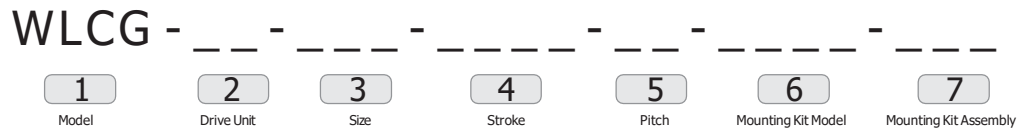


**Ordering Code**



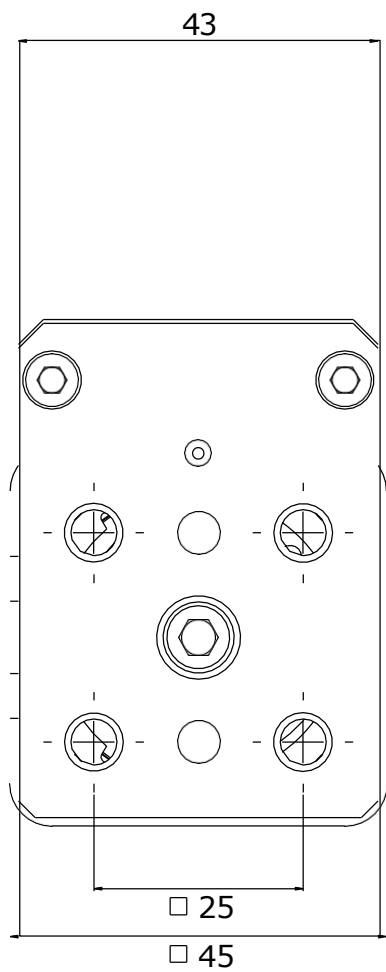
**1 - Model**

**WLCG** : Series Compact Actuators

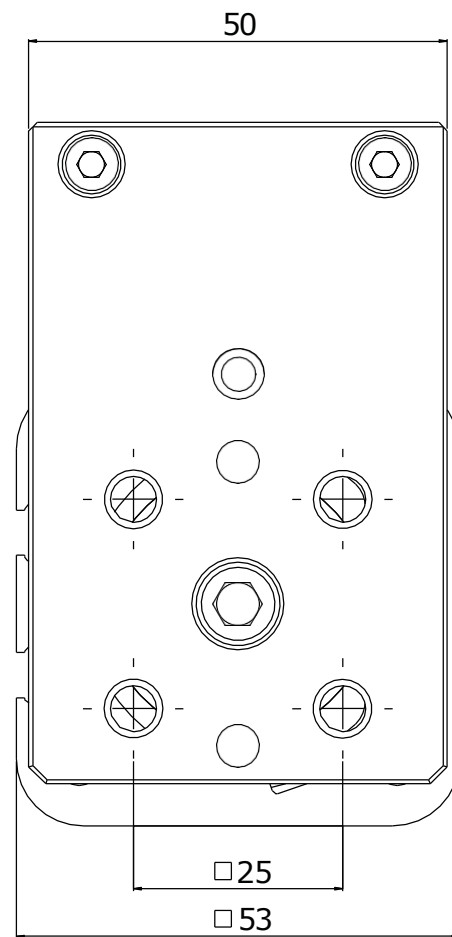
**2 - Drive Unit**

**BS** : Ball Screw

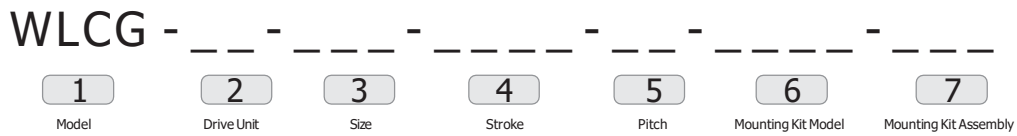
**3 - Size**



WLCG - \_\_ - 032



WLCG - \_\_ - 040

**Ordering Code**

**4-Stroke**

Size	Standard Strokes			
032	0050	0100	0150	-
040	0050	0100	0150	0200

**Movement Stroke**

In addition to the desired movement stroke, it is recommended to leave a space on both sides until 2xPitch.

