



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 1 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
Permanent Facility				
1	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Acetylene	IS 9434:2019 IS 10593:2018 IEC 60567:2011 IEC 60599
2	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Carbon dioxide	IS 9434: 2019 IS 10593:2018 IEC 60567:2011 IEC 60599
3	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Carbon monoxide	IS 9434: 2019 IS 10593:2018 IEC 60567:2011 IEC 60599
4	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Ethane	IS 9434: 2019 IS 10593:2018 IEC 60567:2011 IEC 60599
5	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Ethylene	IS 9434: 2019 IS 10593:2018 IEC 60567:2011 IEC 60599
6	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Hydrogen	IS 9434: 2019 IS 10593:2018 IEC 60567:2011 IEC 60599
7	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Methane	IS:9434:1992 (RA 2013), IS:10593:2018, IEC: 60567: 2011, IEC: 60599
8	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Nitrogen	IS 9434: 2019 IS 10593:2018 IEC 60567:2011 IEC 60599
9	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (Service & New Oil)	Dissolved Gas Analysis-Oxygen	IS 9434: 2019 IS 10593:2018 IEC 60567:2011 IEC 60599
10	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Insulating Oil (In-Service & New Oil)	2-Furfural and related compounds 5-MF	IS 335:2018 & IEC 60296:2020 IS 1866:2017 IEC 60422:2013 IS 15668:2006 (RA 2021) IEC 61198-1993
11	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Insulating Oil (In-Service & New Oil)	DBDS	IS 335:2018 IS 1866:2017 IEC 60296:2020 IEC 60422:2013 IS 16497 (Part 1):2017 IEC 62697-1
12	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Insulating Oil (In-Service & New Oil)	Total PCB Content	IS 335:2018 IEC 60296: 2020 IEC 61619:1997 IS 16082:2013 (RA 2018)
13	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Insulating Oil (In-Service & New Oil)	2-Furfural and related compounds 2-FAL	IS 335:2018 & IEC 60296:2020 IS 1866:2017 IEC 60422:2013 IS 15668:2006 (RA 2021) IEC 61198-1993
14	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Insulating Oil (In-Service & New Oil)	2-Furfural and related compounds 2-FM	IS 335:2018 & IEC 60296:2020 IS 1866:2017 IEC 60422:2013 IS 15668:2006 (RA 2021) IEC 61198-1993



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 2 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
15	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Insulating Oil (In-Service & New Oil)	2-Furfural and related compounds 2-FOL	IS 335:2018 & IEC 60296:2020 IS 1866:2017 IEC 60422:2013 IS 15668:2006 (RA 2021) IEC 61198-1993
16	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Insulating Oil (In-Service & New Oil)	2-Furfural and related compounds 5-HMF	IS 335:2018 & IEC 60296:2020 IS 1866:2017 IEC 60422:2013 IS 15668:2006 (RA 2021) IEC 61198-1993
17	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil	Acidity/Neutralization Value	IS 1866:2017, IEC 60422:2013, IS 335:2018, IEC 60296:2012, IEC 62021-1: 2003, IS 1448(P:2): 2007 (RA: 2018) ISO 6619:
18	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil )	Flash Point	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422:2013, IS 1448(P 21): 2019 ISO 2719:2016 Amd 1
19	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil)	Breakdown Voltage/Electric Strength	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422:2013, IS 6792: 2017 IEC 60156
20	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil)	Color/Appearance	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422-2013, ISO 2049:1996 (RA 2014), IS 335: 2018, IS 1448 (Part:12) RA
21	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil)	Dielectric dissipation factor (DDF)	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422:2013, IEC 60247: 2004, IEC 61620:1998, IS 6262: 1971 (RA 2021), IS 16086:2013 RA
22	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil)	Interfacial Tension	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422:2013, IS 6104:1971 (RA 2021), ASTM D 971:20, EN:14210
23	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil)	Particle content (counting and sizing)	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422:2013, ISO 4406:2021, ISO 4402:1991 IEC 60970:2007, IS 13236: 2013 (RA
24	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil)	Resistivity	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422:2013, IEC 60247:2004, IEC 61620:1998, IS 6103:1971 (RA



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	3 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
25	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil & New Oil)	Water Content	IS 335:2018, IEC 60296:2020, IS 1866:2017, IEC 60422:2013, IEC 60814:1997, IS 2362:1993 (RA:2020), IS 13567
26	CHEMICAL- LUBRICANTS	Inhibited & Un-inhibited Mineral Transformer Oil (In-Service oil)	Sediment & Sludge	Annex C of IS 1866:2017, IS 1866-2017, IEC 60422-2013, IEC 60422
27	ELECTRICAL- CABLES & WIRES	Accessories For cables with rated voltage from 6 kV up to 30 kV	DC withstand Test	IEC 60502 part 4, Table.5,6&7:
28	ELECTRICAL- CABLES & WIRES	Accessories For cables with rated voltage from 6 kV up to 30 kV	Electrical Heat cycle Test /Load Cycle Test	IEC 60502-4
29	ELECTRICAL- CABLES & WIRES	Accessories For cables with rated voltage from 6 kV up to 30 kV	Electrical Heat cycle Test /Load Cycle Test	IEC 60502-4:
30	ELECTRICAL- CABLES & WIRES	Accessories For cables with rated voltage from 6 kV up to 30 kV	Impulse withstand Test	IEC 60502-4, cl.18
31	ELECTRICAL- CABLES & WIRES	Accessories For cables with rated voltage from 6 kV up to 30 kV	Power Frequency Withstand Test/ Dielectric strength	IEC 60502 part 4
32	ELECTRICAL- CABLES & WIRES	Accessories For cables with rated voltage from 6 kV up to 30 kV	Power Frequency Withstand Test/ Dielectric strength	IEC 60502 part 4:
33	ELECTRICAL- CABLES & WIRES	Accessories for Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Armour Resistivity test	IS 13573 Part 2 (RA 2021)& 3 (RA 2016)
34	ELECTRICAL- CABLES & WIRES	Accessories for Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Conductor Resistance test	IS 13573, Part 1 (RA 2016), 2 (RA 2021)& 3 (RA 2016)
35	ELECTRICAL- CABLES & WIRES	Accessories for Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Dielectric Strength tes	IS 13573, Part 1(RA 2016), 2 (RA 2021)& 3 (RA 2016)
36	ELECTRICAL- CABLES & WIRES	Accessories for Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Partial discharge Test	IS 13573-part 2 : 2022 (RA 2021)
37	ELECTRICAL- CABLES & WIRES	Accessories for Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Power frequency withstand test	IS 13573, Part 1 (RA 2016), 2 (RA 2021)& 3 (RA 2016)
38	ELECTRICAL- CABLES & WIRES	Accessories for Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Power frequency withstand test	IS 13573, Part 1 (RA 2016), 2 (RA 2021)& 3 (RA 2016)
39	ELECTRICAL- CABLES & WIRES	Accessories for Extruded power Cables- for working voltages from 3.3kV (UE) to up to and including 33 kV(E)	Impulse withstand Test	IS 13573 part 2 (RA 2021)& 3 (RA 2016)



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

4 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
40	ELECTRICAL- CABLES & WIRES	Accessories for Power Cables from 3.6/6 kV up to 20.8/36 kV	Power Frequency Withstand Test/ Dielectric strength	IEC 60502 Part IV (Table5,6 &7):
41	ELECTRICAL- CABLES & WIRES	Accessories for Power Cables from 3.6/6 kV up to 20.8/36 kV	Power Frequency Withstand Test/ Dielectric strength	IEC 60502 Part IV-(Table5,6 &7):
42	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	Electrical Heat cycle test	BS EN-50393, Cl.8
43	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	Impulse withstand test	BS EN - 50393- (Cl.8):
44	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	Insulation Resistance test	BS EN -50393, Cl.8
45	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	IR Constant test	BS EN-50393, Cl.8
46	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	Mechanical Test: Impact Test	BS EN 50393-(Cl.8):
47	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	Power Frequency Withstand Test/ Dielectric strength	BSEN 50393, cl.8
48	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	Power Frequency Withstand Test/ Dielectric strength	BSEN 50393, cl.8:
49	ELECTRICAL- CABLES & WIRES	Accessories for use on distribution cables of rated voltage 0,6/1,0 (1,2) kV	Volume Resistivity test	BS EN-50393, Cl.8
50	ELECTRICAL- CABLES & WIRES	Accessories for use on power cables of rated voltage from 3.6/6(7.2) kV up to 20.8/36(42) kV	Partial discharge Test	DIN VDE 0278-629-1:
51	ELECTRICAL- CABLES & WIRES	acidity by measuring pH and Conductivity	Halogen Acid Test	IEC 60754-2 + AMD1:2019
52	ELECTRICAL- CABLES & WIRES	ACSR Conductor	Galvanising test(Uniformity of Zinc coating & mass of zinc coating)	IS 398-1 1996 (RA 2018), IS 398-2 1996 (RA 2018), IS 398-5 1992 (RA: ::
53	ELECTRICAL- CABLES & WIRES	ACSR Conductor	Lay Ratio Test	IS 398-1 1996 (RA 2018), IS 398-2 1996 (RA 2018), IS 398-5 1992 RS 2018
54	ELECTRICAL- CABLES & WIRES	ACSR/AAA Conductor	Conductor Resistance measurement	IS 398-1 1996 (RA 2018), IS 398-2 1996 (RA 2018), IS 398-5 1992 (RA:
55	ELECTRICAL- CABLES & WIRES	ACSR/AAA Conductor	Dimension of conductor	IS 398-1 1996 (RA 2018), IS 398-2 1996 (RA 2018), IS 398-5 1992 (RA: :
56	ELECTRICAL- CABLES & WIRES	ACSR/AAA conductor	Mechanical Test/Elongation test	IS 398-1 1996 (RA 2018), IS 398-2 1996 (RA 2018), IS 398-5 1992 (RA:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	5 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
57	ELECTRICAL- CABLES & WIRES	ACSR/AAA conductor	Mechanical Test/Tensile test/Breaking strength	IS 398-1 1996 (RA 2018), IS 398-2 1996 (RA 2018), IS 398-5 1992 (RA: ::
58	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - For working voltages up to and including 1100 Volts	Ageing in air oven	IS 14255 : 1995 cl.10 RA : 2020
59	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - For working voltages up to and including 1100 Volts	Carbon Black content test	IS 14255 : 1995, Cl.10 RA : 2020
60	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - For working voltages up to and including 1100 Volts	Hot Set Test	IS 14255 : 1995, Cl.10 RA : 2020
61	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - For working voltages up to and including 1100 Volts	Shrinkage test	IS 14255 : 1995, Cl.10 RA : 2020
62	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - For working voltages up to and including 1100 Volts	Breaking Strength test	IS 14255 : 1995, Cl.10, RA : 2020
63	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - for working voltages up to and including 1100 Volts	Conductor Resistance test	IS 14255 : 1995, cl. 10, RA : 2020
64	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - For working voltages up to and including 1100 Volts	Volume Resistivity test	IS 14255 : 1995, Cl.10 RA : 2020
65	ELECTRICAL- CABLES & WIRES	Aerial Bunched Cables - For working voltages up to and including 1100V	Thickness and dimension test	IS 14255 : 1995, cl.10, RA : 2020
66	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Electrical Heat cycle test	IEEE Std. 48, Cl.8
67	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Electrical Heat cycle test	IEEE Std. 48, Cl.8:
68	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Impulse withstand Test	IEEE Std-48 cl.8:
69	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Load cycle test	IEEE Std. 48, Cl.8
70	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Load cycle test	IEEE Std.48, Cl.8
71	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Partial discharge Test	IEEE Std-48 (cl. 8):
72	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Power Frequency Withstand Test/ Dielectric strength	IEEE Std-48, cl.8



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 6 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
73	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Power Frequency Withstand Test/ Dielectric strength	IEEE Std-48, cl.8:
74	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Water Penetration test	IEEE Std. 48, Cl.8
75	ELECTRICAL- CABLES & WIRES	Alternating-Current Cable Terminations Used on Shielded Cables Having Laminated Insulation Rated 2.5 kV through 765 kV or Extruded Insulation Rated 2.5 kV through 500 kV	Water Penetration test	IEEE Std. 48, Cl.8:
76	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Halogen acid test	BS 7835 cl.16:
77	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Smoke density test	BS 7835 (cl. 16):
78	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Ageing in Air oven	BS 6622, Cl.15
79	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Annealing test	BS 6622, Cl.15
80	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Bending Test	BS 6622, Cl.15:
81	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Breaking Strength test	BS 6622, Cl.15:
82	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Capacitance Measurement	BS 6622 cl. 15
83	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Carbon Black Content test	BS 6622, Cl.15
84	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Cold Bend test	BS 6622, Cl.15
85	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Cold Elongation test	BS 6622, Cl.15:
86	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Conditioning Test	BS 6622, Cl.15
87	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Conductor Resistance test	BS 6622, Cl.15
88	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Dielectric Strength test	BS 6622, Cl.15
89	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Dimension of Armour Material	BS 6622 cl.15



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 7 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
90	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Electrical Heat Cycle test	BS 6622, Cl.15
91	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Elongation at break	BS 6622, Cl.15
92	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Flame Retardance test (Flammability test)	BS 6622, Cl.15
93	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	BS 6622, Cl.15
94	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Heat Shock test	BS 6622, Cl.15:
95	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Hot Deformation test	BS 6622, Cl.15
96	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Hot Set test	BS 6622, Cl.15:
97	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Impulse withstand Test	BS 6622, cl.15
98	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Insulation Resistance test	BS 6622, Cl.15:
99	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	IR Constant test	BS 6622, Cl.15:
100	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Load Cycle test	BS 6622, Cl.15
101	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Loss of mass test	BS 6622, Cl.15
102	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Mechanical test Cold Impact test	BS 6622, Cl.15:
103	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Mechanical test Tensile strength test	BS 6622, Cl.15
104	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Partial discharge Test	BS 6622 cl. 15
105	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Power frequency withstand test	BS 6622, Cl.15:
106	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Power Frequency Withstand Test/ Dielectric strength	BS 6622 cl. 15
107	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Pressure test at high temperature	BS 6622, Cl.15:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 8 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
108	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Resistivity of Armour test	BS 6622, Cl.15
109	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Shrinkage test	BS 6622, Cl.15
110	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Tan Delta Measurement at ambient & elevated temperature	BS 6622, cl. 15:
111	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Tear Resistance test	BS 6622, Cl.15
112	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	test for Resistance to cracking	BS 6622, Cl.15
113	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Thermal Stability Test for PVC material	BS 6622, Cl.15
114	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Thickness and dimension test	BS 6622 Cl.15
115	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Torsion test	BS 6622, Cl.15
116	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Volume Resistivity test	BS 6622, Cl.15
117	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Water Absorption (Gravimetric)	BS 6622, Cl.15
118	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Water Penetration test	BS 6622, Cl.15
119	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV	Winding test	BS 6622, Cl.15
120	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Mechanical Test Tensile strength test	BS 7835 (cl. 16):
121	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Partial discharge Test	BS 7835 (cl. 16):
122	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Tan delta at ambient and elevated temperature	BS-7835-(Cl.16):
123	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Tear Resistance test	BS 7835, cl.16
124	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Thermal Stability Test for PVC material	BS 7835 (cl. 16):





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 9 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
125	ELECTRICAL- CABLES & WIRES	Armoured cables with thermosetting Insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Thickness and dimension test	BS 7835 cl.16:
126	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Dielectric Strength Test	IEEE Std. 404, Cl.7
127	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Electrical Heat cycle test	IEEE Std-404, cl.7
128	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Electrical Heat cycle test	IEEE Std-404, cl.7::
129	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Impulse withstand test	IEEE Std 404, Cl.7
130	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Load Cycle test	IEEE Std 404, Cl.7: 2012
131	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Load Cycle test	IEEE Std-404, Cl.7
132	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Partial discharge Test	IEEE Std-404 (cl.7):
133	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Power frequency withstand test	IEEE Std 404, Cl.7
134	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -100 kV	Power frequency withstand test	IEEE Std. 404, Cl.7
135	ELECTRICAL- CABLES & WIRES	Cable Joints for use with laminated cable rated 2.5 kV -500 kV	Dielectric Strength test	IEEE Std. 404, Cl.7:
136	ELECTRICAL- CABLES & WIRES	Cables and plastics	Oxygen Index Test	IS 10810 (Part 58):1998, RA:2019
137	ELECTRICAL- CABLES & WIRES	Cables and plastics	Oxygen Index Test, Temperature Index Test	IS 10810 (Part-58 & 64), ASTM D2863-19
138	ELECTRICAL- CABLES & WIRES	Cables and plastics	Smoke Density Test	ASTM D2843
139	ELECTRICAL- CABLES & WIRES	Conductors for insulated cables & Flexible cords	Conductor Resistance test	BS EN 60228-2005, IEC 60228: 3
140	ELECTRICAL- CABLES & WIRES	Conductors for insulated cables & Flexible cords	Conductor resistance test	IS 8130 : 2013, RA : 2018
141	ELECTRICAL- CABLES & WIRES	Conductors for insulated cables & Flexible cords	Resistivity of Armour	BSEN 60228-2005, IEC 60228:
142	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Ageing in air oven	EN 50397-1: 2020, Cl.6



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

10 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
143	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Breaking Strength test (Elongation at break test)	Cl. 6, EN 50397-1: 2020
144	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Carbon Black content test	EN 50397-1, Cl.6 :2020
145	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Conductor Resistance test	EN 50397-1: 2020
146	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Dielectric test	EN 50397-1: 2020
147	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Electrical Heat cycle test	EN 50397-1: 2020
148	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Heat Shock test	EN 50397-1, 2020
149	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Hot Deformation test	EN 50397-1 : 2020
150	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Hot Set Test	EN 50397-1 : 2020
151	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Mechanical test Tensile strength test	EN 50397-1 :2020
152	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Power frequency withstand test	EN 50397-1 :2020
153	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Power frequency withstand test	EN 50397-1: 2020
154	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Shrinkage test	EN 50397-1, Table 2:2020
155	ELECTRICAL- CABLES & WIRES	Covered conductors for overhead lines of rated voltages above 1 KV ac and not exceeding 36 kV ac	Water penetration test	EN 50397-1, Table 2: 2020
156	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 11 kV	Flame Retardancy test (Flammability test)	IS 9968, Part-2, Cl.18
157	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Ageing in air oven	IS 9968, Part-2, Cl.18
158	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Capacitance Measurement	IS 9968 Pt. 2, cl. 18
159	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Carbon Black Content test	IS 9968, Part-2, Cl.18:
160	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Conductor Resistance Test/ Armour resistivity Test	IS 9968 part 2, cl. 22:
161	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Dielectric Strength test	IS 9968, Part-2, Cl.2:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

11 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
162	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Dielectric Strength test	IS 9968, Part-2, Cl.21
163	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Dimension of Armour Material	IS 9968 pt 2
164	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Electrical Heat cycle test	IS 9968, Part-2, Cl.18:
165	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Galvanising test	IS 9968, Part-2, Cl.18:
166	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Hot Set test	IS 9968, Part-2, Cl.18
167	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Insulation Resistance test	IS 9968, Part-2, Cl.18:
168	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	IR Constant test	IS 9968, Part-2, Cl.18
169	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Load Cycle test	IS 9968 Part-2, Cl.18
170	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Mineral Oil Immersion test	IS 9968, part-2, Cl.18
171	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Partial discharge Test	IS 9968 (part 2) cl 18:
172	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Power Frequency withstand test	IS 9968, Part-2, Cl.18
173	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Power Frequency withstand test	IS 9968, Part-2, Cl.18
174	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Pressure test at high temperature	IS 9968, Part-2, Cl.18
175	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Tan Delta Measurement at ambient & elevated temperature	IS 9968 part2, cl.18
176	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Test for Resistance to cracking	IS 9968, Part-2, Cl.18
177	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Thickness and dimension test	IS 9968 pt. 2 cl.18
178	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Uniformity of Zinc Coating (Mass of Zinc Coating)	IS 9968, Part-2, Cl.18: 2002 (RA 2017)
179	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Volume Resistivity test	IS 9968, Part-2, Cl.18:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	12 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
180	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages from 3.3 kV up to and including 33 kV	Water Absorption Test (Electrical)	IS 9968 pt. 2, cl. 21
181	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Ageing in Air Bomb	IS 9968, Part-1 :1988 (RA 2020)
182	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Ageing in Air oven	IS 9968, Part-1, Cl.21 1988 (RA 2020)
183	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Armour Resistivity test	IS 9968, Part-1, Cl.21 : 1988 (RA 2020)
184	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Capacitance Measurement	IS 9968 Pt. 1- Cl.21, 1988 (RA2020)
185	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Conductor Resistance test	IS 9968, Part-1, Cl.21: (RA 2020)
186	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Hot Set test	IS 9968, Part-1 :1988 (RA 2020)
187	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Insulation resistance test	IS 9968, Part-1, Cl.21 :1988 (RA 2020)
188	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Mineral Oil Immersion test	IS 9968, Part-1 :1988 (RA 2020)
189	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Shrinkage test	IS 9968, Part-1 :1988 (RA 2020)
190	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 V	Tan delta at ambient and elevated temperature	IS 9968 Pt. 1, Cl.21, : 1988 (RA 2020)
191	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Bending test	IS 9968 pt.2 cl.18 :2002 (RA 2017)
192	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Dielectric strength test	IS 9968 pt 1 , Cl.21: 1988 (RA 2002)
193	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Dielectric strength test	IS 9968 pt 1, Cl.21
194	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Dimension of Armour Material	IS 9986 pt 1, cl. 21:
195	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 9986 pt 1, cl. 21
196	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	IR Constant test	IS 9968 pt 1, Cl.21 :1988 (RA 2020)
197	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 Volts	Power frequency withstand test	IS 9968, Part-1, Cl.21 :1988 (RA 2020)



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

13 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
198	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 Volts	Power frequency withstand test	IS 9968, Part-1, Cl.21 :1988 (RA 2020)
199	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Thickness and dimension test	IS 9968 pt 1cl.21: 1988 (RA 2020)
200	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Torsion test	IS 9968 pt 1, Cl.21 :1988 (RA 2020)
201	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Volume Resistivity test	IS 9968 pt 1, Cl.21 :1988 (RA 2020)
202	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Water Absorption Test (Electrical)	IS 9968 pt 2, cl.21 :2002 (RA 2017)
203	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Water immersion (Absence of Fault in the insulation)	IS 9968, Part-1, Cl.21 :1988 (RA 2020)
204	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Water Immersion test (Absence of faults in the insulation)	IS 9968, Part-1, Cl.21: 1988 (RA2020)
205	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Winding test	IS 9968 pt 1, Cl.21 :1988 (RA 2020)
206	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Winding test	IS 9968 pt.2 cl.18 :2002 (RA 2017)
207	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages Up to and including 1100 Volts	Wrapping test	IS 9968, Part-1, Cl.18 :1988 (RA 2020)
208	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Cables for working voltages up to and including 1100 Volts	Wrapping test	IS 9968, Part-1, Cl.21 :1988
209	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Ageing in Air Bomb	IS 14494, cl.25:
210	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Ageing in air oven	IS 14494, cl.25:
211	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Armour Resistivity test	IS 14494, cl.25:
212	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Bending test	IS 14494, cl.25:
213	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Capacitance Measurement	IS 14494, cl. 25
214	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Carbon Black content test	IS 14494, cl.25
215	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Conductor Resistance test	IS 14494, cl.25:
216	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Dielectric Strength test	IS 14494, cl.25



