

Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from, Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

Email & Skype: info@chipsmall.com Web: www.chipsmall.com

Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China







Photoelectrics Retro-reflective, Polarized, Relay Output Type PMP





- Range: 6 m
- Modulated, visible light, polarized
- . Make or break switching function (switch selectable)
- LED-indication for target detected
- Multi supply voltage:
 12 to 240 VDC and
 24 to 240 VAC, 50/60 Hz
- 25 x 65 x 81 mm reinforced PC/ABS- housing, IP 67
- Timer options (adjustable)
- NO and NC output







Product Description

Retro-reflective photoelectric switch with polarized light. Range up to 6 m. Fixed sensitivity. Immune to ambient light. Output function switch selectable. Protection degree IP 67. Screw terminal connection. 25 x 65 x 81 mm plastic housing. PG 13.5 or 1/2" NPT cable gland. Timer options: Delay on operate, delay on release, one shot (triggered on leading or trailing edge).

Ordering Key

PMP 6 R G T

Type	
Range ———	
Output —	
Cable gland type ———	
Timer function	

Type Selection

Housing W x H x D	Range (S _n)	Ordering no. with timer
25 x 65 x 81 PG 13.5 cable gland 1/2" NPT cable gland	6 m 6 m	PMP 6R GT PMP 6R IT

Specifications

Rated operating dist. (S _n) (0 to 5,000 lux)	PMP6 6 m with reflector type ER 4, ref. target
Blind zone	≤ 0.15 m
Rated operational volt. (U _B) AC: 45 to 65 Hz	10.8 to 264 VDC 21.6 to 264 VAC
Rated operational power (relay ON)	≤ 2 W (2.5 VA)
Output Contact ratings (AgCdO) Resistive loads AC 1 DC 1 Small inductive loads AC 15 DC 13 Mechanical life (typical) Electrical life (typical)	µ (micro gap) 3 A/250 VAC 3 A/30 VDC 2 A/250 VAC 3 A/30 VDC ≥ 40 x 10 ⁶ operations ≥ 5 x 10 ⁵ operations at 220 VAC - 3 A resistive load: 360 impulses/h
Dielectric voltage	2,000 VAC (rms) (cont./supply)
Sensitivity	Fixed
Light source Light type Optical angle Light spot size	GaAlAs, LED, 660 nm Visible, modulated ±2° 280 mm at 4 m

Operating frequency	20 Hz
Response time OFF-ON (t _{ON}) ON-OFF (t _{OFF})	≤ 20 ms ≤ 30 ms
Power ON delay (t _v)	≤ 300 ms (typ. 100 ms)
Output function	Switch selectable, make or break switching
Indication	
Target detected	LED, yellow
Optional timer Delay on operate Delay on release One shot	0.1 to 7 s ± 2 s 0.1 to 7 s ± 2 s 0.1 to 7 s ± 2 s
Environment Overvoltage category Pollution degree Degree of protection	III (IEC 60664/60664A; 60947-1) 3 (IEC 60664/60664A; 60947-1) IP 67 (IEC 60529; 60947-1)
Temperature Operating Storage	-25° to +55°C (-13° to +131°F) -30° to +80°C (-22° to +176°F)



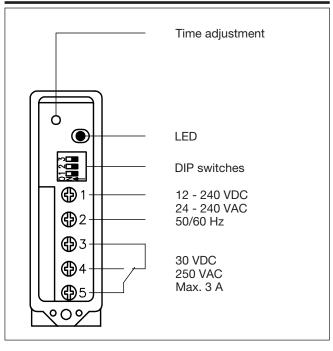
Specifications (cont.)

Vibration	10 to 150 Hz, 0.5 mm/7.5 g (IEC 60068-2-6)
Shock	2 x 1 m & 100 x 0.5 m (IEC 60068-2-32)
Rated insulation voltage	250 VAC (rms)
Housing material Body Front Cover Cable gland Mounting bracket	PC/ABS, grey PMMA, red PC, black PA, black, reinforced Steel, black
Connection Screw terminal Cable gland	5 x 2 x 1 mm ² PG 13.5 or 1/2" NPT for cable 6 to 10 mm
Weight	110 g
Approvals	UL, CSA
CE-marking	Yes

Truth Table

	Make s	witching	Break switching		
Object present	Yes	No	Yes	No	
LED	OFF	ON	OFF	ON	
Load	Non- active	Active	Active	Non- active	

Connection Diagram



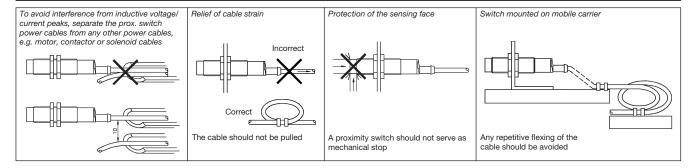
Selection of Function

PMP 6R . Switch 1 2 3

- 1 Delay on operate -Break switching
- 2 Delay on operate Make switching
- 3 Delay on release -Break switching
- 4 Delay on release Make switching
- 5 One shot, trailing edge -Break switching
- 6 One shot, trailing edge Make switching
- 7 One shot, leading edge -Break switching
- 8 One shot, leading edge Make switching

Upper position ON (Mode 1) Lower position OFF (Mode 0)

Installation Hints

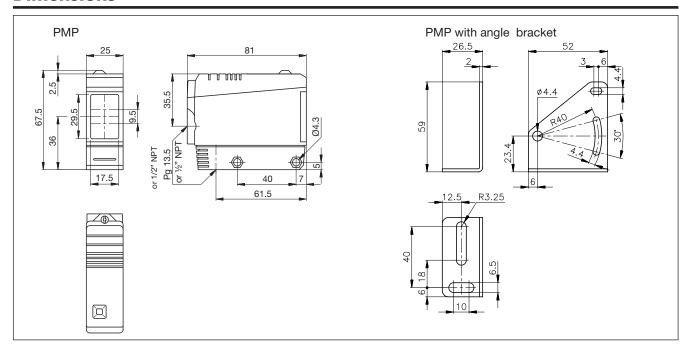




Operation Diagram

t = Time delay tv = Power ON delay Power supply						
Target present						
Object present						
Func 1. Output ON	⊢tv-					
Func 2. Output ON				⊢tv-l		
Func 3. Output ON	⊢tv⊣	⊢ t ⊣				<u>⊢ t ⊣</u>
Func 4. Output ON		⊢ t ⊣	Ft- Ft-	⊢tv⊣	Ft- Ft-	⊢ t ⊣
Func 5. Output ON	⊢tv⊣	— t -	- +t-		⊢ t →	
Func 6. Output ON		⊢ t -	→	Htv-I	⊢t⊣ ⊢t−	1
Func 7. Output ON	⊢tv⊣	⊢ t -		⊢tv-l	<u> </u>	
Func 8. Output ON	,	⊢ t -		,	⊢t	
Func 9. Output ON	⊢tv⊣	⊢ t ⊣	⊢ ⊢ t ⊣	⊢tv⊣	<u> </u>	+ t -
Func 10. Output ON		⊢ t	⊢ ⊢ t →		⊢	⊢ t →

Dimensions



Accessories

- Reflectors: ER series
- MB02 (longer mounting bracket)

Delivery Contents

- Photoelectric switch: PMP
- Cable gland
- Installation instruction
- Mounting bracket
- Packaging: Corrugated cardboard (environmentally friendly recycling material)