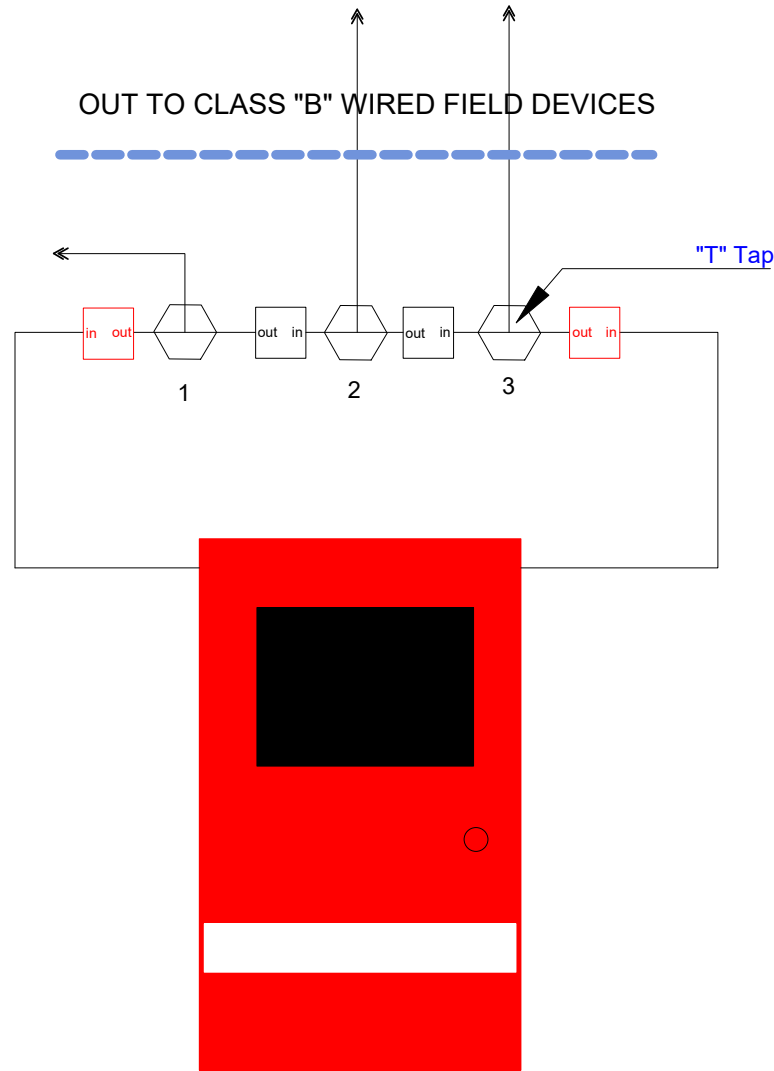


# ISOLATOR WIRING METHODS FOR CLASS "B" WIRED FIELD DEVICES

WIRING METHODS ARE APPLICABLE TO DATA COMMUNICATION LOOP ISOLATORS AS WELL AS POWER BUSS ISOLATORS - INTENDED USE OF ISOLATORS IS TO LIMIT THE LOSS OF COMMUNICATIONS WITH (OR POWER TO) FIELD DEVICES TO A SINGLE FLOOR AREA.

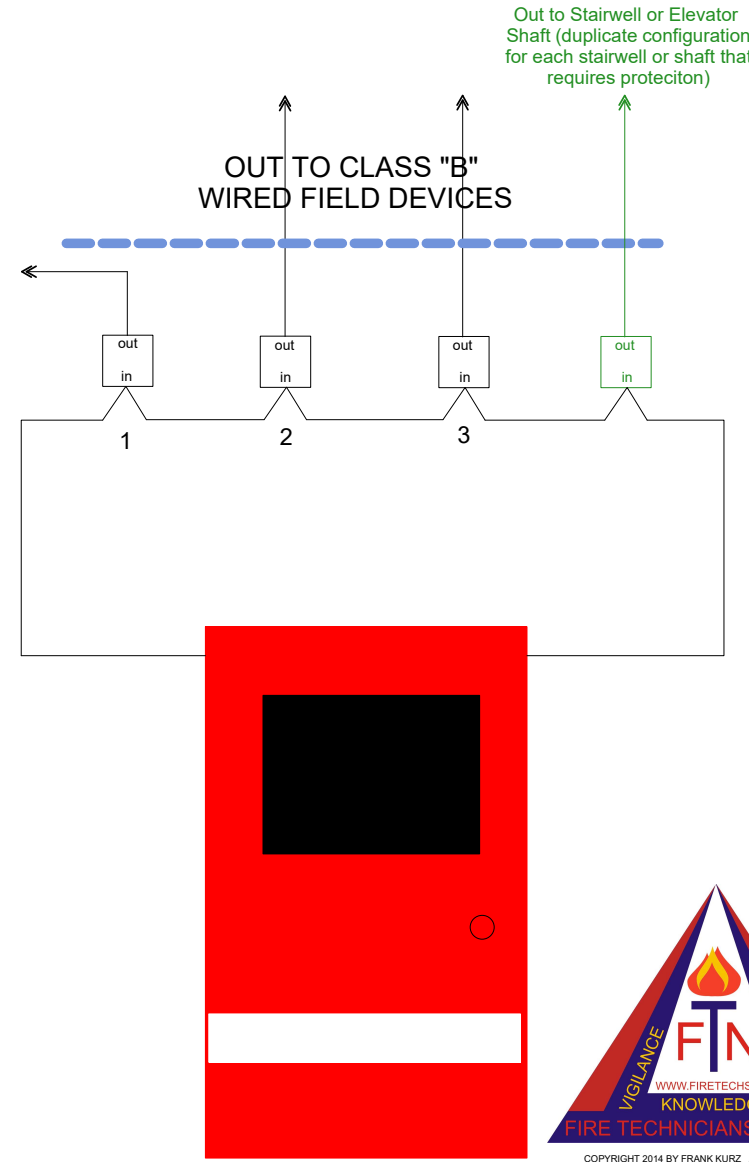
**NOTE: ISOLATORS SHOWN IN RED ARE NOT REQUIRED IF THE CONTROL PANEL EMPLOYS INTEGRAL DATA LOOP ISOLATORS.**

