



## INNOVCABLE PHOTOVOLTAIC ECO180H LSZH + UV 1,8/3KV CA/AC



- Conductor material: Tinned copper wire.
- Conductor class: According to DIN VDE 0295 class 5 and IEC 60228 cl. 5
- Special cross-linked compound INNOVPO-36, heat resistant to DIN VDE 0250-606
- Outer layer: INNOVPO-44 cross-linked special compound, heat and UV resistant, according to DIN VDE 0250-606
- Colour: Black RAL 9005.
- Rated voltage: 1.8/3 kV AC/AC
- Max. operating voltage: AC/AC: 2.1/3.6 kV
- Max. operating voltage: DC/DC: 2.7/5.4 kV
- Test voltage: 6.5 kV (5.min)
- Current carrying capacity: DIN VDE 0298-4
- Conductor resistance: according to DIN VDE 0295 class 5 and IEC 60228 cl. 5
- Insulation resistance: min. 20 MΩX Km.
- Tensile load:  
Max. 15 N/mm<sup>2</sup> in operation  
Max. 50 N/mm<sup>2</sup> during installation  
Stress Torsion - Max. ± 150°/m during installation
- Bending Radius: Acc. to DIN VDE 0298 part 3.
- Flame retardant:  
IEC 60332-1-2 single cables  
IEC 60332-3-24 multiple cables
- Smoke emission: EN 61034-2 luminosity ≥ 70°C
- Halogen free: EN 60754-1
- Corrosivity: EN 60754-1 pH ≥ 4,3
- Conductivity ≤ 2,5 μS/mm
- Toxicity: EN 50305 index ITC = 3
- Weather resistant: EN 50618
- Ozone resistant



- UV resistant
- Acid and alkaline resistance: EN 50618

## Identification

INNOVCABLE PHOTOVOLTAIC ECO 180H LSZH + UV 1,8/3Kv AC/AC XX mm<sup>2</sup> H1Z2Z2-K OF:  
XXXX/ANO EN-50618

## Applicable Specifications

DIN VDE 0295 CLASS 5

IEC 60228 CLASS 5

DIN VDE 0250-606

RAL 9005

DIN VDE 0298-4

IEC 60332-1-2 single cables

IEC 60332-3-24 multiple cables

DIN EN 60754-2

EN 61034-2

EN 50305



EN 50618

## Applications

Cable for photovoltaic systems in fixed and flexible applications. Can be applied in dry and wet locations. For direct application to weather or directly buried, applicable inside and outside explosive and hazardous areas within industry and agriculture, greater fire resistance, high resistance to the effects of solar radiation and weather in general. Ecological product, can be recycled. Manufactured free of harmful substances and Silicone (during the manufacturing process). Application in junction boxes and inverters, rated voltage 1.8 / 3kV AC/AC, as interconnection between central inverter and transformer station. Suitable for applications in equipment with insulation class II protection. Can also be used as ungrounded connections in distribution and distribution boards up to 1000 V (DIN VDE 0100-520 and DIN VDE 0660-500) and in accumulator circuits (DIN 5510 part 5).

- Life span: Minimum 25 years under direct solar radiation
- Excellent thermal expansion.
- UV resistant.
- Halogen free.
- Ozone resistant.
- Abrasion resistant.
- Acid and base resistant.
- Flame retardant.

## Maximum Conductor Temperature

Operating temperature: +90°C

Max. conductor temperature: +120°C max. 20,000 hours

Short circuit temperature: +250°C

Fixed installation: -40°C to +90°C

Flexible installation: -40°C to +90°C

## Notes



- are suitable for direct burial in the ground. Installation conditions according to VDE 0800 Section 174 § 5.4.2 and VDE 0891 Section 6 § 4.2.

- We can produce on request several other cable options and configurations. Innovcable reserves the right to change this catalogue without prior notice.

Diametro do condutor mm <sup>2</sup>	Diametro do condutor max. mm	Diametro externo mm	Diametro externo max. mm	Raio de curvatura fixa min. Mm	Peso Kg/km
1x25	6,3	13,2	14,4	87	380
1x35	7,4	14,3	15,5	93	470
1x50	8,9	15,6	17,1	103	640
1x70	10,6	17,1	19,1	115	820
1x95	12,1	19,4	21,4	129	1060
1x120	14,2	21,5	23,5	141	1320
1x150	15,8	23,1	25,1	151	1590
1x185	17,4	25,1	27,1	163	1910
1x240	20,2	28	30	180	2450
1x300	22,9	31	34	204	3030