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A,  
INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH,  
INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

14 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
217	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Dielectric Strength test	IS 14494, cl.25:
218	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Dimension of Armour Material	IS 14494 cl. 25
219	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Electrical Heating Cycle test	IS 14494, cl.25:
220	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Flame Retardancy test (Sweedish Chimney test)	IS 14494, cl.25
221	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Flame Retardant test (Flammability test)	IS 14494, cl.25
222	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 14494 cl.25
223	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Heat Shock test	IS 14494, cl.25:
224	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Hot Deformation test	IS 14494, cl.25
225	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Hot Set test	IS 14494, cl.25
226	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Insulation Resistance test	IS 14494, cl.25
227	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Loss of mass test	IS 14494, cl.25:
228	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Mineral Oil Immersion test	IS 14494, cl.25
229	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Partial discharge Test	IS 14494, cl. 25
230	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Power frequency withstand test	IS 14494, cl.25
231	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Power frequency withstand test	IS 14494, cl.25
232	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Pressure test at high temperature	IS 14494, cl.25:
233	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Resistivity of Armour test	IS 14494, cl.25:
234	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Shrinkage test	IS 14494, cl.25:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	15 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
235	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Tan Delta Measurement at ambient & elevated temperature	IS 14494, cl. 25
236	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Test for Resistance to cracking	IS 14494, cl.25
237	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Thickness and dimension test	IS 14494 cl.25:
238	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Torsion test	IS 14494, cl.25
239	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Volume Resistivity test	IS 14494, cl.25:
240	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Water Absorption Test (Electrical)	IS 14494, cl.25:
241	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Water penetration test	IS 14494, cl.25
242	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Winding test	IS 14494, cl.25
243	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for use in Mines	Wrapping test	IS 14494, cl.25
244	ELECTRICAL- CABLES & WIRES	Elastomer insulated Flexible cables for use in mines Elastomer Insulated Flexible Cables for working voltages upto including 1100 Volts	Mechanical test Tensile strength test	IS 14494, cl.25
245	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for working voltages from 3.3 kV upto including 1100 Volts	Mechanical test Tensile Strength test	IS 9968 : Part 1 : 1988 ( RA:2020 ), Cl.18
246	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for working voltages from 3.3 kV upto including 1100 Volts	Mechanical test Tensile strength test	IS 9968, Part-2, Cl.18 :2002 (RA 2017)
247	ELECTRICAL- CABLES & WIRES	Elastomer Insulated Flexible Cables for working voltages from 3.3 kV upto including 1100 Volts	Tear Resistance test	IS 9968, Part-2, Cl.18 : 2002 (RA 2017)
248	ELECTRICAL- CABLES & WIRES	Elastomer insulated Flexible cables for use in mines Elastomer Insulated Flexible Cables for working voltages upto including 1100 Volts	Tear Resistance test	IS 14494, cl.25
249	ELECTRICAL- CABLES & WIRES	Elastomer Insulation & Sheath of electric Cables	Water Absorption Test (Electrical)	IS 6380 : 1984, RA : 2021
250	ELECTRICAL- CABLES & WIRES	Electric & Optical fibre Cables	Flame Retardant test (Flammability test)	IEC 60332-1-1-2004, Am1 IEC 60332-1-2-2004, Am1 IEC 60332-1-3, Am1:
251	ELECTRICAL- CABLES & WIRES	Electric & Optical fibre Cables	Flame Retardant test (Flammability test)	IEC 60332-2-1-2004 IEC 60332-2-2:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

16 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
252	ELECTRICAL- CABLES & WIRES	Electric and optical fibre cables	Cold bend test	IEC 60811-504
253	ELECTRICAL- CABLES & WIRES	Electric and optical fibre cables	Cold Elongation test	IEC 60811-505
254	ELECTRICAL- CABLES & WIRES	Electric and optical fibre cables	Mechanical test-Cold Impact test	IEC 60811-506
255	ELECTRICAL- CABLES & WIRES	Electric Cables	Flame retardant Test for Bunched Cables	IEC 60332-3-10-00, IEC 60332-3-21-00, IEC 60332-3-22-00, IEC 60332-3-23-00, IEC 60332-23-00, IEC 60332-3-24-00, IEC 60332-3-25-00, IEEE 383:
256	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Ageing in air bomb	BS 6004 : 2012 cl.8 + A1: 2020
257	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Ageing in air oven	BS 6004 : 2012 cl.8 + A1: 2020
258	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Annealing test	BS 6004 : 2012 cl.8 + A1: 2020
259	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Armour Resistivity test	BS 6004 : 2012 cl.7 + A1: 2020
260	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Breaking Strength test (Elongation at break)	BS 6004 : 2012 cl.8 + A1: 2020
261	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Carbon Black Content test	BS 6004 : 2012 cl.8 + A1: 2020
262	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Cold Bend test	BS 6004 : 2012 cl.8 + A1: 2020
263	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Cold Elongation test	BS 6004 : 2012 cl.8 + A1: 2020
264	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Conductor Resistance test	BS 6004 : 2012 cl.8 + A1: 2020





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	17 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
265	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	DC withstand Test	BS 6004 : 2012 cl.17 + A1: 2020
266	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Dielectric strength test	BS 6004 : 2012 cl.7 + A1: 2020
267	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Dielectric Strength test	BS 6004 : 2012 cl.7 + A1: 2020
268	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Flame Retardance test (Flammability test)	BS 6004 : 2012 cl.8 + A1: 2020
269	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Heat Shock test	BS 6004 : 2012 cl.8 + A1: 2020
270	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Hot Deformation test	BS 6004 : 2012 cl.8 + A1: 2020
271	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Hot Set test	BS 6004 : 2012 cl.8 + A1: 2020
272	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Insulation Resistance test	BS 6004 : 2012 cl.8 + A1: 2020
273	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	IR Constant test	BS 6004 : 2012 cl.16 + A1: 2020
274	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Loss of mass test	BS 6004 : 2012 cl.8 + A1: 2020
275	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Mechanical test Cold Impact test	BS 6004 : 2012 cl.8 + A1: 2020
276	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Mechanical test Tensile strength test	BS 6004 : 2012 cl.8 + A1: 2020
277	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Power Frequency withstand test	BS 6004 : 2012 cl.8 + A1: 2020
278	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Power frequency withstand test	BS 6004 : 2012 cl.8 + A1: 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	18 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
279	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Pressure test at high temperature	BS 6004 : 2012 cl.8 + A1: 2020
280	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Shrinkage test	BS 6004 : 2012 cl.8 + A1: 2020
281	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Tear Resistance test	BS 6004 : 2012 cl.8 + A1: 2020
282	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Test for Resistance to cracking	BS 6004 : 2012 cl.8 + A1: 2020
283	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Thermal Stability Test for PVC material	BS 6004 : 2012 cl.8 + A1: 2020
284	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Thickness and dimension test	BS 6004 : 2012 cl.7 + A1: 2020
285	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Volume Resistivity test	BS 6004 : 2012 cl.16 + A1: 2020
286	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Water immersion test (Absence of faults in the insulation)	BS 6004 : 2012 cl.8 + A1: 2020
287	ELECTRICAL- CABLES & WIRES	Electric Cables – PVC insulated and PVC Sheathed cables for voltages up to and including 300/500 V, for electric Power and lighting	Water immersion test (Absence of faults in the insulation)	BS 6004 : 2012 cl.8 + A1: 2020
288	ELECTRICAL- CABLES & WIRES	Electric cables - Thermosetting insulated and thermoplastic sheathed cables for voltages upto and including 450/750 V, for electric power and lighting and having low emission of smoke and corrosive gases when affected by fire	Halogen Acid test	BS 7211 :2012, Cl.12 + A1 :2020
289	ELECTRICAL- CABLES & WIRES	Electric cables - Thermosetting insulated and thermoplastic sheathed cables for voltages upto and including 450/750 V, for electric power and lighting and having low emission of smoke and corrosive gases when affected by fire	Flame Retardance test (Flammability test)	BS 7211 :2012, Cl.12 + A1 :2020
290	ELECTRICAL- CABLES & WIRES	Electric cables - Thermosetting insulated and thermoplastic sheathed cables for voltages upto and including 450/750 V, for electric power and lighting and having low emission of smoke and corrosive gases when affected by fire	Flame Retardance test on Bunch of Cables	BS 7211 :2012, Cl.12 + A1 :2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 19 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
291	ELECTRICAL- CABLES & WIRES	Electric cables - Thermosetting insulated and thermoplastic sheathed cables for voltages upto and including 450/750 V, for electric power and lighting and having low emission of smoke and corrosive gases when affected by fire	Smoke Density Test	BS 7211 :2012, Cl.12 + A1 :2020
292	ELECTRICAL- CABLES & WIRES	Electric Cables - Thermosetting insulated, armoured cables of rated voltages 600/1000 V & 1900/3300 V for fixed installation	Insulation Resistance test	BS 5467 cl.14
293	ELECTRICAL- CABLES & WIRES	Electric Cables - Thermosetting insulated, armoured cables of rated voltages 600/1000 V & 1900/3300 V for fixed installation	IR Constant test	BS 5467 cl.14
294	ELECTRICAL- CABLES & WIRES	Electric Cables - Thermosetting insulated, armoured cables of rated voltages 600/1000 V & 1900/3300 V for fixed installation	Volume Resistivity test	BS 5467 cl.14
295	ELECTRICAL- CABLES & WIRES	Electric cables - thermosetting insulated, armoured, fire-resistant cables of rated voltage 600/1000 v, having low emission of smoke and corrosive gases	Halogen Acid Test	BS 7846 cl.14
296	ELECTRICAL- CABLES & WIRES	Electric cables - thermosetting insulated, armoured, fire-resistant cables of rated voltage 600/1000 v, having low emission of smoke and corrosive gases	Smoke Emission Test	BS 7846 cl.14
297	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Flame Retardant test (Flammability test)	BS 7835 (cl. 16)
298	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Ageing in Air Oven	BS 6724, cl. 14
299	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Annealing test	BS 6724, cl. 14
300	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Bending test	BS 6724, cl. 14
301	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Breaking Strength (Elongation at break)	BS 6724, cl. 14
302	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Carbon Black content test	BS 6724, cl. 14



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	20 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
303	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Cold Bend test	BS 6724, cl. 14:
304	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Cold Elongation test	BS 6724, cl. 14:
305	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Dimension of Armour Material	BS 6724 cl. 14
306	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Fire Retardant test (Flammability Test)	BS 6724, cl. 14
307	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Flame Retardant test on Bunched Cables	BS 6724, cl. 14
308	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Heat Shock test	BS 6724, cl. 14
309	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Hot Deformation test	BS 6724, cl. 14
310	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Hot set test	BS 6724, cl. 14
311	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Insulation Resistance test	BS 6724, cl. 14
312	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	IR Contant test	BS 6724, cl. 14
313	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Loss of mass test	BS 6724, cl. 14



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 21 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
314	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Mechanical test Cold Impact test	BS 6724, cl. 14
315	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Mechanical test tensile test	BS 6724, cl. 14
316	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Pressure test at high temperature	BS 6724, cl. 14:
317	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Shrinkage test	BS 6724, cl. 14
318	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Smoke Density Test	BS 6724 cl.14
319	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Thickness and dimension test	BS 6724 cl.14
320	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Volume Resistivity test	BS 6724, cl. 14
321	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Winding test	BS 6724, cl. 14
322	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Wrapping test	BS 6724, cl. 14:
323	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke and corrosive gases	Flame Retardance test on Bunch of cables	BS 7835 (cl. 16)
324	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	BS 6724 cl.14



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

22 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
325	ELECTRICAL- CABLES & WIRES	Electric Cables Armoured cables with thermosetting insulation for rated voltages 600/1000 V and 1900/3300 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Halogen Acid Test	BS 6724 cl.14
326	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Ageing in Air Bomb	BS 6231, Cl.11:
327	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Ageing in Air Oven	BS 6231, Cl.11
328	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Annealing test	BS 6231, Cl.11
329	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Breaking Strength test (Elongation at Break)	BS 6231, Cl.11
330	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Carbon Black content test	BS 6231, Cl.11
331	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Cold Bend test	BS 6231, Cl.11
332	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Cold Elongation test	BS 6231, Cl.11
333	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Dielectric Strength test	BS 6231, Cl.11
334	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Dielectric Strength test	BS 6231, Cl.11:
335	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Fire Retardant/ Flammability Test	BS 6231 cl. 11:
336	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Heat Shock test	BS 6231, Cl.11
337	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Hot Deformation test	BS 6231, Cl.11



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	23 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
338	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Loss of mass test	BS 6231, Cl.11
339	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Mechanical test Cold Impact test	BS 6231, Cl.11:
340	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Mechanical test Tensile test	BS 6231, Cl.11
341	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Power frequency test	BS 6231, Cl.11
342	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Power Frequency withstand test	BS 6231, Cl.11
343	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Pressure test at high temperature	BS 6231, Cl.11
344	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Shrinkage test	BS 6231, Cl.11
345	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Test for resistance to cracking	BS 6231, Cl.11:
346	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Thermal Stability Test for PVC material	BS 6231 cl.11
347	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Water Immersion test (Absence of faults in the insulation)	BS 6231, Cl.11
348	ELECTRICAL- CABLES & WIRES	Electric cables single core PVC insulated flexible cables of rated voltage 600/1000 V for switchgear and control gear wiring	Water Immersion test (Absence of faults in the insulation)	BS 6231, Cl.11
349	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Cold Bend test	BS 7846, Cl.14
350	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Cold Elongation test	BS 7846, Cl.14



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	24 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
351	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Mechanical test Cold Impact test	BS 7846, Cl.14:
352	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Water Absorption (Gravimetric)	BS 6724, cl.14
353	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured fire resistant cables for rated voltage 600/1000 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Armour resistivity test	BS 7846, Cl.14:
354	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured fire resistant cables for rated voltage 600/1000 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Conductor resistance test	BS 7846, Cl.14:
355	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured fire resistant cables for rated voltage 600/1000 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Flame Retardance test on Bunched Cables	BS 7846, Cl.14
356	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured fire resistant cables for rated voltage 600/1000 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Flame Retardancy test ( Flammability test)	BS 7846, Cl.14
357	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured fire resistant cables for rated voltage 600/1000 V for fixed installations, having low emission of smoke and corrosive gases when affected by fire	Halogen Acid Test	BS 7846 cl.14:
358	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Annealing test	BS 7846, Cl.14:
359	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Breaking strength test (Elongation at break)	BS 7846, Cl.14:
360	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Cold Bend Test	BS 7846, Cl.19
361	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Cold Elongation test	BS 7846, Cl.19:





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 25 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
362	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Dielectric withstand test	BS 7846, Cl.14:
363	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Dielectric Withstand test	BS 7846, Cl.14:
364	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Dimension of Armour Material	BS 7846, cl.14
365	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	BS 7846 cl.14
366	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Insulation Resistance test	BS 7846, Cl.14:
367	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	IR Constant test	BS 7846, Cl.14
368	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Mechanical test Cold impact test	BS 7846, Cl.14
369	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Mechanical test Tensile test	BS 7846, Cl.14:
370	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Power frequency withstand test	BS 7846, Cl.14
371	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Power frequency withstand test	BS 7846, Cl.14:
372	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Thickness and dimension test	BS 7846 cl.14



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	26 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
373	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Torsion test	BS 7846, Cl.14
374	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Volume Resistivity test	BS 7846, Cl.14:
375	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Water Absorption (Gravimetric)	BS 7846 cl. 14:
376	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Winding test	BS 7846, Cl.14
377	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated armoured Fire resistant cable of rated voltage 600/1000 V having low emission of smoke and corrosive gases when affected by fire	Wrapping test	BS 7846, Cl.14
378	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrive gases	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	BS 7211 :2012, Cl.12 + A1 :2020
379	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Ageing in air oven	BS 7211 :2012, Cl.12 + A1 :2020
380	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Annealing test	BS 7211 :2012, Cl.12 + A1 :2020
381	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Breaking Strength (Elongation at break)	BS 7211 :2012, Cl.12 + A1 :2020
382	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Cold Bend test	BS 7211 :2012, Cl.12 + A1 :2020
383	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Cold Elongation test	BS 7211 :2012, Cl.12 + A1 :2020
384	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Conductor Resistance test	BS 6724, cl. 14



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223

**Validity** 17/12/2022 to 16/12/2024

**Page No** 27 of 96

**Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
385	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Conductor Resistance test	BS 7211 :2012, Cl.12 + A1 :2020
386	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Dielectric withstand test	BS 7211 :2012, Cl.12 + A1 :2020
387	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Dielectric withstand test	BS 7211 :2012, Cl.12 + A1 :2020
388	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Frequency withstand test	BS 7211 :2012, Cl.12 + A1 :2020
389	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Hot set test	BS 7211 :2012, Cl.12 + A1 :2020
390	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Insulation Resistance test	BS 7211 :2012, Cl.12 + A1 :2020
391	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	IR Constant test	BS 7211 :2012, Cl.12 + A1 :2020
392	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Loss of mass test	BS 7211 :2012, Cl.12 + A1 :2020
393	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Mechanical test Cold Impact test	BS 7211 :2012, Cl.12 + A1 :2020
394	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Mechanical test Tensile test	BS 7211 :2012, Cl.12 + A1 :2020
395	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Pressure test at high temperature	BS 7211 :2012, Cl.12 + A1 :2020
396	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Shrinkage test	BS 7211 :2012, Cl.12 + A1 :2020
397	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Test for Resistance to cracking	BS 7211 :2012, Cl.12 + A1 :2020
398	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Thickness and dimension test	BS 7211 :2012, Cl.12 + A1 :2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A,  
INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH,  
INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

28 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
399	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Volume resistivity test	BS 7211 :2012, Cl.12 + A1 :2020
400	ELECTRICAL- CABLES & WIRES	Electric cables- Thermosetting insulated non armoured cables for voltages up to and including 450/750 V and having low emission of smoke and corrosive gases	Water Absorption (Gravimetric)	BS 7211 :2012, Cl.12 + A1 :2020
401	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Ageing in air oven	BS 7835 (cl. 16):
402	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Bending test	BS 7835 (cl. 16)
403	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Capacitance Measurement	BS 7835, Cl.16
404	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Carbon Black Content test	BS 7835 (cl. 16)
405	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Cold Bend test	BS 7835 (cl. 16):
406	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Cold Elongation test	BS 7835 (cl. 16):
407	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Conditioning test	BS 7835 (cl. 16):
408	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Dielectric Strength test	BS 7835 (cl. 16)
409	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Dielectric Withstand test	BS 7835 (cl. 16):
410	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Dimension of Armour Material	BS 7835, cl.16
411	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Electrical Heat Cycle test	BS 7835 (cl. 16):
412	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Flame Retardance test (Flammability test)	BS 7835 (cl. 16):



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017	<b>Page No</b>	29 of 96
<b>Certificate Number</b>	TC-5223	<b>Last Amended on</b>	18/02/2023
<b>Validity</b>	17/12/2022 to 16/12/2024		

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
413	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Flame Retardant test on Bunched Cables	BS 7835 (cl. 16):
414	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Heat Shock test	BS 7835 (cl. 16)
415	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Hot Deformation test	BS 7835 (cl. 16):
416	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Hot set test	BS 7835 (cl. 16):
417	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Impulse withstand Test	BS 7835, cl.16
418	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Insulation Resistance test	BS 7835 (cl. 16):
419	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	IR Constant test	BS 7835 (cl. 16):
420	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Loss of mass test	BS 7835 (cl. 16)
421	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Mechanical test Cold impact test	BS 7835 (cl. 16):
422	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Power frequency withstand test	BS 7835 (cl. 16)
423	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Power frequency withstand test	BS 7835 (cl. 16):
424	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Pressure test at high temperature	BS 7835 (cl. 16)
425	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Shrinkage test	BS 7835 (cl. 16):
426	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Tan Delta Measurement at ambient & elevated temperature	BS-7835, cl.16



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 30 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
427	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Test for Resistance to cracking	BS 7835 (cl. 16):
428	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Torsion test	BS 7835 (cl. 16):
429	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Volume Resistivity test	BS 7835 (cl. 16):
430	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Water Absorption (Gravimetric)	BS 7835, cl.16
431	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Water Penetration test	BS 7835 (cl. 16):
432	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Winding test	BS 7835 (cl. 16):
433	ELECTRICAL- CABLES & WIRES	Electric cables. Armoured cables with thermosetting insulation for rated voltages from 3.8/6.6 kV to 19/33 kV having low emission of smoke	Wrapping test	BS 7835 (cl. 16):
434	ELECTRICAL- CABLES & WIRES	Electrical Insulating mat for electrical Purpose	Ageing in air oven	IS 15652:2006, amtNo.1 & Amt.2 RA : 2016
435	ELECTRICAL- CABLES & WIRES	Electrical insulating mat for Electrical purposes	Fire resistance /Flammability test	IS 15652:2006, Amt 1, Amt.2, RA : 2016
436	ELECTRICAL- CABLES & WIRES	Electrical Insulating mat for Electrical Purposes	Insulation Resistance test	IS 15652:2006, Amt. No.1 ,Amt.2, RA : 2016
437	ELECTRICAL- CABLES & WIRES	Electrical Insulating mat for Electrical purposes	Mechanical test/Elongation test	IS 15652:2006, Amt.1 & Amt.2, RA : 2016
438	ELECTRICAL- CABLES & WIRES	Electrical Insulating mat for Electrical Purposes	Mechanical Test/Tensile test/Breaking strength	IS 15652:2006, Amt.1, Amt.2, RA : 2016
439	ELECTRICAL- CABLES & WIRES	Electrical Insulating mat for electrical Purposes	Thickness and Dimension test	IS 15652:2006, Amt. no.1 ,Amt.No.2, RA : 2016
440	ELECTRICAL- CABLES & WIRES	Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Load Cycle test	IS 13573 Part-1 (RA 2016), 2 (RA 2021)& 3 (RA 2016):
441	ELECTRICAL- CABLES & WIRES	Extruded power Cables- for working voltages for 1.1kV up to 3.3 kV, from 3.3kV (UE) to up to and including 33 kV(E)	Load Cycle test	IS 13573, part-1 (RA 2016), 2 (RA 2021)& 3 (RA 2016)
442	ELECTRICAL- CABLES & WIRES	Hot Dipped Galvanised coating on round steel wires	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 4826 : 1979, RA : 2021



