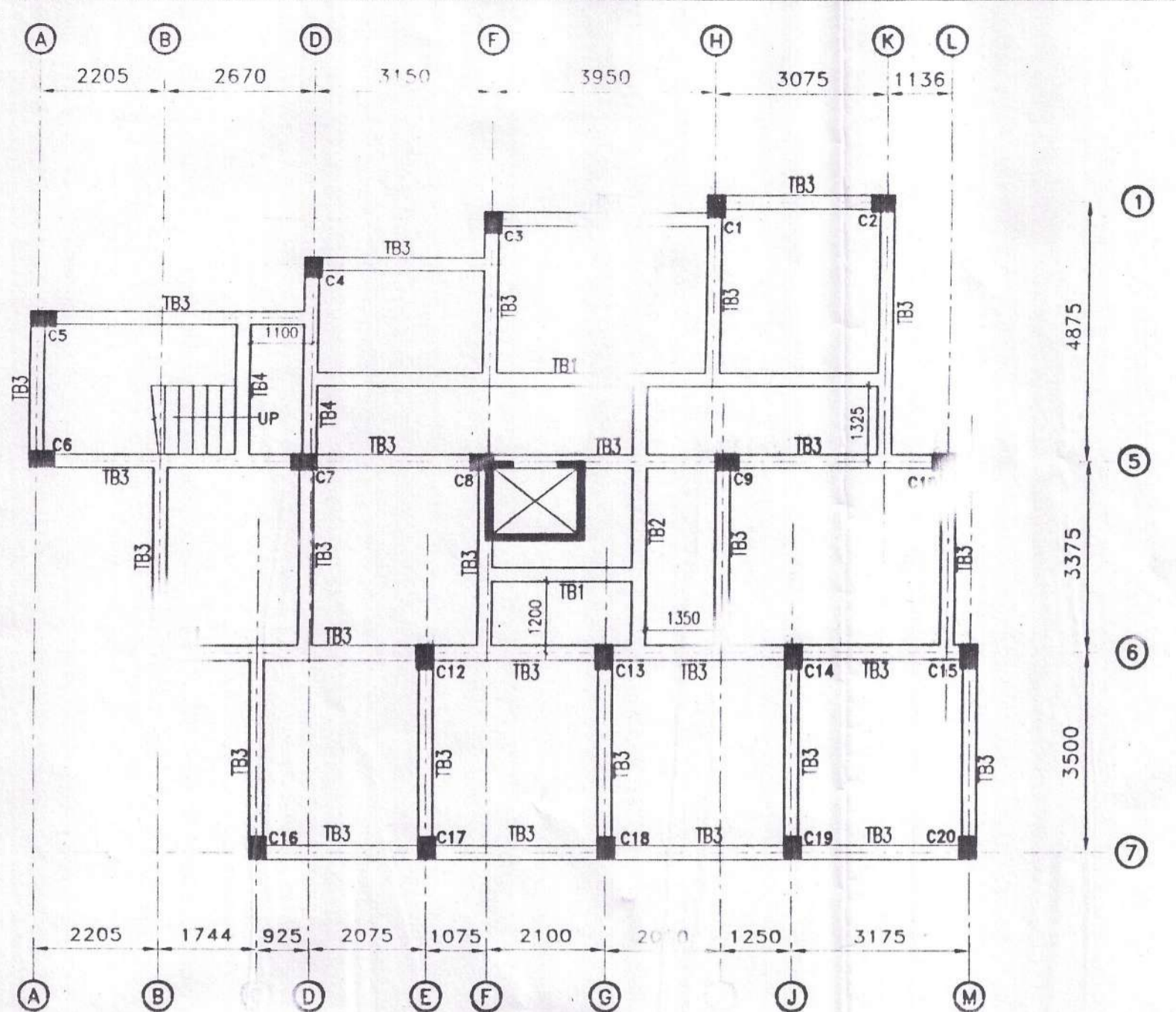


COLUMN LAYOUT PLAN AT LEVEL ±0.00m. SCALE 1:100



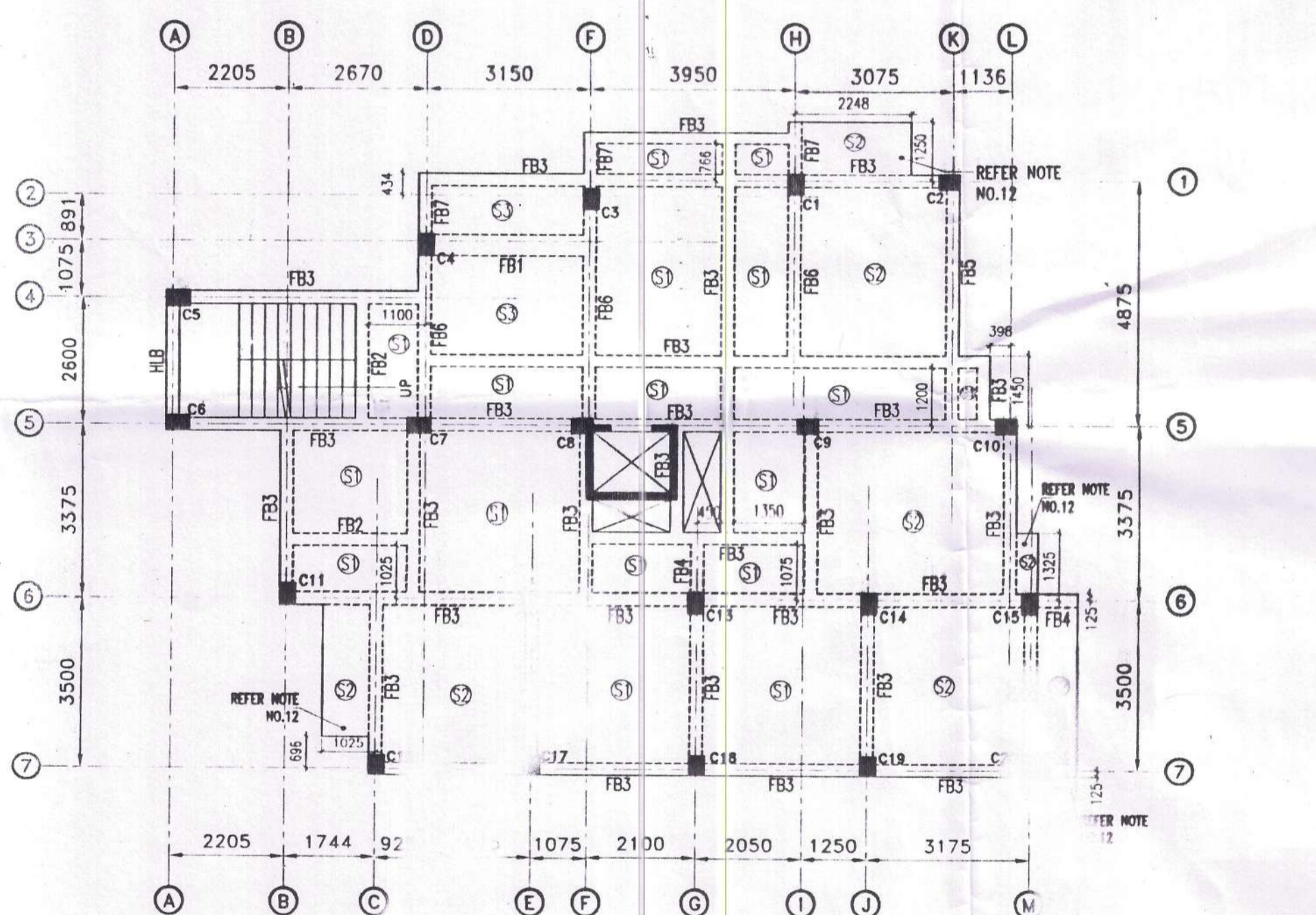
TIE BEAM LAYOUT PLAN AT LEVEL ±0.00m. SCALE 1:100

SCHEDULE OF COLUMNS				
COLUMN MARKED	NOS. OF COLUMNS	COLUMN SIZE (mm x mm)	FOUNDATION TO ROOF/ ABOVE ROOF	STIRRUP ARRANGEMENT & SPACING
C1,C2,C3,C4,C8, C9,C10,C11,C12, C13,C14,C15,C16, C17,C18,C19,C20	17	300X400	300 400 MAIN RNF.: - 4-16 ϕ +6-12 ϕ	NEAR JUNCTION (i) 8 ϕ 75 C/C (3 NOS. CLOSED LINK) REST PORTION 8 ϕ 150 C/C (3 NOS. CLOSED LINK)
C5	01	300X450	300 450 MAIN RNF.: - 4-16 ϕ +6-12 ϕ	NEAR JUNCTION (i) 8 ϕ 75 C/C (3 NOS. CLOSED LINK) REST PORTION 8 ϕ 150 C/C (3 NOS. CLOSED LINK)
C6,C7	02	300X450	300 450 MAIN RNF.: - 10-16 ϕ	NEAR JUNCTION (i) 8 ϕ 75 C/C (3 NOS. CLOSED LINK) REST PORTION 8 ϕ 150 C/C (3 NOS. CLOSED LINK)

