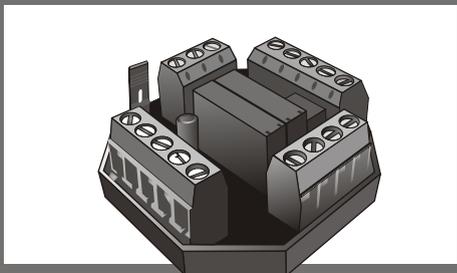


# MOBILUS MOTOR

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## DZU DECENTRALIZED CONTROL FOR ROLLING SHUTTERS MANUAL INSTRUCTIONS

### Safety guidelines

- ▶ Before unpacking the device please check if there aren't any visible damages on the package made in transportation for instance. If such damages are found, they should immediately be reported to the supplier and the device should not be installed.
- ▶ Please read service manual before use.
- ▶ DZU programmer shall be supplied with 230V~, 50Hz. For this reason the installation must be carried out by certified electricians according to the electrical scheme and regulations in force.

### Work specification

DZU programmer controls one servomotor in central control system i.e. shades, gates, awning, etc.

#### Basic DZU programmer functions:

- ▶ Connection to central and local switch;
- ▶ Servicing of one programmer with several of switches;
- ▶ Parallel connection of several switches and servicing with one central switch;
- ▶ Selection of functions: „unipolar switch” , „with signal hold up” , „without signal hold up” or „roll-up”
- ▶ Protection from overvoltage and simultaneous antipole switch on.

### Programmer installation guide

Prior to installation please get familiar with attached installation scheme. Programmer does not require servicing or maintenance.

1. Switch the power on.
2. Install the programmer according to attached scheme.

### ATTENTION!

It is important to follow the local regulations concerning earthing system and protection means.

Use double insulation cables of following sections:

- 1,5 – 2,5 mm<sup>2</sup> for power supply;
- 0,75-1,5mm<sup>2</sup> for programmer connection;
- 0,75mm<sup>2</sup> for the installation of single and several switches.

### IMPORTANT NOTICE!!

1. Avoid short circuit between the directional-conductors as it may damage device transmitters!
2. Avoid applying 230V power supply cables with clamps connecting the switch!
3. Avoid connecting the switch to servomotor and parallel to the controller!
4. Avoid short circuit between the directional-conductors as it may damage device transmitters!
5. Avoid applying 230V power supply cables with clamps connecting the switch!
6. Avoid connecting the switch to servomotor and parallel to the controller!

Check if the sense of rotation of the motor is in accordance with up and down buttons of the roller blind. If there is no compatibility, cross change the directional wires.

### ATTENTION!

If the total power of motors in supplied group exceeds 1,5kW, break it into smaller groups of 1-1,5kW, supplying each group individually also from different phases of three-phase electrical installation.

### Selection of working mode

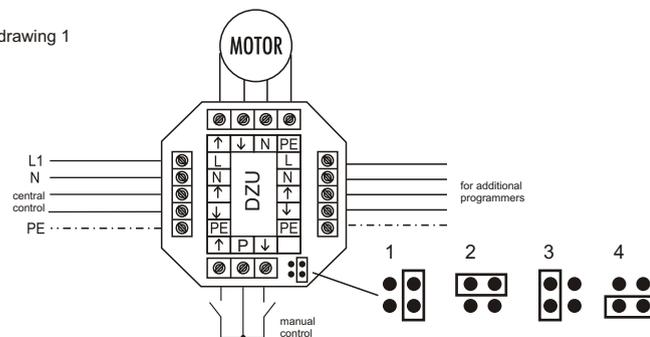
#### ATTENTION!

The operation mode is selected by placing jumper on adequate pins. Jumper shall be switched when the power is on, otherwise it will not be possible to change the operation modes.

Depending on the location of jumper the device can work in the following operation modes:

1. unipolar switch – servomotor works step by step in UP-STOP-DOWN-STOP mode (drawing 1, denotation 1)
2. without voltage hold up – the signal works as long the button is held down (drawing 1, denotation 2)
3. with voltage hold up– after pressing the switch button the signal is held by the DZU for 90 seconds (drawing 1, denotation 3)
4. Roller blind mode – setting the angle of the roller blind, lifting and rolling down the roller blind (drawing 1, denotation 4)

drawing 1



## Connection of unipolar impuls switch (alarm)

The unipolar alarm switches can be applied with DZU instead of bipolar switches if the DZU is not part of any group (drawing 5). DZU with unipolar impuls switch works only with voltage hold up.

