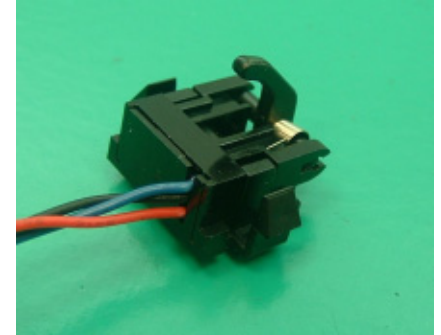


ACTUATOR TYPE PHOTO INTERRUPTER

General Description

The FI-405XX actuator type photo interrupter combined GaAs IRED, high sensitive phototransistor and actuator, is ideal for copiers, facsimiles.



Features

- Widely applicable
- Compact & light
- Wide choice of levers
- Connector type
- Meet RoHS

Applications

- Copiers
- Facsimiles
- Printers
- Banking machines

MAXIMUM RATINGS

(Ta=25°C)

Item		Symbol	Rating	Unit
Input	Power dissipation	PD	100	mW
	Forward current	IF	60	mA
	Reverse voltage	VR	5	V
	Pulse forward current *1	IFP	1	A
Output	Collector power dissipation	PC	100	mW
	Collector current	IC	40	mA
	Collector-Emitter voltage	VCEO	30	V
	Emitter-Collector voltage	VECO	5	V
Operating temp.		Topr.	-20 ~ +85	°C
Storage temp.		Tstg.	-30 ~ +85	°C
Soldering temp. *2		Tsol.	260	°C

