	FK40 FH25	71	34.5
	8.39	244	167	7500	2.28			40
	9.74	210	144	7500	2.64			38.1
	10.96	187	128	7500	2.98			
	12.58	163	111	7500	3.42			
	14.98	137	93	7500	4.07			
	4.84	424	289	5590	0.85			
	5.71	359	245	5590	1.00			
	6.27	327	223	5590	1.10			29.9
	6.94	295	202	5590	1.21			29.2
	7.98	257	175	5590	1.39	FK35 FH25	71	28.8
	9.25	221	151	5590	1.62			33.2
	10.91	188	128	5590	1.91			31.2
	13.25	155	106	5590	2.32			
	14.58	141	96	5590	2.55			
	9.36	233	150	15630	3.55			31.9
	10.72	203	131	15210	4.07			30.4
	11.85	184	118	14900	4.49	FH40*	71	29.1
	12.96	168	108	14620	4.91			35.1
	14.67	149	95	14220	5.38			32.6
	16.65	131	84	13820	5.88			
	9.34	233	150	9340	2.60			
	10.70	204	131	9010	2.95			27.9
	11.82	184	118	8770	3.28			26.2
	12.93	169	108	8560	3.58	FH40	71	25.5
	14.63	149	96	8270	4.06			30.9
	16.61	131	84	7980	4.60			28.9
	20.26	108	69	7540	5.61			
	21.50	101	65	7410	5.97			
	10.70	204	131	6510	1.98			

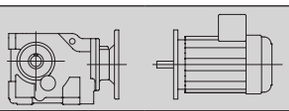


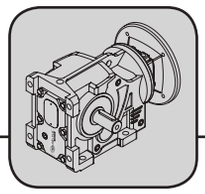
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.25 (0.34HP)	11.99	182	117	6330	2.22			
	12.86	169	109	6220	2.38			
	14.45	151	97	6030	2.67			21
	16.11	135	87	5850	2.98			20.2
	18.34	119	76	5650	3.39	FK35	71	19.6
	19.51	112	72	5550	3.61			23.8
	23.73	92	59	5280	4.39			22.3
	26.27	83	53	5100	4.71			
	29.74	73	47	4940	5.28			
	33.85	64	41	4750	5.96			
	9.30	234	150	5660	0.86			
	10.37	210	135	5500	0.96			
	12.04	181	116	5280	1.11			
	13.18	165	106	5160	1.22			
	15.08	144	93	4970	1.39			
	16.73	130	84	4820	1.55			14.4
	18.52	118	76	4680	1.71			13.8
	20.65	106	68	4540	1.91	FK30	71	13.1
	23.46	93	60	4370	2.17			15.5
	28.28	77	50	4130	2.62			14.7
	31.49	69	44	4000	2.91			
	36.87	59	38	3810	3.41			
	43.49	50	32	3620	3.97			
	53.04	41	26	3400	4.66			
	54.42	40	26	3350	4.71			
	60.61	36	23	3240	5.25			
0.37 (0.5HP)	0.36	8194	3899	59172	0.85			
	0.41	7192	3423	59172	0.97			
	0.46	6415	3053	59172	1.08			
	0.53	5535	2634	59172	1.26			298
	0.61	4816	2292	59172	1.44			264
	0.67	4374	2082	59172	1.59	FK90 FH40	71	245
	0.77	3919	1809	59172	1.83			288
	0.87	3490	1611	59172	2.05			261
	0.99	3063	1414	59172	2.34			
	1.17	2596	1198	59172	2.76			
	1.41	2150	992	59172	3.33			
	1.78	1703	786	59172	4.21			
	0.67	4527	2078	38063	0.86			
	0.76	3992	1843	38063	1.00			
	0.85	3554	1640	38063	1.12			
	0.95	3192	1471	38063	1.21			
	1.15	2637	1219	38063	1.46			
	1.20	2523	1165	38063	1.58			174.4
	1.34	2263	1044	38063	1.70			164.4
	1.60	1901	878	38063	2.10	FK80 FH30	71	154.2
	1.82	1669	770	38063	2.39			185.7
	2.18	1390	642	38063	2.87			171.9
	2.42	1253	579	38063	3.18			
	2.87	1056	487	38063	3.78			
	3.68	823	380	38063	4.85			
	4.11	738	341	38063	5.41			
	4.56	665	307	38063	6.00			
	1.13	2674	1234	23422	0.94			
	1.31	2317	1070	23422	1.08			
	1.43	2119	978	23422	1.18			
	1.73	1753	811	23422	1.38			
	1.92	1576	728	23422	1.59	FK60 FH30		115.8

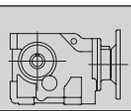
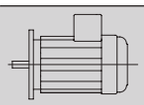


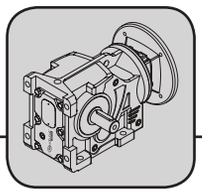
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.37	2.13	1424	657	23422	1.76			105.6
(0.5HP)	2.49	1218	562	23422	2.06	FK60 FH30	71	101.6
	2.87	1057	488	23422	2.37			123.8
	3.24	936	432	23422	2.68			109.9
	3.74	812	375	23422	3.09			
	4.23	717	331	23422	3.49			
	4.76	637	294	23422	3.93			
	5.71	531	245	23422	4.71			
	6.14	494	228	23422	5.07			
	6.95	436	201	23422	5.74			
	1.74	1746	806	13720	0.82			
	1.88	1541	746	13720	0.86			
	2.27	1334	616	13720	1.08			
	2.53	1198	553	13720	1.20			
	2.89	1050	485	13720	1.37			67.2
	3.22	942	435	13720	1.53			63.7
	3.80	799	369	13720	1.80	FK50 FH25	71	64.2
	4.26	711	328	13720	2.02			75.1
	4.75	638	294	13720	2.25			70
	5.55	547	252	13720	2.63			
	6.19	490	226	13720	2.93			
	7.22	420	194	13720	3.42			
	7.98	380	175	13720	3.78			
	9.21	329	152	13720	4.36			
	3.56	853	394	9500	0.89			
	3.90	777	359	9500	0.98			
	4.34	699	323	9500	1.09			40.4
	5.12	592	273	9500	1.28			38.4
	5.72	530	245	9500	1.43	FK40* FH25	71	37.8
	6.30	482	222	9500	1.58			43.8
	7.31	415	191	9500	1.83			41.2
	8.51	356	165	9500	2.13			
	9.87	307	142	9500	2.47			
	11.33	268	124	9500	2.84			
	4.39	691	319	7500	0.81			
	4.98	609	281	7500	0.91			
	5.83	520	240	7500	1.07			36.9
	6.45	470	217	7500	1.18			35.2
	7.11	426	197	7500	1.31	FK40 FH25	71	34.5
	8.39	361	167	7500	1.54			40
	9.74	311	144	7500	1.79			38.1
	10.96	277	128	7500	2.01			
	12.58	241	111	7500	2.31			
	14.98	203	93	7500	2.75			
	6.94	437	202	5590	0.82			29.9
	7.98	380	175	5590	0.94			29.2
	9.25	328	151	5590	1.09	FK35 FH25	71	28.8
	10.91	278	128	5590	1.29			33.2
	13.25	229	106	5590	1.57			31.2
	14.58	208	96	5590	1.72			
	9.36	344	150	14470	2.40			
	10.72	301	131	14200	2.75			
	11.85	272	118	13990	3.04			31.9
	12.96	249	108	13780	3.32			30.4
	14.67	220	95	13490	3.63	FK40*	71	29.1
	16.65	194	84	13170	3.97			35.1
	20.31	159	69	12650	4.57			32.6
	21.55	150	65	12490	4.76			

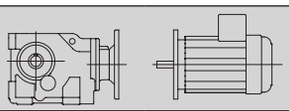


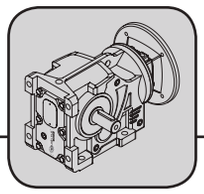
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs		m [kg]
0.37	24.96	129	56	12100	5.27		
(0.5HP)	9.34	345	150	8800	1.75		
	10.70	301	131	8550	2.00		
	11.82	273	118	8360	2.22		
	12.93	249	108	8190	2.42		27.9
	14.63	220	96	7950	2.74		26.2
	16.61	194	84	7700	3.10	FK40 71	25.5
	20.26	159	69	7310	3.79		30.9
	21.50	150	65	7190	4.03		28.9
	24.90	129	56	6910	4.68		
	29.57	109	47	6690	5.54		
	31.51	102	44	6460	5.71		
	10.70	301	131	6090	1.32		
	11.99	269	117	5960	1.48		
	12.86	251	109	5870	1.59		
	14.45	223	97	5730	1.78		
	16.11	200	87	5590	1.99		
	18.34	176	76	5420	2.26		21
	19.51	165	72	5340	2.41		20.2
	23.73	136	59	5110	2.93	FK35 71	19.6
	26.27	123	53	4940	3.14		23.8
	29.74	108	47	4810	3.52		22.3
	33.85	95	41	4640	3.97		
	36.00	90	39	4560	4.14		
	44.66	72	31	4260	4.83		
	48.48	67	29	4180	5.05		
	53.24	61	26	4050	5.53		
	56.62	57	25	3970	5.86		
	16.73	193	84	4430	1.05		
	18.52	174	76	4330	1.16		
	20.65	156	68	4220	1.29		
	23.46	137	60	4100	1.47		
	28.28	114	50	3910	1.77		
	31.49	102	44	3800	1.97		14.5
	36.87	87	38	3650	2.30		13.8
	43.49	74	32	3480	2.68	FK30 71	3.1
	53.04	61	26	3290	3.15		15.5
	54.42	59	26	3220	3.19		14.7
	60.61	53	23	3120	3.55		
	70.95	45	20	2980	4.13		
	83.69	39	17	2840	4.84		
	91.41	35	15	2800	5.06		
	107.02	30	13	2670	5.93		
0.55	0.61	7159	2292	59172	0.97		
(0.74HP)	0.67	6502	2082	59172	1.07		
	0.77	5825	1809	59172	1.23		
	0.87	5188	1611	59172	1.38		298
	0.99	4554	1414	59172	1.57		264
	1.17	3859	1198	59172	1.86	FK90 FH40 80	245
	1.41	3196	992	59172	2.24		288
	1.78	2531	786	59172	2.83		261
	2.04	2205	685	59172	3.25		
	2.31	1949	605	59172	3.68		
	2.67	1689	524	59172	4.24		
	0.95	4746	1471	38063	0.81		
	1.15	3920	1219	38063	0.98		
	1.20	3751	1165	38063	1.06		
	1.34	3364	1044	38063	1.14		



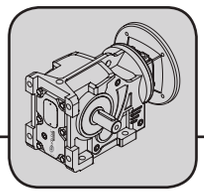
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.55	1.60	2826	878	38063	1.41			174.4
(0.74HP)	1.82	2481	770	38063	1.61			164.4
	2.18	2066	642	38063	1.93	FK80 FH30	80	154.2
	2.42	1863	579	38063	2.14			185.7
	2.87	1569	487	38063	2.54			171.9
	3.68	1224	380	38063	3.26			
	4.11	1097	341	38063	3.64			
	4.56	989	307	38063	4.03			
	5.41	833	259	38063	4.79			
	6.12	737	229	38063	5.41			
	1.43	3150	978	23422	0.80			
	1.73	2606	811	23422	0.93			
	1.92	2343	728	23422	1.07			
	2.13	2117	657	23422	1.18			
	2.49	1811	562	23422	1.38			
	2.87	1572	488	23422	1.59			
	3.24	1391	432	23422	1.80			115.8
	3.74	1207	375	23422	2.08			105.6
	4.23	1066	331	23422	2.35	FK60 FH30	80	101.6
	4.76	947	294	23422	2.65			123.8
	5.71	790	245	23422	3.17			109.9
	6.14	734	228	23422	3.41			
	6.95	649	201	23422	3.86			
	7.75	582	181	23422	4.30			
	8.85	509	158	23422	4.92			
	9.87	457	142	23422	5.48			
	2.53	1780	553	13720	0.81			
	2.89	1561	485	13720	0.92			
	3.22	1400	435	13720	1.03			
	3.80	1187	369	13720	1.21			67.2
	4.26	1057	328	13720	1.36			63.7
	4.75	948	294	13720	1.52	FK50 FH25	80	64.2
	5.55	812	252	13720	1.77			75.1
	6.19	728	226	13720	1.97			70
	7.22	625	194	13720	2.30			
	7.98	565	175	13720	2.55			
	9.21	490	152	13720	2.94			
	5.12	880	273	9500	0.86			
	5.72	788	245	9500	0.96			40.4
	6.30	716	222	9500	1.06			38.4
	7.31	616	191	9500	1.23	FK40* FH25	80	37.8
	8.51	530	165	9500	1.43			43.8
	9.87	457	142	9500	1.66			41.2
	11.33	398	124	9500	1.91			
	6.45	880	217	7500	0.80			
	7.11	788	197	7500	0.88			36.9
	8.39	716	167	7500	1.04			35.2
	9.74	616	144	7500	1.20	FK40 FH25	80	34.5
	10.96	530	128	7500	1.35			40
	12.58	457	111	7500	1.55			38.1
	14.98	398	93	7500	1.85			
	10.91	413	128	5590	0.87			29.9
	13.25	340	106	5590	1.05			29.2
	14.58	309	96	5590	1.16	FK35 FH25	80	28.8
								33.2
								31.2
	9.36	512	150	12750	1.61			
	10.72	447	131	12700	1.85			



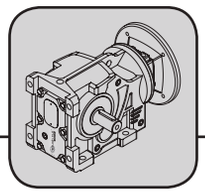
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs		m [kg]
0.55	11.85	404	118	12620	2.04		
(0.74HP)	12.96	370	108	12540	2.23		
	14.67	327	95	12380	2.44		
	16.65	288	84	12200	2.67		31.9
	20.31	236	69	11860	3.07		30.4
	21.55	222	65	11740	3.20	FK40* 80	29.1
	24.96	192	56	11450	3.55		35.1
	30.22	159	46	11010	4.36		32.6
	31.59	152	44	10950	4.18		
	36.86	130	38	10580	5.02		
	39.11	123	36	10450	5.23		
	42.09	114	33	10310	5.12		
	45.31	106	31	10120	5.80		
	51.34	93	27	9860	5.88		
	9.34	513	150	7940	1.18		
	10.70	448	131	7820	1.34		
	11.82	405	118	7700	1.49		
	12.93	371	108	7590	1.63		
	14.63	328	96	7430	1.84		
	16.61	289	84	7250	2.09		
	20.26	237	69	6940	2.55		27.9
	21.50	223	65	6850	2.71		26.2
	24.90	192	56	6620	3.15	FK40 80	25.5
	29.57	162	47	6500	3.73		30.9
	31.51	152	44	6240	3.84		28.9
	33.56	143	42	6280	4.07		
	40.94	117	34	5930	4.95		
	43.45	110	32	5830	5.22		
	50.33	95	28	5590	5.29		
	54.35	88	26	5380	5.37		
	62.95	76	22	5150	5.88		
	10.70	448	131	5400	0.90		
	11.99	400	117	5350	1.01		
	12.86	373	109	5320	1.08		
	14.45	332	97	5240	1.21		
	16.11	297	87	5160	1.35		
	18.34	261	76	5050	1.54		
	19.51	246	72	4990	1.64		
	23.73	202	59	4840	2.00		21
	26.27	182	53	4690	2.14		20.2
	29.74	161	47	4600	2.40	FK35 80	19.6
	33.85	142	41	4460	2.71		23.8
	36.00	133	39	4390	2.82		22.3
	44.66	107	31	4120	3.29		
	48.48	99	29	4060	3.44		
	53.24	90	26	3930	3.77		
	56.62	85	25	3870	3.99		
	67.81	71	21	3700	4.31		
	76.26	63	18	3550	4.82		
	82.41	58	17	3490	4.91		
	20.65	232	68	3890	0.87		
	23.46	204	60	3810	0.99		
	28.28	169	50	3680	1.19		
	31.49	152	44	3600	1.32		
	36.87	130	38	3480	1.55		14.5
	43.49	110	32	3340	1.80		13.8
	53.04	90	26	3180	2.12	FK30 80	13.1
	54.42	88	26	3080	2.14		15.5



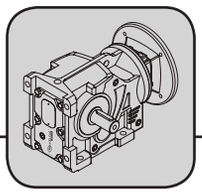
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.55	60.61	79	23	3000	2.39	FK30		14.7
(0.74HP)	70.95	68	20	2880	2.78			
	83.69	57	17	2760	3.26			
	91.41	52	15	2740	3.40			
	107.02	45	13	2620	3.99			
	126.23	38	11	2490	4.69			
	153.95	31	9	2350	5.71			
0.75	0.77	7943	1809	59172	0.90			
(1HP)	0.87	7075	1611	59172	1.01			
	0.99	6209	1414	59172	1.15			
	1.17	5262	1198	59172	1.36			300
	1.41	4358	992	59172	1.64			266
	1.78	3452	786	59172	2.08	FK90 FH40	80	247
	2.04	3007	685	59172	2.38			290
	2.31	2657	605	59172	2.70			263
	2.67	2303	524	59172	3.11			
	3.06	2010	458	59172	3.56			
	3.56	1728	393	59172	4.15			
	1.34	4588	1044	38063	0.84			
	1.60	3853	878	38063	1.04			
	1.82	3383	770	38063	1.18			
	2.18	2818	642	38063	1.42			176.2
	2.42	2541	579	38063	1.57			166.2
	2.87	2140	487	38063	1.86	FK80 FH30	80	155.9
	3.68	1669	380	38063	2.39			187.5
	4.11	1496	341	38063	2.67			173.7
	4.56	1349	307	38063	2.96			
	5.41	1136	259	38063	3.51			
	6.12	1005	229	38063	3.97			
	6.82	901	205	38063	4.43			
	2.13	2886	657	23422	0.87			
	2.49	2470	562	23422	1.01			
	2.87	2143	488	23422	1.17			
	3.24	1897	432	23422	1.32			
	3.74	1646	375	23422	1.52			117.6
	4.23	1453	331	23422	1.72			107.4
	4.76	1291	294	23422	1.94	FK60 FH30	80	104.7
	5.71	1077	245	23422	2.33			126.9
	6.14	1001	228	23422	2.50			112.5
	6.95	885	201	23422	2.83			
	7.75	794	181	23422	3.16			
	8.85	694	158	23422	3.61			
	9.87	623	142	23422	4.02			
	3.80	1619	369	13720	0.89			
	4.26	1442	328	13720	1.00			68.9
	4.75	1293	294	13720	1.11			64.4
	5.55	1108	252	13720	1.30	FK50 FH25	80	65.2
	6.19	993	226	13720	1.45			76.9
	7.22	852	194	13720	1.69			71.7
	7.98	770	175	13720	1.87			
	9.21	668	152	13720	2.15			
	7.31	841	191	9500	0.90			42.2
	8.51	722	165	9500	1.05			40
	9.87	623	142	9500	1.22	FK40* FH25	80	39.1
	11.33	543	124	9500	1.40			45.5
								42.9
	9.74	631	144	7500	0.88			38.6
	10.96	561	128	7500	0.99	FK40 FH25		35.9

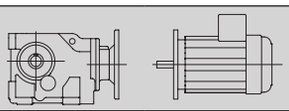


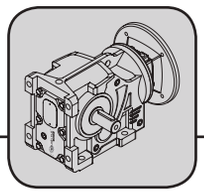
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]	
0.75 (1HP)	12.58	489	111	7500	1.14		80	36.2	
	14.98	410	93	7500	1.36	FK40 FH25		41.7	
								39.7	
	14.58	422	96	5590	0.85		80	31.5	
								30.9	
						FK35 FH25		30.5	
								34.9	
								32.9	
	6.53	1001	215	33240	1.60		80		
	7.35	889	190	32520	1.60			98.1	
	7.76	842	180	32180	1.60			91.2	
	9.24	708	152	31080	1.60	FK60		87	
	10.83	603	129	30040	4.51			104	
	11.91	549	118	29410	4.96			95.3	▲
	12.96	504	108	28850	5.39				▲
	7.20	907	194	18530	1.60		80		
	7.77	841	180	18480	1.60				
	8.71	750	161	18360	1.60				
	9.71	673	144	18190	1.60			59.9	
	11.39	574	123	17890	1.60			55.7	
	12.81	510	109	17610	1.60	FK50		56.6	
	13.91	470	101	17410	3.32			67.2	
	15.54	420	90	17110	3.71			63	
	17.93	364	78	16700	4.28				
	21.85	299	64	16090	5.22				▲
	24.54	266	57	15720	5.86				▲
	9.36	698	150	10820	1.18				
	10.72	609	131	11020	1.36				
	11.85	551	118	11110	1.50				
	12.96	504	108	11150	1.64				
	14.67	446	95	11160	1.79				
	16.65	393	84	11120	1.96				
	20.31	322	69	10970	2.25				
	21.55	303	65	10910	2.35			33.6	
	24.96	262	56	10730	2.60			31	
	30.22	216	46	10400	3.20	FK40*	80	30.6	
	31.59	207	44	10380	3.07			36.6	
	36.86	177	38	10080	3.68			34.1	
	39.11	167	36	9980	3.84				
	42.09	155	33	9880	3.75				
	45.31	144	31	9710	4.25				
	51.34	127	27	9500	4.31				
	54.48	120	26	9390	4.49				
	57.33	114	24	9260	5.01				
	63.11	104	22	9100	4.98				
	79.86	82	18	8630	5.87				
	11.82	553	118	6930	1.09				
	12.93	505	108	6890	1.19				
	14.63	447	96	6820	1.35				
	16.61	394	84	6720	1.53				
	20.26	323	69	6520	1.87				
	21.50	304	65	6460	1.99			30.2	
	24.90	262	56	6280	2.31			28.6	
	29.57	221	47	6270	2.74	FK40	80	27.5	
	31.51	207	44	5980	2.81			32.9	
	33.56	195	42	6080	2.98			30.9	
	40.94	160	34	5780	3.63				
	43.45	150	32	5690	3.83				



