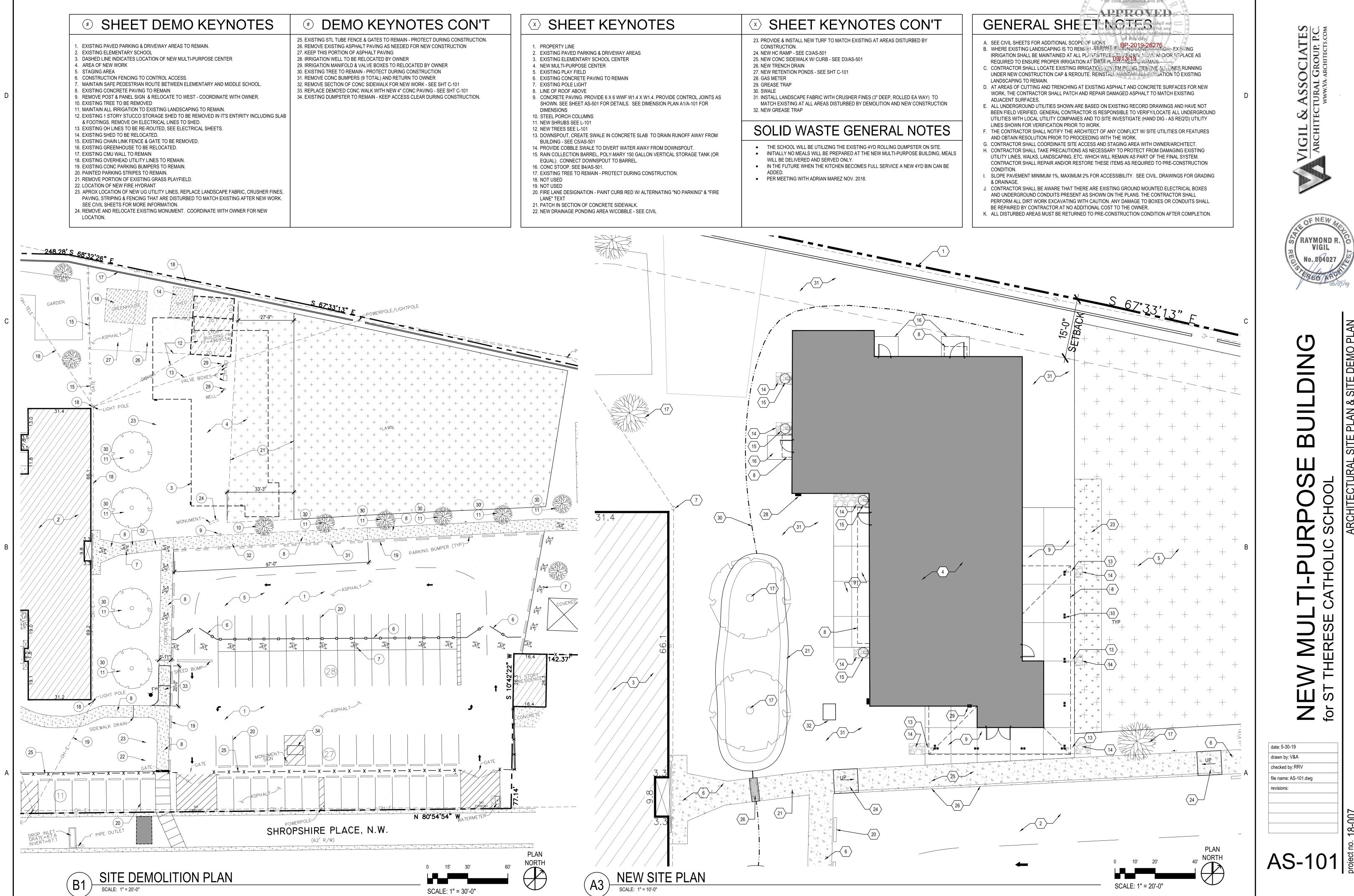
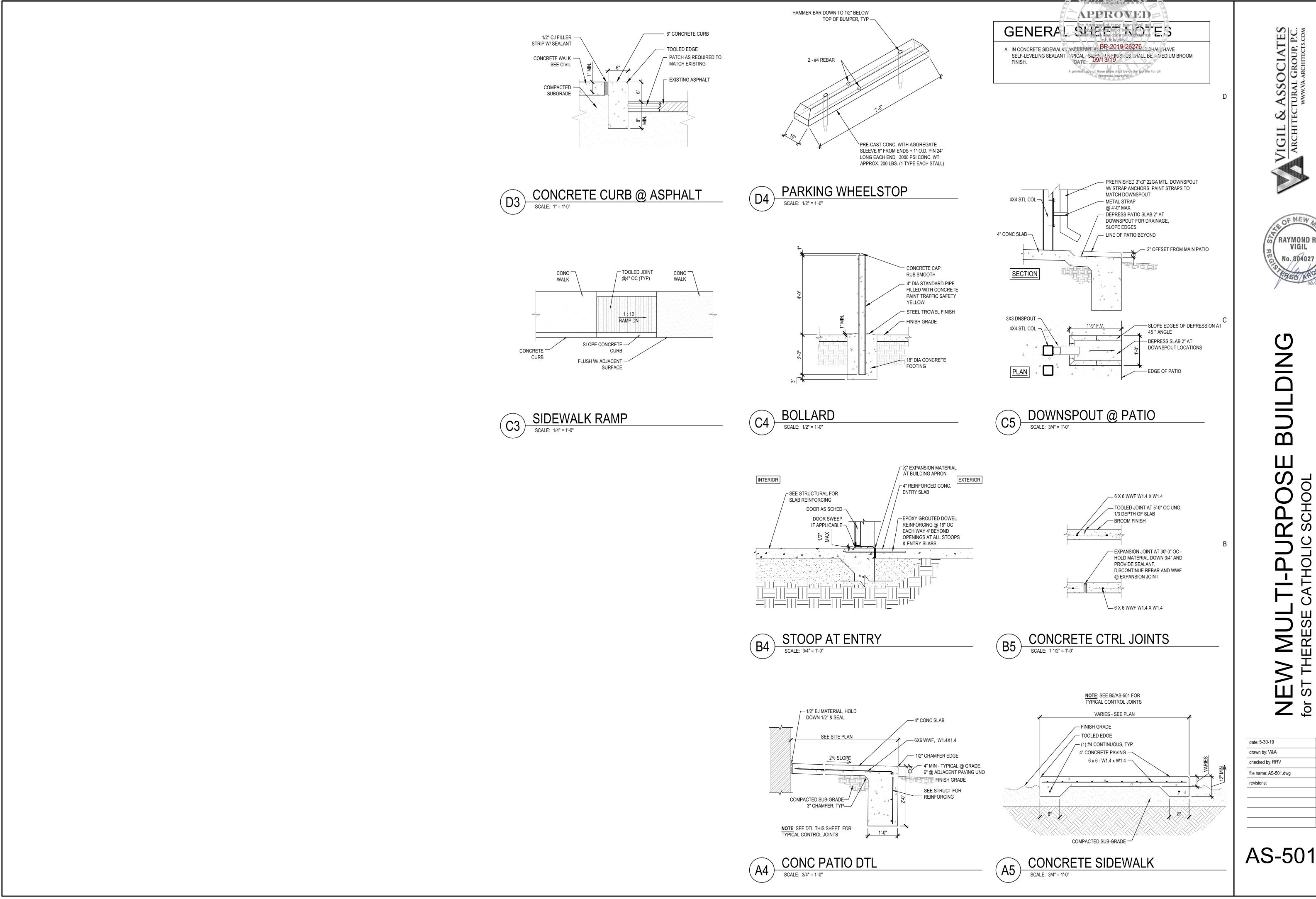


