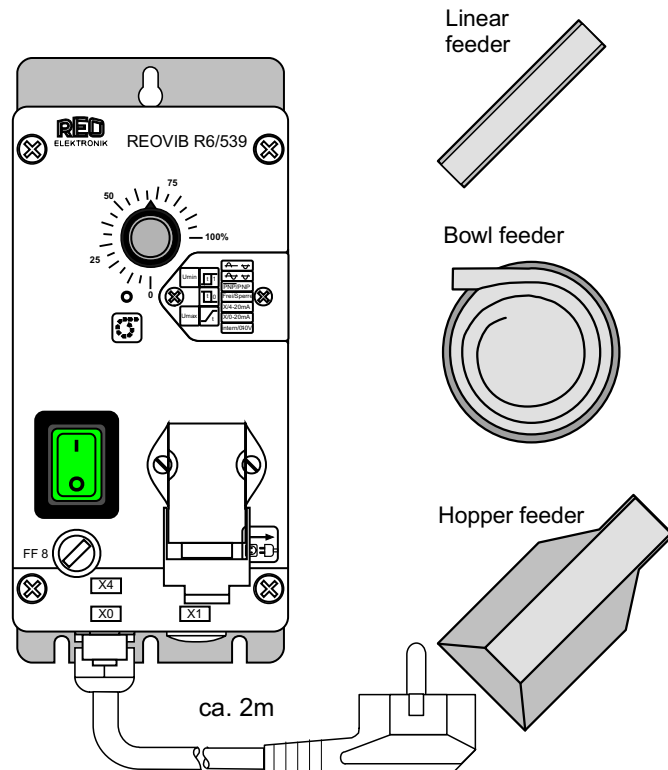


REOVIB R6/539 and REOVIB RS6/539-559

Phase-angle control units for vibratory feeders



REOVIB R6/539 and REOVIB RS6/539-559

Control units for vibratory feeders, enclosed to IP54.

The range of units includes controllers with and without integrated track-control. They operate on the phase-angle control principle, whereby the throughput of the feeder is adjusted by changing the voltage supplied to it. An external potentiometer is used to set the feed-rate or, depending on the application, 0...+10 V, DC oder 0(4)... 20 mA external signals may also be used. An internal enable-input and status output are provided for control from a supervisory system or for interlocking with another unit. Versions that have track-control operate with a PNP track-sensor that calls for product when the level is low and this causes the feeder to switch on and off after preset time-delays (t-on, t-off) have elapsed. The units are fitted with a mains-switch and fuse. The controller is adapted to suit the feeder by using trimmers and links, that are accessed, externally, by removing a cover-plate. An output-socket is provided for connecting to the feeder.

Additional features include:

Compensation for mains voltage variations.

U_{min} and U_{max} trimmers for linearising the set-point range of the feeder.

Enable input from a 24Vdc signal or potential-free contacts..

Status-relayoutput for feeder ON/OFF.

Socket for a 24 Vdc PNP track-sensor with an M12 connector.

Adjustable time-delays t_{on} / t_{off} for track control

Adjustable soft-start

Mains voltage 110 / 240 V, selected internally.

Technical data:

Supply voltage:	switch selected: 110/ 240 V, +/- 10% 50/60 Hz
Output voltage:	20... 100 V / 40...210 V
Output current:	0,1...6 A max.
Vibrating frequency:	Switch selected 50/100 Hz (60/120 Hz with 60 Hz system)
Sensor supply:	24 V, DC / 50 mA (only RS6/539-559)
Enable input:	Contact or 24 V, DC
Status relay:	Change over contact (max 250 V, 1 A)
Protection:	IP 54
Operating temperature:	0...+45 °C
Storage temperature:	-10...+85 °C

Order code (standard unit)

Type ID-Nr.:

REOVIB R6/539	653901	No track-control, output cable
REOVIB RS6/539-559	655901	With track-control, output cable

REOVIB R6/539	653902	No track-control, output plug
REOVIB RS6/539-559	655902	With track-control, output plug

Standard unit with main cable and output plug

Safety instructions

This description contains the necessary information for the correct application of the product described below. It is intended for use by technically qualified personnel.

Qualified personnel are persons who, because of their training, experience and position as well as their knowledge of appropriate standards, regulations, health and safety requirements and working conditions, are authorised to be responsible for the safety of the equipment, at all times, whilst carrying out their normal duties and are therefore aware of, and can report, possible hazards (Definition of qualified employees according to IEC 364).



WARNING!

Hazardous Voltage!

Failure to observe can kill, cause serious injury or damage.

Isolate from mains before installation or dismantling work, as well as for fuse changes or post installation modifications.

Observe the prescribed accident prevention and safety rules for the specific application.

Before putting into operation check if the rated voltage for the unit conforms with the local supply voltage.

Emergency stop devices must be provided for all applications. Operation of the emergency stop must inhibit any further uncontrolled operation.

Electrical connections must be covered.

