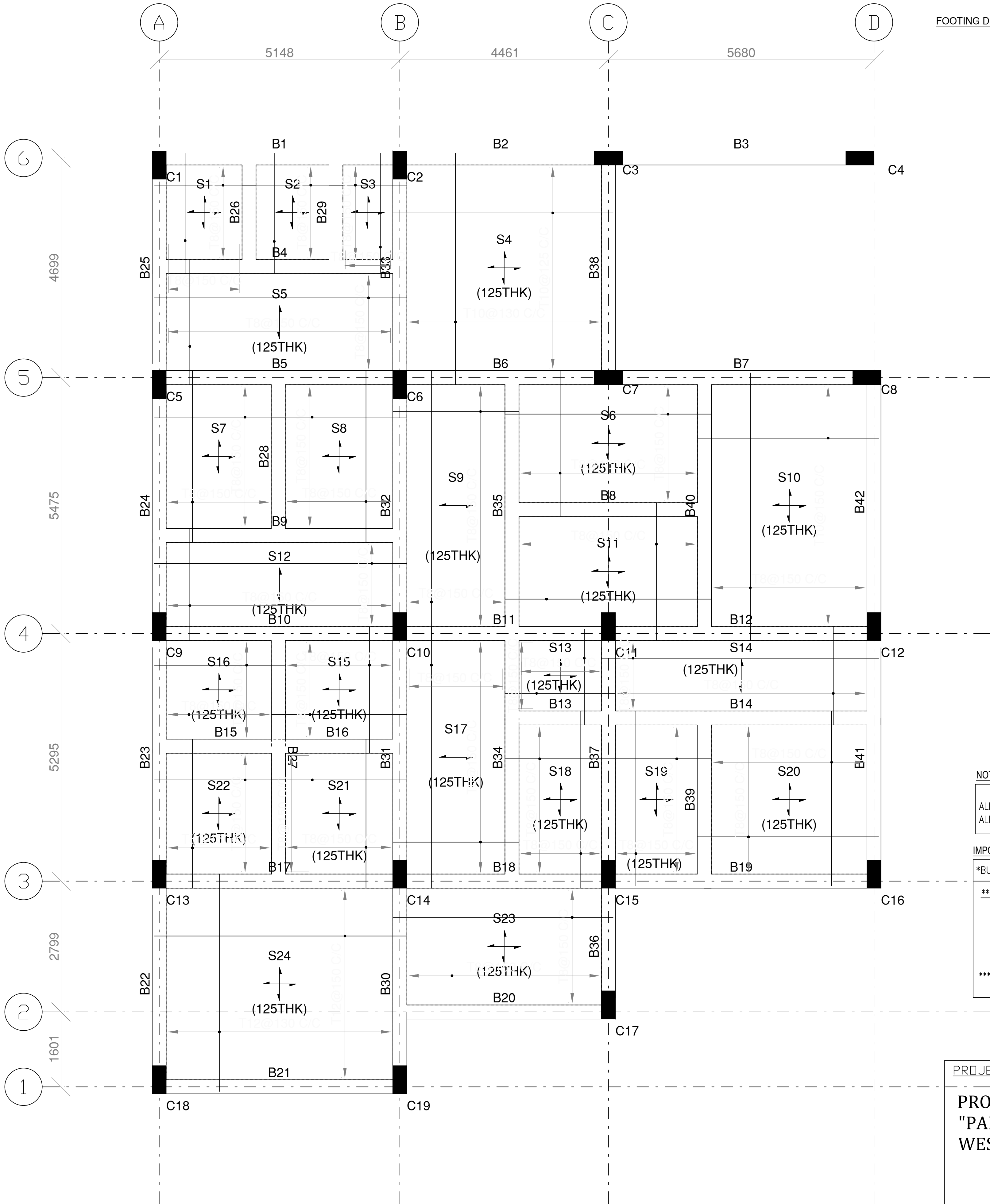


BEAM SCHEDULE (M25 : Fe500 (MAIN) : Fe415 (SHEAR)) (LEVEL: 3.15 m-1ST FLOOR)

