



















Transmission type Photointerrupters

Linear Phototransistor Output													
Package	Exterior	Part No.	Output type	Standard Characteristics							Packing Specifications	Positioning	Remarks
				Detection Groove Width (mm)	Slit Width (mm)	I _c (mA)	V _{CE} (V)	I _F (mA)	tr, tf (μs)				
Surface Mount type		RPI-0125	Phototransistor	1.2	0.3	0.45 Min 4.95 Max	5	20	10	Taping		Ultra-Miniature	
		RPI-0226		2.0	0.3	0.1 Min	5	5	50		✓	Miniature	
		RPI-0352E		3.0	0.4	0.18 Min	5	10	10		✓	Wide Gap, Energy Saving, High Efficiency	
		New RPI-0451E		4.5	0.5	0.16 Min	5	10	10		✓	Wide Gap, Energy Saving, High Efficiency	
Lead type		RPI-122		0.8	0.25	0.18 Min 1.08 Max	0.7	3	10	Bulk		Ultra-Compact	
		RPI-121		0.8	0.4	0.7 Min	5	20	10			Ultra-Compact	
		RPI-125		1.2	0.3	0.45 Min 4.95 Max	5	20	10			Ultra-Compact	
		RPI-221		2.3	0.4	0.2 Min	5	20	10				
		RPI-222		2.0	0.2	0.18 Min 0.95 Max	5	10	10				
		RPI-243		2.0	0.4	0.5 Min	5	20	10				
		RPI-246		2.0	0.2	0.35 Min 1.2 Max	5	20	10				
		RPI-352		3.0	0.4	0.2 Min	5	20	10		✓	Wide Gap	
		RPI-441C1	4.0	0.5	0.2 Min	5	20	10	✓		Wide Gap		
		RPI-441C1E	4.0	0.5	0.2 Min	5	10	10	✓		Wide Gap, Energy Saving, High Efficiency		

Reflective type Photosensors

Photoreflectors type												
Package	Exterior	Part No.	Output type	Standard Characteristics							Packing Specifications	Remarks
				Focal Length (mm)	LEDλ _P (nm)	PTrλ _P (nm)	I _c (mA)	V _{CE} (V)	I _F (mA)	tr, tf (μs)		
Lead type		RPR-220	Phototransistor	6.0	940	800	0.08 Min 0.8 Max	2	10	10	Bulk	
		RPR-220UC30N		6.0	630	800	0.08 Min 0.8 Max	5	10	10	Stick	Emitting Color: Red
		RPR-220PC30N		6.0	470	800	0.08 Min 0.8 Max	5	10	10		Emitting Color: Blue

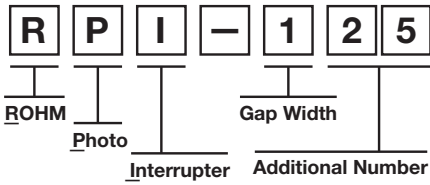
4 Direction Detector

4 Direction Detector												
Package	Exterior	Part No.	Output type	Standard Characteristics							Packing Specifications	Remarks
				LEDλ _P (nm)	PTrλ _P (nm)	I _c (mA)	V _{CE} (V)	I _F (mA)	tr, tf (μs)			
Surface Mount type		RPI-1035	Phototransistor	950	800	0.1 Min	5	5	10	Taping		