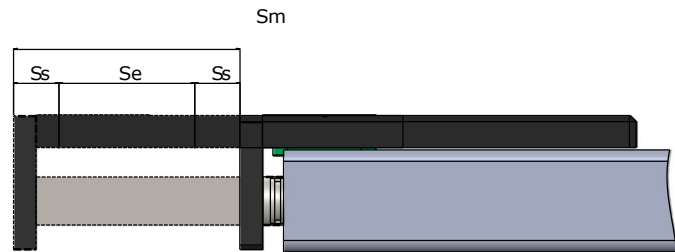
$$S_m = S_e + 2 \cdot S_s$$

$$S_s = 2 \cdot p$$

$S_m$  : Movement Stroke

$S_e$  : Safety Stroke

$p$  : Ball Screw Pitch


**5 - Pitch**

Drive Unit	Ball Screw		
Actuator Model	5	10	16
WLCG - _ - 032	+	+	-
WLCG - _ - 040	+	+	+

**6 - Mounting Kit Model**

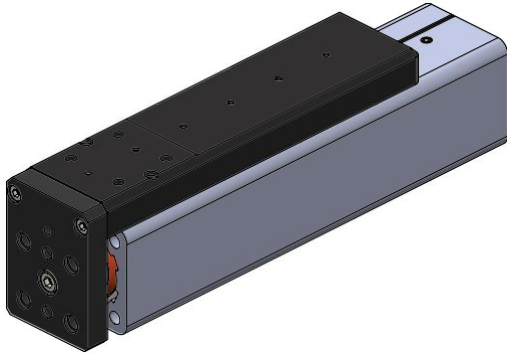
00 : Without Mounting	WDAK : Axial Kit	WDPK : Parallel Kit

Note 1 : Please contact for different motor types and mounting sizes.

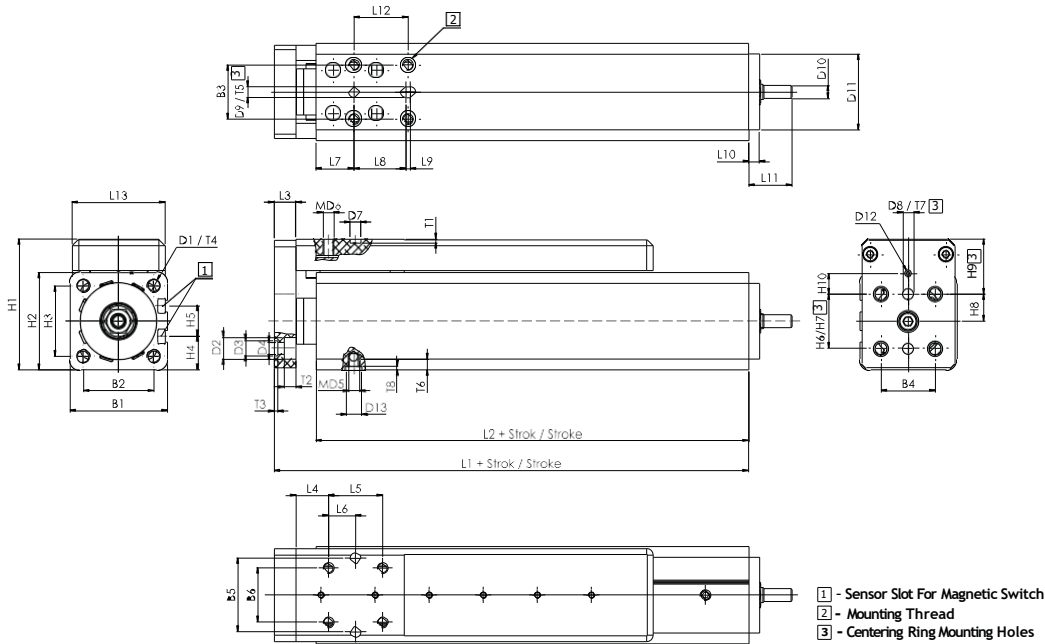
Note 2 : Please contact for to use reducer.