BEAM NUMBERS	SIZE		BOTTOM REINFORCEMENT			TOP REINFORCEMENT			SHEAR STIRRUPS			SFR
	B	D	LEFT	MID SPAN	RIGHT	LEFT	MID SPAN	RIGHT	LEFT	MID SPAN	RIGHT	
B1	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20	10-2L-T8@190 C/C	8-2L-T8@190 C/C	10-2L-T8@185 C/C	1-T12EF
B2	300	550	3-T20	3-T20	3-T20	3-T20	3-T20	3-T20 + 2-T20	9-2L-T8@190 C/C	7-2L-T8@190 C/C	9-2L-T8@190 C/C	1-T12EF
B3	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	10-2L-T8@190 C/C	8-2L-T8@190 C/C	10-2L-T8@190 C/C	1-T12EF
B4	300	550	3-T20	3-T20	3-T20	3-T20	2-T20	3-T20	11-2L-T8@175 C/C	8-2L-T8@190 C/C	13-2L-T8@140 C/C	1-T12EF
B5	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	14-2L-T8@125 C/C	10-2L-T8@160 C/C	12-2L-T8@150 C/C	1-T12EF
B6	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	14-2L-T8@105 C/C	15-2L-T8@85 C/C	17-2L-T8@85 C/C	1-T12EF
B7	300	550	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 3-T20	18-2L-T10@100 C/C	14-2L-T10@115 C/C	10-2L-T10@190 C/C	1-T12EF
B8	300	550	3-T20	3-T20	3-T20	3-T20	2-T20	3-T20	8-2L-T8@190 C/C	4-2L-T8@300 C/C	6-2L-T8@300 C/C	1-T12EF
B9	300	550	3-T20	3-T20	3-T20	3-T20	2-T20	3-T20	10-2L-T8@190 C/C	8-2L-T8@190 C/C	10-2L-T8@190 C/C	1-T12EF
B10	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	14-2L-T8@130 C/C	9-2L-T8@165 C/C	12-2L-T8@155 C/C	1-T12EF
B11	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 3-T20	10-2L-T8@170 C/C	9-2L-T8@150 C/C	12-2L-T8@135 C/C	1-T12EF
B12	300	550	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 3-T20	3-T20	3-T20 + 2-T20	20-2L-T10@95 C/C	11-2L-T10@150 C/C	11-2L-T10@190 C/C	1-T12EF
B13	300	550	3-T20	3-T20	3-T20	3-T20	3-T20	3-T20	3-2L-T8@300 C/C	1-2L-T8@300 C/C	3-2L-T8@300 C/C	-
B14	300	550	3-T20	3-T20	3-T20	3-T20	2-T20	3-T20	12-2L-T8@165 C/C	9-2L-T8@190 C/C	11-2L-T8@190 C/C	1-T12EF
B15	300	550	3-T20	3-T20	3-T20	3-T20	3-T20	2-T20	5-2L-T8@190 C/C	2-2L-T8@300 C/C	4-2L-T8@300 C/C	1-T12EF
B16	300	550	3-T20	3-T20	3-T20	2-T20	2-T20	3-T20	4-2L-T8@300 C/C	2-2L-T8@300 C/C	6-2L-T8@190 C/C	1-T12EF
B17	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	11-2L-T8@165 C/C	8-2L-T8@190 C/C	10-2L-T8@190 C/C	1-T12EF
B18	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	9-2L-T8@190 C/C	7-2L-T8@190 C/C	9-2L-T8@190 C/C	1-T12EF
B19	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	15-2L-T8@135 C/C	9-2L-T8@180 C/C	11-2L-T8@190 C/C	1-T12EF
B20	300	550	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20	3-T20	9-2L-T8@190 C/C	7-2L-T8@190 C/C	9-2L-T8@190 C/C	1-T12EF