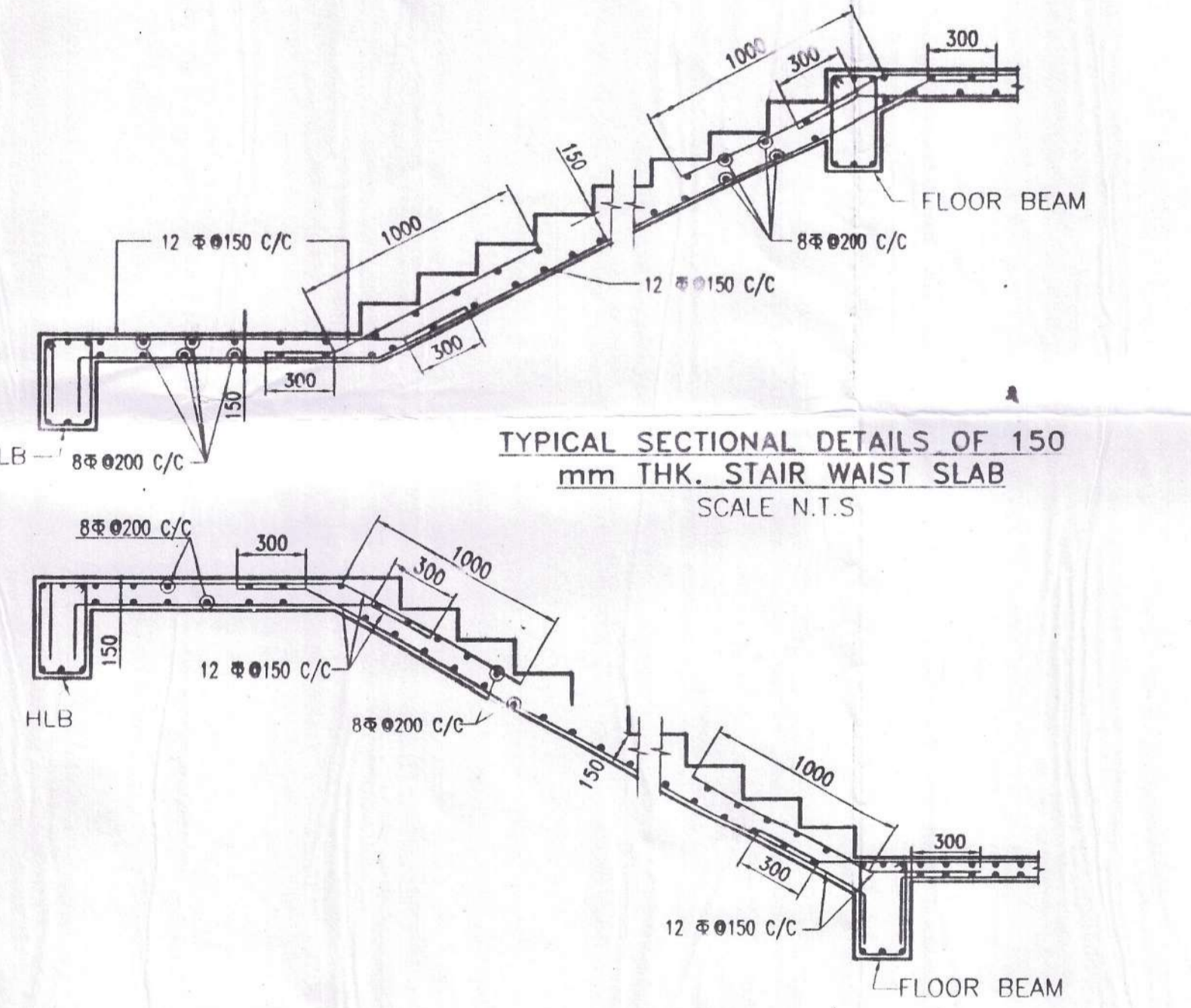
SCHEDULE OF STOOL COLUMNS			
COLUMN MARKED	NOS. OF COLUMNS	COLUMN SIZE (mm x mm)	STIRRUP ARRANGEMENT & SPACING
ST6,ST7(MUMTY ROOF TO WATER TANK), ST1(ROOF TO ST2,ST3,ST4 (ROOF TO LMR ROOF))	07	250x250	250 250 MAIN RNF.: - 4-16 ϕ 8 ϕ 150 C/C (1 NOS. CLOSED LINK)

