



People Counting System

PCS-100

DESCRIPTION

The PCS100 system is designed to monitor the flow of people into and out of buildings. Using microprocessor technology the system can monitor a single portals and differentiate between people entering and leaving a doorway. Three types of sensor heads are available, a single beam photoelectric, (PSH4), a dual beam photoelectric (PSH6) and a PIR, passive infrared (PSH5).

Normally the single beam and PIR are used in doorways with traffic flow in one direction and the dual beam with bi-directional traffic. The PIR type is used where it is difficult to install a reflector and also for overhead use and can monitor up to a distance of 5 metres from the sensor.



Wall Mounted Display Unit

The counter is programmable and can be set to suit the type of sensor and the installation. The mode of operation is set at installation. The operating modes are shown below for the two models

PCS100-2

- A: One way - Using single way sensor, One count for every break of beam
- B: One Way Divided by 2 - Using single way sensor, One count for every two breaks of beam
- C: Dual One way - One sensor for IN1 (increase count) one sensor for IN2 (increase count)
- D: As C but with divide by two on total
- E: Dual One way - One sensor for IN (increase count) one sensor for OUT (decreases count)

PCS100-1

- A: Two Way - Using two way sensor, Up count one way, Down count in the other direction
- B: Two Way IN only - Using two way sensor, Up count one way, No Down count in the other direction

The display unit is connected to the remote sensor heads using any suitable cables as the voltage used is only 12VDC installation of the system is very simple . The display unit communicates with the sensor head and keeps a tally of either the total of people entering the building over a period or the current occupancy level. The total can be reset using the key operated switch on the side of the unit.

The PCS100 can be hard wired to an AC supply or can use a plug-in power supply for ease of installation The PCS100 provides power to sensor heads. The unit has a 5 decade LED display which can be reset using the key operated switch on the side of the unit. These facilities enable an installation to show the total number of visitors over a time periods or the current number of people in the building.

Accuracy:

The accuracy of the PCS100 system depends on the details of each installation. The software in the counter is designed to eliminate as many errors as possible due to such things as swinging arms but situations where people are walking side by side will cause errors. The control of traffic through the sensors is important for overall accuracy with people walking steadily through in single file with gaps between each person giving the best results.

The positioning of sensors is important for photoelectric beam sensors, both in terms of the position in the flow, so that after a pay booth is better than before where people may bunch up in a queue, and height above the ground, so that set at hip height prevents double counting of legs but may miss small children. However proper installation will give good results in most applications.

The count totals are stored in the PCS100 in non-volatile memory when the power is switched off and restored to the display when next turned on. The memory will last at least 10 years without power.



PCS-100

User Controls

The PCS100 has a RESET switch on the side of the unit that is used to clear the count total as required. This is key operated to prevent unauthorised operation.

Specification

Power Input:	85 - 265 VAC Universal Input (230VAC for separate plug-in supply)
Maximum Count:	99999 (others to order)
Display:	14 mm high red LED digits
Count Memory:	Count totals are stored indefinitely while power is turned off
Controls:	Reset: Key operated, Resets the total to zero
Dimensions:	143 x 88 x 45 mm

Order Code

Display Unit:	PCS100-1 (Two way or single one way sensor) Universal AC Input
	PCS100-2 (Single or Dual one way sensors) Universal AC Input

Add suffix " P " for separate 230VAC plug in power supply unit

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