							PTW NO. :- 61/	
Format No: ER	5/10- F2	IOR SAFFTY	ΔΝΔΙ ΥSIS (19	SΔ) IR THERM	AL POWER STATION	OPGC	1110 110 01/	<u>'</u>
Serial No.	Department	JOB SAFETY ANALYSIS (JSA), IB THERMAL POWER STATION, OPGC nt Equipment Location Job description:						
1	MMDCHP	BCN-	TP-	ROOF SHEETING AND CLADDING WORK.				
JSA performed by:	Signature	Reviewed & Approved by	Signature	Date of Issue	T			Revision No-
					01.0	04.2020		R0
		•	HAZARD TEX	(T/TYPE (For ref	erence to identify the Haz	ard type)	•	
PHYSICAL HAZARDS	PHYSICAL HAZARDS		ELECTRICAL HAZARDS	CHEMICAL/ GAS HAZARDS	EXCAVATION OTHERS		OTHERS	
Noise	Fall from height	Force (Push/Pull)	Shock/ Electrocution	Flammable/ Explosive substances	Collapse/Sliding Fire		Fire	
Radiation	Fall (Slip/Trip)	Caught in/on or between	Static electricity	Inhalation of toxic fumes	Underground live cable damage		Heavy Wind/Rain	
Confined space	Fall down/below	Struck by/against	Arcflash/ blast	Ingestion/Abso rption	ERGONOMICS		Dust exposure	
Exposure to pressurised Steam/Air	Fall of Objects from height	Extreme weather (Hot/Cold)	BIOLOGICAL HAZARDS	Body/Eye Contact	Poor Posture		Oil spill	
Contact with Hot surface	Contact with moving parts	Poor illumination	Snake/Insect bite/Virus infection	Spillage	Repeatative motion Hun		Human factor	
PPEs to be used	Hand gloves, Safe	ty Goggles,Dust mu	sk,Safety helme	et,Ear plug, weldi	ng apron,leather gloves, w	relding helmet,etc.		
Tools required	Welding machine,	welding rod, grindi	ng machine, gas	s cutter, hammer	, screw driver, spanner, etc			
Important Note- V	hile deciding hazar	d control measures	, consider hiera	archy of hazard c	ontrol steps in order of pre	eference.		
SEQUENCE OF BASIC STEPS		SAFETY, HEALTH & ENVIROMENT HAZARDS		SAFE JOB STEPS / HAZARD CONTROL MEASURES				Are control Measures adequate to mitigate
				Elimination/ Substitution	Engineering	Administrative	PPE	the risk (Yes/No)
Working on equipment/Conveyor		Contact with moving parts		N.A	ISOLATION OF BCN- MOTOR to be made. PTW to be issued.	Electrical isolation and LOTO procedure to be followed.	General ppe use	YES
		Fauilure of Tools/Takels		N.A	N.A	Use certified tools and before start work physically verify all tools at site	hand gloves, Safety Goggles,Dust musk	YES

	Fall hazard	N.A	Scaffolding components to be ensured healthy. Put Red colour tag at the time scaffolding erectionCertify the platform before use from Authorised person	Use Rubber hand gloves & Safety goggle.	YES
		N.A	Ensure anchor point of full body harness must be rigid enough.	Use full body harness.	YES
ERRECTION OF SCAFFOLDING	Struck by/against Tools and tackles.	N.A	Care fully shift the materail. Transfer scaffolding	Use Rubber hand gloves & Safety goggle.	YES
	Fall of Objects from height	N.A	Securely hold the scaffolding materail during its shifting for erection of scaffolding. Use manila rope for shifting of scaffolding material from bootom to top. Do not stand under the shifting	Use Rubber hand gloves & Safety goggle.	YES
	Slip hazard	N.A	Clean the shoes from slipper type substances.	Use Rubber hand gloves & Safety goggle.	YES
WORK AT HEIGHT	Fall from height.	N.A	Ensure anchor point of full body harness must be rigid enough.	Use full body harness.	YES
	Fire hazard	N.A	Obtain Hot Work permit. Deploy fire watcher with fire exstigusher. Remove all combustible before start work.	hand gloves, Safety Goggles, Dust musk	YES
Dismantling of GCI Sheet	Contact with hot splattor	N.A	Use of welding apron. Intermittent water sprinkling in floor to be done.	Use welding aprone, welding visor & lether hand gloves.	YES
	Working at height.	N.A	Use full body harness. proper check the anchor	FULL BODY HARNESS & General ppe	YES

	Fauilure of Tools/Tal	cels	N.A		Use certified tools and before	hand gloves,	YES	
						Safety Goggles		
					tools at site			
	Force (Push/Pull)		N.A		Use tested & certified tools and	hand gloves,	YES	
					before start work physically	Safety Goggles,		
ROOF SHEETING AND CLADING					verify all tools at site	Dust musk		
WORK.	Cut/Injury		N.A		Before start work physically	hand gloves,	YES	
					verify the hand gloves	Safety		
						Goggles,Dust musk		
	Struck by/against		NA		Care fully shifting material by	hand gloves,	YES	
					trolly or manualy in working	Safety Goggles,		
					area.	Dust musk, Safety		
-	<u> </u>					helmat.		
Emergency Safety Measures	(Rescue/Fire	Emergency	Contacts-Ma	in Control Room- 8018	3084333, Fire- 06645222	257, Ambulanc	e- 06645222214,	
Overal Job Risk Category-	High							
JSA Review during								
PJB:								
Pre Job Briefing (PJB) is applicable to	all persons involved	d with the task.	•					
Pre Job Briefing (PJB) Acknowledgem	ent: I undertake th	at the JSA is co	mmunicated to	me effectively				
Name	Agency's name		Signature					
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