

RECOMMENDED / सिफारिश

APPROVED / अनुमोदित

19/7/17

17/3/17

एल. पी. जोशी / L.P. JOSHI
 अपर हेडक्वार्टर (विद्युत-यांत्रिक परीक्षण)
 Add: General Manager (Electrical Design)
 टीएचडीसी इंडिया लिमिटेड, रायचूर
 THDC India Limited, Rayachoti

Approval of this drawing/document does not
 absolve contractor of its responsibility for
 manufacturing of the equipment as per ER &
 CTP for the achievement of designed
 performance at site and completeness of the
 equipment.

20 (EXPANSION JOINT)

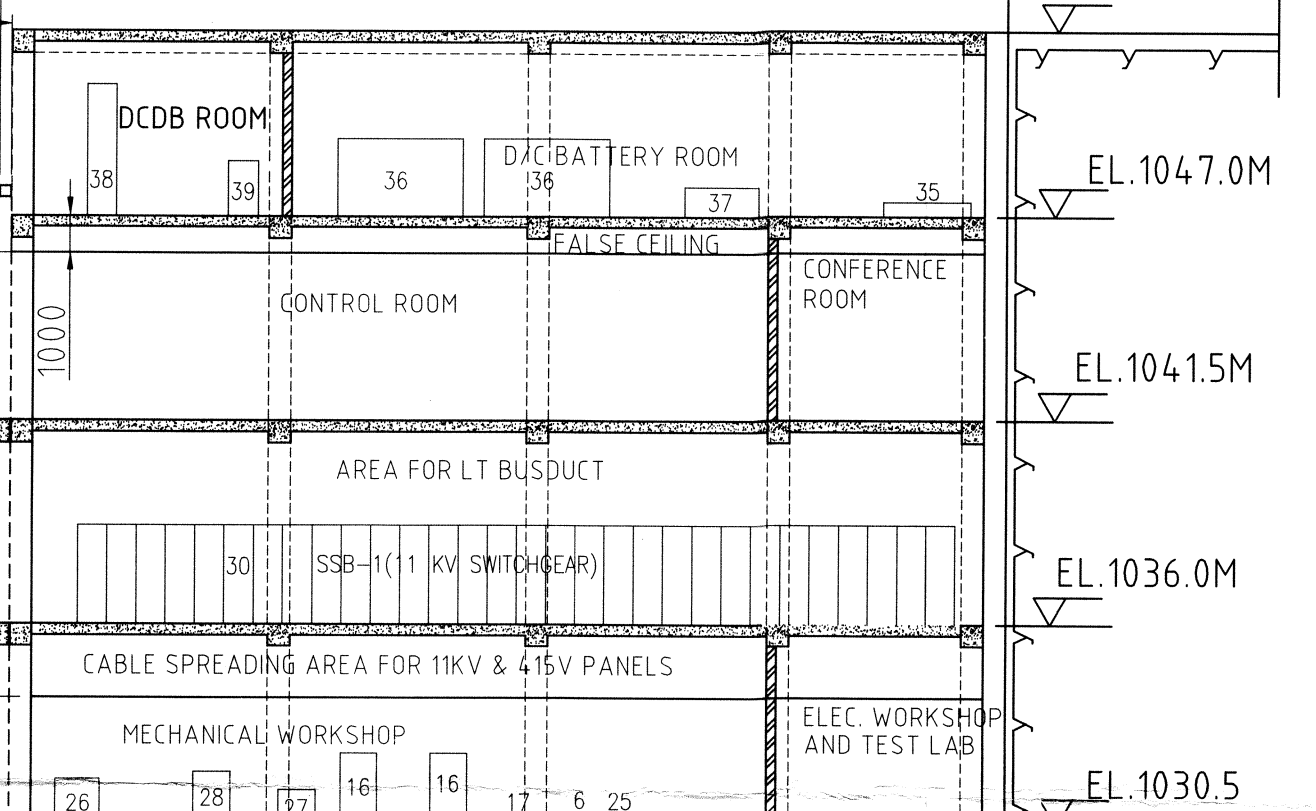
CONTROL BLOCK

EL. 1058.0

A/C & VENTILATION
ROOM

VENTILATION TUNNEL

EL. 1052.0



EL. 1047.0M

EL. 1041.5M

EL. 1036.0M

EL. 1030.5

20 (EXPANSION JOINT)

ITEM No.	DESCRIPTION	APPROX. SIZE (mm)			WEIGHT (kg)	QUANTITY PER UNIT	TOTAL QUANTITY
		LENGTH	WIDTH	HEIGHT			
G2	MARSHALLING BOX	1200	200	1200	-	2	8
G6	UNIT AUXILIARY BOARD	5000	1000	2400	-	1	4
T5	NITROGEN BOTTLE BANK (MIV)	1800	2800	3500	-	1	4
T18	OIL TANK FOR LUBE HANDLING SYSTEM	2500	1500	1400	-	-	2
35	48V BATTERY BANK	2364	800	405	-	-	2
36	220V BATTERY CHARGER	3400	1000	2100	-	-	4
37	48V BATTERY CHARGER	2000	1000	2100	-	-	4
38	220V MAIN DCDB	3500	800	2100	-	-	1
39	48V DCDB	2000	800	2100	-	-	1
6	TRIPOD WITH AXLE	330	330	1000	-	-	1
16	WORK BENCH 2 NOS	2000	1000	800	-	-	2
17	PIPE BENDING MACHINE (WITH ACCESSORIES)	730	320	200	-	-	1
25	4 WHEELED PLATFORM TROLLEY	1700	1100	500	-	-	1
26	CENTER LATHE (WITH ACCESSORIES)	3600	1200	1300	-	-	1
27	TOOL GRINDER MACHINE	1000	1000	1000	-	-	1
28	RADIAL DRILLING MACHINE	900	1000	1500	-	-	1
30	SSB-1, 11KV SWITCHGEAR	23000	1800	2700	-	-	1

CUSTOMER :

टी.एच.डी.सी. इन्डिया लि.
 T H D C INDIA Ltd.

CONSULTANT :

PROJECT :

VISHNUGAD PIPALKOTI HEP 4x111MW



BHARAT HEAVY ELECTRICALS LTD.
 BHOPAL

DEPT. CODE	NAME	SIGN	DATE	NO. OF VAR
DRN	BSINGH		10.09.15	
HSE	CKD	BSINGH	10.09.15	
415	APPD	RSINGH	10.09.15	

SUB-VENDOR DRG. NO.

PO REF

NO. OF ITEMS

TITLE

POWER HOUSE
 LONGITUDINAL SECTION

THDC DRG. NO.
 THDC/VPHEP/C/PH/03

BHEL DRG. NO.
 12000019756

REV. 04

SUB-VENDOR NAME

WEIGHT (kg)

SCALE 1:200



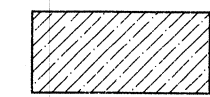
SHEET NO. 01 NO. OF SHT. 01

A1 SIZE

LONGITUDINAL SECTION OF POWER HOUSE THROUGH C-LINE

NOTE:-

1. LOCATION AND SIZES OF COLUMNS/BEAMS AND ARE INDICATIVE AND TO BE FINALIZED BY THDC.
2. SIZES OF EQUIPMENTS SHOWN IS TENTATIVE AND SHALL BE FINALIZED LATER AFTER GETTING FINAL EQUIPMENTS DRAWINGS FROM RESPECTIVE DEPARTMENTS.



FIRST STAGE CONCRETE



SECOND STAGE CONCRETE

REV.	DATE	ALTERED CHECKED APPD.	REV.	DATE	ALTERED BSINGH CHECKED BSINGH APPD. RSINGH	REV.	DATE	ALTERED BSINGH CHECKED BSINGH APPD. RSINGH	REV.	DATE	ALTERED BSINGH CHECKED BSINGH APPD. RSINGH	REV.	DATE	ALTERED BSINGH CHECKED BSINGH APPD. RSINGH
04	19.08.16		03	04.06.16		02	11.04.16		01	27.01.16				
ZONE			ZONE			ZONE			ZONE			ZONE		

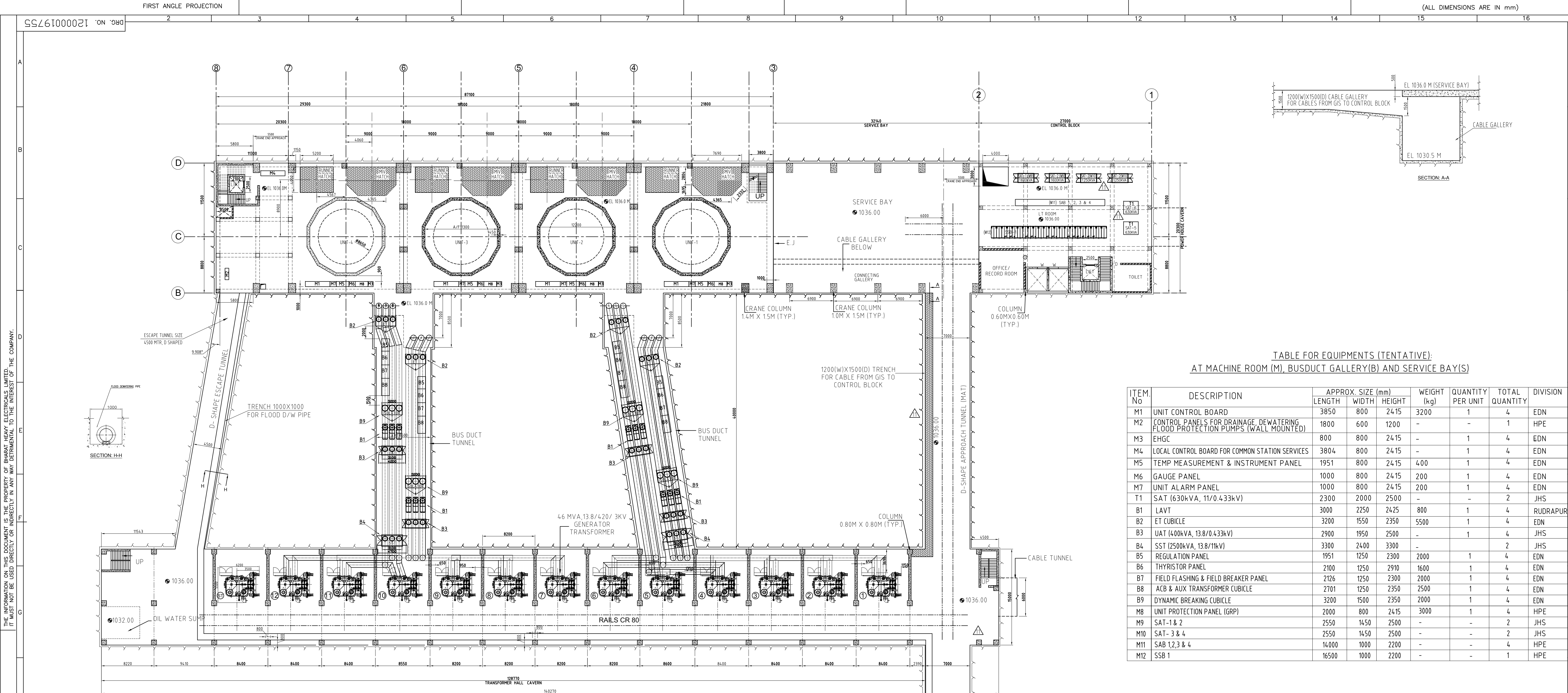
DRAWING REVISED AS PER THE CUSTOMER'S
 COMMENTS DATED 23.06.16
 LTR NO: THDC/RKSH/EMD/VPHEP/401-1/6889

DRAWING REVISED AS PER THE CUSTOMER'S
 COMMENTS DATED 10.05.16
 LTR NO: THDC/RKSH/EMD/VPHEP/401-1/6686

DRAWING REVISED AS PER THE CUSTOMER'S
 COMMENTS DATED 16.02.16

DRAWING REVISED AS PER THE CUSTOMER'S
 COMMENTS

THE INFORMATION ON THIS DOCUMENT IS THE PROPERTY OF BHARAT HEAVY ELECTRICALS LIMITED.
 IT MUST NOT BE USED DIRECTLY OR INDIRECTLY IN ANY WAY DETRIMENTAL TO THE INTERESTS OF THE COMPANY.



