

Photointerrupter with Connector

GP1A173LCS2F/GP1S173LCS2F

Features

- Employs connector-united case and connector pin-united frame.
Low cost by part reduction
- High operating temperature (-30 to +95 °C)
Extending area to mount photointerrupter under high/low temperature condition in copier & LBP.
- High reliability of connection improved by combined case & connector as one part.
- Mechanical installation is compatible with conventional models. (GP1A73/GP1S73 series)

Main Specifications

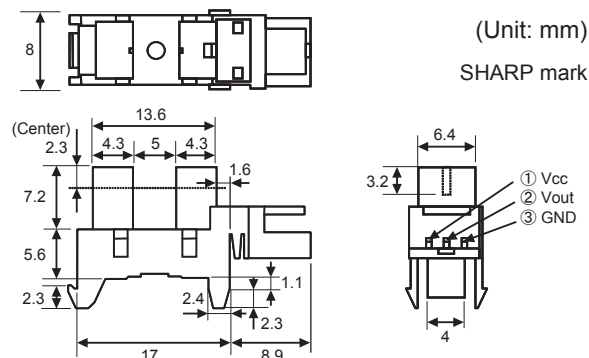
OPIC output type 【GP1A173LCS2F】

Parameter	Symbol	Characteristics
Operating supply voltage	V_{CC}	4.5 to 5.5 V
Low level supply current	I_{CCL}	MAX. 16.5 mA
Low level output voltage	V_{OL}	MAX. 0.35 V
High level supply current	I_{CCH}	MAX. 16.5 mA
High level output voltage	V_{OH}	MIN. $V_{CC} \times 0.9$ V
Response characteristics	MIN. interruption time	t_H MIN. 166 μ s
	MIN. sensing time	t_L MIN. 166 μ s
Operating temperature	T_{opr}	-30 to +95 °C

Phototransistor output type 【GP1S173LCS2F】

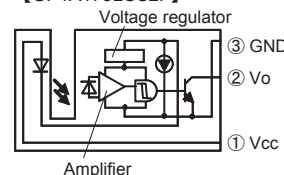
Parameter	Symbol	Characteristics
Forward voltage	V_F	1.2 to 1.4 V
Peak forward voltage	V_{FM}	TYP. 3 V
Reverse voltage	I_R	MAX. 10 mA
Dark current	I_{CEO}	MAX. 100 nA
Collector current	I_C	MIN. 0.5 mA
Collector-emitter voltage	$V_{CE(sat)}$	MAX. 0.4 V
Response characteristics	Rise time	t_r MAX. 15 μ s
	Fall time	t_f MAX. 20 μ s
Operating temperature	T_{opr}	-30 to +95 °C

Outline Dimensions

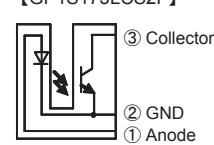


Internal Connection Diagram

OPIC output type
【GP1A173LCS2F】

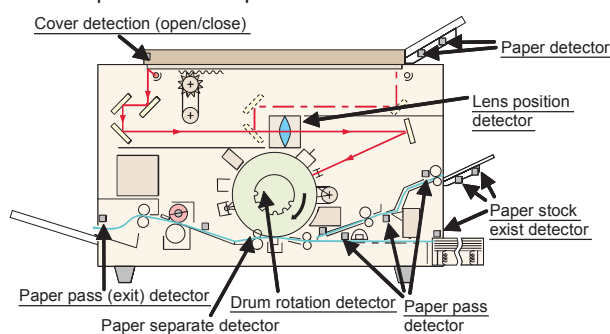


Phototransistor output type
【GP1S173LCS2F】



Application

Example used in copier



Lineup

Transmissive type photointerrupter with connector

Output type	Operating voltage	Current model	General purpose type
OPIC output	5 V drive	GP1A73AJ000F	GP1A173LCS2F
	3 V drive	GP1A073LCS0F	
Phototransistor output	5 V drive	GP1S73PJ000F	GP1S173LCS2F

: New product

Applications

Copier, Laser beam printer

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