

**TAKEX**

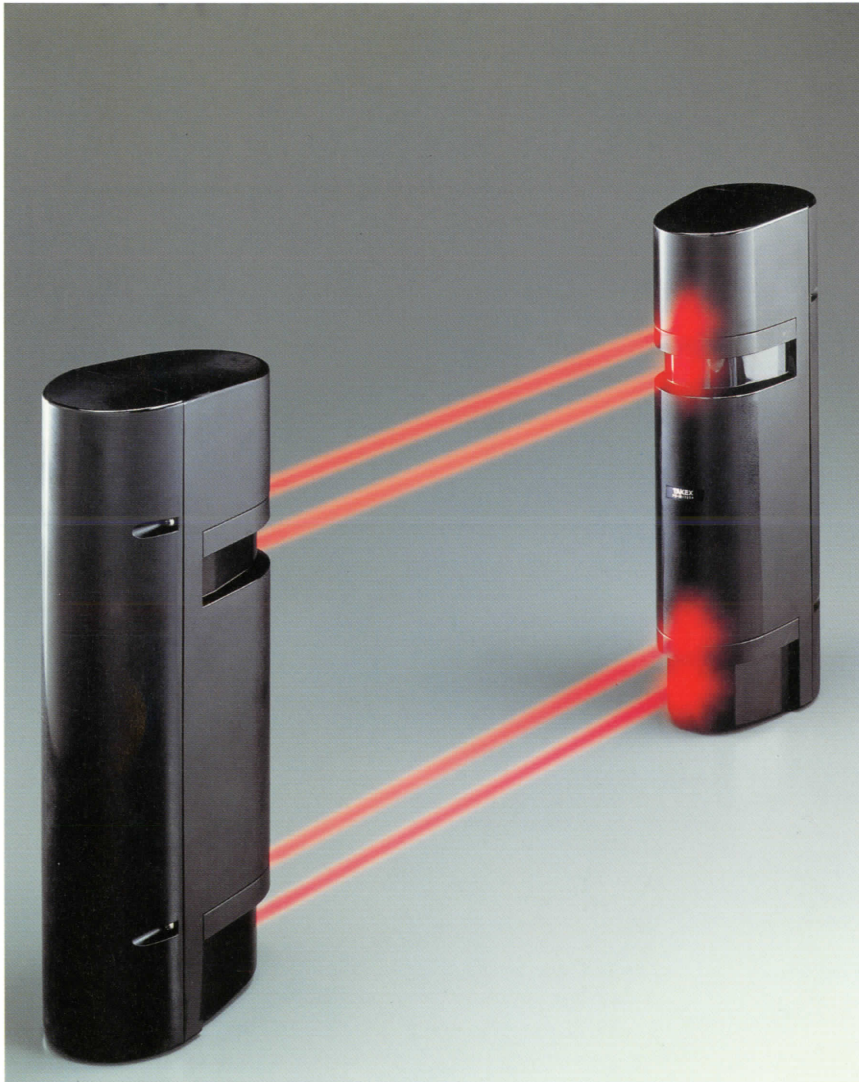
# PHOTOELECTRIC BEAM SENSOR

(4-STACKED SYNCHRONIZED BEAM)

PB-50F :Outdoor 165ft.(50m)

PB-100F:Outdoor 330ft.(100m)

PB-200F:Outdoor 660ft.(200m)



Patent registered : 1, Utility model registered : 7  
Utility model pending : 6, Design pending : 1

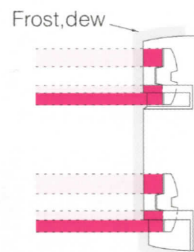
(POLE COVERS SOLD SEPARATELY)



Pole mounting back to back

## PROTECTION AGAINST FROST, DEW, FOG(Utility model)

As a special hood is attached on sensor cover, beam protection continues without interruption though the cover is screened by frost or dew.



## THE EXPERT IN OUTDOOR PROTECTION 4-STACKED SYNCHRONIZED BEAM SENSOR FOR LONG RANGE USE

### 4-STACKED HIGH-POWERED BEAM(Patent)

Double modulation frequency and phased locked loop system offers high power beams that have tenfold maximum arrival distance and a hundredfold maximum sensitivity.

- Excellent tolerance for bad weather (Fog, snow, or heavy rain etc.)
- Anti-external light circuit provides excellent tolerance for sun light, mercury light, fluorescent light.
- Since simultaneous breaking of 4 beams is required to initiate an alarm, the most common causes of false alarms (small animals, birds, falling leaves) are virtually eliminated.

### BEAM LEVEL INDICATION FOR BEAM ALIGNMENT

- Sound check function (Utility model)  
Incorporates speakers in the receiver.  
Sound volume is set to be maximum at the peak of received beam. You can confirm visual and audible beam alignment.
- Attenuation LED  
The LED lights up and informs you of low sensitivity condition when the beam attenuates under a certain level. Convenient for sensitivity check after cover attached.
- Monitor jack to check if the beam level is optimal for beam alignment use.