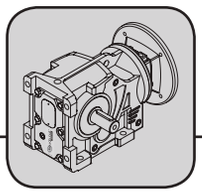
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
0.75	50.33	130	28	5460	3.88			
(1HP)	54.35	120	26	5230	3.93			
	62.95	104	22	5030	4.31			
	79.66	82	18	4710	4.98			
	16.11	406	87	4640	0.99			
	18.34	356	76	4600	1.13			
	19.51	335	72	4580	1.20			
	23.73	275	59	4520	1.46			
	26.27	249	53	4400	1.57			
	29.74	220	47	4360	1.76			
	33.85	193	41	4250	1.99			22.8
	36.00	182	39	4190	2.07			21.9
	44.66	146	31	3960	2.41	FK35	80	21.3
	48.48	135	29	3920	2.53			25.5
	53.24	123	26	3800	2.77			24
	56.62	115	25	3740	2.93			
	67.81	96	21	3600	3.16			
	76.26	86	18	3460	3.53			
	82.41	79	17	3410	3.60			
	106.66	61	13	3160	4.52			
	129.63	50	11	2990	5.11			
	140.74	46	10	2930	5.14			
	36.87	177	38	3280	1.14			
	43.49	150	32	3180	1.32			
	53.04	123	26	3050	1.55			
	54.42	120	26	2920	1.57			
	60.61	108	23	2860	1.75			16.2
	70.95	92	20	2760	2.04			15.6
	83.69	78	17	2660	2.39	FK30	80	14.9
	91.41	72	15	2670	2.50			17.3
	107.02	61	13	2560	2.92			16.4
	126.23	52	11	2440	3.44			
	153.95	42	9	2310	4.19			
	175.93	37	8	2190	4.78			
	205.96	32	7	2090	5.31			
	242.95	27	6	1990	5.92			
1.1	1.17	7717	1198	59172	0.93			
(1.5HP)	1.41	6391	992	59172	1.12			
	1.78	5062	786	59172	1.42			
	2.04	4410	685	59172	1.62			300
	2.31	3898	605	59172	1.84			266
	2.67	3378	524	59172	2.12	FK90 FH40	90	247
	3.06	2948	458	59172	2.43			290
	3.56	2534	393	59172	2.83			263
	3.90	2310	359	59172	3.10			
	4.42	2040	317	59172	3.51			
	5.07	1777	276	59172	4.03			
	1.82	4962	770	38063	0.80			
	2.18	4133	642	38063	0.97			
	2.42	3726	579	38063	1.07			176.2
	2.87	3138	487	38063	1.27			166.2
	3.68	2447	380	38063	1.63	FK80 FH30	90	155.9
	4.11	2194	341	38063	1.82			187.5
	4.56	1978	307	38063	2.02			173.7
	5.41	1667	259	38063	2.39			
	6.12	1474	229	38063	2.71			
	6.82	1322	205	38063	3.02			
	2.87	3143	488	23422	0.80			

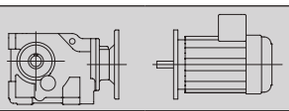


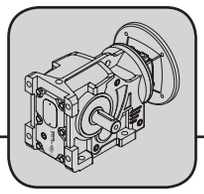
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs		m [kg]	
1.1 (1.5HP)	3.24	2782	432	23422	0.90			
	3.74	2414	375	23422	1.04			
	4.23	2131	331	23422	1.18		117.6	
	4.76	1893	294	23422	1.32		107.4	
	5.71	1580	245	23422	1.59	FK60 FH30 90	104.7	
	6.14	1469	228	23422	1.71		126.9	
	6.95	1298	201	23422	1.93		112.5	
	7.75	1164	181	23422	2.15			
	8.85	1018	158	23422	2.46			
	9.87	914	142	23422	2.74			
	5.55	1625	252	13720	0.88		68.9	
	6.19	1457	226	13720	0.99		64.4	
	7.22	1249	194	13720	1.15	FK50 FH25 90	65.2	
	7.98	1130	175	13720	1.27		76.9	
	9.21	979	152	13720	1.47		71.7	
	9.87	914	142	9500	0.83		42.2	
	11.33	796	124	9500	0.95		40	
						FK40* FH25 90	39.1	
							45.5	
							42.9	
	14.98	602	93	7500	0.92		38.6	
							35.9	
						FK40 FH25 90	36.2	
							41.7	
							39.7	
	6.53	1468	215	30530	1.10			
	7.35	1303	190	30120	1.10			
	7.76	1234	180	29910	1.10		98.1	
	9.24	1038	152	29170	1.10		91.2	
	10.83	885	129	28410	3.07	FK60 90	87	
	11.91	805	118	27930	3.38		104	▲
	12.96	739	108	27490	3.68		95.3	▲
	14.92	642	94	26740	4.23			▲
	16.90	567	83	26060	4.73			▲
	19.35	495	72	25300	5.28			▲
	7.20	1330	194	15150	1.10			
	7.77	1233	180	15350	1.10			
	8.71	1100	161	15560	1.10			
	9.71	987	144	15690	1.10			
	11.39	842	123	15750	1.10		59.9	
	12.81	748	109	15710	1.10		55.7	
	13.91	689	101	15660	2.27	FK50 90	56.6	
	15.54	617	90	15540	2.53		67.2	
	17.93	534	78	15340	2.92		63	
	21.85	439	64	14970	3.56			▲
	24.54	391	57	14730	4.00			▲
	27.36	350	51	14470	4.46			▲
	29.71	323	47	14270	4.84			▲
	35.21	272	40	13840	5.53			▲
	9.36	1024	150	1820	0.81			
	10.72	894	131	6440	0.92			
	11.85	809	118	8450	1.02			
	12.96	739	108	8720	1.12			
	14.67	653	95	9010	1.22			
	16.65	576	84	9230	1.34			
	20.31	472	69	9420	1.54			
	21.55	445	65	9450	1.60			
	24.96	384	56	9470	1.77	FK40*	33.6	



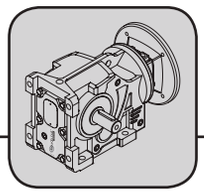
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
1.1	30.22	317	46	9340	2.18	FK40*		31
(1.5HP)	31.59	303	44	9380	2.09		90	30.6
	36.86	260	38	9200	2.51			36.6
	39.11	245	36	9150	2.62			34.1
	42.09	228	33	9130	2.56			
	45.31	212	31	9000	2.90			
	51.34	187	27	8890	2.94			
	54.48	176	26	8810	3.06			
	57.33	167	24	8700	3.42			
	63.11	152	22	8600	3.39			
	79.86	120	18	8240	4.00			
	98.89	97	14	7860	5.01			
	114.55	84	12	7620	5.55			
	12.93	741	108	5520	0.81			
	14.63	655	96	5640	0.92			
	16.61	577	84	5710	1.04			
	20.26	473	69	5720	1.27			
	21.50	446	65	5710	1.36			
	24.90	385	56	5650	1.57			
	29.57	324	47	5830	1.87			30.2
	31.51	304	44	5490	1.92			28.6
	33.56	286	42	5700	2.03	FK40	90	27.5
	40.94	234	34	5480	2.48			32.9
	43.45	221	32	5410	2.61			30.9
	50.33	190	28	5230	2.64			
	54.35	176	26	4970	2.68			
	62.95	152	22	4800	2.94			
	79.66	120	18	4540	3.40			
	109.84	87	13	4260	4.58			
	127.24	75	11	4080	5.15			
	19.51	491	72	3760	0.82			
	23.73	404	59	3870	1.00			
	26.27	365	53	3830	1.07			
	29.74	322	47	3860	1.20			
	33.85	283	41	3830	1.36			
	36.00	266	39	3810	1.41			
	44.66	215	31	3660	1.65			22.8
	48.48	198	29	3650	1.72			21.9
	53.24	180	26	3550	1.89	FK35	90	21.3
	56.62	169	25	3510	2.00			25.5
	67.81	141	21	3420	2.15			24
	76.26	126	18	3300	2.41			
	82.41	116	17	3270	2.45			
	106.66	90	13	3040	3.08			
	129.63	74	11	2890	3.48			
	140.74	68	10	2850	3.50			
	196.83	49	7	2590	4.38			
	239.23	40	6	2450	4.99			
	43.49	220	32	2840	0.90			
	53.04	181	26	2790	1.06			
	54.42	176	26	2590	1.07			
	60.61	158	23	2570	1.19			
	70.95	135	20	2530	1.39			16.2
	83.69	115	17	2460	1.63			15.6
	91.41	105	15	2530	1.70	FK30	90	14.9
	107.02	90	13	2440	1.99			17.3
	126.23	76	11	2350	2.35			16.4
	153.95	62	9	2230	2.86			

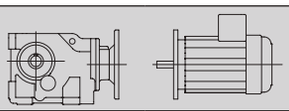


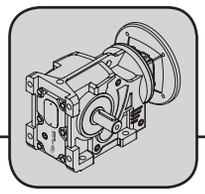
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs		m [kg]
1.1	175.93	55	8	2100	3.26		
(1.5HP)	205.96	47	7	2020	3.62		
	242.95	39	6	1930	4.04		
	296.30	32	5	1830	4.61		
1.5	1.41	8715	992	59172	0.82		
(2HP)	1.78	6903	786	59172	1.04		
	2.04	6014	685	59172	1.19		
	2.31	5315	605	59172	1.35		
	2.67	4606	524	59172	1.56		300
	3.06	4020	458	59172	1.78		266
	3.56	3455	393	59172	2.07	FK90 FH40 90	247
	3.90	3151	359	59172	2.27		290
	4.42	2782	317	59172	2.58		263
	5.07	2424	276	59172	2.96		
	5.61	2190	249	59172	3.27		
	6.47	1901	216	59172	3.77		
	7.26	1693	193	59172	4.23		
	2.87	4279	487	38063	0.93		
	3.68	3337	380	38063	1.20		176.2
	4.11	2992	341	38063	1.33		166.2
	4.56	2697	307	38063	1.48	FK80 FH30 90	155.9
	5.41	2273	259	38063	1.76		187.5
	6.12	2010	229	38063	1.98		173.7
	6.82	1802	205	38063	2.21		
	4.23	2906	331	23422	0.86		
	4.76	2582	294	23422	0.97		117.6
	5.71	2154	245	23422	1.16		107.4
	6.14	2003	228	23422	1.25	FK60 FH30 90	104.7
	6.95	1769	201	23422	1.42		126.9
	7.75	1587	181	23422	1.58		112.5
	8.85	1389	158	23422	1.80		
	9.87	1246	142	23422	2.01		
	7.22	1703	194	13720	0.84		68.9
	7.98	1540	175	13720	0.93		64.4
	9.21	1335	152	13720	1.08	FK50 FH25 90	65.8
							76.9
							71.8
	10.83	1206	129	26550	2.25		
	11.91	1097	118	26240	2.48		
	12.96	1008	108	25930	2.70		98.1
	14.92	876	94	25390	3.10		91.2
	16.90	773	83	24860	3.47	FK60 90	87.1
	19.35	675	72	24260	3.87		104
	22.80	573	61	23500	4.42		95.4
	26.11	501	54	22850	4.94		
	27.75	471	50	22560	5.19		
	32.32	404	43	21810	5.87		
	13.91	940	101	13660	1.66		
	15.54	841	90	13750	1.86		
	17.93	729	78	13790	2.14		
	21.85	598	64	13700	2.61		59.9
	24.54	533	57	13590	2.93		55.8
	27.36	478	51	13460	3.27	FK50 90	56.7
	29.71	440	47	13340	3.55		67.7
	35.21	371	40	13050	4.06		63.1
	45.93	285	30	12330	4.60		
	51.21	255	27	12110	5.14		
	55.61	235	25	11930	5.52		



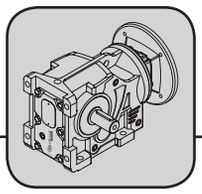
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
1.5	20.31	644	69	7650	1.13			
(2HP)	21.55	606	65	7780	1.17			
	24.96	524	56	8030	1.30			
	30.22	433	46	8120	1.60			
	31.59	414	44	8250	1.53			
	36.86	355	38	8210	1.84			
	39.11	334	36	8210	1.92			33.7
	42.09	311	33	8280	1.88			31.1
	45.31	288	31	8190	2.13	FK40*	90	30.7
	51.34	255	27	8190	2.16			36.7
	54.48	240	26	8150	2.25			34.2
	57.33	228	24	8060	2.51			
	63.11	207	22	8030	2.49			
	79.86	164	18	7780	2.93			
	98.89	132	14	7490	3.67			
	114.55	114	12	7300	4.07			
	144.95	90	10	6970	4.80			
	21.50	608	65	4770	0.99			
	24.90	525	56	4860	1.15			
	29.57	442	47	5270	1.37			
	31.51	415	44	4900	1.41			
	33.56	389	42	5220	1.49			30.2
	40.94	319	34	5100	1.82			28.6
	43.45	301	32	5060	1.91	FK40	90	27.5
	50.33	260	28	4940	1.94			32.9
	54.35	240	26	4650	1.97			30.9
	62.95	208	22	4530	2.15			
	79.66	164	18	4330	2.49			
	109.84	119	13	4140	3.36			
	127.24	103	11	3980	3.78			
	161.01	81	9	3730	4.59			
	33.85	386	41	3280	0.99			
	36.00	363	39	3300	1.04			
	44.66	293	31	3280	1.21			
	48.48	270	29	3300	1.26			
	53.24	245	26	3240	1.38			22.8
	56.62	231	25	3230	1.46			21.9
	67.81	193	21	3190	1.58	FK35	90	21.3
	76.26	171	18	3100	1.77			25.5
	82.41	159	17	3090	1.80			24
	106.66	123	13	2910	2.26			
	129.63	101	11	2780	2.55			
	140.74	93	10	2750	2.57			
	196.83	66	7	2530	3.21			
	239.23	55	6	2400	3.66			
	70.95	184	20	2250	1.02			
	83.69	156	17	2240	1.19			
	91.41	143	15	2370	1.25			16.3
	107.02	122	13	2310	1.46			15.6
	126.23	104	11	2240	1.72	FK30	90	14.9
	153.95	85	9	2140	2.09			17.3
	175.93	74	8	2010	2.39			16.5
	205.96	63	7	1940	2.65			
	242.95	54	6	1870	2.96			
	296.30	44	5	1780	3.38			
2.2	2.31	7795	605	59172	0.92			
(3HP)	2.67	6756	524	59172	1.06			
	3.06	5897	458	59172	1.22			



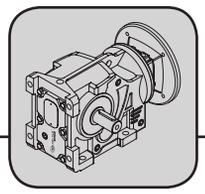
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs		m [kg]	
2.2	3.56	5068	393	59172	1.41			
(3HP)	3.90	4621	359	59172	1.55		307	
	4.42	4080	317	59172	1.76		273	
	5.07	3555	276	59172	2.02	FK90 FH40 100	254	
	5.61	3212	249	59172	2.23		297	
	6.47	2788	216	59172	2.57		270	
	7.26	2483	193	59172	2.89			
	8.10	2227	173	59172	3.22			
	9.00	2005	156	59172	3.57			
	9.87	1828	142	59172	3.92			
	3.68	4894	380	38063	0.82		179.2	
	4.11	4388	341	38063	0.91		168.7	
	4.56	3956	307	38063	1.01	FK70 FH30 100	159.2	
	5.41	3333	259	38063	1.20		190.4	
	6.12	2948	229	38063	1.35		176.7	
	6.82	2643	205	38063	1.51			
	6.14	2937	228	23422	0.85		117.6	
	6.95	2595	201	23422	0.97		107.4	
	7.75	2328	181	23422	1.08	FK60 FH30 100	104.7	
	8.85	2037	158	23422	1.23		126.9	
	9.87	1827	142	23422	1.37		112.5	
	9.75	1951	144	74590	4.10		276	
							243	
						FK90 100	223	
							266	
							239	
	8.01	2392	175	47170	1.81			
	9.08	2110	154	46350	2.05			
	9.95	1926	141	45710	2.25			
	11.68	1641	120	44490	2.64			▲
	12.45	1539	112	43980	2.81		157	▲
	13.81	1388	101	43140	3.12		153	▲
	15.59	1229	90	42110	3.52	FK70 100	142.7	▲
	17.48	1096	80	41130	3.95		173.4	▲
	19.50	983	72	40170	4.41		159.4	▲
	21.63	886	65	39260	4.89			▲
	26.44	725	53	37490	5.97			▲
	29.68	646	47	36060	5.10			▲
	33.11	579	42	35150	5.70			▲
	11.91	1609	118	23270	1.69			
	12.96	1479	108	23210	1.84			
	14.92	1285	94	23020	2.12			
	16.90	1134	83	22780	2.36			
	19.35	990	72	22440	2.64		101.1	
	22.80	841	61	21950	3.01		90.1	
	26.11	734	54	21500	3.37	FK60	90.3	
	27.75	691	50	21290	3.54		106.9	
	32.32	593	43	20720	4.00		98.6	
	35.35	542	40	20030	4.31			▲
	43.19	444	32	19290	5.16			
	49.47	387	28	18770	5.68			
	52.58	365	27	18530	5.92			
	13.91	1378	101	13660	1.13			
	17.93	1069	78	13790	1.46			
	21.85	877	64	13700	1.78			
	24.54	781	57	13590	2.00			
	27.36	701	51	13460	2.23			
	29.71	645	47	13340	2.42	FK50	62.4	



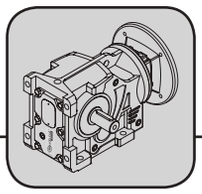
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
2.2	35.21	544	40	13050	2.77			58.3
(3HP)	45.93	417	30	12330	3.14	FK50	100	59.2
	51.21	374	27	12110	3.51			70.6
	55.61	345	25	11930	3.76			65.6
	62.04	309	23	11830	4.11			
	65.91	291	21	11550	4.24			
	69.16	277	20	11570	4.44			
	75.12	255	19	11370	4.70			
	89.02	215	16	10950	5.29			
	30.22	634	46	5990	1.09			
	31.59	607	44	6250	1.05			
	36.86	520	38	6460	1.25			
	39.11	490	36	6560	1.31			
	42.09	455	33	6780	1.28			36.6
	45.31	423	31	6770	1.45			35.1
	51.34	373	27	6960	1.47	FK40*	100	33.6
	54.48	352	26	7000	1.53			36.7
	57.33	334	24	6940	1.71			37.1
	63.11	304	22	7030	1.70			
	79.86	240	18	7000	2.00			
	98.89	194	14	6840	2.50			
	114.55	167	12	6740	2.77			
	144.95	132	10	6530	3.27			
	33.56	571	42	4250	1.02			
	40.94	468	34	4360	1.24			
	43.45	441	32	4370	1.31			32.6
	50.33	381	28	4360	1.32			30.9
	54.35	353	26	4050	1.34	FK40	100	30.3
	62.95	304	22	4030	1.47			35.7
	79.66	241	18	3940	1.70			33.7
	109.84	175	13	3920	2.29			
	127.24	151	11	3790	2.58			
	161.01	119	9	3590	3.13			
	67.81	283	21	2730	1.08			
	76.26	251	18	2710	1.20			25.6
	82.41	233	17	2730	1.23			24.7
	106.66	180	13	2650	1.54	FK35	100	24.1
	129.63	148	11	2570	1.74			28.3
	140.74	136	10	2570	1.75			26.8
	196.83	97	7	2400	2.19			
	239.23	80	6	2300	2.50			
3	3.06	8041	458	59172	0.89			
(4HP)	3.56	6911	393	59172	1.04			
	3.90	6301	359	59172	1.14			
	4.42	5564	317	59172	1.29			307
	5.07	4847	276	59172	1.48			273
	5.61	4380	249	59172	1.64	FK90 FH40	100	254
	6.47	3802	216	59172	1.88			297
	7.26	3386	193	59172	2.12			270
	8.10	3037	173	59172	2.36			
	9.00	2733	156	59172	2.62			
	9.87	2492	142	59172	2.88			
	5.41	4545	259	38063	0.88			179.2
	6.12	4021	229	38063	0.99			168.7
	6.82	3605	205	38063	1.11	FK70 FH30	100	159.2
								190.4
								176.7
	9.75	2661	144	72770	3.01	FK90		276

