



Ranipet

**QUALITY
DEPARTMENT
M/S BHEL RANIPET
TAMIL NADU-632 406**

STANDARD QUALITY PLAN

ITEM/SUB SYSTEM:

**STANDARD QUALITY PLAN FOR
INTERLOCKS FOR ESP**

Sl no	Component & operation	Characteristics	Class	Type of Check	Quantum of Check	Reference Documents	Acceptance Norms	Format Of Records	Doc. Ref. No		Remarks
									Rev. No	QP:E:834	
1	2	3	4	5	6	7	8	9	01		
									Date	26 08 2014	
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									Agency 10		
									M	B	

M B

1	ENCLOSURE BOX & KEY EXCHANGE BOX	MECHANICAL - BEND TEST & CHEMICAL COMPOSITION	MAJOR	MECH. CHEMICAL	10% SAMPLE /LOT	—	IS:513	IS:513	MATERIAL TC	P	R	
2	ENCLOSURE BOX	GASKET TIGHTNESS TEST/ CHALK TEST	MAJOR	VISUAL	100%	10%	BHEL APPD DRG/BHEL TECH SPEC	CHALK IMPRESSION ON DOOR GASKET WHEN DOOR CLOSED	ROUTINE TEST REPORT	P	W	
3	PAINTING	DFT & PAINT SHADE,ADHESION TEST	MAJOR	VISUAL / MEASUREMENT	100%	10%	BHEL APPD DRG/BHEL TECH SPEC	BHEL APPD DRG/BHEL TECH SPEC.	ROUTINE TEST REPORT	P	W	
4	ENCLOSURE BOX	IP 55 TEST	MAJOR	PROTECTION AGAINST DUST & WATER	ONE SAMPLE/ REFER NOTE-2	—	IS 13947	IS 13947	TYPE TEST REPORT	P	R	
5	SHEET THICKNESS, LINK CHAIN LENGTH, KEY LAYOUT DIMENSIONS, MOUNTING DIMENSIONS OF ROTARY SWITCH	DIMENSIONS CHECKS	MAJOR	MEASUREMENT	100%	5%	BHEL APPD DRG	BHEL APPD DRG	DIMENSIONAL REPORT	P	W	
6	INTERLOCK NAME PLATES	NAME DETAILS VERIFICATION	MAJOR	VERIFICATION	100%	10%	BHEL APPD DRG/BHEL TECH SPEC	BHEL APPD DRG/BHEL TECH SPEC	VERIFICATION REPORT	P	V	

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									10	B	
1	2	3	4	5	6	7	8	9	M	B	

M B

7	ROTARY SWITCH WITH KEY	VERIFICATION OF TYPE, MAKE, RATING OF ROTARY SWITCH, KEY POSITION FREE/TRAPPED	MAJOR	VISUAL	100%	10%	BHEL APPD DRG/BHEL TECH SPEC	BHEL APPD DRG/BHEL TECH SPEC	TC	P	V	Make for NTPC projects follow NTPC specifications, for Other projects follow BHEL appd specifications
8	ROTARY SWITCH WITH KEY	H.V. TEST(2kV AC)	MAJOR	ELEC. TEST	100%	10%	BHEL APPD DRG/BHEL TECH SPEC	SHOULD WITHSTAND 2 KV FOR 1 MIN.	ROUTINE TEST REPORT	P	W	
9	ROTARY SWITCH WITH KEY	INSULATION RESISTANCE TEST BEFORE AND AFTER HV TEST	MAJOR	ELEC. TEST	100%	10%	BHEL APPD DRG	VALUE SHOULD BE WITHIN 10 MOHM WHEN CHECKED WITH 1000V MEGGER	ROUTINE TEST REPORT	P	W	
9	ROTARY SWITCH, INTERLOCK WITH OUT KEY, INTERLOCK WITH KEY, CHECK LOCKS IN KEY EXCHANGE BOX	SEQUENCE TEST & OPERATION	MAJOR	OPERATIONAL	100%	10%	BHEL APPD DRG	BHEL APPD DRG.	ROUTINE TEST REPORT	P	W	

Note: 1. Suppliers has to submit the Manufacturer's test certificates of Rotary switch for BHEL/BHEL TPI Review.
2. Validity of IP 55 type test reports shall not older than five years from the inspection date.

Legend: P=Perform, W=witness by BHEL/BHEL TPI, V= Verification, R=Review of documents, M=Manufacturer, B=BHEL/BHEL TPI.

Revision status

Rev 00	21 08 2014	Original issue.
Rev 01	26 08 2014	Revised based on sub vendors feed back and general review.

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