FLOOR PLAN AT EL 1036.0

TABLE FOR EQUIPMENTS (TENTATIVE):
AT MACHINE ROOM (M), BUSDUCT GALLERY(B) AND SERVICE BAYS(S)

ITEM No	DESCRIPTION	APPROX. SIZE (mm)			WEIGHT (kg)	QUANTITY PER UNIT	TOTAL QUANTITY	DIVISION
		LENGTH	WIDTH	HEIGHT				
M1	UNIT CONTROL BOARD	3850	800	2415	3200	1	4	EDN
M2	CONTROL PANELS FOR DRAINAGE, DEWATERING FLOOD PROTECTION PUMPS (WALL MOUNTED)	1800	600	1200	-	-	1	HPE
M3	EHGC	800	800	2415	-	1	4	EDN
M4	LOCAL CONTROL BOARD FOR COMMON STATION SERVICES	3804	800	2415	-	1	4	EDN
M5	TEMP MEASUREMENT & INSTRUMENT PANEL	1951	800	2415	400	1	4	EDN
M6	GAUGE PANEL	1000	800	2415	200	1	4	EDN
M7	UNIT ALARM PANEL	1000	800	2415	200	1	4	EDN
T1	SAT (630kVA, 11/0.433kV)	2300	2000	2500	-	-	2	JHS
B1	LAVT	3000	2250	2425	800	1	4	RUDRAPUR
B2	ET CUBICLE	3200	1550	2350	5500	1	4	EDN
B3	UAT (400kVA, 13.8/0.433kV)	2900	1950	2500	-	1	4	JHS
B4	SST (2500kVA, 13.8/11kV)	3300	2400	3300	-	-	2	JHS
B5	REGULATION PANEL	1951	1250	2300	2000	1	4	EDN
B6	THYRISTOR PANEL	2100	1250	2910	1600	1	4	EDN
B7	FIELD FLASHING & FIELD BREAKER PANEL	2126	1250	2300	2000	1	4	EDN
B8	ACB & AUX TRANSFORMER CUBICLE	2701	1250	2350	2500	1	4	EDN
B9	DYNAMIC BREAKING CUBICLE	3200	1500	2350	2000	1	4	EDN
M8	UNIT PROTECTION PANEL (GRP)	2000	800	2415	3000	1	4	HPE
M9	SAT-1 & 2	2550	1450	2500	-	-	2	JHS
M10	SAT-3 & 4	2550	1450	2500	-	-	2	JHS
M11	SAB 1,2,3 & 4	14000	1000	2200	-	-	4	HPE
M12	SSB 1	16500	1000	2200	-	-	1	HPE

NOTE:-

- LOCATION AND SIZES OF COLUMNS/FLOORS BEAMS AND WALLS ARE INDICATIVE AND TO BE FINALIZED BY THDC.
- SIZES OF EQUIPMENTS SHOWN IS TENTATIVE AND SHALL BE FINALIZED LATER AFTER GETTING FINAL EQUIPMENTS DRAWINGS FROM RESPECTIVE DEPARTMENTS.
- CUTOUTS, FOUNDATIONS AND EMBEDMENTS ARE NOT SHOWN IN THE DRAWING. REFER DWG " CIVIL GUIDELINES OF FLOOR AT EL 1036.0M/1038.0M".
- CONNECTION SHOWN OF BUS DUCT TO TRANSFORMER IS INDICATIVE ONLY, REFERE DETAILED BUS DUCT DRAWING FOR EXACT CONNECTION
- THDC TO INSTALL A HELICAL STAIRS AT GIS FLOOR TOWARDS CVT.
- FOR EQUIPMENT LAYOUT AT EL 1046.0, PLEASE REFER DWG NO TB-0-382-316-014, SUBMITTED BY BHEL TBG

REV. 11	DATE 22.01.19	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 10	DATE 29.06.18	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 09	DATE 29.03.18	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH
ZONE	REVISED AS PER THDC'S COMMENTS		ZONE	REVISED AS PER 17TH DCM, MOM		ZONE	REVISED AS PER CUSTOMER'S COMMENTS	
REV. 03	DATE 14.11.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 02	DATE 09.09.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 01	DATE 30.07.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH
ZONE	REVISED AS PER MOM DATED 16TH & 17 TH OCT 2015		ZONE	REVISED AS PER MOM DATED 26.08.15		ZONE	REVISED AS PER CUSTOMER'S COMMENTS	

08	06.02.17	B.SINGH B.SINGH R.SINGH	REV. 07	DATE 06.02.17	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 06	DATE 28.11.17	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 05	DATE 11.03.16	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 04	DATE 11.12.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH
ZONE	REVISED AS PER THDC'S COMMENT DATED 09.03.18		ZONE	REVISED AS PER LATEST CIVIL DRAWINGS RECEIVED FROM THDC DATED 06.11.17		ZONE	REVISED AS PER LATEST CIVIL DRAWINGS RECEIVED FROM THDC DATED 06.11.17		ZONE	REVISED AS PER LATEST CIVIL DRAWINGS RECEIVED FROM THDC DATED 09.02.16		ZONE	REVISED AS PER MOM DATED 02.12.15	

CUSTOMER :

THDC INDIA LIMITED

Joint venture of Govt. of India & Govt. of U.P
Schedule-A MiniRatna PSU

CONSULTANT :

PROJECT : VISHNUGAD PIPALKOTI HEP 4x111MW

BHARAT HEAVY ELECTRICALS LTD.
BHOPAL

TITLE POWER HOUSE
FLOOR LEVEL AT EL. 1036.0

SUB-VENDOR NAME

WEIGHT (kg)

SCALE 1:300

DEPT. CODE DRN BSINGH
HPE CKD BSINGH
415 APPD RSINGH

NAME SIGN

DATE 30.05.2015
30.05.2015
30.05.2015

NO. OF VAR

SUB-VENDOR DRG. NO.

PO REF

NO. OF ITEMS

THDC DRG. NO.
THDC/VPHEP/C/PH/04

BHEL DRG. NO.
12000019755

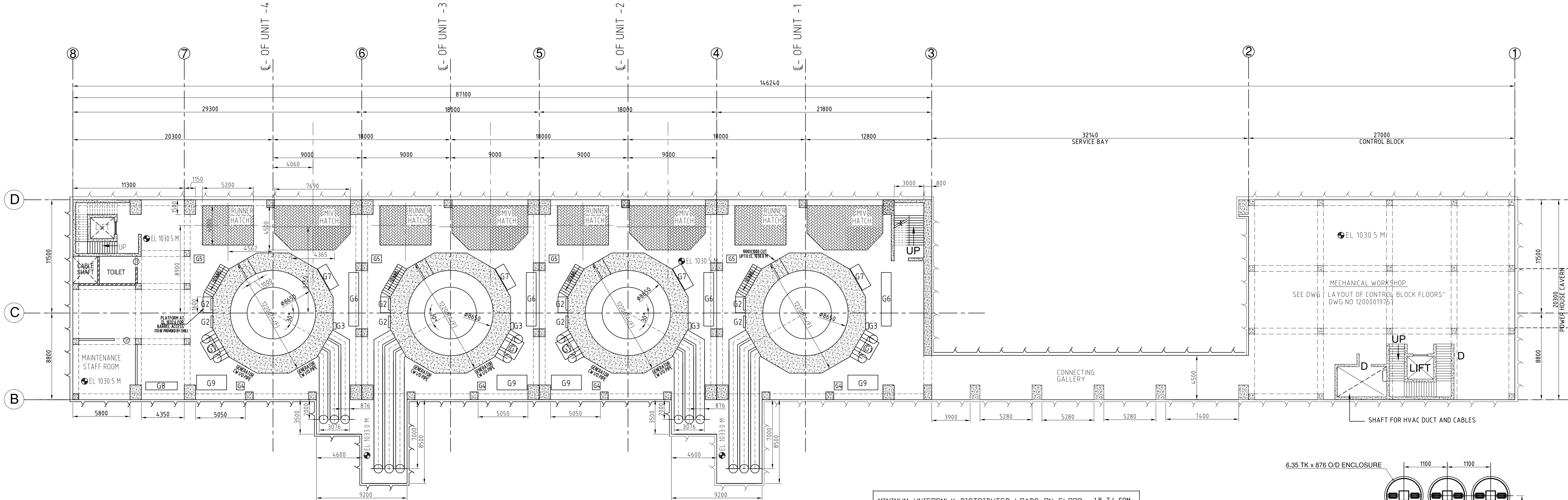
REV. 11

SHEET NO. 01

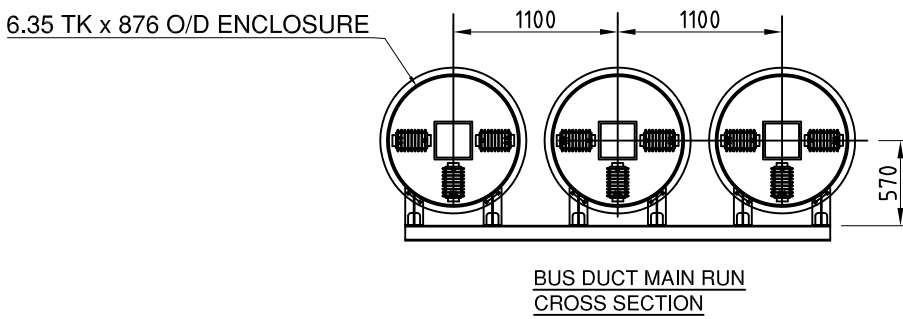
NO. OF SHT. 01

THE INFORMATION ON THIS DOCUMENT IS THE PROPERTY OF BHARAT HEAVY ELECTRICALS LIMITED. IT MUST NOT BE USED DIRECTLY OR INDIRECTLY IN ANY MANNER TO THE INTEREST OF THE COMPANY.