ALTERNATE







#### **DESIGN LOADS:**

A. Vertical: Roof Live Loading (non reducible snow) Roof Dead Loading

20psf 20psf

#### B. Horizontal:

(1) WIND - ASCE 7 Main Force Resisting system Envelope Procedure

## WALLS

V<sub>3</sub>Sec gust = 115mph = 1.0 = B Exposure Mean Roof Height = 16ft.(Max) Roof Angle = 0 Deg(Max)= 21.0 psf Zone A

(2) SEISMIC (EQUIVALENT LATERAL FORCE PROCEDURE) V = Cs W

13.9 psf Zone C

Site Class	=	D
Occupancy Category	=	II
Seismic Design Category	=	D
IE	=	1.0
S <sub>DS</sub>	=	0.46
SDI	=	0.22
R	=	6.5
Cs	=	0.07

C. SOIL: Allowable Bearing Pressure qa = 1500psf for conventional spread and strip (1)

> \*allowable 1/3 stress increase for combined gravity and seismic/wind loading

#### GENERAL

- A. The Contractor shall verify all dimensions in the field.
- B. Shop drawings shall be furnished for review before any fabrication and erection is started. Poorly executed shop drawings shall be rejected and
- C. The Contractor shall be responsible for providing safe and adequate shoring for all parts of the structure during construction.
- D. All trades shall coordinate and verify all openings in floors, roof, walls, and beams with the General Contractor.
- E. The General Contractor shall be responsible for foundations under Mechanical equipment and shall coordinate size and location of foundations with Mechanical Contractor.

## 4. MATERIALS

- A. Cast-in-place Concrete
  - (1) Hardrock Concrete (Unit Wt. = 150 pcf)
    - a. F'c = 3000 psi @ 28 days -All cast-in-place concrete slab-on-ground footings, piers and stemwalls.
    - b. F'c = 4000 psi @ 28 days (Air Entrained) -All cast-in-place exterior concrete slabs-on-ground and site concrete
- B. Reinforcing Steel:
  - (1) All reinforcing steel shall conform to ASTM A615 Grade 60.
  - (2) Welded smooth wire fabric shall conform to ASTM A185 specification for welded wire fabric for concrete reinforcement. (3) Reinforcing steel shall be fabricated and placed in accordance with the latest building code requirements for reinforced concrete (ACI 318) and the latest standard Manual (ACI 315)
  - (4) Bar supports and spacers for rebar shall be provided in accordance with ACI 315. Chairs with 22 GA. sand plates shall be provided for all reinforcing in slabs on grade.
  - (5) Where lapped splices in reinforcing occur, the minimum lap shall be made as follows unless noted otherwise:
    - a. Vertical reinforcing: 48 bar dia. or 24" minimum. b. Horizontal reinforcing: 48 bar dia. or 24" minimum.
    - c. Horizontal corner bars: 48 bar dia. or 24" minimum.
  - (6) Concrete cover for reinforcing shall be as follows:
    - a. Footings: 3" from bottom and 2" from sides.
    - b. Stem Walls: 2" from sides and 2" from top and bottom.
    - c. Slabs on ground: centered in slab.
  - (7) The contractor shall be responsible to see that all rebar is properly aligned and tied in place before placing concrete. All column, wall dowels and vertical steel shall be accurately located and secured in place so that it remain in position during the concrete placing operation. Any rebar found to be improperly installed shall be removed and replaced at no additional cost to the owner.
  - (8) All horizontal reinforcing in footings, walls and beams shall be continuous around corners or have corner bars of the same size and spacing as the horizontal bars and lap a minimum of 30 bar diameters or 24" minimum.
  - (9) Form Ties shall be either of the threaded or snap off type so that no metal will be left within 1" of the surface of the wall. Following removal of form ties, recesses are to be carefully filled and pointed with mortar.

#### C. Structural and Miscellaneous Steel:

- (1) All structural steel members, shapes and connections shall conform to ASTM A992 Fy=50ksi
- (2) The contractor shall be responsible for checking the Architectural drawings for all miscellaneous steel.
- (3) Bolts Shall Conform to ASTM A325 tension control bolts unless noted otherwise, with sizes as shown on the drawings. Anchor bolts embedded in concrete or masonry shall be ASTM F1554 grade 36 bolts or A36 threaded bars.
- (4) All welding shall be done by certified welders and shall be in accordance with the latest standards of the AWS and AISC. Inspect all welding in Accordance with the specifications.
- (5) Tube steel shall be ASTM 500 grade B Fy=46ksi.
- (6) All miscellaneous steel members shall conform to ASTM A36 Fy=36ksi

#### D. Cold formed structural and miscellaneous steel

- (1) All cold formed shapes and connections shall have a yield stress of Fy=50 ksi for 16gage & heavier & 33ksi for 18gage & lighter.
- (2) All welding shall conform to the provisions of AWS D1.1 and ANSI/AWS D1.3. Where the weld throat is not shown on the drawings, the weld throat shall be at least as the thickness of the thinnest sheet joined. All welds shall provide complete fusion of the sheets without "blowouts".
- (3) At all butt joints, abutting pieces of track shall be securely anchored to a common structural element or they shall be splice welded together
- (4) All structural stud framing shall have rows of horizontal bridging installed at a maximum of 4'-0" o.c. See detail on sheet S-002.
- (5) The track of all structural stud framing shall be 16 gage minimum.

