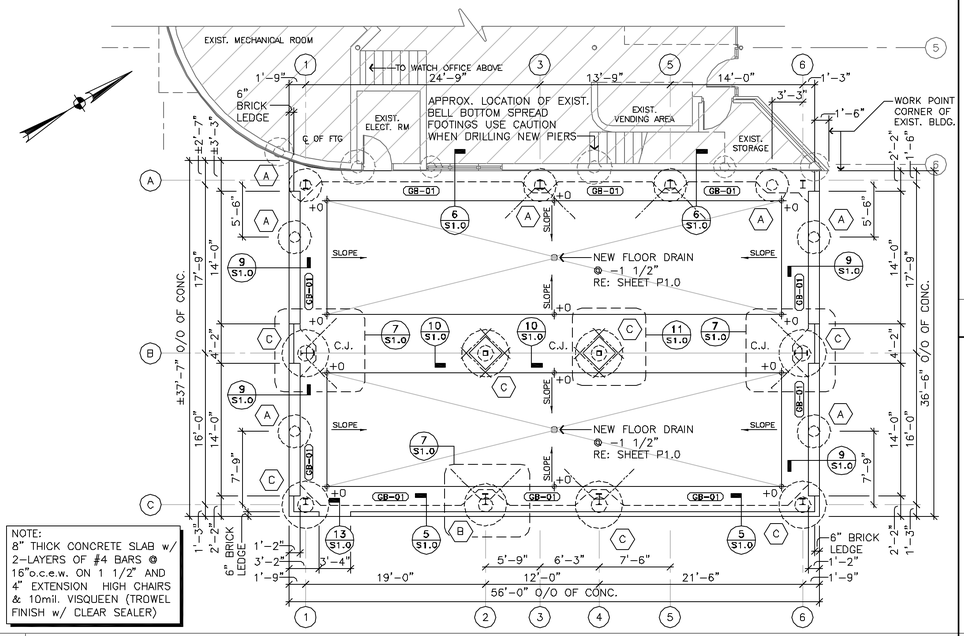


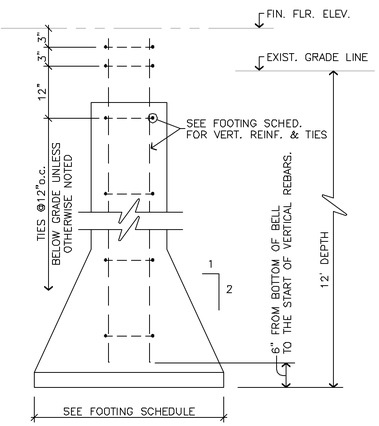
NOTE:
8" THICK CONCRETE SLAB w/ 2-LAYERS OF #4 BARS @ 16"o.c.e.w. ON 1 1/2" AND 4" EXTENSION HIGH CHAIRS & 10mil. VISQUEEN (TROWEL FINISH w/ CLEAR SEALER)

1 FOUNDATION PLAN

SCALE: 1/8" = 1'-0"

