

# Test Report



**BASEC Client**    **National Cables Industry**

Al Dhaid Road  
Al Sajja Ind. Area  
Sharjah  
United Arab Emirates

**Report No.**    NAC163-4

Number of pages in this Report: 5

**Issue Date**    **26 April 2018**

**Items Tested**    1 sample of Electric Cable

**Specification(s)**    BS EN 50525-2-31:2011  
BASEC PCR Issue 8

**Test Results**    The sample submitted complied with the requirements of the specification for the tests which were requested.

Authorised by:    I McGuinness

Laboratory Manager

Issue Date:    26 April 2018

The results presented in this Test Report relate only to the items tested and to the specific tests carried out. This Test Report does not represent any Approval or Certification by BASEC of the product or of the associated manufacturer. This test Report shall not be reproduced except in full, without written approval of the laboratory.

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## BASEC Report No NAC163-4

Sample 1 sheet 1

### TESTING OF CABLE MANUFACTURED TO BS EN 50525-2-31:2011 Clause 4.1

Circular cable	1 core	Conductor size: 300.0 sqmm
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### F100 TESTS

### ASSESSMENT

#### Indication of origin

Marking printed on insulation:-

1 X 300 mm<sup>2</sup> CU/PVC 450.750V H07V-R BS EN 50525-2-31 (BS 6004), NCI, UAE

PASS

Legible:- PASS

Repeat interval:- 242 mm PASS

Durable:- PASS

PASS

#### Construction

Outer Covering:

RED INSULATION

Type of conductor:

PLAIN ANNEALED Cu

Application of insulation

PASS

Overall assessment of construction

PASS

**NOTE: Where appropriate, values shown in italics indicate specification requirements**

Date samples received: 21/03/18	Date testing commenced: 13/04/18	Tested by: D Gurney
Date job raised: 21/03/18	Date testing completed: 26/04/18	Checked by: I McGuinness
N/A = Not Applicable	N/R = Not Requested	N/T = Not Tested
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Sample 1 sheet 2

### TESTING OF CABLE MANUFACTURED TO BS EN 50525-2-31:2011 Clause 4.1

Circular cable	1 core	Conductor size: 300.0 sqmm
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#### F100 TESTS

#### ASSESSMENT

##### Tests on individual cores

Core I.D. and sequence	Red	PASS
Core colour indelibility	P	PASS
<b>Conductors</b>		
Number of wires	61	PASS
Class of conductor	2	PASS
Resistance (ohms/km)	0.0596	PASS
<b>Insulation Thickness</b>		
Mean (mm)	2.7	PASS
Min (mm)	2.40	PASS

<b>Overall assessment of F100 tests:</b>	<b>PASS</b>
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#### F50 TESTS

#### ASSESSMENT

Heat shock test

Cores	PASS	PASS
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<b>Overall assessment of F50 tests:</b>	<b>PASS</b>
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Sample 1 sheet 3

### TESTING OF CABLE MANUFACTURED TO BS EN 50525-2-31:2011 Clause 4.1

Circular cable	1 core	Conductor size: 300.0 sqmm
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#### F25 TESTS

#### ASSESSMENT

#### Tests on complete cable

Voltage test on non sheathed cable @ 2500 Vac	PASS
Mean Overall Diameter Circular Cable 26.5 (mm)	PASS
Flame propagation single cable	PASS

#### Tensile tests on Cores

Compound	TI1
Core I.D. and sequence	Red
Tensile strength unaged (N/mm <sup>2</sup> )	19.3
Elongation at Break-unaged (%)	245
Tensile strength, aged 80 °C (N/mm <sup>2</sup> )	19.8
% Var Tensile strength, aged 80 °C	2
Elongation @ break after ageing 80 °C (%)	237
% Var.Elongation @ break after ageing 80 °C	-3

Assessment of tensile tests on cores PASS

**Overall assessment of F25 tests:**

**PASS**

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Sample 1 sheet 4

### TESTING OF CABLE MANUFACTURED TO BS EN 50525-2-31:2011 Clause 4.1

Circular cable	1 core	Conductor size: 300.0 sqmm
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#### F5 TESTS

#### ASSESSMENT

Compound	TI1	
Core I.D. and sequence	Red	
Cold Elongation @ -15 °C	P	PASS
Loss of mass mg/cm <sup>2</sup>	0.2	PASS
Hot pressure %	23	PASS
Insulation resistance @ 70°C (Mohms.km)	0.02205	PASS
Resistance of insulation to D.C	P	PASS

Overall assessment of F5 tests:	PASS
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--- END OF REPORT ---

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