



भारत हेवी इलेक्ट्रिकल्स लिमिटेड

(भारत सरकार का उपक्रम)

BHARAT HEAVY ELECTRICALS LIMITED

(A Govt. of India Undertaking)

TCN – 02

Ref: PSER:SCT:BNP-F1789:TCN-02

Date: 14-12-2016

Sub	Tender change notice (TCN) 02	
Job	Hiring of 1 no. mid range heavy lift crawler crane with lattice boom & jib for 2x660MW units at IB TPS, Banharpalli, Odisha.	
Ref	1.0	Tender no PSER:SCT:BNP-F1789:16
	2.0	BHEL's NIT, vide reference no PSER:SCT:BNP-F1789:5344 Date: 09-12-2016
	3.0	BHEL's TCN-01 vide ref: PSER:SCT:BNP-F1789:TCN-01 dated 13-12-2016
	4.0	All other pertinent issues till date.

With reference to above, following points/ documents, relevant to tender, may please be noted and complied with while submitting offer.

- 1.0 Please find attached the relevant drawings for bunker structures which contain all details. For details of distance from all structure sides & equipment center for crane placement area, the bidder is requested to visit site of work
- 2.0 Revised 'No deviation certificate' as per enclosed Annexure-2. Bidder shall submit no deviation certificate as per enclosed format only.
- 3.0 All other terms & conditions shall remain unchanged.

Thanking you,

Yours faithfully,
for BHARAT HEAVY ELECTRICALS LTD

SR.ENGR (SCT)