### INSECT PROTECTION

A sealed optical system prevents interference by insects.

### AGC CIRCUIT

Incorporates AGC circuit that automatically maintains proper sensitivity depending on environmental conditions.

### EXCELLENT NOISE, RFI IMMUNITY

Special noise eliminator system provides excellent RFI and electrical induction noise immunity.

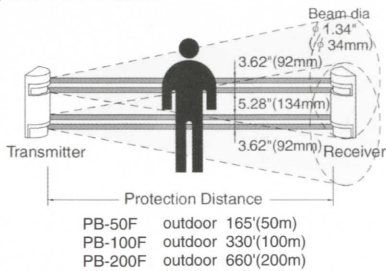
### POLE MOUNTING/WALL MOUNTING AVAILABLE

The unit can be mounted back to back on pole and the protection line can be set at the same height. (Utility model)

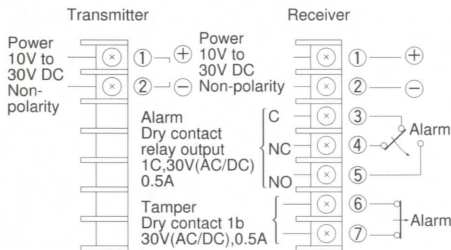
- Wide adjustable range of beam alignment (Horizontally  $\pm 90^\circ$ , Vertically  $\pm 10^\circ$ )
- Optional accessory available (Heater, pole, housing etc.)
- Tamper output
- Polycarbonate cover provides excellent shock-proof.

# PHOTOELECTRIC BEAM SENSOR

## ■ COVERAGE



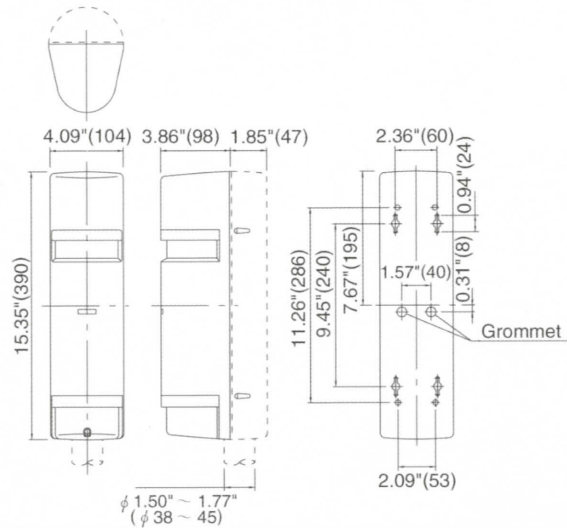
## ■ TERMINAL ARRANGEMENT



## ■ OPTIONAL

- Pole  
KP-100(100cm, 2pcs./set)  
KP-150(150cm, 2pcs./set)
- Pole cover  
BP-200F(2pcs./set)
- Housing case  
KH-120(1pce.)
- Flush mount attachment  
BU-50F(1pce.)  
(with stainless plate)
- Heater(2pcs./set)  
HTF-100(100VAC·200mA/set)  
HTF-24(24VDC·860mA/set)  
(Temperature control switch)
- Pole side cover  
BS-50F(1pce.)

## ■ EXTERNAL DIMENSIONS (Unit:inch(mm))



## ■ SPECIFICATIONS

Type	4-stacked synchronized beam		
Model	PB-50F	PB-100F	PB-200F
Maximum beam range	1650'(500m)	3300'(1000m)	6600'(2000m)
Protection distance	165'(50m) or less	330'(100m) or less	660'(200m) or less
Infrared beam	Wave length 9400Å Double modulation (500Hz to 20kHz)	Wave length 8900Å Double modulation (500Hz to 20kHz)	
Light source	LED (Pulsed beam by LED)		
Response time	50msec.		
Alarm signal	Dry contact relay output form C Contact action : Interruption time + Delay time (Approx. 1 sec.) Contact capacity : 30V (AC/DC) up to 0.5A		
Supply voltage	12V to 30V DC (Non-polarity)		
Power consumption	75mA or less (at 12V DC)		
Tamper signal	Dry contact output 1b (N/C) Contact capacity : 30V (AC/DC) up to 0.5A		
Functions	Sound check, Monitor jack, Attenuation LED, Frost protection cover		
Ambient temperature range	-31°F to +151°F (-35°C to +66°C)		
Mounting position	Outdoor (Periphery protection)		
Connection	Terminals		
Weight	TR./RE 45.5oz (1.3kg) each		
Appearance	Wine red PC resin		

Please note : Units should be tested on a regular monthly basis to keep normal function.

This sensor is designed to detect intrusion and to initiate an alarm; it is not a burglary-preventing device.

TAKEX is not responsible for damage or losses caused by accident, theft, Acts of God (including inductive lightning), abuse, misuse, abnormal usage, faulty installation or improper maintenance.

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