- NOTES :
- UNLESS OTHERWISE STATED ALL CONSTRUCTION ACTIVITIES SHALL BE CARRIED OUT CONFORMING TO RELEVANT (INDIAN) STANDARD CODES OF PRACTICE.
 - ALL DIMENSIONS ARE IN MILLIMETERS & LEVELS ARE IN METER. EXCEPT OTHERWISE MENTIONED ONLY WRITTEN DIMENSIONS SHALL BE FOLLOWED. ALL LEVELS GIVEN IN STRUCTURAL DRAWINGS ARE IN ACCORDANCE WITH ARCHITECTURAL DRAWINGS AND INDICATE STRUCTURAL LEVEL ONLY (WITHOUT FINISH).
 - ANY DISCREPANCY IN THE STRUCTURAL AND ARCHITECTURAL DRAWINGS SHALL BE BROUGHT TO THE NOTICE OF STRUCTURAL CONSULTANT BEFORE EXECUTION OF WORK.
 - UNLESS OTHERWISE SPECIFIED ALL REINFORCEMENT TO BE USED SHALL BE TMT BARS OF GRADE Fe-500/500D CONFORMING TO IS-1786-2008.
 - UNLESS OTHERWISE STATED LAP LENGTH OF BARS SHALL BE EQUAL TO THE DEVELOPMENT LENGTH = 50x BAR DIA.
 - CONCRETE NOMINAL COVER TO MAIN REINFORCEMENT SHALL BE AS FOLLOWS:
 - i) COLUMNS : 40 mm
 - ii) BEAMS : 30 mm
 - iii) SLABS : 20 mm
 - iv) WAIST SLAB : 20 mm
 - GRADE OF CONCRETE FOR SUPERSTRUCTURE WILL BE M25 AS PER IS-456-2000.
 - VIBRATOR SHALL BE USED FOR PROPER COMPACTION OF CONCRETE AND CURING SHALL BE DONE PROPERLY.
 - DEVELOPMENT LENGTH 50XD FOR LAP & SPLICES SHOULD BE PROVIDED AS PER THE PROVISIONS LAID DOWN IN SP34:1987 WHEREVER A SUPPORTED MEMBER TERMINATES AT A SUPPORTING MEMBER THE BARS OF THE SUPPORTED MEMBER SHOULD HAVE AN ANCHORAGE OF 60D IN THE SUPPORTING MEMBER.
 - WHEN TWO BEAMS MEET AT A COLUMN LOCATION ALONG THE SAME LINE THE HIGHER REINFORCEMENT AT THE TOP SHOULD BE CONTINUED AT BOTH SIDE.
 - IN ALL CANTILEVER SLAB WITHOUT PERIPHERAL BEAMS THE TOP REINFORCEMENT PARALLEL TO THE CANTILEVER SPAN SHOULD BE CONTINUED UP TO ATLEAST 1.5 TIMES THE CANTILEVER SPAN WITHIN THE ADJACENT SLAB.

