Industrial flexible cable, insulation and outer sheath in elastomer. Oil resistant, flame retardant according to IEC/EN 60332-1-2 standard.

DESCRIPTION

Application

TITANEX flexible cable is intended for installations with moving equipment, electric appliances and for building sites. The cable may be rated 0,6/1 kV where the installation has built-in protection and for motors in lifting appliances - machine tools -

This cable can be used in refrigerating installations.

Installation

This cable can be installed in open air or be buried but with extra mechanical protection.

Conductors laid up

Assembled conductors.

Nota

Max continuous operating conductor temperature in normal use :

+60°C (in every case of mobile installation)

+90°C (fixed protected installation)

+250°C (in short circuit)

Permissible current rating is measured for an ambient temperature of 30°C and a maximum operating and conductor temperature of 90°C according IEE 4F2A table. For other temperature please refer to correction factors.





STANDARDS

International EN 50525-2-21; IEC 60228



Lead free



Rated Voltage Uo/U (Um) 450 / 750 V



Cable flexibility Flexible



Chemical resistance Accidental



Water proof Good



Operating temp

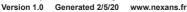


Oil resistance



Max.conductor







CHARACTERISTICS

Construction characteristics	
Sheath colour	Black
Lead free	Yes
Electrical characteristics	
Rated Voltage Uo/U (Um)	450 / 750 V
Mechanical characteristics	
Cable flexibility	Flexible
Usage characteristics	
Chemical resistance	Accidental
Water proof	Good
Short-circuit max. conductor temperature	250 °C
Operating temperature, range	-25 55 °C
Oil resistance	Yes
Max. conductor temperature in service	90 °C

SINGLE CORE

se		current rating Vol open air [A]	tage drop, single phase [V/A.km]	Max. outer diam. [mm]	Min. outer diam. [mm]	Approx. weight [kg/km]
	35	200	1.04	17.9	14.3	482
	50	250	0.75	20.6	16.5	662
	70	310	0.56	23.3	18.6	895
	95	369	0.44	26.0	20.8	1144
•	20	432	0.36	28.6	22.8	1430
,	50	497	0.31	31.4	25.2	1740
•	85	564	0.28	34.4	27.6	2160
2	240	673	0.23	38.3	30.6	2730
3	300	773	0.2	41.9	33.5	3480
2	100	924	0.18	46.8	37.4	4510
Ę	500	1062	0.16	52.0	41.3	5700



Lead free



Rated Voltage Uo/U (Um) 450 / 750 V



Cable flexibility Flexible



Chemical resistance Accidental



Water proof Good



Operating temp. -25 .. 55 °C



Oil resistance



Max.conductor temp.in service

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TWO CORES

Cross section [mm²]	Perm. current rating open air [A]	Voltage drop, single phase [V/A.km]	Max. outer diam. [mm]	Min. outer diam. [mm]	Approx. weight [kg/km]
4	42	10.1	15.1	11.8	238
6	55	6.7	16.8	13.1	279
10	76	3.8	22.6	17.7	538
16	103	2.5	25.7	20.2	744
25	136	1.68	30.7	24.3	1074

THREE CORES

Cross section [mm²]	Perm. current rating open air [A]	Voltage drop, single phase [V/A.km]	Max. outer diam. [mm]	Min. outer diam. [mm]	Approx. weight [kg/km]
4	42	10.1	16.2	12.7	290
6	55	7.0	18.0	14.1	346
10	76	4.0	24.2	19.1	663
16	103	2.5	27.6	21.8	924
25	136	1.7	33.0	26.1	1345

FOUR CORES

Cross section	Perm. current rating open air	Voltage drop, single phase	Max. outer diam.	Min. outer diam.	Approx. weight
[mm²]	[A]	[V/A.km]	[mm]	[mm]	[kg/km]
4	37	8.71	18.0	14.0	357
6	49	5.84	20.0	15.7	443
10	66	3.42	26.5	20.8	818
16	89	2.2	30.1	23.8	1150
25	119	1.44	36.6	28.9	1700
35	146	1.04	41.1	32.5	2180
50	177	0.75	47.5	37.7	3030
70	225	0.56	54.0	42.7	3990
95	273	0.44	61.0	48.4	5360
120	316	0.36	66.0	53.0	6500
150	363	0.31	73.0	58.0	7990
185	414	0.28	80.0	64.0	9910



Lead free



Rated Voltage Uo/U (Um) 450 / 750 V



Cable flexibility Flexible



Chemical resistance Accidental



Water proof Good



Operating temp. -25 .. 55 °C



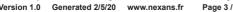
Oil resistance



Max.conductor temp.in service

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Cross	Perm. current rating open air [A]	Voltage drop, single	Max. outer	Min. outer	Approx.
section		phase	diam.	diam.	weight
[mm²]		[V/A.km]	[mm]	[mm]	[kg/km]
240	487	0.23	91.0	72.0	13120

FIVE CORES

Cross section [mm²]	Perm. current rating open air [A]	Voltage drop, single phase [V/A.km]	Max. outer diam. [mm]	Min. outer diam. [mm]	Approx. weight [kg/km]
4	37	8.72	19.9	15.6	453
6	49	5.84	22.2	17.5	557
10	66	3.43	29.1	22.9	1001
16	89	2.2	33.3	26.4	1430
25	119	1.44	40.4	32.0	2096
35	146	1.04	45.1	35.6	2690
50	177	1.04	53.0	41.8	3840
70	225	0.56	60.0	47.5	4996
95	273	0.44	67.0	54.0	6640
120	316	0.37	73.0	58.0	7900
150	363	0.31	83.0	66.0	9960

NEW CORES IDENTIFICATION

Core identification in accordance with HD 308 S2 - Identification of cores in cables and flexible cords.

Number of cores	HD 308 S2 since ja	HD 308 S2 since january 2004						
Number of cores	G (earth core)	X (without earth core)						
1		Black (preferential)						
2	Blue + Brown							
3*	Green - Yellow + Blue + Brown Brown + Black + Grey							
3**		Blue + Brown + Black						
4	Green - Yellow + Brown + Black + Grey	n - Yellow + Brown + Black + Grey Blue + Brown + Black + Grey						
5	5 Green - Yellow + Blue + Brown + Black + Grey Blue + Brown + Black + Grey + Black							
> 5	White printed numbers + 1 Green - Yellow White printed numbers							
* For the cables withou	t Green/Yellow with a cross-section >4mm²							
** For the cables without	ut Green/Yellow with a cross-section of 1,5mm ² & 2,5	5mm²						



Lead free



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Cable flexibility Flexible



Chemical resistance Accidental



Water proof Good



Operating temp.



Oil resistance



Max.conductor temp.in service

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DERATING TABLE

Mobile application: 60°C maximum on core												
Temperature of air ambient °C	30	35	40	45	50	55						
Corrective factor	1	0.91	0.82	0.71	0.58	0.41						
Fixed application: 90°C maximum on core												
Temperature of air ambient °C	30	35	40	45	50	55	60	65	70	75	80	85
Corrective factor	1	0.95	0.91	0.87	0.82	0.76	0.71	0.65	0.58	0.5	0.41	0.29

SELLING INFORMATION

Marking

USE <'HAR> H07RN-FN (x or G) S TITANEX

- N = number of cores
- G = with Green-Yellow
- x = without Green-Yellow
- S = section in mm²



Lead free



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Operating temp.



Oil resistance



Max.conductor temp.in service

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