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 31 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
443	ELECTRICAL- CABLES & WIRES	Impregnated paper-insulated lead or lead alloy sheathed electric cables of rated voltages up to and including 33 000 V	Thickness and dimension test	BS 6480-am1,am2(Cl.19):
444	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for current Transformers	Capacitance Measurement	IEC 61869-2(Cl.7.4.3.);:
445	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for current Transformers	Capacitance Measurement	IS 16227 : Part 2 : 2016 , RA : 2021
446	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for current Transformers	Partial discharge Test	IEC 61869-2 cl. 7.3.1
447	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for current Transformers	Partial Discharge test	IS 16227 : Part 2 : 2016 , RA : 2021
448	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for current Transformers	Tan Delta Measurement	IEC 61869-2, Cl. 7.4.3
449	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for current Transformers	Tan Delta Measurement	IS 16227 : Part 2 : 2016 , RA : 2021
450	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for Voltage Transformers	Capacitance Measurement	IS 16227 : Part 5 : 2015 , RA : 2020
451	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for Voltage Transformers	Capacitance Measurement	IEC 61869-3 (Cl.7.4.3
452	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for Voltage Transformers	Tan Delta Measurement	IS 16227 : Part 5 : 2015 , RA : 2020
453	ELECTRICAL- CABLES & WIRES	Instrument Transformers- Additional Requirements for Voltage Transformers	Tan Delta Measurement	IEC 61869 part 3
454	ELECTRICAL- CABLES & WIRES	Instrument Transformers- General Requirements	Capacitance Measurement	IEC 61869-1, cl. 7.4.3
455	ELECTRICAL- CABLES & WIRES	Instrument Transformers- General Requirements	Capacitance Measurement	IS 16227 : Part 1
456	ELECTRICAL- CABLES & WIRES	Instrument Transformers- General Requirements	Partial discharge Test	IEC 61869-1, cl. 7.3.2:
457	ELECTRICAL- CABLES & WIRES	Instrument Transformers- General Requirements	Partial Discharge test	IS-16227 Part-I
458	ELECTRICAL- CABLES & WIRES	Instrument Transformers- General Requirements	Tan Delta Measurement	IS 16227 : Part 1
459	ELECTRICAL- CABLES & WIRES	Instrument Transformers- General Requirements	Tan Delta Measurement at ambient	IEC 61869-1, cl. 7.4.3



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 32 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
460	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Ageing in air oven	IS 10810 pt. 10,11,12,14,15,16& 30 1984, RA: 2021, IEC 60811-404,409,412,502,503,508,509 &507
461	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Breaking Strength test (Elongation at break test)	IS 10810 part 10,11,12,14,15,16 & 30
462	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Carbon Black content test	IS 10810 (Part 32):1984, RA:2021,IEC 60811-605
463	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Heat Shock test	IS 10810 pt. 10,11,12,14,15,16& 30 1984, IEC 60811-404,409,412,502,503,508,509 &507:
464	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Hot Deformation test	IS 10810 pt. 10,11,12,14,15,16& 30 1984,RA : 2021 IEC 60811-404,409,412,502,503,508,509 &507:
465	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Hot set test	IS 10810 9Part 30):1984, RA:2021, IEC 60811-507
466	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Loss of mass test	IS 10810 pt. 10,11,12,14,15,16& 30 1984, IEC 60811-404,409,412,502,503,508,509 &507
467	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Mechanical test Tensile Strength test	IS 10810 part 10,11,12,14,15,16 & 30:
468	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Mineral oil immersion test	IS 10810 (Part 31):1984, RA:2021, IEC 60811-404
469	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Pressure test at high temperature	IS 10810 : PART- 10,11,12,14,15,16& 30 1984, RA: 2021, IEC 60811-404,409,412,502,503,508,509 &507:
470	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Shrinkage test	IS 10810 pt. 10,11,12,14,15,16& 30 1984, IEC 60811-404,409,412,502,503,508,509 &507:
471	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Tear Resistance test	IS 10810 part 10,11,12,14,15,16 & 30





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	33 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
472	ELECTRICAL- CABLES & WIRES	Insulating and sheathing material of electric cables	Test for resistance for cracking	IS 10810 pt. 10,11,12,14,15,16& 30 1984, RA : 2021 IEC 60811-404,409,412,502,503,508,509 &507
473	ELECTRICAL- CABLES & WIRES	Insulating and sheathing materials of electric Cables	Mechanical test Tensile strength test	IEC 60811 501 : 2012 + AMD1 : 2018
474	ELECTRICAL- CABLES & WIRES	Insulating and sheathing materials of electric Cables	Tear Resistance test	IEC 60811-501
475	ELECTRICAL- CABLES & WIRES	Insulating and sheathing materials of electric cables	Thermal Stability Test for PVC material	IEC 60811-405
476	ELECTRICAL- CABLES & WIRES	Insulating and sheathing materials of electric Cables	Water Absorption (Electrical)	IEC 60811-402
477	ELECTRICAL- CABLES & WIRES	Insulating and sheathing materials of electric Cables	Water Absorption Test (Gravimetric)	IEC 60811-402
478	ELECTRICAL- CABLES & WIRES	Insulating mat for Electrical Purposes	Power Frequency withstand test/Dielectric strength	IS 15652:2006, Amt.No.1, Amt. No.2, RA : 2016
479	ELECTRICAL- CABLES & WIRES	Joints and Termination of Polymeric Cables for working voltages from 6.6kV up to and including 33 kV	Mechanical Test: Impact Test	IS 13573 part 2 (RA 2021) & part 3 (RA 2016)
480	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Dielectric withstand test	BS 7870-4.10 Table 5, Am1 : 2016,
481	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Annealing test	BS 7870-1:
482	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Capacitance Measurement	BS 7870-4.10 Table 5, Am1 : 2016
483	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Electrical Heat Cycle test	BS 7870-4.10 Am1 : 2016
484	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Impulse withstand test	BS 7870-4.10 Table 5, Am1 : 2016
485	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Mechanical Test Tensile test	BS 7870-1:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 34 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
486	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Partial Discharge test	BS 7870-4.10 Table 5, Am1 : 2016
487	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Power frequency withstand test	BS 7870-4.10 Table 5, Am1 : 2016
488	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Power frequency withstand test	BS 7870-4.10 Table 5, Am1 : 2016,
489	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Tan delta at ambient and elevated temperature	BS 7870-4.10 Table 5, Am1 : 2016,
490	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Water penetration test	BS 7870-4.10 Table 5, Am1 : 2016,
491	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33kV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33 kV	Dielectric strength test	BS 7870-4.10 Table 5, Am1 : 2016,
492	ELECTRICAL- CABLES & WIRES	LV & MV Polymeric Insulated Cables for use by distribution and generation Utilites-Specification for distribution cables with extruded insulation or rated voltages of 11 kV to 33kV	Breaking Strength (Elongation at break test)	BS 7870-1:
493	ELECTRICAL- CABLES & WIRES	Mild Steel wires, Formed wires And tapes For armouring of Cables	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 3975, cl.9 :1999, RA : 2021
494	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Ageing in air oven	IS 692 : 1999, cl.24 RA : 2020
495	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Armour Resistivity Test	IS 692 cl.24 : 1999, RA : 2020
496	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Breaking strength test (Elongation at break test)	IS 692 : 1999, cl.24 RA : 2020
497	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Capacitance Measurement	IS 692 : 1999, cl.24 RA : 2020
498	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Conductor Resistance test	IS 692 : 1999, cl.24 RA : 2020
499	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Dielectric Strength Test	IS 692 : 1999, cl.24 RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	35 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
500	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Dielectric Strength test	IS 692 : 1999, cl.24 RA : 2020
501	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Dimension of Armour Material	IS 692 : 1994, RA 2020
502	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Flame Retardant test (Flammability test)	IS 692 : 1999, cl.24 RA : 2020
503	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 692 : 1999, cl.24 Am I, am II (Cl.24 RA : 2020)
504	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Heat Shock test	IS 692 : 1999, cl.24 RA : 2020
505	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Hot Deformation Test	IS 692 : 1999, cl.24 RA : 2020
506	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Insulation Resistance test	IS 692 : 1999, cl.24 RA : 2020
507	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	IR Constant	IS 692 : 1999, cl.24 RA : 2020
508	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Loss of Mass test	IS 692:1999, Cl.24 RA:2020
509	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Mechanical test Tensile strength test	IS 692 : 1999, cl.24 RA : 2020
510	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Power frequency withstand test	IS 692 : 1999, cl.24 RA : 2020
511	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Power frequency withstand test	IS 692 : 1999, cl.24 RA : 2020
512	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Pressure test at High Temperature	IS 692 : 1999, cl.24 RA : 2020
513	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Shrinkage test	IS 692 : 1999, cl.24 RA : 2020
514	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Tan Delta Measurement at ambient and elevated temperature	IS 692 : 1999, cl.24 RA : 2020
515	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Tear Resistance test	IS 692 : 1999, cl.24 RA : 2020
516	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Tests for resistance to cracking	IS 692 : 1999, cl.24 RA : 2020
517	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Thickness and dimension test	IS 692 : 1999, cl.24 RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

36 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
518	ELECTRICAL- CABLES & WIRES	Paper Insulated Lead Sheathed Cables for rated Voltages up to and including 33 kV	Volume Resistivity Test	IS 692 : 1999, cl.24 RA : 2020
519	ELECTRICAL- CABLES & WIRES	Plastics and Cables	Oxygen Index Test and Temperature Index Test	ASTM D2863
520	ELECTRICAL- CABLES & WIRES	Polyvinyl Chloride Insulated Cables of rated Voltages up to and including 450/750 Volts	Annealing test	IEC 60227 (Part I to VI), Cl.12
521	ELECTRICAL- CABLES & WIRES	Polyvinyl Chloride Insulated Cables of rated Voltages up to and including 450/750 Volts	Breaking Strength test (Elongation at break test)	IEC 60227 (Part I to VI), Cl.12
522	ELECTRICAL- CABLES & WIRES	Polyvinyl Chloride Insulated Cables of rated Voltages up to and including 450/750 Volts	Conductor Resistance test	IEC 60227(Part I to VI), Cl.12
523	ELECTRICAL- CABLES & WIRES	Polyvinyl Chloride Insulated Cables of rated Voltages up to and including 450/750 Volts	Mechanical test Tensile test	IEC 60227 (Part I to VI), Cl.12
524	ELECTRICAL- CABLES & WIRES	Power Cable	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 2633: 1986 , RA : 2021
525	ELECTRICAL- CABLES & WIRES	Power Cable	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 6745:1972, RA : 2021
526	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages 3.3kV upto 30 kV	Load Cycle test	DIN VDE 0278-629-1
527	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages 3.3kV upto 30 kV	Load Cycle test	DIN VDE 0278-629-1
528	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U up to 30 kV	Dielectric Strength test	DIN VDE 0278-629-1
529	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U up to 30 kV	Dielectric strength test	DIN VDE 0278-629-1:
530	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U up to 30 kV	Impulse withstand test	DIN 61442
531	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U up to 30 kV	Power frequency test	DIN VDE 0278-629-1
532	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U up to 30 kV	Power Frequency test	DIN VDE 0278-629-1
533	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U up to 36 kV	DC withstand Test	DIN VDE 0278-629-1:
534	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U upto 30 kV	Mechanical test Cold Impact test	IEC 60502-4
535	ELECTRICAL- CABLES & WIRES	Power Cable Accessories with Nominal voltages U upto 30 kV	Mechanical Test: Impact Test	DIN VDE 0278-629-1



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

37 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
536	ELECTRICAL- CABLES & WIRES	Power Cable with Extruded Insulation and their accessories - for rated voltages 6 kV to 30 kV	Partial discharge Test	IEC 60502-4, Table 5,6,&7
537	ELECTRICAL- CABLES & WIRES	Power Cables	Armour Resisitivity test	IS 10810 : Part 5 & 42 : 1984 RA : 2021
538	ELECTRICAL- CABLES & WIRES	Power Cables	Capacitance Measurement	IS 10810 : Part 48 : 1984, RA : 2021
539	ELECTRICAL- CABLES & WIRES	Power Cables	Cold Bend test	IS 10810 (Part 20):1984, RA:2021
540	ELECTRICAL- CABLES & WIRES	Power Cables	Conductor Resistance	IS 10810 : Part 5 & 42 : 1984 RA : 2021
541	ELECTRICAL- CABLES & WIRES	Power Cables	Dimension of Armour Material	IS 10810 : Part 36 : 1984, RA :2021
542	ELECTRICAL- CABLES & WIRES	Power Cables	Electrical heat cycle test	IS 10810 (Part 49) : 1984, RA : 2021
543	ELECTRICAL- CABLES & WIRES	Power Cables	Fire resistance/ Flammability	ASTM-D635
544	ELECTRICAL- CABLES & WIRES	Power Cables	Fire retardant/ Flammability	IS 11731 part 1 & 2 :1986 RA : 2021
545	ELECTRICAL- CABLES & WIRES	Power Cables	Flame Retardant test (Flammability test)	IS 10810 : Part 53 : 1984, RA : 2021
546	ELECTRICAL- CABLES & WIRES	Power Cables	Flammability test on Bunch of Cables Test	IS 10810 (Part 62) : 1993 , RA : 2019
547	ELECTRICAL- CABLES & WIRES	Power Cables	Halogen Acid Test	IEC 60754-2: +AMD1:2019
548	ELECTRICAL- CABLES & WIRES	Power Cables	Halogen Acid test	IEC 60754-2+AMD1:2019
549	ELECTRICAL- CABLES & WIRES	Power Cables	Insulation Resistance test	IS 10810 : Part 43 : 1984, RA 2021
550	ELECTRICAL- CABLES & WIRES	Power Cables	IR Constant test	IS 10810 : Part 43 : 1984, RA 2021
551	ELECTRICAL- CABLES & WIRES	Power Cables	Load cycle test	IS 10810 (Part 49) : 1984, RA : 2021
552	ELECTRICAL- CABLES & WIRES	Power Cables	Mechanical test Cold Impact test	IS 10810 (Part 21):1984, RA:2021
553	ELECTRICAL- CABLES & WIRES	Power Cables	Partial discharge Test	IS 10810 part 45-48, RA : 2021
554	ELECTRICAL- CABLES & WIRES	Power Cables	Power Frequency Withstand Test/ Dielectric strength	IS 10810 : Part 45 : 1984 , RA : 2021



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

38 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
555	ELECTRICAL- CABLES & WIRES	Power Cables	Power Frequency Withstand Test/ Dielectric strength	IS 10810 : Part 45 : 1984 , RA : 2021
556	ELECTRICAL- CABLES & WIRES	Power Cables	Swedish Chimney Flammability Test	IS 10810 (Part 61) : 1988, RA : 2020
557	ELECTRICAL- CABLES & WIRES	Power Cables	Tan Delta Measurement at ambient & elevated temperature	IS 10810 : Part 48 : 1984, RA : 2021
558	ELECTRICAL- CABLES & WIRES	Power Cables	Thermal Stability Test for PVC material	IS 10810 : Part 60 : 1988, RA : 2020
559	ELECTRICAL- CABLES & WIRES	Power Cables	Thickness and dimension test	IS 10810 part : 34 : 1984, RA : 2021, IEC 60811-201, 202, 203:
560	ELECTRICAL- CABLES & WIRES	Power Cables	Volume Resistivity test	IS 10810 : Part 43 : 1984, RA 2021
561	ELECTRICAL- CABLES & WIRES	Power Cables	Water Absorption (Gravimetric)	IS 10810 : Part 33 : 1984, RA : 2021
562	ELECTRICAL- CABLES & WIRES	Power Cables	Water absorption Test (Electrical)	IS 10810 : Part 28 : 1984, RA : 2021
563	ELECTRICAL- CABLES & WIRES	Power Cables from 3.6/6 kV up to 20.8/36 kV	Load Cycle test	DIN EN 61442
564	ELECTRICAL- CABLES & WIRES	Power Cables from 3.6/6 kV up to 20.8/36 kV	Load Cycle test	DIN EN 61442:
565	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Ageing in air bomb	IEC 60502 part 1, cl. 18
566	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Ageing in air oven	IEC 60502 part 1, cl. 18
567	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Bending test	IEC 60502, part 1, cl.18
568	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Breaking Strength test (Elongation at Break test)	IEC 60502 part 1 cl.18
569	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Carbon Black Content Test	Cl. 18, IEC 60502 part-1: 2021
570	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Carbon Black content test	IEC 60502 part 1, cl. 18
571	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Dimension of Armour	Cl. 18, IEC 60502 Part-1 : 2021
572	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Drainage test	IEC 60502 part 1, cl. 18



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

39 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
573	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Dripping test	IEC 60502 part 1, cl. 18
574	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Flame retardant Test on Bunch cable	Cl.18 IEC 60502 Part-1: 2021
575	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Flame Retardant Test (Flammability Test)	cl.17 IEC 60502 part-1:2021
576	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Flame Retardant test (Flammability test)	IEC 60502, part-1, cl.18:
577	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Flame Retardant test on Bunch of Cables	IEC 60502, Part-1, Cl.18
578	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Heat Shock test	IEC 60502 part 1, cl. 18:
579	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Hot deformation test	IEC 60502 part 1, cl. 18
580	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Hot set test	IEC 60502 part 1, cl. 18
581	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Impulse withstand test	IEC 60502 part I-(Cl. 17
582	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Insulation Resistance test	IEC 60502 part 1, cl. 17
583	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	IR Constant test	IEC 60502 part 1, cl. 17
584	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Loss of mass test	IEC 60502 part 1, cl. 18
585	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Mechanical test Tensile test	IEC 60502 part 1, cl. 17
586	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Mineral Oil Immersion test	IEC 60502 part 1, cl. 18
587	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Pressure test at high temperature	IEC 60502 part 1, cl. 18
588	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Shrinkage test	IEC 60502 part 1, cl. 18
589	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Tear Resistance test	IEC 60502, part 1, Cl.17
590	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Test for resistance to cracking test	IEC 60502 part 1, cl. 18
591	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Thickness and dimension test	IEC 60502 part 1 cl.18



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A,  
INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH,  
INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

40 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
592	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Torsion test	IEC 60502 part-1, cl.18
593	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Volume Resistivity test	IEC 60502 part 1, cl. 17
594	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Winding test	IEC 60502 part-1, cl.18
595	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories Cables for rated voltages 1 kV up to 3 kV	Wrapping test	IEC 60502, Part-1, Cl.18
596	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 1 kV up to 3 kV	Dimension of Armour Material	IEC 60502 part 1, cl. 18:
597	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 1 kV up to 3 kV	Power Frequency Withstand Test/ Dielectric strength	IEC 60502 part 1, cl. 17
598	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 1 kV up to 3 kV	Water Absorption (Gravimetric)	IEC 60502 part 1, cl.18
599	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 1 kV up to 3 kV	Water Immersion Test	IEC 60502 part 1 cl.18
600	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 1 kV up to 3 kV	Water Immersion Test	IEC 60502 part 1 cl.18
601	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Ageing in air oven	IEC 60502, Part-2, Cl.18
602	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Bending test	IEC 60502, Part-2, Cl.18
603	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Carbon Black content test	IEC 60502, part-2, cl.18
604	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Cold bend test	IEC 60502, part-2, Cl.17
605	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Cold Elongation test	IEC 60502, part-2, Cl.17
606	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Conditioning test	IEC 60502, Part-2, Cl.17
607	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Dimension of Armour Material	IEC 60502 part 2, cl.18
608	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Drainage test	IEC 60502, part-2, cl.18
609	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Dripping test	IEC 60502, Part-2, Cl.18
610	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Electrical heat cycle test	IEC 60502 part 2, cl. 18





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

41 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
611	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Flame Retardant test (Flammability test)	IEC 60502, Part-2, Cl.18
612	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Flame Retardant test on Bunch of Cables	IEC 60502, Part-2, Cl.18
613	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Heat Shock test	IEC 60502, Part-2, Cl.18
614	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Hot deformation test	IEC 60502, part-2, cl.18
615	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Hot set test	IEC 60502, part-2, Cl.18:
616	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Impulse withstand Test	IEC 60502 part 2 cl.17
617	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	IR Constant test	IEC 60502, part-2, Cl.17
618	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Load cycle test	IEC 60502 part 2, cl. 18
619	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Loss of mass test	IEC 60502, part-2, Cl.18:
620	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Mechanical test Cold impact test	IEC 60502, Part-2, Cl.17
621	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Mineral Oil immersion test	IEC 60502, part-2, Cl.18
622	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Partial discharge Test	IEC 60502 (part 2), cl. 18:
623	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Power Frequency Withstand Test/ Dielectric strength	IEC 60502 part 2, cl. 18
624	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Power Frequency Withstand Test/ Dielectric strength	IEC 60502 part 2, cl. 18:
625	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Pressure test at high temperature	IEC 60502, part-2, Cl.18
626	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Shrinkage test	IEC 60502, part-2, Cl.18
627	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Tan Delta Measurement at ambient and elevated temperature	IEC 60502 part 2, cl.18
628	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Test for Resistance to cracking	IEC 60502, Part-2, Cl.18



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 42 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
629	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Thickness and dimension test	IEC 60502 part 2 cl.18
630	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Torsion test	IEC 60502, Part-2, Cl.18:
631	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Volume Resistivity test	IEC 60502, Part-2, Cl.17
632	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Water Absorption (Gravimetric)	IEC 60502 part 2, cl.18:
633	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Water penetration test	IEC 60502 part 2, cl. 18
634	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Winding test	IEC 60502, Part-2, Cl.18
635	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV	Wrapping test	IEC 60502, Part-2, Cl.18
636	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6 kV up to 30 kV Cables	Capacitance Measurement	IEC 60502 part 2, cl.18
637	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories for rated voltages 6kV upto and including 30kV	Strippability Test	IEC 60502 part-2 : 2014
638	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories- Cables for rated voltages 1 kV up to 3 kV	Armour Resistivity test	IEC 60502, Part-1, Cl.16 & 17: 2021
639	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories- Cables for rated voltages 1 kV up to 3 kV	Armour Resistivity test	IEC 60502, part-2, Cl.17
640	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories- Cables for rated voltages 1 kV up to 3 kV	Conductor resistance test	IEC 60502, Part-1, Cl.16 & 17:
641	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories- Cables for rated voltages 1 kV up to 3 kV	Conductor Resistance test	IEC 60502, Part-2, Cl.17
642	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories-Cables for rated voltages 1 kV up to 3 kV	Cold Bend test	IEC 60502, Part-1, Cl.18
643	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories-Cables for rated voltages 1 kV up to 3 kV	Cold Elongation test	IEC 60502, Part-1, Cl.18
644	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories-Cables for rated voltages 1 kV up to 3 kV	Conditioning test	IEC 60502, part-1, Cl.18
645	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories-Cables for rated voltages 1 kV up to 3 kV	Mechanical test Cold impact test	IEC 60502, Part-1, Cl.18
646	ELECTRICAL- CABLES & WIRES	Power cables with extruded insulation and their accessories-Cables for rated voltages 1 kV up to 3 kV	Thermal Stability Test for PVC material	IEC 60502 part 1 cl.18
647	ELECTRICAL- CABLES & WIRES	Power cables with rated voltages from 3.6/6 kV up to and including 20.8/36 kV	DC withstand Test	VDE -0278-442



