

## Description

Halogen free, low smoke emission and UV resistant coaxial cable -  
75 Ohm  
Security sheath of LSZH material (Screening Class A)



## Data Sheet

DG163ZH



Ø	1,63	7,20	7,37	7,85	10,10
	(Cu)	(PEG)	(Al/Pet/Al/Sur)	(CuSn)	(LSZH)

## Class CPR acc. to UE 305/2011 (DoP)

Dca s2,d2,a1

The cable can be used in the field of application of the Construction Product Regulation (DoP) UE nr. 305/2011 for the class of performance specified on the related product label.

## Standards

EN 50117-2-3

## Reaction to Fire

EN 50399

EN50575

## Application

DOCSIS 3.1 (Data Over Coax System)

## Construction data

Inner conductor of plain copper	(Cu)	Ø 1,63 ± 0,03	mm
Dielectric of physical foam polyethylene	(PEG)	Ø 7,20 ± 0,10	mm
Aluminium/Polyester/Aluminium/Surlyne tape longitudinally overlapped and bonded to the dielectric	(Al/Pet/Al/Sur)		
Braid of tinned copper wires	(CuSn)		
Braid optical coverage (IEC 96-1)		78	%
Braid optical coverage (IEC 96-1) - External		75	%
Tracer Identifier	Year + Flag		
Diameter over Braid		Ø 7,85	mm
Outer sheath of Thermoplastic material - grey (RAL 7001) - halogen-free, low smoke, flame retardant and UV-resistant	(LSZH)	Ø 10,10 ± 0,15	mm

Printed each meter by blue ink-jet :

**CAVEL DG 163 ZH MADE IN ITALY 75 Ohm Euroclass Dca,s2,d2,a1 EN50117-2-3 CEI-UNEL 36762 C-4 (U0 = 400V) ULTRA HD / 4K gggaa(n) m**

(ggg=day)(aa=year)(n=batch) (m=meter marking)

## Physical data

Weight of copper conductors	39,54	kg/km
Total weight of cable	105,43	kg/km
Minimum bending radius (single/repetead bending)	100	mm
Maximum cable pulling strength	300	N
Minimum installation temperature	-5	°C
Operating temperature	-25 / +80	°C

## Electrical data

Characteristic impedance	200 MHz	75 ± 2	Ohm
Capacitance (@1kHz)		52 ± 2	pF/m
Velocity Ratio		85 %	

## ITALIANA CONDUTTORI s.r.l.

Viale Zanotti 90 I - 27027 Gropello Cairoli  
Tel +39-382.815150 Fax +39-0382.814212

## Date

23/05/2017

## Responsible

Alberto Scardovi

**Description**

Halogen free, low smoke emission and UV resistant coaxial cable -  
75 Ohm  
Security sheath of LSZH material (Screening Class A)

**Data Sheet****DG163ZH**

Inner conductor resistance	8,50	Ohm/km
Outer conductor resistance	7,50	Ohm/km
Loop resistance	16	Ohm/km
Sheat Insulation voltage (spark test)	5	kV
Maximum current (Ieff)	16	A

Structural return loss (SRL)	
5 - 470 MHz	>30 dB
470 - 1000 MHz	>28 dB
1000 - 2000 MHz	>23 dB
2000 - 3000 MHz	>20 dB

Screening Attenuation (SA)	SA-Class A+	Shield Transfer Impedance (Zt)	Zt-Class A
30 - 1000 MHz	>95 dB	5 - 30 MHz	< 4mOhm/m
1000 - 2000 MHz	>95 dB		
2000 - 3000 MHz	>85 dB		

**Attenuation (at 20°C )**

Frequency [MHz]	Attenuation [dB/100m]	Frequency [MHz]	Attenuation [dB/100m]
5	1,10	862	12,30
10	1,50	1000	13,20
30	2,20	1750	17,90
50	2,80	2150	20,10
200	5,60	2400	21,60
300	6,90	3000	24,80
470	8,80		

**ITALIANA CONDUTTORI s.r.l.**

Viale Zanotti 90 I - 27027 Gropello Cairoli  
Tel +39-382.815150 Fax +39-0382.814212