ISSN. & DATE
REV. DRG. NO.



MINIMUM UNIFORMLY DISTRIBUTED LOADS ON FLOOR = 1.5 T/ SQM



GENERATOR FLOOR PLAN AT EL. 1030.5 M.

TABLE FOR EQUIPMENTS (TENTATIVE):								
ITEM No.	DESCRIPTION	APPROX. SIZE (mm)			WEIGHT (kg)	QUANTITY PER UNIT	TOTAL QUANTITY	DIVISION
		LENGTH	WIDTH	HEIGHT				
G1	NG CUBICLE	2000	1250	1355	1500	1	4	JHANSI
G2	MARSHALLING BOX	1200	200	1200	-	2	8	HGE
G3	SPACE HEATER STARTER PANEL	650	300	800	-	1	4	HGE
G4	RTU-GEN FLOOR FOR AUTO SEQ. EQUIPMENT	800	800	2465	-	1	4	EDN
G5	HYDRO MECHANICAL CABINET	1000	800	2800	1700	1	4	HPE(GOV)
G6	UNIT AUXILIARY BOARD	5000	1000	2400	-	1	4	EDN
G7	WATER MIST TYPE FIRE FIGHTING SYSTEM FOR GENERATOR	2500	1000	2300	1000	1	4	HGE
G8	ILLUMINATION PANEL	3200	800	2200	-	1	1	HPE
G9	DYNAMIC BRAKING CUBICLE	3050	1500	2350	-	1	4	EDN

- NOTE:-
1. LOCATION AND SIZES OF COLUMNS/FLOORS BEAMS AND WALLS ARE INDICATIVE AND TO BE FINALIZED BY THDC
 2. SIZES OF EQUIPMENTS SHOWN IS TENTATIVE AND SHALL BE FINALIZED LATER AFTER GETTING FINAL EQUIPMENTS DRAWINGS FROM RESPECTIVE DEPARTMENTS.
 3. CUTOUTS, FOUNDATIONS AND EMBEDMENTS ARE NOT SHOWN IN THE DRAWING

CUSTOMER : टी.एच.डी. सी. इन्डिया लि.
T H D C INDIA Ltd.

CONSULTANT :

PROJECT : VISHNUGAD PIPALKOTI HEP 4x111MW



BHARAT HEAVY ELECTRICALS LTD.
BHOPAL

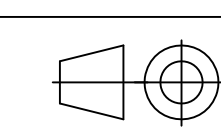
DEPT. CODE	NAME	SIGN	DATE	NO. OF VAR
DRN	BSINGH		30.04.2015	
HPE	CKD	BSINGH	30.04.2015	
415	APPD	RSINGH	30.04.2015	
SUB-VENDOR DRG. NO.			PO REF	NO. OF ITEMS

TITLE
POWER HOUSE
GENERATOR FLOOR LEVEL AT EL. 1030.5M

SUB-VENDOR NAME

WEIGHT (kg)

SCALE



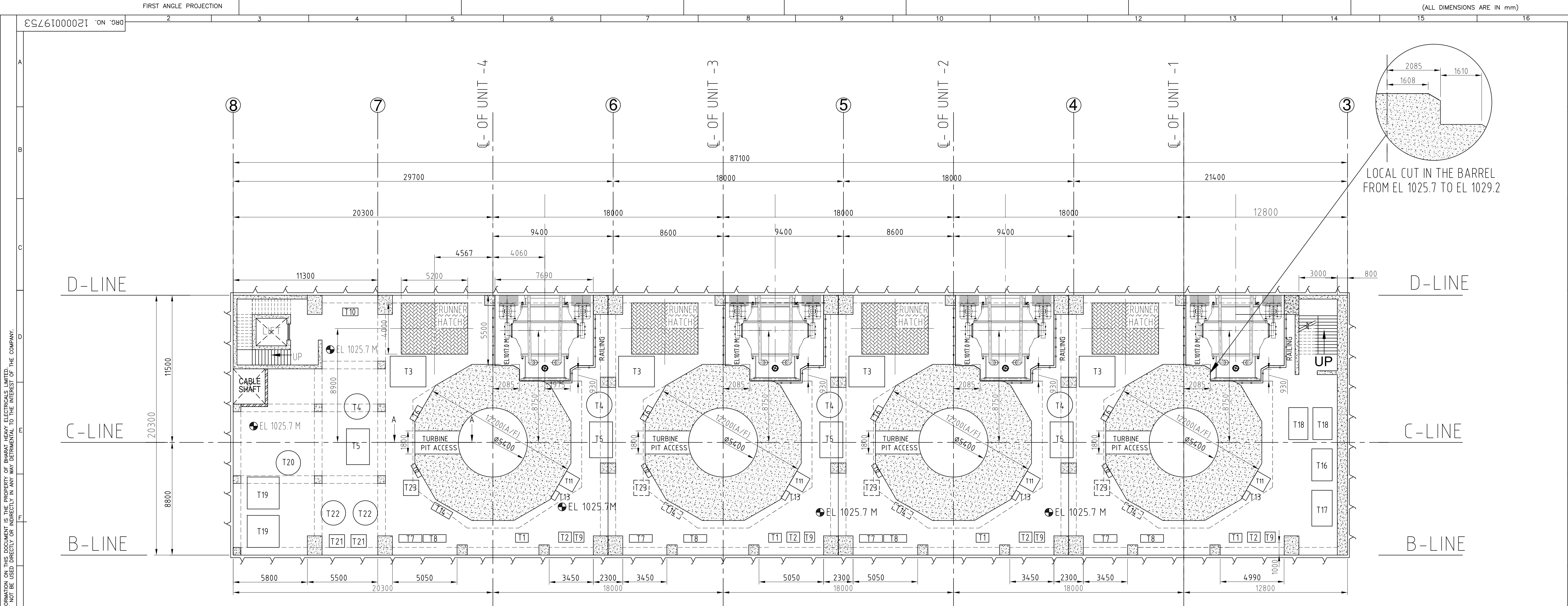


TABLE FOR EQUIPMENTS (TENTATIVE):

ITEM. No	DESCRIPTION	APPROX. SIZE (mm)			WEIGHT (kg)	QUANTITY PER UNIT	TOTAL QUANTITY	DIVISION
		LENGTH	WIDTH	HEIGHT				
T1	MIV HYDRAULIC CONTROL PANEL	700	1000	2350	400	1	4	HPE-GOV
T2	MIV ELECTRICAL CONTROL PANEL	800	1000	2350	300	1	4	HPE-GOV
T3	PRESSURE PUMPING SET-MIV	2800	2400	2700	4000	1	4	HPE-GOV
T4	PRESSURE ACCUMULATOR-MIV	1500	2000	3400	6000	1	4	HPE-GOV
T5	NITROGEN BOTTLE BANK-MIV	1800	2800	3500	6000	1	4	HPE-GOV
T6	MIV OPU STARTER PANEL	1200	450	1800	500	1	4	HPE
T7	STARTER PANEL FOR CLEAN COOLING WATER SYSTEM	1800(M+S)	600	1800	-	1	4	HPE
T8	STARTER PANEL FOR RAW COOLING WATER SYSTEM	1800(M+S)	600	1800	-	1	4	HPE
T9	RTU-TURBINE FLOOR FOR AUTO SEQ. EQUIPMENT	800	800	2465	-	1	4	EDN
T10	STARTER PANEL FOR HVAC PUMPS	1200	600	1800	-	1	1	HPE
T11	BRAKE DUST COLLECTION EQPT	1200	1200	2500	500	1	4	HGE
T12	BRAKE JACK CONTROL PANEL	1100	350	1200	-	1	4	HGE
T13	STARTER PANEL FOR BRAKE DUST COLLECTOR	800	650	1000	-	1	4	HPE
T14	HS LUBRICATION UNIT (PORTABLE)	1625	600	600	250	-	1	HGE
T16	CENTRIFUGAL TYPE OIL HANDLING & PURIFICATION SYSTEM	2500	1600	2000	2200	-	1	HPE (GOV)
T17	LUBRICATING OIL HANDLING SYSTEM	2800	1500	1500	2000	-	1	HPE (GOV)
T18	OIL TANK FOR LUBE HANDLING SYSTEM	2500	1500	1400	5000	-	2	HPE (GOV)
T19	HP AIR COMPRESSOR	2500	2500	2000	-	2	2	HTE
T20	HP AIR RECEIVER	φ2000	-	2500	-	1	1	HTE
T21	LP AIR COMPRESSOR	1200	1200	2000	-	2	2	HTE
T22	LP AIR RECEIVER	φ2000	-	2500	-	2	2	HTE
T23	MOTORISED POWER PACK (PORTABLE)	1200	1200	1800	-	1	1	HGE

TURBINE FLOOR PLAN AT EL. 1025.7 M.

MINIMUM UNIFORMLY DISTRIBUTED LOADS ON FLOOR = 1.5 T/ M²

NOTE:-

1. LOCATION AND SIZES OF COLUMNS/FLOORS BEAMS AND WALLS TO BE PROVIDED BY THDC
2. SIZES OF EQUIPMENTS SHOWN IS TENTATIVE AND SHALL BE FINALIZED LATER AFTER GETTING FINAL EQUIPMENTS DRAWINGS FROM RESPECTIVE DEPARTMENTS.
3. CUTOUTS, FOUNDATIONS AND EMBEDMENTS WILL BE SHOWN IN SEPARATE DRAWING.

CUSTOMER : टी.सू. डी. सी. इन्डिया लि.
T H D C INDIA Ltd.