The earth connection must be checked for correct function, after installation.



Specified Use



The units described herein are electrical controllers for installation in industrial plants.

They are designed for power adjustment on vibratory feed equipment.




Declaration of conformity



We declare that these products conform with the following standards and directives:
EN 61000-6-2 and EN 61000-6-4 in accordance with Directive 2004/108/EEC.

REO ELEKTRONIK AG, D-42657 Solingen

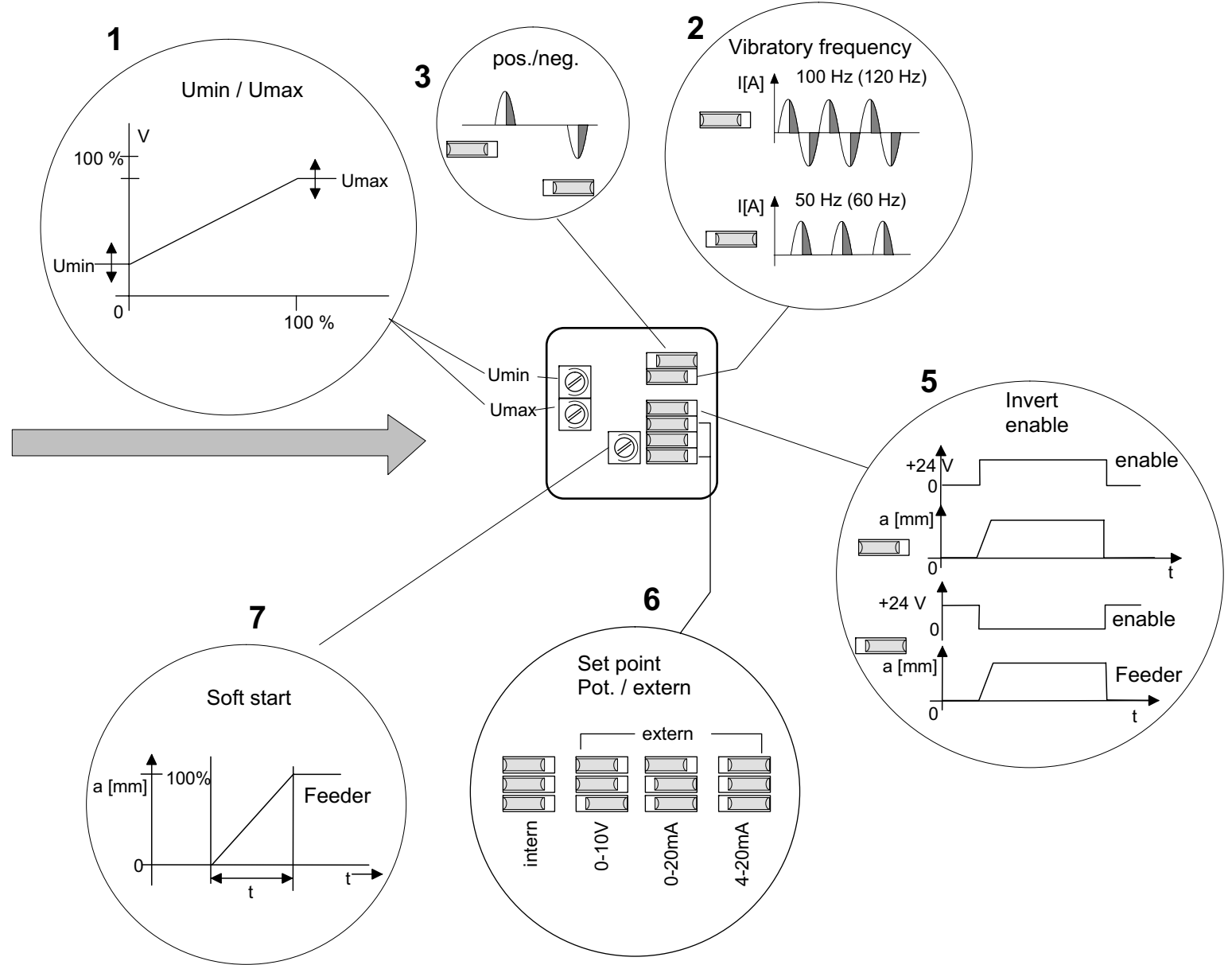
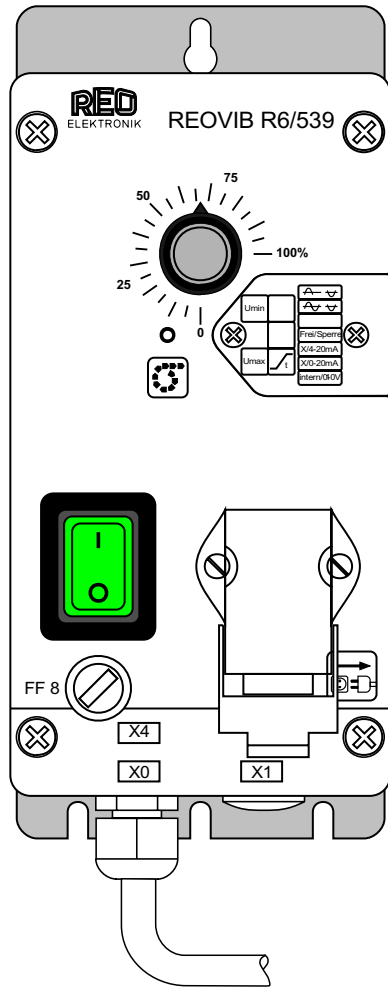
Installation

