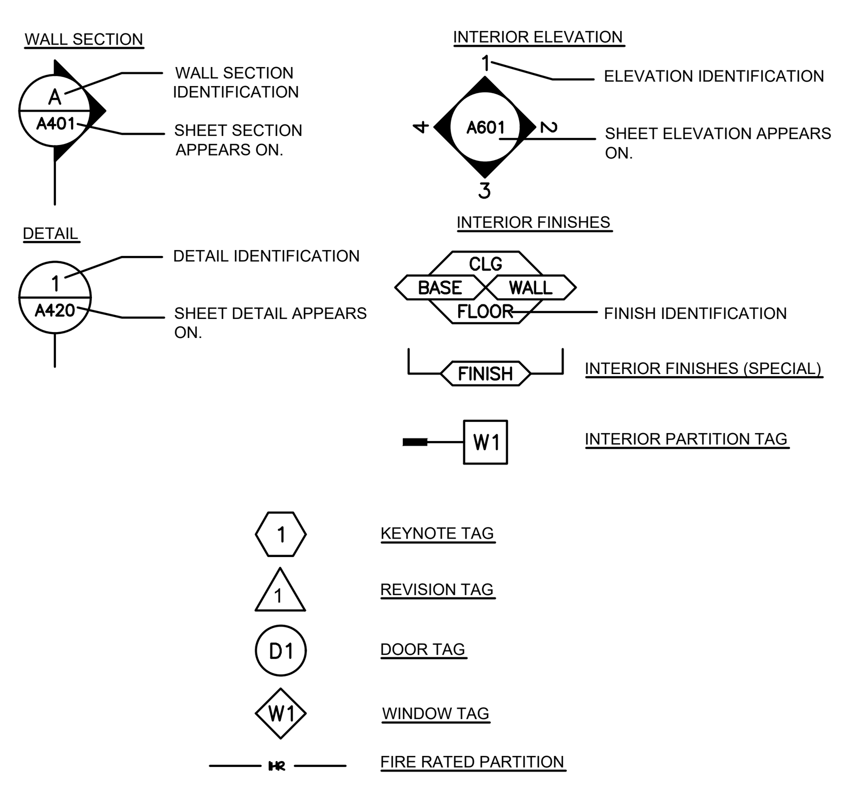
ARCHER LODGE MAINTENANCE BUILDING

SYMBOLS & MATERIALS LEGEND

CONCRETE MASONRY UNIT (PLAN VIEW)	GYPSUM BOARD
CONCRETE MASONRY UNIT (SECTION VIEW)	PLYWOOD
CONCRETE	RIGID INSULATION
BRICK	BATT INSULATION
STEEL/METAL	FOAM INSULATION
WOOD	EARTH
EXISTING WALL	STONE/GRAVEL
	STUCCO/SAND



GENERAL NOTES

1.1 ALL WORK SHALL CONFORM TO AT LEAST THE MINIMUM STANDARDS OF THE NORTH CAROLINA BUILDING CODE (NCBC), 2018 EDITION AND ALL APPLICABLE LOCAL ORDINANCES.

1.2 DESIGN LOADINGS WHERE APPLICABLE ARE INDICATED WITHIN THE STRUCTURAL DRAWINGS AND/OR BUILDING CODE SUMMARY.

1.3 TO THE BEST OF THE ARCHITECT'S KNOWLEDGE, THE ARCHITECTURAL DRAWINGS HAVE BEEN DESIGNED IN ACCORDANCE WITH THE CURRENT BUILDING CODE.

1.4 THE CONTRACTOR SHALL NOTIFY THE ARCHITECT OF ANY DISCREPANCIES PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REVIEW AND DETERMINE THAT DIMENSIONS ARE COORDINATED BETWEEN ARCHITECTURAL, MECHANICAL, ELECTRICAL, PLUMBING AND STRUCTURAL DRAWINGS BEFORE FABRICATION OR CONSTRUCTION. THE ARCHITECT WILL MAKE AVAILABLE UPON REQUEST THE BASE FLOOR PLAN(S) & REFLECTED CEILING PLAN(S) IN AUTOCAD R2000 DWG FORMAT FOR SUB-CONTRACTOR USE IN PREPARATION OF SHOP DRAWINGS. FILES SHALL BE SENT ONLY UPON RECEIPT OF ARCHITECTS ELECTRONIC RELEASE FORM SIGNED BY INDIVIDUAL REQUESTING THE FILE(S) AND A $100 PER FILE TRANSFER FEE.

1.5 WHENEVER AMBIGUITY OR CONFLICT WITHIN THESE CONSTRUCTION DOCUMENTS MAY EXIST, THE MOST STRINGENT REQUIREMENT SHALL APPLY AS INTERPRETED BY THE ARCHITECT.

1.6 IF COMPLIANCE WITH TWO OR MORE STANDARDS IS SPECIFIED AND THE STANDARDS ESTABLISH DIFFERENT OR CONFLICTING REQUIREMENTS, THE MOST STRINGENT REQUIREMENT SHALL APPLY.

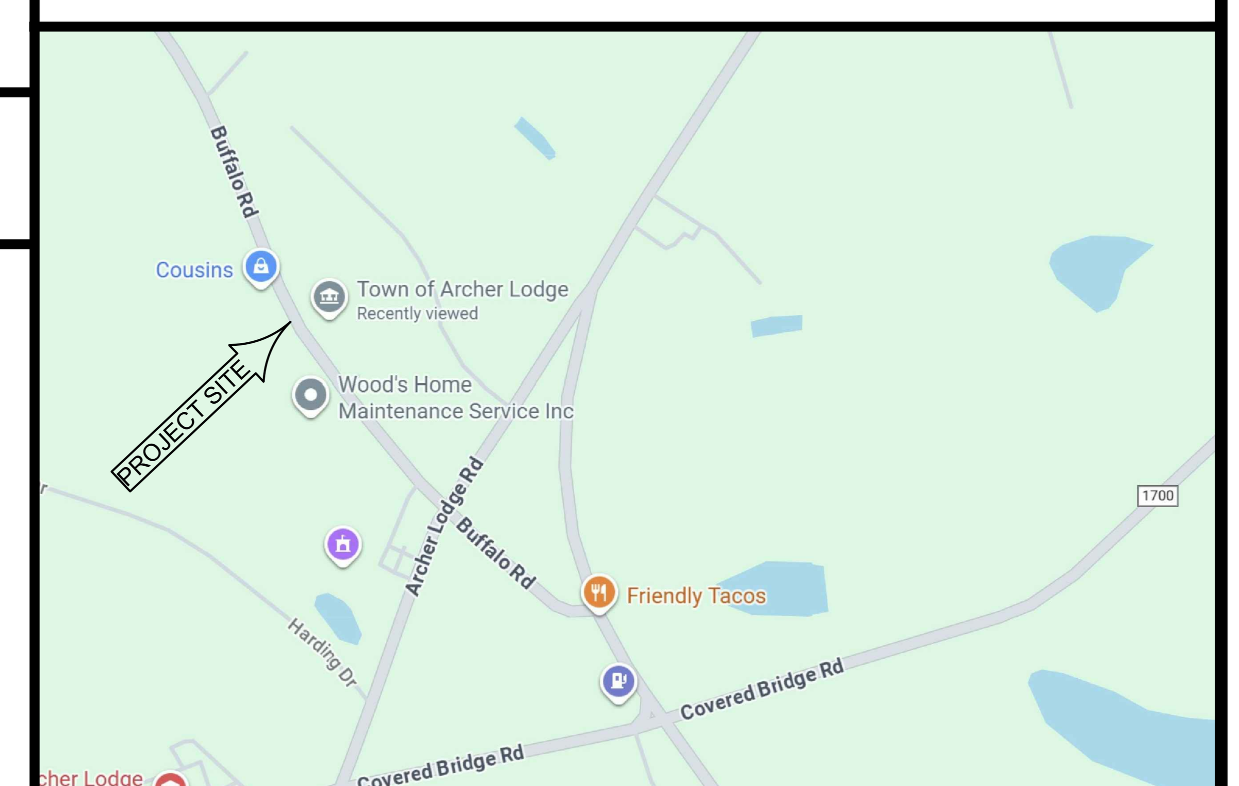
PROJECT TEAM

ARCHITECT:
R. WARD WEBB, ARCHITECT, P.A.
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
PHONE: (252) 606-7860
EMAIL: WGARRYOWEN@CS.COM

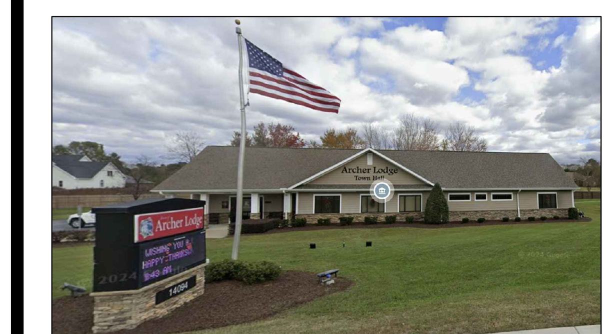
MECHANICAL ENGINEER:
KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS
555 FAYETTEVILLE STREET
SUITE 201 RALEIGH, NC 27601
PHONE: (919) 719-3475

INDEX OF DRAWINGS

VICINITY MAP



ARCHER LODGE MAINTENANCE BUILDING



Town of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

Project Consultants

KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS 555 FAYETTEVILLE STREET | SUITE 201
RALEIGH, NC 27601 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

R. WARD WEBB, ARCHITECT, P.A.
REGISTERED ARCHITECTURAL CORPORATION
51408
2/11/26
NORTH CAROLINA
GREENVILLE, NC

☒ For Construction
☐ Not for Construction
☐ Review Set
☐ Bid Set

Issue Date:2-11-2026

Plot Date:

Revisions

Mark	Date	Description

Drawing No.

TITLE SHEET

T-1

of

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 606-7860

2018 APPENDIX B
BUILDING CODE SUMMARY FOR ALL COMMERCIAL PROJECTS
(EXCEPT 1 AND 2-FAMILY DWELLINGS AND TOWNHOUSES)
(Reproduce the following data on the building plans sheet 1 or 2)

Name of Project: ARCHER LODGE MAINTENANCE BUILDING
Address: 14094 Buffalo Rd. Archer Lodge NC Zip Code 27527
Owner/Authorized Agent: M. GORDON Phone # (919) ... - .... E-Mail ______
Owned By: ☒ City/County ☐ Private ☐ State
Code Enforcement Jurisdiction: ☐ City______ ☒ County JOHNSTON ☐ State

CONTACT: RON WARD WEBB ARCHITECT - LIC# 3114

DESIGNER	FIRM	NAME	LICENSE #	TELEPHONE #	E-MAIL
Architectural	R. WEBB, ARCHITECT	R. WARD WEBB, PA	3114	(252) 606-7860	
Civil				( )	
Electrical	KAIROS PROJECT GROUP	BEN LEWIS, P.E.	23293	(919) 741-8223	
Fire Alarm	KAIROS PROJECT GROUP	BEN LEWIS, P.E.	23293	(919) 741-8223	
Plumbing	KAIROS PROJECT GROUP	BEN LEWIS, P.E.	23293	(919) 741-8223	
Mechanical	KAIROS PROJECT GROUP	BEN LEWIS, P.E.	23293	(919) 741-8223	
Sprinkler-Standpipe				( )	
Structural	R. WEBB, ARCHITECT	RON WEBB	51408	(252) 606-7860	
Retaining Walls >5' High				( )	
Other				( )	

("Other" should include firms and individuals such as truss, precast, pre-engineered, interior designers, etc.)

2018 NC BUILDING CODE: ☒ New Building ☐ Addition ☐ Renovation
☐ 1st Time Interior Completion
☐ Shell/Core - Contact the local inspection jurisdiction for possible additional procedures and requirements
☐ Phased Construction - Shell/Core- Contact the local inspection jurisdiction for possible additional procedures and requirements

2018 NC EXISTING BUILDING CODE: EXISTING: ☐ Prescriptive ☐ Repair ☐ Chapter 14
Alteration: ☐ Level I ☐ Level II ☐ Level III
☐ Historic Property ☐ Change of Use

CONSTRUCTED: (date) N/A CURRENT OCCUPANCY(S) (Ch. 3): N/A
RENOVATED: (date) N/A PROPOSED OCCUPANCY(S) (Ch. 3): REPAIR GARAGE

RISK CATEGORY (Table 1604.5): **Current:** ☐ I ☐ II ☐ III ☐ IV
Proposed: ☐ I ☒ II ☐ III ☐ IV

BASIC BUILDING DATA
Construction Type: ☐ I-A ☐ II-A ☐ III-A ☐ IV ☐ V-A
(check all that apply) ☐ I-B ☐ II-B ☐ III-B ☒ V-B
Sprinklers: ☒ No ☐ Partial ☐ Yes ☐ NFPA 13 ☐ NFPA 13R ☐ NFPA 13D
Standpipes: ☒ No ☐ Yes Class ☐ I ☐ II ☐ III Wet ☐ Dry
Fire District: ☒ No ☐ Yes **Flood Hazard Area:** ☒ No ☐ Yes
Special Inspections Required: ☒ **No** ☐ Yes (Contact the local inspection jurisdiction for additional procedures and requirements.)

STORY NO.	DESCRIPTION AND USE	(A) BLDG AREA PER STORY (ACTUAL)	(B) TABLE 506.2[4] AREA	(C) AREA FOR FRONTAGE INCREASE1,5	(D) ALLOWABLE AREA PER STORY OR UNLIMITED2,3
1	Repair Garage	1,600 SF	17,500 SF	N/A	ALLOWABLE

1 Frontage area increases from Section 506.3 are computed thus:
a. Perimeter which fronts a public way or open space having 20 feet minimum width = _______ (F)
b. Total Building Perimeter = ________ (P)
c. Ratio (F/P) = ___________ (F/P)
d. W = Minimum width of public way = ________ (W)
e. Percent of frontage increase If = 100[F/P – 0.25] x W/30 = ________ (%)
2 Unlimited area applicable under conditions of Section 507.
3 Maximum Building Area = total number of stories in the building x D (maximum3 stories) (506.2).
4 The maximum area of open parking garages must comply with Table 406.5.4.
5 Frontage increase is based on the unsprinklered area value in Table 506.2.

ALLOWABLE HEIGHT

	ALLOWABLE	SHOWN ON PLANS	CODE REFERENCE 1
Building Height in Feet (Table 504.3) 2	60'	20'-6"	T504.3
Building Height in Stories (Table 504.4) 3	1	1	T504.4

1 Provide code reference if the "Shown on Plans" quantity is not based on Table 504.3 or 504.4.
2 The maximum height of air traffic control towers must comply with Table 412.3.1.
3 The maximum height of open parking garages must comply with Table 406.5.4.

