



IS 14927 (Part 2/Sec 1):2023-Cable Trunking Systems and Cable Ducting Systems for Electrical Installations Part 2 Cable Trunking Systems and Cable Ducting Systems Intended for Mounting on Walls and Ceilings Section 1 Particular Requirements

A cable trunking system (CTS) and a cable ducting system (CDS) are structured pathways used in electrical installations to route, protect, and organize cables and wires within residential, commercial, and industrial spaces. They provide a safe and efficient way to manage cables, reducing clutter and minimizing the risk of electrical hazards.

IS 14927 (Part 2/Sec 1): 2023 specifies the requirements for cable trunking systems (CTS) and cable ducting systems (CDS) intended for the accommodation, and where necessary for the electrically protective separation, of insulated conductors, cables and possibly other electrical equipment in electrical and/or communication systems installations with a maximum voltage of 1000V AC or 1500V DC.

The requirements of safety, reliability, durability and flexibility are important quality parameters of CTS and CDS. IS 14927 (Part 2/Sec 1):2023 specifies various requirements for ensuring these aspects. These requirements are addressed through various tests specified in the standard. Mechanical tests i.e. Mechanical Strength, Impact Test, Linear Deflection Test and Compression test ensure that the product withstands the physical stresses, Electrical Tests i.e. Dielectric Strength, Insulation Resistance assess the insulation properties and ensure that the product withstands the electrical stresses, Ball Pressure test and Glow wire test assess the resistance of the product from Heat and Fire, IP tests assess the protection provided by the enclosure of the CTS/CDS from external influences. Marking and documentation requirements ensures proper and safe installation of the product. Additionally, the standard specifies classification of CTS/CDS by installation type providing users with flexibility to match various installation environments.

IS 14927 (Part 2/Sec 1):2023 ensures that CTS/CDS products are not only effective in cable management but also uphold high safety and reliability standards, addressing consumer expectations comprehensively.