B21	300	550	3-T20 + 2-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	10-2L-T8@190 C/C	8-2L-T8@190 C/C	10-2L-T8@190 C/C	1-T12EF
B22	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	8-2L-T8@190 C/C	6-2L-T8@190 C/C	10-2L-T8@145 C/C	1-T12EF
B23	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 3-T20	10-2L-T8@190 C/C	8-2L-T8@190 C/C	12-2L-T8@150 C/C	1-T12EF
B24	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	14-2L-T8@130 C/C	10-2L-T8@160 C/C	10-2L-T8@185 C/C	1-T12EF
B25	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	10-2L-T8@160 C/C	7-2L-T8@190 C/C	11-2L-T8@145 C/C	1-T12EF
B26	300	550	3-T20	3-T20	3-T20	3-T20	3-T20	3-T20	4-2L-T8@300 C/C	2-2L-T8@300 C/C	4-2L-T8@300 C/C	-
B27	300	550	3-T20	3-T20	3-T20	3-T20	2-T20	3-T20	7-2L-T8@300 C/C	5-2L-T8@300 C/C	7-2L-T8@300 C/C	1-T12EF
B28	300	550	3-T20	3-T20	3-T20	2-T20	3-T20	3-T20	5-2L-T8@300 C/C	3-2L-T8@300 C/C	5-2L-T8@300 C/C	-
B29	300	550	3-T20	3-T20	3-T20	2-T20	3-T20	3-T20	4-2L-T8@300 C/C	2-2L-T8@300 C/C	5-2L-T8@190 C/C	1-T12EF
B30	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	16-2L-T8@90 C/C	13-2L-T8@95 C/C	8-2L-T8@190 C/C	1-T12EF
B31	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 3-T20	10-2L-T8@190 C/C	8-2L-T8@190 C/C	11-2L-T8@160 C/C	1-T12EF
B32	300	550	3-T20	3-T20	3-T20	3-T20 + 3-T20	3-T20	3-T20 + 2-T20	17-2L-T8@105 C/C	13-2L-T8@120 C/C	10-2L-T8@185 C/C	1-T12EF
B33	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	12-2L-T8@130 C/C	8-2L-T8@155 C/C	12-2L-T8@125 C/C	1-T12EF
B34	300	550	3-T20	3-T20	3-T20	3-T20	3-T20	3-T20	10-2L-T8@190 C/C	5-2L-T8@300 C/C	7-2L-T8@300 C/C	1-T12EF
B35	300	550	3-T20	3-T20	3-T20	3-T20	2-T20	3-T20	15-2L-T8@125 C/C	9-2L-T8@175 C/C	13-2L-T8@155 C/C	1-T12EF
B36	300	550	3-T20	3-T20	3-T20	3-T20	3-T20	3-T20 + 2-T20	5-2L-T8@190 C/C	3-2L-T8@190 C/C	5-2L-T8@190 C/C	1-T12EF
B37	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 3-T20	10-2L-T8@190 C/C	12-2L-T8@130 C/C	15-2L-T8@115 C/C	1-T12EF
B38	300	550	3-T20	3-T20	3-T20	3-T20	3-T20	3-T20	9-2L-T8@190 C/C	4-2L-T8@300 C/C	6-2L-T8@300 C/C	1-T12EF
B39	300	550	3-T20	3-T20	3-T20	3-T20	2-T20	2-T20	5-2L-T8@300 C/C	3-2L-T8@300 C/C	5-2L-T8@300 C/C	-
B40	300	550	3-T20	3-T20 + 2-T20	3-T20	3-T20	2-T20	3-T20	11-2L-T8@180 C/C	9-2L-T8@190 C/C	11-2L-T8@190 C/C	1-T12EF
B41	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20 + 2-T20	10-2L-T8@180 C/C	9-2L-T8@160 C/C	14-2L-T8@125 C/C	1-T12EF
B42	300	550	3-T20	3-T20	3-T20	3-T20 + 2-T20	3-T20	3-T20	10-2L-T8@190 C/C	8-2L-T8@190 C/C	10-2L-T8@190 C/C	1-T12EF