PERCENTAGE OF WALL OPENING CALCULATIONS

FIRE SEPARATION DISTANCE (FEET) FROM PROPERTY LINES	DEGREE OF OPENINGS PROTECTION (TABLE 705.8)	ALLOWABLE AREA (%)	ACTUAL SHOWN ON PLANS (%)

LIFE SAFETY SYSTEM REQUIREMENTS

Emergency Lighting: ☐ No ☐ Yes
Exit Signs: ☐ No ☐ Yes
Fire Alarm: ☐ No ☐ Yes
Smoke Detection Systems: ☐ No ☐ Yes ☐ Partial _______
Carbon Monoxide Detection: ☐ No ☐ Yes

LIFE SAFETY PLAN REQUIREMENTS

Life Safety Plan Sheet #: ____________________

- ☐ Fire and/or smoke rated wall locations (Chapter 7)
- ☐ Assumed and real property line locations (if not on the site plan)
- ☐ Exterior wall opening area with respect to distance to assumed property lines (705.8)
- ☐ Occupancy Use for each area as it relates to occupant load calculation (Table 1004.1.2)
- ☐ Occupant loads for each area
- ☐ Exit sign locations (1013)
- ☐ Exit access travel distances (1017)
- ☐ Common path of travel distances (Tables 1006.2.1 & 1006.3.2(1))
- ☐ Dead end lengths (1020.4)
- ☐ Clear exit widths for each exit door
- ☐ Maximum calculated occupant load capacity each exit door can accommodate based on egress width (1005.3)
- ☐ Actual occupant load for each exit door
- ☐ A separate schematic plan indicating where fire rated floor/ceiling and/or roof structure is provided for purposes of occupancy separation
- ☐ Location of doors with panic hardware (1010.1.10)
- ☐ Location of doors with delayed egress locks and the amount of delay (1010.1.9.7)
- ☐ Location of doors with electromagnetic egress locks (1010.1.9.9)
- ☐ Location of doors equipped with hold-open devices
- ☐ Location of emergency escape windows (1030)
- ☐ The square footage of each fire area (202)
- ☐ The square footage of each smoke compartment for Occupancy Classification I-2 (407.5)
- ☐ Note any code exceptions or table notes that may have been utilized regarding the items above

ENERGY SUMMARY

ENERGY REQUIREMENTS:
The following data shall be considered minimum and any special attribute required to meet the energy code shall also be provided. Each Designer shall furnish the required portions of the project information for the plan data sheet. If performance method, state the annual energy cost for the standard reference design vs annual energy cost for the proposed design.

Existing building envelope complies with code: ☐ No ☐ Yes (The remainder of this section is not applicable)

Exempt Building: ☒ No ☐ Yes (Provide code or statutory reference): ____________

Climate Zone: ☒ 3A ☐ 4A ☐ 5A

Method of Compliance: Energy Code ☐ Performance ☐ Prescriptive
ASHRAE 90.1 ☒ Performance ☐ Prescriptive
(If "Other" specify source here) ____________

THERMAL ENVELOPE (Prescriptive method only)

Roof/ceiling Assembly (each assembly)
Description of assembly: ____________
U-Value of total assembly: ____________
R-Value of insulation: 38
Skylights in each assembly: ____________
U-Value of skylight: ____________
total square footage of skylights in each assembly: ____________

Exterior Walls (each assembly)
Description of assembly: ____________
U-Value of total assembly: ____________
R-Value of insulation: 19
Openings (windows or doors with glazing)
U-Value of assembly: ____________
Solar heat gain coefficient: ____________
projection factor: ____________
Door R-Values: 3.0

Walls below grade (each assembly)
Description of assembly: N/A
U-Value of total assembly: ____________
R-Value of insulation: ____________

Floors over unconditioned space (each assembly)
Description of assembly: N/A
U-Value of total assembly: ____________
R-Value of insulation: ____________

Floors slab on grade
Description of assembly: 5" AND 4" SLAB ON GRADE
U-Value of total assembly: ____________
R-Value of insulation: ____________
Horizontal/vertical requirement: ____________
slab heated: ____________

2018 APPENDIX B
BUILDING CODE SUMMARY FOR ALL COMMERCIAL PROJECTS
MECHANICAL DESIGN
(PROVIDE ON THE MECHANICAL SHEETS IF APPLICABLE)

MECHANICAL SUMMARY

MECHANICAL SYSTEMS, SERVICE SYSTEMS AND EQUIPMENT

Thermal Zone
winter dry bulb: ____________
summer dry bulb: ____________

Interior design conditions
winter dry bulb: ____________
summer dry bulb: ____________
relative humidity: ____________

Building heating load: ____________

Building cooling load: ____________

Mechanical Spacing Conditioning System
Unitary
description of unit: ____________
heating efficiency: ____________
cooling efficiency: ____________
size category of unit: ____________
Boiler
Size category. If oversized, state reason.: ____________
Chiller
Size category. If oversized, state reason.: ____________

List equipment efficiencies: ____________

Gross Building Area Table

FLOOR	EXISTING (SQ FT)	NEW (SQ FT)	SUB-TOTAL
3rd Floor			
2nd Floor			
Mezzanine			
1st Floor		1,600	1,600
Basement			
TOTAL		1,600	

ALLOWABLE AREA

Primary Occupancy Classification(s):
Assembly ☐ A-1 ☐ A-2 ☐ A-3 ☐ A-4 ☐ A-5
Business ☐
Educational ☐
Factory ☐ F-1 Moderate ☐ F-2 Low
Hazardous ☐ H-1 Detonate ☐ H-2 Deflagrate ☐ H-3 Combust ☐ H-4 Health ☐ H-5 HPM
Institutional ☐ I-1 Condition ☐ 1 ☐ 2
☐ I-2 Condition ☐ 1 ☐ 2
☐ I-3 Condition ☐ 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5
☐ I-4
Mercantile ☐
Residential ☐ R-1 ☐ R-2 ☐ R-3 ☐ R-4
Storage ☐ S-1 Moderate ☐ S-2 Low ☐ High-piled
☐ Parking Garage ☐ Open ☐ Enclosed ☒ Repair Garage
Utility and Miscellaneous ☐

Accessory Occupancy Classification(s): N/A
Incidental Uses (Table 509): N/A
Special Uses (Chapter 4 – List Code Sections): N/A
Special Provisions: (Chapter 5 – List Code Sections): N/A
Mixed Occupancy: ☒ No ☐ Yes Separation: 0 Hr. Exception: ____________

☒ Non-Separated Use (508.3) - The required type of construction for the building shall be determined by applying the height and area limitations for each of the applicable occupancies to the entire building. The most restrictive type of construction, so determined, shall apply to the entire building.

☐ Separated Use (508.4) - See below for area calculations for each story, the area of the occupancy shall be such that the sum of the ratios of the actual floor area of each use divided by the allowable floor area for each use shall not exceed 1.

$$\frac{\text{Actual Area of Occupancy A}}{\text{Allowable Area of Occupancy A}} + \frac{\text{Actual Area of Occupancy B}}{\text{Allowable Area of Occupancy B}} \leq 1$$

________ + ________ + ... = ________ ≤ 1.00

FIRE PROTECTION REQUIREMENTS

BUILDING ELEMENT	FIRE SEPARATION DISTANCE (FEET)	RATING REQ'D	RATING PROVIDED (W/_______* REDUCTION)	DETAIL # AND SHEET #	DESIGN # FOR RATED ASSEMBLY	SHEET # FOR RATED PENETRATION	SHEET # FOR RATED JOINTS
Structural Frame, including columns, girders, trusses		- 0 -					
Bearing Walls							
Exterior							
North							
East							
West							
South							
Interior							
Nonbearing Walls and Partitions							
Exterior walls							
North							
East							
West							
South							
Interior walls and partitions							
Floor Construction Including supporting beams and joists							
Floor Ceiling Assembly							
Columns Supporting Floors							
Roof Construction, including supporting beams and joists							
Roof Ceiling Assembly							
Columns Supporting Roof							
Shaft Enclosures - Exit							
Shaft Enclosures - Other							
Corridor Separation							
Occupancy/Fire Barrier Separation							
Party/Fire Wall Separation							
Smoke Barrier Separation							
Smoke Partition							
Tenant/Dwelling Unit/ Sleeping Unit Separation							
Incidental Use Separation							

* Indicate section number permitting reduction

NOTE:

ACCESSIBLE DWELLING UNITS N/A
(SECTION 1107)

UNIT CLASSIFICATION	TOTAL UNITS	ACCESSIBLE UNITS REQUIRED	ACCESSIBLE UNITS PROVIDED	TYPE A UNITS REQUIRED	TYPE A UNITS PROVIDED	TYPE B UNITS REQUIRED	TYPE B UNITS PROVIDED	TOTAL ACCESSIBLE UNITS PROVIDED

ACCESSIBLE PARKING BY OTHERS
(SECTION 1106)

LOT OR PARKING AREA	TOTAL # OF PARKING SPACES REQUIRED	TOTAL # OF PARKING SPACES PROVIDED	# OF ACCESSIBLE SPACES PROVIDED 96" SPACES	# OF ACCESSIBLE SPACES PROVIDED 132" SPACES	TOTAL # ACCESSIBLE PROVIDED
TOTAL					

PLUMBING FIXTURE REQUIREMENTS
(TABLE 2902.1)

USE		WATER CLOSETS MALE	WATER CLOSETS FEMALE	WATER CLOSETS UNISEX	URINALS	LAVATORIES MALE	LAVATORIES FEMALE	LAVATORIES UNISEX	SHOWERS / TUBS	DRINKING FOUNTAINS REGULAR	DRINKING FOUNTAINS ACCESSIBLE
SPACE	EXIST'G										
	NEW			1.0				1.0			
	REQ'D			1.0				1.0			

BOTTLED DISPENSER

SPECIAL APPROVALS

Special approval: (Local Jurisdiction, Department of Insurance, OSC, DPI, DHHS, etc., describe below)

LOCAL JURISDICTION - JOHNSTON COUNTY INSPECTIONS DEPARTMENT

2018 APPENDIX B
BUILDING CODE SUMMARY FOR ALL COMMERCIAL PROJECTS
STRUCTURAL DESIGN
(PROVIDE ON THE STRUCTURAL SHEETS IF APPLICABLE)

DESIGN LOADS:

Importance Factors: Snow (IS) 1.0
Seismic (IE) 1.0

Live Loads: Roof 20 psf
Mezzanine N/A psf
Floor N/A psf

Ground Snow Load: 15 psf

Wind Load: Ultimate Wind Speed 120 mph (ASCE-7)
Exposure Category B

SEISMIC DESIGN CATEGORY: ☐ A ☒ B ☐ C ☐ D
Provide the following Seismic Design Parameters:
Risk Category (Table 1604.5) ☐ I ☒ II ☐ III ☐ IV
Spectral Response Acceleration SS 25 %g S1 9.5 %g
Site Classification (ASCE 7) ☐ A ☐ B ☐ C ☒ D ☐ E ☐ F
Data Source: ☐ Field Test ☒ Presumptive ☐ Historical Data
Basic structural system ☒ Bearing Wall ☐ Dual w/Special Moment Frame
☐ Building Frame ☐ Dual w/Intermediate R/C or Special Steel
☐ Moment Frame ☐ Inverted Pendulum
Analysis Procedure: ☐ Simplified ☒ Equivalent Lateral Force ☐ Dynamic
Architectural, Mechanical, Components anchored? ☐ Yes ☐ No

LATERAL DESIGN CONTROL: Earthquake ☐ Wind ☒

SOIL BEARING CAPACITIES:
Field Test (provide copy of test report) ____________ psf
Presumptive Bearing capacity 2000 psf
Pile size, type, and capacity ____________

2018 APPENDIX B
BUILDING CODE SUMMARY FOR ALL COMMERCIAL PROJECTS
ELECTRICAL DESIGN
(PROVIDE ON THE ELECTRICAL SHEETS IF APPLICABLE)

ELECTRICAL SUMMARY

ELECTRICAL SYSTEM AND EQUIPMENT

Method of Compliance: Energy Code ☐ Performance ☐ Prescriptive
ASHRAE 90.1 ☐ Performance ☐ Prescriptive

Lighting schedule (each fixture type)
lamp type required in fixture
number of lamps in fixture
ballast type used in the fixture
number of ballasts in fixture
total wattage per fixture
total interior wattage specified vs. allowed (whole building or space by space)
total exterior wattage specified vs. allowed

Additional Efficiency Package Options
(When using the 2018 NCECC; not required for ASHRAE 90.1)
☐ C406.2 More Efficient HVAC Equipment Performance
☐ C406.3 Reduced Lighting Power Density
☐ C406.4 Enhanced Digital Lighting Controls
☐ C406.5 On-Site Renewable Energy
☐ C406.6 Dedicated Outdoor Air System
☐ C406.7 Reduced Energy Use in Service Water Heating

ARCHER LODGE MAINTENANCE BUILDING

Town of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

Project Consultants

KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS 555 FAYETTEVILLE STREET | SUITE 201
RALEIGH, NC 27601 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