 Check!	Do supply voltage, operating voltage of the conveyor and controller input voltage match ? Is the controller adequately rated for the rated power of the feeder ? What is the vibrating frequency of the feeder ?
	Connect the unit in accordance with the wiring instructions and ensure that earthing is correct !
 Attention!	A wrongly adjusted vibrating frequency may result in destruction of the connected coils! If half-wave is selected make sure that coils suitable for half-wave operation (50 Hz / 3000 vibs./min. / 60 Hz /3600 vibs./min.) are used .

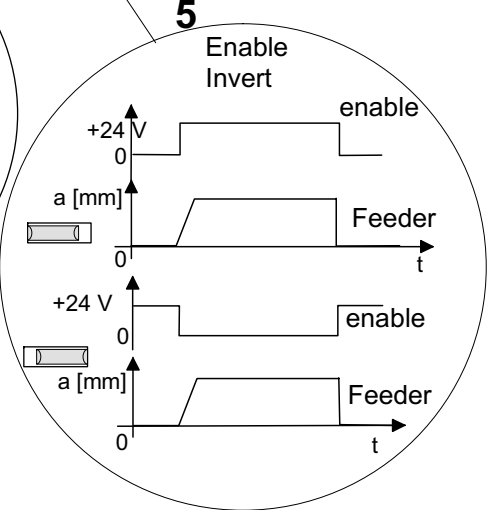
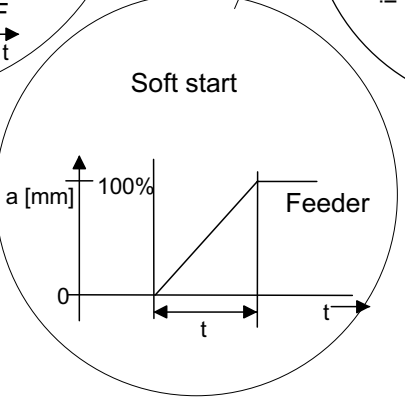
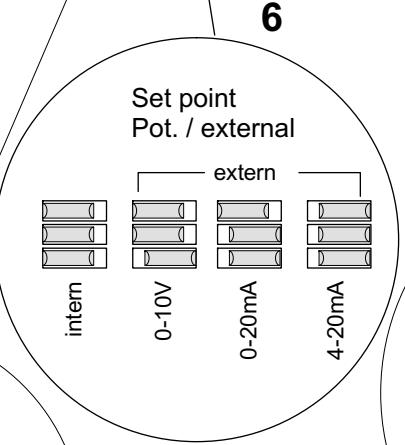
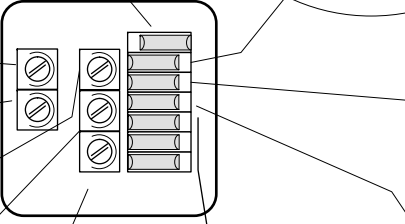
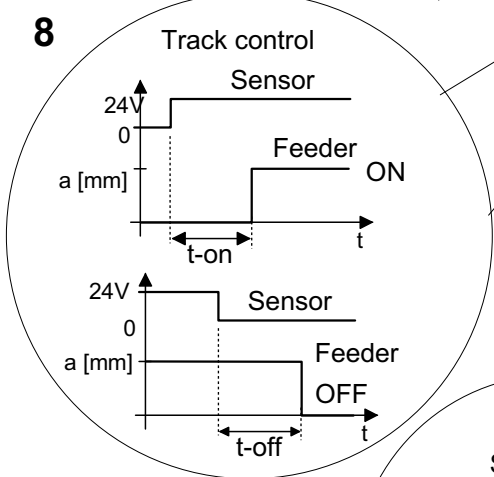
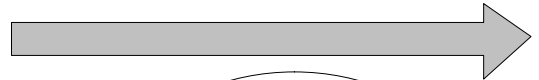
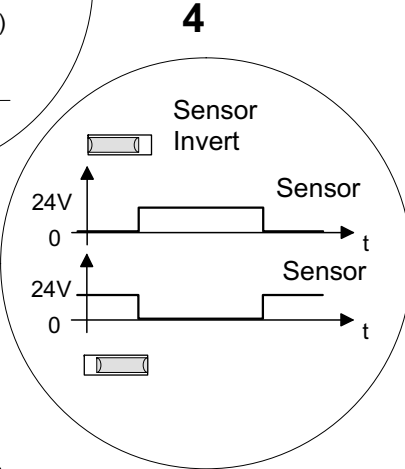
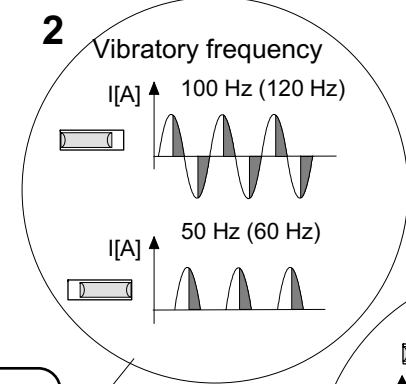
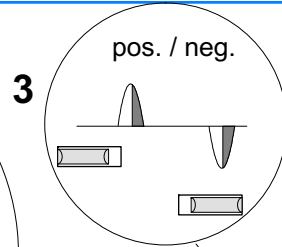
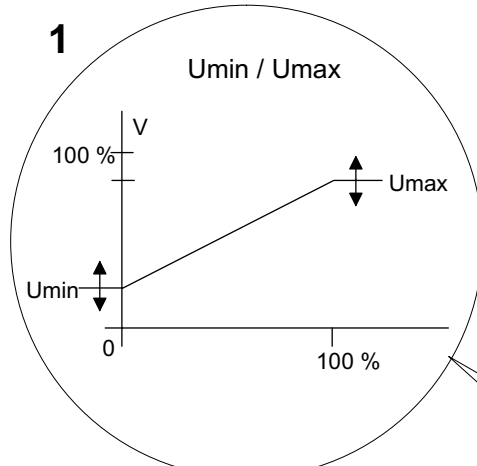
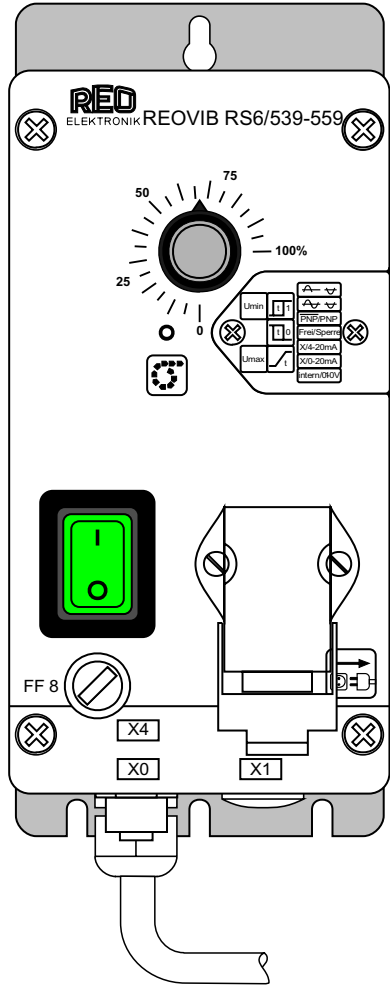
Settings