Product No. Explanation

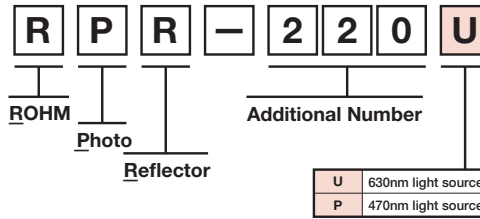
●Transmission type

7 characters

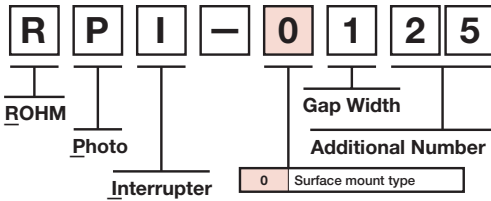


●Reflective type

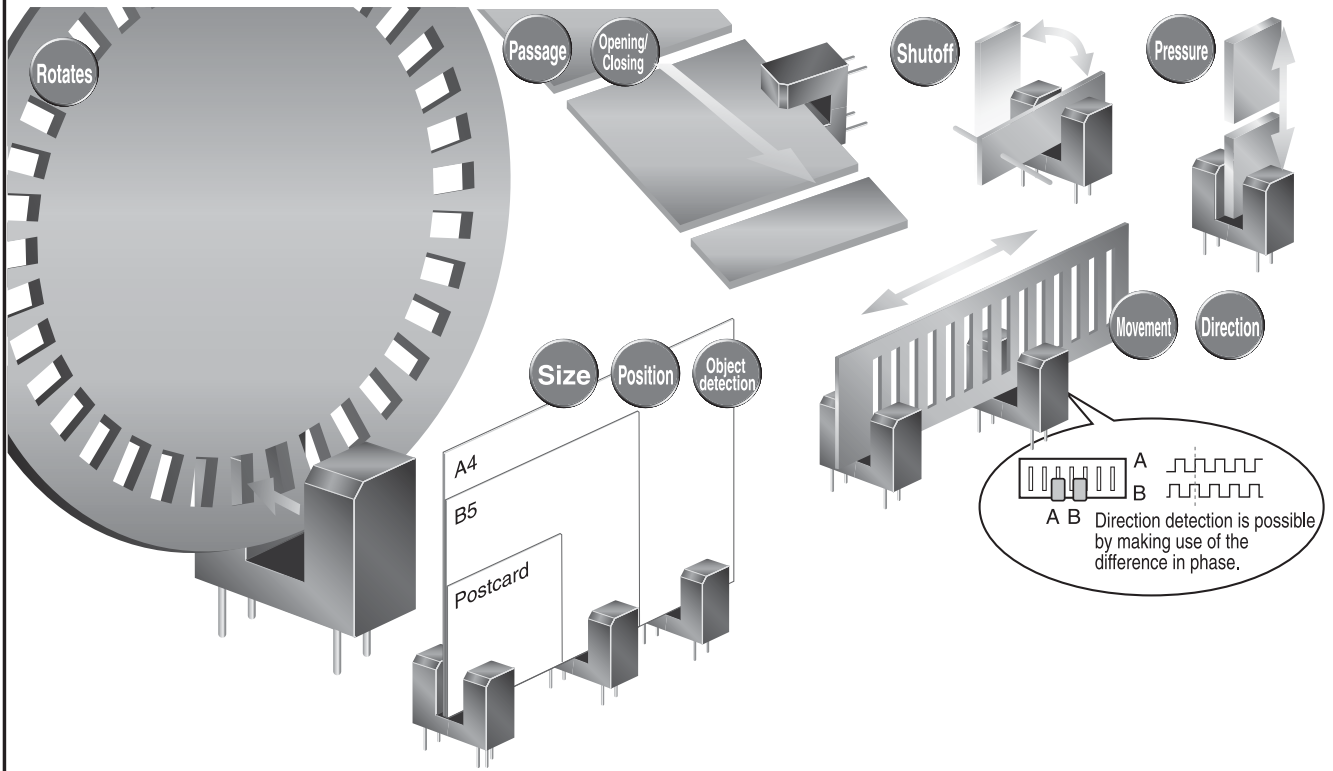
7 characters



8 characters







Detection of all movements

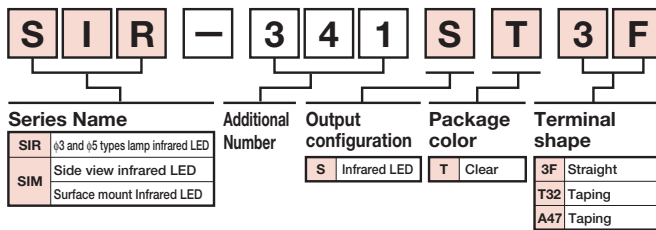


Infrared Light Emitting Diodes

These Ir-LEDs can be used for various remote control applications.



Infrared Light Emitting Diodes 1											
Package	Exterior	Part No.	Features	Absolute Maximum Rating	Standard Characteristics						
				I _F (mA)	I _E (mW/sr)	I _F (mA)	V _F (V)	I _F (mA)	λ _p (nm)	tr, tf (μs)	θ1/2 (deg)
φ3 resin		SIR-34ST3F	Optimized for remote controls	100	10.5	50	1.3	100	950	1	27
		SIR-341ST3F	Compact, high power	75	18.1	50	1.3	50	940	1	16
φ5 resin		SIR-56ST3F	Optimized for remote controls	100	15	50	1.3	100	950	1	15
		SIR-563ST3F	High output, Optimized for remote controls	100	21	50	1.34	50	940	1	15
		SIR-568ST3F	High speed LED for optical communications	100	38	50	1.6	50	850	fc=50MHz	13
Resin Side View type		SIM-20ST	General purpose molded type	50	7.5	50	1.3	50	950	1	15
		SIM-22ST	General purpose molded type	50	0.8	10	1.3	50	950	1	30
Surface Mount type (Top View)		SIM-030ST	Low Profile (0.9mm)	100	25	100	1.7	100	870	0.1	20
		SIM-040ST	High power	100	40	100	1.7	100	870	0.1	20

Product No. Explanation

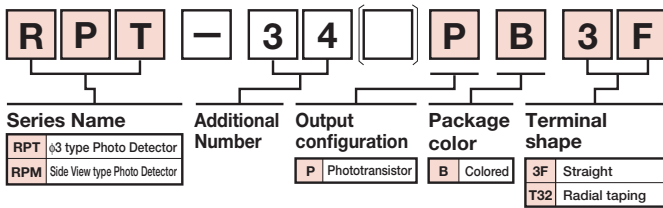


Phototransistors

ROHM phototransistors have high reliability and large collector currents, side view packages, and $\phi 3$ mm lamp packages are available.


