

H05V-K

DB8110001EN

valid from: 11th Sept. 2014

APPLICATION (HD 516)

H05V-K belongs to Europe's harmonized, normative cable types and is designed according to the CENELEC harmonized third-party standard EN 50525-2-31 – formerly: Meanwhile withdrawn harmonization document HD 21.3. H05V-K is a classic, single-layer insulated, single-core, low-voltage hook-up wire, and that for stationary/ static and protected installation inside of devices/ appliances/ machines/ control cabinets (panels) etc. as well as inside or on lamps, since it only disposes of basic protection, but not additional error protection, in line with modified IEC 60364-4-41/ HD 60364-4-41, for lack of an outer sheath/ jacket. Also, H05V-K is suitable for protected, stationary/ static installation inside of closed conduits and cable ducting systems. Unprotected laying on or under plaster as well as wiring through unclosed or opening cable trunking systems shall only be permitted as part of security irrelevant signal and control circuits with special extra-low voltage under 25 V AC to-ground or under 60 V DC to-ground. In wet or damp rooms and locations, unprotected laying is completely forbidden. Under individual part numbers, different core insulation colours are offered for diverse application types. As packaging type, 100-metre coils in small, flat cardboard boxes are applied.

ETIM 5.0 Class-ID: EC000993

ETIM 5.0 Class-Description: Single core cable

DESIGN (EN 50525-2-31)

Conductor	Copper, bare, fine-wired/ finely stranded, conductor class 5 acc. IEC 60228
Nominal conductor cross section	0.5 mm ² to and incl. 1 mm ²
Core insulation	PVC compound type TI 1 acc. EN 50363-3
Core insulation colours	Diverse single colours Diverse double colours (lengthways stripes)

CABLE TYPE CERTIFICATION (EN 50525-2-31)

◀VDE▶ H05V-K

Exceptions without cable type certification:

- Transparent core insulations
- Core insulations with partly transparent multiple-colour combinations

ELECTRICAL PROPERTIES @ +20 °C

IEC rated voltage U ₀ /U	300/500 V AC = 450/750 V DC
Conductor resistance	IEC 60228, conductor class 5
Test voltage	2000 V AC
Compliance with low-voltage EC directive	2006/95/EC

MECHANICAL, THERMAL AND CHEMICAL PROPERTIES

Minimum bending radius (HD 516)	Intended use:	4 x Outer diameter
	Cautious bending:	2 x Outer diameter
Conductor temperature	Stationary/ static operation (without vibration):	-40 °C to +80 °C
	Moved operation (not normatively intended):	+5 °C to +70 °C
	Laying/ handling:	Min. +5 °C
	Short-circuit and ground leakage:	Max. +160 °C
	Ambient temperature at storage:	Max. +40 °C
Flame retardant	IEC 60332-1-2	
RoHS	Chemical compliance with the EU RoHS II directive 2011/65/EU on the Restriction of (the use of certain) Hazardous Substances	