R. WARD WEBB, ARCHITECT, P.A.
REGISTERED ARCHITECTURAL CORPORATION
51408
2/11/26
NORTH CAROLINA
GREENVILLE, NC

☒ For Construction
☐ Not for Construction
☐ Review Set
☐ Bid Set

Issue Date: 2-11-2026
Plot Date:
Revisions

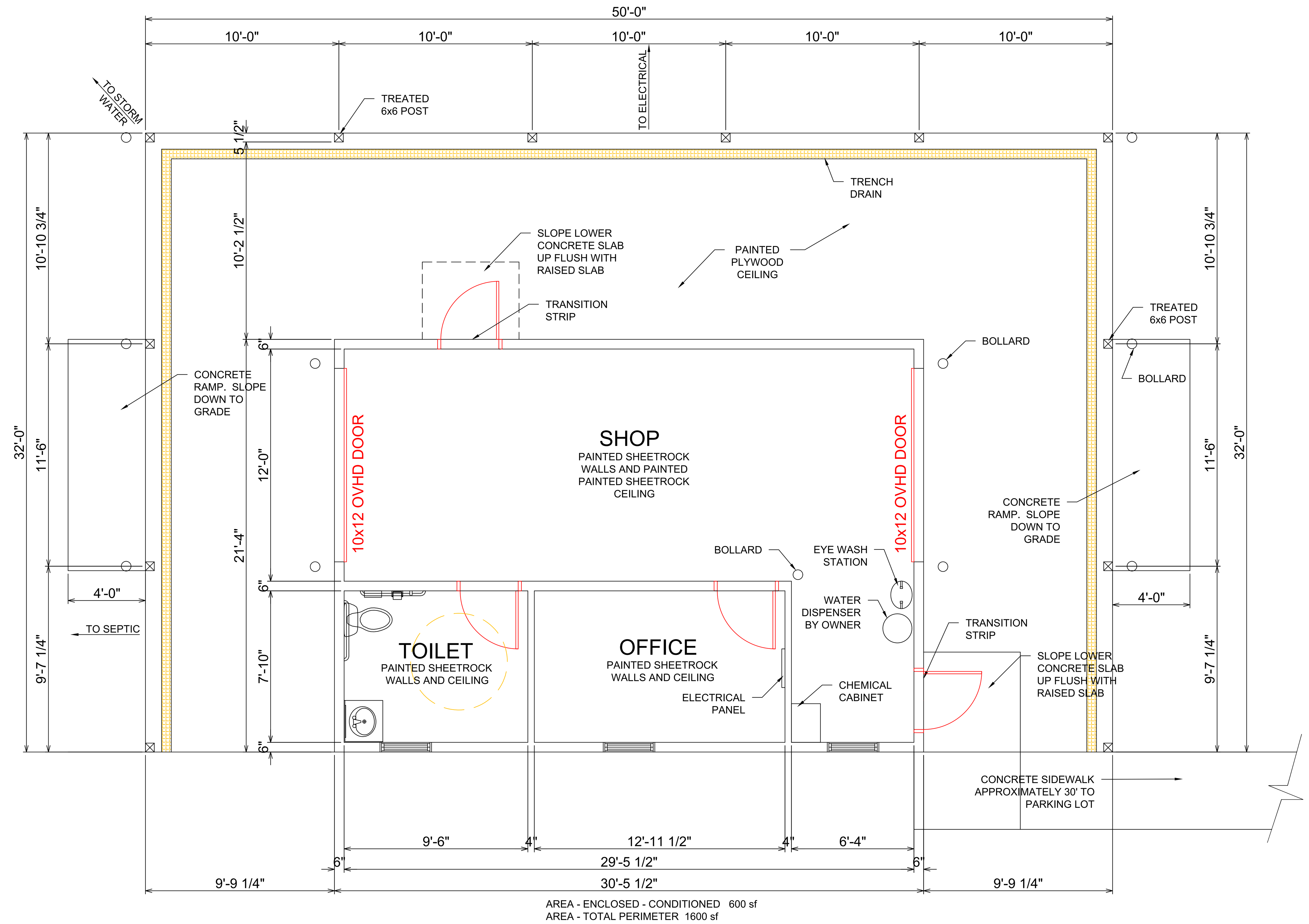
Mark	Date	Description

BUILDING CODE SUMMARY

Drawing No.
BCS
of

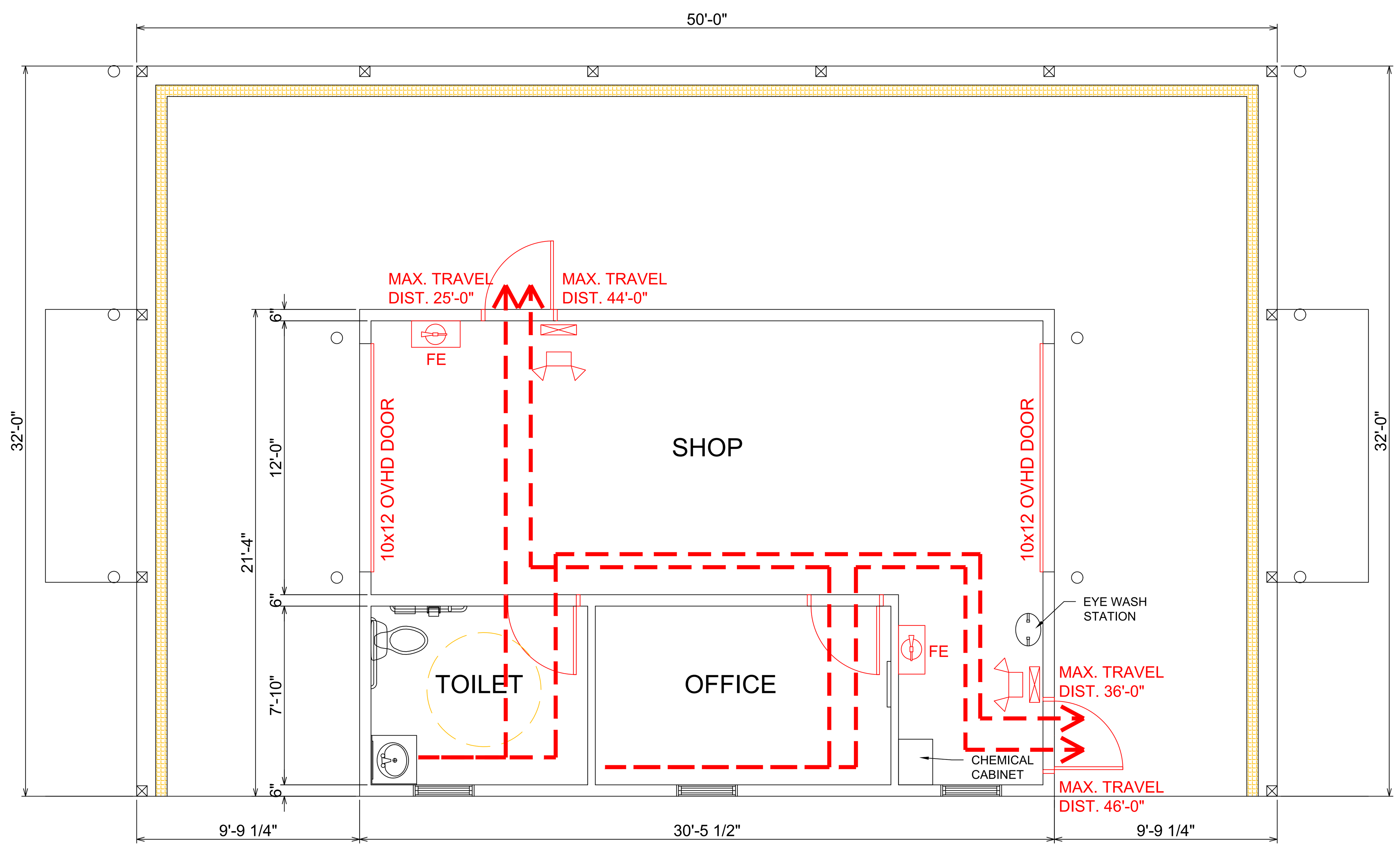
ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 606-7860



FLOOR PLAN

1/4"=1'-0" NOTE: FIELD VERIFY ALL DIMENSIONS



LIFE SAFETY PLAN

1/4"=1'-0" NOTE: FIELD VERIFY ALL DIMENSIONS

LIFE SAFETY LEGEND			
- - - -	PATH OF EGRESS	FE	FIRE EXTINGUISHER IN RECESSED CABINET
	EXIT SIGN (SEE ELECTRICAL DRAWINGS FOR ADDITIONAL INFORMATION)	FE	FIRE EXTINGUISHER W/ BRACKET
	EMERGENCY LIGHT FIXTURE (SEE ELECTRICAL DRAWINGS FOR ADDITIONAL INFORMATION)	00" / 00"	EXIT WIDTH REQUIRED / EXIT WIDTH PROVIDED

OCCUPANCY CALCULATIONS

OCCUPANCY	AREA	PER PERSON (T1004.1.2)	NUMBER OF OCCUPANTS
REPAIR GARAGE	1,600 SQ. FT.	300 SF. / PERSON	5 OCCUPANTS (2 EXITS = 3 OCCUPANTS / EXIT)

T1017.2 EXIT TRAVEL DISTANCE T1017.2 REQUIRES NO MORE THAN 200'-0" FOR UNSPRINKLERED S1 OCCUPANCY. WE HAVE A MAX. 80'-0"

ARCHER LODGE MAINTENANCE BUILDING

Town of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

Project Consultants

KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS 555 FAYETTEVILLE STREET | SUITE 201 RALEIGH, NC 27601 | 919-719-3475 WWW.KPGNC.COM | NC FIRM #: C-3824

☒ For Construction
☐ Not for Construction
☐ Review Set
☐ Bid Set

Issue Date:2-11-2026

Plot Date:

Revisions

Mark	Date	Description

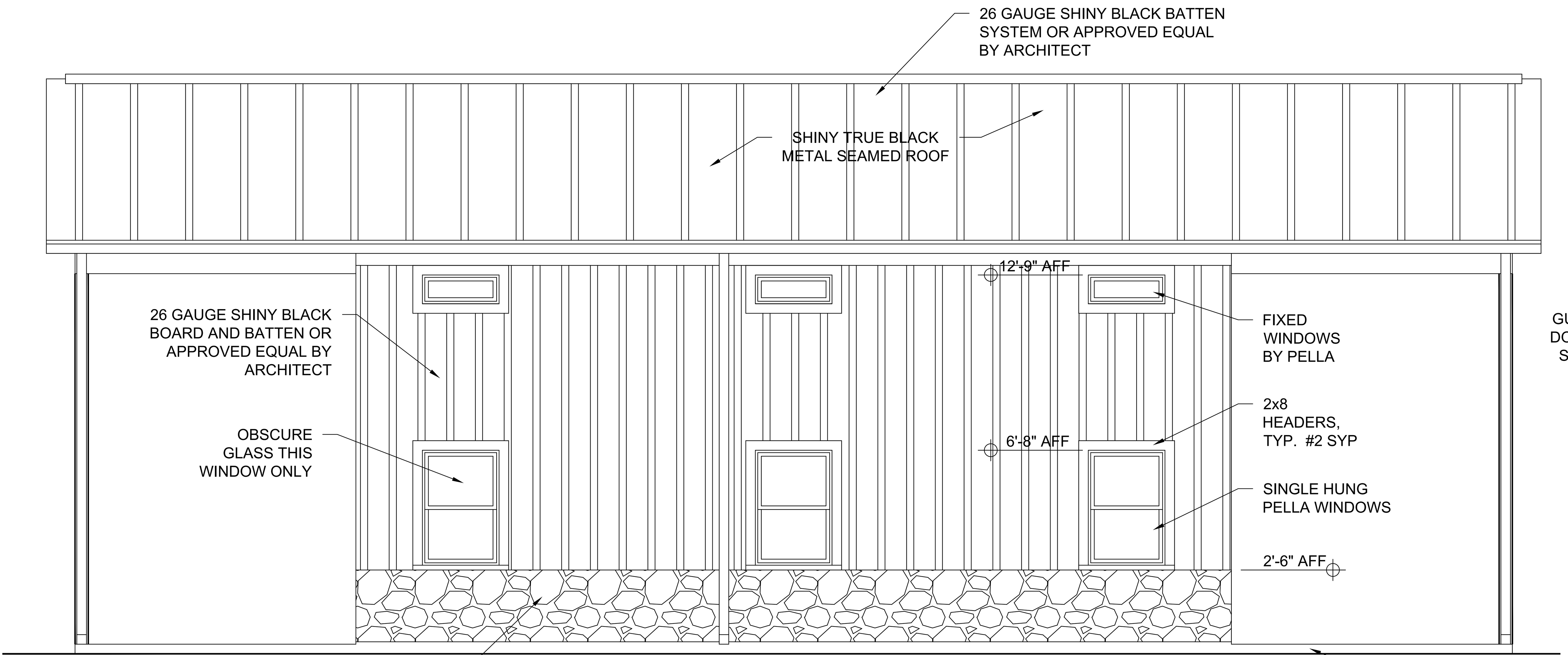
Drawing No.