Phototransistors 1												
Package	Exterior	Part No.	Feature	Visible Light Filter	Visible Light Filter			Standard Characteristics				
					V_{CE0} (V)	P_C Max (mW)	I_{CE0} Max (μ A)	V_{CE} (V)	I_C (mA)	λ_P (nm)	tr, tf (μ s)	$\theta 1/2$ (deg)
$\phi 3$ resin		RPT-34PB3F	Visible light filter	✓	32	150	0.5	10	2.0 Min	800	10	36
		RPT-37PB3F	Visible light filter, Polarity discrimination	✓	32	150	0.5	10	2.0 Min	800	10	36
		RPT-38PB3F	Visible light filter	✓	32	150	0.5	10	2.0 Min	800	10	36
Resin Side View type		RPM-20PB	Visible light filter	✓	32	100	0.5	10	0.5 Min	800	10	14
		RPM-22PB	Visible light filter, Wide viewing angle	✓	32	100	0.5	10	0.48 Min	800	10	32

Product No. Explanation




Photodiode

ROHM photodiode have been used Compact accurate instrument. Surface mount type, top view packages are available.

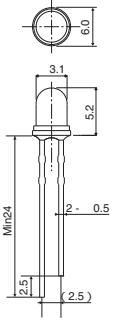
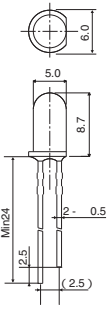
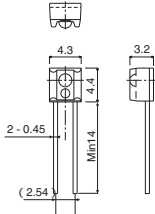
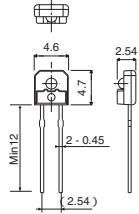
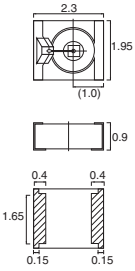
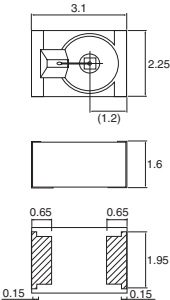
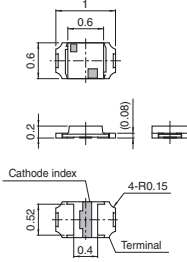
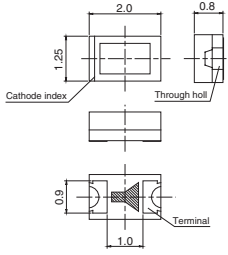
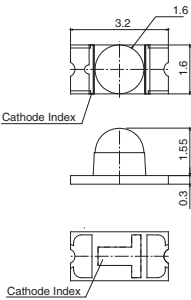
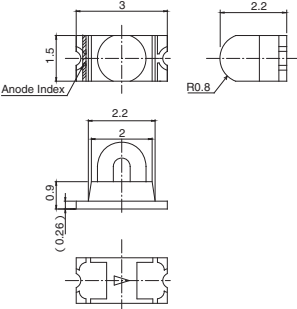
Photodiode												
Package	Exterior	Part No.	Features	Visible Light Filter	Absolute Maximum Rating		Standard Characteristics					Packaging Specifications
					V_R (V)	P_D Max (mW)	Light Current (μ A)	Dark Current (nA)	λ_P (nm)	tr, tf (ns)	$\theta 1/2$ (deg)	
Surface Mount type (Top View)		RPMD-0100	Small size, Thin type	✓	60	30	8	6 Max	940	100	60	Embossed taping 3,000pcs/reel

Proximity Sensor

Proximity Sensor										
Package	Exterior	Part No.	Features	Visible Light Filter	Interface	Absolute Maximum Rating		Standard Characteristics		
						V_{DD} Max (V)	V_{LED} Max (V)	PS Sensor Out (Count)	λ_P (nm)	
Surface Mount type		RPR-0521RS	Proximity Sensor and Ambient Light Sensor	Built-in Noise Cancellation Function	I ² C	4.5	7	80	940	