#### E. Masonry (ALTERNATE)

- (1) All masonry shall be 2 cell block and have a specified minimum compressive strength of 1900psi on net area at 28 days. fm'=1500psi
- (2) Type "S" Mortar shall be used
- (3) All CMU bond beams, lintels and cells which contain reinf. steel shall be filled solid with 2000 psi concrete grout
- (4) Vertical cells to be filled shall have vertical alignment sufficient to maintain a clear unobstructed continuous vertical cell not less than 2"x3" in plan dimensions
- (5) Foundation dowels shall extend into the foundation concrete as shown on the sections and details. Splices of reinforcing steel in masonry shall be 2'-0" or 48 bar diameters in length, which ever is greater. There shall be a foundation dowel for for each vertical wall reinforcing bar.
- (6) Normal vertical wall reinforcing shall extend continuously from the top of foundation to embed at least 6" into the top of wall bond beam. The vertical slots in knockout bond beams shall be at least 3" into the height of an 8" block unit.
- (7) An additional vertical bar the same size and length as the normal vertical reinf. bar shall be placed:
  - A. As shown on drawings.
  - B. At a corner intersection of two walls, see detail on sheet S-002.
  - C. At a "T" intersection of two walls, see detail on sheet S-002.
  - D. At end of discontinuous walls and at openings, see detail on sheet S-002.
- (8) Control joints shall be installed per masonry control joint detail on sheet S-002. For contol joint locations see Architectural drawings. Continue all bond beam and lintel reinforcement through control joint.
- (9) Corner blocks shall be interwoven between two walls
- (10) Unless noted otherwise, provide (2) additional #5 reinforcing bars along sides and top & bottom of all masonry wall openings. Extend reinforcing 24" beyond opening.
- (11) All masonry shall be special inspected in accordance with the requirements contained in the IBC 2015.

#### 5. SITE GRADING AND EARTHWORK:

- A. Inspection: The inspection of soils for this facility shall be covered under the "Quality Assurance Plan" outlined on this sheet.
- Foundation Preparation:
  - Building areas shall be completely stripped of vegetation, pavements, walls, and soft or muddy areas.
  - (1) All removals specified herein shall extend a distance equal to the depth of fill beyond
  - (2) Soil utilized for filling shall consist of approved on-site or imported soil.
  - (3) Any imported soils shall be approved by the Engineer for both expansive and strength qualities prior to importation to the project site. Final acceptance of any imported soil will be based on observation of the soil actually delivered to the site.
  - (4) All fill shall be compacted to at least 95 percent of maximum dry density
  - (5) The maximum density of all soils shall be determined in accordance with A.S.T.M. Test
  - (6) All fill shall be placed with a moisture content at 1% below or 3% above optimum.
- C. Fill material shall be non-expansive soil with a plasticity index of ten or less. All fill material shall be approved by the Engineer.
- D. Site Drainage During Construction:
  - (1) Positive surface drainage away from both existing structures and new foundation excavations shall be provided during construction. A minimum of four percent gradient within the first ten feet away from structures in areas not protected by sidewalks and pavement shall be maintained

## QUALITY ASSURANCE PLAN

### General Requirements:

- 1. The owner shall be responsible for hiring the special inspector(s) and must incur all associated costs per section 1704.1 of the IBC-2015.
- 2. The permit applicant shall submit a statement of special inspections prepared by the registered design professional in responsible charge per section 1704.1.1 of the IBC-2015. The statement of special inspections shall be as shown on this sheet.
- Special inspectors shall submit inspection reports to the building official and to the registered design professional in responsible charge. The reports shall be prepared in accordance with the requirements contained in section 1704.1.2 of the IBC-2015.
- The required Special Inspections for this project have been summarized below. All other normal inspections and testing not included in the Special Inspections shown below (i.e. soils compaction testing, concrete sampling and testing, permit agency inspections, etc.) shall be paid for by the General Contractor. All normal testing and inspections, as well as all Quality Assurance testing and inspections (Special Inspections), shall be coordinated and scheduled by the General Contractor to fit within the workflow of the project

#### **Structural Observations**

Structural observations shall be performed in accordance with sections 1709 of the IBC-2015.

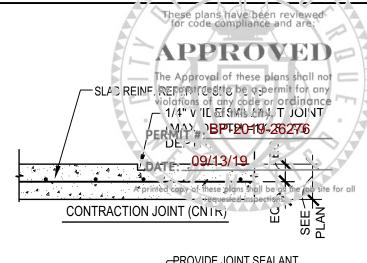
### Seismic Resistance

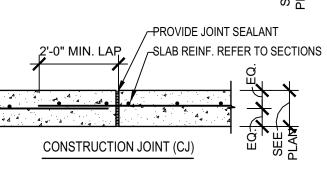
## 1. SEISMIC RESISTANCE REQUIREMENTS

- a) Quality plan for the seismic resistance of this project will include the following items:
- 1) Seismic-Force-Resisting system for this building: This system consists of ordinary moment frames.
- b) The special inspections and testing to be provided for the items shown above shall be in accordance with the sections 1704. 1707 and 1708 of the IBC-2015.
- c) The type and frequency of testing and special inspections shall be as shown above.
- d) The testing and special inspection reports shall be distributed weekly during the construction period for each element. The reports shall be submitted to the following:
- 1) building official and
- 2) registered design professional

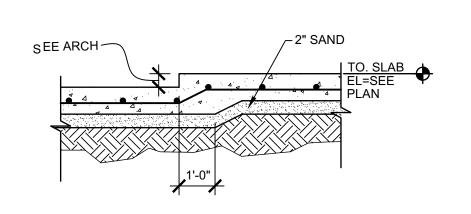
and their position(s) in the organization.

