

FIK-W-PHOTO, FIK-W-ACCLIMATE, FIK-W-HEAT-ROR, FIK-HEAT SWIFT[®] Wireless Detectors

The wireless detectors are intelligent (addressable) detectors that provide secure, reliable communication to the Fire Alarm Control Panel (FACP) across a Class A mesh network. Wireless detectors create an opportunity for applications where it is costly (concrete walls/ceilings, buried wires), obtrusive (surface mount conduit), or possibly dangerous (asbestos) to use traditional wired devices. In addition, both wired and wireless devices can be present on the same FACP, providing an integrated wired/wireless solution for increased installation potential.



The SWIFT detection line includes a photoelectric, Acclimate[®], standard fixed heat, and rate-of-rise heat detectors. The photoelectric detectors transmit a digital representation of smoke density through a wireless mesh to a gateway and then to the FACP. The Acclimate detectors combine a photoelectric chamber and a 135°F fixed temperature heat detector. Acclimate can also transmit an alarm signal due to heat per UL 521. The fixed heat detector and rate-of-rise detectors utilize sensors designed for open area protection with 50-foot spacing capability as approved by UL 521.

All sensors offer addressable code wheels and two LEDs. The LEDs are controlled by the panels. Operation modes include red, green, and amber colors with various solid or blink patterns.

The mesh network within the SWIFT system creates a child-parent relationship between the devices. Each device has two parents providing a second path for communications on every device. If one device can no longer operate for any reason, the rest of the devices can still communicate with each other, directly or through one or more intermediate devices.

The SWIFT system also engages frequency hopping to prevent system interference, whether intentional or accidental.

The devices communicate across the mesh network through a gateway to the FACP. The FACP views the SWIFT wireless device and another addressable device on the system providing similar detection functions and outputs as a wired counterpart. In addition, both wired and wireless devices can be present on the same FACP to meet a given application's needs. A SWIFT wireless system can use any combination of modules, smoke and heat detectors, pull stations, and A/V bases.

COMPATIBLE CONTROL PANELS

- FCP-75
- FCP-300 / FCP-300ECS
- FCP-2100 / FCP-2100ECS
- RFCP-2100

APPROVALS

Each device complies with part 15 of the FCC rules, meaning operation is subject to two conditions:

- 1) The device may not cause harmful interference, and
- 2) The device must accept any interference received, including interference that may cause undesired operation.

The listings and approvals below apply to the basic intelligent wireless detectors. Certain devices may not be listed by certain approval agencies or listing may be in process in some cases. Consult the factory for the latest listing status.

- UL Listed; UL 864 and UL 268
- Factory Mutual Approved
- CSFM
- FCC ID: AUBWFSSD

For exact certification listings, please reference the respective agency website.

SPECIFICATIONS

PHYSICAL / OPERATING	
Height:	2.4 inches (61 mm), installed in B210W base
Diameter:	6 inches (152 mm), installed in B210W base
Device Weight (includes four batteries):	9.2 oz (261 g), installed in B210 base
Operating Temperature Range:	Photo: 32°F to 120°F (0°C to 49°C) Acclimate with Heat: 32°F to 100°F (0°C to 38°C)
Air Velocity:	Acclimate with Heat: 0 – 4,000 fpm (0 – 20 m/sec)
Operating Humidity:	10% to 93% RH, non-condensing
Thermal Ratings:	Fixed Temperature Set Point: 135°F (57°C) Rate-of-Rise Detection: 15°F/min (8.3°C/min)
ELECTRICAL	
Radio Frequency Range:	902 – 928 MHz
Battery Type:	4 Panasonic® CR123A or 4 Duracell® DL 123A
Battery Life:	Two years (replace battery upon BATTERY LOW or BAT LOW display and/or during annual maintenance)

ORDERING INFORMATION

Part Number	Description
FIK-W-PHOTO	Intelligent, wireless photo detector. Requires one B210W base for installation. Requires (4) CR-123A batteries (included).
FIK-W-ACCLIMATE	Intelligent, wireless Acclimate® heat and photo detector using combined heat and smoke sensor information and the ability to automatically adjust sensitivity based on ambient changes in the environment. Requires one B210W base for installation. Requires (4) CR-123A batteries (included).
FIK-W-HEAT-ROR	Intelligent wireless rate of rise (135°F) heat detector. Requires one B210W base for installation. Requires (4) CR-123A batteries (included).
FIK-W-HEAT	Intelligent wireless fixed-temperature (135°F) heat detector. Requires one B210W base for installation. Requires (4) CR-123A batteries (included).
FIK-W-WGI	Wireless SWIFT Gateway. One SWIFT Gateway is required for each wireless mesh and supports up to 49 SWIFT detectors or modules. Connects to the SLC loop of a compatible panel using FIK-IDP protocol. Power may be supplied by the SLC circuit or via an optional 24 VDC input.*
FIK-W-MONITOR	Wireless monitor module. It is used to monitor devices with mechanical contact actuation. Includes a special cover with a built-in tamper magnet. It is recommended for installation in a SMB500-WH box (ordered separately) rather than a metal backbox for best performance. Requires (4) CR-123A batteries (included).
FIK-W-RELAY	Wireless relay module for use with the FIK-W-WGI wireless gateway. Includes a special cover with a built-in tamper magnet. It is recommended for installation in a SMB500-WH box (ordered separately) rather than a metal backbox for best performance. Requires (4) CR-123A batteries (included).
FIK-W-PULL-DA	Wireless addressable pull station. Requires (4) CR-123A batteries (included).
WAV-CRL, WAV-CWL	SWIFT Wireless Addressable A/V bases. Required (8) CR-123A batteries (included). Requires a non-compact ceiling System Sensor® L-series notification device (ordered separately).
W-SYNC	Wireless sync module. Requires (4) CR-123A batteries (included).
SMB500-WH	Optional surface-mount back box.
B210W	Detector base used for wireless detectors. Includes a built-in magnet so that wireless devices can establish installed and tampered states.
SWIFT Tools	Programming and diagnostic utility.
W-USB	Wireless USB radio/antenna dongle that plugs into the USB port of a PC running SWIFT tools. Provides a communication link with the SWIFT Wireless devices.
W-BATCART	Wireless battery cartridge. 10-pack. For use with wireless pull stations and A/V bases.

*Use of the 24 VDC input may be more convenient for service as it allows for powering down a gateway without shutting down an SLC loop.