

## Analog voltage output model

### ● Absolute Maximum Ratings Exterior Specifications

Item	Symbol	Rated value	Unit	Remarks
Power supply voltage	Vcc	5.5	V	4. Vcc - 2. GND
Input pulse voltage *1	Vp	5.5 *2	V	1. Pulse - 2. GND
Operating temperature	Topr	-10 to 60	°C	With no icing or condensation
Storage temperature	Tstg	-25 to 80	°C	

\*1. DC voltage is not covered by warranty.

\*2. Pulse width: 800 μs, frequency: 500 Hz

### ● Exterior Specifications

Connecting method	Weight (g)	Material	
		Case	Lens
Connector	Approx 3.2 g	Polycarbonate (PC)	Acrylic (PMMA)

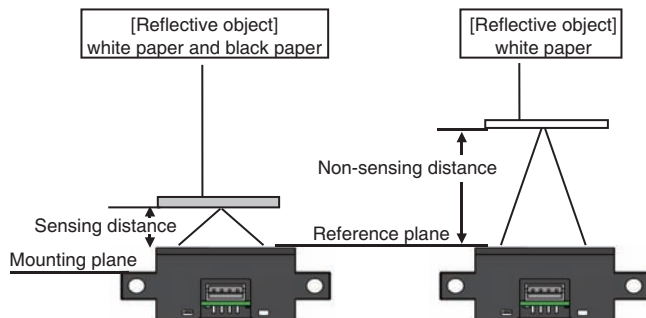
### ● Electrical and Optical Characteristics (Ta= 25°C, Vcc= 5.0 V)

Item	Symbol	Value			Unit	Condition
		MIN.	TYP.	MAX.		
Operating voltage	Vcc	4.5	5.0	5.5	V	---
Operating input pulse voltage	Vp	3.0	---	5.5	V	---
Maximum output voltage Forward voltage	Vomax	---	3.3	---	V	---
Sensing distance (Black paper)	Lrange	10	---	40	mm	Black paper, Vo ≥ 70 mV
Sensing distance (White paper)	Lrange	10	---	55	mm	White paper, Vo ≥ 70 mV
Non-sensing distance (White paper)	L	85	---	---	mm	White paper, Vo < 30 mV

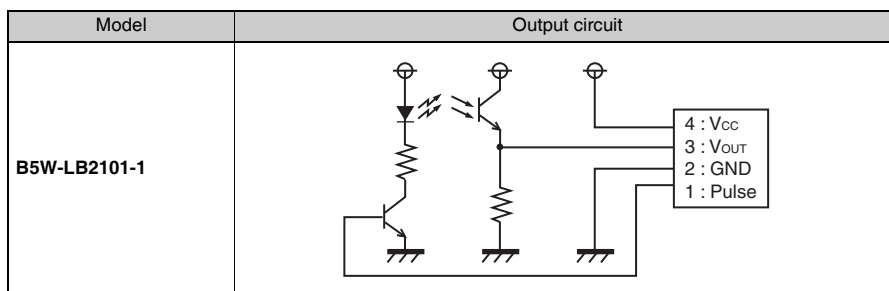
\* Frequency = 500 Hz (duty = 40%), input voltage = 5.0 V

Output voltage without reflector = 0 mV

Specified reference plane and mounting surface are as shown Below



## Analog voltage output

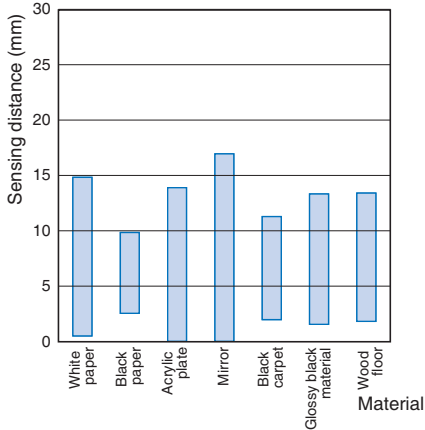


Terminal No.	Name
1.	Pulse
2.	GND
3.	Vout
3. 4.	Vcc

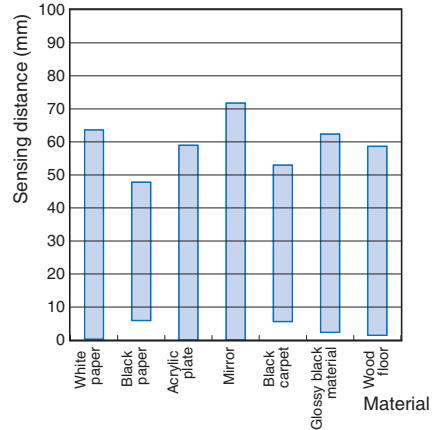
## Engineering Data (Reference Value)

