

UV Sensor KME-M001C

Description

The KME-M001C UV Sensor combines a UV LED with LTV Sensor, Band pass filter.

Features

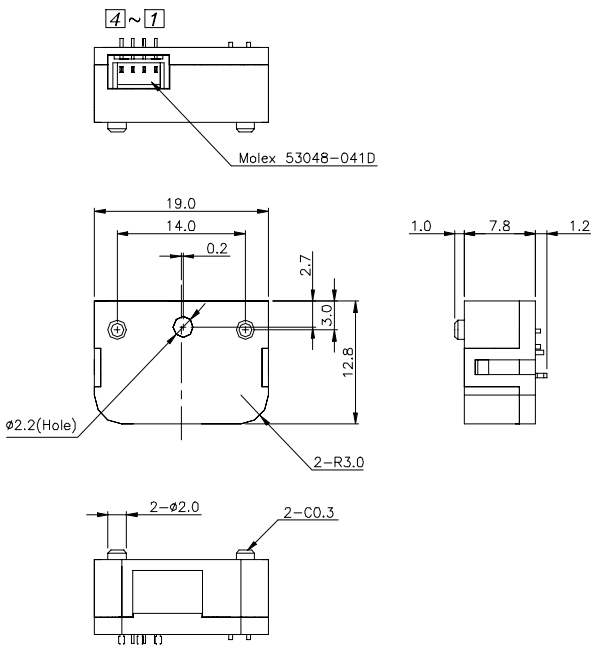
- Difficult for Dust and Debris to come onto Element
- Easy Equipping
- Detection of the Existence for a Fluorescent Material

Application

- ATM
- Vending Machine
- Currency Counters

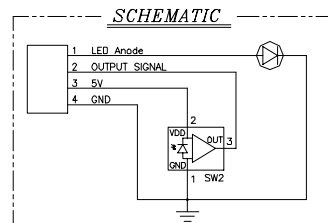


Outline Dimensions

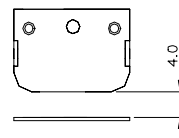


Note

1. Pin Configuration



2. Detecting Distance



3. General Tolerance : ±0.2

[Unit : mm]

Characteristics

[Ta= 25°C]

Parameter		Symbol	Conditions	Min.	Typ.	Max.	Unit
Input	Forward Voltage	V_F	$I_F=20mA$	-	3.5	4.0	V
	Peak Wavelength	λ_p	$I_F=20mA$	-	375	-	nm
Output	Supply Voltage	V_{DD}	-	4.5	5.0	5.5	V
	Dark Voltage	V_D	Ee=0	0		15	mV
	Maximum Output Voltage	V_{OM}	$V_{DD}=4.5V$		4.49		V
Transmission	Forward Current	I_F	L=4mm, $V_{DD}=5V$, $V_{TAR}^{(1)}=4.5V$, A fluorescent paper	2	-	25	mA
	Low Level Output Voltage	V_{OL}	L=4mm, $V_{DD}=5V$, $I_{TAR}^{(2)}$, on fluorescent paper	-	-	1.5	V
Response Time	Rise Time	tr	$V_{DD}=5V, R_L = 10k\Omega$	-	160	-	μS
	Fall Time	tf		-	150	-	μS

Note 2. V_{TAR} = Target Voltage = 4.5V

Note 3. I_{TAR} = I_F (Forward Current) when I_{TAR}

Note 4. Adjust amplitude and offset of square wave so that Vout transitions from 10% to 90% of Vout range