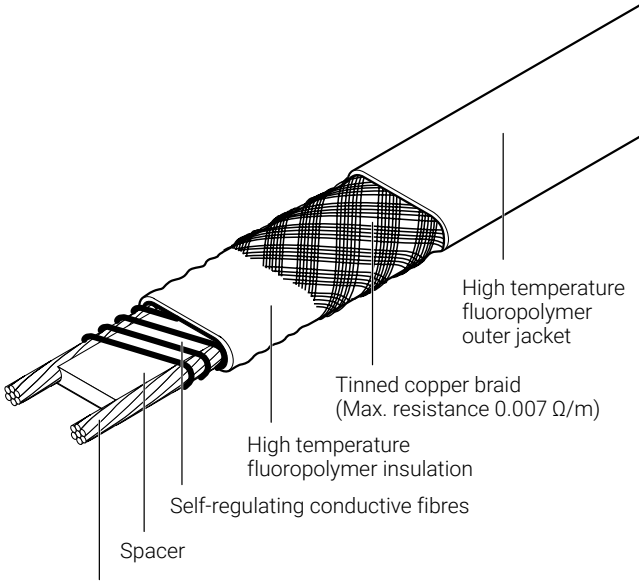
KTV

nVent RAYCHEM

SELF-REGULATING HEATING CABLE



HEATING CABLE CONSTRUCTION

Electrical heat-tracing for process temperature maintenance applications up to 150°C which may be subject to steam cleaning.

The nVent RAYCHEM KTV family of self-regulating, parallel circuit heating cables is used for process temperature maintenance of pipes and vessels.

It can also be used for frost protection of large pipes and for applications requiring high temperature exposure capability.

APPLICATION

Area classification	Hazardous, Zone 1, Zone 2 (Gas), Zone 21, Zone 22 (Dust) Ordinary
Traced surface type	Carbon steel Stainless steel Painted or unpainted metal
Chemical resistance	Organics and corrosives For aggressive organics and corrosives consult your local nVent representative

SUPPLY VOLTAGE

230 Vac (Contact your local nVent representative for data on other voltages)

APPROVALS

The KTV heating cables are approved for use in hazardous areas by PTB and Baseefa Ltd.
PTB 09 ATEX 1117 X & Baseefa06ATEX0186X
Ⓔx II 2G Ex e II 226°C (T2) & Ⓔx II 2D Ex tD A21 IP66 T226°C
IECEx PTB 09.0058X & IECEx BAS 06.0046X
Ex e II 226°C (T2) & Ex tD A21 IP66 T226°C

The KTV heating cables are approved by DNV for use on ships and mobile off shore units.
DNV Certificate No. DNV-GL TAE00000TV

EAC Ex

TC RU C-BE.МЮ62.B.00054/18
1Ex e IIC 226°C (T2) Gb X 1Ex e mb IIC 226°C (T2) Gb X
Ex tb IIIC T226°C Db X Ex tb mb IIIC T226°C Db X
Ta -60°C...+56°C IP66
ООО "ТехИмпорт"

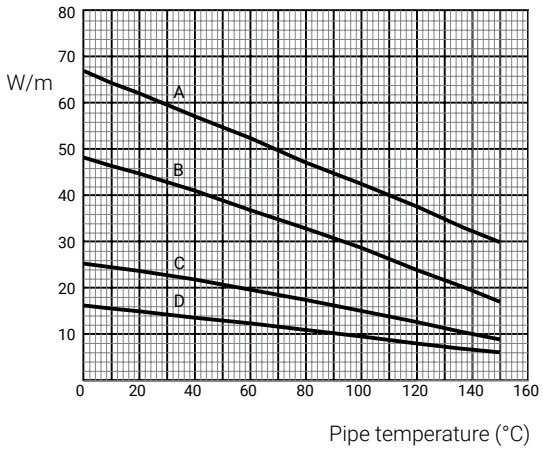
SPECIFICATIONS

Maximum maintain or continuous exposure temperature (power on)	150°C
Maximum intermittent exposure temperature (power on/off)	250°C (*) Maximum cumulative exposure 1000 hours (*) The 250°C rating applies to all products printed "MAX INTERMITTENT EXPOSURE 250C".
Temperature classification	T2
Based on systems approach*	T3-T6 * nVent RAYCHEM KTV heat-tracing cables are approved for the listed temperature classifications by using the principles of stabilized design (as per system classification approach) or the use of a temperature limiting device. Use TraceCalc design software or contact nVent.
Minimum installation temperature	−60°C
Minimum bend radius	at 20°C: 26 mm at −60°C: 51 mm

THERMAL OUTPUT RATING

Nominal power output at 230 Vac on insulated steel pipes

A 20KTV2-CT
B 15KTV2-CT
C 8KTV2-CT
D 5KTV2-CT



	5KTV2-CT	8KTV2-CT	15KTV2-CT	20KTV2-CT
Nominal power output (W/m at 10°C)	16	25	47	66

PRODUCT DIMENSIONS (NOMINAL) AND WEIGHT

Thickness (mm)	7.6	7.6	7.6	7.6
Width (mm)	13.3	13.3	13.3	13.3
Weight (g/m)	250	250	250	250

MAXIMUM CIRCUIT LENGTH BASED ON TYPE 'C' CIRCUIT BREAKERS ACCORDING TO EN 60898

Electrical protection sizing	Start-up temperature	Maximum heating cable length per circuit (m)			
16 A	−20°C	130	95	60	40
	+10°C	145	105	65	45
25 A	−20°C	205	150	90	65
	+10°C	230	165	100	75
32 A	−20°C	230	180	115	85
	+10°C	230	180	130	95
40 A	−20°C	230	180	130	105
	+10°C	230	180	130	110

The above numbers are for circuit length estimation only. For more detailed information please use the nVent RAYCHEM TraceCalc software or contact your local nVent representative. nVent requires the use of a 30 mA residual current device to provide maximum safety and protection from fire.
Where design results in higher leakage current, the preferred trip level for adjustable devices is 30 mA above any inherent capacitive leakage characteristic of the heater as specified by the trace heater supplier or alternatively, the next common available trip level for non adjustable devices, with a maximum of 300 mA. All safety aspects need to be proven.

ORDERING DETAILS

Part description	5KTV2-CT	8KTV2-CT	15KTV2-CT	20KTV2-CT
Part No.	P000001679	P000001681	P000001683	P000001685

COMPONENTS

nVent RAYCHEM offers a full range of components for power connections, splices and end seals.
These components must be used to ensure proper functioning of the product and compliance with electrical requirements.

North America
Tel +1.800.545.6258
Fax +1.800.527.5703
thermal.info@nVent.com

Europe, Middle East, Africa
Tel +32.16.213.502
Fax +32.16.213.604
thermal.info@nVent.com

Asia Pacific
Tel +86.21.2412.1688
Fax +86.21.5426.3167
cn.thermal.info@nVent.com

Latin America
Tel +1.713.868.4800
Fax +1.713.868.2333
thermal.info@nVent.com

nVent

nVent.com

Our powerful portfolio of brands:
CADDY ERICO HOFFMAN RAYCHEM SCHROFF TRACER

©2019 nVent. All nVent marks and logos are owned or licensed by nVent Services GmbH or its affiliates. All other trademarks are the property of their respective owners.
nVent reserves the right to change specifications without notice.

RAYCHEM-DS-EU1383-KTV-EN-1911