

ALK-AS



Product Overview

Hochiki's new photoelectric smoke detector supports Hochiki's GTP protocol. The ALK-AS can give a very fast response by means of transmission INTERRUPT of the normal polling thus, priority attention in the event of device activation.

Features

- 1. More accurate fire detection allows greater distinction between real and false events. The ALK-AS has its loop address set between 1 & 127. The detectors address is stored in non-volatile memory.
- 2. Through fully digital, asynchronous communication, the detector can give a very fast fire alarm by means of interrupt of the normal polling thus, priority attention in the event of device activation.
- 3. Can support a low power operation mode for current saving.
- 4. All analogue data is synchronized by means of A/D conversion commands from the control panel.
- 5. ALK-AS accommodates a remote LED terminal and a monitoring LED. These functions can be separately controlled by commands from the control panel.
- 6. Fire test can be controlled by commands from the control panel.
- 7. Alarm & pre-alarm levels can be set by commands from the control panel.
- 8. ALK-AS has been designed with a one piece outer cover which gives an aesthetically pleasing modern low profile shape. Twin fire alarm LED's give 360° viewing.

Principle of Operation

The ALK-AS has an 8 bit microprocessor and can read transmission signals from the control panel, including paging signals, fire test signals, and alarm lamp turn on signals. These transmission signals are transmitted as digital signals which change the power source voltage between 39.5V (high) and 31.0V (low). In addition, the ALK-AS returns an analogue value corresponding to the smoke density from the detector using a digital signal. When polled from the control panel, the ALK-AS returns the last analogue value. The fire alarm level is sent from the control panel to the ALK-AS in advance. When the detected smoke density exceeds this level, the detector sends a fire signal and, as a rule, the control panel stops polling and performs fire detection processing by priority.



ALK-AS Specifications

Supply Voltage Range	Absolute Maximum Voltage (V _H)	41V DC
	VLow	17V - 31V
	Pulse Voltage	7V - 9V
Current Consumption	Quiescent	390μA (Typ)
	Low Power Mode 0.75s Polling	120μA (Typ)
	Low Power Mode 1.5s Polling	110μA (Typ)
	Current in polling	22mA ±20%
	Current in Alarm	36mA
	Surge Current	40mA (for 50ms)
Smoke Density Range		0 ~ 4.5%/m
Fire Test Level		4.5%/m
Operating Ambient Temperature Range		$-10^{\circ}\text{C} \sim +50^{\circ}\text{C}$
Storage Temperature Range (≤80% RH at 60°C)		−30°C ~ +60°C
Dimensions		Ø100mm x 48mm
Weight		Approximately 100g
Colour		Off White
Applicable Standard		AS7240.7-2004
SSL Listing Number		AFP-2014

