

TENTATIVE

TOSHIBA PHOTOCOUPLER GaAlAs IRED + PHOTO IC

# TLP759F(IGM)

TRANSISTOR INVERTOR

INVERTER FOR AIR CONDITIONER

LINE RECEIVER

IPM INTERFACES

Unit in mm

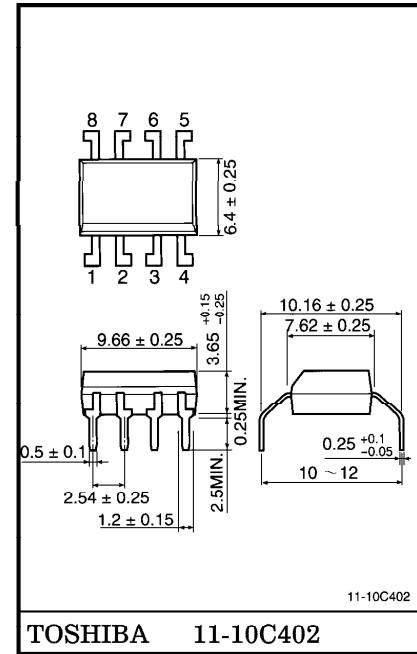
The TOSHIBA TLP759F(IGM) consists of a GaAlAs high-output light emitting diode and a high speed detector of one chip photo diode-transistor.

This unit is 8-lead DIP package.

TLP759F(IGM) has no internal base connection, and a Faraday shield integrated on the photodetector chip provides an effective common mode noise transient immunity.

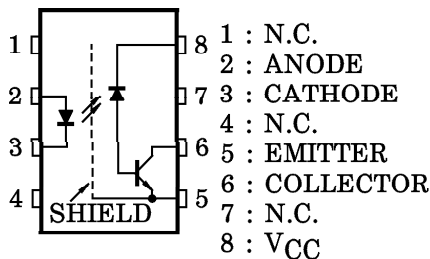
TLP759F(IGM) guarantees minimum and maximum of propagation delay time, switching time dispersion, and high common mode transient immunity. Therefore TLP759F(IGM) is suitable for isolation interface between IPM (Intelligent Power Module) and control IC circuits in motor control application.

All parameters are tested to the specification of TLP759(IGM).

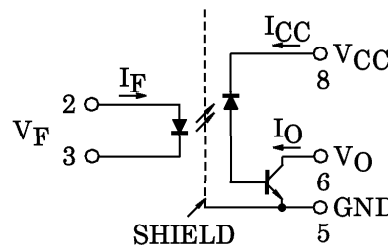


Weight : 0.54g

**PIN CONFIGURATION (Top view)**



**SCHEMATIC**



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- The information contained herein is subject to change without notice.

- Isolation Voltage : 5000V<sub>rms</sub> (Min.)
  - Common Mode Transient Immunity :  $\pm 10\text{kV} / \mu\text{s}$  (Min.)  
@V<sub>CM</sub>=1500V
  - Switching Time : t<sub>pHL</sub>, t<sub>pLH</sub> = 0.1 $\mu\text{s}$  (Min.)  
= 0.8 $\mu\text{s}$  (Max.)  
@I<sub>F</sub>=10mA, V<sub>CC</sub>=15V, R<sub>L</sub>=20k $\Omega$ , T<sub>a</sub>=25°C
  - Switching Time Dispersion : |t<sub>pLH</sub>-t<sub>pHL</sub>|=0.7 $\mu\text{s}$  (Max.)
  - UL Recognized : UL1577, Fle No. E67349
  - Option (D4) type VDE Approved : DIN VDE0884 / 06.92,  
Certificate No. 83676
- Maximum Operating Insulation : 1140V<sub>PK</sub>  
Highest Permissible Over Voltage : 6000V<sub>PK</sub>
- (Note 1) When a VDE0884 approved type is needed,  
please designate the "Option (D4)"
- Creepage Distance : 8.0mm
  - Clearance : 8.0mm
  - Insulation Thickness : 0.4mm