



# City of Alamogordo

Engineering Department □ 1376 E. Ninth Street □ Alamogordo, New Mexico 88310 □ Ph (575) 439-4235 FAX (575) 439-4343

October 25, 2021

To: All Bidders/Plan Holders

Re: **Addendum 1**  
**Public Works Bid No. 2021-005**  
**Alamogordo Park Restrooms**

Addendum Number 1 is issued to provide changes and/or clarifications to the questions asked on the above referenced bid. Date, time, and location of submitting this bid remains unchanged.

## **General**

Questions and responses offered at the Pre-Bid Meeting held October 19, 2021, at 1:30 PM; as well as additional questions received to date.

**Question 1** – Will the bid lots be awarded in order, or will they possibly be awarded to separate contractors depending on pricing?

**Response 1** – The intent is to award one contract to build 2 restrooms – bid lot 3 at the zoo and either bid lot 1 or 2 at the balloon park. There will not be separate awards to other contractors.

**Question 2** – Alternate to Bid Lot 1 – Balloon Fiesta Park Restroom: Unclassified Excavation- The plans show a different building layout. Please clarify. Also, is this an add to bid lot 1 or a separate bid for a new layout.

**Response 2** – Bid Lot 2 (Alternate to Bid Lot 1) is a separate bid for a larger building at the balloon park. If budget allows, the larger building (Bid Lot 2) will be constructed instead of Bid Lot 1.

**Question 3** – Will builders risk insurance be required?

**Response 3** – No builders risk insurance will be required.

**Question 4** – Who will be responsible for the fees from PNM, if any?

**Response 4** – If there are PNM-related charges, the city will pay those fees.

**Question 5** – Is the existing electrical panel located on the northwest corner of the education building at the zoo available to tie into for the new restroom?

**Response 5** – Yes, power can be taken from this panel with some modifications to accommodate the increased load. See attached updated Electrical Sheets E102, E200R1, E201R1, and E202R1

**Question 6** – On sheet S-100, details 1/S-100 and 2/S-100 show different footings (8 vs. 7, respectively) under the right side, short CMU wall. Please clarify

**Response 6** – The detail noted under the right L-shaped wind break wall (2/S100) should reference detail 8/S100. See revised sheet S100.

**Question 7** – How are the guardrails to be fastened, sleeves, weld plates, anchors, or other method?

**Response 7** – Guardrails are to be fastened with 4x4x3/8” weld plates with (2) J-Style 6” anchors each embedded in concrete, contractor to provide a min 8” thickened slab at weld plate anchor locations. See revised sheet S100 Weld plate detail.

**Question 8** – Is there any irrigation in the areas of work for either of these buildings?

**Response 8** – Balloon Park effluent water is shown (purple line) on the attached aerial. The irrigation lines are limited to the grass area of the field. There is a water line/hose bib that will need to be relocated to outside of bathroom footprint at the Zoo.

**Question 9** – Bid Lot No. 2 Alternate to Bid Lot 1 Unclassified Excavation has the same description as the other items, And the plans call for the pad to be 20.5” above adjacent grade so what is this lump sum item to cover?

**Response 9** – The finish floor elevation for the building (bid lot #1 or bid lot #2) shall be 4275.2 which is 20.5” above adjacent grade, this is required to keep building out of the flood zone. The contractor will be required to bring in additional fill as needed for the project, in order to elevate the building to the required finish floor elevation. See attached AD1.0 for required sub-grade preparation.

**Question 10** – At the walk through it was discussed to get electricity supplied from the adjacent building rather than as shown on the plans. Is this the approach we should take? Will design details for this change be provided?

**Response 10** – See response to question #5 and attached updated Electrical Sheets E102, E200R1, E201R1, and E202R1

### **Attachments**

1. Pre-Bid Meeting Agenda
2. Pre-Bid Meeting Sign-In Sheet
3. Existing Utility Sheets – Balloon Park and Zoo
4. Sub-Grade Prep Sheet AD1.0
5. Updated Structural Sheet S100
6. Updated Electrical Sheets E102, E200R1, E201R1, and E202R1

All other provisions of the Contract Documents shall remain unchanged. This addendum is hereby made part of the Contract Documents to the same extent as though contained in the original documents and itemized listings thereof.

Each bidder is required to acknowledge receipt of each addendum in Section 3 of the Bid Proposal, failure to do so could render the bid non-responsive.

Plan holders: As a courtesy, please fill out the information below and fax this page back to the City of Alamogordo, Attention: Barbara Pyeatt, Purchasing Manager at 575-439-4117 or replying via e-mail to: [bpyeatt@ci.alamogordo.nm.us](mailto:bpyeatt@ci.alamogordo.nm.us)

Received By (Company): \_\_\_\_\_

Date Received: \_\_\_\_\_

Number of sheets received: \_\_\_\_\_

Time Received: \_\_\_\_\_

Signature: \_\_\_\_\_



**Public Works Bid No. 2021-005**  
**Park Restrooms**  
**PRE-BID MEETING**  
**AGENDA**  
**October 19, 2021**

1. Sign-in sheet and introductions
2. Project scope: construction of new ADA-compliant restrooms at the Alameda Park Zoo and at the Balloon Fiesta Park.
3. The licensing requirement is GB-98
4. Schedule: Balloon Fiesta Park restroom (Bid Lot 1 or 2) – 90 calendar days  
Alameda Park Zoo restroom (Bid Lot 3) – 90 calendar days
5. BID OPENING is Wednesday, November 8, 2021 at 1:30 pm in Commission Chambers at City Hall. Bidder questions must be submitted by 4:00 pm October 22, 2021. Questions received after that time will not be answered. Bidder questions must be directed to Purchasing either via fax at 575.439.4117 or via email to [bpyeatt@ci.alamogordo.nm.us](mailto:bpyeatt@ci.alamogordo.nm.us). Questions submitted will be answered by written addendum and will be binding.
6. Ten percent (10%) bid preference for local bidders is not applicable for this project. Section 2, Article 33.0 covers In-State Preference and Resident Veterans Preference. A Bidder must specify which preference they would claim if qualifying for more than one. The preference values are not cumulative. Bidder must meet criteria at time of bid opening.
7. Section 2, Article 17.0 lists documents that must be submitted with the bid package.
8. Project cleanup requirements are covered in Chapter 3 of the Technical Standards.
9. Product substitutions are covered in Chapter 4 of the Technical Standards.
10. For contractors familiar with City of Alamogordo Specifications, take note that the specification chapters and standard drawings have been modified.
11. Contractor will be allowed to use existing electricity on-site but will need to provide other utilities, including sanitary facilities for workers. For Reclaimed Water Rates contact the Water Billing Department at 575.439.4288. Locations of Reclaimed Water Hydrants are listed in Chapter 01, Article 01-01-050.
12. Wage Rates apply. See Section 12 of Specifications and Contract Documents. Certified payrolls will be required and can be submitted via email.
13. At the balloon park, contractors will have access to parking and travel-way areas but will not be able to be on the grass field. Access to the zoo site will be through gates at the north end of the zoo. A key will be provided if access will be necessary outside the hours of 8-5. Contractor can store equipment behind the new block wall at the north end of the zoo.
14. Questions and discussion

**Public Works Bid No. 2021-005**

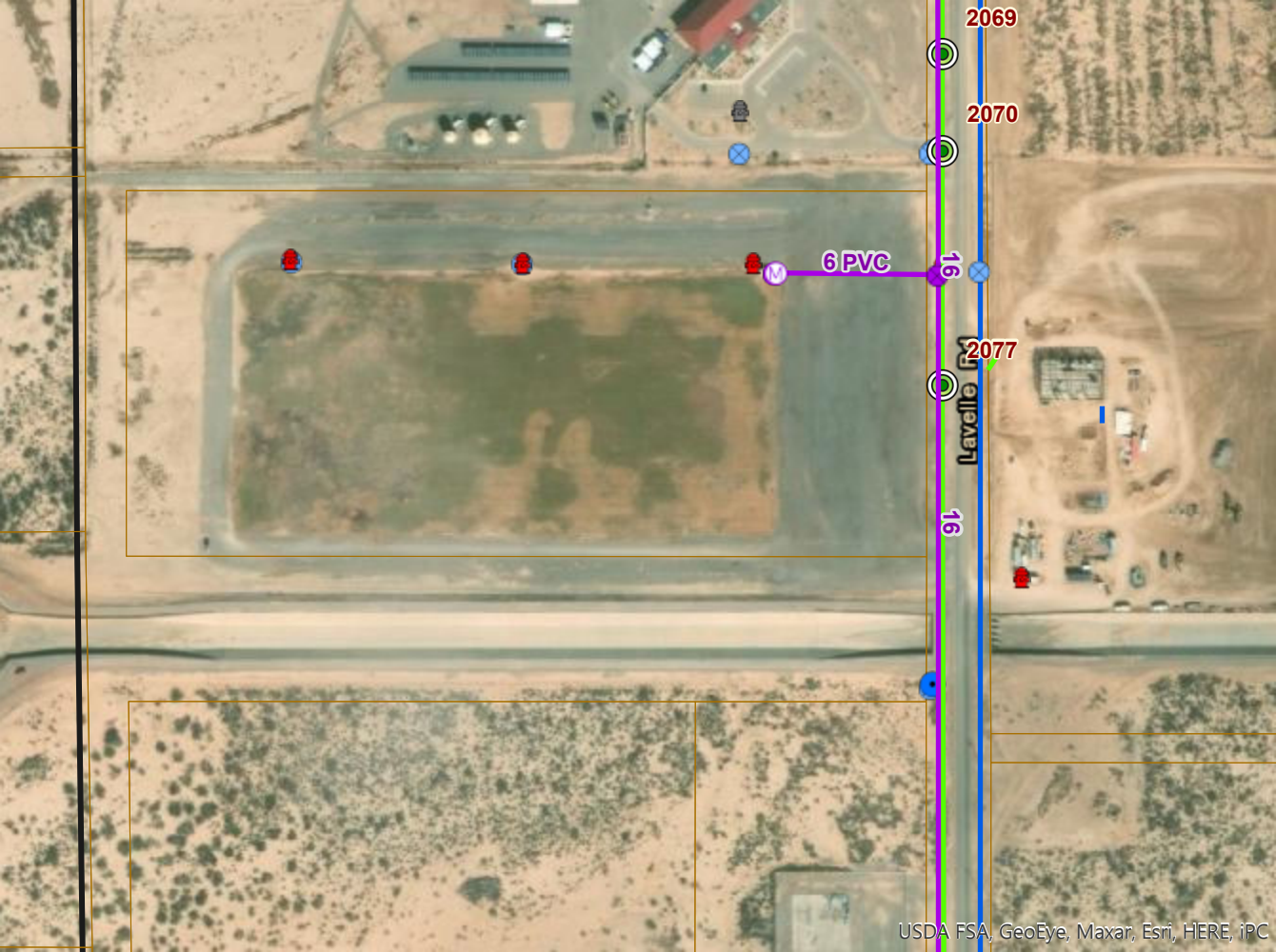
**Park Restrooms**

**Pre-Bid Meeting**

October 19, 2021

SIGN IN SHEET

NAME	ORGANIZATION	CONTACT INFO
Nancy Beshaler	City of Alamogordo	575.439.4235 ext 1
Melody Tamara	National Construction	437-2913
Yolanda DIAZ	MIRADON Enterprises	915 546-4111
Kate Unterwieser	ZOO	575-415-0817
Ben Rodriguez	Miradon Enterprises	915 328 6680
Hectora Martinez	MIRADON	915-546-4111
Lawrence Brookes	GENERAL HYDRONICS	(525) 640-7388
Neil Stone	Stone Electric	575-437-1822
ABEL NATIVIDAD	STUDIO D ARCH	575-635-8719
Veronica Ortega	C.O.A.	575-439-4324
Bob Johnson	C.O.A.	575-439-4235 X3
Enrik Manion	C.O.A.	575-439-4139
Michael Romriell	Triple L Electric	575-491-3106
Allen Gorby	Jack Wayne Construction	575-437-6657



2069

2070

6 PVC

16

2077

Lavalle

16



6PVC

N White Sands

54

1,246

1,243

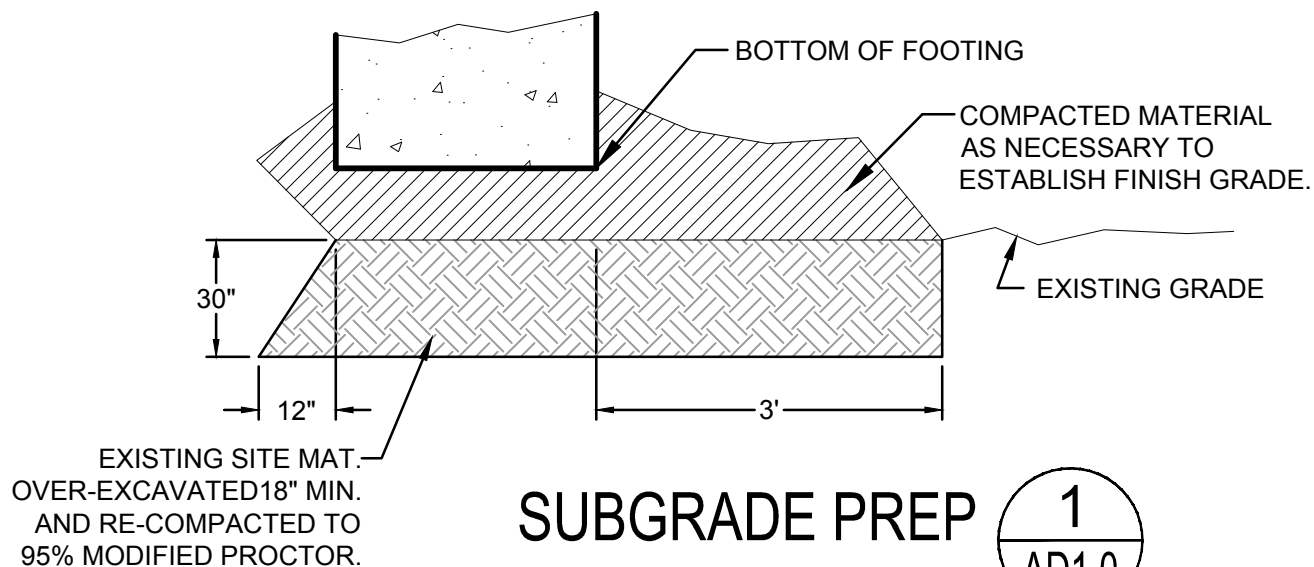
200

1299

Estn, HERE, IPC

**SUB-GRADE NOTES:**

1. IF A GEO-TECHNICAL REPORT IS NOT AVAILABLE, USE THIS DETAIL FOR ALL SUB-GRADE PREPARATION.
2. THE TOP 30" OF IN-SITU MATERIAL BELOW THE PROPOSED BUILDING ENVELOPE SHALL BE REMOVED AND RECOMPACTED.
3. ADDITIONAL COMPACTED SOIL LAYERS MAY BE ADDED ABOVE THE EXISTING SITE GRADE BASE ON THE FINAL SITE GRADING PLAN.
4. COMPACTED SOILS SHALL EXTEND A MINIMUM OF 5'-0" HORIZONTALLY OUTWARD FROM THE EXTERIOR EDGES OF THE FOOTING.



**SUBGRADE PREP**



REVISED / ADDED  
DRAWING

ALAMOGORDO  
PARK RESTROOMS

ALAMOGORDO, NEW MEXICO

Project no: 21.16

Date: 10.25.21

ADDENDUM 01

**AD1.0**



**GENERAL NOTES :**

- CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND SITE CONDITIONS BEFORE COMMENCING WORK.
- DETAILS ON THESE DRAWINGS ARE TYPICAL FOR AND APPLY TO SIMILAR PROJECT CONDITIONS REGARDLESS OF WHETHER OR NOT THEY ARE SPECIFICALLY REFERENCED.
- VERIFY SLAB RECESSES AND LOCATION OF FLOOR DRAINS, IF ANY.
- COORDINATE WITH OTHER DRAWINGS FOR SLEEVES AND PENETRATIONS THROUGH SLAB AND ROOF.
- BUILDING STRUCTURE SHALL BE TEMPORARILY BRACED DURING CONSTRUCTION AGAINST LATERAL LOADS UNTIL PERMANENT BRACING SYSTEM IS IN PLACE.

