





## **NSL-4140**

#### **Light Dependent Resistor (LDR) CdS Photocell**

The NSL-4140 is a Type 5 light dependent resistor with sensitivity in the visible light region. The CdS photoresistor photocell is mounted in a hermetic, flat lens TO-18 package.

Advanced Photonix's CdS Photocells are photoresistor cells for visible light measurement designed to sense light from 400 to 700 nm. Their resistance decreases as the light level increases with efficiency characteristics similar to the human eye. These Light Dependent Resistors (LDR) are available in a wide range of resistance values. They are available in a two leaded plastic-coated ceramic header or hermetically sealed TO metal cans.

#### **Applications**

# Industrial Audio Compressors Night Lights Photography Light Meters Solar Street Lights Flame Detection

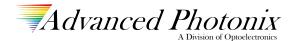
#### **Features**

Passive Resistance output

Hermetically Sealed

Available in a two-leaded ceramic package

Available in a wide range of resistance values





#### **Absolute Maximum Ratings**

Parameter	Symbol	Min Max		Unit				
Voltage	V <sub>R</sub>	-	80	V				
Power Dissipation	-	-	50	mW				
Operating Temperature	T <sub>OP</sub>	-40	+75	°C				
Storage Temperature	T <sub>STG</sub>	-55	+75	°C				
Package	TO-18							

### Typical Electro-Optical Specifications at T<sub>A</sub>=23 °C

Parameter	Test Conditions	Symbol	Min	Тур	Max	Unit
Light Resistance	1ftc., 2854 °K	$R_{\scriptscriptstyle L}$	8.4	14	19.6	ΚΩ
	100 ftc.,2854 °K	$R_L$	-	0.25	-	ΚΩ
Dark Resistance	5 sec after removal of test light	$R_{_{D}}$	800	-	2	ΜΩ
Spectral Peak	-	$\lambda_{P}$	-	550	-	nm

#### **Mechanical Specifications**

Units are in inches [mm]