Encl

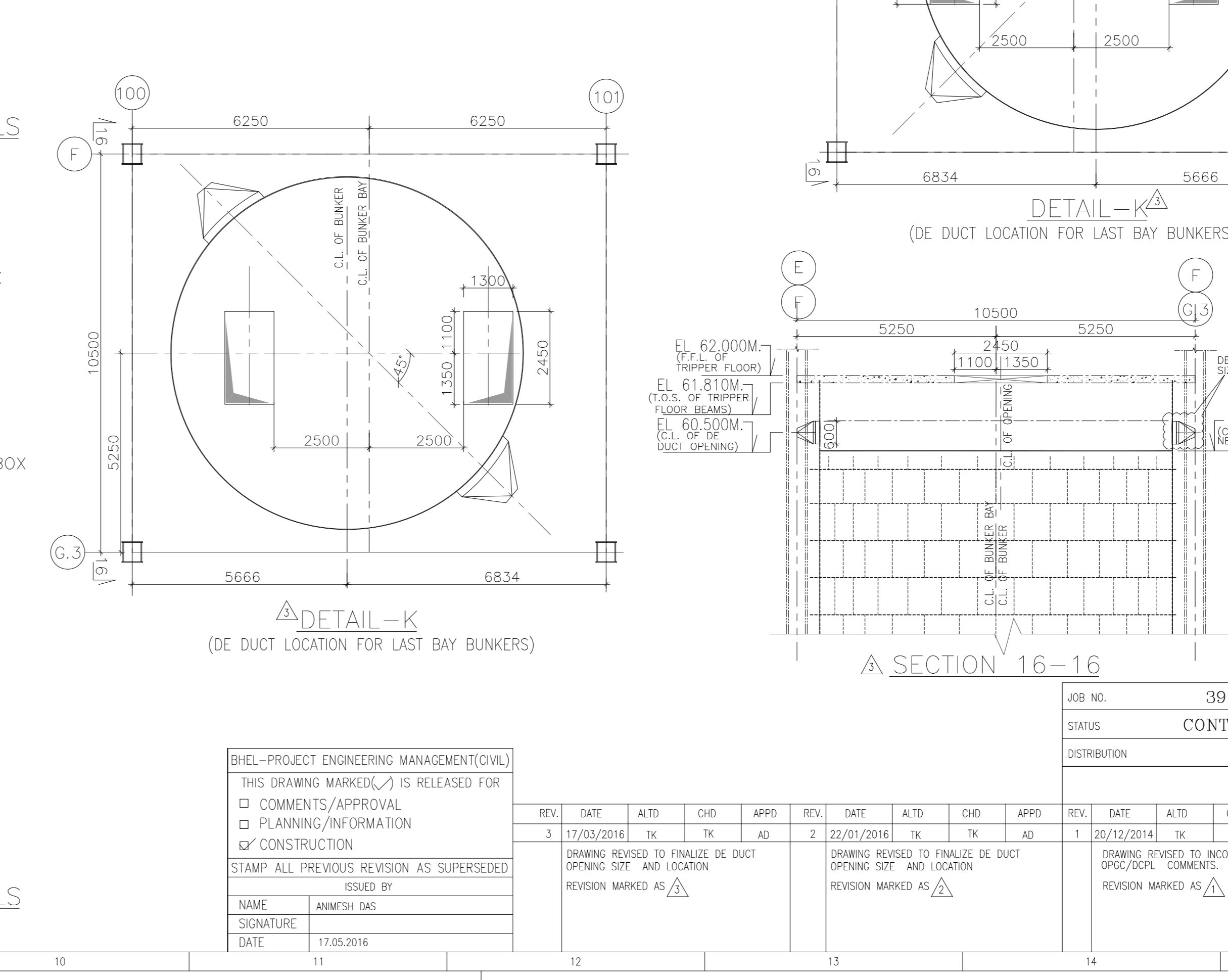
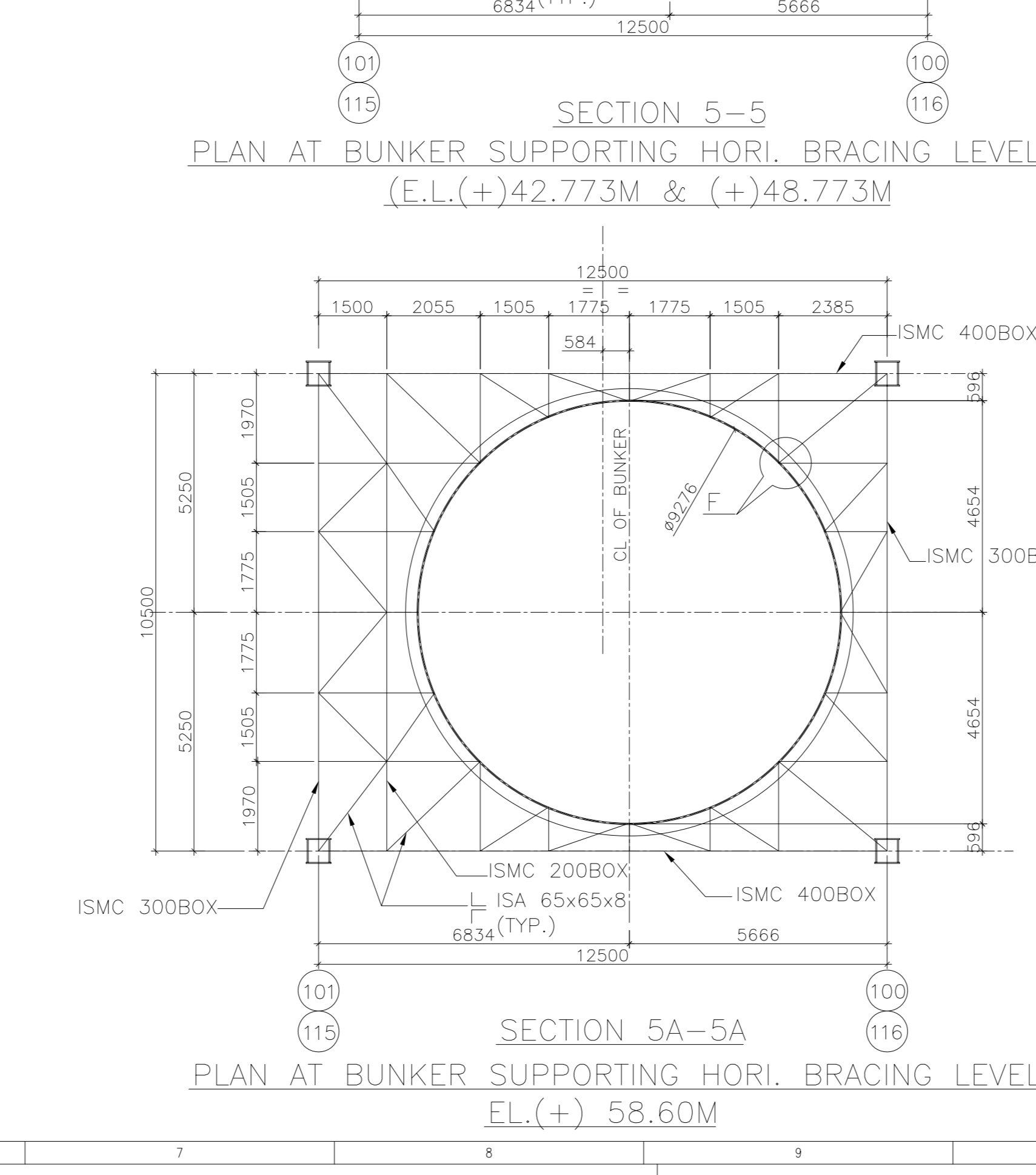
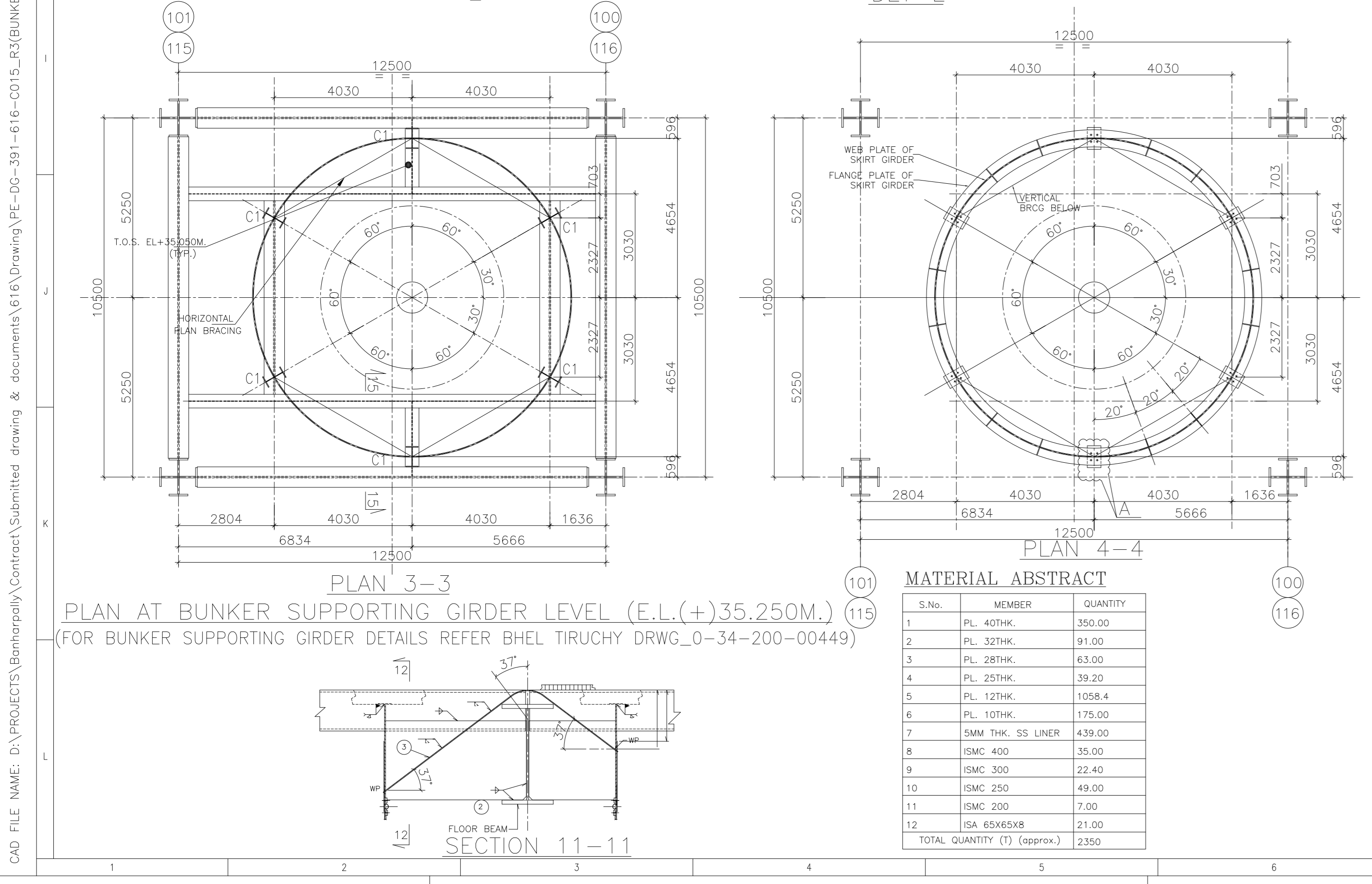