- 1 Set-point control range:
Scale the usable control range of the feeder by using trimmers Umin and Umax.
- 2 Vibrating frequency setting:
Select 50 Hz or 100 Hz (for 50 Hz mains supply); 60 Hz or 120 Hz (for 60 Hz mains supply).
- 3 Selection of half-wave polarity. (when several controllers are used).
To reduce mains distortion for applications using 50 (60) Hz mechanical frequency, the controllers are used on different half-waves.
- 4 Invert sensor:
Change the logic function of the sensor input
- 5 Invert enable:
Change the logic function of the enable input.
- 6 Set-point source:
Change the external set point source to 0...+10 V, DC voltage signal ; 0... 20 mA or 4... 20 mA current signal.
- 7 Soft start:
Start-up time ramp adjustment.
- 8 Track-control time delays:
Switch on time delay when sensor calls for product.
Switch off time delay when sensor indicates that no more product is required.

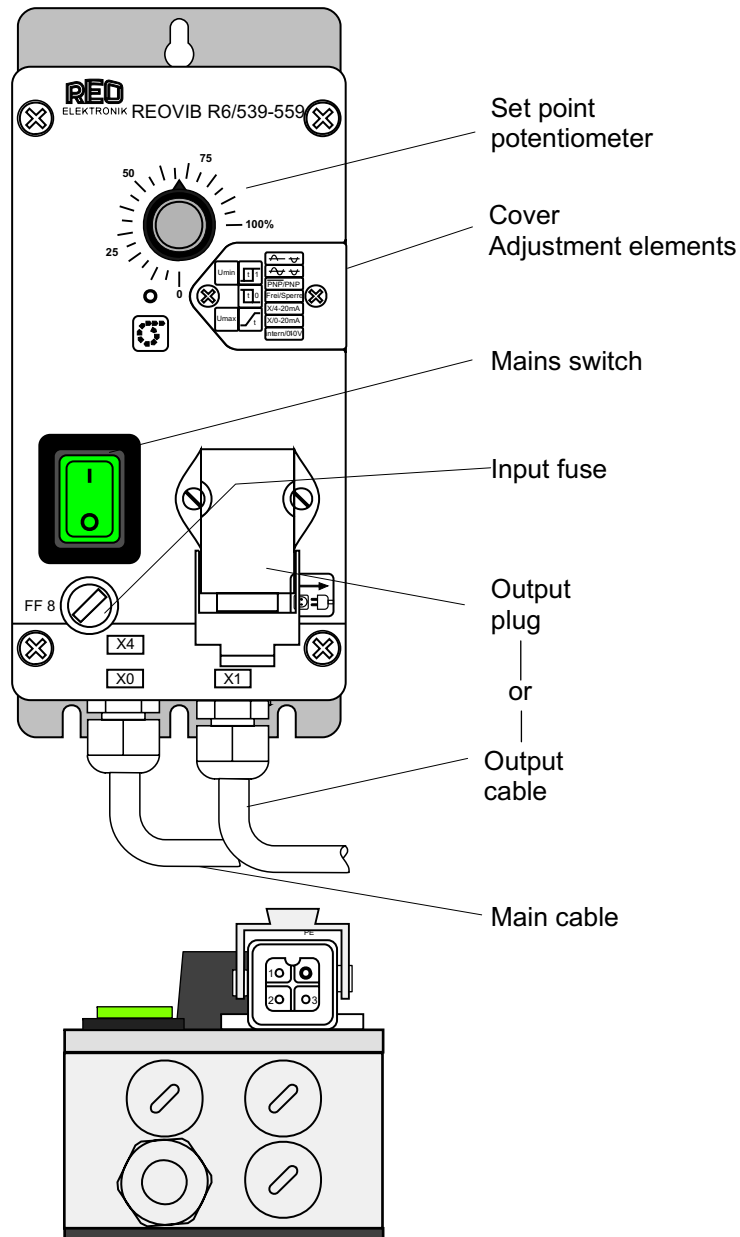
Settings REOVIB R6/539



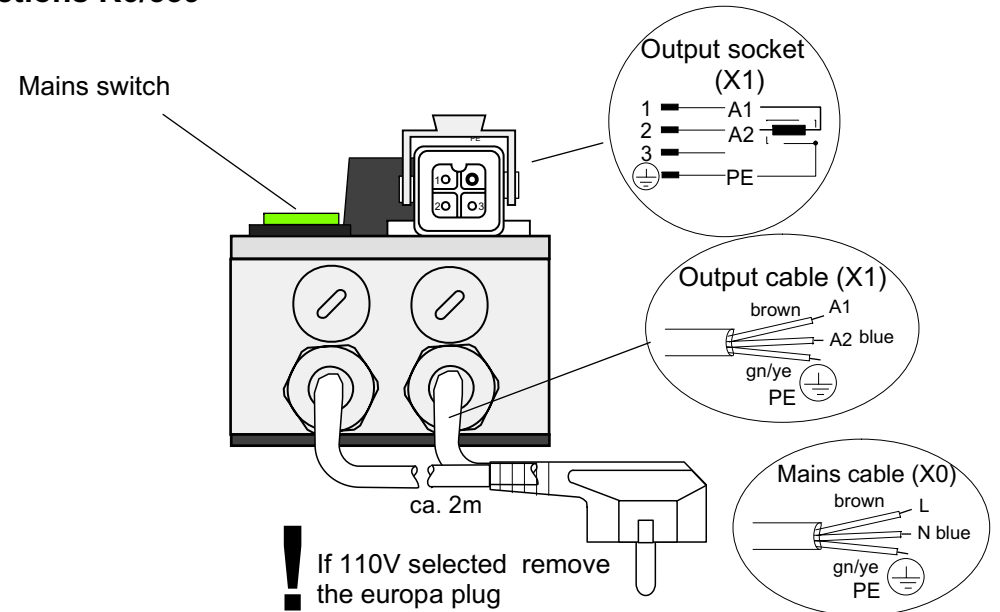