BENTUP REINFORCEMENT LAYOUT - 3.15 M
(SCALE: H = 1:100 / V = 1:100)

SLAB SCHEDULE (M25 : FE500) (LEVEL : 3.15 M)

SLAB MARKED	SLAB THICKNESS	BOTTOM REINFORCEMENT				TOP REINFORCEMENT					REMARKS
		ALONG SHORT SPAN		ALONG LONG SPAN		OVER LONG SUPPORT		OVER SHORT SUPPORT		DISTRIBUTION	
		FULL LENGTH	CURTAILED	FULL LENGTH	CURTAILED	CONTINUOUS SUPPORT	END SUPPORT	CONTINUOUS SUPPORT	END SUPPORT		
S1, S7, S16 S20, S23	125	T8 @ 150 C/C	---	T8 @ 150 C/C	---	T8 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	---
S2, S3, S19 S22	125	T8 @ 150 C/C	---	T8 @ 150 C/C	---	T8 @ 150 C/C	---	T8 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	---
S4	125	T10 @ 125 C/C	---	T10 @ 130 C/C	---	T10 @ 150 C/C	S8 @ 150 C/C	T10 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	---
S5, S9, S12 S14, S17	125	T8 @ 150 C/C	---	T8 @ 150 C/C	---	T8 @ 150 C/C	---	---	T8 @ 150 C/C	T8 @ 150 C/C	---
S6, S8, S11 S13, S15, S18 S21	125	T8 @ 150 C/C	---	T8 @ 150 C/C	---	T8 @ 150 C/C	---	T8 @ 150 C/C	---	T8 @ 150 C/C	---
S10	125	T10 @ 150 C/C	---	T8 @ 150 C/C	---	T10 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	---
S24	125	T12 @ 130 C/C	---	T12 @ 150 C/C	---	T10 @ 150 C/C	T8 @ 150 C/C	T10 @ 150 C/C	T8 @ 150 C/C	T8 @ 150 C/C	---

ENSURE DESIGNED SBC BEFORE EXECUTION
FOOTING DESIGN DONE WITH THE SBC OF 13.6 T/SQ.M BASED ON PROVIDED SOIL REPORT

N O T E S :-

A. GENERAL:

1. ALL DIMENSIONS ARE IN MILLIMETRES AND LEVELS ARE IN METRE.
2. DRAWINGS SHALL NOT BE SCALED. ONLY WRITTEN DIMENSIONS ARE TO BE FOLLOWED.
3. ALL FOUNDATIONS SHALL BE REST ON VIRGIN SOIL OR ON THOROUGHLY COMPACTED SOIL AS PER SPECIFICATION. WHENEVER THE SOIL CONTAIN THE LOOSE SOIL POCKETS, THE SAME SHALL BE REMOVED AND REFILLED WITH THE P.C.C.

B. CONCRETE WORK:

1. ALL CONCRETE WORK SHALL BE AS PER IS:456 (LATEST REVISION)
2. ALL STRUCTURAL REINFORCED CONCRETE WORK SHALL BE WITH DESIGN MIX CONCRETE OF GRADE AS FOLLOWS UNLESS NOTED OTHERWISE.
 - a). THE GRADE CONC. FOR SUB & SUPER STRUCTURES ARE **M-25**
3. PLAIN CONCRETE WORK SHALL BE OF THE FOLLOWING GRADES OF NOMINAL MIX CONCRETE:
 - a). 1:5:10 PLUM CONCRETE FOR FILLING CONCRETE UNDER FOUNDATION (WITH MAXIMUM AGGREGATE SIZE OF 40 MM.) AND AS , PIT, TRENCHES ETC.
 - b). M-15 FOR LEAN CONCRETE BELOW FOUNDATIONS & PLINTH PROTECTION
4. THE MINIMUM CLEAR COVER FOR PROTECTION OF MAIN REINFORCEMENT SHALL BE AS FOLLOWS