CONSULTANT :

PROJECT : VISHNUGAD PIPALKOTI HEP 4x111MW



BHARAT HEAVY ELECTRICALS LTD.
BHOPAL

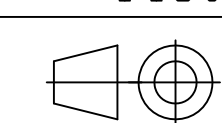
DEPT. CODE	NAME	SIGN	DATE	NO. OF VAR
DRN	B.SINGH		30.04.2015	
CKD	B.SINGH		30.04.2015	
APPD	R.SINGH		30.04.2015	
SUB-VENDOR DRG. NO.			PO REF	NO. OF ITEMS

TITLE POWER HOUSE STATION LAYOUT
TURBINE FLOOR LEVEL AT EL. 1025.7 M

SUB-VENDOR NAME

WEIGHT (kg)

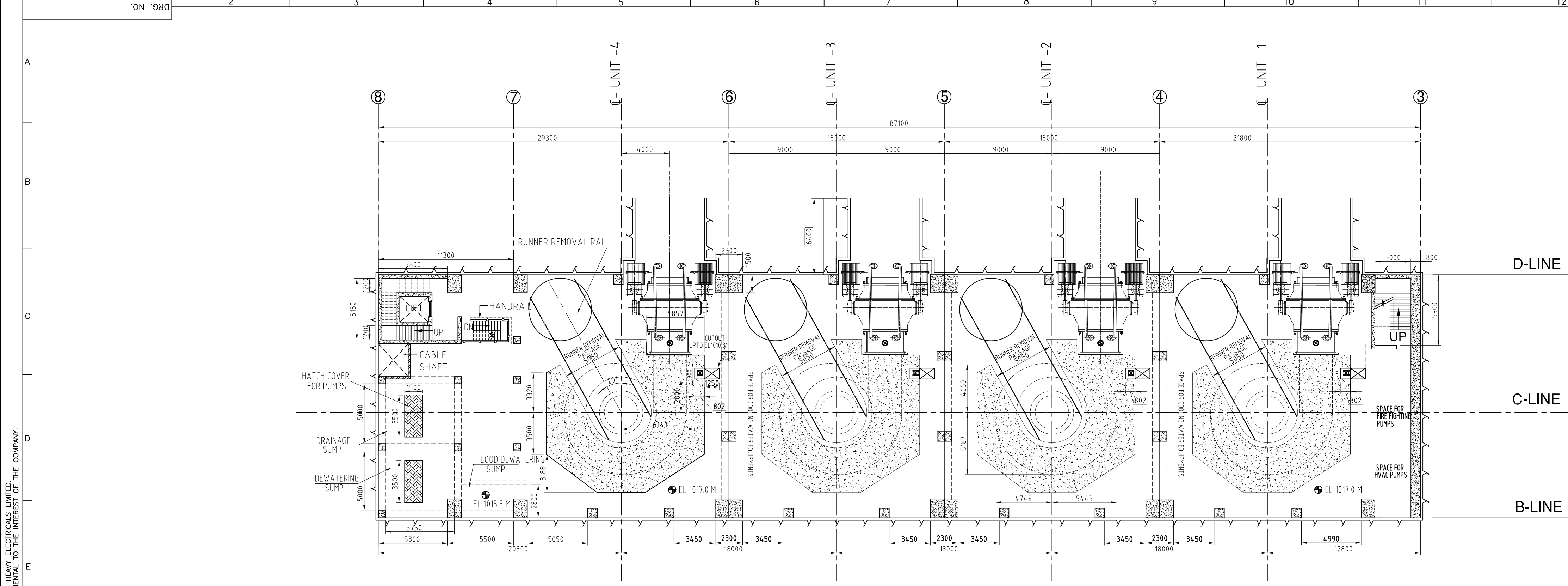
SCALE 1:150



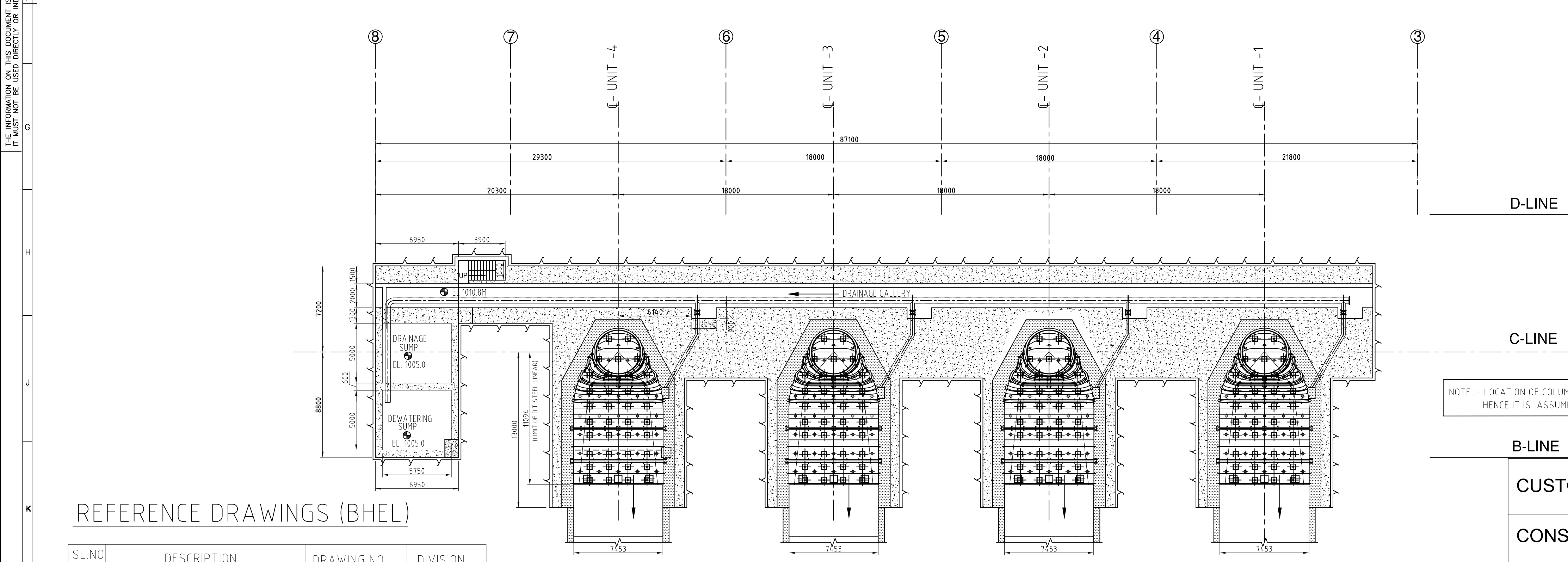
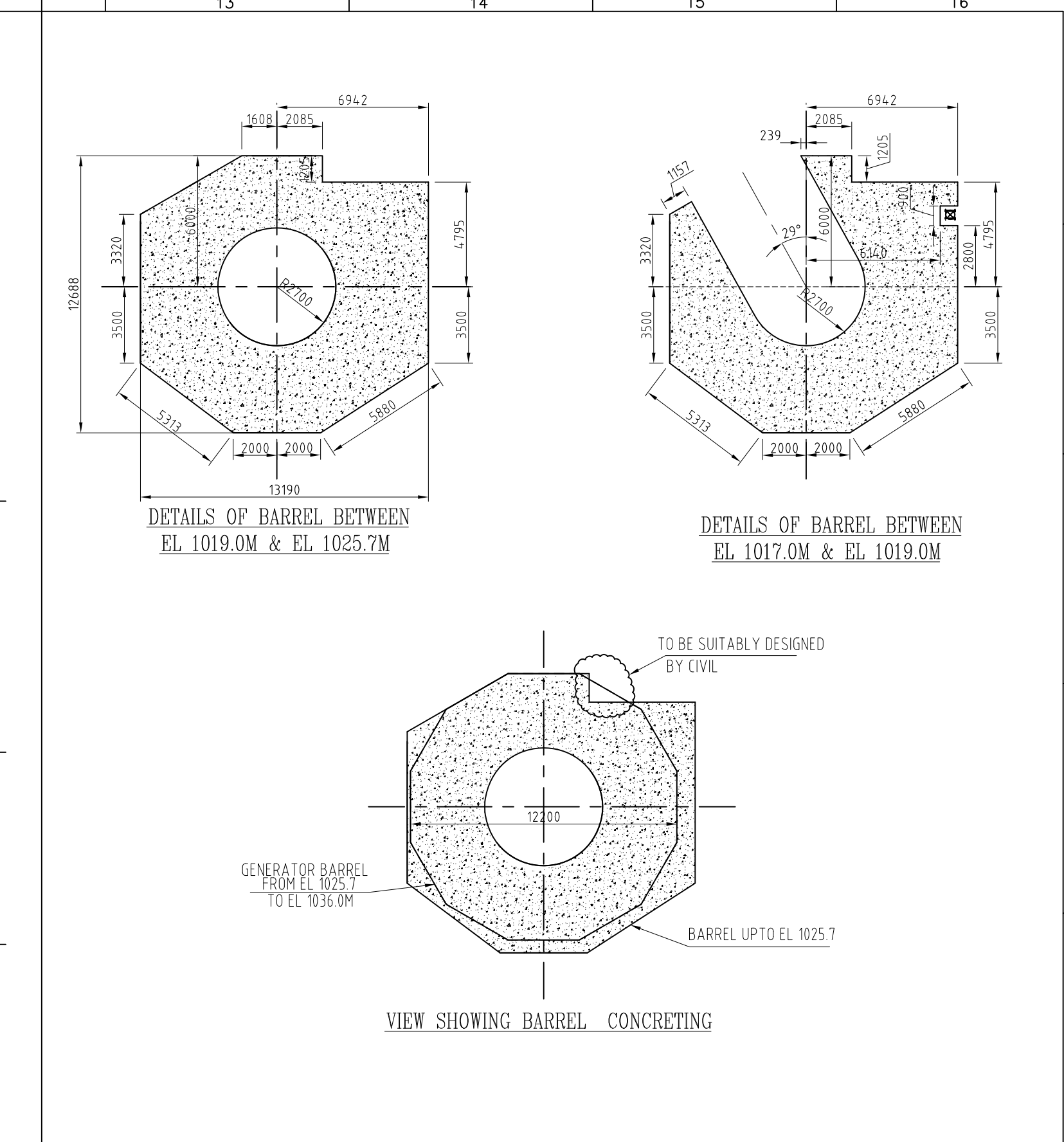
THDC DRG. NO.
THDC/VPHEP/C/PH/06

BHEL DRG. NO.
12000019753

SHEET NO. 01 NO. OF SHT. 01



PLAN AT EL. 1017.0



PLAN AT DRAFT TUBE LEVEL

REFERENCE DRAWINGS (BHEL)

SL.NO	DESCRIPTION	DRAWING NO.	DIVISION
01	INSTALLATION OF MAIN INLET VALVE	x	HTE
02	DRAINAGE , DEWATERING AND FLOOD DEWATERING SYSTEM OF POWER HOUSE	x	HPE
03	FIRST STAGE EMBEDMENTS AND PIPING	x	HTE
04	ARRGT. OF COOLING WATER SYSTEM.	x	HTE
05	CIVIL GUIDELINES OF FLOOR AT EL 1017.0M	x	HPE

- NOTES:
- 01. ALL. DIMENSIONS ARE IN MILLIMETRES AND ELEVATIONS ARE IN METRES.
 - 02. EQUIPMENT SHOWN AND LISTED ARE TENTATIVE AND SHALL BE FINALISED DURING DETAILED DESIGN.
 - 03. CRANE APPROACHES & HEIGHT OF LIFT SHOWN ARE INDICATIVE AND VENDOR SPECIFIC. THIS DATA SHALL BE FURNISHED AFTER PLACEMENT OF PO.THERE MAY BE CHANGES IN CRANE APPROACH.

REV. 05	DATE 11.03.16	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 04	DATE 11.12.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 03	DATE 14.11.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 02	DATE 09.09.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH	REV. 01	DATE 30.07.15	ALTERED B.SINGH CHECKED B.SINGH APPD. R.SINGH
ZONE 1			ZONE 2			ZONE 3			ZONE 4			ZONE 5		
REVISED AS PER LATEST CIVIL DRAWINGS RECEIVED FROM THDC DATED 09.02.16			REVISED AS PER MOM DATED 02.12.15			REVISED AS PER MOM DATED 16 & 17 OCT 2015			REVISED AS PER MOM DATED 26.08.15 2015			REVISED AS PER CUSTOMER'S COMMENTS		

CUSTOMER :
T H D C INDIA Ltd.