- e) Contractor responsibility: each contractor responsible for the construction of any of the the systems listed above shall submit a written contractors statement of responsibility to the building official, and the registered design professional prior to the commencement of work. The contractors' statement of responsibility shall contain the following:
- 1) Acknowledgement of awareness of the special requirements contained in the quality assurance plan.
- 2) Acknowledgement that control will be exercised to obtain conformance with the construction documents
- 3) Procedures for exercising control within the contractors' organization, the method and frequency of reporting and the distribution of reports. 4) Identification and qualifications of the person(s) exercising such control

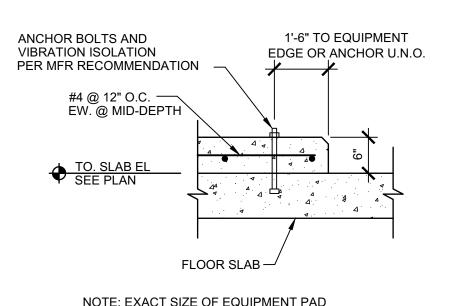




## **CONCRETE SLAB JOINT DETAILS** SCALE: NOT TO SCALE

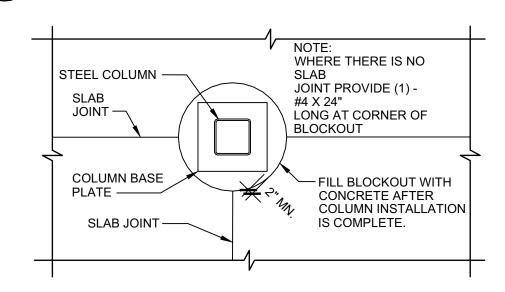






## **INTERIOR** EQUIPMENT PAD DETAIL SCALE: NOT TO SCALE

IS PER MER RECOMMENDATIONS





S-001

QPEC QUIROGA - PFEIFFER ENGINEERING CORPORATION 6621 GULTON COURT N.E. ALBUQUERQUE, NM 87109 **QPEC JN 6365** 

CITY OF ALBUQUERQU PLANNING

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date: 6-7-19 drawn by: TEP checked by: RSP file name: S-001.dwg

STRUCTURAL QUALITY ASSURANCE PROGRAM

THE CONTRACTOR SHALL ENGAGE INDEPENDENT INSPECTORS TO IMPLEMENT THE FOLLOWING INSPECTIONS IN ACCORDANCE WITH IBC 2015:

APPROVED The Approval of these plans shall not

CLTY OF ALBUQUEROU PLANNING

Special Inspections /Quality Assurance Requirements Special Inspection Requirement 1. Concrete Construction a. Inspection of reinforcing steel and placement. Periodic Inspection required as defined in ACI 318 Sections 3.5, and 7.1 thru 7.7 Inspection of bolts to be installed in concrete Continuous Inspection required as defined in ACI prior to and during placement of concrete. 318 Sections 8.1.3 and 21.2.8 Periodic Inspection required per ACI 318 Sections Inspection of anchors installed in hardened 3.8.6, 8.1.3., and 21.2.8 concrete d. Verify use of required mix design. Periodic Inspection required as defined in ACI 318 Chapter 4 and Sections 5.2 thru 5.4, and IBC Sections 1904.2.2, 1913.2, and 1913.3 At time fresh concrete is sampled to fabricate Continuous Inspection required as defined in IBC specimens for strength tests, perform slump 2006 section 1913.10, and ASTM Sections C 172 and air content tests, and determine the and C 31, and ACI 318 sections 5.6 and 5.8 temperature of the concrete. Continuous Inspection required as defined in IBC Inspection of concrete placement for proper 2006 section 1913.6, 1913.7, and 1913.8, and ACI application techniques. 318 sections 5.9 and 5.10 . Inspection for maintenance of specified curing Periodic Inspection required as defined in IBC 2006 section 1913.9, and ACI 318 sectios 5.11 temperature and techniques. and 5.13 Inspection of formwork for shape, location, and Periodic Inspection required as defined in ACI 318 section 6.1.1 dimensions of the concrete member being formed a. Verify materials below shallow foundations Periodic Inspection are adequate to achieve the design bearing capacity b. Verify excavations are extended to proper Periodic Inspection depth and have reached proper material . Perform classification and testing of compacted Periodic Inspection fill materials d. Verify use of proper materials, densities, and Continuous Inspection lift thicknesses during placement and compaction of compacted fill e. Verify that site has been prepared properly prior Periodic Inspection to compacted fill placement 3. Masonry Construction ALTERNATE Special Inspection for the masonry elements of the Facility shall be in accordance with Level 1 requirements of the IBC 2015 and as shown below: Proportions of site prepared mortar, and Periodic Inspection required as defined in ACI 530.1/ASCE 6/TMS 602 Article 2.6A and Article Construction of mortar joints. Locations of Reinforcing Connectors and anchorages Periodic Inspection required as defined in ACI . Size and Location of Structural 530.1/ASCE 6/TMS 602 Article 3.3G Type, size, and location of anchors Periodic Inspection required as defined in ACI 530/ASCE 5/TMS 402 Sections 1.2.2(e), 2.1.4, including details of masonry anchorage to other structural members . Specified size, grade, and type of Periodic Inspection required as defined in ACI 530/ASCE 5/TMS 402 Sections 1.13 and ACI reinforcement 530.1/ASCE 6/TMS 6 or Article 2.4 & 3.4 Periodic Inspection required as defined in ACI Protection of masonry during cold or 530.1/ASCE 6/TMS 602 Article 1.8C and 1.8D and hot weather IBC 2015 Section2104.3 and 2104.4 Prior to grout placement verify that grout space is Periodic Inspection required as defined in ACI 530.1/ASCE 6/TMS 602 Article 3.2D, 3.4, and clean, placement of reinforcement and 3.3B and IBC 2015 Section 1.13 anchorage is accurate, and mortar joints are correct.