1. ALL CONCRETE SHALL HAVE SAND AND GRAVEL AGGREGATE TYPE '1' PORTLAND CEMENT AND SHALL HAVE A COMPRESSIVE STRENGTH (f'c) OF 3,000 PSI AT 28 DAYS.
2. ALL CONCRETE REINFORCING BARS SHALL CONFORM TO ASTM A615, GRADE 60, #3 BARS AND SMALLER MAY BE GRADE 40.
3. ALL CONTINUOUS REINFORCEMENT SHALL LAP AT SPLICES BY 36 TIMES ITS BAR DIAMETER OR CALCULATED IN ACCORDANCE WITH ACI-318.
4. ALL REINFORCING BARS FORMED AGAINST GROUND SHALL HAVE A MINIMUM CONCRETE COVER OF 3-INCHES AT BEAMS, 1-3/4-INCHES AT SLABS.
5. PROVIDE CORNER BARS EQUAL IN SIZE AND NUMBER TO THE ONE IT LAPS WITH. CORNER BARS TO BE 3FT. LONG (EACH LEG), IN EXTERIOR FACE OF BEAMS.
6. ADDITIONAL FILL MATERIAL WITHIN THE BUILDING AREA SHOULD BE A SILTY OR SANDY CLAY HAVING A PLASTICITY INDEX (P.I.) OF TEN(10) TO TWENTY(20) AND A LIQUID LIMIT OF 28 OR MORE. FILL MATERIALS SHOULD BE PLACED IN SIX(6) TO EIGHT(8) INCH LOOSE LIFTS AND COMPACTED TO NINETY-FIVE(95) PERCENT OF THEIR MAXIMUM DRY DENSITY AS DETERMINED BY THE STANDARD PROCTOR COMPACTION TEST (ASTM D 698). PLEASE REFER TO SOILS REPORT REQUIREMENTS IN THE SPECIFICATIONS.
7. ALL CONCRETE SHALL BE CONSOLIDATED BY VIBRATION, SPADING, OR RODDING TO WORK THE CONCRETE AROUND THE REINFORCEMENT, EMBEDDED ITEMS AND INTO CORNERS OF FORMS, ELIMINATING AIR OR STONE POCKETS WHICH MAY CAUSE HONEYCOMBS. CARE SHALL BE TAKEN TO AVOID OVER VIBRATION AND CAUSE SEGREGATION.
8. CONCRETE CONTRACTOR SHALL VERIFY FOUNDATION DRAWINGS WITH ARCHITECTURAL, PLUMBING, AND ELECTRICAL DRAWINGS FOR COORDINATION.
9. ALL MIXING, TRANSPORTING, PLACING AND CURING OF CONCRETE SHALL BE IN ACCORDANCE WITH ACI-318.
10. PROVIDE POSITIVE DRAINAGE ALLOWING STORM WATER TO SLOPE AWAY FROM THE BUILDING OR CONCRETE PAVED AREAS.
11. STRIP AND REMOVE ALL SURFACE ORGANICS, TOPSOIL AND UNSUITABLE MATERIALS FROM ALL BUILDING AND PAVING AREAS.
12. PROOF ROLL THE SUBGRADE TO DETECT ANY WET, SOFT, OR PUMPING AREAS. TREAT THESE AREAS WITH DRYING OR STABILIZING AGENTS AS NECESSARY, OR REMOVE AND REPLACE THEM WITH A SUITABLE FILL MATERIAL.
13. COMPACT THE SUBGRADE TO A MINIMUM OF NINETY-FIVE(95) PERCENT OF ITS MAXIMUM DRY DENSITY AS DETERMINED BY THE STANDARD PROCTOR COMPACTION TEST (ASTM D 698).
14. CONTRACTOR SHALL POUR CONCRETE ON PIERS AND/OR SPREAD FOOTINGS AS SOON AS POSSIBLE TO MINIMIZE THE DANGER OF LEAVING OPEN HOLES ON THE SITE.
15. FOUNDATION DESIGN BASED ON SOILS REPORT BY:
ASSOCIATED TESTING LABORATORIES, INC.
REFER TO SPECIFICATIONS, IF APPLICABLE, FOR ADDITIONAL INFORMATION.

2 FOUNDATION GENERAL NOTES



BELL FOOTING SCHEDULE					
⬡	SHAFT SIZE x BELL SIZE		MAIN REINF.	TIE REINF. SIZE	REMARKS
A	14"	x 42"	4-#5	#4	–
B	18"	x 54"	4-#6	#4	–
C	20"	x 60"	4-#6	#4	–

TIE REINF. LAYOUT

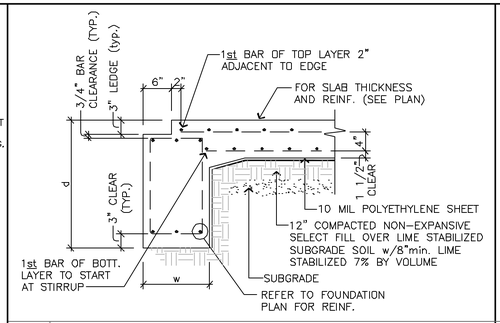
4 BARS

3 BELL FOOTING DET. & SCHEDULE

SCALE: N.T.S.

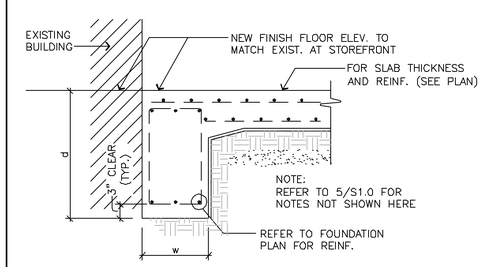
GRADE BM. SCHEDULE									
GRADE BEAM #	GR. BEAM SIZE		BOTTOM BARS	TOP BARS	INTERM. BARS	STIRRUP BARS	STIRRUP SPACING TO 4' FROM ℄ FTG.	REMAINING STIRRUP SPACING	REMARKS
	width (w)	depth (d)							
GB-01	14"	30"	3-#6	3-#6	–	#3	12"o.c.	24"o.c.	

4 GRADE BEAM SCHEDULE



5 EXT. GRADE BM. @ BRICK LEDGE

SCALE: N.T.S.

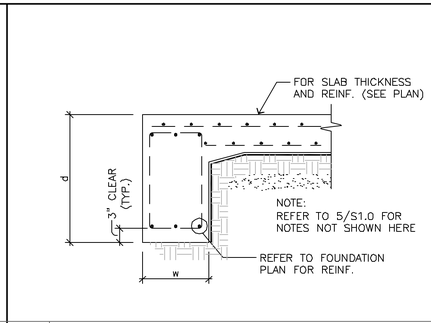


6 GRADE BM. @ EXIST. SLAB

SCALE: N.T.S.