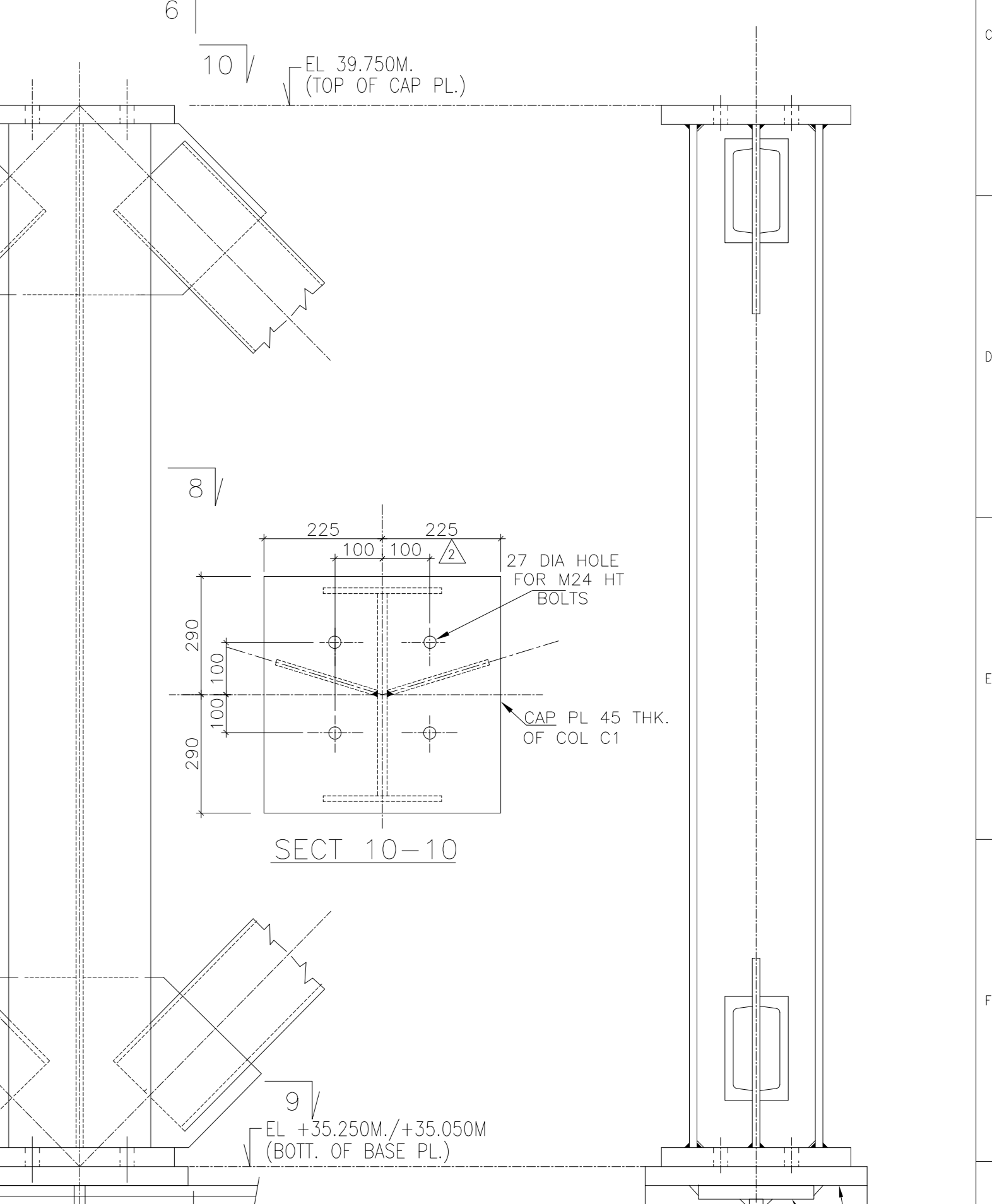
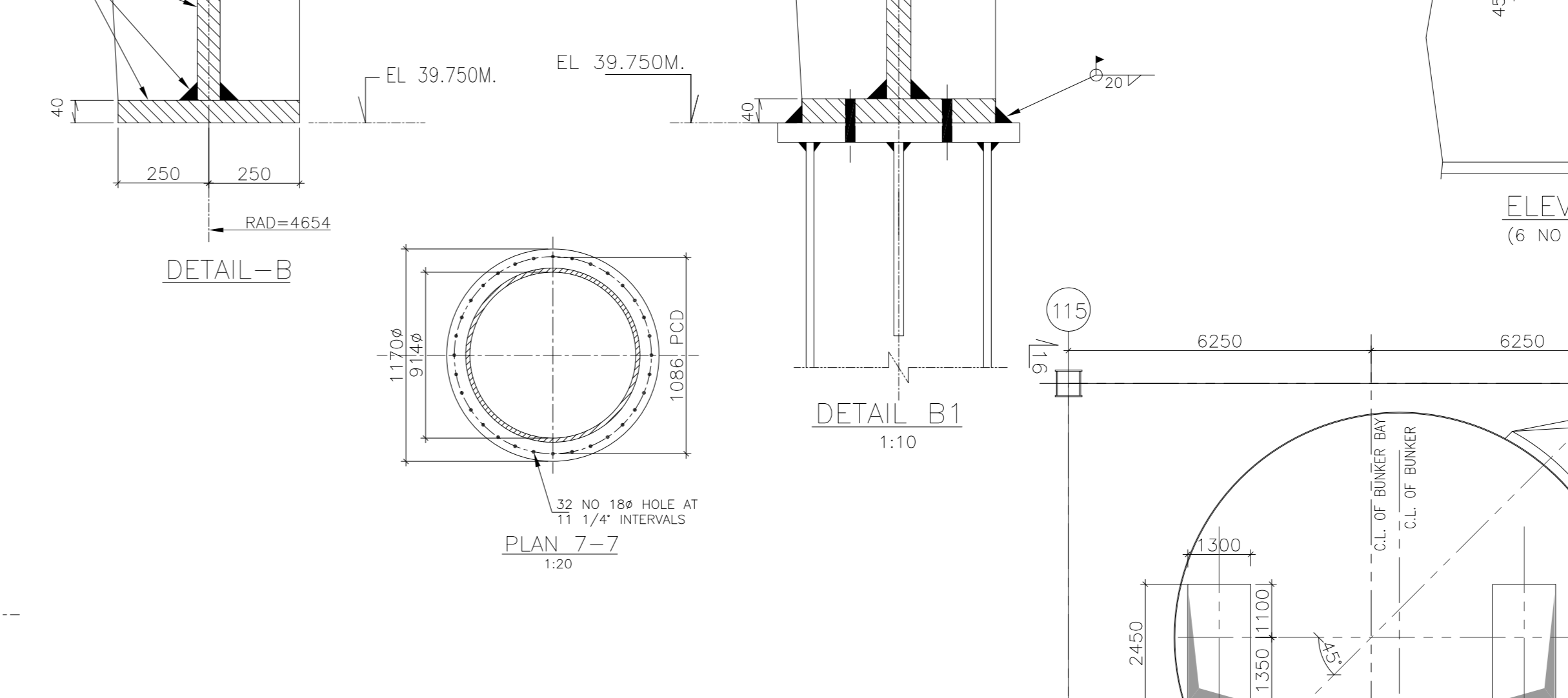
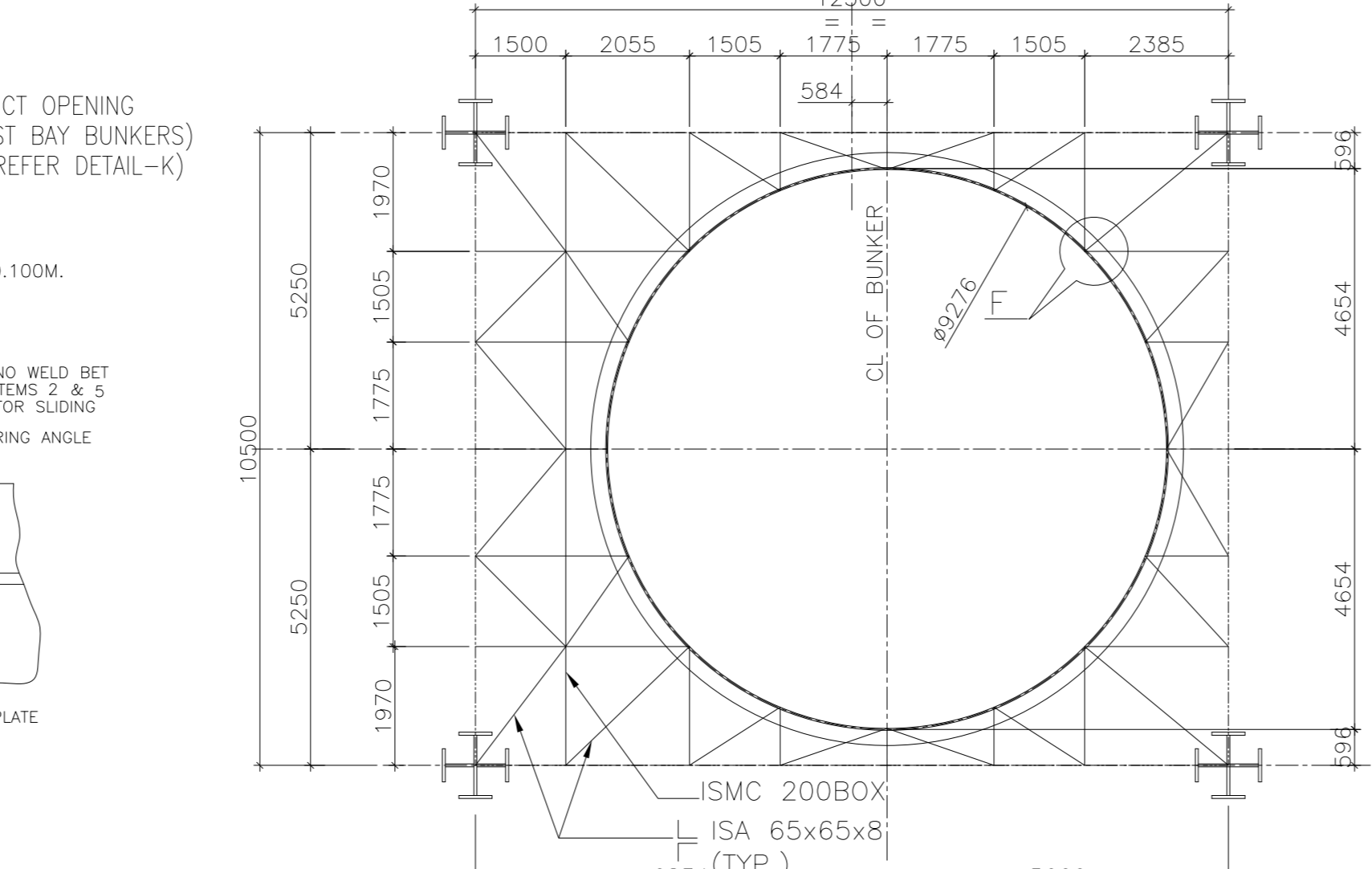
