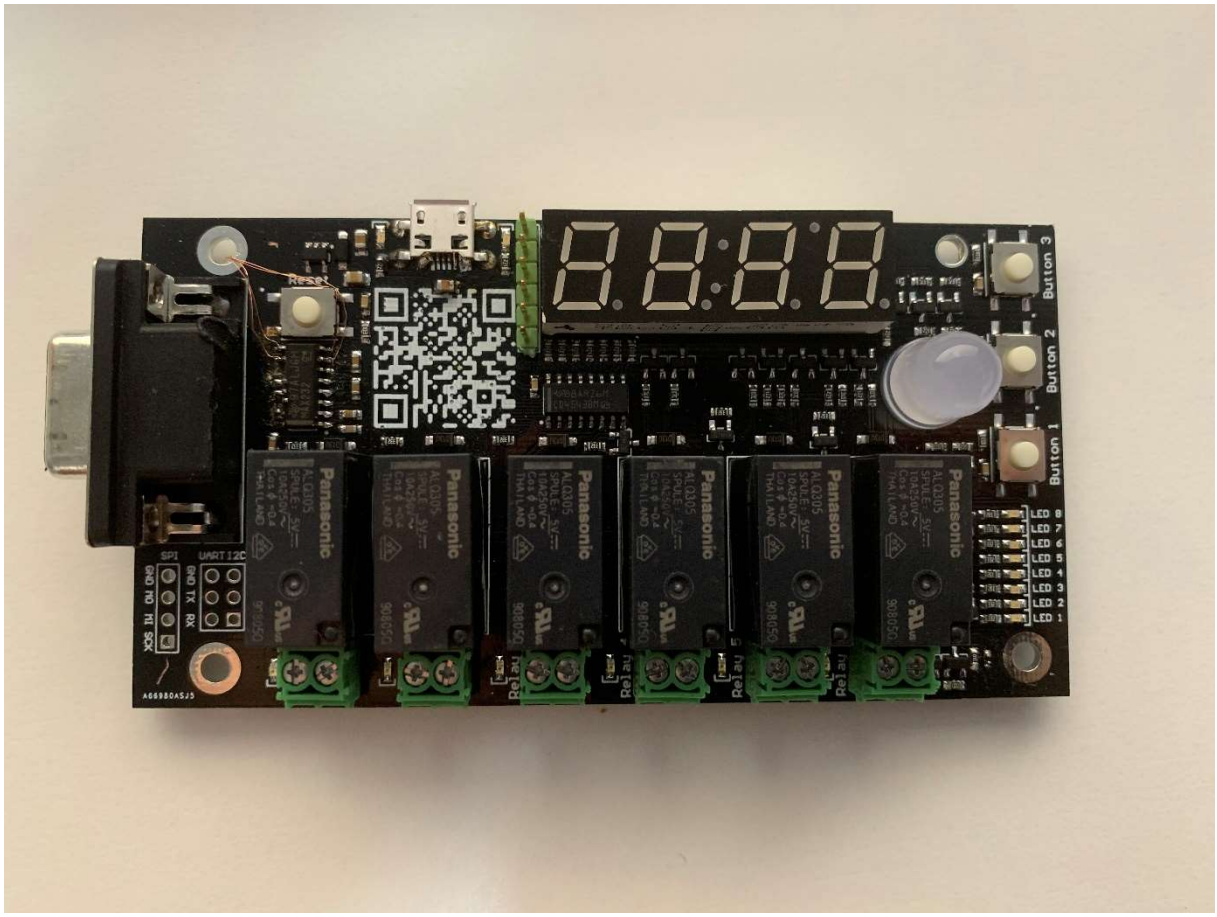
COMMAND REFERENCE v1.0

Extension board for the Edge Device



In this manual for the extension board v1.0 are supported command that can be sent over RS-232 (Serial) to control the parts on the PCB. Since the DSUB connector doesn't supply the PCB with current, the Micro-USB connector on the top left has to be used. It is only for supply and can't be used for communication.

Serial settings:

Every sent command must end with a ";" to be completed, else it is still reading until he receives one. Every command received by the extension board comes with a ";" too.

Baud-Rate: 115200

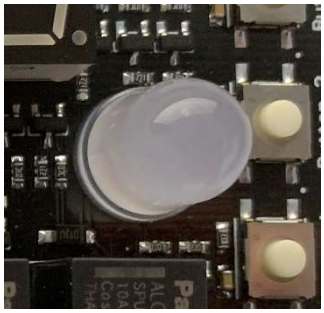
Inhalt

RGB

You can set or read the current color of the RGB led. There are only certain colors available.