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	43 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
648	ELECTRICAL- CABLES & WIRES	power cables with rated voltages from 3.6/6 kV up to and including 20.8/36 kV	Dielectric Strength test	VDE-0278-442
649	ELECTRICAL- CABLES & WIRES	Power cables with rated voltages from 3.6/6 kV up to and including 20.8/36 kV	Impulse withstand Test	VDE -0278-442
650	ELECTRICAL- CABLES & WIRES	Power cables with rated voltages from 3.6/6 kV up to and including 20.8/36 kV	Partial discharge Test	DIN EN 61442
651	ELECTRICAL- CABLES & WIRES	Power cables with rated voltages from 3.6/6 kV up to and including 20.8/36 kV	Partial discharge Test	VDE -0278-442
652	ELECTRICAL- CABLES & WIRES	power cables with rated voltages from 3.6/6 kV up to and including 20.8/36kV	Mechanical Test: Impact Test	DIN EN 61442:
653	ELECTRICAL- CABLES & WIRES	PVC Cables Upto and including 1.1kV	Flame Retardant test (Flammability test)	IS 694 : 2010 RA :2020 cl.15
654	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Ageing in air bomb	IS 1554 : Part 2, cl.18 RA:2020
655	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Ageing in air oven	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
656	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Armour Resistivity test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
657	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Breaking strength test (Elongation at break test)	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
658	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Carbon Black content test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
659	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Cold Bend test	IS 1554 : Part 2 : 1988, cl.18 RA 2020
660	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Conductor Resistance test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
661	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Dimension of Armour Material	IS 1554 : Part 2 : 1988, cl. 18 RA : 2020
662	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Electrical Heat Cycle test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
663	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Flame Retardance test (Sweedish Chimney test)	IS 1554 : Part 2 : 1988, cl.18 RA :2020
664	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Flame retardance test on bunch of cables	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
665	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Flame Retardant test (Flammability test)	IS 1554 : Part 2 : 1988, cl.18 , RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 44 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
666	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 1554 : Part 2 : 1988 cl.18 , RA : 2020
667	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Heat Shock test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
668	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Hot deformation test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
669	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Hot set test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
670	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Impulse withstand Test	IS 1554 : Part 2 : 1988 RA : 2020
671	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Insulation Resistance test	IS 1554 : Part 2 : 1988, cl.18, RA : 2020
672	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	IR Constant test	IS 1554 : Part 2 : 1988, cl.18, RA : 2020
673	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Load cycle test	IS 1554 : Part 2 : 1988 RA : 2020, cl.18
674	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Loss of mass test	IS 1554 : Part 2 : 1988, cl.18, RA : 2020
675	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Mechanical test Cold Impact test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
676	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Mechanical test Tensile test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
677	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Power Frequency Withstand Test/ Dielectric strength	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
678	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Power Frequency Withstand Test/ Dielectric strength	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
679	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Shrinkage test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
680	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Thermal Stability Test for PVC material	IS 1554 : Part 2 : 1988 cl.18 RA : 2020
681	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Thickness and dimension test	IS 1554 : Part 2 : 1988, cl. 18 RA : 2020
682	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Volume Resistivity test	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
683	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3 kV up to and including 11 kV	Water Absorption (Gravimetric)	IS 1554 : Part 2 : 1988, cl.18 RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

45 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
684	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages from 3.3kV up to and including 11 kV	Partial discharge Test	IS 1554 : Part 2 : 1988 RA : 2020
685	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Armour Resistivity tests	IS 1554 : Part 1 : 1988, cl.15, RA : 2020
686	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Conductor Resistance test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
687	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	DC withstand Test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
688	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Dimension of Armour Material	IS 10810 : Part 36 : 1984, RA : 2021
689	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Dimension of armour material	IS 1554 : Part 1 : 1988, Am I, Am II, Am III(Cl.15) RA : 2020
690	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Power Frequency Withstand Test/ Dielectric strength	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
691	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Power Frequency Withstand Test/ Dielectric strength	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
692	ELECTRICAL- CABLES & WIRES	PVC Insulated (Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Test for resistance to cracking	Clause 5 of IS 1554 : Part 1 : 1988 RA : 2020
693	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Thermal Stability Test for PVC material	IS 1554 : Part 1 : 1988, cl. 15 RA 2020
694	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Thickness and dimension test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
695	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Water Immersion test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
696	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts	Water Immersion Test/ Absence of faults in the insulation	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
697	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts From 3.3 kV up to and including 11 kV	Partial discharge Test	IEC 60885-2
698	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100 Volts From 3.3 kV up to and including 11kV	Insulation Resistance Test/ Volume resistivity/ IR Constant	IS 694 : 2010 cl.15 RA : 2020
699	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100Volts	Breaking Strength test (Elongation at break test)	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
700	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100Volts	Insulation Resistance test/IR Constant test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
701	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100Volts	Mechanical test Tensile strength test	IS 1554 : Part 1 : 1988, cl.15 , RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 46 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
702	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables for working voltages up to and including 1100Volts	Volume Resistivity test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
703	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables from 3.3 kV up to and including 11 kV	Capacitance Measurement	IS 1554 : Part 2 : 1988, cl.18 RA : 2020
704	ELECTRICAL- CABLES & WIRES	PVC insulated (Heavy Duty) Electric Cables from 3.3 kV up to and including 11 kV	Tan Delta Measurement at ambient and elevated temperature	IS 1554 : Part 2 : 1988, cl. 18 RA : 2020
705	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for Electric Supply for working voltages up to and including 1100 Volts	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
706	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 volts	Armour Resistivity test	IS 694 : 2010 cl.15 RA : 2020
707	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 volts	Conductor Resistance test	IS 694 : 2010 cl.15 RA : 2020
708	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 volts	DC withstand Test	IS 694 : 2010 , cl.15 RA : 2020
709	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 volts	Power Frequency Withstand Test/ Dielectric strength	IS 694 : 2010 cl. 15 RA : 2020
710	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 volts	Power Frequency Withstand Test/ Dielectric strength	IS 694 : 2010, cl. 15 RA : 2020
711	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 Volts	Thickness and dimension test	IS 694 : 2010, cl.15 RA : 2020
712	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 Volts	Water Immersion Test/ Absence of faults in the insulation	IS 694 : 2010 cl.15 RA : 2020
713	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100 Volts	Water Immersion Test/ Absence of faults in the insulation	IS 694 : 2010 Cl.15 RA : 2020
714	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Annealing test	IS 694 : 2010, cl.15 RA : 2020
715	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Breaking strength test (Elongation at break test)	IS 694 : 2010, cl.15, RA : 2020
716	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Cold Bend test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
717	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Cold Bend test	IS 694 : 2010 cl.15, RA : 2020
718	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Mechanical test Cold impact test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

47 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
719	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Mechanical test Cold impact test	IS 694 : 2010 cl.15 RA : 2020
720	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Mechanical test Tensile strength test	IS 694 : 2010 cl.15 RA : 2020
721	ELECTRICAL- CABLES & WIRES	PVC insulated Cables for working voltages up to and including 1100Volts	Thermal Stability Test for PVC material	IS 694 : 2010 cl.11, RA : 2020
722	ELECTRICAL- CABLES & WIRES	PVC insulated Cables of rated voltages up to and including 450/750 Volts	Cold bend test	IEC 60227, Part 1 to 6, cl.12
723	ELECTRICAL- CABLES & WIRES	PVC insulated Cables of rated voltages up to and including 450/750 Volts	Cold Elongation test	IEC 60227, Part 1 to 6, cl.12:
724	ELECTRICAL- CABLES & WIRES	PVC insulated Cables of rated voltages up to and including 450/750 Volts	Mechanical test Cold Impact test	IEC 60227, Part 1 to 6, cl.12
725	ELECTRICAL- CABLES & WIRES	PVC Insulated Cables of rated Voltages up to and including 450/750 Volts	Thickness and dimension test	IEC 60227 part 1 to 6, cl.12
726	ELECTRICAL- CABLES & WIRES	PVC insulated Cables upto and including 1100 Volts	Ageing in air oven	IS 694 : 2010 cl.15, RA : 2020
727	ELECTRICAL- CABLES & WIRES	PVC insulated Cables upto and including 1100 Volts	Carbon Black content test	IS 694 : 2010 cl.15 RA : 2020
728	ELECTRICAL- CABLES & WIRES	PVC insulated Cables upto and including 1100 Volts	Heat shock test	IS 694 : 2010 cl.15 RA : 2020
729	ELECTRICAL- CABLES & WIRES	PVC insulated Cables upto and including 1100 Volts	Hot Deformation test	IS 694 : 2010 cl.15 RA : 2020
730	ELECTRICAL- CABLES & WIRES	PVC insulated Cables upto and including 1100 Volts	Loss of mass test	IS 694 : 2010 cl.15 RA : 2020
731	ELECTRICAL- CABLES & WIRES	PVC insulated Cables upto and including 1100 Volts	Shrinkage test	IS 694 : 2010 cl.15 RA : 2020
732	ELECTRICAL- CABLES & WIRES	PVC insulated Heavy Duty Electric Cables for working voltages up to and including 1100 Volts	Flame Retardance test ( Sweedish Chimney test)	IS 1554 : Part 1 : 1988, cl.15 RA 2020
733	ELECTRICAL- CABLES & WIRES	PVC insulated Heavy Duty Electric Cables for working voltages up to and including 1100 Volts	Flame retardance tets on bunched cables	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
734	ELECTRICAL- CABLES & WIRES	PVC insulated Heavy Duty Electric Cables for working voltages up to and including 1100 Volts	Flame retardant test (Flammability test)	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
735	ELECTRICAL- CABLES & WIRES	PVC insulated(Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Ageing in air oven	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
736	ELECTRICAL- CABLES & WIRES	PVC insulated(Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Heat Shock test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
737	ELECTRICAL- CABLES & WIRES	PVC insulated(Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Hot Deformation test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

48 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
738	ELECTRICAL- CABLES & WIRES	PVC insulated(Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Hot set test	IS 1554 : Part 1 : 1988, cl.15: RA : 2020
739	ELECTRICAL- CABLES & WIRES	PVC insulated(Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Loss of mass test	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
740	ELECTRICAL- CABLES & WIRES	PVC insulated(Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Pressure test at high temperature	IS 1554 : Part 1 : 1988, cl.15 RA : 2020
741	ELECTRICAL- CABLES & WIRES	PVC insulated(Heavy Duty) Electric cables for working voltages up to and including 1100 Volts	Shrinkage test	IS 1554 : Part 1 : 1988 cl.15 RA : 2020
742	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltage Up to and including 450/750 Volts	Conductor Resistance test	IEC 60245, Part 1 to 7
743	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltage Up to and including 450/750 Volts	Power Frequency Withstand Test/ Dielectric strength	IEC 60245, part 1 to 5
744	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltage Up to and including 450/750 Volts	Power Frequency Withstand Test/ Dielectric strength	IEC 60245, part 1 to 5:
745	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltage Up to and including 450/750 Volts	Resistivity of Armour	IEC 60245, Part 1 to 7
746	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages up to and including 450/750 Volts	Annealing test	IEC 60245, Part 1 to 7:
747	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages up to and including 450/750 Volts	Breaking strength test (Elongation at break test)	IEC 60245, Part 1 t o 7
748	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages up to and including 450/750 Volts	Insulation Resistance test	IEC 60245, Part 1 to 7
749	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages up to and including 450/750 Volts	IR Constant test	IS 60245, Part 1 to 7
750	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages up to and including 450/750 Volts	Mechanical test tensile strength test	IEC 60245, Part-1 to 7
751	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages up to and including 450/750 Volts	Tear Resistance test	IEC 60245, Part-1 to 7
752	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages Up to and including 450/750 Volts	Thickness and dimension test	IEC 60245 part 1 to 7
753	ELECTRICAL- CABLES & WIRES	Rubber Insulated Cables of rated voltages up to and including 450/750 Volts	Volume Resistivity test	IEC 60245, Part 1 to 7
754	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Ageing in air bomb	IEC 60245, Part 1 to 7
755	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Ageing in air oven	IEC 60245, Part 1 to 7:
756	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Carbon Black content test	IEC 60245, Part 1 to 7





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

49 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
757	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Cold Bend test	IEC 60245, Part 1 to 7
758	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Cold Elongation test	IEC 60245, part 1 to 7
759	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Conditioning test	IEC 60245 Part 1 to 7
760	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Heat Shock test	IEC 60245, Part 1 to 7:
761	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Hot Deformation test	IEC 60245, Part 1 to 7
762	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Hot set test	IEC 60245, Part 1 to 7
763	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Loss of mass test	IEC 60245, Part 1 to 7:
764	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Mechanical test Cold Impact test	IEC 60245, Part 1 to 7
765	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Mineral Oil Immersion test	IEC 60245, Part 1 to 7
766	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Pressure test at high temperature	IEC 60245, Part 1 to 7
767	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Shrinkage test	IEC 60245, Part 1 to 7
768	ELECTRICAL- CABLES & WIRES	Rubber insulated Cables of rated voltages upto and including 450/ 750 Volts	Test for Resistance to cracking	IEC 60245, Part 1 to 7
769	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Ageing in air oven	IEC 60092-350, Cl.8
770	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Breaking strength test (Elongation at break test)	IEC 60092-350
771	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Capacitance Measurement	IEC 60092-350-Cl. No. 7.7
772	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Carbon Black content test	IEC 60092-350, Cl.8
773	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Conductor Resistance Test/ Armour resistivity Test	IEC 60092-350
774	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Electrical Heat cycle test	IEC 60092-350, Cl.7
775	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Heat Shock test	IEC 60092-350, Cl.8:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

50 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
776	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Hot deformation test	IEC 60092-350, Cl.18
777	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Hot set test	IEC 60092-350, Cl.8
778	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Impulse withstand test	IEC 60092-350
779	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Load cycle test	IEC 60092-350, Cl.7
780	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Loss of mass test	IEC 60092-350, Cl.8
781	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Mechanical test Tensile strength test	IEC 60092-350
782	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Partial Discharge test	IEC 60092-350- Cl.No. 7.7.3
783	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Power Frequency Withstand Test/ Dielectric strength	IEC 60092-350- Cl. 7.7
784	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Power Frequency Withstand Test/ Dielectric strength	IEC 60092-350- Cl. 7.7
785	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Pressure test at high temperature	IEC 60092-350, Cl.8
786	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Shrinkage test	IEC 60092-350, Cl.8:
787	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Tan delta Measurement	IEC 60092-350- Cl. No. 7.7
788	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Tear Resistance test	IEC 60092-350
789	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Test for resistance to cracking	IEC 60092-350, Cl.8
790	ELECTRICAL- CABLES & WIRES	Ship Board Power Cables	Water penetration test	IEC 60092-350, Cl.7
791	ELECTRICAL- CABLES & WIRES	Single core PVC insulated flexible cables of rated voltage 600/1000 V for switch gear and control gear wiring	Armour Resistivity test	BS 6231, Cl.11
792	ELECTRICAL- CABLES & WIRES	Single core PVC insulated flexible cables of rated voltage 600/1000 V for switch gear and control gear wiring	Conductor resistance test	BS 6231, Cl.11
793	ELECTRICAL- CABLES & WIRES	Single core PVC insulated flexible cables of rated voltage 600/1000 V for switch gear and control gear wiring	Power Frequency Withstand Test/ Dielectric strength	BS 6231, cl.11
794	ELECTRICAL- CABLES & WIRES	Single core PVC insulated flexible cables of rated voltage 600/1000 V for switch gear and control gear wiring	Power Frequency Withstand Test/ Dielectric strength	BS 6231, cl.11



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	51 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
795	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Ageing air bomb	BS 5467 cl.14
796	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Ageing in air oven	BS 5467 cl.14:
797	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Annealing test	BS 5467 cl.14:
798	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Breaking strength test (Elongation at break test)	BS 5467 cl.14
799	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Carbon Black content test	BS 5467 cl.14:
800	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Conductor Resistance Test/ Armour resistivity Test	BS 5467, cl. 14
801	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Dielectric withstand test	BS 5467 cl.14:
802	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Dimension of Armour Material	BS 5467, cl.14
803	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Drainage test	BS 5467 cl.14:
804	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Dripping test	BS 5467 cl.14:
805	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Fire Retardant/ Flammability Test /Swedish Chimney Test	BS 5467 cl. 14 :
806	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Heat Shock test	BS 5467 cl.14:
807	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Hot Deformation test	BS 5467 cl.14
808	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Hot set test	BS 5467 cl.14
809	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Loss of mass test	BS 5467 cl.14:
810	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Mechanical test Tensile Strength test	BS 5467 cl.14
811	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Mineral Oil immersion test	BS 5467 cl.14:
812	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Power Frequency withstand test	BS 5467 cl.14
813	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Power Frequency Withstand Test/ Dielectric strength	BS 5467, cl.14



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

52 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
814	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Pressure test at high temperature	BS 5467 cl.14
815	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Shrinkage test	BS 5467 cl.14
816	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Tear Resistance test	BS 5467 cl.14
817	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Test for Resistance to cracking	BS 5467 cl.14
818	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Thickness and dimension test	BS 5467 cl.14:
819	ELECTRICAL- CABLES & WIRES	Thermosetting insulated , armoured Cables of rated voltages of 600/1000 V & 1900/3300 V for fixed installation	Water Absorption (Gravimetric)	BS 5467 cl.14
820	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Ageing in air bomb	BS 7846, Cl.14
821	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Ageing in air oven	BS 7846, Cl.14
822	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Hot Deformation test	BS 7846, Cl.14
823	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Hot set test	BS 7846, Cl.14
824	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Loss of mass test	BS 7846, Cl.14:
825	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Mineral Oil immersion test	BS 7846, Cl.14:
826	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Pressure test at high temperature	BS 7846, Cl.14
827	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Shrinkage test	BS 7846, Cl.14
828	ELECTRICAL- CABLES & WIRES	Thermosetting insulated, armoured fire resistant 600/1000 V Cable having low emission of smoke and corrosive gases	Test for resistance to cracking	BS 7846, Cl.14
829	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV up to and including 33 kV	Armour Resistance test	IS 13705 : 1993, RA 2019
830	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV up to and including 33 kV	Conductor Resistance test	IS 13705 : 1993, RA 2019
831	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV up to and including 33 kV	DC withstand Test	IS 13705 : 1993, RA 2019
832	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV up to and including 33 kV	Mechanical Test: Impact Test	IS 13705 : 1993, RA : 2019



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 53 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
833	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV up to and including 33kV	Power Frequency Withstand Test/ Dielectric strength	IS 13705 : 1993, RA : 2019
834	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV up to and including 33kV	Power Frequency Withstand Test/ Dielectric strength	IS 13705 : 1993, RA : 2019
835	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV upto and including 33 kV	Capacitance Measurement	IS 13705 : 1993, RA 2019
836	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV upto and including 33 kV	Electrical Heat cycle Test /Load Cycle Test/ Water penetration Test/ Pre Qualficiation Test	IS 13705 : 1993, RA : 2019
837	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV upto and including 33 kV	Electrical Heat cycle Test /Load Cycle Test/ Water penetration Test/ Pre Qualficiation Test	IS 13705 : 1993, RA : 2019
838	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV upto and including 33 kV	Impulse withstand Test	IS 13705 : 1993, RA : 2019
839	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV upto and including 33 kV	Partial discharge Test	IS 13705 : 1993, RA : 2019
840	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV upto and including 33kV	Insulation Resistance Test/ Volume resistivity/ IR Constant	IS 13705 : 1993, RA : 2019
841	ELECTRICAL- CABLES & WIRES	Transition Joints of Power Cables from 11 kV upto and including 33kV	Tan Delta Measurement at ambient and elevated temperature	IS 13705 : 1993, RA : 2019
842	ELECTRICAL- CABLES & WIRES	Uniformity & Mass of Zinc Coating on steel armour	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating	IS 10810 part 40-41 : 1984, RA : 2021
843	ELECTRICAL- CABLES & WIRES	Unsaturated polyester Resin systems	Fire Retardant/ Flammability Test	IS 6746- APPENDIX-N :1994, RA : 2020
844	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Ageing in air oven	IS 7098 : Part 1 : 1988, cl.16 RA: 2020
845	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Breaking strength test (Elongation at break test)	IS 7098 : Part 1 : 1988 cl.16 RA : 2020
846	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Flame Retardancy test (Sweedish Chimney test)	IS 7098 : Part 1 : 1988 cl. 16 RA : 2020
847	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Flame Retardancy test on Bunched Cables	IS 7098 : Part 1 : 1988 cl.16 RA : 2020
848	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Flame Retardant test (Flammability test)	IS 7098 : Part 1 : 1988, cl. 16 RA : 2020
849	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Heat shock test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 54 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
850	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Hot deformation test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
851	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Hot set test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
852	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Insulation Resistance test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
853	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	IR Constant test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
854	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Loss of mass test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
855	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Mechanical test Tensile strength test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
856	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Pressure test at high temperature	IS 7098 : Part 1 : 1988 cl.16 RA : 2020
857	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Shrinkage test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
858	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1 kV	Thermal Stability Test for PVC material	IS 7098 : Part 1 : 1988,cl.16 RA : 2020
859	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Thickness and dimension test	IS 7098 : Part 1 : 1988, RA : 2020 cl.16
860	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Thickness and dimension test	IS 7098 : Part 3 : 1993 RA : 2019
861	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1 kV	Volume Resistivity test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
862	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1kV	Armour Resistivity test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
863	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1kV	Cold bend test	IS 7098 : Part 1 : 1988, cl. 15 RA: 2020
864	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1kV	Cold Bend test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
865	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1kV	Conductor Resistance test	IS 7098 : Part 1 : 1988, cl.16: RA : 2020
866	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1kV	Dimension of Armour Material	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
867	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for voltages up to and including 1.1kV	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 7098 : Part 1 : 1988, cl.16 RA : 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