**NOTE: ISOLATORS SHOWN IN BLUE ARE RECOMMENDED IF UNI-DIRECTIONAL UNITS ARE DEPLOYED IN THE DATA OR POWER BUSS LOOP .**

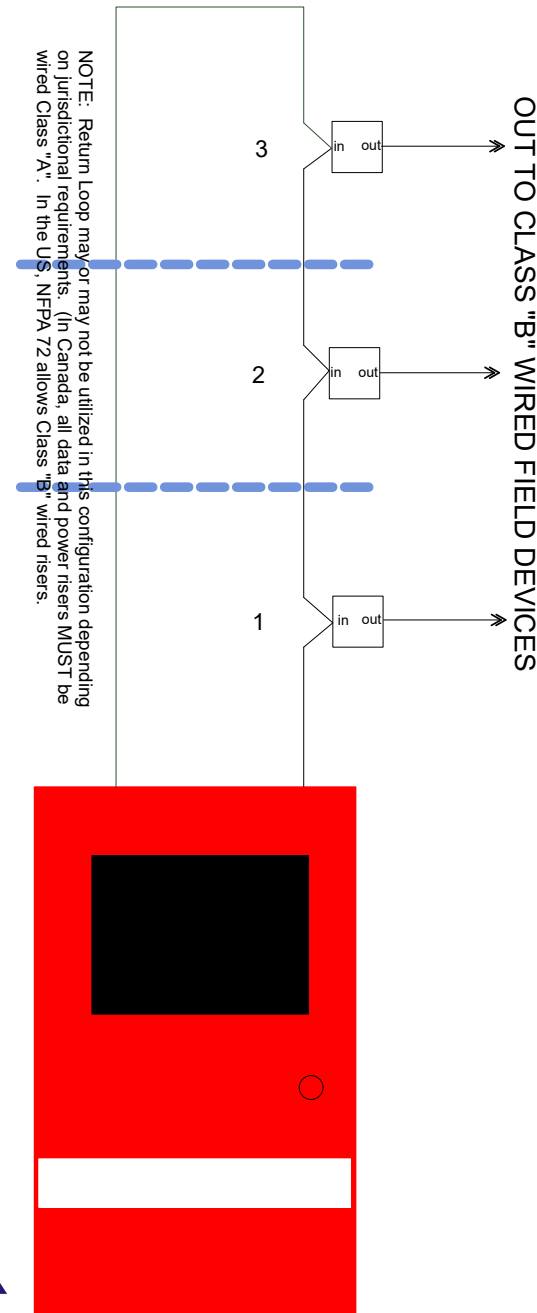


**INCORRECT METHOD PUBLISHED IN CAN/ULC-S524-14 FOR WIRING CLASS "B" LOOPS HOME-RUN TO THE FIRE ALARM CONTROL PANEL**

**NOTE:** For isolators employing a uni-directional communications protocol, the only loop which functions correctly in this diagram is #1. A short imposed on #3 will take down the entire data loop. A short imposed on #2 will take down both #1 and #2.