Continuous Inspection required to ensure

Article 3.5, and 1.4, and IBC 2015 Section

2105.2.2 and 2105.3

compliance with ACI 530.1/ASCE 6/ TMS 602

Item PERMIT #: BR: 201,9-26276: C.3. Re quirement		
4. Steel Construction	DATE: 09/13/19	
a. Verification of high strength bolts, nuts and washers. Verify identification markings to conform to ASTM standard specified. Obtain manufacturer's certificate of compliance.	Periodic Inspection required as distribution AISC 360 Section A3.3 and applicable ASTM material standards	
b. Inspection of high strength bolting:		
1) Snug Tight joints	Periodic Inspection required as defined in AISC 360 Section M2.5 & IBC 1704.3.3	
2) Slip-Critical joints using turn-of-nut with match marking, twist off bolt, or direct tension indicator methods of installation.	Periodic Inspection required as defined in AISC 360 Section M2.5 & IBC 1704.3.3	
3) Slip-Critical joints using turn-of-nut without match marking or calibrated wrench methods of installation.	Continuous Inspection required as defined in AISC 360 Section M2.5 & IBC 1704.3.3	
c. Material Verification of Structural Steel and Cold formed steel deck.		
For structural steel, identification markings to conform to AISC 360	Periodic Inspection required as defined in AISC 360 Section M5.5	
Manufacturer's     Certified Test Reports	Periodic Inspection	
d. Material Verification of Weld Filler materials.		
Identification     markings to conform to     AWS Specification	Periodic Inspection as defined in AISC 360 Section A3.5 and applicable AWS A5 documents.	
Manufacturer's     Certificate of complice required.	Periodic Inspection	
e. Inspection of Welding:		
Complete and partial penetration groove welds	Continuous Inspection required as defined in AWS D1.1 and IBC section 1704.3.1	
2) Multipass fillet welds	Continuous Inspection required as defined in AWS D1.1 and IBC section 1704.3.1	
3) Single pass fillet welds greater than 5/16"	Continuous Inspection required as defined in AWS D1.1 and IBC section 1704.3.1	
4) Plug and Slot welds	Continuous Inspection required as defined in AWS D1.1 and IBC section 1704.3.1	
5) Single pass fillet welds less than 5/16"	Periodic Inspection required as defined in AWS D1.1 and IBC section 1704.3.1	
6) Floor and Roof Deck welds	Periodic Inspection required as defined in AWS D1.3	
7) Verification of weldability of reinforcing steel other than ASTM A 706	Periodic Inspection required as defined in AWS D1.4 and ACI 318 Section 3.5.2	
8) Shear reinforcement	Continuous Inspection required as defined in AWS D1.4 and ACI 318 Section 3.5.2	
9) Other reinforcing steel	Periodic Inspection required as defined in AWS D1.4 and ACI 318 Section 3.5.2	
f. Inspection of Steel frame joints for compliance with approved construction documents for details such as bracing and stiffening members locations and application of joint details at each connection.	Periodic Inspection required as defined in IBC 2015 Section 1704.3.2	

Q P E C Q U I R O G A - P F E I F F E R ENGINEERING CORPORATION 6621 GULTON COURT N.E. ALBUQUERQUE, NM 87109

**Solution** 

S-002

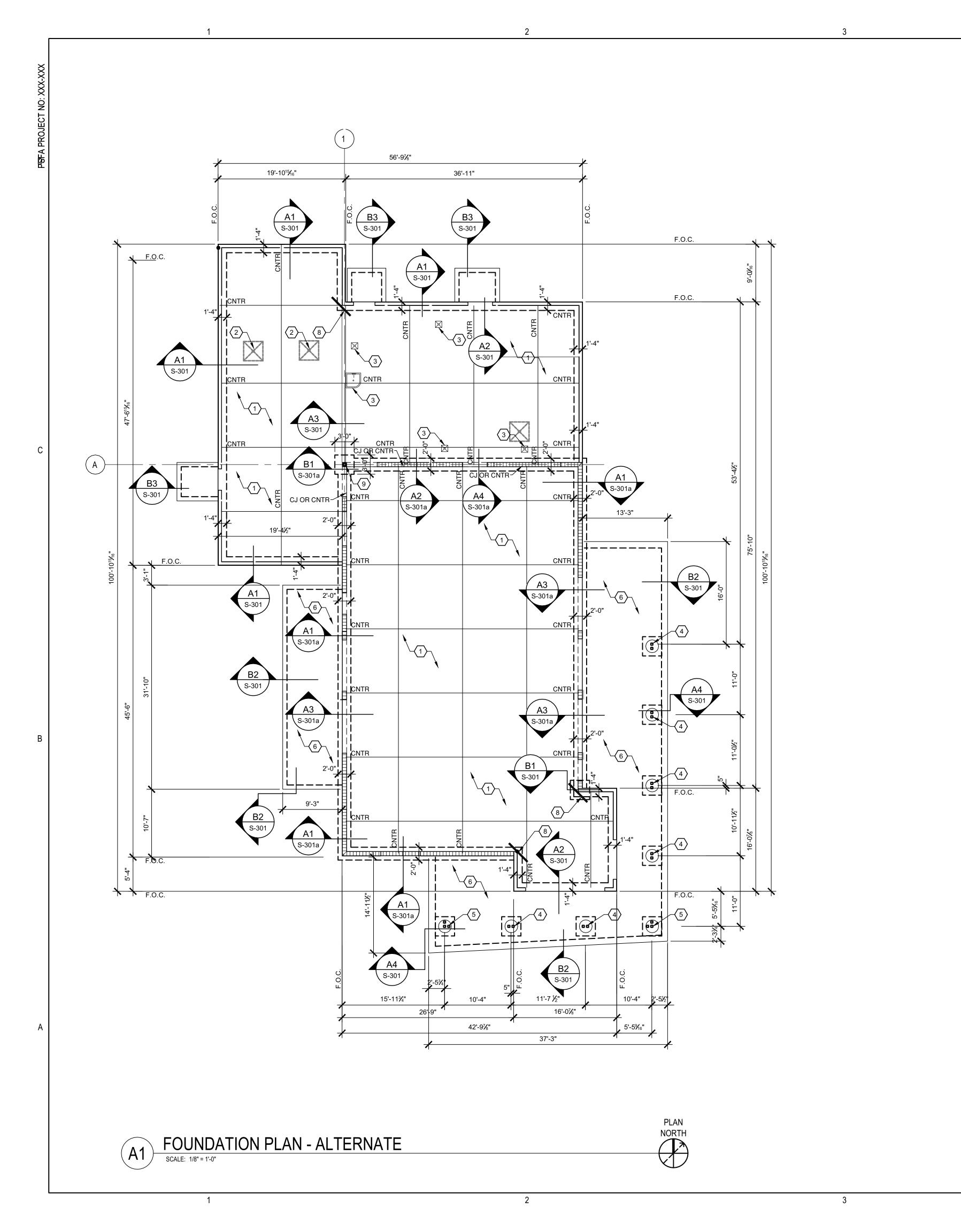
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checked by: RSP