### Distance Characteristics for Various Reflective Objects

**B5W-LB1**

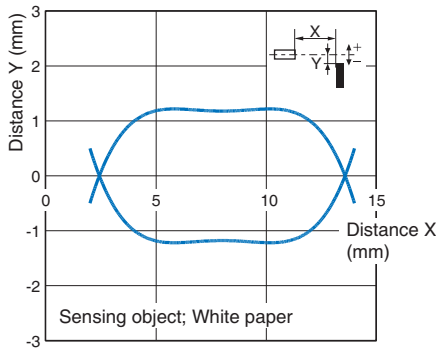


**B5W-LB2**

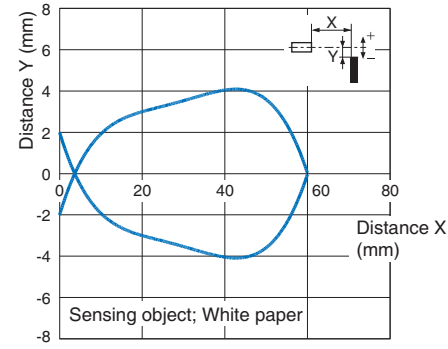


### Operating Range (Left and Right)

**B5W-LB1**

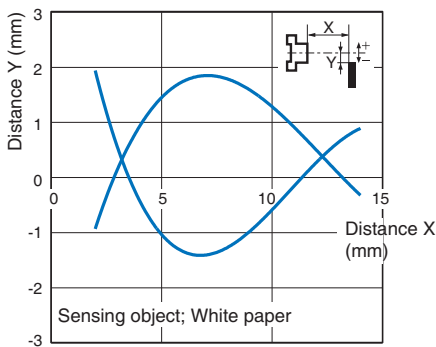


**B5W-LB2**

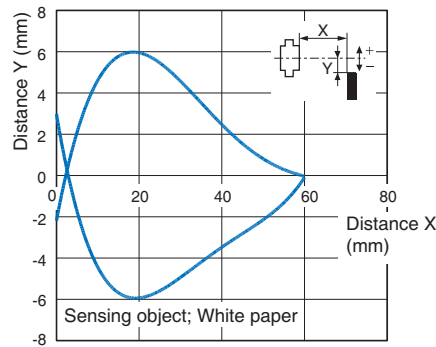


### Operating Range (Up and Down)

**B5W-LB1**

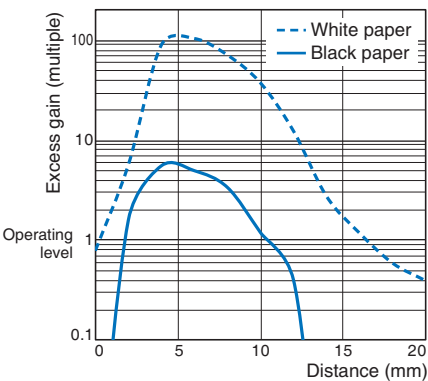


**B5W-LB2**

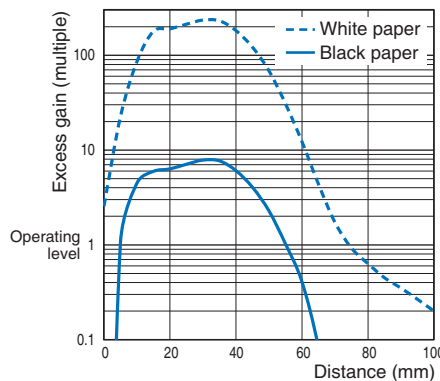


### Receiver Output-Sensing Distance Characteristics

**B5W-LB1**



**B5W-LB2112/LB2122**



**B5W-LB2101**

