

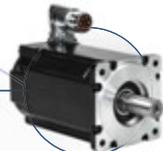
AKD[®] Servo Drive

The AKD servo drive delivers cutting-edge technology and performance with one of the most compact footprints in the industry. These feature-rich drives provide a solution for nearly any application, from basic torque-and-velocity applications, to indexing, to multi-axis programmable motion with embedded Kollmorgen Automation Suite™. The versatile AKD sets the standard for power density and performance.

AKD[®] SERVO DRIVE



AKMH[™] Hygienic Stainless Steel Motors



AKM[®] 2G Servo Motors



Frameless Brushless Direct Drive Motors



AKD[®]-N Decentralized Servo Drive



Cartridge DDR[®] Motors



Housed DDR[®] Motors



Direct Drive Linear Motors



Linear Actuators



Multi-Axis Precision Tables



AKD[®] Servo Drive



Control of motors with AKD[®] PDMM programmable multi-axis master

Best-in-Class Components

AKD works seamlessly with Kollmorgen motors and actuators—well-known for quality, reliability, and performance.



Industry-leading power density

48A @ 480V

AKD® SERVO DRIVE

General Specifications

120 / 240 Vac 1 & 3 Phase (85 - 265 V)	Continuous Current (Arms)	Peak Current (Arms)	Drive Continuous Output Power Capacity (Watts)	Internal Regen (Watts) (Ohms)		Height mm (in)	Width mm (in)	Depth mm (in)	Depth with Cable Bend Radius mm (in)
AKD-x00306	3	9	1100	0	0	168 (6.61)	59 (2.32)	156 (6.14)	184 (7.24)
AKD-x00606	6	18	2000	0	0	168 (6.61)	59 (2.32)	156 (6.14)	184 (7.24)
AKD-x01206	12	30	4000	100	15	196 (7.72)	78 (3.07)	187 (7.36)	215 (8.46)
AKD-x02406	24	48	8000	200	8	247 (9.72)	100 (3.94)	228 (8.98)	265 (10.43)
240/480 Vac 3 Phase (187-528 V)	Continuous Current (Arms)	Peak Current (Arms)	Drive Continuous Output Power Capacity (Watts)	Internal Regen (Watts) (Ohms)		Height mm (in)	Width mm (in)	Depth mm (in)	Depth with Cable Bend Radius mm (in)
AKD-x00307	3	9	2000	100	33	256 (10.08)	70 (2.76)	185 (7.28)	221 (8.70)
AKD-x00607	6	18	4000	100	33	256 (10.08)	70 (2.76)	185 (7.28)	221 (8.70)
AKD-x01207	12	30	8000	100	33	256 (10.08)	70 (2.76)	185 (7.28)	221 (8.70)
AKD-x02407	24	48	16,000	200	23	306 (12.01)	105 (4.13)	228 (8.98)	264 (10.39)
AKD-x04807	48	96	35,000	—	—	385 (15.16)	185 (7.28)	225 (8.86)	260 (10.23)

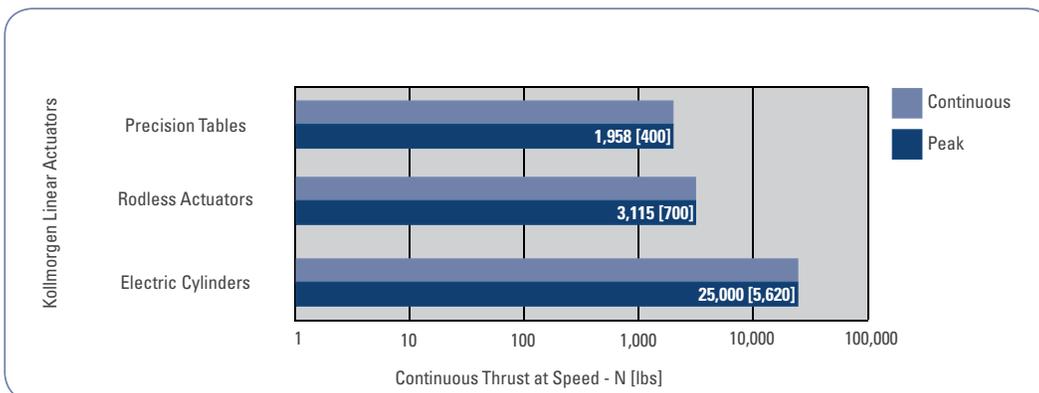
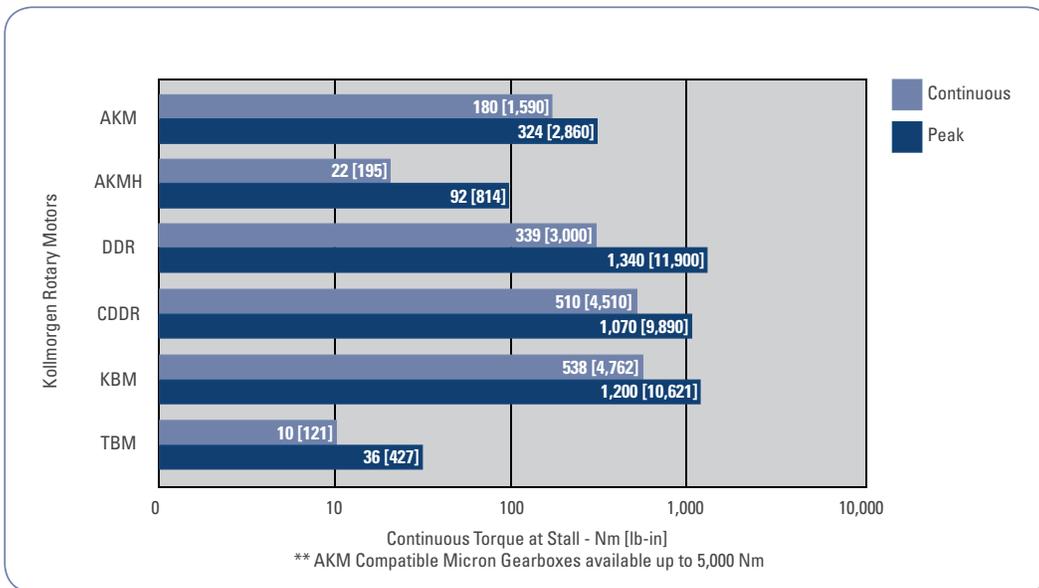
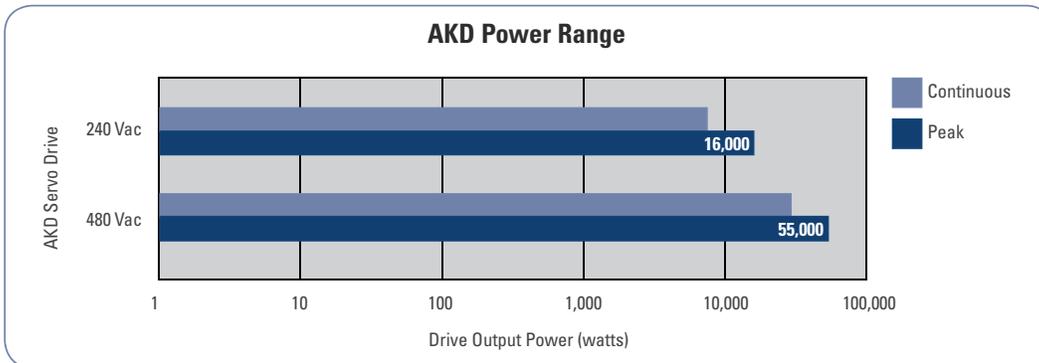
Note: For complete AKD model nomenclature, refer to pages 46.