Settings REOVIB RS6/539-559



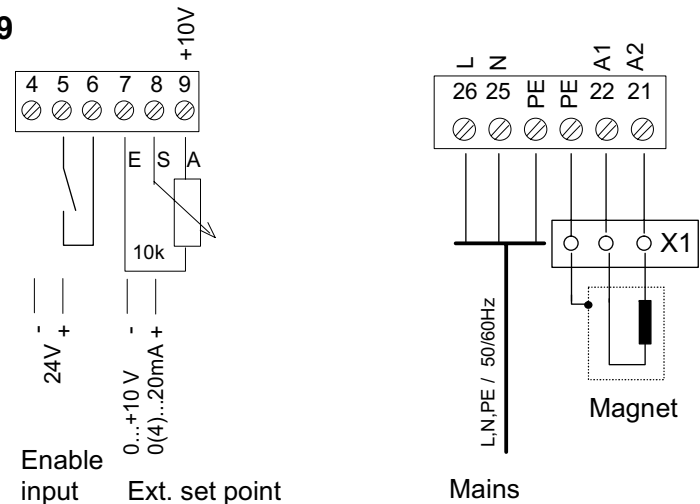
Control elements R6/539



External connections R6/539



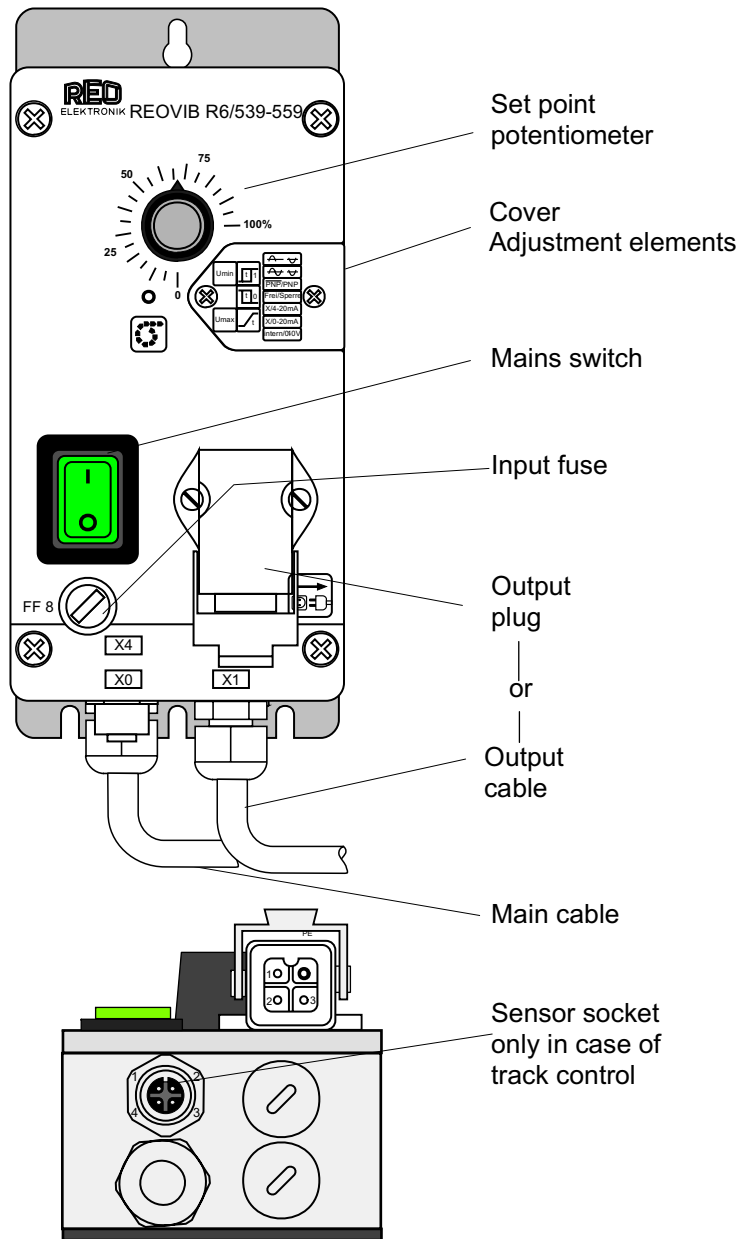
Internal connections R6/539



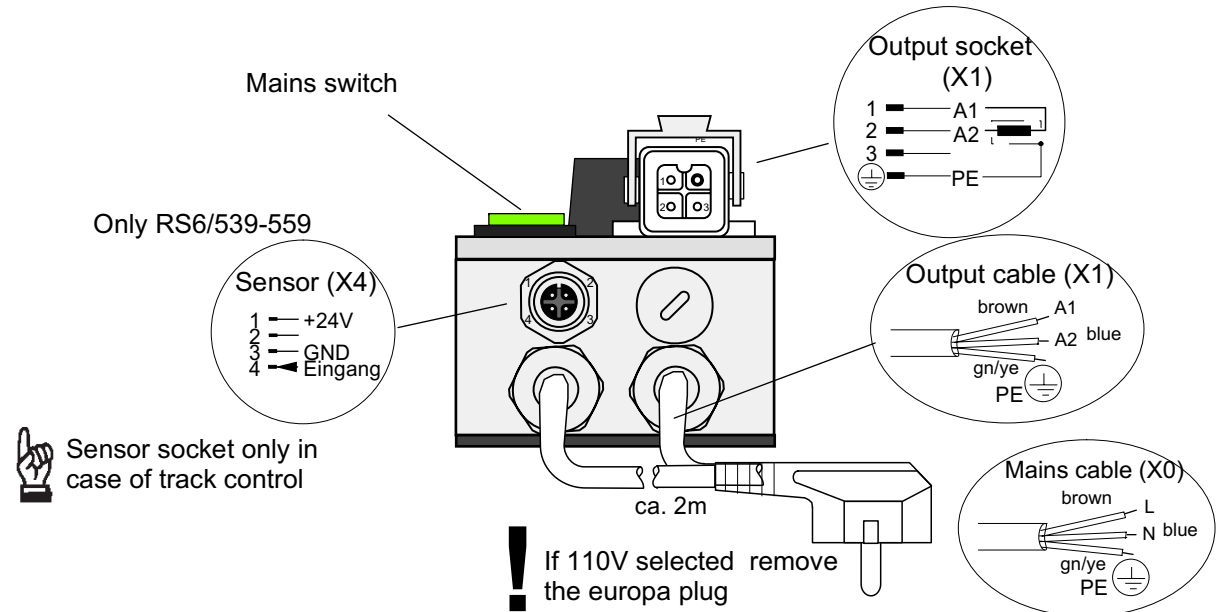
Accessories

Output plug: 3+PE HA-4-K / 090212
 Sensor plug: M12, 4PIN RSV-M12-4 / 090131

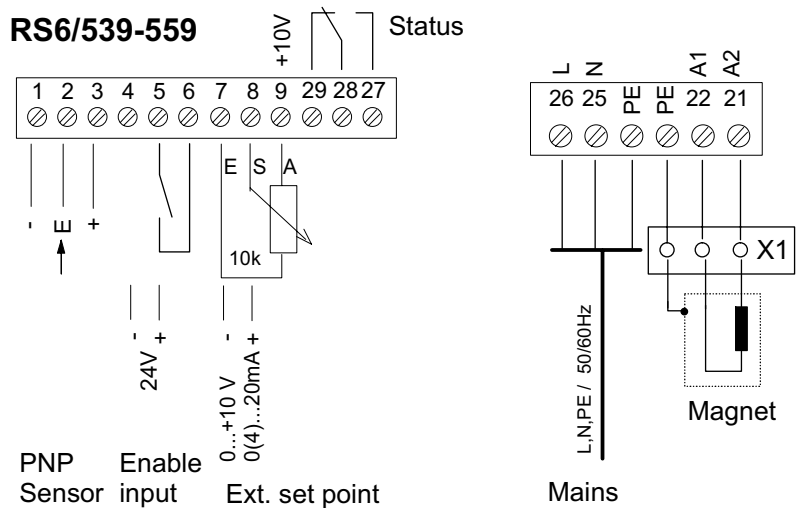
Control elements RS6/539-559



External connections RS6/539-559



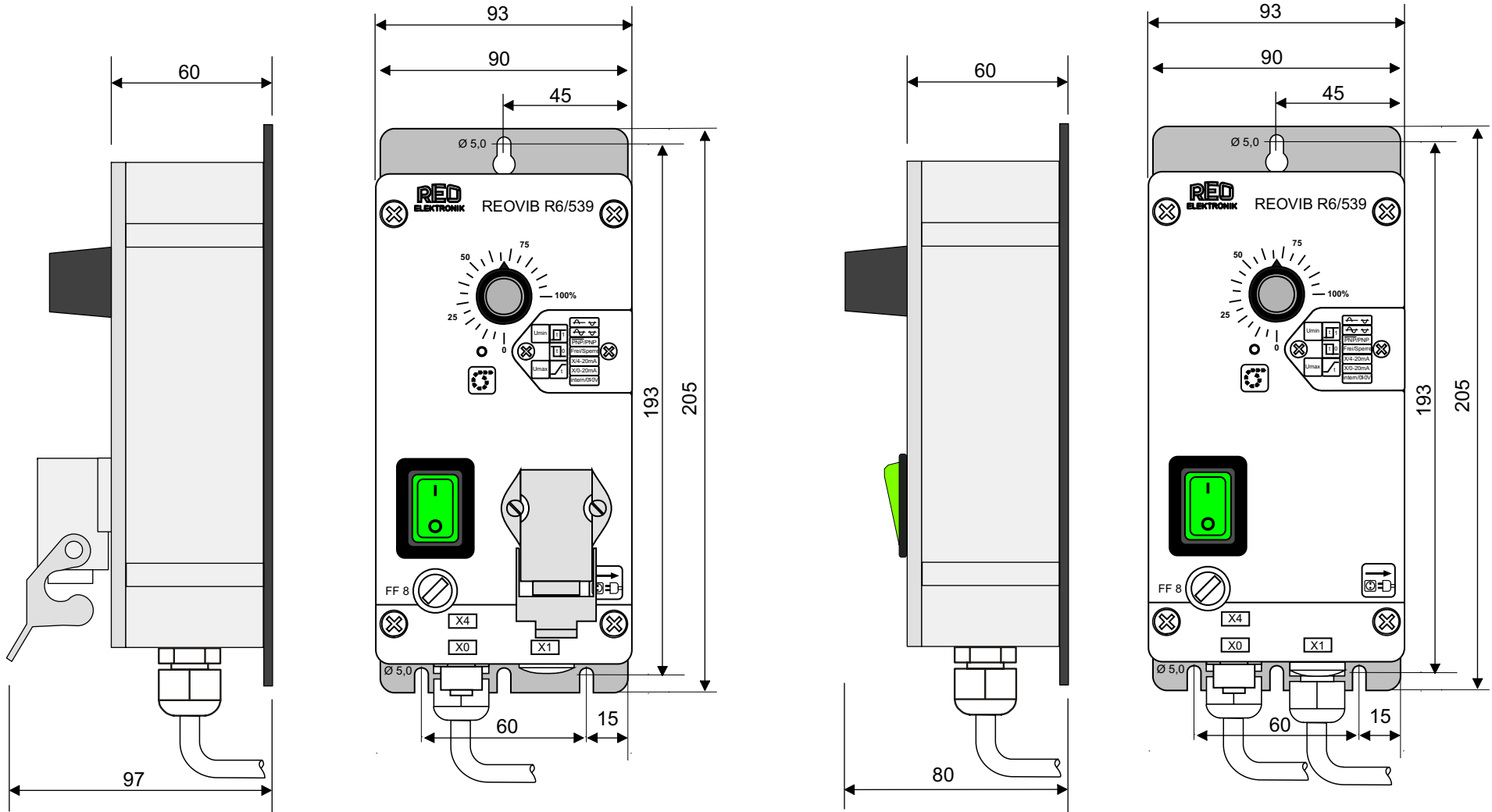
Internal connections RS6/539-559



