

General

Plans shall comply with the 2018 International Residential Code with amendments as adopted by the governing jurisdiction. If any changes or deviations from the plans are made during construction, the contractor shall notify the appropriate authority and the engineer of record, either (or both) of whom may require revised drawing or calculations at its discretion.

Where discrepancies exist between the standard comments, notes from the design professional or the code, the most restrictive shall apply.

The suspended slab shall comply with the following design loads:

Minimum dead load (psf) = slab weight
Minimum live load (psf) = 50

The slab shall be designed for a single concentrated live load of 2000 lbs, acting over any 4.5"x4.5" area. It shall not be considered to act concurrently with the uniformly distributed design live load.

Slab and Foundation Notes:

1. The foundation design shall be based on a minimum soil bearing capacity of 2000 psf, unless otherwise indicated on the plans or if modified by an engineering report based on actual site conditions.
2. Concrete shall meet the following specified design strength criteria:
 - 3000psi for footings & foundation walls
 - 3500psi for garage floor slabs.
3. Footings shall extend below the frost line; minimum depth 36 inches below grade.
4. Unless otherwise noted on the plans or if site conditions require otherwise, footings shall be a minimum of 16 inches wide and 8 inches deep with 2 - #4 bars continuous.
5. Column pads shall be a minimum 30" x 30" x 12" with 4 - #4 bars each way unless otherwise noted.
6. Unless otherwise noted on the plans, foundation walls shall be minimum 8 inches thick. Foundation walls greater than 10'-0" tall require a separate engineered design. Provide a 2'-0" long interior or exterior dead-men for any straight wall panels exceeding 20'-0" in length.
7. Reinforcement shall be minimum grade 40 unless otherwise noted. Reinforcement shall lap a minimum of 24 inches at ends, splices, and around corners.
8. Foundation wall shall be backfilled with a clean lean clay (or better) low volume change material. On-site material may be used if deemed acceptable by the geotechnical engineer of record.
9. Garage beam above shall clearspan, if applicable. No point loads shall be placed on the slab.
10. Embed bars 24" or drill and epoxy min. 5" at foundation walls.
11. Shore decking a 6'-0" maximum during construction, if applicable.

Concrete

- Concrete shall be air entrained with a minimum compressive strength at 28 days of 2,500 psi for basement and interior floor slabs, 3,000 psi for basement and foundation walls and 3,500 psi for porches, carport and garage floor slabs.

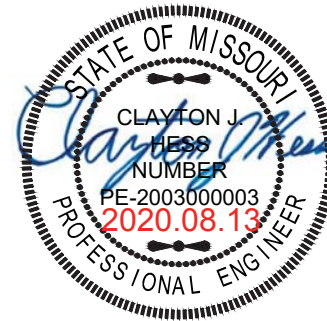
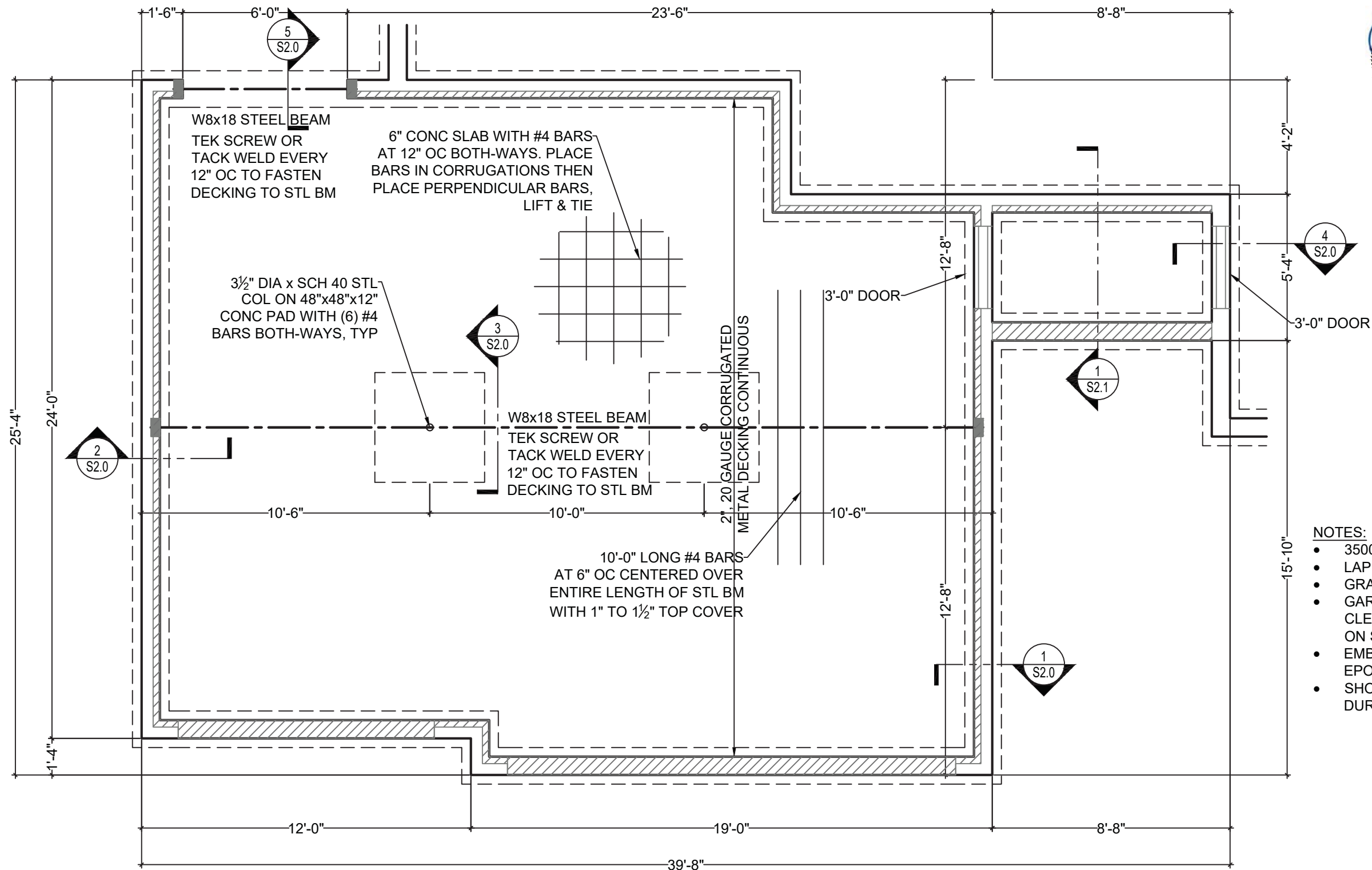