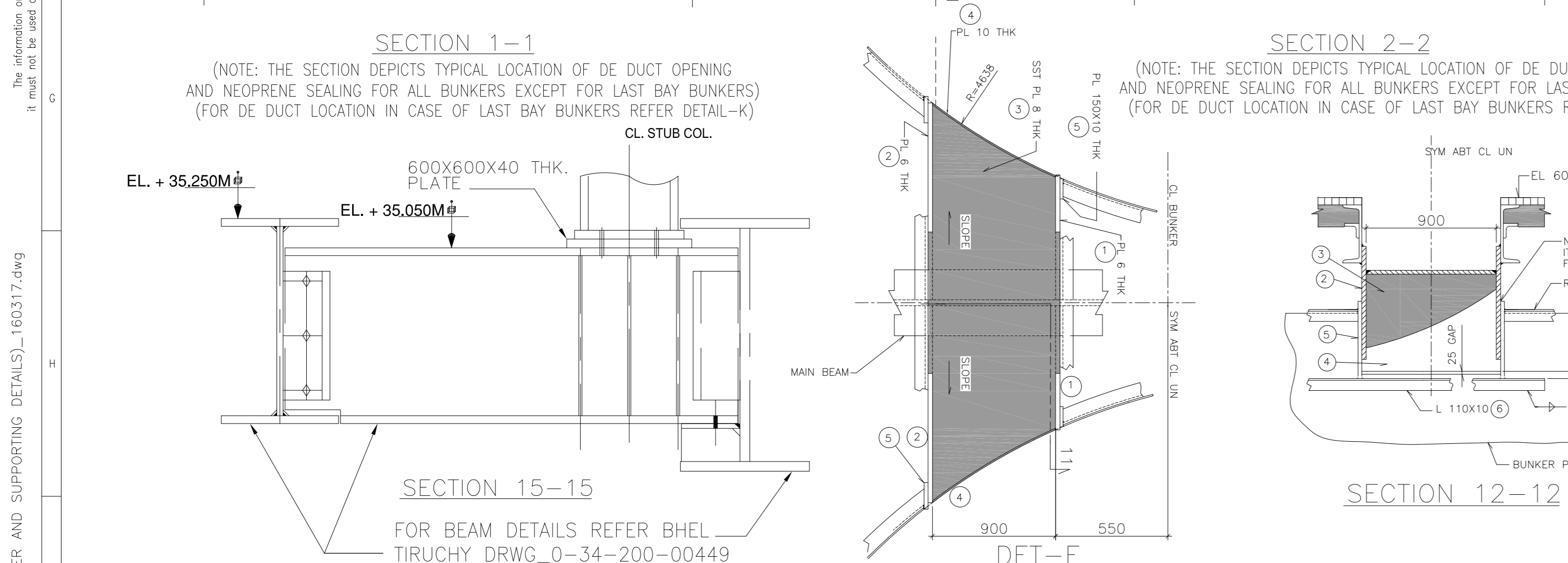
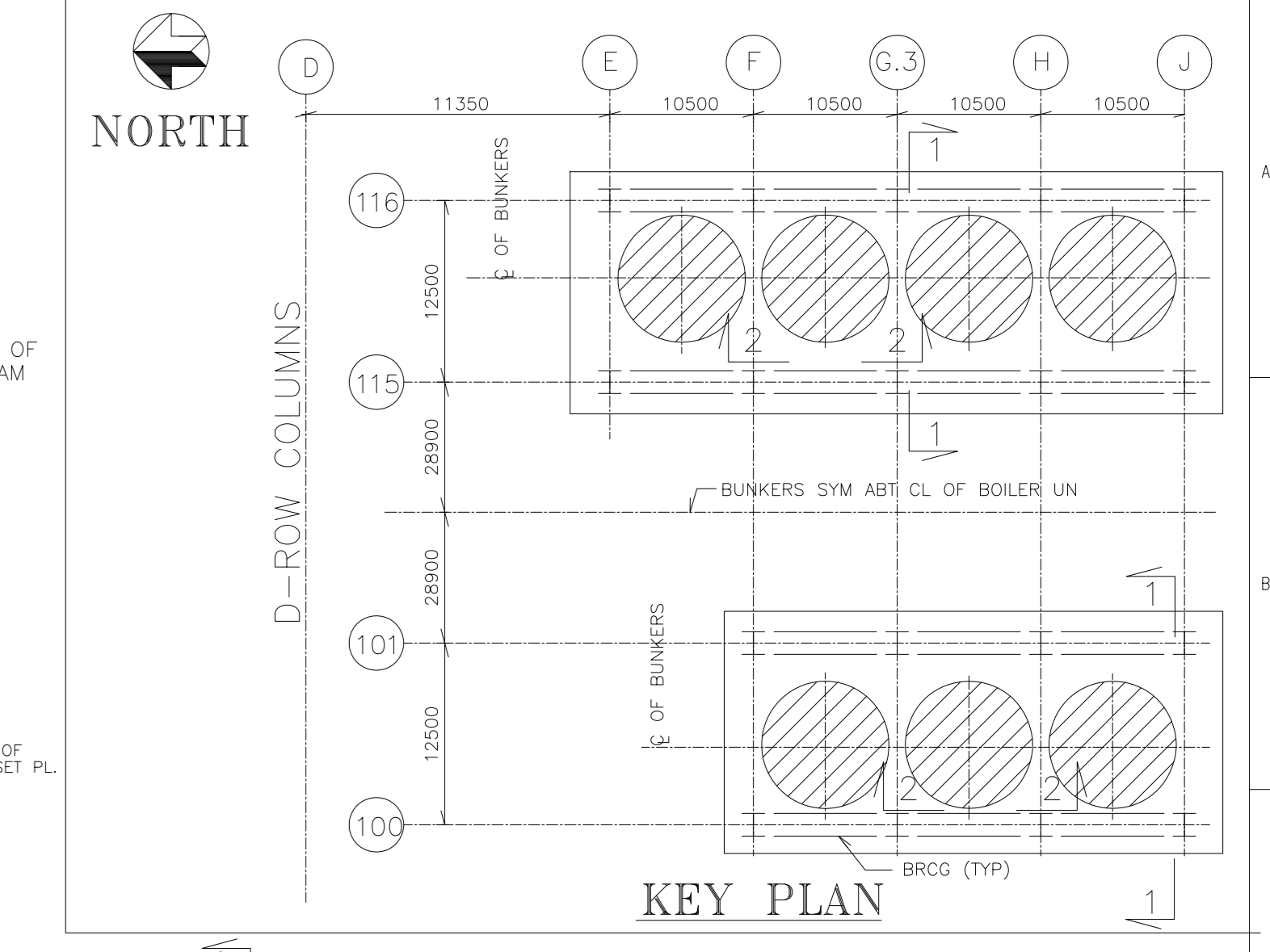