file name: S-002.dwg

**QPEC JN 6365** 



## ○ KEYED NOTES

- 5" 3000psi INTEGRAL COLOR CONCRETE SLAB ON GROUND WITH #4 BARS @ 18" O.C. E.W. CENTERED IN SLAB. CONTROL JOINTS LOCATED AS SHOWN
- FLOOR DRAINS SLOPE SLAB TO DRAIN COORDINATE WITH MECHANICAL FOR REQUIREMENTS
- FLOOR SINK, SEE MECHANICAL FOR REQUIREMENTS DOUBLE HSS4x4x1/4 Fy=42ksi STEEL COLUMN WITH 3/4" THICK BASE PLATE. PROVIDE (4) 3/4" DIA. F1554 ANCHOR BOLTS, EMBEDDED 9" INTO CONCRETE SEE, TYPE A BASE PLATE ON SHEET S-301.
- TRIPLE HSS4x4x1/4 Fy=42ksi STEEL COLUMN WITH 3/4" THICK BASE PLATE. PROVIDE (4) 3/4" DIA. F1554 ANCHOR BOLTS, EMBEDDED 9" INTO CONCRETE, SEE TYPE B BASE PLATE ON
- SHEET S-301. 4" 3000psi CONCRETE SLAB ON GRADE WITH 6x6xW2.9xW2.9 WWF
- CENTERED IN SLAB NOT USED
- (2) #4 x4'-0" RE-ENTRANT CORNER BARS HSS4x4x1/4 W/ 3/4"x10"x0'-10" BASE PLATE PROVIDE (4) 3/4" DIA F1554 ANCHOR BOLTS EMBEDDED 9" INTO CONCRETE

8" MASONRY WALL W/ #5 VERTICAL REINFORCING BARS @ 24" O.C. AND K.O.B.B. @ 48" O.C. WITH (10) #5 , SOLID GROUT ALL REINFORCED CELLS AND ALL CELLS BELOW GRADE.

1 5/8"x6x16 GAGE METAL STUDS @ 16" O.C. PROVIDE 7/16" PLYWOOD W/ #10 SREWS @ 6" O.C. @ ALL EDGES & SUPPORTS EXTERIOR FACE PROVIDE BLOCKING @ ALL PANEL EDGES.

SHEAR WALL - 1 5/8"x6x16 GAGE METAL STUDS @ 16" O.C.7/16" PLYWOOD WITH #10 SCREWS @ 6" O.C. AT EDGE AND FIELD. PROVIDE BLOCKING @ ALL PANEL

F.O.C. FACE OF CONCRETE & SHEATHING CONTRACTION JOINT, SEE SHEET S-001 FOR

**LEGEND** 

SEE ARCHITECTURAL FOR WALL HEIGHTS

EDGES. PROVIDE ANCHOR BOLTS SPACED @ 3'-0" O.C.

REQUIREMENTS © COL CENTERLINE OF COLUMN

DIMENSIONS SHOWN ARE TO THE FACE OF CONCRETE, STUD WALL OFFSET 7/16" TO INSIDE UNLESS OTHERWISE

TYPICAL WALL OFFSET **DIMENSION LAYOUT** 



F.O.C. OFFSET

FACE OF CONCRETE



drawn by: TEP checked by: RSP file name: S-101.dwg

date: 6-7-19

S-101a ALTERNATE

## ○ KEYED NOTES

- 5" 3000psi INTEGRAL COLOR CONCRETE SLAB ON GROUND WITH #4 BARS @ 18" O.C. E.W. CENTERED IN SLAB. CONTROL JOINTS LOCATED AS SHOWN
- FLOOR DRAINS SLOPE SLAB TO DRAIN COORDINATE WITH MECHANICAL FOR REQUIREMENTS
- FLOOR SINK, SEE MECHANICAL FOR REQUIREMENTS DOUBLE HSS4x4x1/4 Fy=42ksi STEEL COLUMN WITH 3/4" THICK BASE PLATE. PROVIDE (4) 3/4" DIA. F1554 ANCHOR BOLTS, EMBEDDED 9" INTO CONCRETE SEE, TYPE A BASE PLATE ON
- SHEET S-301. TRIPLE HSS4x4x1/4 Fy=42ksi STEEL COLUMN WITH 3/4" THICK BASE PLATE. PROVIDE (4) 3/4" DIA. F1554 ANCHOR BOLTS, EMBEDDED 9" INTO CONCRETE, SEE TYPE B BASE PLATE ON
- SHEET S-301. 4" 3000psi CONCRETE SLAB ON GRADE WITH 6x6xW2.9xW2.9 WWF
- CENTERED IN SLAB SIMPSON HTT4 HOLDWN, SEE SECTION B4/S-301
- 8. (2) #4 x4'-0" RE-ENTRANT CORNER BARS

## **LEGEND**

\_\_\_\_\_\_ 1 5/8"x6x16 GAGE METAL STUDS @ 16" O.C. PROVIDE 7/16" PLYWOOD W/ #10 SREWS @ 6" O.C. @ ALL EDGES & SUPPORTS EXTERIOR FACE PROVIDE BLOCKING @ ALL PANEL EDGES.

SHEAR WALL - 1 5/8"x6x16 GAGE METAL STUDS @ 16" O.C.7/16" PLYWOOD WITH #10 SCREWS @ 6" O.C. AT

F.O.C. FACE OF CONCRETE & SHEATHING

TYPICAL WALL OFFSET **DIMENSION LAYOUT** 





S-101

date: 6-7-19

drawn by: TEP

checked by: RSP

EDGE AND FIELD. PROVIDE BLOCKING @ ALL PANEL EDGES. PROVIDE ANCHOR BOLTS SPACED @ 3'-0" O.C. CONTRACTION JOINT, SEE SHEET S-002 FOR REQUIREMENTS © COL CENTERLINE OF COLUMN

DIMENSIONS SHOWN ARE TO THE FACE OF CONCRETE, STUD WALL OFFSET 7/16" TO INSIDE UNLESS OTHERWISE F.O.C. 7/1 OFFSET FACE OF CONCRETE

