



Conducting Value

..... HIGH VALUE CABLES





OUR MARKETS

Our cables are installed in the following countries:

Afghanistan, Algeria, Austria, Bahrain, Bangladesh, Belgium, Brunei, Bulgaria, Chile, China, Congo, Cuba, Cyprus, Czech Republic, Denmark, Egypt, Estonia, Finland, France, Germany, Greece, Holland, Hong Kong, Hungary, India, Indonesia, Iran, Iraq, Ireland, Italy, Japan, Jordan, Kazakhstan, Kuwait, Lebanon, Luxembourg, Malaysia, Maldives, Malta, Mauritius, Morocco, Mozambique, Nigeria, Norway, Oman, Pakistan, Philippines, Poland, Portugal, Qatar, Romania, Russia, Saudi Arabia, Singapore, South Africa, Spain, Sudan, Sweden, Syria, Taiwan, Turkey, United Arab Emirates, United Kingdom, Usa, Venezuela, Vietnam, Yemen.

» **MANY DESTINATIONS,
BUT ONLY ONE ORIGIN: ITALY**

TOTAL QUALITY

Quality means different things to different people.

Quality is not only our approved Quality System according to **ISO 9001** by **CSQ** – Italy, **BASEC** – UK and **LPCB** – UK.

Quality is not only our fully equipped test laboratory to certify the required characteristics of cables.

For CAVICEL Quality simply means to satisfy customers not only by supplying them the required products, but by working together in a professional way to create a long lasting successfully relationship.

Our growth and success stem from the quality of our promise and the certainty of delivering on promise.

Quality also means respect for the environment and this is why CAVICEL is certified according to **ISO 14001** by **CSQ** – Italy.

OUR VALUE

CAVICEL is a cable manufacturer, but we do not only supply cables. We grant the satisfaction of the right solution in cable application. This means to have fully evaluated all customers' requirements, not only in terms of cable performance, but in terms of service, knowledge, reliability in order to assure the best value for our customer. We try to understand our partner's situation and criticality. Then we just create a cable that let's your value flow free.

» **THIS IS CAVICEL:**
Conducting Value.



CAVICEL is an innovator in the design and manufacturing of copper and fibre optic special cables for various applications. CAVICEL has been producing special cables for over 60 years, with always the same goal: quality and reliability. With its skilled staff and its solid know-how

CAVICEL proposes itself as a useful partner for every problem concerning the transmission of any optical or electrical signal.

Our Mission is to supply cable market with special products that are recognized for **Quality, Performances** and **Innovation**.

OUR PRODUCTION

FIRECEL

Fire resistant cables

INCOCEL

Instrumentation, thermocouple, control and power cables

OPTICEL

Fibre optic cables

SPECIAL CABLES

designed and manufactured with different characteristics meeting the specific needs in the most appropriate way.

OUR KNOW-HOW

We have had a wide experience in designing and manufacturing cables for over 60 years, and we have always worked close to our customers to understand the real needs.

We have developed different production technologies and we are able to offer the most suitable construction for each application.

Our cables, installed in more than 60 countries, say that we have the right knowledge and experience in approaching the market



FIRECEL

FIRE RESISTANT CABLES

Firecel SR cables are fire resistant cables designed to continuously operate under fire conditions. During the burning stage, the combustion gases have very low opacity, low toxicity and are halogen free, for the safeguard of the human life and for protection of installations.

FIRECEL SR 114H - SR 114E

These cables are installed for **over 30 years** in **more than 50 countries** for Fire detection and Fire alarm systems for buildings.

These cables comply with the following standards: BS 5839-1/ BS 7629 / BS 6387 cat. CWZ.

FIRECEL SR 114H: "standard" fire resistant cables, used for general applications.

FIRECEL SR 114E: "enhanced" fire resistant cables, used when the designer or specifier require an improved fire resistance, such as unsprinklered premises or buildings, in which, "enhanced" cables must be used.

