

Press release

New round SKINTOP® MULTI-M multi-cable entry system with patented graduated cone geometry from LAPP

Gel technology for innovative multi-cable entry systems



The rectangular SKINTOP® MULTI multi-cable entry system is now also available in a round design

The trend towards digitalisation and miniaturisation doesn't stop when it comes to cable entry systems. An increasing number of cables with a small diameter need to be inserted in tight spaces. The solution is a new, round multi-cable entry system from LAPP. Its developers won the Eddie LAPP Award, LAPP's internal innovation prize.

The SKINTOP® MULTI-M multi-cable entry system with metric connection thread enables more cables to be fed through than comparable cable gland solutions. Depending on the size, up to 30 non-assembled cables and media hoses can be inserted into a housing without taking up too much space. The innovation is based on a special gel technology, which is already used in rectangular SKINTOP® MULTI.

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However, to date LAPP's portfolio has lacked a round design, which has been in increasing demand in the market.

The cables are simply pushed through the elastic gel insert and are held securely in place by the static friction on the cable insulation. Foreign bodies such as water cannot get through. The patented graduated cone geometry of the individual entry points also enables the maximum clamping ranges to be increased with up to 4 mm variance per cable diameter. Another advantage is the compact design of the SKINTOP® MULTI-M, which enables a space saving cable configuration. The sizes are designed for metric threads (DIN EN 62444). "Our round multi-cable entry system is unique in the market in this form and is therefore patented. It enables the customer to insert a variety of cables or hoses in a tight space. Unused lead-through points remain permanently sealed", says Benjamin Rentschler, Product Manager at LAPP, who together with developer Daniel Müller was the winner of the Eddie LAPP Award 2020.

One of the new round multi-cable entry system's greatest advantages is its high packing density. With the gel insert, more cables can be fed through the housing wall than is possible using conventional methods. The SKINTOP® MULTI-M is currently available in three sizes, and M25x1.5 and M32x1.5 sizes will be added at the beginning of 2021. The gel material ensures optimum strain relief on the entire cable bundle. There are also time benefits when it comes to installation. As there is no need for additional preliminary work for the rectangular and round multi-cable bushings, for example the pre-piercing to install the cables, several work steps can be omitted.

Applications for round multi-cable entry systems include control, control cabinet and equipment construction and automation technology. The patented multi-cable entry systems with gel technology are particularly advantageous when a large number of non-assembled cables or hoses are inserted into a housing in a small space.

The SKINTOP® MULTI-M conforms to the IP 68 protection standard and, in addition to its gel insert, consists of a polycarbonate frame. This thermoplastic is exceptionally stable. UL certification for the North American market is already in place in compliance with the UL 50, UL 50E, CSA C22.2 and UL 508A standards for industrial control systems (e.g. control cabinets).