Colorcode

0
1
2
3
4
5
6
7



SET

Set the RGB to the color with the color-code

```
rgb.set.[color-code]
```

Example:

```
rgb.set.5;
```

GET

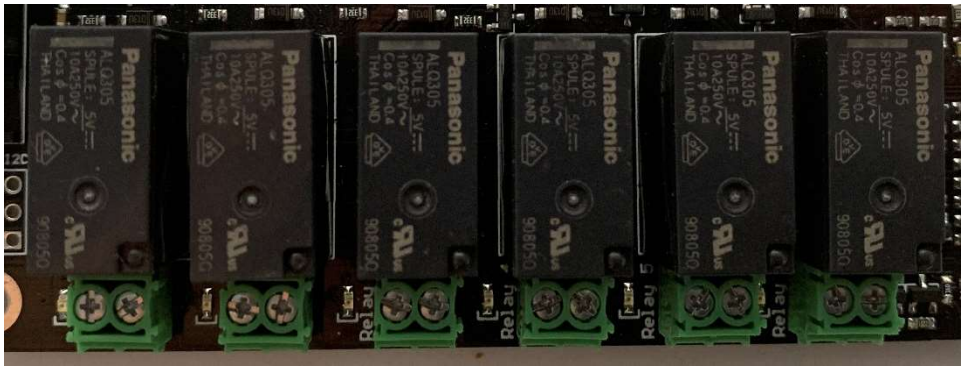
Returns the current color of the RGB

```
rgb.get
```

Example:

Received: 6;
Converted: Yellow

Relays



There are six relays that are able to switch 230V AC **(but not recommended).**
If the relay is set a red led will shine on the left side of it.
You can connect it through the green terminal below it.
They are numbered from left to right and 1 to 6.

SET

Turn the selected relay on or off

State:

0 -> off
1 -> on

```
relay.set.[relay number].[state]
```

Example:

```
relay.set.1.1;
```

GET

Get the state of the relay

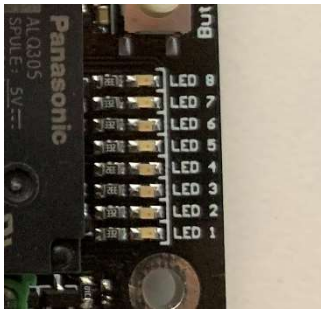
```
relay.get.[relay number]
```

Example:

Received: 1;
Converted: ON

LEDs

There are 8 green LEDs that can be turned on or off. They are numbered from 1 to 8.



SET

Turn the selected LED on or off

State:

0 -> off
1 -> on

```
led.set.[led number].[state]
```

Example:

```
led.set.4.1;
```

GET

Returns the state of the relay

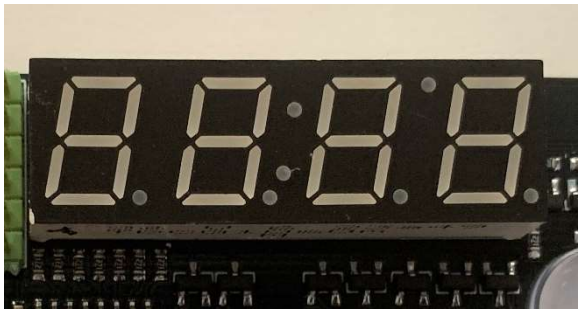
```
led.get.[led number]
```

Example:

Received: 1;
Converted: ON

7 Segment

The segment display can individually show numbers on each position, you can choose where the decimal point is, turn the colon or the upper point on. The display shines in green and can only show numbers.



SET

The position of the single digit:
Pos. 1 -> X000
Pos. 2 -> 0X00
Pos. 3 -> 00X0
Pos. 4 -> 000X

dp pos -> decimal point position. Can be from 1 to 4.

colon -> colon state, 1 = on, 0 = off.

upper -> upper point, 1 = on, 0 = off.

```
segment.set.[pos. 1].[pos. 2].[pos. 3].[pos. 4].[dp pos].[colon].[upper]
```

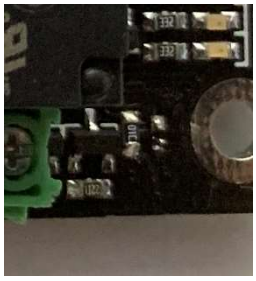
Example:

segment.set.1.2.3.4.0.1.0 -> 12:34

Temperature

Used to measure the room temperature.

Problem:
The longer the PCBs is turned on the more the sensor heat itself up. It will rise up a few Celsius.



GET

Returns the temperature as one number

```
temp.get
```

Example:

Received:	2918;
Converted:	29.18°C

SHOW

The temperature can be show on the display with this command:

```
showTemp.set.[state]
```

If you turn it off (state=0) the display shows 0000.