



## DESCRIPTION

The Suppression Disconnect is a keyed switch that enables the operator to put the suppression release circuit that the switch is connected to in a “**DISARMED**” condition. It electrically isolates the connected releasing device from the associated control panel’s releasing circuit. This allows the operator to work in the area protected by the suppression system without accidentally releasing the system.

## ORDERING INFORMATION

The switch can be ordered with or without status LEDs (Green – ARMED and Red – DISARMED). The LEDs provide positive indication of the status of the releasing circuit. LEDs require 24 VDC auxiliary power from the associated control panel for operation.

## PART NUMBERS

10-2698 Suppression Disconnect Switch, no LEDs  
 10-2699 Suppression Disconnect Switch, w/ LEDs

## COMPATIBILITY

The Suppression Disconnect switch is compatible with all Fike intelligent control panels. The disconnect switch is compatible with “Class B” style releasing circuits only. Do NOT attempt to install this product on “Class A” style wiring. The switch can be used in conjunction with Fike’s Agent Release Module (ARM), Impulse Release Module (IRM), or standard releasing solenoids used for sprinkler or carbon dioxide suppression systems.

## SPECIFICATIONS

Input Voltage:	15 – 30 VDC
Current Consumption:	13.1 mA (LED active)
Circuit Limitations:	Class B only
Dimensions (LxWxD):	4.5 in. x 4.5 in. x 2.125 in. (11.5cm x 11.5cm x 5.4cm)
Weight:	0.55 lb. (0.25 kg)
Operating Temp:	0° to 49° C (32°to 120° F)
Operating Humidity:	93% RH
Contact Ratings:	8A @ 24 VDC Resistive 4A @ 24 VDC Inductive

## LISTINGS AND APPROVALS

UL S3217  
 FM Pending



**Exhibit 1: Suppression Disconnect Switch with Status LEDs**

## OPERATION

### Armed Mode

With the key switch in the ARMED (normal) position, the release device is connected to the associated control panel’s releasing circuit. In this position, the switch does not interfere with panel supervision of the releasing circuit or releasing operations. The green LED on the faceplate illuminates steady to indicate the ARMED status of the circuit.

**Note:** The key can only be removed in the ARMED position.

### Disarmed Mode

With the key switch in the DISARMED (maintenance) position, the connected release device is electrically isolated from the releasing circuit and will not activate when the associated control panel enters the *Release State*. A trouble and supervisory event will be displayed on the associated control panel to indicate the open circuit. The green LED on the faceplate will turn off and the red LED will turn on to indicate the **DISARMED** status of the circuit.

### STOP WARNING

Both the ARM and IRM modules utilize capacitors to store a charge for releasing the suppression system. Before servicing the system, wait 10 minutes for the capacitor’s charge to dissipate.

## SAFETY NOTICES

Read all of the following safety notices before attempting to install or use this device. Personal injury or accidental release of the suppression system may result if the following instructions are not followed.

### WARNING

1. The SHP, SHP-Pro, Rhino, and Intella-Scan control panels are equipped with an ARM/DISABLE switch for the releasing circuit(s). If using the Agent Disconnect switch with these panels, the ARM/DISABLE switch on the panel must be in the ARM position for the switch to operate properly. DO NOT use the ARM/DISABLE switch simultaneously with the Agent Disconnect switch.
2. A manual actuator can also be used to fire the GCA's connected to an ARM. It is extremely important to make sure the GCA is not connected to a manual actuator before considering the circuit "DISARMED".

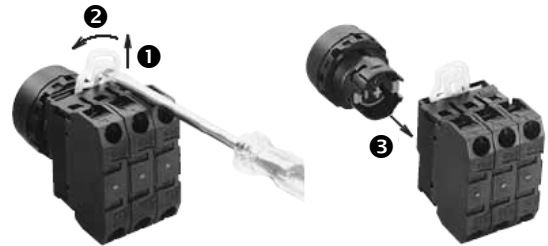
### Caution

1. Only release devices that are connected to the Agent Disconnect switch will be disconnected by the user operated key switch.
2. The Agent Disconnect switch DOES NOT remove the firing charge stored in the ARM or IRM capacitors. It removes the charging current to the releasing circuit and allows time for the capacitors to de-energize until there is insufficient energy to activate the releasing device.

