# GBY060020K

angular gearbox straight teeth GBY, Lexium, 60mm, reduction 20:1, 18arc.min, 44N.m





### Main

Range compatibility	Lexium ILS Lexium ILE Lexium SD3 Lexium 62 Lexium 62 Lexium 62 ILM Lexium 52 Lexium 32 Lexium ILA
Gear box type	Straight teeth
Product or component type	Angular planetary gearbox
Device short name	GBY
Product compatibility	BSH (55 mm, 1 motor stacks) BSH (55 mm, 2 motor stacks) BSH (55 mm, 3 motor stacks) BRS3 ILE (66 mm, 1 motor stacks) ILE (66 mm, 2 motor stacks) ILA (57 mm, 1 motor stacks) ILA (57 mm, 2 motor stacks) ILS (57 mm, 1 motor stacks) ILS (57 mm, 2 motor stacks) ILS (57 mm, 2 motor stacks) ILS (57 mm, 3 motor stacks) ILS (57 mm, 3 motor stacks) SH3 MH3 ILM
Gearbox external diameter	60 mm
Reduction ratio	20:1

#### Complementary

Complementary	
Maximum torsional backlash	18 arc.min
Torsional rigidity	2.5 N.m/arcmin
Housing colour	Black
Housing material	Black anodized aluminium
Shaft material	C 45
Additional information	Lubricated for life
Service life in hours	30000 h at 100 rpm at 30 °C
Mounting position	Any position
Efficiency	92 %
Maximum radial force Fr	340 N at 100 rpm, force applied at mid-distance from output shaft during 30000 hour at 30 $^{\circ}\text{C}$
Maximum axial force Fa	450 N at 100 rpm, during 30000 hour at 30°C
Moment of inertia	0.186 kg.cm²
Continuous output torque	44 N.m at 100 rpm at 30 °C
Maximum output torque	70 N.m at 100 rpm at 30 °C
Net weight	1.9 kg
Input diameter	14.0 mm

## Environment

LITTION		
Noise level	70 dB at 1 m, no-load	
IP degree of protection	Shaft output: IP54	
Ambient temperature for operation	-2590 °C	_

May 20, 2024

## Packing Units

3	
Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	9.7 cm
Package 1 Width	8.0 cm
Package 1 Length	18.0 cm
Package 1 Weight	1.873 kg
Unit Type of Package 2	S03
Number of Units in Package 2	5
Package 2 Height	30.0 cm
Package 2 Width	30.0 cm
Package 2 Length	40.0 cm
Package 2 Weight	10.078 kg

## Offer Sustainability

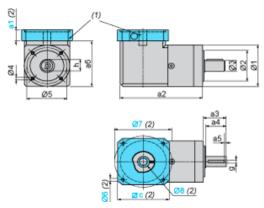
Sustainable offer status	Green Premium product				
REACh Regulation	☑ REACh Declaration				
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope)				
Mercury free	Yes				
China RoHS Regulation	☑ China RoHS Declaration				
RoHS exemption information	₫Yes				
Environmental Disclosure	Product Environmental Profile				
Circularity Profile	No need of specific recycling operations				
PVC free	Yes				

### Contractual warranty

Warranty	18 months
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## GBY060020K

### Dimensions with Servo Motor Adaptation Kit



- (1) GBK adaptation kit
- (2) GBK adaptation kit related dimensions a1, c, Ø6, Ø7, Ø8 depend on the gearbox and servo motor combination
- Ø8 shaft end adaptor in case motor shaft diameter is smaller than gearbox input coupling diameter

#### Values in mm

a2	a3	a4	a5	h	g	Ø1	Ø2	Ø3	Ø4	Ø5	a6
124.5	35	30	2.5	16	5	60	40 h7	14 h7	M5 x 8	52	80.3

#### Values in in.

a2	a3	a4	a5	h	g	Ø1	Ø2	Ø3	Ø4	Ø5	a6
4.90	1.38	1.18	0.09	0.63	0.19	2.36	1.57 h7	0.55 h7	M5 x 0.31	2.05	3.16