

# Control guidelines

Motors with either an electronic or mechanical end position position are used depending on the product and its functions. This overview provides information on which motor type is installed where and which control guidelines must be duly followed.

Product	Motor type	
	mechanical	electronic
<b>All slat blinds</b> EC/KR/VR/KV/GM/NS	Basic position	Working position + light optimised
<b>Standard awnings</b> BGM6/NGM20	general	–
<b>Semi-cassette/Cassette awnings</b> CGM/KGM	–	general
<b>Standard fabric blinds</b> VS/AS/AM/FM 95/150	without counterdrive system	with counterdrive system
<b>Box vertical fabric blinds</b> VSeZIP/VSeEBA/Vse/VSc	–	general
<b>Facade awning</b> FM150	without box + without counterdrive system	general with box without box + counterdrive system
<b>Roller blinds</b> RL/RLW/AR	conv. System	FIXED system
<b>Box roller blind + Alufalt</b>	–	general

# Planning and control guidelines for shading drives with mechanical end positions

The following points must be observed without fail for the shading drives to work properly. Deviations from these guidelines may delete the end positions, and/or damage the drive or shading system.

If you're not sure how to control the system, please contact us before starting up the controller.

Resetting the end positions or repairs resulting from incorrect settings do not constitute grounds for a warranty claim, and the originator shall bear the costs.

Assistance provided beyond the normal remit of support will be invoiced at cost.

1. The running directions of UP and DOWN must not be controlled at the same time. The drives must therefore be controlled with locked switches/control devices and/or actuators. (This does not apply when the installation-/programming mode of the drive permits a simultaneous UP and DOWN control.)  
the electronic limit switch. However, the operator is advised not to use this as a basis for the planning, and instead install a separate supply line for each motor. A parallel connection reduces the maximum length of a line, and the load of the switch or actuator must be checked. measuring point to the corresponding actuator/motor output.
2. The drives must only be controlled from one control position. (Control devices must be used to operate the system via different buttons)
3. A switch-over pause must be maintained between the UP and DOWN commands. 500 ms serves as a guideline.
4. For technical reasons, electronic drives respond with a slight delay of around 180 ms. This must be taken into consideration with short commands (turning interval or positioning).
5. On certain models the end positions can be readjusted by following a special sequence of commands. When controlling the system it is important to make sure that the drives are not reactivated and activated more than once in their end position for more than 4 seconds in the direction they are already travelling in.
6. In theory it is possible to connect several electronic drives in parallel with  
7. With long motor lines installed parallel to electrical cables, capacitive coupling can cause the voltage to build up at the UP and DOWN connection of the drive. Therefore several drives may not be combined in a single multi-wheel cable. Every drive must have its own supply line. Installations with line lengths of up to 100 metres are permitted as per the instructions of the manufacturers; we recommend, where possible, to restrict the supply line to 50 metres.
8. Motors with electronic end positions cannot be controlled via solid state relays.
9. The system cannot be operated when disconnected from the mains voltage.
10. It is advisable, where possible, to switch off the automatic runtime measurement and obstacle detection on the actuator. If this is not possible, the integrator must run the corresponding tests before using the actuator. When using these functions, the neutral conductor connection on the actuator must be connected as a vital

# Planning and control guidelines for shading drives with mechanical end positions

The following points must be observed without fail for the shading drives to work properly. Deviations from these guidelines may destroy the limit switch (microswitch), and/or damage the drive or shading system.

If you're not sure how to control the system, please contact us before starting up the controller.

Faulty drives or repairs resulting from incorrect settings do not constitute grounds for a warranty claim, and the originator shall bear the costs.

Assistance provided beyond the normal remit of support will be invoiced at cost.

1. No more than one drive may be controlled at a time. Suitable motor control devices are available for controlling groups.
2. The drives must never be controlled with UP and DOWN at the same time, they must only be controlled via one control position. The operator must use interdependently locked contacts and control devices.
3. A switch-over pause of 500 ms must be observed between the UP and DOWN commands so that the motor can come to a complete stop when the direction is changed and the capacitor can be discharged.