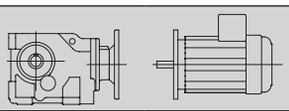


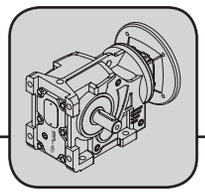
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]	
3	11.48	2261	122	70000	3.54			243	
(4HP)	13.08	1984	107	67800	4.03	FK90	100	223	
								266	
								239	
	8.01	3262	175	43020	1.33				
	9.08	2877	154	42690	1.51				
	9.95	2627	141	42360	1.65				
	11.68	2238	120	41640	1.94				▲
	12.45	2099	112	41310	2.06				▲
	13.81	1892	101	40730	2.29			157	▲
	15.59	1676	90	39980	2.58			153	▲
	17.48	1495	80	39220	2.90	FK70	100	142.7	▲
	19.50	1340	72	38470	3.23			173.4	▲
	21.63	1208	65	37720	3.58			159.4	▲
	26.44	989	53	36230	4.38				▲
	29.68	880	47	34790	3.74				▲
	33.11	789	42	34010	4.18				▲
	36.72	712	38	33260	4.64				▲
	44.88	582	31	31790	5.70				▲
	11.91	2195	118	19880	1.24				
	12.96	2016	108	20100	1.35				
	14.92	1752	94	20320	1.55				
	16.90	1547	83	20390	1.73				
	19.35	1351	72	20350	1.94				
	22.80	1147	61	20180	2.21			101.1	
	26.11	1001	54	19960	2.47			90.1	
	27.75	942	50	19830	2.59	FK60	100	90.3	
	32.32	809	43	19470	2.94			106.9	
	35.35	739	40	18760	3.16			98.6	▲
	43.19	605	32	18250	3.79				
	49.47	528	28	17860	4.16				
	52.58	497	27	17680	4.34				
	61.24	427	23	17200	4.83				
	66.99	390	21	16900	5.15				▲
	13.91	1879	101	6150	0.83				
	17.93	1457	78	7970	1.07				
	21.85	1196	64	8930	1.31				
	24.54	1065	57	9340	1.47				
	27.36	955	51	9640	1.63				
	29.71	880	47	9820	1.77				
	35.21	742	40	10080	2.03			62.4	
	45.93	569	30	9870	2.30			58.3	
	51.21	510	27	9900	2.57	FK50	100	59.2	
	55.61	470	25	9900	2.76			70.6	
	62.04	421	23	10140	3.01			65.6	
	65.91	397	21	9840	3.11				
	69.16	378	20	10060	3.25				
	75.12	348	19	9980	3.45				
	89.02	294	16	9780	3.88				
	116.13	225	12	9250	4.62				
	129.46	202	11	9090	4.99				
	140.61	186	10	8960	5.28				
	166.63	157	8	8690	5.95				
	36.86	709	38	2240	0.92				
	39.11	668	36	3590	0.96				
	42.09	621	33	2790	0.94				
	45.31	577	31	5140	1.06	FK40*		36.6	
	51.34	509	27	5560	1.08			35.1	



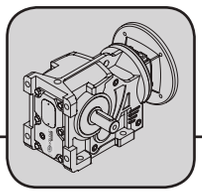
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
3	54.48	480	26	5670	1.12			33.6
(4HP)	57.33	456	24	5650	1.25	FK40*	100	39.6
	63.11	414	22	5890	1.24			37.1
	79.86	327	18	6090	1.47			
	98.89	264	14	6100	1.84			
	114.55	228	12	6090	2.03			
	144.95	180	10	6020	2.40			
	40.94	638	34	3330	0.91			
	43.45	602	32	3430	0.96			
	50.33	519	28	3590	0.97			32.6
	54.35	481	26	3000	0.98			30.9
	62.95	415	22	3420	1.08	FK40	100	30.3
	79.66	328	18	3460	1.25			35.7
	109.84	238	13	3630	1.68			33.7
	127.24	205	11	3560	1.89			
	161.01	162	9	3410	2.29			
4	3.90	8402	359	59172	0.85			
(5.4HP)	4.42	7419	317	59172	0.97			
	5.07	6463	276	59172	1.11			307
	5.61	5840	249	59172	1.23			273
	6.47	5069	216	59172	1.41	FK90 FH40	112	254
	7.26	4515	193	59172	1.59			297
	8.10	4050	173	59172	1.77			270
	9.00	3645	156	59172	1.97			
	9.87	3323	142	59172	2.16			
	6.82	4806	205	38063	0.83			179.2
								168.7
						FK80 FH30	112	159.2
								190.4
								176.7
	11.48	3014	122	68060	2.65			276
	13.08	2646	107	66100	3.02			243
						FK90	112	223
								266
								239
	8.01	4350	175	37820	1.00			
	9.08	3836	154	38110	1.13			
	9.95	3502	141	38180	1.24			
	11.68	2984	120	38080	1.45			
	12.45	2798	112	37970	1.55			
	13.81	2523	101	37710	1.72			157
	15.59	2235	90	37310	1.94			153
	17.48	1993	80	36840	2.17	FK70	112	142.7
	19.50	1787	72	36330	2.42			173.4
	21.63	1611	65	35800	2.69			159.4
	26.44	1318	53	34660	3.29			
	29.68	1174	47	33200	2.80			
	33.11	1052	42	32580	3.13			
	36.72	949	38	31970	3.48			
	44.88	776	31	30740	4.27			
	14.92	2336	94	16940	1.16			
	16.90	2062	83	17400	1.30			
	19.35	1801	72	17750	1.45			
	22.80	1529	61	17970	1.66			
	26.11	1335	54	18020	1.85			
	27.75	1256	50	18010	1.95			101.1
	32.32	1078	43	17910	2.20			90.1
	35.35	986	40	17180	2.37	FK60	112	90.3



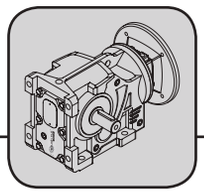
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs		m [kg]
4	43.19	807	32	16960	2.84		106.9
(5.4HP)	49.47	705	28	16730	3.12	FK60	98.6
	52.58	663	27	16620	3.26		
	61.24	569	23	16280	3.63		
	66.99	520	21	16070	3.86		
	89.38	390	16	15300	4.72		
	109.20	319	13	14710	5.44		
	125.06	279	11	14300	5.98		
	21.85	1595	64	5740	0.98		
	24.54	1420	57	6500	1.10		
	27.36	1274	51	7100	1.23		
	29.71	1173	47	7480	1.33		
	35.21	990	40	8110	1.52		
	45.93	759	30	8240	1.73		62.4
	51.21	681	27	8440	1.93		58.3
	55.61	627	25	8550	2.07	FK50	59.2
	62.04	562	23	9020	2.26	112	70.6
	65.91	529	21	8700	2.33		65.6
	69.16	504	20	9050	2.44		
	75.12	464	19	9050	2.58		
	89.02	391	16	9000	2.91		
	116.13	300	12	8600	3.47		
	129.46	269	11	8510	3.74		
	140.61	248	10	8430	3.96		
	166.63	209	8	8240	4.46		
	57.33	608	24	2610	0.94		36.6
	63.11	552	22	2330	0.93		35.1
	79.86	436	18	4970	1.10	FK40*	33.6
	98.89	352	14	5170	1.38		39.6
	114.55	304	12	5290	1.53		37.1
	144.95	240	10	5380	1.80		
	62.95	554	22	1250	0.81		32.6
	79.66	437	18	2280	0.93		30.9
	109.84	317	13	3240	1.26	FK40	112	30.3
	127.24	274	11	3230	1.42		35.7
	161.01	216	9	3160	1.72		33.7
5.5	5.61	8030	249	59172	0.89		310
(7.4HP)	6.47	6971	216	59172	1.03		276
	7.26	6208	193	59172	1.15	FK90 FH40	132S	257
	8.10	5569	173	59172	1.29		300
	9.00	5011	156	59172	1.43		273
	9.87	4569	142	59172	1.57		
	13.08	3638	107	63540	2.20		
	13.94	3414	100	62740	2.34		280
	14.66	3245	95	62100	2.47		247
	15.44	3082	91	61440	2.60	FK90	132S	227
	16.99	2800	82	60190	2.86		270
	18.64	2553	75	58990	3.13		243
	21.11	2254	66	57350	3.55		
	24.23	1964	58	55540	4.07		
	11.68	4103	120	32740	1.06		
	12.45	3848	112	32960	1.13		
	13.81	3469	101	33200	1.25		
	15.59	3073	90	33310	1.41		
	17.48	2740	80	33280	1.58		
	19.50	2457	72	33140	1.76		163
	21.63	2215	65	32920	1.95		158
	26.44	1812	53	32300	2.39	FK70	132S	148.5



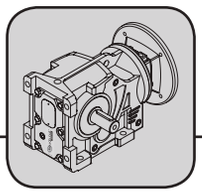
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
5.5	29.68	1614	47	30820	2.04	FK70		180.1
(7.4HP)	33.11	1447	42	30450	2.28			166.3
	36.72	1305	38	30050	2.53			
	44.88	1068	31	29160	3.11			
	58.53	819	24	28360	4.86			
	65.64	730	21	27690	5.26			
	73.21	654	19	27040	5.68			
	19.35	2476	72	13840	1.06			
	22.80	2102	61	14650	1.21			
	26.11	1835	54	15130	1.35			
	27.75	1727	50	15290	1.41			
	32.32	1482	43	15570	1.60			
	35.35	1355	40	14810	1.72			
	43.19	1109	32	15020	2.07			106.9
	49.47	969	28	15040	2.27			99.9
	52.58	911	27	15020	2.37	FK60	132S	96
	61.24	782	23	14910	2.64			112.7
	66.99	715	21	14810	2.81			104.3
	89.38	536	16	14360	3.44			
	109.20	439	13	13940	3.95			
	125.06	383	11	13630	4.35			
	132.93	361	11	13490	4.54			
	154.84	309	9	13110	5.05			
	169.35	283	8	12880	5.37			
	35.21	1361	40	5150	1.11			
	45.93	1043	30	5780	1.25			
	51.21	936	27	6230	1.40			
	55.61	862	25	6520	1.51			
	62.04	772	23	7340	1.64			69.6
	65.91	727	21	6990	1.70			65
	69.16	693	20	7540	1.77	FK50	132S	66
	75.12	638	19	7660	1.88			76.6
	89.02	538	16	7820	2.12			72.4
	116.13	413	12	7630	2.52			
	129.46	370	11	7640	2.72			
	140.61	341	10	7630	2.88			
	166.63	288	8	7560	3.25			
7.5	13.08	4960	107	60140	1.61			
(10HP)	13.94	4656	100	59550	1.72			
	14.66	4424	95	59060	1.81			280
	15.44	4203	91	58550	1.90			247
	16.99	3818	82	57570	2.10	FK90	132M	227
	18.64	3481	75	56600	2.30			270
	21.11	3074	66	55240	2.60			243
	24.23	2678	58	53700	2.99			
	30.56	2161	46	51050	3.63			
	15.59	4191	90	27970	1.03			
	17.48	3737	80	28520	1.16			
	19.50	3350	72	28870	1.29			
	21.63	3021	65	29070	1.43			
	26.44	2471	53	29150	1.75			
	29.68	2201	47	27640	1.49			
	33.11	1973	42	27600	1.67			163
	36.72	1779	38	27480	1.86			158
	44.88	1456	31	27060	2.28	FK70	132M	148.5
	58.53	1116	24	26930	3.56			180.1
	65.64	995	21	26420	3.86			166.3
	73.21	892	19	25910	4.17			



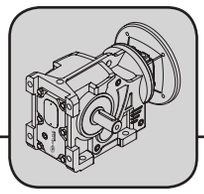
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
7.5 (10HP)	81.20	805	17	25400	4.48			
	99.25	658	14	24390	5.15			
	111.44	586	13	23420	4.85			
	124.30	526	11	22900	5.24			
	137.86	474	10	22390	5.63			
	27.75	2355	50	11650	1.04			
	32.32	2021	43	12450	1.17			
	35.35	1848	40	11640	1.26			
	43.19	1513	32	12420	1.51			
	49.47	1321	28	12770	1.67			106.9
	52.58	1243	27	12890	1.74			99.9
	61.24	1067	23	13090	1.93	FK60	132M	96
	66.99	975	21	13140	2.06			112.7
	89.38	731	16	13100	2.52			104.3
	109.20	598	13	12920	2.90			
	125.06	522	11	12740	3.19			
	132.93	492	11	12640	3.33			
	154.84	422	9	12380	3.70			
	169.35	386	8	12220	3.94			
9.2 (12.4HP)	13.08	6085	107	57250	1.31			
	13.94	5711	100	56830	1.40			
	14.66	5427	95	56480	1.47			280
	15.44	5156	91	56100	1.55			247
	16.99	4683	82	55350	1.71	FK90	132M	227
	18.64	4270	75	54570	1.87			270
	21.11	3770	66	53450	2.12			243
	24.23	3285	58	52140	2.44			
	30.56	2651	46	49810	2.96			
	15.59	5141	90	23440	0.84			
	17.48	4584	80	24470	0.94			
	19.50	4110	72	25240	1.05			
	21.63	3705	65	25800	1.17			
	26.44	3032	53	26480	1.43			
	29.68	2700	47	24940	1.22			
	33.11	2421	42	25180	1.36			163
	36.72	2183	38	25300	1.51			158
	44.88	1786	31	25280	1.86	FK70	132M	148.5
	58.53	1369	24	25730	2.90			180.1
	65.64	1221	21	25340	3.15			166.3
	73.21	1095	19	24940	3.40			
	81.20	987	17	24530	3.65			
	99.25	808	14	23680	4.20			
	111.44	719	13	22710	3.96			
	124.30	645	11	22250	4.27			
	137.86	581	10	21810	4.59			
	168.49	476	8	20920	5.29			
	27.75	2888	50	8560	0.85			
	32.32	2480	43	9800	0.96			
	35.35	2267	40	8950	1.03			
	43.19	1856	32	10220	1.23			
	49.47	1620	28	10850	1.36			106.9
	52.58	1524	27	11080	1.42			99.9
	61.24	1309	23	11530	1.58	FK60	132M	96
	66.99	1197	21	11720	1.68			112.7
	89.38	897	16	12040	2.05			104.3
	109.20	734	13	12050	2.36			
	125.06	641	11	11980	2.60			
	132.93	603	11	11930	2.71			

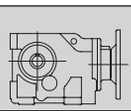
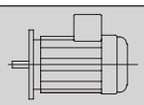


Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
9.2	154.84	518	9	11770	3.02			
(12.4HP)	169.35	473	8	11650	3.21			
11	15.44	6165	91	53510	1.30			
(15HP)	16.99	5599	82	52990	1.43			
	18.64	5105	75	52420	1.57			293
	21.11	4508	66	51550	1.77			259
	24.23	3927	58	50490	2.04	FK90	160M	239
	30.56	3170	46	48500	2.47			282
	33.37	2762	42	47710	2.67			256
	36.88	2510	38	46780	2.87			
	42.96	2215	33	45330	3.25			
	47.12	1934	30	44430	3.52			
	26.44	3625	53	23640	1.19			
	29.68	3228	47	22080	1.02			
	33.11	2894	42	22620	1.14			
	36.72	2610	38	22990	1.27			
	44.88	2135	31	23390	1.55			173.8
	58.53	1637	24	24450	2.43			172
	65.64	1460	21	24200	2.63	FK70	160M	156.9
	73.21	1309	19	23920	2.84			190
	81.20	1180	17	23610	3.05			174.3
	99.25	966	14	22930	3.51			
	111.44	860	13	21950	3.31			
	124.30	771	11	21570	3.57			
	137.86	695	10	21190	3.84			
	168.49	569	8	20420	4.42			
	43.19	2219	32	7890	1.03			
	49.47	1937	28	8820	1.14			
	52.58	1823	27	9170	1.18			
	61.24	1565	23	9890	1.32			118.4
	66.99	1431	21	10220	1.40			111.5
	89.38	1072	16	10910	1.72	FK60	160M	107.4
	109.20	878	13	11130	1.98			124.1
	125.06	766	11	11170	2.17			115.7
	132.93	721	11	11170	2.27			
	154.84	619	9	11120	2.52			
	169.35	566	8	11060	2.69			
15	16.99	7635	82	47750	1.05			
(20HP)	18.64	6962	75	47640	1.15			
	21.11	6148	66	47330	1.30			
	24.23	5355	58	46810	1.49			293
	30.56	4323	46	45590	1.81			259
	33.37	3766	42	45040	1.95	FK90	160L	239
	36.88	3423	38	44360	2.10			282
	42.96	3020	33	43250	2.38			256
	47.12	2637	30	42540	2.58			
	61.26	2243	23	40420	3.21			
	70.57	2006	20	39230	3.59			
	86.77	1488	16	37470	4.31			
	44.88	2911	31	19180	1.14			
	58.53	2233	24	21600	1.78			
	65.64	1991	21	21670	1.93			173.8
	73.21	1785	19	21650	2.08			172
	81.20	1609	17	21560	2.24	FK70	160L	156.9
	99.25	1317	14	21250	2.58			190
	111.44	1173	13	20250	2.43			174.3
	124.30	1051	11	20050	2.62			
	137.86	948	10	19820	2.82			

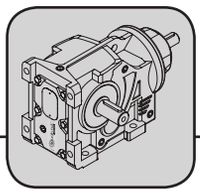


Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
	168.49	776	8	19300	3.24			
18.5	21.11	7582	66	43640	1.06			
(25HP)	24.23	6605	58	43600	1.21			
	30.56	5331	46	43040	1.47			
	33.37	4644	42	42700	1.58			300
	36.88	4221	38	42250	1.71			267
	42.96	3725	33	41440	1.93	FK90	180M	247
	47.12	3252	30	40890	2.09			290
	61.26	2766	23	39150	2.60			264
	70.57	2474	20	38130	2.91			
	86.77	1835	16	36580	3.50			
	95.94	1564	15	35800	3.84			
	58.53	2754	24	19120	1.44			
	65.64	2455	21	19450	1.56			
	73.21	2201	19	19660	1.69			183.8
	81.20	1985	17	19770	1.82			176
	99.25	1624	14	19780	2.09	FK70	180M	168.8
	111.44	1446	13	18770	1.97			200.3
	124.30	1297	11	18730	2.12			178.7
	137.86	1169	10	18630	2.28			
	168.49	957	8	18320	2.63			
22	24.23	7855	58	40380	1.02			
(30HP)	30.56	6340	46	40490	1.24			
	33.37	5523	42	40370	1.33			
	36.88	5020	38	40140	1.43			300
	42.96	4429	33	39630	1.63			267
	47.12	3868	30	39240	1.76	FK90	180L	247
	61.26	3289	23	37880	2.19			290
	70.57	2942	20	37030	2.45			264
	86.77	2182	16	35680	2.94			
	95.94	1860	15	34990	3.23			
	130.02	1141	11	32430	4.03			
	58.53	3275	24	16630	1.21			
	65.64	2920	21	17230	1.32			
	73.21	2618	19	17670	1.42			183.8
	81.20	2360	17	17980	1.53			176
	99.25	1931	14	18320	1.76	FK70	180L	168.8
	111.44	1720	13	17290	1.65			200.3
	124.30	1542	11	17400	1.79			178.7
	137.86	1390	10	17430	1.92			
	168.49	1138	8	17340	2.21			
30	36.88	6845	38	35310	1.05			
(40HP)	42.96	6040	33	35480	1.19			
	47.12	5274	30	35460	1.29			300
	61.26	4486	23	34970	1.61			267
	70.57	4012	20	34500	1.79	FK90	200L	247
	86.77	2976	16	33630	2.16			290
	95.94	2536	15	33140	2.37			264
	130.02	1556	11	30910	2.96			
	161.45	1212	9	29710	3.36			
	58.53	4465	24	10940	0.89			
	65.64	3982	21	12160	0.96			
	73.21	3570	19	13120	1.04			183.8
	81.20	3219	17	13880	1.12			176
	99.25	2633	14	14960	1.29	FK70	200L	168.8
	111.44	2345	13	13910	1.21			200.3
	124.30	2103	11	14370	1.31			178.7
	137.86	1896	10	14700	1.41			

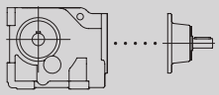


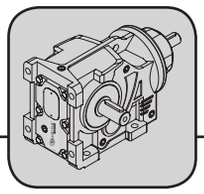
Pm [kW]	na [1/min]	Ma [Nm]	i	FRa [N]	fs			m [kg]
	168.49	1551	8	15100	1.62			
37	61.26	5532	23	32430	1.30			308
(50HP)	70.57	4948	20	32300	1.46			279
	86.77	3670	16	31830	1.75	FK90	225S	254
	95.94	3128	15	31510	1.92			297
	130.02	1919	11	29580	2.40			271
	161.45	1494	9	28640	2.72			
45	61.26	6728	23	29520	1.07			308
(60HP)	70.57	6018	20	29770	1.20			279
	86.77	4464	16	29780	1.44	FK90	225M	254
	95.94	3804	15	29660	1.58			297
	130.02	2334	11	28060	1.97			271
	161.45	1817	9	27420	2.24			

▲ Not available for K..M (direct couple) models.