STRUCTURAL DESIGN REVIEW	
KANSAS ENGINEERING LICENSE:	992
MISSOURI ENGINEERING LICENSE:	2003004673

PROJECT:	1717 SW 27TH ST LOT 31 WHISPERING WOODS LEE'S SUMMIT, MO	CLIENT:	D&D BUILDING
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PROJECT #	
DRAWING NAME	
GENERAL NOTES	
DATE:	COMMENTS:
8/13/20	ORIGINAL
DRAWN BY: APEX CHECKED BY: BDC	

SHEET #
S1.0



APEX
ENGINEERS

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PROJECT:

1717 SW 27TH ST
LOT 31 WHISPERING WOODS
LEE'S SUMMIT, MO

CLIENT:

D&D BUILDING

NOTES:

- 3500 PSI CONCRETE
- LAP SPLICES 24" MIN
- GRADE 40 REBAR
- GARAGE BEAM ABOVE SHALL CLEARSPAN. NO POINT LOADS ON SUSPENDED SLAB.
- EMBED BARS 24" OR DRILL & EPOXY MIN 5" AT FDTN WALLS
- SHORE DECKING AT MAX 6'-0" DURING CONSTRUCTION



1
S1.1

SUSPENDED SLAB LAYOUT

SCALE X" = 1'-0"

PROJECT #

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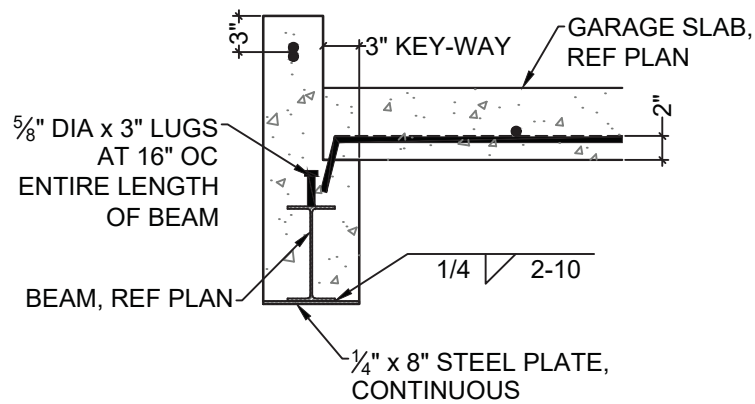
**SUSPENDED
SLAB LAYOUT**