CONSULTANT :

PROJECT :
VISHNUGAD PIPALKOTI HEP 4x111MW

DEPT. CODE

HPE

415

DRN

CKD

APPD

NAME

B.SINGH

B.SINGH

R.SINGH

SIGN

DATE

30.04.2015

30.04.2015

30.04.2015

NO. OF VAR

SUB-VENDOR DRG. NO.

PO REF

NO. OF ITEMS

POWER HOUSE STATION LAYOUT

PLAN AT EL. 1017.00 & DRAFT TUBE LEVEL

SUB-VENDOR NAME

WEIGHT (kg)

SCALE

THDC DRG. NO.

BHEL DRG. NO.

SHEET NO.

REV.

05

NO. OF SHT.

THDC/VPHEP/C/PH/07

12000019752

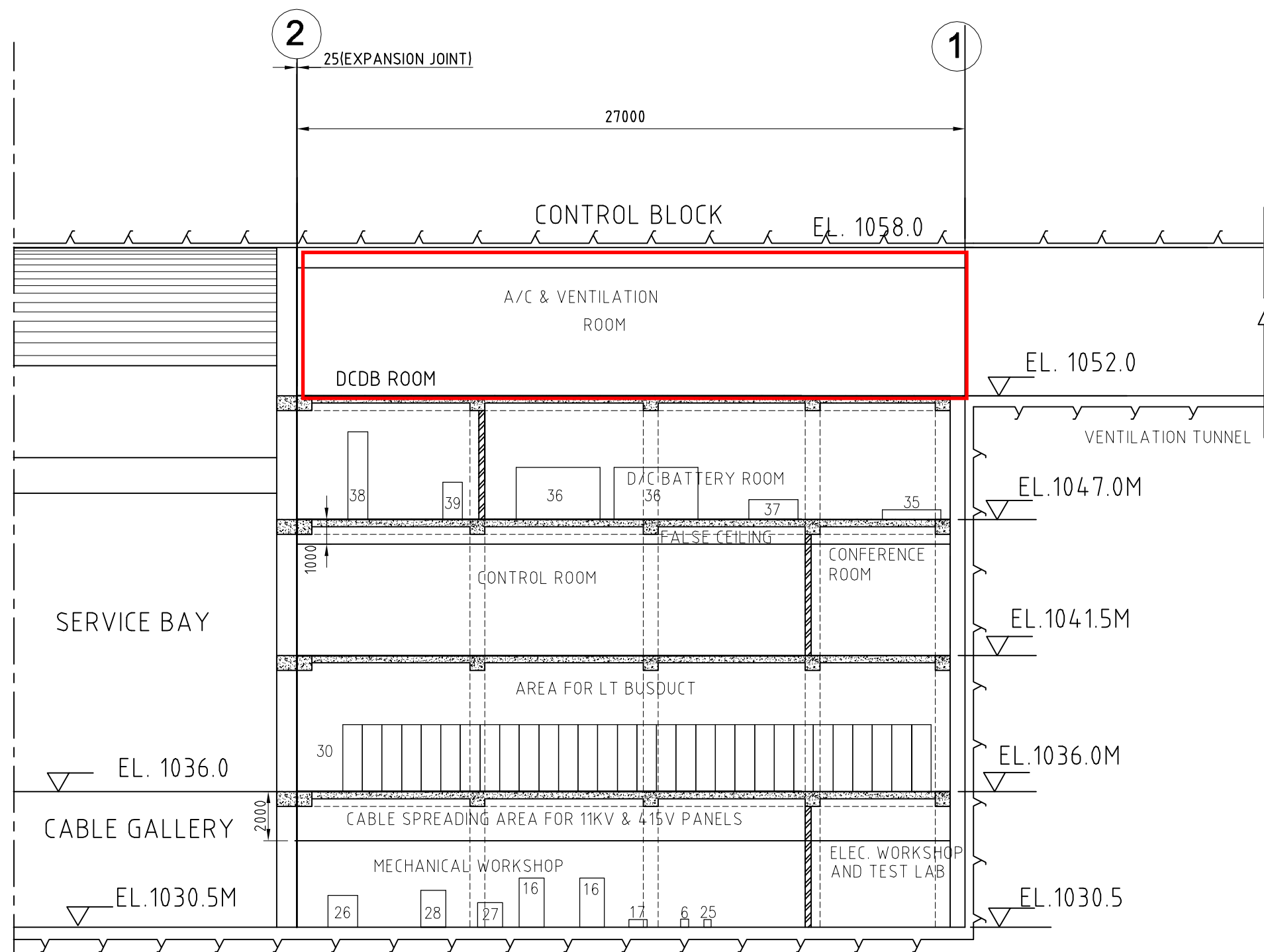
01

01

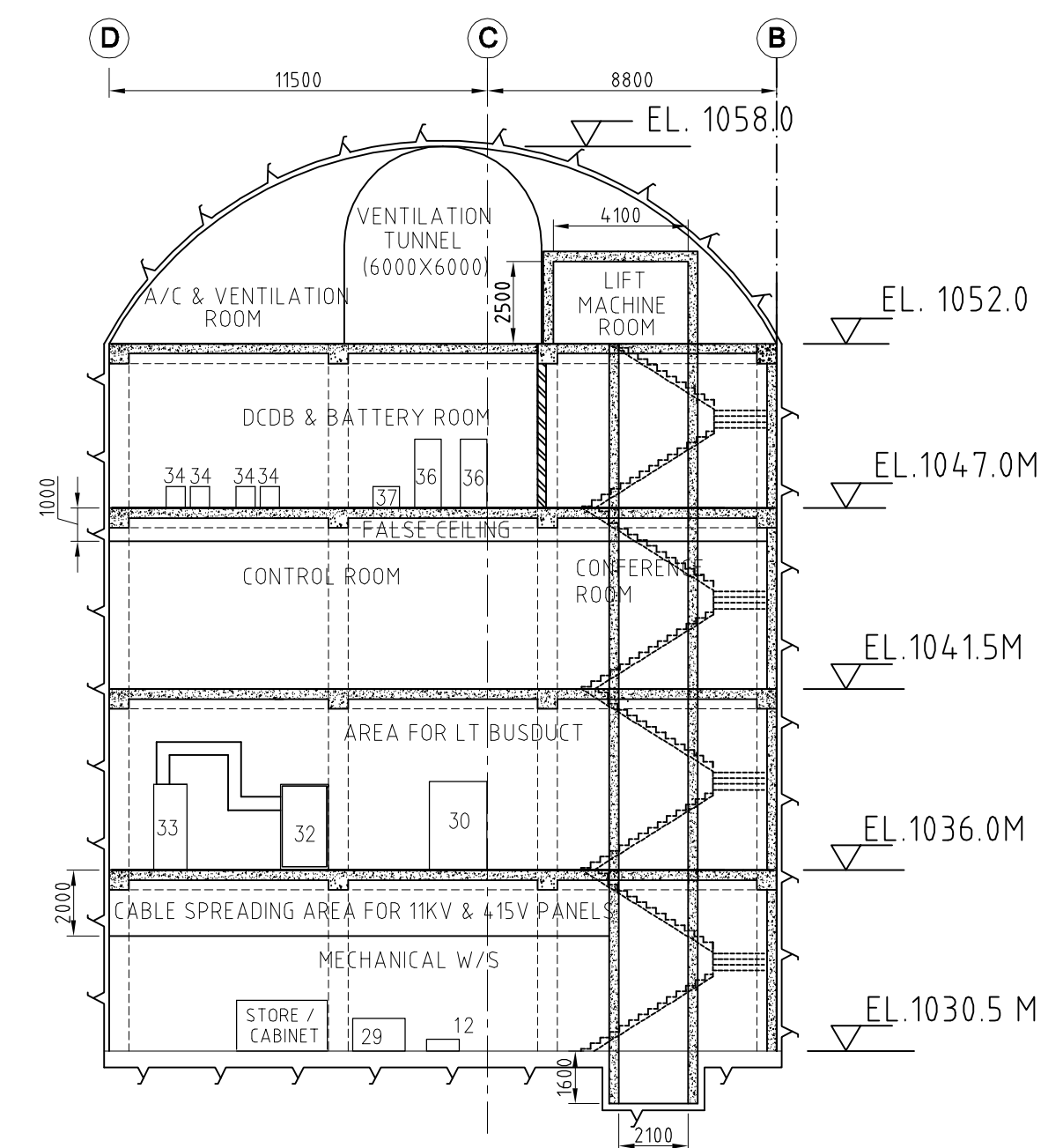
01

THE INFORMATION ON THIS DOCUMENT IS THE PROPERTY OF BHARAT HEAVY ELECTRICALS LIMITED. IT MUST NOT BE USED DIRECTLY OR INDIRECTLY IN ANY MANNER DETRIMENTAL TO THE INTEREST OF THE COMPANY.

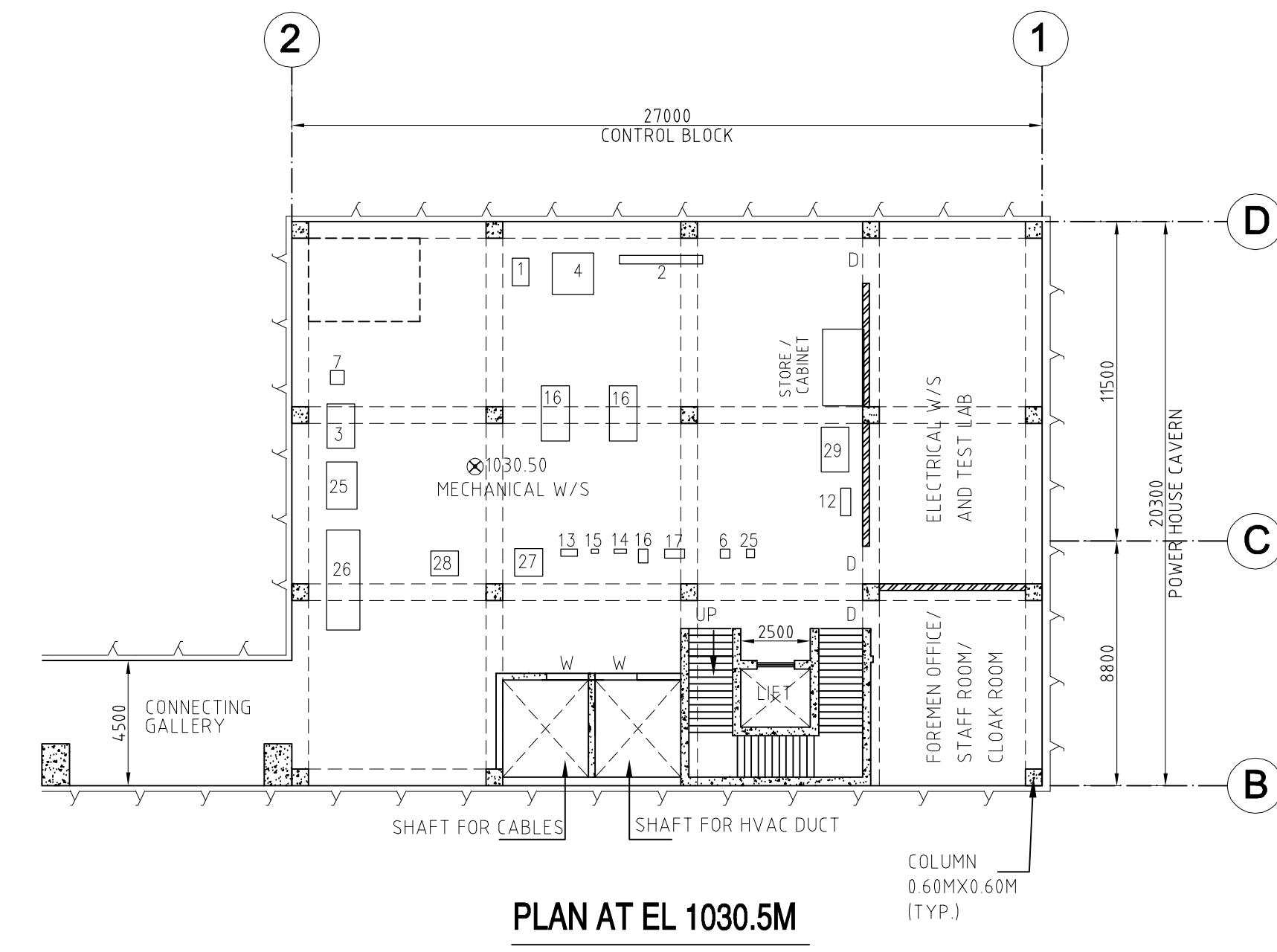
ISN. & DATE
REF. DRG. NO.
MATERIAL NO.



