

Standard Specification
for
Bus Post Insulator

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				IGT-SS-SPC-STD-005	00

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1. GENERAL

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|-----|---|-------------|
| 1.1 | This Requirement of BPIs for 800kV Equipment
For Isolator
For normal support structures and Wave Trap | 10kN
8kN |
| 1.2 | This Requirement of BPIs for 420kV Equipment
For Isolator
For normal support structures and Wave Trap | 10kN
8kN |
| 1.3 | This Requirement of BPIs for 245kV Equipment
For Isolator
For normal support structures and Wave Trap | 10kN
8kN |
| 1.4 | This Requirement of BPIs for 145kV Equipment
For all applications | 6kN |
| 1.5 | This Requirement of BPIs for 72.5kV Equipment
For all applications | 6kN |
| 1.6 | This Requirement of BPIs for 36 kV Equipment
For all applications | 6kN |

2. CONSTRUCTION:

- 2.0 The creepage distance of the insulator shall be as per respective project requirement.
- 2.1 Porcelain or Polymer any kind of BPI can be used, if any specific restriction not specified anywhere in the project documents.
- 2.2 For any very very high pollution area / Coastline area installation of RTV quoting have been asked in the project document same to be considered for Porcelain insulator.

3. STANDARDS:

The following clause of IEC shall be complied with.

3.1	Verification of Dimensions	IS: 2544 - Cl. No. 9.7 and IEC: 60168 – Cl. No. 5.1
3.2	Mechanical failing load test	
	Bending Test	(After Torsion Test) IS: 2544 - Cl. No. 9.6.5.1 and IEC:60168 – Cl. No. 5.2.4
	Torsion Test	(After Tensile Test) IS: 2544 - Cl. No. 9.6.5.2 and IEC:60168 – Cl. No. 5.2.5

	Tensile Test	(After Compressive Test) IS: 2544 - Cl. No. 9.6.5.3 and IEC:60168 – Cl. No. 5.2.6
	Compressive Test	IS: 2544 - Cl. No. 9.6.5.3 and IEC:60168 – Cl. No. 5.2.7
3.3	Temperature Cycle Test	IS: 2544 - Cl. No. 9.8 and IEC:60168 – Cl. No. 5.4
3.5	Porosity Test	IS: 2544 - Cl. No. 9.10 and IEC:60168 – Cl. No. 5.6
3.6	Galvanising Test	
	Uniformity of Zinc coating on Metal Component: Top flange Bottom flange	IS: 2544 - Cl. No. 9.11 and IEC:60168 – Cl. No. 5.7
	Thickness of Zinc Coating on Metal Component: Top flange Bottom flange	IEC:60168 – Cl. No. 5.7
3.7	Dry lightning-impulse withstand voltage test	IEC:60168 – Cl. No. 4.5 and as per RFP & SPGVL's requirement for the project.
3.1	Visual Examination	Cl. No. 9.12 of IS: 2544 & 5.8 of IEC: 60168
3.7	Visible Discharge Test	As per RFP & SPGVL's requirement for the project
3.9	Lightning Impulse Voltage Flashover Test	Cl. No. 4.5.2 of IEC: 60168-2001 and as per RFP & SPGVL's requirement for the project.
3.10	Dry Power Frequency Voltage Withstand Test	Cl. No. 4.7 of IEC: 60168-2001 and as per RFP & SPGVL's requirement for the project.
3.11	Dry Power Frequency Voltage Flashover Test	Cl. No. 4.7.3 of IEC: 60168-2001 and as per RFP & SPGVL's requirement for the project.
3.12	Wet Power Frequency Voltage Withstand Test	Cl. No. 4.8 of IEC: 60168-2001 and as per RFP & SPGVL's requirement for the project.
3.13	Wet Power Frequency Voltage Flashover Test	Cl. No. 4.8.3 of IEC: 60168-2001 and as per RFP & SPGVL's requirement for the project.
3.14	Radio Interference Test	IEC: 60437-Latest Revision and as per RFP & SPGVL's requirement for the project.

NOTE- All the relevant standards specified above, their latest version to be used with amendments if any time to time till the date of issuance of order for respective project.