STRUCTURAL ELEMENT	COVER		LOAD CONSIDERED NOTE:
	TOP	BOTTOM	
a). PLINTH BEAM	25	40	FLOOR LIVE LOAD =2.5kN/m ² (RESIDENTIAL) ACCESS ROOF LIVE LOAD =1.5kN/m ² NON ACCESS ROOF LIVE LOAD =0.75kN/m ² WATER TANK WITH WATER DEAD LOAD=3.0kN/m ²
b). COLUMNS	50	25	
c). SLAB ON GRADE	50	--	
d). FLOOR BEAM	25	25	
e). SLAB	20	20	
f). FOUNDATION	50	50	

C. REINFORCEMENTS:

1. ALL REINFORCING STEEL SHALL BE OF TESTED QUALITY.
2. (a). HIGH YIELD STRENGTH DEFORMED BAR REINFORCEMENT (YIELD STRESS $f_y = 500$ N/MM²) SHALL CONFORM TO IS:1786, (LATEST REVISION)
3. LAPS AND SPLICES OF REINFORCEMENT TO SUIT AVAILABLE LENGTH OF BARS SHALL BE MADE AS SHOWN ON THE DRAWINGS OR APPROVED BY THE ENGINEER AT SITE.
4. ALL HOOKS, BENDS, LAPS AND SPLICES SHALL BE AS PER IS:2502.
5. THE LAP/ANCHORAGE LENGTH OF BARS OF DIAMETER 'D' SHALL BE AS FOLLOWS:-

CONCRETE GRADE	DEFORMED BARS	
	TENSION	COMPRESSION
M-25	50XD	40XD

6. LAPPING OF BARS SHALL BE SUITABLY STAGGERED AND IN NO CASE MORE THAN 50% BARS SHALL BE LAPPED AT ANY SECTION.
7. LAPPING OF BARS FOR BEAM AND SLAB SHALL BE AVOIDED IN THE MAXIMUM TENSION ZONES.
8. DEVELOPMENT LENGTH (Ld) = 50xDIA OF THE BAR+10xDIA OF THE BAR.
9. ALL SPACER BARS ARE 250dia @450 C/C AND TO BE PROVIDED WHEREVER REQUIRED.

NOTE:

ALL EXTERNAL BRICK WALLS ARE 250MM THICK USED DENSITY 20kN/m³
ALL INTERNAL BRICK WALLS ARE 125MM THICK USED DENSITY 20kN/m³

IMPORTANT NOTE:

*BUILDING LOCATIONS AND LEVELS/DIMENSION TO BE FOLLOW APPROVED ARCHITECTURAL DRAWING.

**** LOADINGS:**

LL = 4.0 kN/SQM
SDL = 2.0 kN/SQM
TOTAL= 6.0 kN/SQM

IT HAS TO BE ENSURED THAT AT ANY CASE THE TOTAL CONSTRUCTION LOADS DOES NOT EXCEED THE SPECIFIED DESIGN LOADS.

*** SUFFICIENT SUPPORTS (IF REQUIRED) HAS TO BE MAINTAINED BELOW THIS FLOOR WHILE CONCRETING UPPER SLABS.

PROJECT TITLE.....

PROPOSED B+G+5 FLOOR COMMERCIAL BUILDING FOR
"PANECIA INDIA" FOR CLOUD SPACE AT -JALPAIGURI,
WEST BENGAL,

DECLARATION OF STRUCTURAL ENGINEER

Certified that the Structural Analysis & Design of B+G+5 STORIED BUILDING, HEIGHT OF 23.25M(1.2m ABOVE GL) OF "PANECIA INDIA" FOR CLOUD SPACE AT -JALPAIGURI, WEST BENGAL,

It is also certified that the said Structural Analysis has been prepared considering all possible loads including seismic loads and as per latest relevant IS Codes and the proposed structure is safe in all respect.

STRUCTURAL DESIGN & DRAWING BY



1NO GOVT.COLONY,MALDA,WB,732101
CONTACT:
1.8101788332(KALYAN ROY)
2.9851492030(SUJOY ROY)
3.9733434391(SUBOL ROY)