

Locomotives up to address 80

Control of the exits selectable between F0 and F4

FA = F0L or F3

FB = F0R or F4

FC = F1 PWM dimmable

FD = F2

Max. 500mA for each port with total Max. of 800mA

PCB 14mm x 23mm

Connections:

J or Black = Digital ground

K or Red = Digital Power

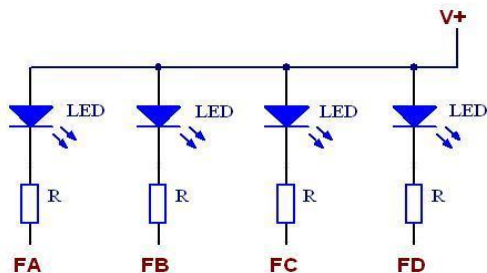
FA or White = Port 1

FB or Yellow = Port 2

FC or Green = Port 3

FD or Violet = Port 4

V+ or Blue = common Port power



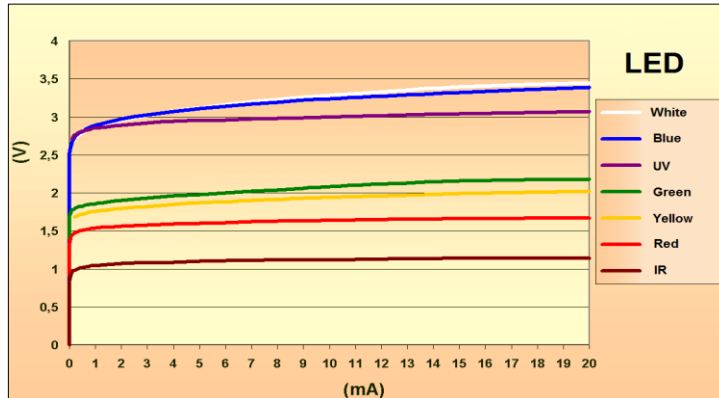
$$\frac{U_s - U_l}{I} = R$$

I= amperage

R= ballast resistance

Us= supply voltage

Ul= working voltage of the LED \* number of the LEDs in series posted



Setting address, PWM and outputs:

1. Place carriage on rails.
2. Enter the locomotive address in and put all the functions off.
3. get a magnet along the end of the carriage to the carriage lights flashing.
4. Remove the magnet and wait until the light stops flashing.
5. Enter a speed for the PWM dim level.
6. Turn the lights on with F1.
7. If illumination level is not correct, put F1 back off and repeat step 5.
8. If you want to use FA and FB as F3 and F4 instead of FL and FR, press F3.
9. Put F4 on to store lighting level and other data.
10. The carriage light will blink a few times to indicate that the level and data are accepted.

Hans Deloof

[info@locohdl.be](mailto:info@locohdl.be)

[www.locohdl.be](http://www.locohdl.be)

18/12/2021

English

**Liability disclaimer:**

Use all items that can be bought and installation instructions that can be found on this site at your own risk. They have been developed for personal use, and I find them very useful. That is why I wish to share them with other model railroad hobbyists. All items and procedures have been tested and used on my own model railroad systems without causing any damage, but this does not necessarily imply that all modifications and procedures will work in any and all environments or systems. I cannot take any responsibility when items or procedures are used under different circumstances. Always use your own judgment and common sense!