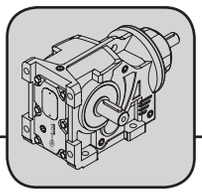


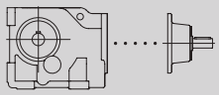
FK..S

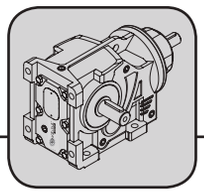
i	na [1/min]	Mamax [Nm]	Pe [kW]	FRa [N]	FRe [N]			m [kg]
FK30								200Nm
150.47	9.3	200	0.21	5530				
134.96	10	200	0.24	5300				
116.28	12	200	0.28	5000				
106.21	13	200	0.30	4830				13.4
92.84	15	200	0.35	4580				12.7
83.69	17	200	0.38	4400		FK..S30	Ø16	12
75.58	19	200	0.43	4220				14.4
67.80	21	200	0.47	4040				13.6
59.67	23	200	0.54	3830				
49.51	28	200	0.65	3550				
44.46	31	200	0.72	3390				
37.97	37	200	0.85	3170				
32.19	43	197	0.99	2960				
26.40	53	190	1.2	2740				
25.73	54	187	1.2	2530				
23.10	61	187	1.3	2400				
19.73	71	186	1.5	2220				13.8
16.73	84	185	1.8	2040				13.1
15.32	91	177	1.9	2200		FK..S30	Ø19	12.4
13.08	107	177	2.2	2040				14.8
11.09	126	177	2.6	1880				14
9.09	154	176	3.1	1700				
7.96	176	176	3.6	1380				
6.80	206	167	4.0	1310				
5.76	243	158	4.4	1230				
4.73	296	148	5.0	1140				
FK35								400Nm
130.79	11	400	0.49	5630				20.3
116.81	12	400	0.55	5350				19.4
108.86	13	400	0.59	5180		FK..S35	Ø16	18.8
96.90	14	400	0.66	4910				23
								21.5
86.89	16	400	0.74	4660				
76.33	18	400	0.84	4380				
71.78	20	400	0.90	4250				
58.99	24	400	1.1	3890				
53.29	26	388	1.2	3710				
47.08	30	384	1.3	3530				
41.36	34	381	1.5	3310				
38.89	36	373	1.5	3240				20.5
31.35	45	351	1.8	2970				19.6
28.88	48	338	1.9	2940		FK..S35	Ø19	19
26.30	53	337	2.1	2770				23.2
24.73	57	335	2.2	2680				21.7
20.65	68	302	2.4	2620				
18.36	76	300	2.6	2450				
16.99	82	283	2.7	2460				
13.13	107	275	3.4	2150				
10.80	130	256	3.8	2030				
9.95	141	237	3.8	2060				
7.11	197	212	4.8	1840				
5.85	239	199	5.5	1720				

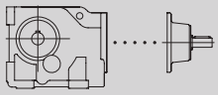


i	na [1/min]	Mamax [Nm]	Pe [kW]	FRa [N]	FRe [N]			m [kg]
FK40								600Nm
149.93	9.3	600	0.64	7470				
130.88	11	600	0.73	7010				
118.43	12	600	0.81	6650				
108.29	13	600	0.89	6360				
95.70	15	600	1.0	5960				
84.31	17	600	1.1	5580				
69.12	20	600	1.4	4990				29.6
65.13	21	600	1.5	4820				28
56.22	25	600	1.7	4400		FK..S40	Ø19	26.9
47.35	30	600	2.0	4410				32.3
44.43	32	580	2.1	3790				30.3
41.71	34	577	2.2	4220				
34.20	41	575	2.7	3730				
32.22	43	572	2.9	3610				
27.82	50	500	2.9	3710				
25.76	54	470	2.9	3170				
22.24	63	444	3.2	3000				
17.57	80	406	3.7	2760				29.8
12.75	110	397	5.0	2790				28.2
11.00	127	385	5.6	2610		FK..S40	Ø24	27.1
8.69	161	370	6.8	2330				32.5
								30.5
FK40								820Nm
149.56	9.4	820	0.88	9560				
130.56	11	820	1.0	8840				
118.14	12	820	1.1	8330				
108.03	13	820	1.2	7360				
95.46	15	793	1.3	6930				
84.10	17	764	1.5	6660				
68.95	20	720	1.7	6280				33.3
64.97	22	707	1.7	6170				31.6
56.09	25	676	1.9	5910		FK..S40*	Ø19	30.1
46.33	30	687	2.4	5430				36.1
44.32	32	630	2.3	5500				33.6
37.98	37	648	2.7	5110				
35.79	39	636	2.9	5020				
33.26	42	578	2.8	5040				
30.90	45	609	3.2	4810				
27.27	51	545	3.2	4750				
25.70	54	535	3.3	4670				
24.42	57	567	3.7	4480				33.5
22.18	63	512	3.7	4460				31.8
17.53	80	477	4.4	4160		FK..S40*	Ø24	30.3
14.16	99	482	5.5	3800				36.3
12.22	115	461	6.1	3640				33.8
9.66	145	429	7.1	3390				



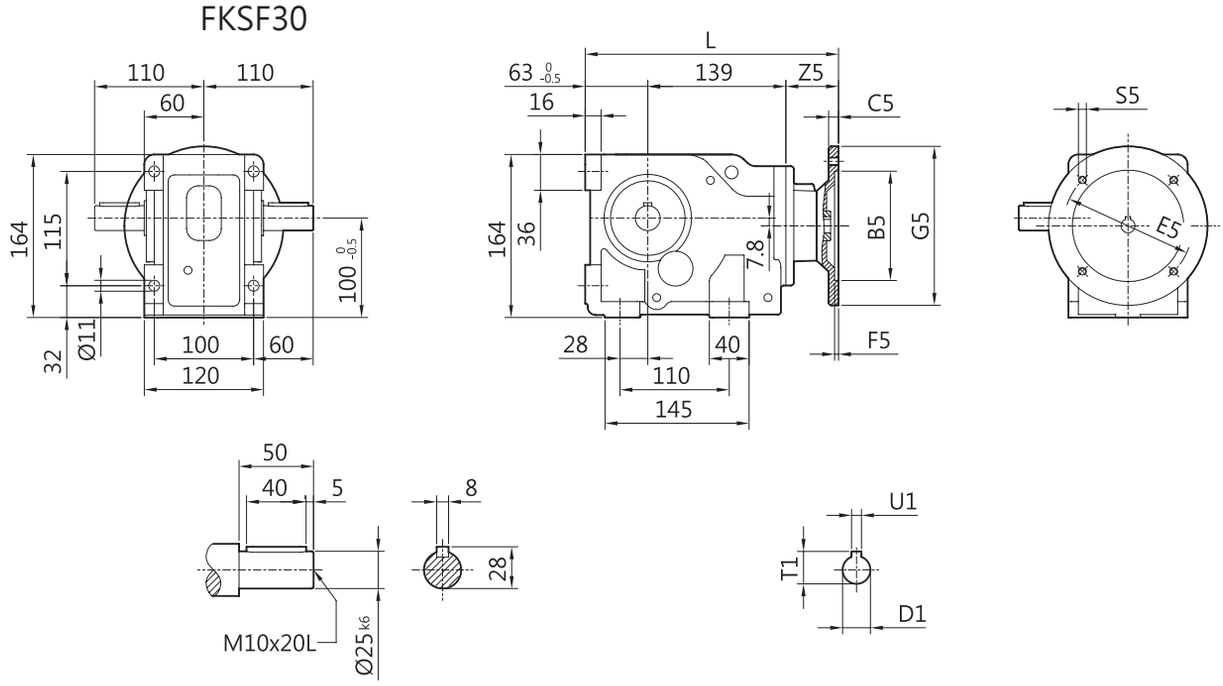
i	na [1/min]	Mamax [Nm]	Pe [kW]	FRa [N]	FRe [N]			m [kg]
FK50								1550Nm
194.36	7.2	1451	1.2	16730				
180.17	7.8	1345	1.2	16080				
160.76	8.7	1200	1.2	15120				59.7
144.13	9.7	1076	1.2	14240				55.1
122.94	11	918	1.2	13000		FK..S50	Ø19	56.1
109.30	13	816	1.2	12120				66.7
100.66	14	1550	2.5	11520				62.5
90.08	16	1550	2.8	10740				
78.07	18	1550	3.2	9760				
64.06	22	1550	3.9	8490				59.9
57.05	25	1506	4.2	8130				55.3
51.18	27	1457	4.6	7870			Ø24	56.3
47.12	30	1422	4.8	7680				66.9
								62.7
39.76	35	1351	5.5	7300				
30.48	46	1233	6.5	6050				
27.34	51	1194	7.0	5860				
25.17	56	1165	7.4	5710				
22.57	62	1140	8.1	6150				65.1
21.24	66	1107	8.4	5430				60.5
20.24	69	1103	8.8	5960			Ø38	61.5
18.64	75	1076	9.3	5810				72.1
15.73	89	1023	10.5	5520				67.9
12.06	116	934	12.4	4580				
10.81	129	904	13.4	4430				
9.96	141	882	14.2	4330				
8.40	167	838	16.0	4110				
FK60								2700Nm
214.50	6.5	1602	1.2	23400				
190.38	7.4	1422	1.2	22030				97.7
180.32	7.8	1346	1.2	21420				90.7
151.59	9.2	1132	1.2	19540		FK..S60	Ø19	86.8
129.25	11	2700	3.4	17900				103.5
117.56	12	2700	3.7	16960				95.1
108.00	13	2700	4.0	16140				
93.84	15	2700	4.6	14830				98
82.86	17	2663	5.2	13930				91
							Ø28	87.1
								103.8
								95.4
72.35	19	2595	5.8	13150				102.3
61.42	23	2517	6.6	12250				95.3
53.63	26	2454	7.4	11550			Ø38	91.4
50.45	28	2426	7.7	11240				108.1
43.31	32	2358	8.7	10500				99.7
39.60	35	2319	9.4	8620				
32.41	43	2275	11.3	7530				
28.30	49	2184	12.4	7230				
26.63	53	2145	12.9	7100				
22.86	61	2049	14.4	6780				110.5
20.90	67	1994	15.3	6600				103.5
15.66	89	1829	18.8	6050			Ø42	99.6
12.82	109	1722	22	5700				116.3
11.19	125	1654	24	5470				107.9
10.53	133	1624	25	5370				
9.04	155	1551	28	5130				
8.27	169	1510	29	5000				



i	na [1/min]	Mamax [Nm]	Pe [kW]	FRa [N]	FRe [N]			m [kg]
FK70								4300Nm
174.75	8.0	4300	4.0	38060				154.9
154.10	9.1	4300	4.5	35890				147.1
140.71	10	4300	4.9	34370		FK..S70	Ø28	140.4
								171.4
								149.8
119.87	12	4300	5.8	31800				
112.43	12	4300	6.1	30800				159.1
101.37	14	4300	6.8	29230				151.3
89.79	16	4300	7.7	27450			Ø38	144.6
80.07	17	4300	8.6	25830				175.6
71.78	20	4300	9.6	24330				154
64.72	22	4300	10.7	22960				
52.96	26	4300	13.0	20420				167.1
47.16	30	3266	11.1	21880				159.3
42.28	33	3274	12.4	20560			Ø42	152.6
38.12	37	3280	13.8	19360				183.6
31.19	45	3295	17.0	17110				162
23.92	59	3948	27	13410				
21.33	66	3814	29	12960				
19.12	73	3692	31	12540				167.1
17.24	81	3579	33	12160				166.3
14.11	99	3369	38	11450			Ø48	159.6
12.56	111	2826	36	11310				190.6
11.26	124	2735	39	10950				169
10.16	138	2651	42	10610				
8.31	168	2496	48	9990				
FK90								8000Nm
143.55	10	8000	9.0	59170				273
121.95	11	8000	10.5	55370				244
						FK..S90	Ø28	219
								262
								236
107.04	13	8000	12.0	52460				277
100.47	14	8000	12.8	51090				248
95.48	15	8000	13.5	50000			Ø38	223
								266
								240
90.70	15	8000	14.2	48930				284
82.38	17	8000	15.6	46960				255
75.12	19	8000	17.1	45110			Ø42	230
								273
								247
66.33	21	8000	19.4	42710				
57.78	24	8000	22	40150				
45.81	31	7700	27	36840				
41.96	33	7600	29	35630				
37.96	37	7400	31	34510				295
32.59	43	7200	36	32630				266
29.71	47	7100	38	31490			Ø48	241
22.86	61	6800	48	28500				284
19.84	71	6600	53	27100				258
16.13	87	6450	64	24840				
14.59	96	6400	70	23740				
10.77	130	5900	88	19890				
8.67	161	5400	100	19010				

3.3 Dimension Sheets

FKSF30



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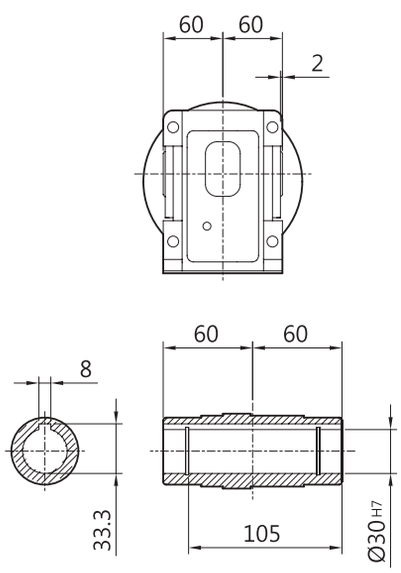
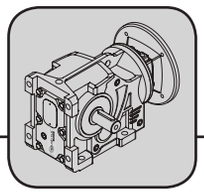


For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	255	M8	53	11	12.8	4
IEC 71	110	10	130	4	160	255	M8	53	14	16.3	5
IEC 80	130	12	165	5	200	273	M10	71	19	21.8	6
IEC 90	130	12	165	5	200	273	M10	71	24	27.3	8



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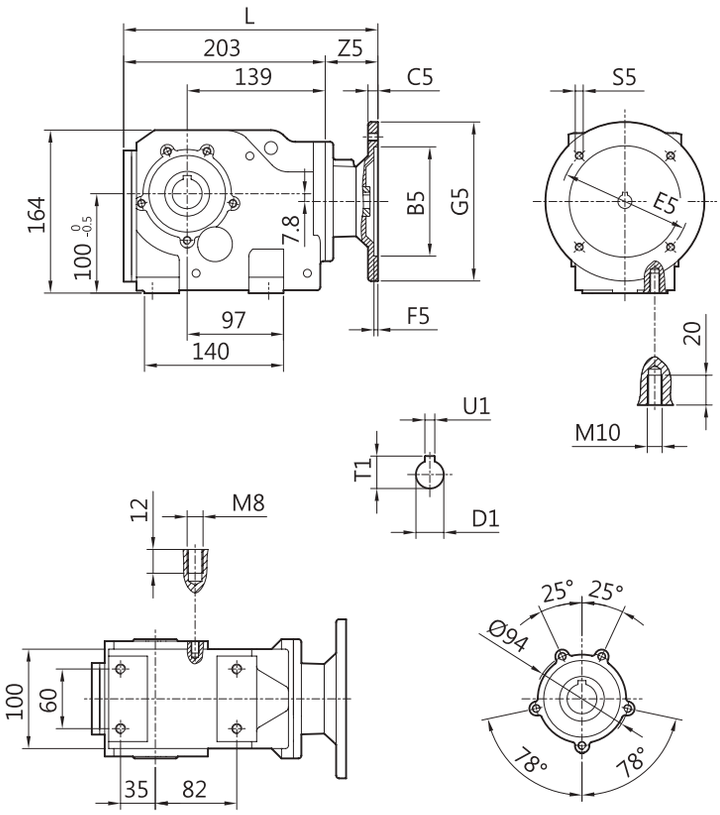

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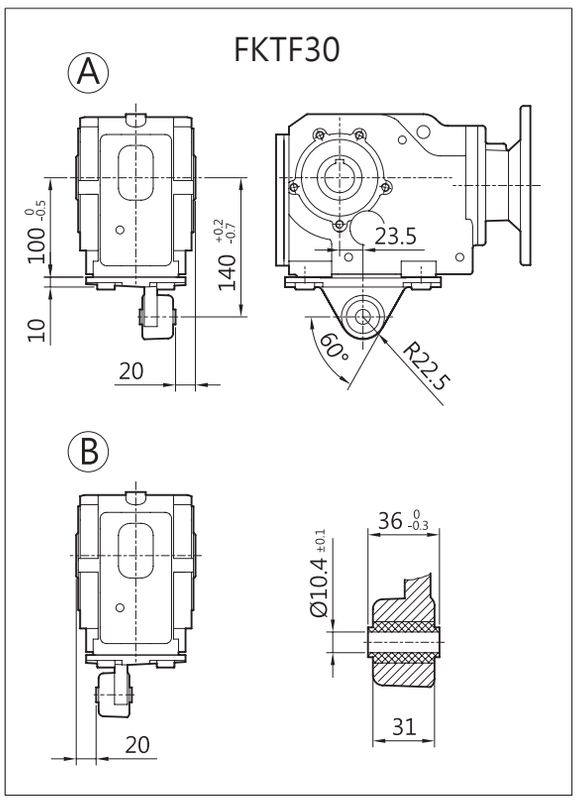

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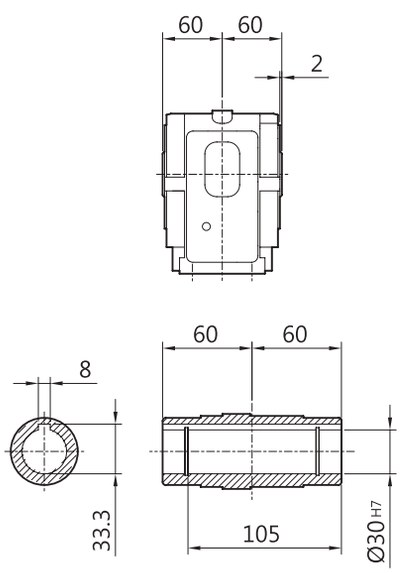

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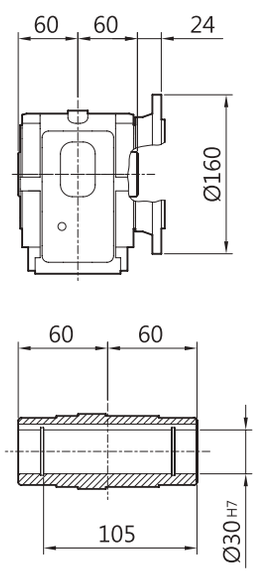

