CURTAIN MOTOR · KNX · RF 433 MHZ

WS-CM-KNX

KNX curtain track motor with hand-pull start, obstacle stop and position feedback · 100–240 VAC



1.2 N·m	14 cm/s	50 kg	12 m	33 dB	KNX + RF
rated torque	travel speed	max. curtain load	max. track length	running noise	control interfaces

1 Features

- Hand-pull start: a gentle pull of about 5 cm starts the motor in that direction.
- Manual operation during power failure, like a conventional curtain.
- Obstacle detection: the motor stops automatically when it meets resistance.
- Automatic end-position learning on the first run after power-up.
- Fabric rebound correction: the motor stores the rebound point so the fabric is not compressed at the end stop.
- Position recovery: after the curtain is moved while unpowered, settings are restored at the first end stop.
- Real-time feedback of position, direction and end positions over KNX.
- Two control interfaces: KNX and optional 433 MHz RF remote.
- 8 scenes per channel with scene learning; wind, rain and frost alarms; blocking functions.

2 Ordering information

Model	Description
WS-CM-KNX	KNX curtain motor, 100–240 VAC, 1.2 N·m
Remote	433 MHz RF remote, optional

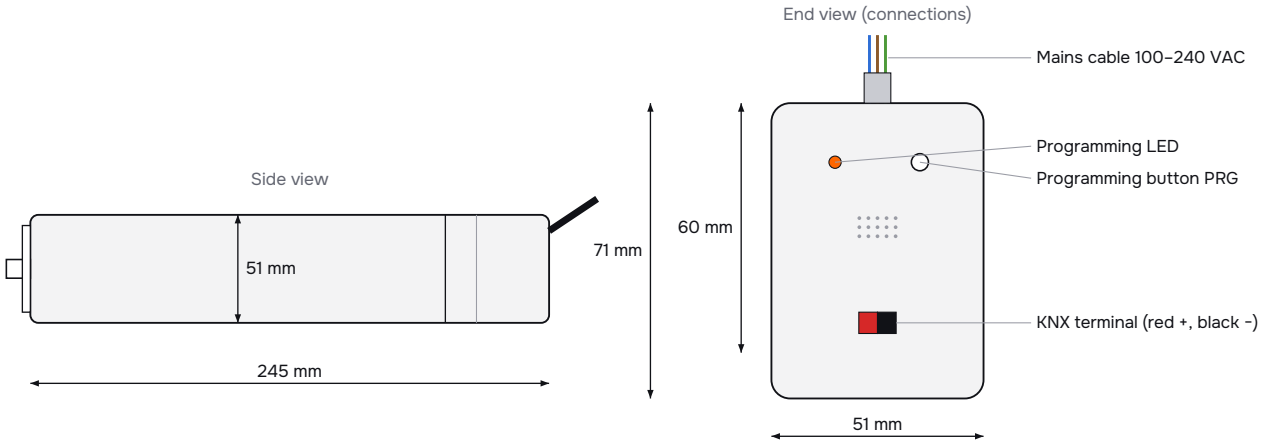
For flat (track) curtains. Indoor use only.
ETS application and documentation available from Wonder Smart.

3 Specification

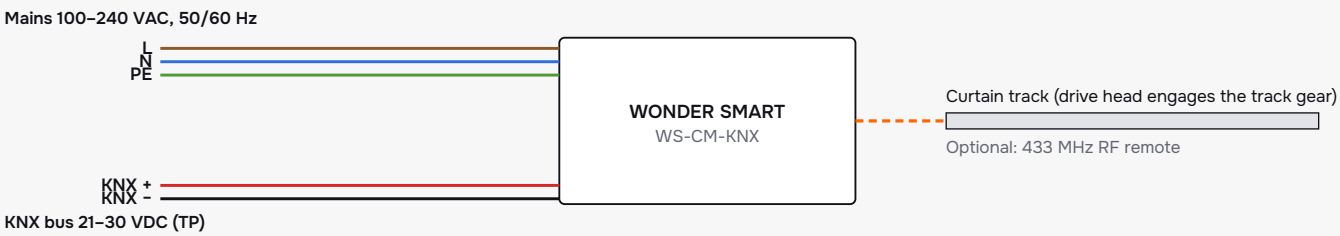
Model		WS-CM-KNX · KNX curtain motor
ELECTRICAL	Supply voltage	100 – 240 VAC, 50/60 Hz
	Rated motor power	45 W
	Mains connection	3-core cable: L Brown, N Blue, PE Green/Yellow
KNX	Bus voltage	21 – 30 VDC (KNX TP)
	Bus current consumption	< 5 mA
	Bus connection	KNX terminal (red/black)
	Commissioning	ETS; physical address via PRG button
	Channels	1 curtain channel (channel A)
CONTROL	Control interfaces	KNX; RF remote 433 MHz (optional)
	Local operation	Hand-pull start; manual operation during power failure
	Feedback	Position (0 – 100 %), direction / movement, end positions
MECHANICAL	Rated torque	1.2 N·m
	Travel speed	14 cm/s
	Maximum curtain load	50 kg
	Track length	0.9 – 12 m
	Rated continuous run time	4 min
	Noise level	33 dB
	Dimensions	245 × 51 × 71 mm
	Weight	0.55 kg
ENVIRONMENT	Operating temperature	-10 … +55 °C
	Ingress protection	IP20, indoor use only
PACKAGING	Package	Single unit in kraft paper box
	Box size	292 × 112 × 62 mm

Specifications are subject to change without notice.

4 Dimensions



5 Connections



Power-up order. Connect mains power to the motor first, or at the same time as the KNX bus. If the KNX bus is powered first, the physical address may fail to download.

6 KNX communication objects

No.	Object	Size	DPT	Function
0	Shutter up/down	1 bit	1.008	Open / close all channels that respond to global objects
2	Stop	1 bit	1.001	Stop movement
3	Absolute position	1 byte	5.001	Move to an absolute position (0 – 100 %)

No.	Object	Size	DPT	Function
13	Shutter up/down	1 bit	1.008	Open (0) / close (1)
14	Short time operation	1 bit	1.007	Short step movement; stops a running motor
15	Stop	1 bit	1.017	Stop movement
16	Scene	1 byte	18.001	Call / save scenes 1 – 64
17	Status actual direction / Status of movement	1 bit	1.008	Direction (1 = up, 0 = down) or movement (1 = moving)
18	Absolute position	1 byte	5.001	Move to position: 0 % = fully open, 100 % = fully closed
20	Status actual position	1 byte	5.001	Actual position feedback
22	Act. position valid	1 bit	1.002	1 = position is calibrated and valid
23	Start driving to reference	1 bit	1.001	Hand-pull start: 1 = on, 0 = off
25	State upper position	1 bit	1.002	1 = curtain fully open
26	State lower position	1 bit	1.002	1 = curtain fully closed
27	Block absolute position	1 bit	1.003	1 = absolute position commands ignored
28	Block universal mode	1 bit	1.003	Blocks the functions selected in parameters
29	Wind alarm	1 bit	1.005	1 = alarm active, 0 = alarm cleared
30	Rain alarm	1 bit	1.005	1 = alarm active, 0 = alarm cleared
31	Frost alarm	1 bit	1.005	1 = alarm active, 0 = alarm cleared
32	Block	1 bit	1.003	Simple blocking: 1 = blocked, 0 = released

Global objects 0 – 3 act on every channel set to respond to them. Full parameter description: see the Installation & KNX Technical Manual.