

## **860 – Coldflow in soft-bedded cables – busting some myths and a new solution**

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Abstract: Electrical installations in hazardous areas often require the use of flame resistant or flame retardant cables. Some types of these cables have a soft inner bedding and are at risk of coldflow. As a result they require extra consideration, particularly in the selection of appropriate cable glands. The phenomenon of coldflow is generally not well understood and this has resulted in a number of myths to have developed and also the over-specification of coldflow 'solutions' where they are not needed.

This paper will explain coldflow correctly and demonstrate how it can be identified. It will also discuss the selection of appropriate cable glands and then reveal an entirely new approach and the testing that has been done to verify this solution. This includes testing to Annex E of IEC 60079-14 together with actual flame transmission tests to verify the correlation between the two.