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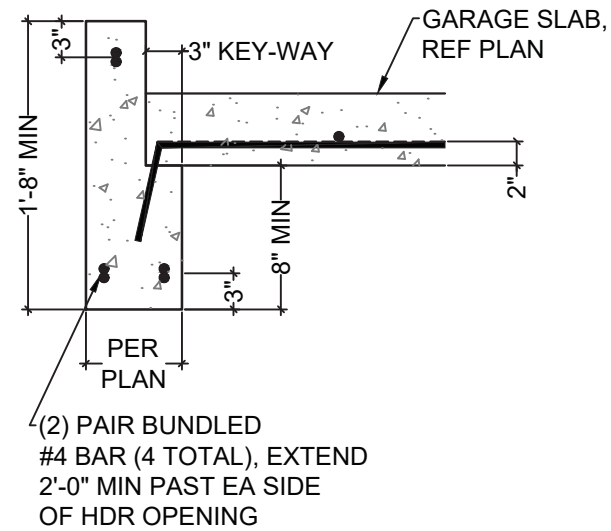
DRAWN BY: APEX
CHECKED BY: BDC

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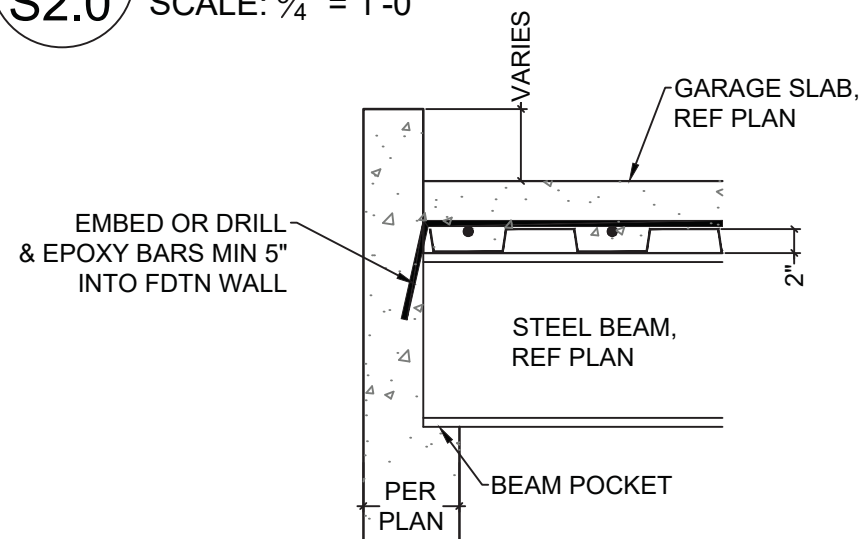
S1.1



