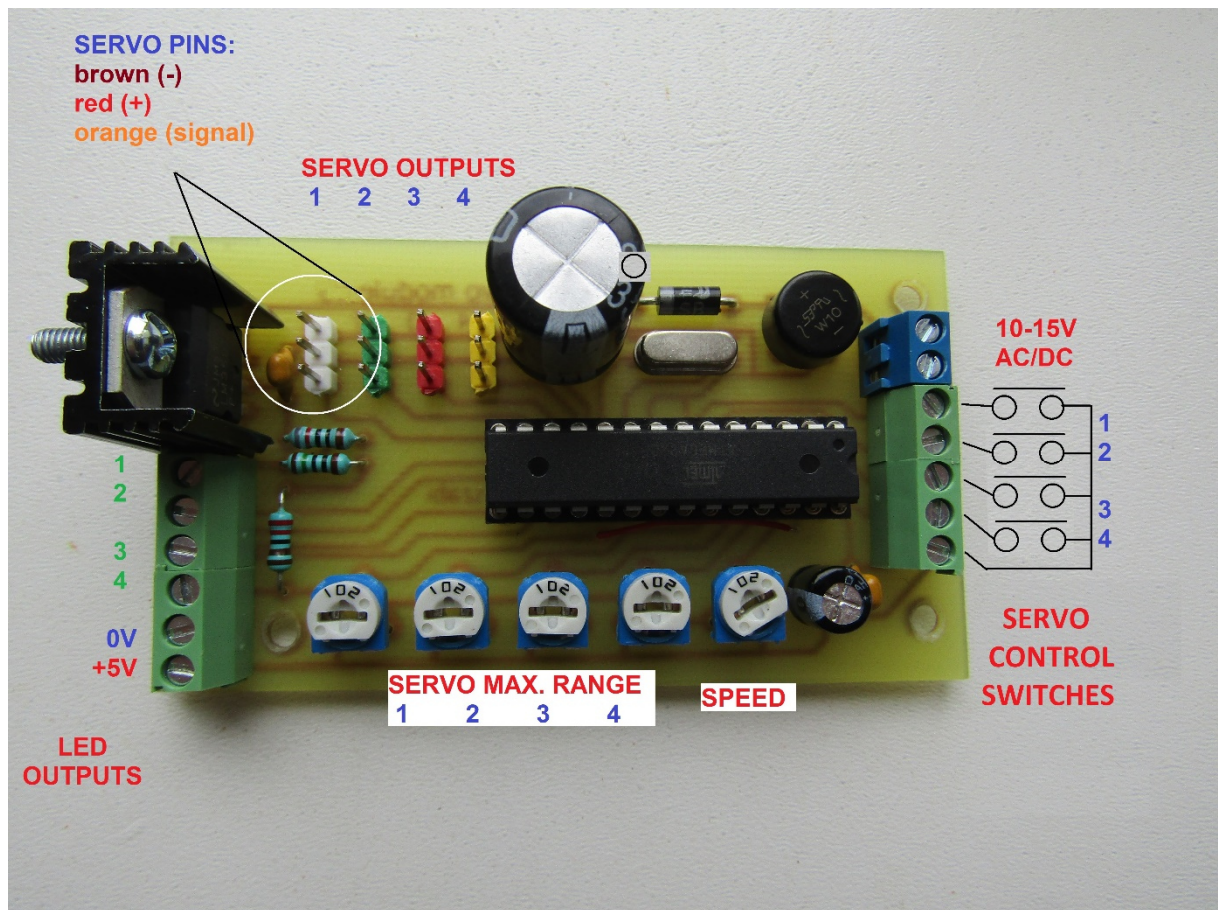# SERVO CONTROLLER

- manual servo controller with LED indication
- module commands 4 servos with 4 tactile switches between 0 - 180 degrees
- adjustable maximum angle of servos with four on-board potentiometer
- adjustable speed of servos (one potentiometer for all servos)
- output for 8x LEDs, or 4x Bipolar LEDs
- the LEDs show the position of the servo; you will always know in which position the servo arm is
- example of use: if the LED is green the servo-controlled turnout is in the straight position, if the LED is red it is in the divergent position
- suitable for manual control of turnouts, semaphores, moving any kind of arms, doors, barriers
- if the connected switch is in the ON position (input connected to the ground), the servo moves to the max degree adjusted with the potentiometer (counterclockwise), otherwise stays in the zero position
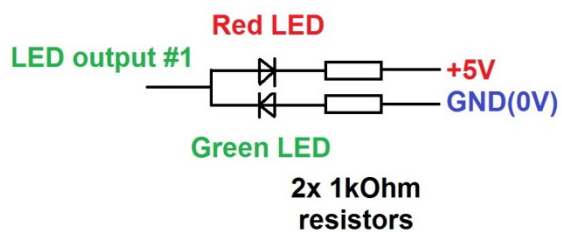- recommended power supply: 8-12V AC/10-16 DC

SETTING:
- connect LED diodes to the left green terminal (picture 2)