AKD[®] Servo Drive

Range of Coverage

When you pair the AKD servo drive with any of our Kollmorgen motors or linear actuators, you'll achieve optimized performance. From 3 to 48 Arms continuous current and 9 to 96 Arms peak current, the feature-rich AKD provides a solution for nearly any application.



Feedback & I/O

AKD® servo drive is specifically designed with the versatility, communications, and power you need to expand machine performance and increase integration speeds. Motor set-up is plug-and-play and multiple Ethernet connectivity options provide both open and closed protocols. Online troubleshooting and data verification enable faster, bug-proof programming. And a broad power range in a smaller, compact design allows you to use these robust drives with a single interface while experiencing industry-leading, high-performance servo loops.

AKD Specifications

	Standard Drive	With I/O expansion - AKD-T only
Encoder Output or AUX Encoder Input	2.5 MHz Maximum line frequency	
Feedback	Smart Feedback Device (SFD), EnDat2.2, EnDat2.1, BiSS, analog Sine/Cos encoder, incremental encoder, HIPERFACE®, and resolver	
Logic supply	24 Vdc	
Digital input (24 Vdc)	8 (1 dedicated to enable)	20 (1 dedicated to enable)
Digital output (24 Vdc)	3 (1 dedicated to fault relay)	13 (1 dedicated to fault relay)
Analog input (+/- 10 Vdc, 16-bit)	1	2
Analog output (+/- 10 Vdc, 16-bit)	1	2
Programmable inputs	7	19
Programmable outputs	2	12
Sink/Source inputs/outputs	Yes	Yes

AKD® Servo Drive

AKD – B 003 06 – NB AN – 0000

AKD Series

Version

- B = Base drive
- C = Central power supply for AKD-N (Requires CB Extension)
- N = Decentralized drive (Requires DB, DF, or DS Extension)
- P = Position indexer (motion tasking)
- T = AKD BASIC Language Programmable drive (Requires IC or NB Extension)
- M = Multi-axis Master Drive (Requires MC Extension option, and EC Connectivity option)

Current Rating

- 003 = 3 Amp
- 006 = 6 Amp
- 010 = 10kW (for AKD-C, this field refers to power.)
- 012 = 12 Amp
- 024 = 24 Amp
- 048 = 48 Amp

Voltage

- 06 = 120/240 Vac 1Ø/3Ø (24 Amp Drive: 240 Vac 3Ø only)
- 07 = 240/480 Vac 3Ø (Version C: 07 = 400/480 Vac 3Ø | Version N: 07 = 560/680 Vdc)

Variants

0000 = Standard

Connectivity*

AN = Analog command	Drive Version Availability
CN = CANopen®	B, P, T
EC = EtherCAT®	P
EI = EtherNet/IP™	C, M, N, P
PN - PROFINET®	P
SQ = SynqNet®	P
	B

*Motion Tasking is included as a free upgrade with CN, EC, EI and PN

Extension

- CB = without extention (AKD-C version only)
- DB = hybrid motor cable (AKD-N version only)
- DF = additional EtherCAT® port + feedback connector (AKD-N version only)
- DS = local STO + feedback connector (AKD-N version only)
- IC = Expanded I/O version and SD card slot (AKD-T version only)
- NB = Without extensions

Note: Options shown in blue text are considered standard.