**CONCRETE NOTES :**

- CONCRETE MIXES :
 

	MIN. STRENGTH, FYP PSI	MAX. AGG. SIZE, IN	SLUMP, IN	MAX. W/C
FOOTINGS	3,000	1 1/2	4 - 6	-
SLABS, BEAMS	3,000	1 1/2	3 - 5	0.50
COMPOSITE SLAB	3,000	3/4	3 - 5	-

\* CONCRETE STRENGTH AT 28 DAYS
- CONCRETE SHALL BE NORMAL WEIGHT UNLESS NOTED OTHERWISE.
- GRADE BEAM SIDES SHALL BE FORMED.
- EXPOSED SLAB EDGES SHALL BE CHAMFERED 3/4".
- CONSOLIDATE ALL CONCRETE WITH MECHANICAL VIBRATORS.

**FOUNDATION NOTES :**

- ENGINEERED FILL SHALL BE PLACED & COMPACTED IN 8-INCH LOOSE LIFTS COMPACTED TO MIN 95% OF MAXIMUM DRY DENSITY IN ACCORDANCE WITH ASTM D 1557. EACH LIFT OF COMPACTED-ENGINEERED FILL SHALL BE TESTED BY THE GEOTECHNICAL ENGINEER PRIOR TO PLACEMENT OF SUBSEQUENT LIFTS.
- FOOTINGS SHOULD BE PROTECTED FROM FREEZING IF EXPOSED TO FREEZING TEMPERATURES DURING CONSTRUCTION.
- FOOTING EXCAVATIONS SHOULD BE PROTECTED FROM WEATHER IF EXPOSED FOR MORE THAN ONE DAY.

**REINFORCEMENT NOTES :**

- REINFORCING STEEL SHALL CONFORM WITH ASTM A 615, GRADE 60.
- WELDABLE REINFORCING STEEL SHALL CONFORM TO ASTM A 706.
- UNLESS NOTED OTHERWISE, REINFORCING STEEL SHALL BE LAPPED 24 INCHES.
- TOP BARS SHALL BE SPLICED AT MID-SPAN AND BOTTOM BARS SHALL BE SPLICED AT SUPPORTS UNLESS NOTED OTHERWISE.
- MINIMUM CLEAR SPACING BETWEEN PARALLEL REINFORCING BARS SHALL BE 2 INCHES.
- PROVIDE CORNER BARS OF SAME SIZE AS LONGITUDINAL REINFORCEMENT AND LAP SPLICE 24 INCHES.
- REINFORCEMENT CLEAR CONCRETE COVER :
 

PLACED AGAINST EARTH	: 3"
SIDES OF GRADE BEAM	: 2"
TOP OF SLAB	: 1 1/2"
- SUPPORT REINFORCING STEEL WITH INTER SECTIONAL CHAIRS MANUFACTURED WITH CONTINUOUS RUNNERS OR SAND PLATES.

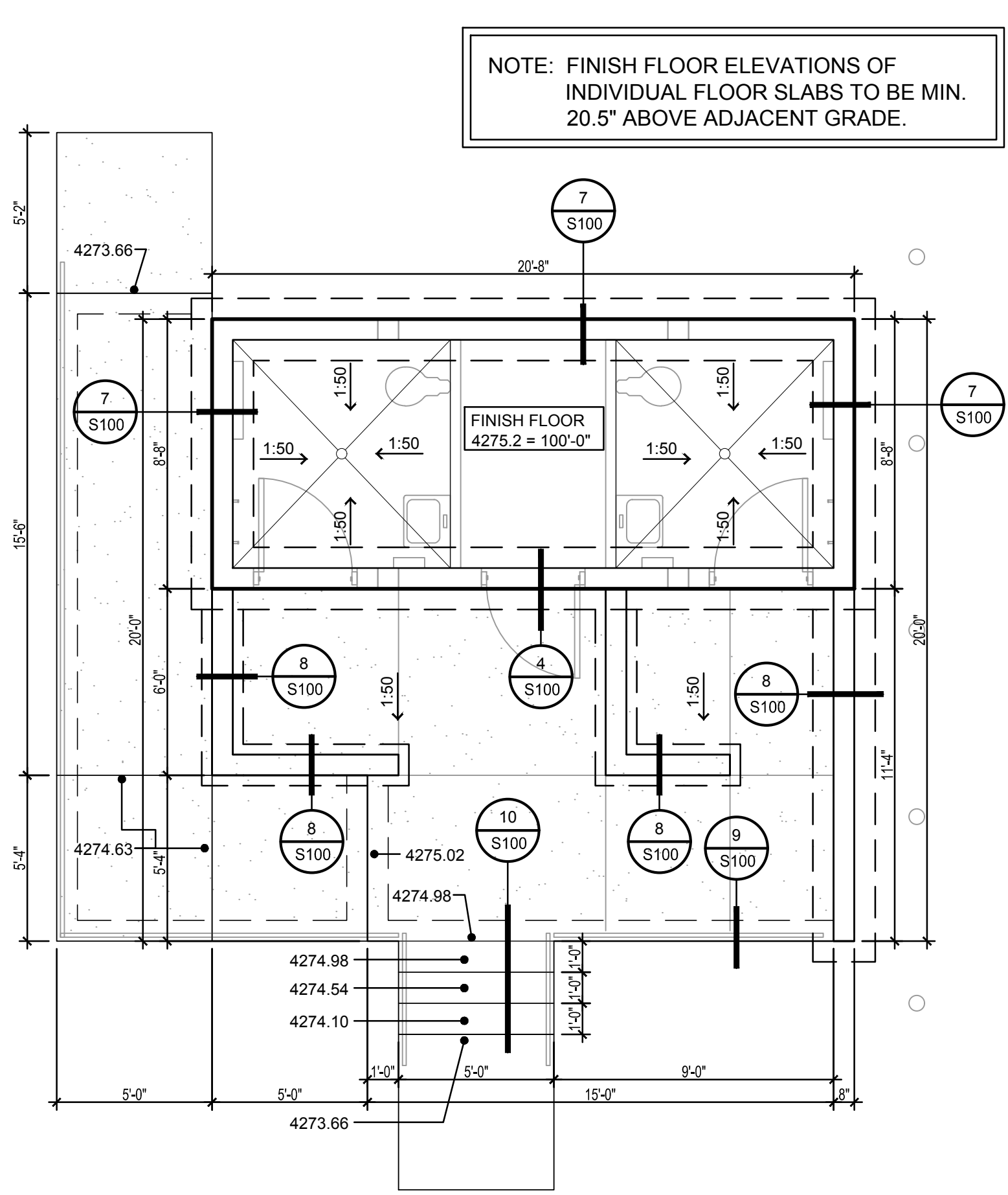
**LEGEND :**

- |            |                                |
|------------|--------------------------------|
| C.J.       | : CONTROL JOINT                |
| F.F. ELEV. | : FINISHED FLOOR ELEVATION     |
| J.B. EL.   | : JOIST BEARING ELEVATION      |
| SIM.       | : SIMILAR                      |
| T.O.B.     | : TOP OF BEAM                  |
| T.O.C.     | : TOP OF COLUMN                |
| T.O.F.     | : TOP OF FOOTING               |
| T.O.P.     | : TOP OF PILASTER/PEDESTAL     |
| T.O.S.     | : TOP OF STEEL                 |
| T.O.W.     | : TOP OF WALL                  |
| TYP.       | : TYPICAL                      |
| H.S.       | : HIGH STRENGTH OR HEADED STUD |
| E.J.       | : WALL EXPANSION JOINT         |
| B.O.B.     | : BOTTOM OF BEAM               |

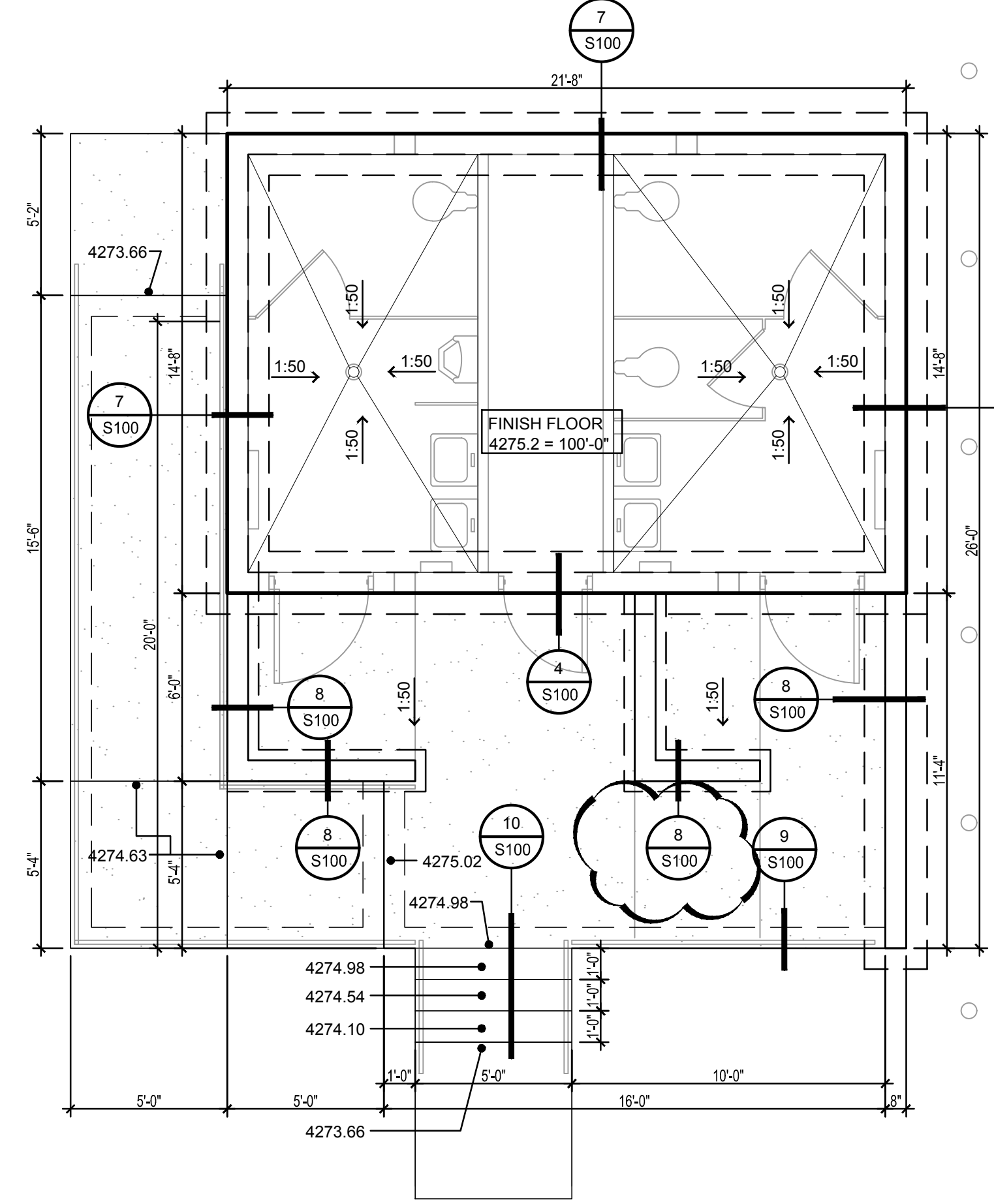
**CONCRETE MASONRY NOTES :**

- CONCRETE MASONRY UNITS, EXCEPT FOR THOSE USED AS BUILDING VENEER, SHALL BE HOLLOW, LOAD-BEARING, TYPE N, CONFORMING TO ASTM C 90.
- REFER TO ARCHITECTURAL DRAWINGS AND SPECIFICATIONS FOR CONCRETE MASONRY UNITS USED FOR BUILDING VENEER.
- MASONRY DESIGN STRENGTH, F<sub>m</sub>, SHALL BE 1,500 PSI.
- REINFORCE CONCRETE MASONRY WALLS AS SHOWN IN DETAILS IN THESE DRAWINGS. IN ADDITION, PROVIDE 1-#5 VERTICAL AT WALL CORNERS, INTERSECTIONS, END OF WALLS AND ADJACENT TO OPENINGS.
- MORTAR SHALL HAVE 28-DAY COMPRESSIVE STRENGTH OF 1,800 PSI.
- FILL ALL CELLS CONTAINING REINFORCEMENT AND THOSE BELOW FINISHED FLOOR WITH GROUT. GROUT SHALL HAVE 28-DAY STRENGTH OF 2,500 PSI.
- PROVIDE 8-INCH BOND BEAMS REINFORCED WITH 2-#4 @ 5" O.C., MAXIMUM. BOND BEAMS SHALL BE DISCONTINUOUS AT WALL CONTROL JOINTS, EXCEPT AT THE ROOF ELEVATION WHERE IT SHALL BE CONTINUOUS.
- CMU LINTELS SHALL BEAR ON JAMBS THE SAME WIDTH AS THE DEPTH OF LINTEL. REINFORCE EACH CELL W/1-#5 VERTICAL & GROUT ALL CELLS.
- REBARS SHALL BE CHAIRED AND BRACED PRIOR TO GROUT BEING PLACED.
- GROUT SHALL HAVE FLUIDITY TO ASSURE FILLING OF ALL CELLS INTENDED TO BE FILLED.

NOTE: FINISH FLOOR ELEVATIONS OF INDIVIDUAL FLOOR SLABS TO BE MIN. 20.5' ABOVE ADJACENT GRADE.