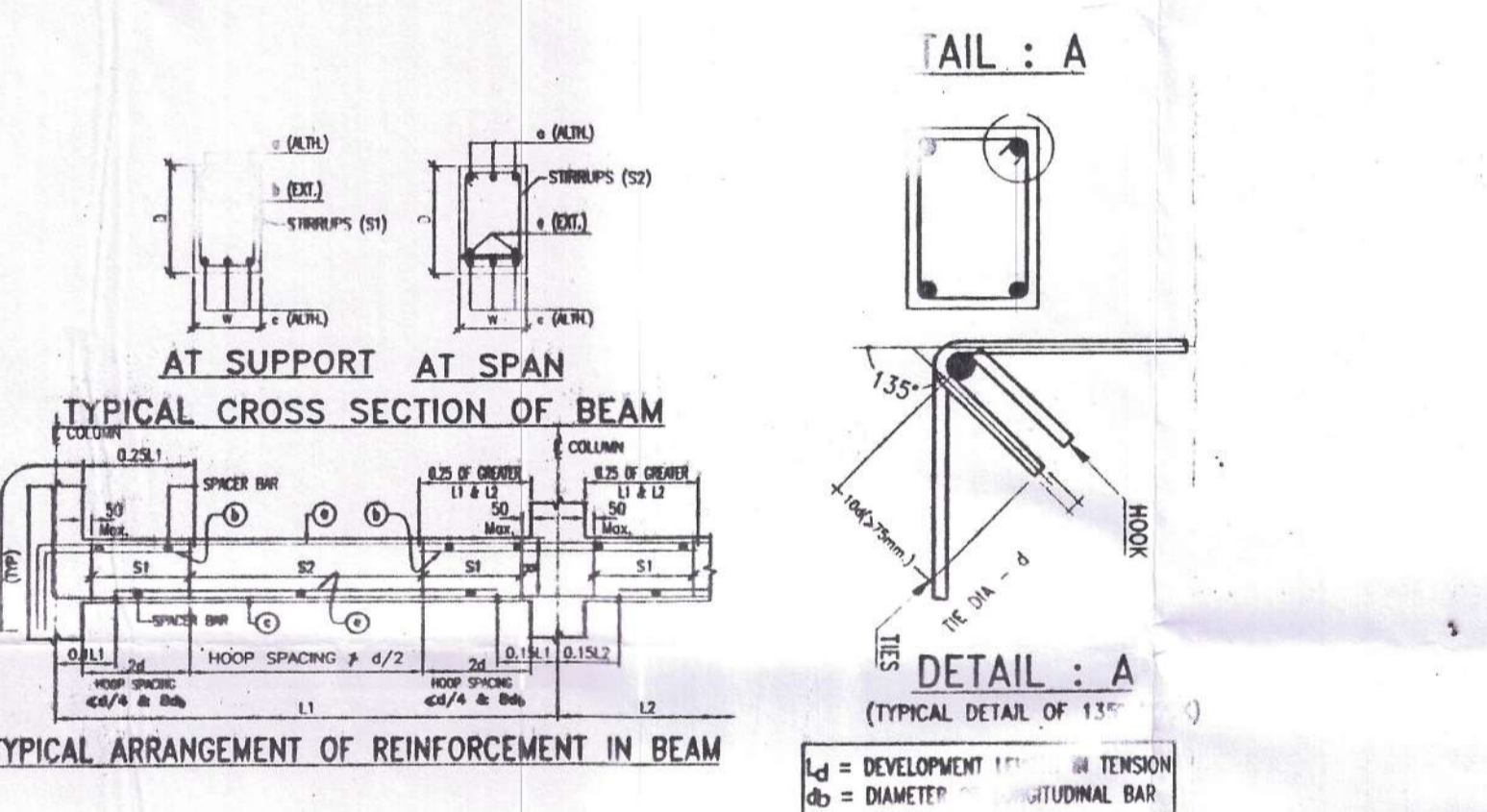
TITLE
 STRUCTURAL DRAWING OF PROPOSED G+4 STORIED RESIDENTIAL BUILDING AT MOUZA :- CHAKPACHURIA; J. L. NO.:-33 TOUZI NO. :-145, R. S. - & L.R DAG NOS. 413; L. R. KHATIAN NOS. :- 4132. UNDER PATHARGHATA GRAM PANCHAYET P. S. RAJARHAT, DIST. 24-PGS.(N)



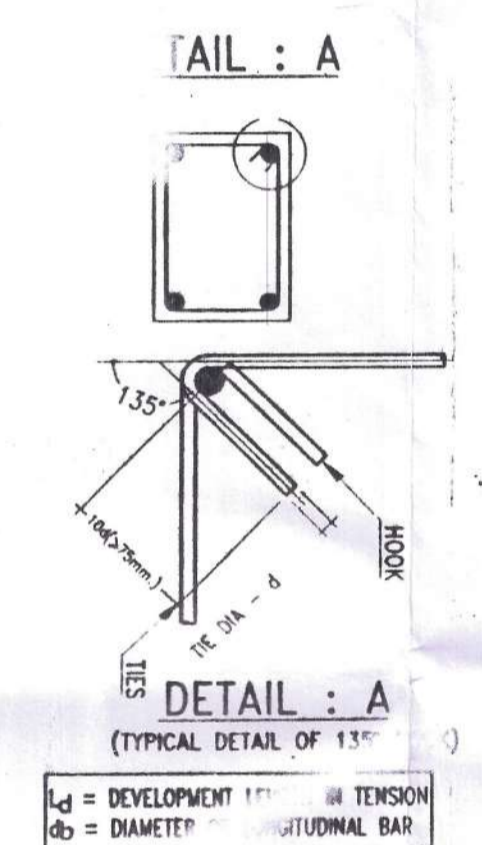
FLOOR BEAM AND SLAB LAYOUT PLAN AT LEVELS (+)3.10m, (+)9.10m, (+)12.10m. SCALE 1:100



TYPICAL SECTIONAL DETAILS OF 150 mm THK. STAIR WAIST SLAB SCALE N.T.S.



