

Fibre-optic sensors



**D11 series
dc operation**

Wave length

Red	680 nm
Green	525 nm
Blue	470 nm
White	450-650 nm

Adjustment

sensitivity

Supply

Supply voltage	10...30 V dc
Ripple V_{pp}	$\leq 10\%$
No load current	$\leq 25\text{ mA}$
Delay upon power up	100 ms

Protection

reverse polarity
short-circuit

Output

Programmable (see wiring)	light and dark operate or light operate and alarm
Continuous load current	$\leq 150\text{ mA}$
Switching frequency	1 kHz

Material

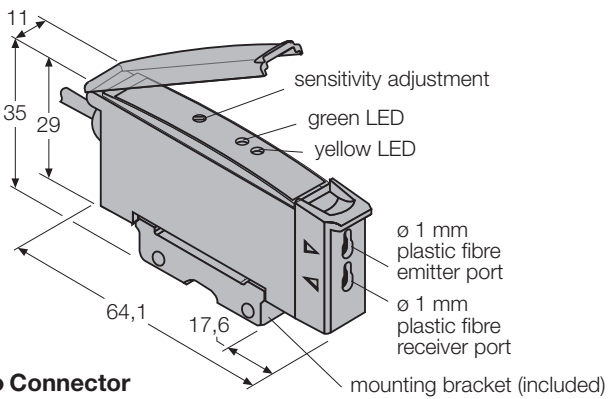
Housing	ABS
Cover	acrylic
Protection class (IEC 60529/EN 60529)	IP54
Temperature range	-20...+55 °C
Cable	2 m, PVC, 4 x 0,34 mm ²
Connector	picocon (ø 8 mm)

Indicator LED's

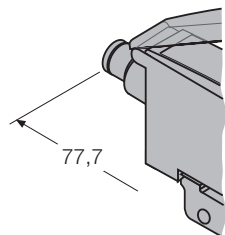
Yellow	light sensed
Green	power-on
Yellow flashing	low gain
Green flashing	short-circuit or output overload

Dimensions [mm]

● Cable

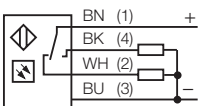


● Connector

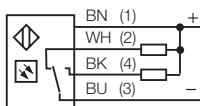


Wiring

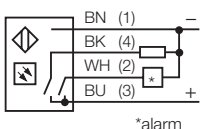
pnp complementary



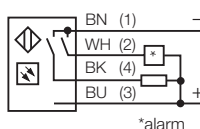
nnp complementary



pnp light op. + alarm



nnp light op. + alarm



Accessories

Bracket

SMBD11	30 566 22	through-hole mounting (included)
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Connectors

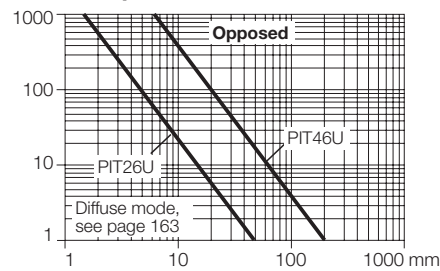
KP4-2/S90	80 072 90	straight type
WKP4-2/S90	80 073 26	right-angled type

D11 series

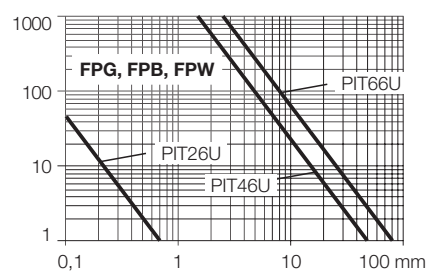
dc operation

Excess gain curve:
Excess gain in relation to the distance

— Fibre-optic



— Fibre-optic



	<i>Fibre type</i>	<i>Light source</i>	<i>Output function</i>	<i>Connection</i>	<i>Type</i>	<i>Ident number</i>
	plastic	red	pnp	cable	D11SP6FP	30 433 48
	plastic	red	pnp	connector	D11SP6FPQ	30 433 50
	plastic	red	nnp	cable	D11SN6FP	30 433 42
	plastic	red	nnp	connector	D11SN6FPQ	30 433 44
	plastic	green	pnp	cable	D11SP6FPG	30 494 16
	plastic	green	pnp	connector	D11SP6FPGQ	30 494 17
	plastic	green	nnp	cable	D11SN6FPG	30 486 04
	plastic	green	nnn	connector	D11SN6FPGQ	30 486 28
	plastic	blue	pnp	cable	D11SP6FPB	30 502 44
	plastic	blue	pnp	connector	D11SP6FPBQ	30 511 66
	plastic	blue	nnp	cable	D11SN6FPB	30 486 03
	plastic	blue	nnp	connector	D11SN6FPBQ	30 511 64
	plastic	white	pnp	cable	D11SP6FPW	30 597 96
	plastic	white	pnp	connector	D11SP6FPWQ	30 597 97
	plastic	white	nnp	cable	D11SN6FPW	30 597 93
	plastic	white	nnp	connector	D11SN6FPWQ	30 597 94

Subject to changes without notice • Edition 02.02 • P/N ED005 – excerpt from EC001/0102



These sensors do not include the self-checking redundant circuitry necessary to allow their use in personnel safety applications. A sensor failure or malfunction can result in either an energised or de-energised output condition. These products should not be used as sensing devices for personnel safety.