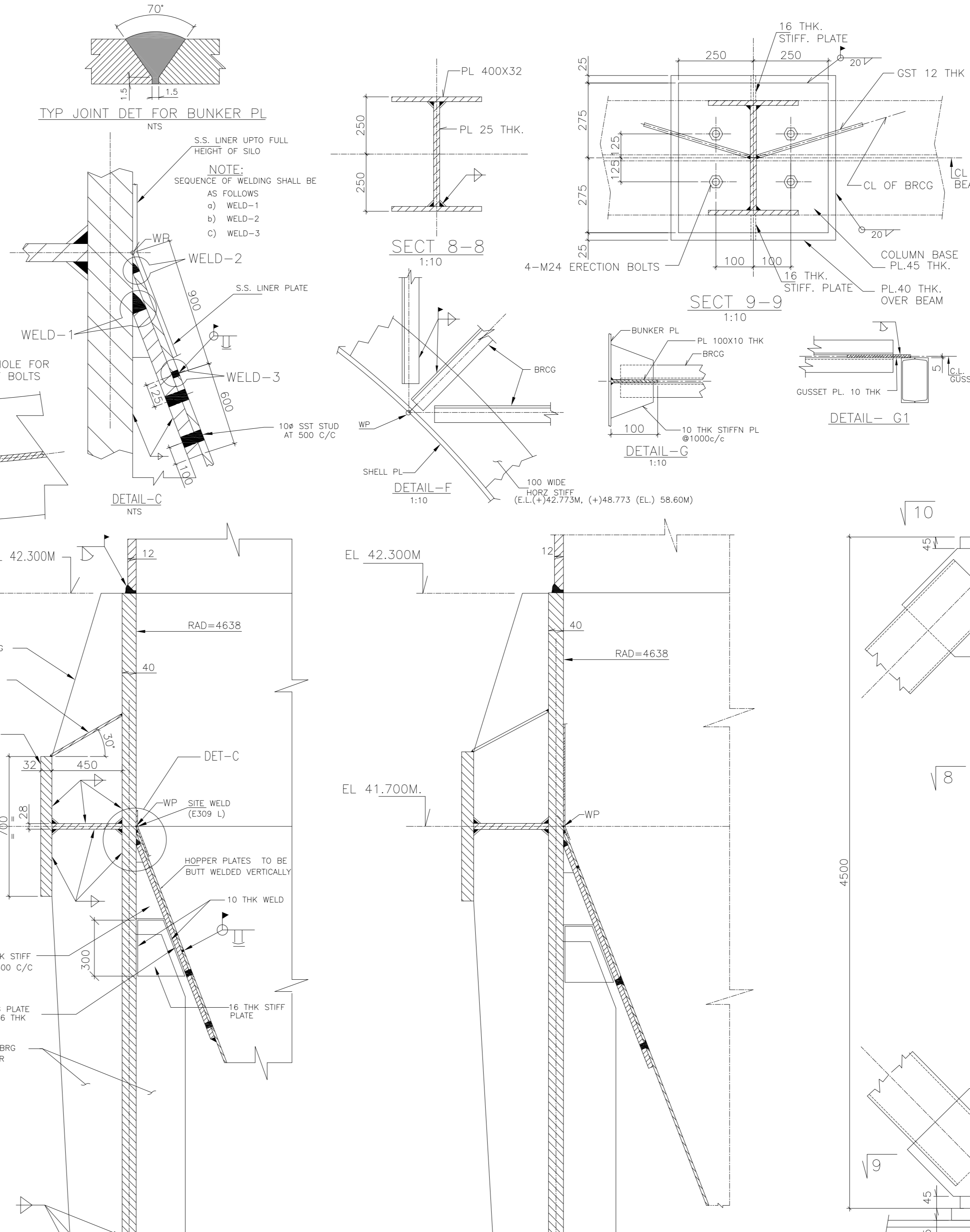
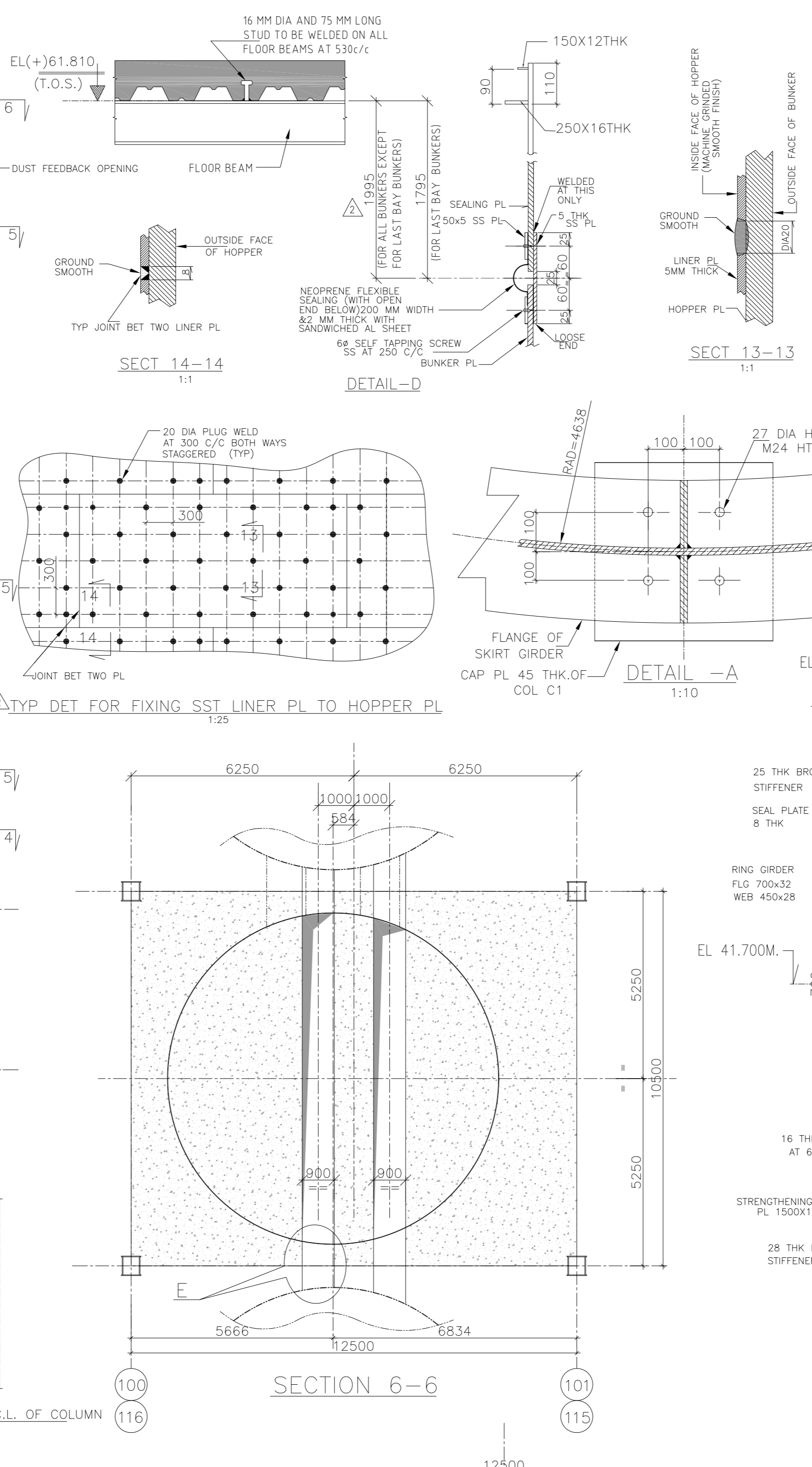
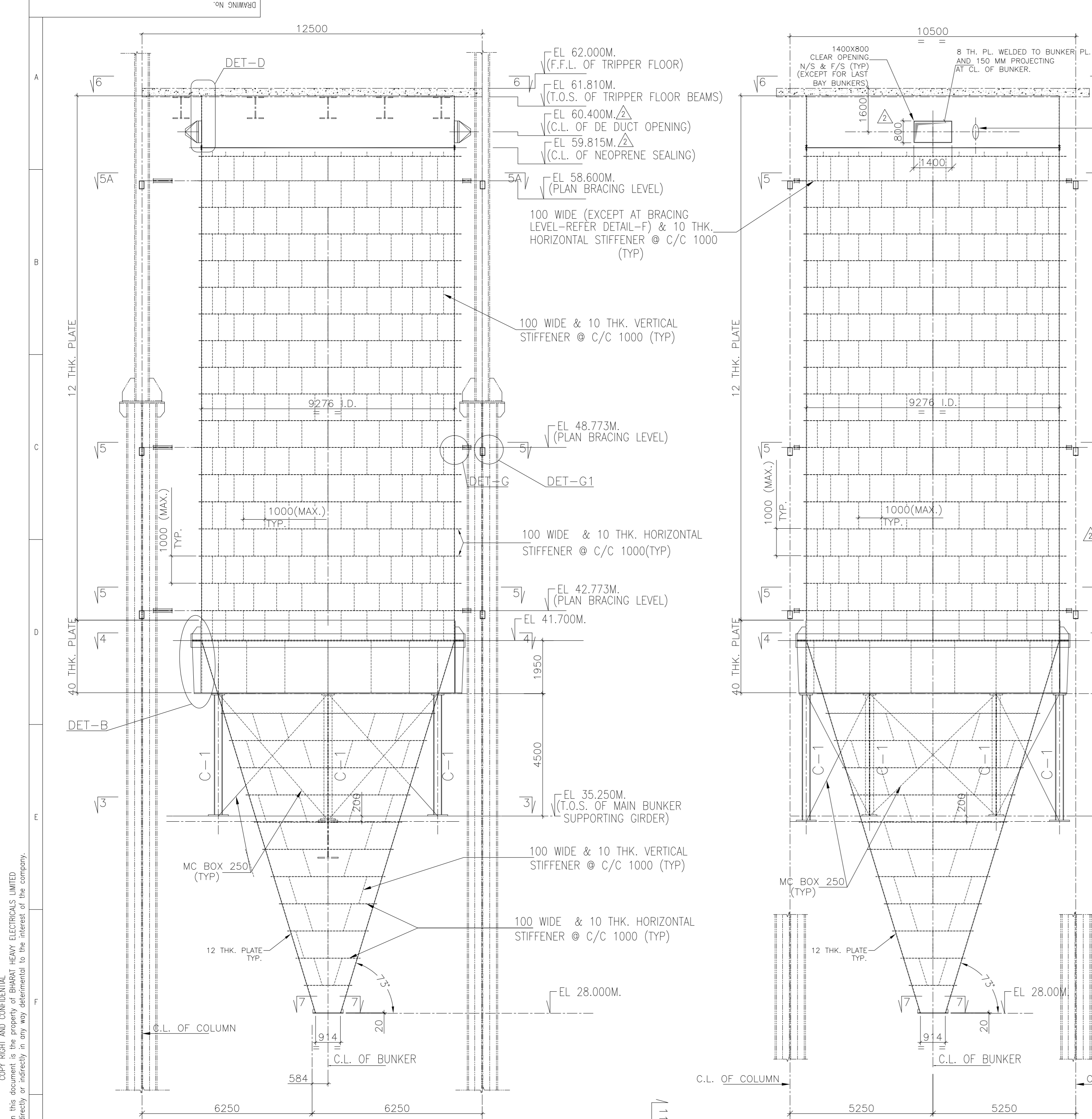
1.0 As above.

