Meeting code: arc energy reduction - an important NEC code change for fusible switches

In the 2017 National Electrical Code (NEC), article 240.67 was introduced, providing requirements for fusible devices rated 1200 A and higher to have arc energy reduction capabilities. While the article was introduced in 2017, the code noted that the effective date for the change was January 1, 2020.

To help customers comply, Eaton's switching devices product line has introduced an arc energy reduction relay that will be incorporated into multiple solutions, including shunt trip safety switches, pringle bolted pressure contact switches, and ultimately fusible panelboard switches.

"While we're still waiting on UL approvals, no other manufacturers are as far along on this code change as Eaton," said **John Alexander**, product manager. "We're moving into the final testing and production phase with UL now, but we can self-certify products with the arc energy reduction relay incorporated to customers who have an urgent need for a code-compliant solution."

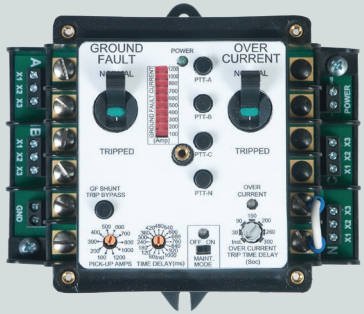
Alexander notes that even for states or municipalities that have not adopted the 2020 NEC, this code change is still applicable since it was introduced under the 2017 NEC with an effective date of January 1, 2020.

The relay is available in two different variations – a standalone relay or a combination relay that offers both arc energy reduction and ground-fault protection.

Regarding arc energy reduction, relays can be put into a maintenance mode that greatly reduces the amount of arc energy available downstream from the device. Additionally, all relays have overcurrent protection that will allow the switch to trip open before fuses clear for specific current ranges.

For customers looking to meet the ground-fault requirement for 480 VAC service entrance applications, the combination relay offering is compliant. For states or municipalities not yet on the 2017 code, a standard ground fault relay factory installed in a 1200 A shunt trip safety switch is another solution for the market offered only by Eaton.

Bid Manager users can currently add the arc energy



reduction relay within the shunt trip safety switch takeoff for fusible devices rated 400 – 1200 A. Look for additional information on the availability of relays for pringle bolted pressure contact switches and fusible panelboard switches later this year.

For more information or for order inquiries, reach out to the Switching Device Flex Center at FlexSwitches@eaton.com or visit Eaton.com/flex. ■