FIRE TEST LABORATORY

CAVICEL has a very well equipped laboratory for the following tests:

Resistance to fire alone

(BS 6387 cat. C, IEC 60331)

Resistance to fire with water spray

(BS 6387 cat. W)

Resistance to fire with mechanical shocks (BS 6387 cat. Z, BS EN 50200)

Resistance to fire with mechanical shocks and water spray

(BS EN 50200 + Annex E, BS 8434-2)

Smoke Density (BS EN 61034-2)

Acid gas Emission

(IEC 60754-1/2)

Fire and flame propagation

(BS EN 60332-1, BS EN 60332-3-24)

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FIRECEL SR: a wide range of fire resistant cables

CONSTRUCTION:

Conductor: Bare or tinned copper, solid or stranded

Insulation: Silicone rubber or Mica-silicone or Mica-XLPE

Cabling: concentric or twisted pairs

Screen: aluminium/polyester tape (optional)

Jacket: LSZH

Armour: GSWB (galvanized steel wire braid), SWA (steel wire armour) - optional

Insulation grade: 300/500V, 450/750 V, 600/1000 V.

APPLICATIONS

Hotels
Theatres and cinemas
Museums
Hospitals
Shopping centers
Offices
Schools
Airports
Undergrounds and tunnels
Railway stations
High-rise buildings
Data communication centers
Public address systems
Traffic control systems
Fire fighting systems

APPROVALS

Department of Social Services -

Abu Dhabi

Civil Defence Directorate - Abu Dhabi

ADWEA - Abu Dhabi

Civil Defence Directorate - Dubai

Civil Defence - Bahrain

Civil Defence Department - Qatar

Fire Service Directorate - Kuwait

Royal Oman Police - Sultanate of Oman

Ministry of Public Works - UAE

Fire Service Dept. (Fire Protection Bureau) - Hong Kong



Instrumentation, control and power cables are suitable for use in Oil & Gas installations, chemical and petrochemical plants, iron and steel industries, Off-Shore...

Cavical can offer a wide range of cables, designed, manufactured and tested according to international standards or to meet specific requirements.

CONSTRUCTION

Conductor: Bare or tinned copper, solid or stranded

Special alloy for thermocouple cables

Insulation: PVC

PE

XLPE

Cabling: concentric or twisted pairs or triples

Screen: individual or collective aluminium/polyester tape or copper tape or braid

Jacket: LSZH, PVC

Armour: SWA, GSTA, GSWB, GSFA

Insulation grade: 300/500V, 600/1000 V.

APPLICATIONS

Refineries & Gas Plants

Chemical and pharmaceutical plants

Offshore platforms

Power station

Steelworks

Desalinization plants



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APPROVALS

ADNOC - GASCO - ADCO - UAE

ENI-AGIP - Italy

HELLENIC PETROLEUM - Greece

KNPC - Kuwait

MOBIL OIL

NAOC - Nigeria

PDO - Oman

PETROBEL - Egypt

QATAR PETROLEUM - Qatar

SHELL - Netherlands

TOTAL - France-Indonesia

SONATRACH - Algeria

SPECIAL DESIGN

Cables can be supplied with:

- Moisture and corrosion barrier
- Lead sheath
- Oil, solvent and hydrocarbon resistant jacket
- Mud resistant jacket
- Hi Pack: protection against corrosion and humidity as alternative to lead sheath

Incoel can be designed and manufactured to assure fire resistance (BS 6387, EN 50200, IEC 60331) when required.

SCREENS

IS Individual Aluminium/Polyester Screen



CWB Copper Wire Braid
TCWB Tinned Copper Wire Braid



OS Overall Aluminium/Polyester Screen



BCT Bare Copper Tape



ARMOURS

SWA Steel Wire Armour



GSTA Steel Tape Armour



GSWB Steel Wire Braid



GSFA Steel Flat Armour



OPTICEL

FIBRE OPTIC CABLES

For more than 25 years, Cavicel has been internationally recognized for the quality of OPTICEL fiber optic cables. Our experience now permits us to offer fibre solutions to a wide range of applications, such as telecommunication, broadcasting and video communication, military and defence, railway applications, industrial harsh environment and various specialty market.