FLOOR PLAN **A-1**

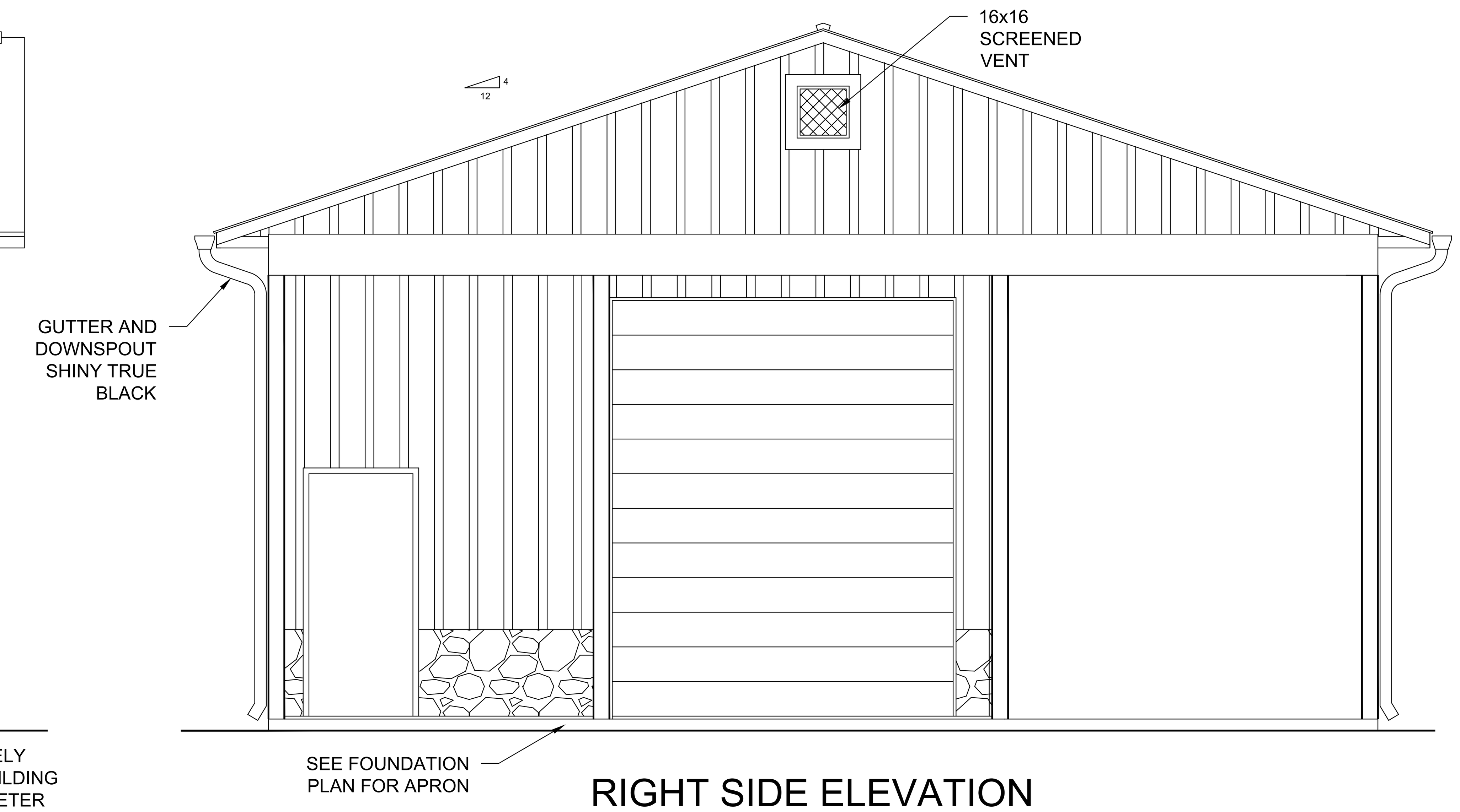
of

ARCHITECT

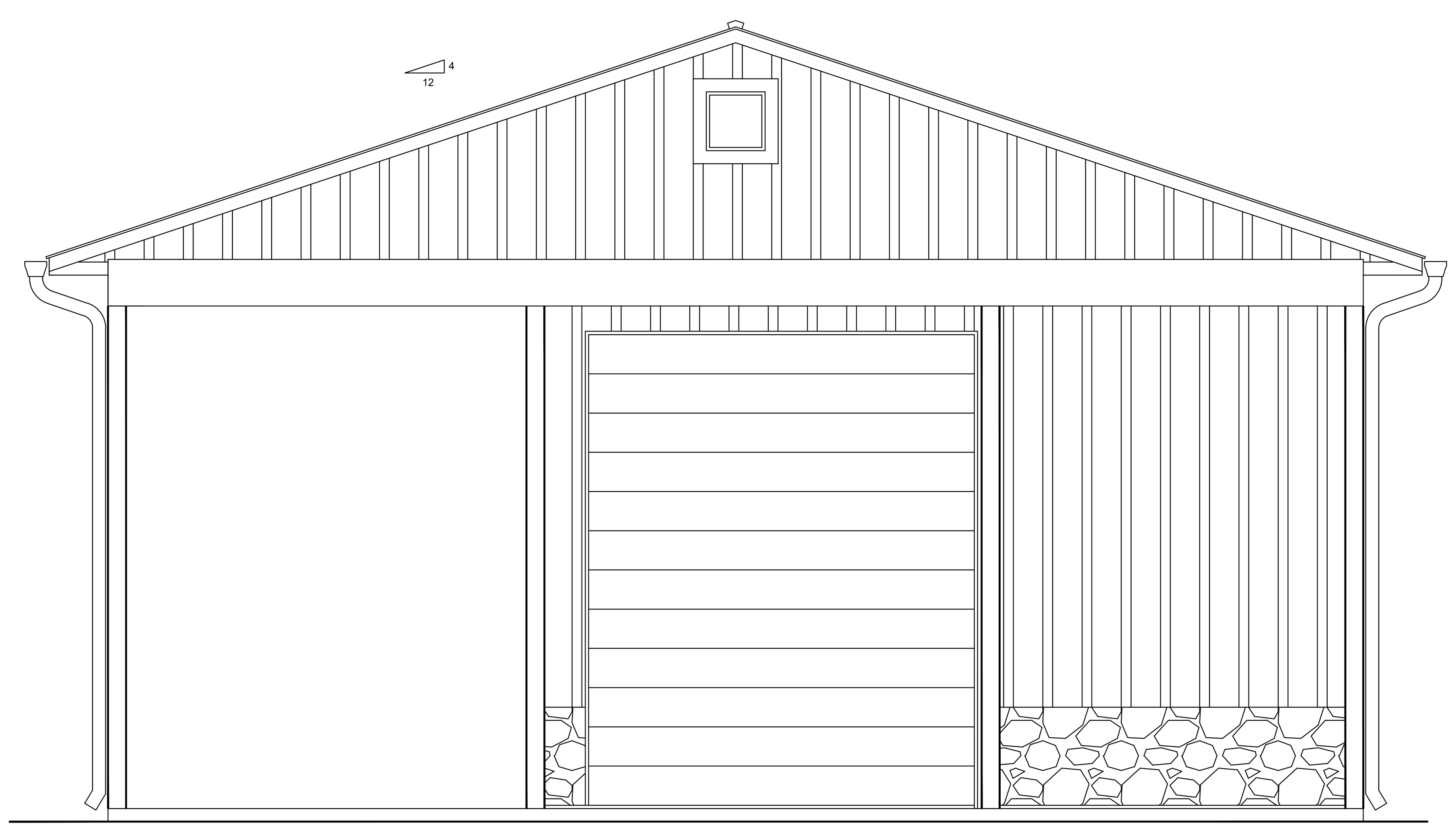
RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 606-7860



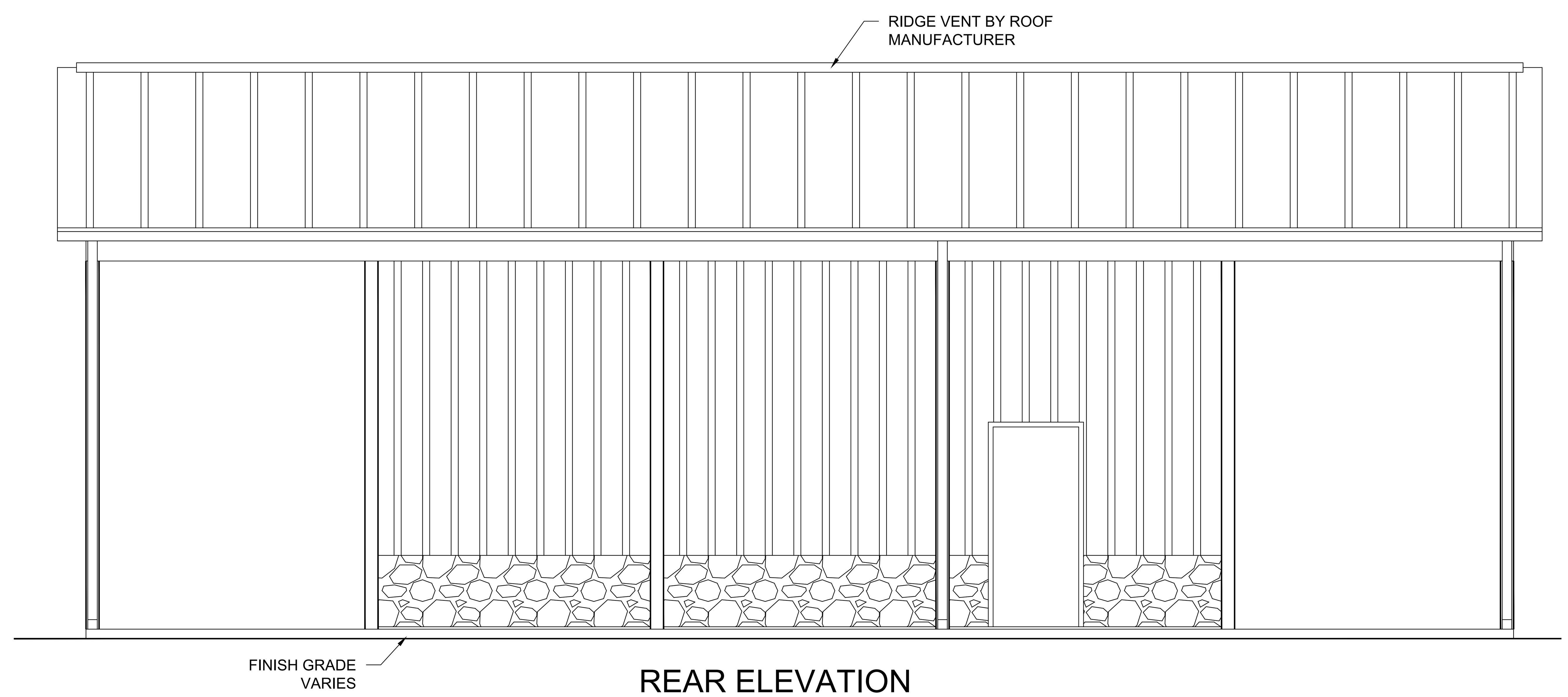
FRONT ELEVATION
NO SCALE



RIGHT SIDE ELEVATION
NO SCALE



LEFT SIDE ELEVATION
NO SCALE



REAR ELEVATION
NO SCALE

ARCHER LODGE MAINTENANCE BUILDING

Town of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

Project Consultants

KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS 555 FAYETTEVILLE STREET | SUITE 201
RALEIGH, NC 27601 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

R. WARD WEBB, ARCHITECT, P.A.
REGISTERED ARCHITECTURAL CORPORATION
51408
2/11/26
NORTH CAROLINA
GREENVILLE, NC

☒ For Construction
☐ Not for Construction
☐ Review Set
☐ Bid Set

Issue Date:2-11-2026
Plot Date:
Revisions

Mark	Date	Description

Drawing No.

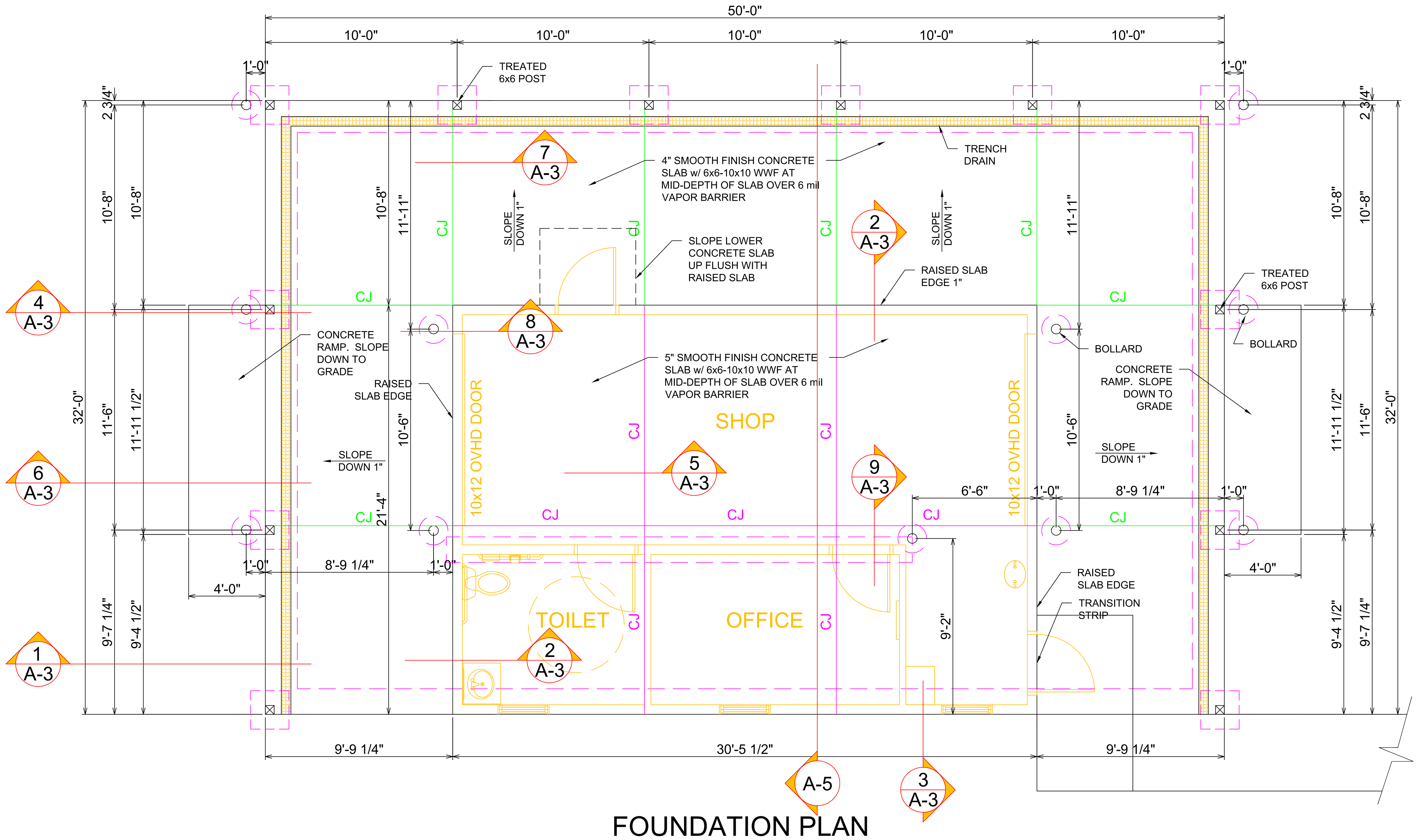
ELEVATIONS

A-2

of

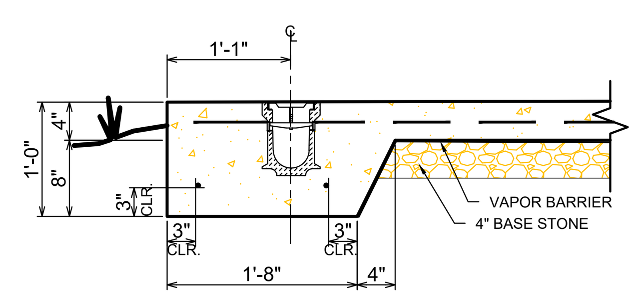
ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 606-7860



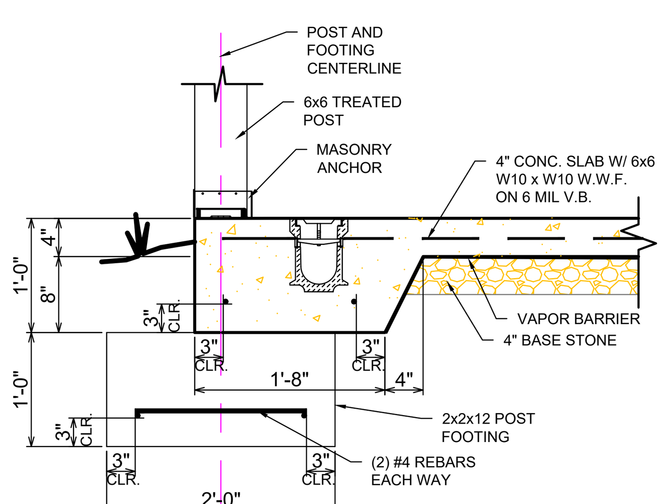
FOUNDATION PLAN

1/4"=1'-0"



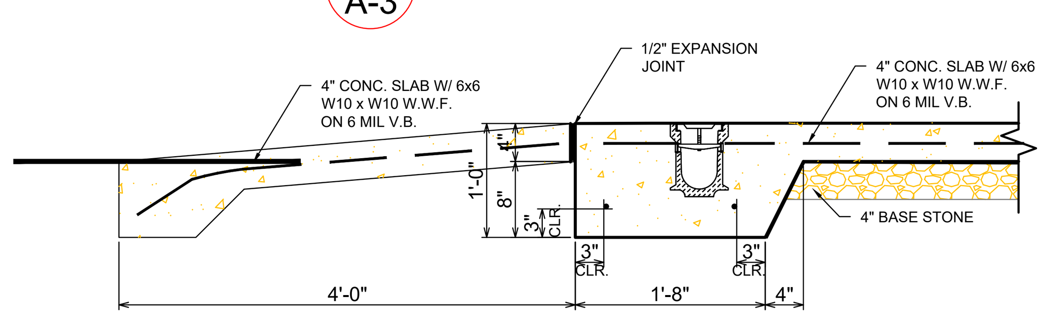
1 A-3 TYPICAL SLAB EDGE DETAIL AT TRENCH DRAIN

3/4"=1'-0"



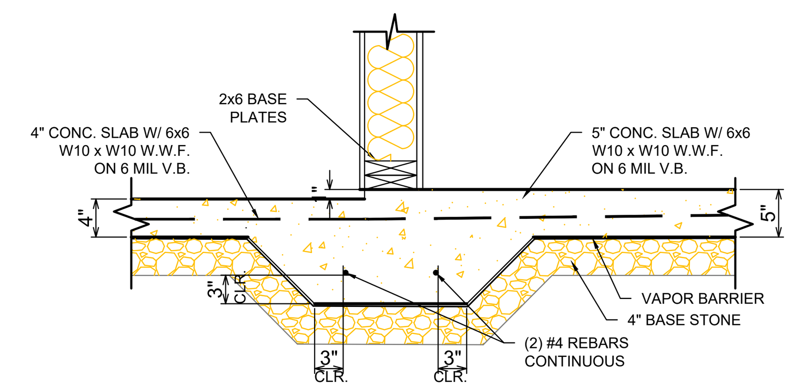
4 A-3 SLAB EDGE DETAIL AT POST

3/4"=1'-0"



