

Industrial LSZH™ Tray-Rated, Loose Tube, Gel-Free, Double-Jacket Cable

96 F, 62.5 μm multimode (OM1)

CORNING

Corning LSZH™ industrial fiber optic cables are designed for industrial building backbones and harsh environments atypical of traditional datacom systems. Based on proven stranded loose tube cable designs, these industrial cables are flame-retardant and have been tested to meet mechanical/environmental conditions exceeding the requirements set for traditional datacom cables. This ruggedized armored version offers additional mechanical protection and is also available in a gel-filled, cold temperature version. The 250 μm color-coded individual fibers offer quick and easy identification during installation, with 50 μm, 62.5 μm and single-mode versions available. A key benefit of the Corning industrial cables is the low-smoke/zero-halogen (LSZH) sheath.

Corning LSZH™ industrial cables provide life-safety benefits for industrial applications through the cables' construction. Many traditional data communication cables contain halogens in the jacket compound, which pose little risk in the controlled and protected environment of typical building air spaces, such as behind walls, under floors and in conduit.

However, cables deployed in industrial applications, particularly on the plant floor, are typically exposed to greater risk of fire, extreme temperatures or chemical exposure. This often makes halogen cables inappropriate for industrial environments. When cables containing halogens ignite, they emit highly reactive gases that can be harmful if inhaled. When halogens combine with water, acids are formed. These acids damage both living tissue and inorganic materials, such as metal and electronic equipment. Corning LSZH industrial cables eliminate these risks in the event of a fire in the industrial environment. In addition, the LSZH compound does not drip when superheated; the material burns to ash, eliminating the onset of secondary fires.

Features and Benefits

Low-smoke, zero-halogen sheath

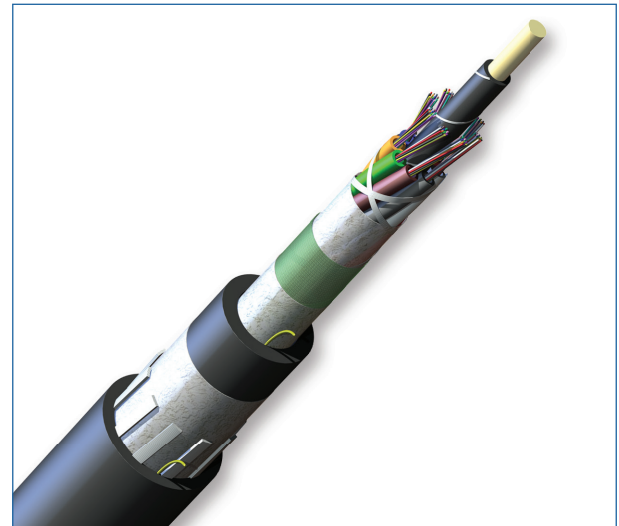
Key life-safety benefit

Meets cyclic impact and chemical resistance test

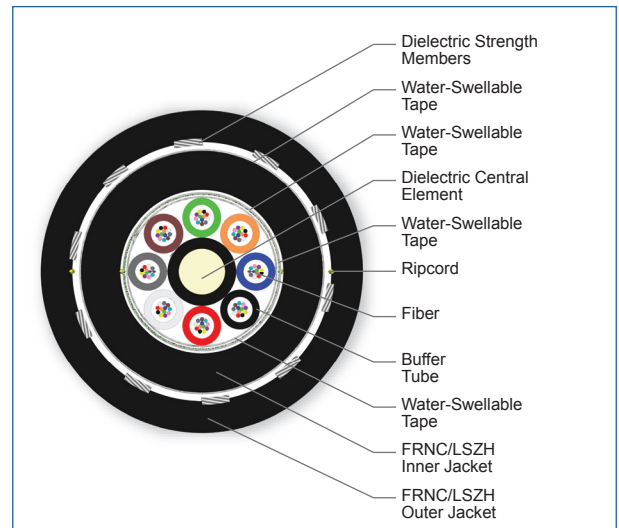
Superior performance

Common installations

Outdoor aerial and duct; indoor general purpose horizontal according to NEC Article 770



Part Number: 096KUL-T4630D2N



Cross Section of Part Number: 096KUL-T4630D2N

Industrial LSZH™ Tray-Rated, Loose Tube, Gel-Free, Double-Jacket Cable

96 F, 62.5 µm multimode (OM1)



Standards

Listings

National Electrical Code® (NEC®) OFN-LS, Sunlight Resistant (SUN RES); IEEE-383/IEEE-1202 flame test; Suitable for Direct Burial (DIR BUR); IEC 60332-3, IEC 60754-2, IEC 61034; MSHA 30 CFR Part 7-K, Section 7.408