**7 - Mounting Kit Assembly**

00 : Without Motor	070 : Ø70 motor mounting	023 : NEMA 23 motor mounting

**WINMAN WLCG Series Compact Actuators**

**Specification**

Size	032			040		
Pitch [mm/rev]	5	10	5	10	16	
Max. Payload Horizontal [kg] <sup>(1)</sup>	60	30	120	60	36	
Max. Payload Vertical [kg]	30	15	60	30	18	
Max. Feed Force Fx [N]	350	175	650	325	200	
Max. Speed [mm/s]	150	300	180	360	580	
Max. Acceleration [m/s <sup>2</sup> ]	10					
Repetition Accuracy[mm]	±0,02					
Position Sensing	Magnetic Sensor WT65 or WT75					
Basic Weight 0 mm Stroke [kg]	1,04			2,49		
Additional Weight Per 100 mm Stroke [kg]	0,34			0,55		
Mass Moment of Inertia J <sub>0</sub> With 0 mm Stroke [kgmm <sup>2</sup> ]	9,33	9,40	33,25	33,75	34,25	
Mass Moment of Inertia J <sub>s</sub> Per Metre Stroke [kgmm <sup>2</sup> /m]	4,87	5,78	11,66	16,70	21,77	
Mass Moment of Inertia J <sub>p</sub> Per Kg Payload [kgmm <sup>2</sup> /m]	0,64	2,54	0,64	2,54	6,50	
Mass Moment of Inertia J <sub>A</sub> of The Compact Actuator [kgmm <sup>2</sup> ]	$J_A = J_0 + (J_s \times W_s) + (J_p \times m)$					W <sub>s</sub> : Working Stroke [m] m: Moving payload [kg]

**Technical Drawing**


Size	B1	B2	B3	B4	B5	B6	D1	ØD2	ØD3	ØD4	D5	D6	ØD7	ØD8	ØD9	ØD10	ØD11	ØD12
032	45	32,50	25	25	34	25	M6	10	7	5,50	M5	M5	5	5	5	6	35	6
040	53	38	40	25	40	40	M6	10	7	5,50	M5	M5	7	5	7	10	43	10

