

# Detailed Specifications & Technical Data

ENGLISH MEASUREMENT VERSION

**BELDEN**  
SENDING ALL THE RIGHT SIGNALS

## 8641NH Multi-Conductor - GreenChoice Multi Conductor



For more Information  
please call

1-800-Belden1



### General Description:

24 AWG stranded (7x32) TC conductors, polyethylene insulation, twisted pair, overall Beldfoil shield (100% coverage), 24 AWG stranded TC drain wire, LSZH jacket.

### Physical Characteristics (Overall)

#### Conductor

AWG:

# Pairs	AWG	Stranding	Conductor Material
1	24	7x32	TC - Tinned Copper

Total Number of Conductors: 2

#### Insulation

Insulation Material:

Insulation Material	Wall Thickness (in.)
PE - Polyethylene	.016

#### Outer Shield

Outer Shield Material:

Outer Shield Trade Name	Type	Outer Shield Material	Coverage (%)
Beldfoil®	Tape	Aluminum Foil-Polyester Tape	100

Outer Shield Drain Wire AWG:

AWG	Stranding	Drain Wire Conductor Material
24	7x32	TC - Tinned Copper

#### Outer Jacket

Outer Jacket Material:

Outer Jacket Material	Nom. Wall Thickness (in.)
LSZH - Low Smoke Zero Halogen	0.025

#### Overall Cable

Overall Nominal Diameter: 0.165 in.

#### Pair

Pair Color Code Chart:

Number	Color
1	Black & Clear

Pair Lay Length & Direction:

Lay Length (in.)	Twists (twist/ft)
1.500	8.000

### Mechanical Characteristics (Overall)

Operating Temperature Range: -20°C To +75°C

UL Temperature Rating: 75°C

Bulk Cable Weight: 12 lbs/1000 ft.

Max. Recommended Pulling Tension: 11 lbs.

Min. Bend Radius/Minor Axis: 1.700 in.

### Applicable Specifications and Agency Compliance (Overall)

#### Applicable Standards & Environmental Programs

NEC/(UL) Specification: CMG

CEC/C(UL) Specification: CMG

EU Directive 2011/65/EU (ROHS II): Yes

EU CE Mark: Yes

EU Directive 2000/53/EC (ELV): Yes

EU Directive 2002/95/EC (RoHS): Yes

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EU RoHS Compliance Date (mm/dd/yyyy):	05/10/2012
EU Directive 2002/96/EC (WEEE):	Yes
EU Directive 2003/11/EC (BFR):	Yes
CA Prop 65 (CJ for Wire & Cable):	Yes
MII Order #39 (China RoHS):	Yes
Other Specification:	UL AWM 21305

#### Flame Test

UL Flame Test:	UL1685 FT4 Loading
C(UL) Flame Test:	FT4

#### Suitability

Suitability - Indoor:	Yes
Non-halogenated:	Yes

#### Plenum/Non-Plenum

Plenum (Y/N):	No
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#### Electrical Characteristics (Overall)

##### Nom. Characteristic Impedance:

Impedance (Ohm)
80

##### Nom. Inductance:

Inductance (μH/ft)
.22

##### Nom. Capacitance Conductor to Conductor:

Capacitance (pF/ft)
22

##### Nom. Capacitance Cond. to Other Conductor & Shield:

Capacitance (pF/ft)
42

##### Nom. Conductor DC Resistance:

DCR @ 20°C (Ohm/1000 ft)
25

##### Nominal Outer Shield DC Resistance:

DCR @ 20°C (Ohm/1000 ft)
14.6

##### Max. Operating Voltage - UL:

Voltage
300 V RMS

##### Max. Recommended Current:

Current
2.2 Amps per conductor @ 25°C

#### Put Ups and Colors:

Item #	Putup	Ship Weight	Color	Notes	Item Desc
8641NH 0601000	1,000 FT	14.000 LB	CHROME	C	1 FS PR #24 PO FRNHPO
8641NH 060500	500 FT	7.500 LB	CHROME		1 FS PR #24 PO FRNHPO

##### Notes:

C = CRATE REEL PUT-UP.

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Belden declares this product to be in compliance with EU LVD (Low Voltage Directive 2014/35/EU).

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