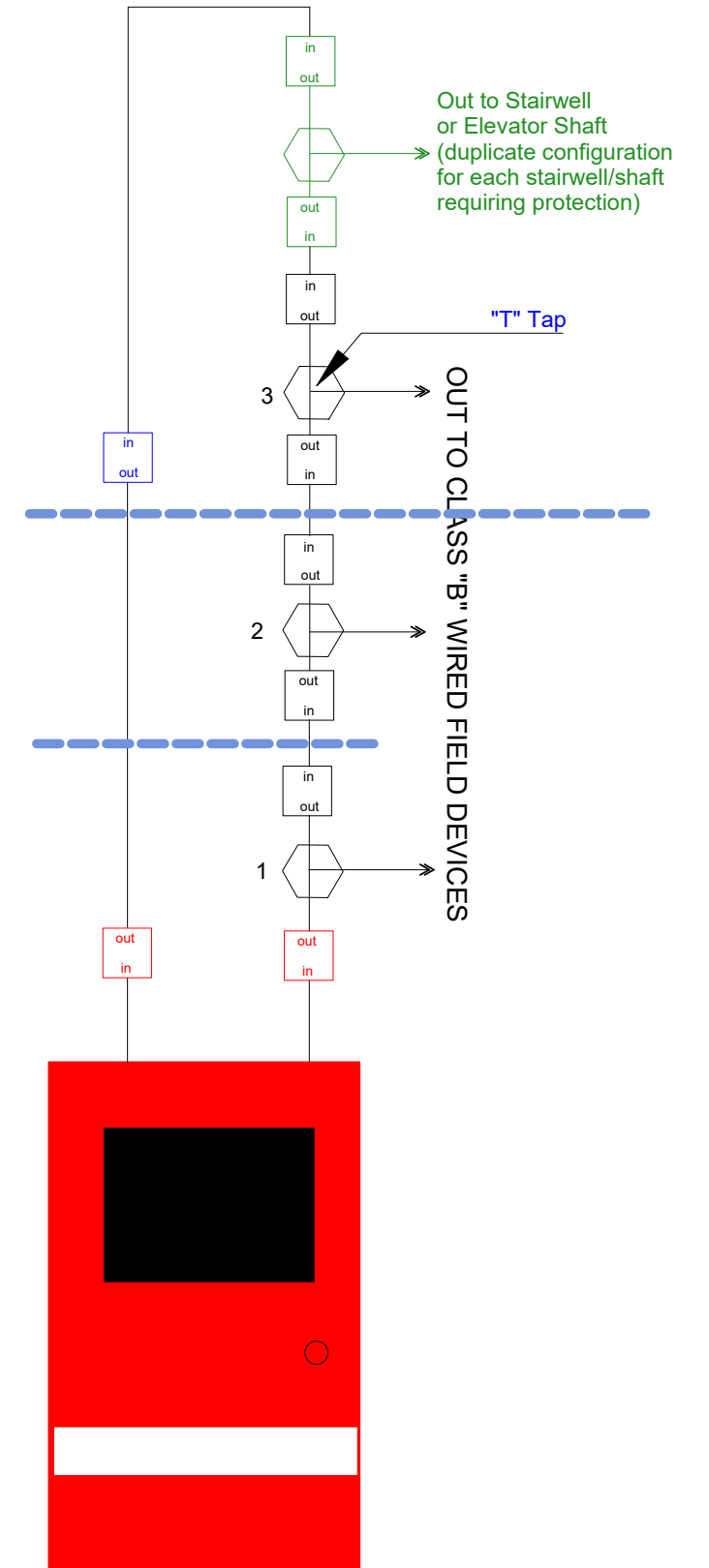


**CORRECTED METHOD IN AMENDMENT ONE OF CAN/ULC-S524-14 FOR WIRING CLASS "B" LOOPS HOME-RUN TO THE FACP (LOCATED IN THE SAME ROOM AS THE FACP). ALL STYLE "A" WIRING IS INSTALLED IN RIGID METALLIC CONDUIT (EMT). ISOLATORS MAY BE INSTALLED IN AN APPROVED ENCLOSURE LOCATED ADJACENT TO THE COMMON CONTROL OR MOUNTED IN ACCORDANCE WITH THE MANUFACTURER'S PUBLISHED INSTALLATION INSTRUCTIONS.**



**INCORRECT METHOD WIDELY CONSIDERED "ACCEPTABLE" FOR PROTECTING CLASS "B" DCL CIRCUITS IN A FLOOR AREA.**

**NOTE:** A short imposed anywhere on the riser will take down the entire data loop in either a Class "A" or Class "B" configuration.



**PROVIDES MAXIMUM PROTECTION FOR CLASS "A" STYLE "C" DCL RISER AND CLASS "B" CIRCUITS IN A FLOOR AREA (ISOLATORS SHOULD STILL BE LOCATED IN AN ELECTRICAL CLOSET OR OTHER PROTECTED SPACE ON THE FLOOR).**