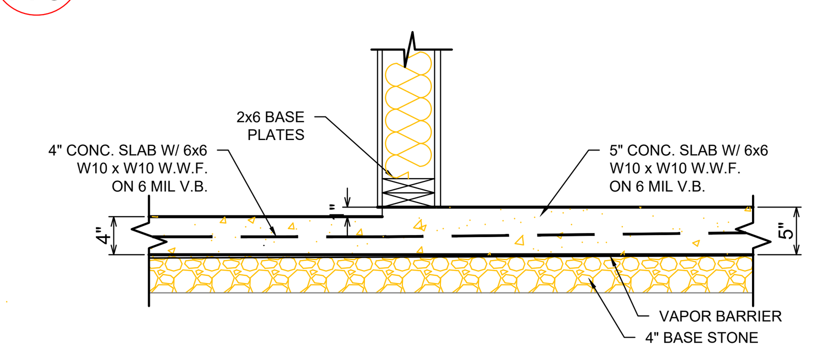
6 A-3 SLAB EDGE DETAIL AT APPROACH SLAB

3/4"=1'-0"



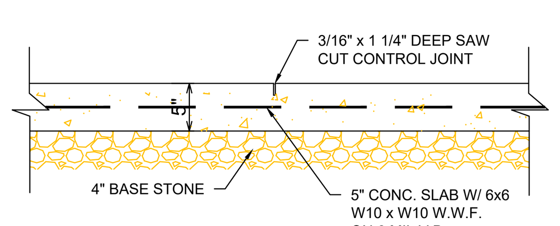
9 A-3 THICKENED SLAB DETAIL

3/4"=1'-0"



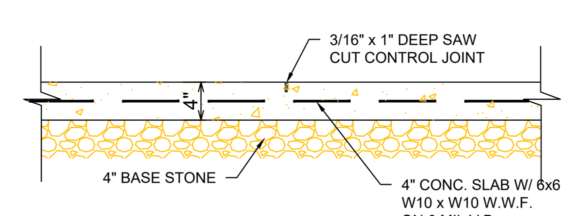
2 A-3 SLAB TRANSITION DETAIL

3/4"=1'-0"



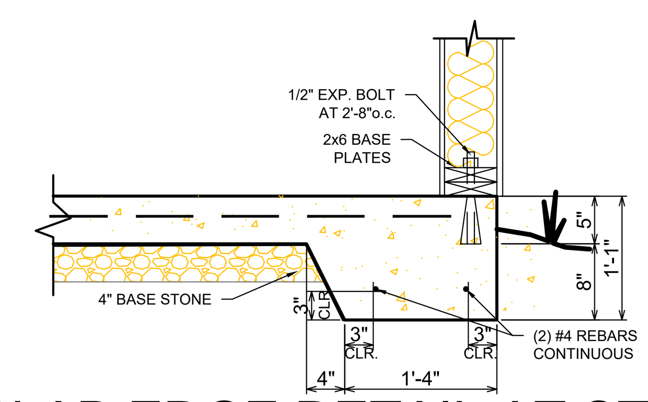
5 A-3 SAW JOINT DETAIL AT 5" SLAB

3/4"=1'-0"



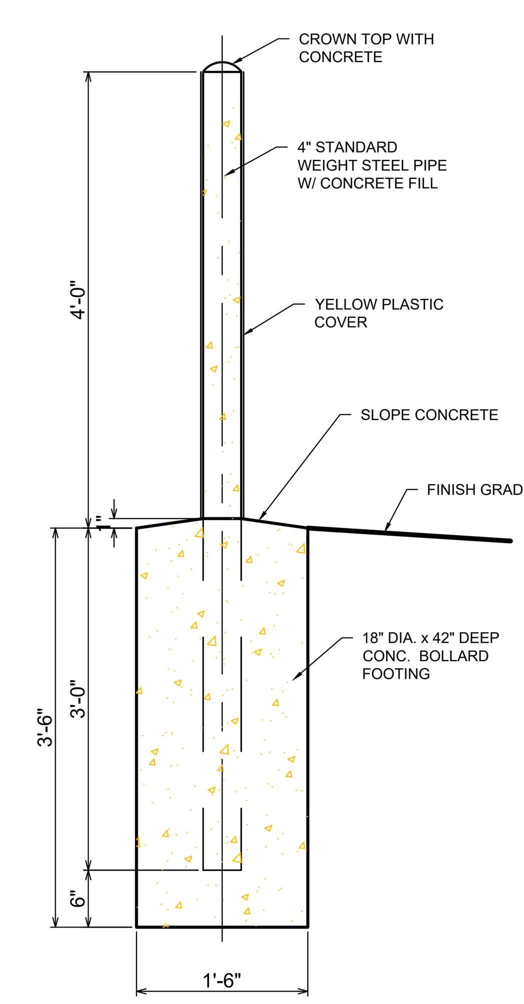
7 A-3 SAW JOINT DETAIL AT 4" SLAB

3/4"=1'-0"



3 A-3 SLAB EDGE DETAIL AT STUD WALL

3/4"=1'-0"



8 A-3 PIPE BOLLARD SECTION

3/4"=1'-0"

ARCHER LODGE MAINTENANCE BUILDING

Town of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

Project Consultants

KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS 555 FAYETTEVILLE STREET | SUITE 201
RALEIGH, NC 27601 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

R. WARD WEBB, ARCHITECT, P.A.
REGISTERED ARCHITECTURAL CORPORATION
51406
2/11/26
NORTH CAROLINA
GREENVILLE, NC

☒ For Construction
☐ Not for Construction
☐ Review Set
☐ Bid Set

Issue Date:2-11-2026

Plot Date:

Revisions

Mark	Date	Description

FOUNDATION PLAN

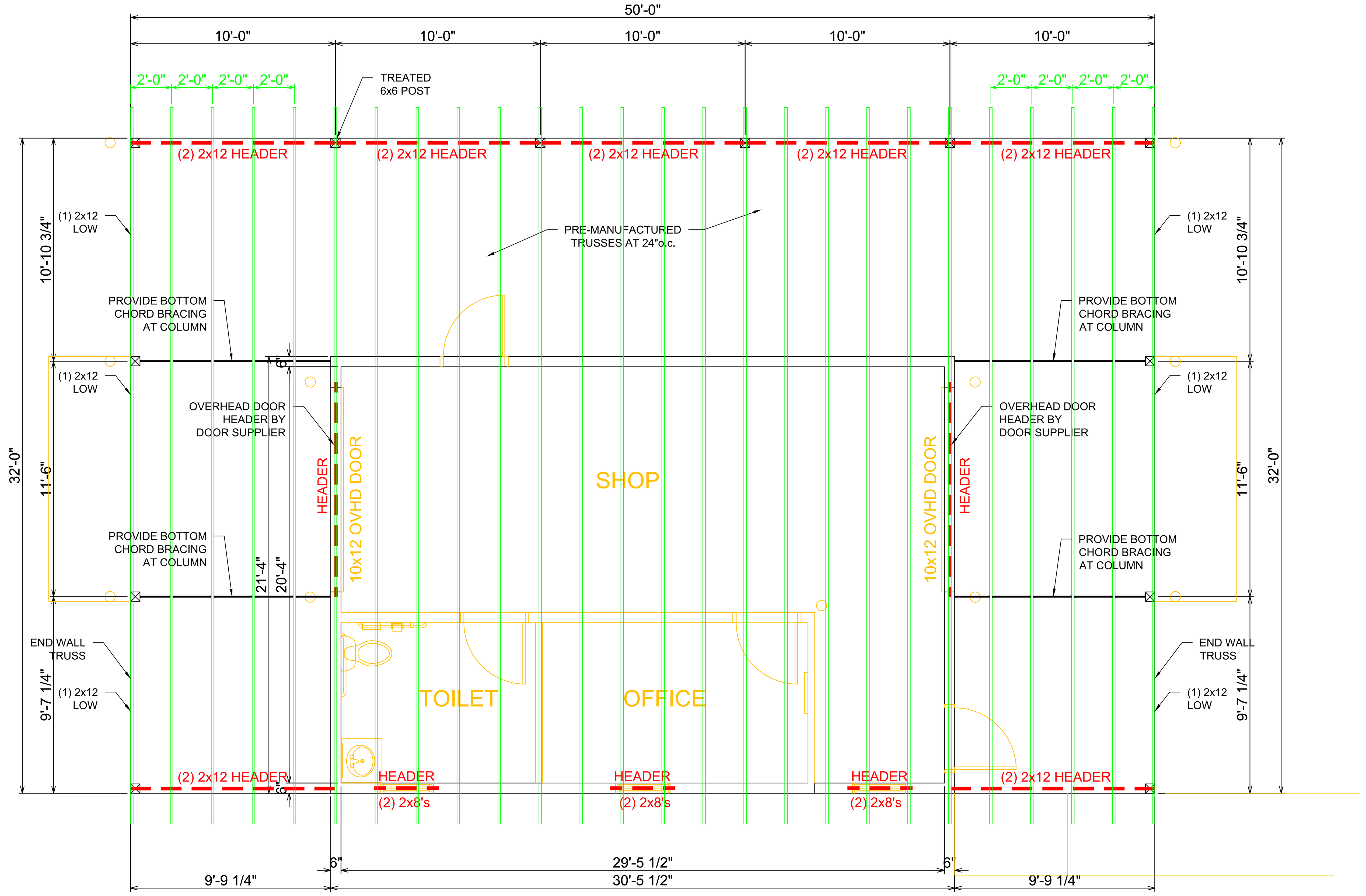
Drawing No.

A-3

of

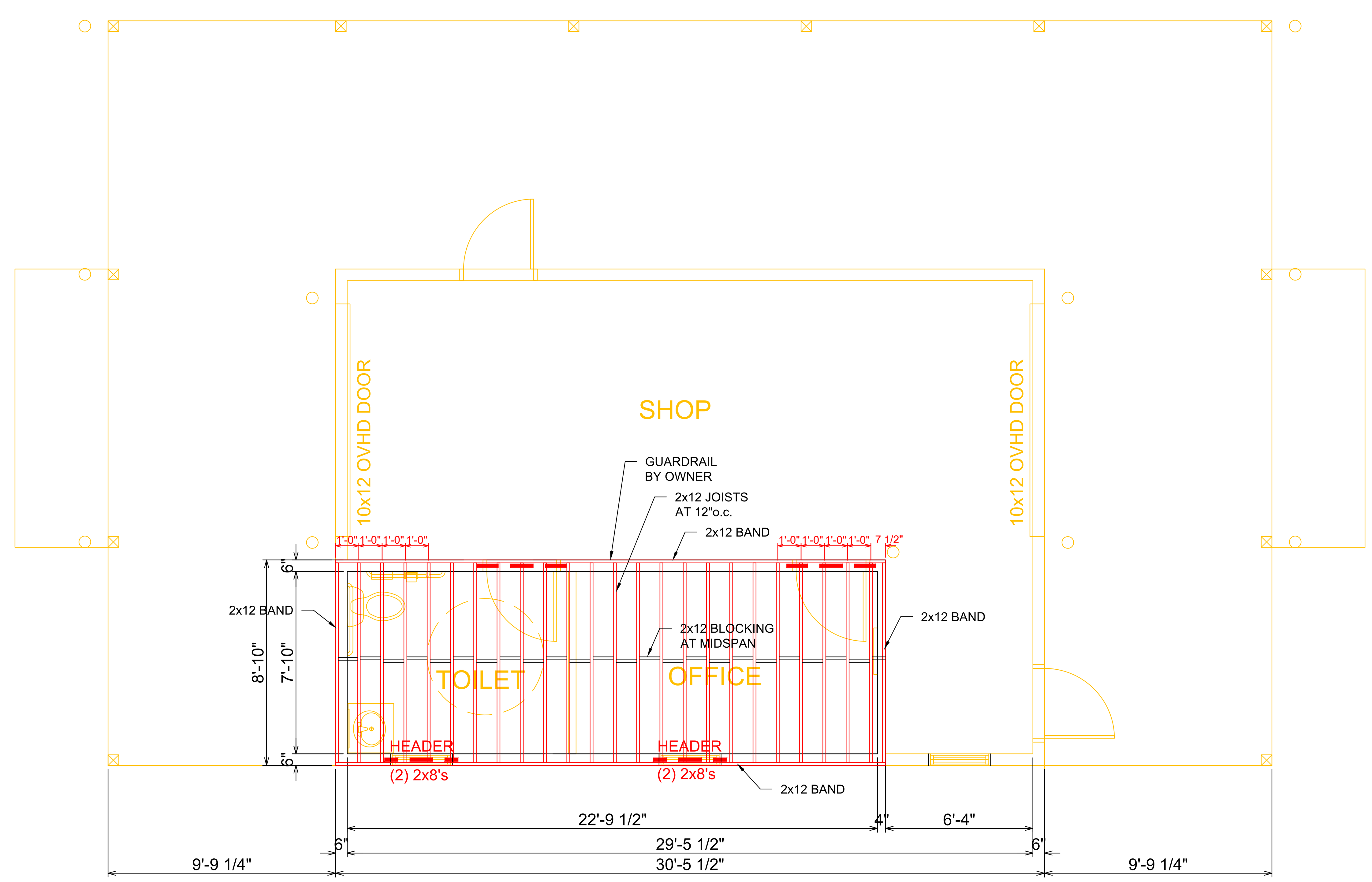
ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 606-7860



FRAMING PLAN

1/4"=1'-0" NOTE: FIELD VERIFY ALL DIMENSIONS



STORAGE PLATFORM FRAMING PLAN

1/4"=1'-0" NOTE: FIELD VERIFY ALL DIMENSIONS

ARCHER LODGE MAINTENANCE BUILDING

Town of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

Project Consultants

KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS 555 FAYETTEVILLE STREET | SUITE 201 RALEIGH, NC 27601 | 919-719-3475 WWW.KPGNC.COM | NC FIRM #: C-3824

☒ For Construction
☐ Not for Construction
☐ Review Set
☐ Bid Set

Issue Date:2-11-2026
Plot Date:
Revisions

Mark	Date	Description

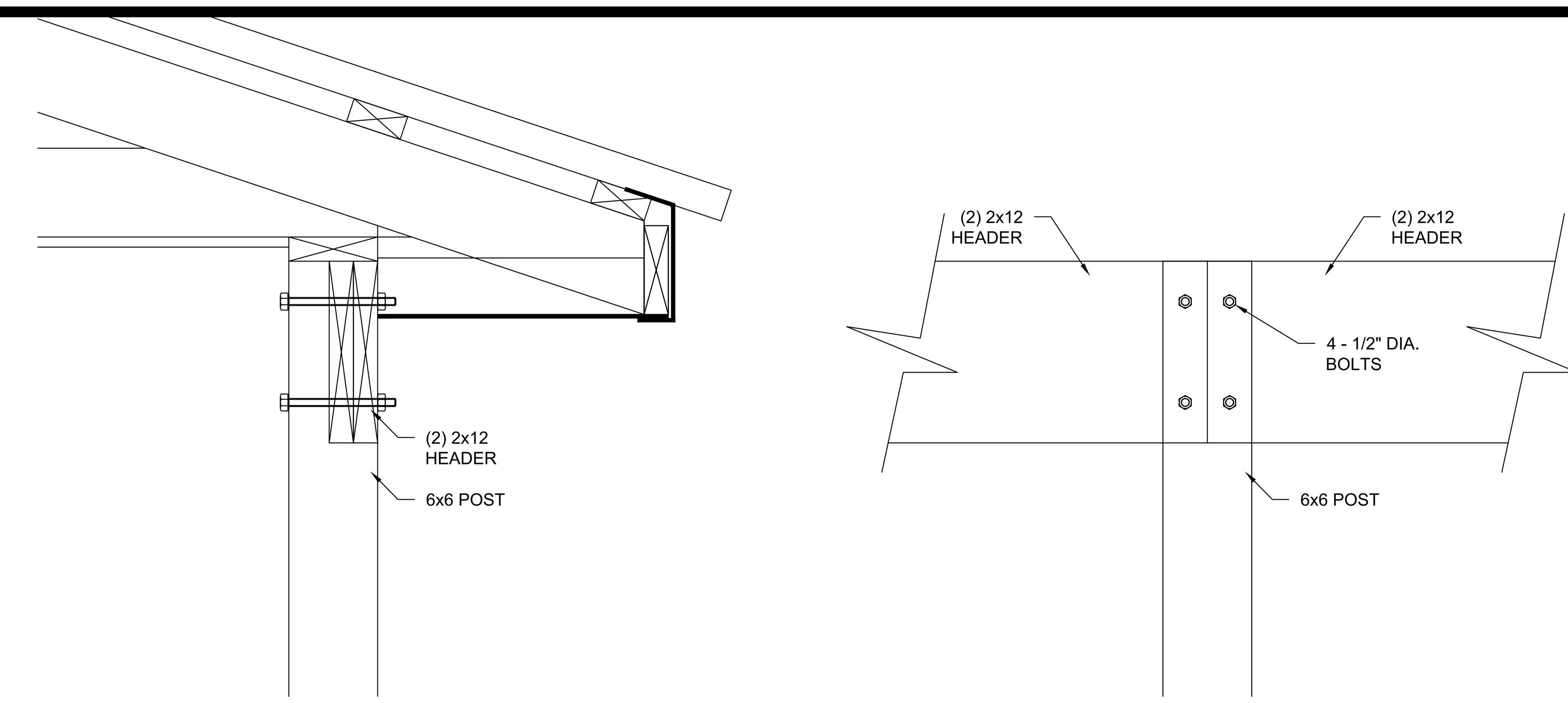
Drawing No.