5
S2.0 **CONCRETE HEADER DETAIL**
SCALE: $\frac{3}{4}$ " = 1'-0"

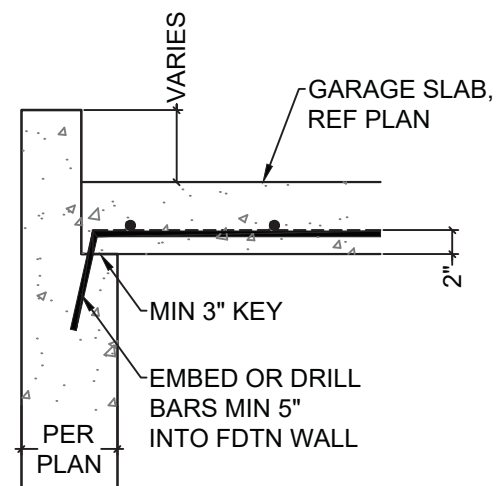


4
S2.0 **CONCRETE HEADER DETAIL**
SCALE: $\frac{3}{4}$ " = 1'-0"

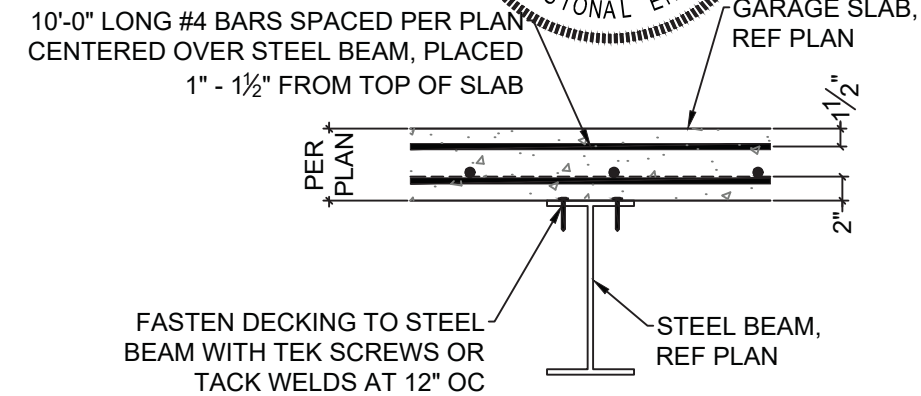


2
S2.0 **GARAGE SLAB BEAM BEARING**
SCALE: $\frac{3}{4}$ " = 1'-0"

- STEEL DECKING NOTES:
- MINIMUM $1\frac{1}{2}$ " BEARING
 - FASTEN TO SUPPORT STEEL WITH $\frac{5}{8}$ " VISIBLE PUDDLE WELDS AT EDGE RIBS & 12" CTRS. ALONG END BEARING
 - FASTEN SIDE LAPS & PERIMETER EDGES AT 36" CTRS. WITH #10 TEK SCREWS OR $\frac{5}{8}$ " PUDDLE WELDS
 - MAX UNSUPPORTED CONSTRUCTION SPAN 6'-0"



1
S2.0 **GARAGE SLAB BEARING**
SCALE: $\frac{3}{4}$ " = 1'-0"



3
S2.0 **GARAGE SLAB BEAM BEARING**
SCALE: $\frac{3}{4}$ " = 1'-0"



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LEE'S SUMMIT, MO

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SUSPENDED SLAB DETAILS


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S2.0





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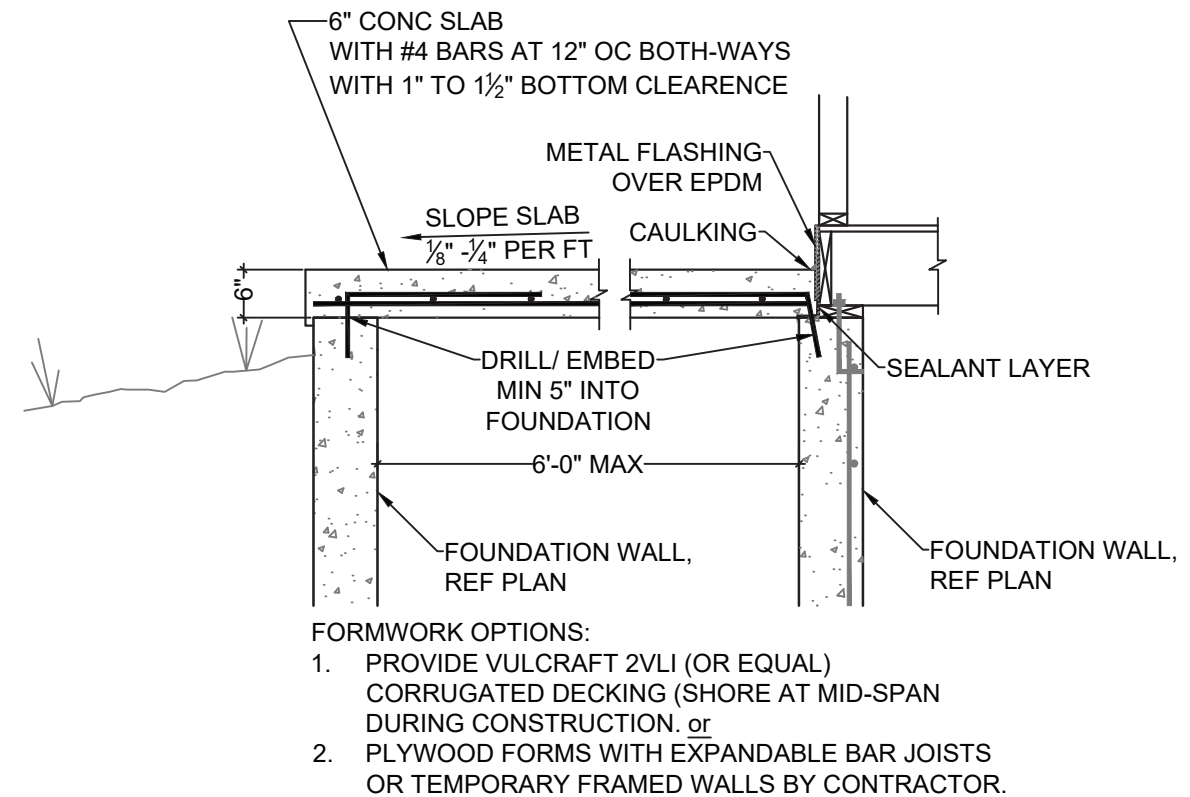
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SLAB DETAILS

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S2.1



1
S2.1

SUSPENDED PORCH STOOP
SCALE: 1/2" = 1'-0"