



## PRO controller

### 1. FEATURES

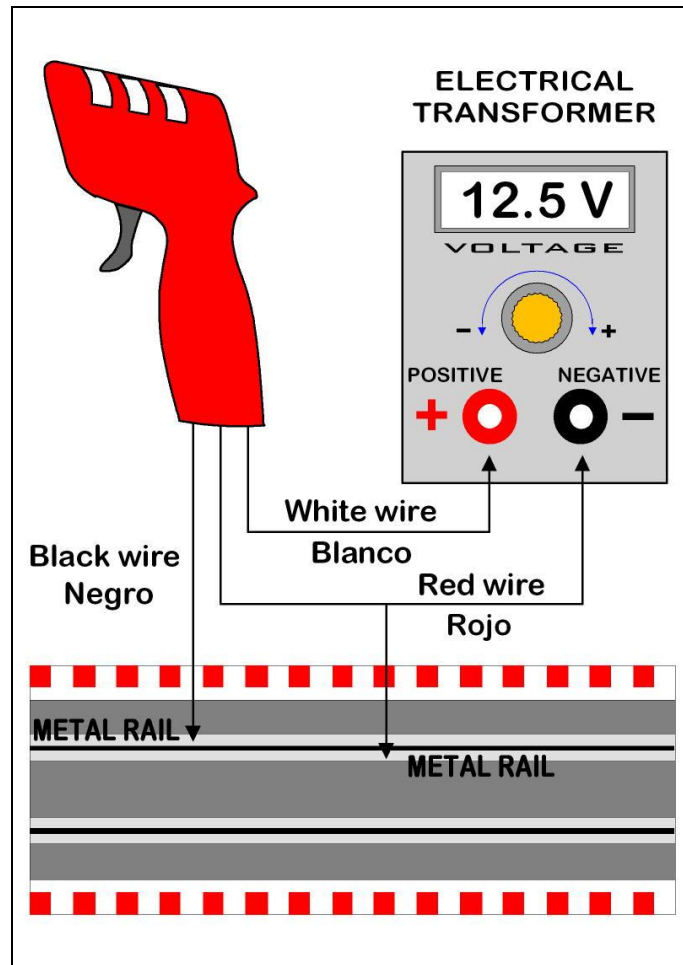
#### 1.1 General features

- Embedded microcontroller.
  - Acceleration and brake control by PWM signals and MOSFET transistors.
  - Magnetic trigger that eliminates friction and is maintenance-free.
  - Built-in protective fuse of 2 A. (+1 Spare).
  - Green LED indicating operation.
  - Extra flexible power cord 1,5 m. long. 3 4mm red, white and black banana connectors.
  - Four different power curves offering controls similar to having four resistances of different ohms (approx. 25 - 35 - 45 - 60Ω) in a single controller.
  - Brake adjustment by potentiometer.
  - Sensitivity adjustment by potentiometer.
  - Traction control on / off.
  - Adjustable trigger range from minimum (brake) to maximum (acceleration).
  - Rubber cable protection.
  - Reduced weight.
  - Low power consumption.

#### 1.2 Connections and electrical specifications:

- It is very important **NOT** to connect the **PRO** Sloting Plus controller to a voltage exceeding 22V for it may cause it to be severely damaged.
- Built-in protective fuse of 2 amperes.
- It is very important to respect the polarity of the connections.
- Correlation of colors and bananas:

BANANA COLORS	TYPE OF CONNECTION	COLOR CABLE
Red	Negative power	Brown
White	Positive power	Blue
Black	To track	Yellow / green



Scheme to connect the controller to the track and transformer.

## REMEMBER

To change the direction of circulation of the cars, **ONLY** have to invest the position of the electrical cables which are connected to the metal rails of the track.

## 2 INSTRUCTIONS

### 2.1 Select the power curve.

The **PRO** controller has a triple switch with which it is possible to select between 4 power curves (Fig.1). Activating switches 1 and 2 with a little screwdriver or the like (Fig.2), we can select between the 4 different power curves (Fig. 3).