FRAMING PLAN **A-4**

of

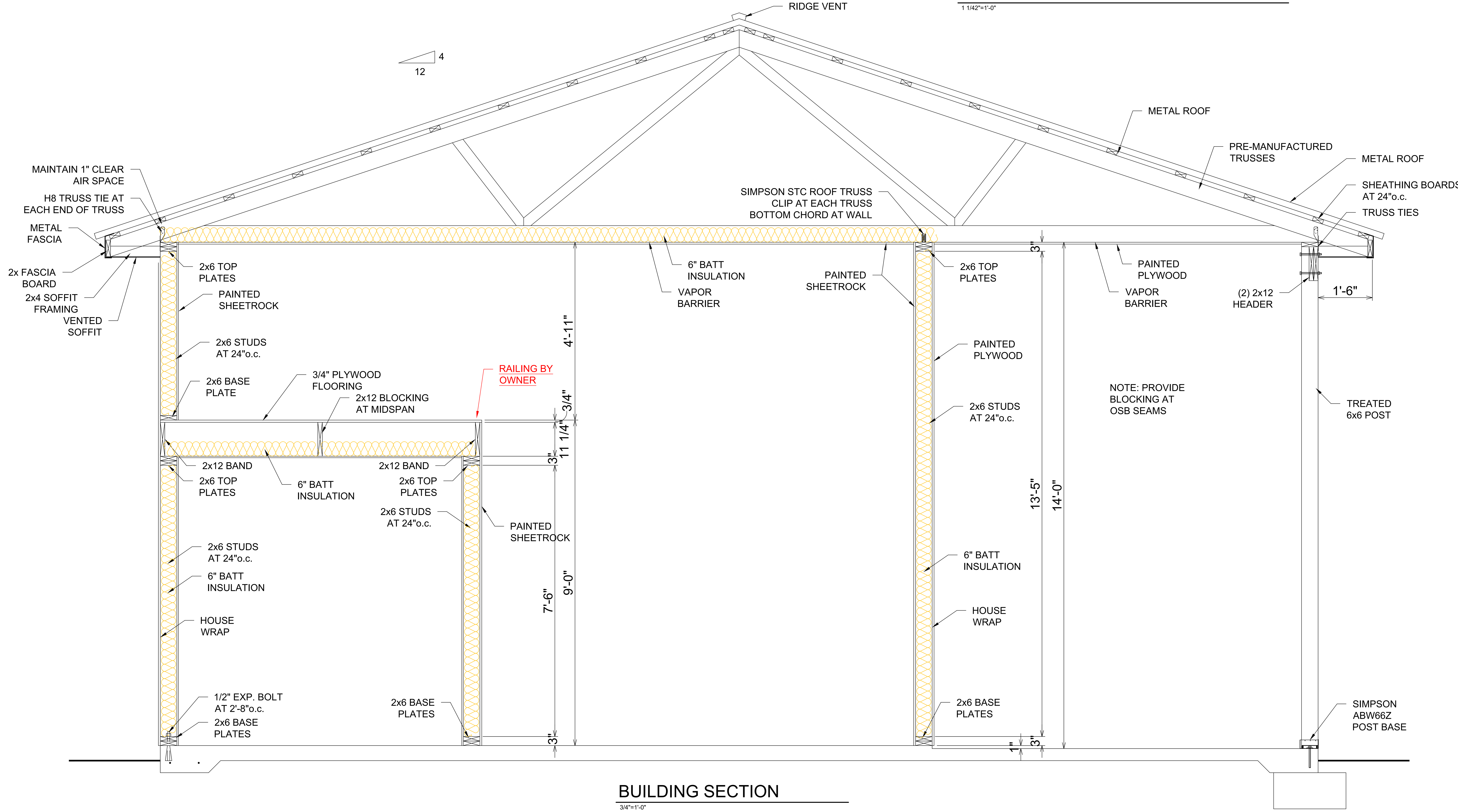
ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 606-7860



BEAM TO POST CONNECTION DETAILS

1 1/42"=1'-0"



BUILDING SECTION

3/4"=1'-0"

ARCHER LODGE MAINTENANCE BUILDING

Town of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

Project Consultants

KAIROS PROJECT GROUP INC.
CONSULTING ENGINEERS 555
FAYETTEVILLE STREET | SUITE 201
RALEIGH, NC 27601 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

R. WARD WEBB, ARCHITECT, P.A.
REGISTERED ARCHITECTURAL CORPORATION
51408
2/11/26
NORTH CAROLINA
GREENVILLE, NC

☒ For Construction
☐ Not for Construction
☐ Review Set
☐ Bid Set

Issue Date:2-11-2026

Plot Date:

Revisions

Mark	Date	Description

BUILDING SECTION

Drawing No.

A-5

of

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 606-7860

GENERAL MECHANICAL SYMBOLS

- REVISION NUMBER - SHOWN ON PLANS
- POINT WHERE NEW CONNECTS TO EXISTING
- NUMBER OF DETAIL ON SHEET
- NUMBER OF SHEET WHERE DETAIL APPEARS
- KEYNOTE
- CONTINUATION SYMBOL
- Room 4 — ROOM NAME AND NUMBER
- ITEM TO BE DEMOLISHED
- AREA NOT IN CONTRACT
- 2" — PIPE SIZE TAG (DIAMETER)
- ABOVE GROUND PIPING
- 1/8" / 12" SLOPE — PIPE SLOPE TAG
- BELOW GROUND PIPING
- INVERT: -105' - 1" — PIPE INVERT ELEVATION TAG
- (E) — EXISTING PIPE TAG
- PIPING BEING DEMOLISHED

ABBREVIATIONS

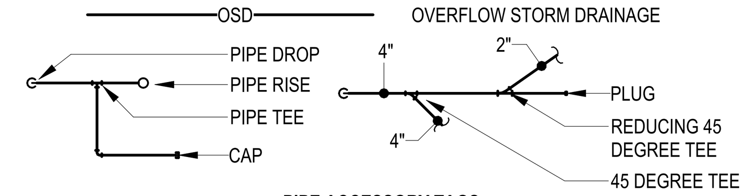
Ø	ROUND	LVR	LOUVER
ABV	ABOVE	LWT	LEAVING WATER TEMPERATURE
AC	AIR CONDITIONING	M/A	MIXED AIR
AD	AREA DRAIN	MAX	MAXIMUM
ADD	ADDENDUM	MBH	ONE THOUSAND BTU PER HOUR
AFF	ABOVE FINISHED FLOOR	MCF	ONE THOUSAND CUBIC FEET
AFUE	ANNUAL FUEL UTILIZATION EFFICIENCY	MD	MOTORIZED DAMPER
ALT	ALTERNATE	MECH	MECHANICAL
AP	ACCESS PANEL	MFR	MANUFACTURER
ARCH	ARCHITECT/ARCHITECTURAL	MIN	MINIMUM
BFF	BELOW FINISHED FLOOR	MISC	MISCELLANEOUS
BLW	BELOW	MTR	MOTOR
BTU	BRITISH THERMAL UNITS	MU/A	MAKE-UP/AIR
BTUH	BRITISH THERMAL UNITS PER HOUR	NC	NOISE CRITERIA
CAP	CAPACITY	NC	NORMALLY CLOSED
CB	CATCH BASIN	NIC	NOT IN CONTRACT
CFM	CUBIC FEET PER MINUTE	NO	NUMBER
CLG	CEILING	NO	NORMALLY OPEN
CO	CLEAN OUT	NTS	NOT TO SCALE
CW	COLD WATER	O	OXYGEN
D	DEGREE	O/A	OUTSIDE AIR
DB	DRY BULB	ORD	OVERFLOW ROOF DRAIN
DIA	DIAMETER	PD	PRESSURE DROP
DN	DOWN	PIV	POST INDICATOR VALVE
DW	DISTILLED WATER	PLBG	PLUMBING
EA	EACH	PRESS	PRESSURE
EAT	ENTERING AIR TEMPERATURE	PRV	PRESSURE REDUCING VALVE
ELEC	ELECTRICAL	PSI	POUNDS PER SQUARE INCH
EQUIP	EQUIPMENT	PSIG	POUNDS PER SQUARE INCH GAUGE
EWC	ELECTRIC WATER COOLER	PWR	POWER
EWT	ENTERING WATER TEMPERATURE	R	DUCT RISER
E/A	EXHAUST AIR	R/A	RETURN AIR
EXIST	EXISTING	RCP	RADIANT CEILING PANEL
F	DEGREES FAHRENHEIT	RD	ROOF DRAIN
FCO	FLOOR CLEAN OUT	REC	RECESSED
FD	FLOOR DRAIN	RED	REDUCER
FDC	FIRE DEPARTMENT CONNECTION	RH	RELATIVE HUMIDITY
FL	FLOOR	RL/A	RELIEF AIR
FO	FUEL OIL	RM	ROOM
FOV	FUEL OIL VENT	RPM	REVOLUTIONS PER MINUTE
FOR	FUEL OIL RETURN	RW	RAIN WATER
FOS	FUEL OIL SUPPLY	SF	SQUARE FOOT
FPM	FEET PER MINUTE	S/A	SUPPLY AIR
FS	FLOOR SINK	SAN	SANITARY
FT	FOOT/FEET	SF	SQUARE FOOT
FTR	FIN TUBE RADIATION	SD	SMOKE DAMPER
GAL	GALLON	SM	SURFACE MOUNT
GF	GAS-FIRED	SP	STANDPIPE
GC	GENERAL CONTRACTOR	SP	STATIC PRESSURE
GPM	GALLONS PER MINUTE	STM	STEAM
GW	GREASE WASTE	T	THERMOSTAT
HB	HOSE BIB	TD	TEMPERATURE DROP
HP	HORSE POWER	TDR	TRENCH DRAIN
HTG	HEATING	TEMP	TEMPERATURE
HTR	HEATER	TYP	TYPICAL
HW	HOT WATER	UG	UNDERGROUND
HYD	HYDRANT	VAC	VACUUM
ID	INDIRECT	V	VENT
IN	INCH	VAV	VARIABLE AIR VOLUME
INV	INVERT	VENT	VENTILATION
LB	POUND	VTR	VENT THROUGH ROOF
LB/HR	POUNDS PER HOUR	W	WASTE
LAT	LEAVING AIR TEMPERATURE	WB	WET BULB
LP	LOW PRESSURE	WCO	WALL CLEAN OUT
LPG	LIQUEFIED PETROLEUM GAS	WH	WALL HYDRANT

EQUIPMENT ABBREVIATIONS

AC	AIR CONDITIONING UNIT	ET	EXPANSION TANK
ACCU	AIR COOLING CONDENSING UNIT	EWH	ELECTRIC WATER HEATER
AHU	AIR HANDLING UNIT	FCU	FAN COIL UNIT
AS	AIR SEPARATOR	FP	FIRE PUMP
B	BOILER	GI	GREASE INTERCEPTOR
CH	CHILLER	GRV	GRAVITY ROOF VENTILATOR
CT	COOLING TOWER	HWP	HEATING WATER PUMP
CUH	CABINET UNIT HEATER	HRU	HEAT RECOVERY UNIT
CHWP	CHILLED WATER PUMP	PRV	POWER ROOF VENTILATOR
DBP	DOMESTIC WATER BOOSTER PUMP	RE	RETURN/EXHAUST FAN
DC	DUCT MOUNTED COIL	RTU	ROOFTOP UNIT
DCP	DOMESTIC WATER CIRCULATING PUMP	SP	SUMP PUMP
EF	EXHAUST FAN	UH	UNIT HEATER
EDC	ELECTRIC DUCT COIL	WH	WATER HEATER

PLUMBING AND PIPING SYMBOLS

CHWR	CHILLED WATER RETURN
CHWS	CHILLED WATER SUPPLY
CD	CONDENSATE DRAINAGE
CWR	CONDENSER WATER RETURN
CWS	CONDENSER WATER SUPPLY
GWR	GEOTHERMAL WATER RETURN
GWS	GEOTHERMAL WATER SUPPLY
HWR	HEATING WATER RETURN
HWS	HEATING WATER SUPPLY
G	NATURAL GAS
PG	PROPANE GAS
REF-L	REFRIGERANT-LIQUID
REF-S	REFRIGERANT-SUCTION
REF-HG	REFRIGERANT-HOT GAS
STM	STEAM
CDR	CONDENSATE RETURN
CWV	COMBINATION WASTE & VENT
CA	COMPRESSED AIR
CW	DOMESTIC COLD WATER
H-CW	HARD COLD WATER
S-CW	SOFT COLD WATER
F-CW	FILTERED COLD WATER
RO	REVERSE OSMOSIS WATER
HW	HOT WATER
HW 140°	HOT WATER 140°
HW-R	HOT WATER RECIRCULATION
HW-R 140°	HOT WATER RECIRCULATION 140°
GV	GREASE VENT
GW	GREASE WASTE
IW	INDIRECT WASTE
OV	OIL VENT
OW	OIL WASTE
PD	PUMP DISCHARGE
V	SANITARY VENT
SS	SANITARY SEWER
SHWR	SOLAR HOT WATER RETURN
SHWS	SOLAR HOT WATER SUPPLY
SD	STORM DRAINAGE
OSD	OVERFLOW STORM DRAINAGE



