

Overview

The Protec 6000PLUS/OP is a loop powered fire sensor which reports Smoke levels in its installed location to the fire alarm control panel.

Technical Specification

Loop protocol	Protec Algo-tec™ 6000PLUS
Loop isolator fitted	No
Loop voltage range	18 to 27V Algo-tec™ Protocol
Loop average quiescent current (24V loop)	0.2 mA
Loop average alarm current (24V loop)	2.0 mA
Analogue values	Smoke
	Normal 40 to 60 bits
	Fault Low <35 bits Fault low High>90 bits
Indications	On-board red indicating LED
Environmental operational limits	-10 to 50 degrees C (95% RH no condensation or icing)

Installation

- Base options: 6000PLUS/BASE LPCB Approved as part of product approval
6000PLUS/FFBASE LPCB Approved as part of product approval
28-075-01 (Plug and Play Fast Fix) LPCB Approved as part of product approval
28-075-02 (Plug and Play Surface) LPCB Approved as part of product approval


Note: See individual information sheets for base wiring details.

- Install the detector in the base, turn firmly clockwise.

Commissioning

- Each 6000PLUS detector has a unique serial number which will be used as part of the commissioning of the fire alarm system. It is necessary to remove one of the 'peelable' bar code labels present on the product and place it in the commissioning booklet supplied with each Protec addressable control panel. The bar code sticker should be placed at the relevant loop and address position intended. It is important that serial numbers are not mixed otherwise the addressing of the 6000PLUS/OP will be incorrect when commissioned.
- Commission the device onto the system as detailed in the installation and commissioning manual for the fire alarm panel being used.

6000PLUS/OP Certification Details

EN Standards Compliance/ Approvals table
 0 8 3 2
Protec Fire Detection plc, Nelson, Lancs 10 0832-CPD-1168
EN 54 –7 Point type smoke detector 6000PLUS/OP
Technical Data included in this datasheet DEL2092 Issue 4

High sensitivity	Medium Sensitivity	Low Sensitivity
Not approved.	EN 54-7: 2000 + A1: 2002 + A2: 2006	Not approved.

6000PLUS Locking Mechanism

The 6000PLUS detector range has a break off bridging piece shown in diagram one. Removing the small plastic bridging piece will enable the locking mechanism, and when the detector is fitted on a base, it will lock the detector. See diagram 1.

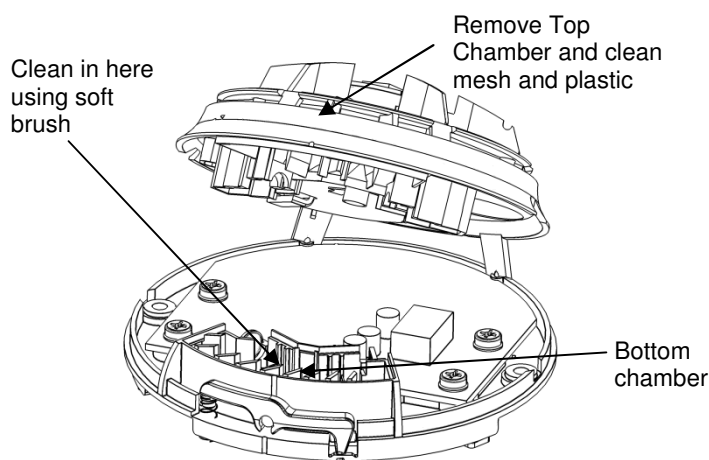
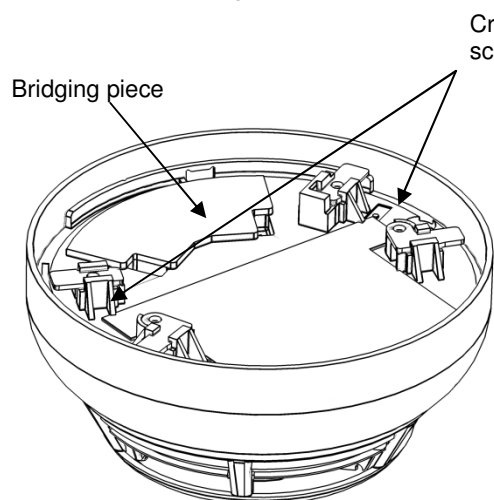


Diagram 1 - Locking bridging piece and cross head screw position

Diagram 2 - Outer case removed exposing optical chamber

6000PLUS/OP Service and Maintenance details

- Remove Detector from its base, check panel for Zone fault.
- Remove two cross head screws shown in diagram 1.
- Remove detector outer case
- Remove Deflector and top chamber moulding, keeping mesh in place on top chamber. Ensure light pipe does not get lost.
- Clean all mouldings and mesh with a soft brush, clean inside the bottom chamber with soft brush (see Diagram 2).
- Clean deflector with soft brush
- Clean detector outer case with a cloth.
- To rebuild, first fit deflector to top chamber noting arrow position to centre of optical chamber. Ensure mesh is flat to top chamber moulding. Ensure Light pipe is in place.
- Ensure both lenses are in place on bottom chamber moulding.
- Fit top chamber/deflector assembly to bottom chamber
- Fit detector outer case, using light pipe as orientation guide.
- Fit the two cross head fixing screws, tighten sufficiently to compress mouldings, but be aware over tightening may strip the thread on the outer case. Visually inspect.
- Fit back onto base. Once detector logged back onto panel, wait for confirmation LED flash, then apply smoke to the detector ensuring activation of control panel.
- Remove old service label and fit new label to detector.