**Procedure for certification of welders**

Objective               Certification of welder to ensure quality job

Scope                    power plant & Accessories

Responsibility         Engineer In charge

PPE –s to be used Helmet, Safety shoes, Cotton cloth, hand gloves, apron and goggles

 Work No 1 Certification of welder (Internal Procedure)

Aspect – impact

Scrap generation Resource Depletion

Fumes Air pollution

Hazards identified

Electrical Hazard Shock while welding the plates

 Mechanical hazard Fall of test plates

 Physical hazard Fall of DP spray in eyes inhaling fumes

 PROCEDURE                        : Certification of welder (Internal Procedure)

Check knowledge of the welder by asking questions related to welding quality, machines and safety.

Check the Experience and the competency of the welder for carrying out the welding activity

Weld the V notch plate and double V notch plate in all three directions i.e. in 3G & 4G positions with filler material of 3.15 mm with welding progression from downward for 4G and vertically upward for 3G.

Check the welding quality of welding by guidelines given below:

GUIDELINE FOR POINTING SCHEME FOR WLEDERS QULAIFICATION

Question & Answer session (Oral coordination)      -           Max 10 Points

Safety care taken by welder                                      -           Max 10 Points

Environmental care being taken                               -           Max 10 Points

Parameter selected/taken for welding                      -           Max 10 Points

Current selection

Fixture selected etc

Time taken for welding

DP test clearance                                                       -           Max 10 Points

GUIDELINES FOR WELDING & TESTING

Current range selected by welder (Recommended 80-140 A)

Travel Speed of welding (Recommended 50 mm/min)

Length of continuity of welding (Recommended 5 cm)

Check for the Quality of the Job carried out visually for any spits of welding

Check the welding using Dry penetrate test for root welding & access the quality of welding.

Welder can be Approved if the welder get min 30 points out of 50 as per below pointing scheme & should get a score of min 5 in DP test

VALIDITY OF CERTIFICATION 1 YEAR. ALL NEW ENTRANTS TO PASS WELDING TEST.