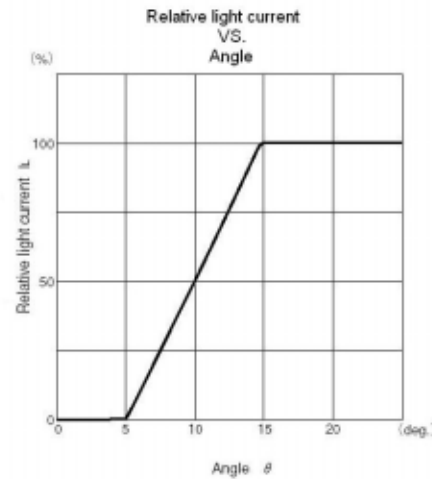
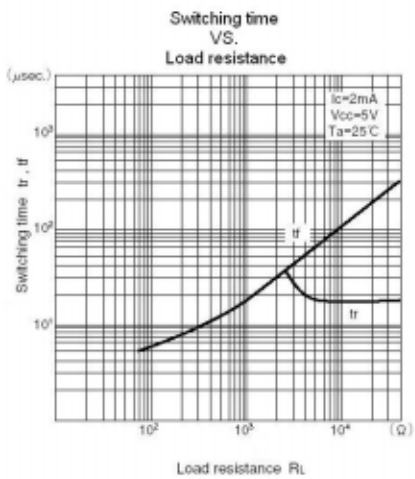
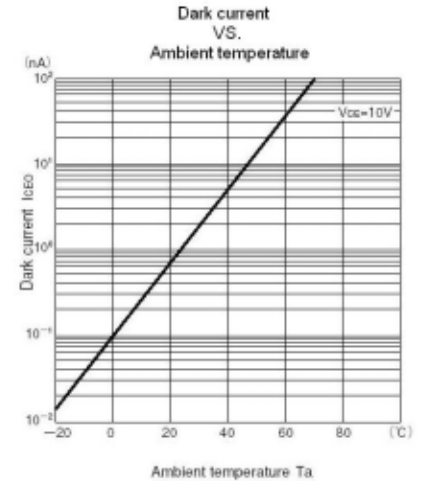
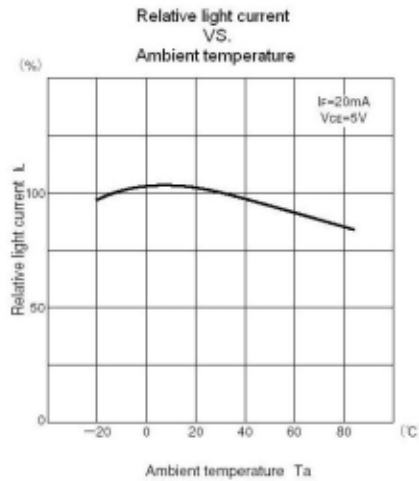
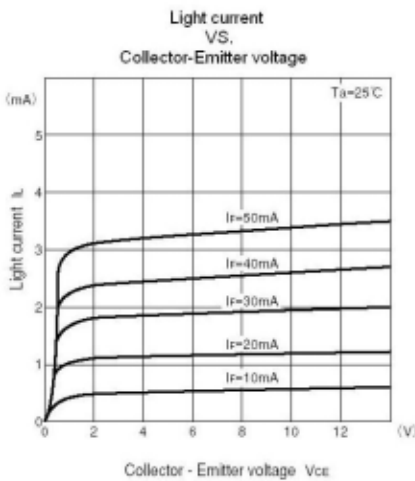
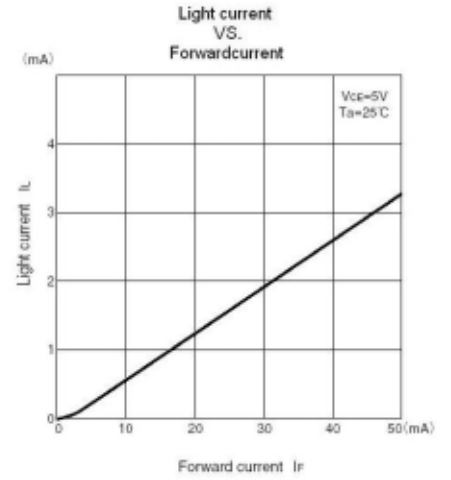
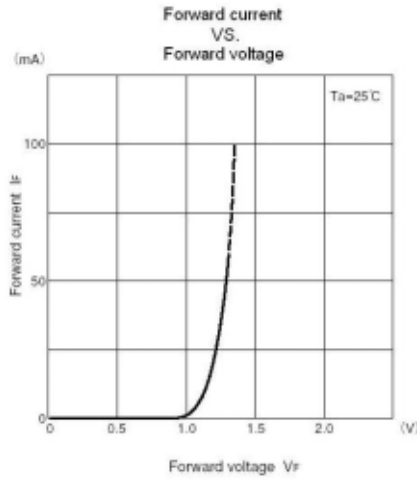
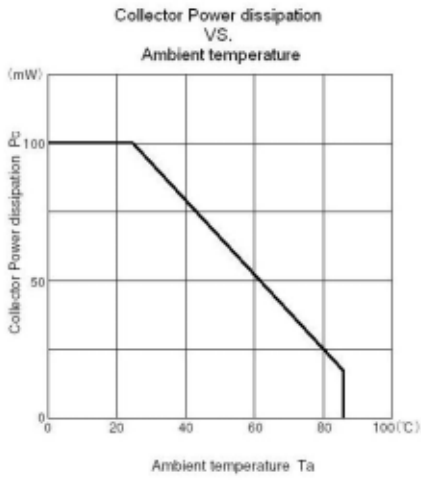
*1. pulse width : $t_w \leq 100\mu\text{sec}$. Period : $t = 10\text{msec}$