पावर सेक्टर पूर्वी क्षेत्र (मुख्यालय)

POWER SECTOR EASTERN REGION, DJ-9/1, SECTOR-II, SALT LAKE CITY, KOLKATA - 700 091

फैक्स/Fax : (033) 23211960

फोन/Phone : बोर्ड/EPABX : 23211691, 23211798, 23211796



NOTES

- THIS DRAWING SHALL BE READ IN CONJUNCTION WITH CONTRACT TERMS AND CONDITIONS, SPECIFICATIONS AND SCHEDULE OF ITEMS.
- ALL ELEVATIONS ARE REFERRED TO THE FINISHED FLOOR LEVEL OF POWERHOUSE 0.0M FLOOR WHICH CORRESPONDS TO RL+200.00M ABOVE MAIN SEA LEVEL.
- ALL DIMENSIONS ARE IN MILLIMETER AND ALL LEVELS ARE IN METER U.M.D.
- FOR CORRESPONDING FILE CAPS.
- PROVIDER SHALL BE TAKEN IN WELDING OF BUNKER PLATES, HORIZONTAL AND VERTICAL JOINTS IN BUNKER & HOPPER SHALL BE SUBJECT TO NOT AS PER FOR.
- PLATE SHALL BE CUT TO MAX WIDTH TO REDUCE NUMBER OF JOINTS.
- BEFORE COMMENCING REGULAR FABRICATION OF THE BUNKER TRAIL ASSEMBLY OF THE BUNKER INCLUDING HOPPER SHALL BE MADE AT LEAST FOR ONE BUNKER.
- ALL END CONNECTIONS FOR BRCS SHALL BE DESIGNED FOR FULL TENSILE STRENGTH OF MEMBERS.
- STAINLESS STEEL LINER IN THE INNER FACES OF COAL BUNKERS SHALL BE SAME THICKNESS OF GRADE 304M AND SURFACE FINISH SHALL BE GRADE 2000D ROLLED/ANNEALED & PICKLED. HOPPER LINER SHALL BE PROVIDED IN THE WELDED, VERTICAL PORTION OF HOPPERS AND MOUTH OF THE HOPPERS, WITHOUT ALLOWING ANY PROJECTIONS IN COAL FLOW PATH. LINER IN THE VERTICAL PORTION SHALL BE UP TO NEOPRENE SEAL LEVEL AS PER DETAIL-D.
- PLUG WELD IN SST LINER SHALL BE GROUND SMOOTH TO MATCH WITH PLATE PROFILE.
- THE ELECTRODES USED FOR WELDING SHALL BE AUSTENITIC STAINLESS STEEL ELECTRODE E308L FOR WELD JOINTS BET SST PLATES & E309L FOR WELD JOINTS BET SST PL & HD PLATE.
- ALL BUTT WELDS FOR BUNKER SUPPORTING GIRDERS (LONGITUDINALLY/TRANSVERSE) SHALL BE RADIOGRAPHIC SUBJECTED 10100%.
- ALL SITE WELD WELDS OF BUNKER AND BUNKER SUPPORTING GIRDERS/BEAMS SHALL BE SUBJECT TO NON DESTRUCTIVE TESTED.
- QUALITY CONTROL AND SUPERVISION FOR ABOVE MENTIONED TESTS SHALL BE CARRIED OUT BY AN INDEPENDENT INSPECTION AGENCY.
- FOR OTHER NOTES AND STD. DETAILS REF. DRG. PE-00-391-612-C001

REFERENCE DRAWINGS

- GENERAL NOTES & STANDARD DETAILS FOR STRUCTURAL STEEL WORKS PE-00-391-612-C001
- ARRANGEMENT OF BUNKER BAY_HORI. BEAM : _FRAME 100 & 116 0-34-400-00300
- ARRANGEMENT OF BUNKER BAY_HORI. BEAM : _FRAME 110 & 116 0-35-513-15504
- ARRANGEMENT OF BUNKER BAY_HORI. BEAM : _FRAME 101 0-35-513-15500
- CAPACITY CALCULATION OF BUNKER : PE-00-391-161-A001
- MECHANICAL FLOOR PLAN AT RL+21.262M LVL. : FOR TRIPPER CONVEYOR OVER COAL BUNKERS GD-208-ME-CHP-XD-4518
- FOUNDATION PLAN WITH LOAD DATA AT RL+28.00M LVL. : FOR TRIPPER CONVEYOR OVER COAL BUNKERS GD-208-ME-CHP-XD-4519

PROJECT: OPGC DOCUMENT NO. BTG-XXX-DWG-S-0036 [REV. 1]
IB THERMAL POWER STATION, BANHARPALI
2 x 660 MW UNITS 3&4

OWNER: ODISHA POWER GENERATION CORPORATION LIMITED

OWNER'S CONSULTANT: DEVELOPMENT CONSULTANTS PVT. LTD.
 CONSULTING ENGINEERS
 KOLKATA - MUMBAI - CHENNAI - NEW DELHI

DESIGNED BY: BHARAT HEAVY ELECTRICALS LTD
CHECKED BY: POWER SECTOR
PROJECT ENGINEERING MANAGEMENT
 NOIDA

JOB NO.: 391
CONTRACT:
DISTRIBUTION:

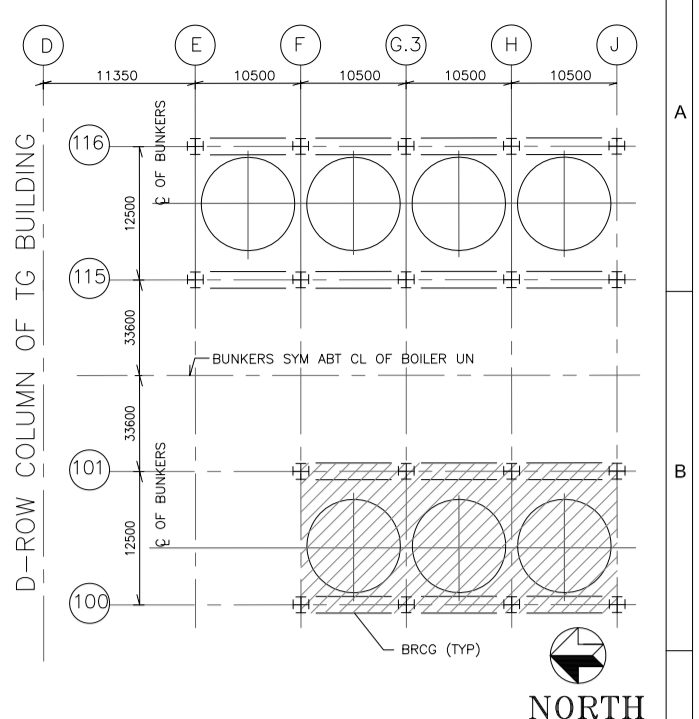
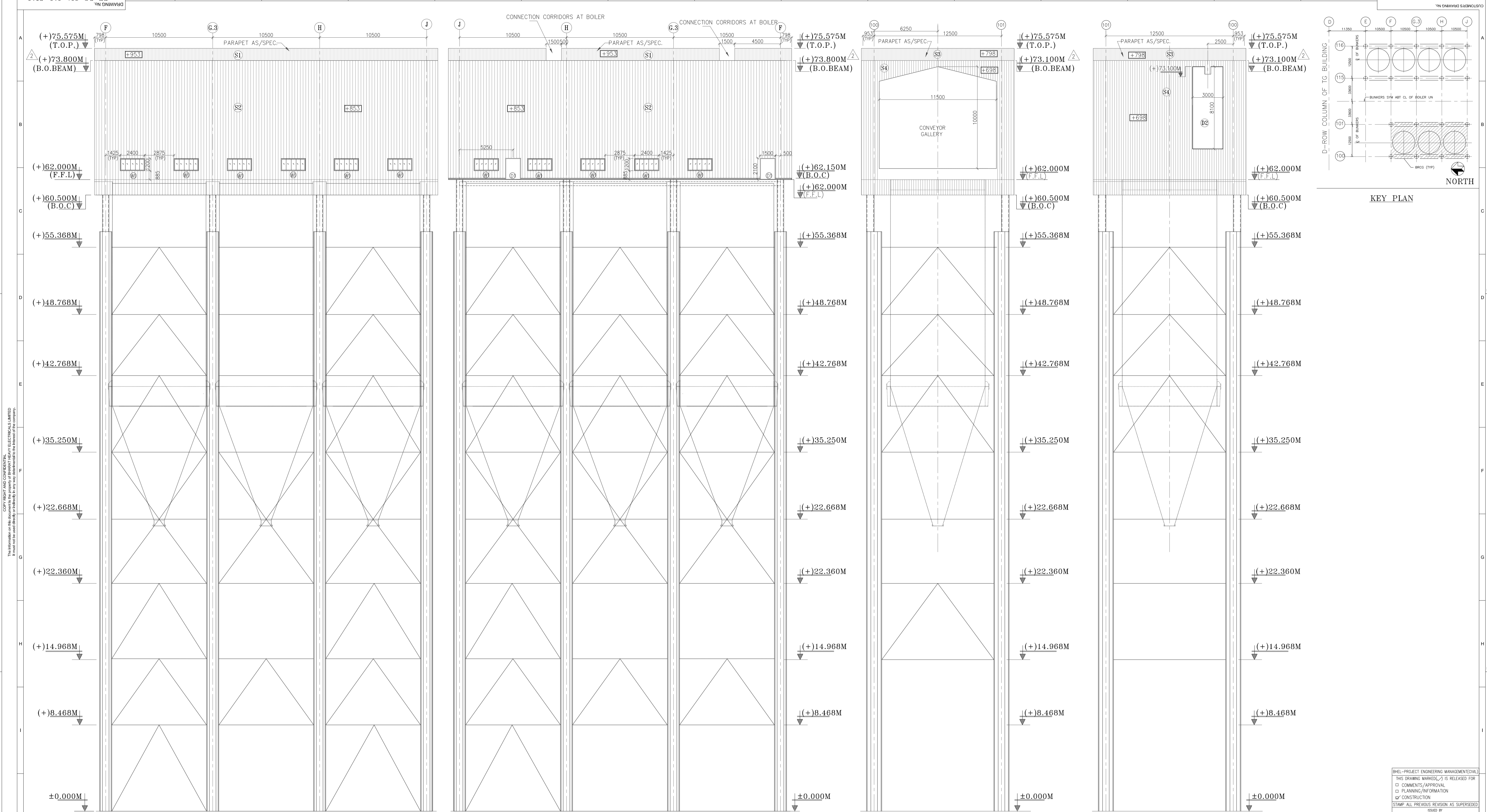
DATE: 17.02.2016
REVISED TO ANALYZE DE DUCT OPENING SIZE AND LOCATION
REVISION MARKED AS A