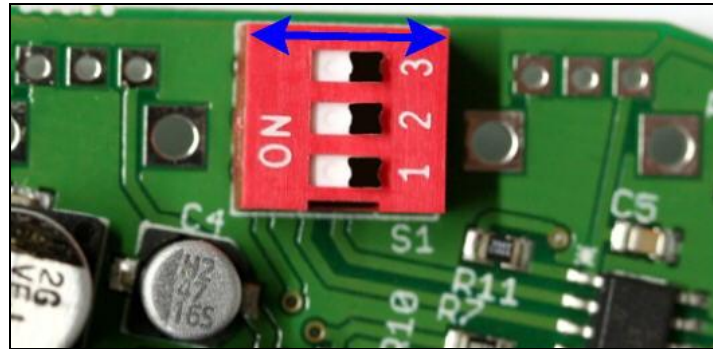


Fig. - 1 -

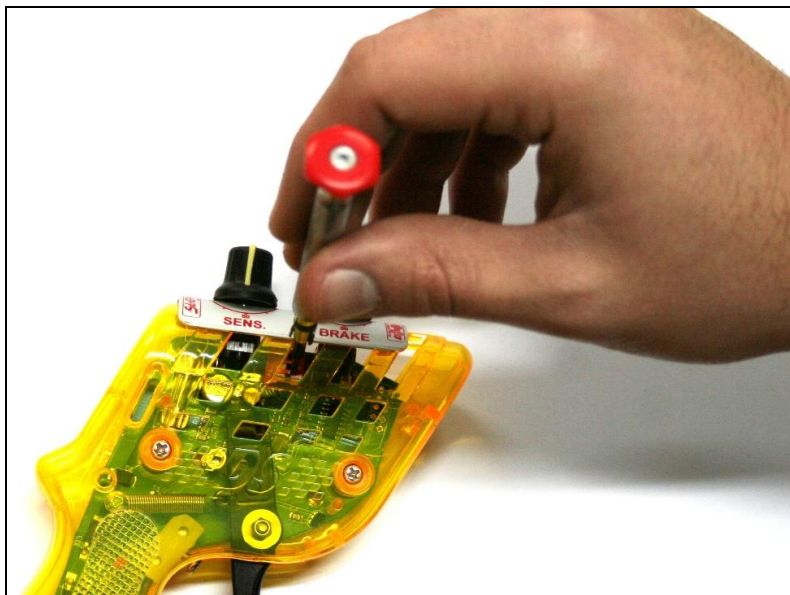


Fig. - 2 -

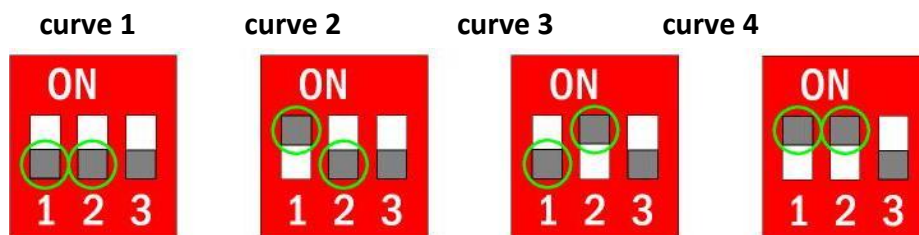


Fig. - 3 -

curve 1: approx. 25Ω - curve 2: approx. 35Ω - curve 3: approx. 45Ω - curve 4: approx. 60Ω

## 2.2 Traction control.

Activating the switch number 3 (fig.4) you can activate or deactivate the traction control. In the “off” position the traction control will be deactivated, putting the switch in the “on” position will activate it.

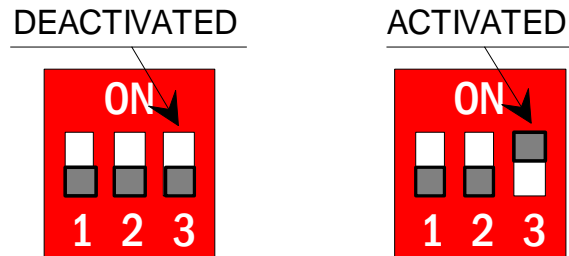


Fig. - 4 -

## 2.3 On light.

The **PRO** controller includes a green LED light that indicates at all times that the remote is ready to be used (Fig.5) white circle. If when connecting the controller to the track the light doesn't light up, first check if it has been connected properly, then check if the track has power, and last examine the state of the fuse and replace it if necessary.