*2. For MAX. 5seconds at the position of 2mm from the resin edge

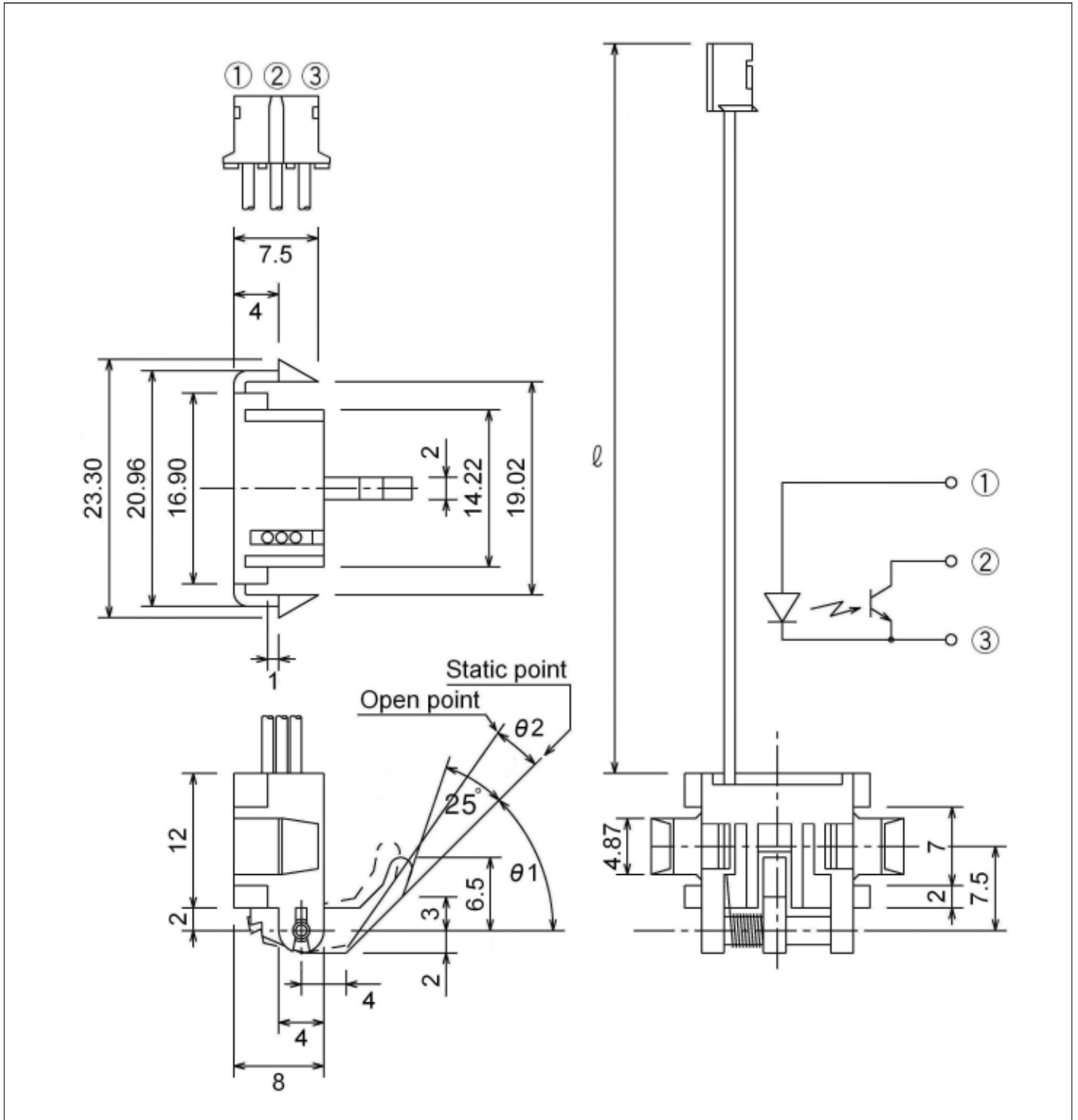
ELECTRO-OPTICAL CHARACTERISTICS

(Ta=25°C)

Item		Symbol	Conditions	Min.	Typ.	Max.	Unit
Input	Forward voltage	V _F	I _F =20mA	-	1.2	1.4	V
	Reverse current	I _R	V _R =5V	-	-	10	μA
	Peak wavelength	λ _p	I _F =20mA	-	940	-	nm
Output	Collector dark current	I _{CEO}	V _{CE} =10V	-	1	100	nA
Transmission	Light current	I _C	I _F =20mA, V _{CE} =5V (Non-shading)	0.3	1.5	-	mA
	Leakage current	I _{CEOD}	I _F =20mA, V _{CE} =5V (Shading)	-	-	20	μA
	C-E saturation voltage	V _{CE(sat)}	I _F =20mA, I _C =0.1mA	-	0.15	0.4	V
Switching Speeds	Rise time	t _r	V _{CC} =5V, I _C =2mA	-	4	-	μsec
	Fall time	t _f	R _L =100Ω	-	5	-	μsec



DIMENSIONS



MECHANICAL CHARACTERISTICS

Item	Min	Typ	Max	Unit
Static point $\theta 1$	-	45	-	deg.
Open point $\theta 2$	5	10	15	deg.
Movement torque	-	-	1.5	gf / cm

NOTES :

1. All dimensions are in millimeters.
2. Tolerance is $\pm 0.25\text{mm}$ unless otherwise specified.
3. Specifications are subject to change without notice.
4. The line material may defer to the customer request revision.