

BA SERIES




Miniature Photoelectric diffuse reflective sensor with long detecting distance.

■ Features


- * Easy to mount miniature design□
- * 2 meter sensing distance□
- * Adjustable detection distance 0 - 2 meters□
- * Stability indication for reliable adjustment



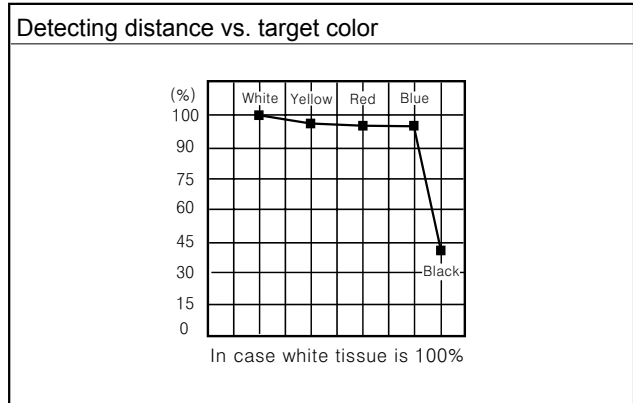
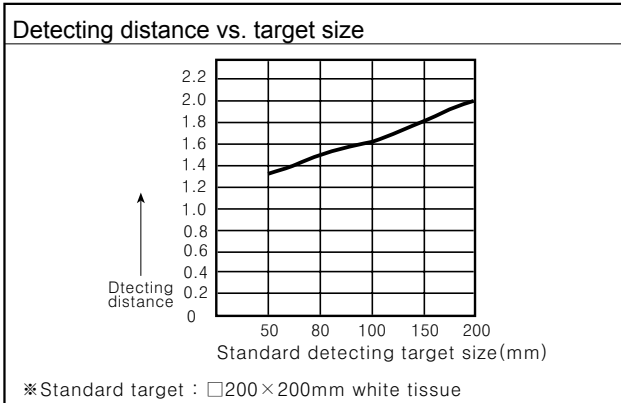
■ Ordering information

Type	Detecting distance	Model	Operating voltage	Operating mode	Output
Diffuse reflective 	 2m	BA2M-DDT	DC 	Light ON type	NPN open collector output

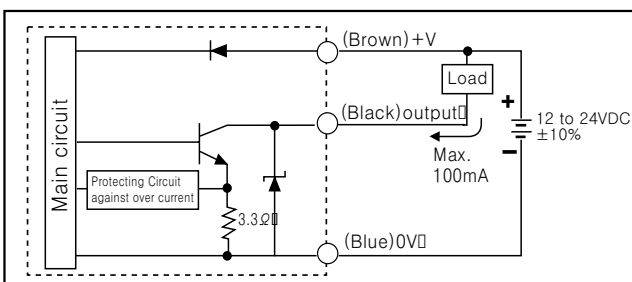
■ Specification

Type	Diffuse reflective
Model	BA2M-DDT
Detecting distance	2M
Detecting target	Transparent, Translucent, Opaque material
Hysteresis	Max. 20% at rated setting distance
Response time	About 1mS
Power supply	12 to 24VDC $\pm 10\%$ (Ripple P-P: Max. 10%)
Current consumption	Max. 15mA, Max. 30mA at on signal
Receiver source	Photo Diode (Built-in IC)□
Light Source	Infrared LED (850nm modulated)□
Sensitivity	Adjustable by VR
Operating mode	Light ON
Control output	NPN open collector output  Load voltage: DC30V Max, Load current: 100mA Max, Residual voltage: 1V Max.
Protection circuit	Reverse polarity protection, output short-circuit protection
Indicator	2 color LED (operation: red, stability: yellow (red+green))
Connection	Cable connection
Insulation resistance	Min. 20M Ω (500VDC)
Noise strength	Power line $\pm 240V$ at pulse band 1 μs of noise simulation□
Dielectric strength	1000VAC 50/60Hz for 1 minute
Vibration	1.5mm amplitude at frequency of 10 to 55Hz in each of X, Y, Z directions for 2 hours
Shock	100m/s ² (10G) in X, Y, Z directions for 3 times
Ambient operation illumination	Sunlight: 10,000 Lux. Max., Incandescent lamp: 3,000 Lux. Max.
Ambient temperature	Operating: -20 to 55°C (non-freezing condition), Storage: -25 to 70°C
Ambient humidity	35 to 85%RH
Ambient protection	IP50 (IEC specification)
Material	Case: PBT, Indicator: PC, Lens: Acryl
Cable	3P, ϕ 3mm, Length: 2M
weight	50g
Accessory	Driver

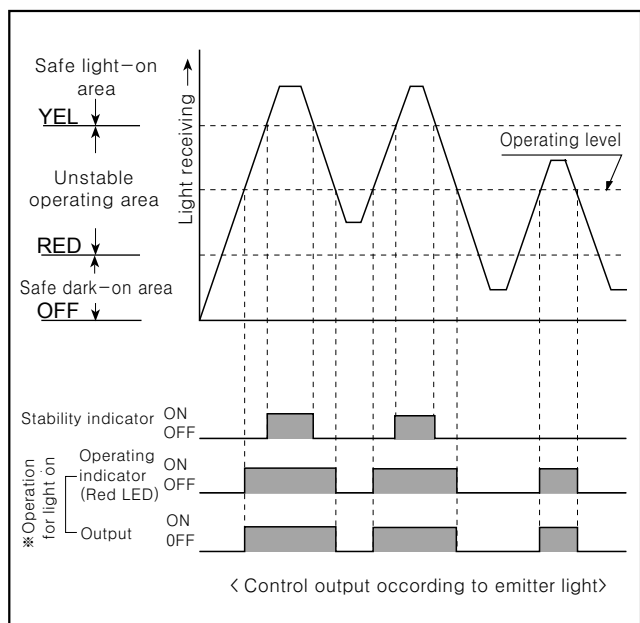
■ Detecting characteristics



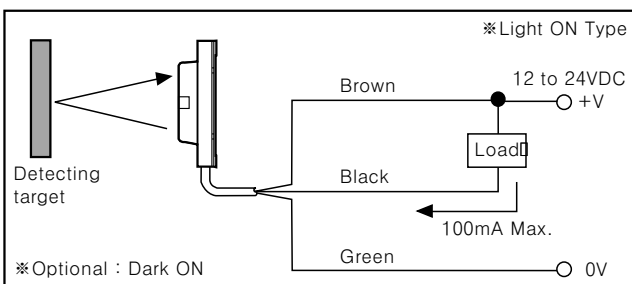
■ Control output circuit



■ Operating & timing chart



■ Connection



■ Dimension