DATE: 22.02.2016
REVISED TO ANALYZE DE DUCT OPENING SIZE AND LOCATION
REVISION MARKED AS B

DATE: 20.12.2014
REVISED TO INCORPORATE OPGC/PCP COMMENTS
REVISION MARKED AS C

TITLE: MILL AND BUNKER BUILDING BUNKERS AND SUPPORTING DETAILS

SCALE: 1:200
DRAWING NO.: PE-DG-391-616-C015
SHEET: 1 of 1



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SCHEDULE OF OPENING

TYPE	SIZE OF OPNG	DESCRIPTION
	WIDTH HEIGHT	
D1	1500 2100	HOLLOW METAL STEEL FLUSH DOOR AS/SPEC.
D2	3000 8100	HOLLOW METAL STEEL FLUSH DOOR AS/SPEC.(DOUBLE SHUTTER)
W1	2400 1200	ALUMINUM GLAZED WINDOW WITH 6MM THK CLEAR W/RED GLASS PARTLY OPENABLE AND PARTLY FIX

INTERNAL FINISHING SCHEDULE

AREA	FLOOR/SKIRTING
TRIPPER FLOOR	40 MM THK. HEAVY DUTY CEMENT CONCRETE FLOOR WITH METALLIC HARDENER AND MATCHING SKIRTING

LEGENDS

S.NO	LEGEND	DESCRIPTION
1.	T.O.P	TOP OF PARAPET
2.	TYP	TYPICAL
3.	THK	THICK
4.	B.O.C	BOTTOM OF CLADDING
5.	LVL	LEVEL
6.	[Symbol]	9002-GUL GREY
7.	[Symbol]	5012-SKY BLUE
8.	FFL	FINISHED FLOOR LEVEL
9.	TOC	TOP OF CONCRETE
10.	[Symbol]	KERB

SURFACE	DISTANCE OF OUTER FACE OF CLADDING FROM FACE OF COLUMN	FINISHES
S1	953 (RAL 5012 SKY BLUE) (CLADDING)	SINGLE SHEET CLADDING
S2	853 (RAL 9002 GUL GRAY) (CLADDING)	SINGLE SHEET CLADDING
S3	798 (RAL 5012 SKY BLUE) (CLADDING)	SINGLE SHEET CLADDING
S4	698 (RAL 9002 GUL GRAY) (CLADDING)	SINGLE SHEET CLADDING

- NOTES:**
- ALL DIMENSIONS ARE IN MM. UNLESS OTHERWISE SPECIFIED.
 - ALL ELEVATIONS INDICATED IN THE DRG. ARE W.R.T. POWER HOUSE GROUND FLOOR ELEVATION AS 0.00M WHICH CORRESPONDS TO RL(+200.00M ABOVE MAIN SEA LEVEL).
 - MISCELLANEOUS ARCHITECTURAL DETAILS - PE-DG-391-611-C001

- REFERENCE DRAWINGS:-**
- MILL & BUNKER BUILDING _ CLADDING FRAMING DETAILS ----- PE-DG-391-616-C013
 - ARRANGEMENT OF BUNKER BAY_HORI. BEAM _FRAME 100 & 116----- 0-34-400-00360
 - ARRANGEMENT OF BUNKER BAY_HORI. BEAM _FRAME 115 ----- 0-35-513-15504
 - ARRANGEMENT OF BUNKER BAY_HORI. BEAM _FRAME 101 ----- 0-35-513-15500

OPPC DOCUMENT NO. BTG-XXX-DWG-S-00-01 REV. 0

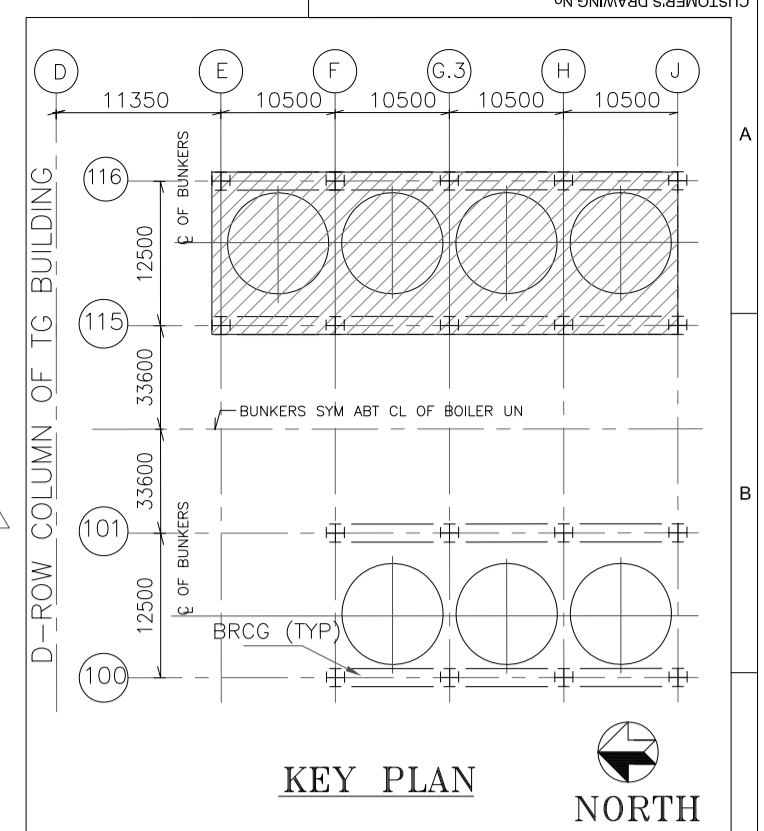
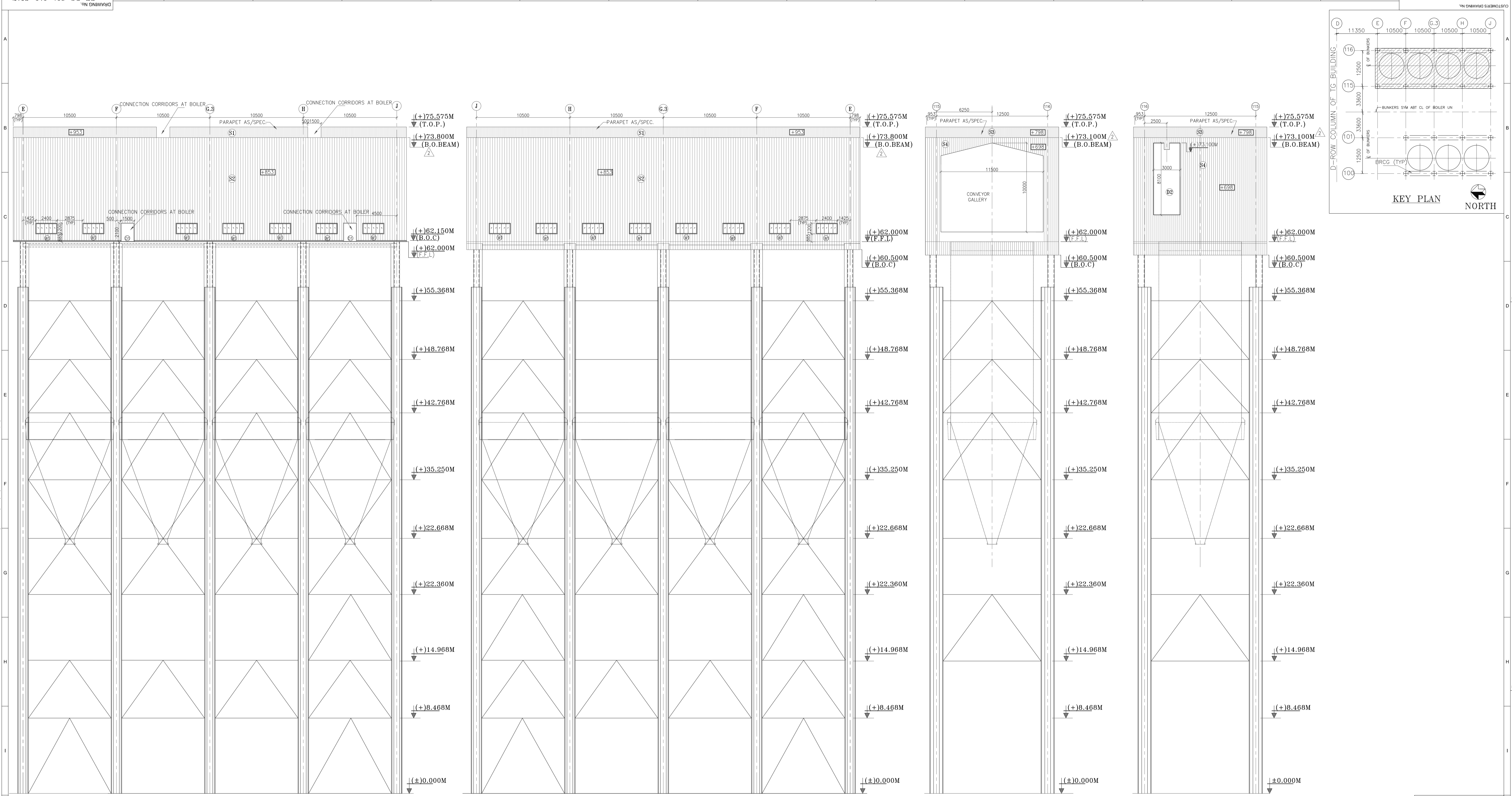
PROJECT: IB THERMAL POWER STATION, BANHARPALI 2x660MW UNITS 3&4
 CUSTOMER: ORISSA POWER GENERATION CORPORATION LIMITED