PIPE ACCESSORY TAGS

- 4" FCO — CLEANOUT
- 2" BACKWATER — SWING CHECK
- 2" CHECK — CHECK VALVE
- (ALTERNATE CHECK VALVE SYMBOL)
- 2" BALANCE — BALANCING VALVE
- 2" CIRC — CIRCUIT SETTER
- T/P — 1" RECIRC — RECIRC. VALVE
- 2" GATE — GATE VALVE
- 2" QUICK — QUICK OPENING
- 2" SHUTOFF — BALL VALVE
- 2" STRAINER
- TP — 1/2" PRIMER — TRAP PRIMER
- M — 2" M-CNTRL — ELEC. CONTROL
- T/P — TMV-XX — THERMOSTATIC MIXING
- EM — 1/2" TMV — EMERG. THERMOSTATIC
- 2" PRV — PRESS REDUCING
- W — 2" DOM. WM — DOM. WATER METER
- IR — 1 1/2" DOM. WM — IRRIGATION WATER METER
- S — 1" GAS-CNTRL — EMERG. GAS SHUTOFF
- 1" PLUG — PLUG VALVE
- 1" GAS COCK — GAS SHUTOFF COCK
- 1" REG — PRESS REGULATOR
- DOUBLE CHECK VALVE
- REDUCED PRESSURE ZONE

DRAIN TAGS

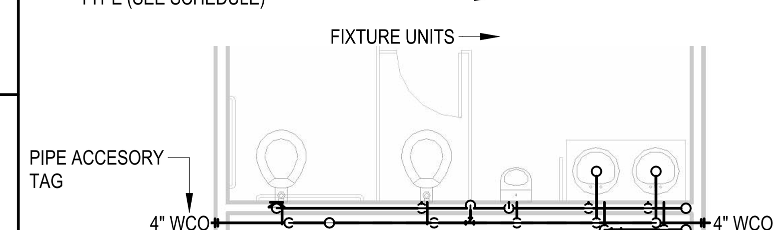
DRAIN SIZE

FLOOR DRAIN	4" FD-1	TYPE (SEE SCHEDULE)	4" AD-2	AREA DRAIN NO TRAP
TRAP PRIMER	4" FD-3P	"P" - INDICATES PRIMER CONNECTION	4" SD-29	DECK DRAIN
DEEP TRAP	4" FD-3 / 8 DFU	FIXTURE UNITS	4" SD-12	FLOW CONTROL DRAIN
INTEGRAL CLEANOUT			4" SD-15	STORM DRAIN
HUB DRAIN	4" FD-14			
FLOOR SINK	4" FS-4	ROOF AREA SERVED BY DRAIN	6" SD-1 / 4000 SF	COMBINATION DRAINS

PLUMBING FIXTURE TAGS

TYPE (SEE SCHEDULE)

FIXTURE UNITS



* NOTE *

ALL OF GENERAL NOTES ON THIS SHEET ARE TO BE APPLIED TO ALL OTHER DRAWINGS IN THIS SET.THE SYMBOLS AND ABBREVIATIONS SHOWN ON THIS SHEET MAY OR MAY NOT BE USED IN THIS SET OF DRAWINGS.

PLUMBING NOTES

A. ALL WORK SHALL BE DONE IN ACCORDANCE WITH THE LATEST EDITION OF THE STATE CODE AS WELL AS ALL LOCAL AND OTHER APPLICABLE CODES.

B. ALL WORK SHALL BE PERFORMED BY EXPERIENCED AND SKILLED CRAFTSMEN.

C. FIELD VERIFY ALL NEW WATER, WASTE, AND VENT PIPING CONNECTIONS AND PROVIDE NEW CONNECTIONS AS REQUIRED FOR PROPERLY OPERATING SYSTEMS.

D. FIELD VERIFY LOCATION AND INVERTS OF SITE UTILITIES PRIOR TO INSTALLATION.

E. ROUTE DOMESTIC WATER, FIRE PROTECTION, SANITARY SEWER, AND STORM SEWER SERVICES TO SITE UTILITIES 5'-0" FROM BUILDING UNLESS NOTED OTHERWISE. REFER TO CIVIL PLANS.

F. WASTE AND VENT PIPING BELOW FLOOR AND THROUGH FLOOR SHALL BE 2" MINIMUM.

G. PROVIDE CLEANOUT IN ACCESSIBLE LOCATION AT THE BASE OF ALL PLUMBING RISERS.

H. WATER LINES BELOW GRADE SHALL BE TYPE "K" COPPER (NO MECHANICAL JOINTS BELOW GRADE) AND ABOVE GRADE TYPE "L". CROSS-LINKED POLYETHYLENE PIPING IS ACCEPTABLE, SO LONG AS ALL LOCAL BUILTING CODES ARE ADHERED TO. SUPPORT AS REQUIRED AND SHALL BE HYDROSTATICALLY TESTED FOR TWO HOURS AT 100 PSIG. ALL WATER PIPING AT WATER FIXTURES SHALL BE PROVIDED WITH 18" AIR CHAMBERS OR SHOCK ARRESTORS. STOPS SHALL BE PROVIDED ON HOT AND COLD-WATER LINES. WATER PIPING SHALL BE INSULATED WITH 1" CLOSED CELL RUBBER. THE ENTIRE WATER SYSTEM SHALL BE DISINFECTED PRIOR TO PLACING INTO SERVICE.

I. SANITARY SEWER LINES SHALL BE PVC AND SLOPED TOWARD DRAINAGE DIRECTION AT A MINIMUM OF 1/4" PER FOOT FOR 2-1/2" AND SMALLER PIPING. SLOPE SHALL BE 1/8" PER FOOT FOR PIPING SIZES 3" - 6".

J. WHERE APPLICABLE, ANY DEVICE THAT SHALL SERVE A SPECIAL FUNCTION SUCH AS PROCESSING OR ICE STORAGE, AND CONNECTS TO WATER SUPPLY AND DRAIN, SHALL BE PROTECTED AGAINST BACKFLOW WITH APPROVED BACKFLOW PREVENTION DEVICE.

K. PROVIDE PRESSURE REDUCING VALVE IF STREET PRESSURE EXCEEDS 80 PSIG.

L. SHOULD WATER PRESSURE BE TOO LOW TO PROPERLY CYCLE FLUSH VALVE FIXTURES, A BOOSTER PUMP SHALL BE REQUIRED. SUFFICIENT WATER PRESSURE IS ASSUMED FOR PROPER PLUMBING OPERATION.

M. THE PLUMBING CONTRACTOR SHALL PROVIDE ALL OPENINGS REQUIRED FOR THE PLUMBING WORK AND SHALL INSTALL FIRE RATED SLEEVES WHEREVER PENETRATIONS OF RATED WALLS OR FLOORS ARE MADE. THE PATCHING SHALL BE BY THE PLUMBING CONTRACTOR. THE PLUMBING CONTRACTOR SHALL REVIEW ALL UTILITY SITE PLANS AND ARCHITECTURAL SITE PLANS FOR WORK BY OTHERS.

N. LOCATION OF UTILITIES (WASTE AND WATER LINES, MANHOLES, ETC...) THAT ARE TO BE CONNECTED TO ARE ASSUMED. IT SHALL BE THE RESPONSIBILITY OF THE PLUMBING CONTRACTOR TO VERIFY THESE LOCATIONS AND MAKE THE FINAL CONNECTION AS REQUIRED.

O. ALL FLOOR DRAINS AND TRENCH DRAINS, IF APPLICABLE, SHALL BE PROVIDED WITH TRAP PRIMERS.

P. ALL PLUMBING FIXTURES SHALL BE INSTALLED WITH AN ANGLE STOP VALVE AT WALL CONNECTION.

PLUMBING SHEET INDEX

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL SEAL 33793 ENGINEER BENJAMIN D. LEWIS
02/27/2026

- [x] For Construction
- [ ] Not for Construction
- [ ] Review Set
- [x] Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:54 AM

Revisions

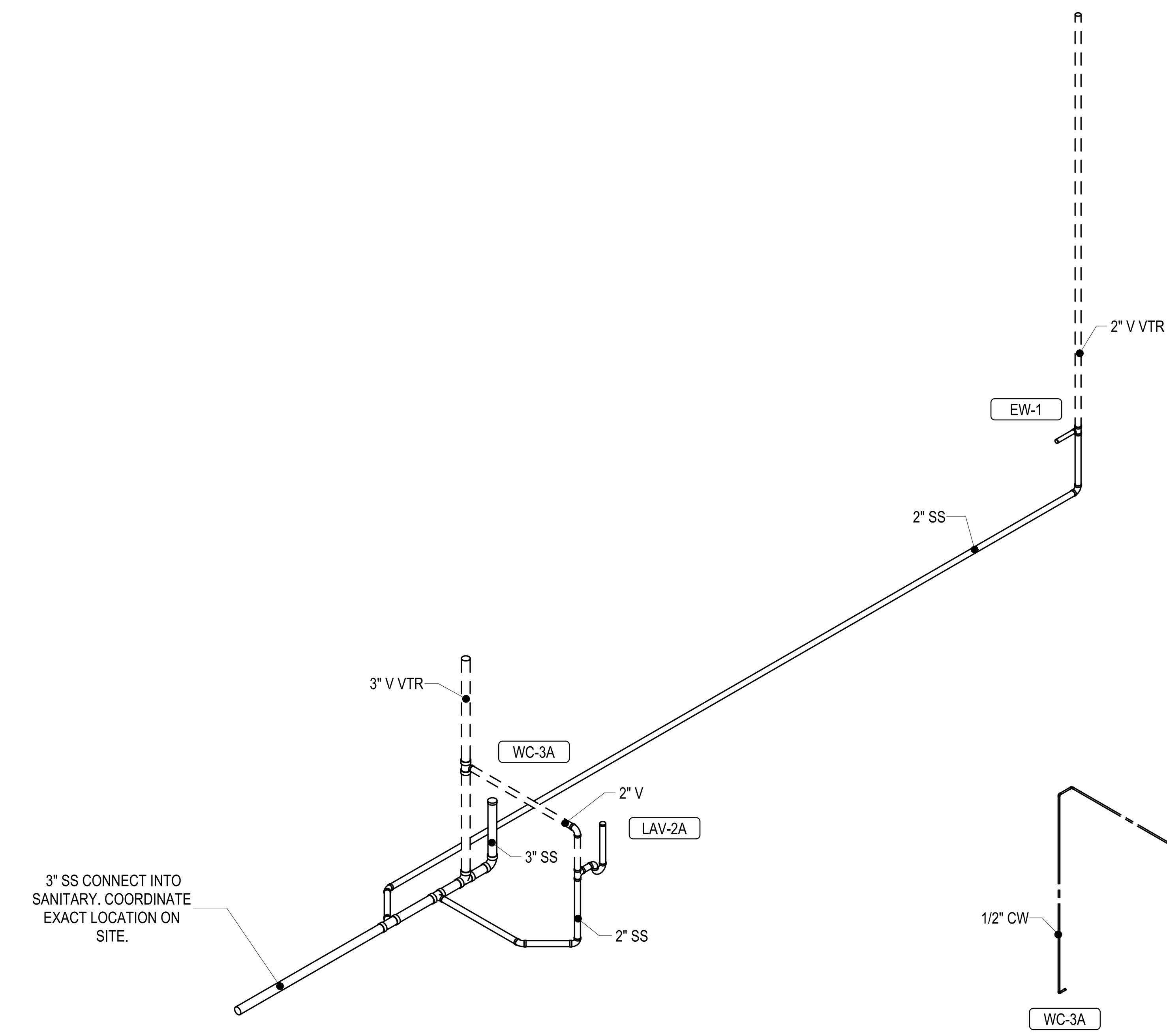
Mark	Date	Description

Drawing No.