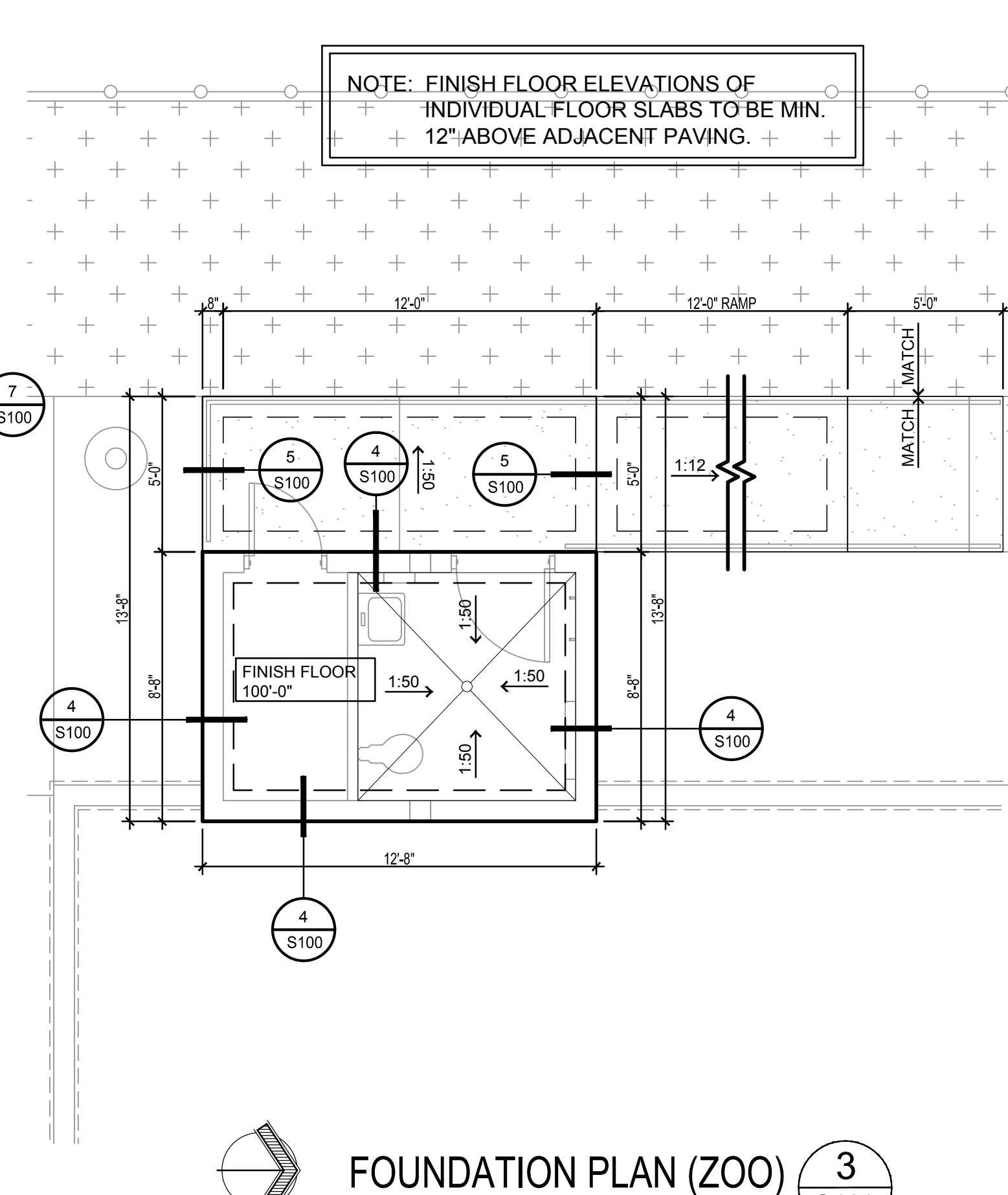


**FOUNDATION PLAN (BALLOON PARK) 1**  
 BID LOT #1 1/4" = 1'-0" S100

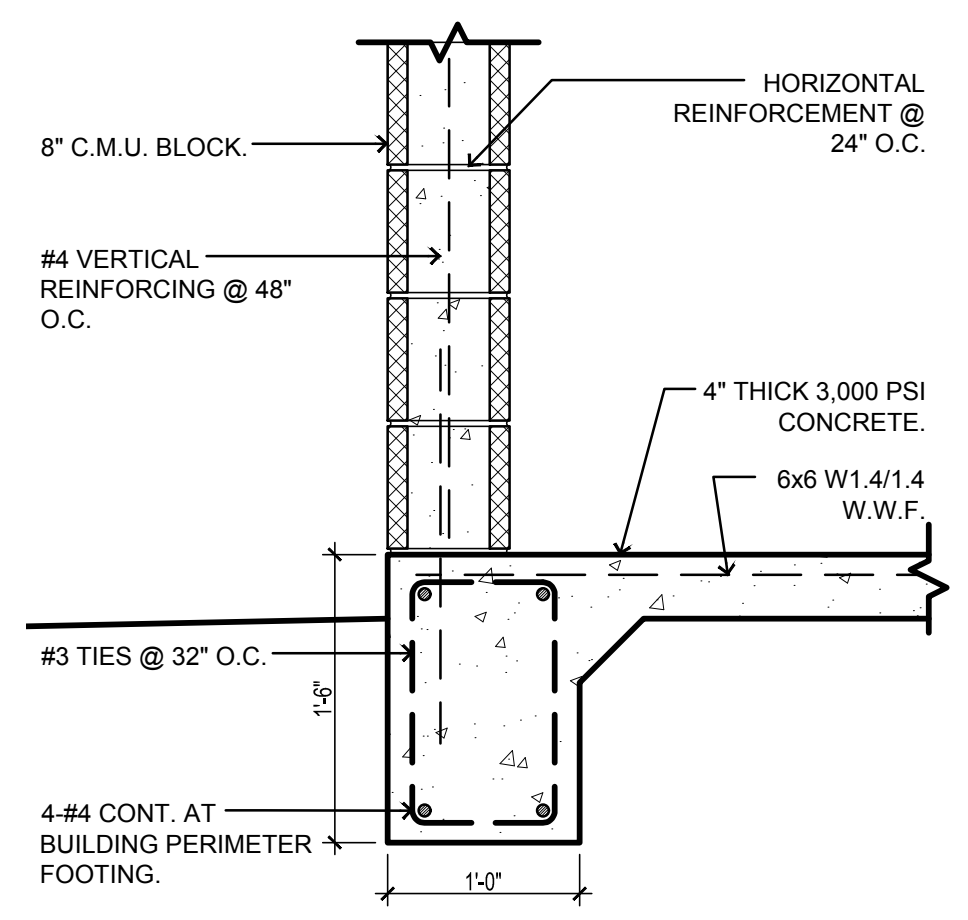


**FOUNDATION PLAN (BALLOON PARK) 2**  
 BID LOT #2 (Alternate to Bid Lot #1) 1/4" = 1'-0" S100

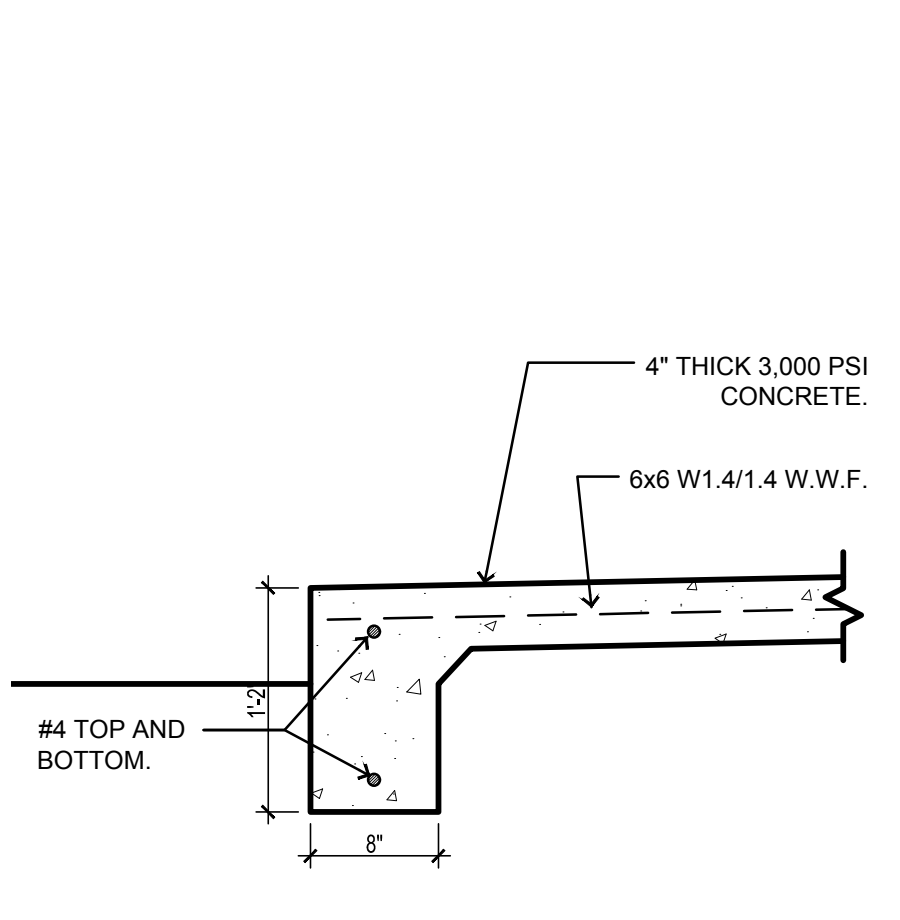
NOTE: FINISH FLOOR ELEVATIONS OF INDIVIDUAL FLOOR SLABS TO BE MIN. 12" ABOVE ADJACENT PAVING.



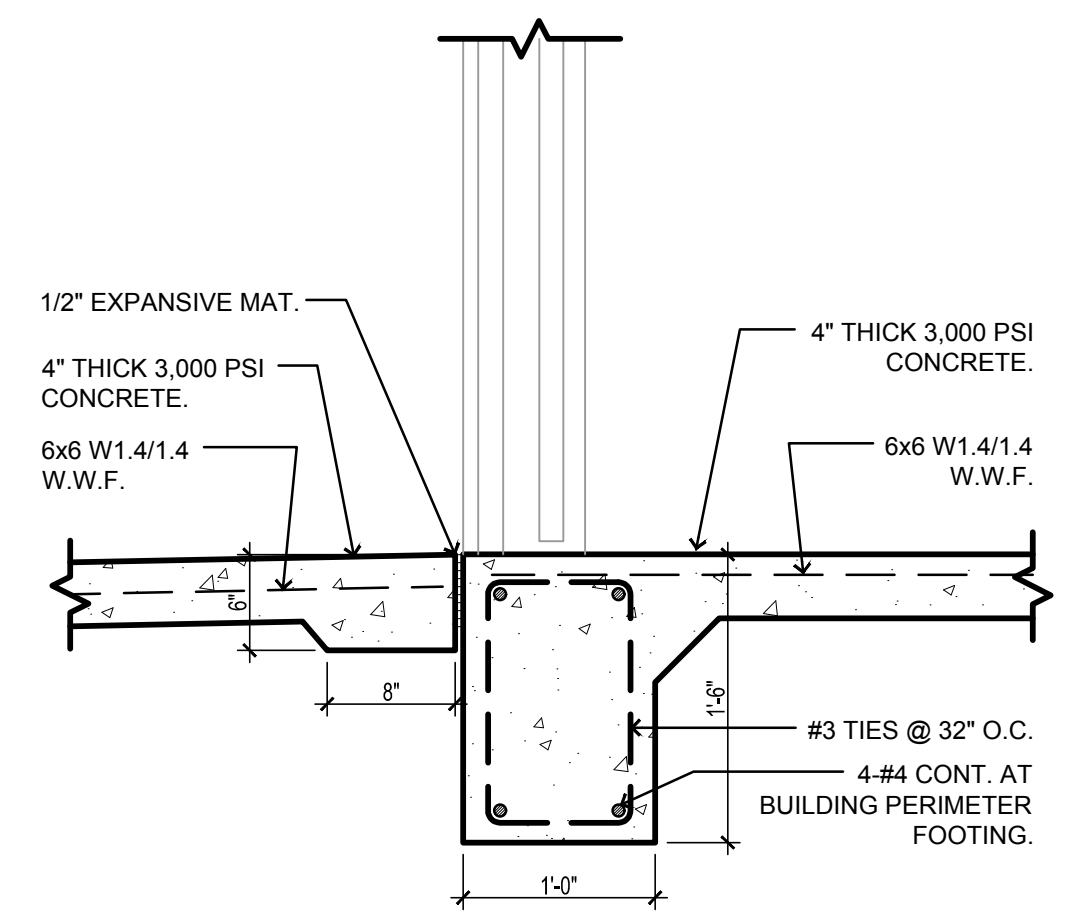
**FOUNDATION PLAN (ZOO) 3**  
 BID LOT #3 1/4" = 1'-0" S100