### ATTENTION!

**DZU is not going to work with unipolar switch with voltage hold up.**

Actuate „unipolar switch” on the DZU placing the jumper on the adequate pin (drawing 1, denotation 1).

## Controller operation in „with voltage hold up” mode

### ATTENTION!

For the purpose of group or individual (local) control it is best to use switches without voltage hold up (instable). For central controlling, besides the switch without voltage hold up, it is possible to use switches with timers. (eg. control clock).

After pressing the up and down button of the roller blind, the roller blind shall open or close. To stop the roller blind press shortly the inverse button, i.e.:

- if the roller blind is going up, press down button shortly
- if the roller is going down, press up button shortly.

The roller blind can be lifted or put down again, but it must be noted that DZU has a 2 second delay in between switching the directions of the roller blind rotation.

To change the direction of rotation press the inverse button for about 2 seconds, i.e.

- if the roller blind is going up, press and hold down button until it starts going down;
- if the roller blind is going down, press and hold down button until it starts going up.

### IMPORTANT NOTICE!!

If the switches/controllers with time hold up signal are applied, pressing of the inverse button only once may only stop the transmission of signal by this controller but it will not stop the roller blind from going. Pushing the button the second time shall stop the roller blind operation. If programmer hold up will be longer than 2 seconds the roller blind shall start turning the opposite direction.

## Controller operation in „roller blind” mode

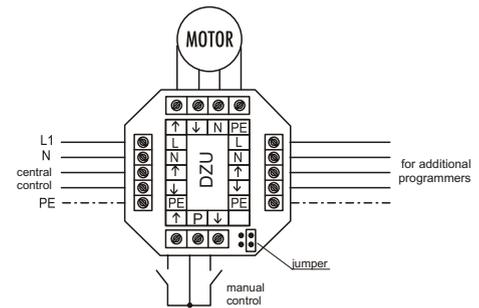
Quick button pressing (up to 2 seconds) enables for precise, step by step setting of the position of the roller blind or its angle. Pushing the UP and DOWN button and holding it (for over 2 seconds) will open or close the roller blinds. Other instructions – see “programmer operation in “with voltage hold up” mode”

## Technical Data

Supply voltage	– 230V~, 50Hz
Current ( power load)	– 5A(cos $\phi$ =1), 2A(cos $\phi$ =0,6)
Controll voltage	– 230V
Number of controllers	– 1
The duration of impulse:	
without hold up mode	– the time of holding the button down
with hold up mode	– 90 seconds or as programmed
The delay for changing direction of the roller blind	– 2 seconds
The range of allowed operation temperatures:	form 20°C to 45°C
Dimensions	– 44 x 44x 25mm (possible to install in cable box $\phi$ 66mm x 100mm)

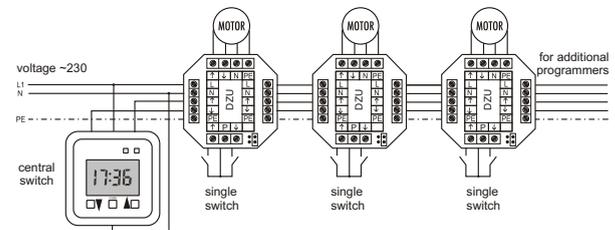
## Schemat połączeń

drawing. 2

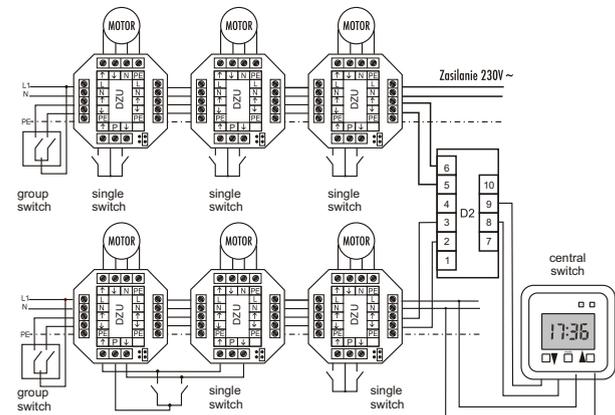


## Przykłady zastosowań

drawing 3. Controlling of the group of roller blinds



drawing 4. Controlling of tw groups of roller blinds by means of D2 exchange



drawing 5. DZU with impuls unipolar switch