55 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
868	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1kV	Mechanical test Cold Impact test	IS 7098 : Part 1 : 1988, cl. 15, RA : 2020
869	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1kV	Mechanical test Cold Impact test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
870	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For voltages up to and including 1.1kV	Water Absorption (Gravimetric)	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
871	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Electrical Heat cycle test	IS 7098 : Part 2 : 2011, RA : 2021
872	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Impulse withstand Test	IS 7098 : Part 2 : 2011 cl.19 RA : 2021
873	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Partial discharge Test	IS 7098 : Part 2 : 2011 cl.19.20.2) RA : 2021
874	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Tan Delta Measurement	IS 7098 : Part 2 : 2011 cl. 19 RA : 2021
875	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Water Penetration test	IS 7098 : Part 2 : 2011, RA 2021
876	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables For working voltages from 3.3 kV up to and including 33KV	Capacitance Measurement	IS 7098 : Part 2 : 2011, cl. 19 RA : 2021
877	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for working voltages up to 1.1 kV	Power Frequency Withstand Test/ Dielectric strength	IS 7098 : Part 1 : 1988- Aml,Am2,AM3(Cl.16): RA : 2020
878	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables for working voltages up to 1.1 kV	Power Frequency Withstand Test/ Dielectric strength	IS 7098 Part I : 1988- Aml,Am2,AM3(Cl.16) RA : 2020
879	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables fr voltages up to and including 1.1 kV	Bending test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
880	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables fr voltages up to and including 1.1 kV	Torsion test	IS 7098 part 1 : 1988 , cl.16 RA : 2020
881	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables fr voltages up to and including 1.1 kV	Winding test	IS 7098 : Part 1 : 1988, cl.16 RA 2020
882	ELECTRICAL- CABLES & WIRES	XLPE Insulated PVC sheathed Cables fr voltages up to and including 1.1 kV	Wrapping test	IS 7098 : Part 1 : 1988, cl.16 RA : 2020
883	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Ageing in air oven	IS 7098 : Part 2 : 2011, cl.19 RA : 2021
884	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Annealing test	IS 7098 : Part 2 : 2011, cl.19 RA : 2021
885	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Bending test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 56 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
886	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Breaking Strength test (Elongation at break)	IS 7098 : Part 2 : 2011, cl.19 RA : 2021
887	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Capacitance Measurement	IS 7098 : Part 2 : 2011 , Am I (Cl.19) RA : 2021
888	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Cold bend test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
889	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Conductor Resistance Test/ Armour resistivity Test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
890	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Flame Retardancy test (Sweedish Chimney test)	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
891	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Flame Retardant test (Flammability test)	IS 7098 : Part 2 : 2011 cl.19 RA : 2021
892	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Flame retardant test on Bunched Cables	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
893	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Galvanising test (Uniformity of Zinc coating & Mass of Zinc coating)	IS 7098 : Part 2 : 2011, Cl.19 RA : 2021
894	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Heat Shock test	IS 7098 : Part 2 : 2011, cl.19 RA : 2021
895	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Hot Deformation test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
896	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Hot set test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
897	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Loss of mass test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
898	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Mechanical test Cold impact test	IS 7098 : Part 2 : 2011 , cl.19, RA : 2021
899	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Mechanical test Tensile strength test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
900	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Shrinkage test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
901	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Tan delta at ambient and elevated temperature	IS 7098 : Part 2 : 2011 , Am I (Cl.19) RA : 2021
902	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Thickness and dimension test	IS 7098 : Part 2 : 2011 cl. 19 RA : 2021
903	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Torsion test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 57 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
904	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Volume resistivity test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
905	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Water Absorption (Gravimetric)	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
906	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Winding test	IS 7098 : Part 2 : 2011 , cl.19 RA : 2021
907	ELECTRICAL- CABLES & WIRES	XLPE Insulated Thermoplastic sheathed Cables For working voltages from 3.3 kV up to and including 33 kV	Wrapping test	IS 7098 : Part 2 : 2011 cl.19, RA : 2021
908	ELECTRICAL- CABLES & WIRES	XLPE Insulated thermoplastic sheathed cables for working voltages from 3.3kv upto and including 33kV	Strippability Test	Cl. 19, IS:7098 part-2 :2011 RA 2021
909	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC Static Transformer operated Watthour and VAR- Hour Meters,Class 0.2 and 0.5;AC direct connected Static prepayment Meters for Active Energy Class 1 and 2;AC.Static Direct Connected Watthour Smart Meter Class1 and 2;AC. Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and 1.0S	Sub harmonics in ac current circuit/Inter harmonic sin Ac current circuit-Burst fired wave form test	IEC62055 -31:2005,Cl.4.6.2IEC62052-11, 2020,Cl.9.4.2.3IEC62053-21,2020,Cl.7.10IEC62053-22,2020,Cl.7.10IEC62053-23,2020,Cl.7.10 IEC62053-24,Cl.7.10
910	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class1 and 2	Test of Immunity to electro magnetic HF/RFFields	IS13779:1999A.1to5 Cl.12.9.3(Withdrawn),,IS15884: 2010Cl.5.5.3,CBIP&€" 325:2015 Cl.5.5.3,IS16444(Part1): 2015A.1 and 2Cl.6.11,IS13779
911	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Protection against penetration of dust and water	IS15884:2010Cl5.2.5,IEC62055 -31:2005,IEC62052-31,2015Cl. 11
912	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2	Surge immunity test	IS13779:2020Cl.12.9.5,IEC620 52-11:2020Cl.9.3.9,IEC62053- 1:2020,IEC62053- 22:2020,IEC62053- 23:2020,IEC62053- 24:2020,IEC62052-31:
913	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;	Influence of supply Voltage	IS13779:1999A1 to5Cl.12.7.2(Withdrawn),CBIP- 325:2015 Cl.5.4.2, ,IS13779:2020Cl.12.7.2,IEC620 52-11:2020Cl.9.3.2,IEC62053-2 1:2020Cl.7.10,IEC62053- 22:2020,Cl.7.10,IEC62053- 23:2020Cl.7.10,IEC62053- 24:2020Cl.7.10



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 58 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
914	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter -Static Energy Meter Category A,B,C1,C2&C3	2.9.2 Block load profile parameters 2.9.3 Selective access by Range for Block load profile 2.9.4 Daily loadprofileparameters2.9.5 Selectiveaccess by Range for Daily loadprofile2.9.6 Billing profileparameters2.9.7 Selectiveaccess by Entry for Billing profile2.10 General Purposeparameters :2.10.1 Name PlateDetails2.10.2 ProgrammableParameters	CINo4to14AnnexAtoLof IS15959(Part1:2011(RA:2016)
915	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter -Static Energy Meter CategoryA,B,C1,C2&C3	Compliance test: 1.0 Conformance to DLMS /COSEM (IEC62056)2.0 arameter verification :2.1SNRM/UA2.2 Object list download2.3 Association properties 2.4Simultaneous operation2.5 Security:2.5.1Lowest Level Security Secret2.5.2 Low Level Security (LLS) Secret 2.5.3 High Level Security (HLS) Secret2.6 ToU setting 2.7 Billing Period2.8 Billing Period Counter2.9 Parameter list:2.9.1 (a) Instantaneous Parameters2.9.1(b)SnapShot of Instantaneous Parameters2.9.1 (c) Scaler Profile	CINo4to14AnnexAtoLof IS15959(Part1)-2011(RA:2016):
916	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter -Static Energy Meter Category A,B,C1,C2&C3	2.11 Event code and Event logging :2.11.1 Indian Event Reference Table - voltage Related 2.11.2 Indian Event Reference Table - CurrentRelated2.11.3 Indian EventReference Table - PowerRelated2.11.4 Indian EventReference Table - TransactionRelated2.11.5 Indian EventReference Table - Other2.11.6Indian Event Reference Table - NonRollOver2.11.7Indian Event Reference Table -Control2.12 Selective accessbyEntryfor EventLogProfile	CINo4to14AnnexAtoLof IS15959(Part1)-2011(RA:2016)



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 59 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
917	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static Direct Connected Watthour Smart Meter Class 1 and Class 2 - Specification	Smart Meter Functional Requirements	Clause 11 of IS 16444 (Part 1):
918	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static Direct Connected Watthour Smart Meter Class 1 and Class 2 - Specification	Test for Data Exchange Protocol	Clause 10.5 of 16444 (Part 1):
919	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static Direct Connected Watthour Smart Meter Class 1 and Class 2 - Specification	Test for Smart Meter Communicability	Clause 10.6 IS 16444 (Part 1):
920	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static DirectConnected WatthourSmartMeterClass1 andClass2	Smart Meter Functional Requirements	Cl.11ofIS16444(Part1)-2015Amd1-2017Amd2-
921	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static Transformer Operated Watthour and Var - Hour Smart Meters, 0.2S, 0.5S and 1.0S Part 2 Specification Transformer Operated Smart Meters	Smart Meter Functional Requirements	Clause 10 of IS 16444 (Part 2)
922	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static Transformer Operated Watthour and Var - Hour Smart Meters, 0.2S, 0.5S and 1.0S Part 2 Specification Transformer Operated Smart Meters	Test for Data Exchange Protocol	Clause 9.4 of IS 16444 (Part 2):
923	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static Transformer Operated Watthour and Var - Hour Smart Meters, 0.2S, 0.5S and 1.0S Part 2 Specification Transformer Operated Smart Meters	Test for Smart Meter Communicability	Clause 9.5 of IS 16444 (Part 2):
924	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	A.C Static Transformer operated Watthourand VAR-Hour Meters,Class 0.2 and0.5;AC.Static Transformer operated Watthourand VAR-hour Smart Meter Class0.2S,0.5Sand1.0S	Ambient temp. influence	IS14697:1999A.1to4 Cl.12.11(Withdrawn),CBIP-325:2015Cl.5.6.3,IS16444(Part2):2017A.1Cl.6.12,IS14697:20Cl.12.11,IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24,Cl.7.10::
925	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	a.c Static Transformer operated WatthourandVar-hourSmartMetersClass 0.2S,0.5Sand1.0S	SmartMeterFunctional Requirements	Cl.10ofIS16444(Part2)-2017Amd1-
926	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Damp heat cyclic test	IS15884:2010Cl.5.3.1,IEC62055-31:2005Cl.No.6.0



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 60 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
927	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and 2; AC.Static Direct Connected Watthour Smart Meter Class1and2	Short time over current Test	IS15884:2010Cl.4.4.3,IEC620-31:2005Cl.7.4,IS16444(Part1):A.1&2Cl.6.10.3
928	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2; AC.Static Direct Connected Watthou rSmartMeter Class1and2	Influence of supply Voltage	Cl.5.4.2, IS15884:2010Cl.4.4.2 & 5.4.2,IEC62055-31:2005Cl.7.2,IS16444(Part 1):2015A.1&2Cl.6.10.2
929	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2; AC.Static Direct Connected Watthour Smart Meter Class1and2;	Electrostatic Discharge Test	IS15884:2010Cl.5.5.2,IEC62031:2005Cl.7.8.2,IS16444(Part 1):2015 A.1&2 Cl.6.11
930	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour SmartMeter Class1and2	Line to Load Voltage Surge Withstand	IS15884:2010Cl.G4,IS16444(Pa rt 1): 2015A.1,2Cl.7.2,IEC62055-31:2005, Cl. AnnexC4
931	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour Smart Meter Class1and2	Influence of self heating	IS15884:2010Cl.5.4.4,IEC620-31:2005Cl.7.6,IS16444(Part1): 2015 A.1&2Cl.6.10.4
932	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour Smart Meter Class1and2	Surge immunity test	IS15884:2010Cl.5.5.7,IEC62055-31:2005Cl.7.8.6,IS16444(Part1):2015,A.1&2Cl.6.11
933	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour Smart Meter Class1and2;	Abnormal voltage condition	IS15884:2010,IEC62055-31:2005, IS16444 (Part1):2015 A.2Cl.6.10.7
934	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour SmartMeter Class1and2;	influence of heating	IS15884:2010Cl.5.4.5,IEC62055-31:2005Cl.7.5,IS16444(Part 1): 2015 A.1&2Cl.6.10.5,IEC62052-31:2015Cl.10.4,;
935	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour SmartMeter Class1and2;	Test of Immunity to electromagnetic HF/RF Fields	IS15884:2010Cl.5.5.3,IEC62031:2005Cl.7.8.3,IS16444 (Part1):2015A.1and2Cl.6.11
936	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static DirectConnected Watthour SmartMeter Class1and2;	Fast transient burst test	IS15884:2010Cl.5.5.4,IEC62031:2005Cl.7.8.4,IS16444(Part1): 2015A.1,2Cl.6.11,



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 61 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
937	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Abnormal a.c.magnetic Induction of external Origin(10mTesla)	IS15884:2010Cl.5.6.2.4
938	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	AC voltage test	IS15884:2010 Cl.5.4.6.3,IEC62055 -31:2005 Cl.7.7,
939	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Ambient temp. influence	IS15884:2010 Cl.5.6.3,IEC62055 -31:2005 Cl.8.0
940	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Cold test	IS15884:2010Cl.5.3.1,IEC62055 -31:2005Cl.No.6.0
941	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Continuous abnormaldc.magnetic Induction of external Origin(200/270mTesla)	IS15884:2010Cl.4.6.2,
942	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Crystal-controlled Clocks on ac supplies	IS15884:2010,Cl. D-3.2.1,IEC62055-31,Cl. D-4.3.1
943	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Crystal-controlled Clocks on Operation Reserve	IS15884:2010,Cl.D- 3.2.2 ,IEC62055-31,Cl. D- 4.3.2
944	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	DC & even harmonics in current circuit	IS15884:2010 Cl.4.6.2,IEC62055 -31:2005Cl.4.6.3
945	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Dry heat test	IS15884:2010Cl.5.3.1,IEC62055 -31:2005IEC62052-11:2020Cl.8.3.3,IEC62053-21:2020Cl.8 IEC62053-22:2020Cl.8,IEC62053-23:2020Cl.8,IEC62053-24:2020Cl.8
946	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Effects of Disturbances on Time Keeping	IS15884:2010 ,Cl. D-4,IEC62055-31,Cl.D-5



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 62 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
947	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Frequency variation	IS15884:2010 Cl.4.6.2,IEC62055-31:2005Cl.8.
948	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	General and constructional requirements: General,eter case,Window,Terminals,Terminal Block and Protective earth Terminal, Terminal Cover,Clearances and Creepage distances, Insulating encased meter,Display of measured values,Output Device,Keypad Interference	IS15884:2010 Cl.4.1,4.2.12.3,IEC62055-31
949	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Impulse voltage test	IS15884:2010 Cl.5.4.6.2,IEC62055 -31:2005 Cl.7.7
950	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Insulation test	IS15884:2010Cl.5.4.6.1,IEC62055-31
951	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	limits of error and Interpretation of test Results	IS15884:2010 Cl.5.6.6,IEC62055-31:2005Cl.8.0
952	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Magnetic induction of external origin(0.5mT)	IS15884:2010 Cl.4.6.2,IEC62055-31:2005Cl.7.7
953	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Operation of an Accessories	IS15884:2010Cl.4.6.2,IEC62055- 31::
954	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Power Consumption	IS15884:2010Cl5.4.1,IEC62055 - 31:2005Cl.7.3
955	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Radio Interference Measurement -Conducted emission-(0.15MHzto30MHz)	IS15884:2010Cl.5.5.5,IEC62031:2005Cl.7.8.8



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 63 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
956	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Test of resistance to heat & fire	IS15884:2010Cl.5.2.4,IEC62055-31:2005,IEC62052-31:2015 Cl.9.3.2.1
957	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Static prepayment Meters for Active Energy Class1and2	Test on limits of error	IS15884:2010 Cl.4.6.1,IEC62055-31:2005 Cl.8.0,
958	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Spring Hammer Test/mechanical test of meter case	IS15884:2010Cl.5.2.1,IEC62055-31:2005,IEC62052-31:2015Cl.8.2
959	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Reversed phase sequence	IS15884:2010 Cl.4.6.2,IEC62055-31:2005 Cl.8.0
960	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Shock test	IS15884:2010 Cl.5.2.2,IEC62055-31:2005Cl.5.2.2
961	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Stray d.c. magnetic induction of external origin 67mT	IS15884:2010Cl.4.6.2
962	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Test of repeatability of Error	IS15884:2010 Cl.5.6.7,IEC62055-31:2005 Cl.7.7,
963	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Test of starting condition	IS15884:2010 Cl.5.6.4,IEC62055-31:2005Cl.8.0
964	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Test on consumption based,time base charging functions	IS15884:2010Cl.5.9,Cl.5.10 IEC62055-31
965	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2	Voltage unbalance	IS15884:2010 Cl.4.6.2,IEC62055-31:2005 Cl.8.0
966	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for Active Energy Class1and2;	Test o Initial start-up of meter and Test of no load condition	IS15884:2010 Cl.5.6.3,IEC62055-31:2005 Cl.8.0



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

64 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
967	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergy Class 1 and 2AC.StaticDirect ConnectedWathour SmartMeterClass1and2;	Dielectric strength	IS15884:2010Cl.G8,IS16444(Part1):2015A.1, 2Cl.7.2,IEC62055-31,Cl. AnnexC 8
968	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergy Class 1 and2,AC.Static Direct ConnectedWathour Smart Meter Class 1and2	Functional requirements	IS15884:2010Cl.6.0,IEC62055-31,Cl.9.0
969	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergy Class 1 and2;AC.Static DirectConnectedWathourSmartMeterClass1and2;	Normal Operation	IS15884:2010Cl.G2,IS16444(Part 1): 2015A.1,2Cl.7.2,IEC62055 -31:2005, Cl. AnnexC2
970	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergyClass1and2	Vibration test (Sine and random)	IS15884:2010Cl.5.2.3,IEC62055 -31:2005cl.no.5.2.3
971	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergyClass1and2	Voltage variation	IS15884:2010 Cl.4.6.2,IEC62055 -31:2005 Cl.8.0,
972	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergyClass1and2	Waveform 10% of 3rd harmonic in the current	IS15884:2010Cl.4.6.2
973	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergyClass1and2;	Marking of meters NamePlateConnection diagrams andterminalMarking	IS15884:2010 Cl.4.2,IEC62055-31:
974	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC direct connected Staticprepayment Meters for ActiveEnergyClass1and2;	Test of meter constant	IS15884:2010 Cl.5.6.5,IEC62055 -31:2005 Cl.8.0
975	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Wathourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Wathour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Shock test	IS14697:1999A.1to 4,Cl.12.3.2(Withdrawn),CBIP&e "325:2015 Cl.5.2.3,IS16444(Part2):2017A. 1Cl.6.5,IEC62052- 11:2020Cl.5.2.1,IEC62053- 21:2020,IEC62053- 22:2020,IEC62053- 23:2020,IEC62053- 24:2020,IS14697,Cl.12.3.3





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

65 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
976	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Test of repeatability of Error	IS14697:1999A.1to4 Cl.12.16(Withdrawn),CBIP-325:2015 Cl.5.6.9,IS16444(Part2):2017A.1Cl.6.12,IS14697:2021Cl.12.16 ,IEC62052-11:2020,IEC62053-2 1:2020,IEC62053-22:2020,IEC6 2053-23:2020,IEC62053-24,Cl. 7.8
977	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Test of meter constant	IS14697:1999A.1to4 Cl.12.14 (Withdrawn),CBIP- 325:2015 Cl.5.4.6.6,IS16444 (Part 2):2017A.1Cl.6.12, IS14697:2021Cl.12.14,IEC6205 2-11:2020,IEC62053-21:2020,IE C62053-22:2020,IEC62053-24 ,Cl.7.4:
978	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Abnormal a.c.magnetic Induction of external Origin(10mTesla)	IS14697:1999A.1to4 Cl.12.10(Withdrawn),CBIP- 325:2015 Cl.5.6.2.4,IS16444(Part2):2017 A.1Cl.6.12,IS14697,Cl
979	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Auxiliary voltage+/-15%	IS14697:1999A.1to4 Cl.12.10(Withdrawn),CBIPà€“ 325:2015Cl.4.2.2.10, IS16444 (Part 2): 2017A.1Cl.6.12,IS14697:2021, Cl.12.10,IEC62052-11:2020 Cl.9.4.8,IEC62053-21:2020Cl.7. 10,IEC62053-22:2020Cl.7.10,IE C62053-24Cl.7.10,
980	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Cold test	IS14697:1999 A.1to 4Cl.12.6.2(Withdrawn),CBIP-32 5:2015 Cl.5.3.2,IS16444(Part2):2017A. 1Cl.6.9,IEC62052- 11:2020Cl.8.3.4,IEC62053- 21:2020Cl.8,IEC62053- 22:2020Cl.8,IEC62053- 23:2020Cl.8,IEC62053- 24:2020 Cl.8,IS14697Cl.12.6.2
981	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Continuous abnormal dc.magnetic Induction of external Origin (200/270mTesla)	IS14697:1999A.1to4 Cl.12.10 (Withdrawn),CBIP-325:2015 Cl.5.6.2.2,IS16444(Part2):2017 A.1Cl.6.12,IS14697,Cl.12.10.:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 66 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
982	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Damp heat cyclic test	IS14697:1999A.1to 4CI.12.6.3(Withdrawn),CBIP-32 5:2015CI.5.3.3,IS16444 (Part2):2017A.1IEC62052-11:2020CI.8.3.5,IEC62053-21:2020CI.8,IEC62053-22:2020CI.8,IEC62053-23:2020CI.8,IEC62053-24:2020 CI.8,IS14697,CI.12.6.3
983	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Fast transient burst test	IS14697:1999 A.1to4CI.12.8.4(Withdrawn),CB IP-325:2015CI.5.5.3,IS16444(P art2) :2017A.1CI.6.11,IEC62052-11:2 020CI.9.3.6,IEC62053-21:2020CI.7.10,IEC62053-22:2020CI.7.10,IEC62053-24:2020CI.7.10,IS14697CI.12.8 .4
984	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Frequency variation	IS14697:1999A.1to4 CI.12.10(Withdrawn),CBIP-325: 2015 CI.5.4.6.3,IS16444(Part 2):2017A.1CI.6.12,IS14697:202 1CI.12,IEC62052-11:2020,IEC6 2053-21:2020,IEC62053-22:20 20,IEC62053-24,CI.7.10
985	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	General and constructional requirements: General, Metercase, Window, Terminals, TerminalBlock and Protective earth Terminal, Terminal Cover, Clearances and Creepage distances, Insulating encased meter, Display of measured values, Output Device	IS14697:1999A.1to4CI.6.0 (Withdrawn), CBIP â€ 325:2015 CI.4.2.2, IS16444(Part 2):2017 A.1 &2CI.6.0,IEC62052-11:2020CI.5 .0,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24:2020,IS14697, CI.6.0:
986	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Influence of heating	IS14697:1999 A.1to 4CI.12.7.5(Withdrawn),CBIPâ€ 325:2015 CI.5.4.5,IS16444 (Part2):2017 A.1 CI.6.10.5,IEC62052-31:2015CI. 10.4,IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-23:2020,IEC62053-24:2020,IS14697 ,CI.12.7.5