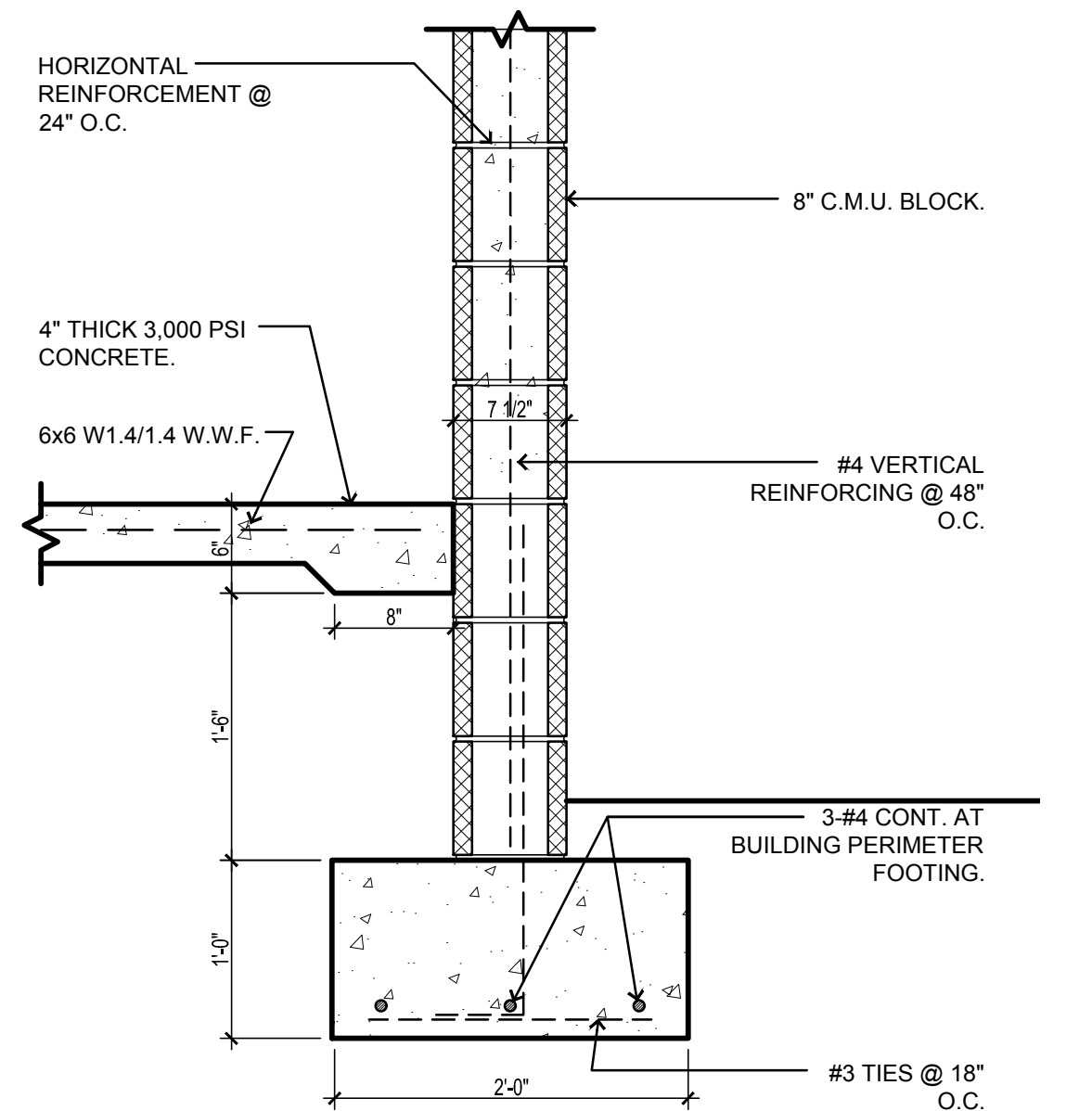
**FOOTING DETAIL 4**  
 1" = 1'-0" S100



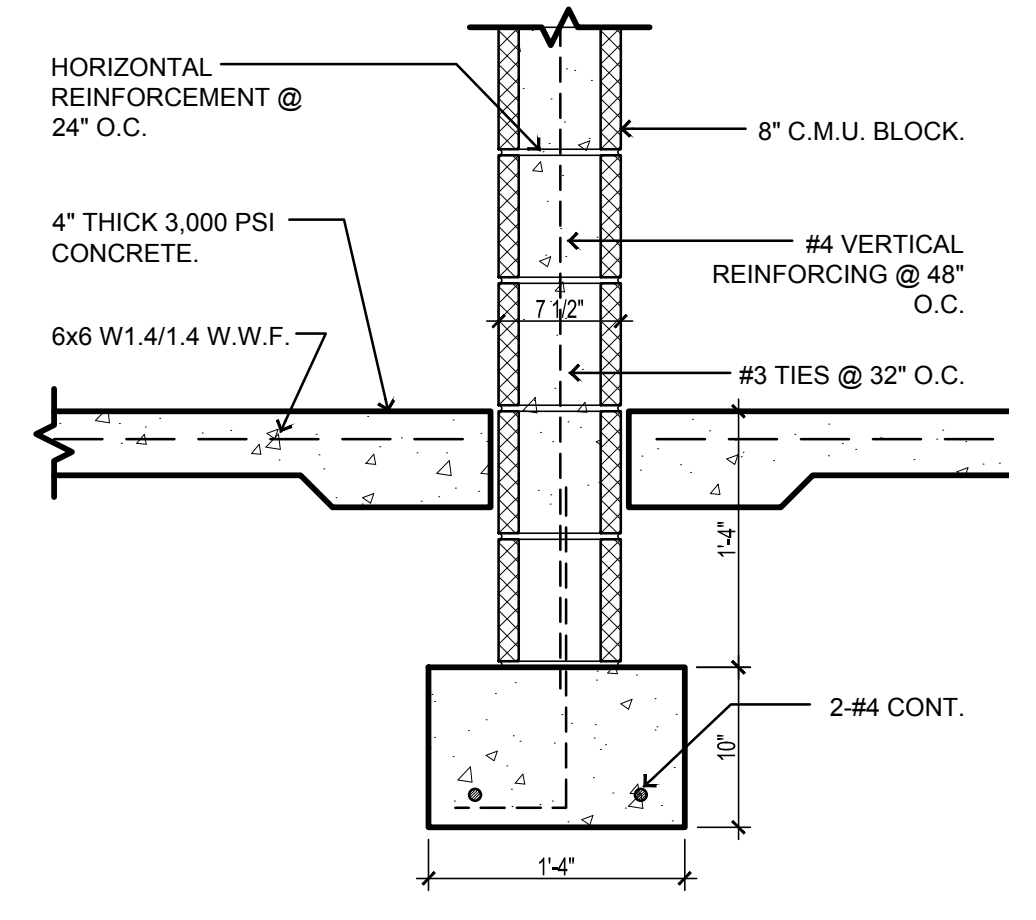
**FOOTING DETAIL 5**  
 1" = 1'-0" S100



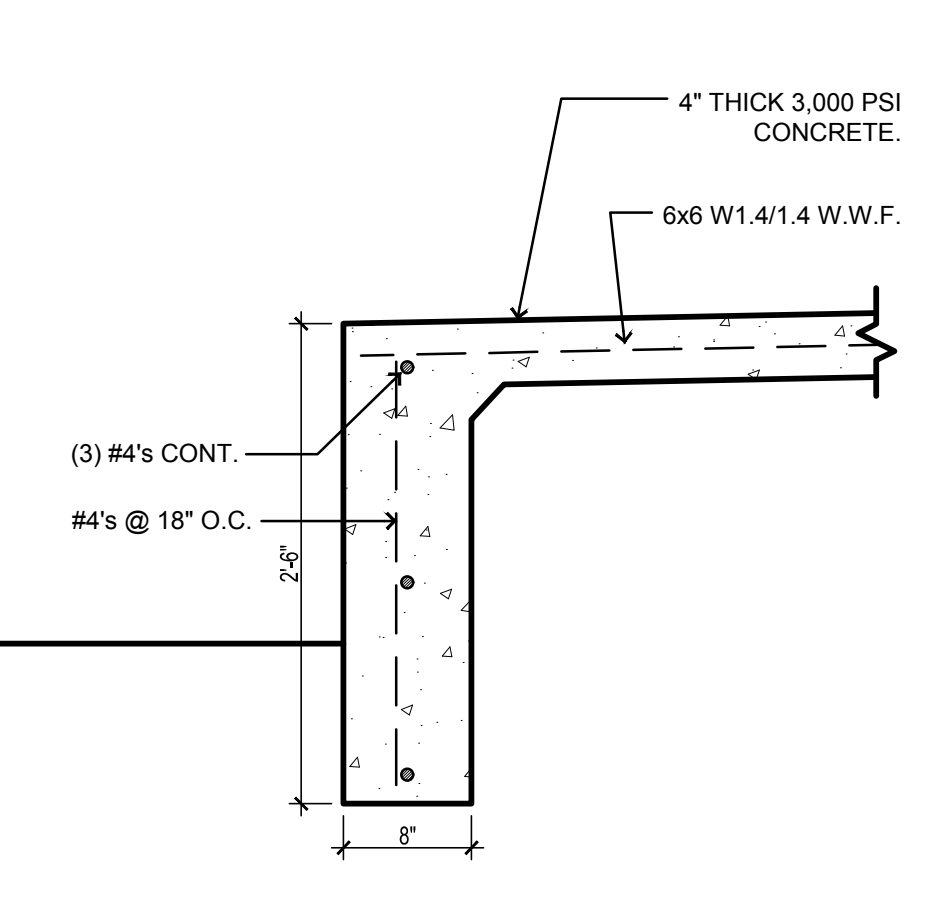
**FOOTING DETAIL 6**  
 1" = 1'-0" S100



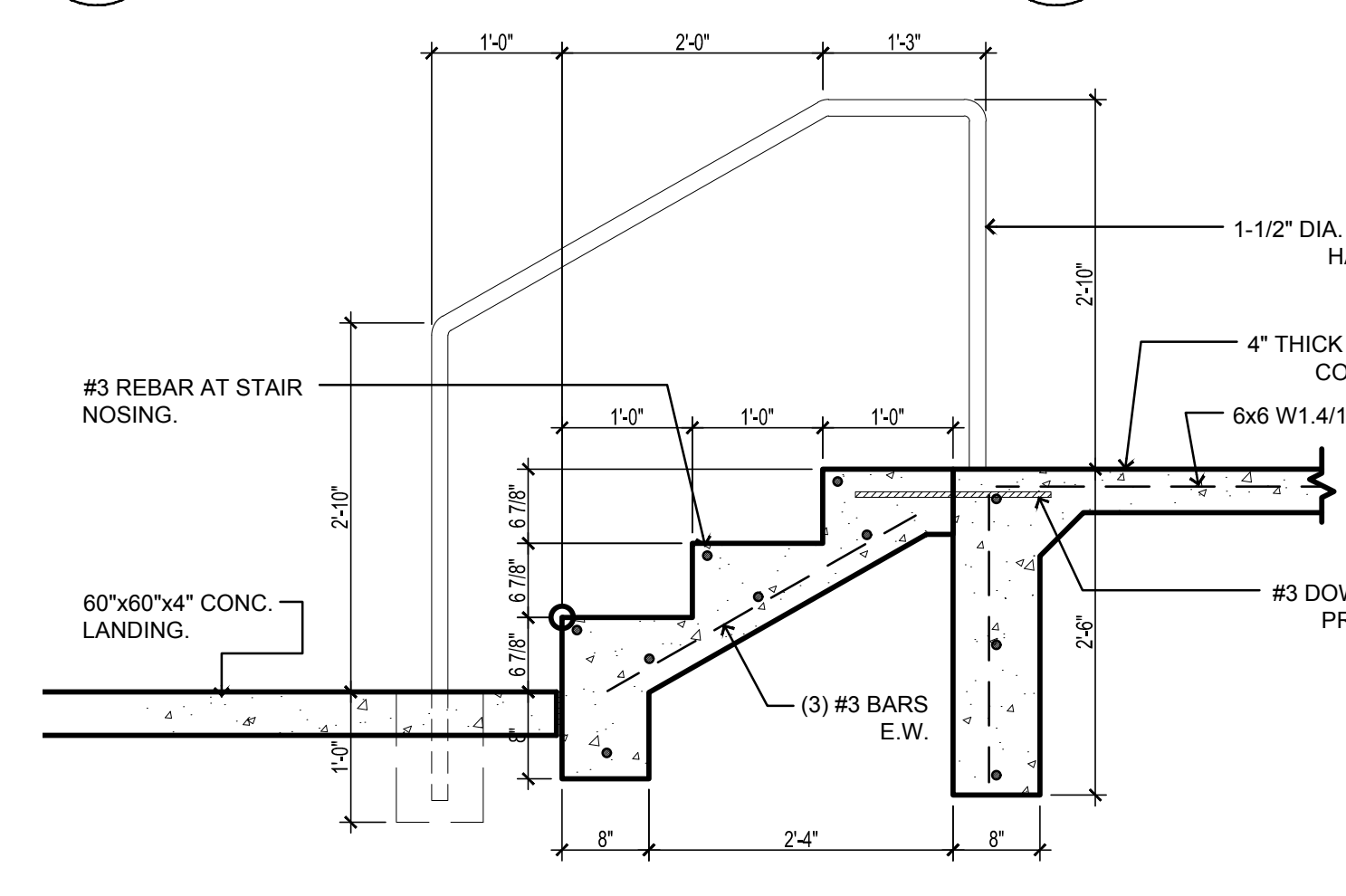
**FOOTING DETAIL 7**  
 1" = 1'-0" S100



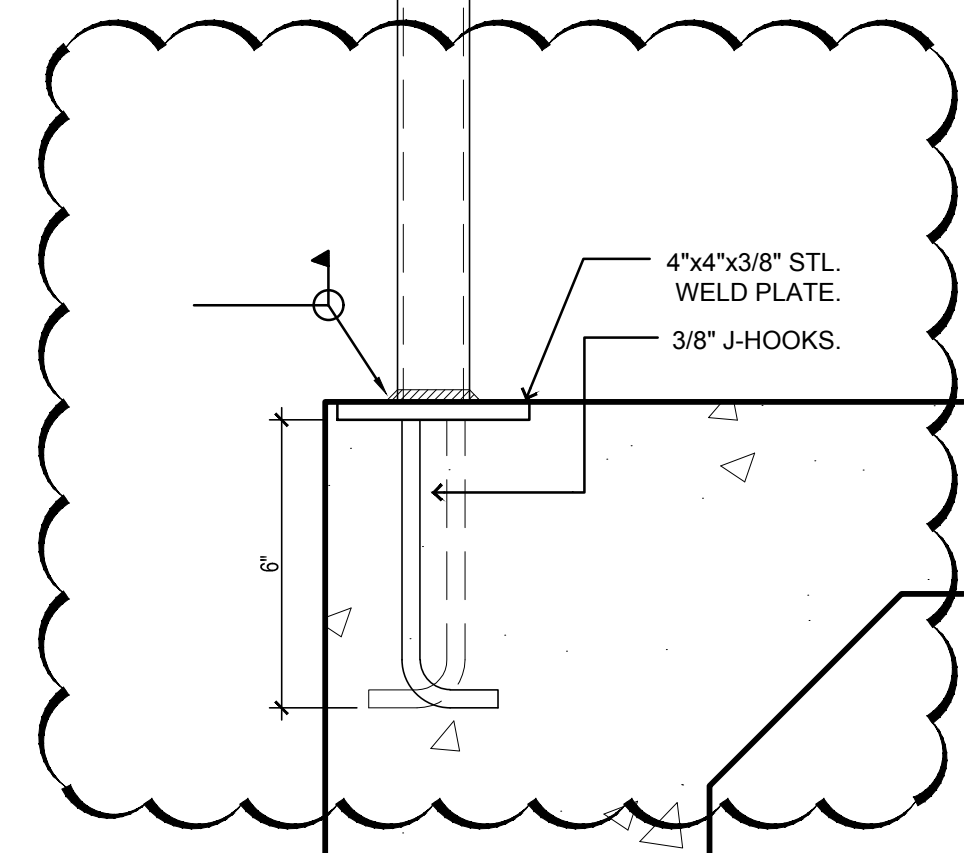
**FOOTING DETAIL 8**  
 1" = 1'-0" S100



**FOOTING DETAIL 9**  
 1" = 1'-0" S100



**STAIR DETAIL 10**  
 3/4" = 1'-0" S100



**WELD PLT. DTL. 11**  
 3" = 1'-0" S100



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**Alamogordo Park Restrooms**

Balloon Fiesta Park  
 Lavelle Rd.  
 Alamogordo, New Mexico

Alameda Park Zoo  
 1021 N. White Sands Blvd.  
 Alamogordo, New Mexico

REVISION	DATE
1	10.25.21
REVISIONS ADD 01	

Project no: 21.16  
 Date: April 2021  
 Sheet:

**FOUNDATION PLANS AND DETAILS**  
**S100**

Date: Oct 25, 2021 - 9:58am User: Station 5  
 Drawing File: K:\2021 Projects\2116 Alamogordo Restroom Projects\DWG\Sheets\2116-S100.dwg  
 Last Saved By: Station 5 Oct 25, 2021 - 9:07am  
 Layout Name: AD1.0



**ELECTRICAL SITE PLAN**

ALAMEDA ZOO NTS

1  
E102

**ELECTRICAL SITE PLAN KEYED NOTES**

1. CONNECT TO EXISTING ELECTRICAL PANEL IN EXISTING BUILDING.

**Alamogordo Park Restrooms**

Balloon Fiesta Park  
Lavelle Rd.  
Alamogordo, New Mexico

Alameda Park Zoo  
1021 N. White Sands Blvd.  
Alamogordo, New Mexico

REVISION	DATE
△ ADDENDUM 1	10-25-21

Project no: 21.16  
Date: April 2021  
Sheet:

**ELECTRICAL  
SITE  
PLAN  
E102**



10-25-21

21-183

**Alamogordo Park Restrooms**

Balloon Fiesta Park  
Lavelle Rd.  
Alamogordo, New Mexico

Alameda Park Zoo  
1021 N. White Sands Blvd.  
Alamogordo, New Mexico

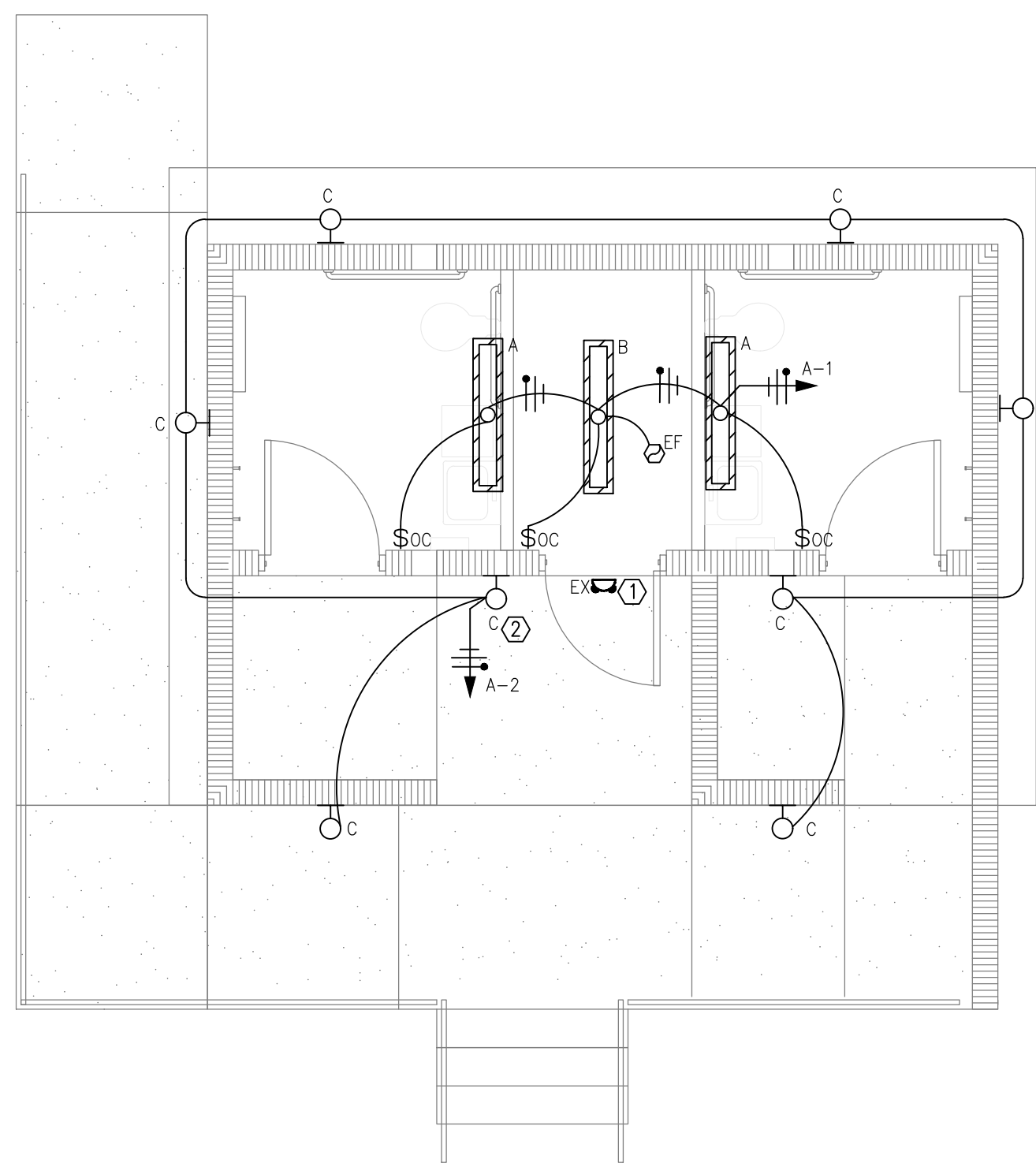
REVISION DATE

ADDENDUM 1 10-25-21

Project no: 21.16  
Date: April 2021  
Sheet:

BIDLOT-1  
ELECTRICAL  
PLAN

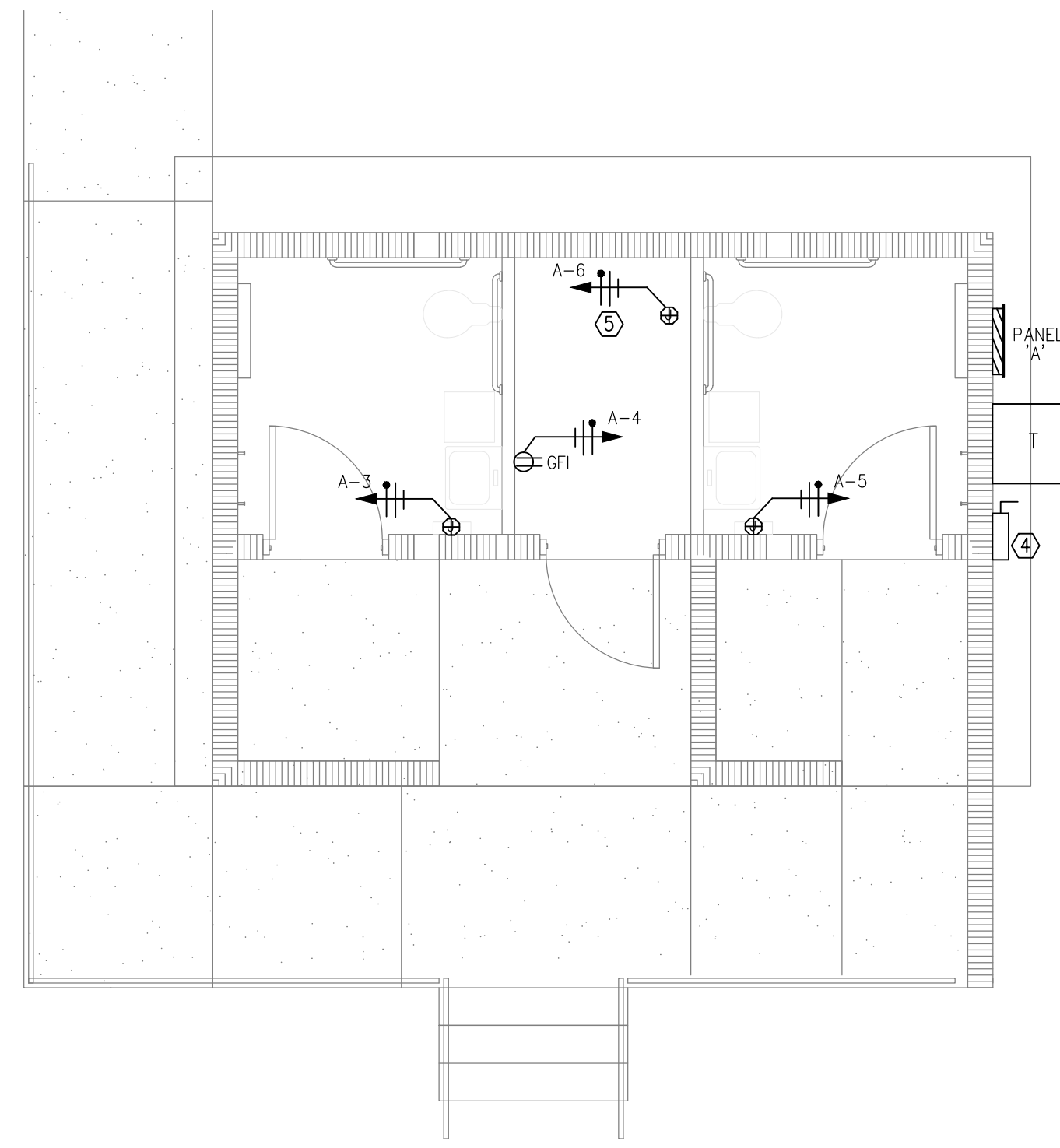
**E200R1**



**LIGHTING PLAN** 1  
BALLOON PARK 1/4" = 1'-0"  
E200

**KEYED NOTES**

- CONNECT ALL EXIT LIGHTS AND EMERGENCY LIGHTS TO HOT LEG OF NEAREST LIGHTING CIRCUIT.
- THIS CIRCUIT TO BE WIRED THRU TIMER CONTACTOR, TIMER CONTACTOR TO BE CONTROLLED BY PHOTOCELL.
- LOCATION OF STEP DOWN TRANSFORMER.
- LOCATION OF 60A NON-FUSED DISCONNECT.
- PIPING HEATING, PROVIDE 4" SQ. J-BOX WITH PLASTER RING. COORDINATE WITH PLUMBING CONTRACTOR FOR EXACT LOCATION.



**POWER PLAN** 2  
BALLOON PARK 1/4" = 1'-0"  
E200

TYPE	MANUFACTURER/MODEL NO.	SUPPLY	LED			COLOR	MOUNTING	NOTES
			DIM	WATTS	TEMP.			
A	FAIL-SAFE HVSL2-4-LD4-STD-40-UNV-O-EDC1	120V		32.7W LED	40K	WHT	WALL	[4]
B	FAIL-SAFE HVSL2-4-LD4-STD-40-UNV-O-EDC1	120V		32.7W LED	40K	WHT	CEILING/WALL	[5]
C	LIGHTWAY BUX-9-LED-4-CBA	120V		12WLED	40K	CBA	WALL	[3]
EX	WEATHERLITE WL-WLEM-WH	120V		INCLUDED		WH	WALL	[2]

NOTES: (1) PROVIDE WITH 90 MIN. MINIMUM POWER LIFE BATTERY  
(2) REMOTE MOUNTED EMERGENCY HEAD, CONNECT TO INTERIOR EXIT SIGN.  
(3) COORDINATE WITH ARCHITECT FOR EXACT MOUNTING HEIGHT  
(4) PROVIDE WITH A WALL BRACKET  
(5) PROVIDE PENDANT MOUNT SUSPENSION SET

GENERAL NOTES:  
(A) FIXTURES SELECTED BASED ON PERFORMANCE AND AESTHETICS.  
(B) ARCHITECT TO SELECT ALL FIXTURE FINISH/COLORS PRIOR TO ORDERING LIGHT FIXTURES.  
(C) SUBSTITUTIONS MUST BE PRE-APPROVED. PROVIDE SUBSTITUTION SUBMITTALS FOR REVIEW 10 BUSINESS DAYS PRIOR TO BID DATE.  
(D) CONTRACTOR MUST PROVIDE FULL PHOTOMETRIC STUDIES ON SUBSTITUTION FIXTURES.

**COMcheck Software Version 4.1.5.1**  
**Interior Lighting Compliance Certificate**

Project Information  
Energy Code: 2015 IECC  
Project Title:  
Project Type: New Construction  
Construction Site: Owner/Agent: Designer/Contractor:

Additional Efficiency Package(s)  
Unspecified

Allowed Interior Lighting Power

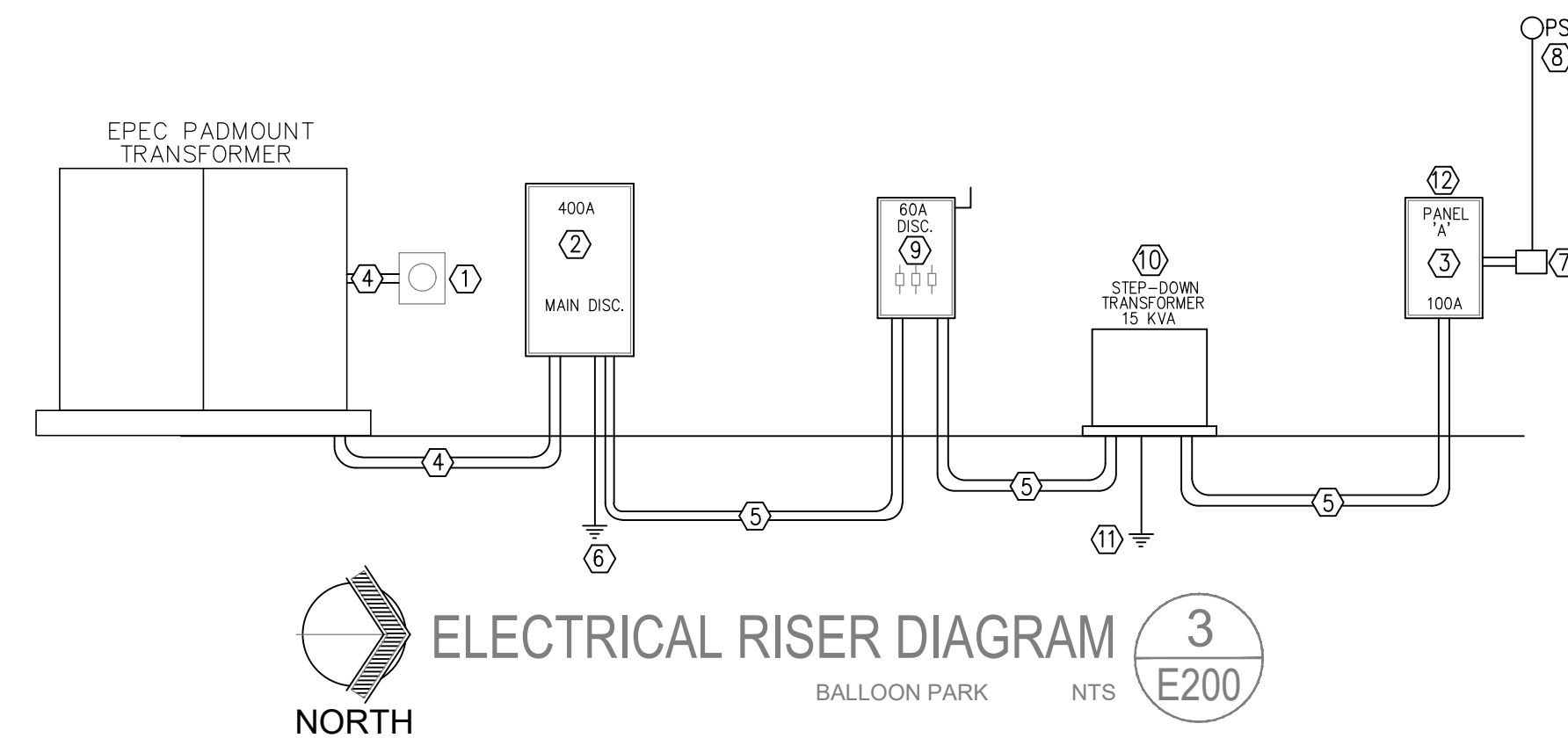
A	B	C	D	E
Area Category	Floor Area (ft <sup>2</sup> )	Allowed Watts / ft <sup>2</sup>	Allowed Watts (B X C)	Allowed Watts (B X C X D)
1-Common Space Types/Restrooms	245	0.98	240	240
Total Allowed Watts = 240				

Proposed Interior Lighting Power

A	B	C	D	E
Fixture ID : Description / Lamp / Wattage Per Lamp / Ballast	Lamps/ Fixture	# of Fixtures	Fixture Watt.	(C X D)
1-Common Space Types/Restrooms	1	2	33	66
A: Other:	1	1	33	33
B: Other:				
Total Proposed Watts = 99				

Interior Lighting PASSES: Design 59% better than code

Interior Lighting Compliance Statement  
Compliance Statement: The proposed interior lighting design represented in this document is consistent with the building plans, specifications, and other calculations submitted with this permit application. The proposed interior lighting systems have been designed to meet the 2015 IECC requirements in COMcheck Version 4.1.5.1 and to comply with any applicable mandatory requirements listed in the Inspection Checklist.



**ELECTRICAL RISER DIAGRAM** 3  
BALLOON PARK NTS E200

**ELECTRICAL RISER DIAGRAM KEYED NOTES**

- EXISTING ELECTRIC METER
- MAIN DISCONNECT SERVICE: 400A, 480Y/277V, 3 PHASE, 4 WIRE WITH A 300A MAIN.
- PANEL 'A' 100A, 240/120V, 1 PHASE, 3 WIRE, REFER TO PANEL SCHEDULE.
- 3" CONDUIT WITH 4-#350MCM CU. CONDRS.
- 1" CONDUIT WITH 3-#6 THWN CU. CONDUCTORS AND 1-#8 CU. GROUND.
- EXISTING GROUNDING SYSTEM.
- PROVIDE NEMA 3R, HINGED, WITH LOCKABLE COVER LARGE ENOUGH TO FIT TIME CLOCK, 4 POLE LIGHTING CONTACTOR, AND ASSOCIATED DEVICES.
- PHOTOCELL ON ROOF, FACING SOUTH.
- DISCONNECT 'A': 60A, 240Y/120V, 1 PHASE, 3 WIRE, NEMA 3R.
- NEW 15 KVA, 480-240/120V, 1PH, 3W, STEP DOWN TRANSFORMER. DELTAY-WYE, TP-1 COMPLIANT, K-4 FACTOR, FIRE RATED, CU. WINDINGS, LOW NOISE RATED.
- GROUND SYSTEM PRE SCHEMATIC 1/E300
- ELECTRICAL PANELS TO BE SQUARE D. REFER TO ARCHITECT FOR EXACT REQUIREMENTS.

LOAD TYPE	CKT. NO.	DESCRIPTION	FEED CODE	AMPS	POLE	LOAD KVA	A	C	LOAD KVA	POLE	AMPS	FEED CODE	DESCRIPTION	CKT. NO.	LOAD TYPE
LT	1	BATHROOM LIGHTS		20	1	0.1	0.22		0.12	1	20		OUTSIDE LIGHTS	2	LT
RE	3	HAND DRYER		20	1	0.8		1.6	0.8	1	20		CHASE OUTLET	4	RE
RE	5	HAND DRYER		20	1	0.8	2.3		1.5	1	20		PIPE HEATING	6	RE
	7	SPARE		20	1			0		1	20		SPARE	8	
	9	SPARE		20	1		0			1	20		SPARE	10	
	11	SPARE		20	1			0		1	20		SPARE	12	
	13	SPARE		20	1		0			1	20		SPARE	14	
	15	SPARE		20	1			0		1	20		SPARE	16	

TOTAL KVA: 2.52, 1.6  
TOTAL AMPS: 21.0, 13.3

LOAD TYPE	CONNECTED KVA	CONNECTED AMPS	DESIGN FACTOR	DESIGN LOAD KVA	DESIGN LOAD AMPS
LIGHTS	0.2	0.9	1.25	0.28	1.1
RECEPTACLES	3.90	16.3	1.0	3.90	16.3
MOTOR	0.00	0.0	NEC	0.00	0.0
AC	0.00	0.0	1.25	0.00	0.0
KITCHEN	0.00	0.0	1.0	0.00	0.0
OTHER	0.00	0.0	NEC	0.00	0.0
TOTAL	4.12	17.2		4.18	17.4

LOAD TYPE	CKT. NO.	DESCRIPTION	FEED CODE	AMPS	POLE	LOAD KVA	A	B	C	LOAD KVA	POLE	AMPS	FEED CODE	DESCRIPTION	CKT. NO.	LOAD TYPE
OT	1	EXISTING LOAD		40	2	2.0	4		2	2	40			EXISTING LOAD	2	OT
OT	3	EXISTING LOAD		20			4		2	2	40			EXISTING LOAD	4	OT
OT	5	EXISTING LOAD		20				4	2	2	40			EXISTING LOAD	6	OT
OT	7	EXISTING LOAD		40	2	2.0	4		2	2	40			EXISTING LOAD	8	OT
OT	9	EXISTING LOAD		20				4	2	2	40			EXISTING LOAD	10	OT
OT	11	EXISTING LOAD		40	2	2.0			4	2	40			EXISTING LOAD	12	OT
OT	13	EXISTING LOAD		20					2	2	40			EXISTING LOAD	14	OT
OT	15	EXISTING LOAD		40	2	2.0	4		2	2	40			EXISTING LOAD	16	OT
OT	17	EXISTING LOAD		20					2	2	40			EXISTING LOAD	18	OT
OT	19	EXISTING LOAD		30	3	1.0	3		2	2	40			EXISTING LOAD	20	OT
OT	21	EXISTING LOAD		20				6	5					EXISTING LOAD	22	OT
OT	23	PANEL 'A'		35	2	1.0			6.02	5	3	100		EXISTING LOAD	24	OT
OT	25	120/240, 1PH		1.6	6.6				5					EXISTING LOAD	26	OT
	27	SPARE		20	1			0		1	20			SPARE	28	
	29	SPARE		20	1			0		1	20			SPARE	30	