Date

**23/05/2017**

Responsible

**Alberto Scardovi**

**Description**

Halogen free, low smoke emission and UV resistant coaxial cable -  
75 Ohm  
Security sheath of LSZH material (Screening Class A)



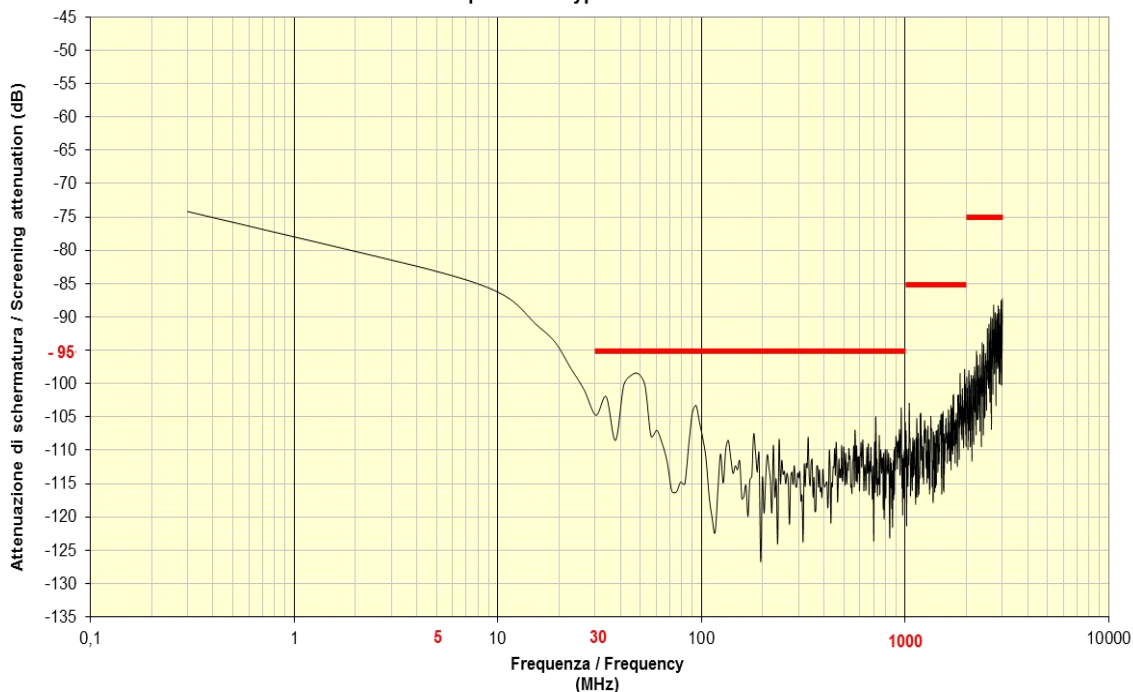
Data Sheet

**DG163ZH**

**Attenuazione di schermatura / Screening Attenuation**

**Cavo classe A+ / A+ Class Cable**

Cavo tipo / Cable type: DG163ZH



**Connectors**

- 5/8MU-TL232** 5/8" connector, male, for UNDERGROUND (Hardline) installation, nitin-plated brass - 69,0 mm x 20,5 mm
- F163** Series F Crimp, F Crimp, for INDOOR installation, nitin-plated brass - 35,0 mm x 14,0 mm
- FA17/73** Series F Twist-On, F Twist-On, for INDOOR installation, nitin-plated brass - 33,0 mm x 14,5 mm
- FC11QM** Series F Compression, Quick Mount, for OUTDOOR installation
- FM-TL232** Series F, male, for UNDERGROUND (Hardline) installation, nitin-plated brass - 76,0 mm x 31,0 mm
- IEC14M-32** Series IEC (toolless), male, for UNDERGROUND (Hardline) installation, nitin-plated brass - 64,5 mm x 21,0 mm
- NM-32** N Connector, male, for UNDERGROUND (Hardline) installation, nitin-plated brass - 62,5 mm x 21,0 mm
- SR01-32** Adapter, for 11/50 - RG11, for UNDERGROUND (Hardline) installation

**ITALIANA CONDUTTORI s.r.l.**

Viale Zanotti 90 I - 27027 Gropello Cairoli  
Tel +39-382.815150 Fax +39-0382.814212

Date

**23/05/2017**

Responsible

**Alberto Scardovi**