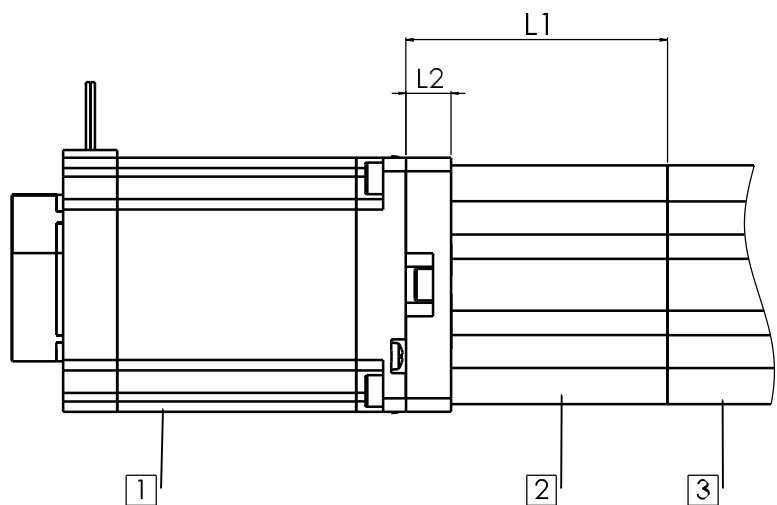
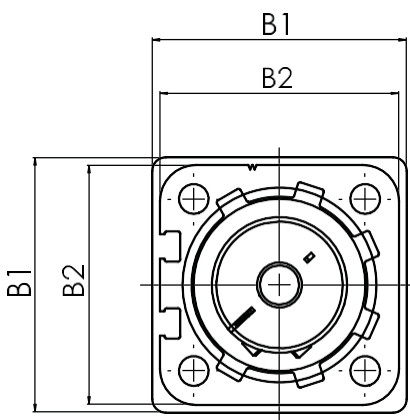
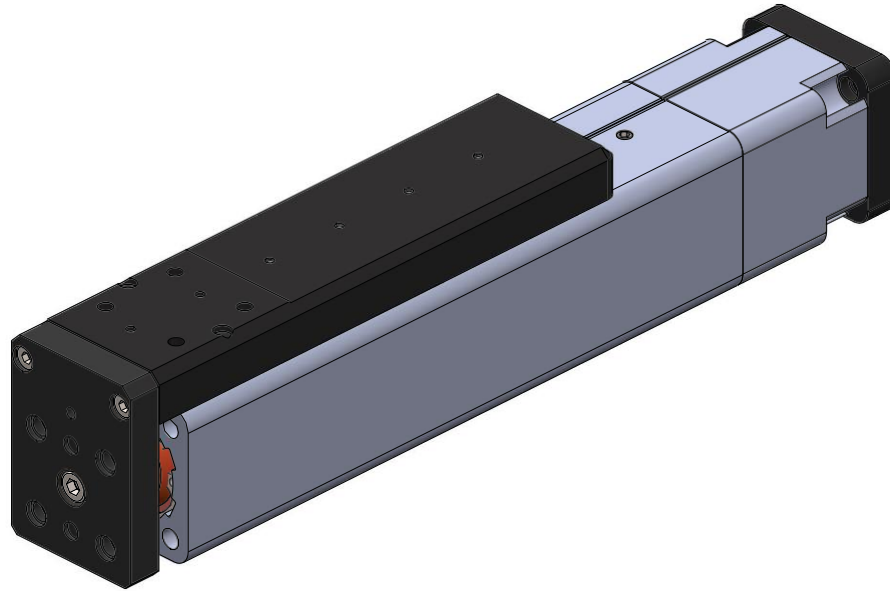
  

Size	ØD13	H1	H2	H3	H4	H5	H6	H7	H8	H9	H10	L1	L2	L3	L4	L5	L6	L7
032	7	60,50	45	32,50	15,50	25	25	25	12,50	25,50	9,50	119,30	100	10	15	25	12,50	17,50
040	7	84	53	38	18	25	25	34	12,50	40,5	15	128,50	108,50	10	15	25	12,50	30

Size	L8	L9	L10	L11	L12	L13	T1	T2	T3	T4	T5	T6	T7	T8
032	24	2	4,90	19,90	25	43	1,80	5,40	1,30	12	1,30	5	1,30	1,80
040	24	2	4,90	24	25	50	1,80	5,40	1,60	12	1,60	6	1,80	1,80