- the LED polarity is not important. Be careful that one of them must be contrary to the other one! If you would like to change the colors (red=straight, green=divergent), replace the +5V and 0V(ground) on LED's legs
- connect a servo to the first output (left pinhead). Be careful of the servo polarity orientation!
- let the switch in the OFF position (basic position - 0 degree)
- adjust the first (left) potentiometer to Counterclockwise
- switch ON the switch and move the potentiometer Clockwise with a small flat screwdriver to set up the max position of the first servo
- test the range of the servo by the connected switch
- continue to set other outputs
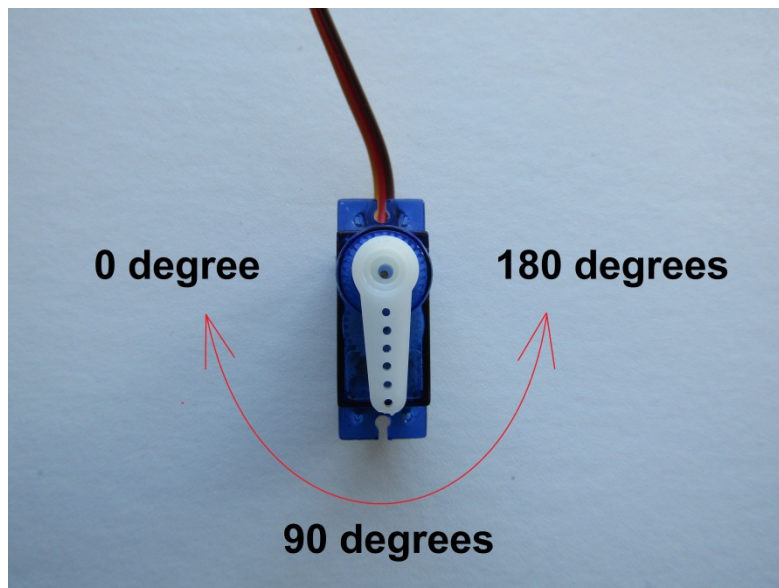
DURING CONNECTING SERVOS, SWITCHES, AND LEDS, I HIGHLY RECOMMEND DISCONNECTING THE POWER SUPPLY!

SERVO PINS:
brown (-)
red (+)
orange (signal)

SERVO OUTPUTS
1 2 3 4

10-15V
AC/DC

1
2
3
4

SERVO
CONTROL
SWITCHES

1
2
3
4
0V
+5V

LED
OUTPUTS

SERVO MAX. RANGE
1   2   3   4

SPEED

2x LED version

Red LED

LED output #1 ──▷|── ▭ ── +5V

──|◁── ▭ ── GND(0V)

Green LED

2x 1kOhm
resistors

Bipolar LED version

LED output #1 ── (▷|◁) ── ▭ ── +5V

── ▭ ── GND(0V)

Bi-polar LED

2x 1kOhm
resistors