TYPICAL ARRANGEMENT OF REINFORCEMENT IN BEAM



TYPICAL DUCTILE DETAIL OF BEAM COLUMN JUNCTION

SCHEDULE OF TYPICAL FLOOR BEAMS						
BEAM MARKED	BEAM SIZE		TOP REINFORCEMENT		BOTTOM REINFORCEMENT	
	WIDTH (mm)	DEPTH (mm)	ALTHROUGH	EXTRA AT SUPPORT	ALTHROUGH	EXTRA AT SPAN
FB1	400	150	4-16 ϕ	-	4-16 ϕ	-
FB2	250	400	3-12 ϕ	-	3-12 ϕ	-
FB3	250	450	3-16 ϕ	-	2-12 ϕ +1-16 ϕ	-
FB4	250	450	3-16 ϕ	-	2-12 ϕ +1-16 ϕ	-
FB5	250	450	3-16 ϕ	2-12 ϕ	2-12 ϕ +1-16 ϕ	2-12 ϕ
FB6	250	450	3-16 ϕ	2-12 ϕ	2-12 ϕ +1-16 ϕ	-
FB7	250	450	+2-12 ϕ	-	+1-16 ϕ	-
TB4	250	400	2-12 ϕ	2-12 ϕ	2-12 ϕ +1-16 ϕ	-
HLB	250	450	3-16 ϕ	-	3-16 ϕ	-

SCHEDULE OF TIE BEAMS						
BEAM MARKED	BEAM SIZE		TOP REINFORCEMENT		BOTTOM REINFORCEMENT	
	WIDTH (mm)	DEPTH (mm)	ALTHROUGH	EXTRA AT SUPPORT	ALTHROUGH	EXTRA AT SPAN
TB1	250	350	3-12 ϕ	-	3-12 ϕ	-
TB2	250	350	3-16 ϕ	-	3-12 ϕ	-
TB3	250	400	2-12 ϕ	2-12 ϕ	2-12 ϕ +1-16 ϕ	-

- SPECIAL NOTES:-
- THIS STRUCTURAL DRAWING IS VALID IF THE CONSTRUCTION IS DONE USING AAC BLOCKS FOLLOWING PROPER DIMENSION OF EXTERNAL AND INTERNAL WALLS AS PER ARCHITECTURAL DRAWING.
 - THE STRUCTURE MUST BE CONSTRUCTED IN PRESENCE OF A COMPETENT STRUCTURAL ENGINEER OR SURVEYOR.

NATURE OF OWNER

Venil Realtors LLP
 Partner: Anurag Kumar Sinha, Rinky Chauhan

SIGNATURE OF L.B.S./ARCHITECT

SIGNATURE OF STRUCTURAL ENGINEER

S. Choudhury 29/4/22
 SUSMITA CHOUDHURY
 B.TECH (CIVIL) - WBUT
 ME (CONSTRUCTION) - JU
 ESE-1 (SUBSON) 130
 ESE-11/KMC/664
 STER/NKDA/21/00010
 CVER/NKDA/10/00175
 (M)-868751732/17003201735

SIGNATURE OF THE VETTING AUTHORITY

CHECKED & VETTED
 DR. DIPANKAR CHAKRABORTY
 STRUCTURAL ENGINEERING DIVISION
 PROFESSIONAL & PROFESSIONAL
 CIVIL ENGINEER (REGD. IN THE
 JHARKHAND UNIVERSITY
 REGD. CIVIL ENGINEER
 MEMBER (REGD) GOLD MEDALIST
 (M) 98323-2457-2688
 (M) 98323-2457-2688
 EMAIL - Prof.dipankar@gmail.com

DRAWING TITLE
 COLUMN, TIE BEAM, TYPICAL FLOOR BEAM AND SLAB LAYOUT PLAN AND REINFORCEMENT DETAILS AND BEAM AND SLAB LAYOUT PLAN
 SCALE-1:100 OR AS SHOWN
 DATE -29.04.2022
 SHEET NO. - 2 OF 3