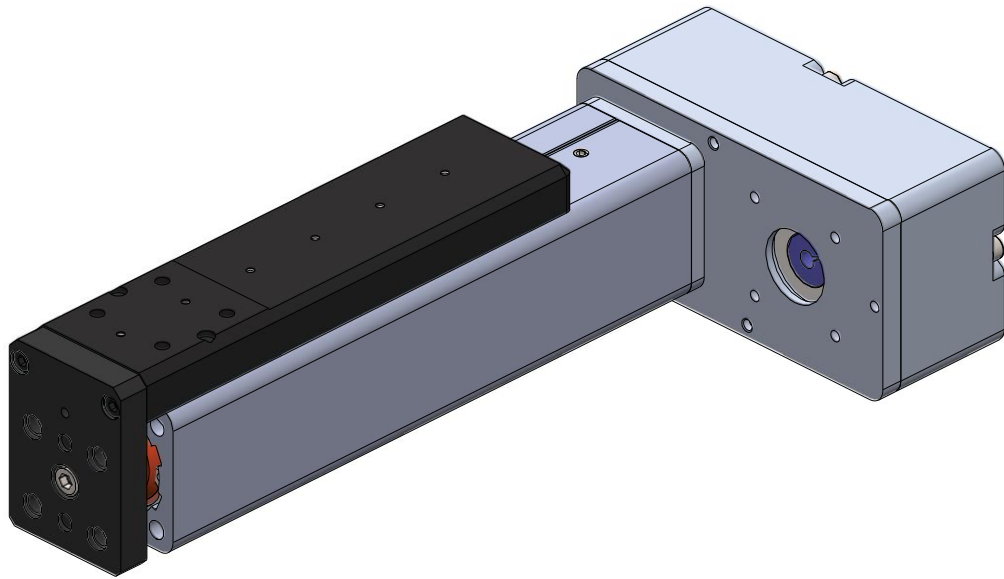
WDAK Axial Mounting Kit



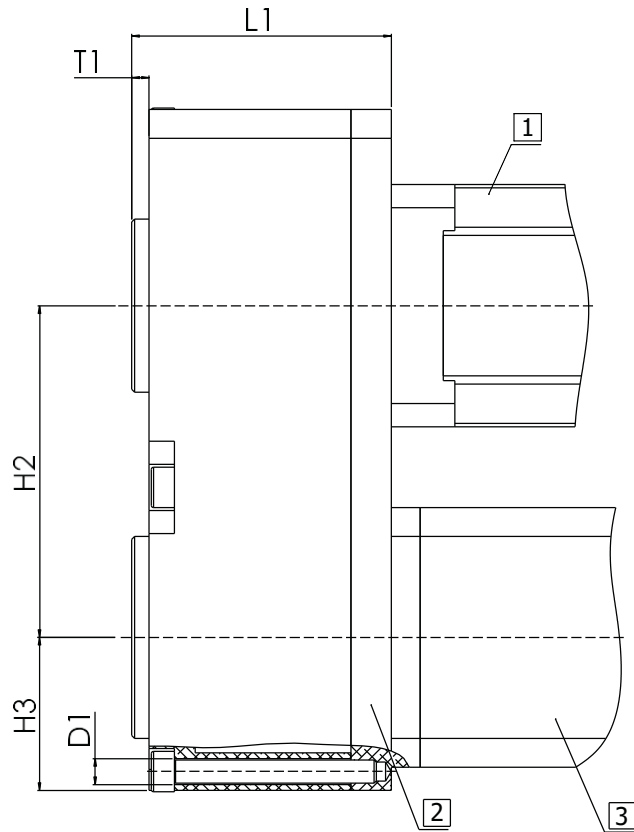
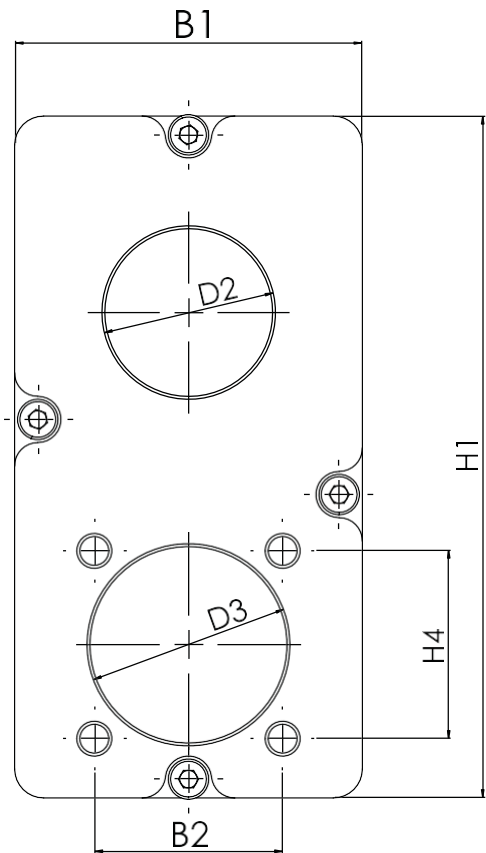
- 1 - Motor
- 2 - Axial Kit
- 3 - Linear Actuator