L-SECTION THROUGH C-LINE
CONTROL BLOCK



CROSS SECTION
CONTROL BLOCK



PLAN AT EL 1030.5M

LIST OF EQUIPMENTS AT LT ROOM AT EL 1036.0M

S.NO	LIST OF EQUIPMENT	APPROX. DIM (LXBXH)
30	SSB-1 (11 KV SWITCHGEAR)	23000X1800X2700
31	STATION AUX. TRANSFORMER-1	2750X2175X2600
32	STATION AUX. TRANSFORMER-2	2750X2175X2600
33	STATION AUX. BOARD-1	14000X1000X2600

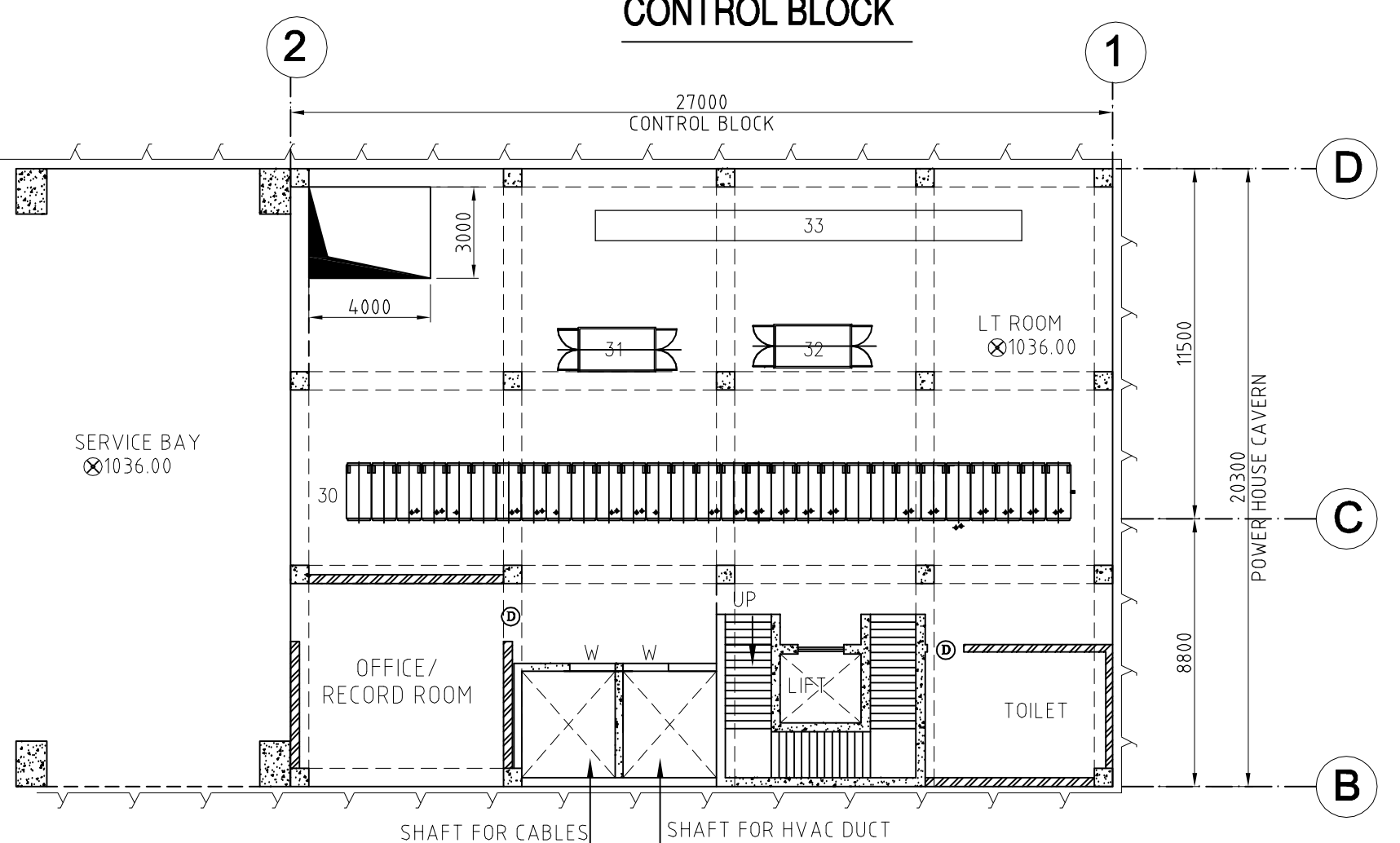
LIST OF MECHANICAL W/S EQUIPMENTS AT EL 1030.5M

S.NO	LIST OF EQUIPMENT	APPROX. DIM (LXBXH)
1	OXY-ACETYLENE GAS WELDING MACHINE	1000X600X600
2	ELECTRODE BAKING OVEN	300X300X480
3	UNIVERSAL KNEE TYPE MILLING MACHINE	1600X1000X1000
4	ELECTRIC WELDING MACHINE	1500X1500X1500
5	ELECTRIC WELDING MACHINE ACCESSORIES	LOOSE ITEM TO BE KEPT IN CABINET
6	TRIPOD WITH AXLE	330X330X1000
7	CHAIN PULLY BLOCK WITH CHAIN	500X500X400
8	TABLE VICE SIZE: 25 TO 100 MM	LOOSE ITEM TO BE KEPT IN CABINET
9	TABLE VICE SIZE: 76 TO 200 MM	
10	PIPE VICE SIZE: 6 TO 25 MM	
11	PIPE VICE SIZE: 6 TO 75 MM	LOOSE ITEM TO BE KEPT IN CABINET
12	PORTABLE LITE DUTY ELCTRIC DRILL MACHINE	
13	PORTABLE STRAIGHT GRINDER (WHEEL DIA 150MM)	
14	PORTABLE ANGLE GRINDER (WHEEL DIA 150MM)	450X150X200
15	PORTABLE ELECTRIC BLOWER(CAP ~ 2.7M ³ /Hr)	250X150X200
16	WORK BENCH (2 NOS)	2000X1000X800
17	PIPE BENDING MACHINE (WITH ACCESSORIES)	730X320X200
18	DIGIMATIC INSIDE MICROMETER OF RANGE 25 TO 50 MM (WITH ACCESSORIES)	LOOSE ITEM TO BE KEPT IN CABINET
19	DIGIMATIC OUTSIDE MICROMETER OF RANGE 25 TO 50 MM (WITH ACCESSORIES)	
20	LASER LEVEL GAUGES (WITH ACCESSORIES)	
21	DIGIMATIC CALIPER, RANGE 0.0 TO 450MM (WITH ACCESSORIES)	LOOSE ITEM TO BE KEPT IN CABINET
22	DIGITAL SPIRIT LEVEL GAUGES (WITH ACCESSORIES)	
23	PAIR OF CONCAVE & CONVEX RADIUS GAUGES RANGE 0.5 TO 13 MM WITH INCREMENT OF 0.5 MM (WITH ACCESSORIES)	
24	METRIC SCREW, PITCH GAUGES, RANGE 0.35 TO 6 MM (WITH ACCESSORIES)	LOOSE ITEM TO BE KEPT IN CABINET
25	4 WHEELED PLATFORM TROLLY(CAP. 2 TONS)	
26	CENTER LATHE (WITH ACCESSORIES)	
27	TOOL GRINDER MACHINE	1000X1000X1000
28	RADIAL DRILLING MACHINE	900X1000X1500
29	POWER HACKSAW	1600X1000X1000

