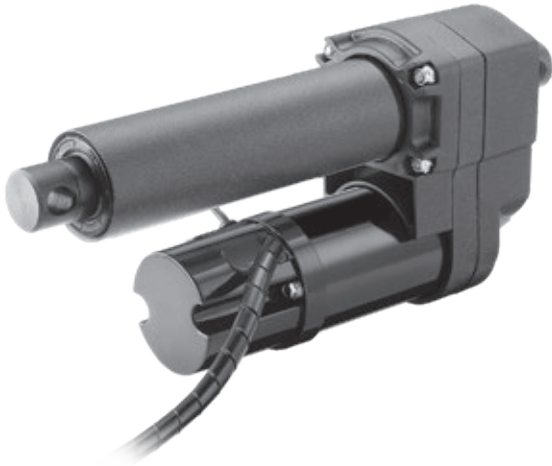




# B-Track AC – Technical Features



## Standard Features

- Robust and reliable
- 1 × 115 and 1 × 230 Vac as standard input voltages
- Acme and ball screw models
- Strokes up to 24 inches
- Load up to 8900N (2000 lbf)
- IP54 protection

## General Specifications

Screw type	acme or ball
Nut type K2 (acme screw) K2X (ball screw)	self-locking lead nut load lock ball nut
Manual override	yes
Anti-rotation	no
Static load holding brake acme screw models ball screw models	no (self-locking) yes
Safety features	overload clutch motor auto reset thermal switch
Anti coast brake K2 (acme screw) K2X (ball screw)	no no
Electrical connections	cable with flying leads
Compliances	CE, UKCA

## Compatible Controls

Contact customer support at [www.thomsonlinear.com/cs](http://www.thomsonlinear.com/cs)

## B-Track AC – Technical Specifications

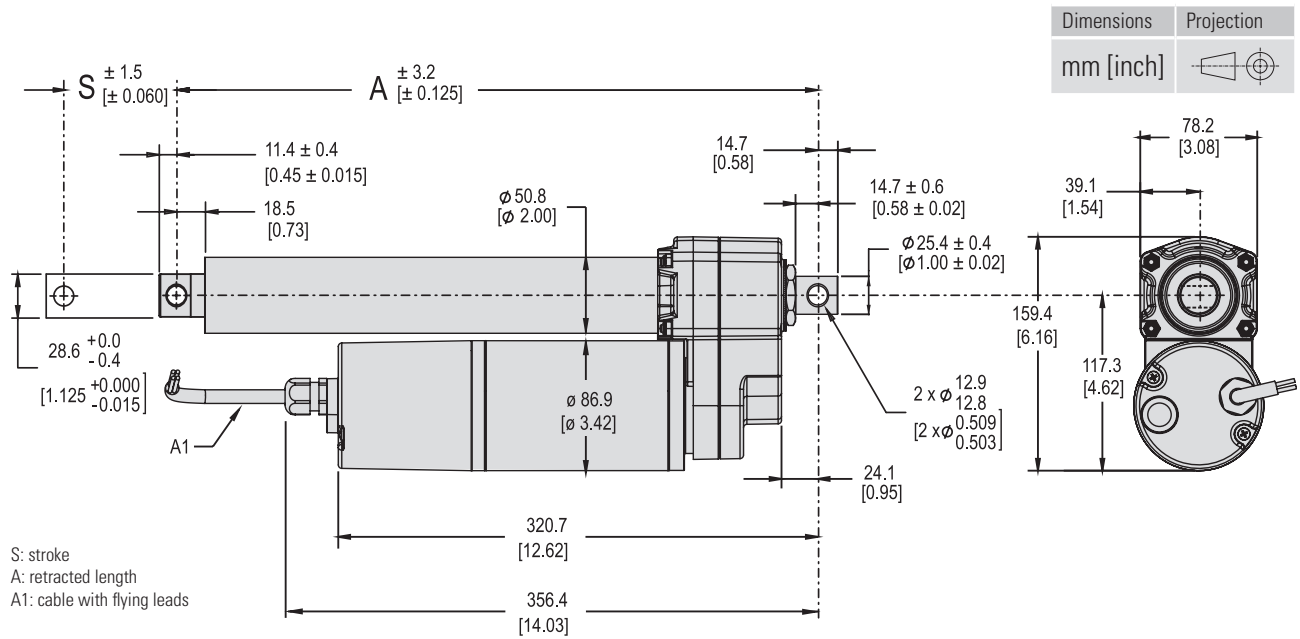
Mechanical Specifications		
Max. static load <sup>(1)</sup>	[N (lbf)]	13345 (3000)
Max. dynamic load (Fx)	[N (lbf)]	
K2G10-		2225 (500)
K2G20-		3338 (750)
K2G30-		4895 (1100)
K2XG05-		2225 (500)
K2XG10-		4450 (1000)
K2XG20-		6675 (1500)
K2XG30-		8900 (2000)
Speed @ no load/max. load	[mm/s (in/s)]	
K2G10-		26.5 (1.07) / 23 (0.9)
K2G20-		14.5 (0.58) / 13 (0.52)
K2G30-		10 (0.39) / 9 (0.35)
K2XG05-		44 (1.75) / 32 (1.28)
K2XG10-		26.5 (1.07) / 24 (0.94)
K2XG20-		14 (0.55) / 12.5 (0.5)
K2XG30-		9.5 (0.38) / 8 (0.32)
Min. ordering stroke (S) length	[in]	4
Max. ordering stroke (S) length	[in]	24
Operating temperature limits	[°C (F)]	-29 – 65 (-20 – 150)
Full load duty cycle @ 25 °C (77 °F)	[%]	25
End play, maximum	[mm (in)]	1.0 (0.04)
Restraining torque	[Nm (lbf-in)]	11.3 (100)
Protection class - static		IP54
Salt spray resistance	[h]	250

