# SHARP

## GP1FA350TZ/GP1FA350RZ

Low Voltage Operation Fiber Optic Transmitter/Receiver

#### Features

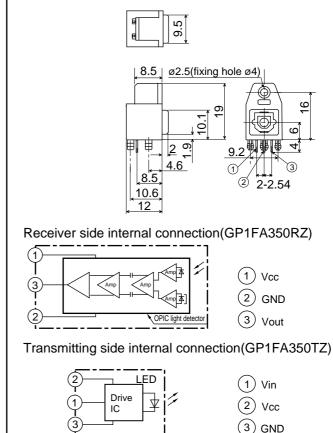
- (1) Low voltage operation (Vcc:2.7 to 3.6V)
- (2) Low dissipation current
- (3) Unidirectional signal transmission for plastic fiberoptic cables
- (4) The optical receiver can be directly connected with the TTL, due to the use of OPIC.

### Applications

- (1) DVD players
- (2) STB/BS,CS tuners
- (3) Digital audio equipment
- (4) Personal computers

\* OPIC is a trademark of SHARP Corporation. An OPIC consists of a light-detecting element and signal-processing circuit integrated onto a single chip.

\* For fiber-optic cables, use our GP1C331/GP1C331A/GP1C335 cables.



Outline Dimensions

#### Specifications

p		$(Ta=25^{\circ}C)$	
Parameter	Symbol	GP1FA350TZ (transmitter side)	GP1FA350RZ (receiver side)
Supply voltage	Vcc	2.7 to 3.6 V	
Dissipation current	Icc	MAX. 12mA	TYP. 15mA
Fiber coupling light output	Pc	MIN. –21dBm	—
Reception photoelectric power	Pc	_	MIN. –27dBm
Jitter	tj	TYP. 1ns	
Operating transmission speed	Т	MAX. 8Mbps (NRZ signal, 50% duty cycle)	
Operating temperature	Topr	-20 to +70°C	

(Notice)

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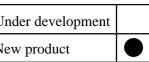
(Internet)

•Data for Sharp's optoelectronic/power devices is provided on internet. (Address http://www.sharp.co.jp/ecg/)

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Under development New product

Fiber Optic Transmitter/Receiver



(Unit: mm)

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  - Personal computers
  - Office automation equipment
  - Telecommunication equipment [terminal]
  - Test and measurement equipment
  - Industrial control
  - Audio visual equipment
  - Consumer electronics

(ii)Measures such as fail-safe function and redundant design should be taken to ensure reliability and safety when SHARP devices are used for or in connection with equipment that requires higher reliability such as:

- Transportation control and safety equipment (i.e., aircraft, trains, automobiles, etc.)
- Traffic signals
- Gas leakage sensor breakers
- Alarm equipment
- Various safety devices, etc.

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- Telecommunication equipment [trunk lines]
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