Size	B1	B2	L1	L2
032	45	-	55	10
040	56,40	53	58	10

**WDPK Parallel Mounting Kit**

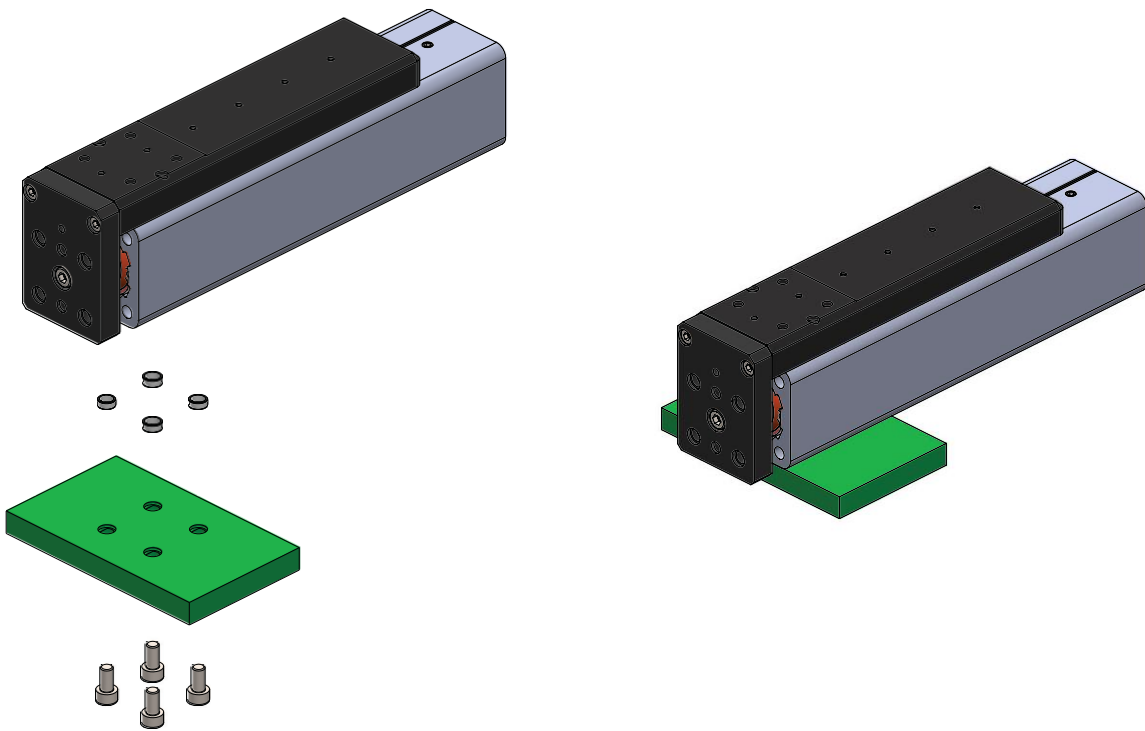


- 1** - Motor
- 2** - Parallel Kit
- 3** - Linear Actuator

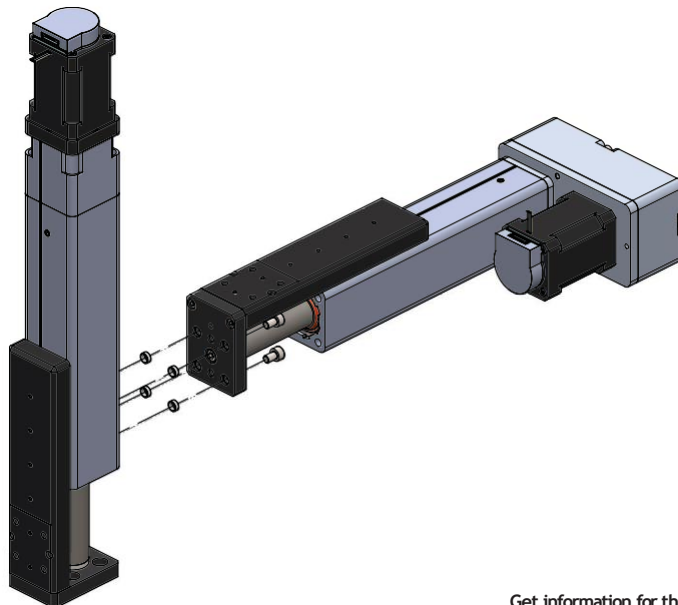
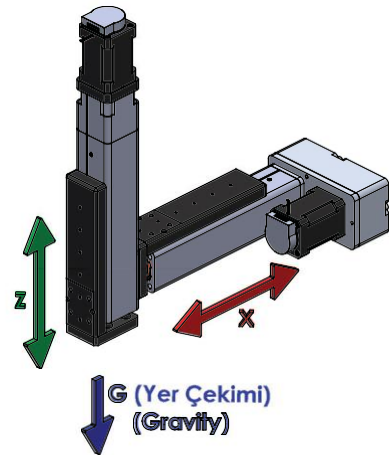


Size	B1	B2	D1	D2	D3	H1	H2	H3	H4	L1	T1