TOTAL KVA: 21.6, 18, 17.02  
TOTAL AMPS: 78.0, 65.0, 61.4

LOAD TYPE	CONNECTED KVA	CONNECTED AMPS	DESIGN FACTOR	DESIGN LOAD KVA	DESIGN LOAD AMPS
LIGHTS	0.00	0.0	1.25	0.00	0.0
RECEPTACLES	0.00	0.0	1.0	0.00	0.0
MOTOR	0.00	0.0	NEC	0.00	0.0
AC	0.00	0.0	1.25	0.00	0.0
KITCHEN	0.00	0.0	1.0	0.00	0.0
OTHER	56.62	68.2	NEC	56.62	68.2
TOTAL	56.62	68.2		56.62	68.2

PHASE A: 21.6  
PHASE B: 18  
PHASE C: 17.02  
UNBALANCE %: 21.20



10-25-21

21-183

**Alamogordo Park Restrooms**

Balloon Fiesta Park  
Lavelle Rd.  
Alamogordo, New Mexico

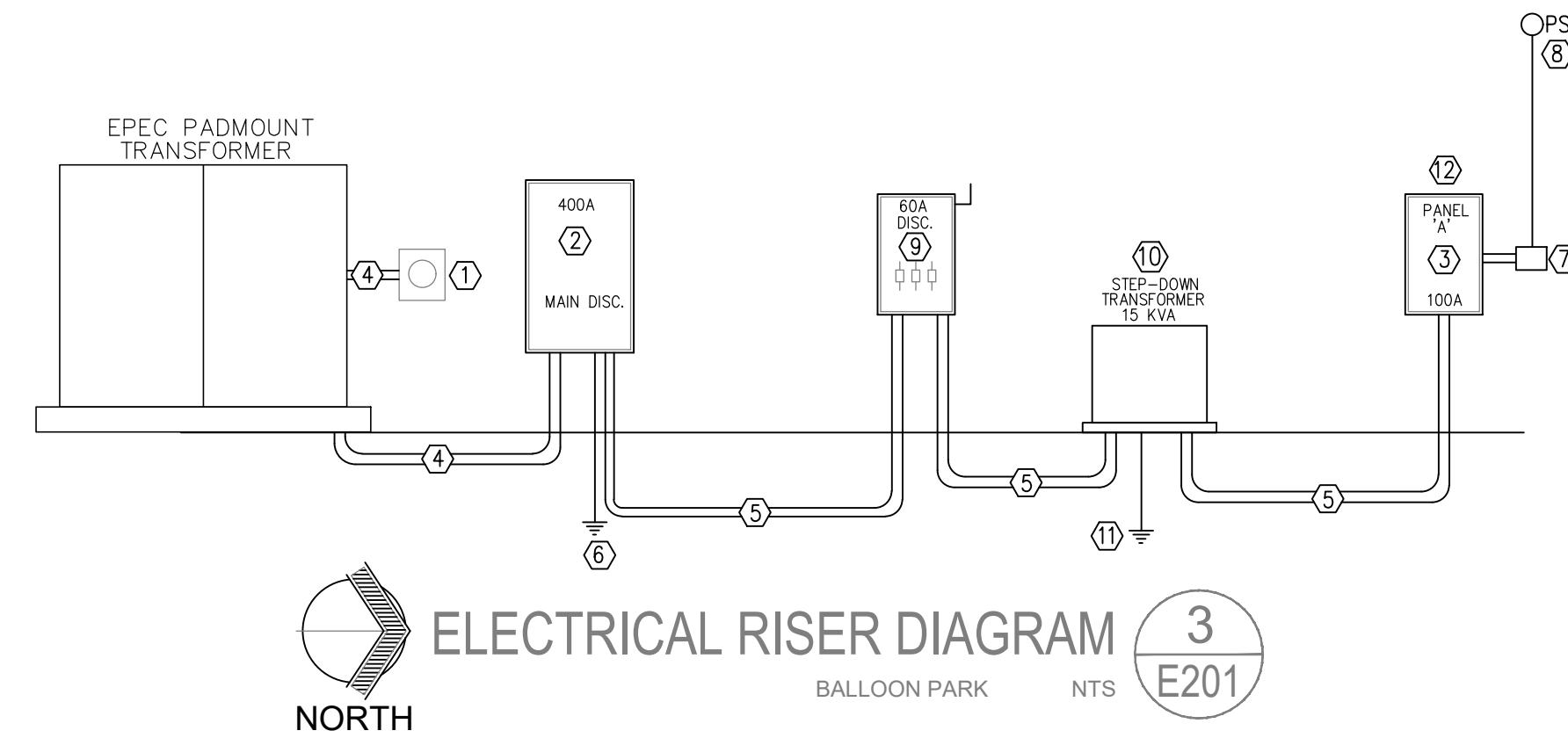
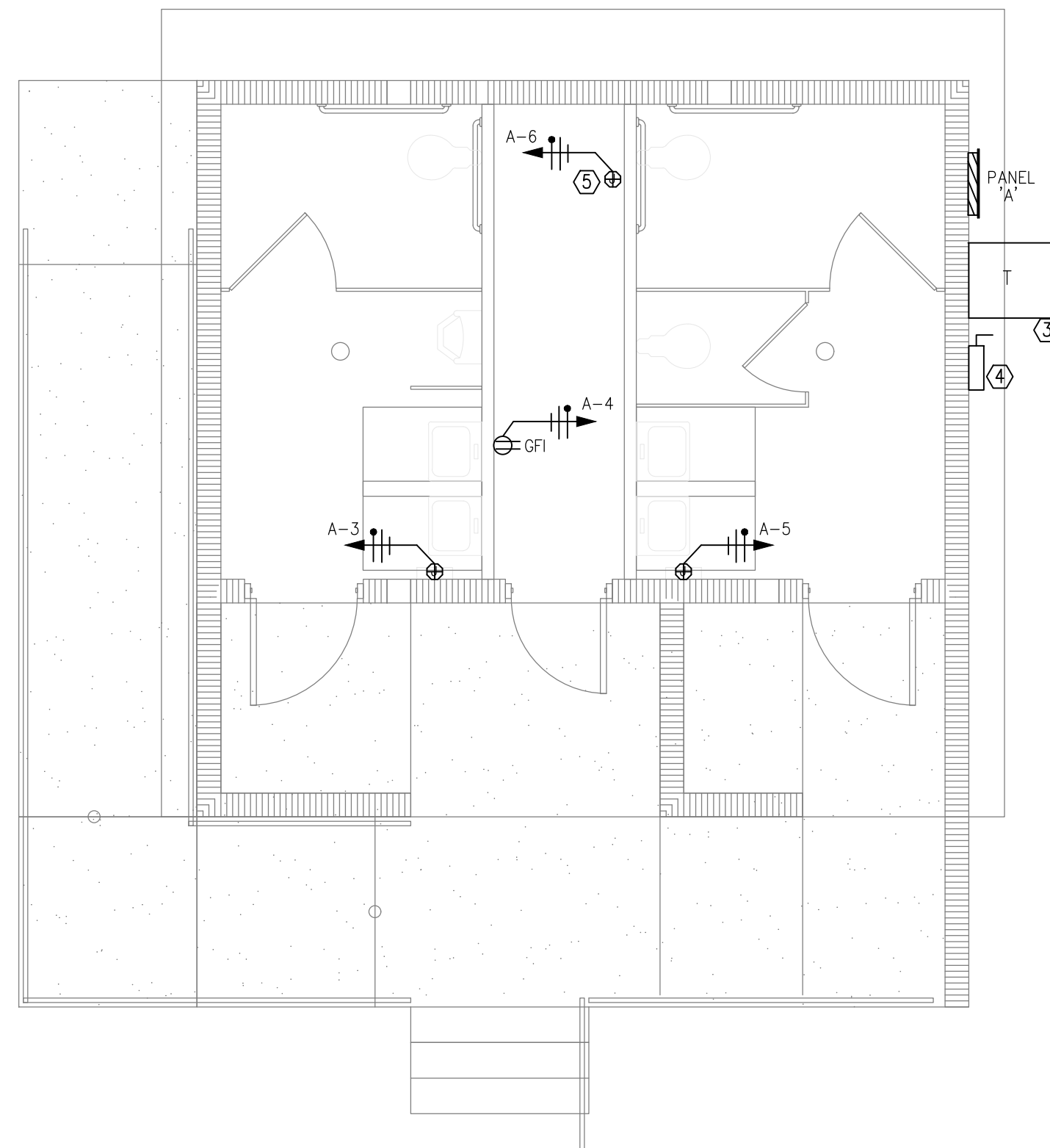
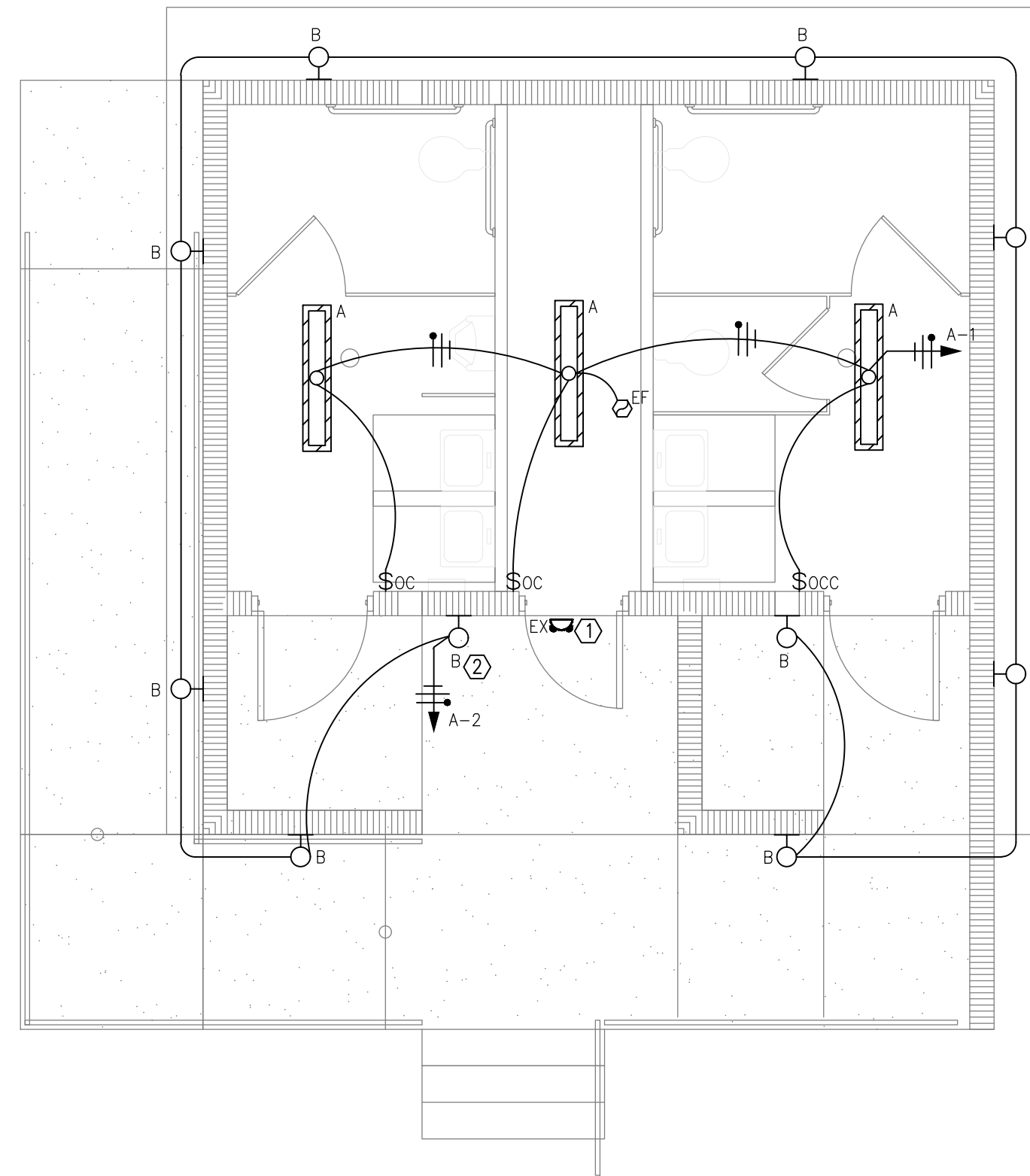
Alameda Park Zoo  
1021 N. White Sands Blvd.  
Alamogordo, New Mexico

REVISION DATE

ADDENDUM 1 10-25-21

Project no: 21.16  
Date: April 2021  
Sheet:

BIDLOT-2 ELECTRICAL PLAN  
**E201R1**



**ELECTRICAL RISER DIAGRAM KEYED NOTES**

- EXISTING ELECTRIC METER
- MAIN DISCONNECT SERVICE: 400A, 480Y/277V, 3 PHASE, 4 WIRE WITH A 300A MAIN.
- PANEL 'A' 100A, 240/120V, 1 PHASE, 3 WIRE, REFER TO PANEL SCHEDULE.
- 3" CONDUIT WITH 4-#350MCM CU. CONDRS.
- 1" CONDUIT WITH 3-#6 THWN CU. CONDUCTORS AND 1-#8 CU. GROUND.
- EXISTING GROUNDING SYSTEM.
- PROVIDE NEMA 3R, HINGED, WITH LOCKABLE COVER LARGE ENOUGH TO FIT TIME CLOCK, 4 POLE LIGHTING CONTACTOR, AND ASSOCIATED DEVICES.
- PHOTOCELL ON ROOF, FACING SOUTH.
- DISCONNECT 'A': 60A, 240Y/120V, 1 PHASE, 3 WIRE, NEMA 3R.
- NEW 15 KVA, 480-240/120V, 1PH, 3W, STEP DOWN TRANSFORMER. DELTAY-WYE, TP-1 COMPLIANT, K-4 FACTOR, FIRE RATED, CU. WINDINGS, LOW NOISE RATED.
- GROUND SYSTEM PRE SCHEMATIC 1/E300
- ELECTRICAL PANELS TO BE SQUARE D. REFER TO ARCHITECT FOR EXACT REQUIREMENTS.

**ALTERNATE LIGHTING PLAN 1**  
BALLOON PARK 1/4" = 1'-0"  
E201

**KEYED NOTES**

- CONNECT ALL EXIT LIGHTS AND EMERGENCY LIGHTS TO HOT LEG OF NEAREST LIGHTING CIRCUIT.
- THIS CIRCUIT TO BE WIRED THRU TIMER CONTACTOR, TIMER CONTACTOR TO BE CONTROLLED BY PHOTOCELL.
- LOCATION OF STEP DOWN TRANSFORMER.
- LOCATION OF 60A NON-FUSED DISCONNECT.
- PIPING HEATING, PROVIDE 4" SQ J-BOX WITH PLASTER RING. COORDINATE WITH PLUMBING CONTRACTOR FOR EXACT LOCATION.

**ALTERNATE POWER PLAN 2**  
BALLOON PARK 1/4" = 1'-0"  
E201

**LIGHTING FIXTURE SCHEDULE**

TYPE	MANUFACTURER/MODEL NO.	SUPPLY	LED			COLOR	MOUNTING	NOTES
			DIM	WATTS	TEMP.			
A	FAIL-SAFE HVSL2-4-LD4-STD-40-UNV-O-EDC1	120V		32.7W LED	40K	WHT	WALL	[4]
B	FAIL-SAFE HVSL2-4-LD4-STD-40-UNV-O-EDC1	120V		32.7W LED	40K	WHT	CEILING/WALL	[5]
EX	WEATHERLITE WL-WLEM-WH	120V		INCLUDED		WH	WALL	[2]

NOTES: [1] PROVIDE WITH 90 MIN. MINIMUM POWER LIFE BATTERY  
[2] REMOTE MOUNTED EMERGENCY HEAD, CONNECT TO INTERIOR EXIT SIGN.  
[3] COORDINATE WITH ARCHITECT FOR EXACT MOUNTING HEIGHT  
[4] PROVIDE WITH A WALL BRACKET  
[5] PROVIDE PENDANT MOUNT SUSPENSION SET

GENERAL NOTES:  
[A] FIXTURES SELECTED BASED ON PERFORMANCE AND AESTHETICS.  
[B] ARCHITECT TO SELECT ALL FIXTURE FINISH/COLORS PRIOR TO ORDERING LIGHT FIXTURES.  
[C] SUBSTITUTIONS MUST BE PRE-APPROVED. PROVIDE SUBSTITUTION SUBMITTALS FOR REVIEW 10 BUSINESS DAYS PRIOR TO BID DATE.  
[D] CONTRACTOR MUST PROVIDE FULL PHOTOMETRIC STUDIES ON SUBSTITUTION FIXTURES.