## SWITCH ASSEMBLY

The disconnect switch is shipped unassembled and must be assembled in the field using the following instructions:

1. Remove the switch components (faceplate and switch) from the shipping package.
2. Remove the operator from the contact block by pulling up the locking lever and turning it to the left as shown in Exhibit 2.

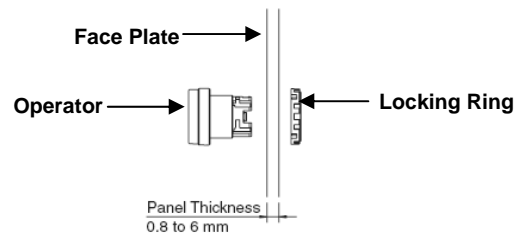


- 1 Pull up the locking lever.
- 2 Turn the lever to the left.
- 3 Pull out the contact block.

**Exhibit 2: Removing and Installing the Contact Block**

**Note:** Switch contacts will transfer to the ENABLED position when the operator is removed from contact block.

3. Remove the locking ring from the operator and insert the operator into the switch faceplate from the front as shown in Exhibit 3. Reinstall the locking ring onto the operator from the back and tighten with pliers or locking ring wrench (02-12318), making sure that the TOP marking on the operator is aligned with the top center of the faceplate.



**Exhibit 3: Operator Installation**

4. Insert the operator into the contact block making sure that the Idex marking on the contact block is facing the same direction as the TOP marking on the operator. Turn the locking lever to the right.

## SWITCH INSTALLATION AND TESTING INSTRUCTIONS

The Suppression Disconnect switch is installed into the releasing circuit between the associated control panel or releasing module and the releasing device itself.

The following steps must be followed in order to properly install and test the operation of the agent disconnect switch. Failure to follow these steps could result in improper operation or accidental release of the suppression system.

### Installation and Testing Steps:

1. Disconnect releasing circuit(s) from the host control panel or releasing module. If applicable, allow 7-10 minutes for capacitor charge on the ARM or IRM module(s) to dissipate.
2. Disarm the suppression system following the recommended procedure for each type of releasing device (ARM/IRM). For releasing solenoids, disconnect the coil operator from the valve.



**Note:** Refer to Fike documents 06-106 and 06-552 respectively for ARM and IRM disarming procedure.

3. Select appropriate location for mounting switch and secure back-box to wall with suitable anchors.

### **Back Box Options**

#### Switch without LEDs

For surface mounting, use a two-gang masonry box (Raco 691 or equal) with a depth of 2.5" (6.35cm). For flush mounting, use a two-gang mud ring (raised 1/2" minimum) on a 4 in square x 2-1/8" deep box.

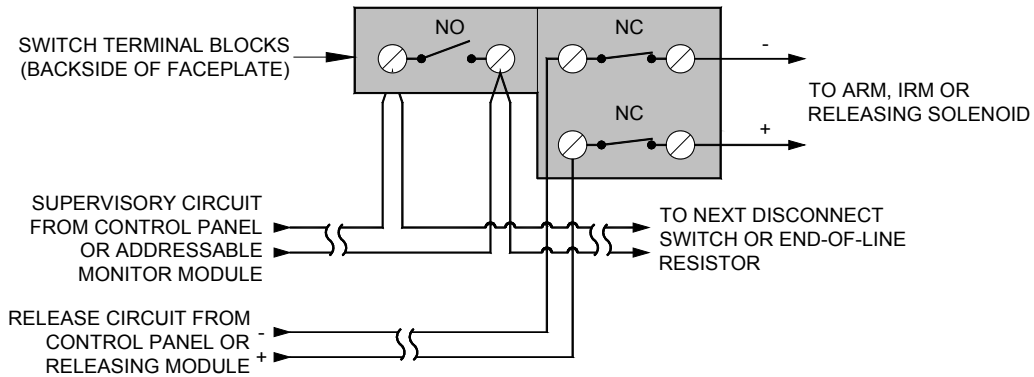
#### Switch with LEDs

For surface mounting, use a two-gang masonry box (Raco 696 or equal) with a depth of 3.5" (8.89cm). For flush mounting, use a two-gang mud ring on a 4 in square x 3-1/2" deep box (Raco 256 or equal).