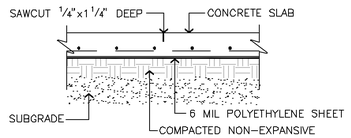
9 EXT. GRADE BM. @ O.H. DOOR

SCALE: N.T.S.



13 EXT. GRADE BM. @ DOORS

SCALE: N.T.S.

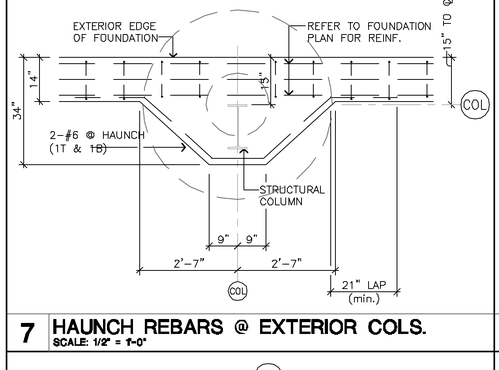


10 TYP. CONTROL JOINT DET.

SCALE: N.T.S.

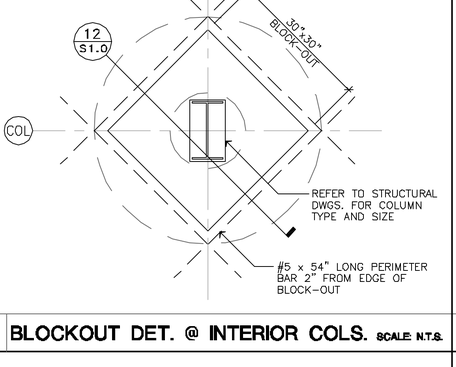
*

NOTE:
HAIR PIN NOT SHOWN FOR CLARITY



7 HAUNCH REBARS @ EXTERIOR COLS.

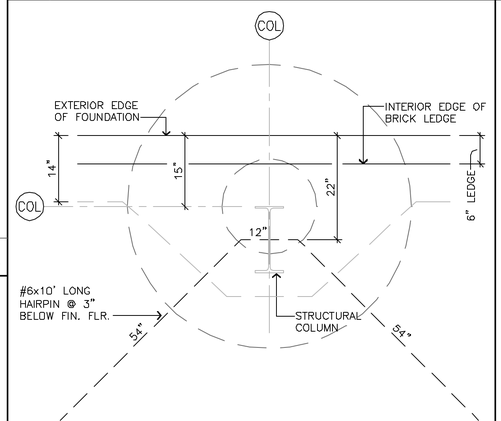
SCALE: 1/2" = 1'-0"



11 BLOCKOUT DET. @ INTERIOR COLS.

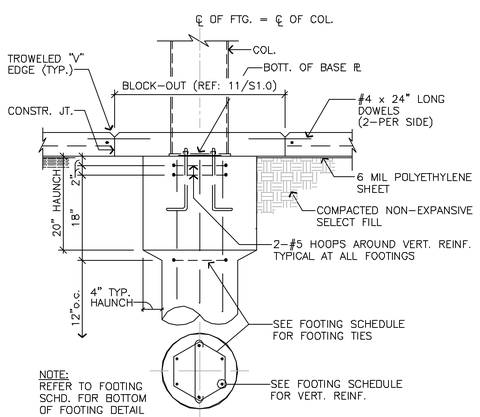
SCALE: N.T.S.

*



8 TYP. HAIRPIN PLACEMENT DET.

SCALE: 3/4" = 1'-0"



12 BLOCKOUT SECT. @ INTERIOR COLS.

SCALE: N.T.S.

*

CITY OF HOUSTON FIRE DEPARTMENT
FIRE STATION #20 - ADDITION
6902 NAVIGATION BLVD., HOUSTON, TEXAS

LAY-SU Architects & Engineers
HOUSTON, TEXAS 77031
TEXAS ENGINEERING FIRM #F-5215

SEAL: STATE OF TEXAS · R. LAY-SU · 46273 · REGISTERED PROFESSIONAL ENGINEER · 04/16/10
R. Lay-Su P.E.# 46273

WARNING
IF THIS BAR DOES NOT MEASURE 1" THEN DRAWING IS NOT TO SCALE

REV.	DATE	REMARKS
–	04/16/10	Issued for Bids

Issued for Bid Date: Lay-Su Project No.: 1095

DESIGNED BY: R.L.S.
DRAWN BY: ROY
SCALE: AS SHOWN
DATE: SEPTEMBER 2009

DRAWING NAME: FOUNDATION PLAN & DETAILS
SHEET: S1.0

PRINT DATE: 04/16/10 DRAWING NAME: S1.0.dwg