

Low-voltage cable trays require no accessories



Overview

Splices join any combination of straight sections and fittings. A series reflects connected component products for individual purchase.

Key Takeaways

Low-voltage cable trays generally require fewer accessories than high-voltage trays, but some components may still be needed for proper installation and cable management.

Low-voltage cable trays are designed to support cables carrying 50 volts or less, such as data, voice, video, and control wiring . Common applications include Ethernet networks, fiber optics, security systems, and building automation . Because these cables are lighter and generate less heat than high-voltage power cables, the trays often do not require heavy-duty accessories like covers or dividers for thermal management .

Accessories Considerations

While low-voltage trays can sometimes be installed without extensive accessories, certain components may still be necessary for safety, organization, and compliance:

- Supports and brackets: Even lightweight trays need secure mounting to walls, ceilings, or racks to prevent sagging and maintain proper alignment .

- Cable ties or separators: For neat routing and to prevent tangling, especially in high-density installations .
- Bend radius management: Accessories like radius elbows or turning fittings help maintain the minimum bend radius for fiber optic or high-performance copper cables .
- Covers (optional): In environments with dust, moisture, or potential interference, solid or ventilated covers may be used, though they are less critical for low-voltage systems compared to high-voltage power trays .

Best Practices

- Plan for future expansion by leaving extra space in the tray, even if accessories are minimal .
- Maintain proper separation from high-voltage cables to avoid electromagnetic interference .
- Use lightweight, flexible tray types such as wire mesh or ventilated troughs for easy installation and modification .

Conclusion

Low-voltage cable trays do not inherently require extensive accessories, but some components like supports, cable ties, and bend-radius fittings are recommended to ensure safe, organized, and code-compliant installations. The need for additional accessories depends on the environment, cable type, and installation complexity .

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