NORTH

## ○ KEYED NOTES

- 1-1/2" TYPE B 22GAGE Fy=33ksi GALVANIZED DECK WITH MINIMUM SECTION PROPETIES Ip=0.155 IN<sup>4</sup>, In=0.183 IN<sup>4</sup>, Sp=0.186 IN<sup>3</sup>, Sn=0.192 IN<sup>3</sup> . ATTACH WITH 36/7 PATTERN OF 5/8" PUDDLE WELDS @ SUPPORTS AND BOUNDARIES AND (7) #10 TEK SCREWS @ SIDE LAPS. MAINTAIN 2 SPAN MINIMUM
- 20K7 STEEL JOIST @ 5'-4" O.C. 12K1 STEEL JOIST @ 5'-4" O.C.
- 18k3 STEEL JOIST MECHANICAL UNIT 2100 LBS., SEE MECHANICAL FOR REQUIREMENTS
- W16x31 Fy=50ksi STEEL BEAM W12x16 Fy=50ksi STEEL BEAM HSS8x4x3/16 Fy=42ksi STEEL BEAM
- HSS6x3x3/16 Fy=42ksi STEEL BEAM SPACED @ 6'-0" O.C. MAXIMUM 10. LIGHTGAGE MÉTAL TRUSSES @ 2'-0" O.C.
- 11. STEEL COLUMN, SEE FOUNDATION PLAN 12. L4x4x1/4 @ 4'-0" O.C.
- 13. OUTRIGGERS OR JACK TRUSS @ 2'-0" O.C.14. BEAM BEARING AS PER SECTION B3/S-311
- NOT USED
- 16. 20K SPECIAL STEEL JOIST @ 5'-4" O.C. 17. 12K SPECIAL STEEL JOIST @ 5'-4" O.C.
- 18. MECHANICAL UNIT 1200 LBS., SEE MECHANICAL FOR REQUIREMENTS 19. MECHANICAL UNIT 800 LBS., SEE MECHANICAL FOR REQUIREMENTS
- MECHANICAL UNIT 180 LBS., SEE MECHANICAL FOR REQUIREMENTS 21. MECHANICAL UNIT 120 LBS., SEE MECHANICAL FOR REQUIREMENTS
- 22. L4x4x3/8 BASKETBALL GOAL SUPPORTS 23. JOIST MANUFACTURER SHALL COORDINATE FINAL LOADS WITH
- BASKETBALL GOAL SUPPLIER
- 24. SEE SECTION A4/S-311a FOR POST CONNECTION AT CMU

## **LEGEND**

24" O.C. AND K.O.B.B. @ 48" O.C. WITH (10) #5, SOLID GROUT ALL REINFORCED CELLS AND ALL CELLS BELOW GRADE. SEE ARCHITECTURAL FOR WALL HEIGHTS

1 5/8"x6x16 GAGE METAL STUDS @ 16" O.C. PROVIDE 7/16" OSB W/ #10 SREWS @ 6" O.C. @ ALL EDGES & SUPPORTS EXTERIOR FACE PROVIDE BLOCKING @ ALL PANEL EDGES.

SHEAR WALL - 1 5/8"x6x16 GAGE METAL STUDS @ 16"
O.C.7/16" OSB WITH #10 SCREWS @ 6" O.C. AT EDGE AND
FIELD. PROVIDE BLOCKING @ ALL PANEL EDGES. PROVIDE ANCHOR BOLTS SPACED @ 3'-0" O.C.

SEE HEADER SCHEDULE ON SHEET S-002 SEE LINTEL SCHEDULE ON SHEET S-002

FACE OF CONCRETE & SHEATHING CONTRACTION JOINT, SEE SHEET S-002 FOR

REQUIREMENTS © COL CENTERLINE OF COLUMN

date: 6-7-19 drawn by: TEP checked by: RSP file name: S-001.dwg

ALTERNATE



1. SEE DETAIL D. /S-00 / FOR FRA WING A TM, CHANICAL UNITS. be construed to be a permit for any violations of any code or ordinance of this city.

## ○ KEYED NOTES

- 1. 1-1/2" TYPE B 22GAGE Fy=33ksi GALVANIZED DECK WITH MINIMUM SECTION PROPETIES Ip=0.155 IN<sup>4</sup>, In=0.183 IN<sup>4</sup>, Sp=0.186 IN<sup>3</sup>, Sn=0.192 IN<sup>3</sup>. ATTACH WITH 36/7 PATTERN OF 5/8" PUDDLE WELDS @ SUPPORTS AND BOUNDARIES AND (7) #10 TEK SCREWS @ SIDE LAPS. MAINTAIN 2 SPAN MINIMUM
- 20K7 STEEL JOIST @ 5'-4" O.C. 12K1 STEEL JOIST @ 5'-4" O.C.
- 18k3 STEEL JOIST MECHANICAL UNIT 2100 LBS., SEE MECHANICAL FOR REQUIREMENTS W16x31 Fy=50ksi STEEL BEAM W12x16 Fy=50ksi STEEL BEAM
- HSS8x4x3/16 Fy=42ksi STEEL BEAM HSS6x3x3/16 Fy=42ksi STEEL BEAM SPACED @ 6'-0" O.C. MAXIMUM
- 10. LIGHTGAGE METAL TRUSSES @ 2'-0" O.C.
  11. STEEL COLUMN, SEE FOUNDATION PLAN
- 11. STEEL COLUMIN, SEE FOUNDATION PLAN
  12. L4x4x1/4 @ 4'-0" O.C.
  13. OUTRIGGERS OR JACK TRUSS @ 2'-0" O.C.
  14. BEAM BEARING AS PER SECTION B3/S-311
- 15. SIMPSON HTT4 HOLDOWN16. 20K SPECIAL STEEL JOIST @ 5'-4" O.C.
- 17. 12K SPECIAL STEEL JOIST @ 5'-4" O.C.
  18. MECHANICAL UNIT 1200 LBS., SEE MECHANICAL FOR REQUIREMENTS
- MECHANICAL UNIT 800 LBS., SEE MECHANICAL FOR REQUIREMENTS
   MECHANICAL UNIT 180 LBS., SEE MECHANICAL FOR REQUIREMENTS
- 21. MECHANICAL UNIT 120 LBS., SEE MECHANICAL FOR REQUIREMENTS

# LEGEND

1 5/8"x6x16 GAGE METAL STUDS @ 16" O.C. PROVIDE 7/16" OSB W/ #10 SREWS @ 6" O.C. @ ALL EDGES & SUPPORTS EXTERIOR FACE PROVIDE BLOCKING @ ALL PANEL

SHEAR WALL - 1 5/8"x6x16 GAGE METAL STUDS @ 16" O.C.7/16" OSB WITH #10 SCREWS @ 6" O.C. AT EDGE AND FIELD. PROVIDE BLOCKING @ ALL PANEL EDGES. PROVIDE ANCHOR BOLTS SPACED @ 3'-0" O.C.