(1) Max. static load at fully retracted stroke

Electrical Specifications		
Available input voltages	[Vac]	1 × 115, 1 × 230
Input voltage tolerance	[%]	± 10
Current draw @ no load/max. load	[A]	
K2G10-115V		2.3 / 3.1
K2G10-230V		1.2 / 1.8
K2G20-115V		2.3 / 2.6
K2G20-230V		1.1 / 1.3
K2G30-115V		2.3 / 2.5
K2G30-230V		1.1 / 1.3
K2XG05-115V		2.3 / 3.3
K2XG05-230V		1.2 / 1.6
K2XG10-115V		2.4 / 3.3
K2XG10-230V		3.2 / 4.3
K2XG20-115V		2.3 / 2.7
K2XG20-230V		1.1 / 1.3
K2XG30-115V		2.4 / 2.6
K2XG30-230V		2.8 / 3.7
Cable length	[mm (in)]	597 (23.5)
Cable diameter	[mm (in)]	10 (0.4)
Cable leads cross section	[mm <sup>2</sup> (AWG)]	0.75 (18)



# B-Track AC – Dimensions

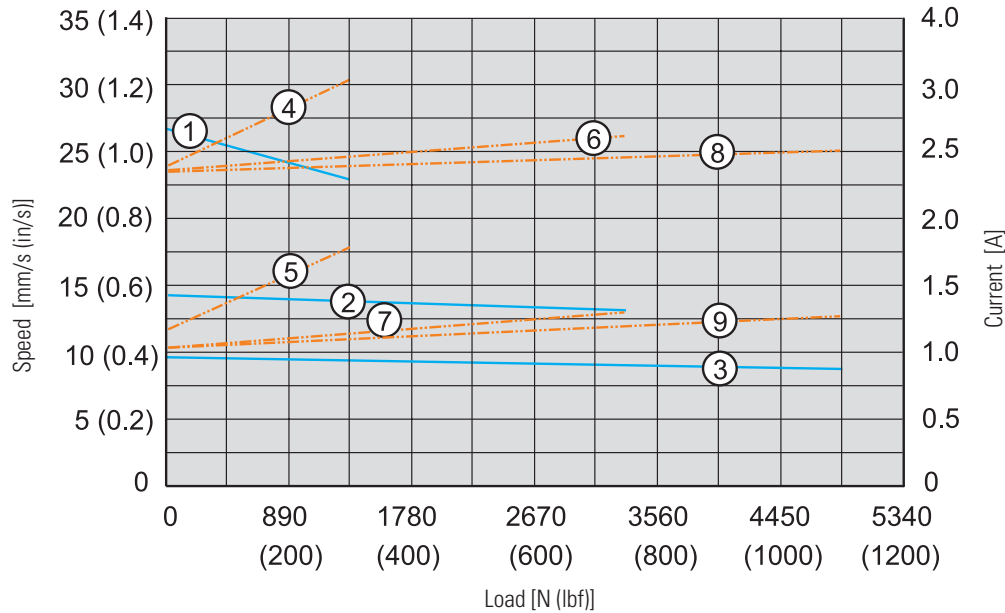


Stroke, Retracted Length and Weight Relationships

Ordering stroke (S)	[in]	4	6	8	12	18	24
Retracted length acme screw models (A)	[mm]	380.0	431.0	481.1	582.9	735.1	887.0
	[in]	14.96	16.97	18.94	22.95	28.94	34.92
Weight acme screw models	[kg]	6.8	7.0	7.2	7.6	8.3	9.4
	[lbs]	14.9	15.4	15.8	16.8	18.2	20.7
Retracted length ball screw models and acme screw models with long nut (A)	[mm]	380.0	431.0	481.1	582.9	735.1	887.0
	[in]	14.96	16.97	18.94	22.95	28.94	34.92
Weight ball screw models	[kg]	7.6	7.8	8.0	8.4	9.1	10.2
	[lbs]	16.7	17.2	17.7	18.6	20.1	22.5