Fig. - 5 -

## 2.4 The fuse.

The **PRO** controller also includes a 2 amp fuse to protect it from possible overcharges (Fig. 7 blue circle). To replace it you must open the casing by unscrewing the three screws.

# VERY IMPORTANT

**ALWAYS** use a FAST acting fuse of 2A or a maximum of 5A .

**Always** of equal value to that offered the transformer or below these value.

If replacing the fuse and fuse burns out again, please check the connections to track, check the connections to the controller with the polarity outlined in these instructions, examine the car to detect any anomaly or a possible crossing of the braids and finally, check the track to find a possible crossing between two lanes. If the fault persists contact Sloting Plus [info@sloting.com](mailto:info@sloting.com)

## 2.5 Sensitivity adjustment.

Once you have selected the desired power curve with the switched 1 and 2 (fig.3), adjust the controller to the voltage of the track and the type of motor being used with the yellow sensitivity potentiometer. Turning the potentiometer to the left reduces the power and turning it to the right raises the power. If you place the potentiometer in item 50 you are in the "curve point". For exemple, you are in curve 45 $\Omega$ , so if you turn left, down curve, 44, 43, 42, 41 $\Omega$  etc... and if you turn right, increases the curve, 46, 47, 48, 49  $\Omega$  etc ...

## 2.6 Brake adjustment.

We can adjust the intensity with the red brake selector between values of 0 (no brake) to 100 (max brake).



Fig. - 6 -

## 2.7 Adjust the range of the trigger.

You have 2 options to adjust the travel of the trigger to your liking. Adjust the minimum position (maximum brake) by moving the hexagonal stopper from left to right (Fig. 7 yellow circle). Adjust the maximum position (maximum acceleration) by screwing or unscrewing the screw (Fig. 7 red circle).



Fig. - 7 -

After modifying the trigger range you **ALWAYS** must calibrate it to the new position.

1. Connect the controller to the track (the track must have power but no car on it)
2. With out touching the trigger, for a quick moment connect the two pins together with a screwdriver or anything metallic and long enough to touch both pins at the same time (Fig. 8).
3. After three seconds press the trigger all the way and hold it for three more seconds.
4. Disconnect the remote from the track and reconnect it again.

Once the controller is reconnected again it should be calibrated to it's new parameters and it's operation should be normal.



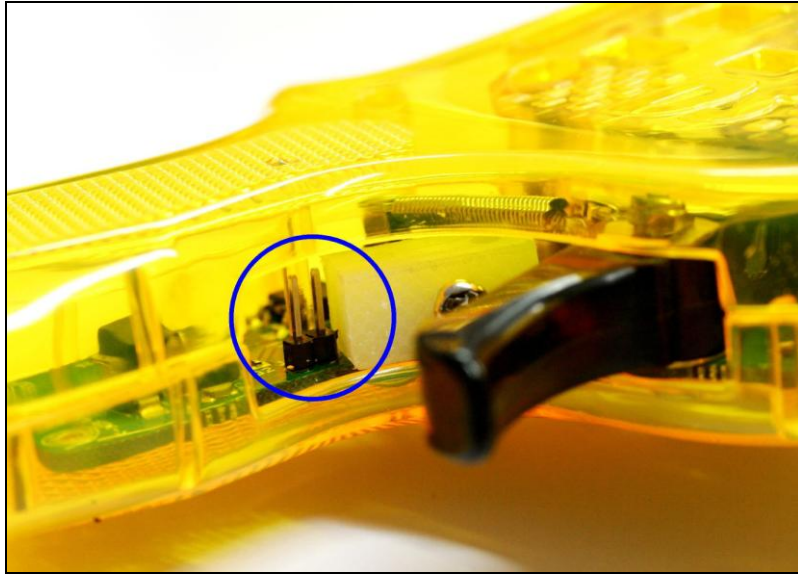


Fig. - 8 -