H-# SEE SCHEDULE ON SHEET S-002 FACE OF CONCRETE & SHEATHING CONTRACTION JOINT, SEE SHEET S-002 FOR

REQUIREMENTS © COL CENTERLINE OF COLUMN



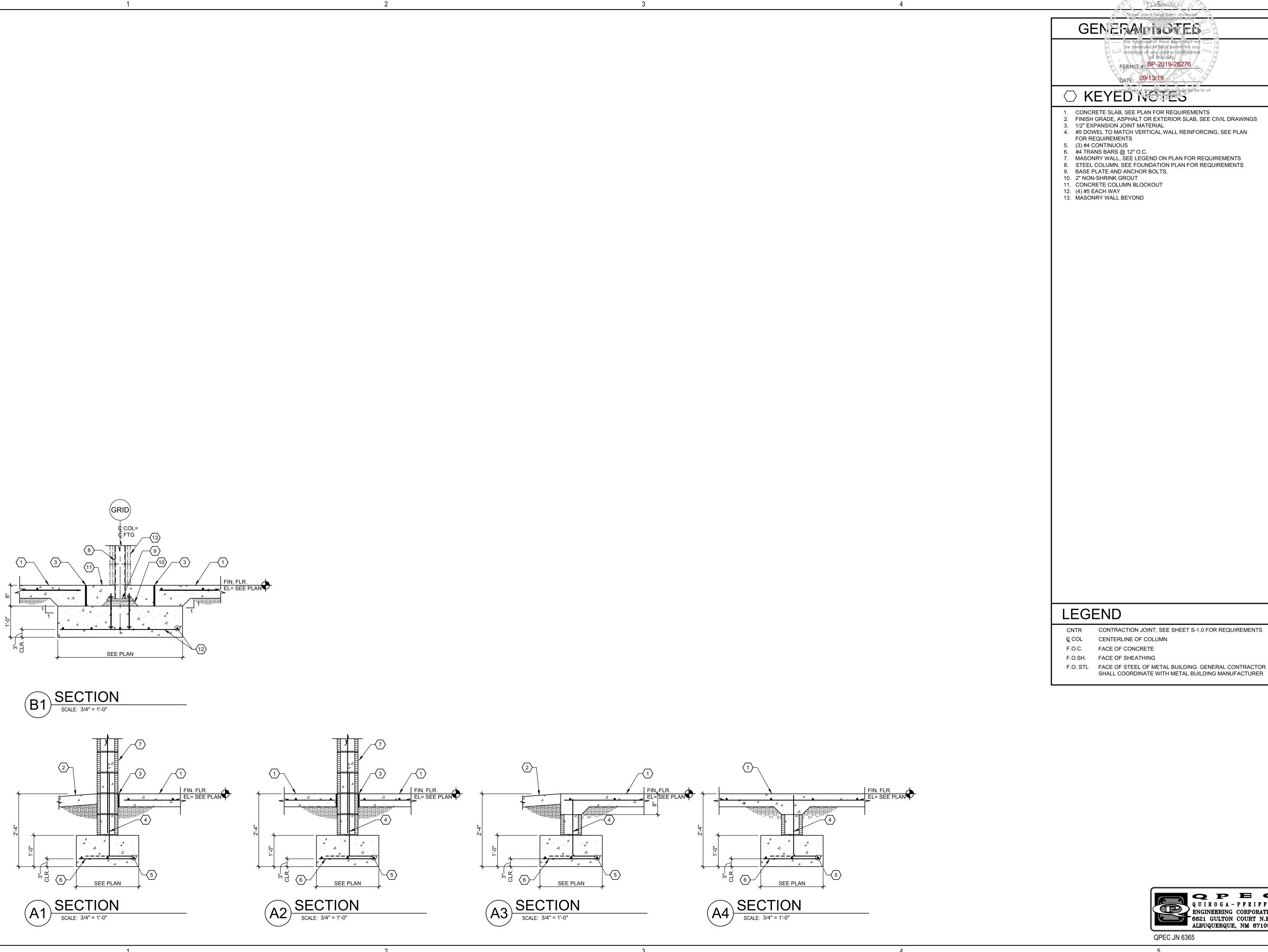
date: 6-7-19 drawn by: TEP checked by: RSP file name: S-001.dwg

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ROOF FRAMING PLAN

PLAN

NORTH



PLANNING

These plans have been reviewed for code compliance and are: GENERAPROVES

The Approval of these plans shall not be construed to be a permit for any violations of any code or ordinance of this city.

BP-2019-26276

## KEYED Neglections of these plans shall be on the lob site for all requested inspections.

CONCRETE SLAB, SEE PLAN FOR REQUIREMENTS
 FINISH GRADE, ASPHALT OR EXTERIOR SLAB, SEE CIVIL DRAWINGS

CITY OF ALBUQUERQUE

- 3. 1/2" EXPANSION JOINT MATERIAL 4. #5 DOWEL TO MATCH VERTICAL WALL REINFORCING, SEE PLAN
- FOR REQUIREMENTS
  5. (3) #4 CONTINUOUS
  6. #4 TRANS BARS @ 12" O.C.
- 7. MASONRY WALL, SEE LEGEND ON PLAN FOR REQUIREMENTS 8. STEEL COLUMN, SEE FOUNDATION PLAN FOR REQUIREMENTS
- 9. BASE PLATE AND ANCHOR BOLTS,
- 10. 2" NON-SHRINK GROUT
- 11. CONCRETE COLUMN BLOCKOUT
- 12. (4) #5 EACH WAY
- 13. MASONRY WALL BEYOND

date: 6-7-19 drawn by: TEP checked by: RSP file name: S-301.dwg

S-301a ALTERNATE

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CONTRACTION JOINT, SEE SHEET S-1.0 FOR REQUIREMENTS

CENTERLINE OF COLUMN FACE OF CONCRETE

FACE OF SHEATHING