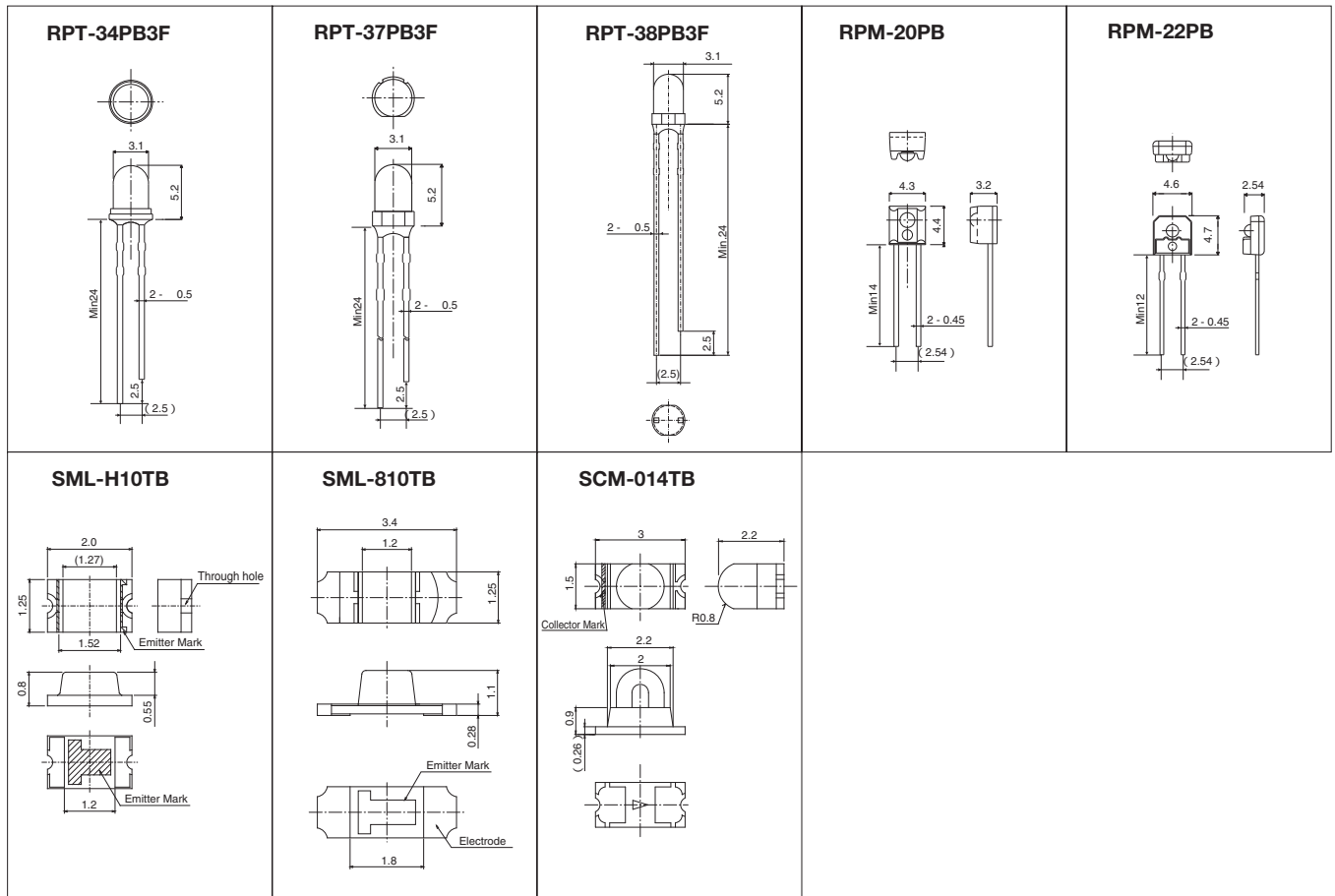
Packages

[Infrared Light Emitting Diodes]

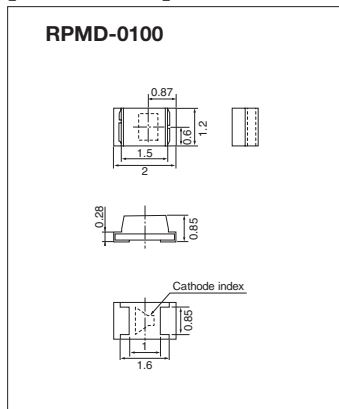
<p>SIR-34ST3F/341ST3F</p> 	<p>SIR-56ST3F/563ST3F/568ST3F</p> 	<p>SIM-20ST</p> 	<p>SIM-22ST</p> 
<p>SIM-030ST</p> 	<p>SIM-040ST</p> 	<p>SML-P15R2T (PICOLED™)</p> 	<p>SML-M13RT</p> 
<p>SML-S13RT, SCM-S15R2T</p> 	<p>SCM-013RT</p> 		

Dimensions (Unit: mm)

[Phototransistors]



[Photodiode]



[Proximity Sensor]