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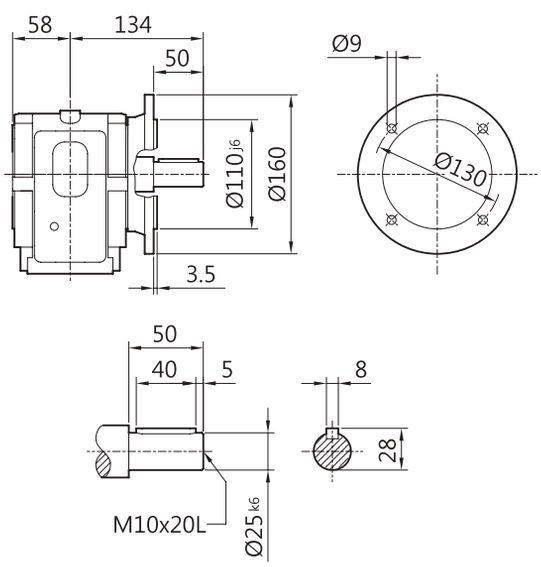
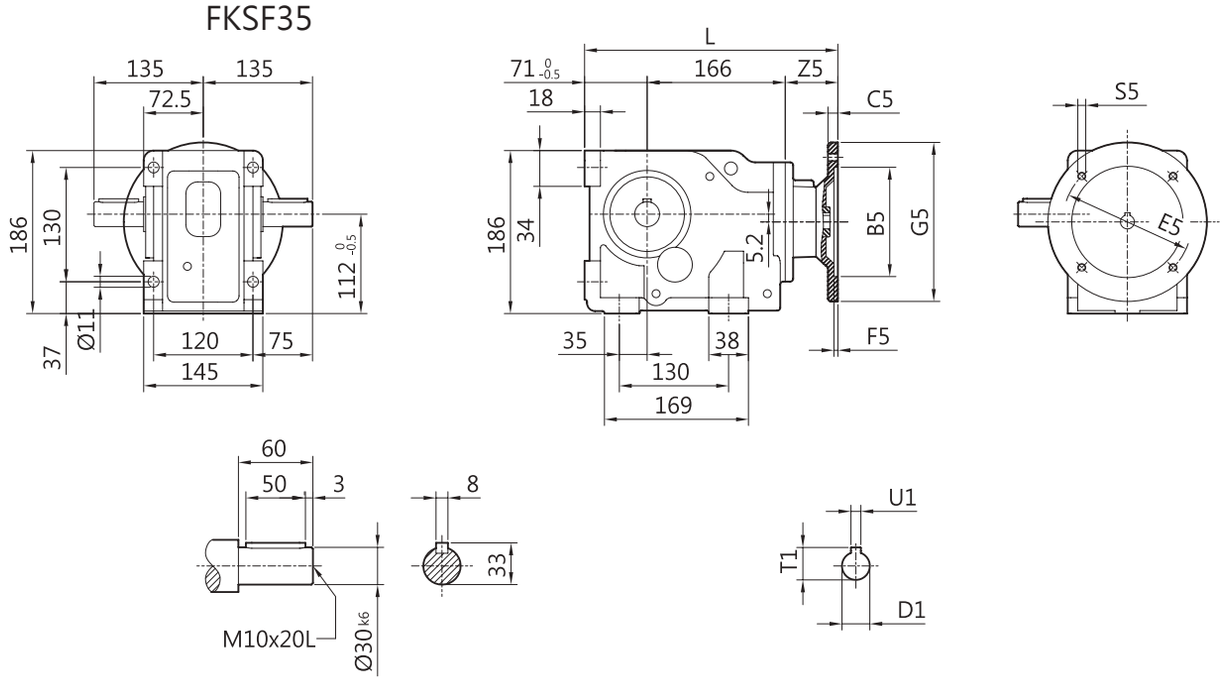


	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	256	M8	53	11	12.8	4
IEC 71	110	10	130	4	160	256	M8	53	14	16.3	5
IEC 80	130	12	165	5	200	274	M10	71	19	21.8	6
IEC 90	130	12	165	5	200	274	M10	71	24	27.3	8

FKSF35



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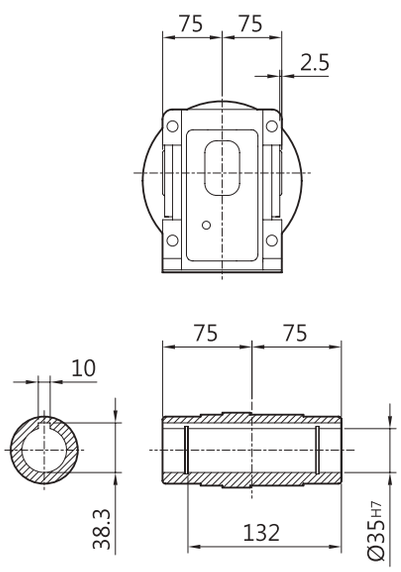
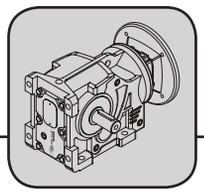


For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	285.5	M8	48.5	11	12.8	4
IEC 71	110	10	130	4	160	285.5	M8	48.5	14	16.3	5
IEC 80	130	12	165	5	200	303.5	M10	66.5	19	21.8	6
IEC 90	130	12	165	5	200	303.5	M10	66.5	24	27.3	8
IEC 100	180	15	215	5	250	320	M12	83	28	31.3	8



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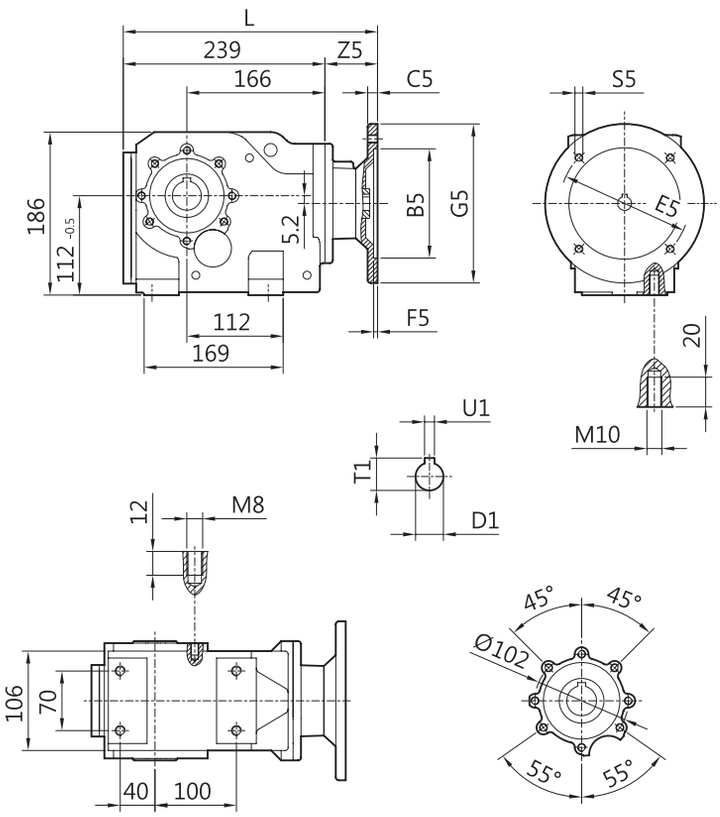

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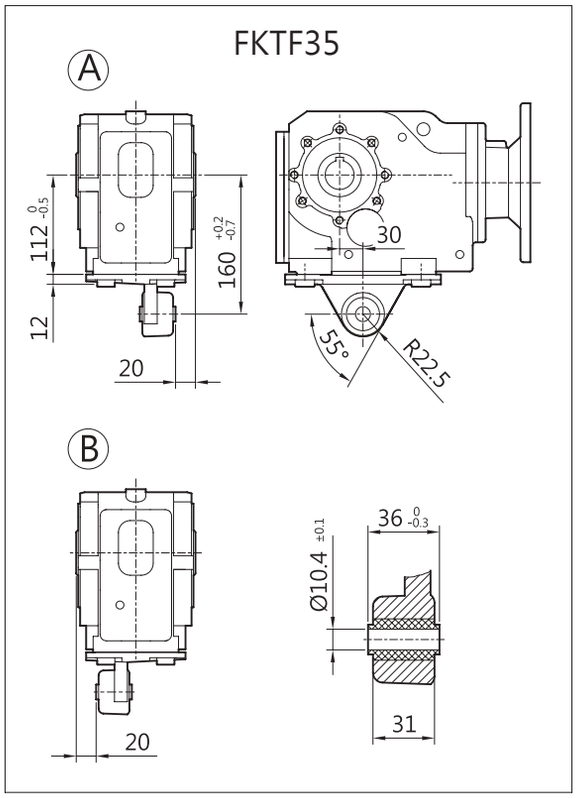

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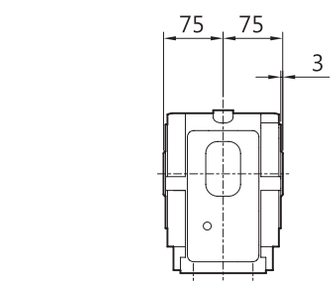

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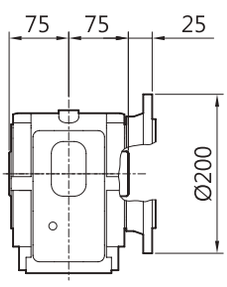

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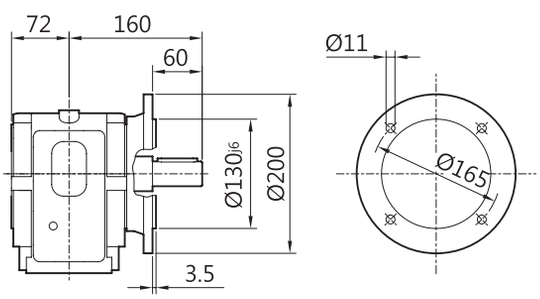

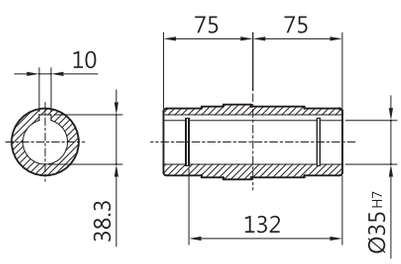

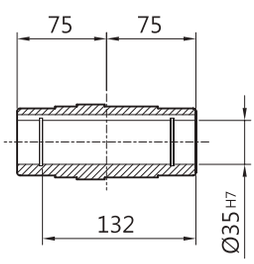

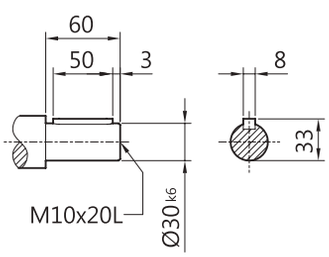

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	287.5	M8	48.5	11	12.8	4
IEC 71	110	10	130	4	160	287.5	M8	48.5	14	16.3	5
IEC 80	130	12	165	5	200	305.5	M10	66.5	19	21.8	6
IEC 90	130	12	165	5	200	305.5	M10	66.5	24	27.3	8
IEC 100	180	15	215	5	250	323	M12	83	28	31.3	8

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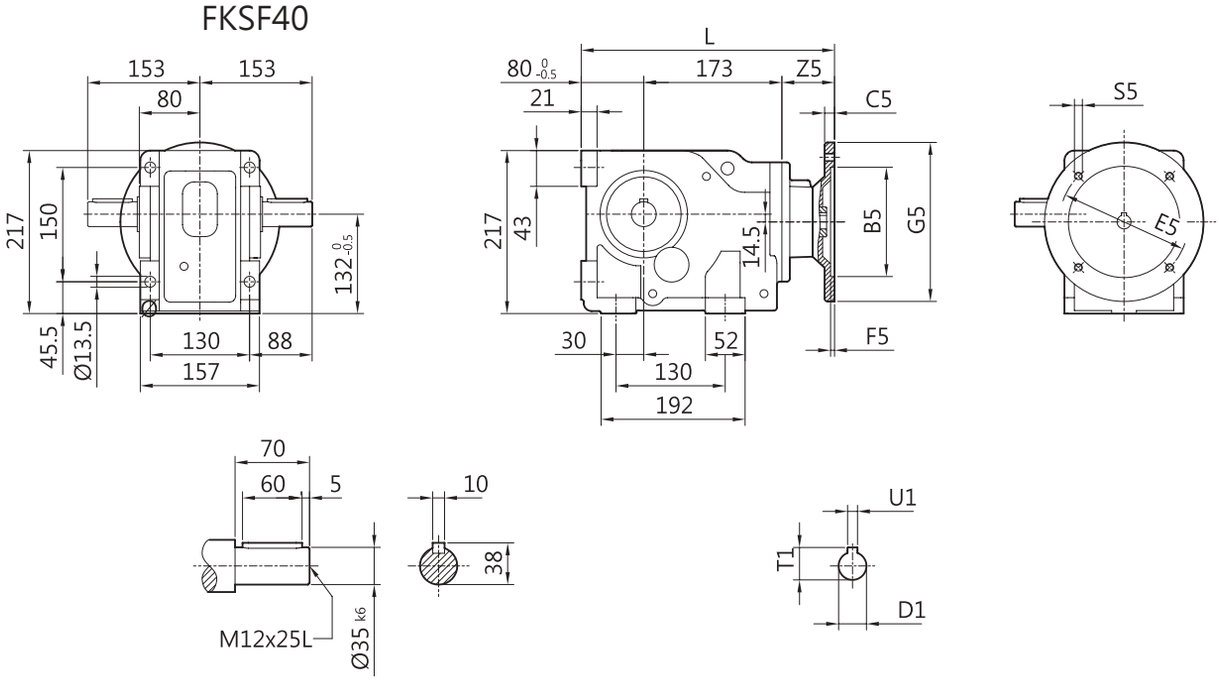

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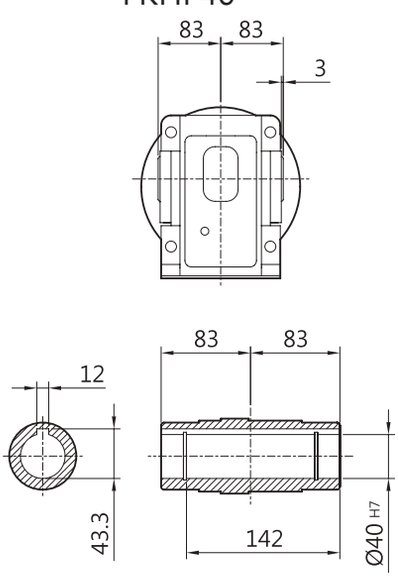
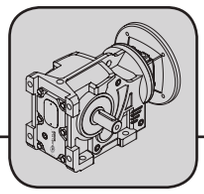


For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	299.5	M8	46.5	11	12.8	4
IEC 71	110	10	130	4	160	299.5	M8	46.5	14	16.3	5
IEC 80	130	12	165	5	200	317.5	M10	64.5	19	21.8	6
IEC 90	130	12	165	5	200	317.5	M10	64.5	24	27.3	8
IEC 100	180	15	215	5	250	334	M12	81	28	31.3	8
IEC 112	180	15	215	5	250	334	M12	81	28	31.3	8



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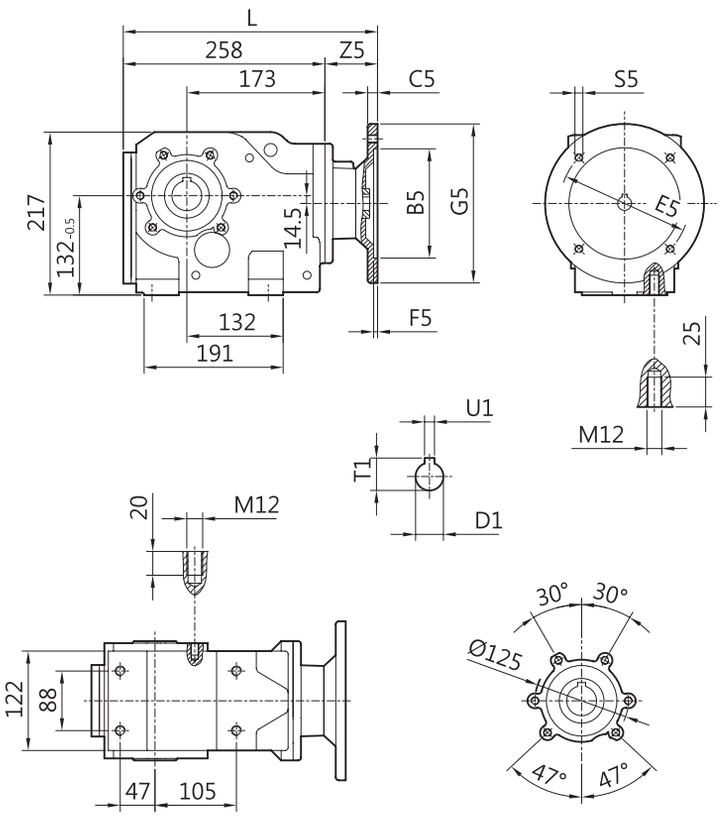

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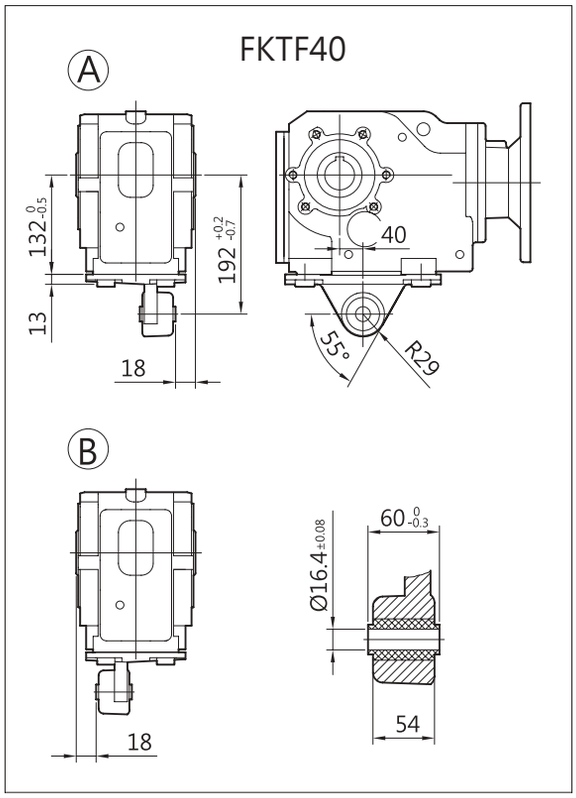

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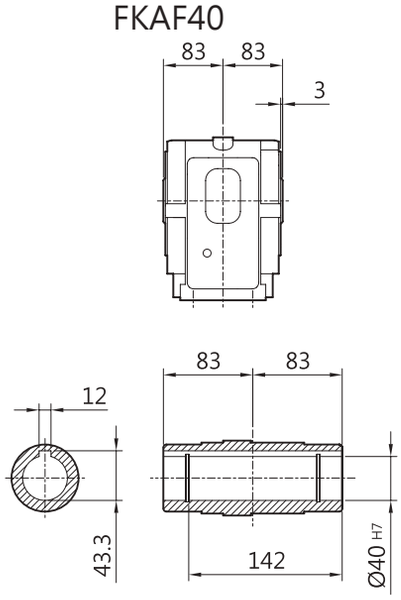

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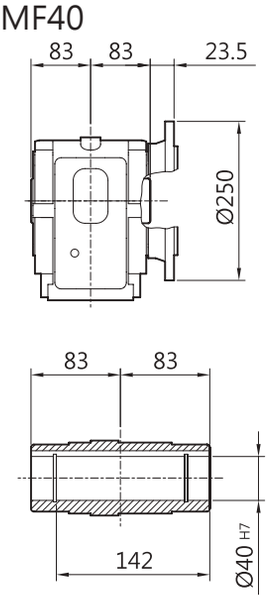

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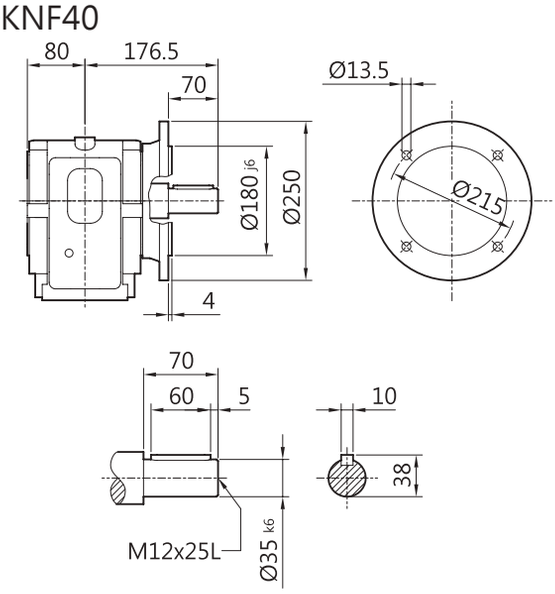
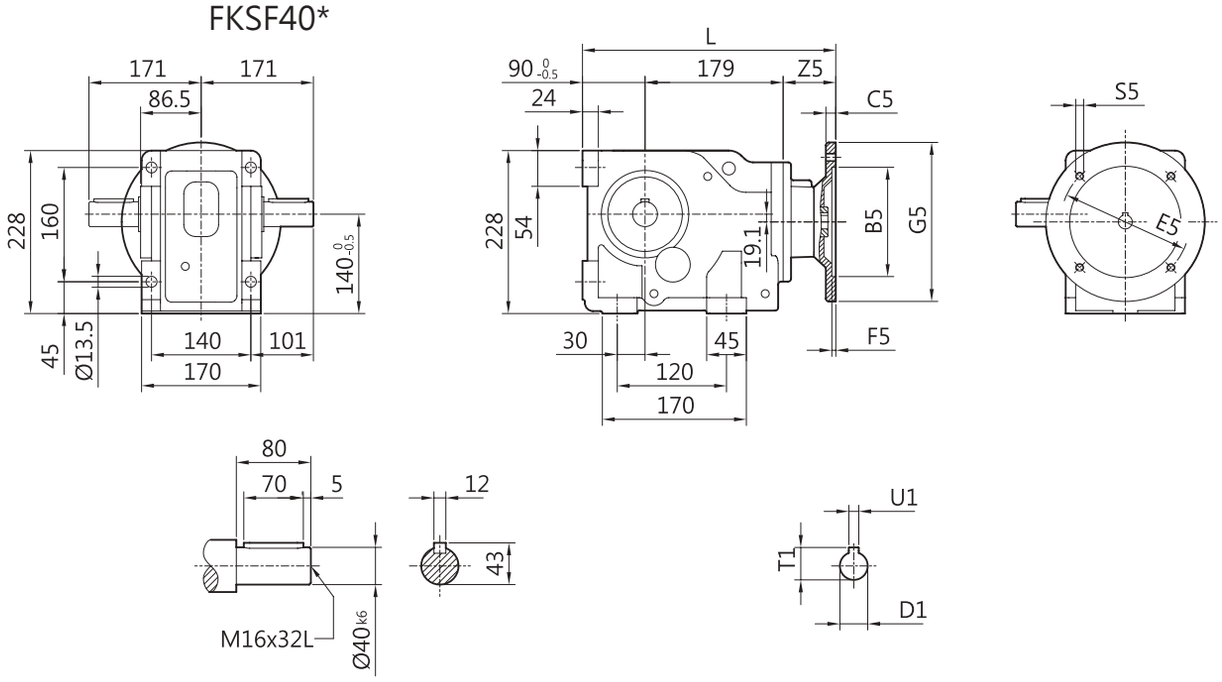