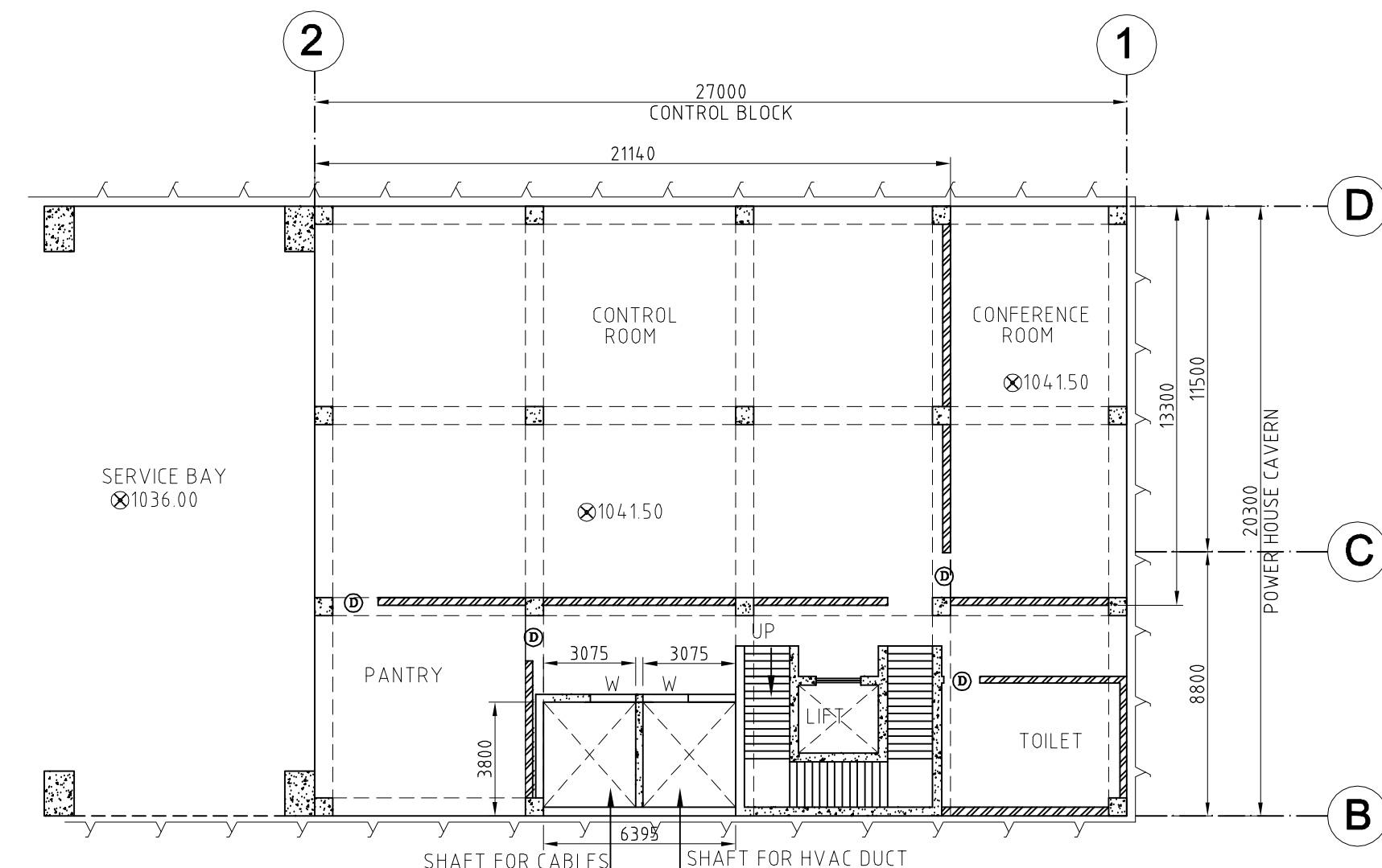
NOTES:-

- LOCATION AND SIZES OF COLUMNS/FLOORS BEAMS AND WALLS ARE INDICATIVE AND TO BE FINALIZED BY THDC.
- SIZES OF EQUIPMENTS SHOWN IS TENTATIVE AND SHALL BE FINALIZED LATER AFTER GETTING FINAL EQUIPMENTS DRAWINGS FROM RESPECTIVE DEPARTMENTS.
- CUTOUTS, FOUNDATIONS AND EMBEDMENTS ARE NOT SHOWN IN THE DRAWING.

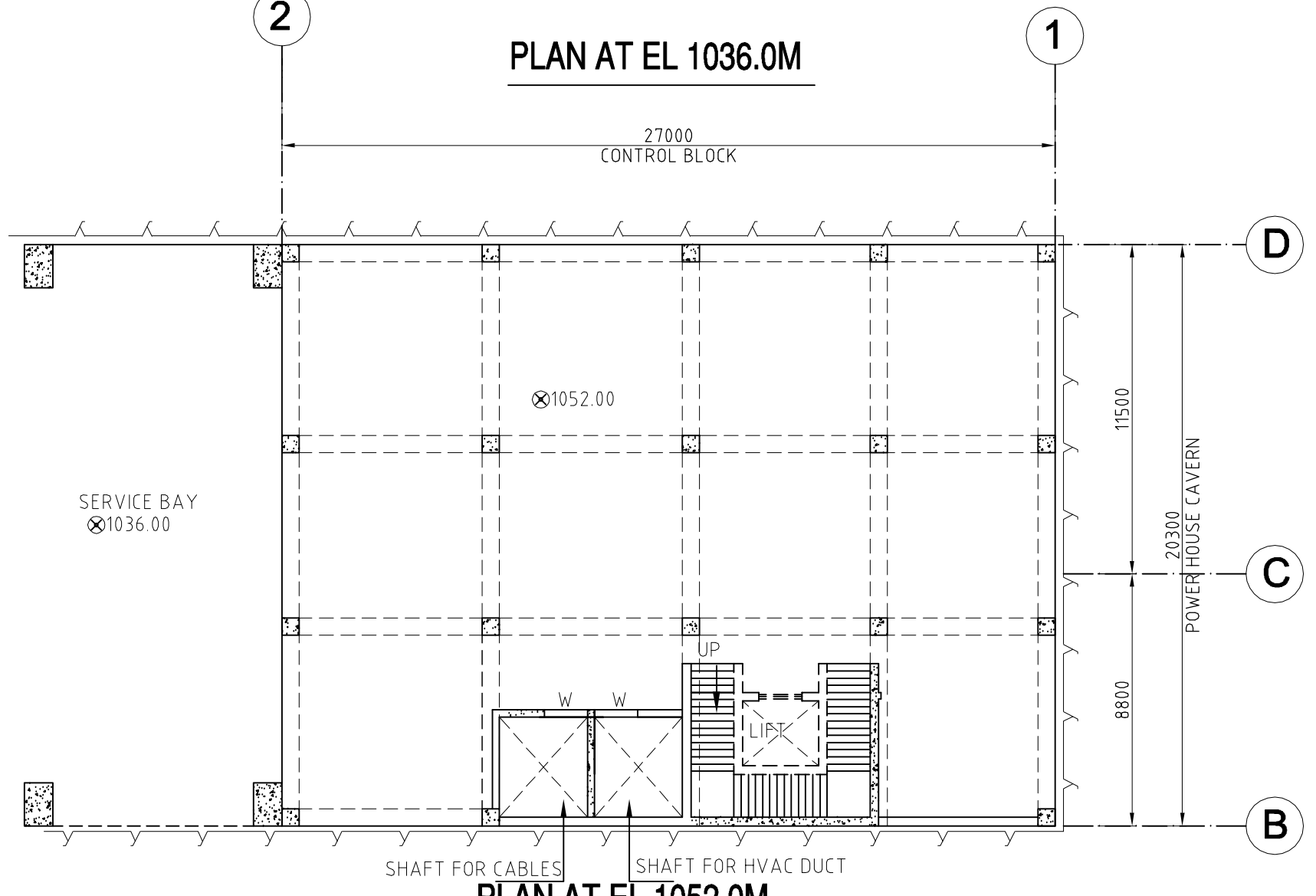
LAYOUT OF CONTROL ROOM AND HVAC FLOOR SHALL BE SHOWN LATER AFTER FINALIZATION OF THESE SYSTEMS DESIGN



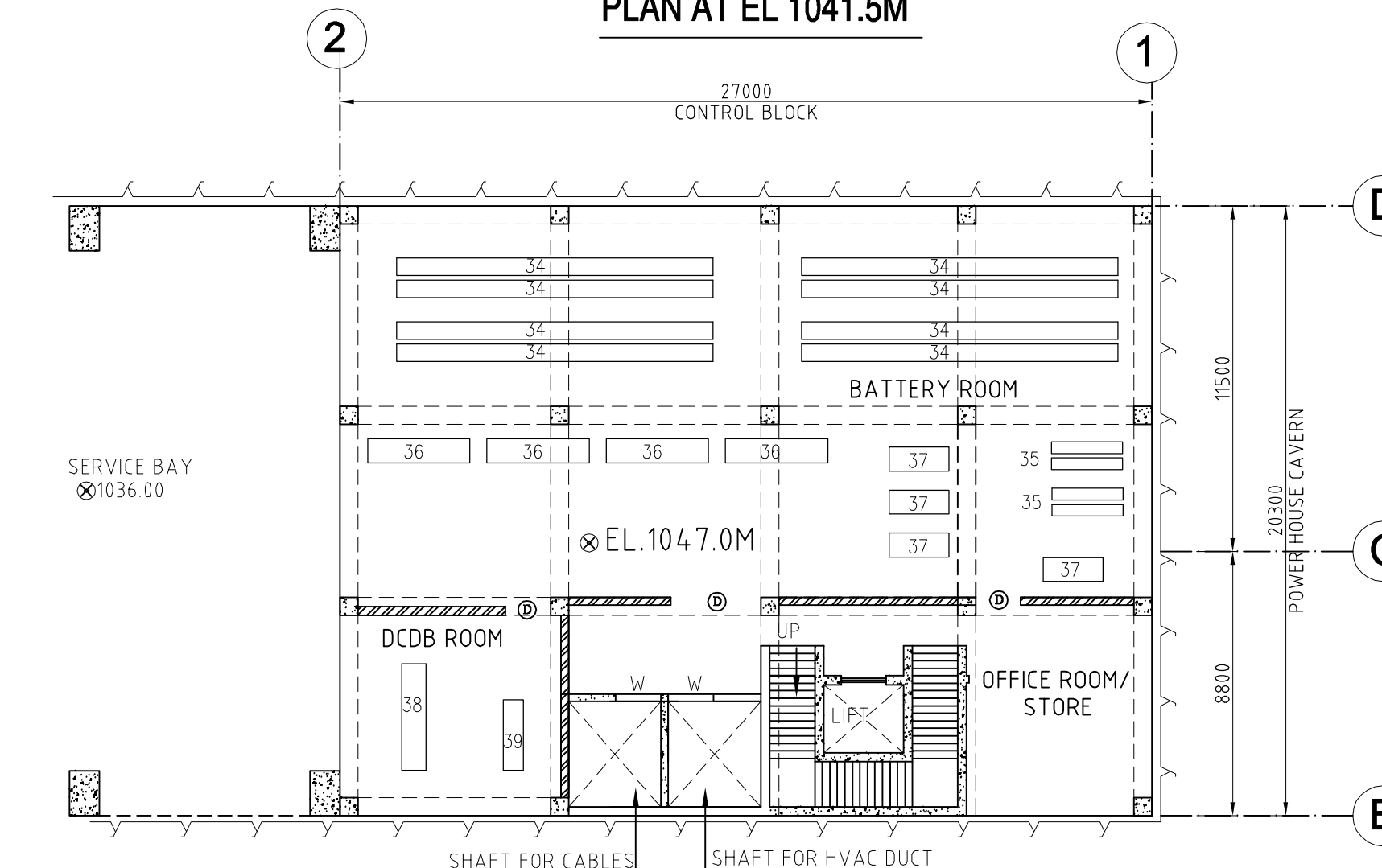
PLAN AT EL 1036.0M



PLAN AT EL 1041.5M



PLAN AT EL 1052.0M



PLAN AT EL 1047.0M

CUSTOMER :

टी.एच.डी.सी. इन्डिया लि.
T H D C INDIA Ltd.