4. Route conduit and field wiring (i.e., releasing circuit, auxiliary power and supervisory circuit) into back-box. Verify that wiring is free from ground fault or short-circuit conditions before proceeding.
  5. Connect field wiring to appropriate terminals on the switch contact block as shown in Exhibits 4 and 5, making sure to observe circuit polarity.
  6. Reconnect releasing circuit(s) to the host control panel or releasing module. Do NOT reconnect releasing devices (i.e., ARM, IRM or Solenoids) at this time.
  7. Functionally test the operation of the disconnect switch in both the ARMED and DISARMED modes following the recommended procedure for each type of releasing device (ARM/IRM). Correct any problems before proceeding to next step.
  8. Disconnect releasing circuit(s) from the host control panel or releasing module and allow 7-10 for capacitor charge on the ARM or IRM module(s) to dissipate if applicable.
  9. Attach the disconnect faceplate to the back-box with supplied mounting screws and turn key switch to DISARMED position.
  10. Rearm the suppression system(s) following the recommended procedure for each type of releasing device (ARM/IRM). For releasing solenoids, reconnect the releasing circuit to the control panel or releasing module.
- Note:** Refer to Fike documents 06-106 and 06-552 respectively for ARM and IRM arming procedure.
11. Turn the key switch to the ARMED position. The system is now operational.

### **SPARE PARTS**

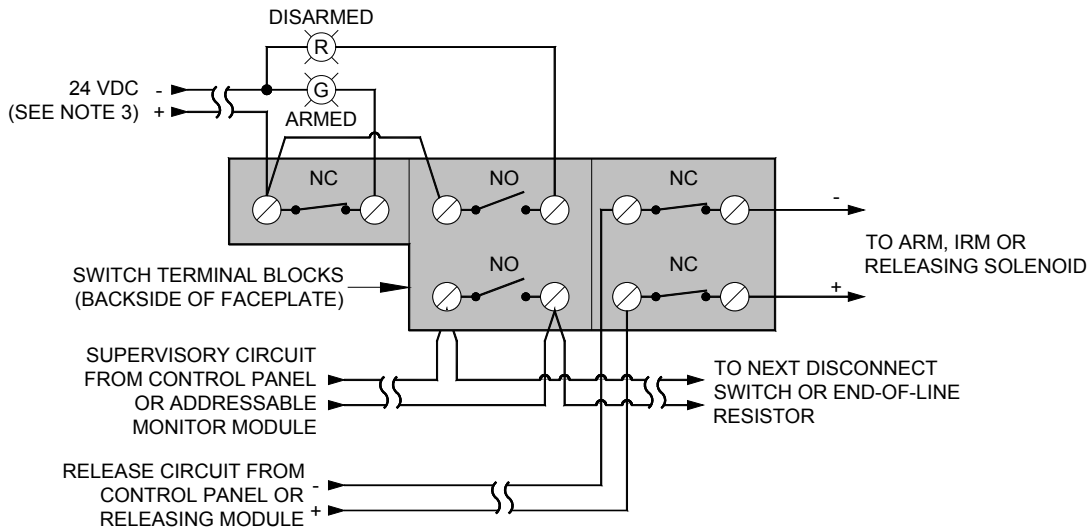
02-12294	Double contact block (2 NC)
02-12295	Double contact block (2 NO)
02-12296	Replacement keys
02-12297	4 block switch
02-12298	5 block switch
02-12300	Single contact block (NO)
02-12314	2 block switch
02-12315	3 block switch
02-12316	Single contact block (NC)
02-12317	Double contact block (1 NC / 1 NO)
02-12318	Locking ring wrench
02-3013	Green LED
02-3009	Red LED
02-1553	2.2K, .5W, 5% resistor
10-2714	Cover plate w/o LED holes
10-2713	Cover plate with LED holes



**NOTES:**

1. WIRING DIAGRAM SHOWS SWITCH IN ARMED POSITION.
2. ALL WIRING SHOWN IS SUPERVISED AND POWER LIMITED.

**Exhibit 4: Wiring Diagram of Switch without LEDs**



**NOTES:**

1. WIRING DIAGRAM SHOWS SWITCH IN ARMED POSITION.
2. ALL WIRING SHOWN IS SUPERVISED AND POWER LIMITED.
3. 24 VDC POWER TO SWITCH LEDs SHALL COME FROM THE ASSOCIATED CONTROL PANEL OR FROM A BATTERY BACKED 24 VDC, REGULATED, POWER-LIMITED POWER SUPPLY LISTED FOR FIRE PROTECTIVE SIGNALING USE.

**Exhibit 5: Wiring Diagram of Switch with LEDs**