	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	304.5	M8	46.5	11	12.8	4
IEC 71	110	10	130	4	160	304.5	M8	46.5	14	16.3	5
IEC 80	130	12	165	5	200	322.5	M10	64.5	19	21.8	6
IEC 90	130	12	165	5	200	322.5	M10	64.5	24	27.3	8
IEC 100	180	15	215	5	250	339	M12	81	28	31.3	8
IEC 112	180	15	215	5	250	339	M12	81	28	31.3	8

FKSF40*



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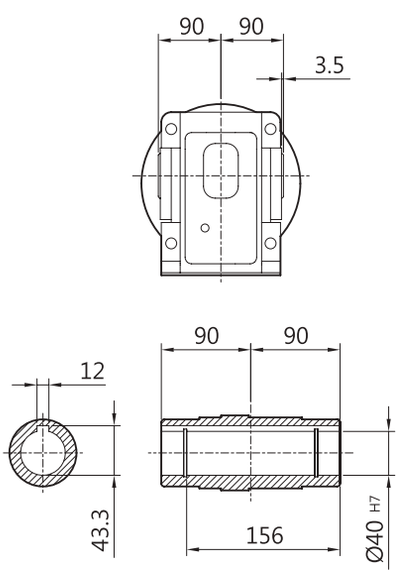
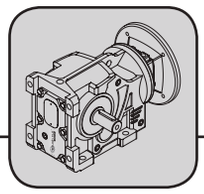


For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	315.5	M8	46.5	11	12.8	4
IEC 71	110	10	130	4	160	315.5	M8	46.5	14	16.3	5
IEC 80	130	12	165	5	200	333.5	M10	64.5	19	21.8	6
IEC 90	130	12	165	5	200	333.5	M10	64.5	24	27.3	8
IEC 100	180	15	215	5	250	350	M12	81	28	31.3	8
IEC 112	180	15	215	5	250	350	M12	81	28	31.3	8



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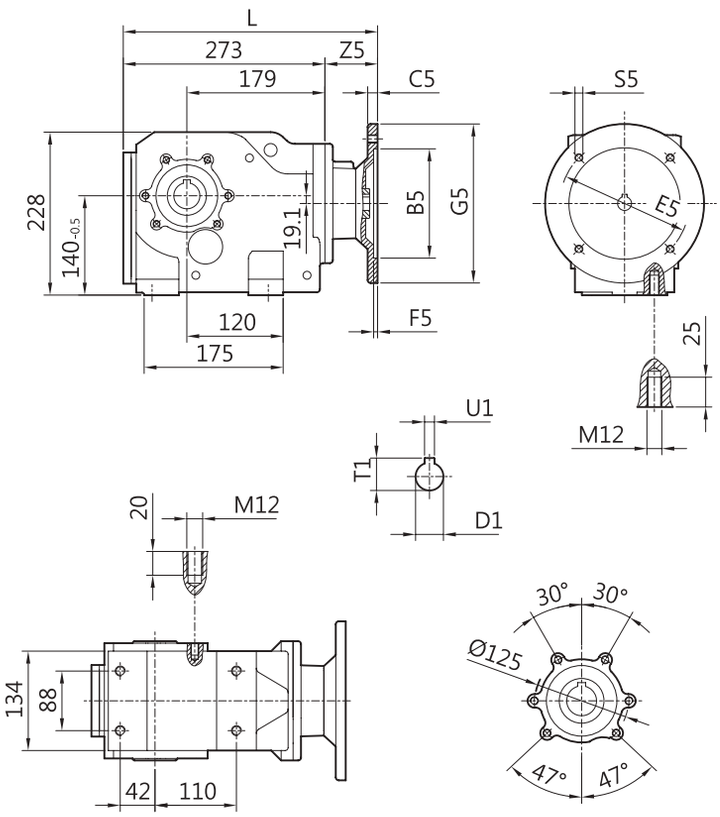
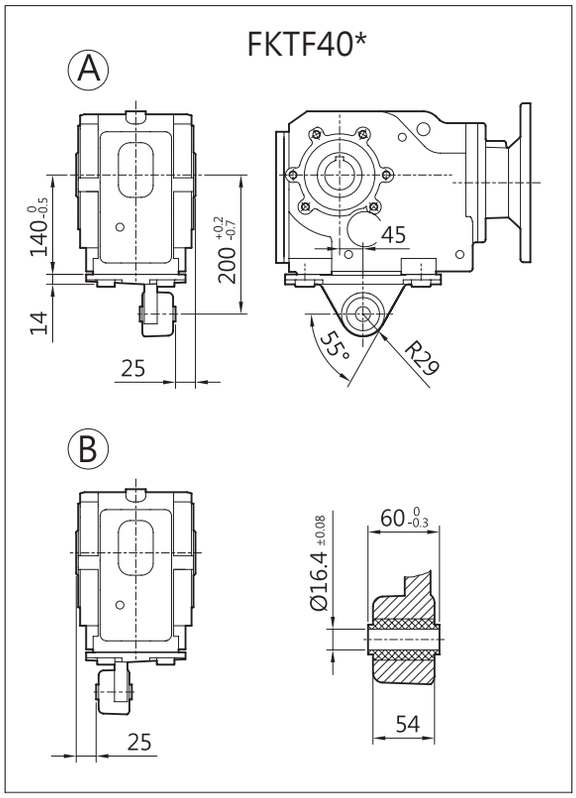


FKTF40*



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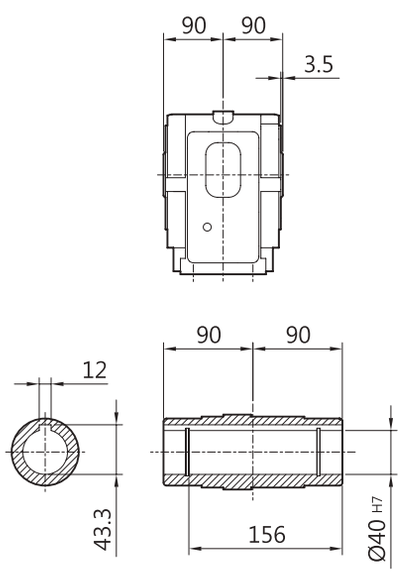

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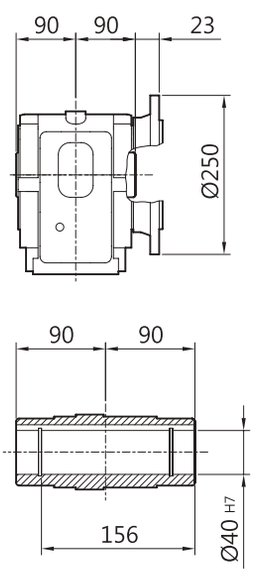

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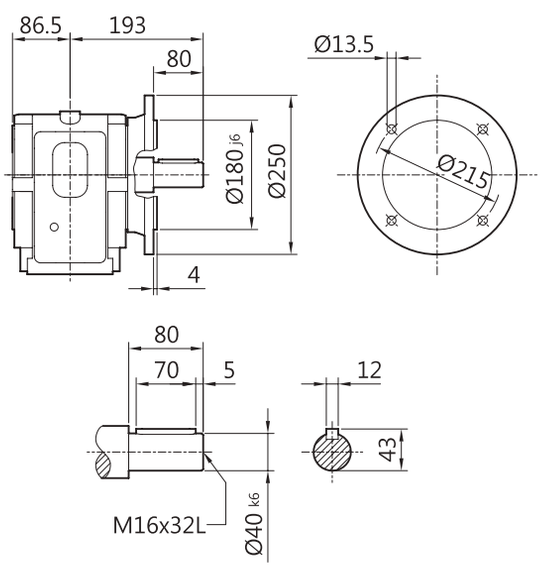
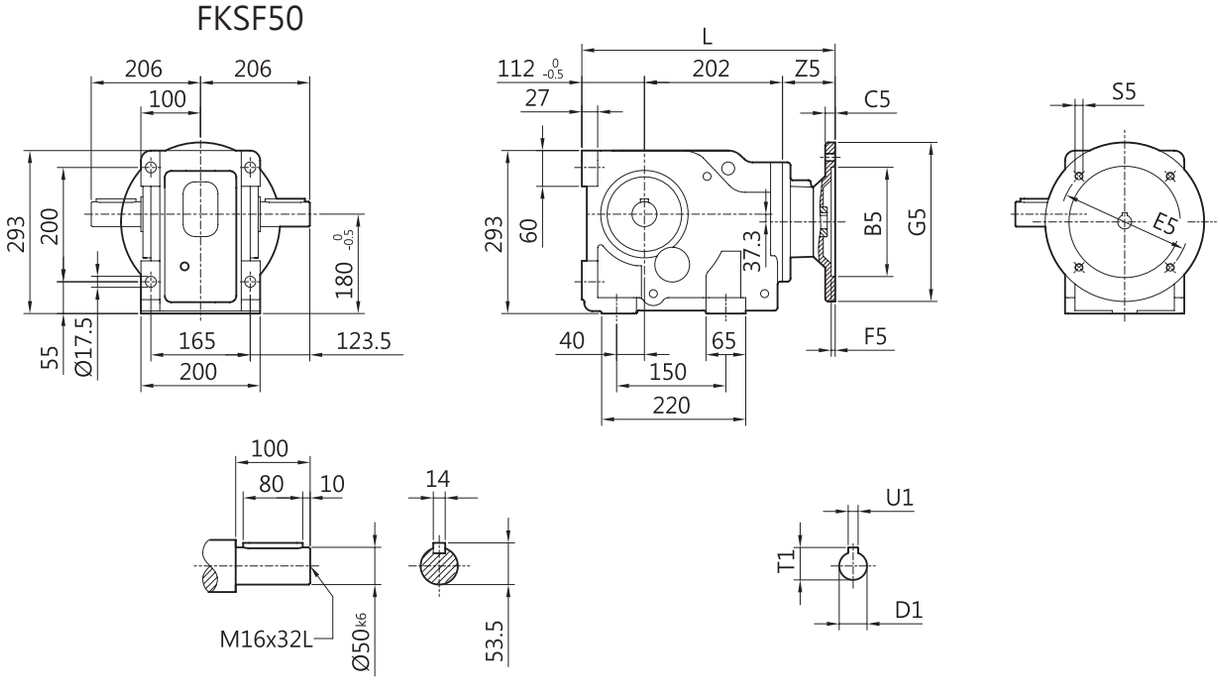
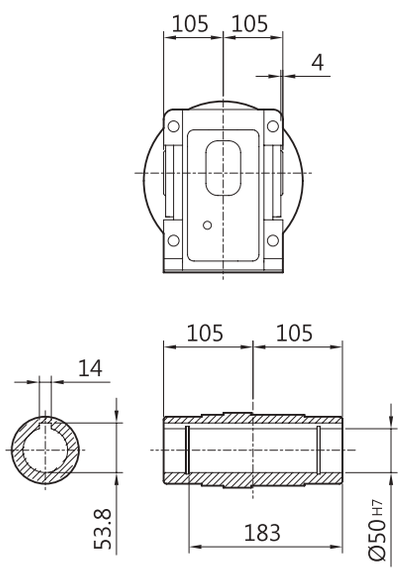


	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 63 *	95	10	115	4	140	319.5	M8	46.5	11	12.8	4
IEC 71	110	10	130	4	160	319.5	M8	46.5	14	16.3	5
IEC 80	130	12	165	5	200	337.5	M10	64.5	19	21.8	6
IEC 90	130	12	165	5	200	337.5	M10	64.5	24	27.3	8
IEC 100	180	15	215	5	250	354	M12	81	28	31.3	8
IEC 112	180	15	215	5	250	354	M12	81	28	31.3	8

FKSF50

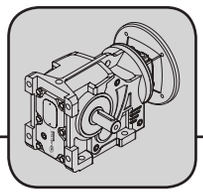


FKHF50



For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 80	130	12	165	5	200	373	M10	59	19	21.8	6
IEC 90	130	12	165	5	200	373	M10	59	24	27.3	8
IEC 100	180	15	215	5	250	389.5	M12	75.5	28	31.3	8
IEC 112	180	15	215	5	250	389.5	M12	75.5	28	31.3	8
IEC 132	230	16	265	6	300	438	M12	124	38	41.3	10



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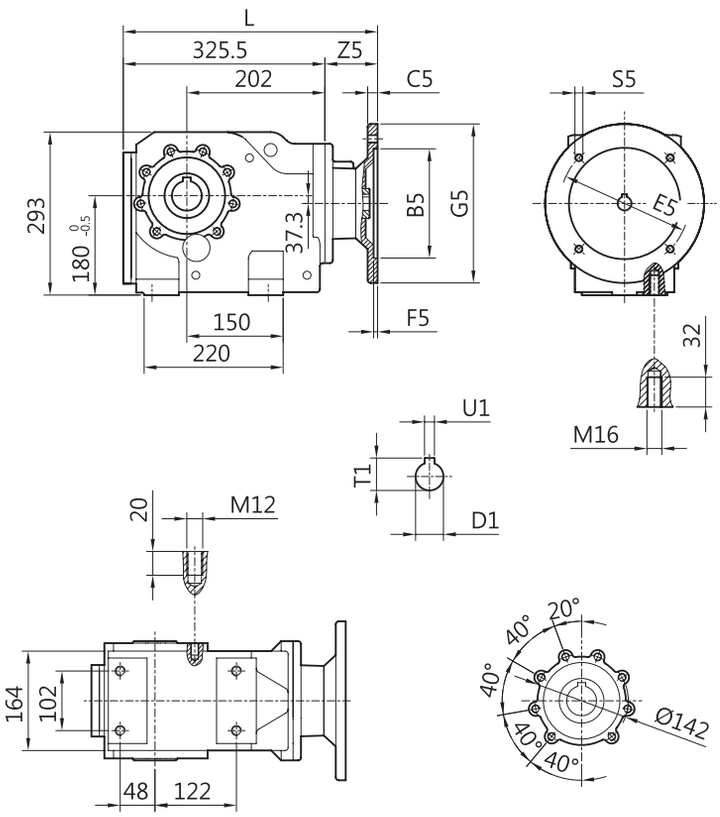

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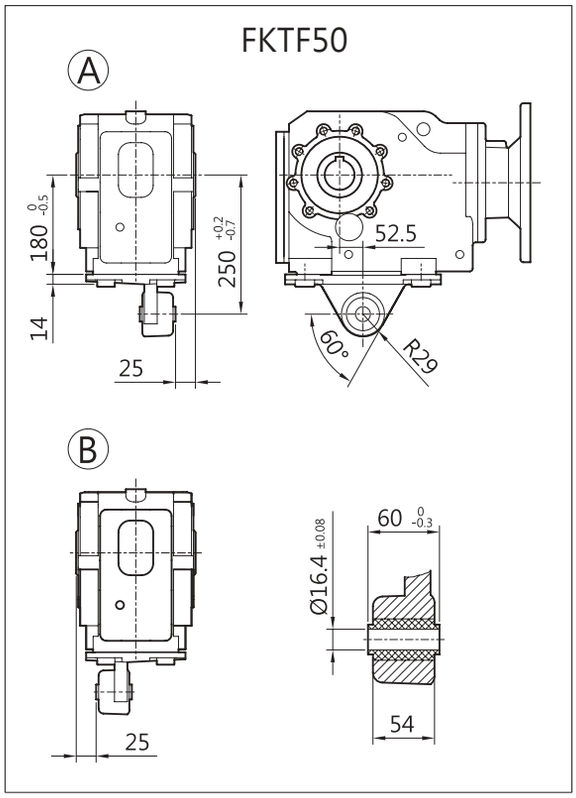

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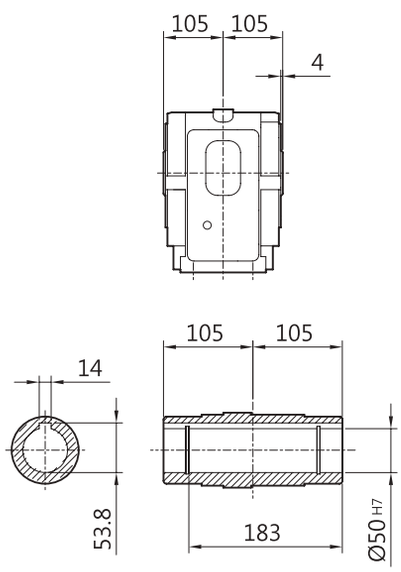

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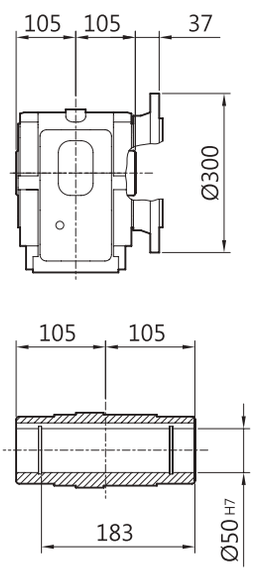

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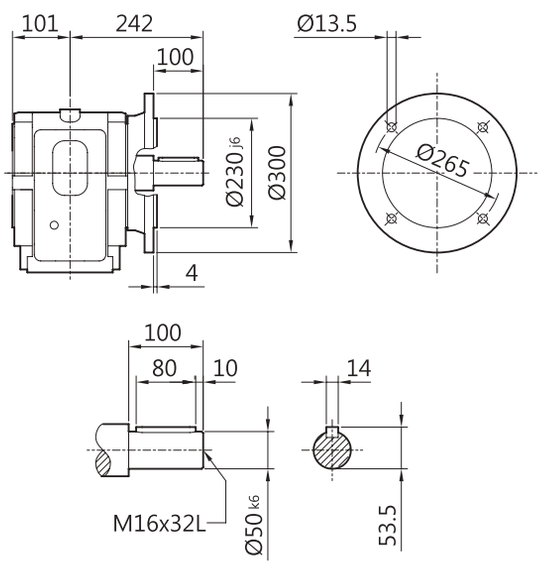
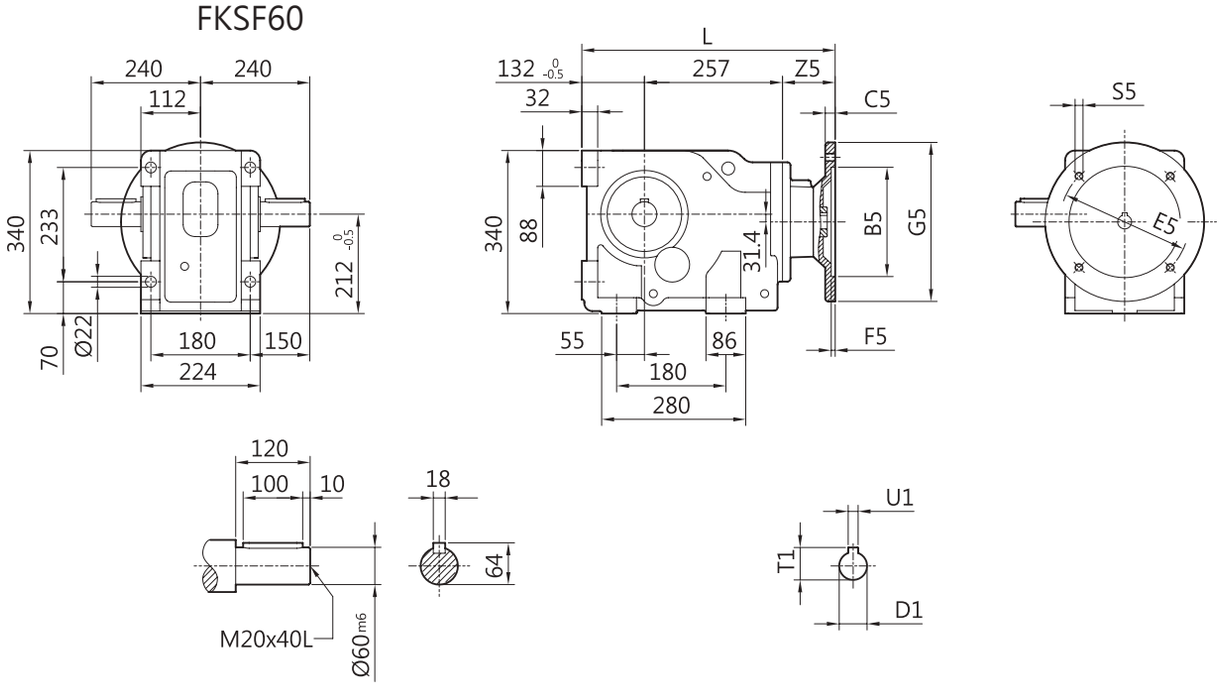


