

PT170400 / PT170420 / PT170421

laser sensor

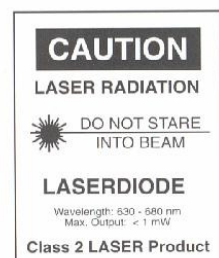


Adjusting the sensor:

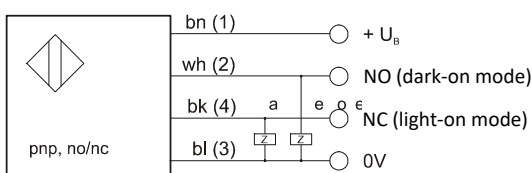
1. The diffuse reflection laser sensor PT17 must first be aligned to the object to be detected so that it can be temporarily mounted.
2. Adjusting the background area:
When doing this, the object to be detected must not be in the path of the laser beam! If the background is in the detection range (sn) of the sensor, the potentiometer must be turned clockwise until the yellow LED signal lights up.
If the background is outside the detection range, the potentiometer will have to be turned clockwise until a click is heard. This is the final limit stop.
3. Adjusting the foreground area
When doing this, the object to be detected must be within the beam path. The yellow LED signal should light up. If it does not light up, the object is too far away from the sensor and the distance between this and the sensor must be changed accordingly.
Next turn the potentiometer counter-clockwise until the LED signal turns off. As this is a multiplex potentiometer, the turns have to be counted.
4. Setting the switching point
Set the potentiometer at the mid-point exactly between the previously determined positions.
5. The laser scanner can then finally be mounted.

Note

The attached warning signs on the device relate to the laser equipment. A warning sticker can be ordered with item number AP000026. In addition, the system's control elements should be mounted as far away from the beam as possible and employees using this equipment should be trained accordingly.



connection



bn=brown, wh=white, bk=black, bl=blue terminal marking of the cable socket in brackets

yellow LED: status display
When this LED lights up, the switching output is active.

green LED: operating voltage display
When this LED lights up, the operating voltage is applied.

dimensional drawings

fig. 1 cable device

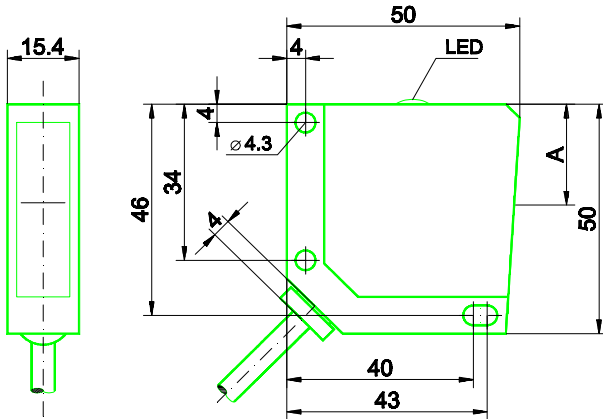
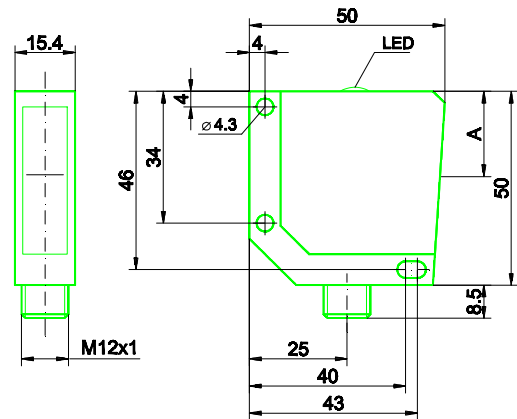
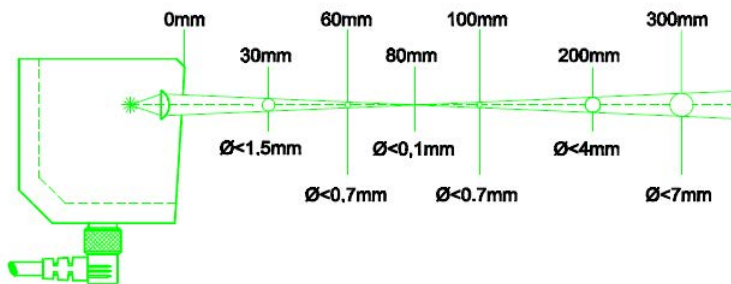


fig. 2 connector device



transmitter axis A: 34mm

fig. 3 laser beam course



Technical data

| | |
|-------------------------------------|--------------------------------------|
| current consumption | < 75mA |
| voltage drop | < 2V |
| operating voltage | 10 ... 30V DC |
| ampacity | 200mA |
| switching frequency | 800Hz |
| nominal switching distance sn | diff. reflection sensor 25 ... 300mm |
| real switching distance sr | sn ± 10% |
| hysteresis (dif. reflection sensor) | 5% ... 15% of sn |
| output | pnp, no/nc |
| system of protection | IP67 according to EN 60529 |
| ambient temperature | -10°C ... +50°C |
| housing | zinc diecast Zn |
| laser class | class 2 |
| transmitting element | laser diode red |