Accessories

Output plug: 3+PE HA-4-K / 090230
 Sensor plug: M12, 4PIN RSV-M12-4 / 090131

Dimensions
R6/539
RS6/539-559



Input cable, output socket

Input cable, output cable

Shift between 110 / 240 V
R6/539
RS6/539-559

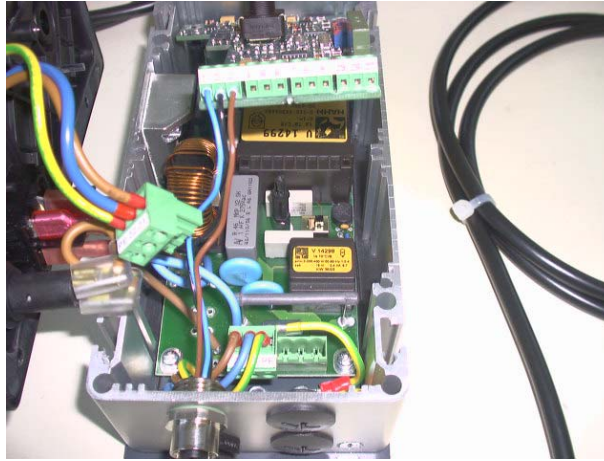
110 V/240 V



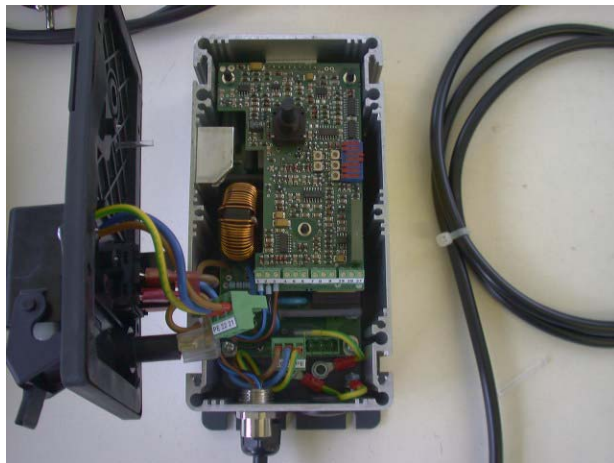
1. Remove potentiometer knob



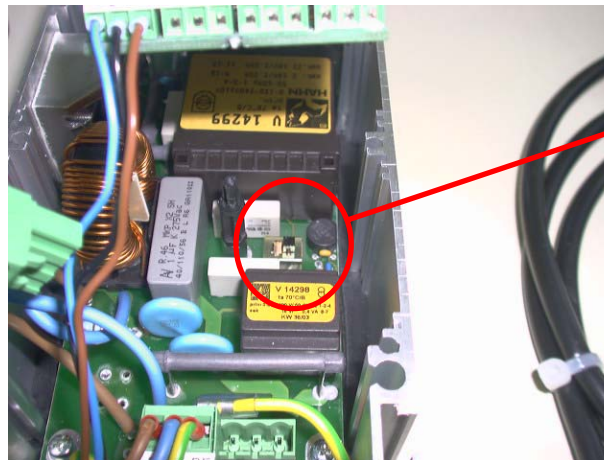
3. Remove clamp 21, 22, PE



2. Open controller



4. Flip up the control PCB



5. Move switch into the desired position