	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 80	130	12	165	5	200	384.5	M10	59	19	21.8	6
IEC 90	130	12	165	5	200	384.5	M10	59	24	27.3	8
IEC 100	180	15	215	5	250	401	M12	75.5	28	31.3	8
IEC 112	180	15	215	5	250	401	M12	75.5	28	31.3	8
IEC 132	230	16	265	6	300	449.5	M12	124	38	41.3	10

FKSF60



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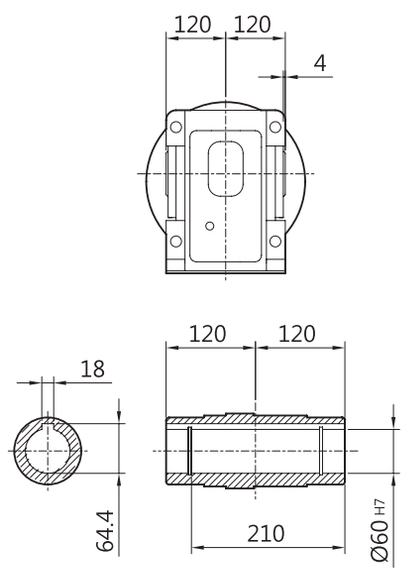
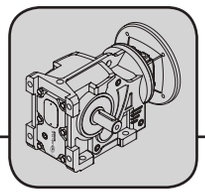


For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 80	130	12	165	5	200	438.5	M10	49.5	19	21.8	6
IEC 90	130	12	165	5	200	438.5	M10	49.5	24	27.3	8
IEC 100	180	15	215	5	250	455	M12	66	28	31.3	8
IEC 112	180	15	215	5	250	455	M12	66	28	31.3	8
IEC 132	230	16	265	6	300	503.5	M12	114.5	38	41.3	10
IEC 160	250	20	300	6	350	539.5	M16	150.5	42	45.3	12



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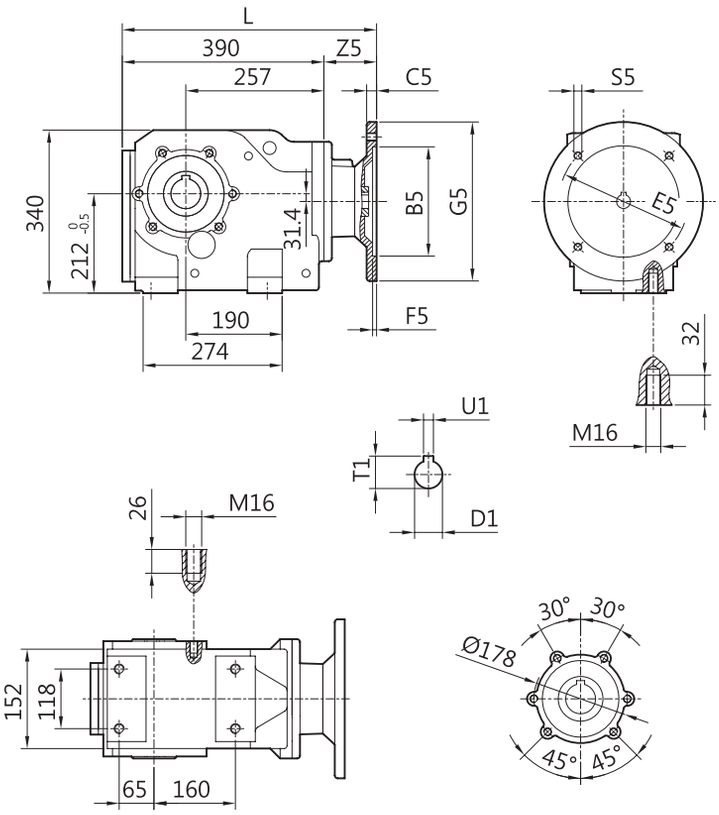

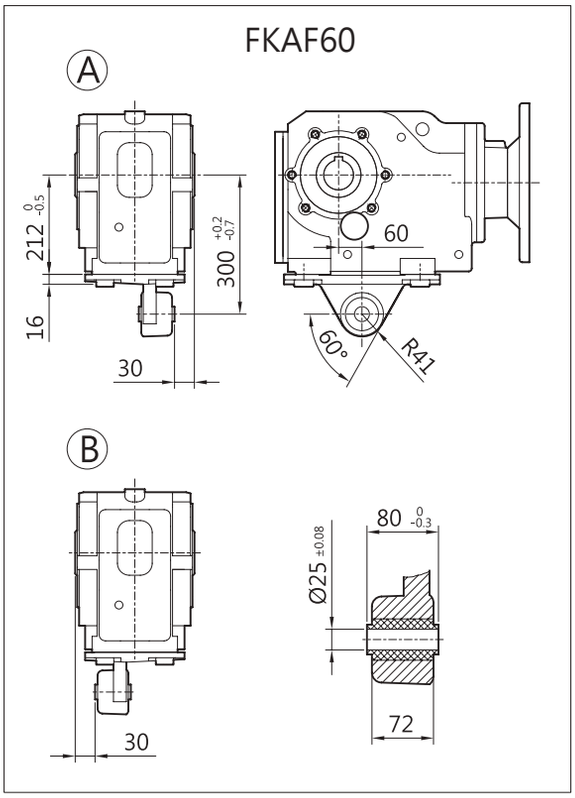

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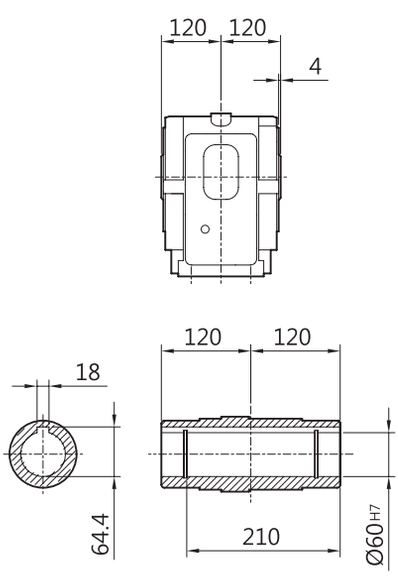
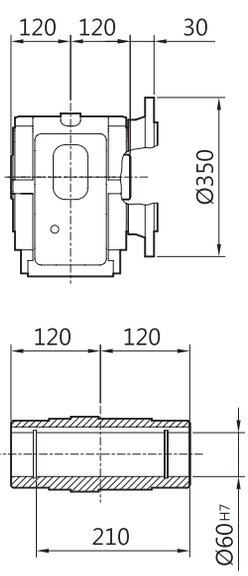


FKMF60



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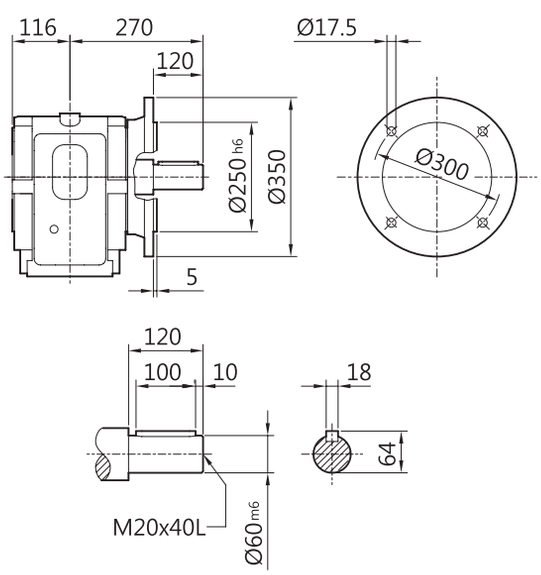
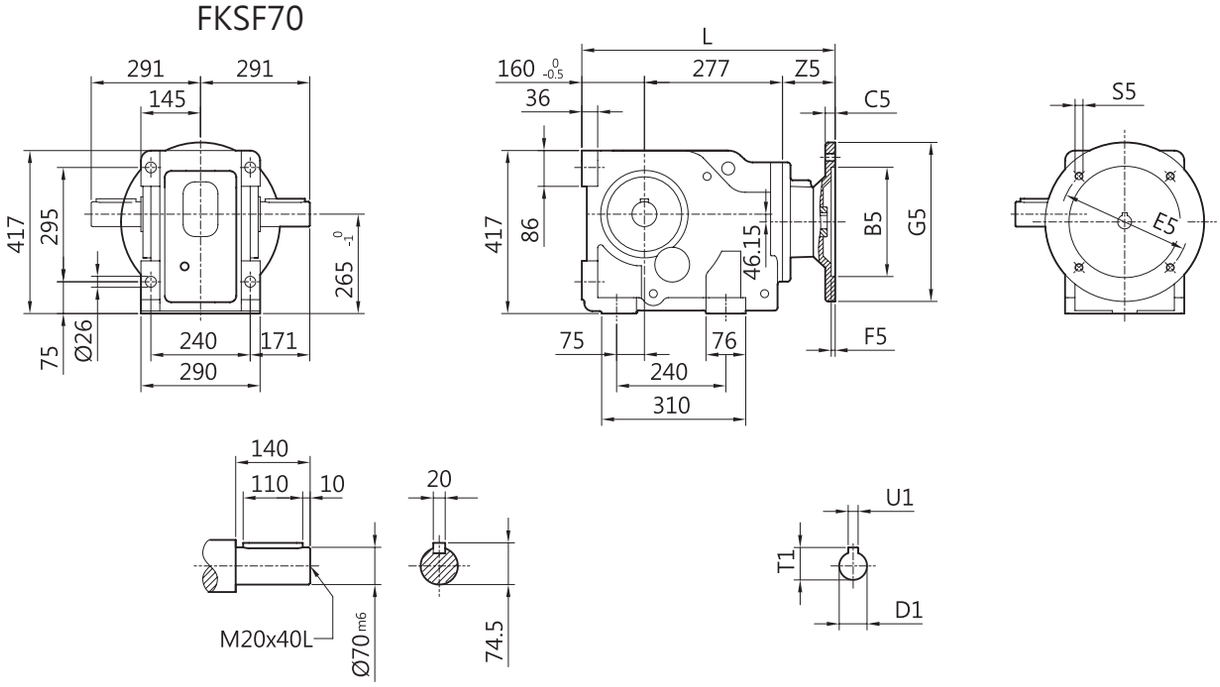
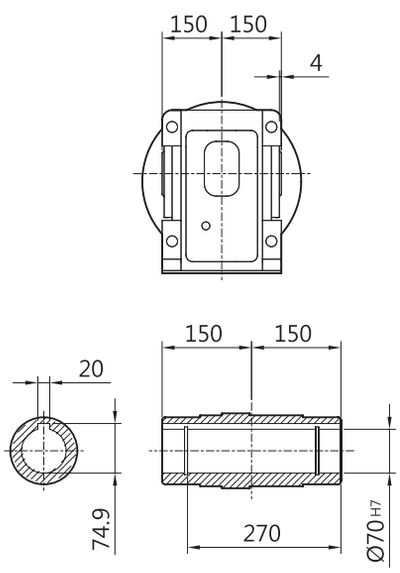


	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 80	130	12	165	5	200	439.5	M10	49.5	19	21.8	6
IEC 90	130	12	165	5	200	439.5	M10	49.5	24	27.3	8
IEC 100	180	15	215	5	250	456	M12	66	28	31.3	8
IEC 112	180	15	215	5	250	456	M12	66	28	31.3	8
IEC 132	230	16	265	6	300	504.5	M12	114.5	38	41.3	10
IEC 160	250	20	300	6	350	540.5	M16	150.5	42	45.3	12

FKSF70

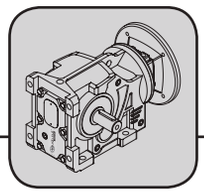


FKHF70



For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 100	180	15	215	5	250	499	M12	62	28	31.3	8
IEC 112	180	15	215	5	250	499	M12	62	28	31.3	8
IEC 132	230	16	265	6	300	543.5	M12	106.5	38	41.3	10
IEC 160	250	20	300	6	350	579.5	M16	142.5	42	45.3	12
IEC 180 *	250	20	300	6	350	588.5	M16	151.5	48	51.8	14



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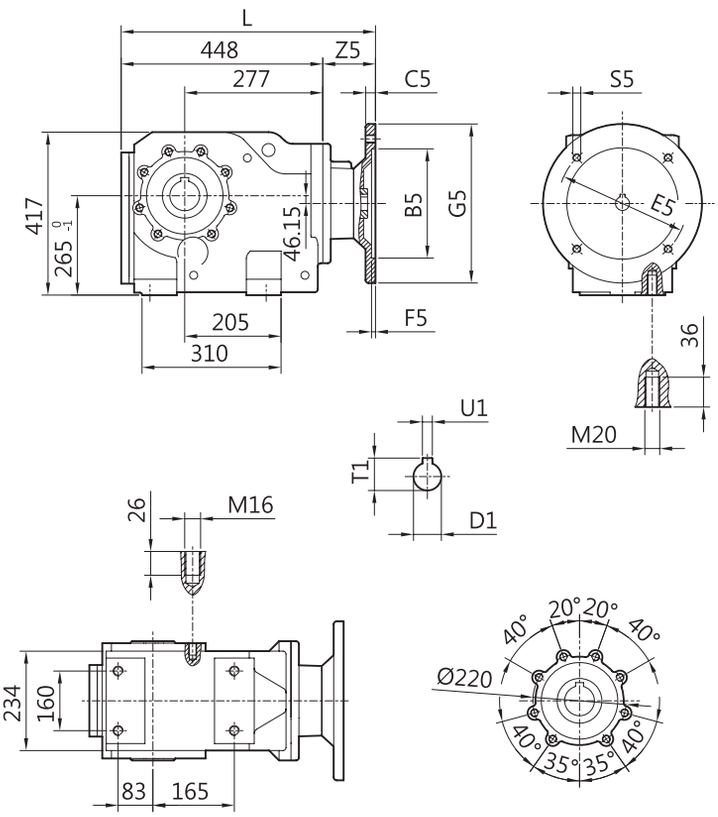

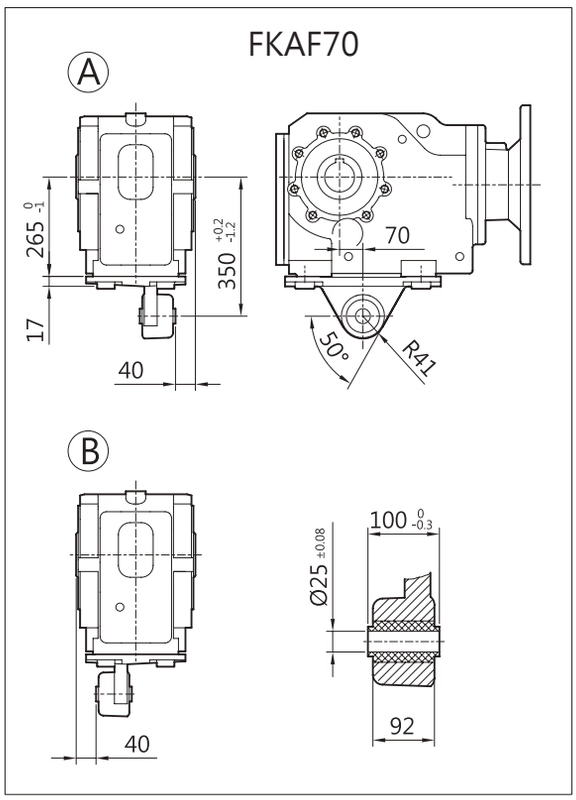

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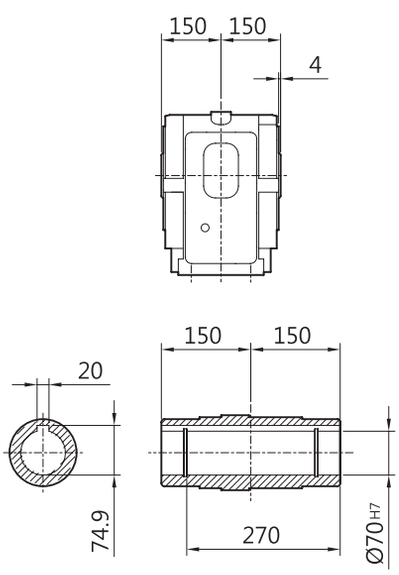

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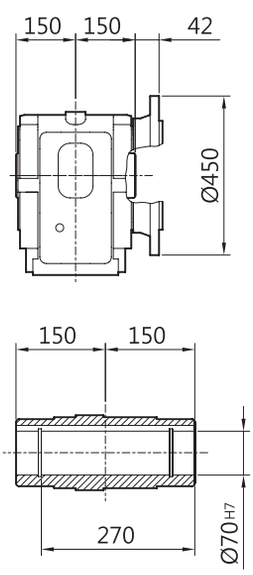

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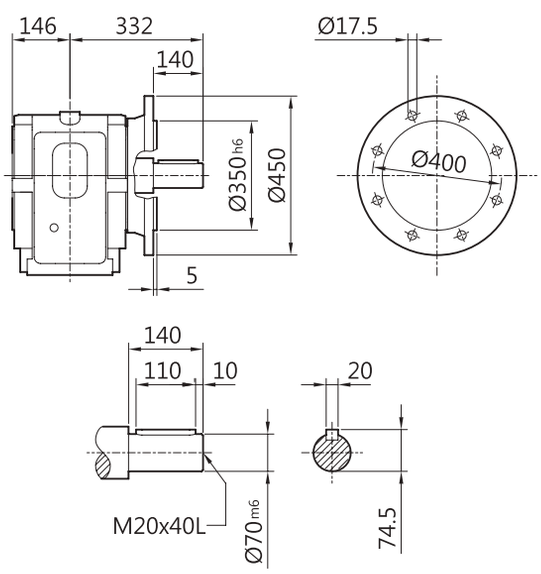
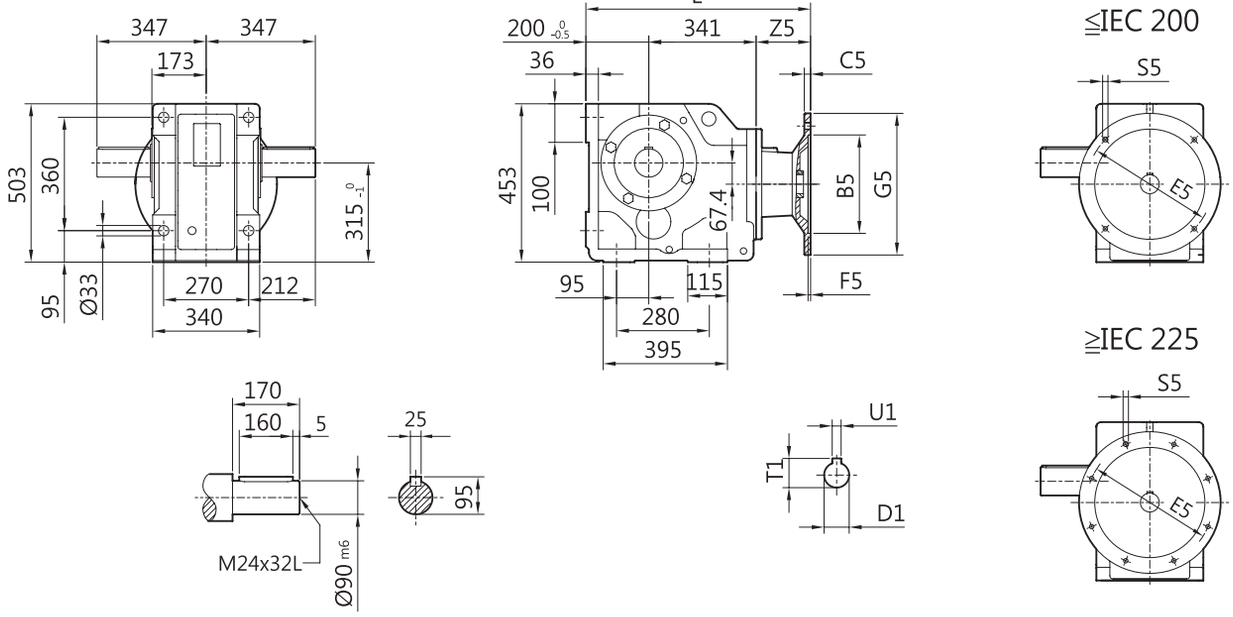
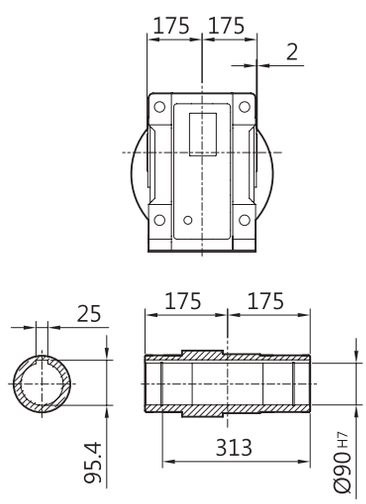


	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 100	180	15	215	5	250	510	M12	62	28	31.3	8
IEC 112	180	15	215	5	250	510	M12	62	28	31.3	8
IEC 132	230	16	265	6	300	554.5	M12	106.5	38	41.3	10
IEC 160	250	20	300	6	350	590.5	M16	142.5	42	45.3	12
IEC 180 *	250	20	300	6	350	599.5	M16	151.5	48	51.8	14

FKSF90

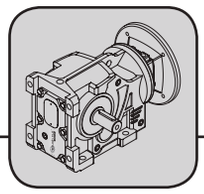


FKHF90



For the dimensions concerning the solid input shaft, please refer to the table shown at page 80.
For the dimensions concerning the motor input, please refer to the table shown at page 81.