CONSULTANT :

PROJECT : VISHNUGAD PIPALKOTI HEP 4x111MW



BHARAT HEAVY ELECTRICALS LTD.
BHOPAL

TITLE
POWER HOUSE
LAYOUT OF CONTROL BLOCK FLOORS

SUB-VENDOR NAME

WEIGHT
(kg)

SCALE

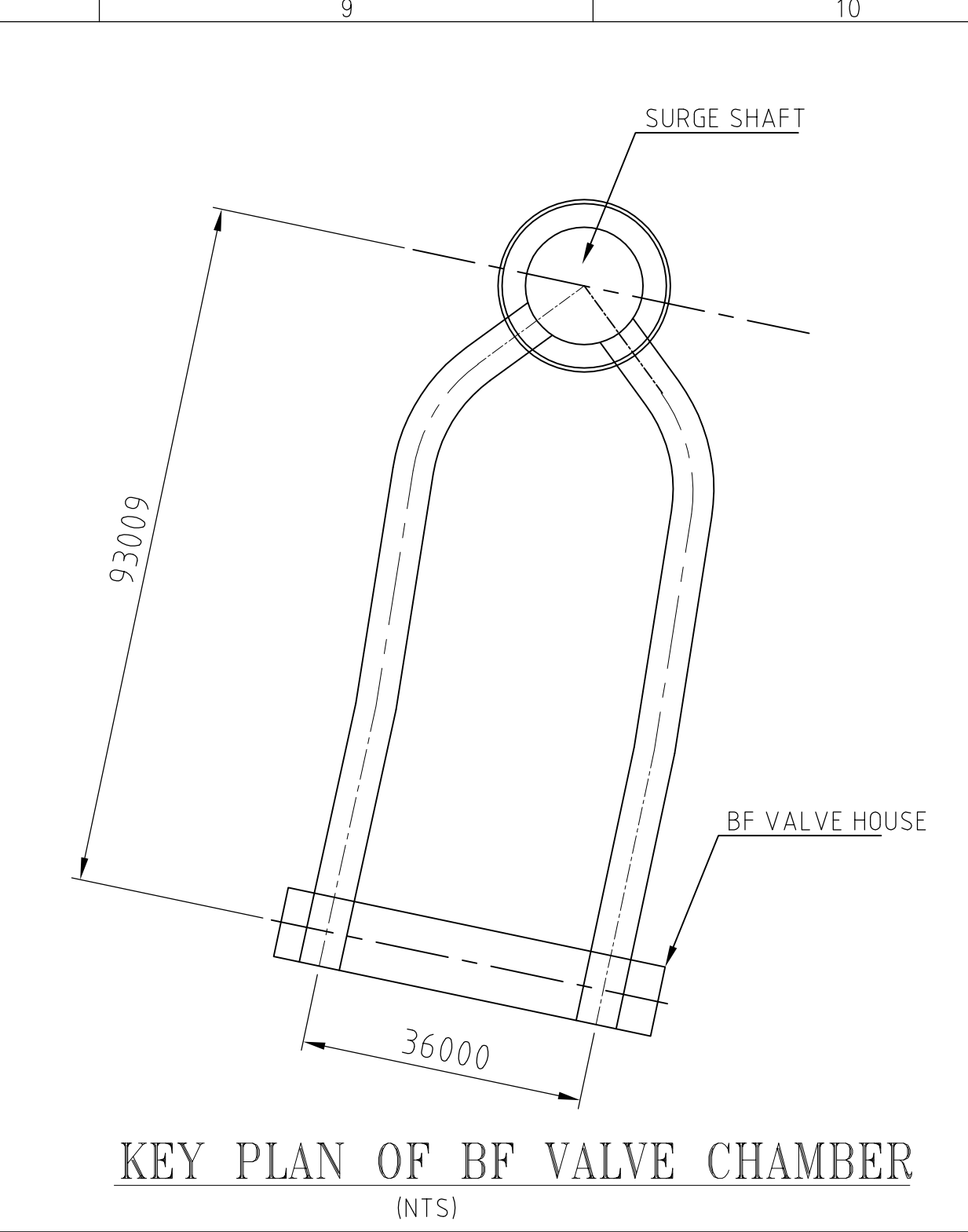
DEPT. CODE	DRN	NAME	SIGN	DATE	NO. OF VAR
HSE	CKD	BSINGH		24.08.15	
415	APPD	RSINGH		24.08.15	
SUB-VENDOR DRG. NO.				PO REF	NO. OF ITEMS

THDC DRG. NO.
THDC/VPHEP/C/PH/03

BHEL DRG. NO.
12000019757
REV. 03

SHEET NO. NO. OF SHT.

REV.	DATE	ALTERED	REV.	DATE	ALTERED	REV.	DATE	BSINGH	REV.	DATE	BSINGH	REV.	DATE	BSINGH	REV.	DATE	BSINGH
		CHECKED			CHECKED			CHECKED			CHECKED			CHECKED			CHECKED
		APPD.			APPD.			APPD.			APPD.			APPD.			APPD.
ZONE			ZONE			ZONE	DWG REVISED AS PER MOM DATED 02.12.15		ZONE	DWG REVISED AS PER CUSTOMER'S COMMENT DATED 07.11.2015		ZONE	DWG REVISED AS PER MOM DATED 16-17 OCT'15.				



BUTTERFLY VALVE CHAMBER
LAYOUT PLAN AT EL.1153.1

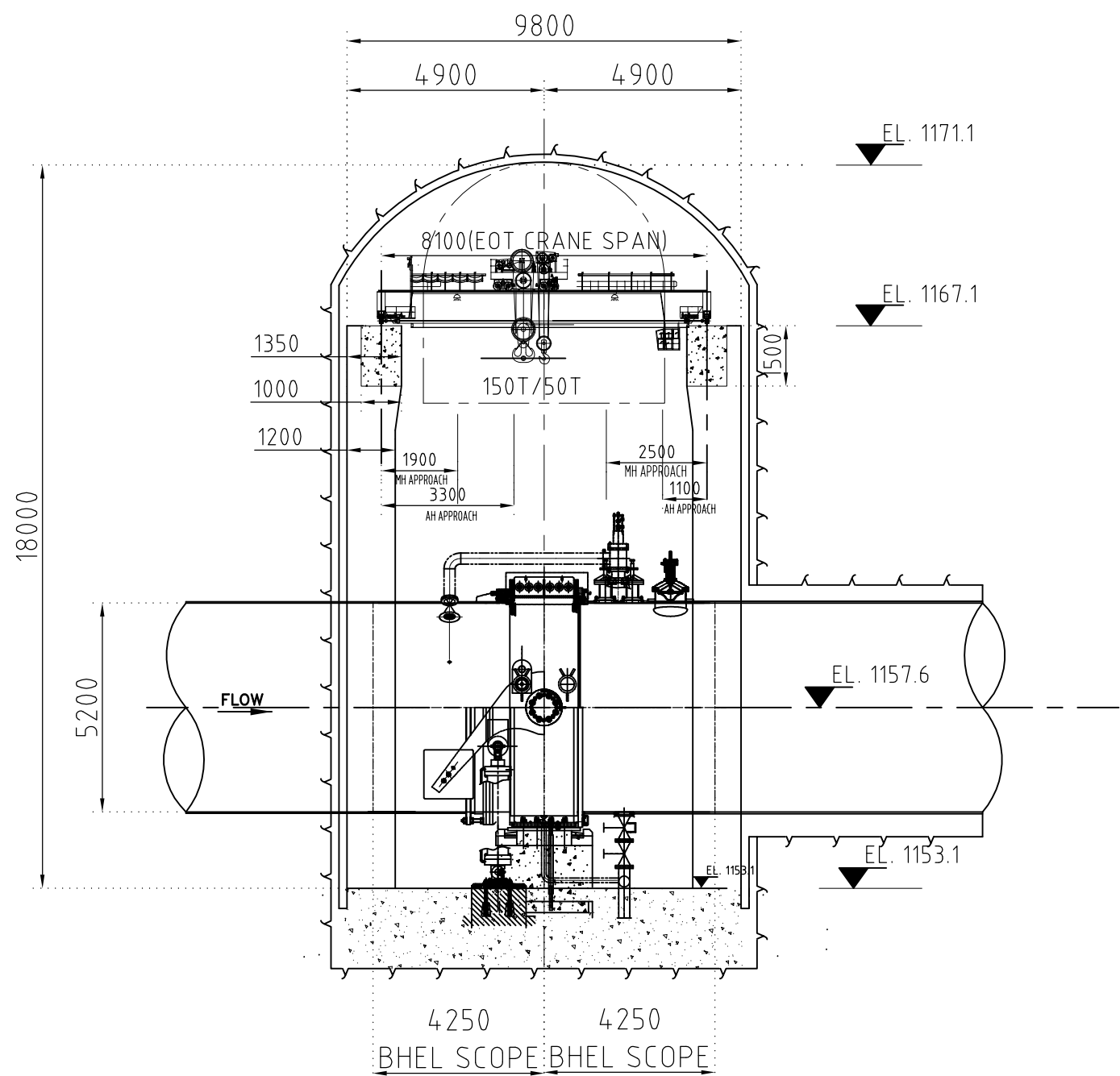


TABLE FOR DIMENSIONS OF EQUIPMENTS (TENTATIVE):

SECTION A-A

LEGENDS :

* TO BE FINALIZED AFTER DETAIL DESIGN OF BF VALVE

NOTES

01. ALL DIMENSIONS ARE IN MILLIMETRES AND ELEVATIONS ARE IN METRES.
02. EQUIPMENT SHOWN AND LISTED ARE TENTATIVE AND SHALL BE FINALISED DURING DETAILED DESIGN.
03. FOR STAGE WISE CONCRETE, FOUNDATION, BLOCK-OUTS AND EMBEDMENT DETAILS REFER BF VALVE DRAWINGS OF BHEL.
04. SIZES OF COLUMNS/BEAMS/SLABS ARE INDICATIVE ONLY. FINAL DIMENSIONS TO BE DECIDED BY THDC
05. REFER EOT CRANE DRAWING FOR COMPLETE DETAILS OF EOT CRANE
06. EOT CRANE APPROACHES SHOWN ARE TENTATIVE AND SHALL BE FINALISED AFTER DETAIL DESIGN.

REFERENCE DRAWINGS:

- THDC-VPHEP-C-SP-03(R2)
- 02160119701 (BHEL HTE DWG)
- 02160019701 (BHEL HTE DWG)

ADDITIONAL INFORMATION					PROJECT		4X111MW, VISHNUGAD PIPALKOTI HYDROELECTRIC PROJECT UTTARAKHAND, INDIA						
STATUS OF DRAWING			U		CUSTOMER		THDC, INDIA						
DISTRIBUTION OF PRINTS					CONSULTANT								
DRWN	NAME	SIGN	DATE	NO. OF VAR.	CONTRACTOR	 भारत हेवी इलेक्ट्रिकल्स लिमिटेड, भोपाल Bharat Heavy Electricals Limited, Bhopal							
CHKD	BSINGH		27.02.16										
APPD	RSINGH		27.02.16										
SUB-SUPPLIER / VENDOR					DEPT	HPE	UNTOL. DIMS. GR.	ANGLE	SCALE	WEIGHT(kg)	REF.TO ASSY.DRG.	ITEM NO.	NO.OF ITEMS
					CODE	415			1:150				
					TITLE						DRAWING NO.		REV.
					BUTTERFLY VALVE CHAMBER PLAN & SECTION VIEW						1 200 00 197 61		04
											SHEET NO.01		NO. OF SHEETS.01
												10	