**PANEL OR LOAD CENTER - A**

LOAD TYPE	CKT. NO.	DESCRIPTION	FEED CODE	AMPS	POLE	LOAD KVA	A	C	LOAD KVA	POLE	AMPS	FEED CODE	DESCRIPTION	CKT. NO.	LOAD TYPE
LT	1	BATHROOM LIGHTS		20	1	0.1	0.22		0.12	1	20		OUTSIDE LIGHTS	2	LT
RE	3	HAND DRYER		20	1	0.8		1.6	0.8	1	20		CHASE OUTLET	4	RE
RE	5	HAND DRYER		20	1	0.8	2.3		1.5	1	20		PIPE HEATING	6	RE
	7	SPARE		20	1			0		1	20		SPARE	8	
	9	SPARE		20	1		0			1	20		SPARE	10	
	11	SPARE		20	1			0		1	20		SPARE	12	
	13	SPARE		20	1		0			1	20		SPARE	14	
	15	SPARE		20	1			0		1	20		SPARE	16	
						TOTAL KVA	2.52	1.6							
						TOTAL AMPS	21.0	13.3							

**PANEL OR LOAD CENTER INFORMATION**

DESIGNATION: A  
MAIN SIZE: 100A  
MAIN TYPE: M.L.O.  
VOLTS: 120/240  
PHASE: 1  
WIRE: 3  
AIC RATING: 12 KAIC  
NEMA TYPE: 3R/EXTERIOR  
MOUNTING: SURFACE  
SERVED FROM: 15 KVA TRANSFORMER

LOAD TYPE	CONNECTED		DESIGN FACTOR	DESIGN LOAD	
	KVA	AMPS		KVA	AMPS
LIGHTS	0.2	0.9	1.25	0.28	1.1
RECEPTACLES	3.90	16.3	1.0	3.90	16.3
MOTOR	0.00	0.0	NEC	0.00	0.0
AC	0.00	0.0	1.25	0.00	0.0
KITCHEN	0.00	0.0	1.0	0.00	0.0
OTHER	0.00	0.0	NEC	0.00	0.0
TOTAL	4.12	17.2		4.18	17.4

**COMcheck Software Version 4.1.5.3**  
**Exterior Lighting Compliance Certificate**

**Project Information**

Energy Code: 2015 IECC  
Project Title: New Construction  
Project Type: Exterior Lighting Zone  
Exterior Lighting Zone: 1 (Developed area in national or state park (LZ1))

Construction Site: Owner/Agent: Designer/Contractor:

**Allowed Exterior Lighting Power**

A Area/Surface Category	B Quantity	C Allowed Watts / Unit	D Tradable Wattage	E Allowed Watts (B X C)
Main entry (4 ft. of door)	20	20	Yes	80
Main entry (4 ft. of door)	20	20	Yes	80
Main entry (4 ft. of door)	20	20	Yes	80
Illuminated area of facade wall or surface (28 ft2)	0	No	0	0
Entry canopy (7 ft2)	0.25	Yes	2	2
Entry canopy (7 ft2)	0.25	Yes	2	2
Illuminated area of facade wall or surface (22 ft2)	0	No	0	0
Illuminated area of facade wall or surface (21 ft2)	0	No	0	0
Total Tradable Watts (a) =				244
Total Allowed Watts =				244
Total Allowed Supplemental Watts (b) =				500

(a) Wattage tradeoffs are only allowed between tradable areas/surfaces.  
(b) A supplemental allowance equal to 500 watts may be applied toward compliance of both non-tradable and tradable areas/surfaces.

**Proposed Exterior Lighting Power**

A Fixture ID : Description / Lamp / Wattage Per Lamp / Ballast	B Lamps/ Fixture	C # of Fixtures	D Fixture Watt. (C X D)	E (C X D)
Main entry (4 ft. of door width): Tradable Wattage				
B: Other:	1	2	12	24
B: Other:	1	2	12	24
B: Other:	1	1	12	12
Illuminated area of facade wall or surface (28 ft2): Non-tradable Wattage				
B: Other:	1	1	12	12
Entry canopy (7 ft2): Tradable Wattage				
B: Other:	1	2	12	24
B: Other:	1	2	12	24
Illuminated area of facade wall or surface (22 ft2): Non-tradable Wattage				
B: Other:	1	2	12	24
Illuminated area of facade wall or surface (21 ft2): Non-tradable Wattage				
B: Other:	1	2	12	24
Total Tradable Proposed Watts =				108

**Exterior Lighting PASSES: Design 85% better than code**

**Exterior Lighting Compliance Statement**  
Compliance Statement: The proposed exterior lighting design represented in this document is consistent with the building plans, specifications, and other calculations submitted with this permit application. The proposed exterior lighting systems have been designed to meet the 2015 IECC requirements in COMcheck Version 4.1.5.3 and to comply with any applicable mandatory requirements listed in the Inspection Checklist.

**COMcheck Software Version 4.1.5.3**  
**Interior Lighting Compliance Certificate**

**Project Information**

Energy Code: 2015 IECC  
Project Title: New Construction  
Project Type: New Construction

Construction Site: Owner/Agent: Designer/Contractor:

**Additional Efficiency Package(s)**  
Credits: 1.0 Required 0.0 Proposed

**Allowed Interior Lighting Power**

A Area Category	B Floor Area (ft2)	C Allowed Watts / ft2	D Allowed Watts (B X C)
1-Common Space Types: Restrooms	245	0.98	240
Total Allowed Watts =			240

**Proposed Interior Lighting Power**

A Fixture ID : Description / Lamp / Wattage Per Lamp / Ballast	B Lamps/ Fixture	C # of Fixtures	D Fixture Watt. (C X D)	E (C X D)
1-Common Space Types: Restrooms				
A: Other:	1	3	33	98
Total Proposed Watts =				98

**Interior Lighting PASSES: Design 59% better than code**

**Interior Lighting Compliance Statement**  
Compliance Statement: The proposed interior lighting design represented in this document is consistent with the building plans, specifications, and other calculations submitted with this permit application. The proposed interior lighting systems have been designed to meet the 2015 IECC requirements in COMcheck Version 4.1.5.3 and to comply with any applicable mandatory requirements listed in the Inspection Checklist.

**PANEL OR LOAD CENTER - H**

LOAD TYPE	CKT. NO.	DESCRIPTION	FEED CODE	AMPS	POLE	LOAD KVA	A	B	C	LOAD KVA	POLE	AMPS	FEED CODE	DESCRIPTION	CKT. NO.	LOAD TYPE
OT	1	EXISTING LOAD												EXISTING LOAD	2	OT
OT	3	EXISTING LOAD		40	2	2.0		4		2	2	40		EXISTING LOAD	4	OT
OT	5	EXISTING LOAD				2.0			4	2	2	40		EXISTING LOAD	6	OT
OT	7	EXISTING LOAD		40	2	2.0		4		2	2	40		EXISTING LOAD	8	OT
OT	9	EXISTING LOAD				2.0			4	2	2	40		EXISTING LOAD	10	OT
OT	11	EXISTING LOAD		40	2	2.0			4	2	2	40		EXISTING LOAD	12	OT
OT	13	EXISTING LOAD		40	2	2.0		4		2	2	40		EXISTING LOAD	14	OT
OT	15	EXISTING LOAD		40	2	2.0			4	2	2	40		EXISTING LOAD	16	OT
OT	17	EXISTING LOAD				1.0			3	2	2	40		EXISTING LOAD	18	OT
OT	19	EXISTING LOAD		30	3	1.0		3		2	2	40		EXISTING LOAD	20	OT
OT	21	EXISTING LOAD				1.0		6		5				EXISTING LOAD	22	OT
OT	23	PANEL 'A'		35	2	1.0			6.02	5	3	100		EXISTING LOAD	24	OT
OT	25	120/240, 1PH				1.6	6.6			5				EXISTING LOAD	26	OT
	27	SPARE		20	1						1	20		SPARE	28	
	29	SPARE		20	1						1	20		SPARE	30	
						TOTAL KVA	21.6	18	17.02							
						TOTAL AMPS	78.0	65.0	61.4							

**PANELBOARD INFORMATION**

DESIGNATION: H  
MAIN SIZE: 400A  
MAIN TYPE: M.L.O.  
VOLTS: 277/480  
PHASE: 3  
WIRE: 4  
AIC RATING: 12 KAIC  
NEMA TYPE: INTERIOR  
MOUNTING: SURFACE  
SERVED FROM: 400A MAIN C.B.

LOAD TYPE	CONNECTED		DESIGN FACTOR	DESIGN LOAD	
	KVA	AMPS		KVA	AMPS
LIGHTS	0.00	0.0	1.25	0.00	0.0
RECEPTACLES	0.00	0.0	1.0	0.00	0.0
MOTOR	0.00	0.0	NEC	0.00	0.0
AC	0.00	0.0	1.25	0.00	0.0
KITCHEN	0.00	0.0	1.0	0.00	0.0
OTHER	56.62	68.2	NEC	56.62	68.2
TOTAL	56.62	68.2		56.62	68.2

KVA	
PHASE A	21.6
PHASE B	18
PHASE C	17.02
UNBALANCE %	21.20



10-25-21

21-183

# Alamogordo Park Restrooms

Balloon Fiesta Park  
Lavelle Rd.  
Alamogordo, New Mexico

Alameda Park Zoo  
1021 N. White Sands Blvd.  
Alamogordo, New Mexico

REVISION	DATE
ADDENDUM 1	10-25-21

Project no: 21.16  
Date: April 2021  
Sheet:

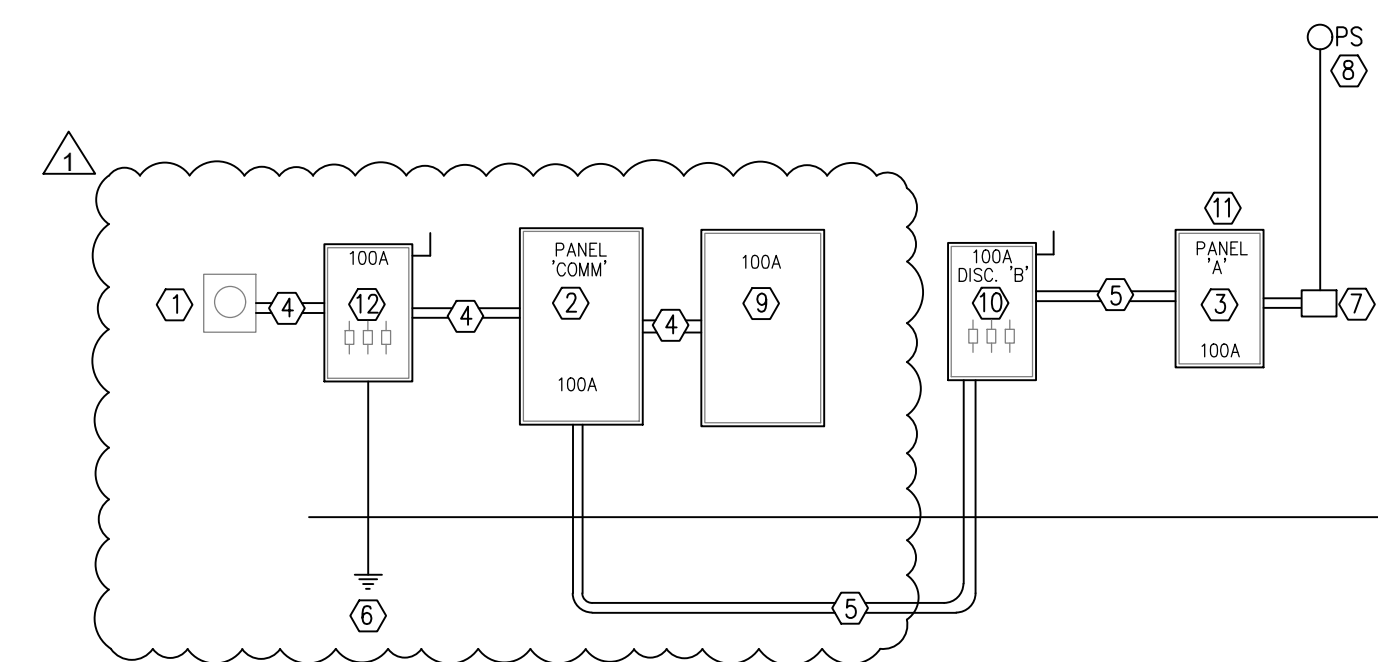
## BIDLOT-3 ELECTRICAL PLAN

# E202R1



10-25-21

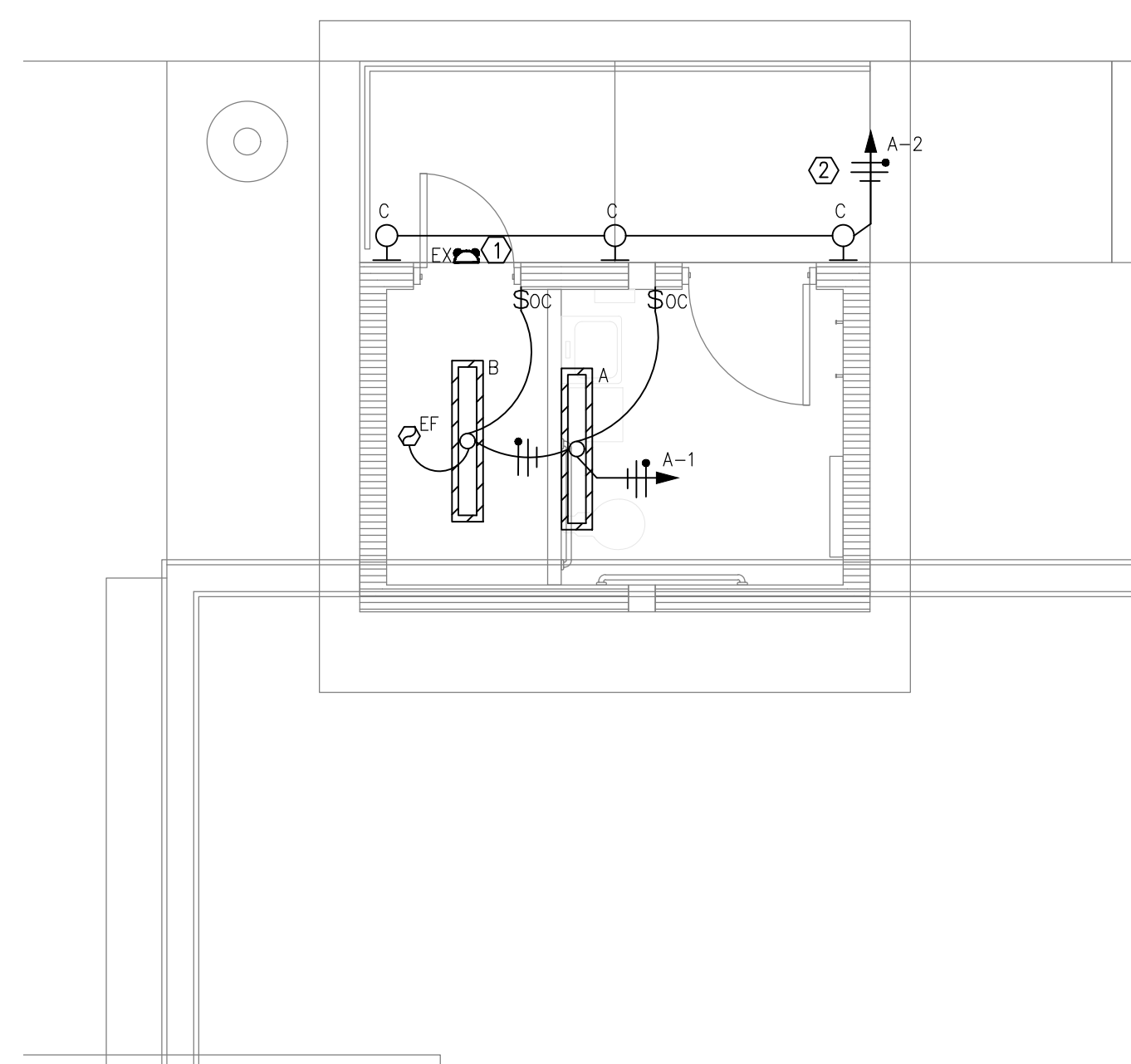
21-183



**ELECTRICAL RISER DIAGRAM** 3  
ALAMEDA ZOO NTS E202

### ELECTRICAL RISER DIAGRAM KEYED NOTES

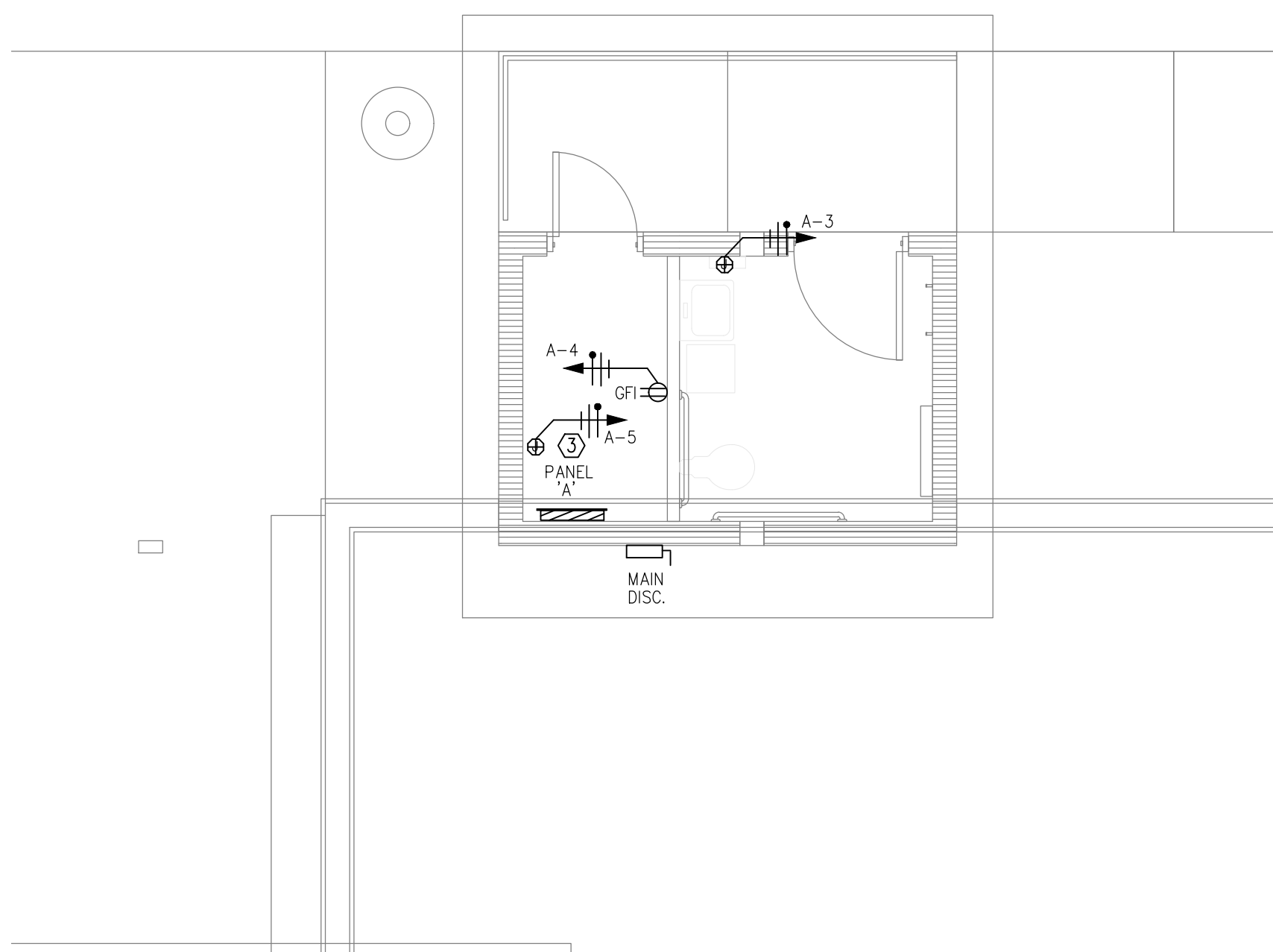
- EXISTING ELECTRIC METER
- EXISTING PANEL 'COMM': 200A, 240Y/120V, 1 PHASE, 3 WIRE. REFER TO PANEL SCHEDULE.
- PANEL 'A' 100A, 240Y/120V, 1 PHASE, 3 WIRE, REFER TO PANEL SCHEDULE.
- EXISTING CONDUIT.
- 1 1/2" CONDUIT WITH 3-#2 THWN CU. CONDUCTORS AND 1-#8 CU. GROUND.
- EXISTING GROUNDING SYSTEM.
- PROVIDE NEMA 3R, HINGED, WITH LOCKABLE COVER LARGE ENOUGH TO FIT TIME CLOCK, 4 POLE LIGHTING CONTACTOR, AND ASSOCIATED DEVICES.
- PHOTOCELL ON ROOF, FACING SOUTH.
- EXISTING GENERATOR 100A TO REMAIN.
- NEW DISCONNECT 'B': 100A, 240Y/120V, 1 PHASE, 3 WIRE, NEMA 3R.
- ELECTRICAL PANEL TO BE SQUARE D. REFER TO ARCHITECT FOR EXACT REQUIREMENTS.
- EXISTING DISCONNECT TO REMAIN.



**LIGHTING PLAN** 1  
ALAMEDA ZOO 1/4" = 1'-0" E202

### KEYED NOTES

- CONNECT ALL EXIT LIGHTS AND EMERGENCY LIGHTS TO HOT LEG OF NEAREST LIGHTING CIRCUIT.
- THIS CIRCUIT TO BE WIRED THRU TIMER CONTACTOR. TIMER CONTACTOR TO BE CONTROLLED BY PHOTOCELL.
- PIPING HEATING, PROVIDE 4" SQ. J-BOX WITH PLASTER RING. COORDINATE WITH PLUMBING CONTRACTOR FOR EXACT LOCATION.



**POWER PLAN** 2  
ALAMEDA ZOO 1/4" = 1'-0" E202

TYPE	MANUFACTURER/MODEL NO.	SUPPLY	LED		COLOR	MOUNTING	NOTES
			DIM	WATTS			
A	FAIL-SAFE HVSL2-4-LD4-STD-40-UNV-O-EDC1	120V	32.7W	LED	40K	WHT	WALL [4]
B	FAIL-SAFE HVSL2-4-LD4-STD-40-UNV-O-EDC1	120V	32.7W	LED	40K	WHT	CEILING/WALL [5]
C	LIGHTWAY-BUX-9-LED-4-CBA	120V	12W	LED	40K	CBA	WALL [3]
EX	WEATHERLITE WL-WLEM-WH	120V				WH	WALL [2]

NOTES: [1] PROVIDE WITH 90 MIN. MINIMUM POWER LIFE BATTERY  
[2] REMOTE MOUNTED EMERGENCY HEAD, CONNECT TO INTERIOR EXIT SIGN.  
[3] COORDINATE WITH ARCHITECT FOR EXACT MOUNTING HEIGHT  
[4] PROVIDE WITH A WALL BRACKET  
[5] PROVIDE PENDANT MOUNT SUSPENSION SET

GENERAL NOTES:  
[A] FIXTURES SELECTED BASED ON PERFORMANCE AND AESTHETICS.  
[B] ARCHITECT TO SELECT ALL FIXTURE FINISH/COLORS PRIOR TO ORDERING LIGHT FIXTURES.  
[C] SUBSTITUTIONS MUST BE PRE-APPROVED. PROVIDE SUBSTITUTION SUBMITTALS FOR REVIEW 10 BUSINESS DAYS PRIOR TO BID DATE.  
[D] CONTRACTOR MUST PROVIDE FULL PHOTOMETRIC STUDIES ON SUBSTITUTION FIXTURES.

### Interior Lighting Compliance Certificate

Project Information		2015 IECC		
Energy Code:	2015 IECC			
Project Title:	New Construction			
Project Type:	1 (Developed Area in National or State Park (LZ1))			
Construction Site:	Owner/Agent:	Designer/Contractor:		
Additional Efficiency Package(s) Unspecified				
Allowed Interior Lighting Power				
A	B	C	D	E
Area Category	Floor Area (ft <sup>2</sup> )	Allowed Watts / ft <sup>2</sup>	Allowed Watts (B X C)	Allowed Watts (B X C X D)
1-Common Space Types/Restrooms	245	0.98	240	240
Total Allowed Watts = 240				
A	B	C	D	E
Fixture ID : Description / Lamp / Wattage Per Lamp / Ballast	Lamps / Fixture	# of Fixtures	Fixture Watt.	(C X D)
1-Common Space Types/Restrooms	1	1	33	33
A: Other:	1	1	33	33
B: Other:				
Total Proposed Watts = 65				
Interior Lighting PASSES: Design 73% better than code				
Compliance Statement: The proposed interior lighting design represented in this document is consistent with the building plans, specifications, and other calculations submitted with this permit application. The proposed interior lighting systems have been designed to meet the 2015 IECC requirements in COMcheck Version 4.1.5.1 and to comply with any applicable mandatory requirements listed in the Inspection Checklist.				

PANEL OR LOAD CENTER - COMM															
LOAD TYPE	CKT. NO.	DESCRIPTION	FEED CODE	AMPS	POLE	LOAD KVA	A	C	LOAD KVA	POLE	AMPS	FEED CODE	DESCRIPTION	CKT. NO.	LOAD TYPE
OT	1	PANEL 'A'		30	2	1.7	1.7			1	20		SPACE	2	
OT	3	240V, 1 PH							1.6	1	20		SPACE	4	
RE	5a	EXISTING OUTLETS OFFICE		20	1	0.8	1.6		0.8	1	20		EXISTING ALARM PARTNER	6	RE
RE	5b	EXISTING EXHAUST FAN		20	1	0.8			1.6	0.8	1	20	EXISTING LIGHTS IN OFFICE	8	RE
RE	7a	EXISTING OUTLETS OFFICE		20	1	0.8	0.8			1	20		SPARE	10	
RE	7b	EXISTING GARAGE		20	1	0.8			0.8	1	20		SPARE	12	
RE	9a	EXISTING LIGHTS		20	1	0.8	1.6		0.8	1	20		EXISTING LIGHTS NORTH	14	RE
RE	9b	EXISTING FLOOD LIGHTS		20	1	0.8			1.6	0.8	1	20	EXISTING OUTLETS NORTH	16	RE
RE	11a	EXISTING UPS		20	1	0.8	1.6		0.8	1	20		EXISTING AIR COND	18	RE
RE	11b	EXISTING UPS		20	1	0.8			0.8	1	20		SPARE	20	
RE	13	EXISTING GENERATOR		50	2	4.2	4.2			1	20			22	
RE	15	EXISTING GENERATOR		20	1	0.8			4.2	1	20			24	
RE	17	EXISTING BATHROOM		20	1	0.8	0.8			1	20			26	
RE	19	EXISTING HEATERS		20	1	0.8			0.8	1	20			28	
						TOTAL KVA	12.3	11.4							
						TOTAL AMPS	102.5	95.0							
PANEL OR LOAD CENTER INFORMATION															
DESIGNATION	COMM														
MAIN SIZE	100A														
MAIN TYPE	M.L.O.														
VOLTS	120/240														
PHASE	1														
Wire	3														
AIC RATING	12 KAIC														
NEMA TYPE	INTERIOR														
MOUNTING	RECESSED														
SERVED FROM	100A, 3 POLE C.B. IN PANEL														
				CONNECTED		DESIGN FACTOR		DESIGN LOAD							
LOAD TYPE	KVA	AMPS	DESIGN FACTOR	KVA	AMPS	KVA	AMPS	KVA	AMPS						
LIGHTS	0.0	0.0	1.25	0.0	0.0										
RECEPTACLES	20.40	85.0	1.0	20.40	85.0										
MOTOR	0.00	0.0	NEC	0.00	0.0										
AC	0.00	0.0	1.25	0.00	0.0										
KITCHEN	0.00	0.0	1.0	0.00	0.0										
OTHER	3.30	13.8	NEC	3.30	13.8										
TOTAL	23.70	98.8		23.70	98.8										

PANEL OR LOAD CENTER - A															
LOAD TYPE	CKT. NO.	DESCRIPTION	FEED CODE	AMPS	POLE	LOAD KVA	A	C	LOAD KVA	POLE	AMPS	FEED CODE	DESCRIPTION	CKT. NO.	LOAD TYPE
LT	1	INTERIOR LIGHTS		20	1	0.1	0.198		0.1	1	20		EXTERIOR LIGHTS	2	LT
RE	3	HAND DRYER		20	1	0.8			1.6	0.8	1	20	CHASE OUTLET	4	RE
RE	5	PIPE HEATING		20	1	1.5	1.5			1	20		SPARE	6	
	7	SPARE		20	1					1	20		SPARE	8	
	9	SPARE		20	1					1	20		SPARE	10	
	11	SPARE		20	1					1	20		SPARE	12	
	13	SPARE		20	1					1	20		SPARE	14	
						TOTAL KVA	1.698	1.6							
						TOTAL AMPS	14.2	13.3							
PANEL OR LOAD CENTER INFORMATION															
DESIGNATION	A														
MAIN SIZE	100A														
MAIN TYPE	M.L.O.														
VOLTS	120/240														
PHASE	1														
Wire	3														
AIC RATING	12 KAIC														
NEMA TYPE	INTERIOR														
MOUNTING	RECESSED														
SERVED FROM	60A MAIN C.B.														
				CONNECTED		DESIGN FACTOR		DESIGN LOAD							
LOAD TYPE	KVA	AMPS	DESIGN FACTOR	KVA	AMPS	KVA	AMPS	KVA	AMPS						
LIGHTS	0.2	0.8	1.25	0.25	1.0										
RECEPTACLES	3.10	12.9	1.0	3.10	12.9										
MOTOR	0.00	0.0	NEC	0.00	0.0										
AC	0.00	0.0	1.25	0.00	0.0										
KITCHEN	0.00	0.0	1.0	0.00	0.0										
OTHER	0.00	0.0	NEC	0.00	0.0										
TOTAL	3.30	13.7		3.35	13.9										

### COMcheck Software Version 4.1.5.3 Exterior Lighting Compliance Certificate

Project Information		2015 IECC		
Energy Code:	2015 IECC			
Project Title:	New Construction			
Project Type:	1 (Developed Area in National or State Park (LZ1))			
Construction Site:	Owner/Agent:	Designer/Contractor:		
Allowed Exterior Lighting Power				
A	B	C	D	E
Area/Surface Category	Quantity	Allowed Watts / Unit	Tradable Wattage	Allowed Watts (B X C X D)
Main entry 4 ft of door	20	Yes	80	
Main entry 4 ft of door	20	Yes	80	
Walkway >= 10 feet wide	22 R2	0.14	Yes	3
Illuminated area of facade wall or surface	12 R2	0	No	0
		Total Tradable Watts (a) =	163	
		Total Allowed Watts (b) =	163	
		Total Allowed Supplemental Watts (d) =	500	
(a) Wattage tradeoffs are only allowed between tradable areas/surfaces.				
(b) A supplemental allowance equal to 500 watts may be applied toward compliance of both non-tradable and tradable areas/surfaces.				
Proposed Exterior Lighting Power				
A	B	C	D	E
Fixture ID : Description / Lamp / Wattage Per Lamp / Ballast	Lamps / Fixture	# of Fixtures	Fixture Watt.	(C X D)
Main entry 4 ft of door w/011: Tradable Wattage	1	2	12	24
C: Other:	1	2	12	24
Walkway >= 10 feet wide (22 R2): Tradable Wattage	1	3	12	36
Illuminated area of facade wall or surface (12 R2): Non-tradable Wattage				
C: Other:	1	3	12	36
Total Tradable Proposed Watts = 84				
Exterior Lighting PASSES: Design 67% better than code				
Compliance Statement: The proposed exterior lighting design represented in this document is consistent with the building plans, specifications, and other calculations submitted with this permit application. The proposed exterior lighting systems have been designed to meet the 2015 IECC requirements in COMcheck Version 4.1.5.3 and to comply with any applicable mandatory requirements listed in the Inspection Checklist.				