CONSTRUCTION

Types of Fibres: SM 9/125 OS1/OS2
NZDSF
MM 50/125 OM2/OM3/OM4
MM 62.5/125 OM1
MM 200/230

Special fibres available on request.

Fibre coating: Tight
Semi-tight
Single-fibre loose tube
Multi-fibre loose tube
Micro-bundle

Armouring and protection:
Aramid yarns
Glass yarns
Corrugated steel tapes
Galvanized steel wires
Steel wire braid

Jacket: LSZH, PVC, PE/ HDPE

APPLICATIONS

Telecommunication
Data Transmission
Video Application
Local Area Network
Surveillance and Safety Systems
Railway Application
Process Control

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SPECIAL DESIGN

Fibre optic cables can be designed and manufactured with materials and structures that allow high performances, such as:

- Resistance to continuous bending (for mobile applications)
- Resistance to high temperature
- Resistance in harsh environment (Mud resistant jacket)
- Fire resistance, assuring performances even during a fire (standard IEC 60331-25)

PROTECTIONS

A1 Galvanized Steel Wire Braid



A5 Glass Yarns



A2 Aramid Yarns



A7 Galvanized Steel Wire Armour



A3 Corrugated Steel Tape



A8 Copolymer Coated Aluminium Tape



A4 Special Rodent Resistant Extruded Polyamide Jacket



A9 Hi Pack - Special Multilayer Protection (Aluminium/HDPE/PA)



SPECIAL CABLES

The continuous technological evolution led to an increase of the demand of customized products fulfilling specific requests. This is why Cavicel keeps on developing thousands of new cables, year after year.

In case you are looking for a cable that is not available on the market, or if your project needs a high performance cable or you are looking for a customized preliminary study and custom cable manufacturing, Cavicel Technical Office can offer you the right resources and the proper know-how necessary for satisfying your new demand.

Clients that rely on CAVICEL know that they can count on a company that deeply knows cable problems and works hard, day by day, to understand customer's need. A Company that proposes new solutions, more sophisticated or endowed with the best Quality for the right price. That's the reason why CAVICEL has a global answer for every country, every standard, every need.

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MATERIALS

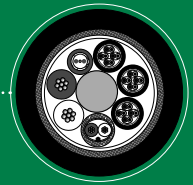
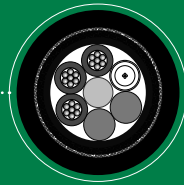
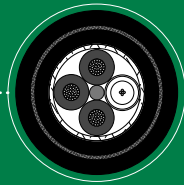
In order to offer the best solution to every enquiry, CAVICEL can process following materials:

PVC
Polyethylene
HDPE
XLPE
Nylon
Polyurethane
TPE
LSZH

Silicone rubber
Fluoropolymer FEP
Fluoropolymer PFA
Fluoropolymer PTFE
Fluoropolymer MFA
Fluoropolymer ETFE
Fluoropolymer ECTFE
Hytrel®
Peek®
Kapton®

APPLICATIONS

Power station
Public transport
Engineering
Industrial plant
Oil & Gas
Off-Shore
Plant monitoring and supervision systems
Naval application
Safety and Defense
Fire-fighting systems
Railways
Underground





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MADE IN ITALY



ISO 9001:2015
Certificate No. CS1-249



Assessed to ISO 9001:2015
Cert/LPCB ref. 217



ISO 9001:2015
n. 9125.CAVL



ISO 14001:2015
n. 9191.CVCL



CORPORATE VIDEO



CaviceL firmly believes in the importance of the quality of its products and it undertakes itself to produce them using clean technologies for the respect and the protection of the environment.

All information contained in this brochure is believed to be accurate. Specifications can change at any time, according to technical developments and market changes.

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