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 67 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
987	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Influence of self heating	IS14697:1999 A.1to 4Cl.12.7.4(Withdrawn),CBIP-325:2015,IS16444(Part2):2017A.1Cl.6.10.4,IEC62052-11:2020Cl.9.4.11,IEC62053-21,IEC62053-22, IEC62053-24:2020Cl.7.10,IS14697Cl.12.7.4
988	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Influence of Supply Voltage	IS14697:1999A.1to4 Cl.12.7.2(Withdrawn),CBIP-325:2015,IS16444(Part2):2017A.1Cl.6.10.2,IEC62052-11:2020Cl.9.3.2,IEC62053-21:2020Cl.7.10,IEC62053-22:2020,Cl.7.10,IEC62053-24:2020 Cl.7.10,IS14697,Cl.12.7.2
989	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	limits of error and Interpretation of test Results	IS14697:1999A.1to4 Cl.12.15(Withdrawn),CBIP-325:2015, IS16444(Part 2):2017A.1Cl.6.12,IS14697:2021Cl.12.15,IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24
990	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Magnetic induction of external origin(0.5T)	IS14697:1999A.1to4 Cl.12.10 (Withdrawn),CBIP- 325:2015 Cl.5.6.2.3,IS16444(Part2):2017 A.1Cl.6.12,IS14697:2021Cl.12.10,IEC62052-11:2020,Cl.9.3.12 ,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24
991	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Operation of An Accessories	IS14697:1999A.1to4 Cl.11.2(Withdrawn),CBIPâ€“325:2015 Cl.4.6.2,IS16444 (Part 2):2017Cl.6.12, IEC62052-11,2020,IEC62053-21:2020Clause. 8.2, IEC62053-22:2020,,IEC62053-24:2020,IS14697
992	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Phase of auxiliary Supply changed by 120Â°	IS14697:1999A.1to 4Cl.12.10(Withdrawn),IS16444 (Part 2) A.1:2017Cl.6.12, IS14697Cl.12.10,



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 68 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
993	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Power Consumption	IS14697:1999A.1to4Cl.12.7.1(3 25:2015 Cl. 5.4.1,IS16444(Part2) :2017A.1Cl.6.10.1,IEC62052-11 :2020Cl.4.4,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24:2020Cl.4.4,IS14697Cl.12.7.1
994	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Protection against penetration of Dust and Water	IS14697:1999 A.1to 4Cl.12.5(Withdrawn),CBIPà€“3 25:2015Cl. 5.2.5,IS16444 (Part 2):2017A.1 Cl.6.5,IEC62052-31,2015Cl.11,I EEC62052- 11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24:2020,IS14697,Cl.12.5:
995	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Reversed phase sequence	IS14697:1999A.1to4 Cl.12.10(Withdrawn),CBIP-325: 2015 Cl.4.6.3,IS16444(Part2):2017A. 1Cl.6.12, ,IS14697:2021 Cl.12.10,IEC62052-11:2020,Cl. 9.4.7,IEC62053-21:2020,IEC62053-22:2020,IEC 62053-24,Cl.7.10,::
996	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Short time over current Test	IS14697:1999A.1to4 Cl.12.7.3(Withdrawn),CBIP-325: 2015Cl.5.4.3,IS16444(ParlIEC62 052-11:2020Cl.9.4.10,IEC6205 3- 21,IEC62053-22, IEC62053-24:2020Cl.7.10,IS14697Cl.12 IS14697:1999A.1to4 Cl.12.7.3(Withdrawn),CBIP-325: 2015Cl.5.4.3,IS16444(ParlIEC62 052-11:2020Cl.9.4.10,IEC6205 3- 21,IEC62053-22, IEC62053-24:2020Cl.7.10,IS14697Cl.12
997	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Spring Hammer Test/ mechanical test of meter case	IS14697:1999 A.1to 4Cl.12.3.3(Withdrawn),CBIP-32 5:2015Cl.5.2.1,IEC62052- 31:2015Cl.8.2,IEC62052- 11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24:2020,IS14697,Cl.12.3.3



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 69 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
998	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Strayd.c.magnetic induction of external origin 67mT	IS14697:1999A.1to4 Cl.12.10(Withdrawn),CBIP-325:2015 Cl.5.6.2.2,IS16444(Part2):2017 A.1Cl.6.12,IS14697,Cl.12.10
999	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Surge immunity test	IS16444(Part2):2017A.1Cl.6.11 ,IS14697Cl.12 11:2020Cl.9.3.9,IEC62053-21:2020,IEC62053-22:2020,IEC62053-23:2020,IEC62053-24:2020,IEC62052-31
1000	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Test of immunity to earth/phase fault	IS14697:1999 A.1to 4Cl.12.17(Withdrawn), CBIP-325:2015, IS16444(Part2) :2017 A.1 Cl.6.10.7,IEC62052-11:2020Cl.9.4.13,IEC62053-21:2020Cl.7.10,IEC62053-22:2020Cl.7.10,IEC62053-24:2020 Cl.7.10,IS14697,Cl.12.17
1001	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Test of Immunity to electromagnetic HF/RF Fields.	IS14697:1999A.1to4 Cl.12.8.3 (Withdrawn),CBIP-325:2015 ,IS16444 (Part2):2017A.1Cl.6.11,IS14697Cl.12.8.3::
1002	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Test of resistance to Heat & fire	IS14697:1999A.1to4 Cl.12.4(Withdrawn),CBIP-325:2015 Cl.5.2.4, IS16444(Part 2):2017A.1Cl.6.5,IEC62052-31:2015Cl.9.3.2.1,IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-23:2020,IEC62053-24:2020,IS14697Cl.12.4.;
1003	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Test of starting condition	IS14697:1999A.1to4 Cl.12.13(Withdrawn),CBIP-325:2015 Cl.5.4.6.5, IS16444(Part 2):2017A.1Cl.6.12,IS14697:2021Cl.12.13,IEC62011:2020,IEC62053-21:2020, IEC62053-22:2020, IEC62053-24,CL.7.7



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 70 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1004	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Voltage unbalance	IS14697:1999A.1to4 Cl.12.10(Withdrawn),CBIP-325:2015 Cl.4.6.3,IS16444(Part2):2017A.1Cl.6.12,IS14697:2021Cl.12.10 ,IEC62052-11:2020Cl.9.4.5,IEC 62053-21:2020,IEC62053-22:2020, IEC62053-24,Cl.7.10
1005	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Voltage variation	IS14697:1999A.1to4Cl.12 (Withdrawn),CBIP-325:2015,IS16444(Part2):2017A.1Cl.6.12, ,IS14697:2021 Cl.12,IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24,Cl.7.10
1006	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Wave form 10% of 3rd harmonic in the current	IS14697:1999A.1to4 Cl.12.10 (Withdrawn),CBIP-325:2015 Cl.4.6.3,IS16444(Part2):2017A.1Cl.6.12,,IS14697,Cl.12.10
1007	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	AC voltage test	IS14697:1999A.1to4 Cl.12.7.6.3 (Withdrawn), CBIP-325:2015 Cl.5.4.6.3,IS16444(Part 2):2017A.1Cl.6.10.6,IS14697:2021Cl.12.7.6.2, IEC62052-31:2015Cl.6.10.3.3,I EC62052-11:2020,IEC62053-21 :2020IEC 62053-22:2020,IEC62053-24
1008	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Dry heat test	IS14697:1999 A.1to 4, Cl.12.6.1(Withdrawn),CBIP-325:2015 ,Cl.6.9,IS16444 (Part 2):2017 A.1Cl.6.9,IEC62052-11:2020Cl. 8.3.3,IEC62053-21:2020Cl.8 IEC62053-22:2020Cl.8,IEC62053-24:2020 Cl.8,IS14697,Cl.12.6.1
1009	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Electrostatic Discharge Test	IS14697, 1999,A.1to4, Cl.12.8.2(Withdrawn),CBIP-325:2015Cl.5.5.2,IS16444(Part 2)A.1 Cl.6.11,IEC62052-11:2020Cl.9. 3.3,IEC62053- 21:2020,IEC62053-22:2020,IEC 62053-24:2020,IS14697,Cl.12. 8.2



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 71 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1010	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Insulation test	IS14697:1999A.1to4 Cl.12.7.6.4 (Withdrawn), CBIP-325:2015 Cl.5.4.6.4,IS16444(Part 2):2017A.1Cl.6.10.6,IS13779:2020Cl.12.7.6.4, IS14697Cl.12.7.6.4
1011	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Marking of meters Name Plate Connection diagrams and terminal Marking	IS14697:1999A.1 to4Cl.7.0(Withdrawn),CBIP:325:2015Cl.4.2.2.11 ,IS16444(Part2):201Cl.6.8, IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24:2020,IS14697Cl.7.0
1012	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Radio Interference Measurement -Conducted emission-(0.15MHzto30MHz)	IS14697:1999A.1to4Cl.12.8.5(C BIP -325:2015Cl.5.5.5, IS16444(Par 2)A.1Cl.6.11,IS14697Cl.12.8.6
1013	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Test of Initial start-up of meter and Test of no Load condition	IS14697:1999A.1to4 Cl.12.12(Withdrawn),CBIP-325:2015 Cl.5.6.4,IS16444(Part2):2017A.1Cl.6.12,IS14697:2021Cl.12.12 ,IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24,Cl.7.6
1014	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-Hour Meters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Test on limits of error	IS14697:1999A.1to4 Cl.11.1 (Withdrawn),CBIP-325:2015Cl.5.4.6.8, IS16444(Part 2):2017A.1Cl.6.12 ,IS14697:2021Cl.11.1,IEC620511:2020, IEC62053-21:2020,IEC62053-23:2020, IEC62053-24,Cl.7.9
1015	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Transformer operated Watthourand VAR-HourMeters, Class 0.2 and0.5; AC.Static Transformer operated Watthour and VAR- hour Smart Meter Class 0.2S,0.5S and1.0S	Impulse voltage test	IS14697:1999A.1to4 Cl.12.7.6.2 (Withdrawn), CBIP-325:2015 Cl.5.4.6.2,IS16444(Part2):2017 A.1Cl.6.10.6,IS14697:2021,Cl.12.7.6.2,IEC62052-31:2015Cl.6.10.3.3, IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-24



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 72 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1016	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC.Static Direct Connected Watthour Smart Meter Class1and2;	Marking of meters Name Plate Connection diagrams and terminal Marking	IS13779:1999A.1to 5Cl.7.0(Withdrawn),CBIP:325:2015Cl.4.2.2.11,IS16444(Part1):2016.8,IS13779:2020Cl.6.0,IEC 62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-23:2020,IEC62053-24
1017	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2	Electro static Discharge Test	IS13779:1999 A.1to 5Cl.12.9.2(Withdrawn),CBIP:325:2015Cl.5.5.2,IS13779:202 Cl.12.9.2,IEC62052-11:2020Cl.9.3.3,IEC62053-21:2020,IEC62053-22:2020,IEC62053-23:2020,IEC 62053-24
1018	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2	Fast transient burst test	IS13779:1999A.1to5Cl.12.9.4( ,CBIP-325:2015Cl.5.5.3,IS1377 9:2020Cl.12.9.11:2020 Cl.9.3.6,IEC62053-21:2020Cl.7.10,IEC62053-22:2020Cl.7.10,IEC62053-23:2020Cl.7.10,IEC62053-24:2020Cl.7.10
1019	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1and 2	Influence of self heating	IS13779:1999A.1to 5Cl.12.7.4(Withdrawn),CBIP-325:2015Cl.5.4.4,IS13779:202 11:2020Cl.9.4.11,IEC62053-21,IEC62053-22, IEC62053-23,IEC62053-24:2020Cl.7.10
1020	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;	Influence of heating	IS13779:1999A.1to5 Cl.12.7.5(Withdrawn),CBIP:325:2015Cl.5.4.5, ,IS13779:2020Cl.12.7.5,IEC620 52-31:2015Cl.10.4,IEC62052-11:2020,IEC62053-21:2020,IEC62053-22:2020,IEC62053-23:2020,IEC62053-24
1021	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;	Short time over current Test	IS13779:1999A.1to5Cl.12.7.3(C BIP-325:2015Cl.5.4.3, ,IS13779:2020Cl.12.7.3,IEC620 52-11:2020Cl.9.4.10,IEC62053-21,IEC62053-22, IEC62053-23, IEC62053-24:2020Cl.7.10





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 73 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1022	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC Static Transformer operated Watthour and VAR-Hour Meters, Class 0.2 and 0.5; A Cdirect connected Static prepayment Meters for Active Energy Class 1 and 2 AC.Static Direct Connected Watthour Smart Meter Class 1 and 2;AC. Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2 S,0.5S and 1 .0 S	Voltage variation	IS13779:1999 A.1to 5Cl.12.11(Withdrawn),CBIP-325 :2015Cl.4.6.3, IS16444(Part 1):2015 A.1&2Cl.6.12,IS13779:2020Cl.1 2.11, IEC62052-11:2020,IEC62053-2 1:2020,IEC62053-22:2020,IEC6 2053-23:2020,IEC62053-24,Cl. 7.10:
1023	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC Static Transformer operated Watthour and VAR-Hour Meters,Class 0.2 and 0.5;A Cdirect connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour Smart Meter Class1 and 2;AC. Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S	Continuous magnetic induction of external origin	IEC62055 -31:2005Cl.7.7,IEC62052- 11:2020,Cl.9.3.12,IEC62053- 21:2020,IEC62053- 22:2020,IEC62053 23:2020,IEC62053-24::
1024	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC Static Transformer operated Watthour and VAR-Hour Meters,Class 0.2 and 0.5;A Cdirect connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct onected Watthour Smart Meter Class1 and .Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and1.0S	Odd harmonics in ac current circuit	IEC62055 -31:2005,Cl.4.6.2IEC62052-11, 2020,Cl.9.4.2.4IEC62053-21,20 20,Cl.7.10IEC62053-22,2020,Cl .7.10IEC62053-23,2020,Cl.7.10 IEC62053-24,Cl.7.10
1025	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC Static Transformer operated Watthour and VAR-Hour Meters,Class 0.2 and 0.5;ACdirect connected Static prepayment Meters for Active Energy Class 1 and2;AC.Static Direct Connected Watthour Smart Meter Class1 and 2;AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 2S,0.5 and1.0S	Harmonic component in current and voltage	IEC62055 -31:2005,Cl.4.6.2IEC62052-11, 2020,Cl.9.4.2.3IEC62053-21,20 20,Cl.7.10IEC62053-22,2020,Cl .7.10IEC62053-23,2020,Cl.7.10 IEC62053-24,Cl.7.10
1026	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC. Static Direct Connected Watthour Smart Meter Class1and2	Coldt est	IS13779:1999 A.1to 5Cl.12.6.2(Withdrawn),CBIPâ€“ 325:2015 Cl.5.3.2,IS16444(Part1): 2015 A.1,2Cl.6.9,IS13779:2020 Cl.12.6.2IEC62052-11:2020Cl.8 .3.4,IEC62053-21:2020Cl.8,IEC 62053-22:2020Cl.8,IEC62053-2 3:2020Cl.8,IEC62053-24:2020 Cl.8



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223

**Validity** 17/12/2022 to 16/12/2024

**Page No** 74 of 96

**Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1027	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC. Static Direct Connected Watthour Smart Meter Class1and2	AC voltage test	IS13779:1999A.1 to5Cl.12.7.6.3 (Withdrawn), CBIP-325:2015 Cl.5.4.6.3IS16444(Part 1):2015 A.1&2Cl.6.10.6, IS13779:2020Cl.12.7.6.2, , IEC62052-31:2015Cl.6.10.3.3,I EC62052-11:2020,IEC62053-21:2020,IEC 62053-22:2020,IEC62053-23:2 020,IEC62053-24
1028	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC.Static Direct Connected Watthour Smart Meter Class 1and2	Insulation test	IS13779:1999A.1to5Cl.12.7.6.4 (Withdrawn),CBIP-325:2015Cl.5 .4.6.4, Cl.7.7,IS16444(Part 1):2015 A.1&2Cl.6.10.6 , IS13779:2020Cl.12.7.6.4,:
1029	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC.Static Direct Connected Watthour Smart Meter Class1and2	Protection against penetration of dust and water	IS13779:1999 A.1to 5Cl.12.5(Withdrawn) ,CBIPâ€“ 325:2015 Cl. 5.2.5,IS16444(Part1):2015A.1& 2Cl.6.5,IS13779:2020Cl.12.5,IE C62052-31,2015Cl.11,IEC6205 2- 11:2020,IEC62053- 21:2020,IEC62053- 22:2020,IEC62053- 23:2020,IEC62053-24
1030	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC.Static Direct Connected Watthour Smart Meter Class 1and 2;	Wave form 10%of3rd harmonic in the current	IS13779:1999 A.1to 5Cl.12.11(Withdrawn),CBIP-325 :2015Cl.4.6.3, IS16444(Part 1):2015 A.1&2Cl.6.12,IS13779:2020 Cl.12.11
1031	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC.Static Direct Connected Watthour Smart Meter Class1 and 2;AC.Static Transformer operated Watthour	Continuous abnormal dc.magnetic Induction of external Origin(200/270mTesla)	IS13779:1999A.1to5Cl.Cl 12.11 (Withdrawn),CBIP-325:2015Cl.5 .6.2.2., IS16444(Part 1):2015A.1&2Cl.6.12,IS13779:2 020 Cl.12.11,
1032	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC.Static Direct Connected Watthour Smart Meter Class1and2;	Test of immunity to earth/phase fault	IS13779:1999A.1to5 Cl.12.8(Withdrawn),CBIPâ€“32 5:2015,IS16444(Part 1):2015 A.2 Cl.6.10.7,IS13779 :2020Cl.12.8,IEC62052-11:202 0Cl.9.4.13,IEC62053- 21:2020Cl.7.10,IEC62053- 22:2020Cl.7.10,IEC62053- 23:2020Cl.7.10,IEC62053- 24:2020Cl.7.10



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 75 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1033	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;AC.Static Direct Connected Watthour Smart MeterClass1and2;	Test of repeatability Of Error	IS13779:1999 A.1to 5Cl.12.17(Withdrawn),CBIP-325 :2015Cl.5.6.9, IS16444(Part 1):2015 A.1&2IS13779:2020 Cl.12.17,IEC62052-11:2020,IEC 62053-21:2020,IEC62053-22:2 020,IEC62053-23:2020,IEC620 53-24,Cl.7.8
1034	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2;Meters for Active Energy Class 1 and 2;AC.Static Direct Connected Watthour Smart Meter Class 1 and 2;	Meter constant	IS13779:1999 A.1to 5Cl.12.15(Withdrawn),CBIP-325 :2015Cl.5.4.6.6, IS16444(Part 1):2015 A.1&2IS13779:2020 Cl.12.15,IEC62052-11:2020,IEC 62053-21:2020,IEC62053-22:2 020,IEC62053-23:2020,IEC620 53-24,Cl.7.4:
1035	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and2;AC.Static Direct Connected Watthour Smart Meter Class 1and2	Dry heat test	IS13779:1999A.1to5 Cl.12.6.1(Withdrawn),CBIP-325: 2015Cl.5.3.1,IS16444 (Part 1): 2015 A.1&2Cl.6.9,IS13779:2020 Cl.12.6.1IEC62052-11:2020Cl.8 3.3,IEC62053-21:2020Cl.8 IEC62053-22:2020Cl.8,IEC6205 3-23:2020Cl.8,IEC62053-24:20 20Cl.8,:
1036	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class1 and 2,AC.Static Direct Connected Watthour Smart Meter Class1and2	Vibration test (Sine and random)	IS13779:1999 A.1to 5Cl.12.3.2(Withdrawn),IS16444 (Part1):2015A.1&2Cl.6.5, IS13779:2020Cl.12.3.2,IEC620 52-11:2020Cl.5.2.1,IEC62053-2 1:2020,IEC62053- 22:2020,IEC62053- 23:2020,IEC62053-24
1037	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class1 and 2;AC. Static Direct Connected Watthour Smart Meter Class 1and2;	Impulse Voltage	IS13779:1999 A.1to 5Cl.12.7.6.2 (Withdrawn), CBIP-325:2015 Cl.5.4.6.2,IS16444(Part 1):2015 A.1&2Cl.6.10.6,IS13779:2020Cl .12.7.6.2, IEC62052-31:2015Cl.6.10.3.3,I EC62052-11:2020,IEC62053-21 :2020,IEC62053-22:2020,IEC62 053-23:2020,IEC62053-24



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 76 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1038	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2;	Test of starting condition	IS13779:1999 A.1to 5CI.12.14(Withdrawn),CBIP-325 :2015CI.5.4.6.5, IS16444(Part 1):2015 A.1&2CI.6.12,IS13779:2020CI.1 2.14, IEC62052-11:2020,IEC62053-2 1:2020,IEC62053-22:2020,IEC6 2053-23:2020,IEC62053-24,CL. 7.7
1039	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2;	Damp heat cyclic test	IS13779:1999 A.1to 5CI.12.6.3(Withdrawn),CBIP-32 5:2015,IS16444(Part1): 2015 A.1&2CI.6.9,IS13779:2020CI.12 .6.3,IEC6211:2020 CI.8.3.5,IEC62053- 21:2020CI.8,IEC62053- 22:2020CI.8,IEC62053- 23:2020CI.8,IEC62053-24
1040	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2;	General and constructional requirements: General, Meter case, Window, Terminals, Terminal Block and Protective earth Terminal, Terminal Cover, Clearances and Creepage distances, Insulating encased meter, Display of measured values, Output Device,	IS13779:1999 A.1to 5CI.6.0 (Withdrawn),CBIP-325:2015 CI.4.2.2,IS16444 (Part 1): 2015 A.1&2CI.6.0,IS13779:2020CI.6. 0,IEC62052-11:2020CI.5.0,IEC6 2053- 21:2020,IEC62053- 22:2020,IEC62053- 23:2020,IEC62053-24
1041	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2;	Ambient temp influence	IS13779:1999 A.1to 5CI.12.12(Withdrawn),CBIP-325 :2015CI.5.6.3, IS16444(Part 1):2015 A.1&2CI.6.12,IS13779:2020CI.1 2.12, IEC62052-11:2020,IEC62053-2 1:2020,IEC62053-22:2020,IEC6 2053-23:2020,IEC62053-24,CI. 7.10:
1042	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2;	Voltage unbalance	IS13779:1999 A.1to 5CI.12.11(Withdrawn),CBIP-325 :2015, IS16444(Part 1):2015 A.1&2 CI.6.12,IS13779:2020 CI.12.11,IEC62052-11:2020CI.9 .4.5,IEC62053-21:2020,IEC620 53-22:2020,IEC62053-23:2020, IEC62053-24,CI.7.10