# B-Track AC – Performance Diagrams

Acme Screw Models  
Speed and Current vs. Load



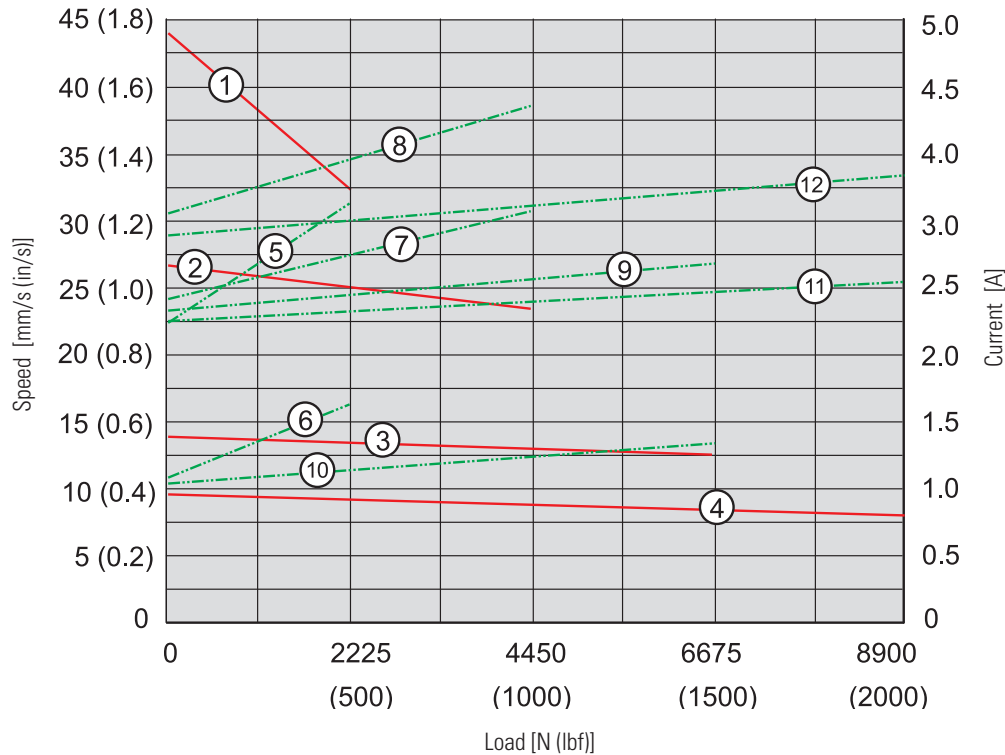
**Speed**

- 1: K2G10-
- 2: K2G20-
- 3: K2G30-

**Current**

- 4: K2G10-115V
- 5: K2G10-230V
- 6: K2G20-115V
- 7: K2G20-230V
- 8: K2G30-115V
- 9: K2G30-230V

Ball Screw Models  
Speed and Current vs. Load



**Speed**

- 1: K2XG05-
- 2: K2XG10-
- 3: K2XG20-
- 4: K2XG30-

**Current**

- 5: K2XG05-115V
- 6: K2XG05-230V
- 7: K2XG10-115V
- 8: K2XG10-230V
- 9: K2XG20-115V
- 10: K2XG20-230V
- 11: K2XG30-115V
- 12: K2XG30-230V

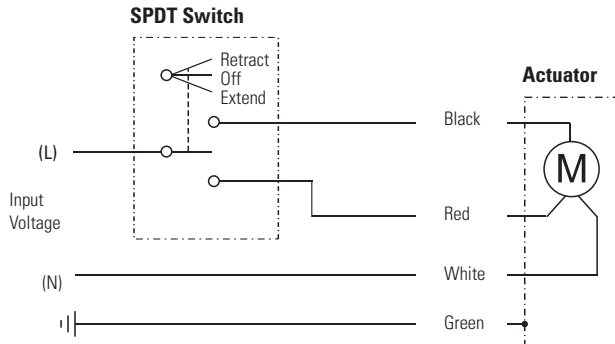


# B-Track AC – Ordering Key

Ordering Key					
1	2	3	4	5	6
<b>K2</b>	<b>G10-</b>	<b>115V</b>	<b>BR-</b>	<b>04</b>	
<p><b>1. Model and screw type</b>            K2 = B-Track, acme            K2X = B-Track, ball</p> <p><b>2. Dynamic load capacity (acme screw / ball screw models)</b>            G05- = not available / 2225 N (500 lbf)            G10- = 2225 N (500 lbf) / 4450 N (1000 lbf)            G20- = 3338 N (750 lbf) / 6675 N (1500 lbf)            G30- = 4895 N (1100 lbf) / 8900 N (2000 lbf) <sup>(1)</sup></p> <p><b>3. Supply voltage</b>            115V = 1 × 115 Vac            230V = 1 × 230 Vac</p> <p><b>4. Nut type</b>            BR- = Acme screw nut (for K2 models only)            BRL- = Long acme screw nut (for K2 models only) <sup>(2)</sup>            - = Ball screw nut (for all K2X models only)</p>			<p><b>5. Ordering stroke length <sup>(3)</sup></b>            04 = 4 inch            06 = 6 inch            08 = 8 inch            12 = 12 inch            18 = 18 inch            24 = 24 inch</p> <p><b>6. Rear adapter orientation</b>            blank = standard            R30 = 30 ° turned            R60 = 60 ° turned            R90 = 90 ° turned            R120 = 120 ° turned            R150 = 150 ° turned</p> <p>1) Not possible with nut type BR            (2) An acme screw unit with long nut has the same retracted length (distance A) as a unit of the same stroke with a ball screw.            (3) Other stroke lengths possible on request, please contact customer support.</p>		

# B-Track AC – Electrical Connections

Standard		
Actuator supply voltage	[Vac]	
K2xxxxx115V		1 × 115
K2xxxxx230V		1 × 230



Connect white lead to neutral (N). To extend the actuator connect L to the red lead. To retract the actuator connect L to the black lead.