DEVELOPMENT CONSULTANTS PVT. LTD.
 CONSULTING ENGINEERS
 KOLKATA · MUMBAI · CHENNAI · NEW DELHI

BHARAT HEAVY ELECTRICALS LTD
 POWER SECTOR
 PROJECT ENGINEERING MANAGEMENT
 NOIDA

REV.	DATE	ALTD	CHD	APPD	DEPT	NAME	SIGN	DATE
1.	23.11.2015	RB	TK	AD	DESIGN	RB		08.04.2015
2.	23.11.2015	RB	TK	AD	CHKD	AD		08.04.2015
					APPROV	RB		08.04.2015

TITLE: MILL & BUNKER BUILDING ARCHITECTURAL ELEVATION ALONG GRID 100, 101, F & J
 DEPT. SCALE: SHEET
 DRAWING NO. PE-DG-391-616-C016
 SHEET REV. 2



ELEVATION ALONG - 115

ELEVATION ALONG - 116

ELEVATION ALONG GRID-J

ELEVATION ALONG GRID-E

LEGENDS

S.NO	LEGEND	DESCRIPTION
1.	T.O.P	TOP OF PARAPET
2.	TYP	TYPICAL
3.	THK	THICK
4.	B.O.C	BOTTOM OF CLADDING
5.	LVL	LEVEL
6.		9002-GUL GREY
7.		5012-SKY BLUE
8.	FFL	FINISHED FLOOR LEVEL
9.	TOC	TOP OF CONCRETE
10.		KERB

SURFACE	DISTANCE OF OUTER FACE OF CLADDING FROM FACE OF COLUMN	FINISHES
S1	953 (RAL 5012 SKY BLUE) (CLADDING)	SINGLE SHEET CLADDING
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S3	798 (RAL 5012 SKY BLUE) (CLADDING)	SINGLE SHEET CLADDING
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SCHEDULE OF OPENING

TYPE	SIZE OF OPNG WIDTH	HEIGHT	DESCRIPTION
D1	1500	2100	HOLLOW METAL STEEL FLUSH DOOR AS/SPEC.
D2	3000	8100	HOLLOW METAL STEEL FLUSH DOOR AS/SPEC.(DOUBLE SHUTTER)
W1	2400	1200	ALUMINUM GLAZED WINDOW WITH 6MM THK CLEAR WIRED GLASS PARTLY OPENABLE AND PARTLY FIX

INTERNAL FINISHING SCHEDULE

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TRIPPER FLOOR	40 MM THK. HEAVY DUTY CEMENT FLOOR WITH METALLIC HARDENER AND MATCHING SKIRTING

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 - MISCELLANEOUS ARCHITECTURAL DETAILS - PE-DG-391-611-C001

- REFERENCE DRAWINGS:-**
- MILL & BUNKER BUILDING _ CLADDING FRAMING DETAILS ----- PE-DG-391-616-C013
 - ARRANGEMENT OF BUNKER BAY_HORI. BEAM_FRAME 100 & 116----- 0-34-400-00360
 - ARRANGEMENT OF BUNKER BAY_HORI. BEAM_FRAME 115 ----- 0-35-513-15504
 - ARRANGEMENT OF BUNKER BAY_HORI. BEAM_FRAME 101 ----- 0-35-513-15500

ISHEL-PROJECT ENGINEERING MANAGEMENT (PVT.) LTD.
THIS DRAWING MARKED AS IS RELEASED FOR
COMMENTS/ APPROVAL
PLANNING/ INFORMATION
CONSTRUCTION
STAMP ALL PREVIOUS REVISION AS SUPERSEDED
ISSUED BY
NAME: ANMESH DAS
SIGNATURE: [Signature]
DATE: 12.01.2016

OPGC DOCUMENT NO. BTG-XXX-DWG-S-00- REV. 0

PROJECT: IB THERMAL POWER STATION, BANHARPALI
2x660MW UNITS 3&4

CUSTOMER: ORISSA POWER GENERATION CORPORATION LIMITED

DEVELOPMENT CONSULTANTS PVT. LTD.
CONSULTING ENGINEERS
KOLKATA MUMBAI CHENNAI NEW DELHI

BHARAT HEAVY ELECTRICALS LTD
POWER SECTOR
PROJECT ENGINEERING MANAGEMENT
NOIDA

JOB NO. 391
STATUS CONTRACT
DISTRIBUTION

REVISIONS TO INCORPORATE
OPGC/CPCL COMMENTS:
REVISION MARKED AS

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BHARAT HEAVY ELECTRICALS LIMITED it must not be used directly or
indirectly in any way detrimental to the interest of the company.

TITLE: MILL & BUNKER BUILDING
ARCHITECTURAL ELEVATION ALONG GRID 115, 116, E & J

DEPT. SCALE SHEET
SIGN. [Signature]

DRAWING NO. PE-DG-391-616-C017
SHEET REV. 2

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FORMAT FOR NO DEVIATION CERTIFICATE
(To be submitted in the bidder's letter head)

BHARAT HEAVY ELECTRICALS LIMITED,
Power Sector - Eastern Region,
Plot no 9/1, DJ Block, Sector – II, Salt Lake City,
Kolkata – 700 091

Sub	No Deviation Certificate.	
Job	Hiring of 1 no. mid range heavy lift crawler crane with lattice boom & jib for 2x660MW units at IB TPS, Banharpalli, Odisha.	
Ref	1.0	Tender no PSER:SCT:BNP-F1789:16
	2.0	BHEL's NIT, vide reference no PSER:SCT:BNP-F1789:5344 Date: 09-12-2016
	3.0	BHEL's TCN-01 vide ref: PSER:SCT:BNP-F1789:TCN-01 dated 13-12-2016
	4.0	BHEL's TCN-02 vide ref: PSER:SCT:BNP-F1789:TCN-02 dated 14-12-2016
	5.0	All other pertinent issues till date.

Dear Sirs,

With reference to above, this is to confirm that as per tender conditions, we have visited site before submission of our offer and noted the job content & site conditions etc. We also confirm that we have not changed/ modified the tender documents as appeared in the website/ issued by you and in case of such observance at any stage, it shall be treated as null and void.

We hereby confirm that we have not taken any deviation from tender clauses together with other references as enumerated in the above referred NIT. We hereby confirm our unqualified acceptance to all terms & conditions, unqualified compliance to technical specification, integrity pact (if applicable) and acceptance to reverse auctioning process.

In the event of observance of any deviation in any part of our offer at a later date whether implicit or explicit, the deviations shall stand null & void.

We confirm to have submitted offer in accordance with tender instructions and as per aforesaid references.

Thanking you,

Yours faithfully,

(Signature, date & seal of authorized
representative of the bidder)

पावर सेक्टर पूर्वी क्षेत्र (मुख्यालय)

POWER SECTOR EASTERN REGION DJ-9/1, SECTOR-II, SALT LAKE CITY, KOLKATA - 700 091

फैक्स/Fax : (033) 23211960

फोन/Phone : बोर्ड/EPABX : 23211691, 23211798, 23211796