

U SERIES PHOTOELECTRIC SENSOR

Type	U Series -A	U Series -B
Sensing Mode	Through-beam	Through-beam
Sensing Schematic		
Sensing Range	3.5mm	3.5mm

Parameter	Symbol	MIN	TYP	MAX	Units	Test Conditions
IR Emitter						
Forward Voltage	VF			1.6	V	VR = 3V
Reverse Leakage Current	IR			10	µA	IF = 20mA
Detector						
Collector-Emitter Breakdown Voltage	V(BR)CEO	30			V	IC = 100µA
Emitter-Collector Breakdown Voltage	V(BR)CEO	5.0			V	IC = 100µA
Collector Dark Current	ICEO			100	nA	VCE = 10V IF = 0
Coupled Characteristics						
On-State Collector Current	IC(on)	1.5			mA	VCE = 5V IF = 20mA
Collector-Emitter Saturation Voltage	VCE(SAT)			0.4	V	IF = 20mA IC = 230µA
Rise And Fall Time	tr, tf		15		µS	VCC = 5V, IC = 1mA RL = 1000 Ω

Absolute Maximum Ratings

Operating Temperature Range -40°C to 85°C

Storage Temperature Range -40°C to 85°C

Soldering Temperature (5 sec) 240°C

IR Emitter

Power Dissipation 100 mW

Reverse Voltage 3 V

Continuous Forward Current 50 mA

Detector

Collector-Emitter Voltage 30 V

Emitter-Collector Voltage 5 V

Power Dissipation 100 mW

Collector DC Current 30 mA

Housing material PC

Model Number	PPU3.2-T3.5N-A4V0.35-A	PPU3.2-T3.5N-A4V0.35-B
Features	<ul style="list-style-type: none"> • NPN Silicon phototransistor output • Infrared emitting diode • 1.52 mm dia. detector aperture • 3.5 mm slot width • 22 AWG UL wire leads 	