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 77 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1043	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2;	Frequency variation	IS13779:1999 A.1 to 5CI.12.11 (Withdrawn), CBIP-325:2015 CI.5.4.6.3, IS16444 (Part 1):2015 A.1 & 2CI.6.12, IS13779:2020 CI.12.11, IEC62052-11:2020, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24, CI.7.10
1044	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2;	Shock test	IS13779:1999 A.1 to 5CI.12.3.1 (Withdrawn), CBIP-325:2015 CI.5.2.2, IS16444 (Part 1):2015 A.1 and 2CI.6.5, IS13779:2020 CI.12.3.1, IEC62052-11:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24
1045	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2	Operation Of an Accessories	IS13779:1999 A.1 to 5CI.12.11 (Withdrawn), CBIP-325:2015 CI.4.6.2, IS16444 (Part 1):2015 A.1 & 2CI.6.12, IS13779:2020 CI.12.11, IEC62052-11, 2020, IEC 62053-21:2020 Clause. 8.2 IEC62053-22:2020, IEC62053-23:2020, IEC62053-24
1046	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2	Power Consumption	IS13779:1999 A.1 to 5CI.12.7.1 (Withdrawn), CBIP-325:2015 CI.5.4.1, IS16444 (Part 1):2015 A.1 & 2CI.6.10.1, IS13779:2020 CI.12.11:2020 CI.4.4, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24:2020 CI.4.4
1047	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC. Static Direct Connected Watthour Smart Meter Class 1 and 2	Radio Interference Measurement-Conducted emission-(0.15MHz to 30MHz)	IS13779:1999 A.1 to 5CI.12.9 (W CBIP -325:2015 CI.5.5.5, IS16444 (Part 1):2015 A.1 & 2CI.6.11, IS13779:2020 CI.12.9.6



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 78 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1048	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC.Static Direct Connected Watthour Smart Meter Class 1 and 2;	Magnetic induction of external origin (0.5mT)	IS13779:1999A.1 to 5Cl. 12.11 (Withdrawn), CBIP-325:2015 Cl.5.6.2.3, IS16444 (Part 1):2015 A.1 & 2Cl.6.12, IS13779:2020 Cl.12.11, IEC62052-11:2020, Cl.9.3.12, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24
1049	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC.Static Direct Connected Watthour Smart Meter Class 1 and 2	Abnormal a.c magnetic induction of external Origin (10mTesla)	IS13779:1999A.1 to 5Cl. Cl. 12.11 (Withdrawn), CBIP-325:2015 Cl.5.6.2.4, (Part 1):2015 A.1 & 2Cl.6.12, IS13779:2020 Cl.12.11
1050	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC.Static Direct Connected Watthour Smart Meter Class 1 and 2;	DC & even harmonics in current circuit	IS13779:1999 A.1 to 5Cl.12.11 (Withdrawn), CBIP-325:2015 Cl.4.6.3, IS16444 (Part 1):2015 A.1 & 2Cl.6.12, IS13779:2020 Cl.12.11, IEC62052-11:2020, Cl.9.4.2.5, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24, Cl.7.10
1051	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC.Static Direct Connected Watthour Smart Meter Class 1 and 2;	Reversed phase sequence	IS13779:1999 A.1 to 5Cl.12.11 (Withdrawn), CBIP-325:2015 Cl.4.6.3, IS16444 (Part 1):2015 A.1 & 2Cl.6.12, IS13779:2020 Cl.12.11, IEC62052-11:2020, Cl.9.4.7, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24, Cl.7.10
1052	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC.Static Direct Connected Watthour Smart Meter Class 1 and 2	Limits of error	IS13779:1999A.1 to 5Cl.11.1 (Withdrawn), CBIP-325:2015 Cl.4.6.8, IS16444 (Part 1):2015 A.1 & 2Cl.6.12, IS13779:2020 Cl.11.1, Cl.8.0 IEC62052-11:2020, IEC62053-21:2020, IEC62053-23:2020, IEC62053-24



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 79 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1053	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC Static Direct Connected Watthour Smart Meter Class 1 and 2	Limits of error & Interpretation of test Results	IS13779:1999 A.1 to 5CI.12.16(Withdrawn), CBIP-325:2015 CI.5.6.7, IS16444(Part 1):2015 A.1&2 IS13779:2020 CI.12.16, IEC62052-11:2020, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24
1054	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC Static Transformer operated Watthour and VAR-Hour Meters, Class 0.2 and 0.5	Verification of anti-tamper features	CBIP R.Publication:325, 2015 CI.6.7 IS14697, 1999A.1 to 4(withdrawn)
1055	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meters Class 1 and 2 AC static Transformer operated Watthour and VAR- Hour Meters, Class 0.2S, 0.5S & 1.0S	Abnormal a.c magnetic induction of external origin(0.2T)	CBIP manual 304::
1056	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC Static Direct Connected Watthour Smart Meter Class 1 and 2;	Spring Hammer Test/mechanical test of meter case	IS13779:1999 A.1 to 5CI.12.3.3(Withdrawn), CBIP-325:2015 CI.5.2.1, IS16444 (Part 1):2015 A.1&2 CI.6.5, IS13779:2020 CI.12.3.3, IEC62052-11:2020, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24
1057	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC Static Direct Connected Watthour Smart Meter Class 1 and 2;	Test of resistance to Heat & fire	IS13779:1999 A.1 to 5CI.12.4(Withdrawn), CBIP-325:2015 CI.5.2.4, IS16444(Part 1):2015 A.1&2 CI.6.5, IS13779:2020 CI.12.4, IEC62052-11:2020, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24:
1058	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static Watthour Meter Class 1 and 2; AC Static Direct Connected Watthour Smart Meter Class 1 and 2	Test of Initial start-up of meter and Test of no load condition	IS13779:1999 A.1 to 5CI.12.13(Withdrawn), CBIP-325:2015 CI.5.6.4, CI.8.0, IS16444(Part 1):2015 A.1&2 CI.6.12, IS13779:2020 CI.12.13, IEC62052-11:2020, IEC62053-21:2020, IEC62053-22:2020, IEC62053-23:2020, IEC62053-24, CI.7.6::



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 80 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1059	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static WatthourMeterClass 1 and 2;AC.Static DirectConnected WatthourSmartMeterClass1and2	Stray d.c. magnetic induction of external origin 67mT	IS13779:1999A.1to5Cl.CI 12.11(Withdrawn), CBIP-325:2015Cl.5.6.2.2, IS16444(Part 1):2015A.1&2Cl.6.12,IS13779:2020 Cl.12.11
1060	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC Static WatthourMeterClass 1 and 2;ACStaticTransformeroperatedWatthourand VAR-HourMeters, Class 0.2 and 0.5;ACdirect connected Staticprepayment Meters for ActiveEnergyClass1and2	Test of Accuracy of Crystal controlled clock with temperature	IS15884, 2010, Clause D-3.2.3IEC62055-31,2005, ClauseD-4.3.3
1061	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Direct Connected Watthour Smart Meter Class1and2	Smart meter Functional Requirement	IS16444(Part1):2015A.1and2Cl. 11.0
1062	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Direct Connected Watthour Smart Meter Class1and2	Test for Smart Meter Communicability (Equipment Type Approval (ETA) of modules for WAN/NAN/HD shall be approved by designated agency authorized by DoT	IS16444 (Part 1): 2015 A.1and2Cl.10.6.2IS15959(Part 1):2011(RA:2016)withAmendm entNo. 1 July 2014, Amendment No. 2March2015,AmendmentNo.3 January 2016, Amendment No.4April,2017 andAmendment No. 5 Feb.2021IS15959(Part2):2016 withA.1, April 2017,A.2,May
1063	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Direct Connected Watthour Smart Meter Class1and2;	Test for Data Exchange Protocol	IS16444(Part1):2015A.1,2Cl.10.5IS15959 (Part1) 2011(RA:2016)withAm.1July20 14, Am. 2 March 2015, Am. 3January 2016 and Am. 4April,2017.AmendmentNo.5Feb .2021IS15959(Part2): 2016 withAm.1and 2,April 2017
1064	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Direct ConnectedWatthour Smart Meter Class 1and2;	Test for Smart Meter Communicability	IS16444(Part1):2015A.1and2Cl. 10.6.2
1065	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Transformer operated Watthour andVARâ€” hour Smart Meter Class0.2S,0.5Sand1.0S	Test for smart meter communicability	IS16444(Part2),A.1,Cl.9.5.2
1066	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Transformer operated Watthour and VAR-hour Smart Meter Class 0.2S,0.5S and 1.0S	Smart meter Functional Requirement	IS16444 (Part 2),2017A.1,Cl.10.0:





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 81 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1067	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Transformer operated Watthour andVAR-hour Smart Meter Class0.2S,0.5S and1.0S	Test for Data Exchange Protocol	IS16444 (Part 2) : 2016A.1CI.9.4IS15959(Part1): 2011(RA:2016)withAm.1July2014, Am. 2 March 2015, Am. 3January 2016 and Am. 4April,2017.AmendmentNo.5Feb.2021 IS15959 (Part 3):
1068	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	AC.Static Transformer operated WatthourandVAR-hour Smart Meter Class 0.2S, 0.5S and 1.0S	Test for Smart MeterCommunicability(Equipm ent Type Approval (ETA) ofmodules for AN/NAN/HDshall be approved by designated agency authorized by DoT	IS16444 (Part 2) : 2016A.1CI.9.6.2IS15959(Part1) : 2011(RA:2016) with Amendment No. 1July 2014, Amendment No. 2March 2015, Amendment No.3 January 2016, Amendment No.4April,2017 andAmendmentNo.5Feb.2021, IS15959(Part3
1069	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	ACStaticTransformeroperatedWatthourand VAR-HourMeters, Class 0.2 and0.5;AC.Static TransformeroperatedWatthourandVAR- hour SmartMeterClass0.2S,0.5Sand1.0S	Vibration test (Sine and random)	IS14697:1999A.1to 4,Ci.12.3.2(Withdrawn),CBIPâ€ “325:2015 CI.5.2.3,IS16444(Part2):2017A. 1CI.6.5,IEC62052-11:2020CI.5.2.1,IEC62053-22:2020,IEC62053-23:2020,IEC62053-24:2020,IS14697,Ci.12.3.2



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 82 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1070	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricit Meter-Smart Meter Category D3&D4	Compliance test:1.0Conformance toDLMS/COSEM (IEC62056)2.0 Parameter verification:3.0SNRM/UA4.0 Object list download5.0Association properties6.0Security:(a) Lowest Level Security Secret (b) Low Level Security(LLS)Secret(c)High Level Security (HLS)Secret Parameter list:7.0(a)Instantaneous Parameters7.0 (b) Snap Shot of Instantaneous Parameters7.0(c) ScalerProfile8.0 Block loadprofile parameters9.0 Selective access by Range for Block load profile10.0 Daily load profile	CINo4to28ofIS15959 (Part3)-2017
1071	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter-Smart Meter Category D1&D2	Compliance test :1.0 Conformance oDLMS/COSEM (IEC62056)2.0 Parameter verification: 3.0SNRM/UA4.0 Object list download5 .0Association properties6.0Security:(a) Lowest Level Security Secret (b) Low Level Security(LLS)Secret(c)High Level Security (HLS)Secret Parameter list:7.0(a)Instantaneous Parameters7.0 (b) Snap Shot of Instantaneous Parameters 7.0(c) Scaler Profile8.0 Block load profile parameters9.0 Selective access by Range for Block load profile10.0 Daily load profile	CINo4to24ofIS15959 (Part2)-2016
1072	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter	Conformance test	IS / IEC 62056 (DLMS /COSEM)-2005



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 83 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1073	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter	Conformance test	IS15959(Part1):2011(RA:2016) /IS/IEC 62056 (DLMS /COSEM)-2005
1074	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter-Smart Meter Category D1&D2	10.0 Daily load profile parameters 11.0 Selective access by Range for Daily load profile 12.0 ToU setting 13.0 Billing profile parameters 14.0 Billing Period 15.0 Billing Period Counter 16.0 Selective access by Entry for Billing profile	CINo4to24ofIS15959 (Part2)-2016
1075	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter-Smart Meter Category D1&D2	19.0 General Purpose parameters: a) Name Plate Details b) Programmable Parameters 20.0 Test for Smart Meter functional Requirements 21.0 Tests for Smart Meter communicability (a) Association (b) Data read (c) Profile read (d) Selective Programmability (e) Reporting of events (f) Connect/Disconnect (g) Firmware upgrade	CINo4to24ofIS15959 (Part2)-2016
1076	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter-Smart Meter Category D3&D4	10.0 Daily load profile parameters 11.0 Selective access by Range for Daily load profile 12.0 ToU setting 13.0 Billing profile parameters 14.0 Billing Period 15.0 Billing Period Counter 16.0 Selective access by Entry for Billing profile	CINo4to28ofIS15959 (Part3)-2017:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 84 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1077	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter-Smart Meter Category D3&D4	17.0 Event code and Event logging :(a) Indian Event ReferenceTable (b) Voltage Related (c) Indian Event Reference Table (d) Current Related (e) Indian Event ReferenceTable (f) Power Related (g) Indian Event ReferenceTable (h) Transaction Related (i) Indian Event ReferenceTable (j) Other (k) Indian Event ReferenceTable (l) Non Roll Over 18.0 Selective access by Entry for Event Log Profile	CINo4to28ofIS15959 (Part3)-2017
1078	ELECTRICAL- ELECTRICAL INDICATING & RECORDING INSTRUMENTS	Data Exchange for Electricity Meter-Smart Meter Category D3&D4	19.0 General Purpose parameters :(a) Name Plate Details (b) Programmable Parameters 20.0 Tests for Smart Meter Functional Requirements 21.0 Tests for smart Meter communicability a) Association (b) Data read (c) Profile read (d) Selective Programmability (e) Reporting of events (g) Firmware upgrade	CINo4to28ofIS15959 (Part3)-2017
1079	ELECTRICAL- EMI / EMC TEST FACILITY	Self ballasted LED Lamps for General Lightning Services	Test for conducted emissions of Radio frequency disturbances	Clause 5.0 of IS 16102 (Part-2): 2017, Amd 1:
1080	ELECTRICAL- EMI / EMC TEST FACILITY	Self ballasted LED Lamps for General Lightning Services	Test for Radiated emissions of Radio frequency disturbances	Clause 5.0 of IS 16102 (Part-2): 2017, Amd 1:
1081	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Determination of sound levels	IS:1180-(part-1) 2014, IS:2026-1 2011 (RA : 2016 ) IEC 60076-10:2016 IEEE Std C57.12.90™:
1082	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Dielectric tests	IS:2026-1:2011 (RA : 2016 ) IEC:60076-1:2011 IEC:60076-2:2011 IEC:60076-3:2013-07 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021: : 2015, IS: 2026 (Part-3), 2018, IS:1180 (Part-3): 2021, IS 2026(Part-2)



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 85 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1083	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Induced over voltage test	IS:2026-1:2011 (RA : 2016 ) IS:2026-3:2018 IEC:60076-1:2011 IEC:60076-3:2013 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021
1084	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Measurement of impedance voltage/short circuit Impedance (principal tapping) and load loss	IS:2026-1:2011 (RA : 2016 ) IEC:60076-1:2011 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021:
1085	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Measurement of impedance voltage/short circuit Impedance (principal tapping) and load loss	IS:2026-1:2011 (RA : 2016 ) IEC:60076-1:2011 IEC:60076-2:2011 IEC:60076-3:2013-07 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021:
1086	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Measurement of insulation resistance	IS:2026-1:2011 (RA : 2016 ) IEC:60076-1:2011 IEC:60076-2:2011 IEC:60076-3:2013-07 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021::
1087	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Measurement of no-load loss and current	IS:2026-1:2011 (RA : 2016 ) IEC:60076-1:2011 IEC:60076-2:2011 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021:
1088	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Measurement of voltage ratio and check of voltage vector relationship. (Phase displacement)	IS:2026-1:2011 (RA : 2016 ) IEC:60076-1:2011 IEC:60076-2:2011 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021
1089	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Measurement of winding resistance	IS:2026-1:2011 (RA : 2016 ) IEC:60076-1:2011 IEC:60076-2:2011 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) IS:12021:
1090	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Oil leakage test	IS:1180-1: 2014 IEC:60076-1:
1091	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Pressure test	IS:1180-1: 2014 IEC:60076-1:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 86 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1092	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Temperature rise test	TIS:2026-1:2011 (RA : 2016 ) S:2026-2:2010 (RA 2015) IEC:60076-1:2011 IEC:60076-2:2011 IS:1180-1: 2014 IS: 11171,1985 (RA 2016) S:12021:
1093	ELECTRICAL- INDUCTORS & TRANSFORMERS	Power transformers Distribution transformers( Non Sealed & Sealed) Dry type Power transformers Control Transformers	Zero Sequence impedancefor three phase transformer.	IS: 2026 (Part-1), 2011; IEC 60076-1
1094	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Bending Moment, Axial Pull and Mass	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3-2020
1095	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Cap Interchangeability	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3-2020
1096	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Cap Temperature rise test	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3-2020
1097	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Creepage distance and clearances	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1098	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Dimensions	IS 16102 (Part-2): 2017, Amd 1 - 2020
1099	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Electric strength after Humidity treatment	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1100	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General ightning Services	"Protection against accidental contact with line parts"	IS 16102 (Part-1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1101	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General ightning Services	mechanical strength test	IS 16102 (Part-1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1102	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General ightning Services	Supply voltage switching test	IS 16102 (Part-2): 2017, Amd 1 - 2020
1103	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Fault Conditions	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1104	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Harmonics and Power factor	IS 16102 (Part-2): 2017, Amd 1 - 2020



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 87 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1105	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Insulation Resistance after humidity treatment	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1106	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Marking	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3:2020, IS 16102 (Part-2): 2017, Amd 1 - 2020
1107	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Mechanical strength -Torsion resistance of Unused Lamps	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1108	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Resistance to flame and ignition	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1109	ELECTRICAL- LAMPS, LUMINARIES & ACCESSORIES	Self ballasted LED Lamps for General Lightning Services	Resistance to Heat	IS 16102 (Part- 1):2012. Amd 1: 2015, Amd 2 : 2015, Amd 3 - 2020
1110	ELECTRICAL- TRANSMISSION LINE EQUIPMENT & ACCESSORIES	11 kV Horn gap fuse DO fuse, HG fuses & expulsion fuses	Temperature rise test	IS:9385-2:2018 IEC 60282-2:2008 IS:9385-1 & 2
1111	ELECTRICAL- TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Circuit breakers Switches Disconnectors Switch disconnector & fuse combination units Contactors & motor starters Control circuit devices & switching elements	Verification of Temperature rise	IS/IEC 60947 part 1 2007 (RA-2017) & Part 2 -2003 (Ra-2017) & part 3 2012 (RA-2018) & Part 4-1:2012 (Ra-2018) IEC 60947 part 1 2014-09 & part 3 , IEC 60947-1-2014, IEC 60947-2-2016, IEC 60947-3:
1112	ELECTRICAL- TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Current transformer - Measuring Current transformers Protective current transformers Protective CT - Special Purpose	Temperature Rise Test	IS 2705 : 1992(Part 1) RA 2017 IEC 61869-1:2007-10 IEC 61869-2:2012-09 IS 16227 ( part 1) : 2016 & IS 16227-(part 2) ANSI/IEEE C57.13TM:
1113	ELECTRICAL- TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Current transformer - Measuring Current transformers Protective current transformers Protective CT - Special Purpose	Temperature Rise Test	IS 2705 : 1992(Part 1,) RA 2017 IEC 61869-1:2007-10 IEC 61869-2:2012-09 IS 16227 ( part 1) : 2016 & IS 16227-(part 2) ANSI/IEEE C57.13TM:
1114	ELECTRICAL- TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post and Similar Insulating Materials. Also Items Like Battery Containers, Rubber Mats, Rating from 1kV To 33kV (Inclusive).	Power Frequency puncture withstand voltage test	IS 731 2016, IS 2544 /2006, IS 1445/ 2009, IS 4318/ 2009, IEC 60383-1 1993, IEC 60383-2 1993,IEC: 61109-2008,IEC 61952-2008, ANSI C29.2/ 1992, C29.5:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 88 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1115	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core Rating from 1kV To 36kV (Inclusive).	Electro Mechanical Failing Load Test	IS 731 2016, IS 2544/ 2006, IEC 60383-1 1993,,IEC: 61109-2008,IEC 61952-2008, IEC 60168 1998 A2 2000, IEC 60433/:
1116	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core Ratings From 1kV To 36kV (Inclusive).	Electro Mechanical Failing Load Test	IS 731 2016, IS 2544 /2006, IEC 60383-1 1993,IEC: 61109-2008,IEC 61952-2008, IEC 60168 /1998 A2 2000, IEC 60433/:
1117	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid core/ Hollow insulator, insulator strings (All Types) Rating 3.6kV to 132kV (Inclusive)	Impulse flashover	IS 692/ 2010, IS 731 /2016, , IS 2544 /2006, IS 1445/ 2009, IS 2071/2016, IS 2099/2008, IS 4318/ 2009, IS 8269/2009, IS 9431/2009, IEC 60168/ A2 2000, IEC 60243-3/2013, IEC: 61109-2008,IEC 61952-2008, BS 159/1992, BSEN 171/2002, ANSI C29.1/1988, ANSI C29.2/1992, ANSI C29.3/1986, ANSI C29.4/1984, ANSI C29.5/1984, ANSI C29.6/1984, ANSI C29.7a/1986, ANSI C29.9
1118	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/ Insulator Ratings of 1kV to 36kV	Mechanical Failing Load Test:	IS 731 2016, IS 2544 2006, IEC 60168 1998 A2 2000, IEC 60383-1 1993,IEC: 61109-2008,IEC 61952-2008 IEC 60433 :
1119	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings and Insulating Tubes etc., rated 3.6kV to 22 kV (inclusive).	Visible Discharge Test	IS 731/ 2016, IS 4318 /2009 IS 2071/ pt.1





# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 89 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1120	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings And Similar Insulating Materials. Ratings up To 132kV (Inclusive). A. B. Switches /Isolator/Circuit Breaker/Bus Duct /Cable/Bushing / Panel/Horn Gap/Dropout Fuse Unit. Ratings up To 132 kV (Inclusive) P T/ C V T /Coupling capacitor/Tap Changers/Grading Capacitors /R.V.T.S/ C.T - PT Units. Ratings up To 132kV (Inclusive). Series Reactors, Line Traps. Tuning Reactors & Neutral Earthing Reactors up To 132kV (Inclusive) Current Transformers up To 132 kV rating(Inclusive) Power/Distribution Transformers Including Earthing Transformers Auto transformers etc. Up to and Inclusive of 1kVA to 50MVA Rating. 1kV to 132kV (Inclusive).	Impulse Withstand Voltage Test	IS 13573/ 2008, IEC 61869-1/ 2007, IEC 60076-1/ 2011, IEC 60076-3 /2013 A1 2018, IEC 60099-4 /2014, IEC 62271-102 /2018, IEC 60137/ 2008, IEC 60168/ A2 2000, IEC 61689-2 /2012-09, IEC 61869-3/ 2011-07, IEC 61869-4 /2013, IEC 61869-5/2011-07, IEC 60214 /2014, IEC 60243-3/ 2001, IEC 265-2/1988, IEC 60282-1 /1988, IEC 60282-2/ 1997,IEC 60289/1988, IEC 62271-200/ 2011, IEC 60353 /1989 A1 2002, IEC 60358/ 2012, IEC 60383-1 /1993, IEC 60383-2/ 1993, IEC 61109/ 2012, IEC 62217/ 2012, RDSO SPEC 4318 ::
1121	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings And Similar Insulating Materials. Ratings up To 132kV (Inclusive). A. B. Switches /Isolator/Circuit Breaker/Bus Duct /Cable/Bushing / Panel/Horn Gap/Dropout Fuse Unit. Ratings up To 132 kV (Inclusive) P T/ C V T /Tap Changers/Grading Capacitors /R.V.T.S/ C.T - PT Units. Ratings up To 132kV (Inclusive). Series Reactors, Line Traps. Tuning Reactors & Neutral Earthing Reactors up To 132kV (Inclusive) Current Transformers up To 132 kV rating(Inclusive) Power/Distribution Transformers Including Earthing Transformers Auto transformers etc. Up to and Inclusive of 1kVA to 50MVA Rating. 1kV to 132kV (Inclusive).	Impulse Withstand Voltage Test	IEC 60433 /1998, IEC 62271-203 /2011, IEC 62271-1 2017, IEC 62271-100 2021, IEC 62271-200 2021, IEC 62271-102 2018, IEC 62271-103 2011, IEC 62271-111 2012, IS 62271-1 2007, IS 62271-100 2008, IS 62271-200 2011, IS 62271-102 2011, IS 62271-103 2011, IEEE -4 /1995, BS 159 /1992, BS 223 /1985, BS ISO 2692/ 1988, BS 3297-2/1993,BS 3938/1973, BS 3941/ 1975, BS 6581/ 1995, BSEN 171 2002, IEC 60282-1 2009 A1 2014, ANSI C29.1/ 1988, ANSI C29.2/ 92, C29.3/86, C29.4/84, C29.5/84, C29.6/84, C29.7a/86, C29.