032	60	32,50	4,50	30	35	118	57,50	26,50	32,50	45	3
040	60	38	4,50	30	35	118	57,50	26,50	38	50	3

**Assembly**



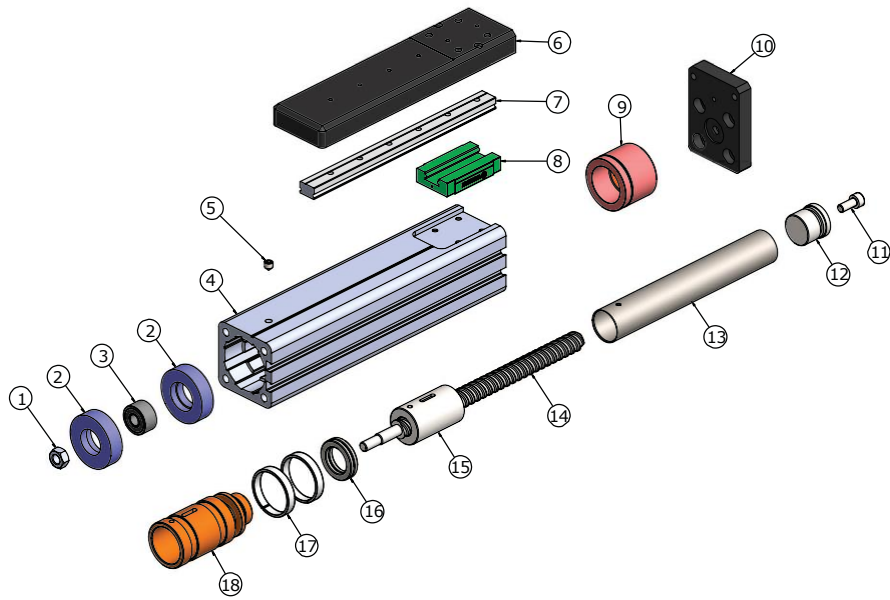
Z \ X	032	040
032	+	+
040	-	+



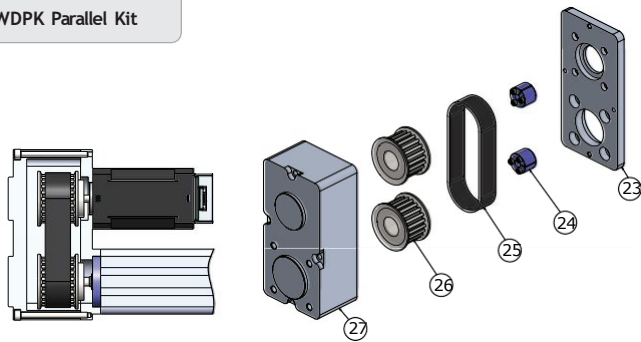
Get information for the speed, force and stroke values you will apply.