Design and Test Criteria

ANSI/ICEA S-104-696; UL 13; UL 444; UL 1277; UL 1666; CSA C22.2 No. 230 and No. 232; CSA OFC (FT-4-S1)

Specifications

General Specifications	
Environment	Indoor/Outdoor Cables
Application	Aerial, Direct Buried, Duct, Tray Rated, (General Purpose Horizontal)
Cable Type	Loose Tube
Product Type	Dielectric
Flame Rating	LSZH™ (OFN-LS)
Fiber Category	62.5 µm MM (OM1)

Temperature Range	
Storage	-40 °C to 70 °C (-40 °F to 158 °F)
Installation	-30 °C to 60 °C (-22 °F to 140 °F)
Operation	-40 °C to 70 °C (-40 °F to 158 °F)

Cable Design	
Central Element	Dielectric
Fiber Count	96
Fiber Coloring	Blue, Orange, Green, Brown, Slate, White, Red, Black, Yellow, Violet, Rose, Aqua
Fibers per Tube	12
Number of Tube Positions	8

Industrial LSZH™ Tray-Rated, Loose Tube, Gel-Free, Double-Jacket Cable

96 F, 62.5 µm multimode (OM1)

CORNING

Cable Design

Number of Active Tubes	8
Buffer Tube Color Coding	Blue, Orange, Green, Brown, Slate, White, Red, Black
Buffer Tube Diameter	2.5 mm (0.1 in)
Tape	Water-swellable
Tape, Layer 2	Flame-retardant tape
Tape, Layer 3	Water-swellable
Inner Jacket Material	Flame-retardant, non-corrosive/low-smoke, zero-halogen (FRNC/LSZH) material
Tape, Layer 4	Water-swellable
Tensile Strength Elements and/or Armoring - Layer 1	Dielectric strength members
Number of Ripcords	4
Outer Jacket Material	Flame-retardant, non-corrosive/low-smoke, zero-halogen (FRNC/LSZH) material
Outer Jacket Color	Black

Mechanical Characteristics Cable

Max. Tensile Strength, Short-Term	4500 N (1000 lbf)
Max. Tensile Strength, Long-Term	1500 N (333 lbf)
Weight	418 kg/km (281 lb/1000 ft)
Nominal Outer Diameter	20.8 mm (0.82 in)
Min. Bend Radius Installation	312 mm (12.2 in)
Min. Bend Radius Operation	208 mm (8.2 in)

Chemical Characteristics

RoHS	Free of hazardous substances according to RoHS 2011/65/EU
------	---

Fiber Specifications

Optical Characteristics (cabled)

Fiber Core Diameter	62.5 µm
Fiber Category	OM1
Fiber Code	K
Performance Option Code	30

Notes: 1) Improved attenuation and bandwidth options available.
2) Bend-insensitive single-mode fibers available on request.
3) Contact a Corning Customer Care Representative for additional information.

Industrial LSZH™ Tray-Rated, Loose Tube, Gel-Free, Double-Jacket Cable

96 F, 62.5 µm multimode (OM1)



Fiber Specifications

Optical Characteristics (cabled)	
Wavelengths	850 nm / 1300 nm
Maximum Attenuation	3.4 dB/km / 1.0 dB/km
Serial 1 Gigabit Ethernet	300 m / 550 m
Serial 10 Gigabit Ethernet	33 m / -
Min. Overfilled Launch (OFL) Bandwidth	200 MHz*km / 500 MHz*km
Minimum Effective Modal Bandwidth (EMB)	220 MHz*km / -

Notes: 1) Improved attenuation and bandwidth options available.
2) Bend-insensitive single-mode fibers available on request.
3) Contact a Corning Customer Care Representative for additional information.

Ordering Information

Part Number	096KUL-T4630D2N
Product Description	Industrial LSZH™ Tray-Rated, Loose Tube, Gel-Free, Double-Jacket Cable, 96 F, 62.5 µm multimode (OM1)
EAN Code	4056418168449



Corning Optical Communications LLC • PO Box 489 • Hickory, NC 28603-0489 USA

800-743-2675 • FAX: 828-325-5060 • International: +1-828-901-5000 • www.corning.com/opcomm

A complete listing of the trademarks of Corning Optical Communications is available at www.corning.com/opcomm/trademarks. All other trademarks are the properties of their respective owners. Corning Optical Communications is ISO 9001 certified.

© 2016 Corning Optical Communications. All rights reserved.