	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 100	180	15	215	5	250	603	M12	62	28	31.3	8
IEC 112	180	15	215	5	250	603	M12	62	28	31.3	8
IEC 132	230	16	265	6	300	638	M12	97	38	41.3	10
IEC 160	250	20	300	6	350	674	M16	133	42	45.3	12
IEC 180 *	250	20	300	6	350	683	M16	142	48	51.8	14
IEC 200 *	300	20	350	6	400	683	M16	142	55	59.3	16
IEC 225 *	350	20	400	6	450	714	M16	173	60	64.4	18



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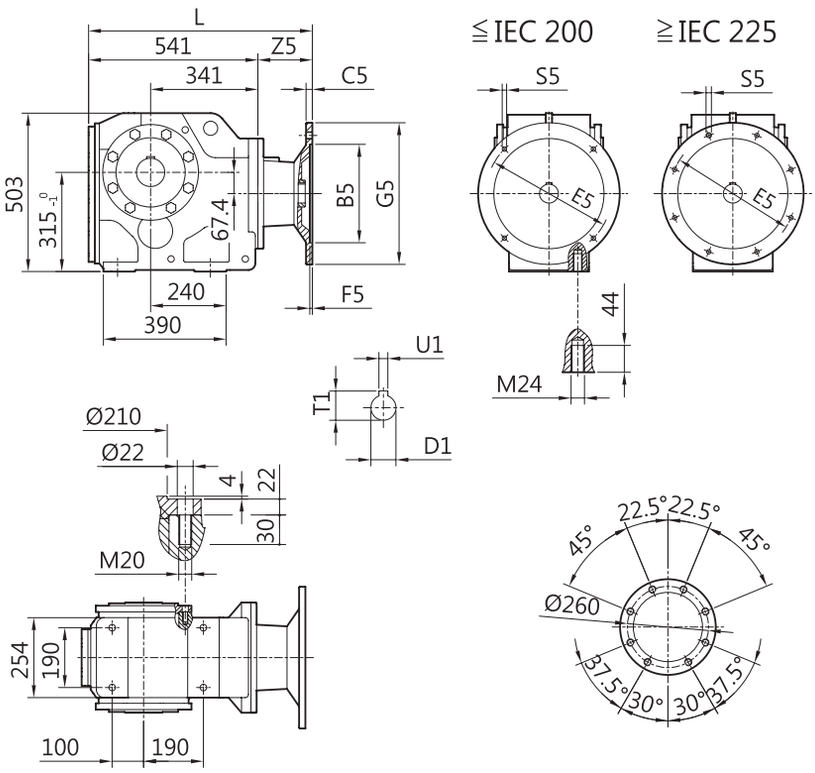

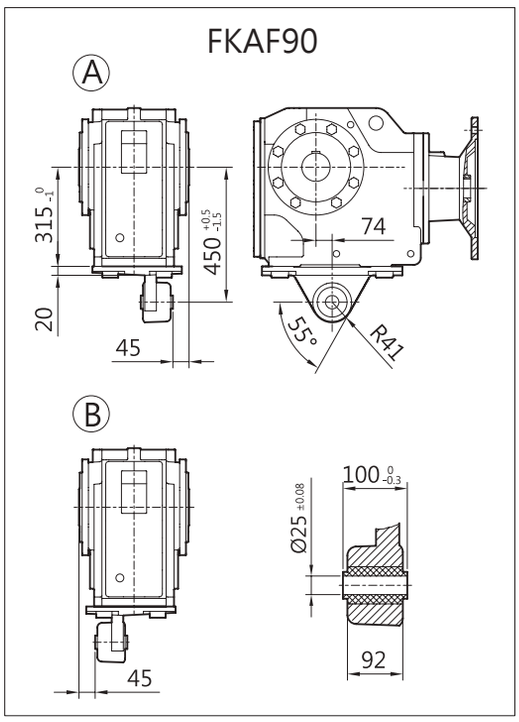

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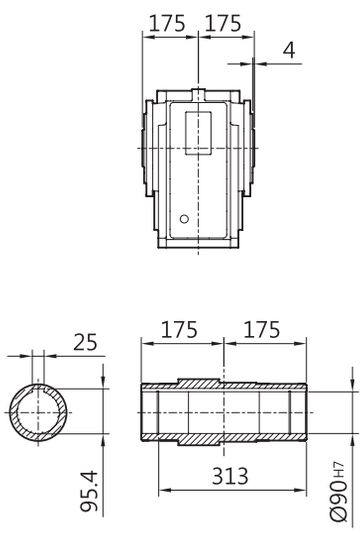

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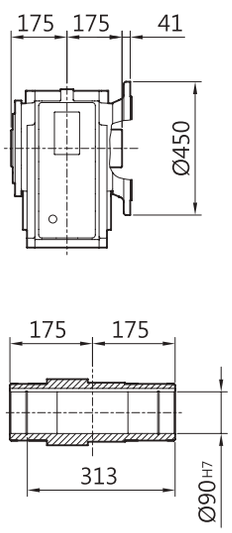

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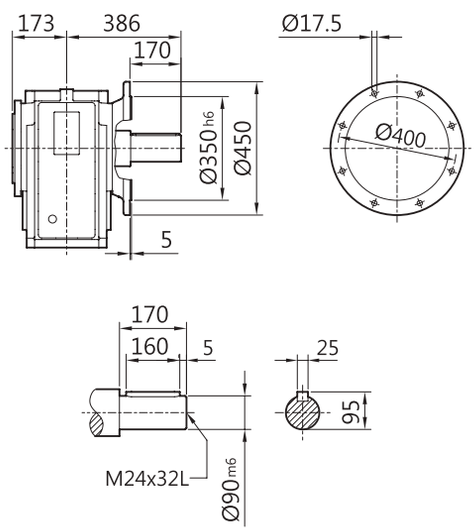


	B5	C5	E5	F5	G5	L	S5	Z5	D1	T1	U1
IEC 100	180	15	215	5	250	603	M12	62	28	31.3	8
IEC 112	180	15	215	5	250	603	M12	62	28	31.3	8
IEC 132	230	16	265	6	300	638	M12	97	38	41.3	10
IEC 160	250	20	300	6	350	674	M16	133	42	45.3	12
IEC 180 *	250	20	300	6	350	683	M16	142	48	51.8	14
IEC 200 *	300	20	350	6	400	683	M16	142	55	59.3	16
IEC 225 *	350	20	400	6	450	714	M16	173	60	64.4	18

Solid Input Shaft

FK..S

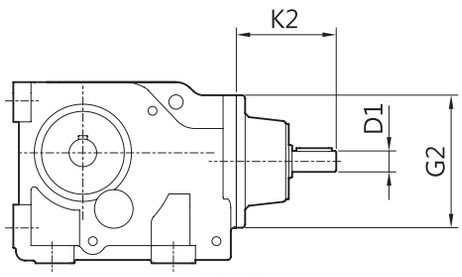
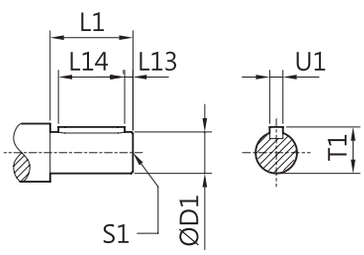


FIG 1



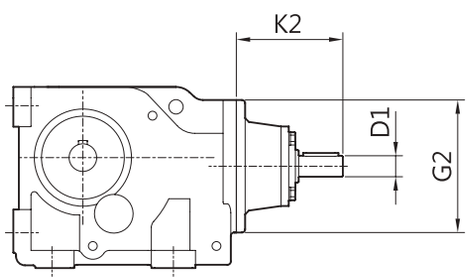
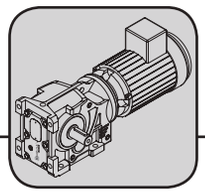


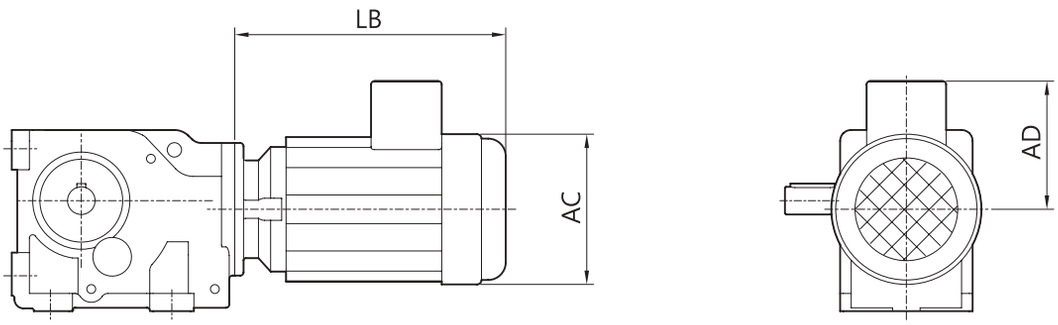
FIG 2

	D1	L1	L13	L14	T1	U1	S1	K2	G2	FIG
FK..30	16 k6	40	4	32	18	5	M5*10L	88	120	1
	19 k6	40	4	32	21.5	6	M6*12L	90.5	120	1
FK..35	16 k6	40	4	32	18	5	M5*10L	83.5	160	1
	19 k6	40	4	32	21.5	6	M6*12L	86	160	1
FK..40	19 k6	40	4	32	21.5	6	M6*12L	95	160	2
	24 k6	50	5	40	27	8	M8*16L	119.5	160	2
FK..40*	19 k6	40	4	32	21.5	6	M6*12L	95	160	2
	24 k6	50	5	40	27	8	M8*16L	119.5	160	2
FK..50	19 k6	40	4	32	21.5	6	M6*12L	89.5	200	2
	19 k6	40	4	32	21.5	6	M6*12L	106	200	2
	24 k6	50	5	40	27	8	M8*16L	114	200	2
	38 k6	80	5	70	41	10	M12*24L	177	200	2
FK..60	19 k6	40	4	32	21.5	6	M6*12L	95.5	250	2
	28 k6	60	5	50	31	8	M8*16L	114.5	250	2
	38 k6	80	5	70	41	10	M12*24L	167.5	250	2
	42 k6	110	10	70	45	12	M16*32L	240.5	250	2
FK..70	28 k6	60	5	50	31	8	M8*16L	110.5	300	2
	38 k6	80	5	70	41	10	M12*24L	159.5	300	2
	42 k6	110	10	70	45	12	M16*32L	232.5	300	2
	48 k6	110	10	80	51.5	14	M16*32L	237.5	300	2
FK..90	28 k6	60	5	50	31	8	M8*16L	110.5	350	2
	38 k6	80	5	70	41	10	M12*24L	150	350	2
	42 k6	110	10	70	45	12	M16*32L	223	350	2
	48 k6	110	10	80	51.5	14	M16*32L	228	350	2



Couple With Motor

FK..M

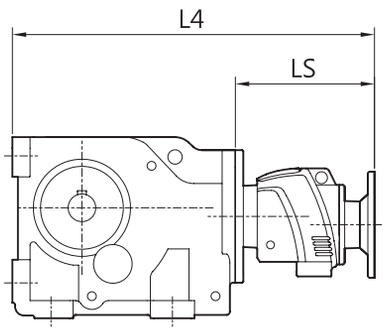


	MOTOR	AC	AD	LB
FK..30	63	120	108	231.5
	71	136	116	247.5
	80	160	127	309
	90	176	139	354.5
FK..35	63	120	108	227
	71	136	116	243
	80	160	127	304.5
	90	176	139	350
	100	198	149	398
FK..40	63	120	108	225
	71	136	116	241
	80	160	127	302.5
	90	176	139	348
	100	198	149	396
	112	220	167	408
FK..40*	63	120	108	225
	71	136	116	241
	80	160	127	302.5
	90	176	139	348
	100	198	149	396
	112	220	167	408
FK..50	80	160	127	297
	90	176	139	342.5
	100	198	149	390.5
	112	220	167	402.5
	132S	258	184.5	441

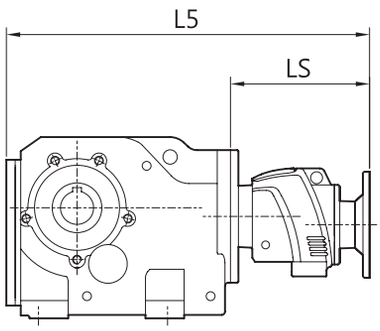
	MOTOR	AC	AD	LB
FK..60	80	160	127	287.5
	90	176	139	333
	100	198	149	381
	112	220	167	393
	132S	258	184.5	431.5
	132M	258	184.5	469.5
	160M	343	263	550
FK..70	100	198	149	377
	112	220	167	389
	132S	258	184.5	423.5
	132M	258	184.5	461.5
	160M	334	263	542
	160L	334	286	586
	180MC	382	305	607.5
FK..90	100	198	149	369
	112	220	167	381
	132S	258	184.5	414
	132M	258	184.5	452
	160M	334	263	532.5
	160L	334	286	576.5
	180MC	382	305	598
	180LC	382	305	636
	200LC	458	362	713

Multi-Staged Gear Unit

FKSF/FKHF



FKAF/FKMF/FKNF



		LS	L4	L5
FK35 FH25	IEC 63	219	456	458
	IEC 71	219	456	458
	IEC 80	237	474	476
	IEC 90	237	474	476
FK40 FH25	IEC 63	217	470	475
	IEC 71	217	470	475
	IEC 80	235	488	493
	IEC 90	235	488	493
FK40* FH25	IEC 63	217	486	490
	IEC 71	217	486	490
	IEC 80	235	504	508
	IEC 90	235	504	508
FK50 FH25	IEC 63	211.5	525.5	537
	IEC 71	211.5	525.5	537
	IEC 80	229.5	543.5	555
	IEC 90	229.5	543.5	555
FK60 FH30	IEC 63	241.5	630.5	631.5
	IEC 71	241.5	630.5	631.5
	IEC 80	259.5	648.5	649.5
	IEC 90	259.5	648.5	649.5
	IEC 100	276	665	666
	IEC 112	276	665	666
FK70 FH30	IEC 63	233.5	670.5	681.5
	IEC 71	233.5	670.5	681.5
	IEC 80	251.5	688.5	699.5
	IEC 90	215.5	688.5	699.5
	IEC 100	268	705	716
	IEC 112	268	705	716
FK90 FH40	IEC 71	290.5	831.5	831.5
	IEC 80	298.5	839.5	839.5
	IEC 90	298.5	839.5	839.5
	IEC 100	315	856	856
	IEC 112	315	856	856
	IEC 132S	363.5	904.5	904.5

JK Fenner

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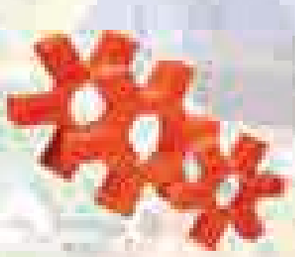
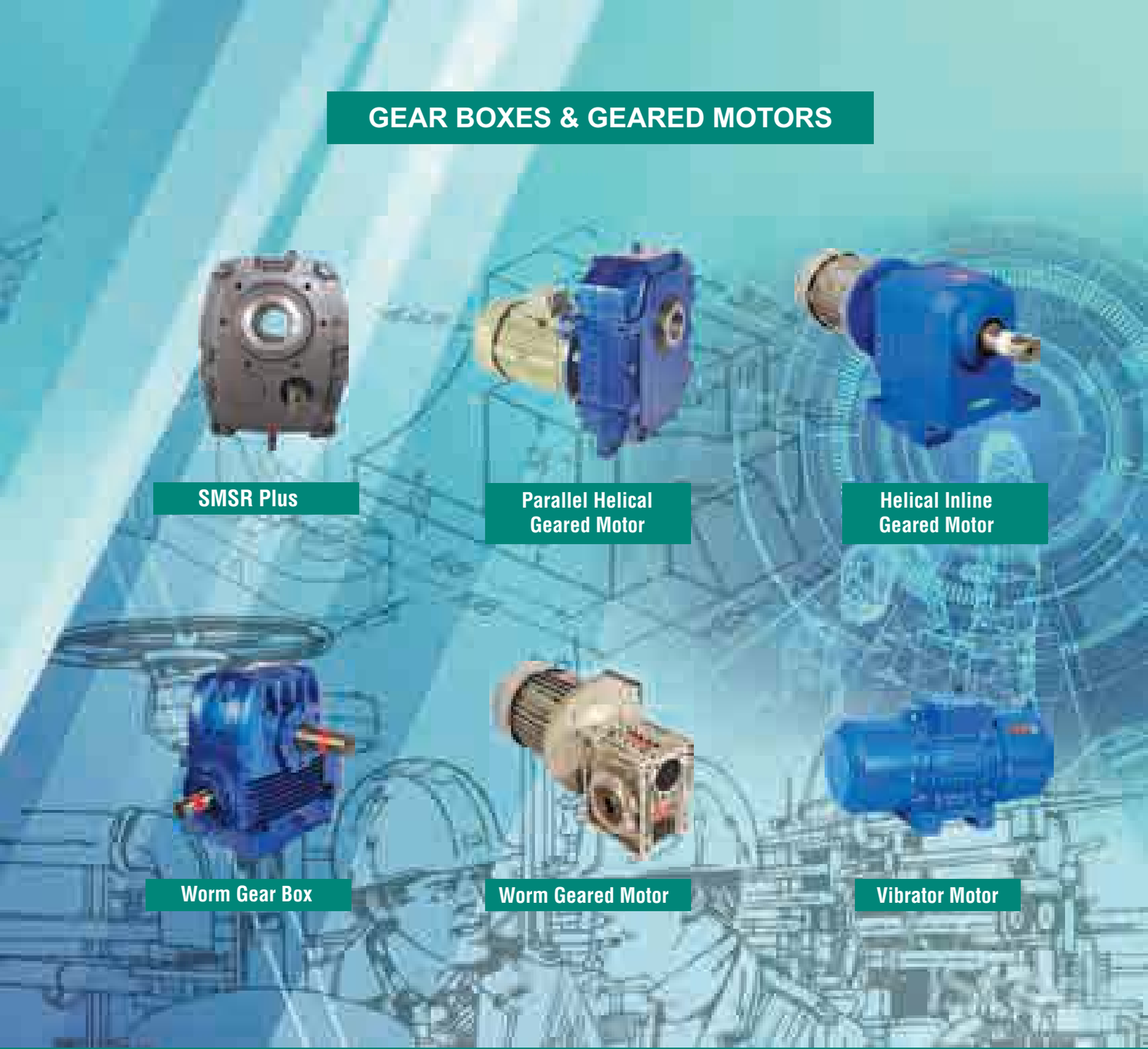


PU Elements

GEAR BOXES & GEARED MOTORS



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