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 90 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1122	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings And Similar Insulating Materials. Ratings up To 425kV (Inclusive). A. B. Switches /Isolator/Circuit Breaker/Bus Duct /Cable/Bushing / Panel/Horn Gap/Dropout Fuse Unit. Ratings up To 132 kV (Inclusive) P T/ C V T /Tap Changers/Grading Capacitors /R.V.T.S/ C.T - PT Units. Ratings up To 132kV (Inclusive). Series Reactors, Line Traps. Tuning Reactors & Neutral Earthing Reactors up To 132kV (Inclusive) Current Transformers up To 132 kV rating(Inclusive) Power/Distribution Transformers Including Earthing Transformers Auto transformers etc. Up to and Inclusive of 1kVA to 50MVA Rating. 1kV to 132kV (Inclusive).	Lightning impulse voltage test	IS 692/ 2010, IS 731/ 2016, IS 1180/ 2014, IS 2544 /2006, IS 1445/ 2009, IS 2026-3 /2009, IEC 76-3/ 2013, IS 2071/ 2016, IS 2099/ 2008, IS 2705-1-2-3 /2007, IS 13925 /2012 A1 2017, IS 3070-3/ 2009, IS 3151 /2016, IS 16227-2 /2016, IS 3427/ 2007, IS 4318 /2009, IS 5300/ 2009, IS 5424/ 2004, IS 5553-1-2-3-4-5 /2009, IS 7098-1-2-3 /2015/2014, IS 8084 /2017, IS 8269 /2009, IS 8468 /2016, IS 8792/ 2008, IS 8793/ 2008, IS 9147/ 2016, IS 9348/ 2008, IS 9385/ 2018, IS 9431 /2009, IS 10810 part 45 & 47/ 2
1123	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings Insulating Rod /Operating Rod upto 66kV (Inclusive) Repair Sleeves Rated Above 1kV to 66kV (Inclusive) Thyristor Valves 11kV to 35kV Systems	Power Frequency Flashover Test (Dry & Wet)	IS 692/ 2010, IS 731/ 2016, , IS 2544 /2006, IS 1445/ 2009, IS 2071 /2016, IS 2099/ 2008, IS 4318 /2009, IS 8269 / 2009, IS 9431/ 2009, IEC 60099-4 / 2014, , IS 5621/ 2004, IEC 60168 2001, IEC 60383-1/ 1993, IEC 60383-2/ 1993, IEC 61109 /2010, IEC 62217/ 2005, , IEC 60433 /1998, , ANSI C29.1/ 1988, ANSI C29.2/ 92, C29.3/86, C29.4/84, C29.5/84, C29.6/84, C29.7a/86, C29.9/83, IEEE -4 /1995, BS 1:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 91 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1124	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings. Also Items Like Battery Containers, Rubber Mats, Insulating Tubes Etc. Rated 3.6kV to 66kV (Inclusive). Insulating Rod /Operating Rod upto 66 kV (Inclusive ). Isolator/Circuit Breaker/Bus Duct /Cable/Bushing / Panel/Horn Gap/Dropout Fuse Unit, AB switches. Ratings up To 66kV (Inclusive). P T/ C V T /Coupling /Tap Changers, Capacitors/Grading Capacitors/R.V.T.S/C.T - PT Units. Ratings up To 66kV (Inclusive). Series Reactors, Line Traps. Damping Reactors Tuning Reactors & Neutral Earthing Reactors. 1.1kV To 66 kV (Inclusive). Power/Distribution Transformers Including Earthing Transformers Autotransformers etc. up to And Inclusive of 1kVA to 50MVA Rating. (1 kV to 66kV Inclusive). Lightning Arresters, Lightning arrester Housing Ratings above 1 kV to 66kV (Inclusive). Bushings /Repair Sleeves rated above 1kV To 66kV( Inclusive ) Thyristor Valves 11kV to 35kV Systems	Power Frequency Withstand Test (Dry & Wet)	IEC 60433 /1998, IEC 62271-100 2008, IEC 62271-200 2011, IEC 62271-102 2018, IEC 62271-103 2011, IEC 62271-111 2012, IS 62271-1 2007, IS 62271-100 2008, IS 62271-200 2011, IS 62271-102 2011, IS 62271-103 2011, IEEE -4 /1995, BS 159 /1992, BS 223 /1985, BS ISO 2692/ 1988, BS 3297-2/1993,BS 3938/1973, BS 3941/ 1975, BS 6581/ 1995, BSEN 171 2002, IEC 60282-1 2009 A1 2014, ANSI C29.1/ 1988, ANSI C29.2/ 92, C29.3/86, C29.4/84, C29.5/84, C29.6/84, C29.7a/86, C29.9/83, NBR 5356-3/2003, IEC 62271-103/20
1125	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings. Also Items Like Battery Containers, Rubber Mats, Insulating Tubes Etc. Rated 3.6kV to 66kV (Inclusive). Insulating Rod /Operating Rod upto 66 kV (Inclusive ). Isolator/Circuit Breaker/Bus Duct /Cable/Bushing / Panel/Horn Gap/Dropout Fuse Unit, AB switches. Ratings up To 66kV (Inclusive). P T/ C V T /Tap Changers, /R.V.T.S/C.T - PT Units. Ratings up To 66kV (Inclusive). Series Reactors, Line Traps. Damping Reactors Tuning Reactors & Neutral Earthing Reactors. 1.1kV To 66 kV (Inclusive). Power/Distribution Transformers Including Earthing Transformers Autotransformers etc. up to And Inclusive of 1kVA to 50MVA Rating. (1 kV to 66kV Inclusive). Lightning Arresters, Lightning arrester Housing Ratings above 1 kV to 66kV (Inclusive). Bushings /Repair Sleeves rated above 1kV To 66kV( Inclusive ) Thyristor Valves 11kV to 35kV Systems	Power Frequency Withstand Voltage Test (Dry & Wet)	IS 13573/ 2008, IEC 61869-1/ 2007, IEC 60076-1/ 2011, IEC 60076-3 /2013 A1 2018, IEC 60099-4 /2014, IEC 62271-102 /2018, IEC 60137/ 2017, IEC 60168/ A2 2000, IEC 61689-2 /2012-09, IEC 61869-3/ 2011-07, IEC 61869-4 /2013, IEC 61869-5/2011-07, IEC 60214 /2014, IEC 60243-3/ 2013, IEC 265-2/1988, IEC 60282-1 /1988, IEC 60282-2/ 1997,IEC 60289/1988, IEC 62271-200/ 2011, IEC 60353 /1989 A1 2002, IEC 60358/ 2012, IEC 60383-1 /1993, IEC 60383-2/ 1993, IEC 61109/ 2012, IEC 62217/ 2012, RDSO SPEC 4318 ::



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 92 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1126	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings. Also Items Like Battery Containers, Rubber Mats, Insulating Tubes Etc. Rated 3.6kV to 66kV (Inclusive). Insulating Rod /Operating Rod upto 66 kV (Inclusive). Isolator/Circuit Breaker/Bus Duct /Cable/Bushing / Panel/Horn Gap/Dropout Fuse Unit, AB switches. Ratings up To 66kV (Inclusive). P T/ C V T /Tap Changers,/R.V.T.S/C.T - PT Units. Ratings up To 66kV (Inclusive). Series Reactors, Line Traps. Damping Reactors Tuning Reactors & Neutral Earthing Reactors. 1.1kV To 66 kV (Inclusive). Power/Distribution Transformers Including Earthing Transformers Autotransformers etc. up to And Inclusive of 1kVA to 50MVA Rating. (1 kV to 66kV Inclusive). Lightning Arresters, Lightning arrester Housing Ratings above 1 kV to 66kV (Inclusive). Bushings /Repair Sleeves rated above 1kV To 66kV( Inclusive ) Thyristor Valves 11kV to 35kV Systems.	Power Frequency Withstand Test(Dry & Wet)	IS 692/ 2010, IS 731/ 2016, IS 1180/ 2014, IS 2544 /2006, IS 1445/ 2009, IS 2026-3 /2009, IEC 76-3/ 2013, IS 2071/ 2016, IS 2099/ 2008, IS 2705-1-2-3 /2007, IS 13925 /2012 A1 2017, IS 3070-3/ 2009, IS 3151 /2016, IS 16227-2 /2016, IS 3427/ 2007, IS 4318 /2009, IS 5300/ 2009, IS 5424/ 2004, IS 5553-1-2-3-4-5 /2009, IS 7098-1-2-3 /2015/2014, IS 8084 /2017, IS 8269 /2009, IS 8468 /2016, IS 8792/ 2008, IS 8793/ 2008, IS 9147/ 2016, IS 9348/ 2008, IS 9385/ 2018, IS 9431 /2009, IS 10810 part 45 & 47/
1127	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings. Ratings upto 132kV (Inclusive).	Porosity test (on porcelain insulators)	IS 731/ 2016, IS 1445 /2009, IS 3070-3 /2009, IS 2544 /2006, IS 5300 /2009, IS 5621 /2009, IEC 60168 /1994, IEC 60305 /1995/ 2018, IEC 60383-1 /1993, IEC 60383-2 /1993, ANSI C29.1/1992, C29.2/1992, C29.3/ 1986, C29.4 /1989, C29.5 /1984, C29.6 /1984, C29.7a /1983, C29.9/:
1128	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings. Ratings upto 66 kV (Inclusive)	Galvanizing test(Uniformity of Zinc Coating)	IS 731/ 2016, IS 2633 1986,IS 1445 /2009, IS 3070-3 /2009, IS 2544 /2006, IS 5300 /2009, IS 5621 /2009, IEC 60168 /1994, IEC 60305 /1995/ 2018, IEC 60383-1 /1993, IEC 60383-2 /1993,,IEC: 61109-2008,IEC 61952-2008 ANSI C29.1/1992, C29.2/1992, C29.3/ 1986, C29.4 /1989, C29.5 /1984, C29.6 /1984, C29.7a /1983, C29.9/:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 93 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1129	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Insulator Strings (All Types) Lightning Arrester Housings. Ratings upto 66kV (Inclusive)	Galvanizing test(Thickness of Zinc Coating)	IS 731/ 2016, IS 2633 1986,IS 1445 /2009, IS 3070-3 /2009, IS 2544 /2006, IS 5300 /2009, IS 5621 /2009, IEC 60168 /1994, IEC 60305 /1995/ 2018, IEC 60383-1 /1993, IEC 60383-2 /1993,,IEC: 61109-2008,IEC 61952-2008 ANSI C29.1/1992, C29.2/1992, C29.3/ 1986, C29.4 /1989, C29.5 /1984, C29.6 /1984, C29.7a /1983, C29.9
1130	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disc/Pin/Post/Solid Core/Hollow Insulator, Lightning Arrester Housings Ratings up To 66kV (Inclusive).	Temperature cycle (on porcelain Insulators)	IS 731/ 2016, IS 1445 /2009, IS 2544 /2006, IS 4318 /2009, IS 5300 /2009, IS 5621 /2009, IEC 60383-1 /1993, IEC 60383-2/ 1993, ANSI C29.1 /1992, C29.2/1992, C29.5/1984,C29-6/84, C29.7a/1983, C29.9/1983, C-57.12.00
1131	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disconnectors (Isolators and Earthing Switches ) for voltages above 1000 volts	Mechanical Endurance Test	IEC 62271-1 2017, IEC 62271-102 2018, IEC62271-103
1132	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Disconnectors (Isolators and Earthing Switches ) for voltages above 1000 volts	Temperature Rise Test , Resistance Measurement	IEC 62271-100:2021. IEC 62271-110,2017. IEC 62271-102,2018 IEC 62271-200,2021. IEC 62271-201, 2014. IEC 62271-202, 2022 IEC 62271- 203, 2011. IEC 62271-1, 2017. IEC 60077-2,2017. IEC 60077-4,2019 BS 6581,1985/IEC 694, 1980.IS/IEC 62271 (part1),2007.IS/IEC 62271 (part100), 2008, IS/IEC 62271(part-200), 2003.IS/IEC 62271 (part-102), 2003. IS/IEC 62271-201:2006 . IS/IEC 62271-202:2022 . IS/IEC 62271-203:2011 IEEE Std C37.09: 2012: 201



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

<b>Laboratory Name :</b>	CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA		
<b>Accreditation Standard</b>	ISO/IEC 17025:2017		
<b>Certificate Number</b>	TC-5223	<b>Page No</b>	94 of 96
<b>Validity</b>	17/12/2022 to 16/12/2024	<b>Last Amended on</b>	18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1133	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	H.V Switchgear & Controlgear Part 1: Common specifications High Voltage ac circuit breaker Alternating Current disconnectors and earthing switches AC Switch fuse combination A.C. Metal enclosed Switchgear controlgear for rated voltage above 1kV and upto and including 52kV	Resistance Measurement	IEC 62271-100:2021. IEC 62271-110,2017. IEC 62271-102,2018 IEC 62271-200,2021. IEC 62271-201, 2014. IEC 62271-202, 2022 IEC 62271- 203, 2011. IEC 62271-1, 2017. IEC 60077-2,2017. IEC 60077-4,2019 BS 6581,1985/IEC 694, 1980.IS/IEC 62271 (part1),2007.IS/IEC 62271 (part100), 2008, IS/IEC 62271(part-200), 2003.IS/IEC 62271 (part-102), 2003. IS/IEC 62271-201:2006 . IS/IEC 62271-202:2022 . IS/IEC 62271-203:2011 IEEE Std C37.09: 2012: 201
1134	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	H.V Switchgear & Controlgear Part 1: Common specifications High Voltage ac circuit breaker Alternating Current disconnectors and earthing switches AC Switch fuse combination A.C. Metal enclosed Switchgear controlgear for rated voltage above 1kV and upto and including 52kV	Temperature Rise Test	EC 62271-100:2021. IEC 62271-110,2017. IEC 62271-102,2018 IEC 62271-200,2021. IEC 62271-201, 2014. IEC 62271-202, 2022 IEC 62271- 203, 2011. IEC 62271-1, 2017. IEC 60077-2,2017. IEC 60077-4,2019 BS 6581,1985/IEC 694, 1980.IS/IEC 62271 (part1),2007.IS/IEC 62271 (part100), 2008, IS/IEC 62271(part-200), 2003.IS/IEC 62271 (part-102), 2003. IS/IEC 62271-201:2006 . IS/IEC 62271-202:2022 . IS/IEC 62271-203:2011 IEEE Std C37.09: 2012: 201



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :** CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard** ISO/IEC 17025:2017

**Certificate Number** TC-5223 **Page No** 95 of 96

**Validity** 17/12/2022 to 16/12/2024 **Last Amended on** 18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1135	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	H.V Switchgear & Controlgear Part 1: Common specifications High Voltage ac circuit breaker Alternating Current disconnectors and earthing switches AC Switch fuse combination A.C. Metal enclosed Switchgear controlgear for rated voltage above 1kV and upto and including 52kV	Temperature Rise Test	IEC 62271-100:2021. IEC 62271-110,2017. IEC 62271-102,2018 IEC 62271-200,2021. IEC 62271-201, 2014. IEC 62271-202, 2022 IEC 62271- 203, 2011. IEC 62271-1, 2017. IEC 60077-2,2017. IEC 60077-4,2019 BS 6581,1985/IEC 694, 1980.IS/IEC 62271 (part1),2007.IS/IEC 62271 (part100), 2008, IS/IEC 62271(part-200), 2003.IS/IEC 62271 (part-102), 2003. IS/IEC 62271-201:2006 . IS/IEC 62271-202:2022 . IS/IEC 62271-203:2011 IEEE Std C37.09: 2012: 201
1136	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	High Voltage fuses - Current limiting fuses High voltage fuses - Expulsion and similar fuses	Temperature Rise Test	IEC 60282-1 2014 IS 9385(part 1 & 2) 2018, IEC 60282-2 :
1137	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	High Voltage fuses - Current limiting fuses High voltage fuses - Expulsion and similar fuses	Temperature Rise Test	IEC 60282-1 2014, IEC 60282-2:
1138	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Inter connecting Busbars for AC Voltage above 1kV upto and including 36kV	Temperature Rise Test	IEC 62271-200: 2011,IEEEEC 37.23-2008,IS 8084-1996, (RA):
1139	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Low-voltage switchgear and controlgear assemblies	Clearance and creepage distance	IEC 61439-1 2011,IS/IEC 61439-1 2011 IEC 61439-2 2011, IEC 61439-3 2012, IEC 61439-6
1140	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Low-voltage switchgear and controlgear assemblies	Dielectric Test	IEC 61439-1 2011,IS/IEC 61439-1 2011 IEC 61439-2 2011, IEC 61439-3 2012, IEC 61439-6: :
1141	ELECTRICAL-TRANSMISSION LINE EQUIPMENT & ACCESSORIES	Low-voltage switchgear and controlgear assemblies	Temperature Rise Test	IEC 61439-1 2011,IS/IEC 61439-1 2011 IEC 61439-2 2011, IEC 61439-3 2012, IEC 61439-6:



# National Accreditation Board for Testing and Calibration Laboratories

## SCOPE OF ACCREDITATION

**Laboratory Name :**

CENTRAL POWER RESEARCH INSTITUTE, REGIONAL TESTING LABORATORY, PLOT 3A, INSTITUTIONAL AREA, SECTOR-62, GAUTAM BUDDHA NAGAR, NOIDA, UTTAR PRADESH, INDIA

**Accreditation Standard**

ISO/IEC 17025:2017

**Certificate Number**

TC-5223

**Page No**

96 of 96

**Validity**

17/12/2022 to 16/12/2024

**Last Amended on**

18/02/2023

S.No	Discipline / Group	Materials or Products tested	Component, parameter or characteristic tested / Specific Test Performed / Tests or type of tests performed	Test Method Specification against which tests are performed and / or the techniques / equipment used
1142	ELECTRICAL- TRANSMISSION LINE EQUIPMENT & ACCESSORIES	switchgear and controlgear assemblies - Part 1: General rules Part 2: Power switchgear and controlgear assemblies Part 3: Distribution Boards Intended to be Operated by Ordinary Persons (DBO) Part6: Busbar trunking systems (Busways)	Ingress of Protection	IEC 61439-1 2020 ,IS/IEC 61439-1 2011 IEC 61439-2 2020, IS/IEC 61439-2:2011 IEC 61439-3 2012, IEC 61439-6: 2012, iec 60529: 2013, IEC: 62271-200
1143	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self ballasted LED Lamps for General ighting Services	Lamp Life	IS 16102 (Part-2): 2017, Amd 1 - 2020
1144	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Service	Endurance -Temperature cycle test	IS 16102 (Part-2): 2017, Amd 1-2020
1145	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Services	Colour Nomenclature variation	IS 16102 (Part-2): 2017, Amd 1-2010, / IESNA LM 79-08 / IS 10106:2012
1146	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Services	Colour Rendering Index	IS 16102 (Part-2): 2017, Amd 1: 2020 / IESNA LM 79-08 / IS 10106:2012
1147	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Services	Endurance test-Supply voltage Switching cycle test	IS 16102 (Part-2): 2017, Amd 1
1148	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self ballasted LED Lamps for General Lightning Services	Lamp power	IS 16102 (Part-2): 2017, Amd 1
1149	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Services	Lumen Maintenance	IS 16102 (Part-2): 2017, Amd 1
1150	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Services	Luminous Efficacy	IESNA LM 79-08 / IS 10106
1151	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self ballasted LED Lamps for General Lightning Services	Luminous Flux	IS 16102 (Part-2): 2017, Amd 1: 2020 / IESNA LM 79-08 / IS 10106:2012
1152	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Services	Test for Colour Characteristics	IESNA LM 79-08 / IS 10106:2012
1153	PHOTOMETRY- LIGHT SOURCES (ELECTRIC LAMP)	Self Ballasted LED Lamps for General Lightning Services	Test for total Luminous Flux measurement	IESNA LM 79-08 / IS 10106