**Assembly**

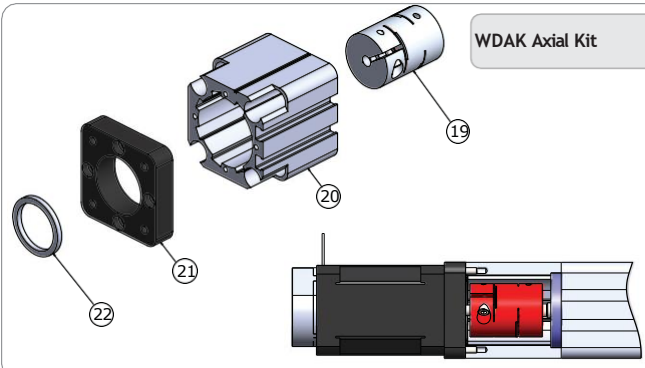
WLCG Compact Actuator



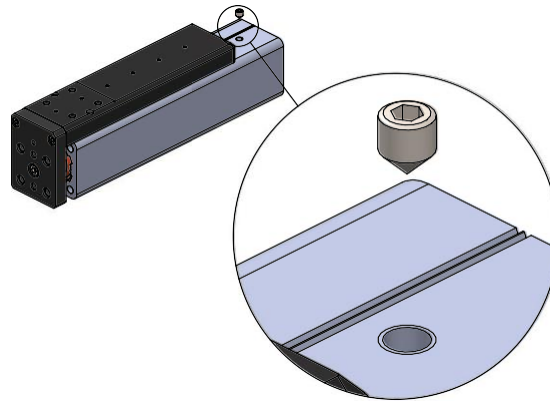
WDPK Parallel Kit



WDAK Axial Kit



Piece	Qty	Part Name	Assembly
1	1	Bearing Fixing Nut	Actuator
2	2	Bearing Fixing Ring	
3	1	Bearing	
4	1	Profile	
5	1	Nipple	
6	1	Top Mounting Plate	
7	1	Linear Guide	
8	1	Linear Carriage	
9	1	Front Cover	
10	1	Front Mounting Plate	
11	1	Connection Bolt	
12	1	Connection Nipple	
13	1	Piston Rod	
14	1	Ball Screw	
15	1	Ball Nut	
16	2	Magnetic	
17	2	Guide Ring	
18	1	Piston	
19	1	Coupling	Axial Mounting
20	1	Bellhousing	
21	1	Bellhousing Flange	
22	1	Centering Ring	Parallel Mounting
23	1	Parallel Kit Cover	
24	2	Taper Bushing	
25	1	Toothed Belt	
26	2	Timing Belt Pulleys	
27	1	Parallel Kit Box	

**Maintenance**


Basic lubrication is done in-factory before shipment.

Bearings of the ball screw have been lubricated for life and will not require in-service lubrication under normal operating conditions.

The profile of the linear actuator has port on the top side for access to the lube on the ball nut.

Re-lubrication should be carried out if the defined travel distance is completed or 400 operating hours are reached first. At the end of 2 years, it must be re-lubricated even if the travel distance and working hours are not reached.

For lubrication; set linear actuator to zero stroke position.

Remove the grubs in the lubrication port lubricate the amount indicated in the table and replace the glue after lubrication, move the linear actuator at least three times along the stroke distance. the travel speed must not exceed 10 mm /s.

Linear actuators must be lubricated with suitable grease.  
Lithium soap grease should be used.

Caution: Do not use grease containing graphite or MoS!

Lubrication quantity is provided in table by normal operating conditions.

Normal Working Conditions		
Ambient Temperature	°C	10 ~ 40
Speed	m/s	≤ 0,4
Screw Rotation Speed	rev/min	2500
Load	N	≤ 0,2 P
Stroke	mm	> 60

Lubrication			
Actuator Model		WLCG - 032	WLCG-040
Lubrication Period	km	250	400
	h	400	400
Lubricate Dose	cm <sup>3</sup>	0,6	1,3