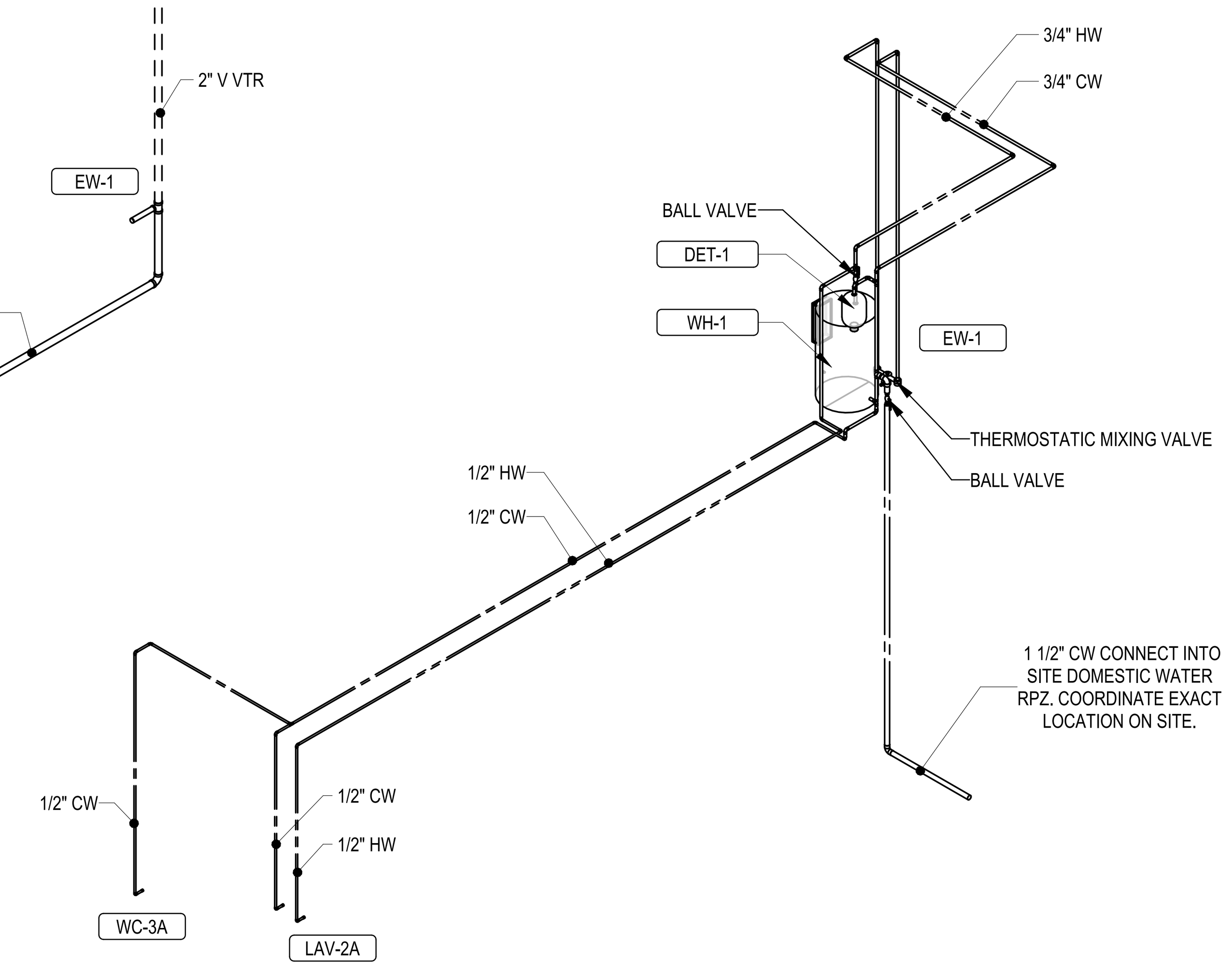
PLUMBING TITLE SHEET

P000

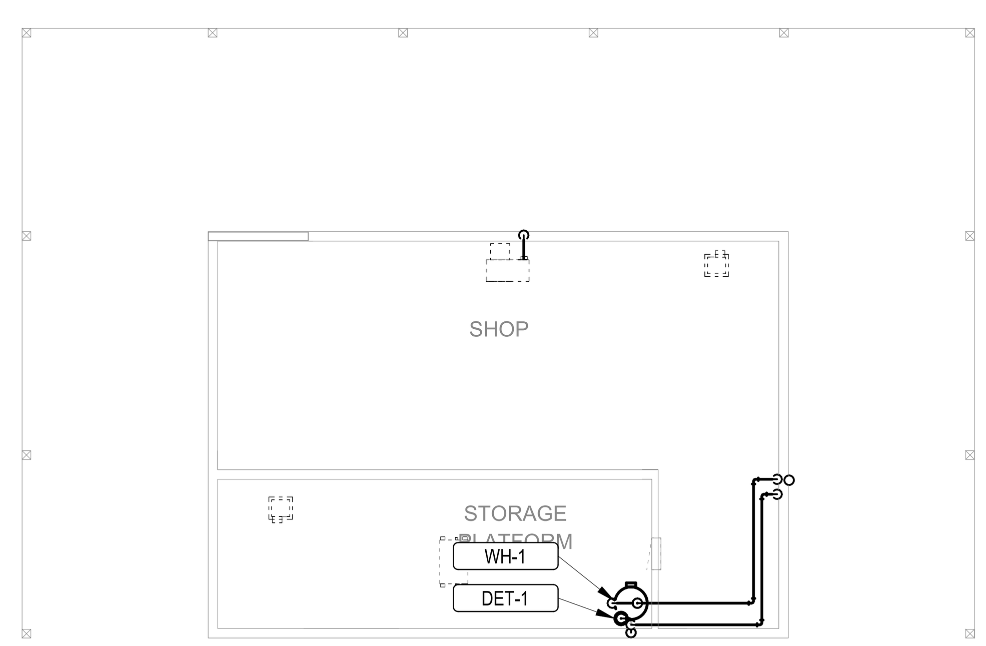
of



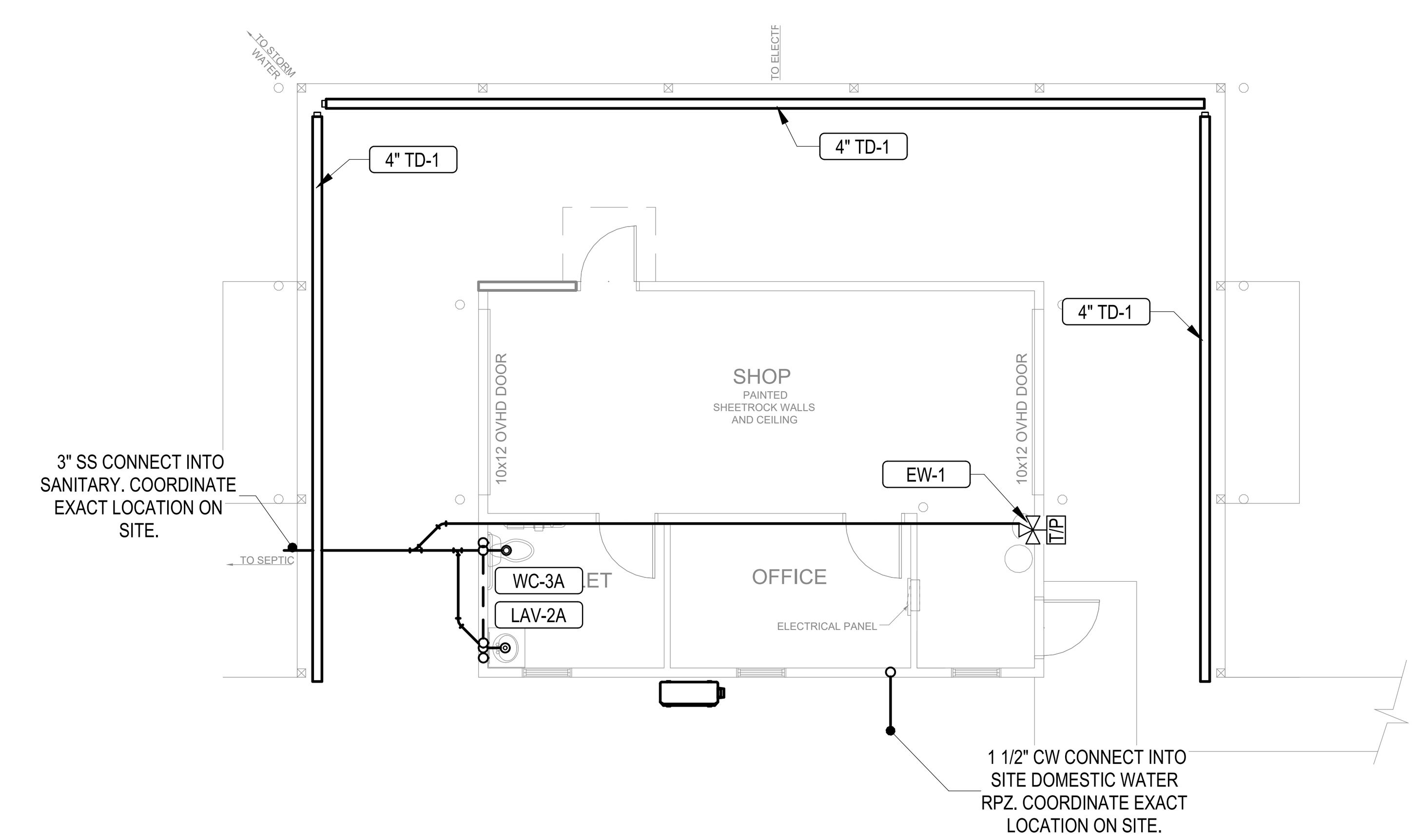
4 P101 WASTE & VENT RISER DIAGRAM



3 P101 DOMESTIC WATER RISER DIAGRAM



2 P101 PLUMBING PLAN - STORAGE PLATFORM
1/8" = 1'-0"



1 P101 PLUMBING PLAN - LEVEL 1
1/8" = 1'-0"

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL SEAL 33293 ENGINEER BENJAMIN D. LEWIS
02/27/2026

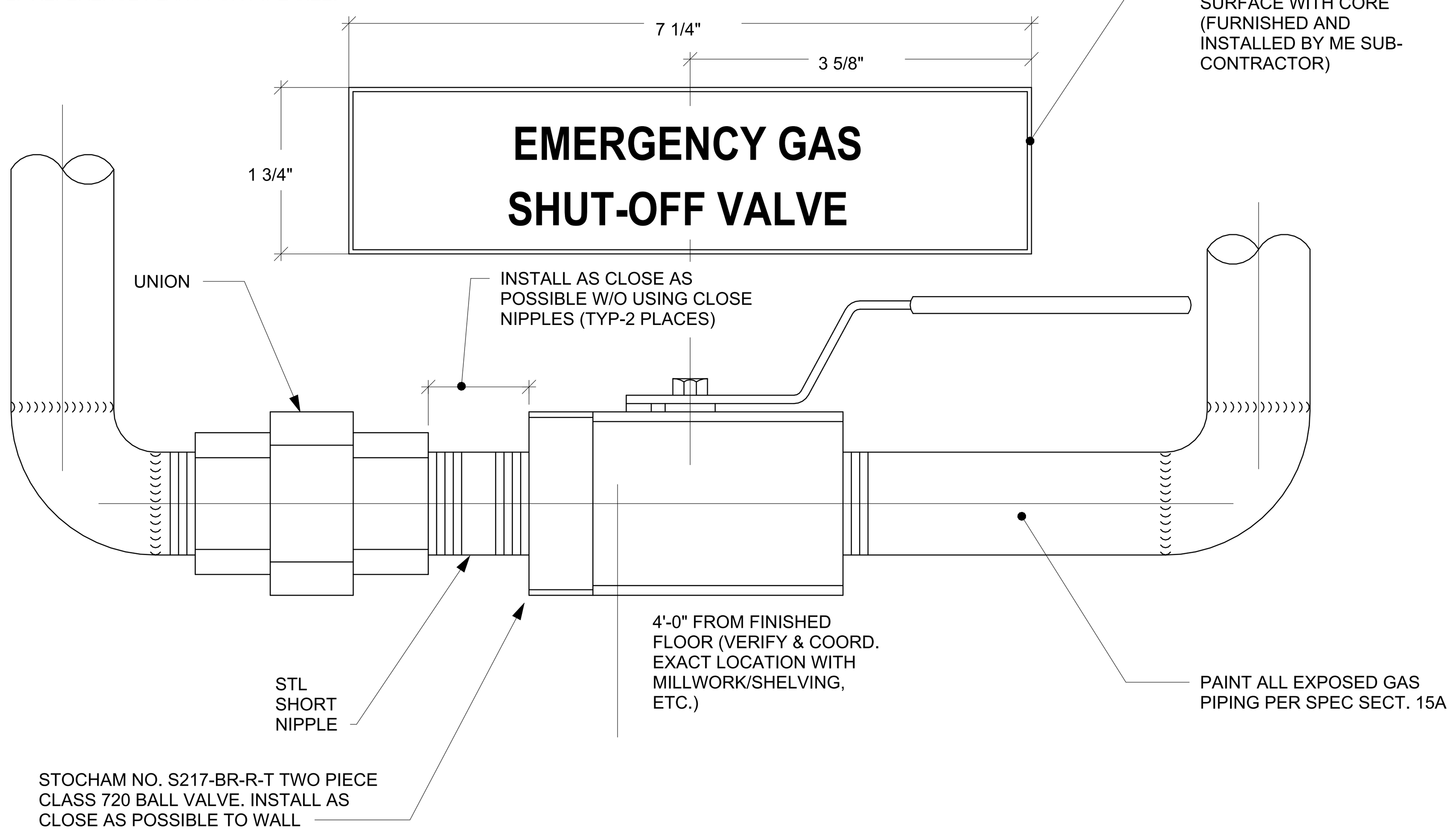
- [x] For Construction
- [ ] Not for Construction
- [ ] Review Set
- [x] Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:55 AM
Revisions

Mark	Date	Description

Drawing No.
PLUMBING PLAN
P101
of

NOTES:
1. ADEQUATELY SUPPORT ASSEMBLY TO WALL.
2. REFERENCE PLANS FOR PIPE SIZE.



2 / P403 GAS SHUT-OFF VALVE DETAIL
NOT TO SCALE

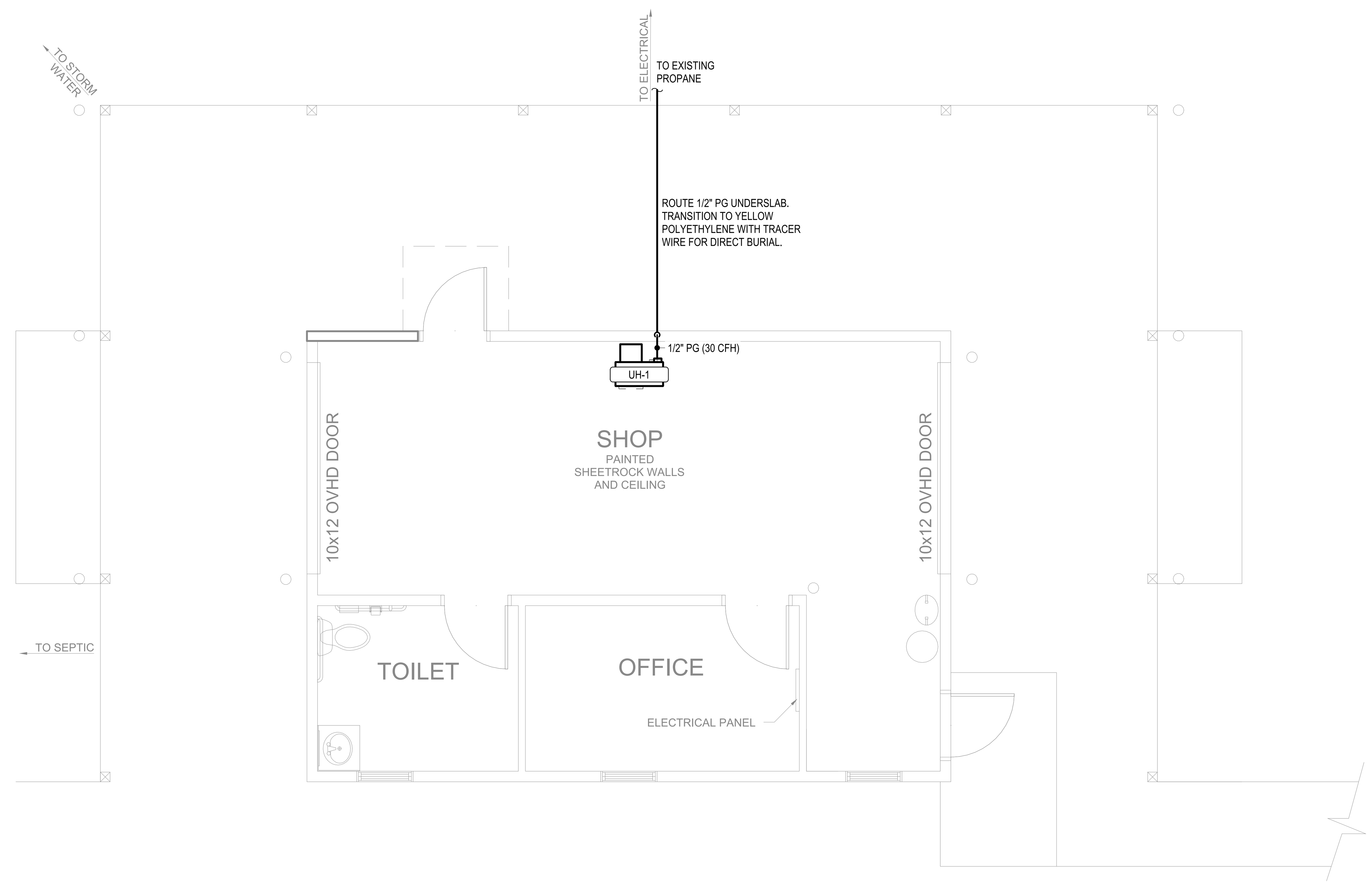
NOTE:
1. PROVIDE AGA APPROVED SHUTOFF VALVE.
2. PROVIDE DIRT LEG AT EACH APPLIANCE.
3. ALL PIPING SHALL BE SCHEDULE 40 CARBON STEEL.
4. GAS PIPING INLET PRESSURE 2.0 PSI WITH A PRESSURE DROP OF 1.0 PSI
5. GAS PIPING SIZED PER 2018 NC FUEL GAS CODE TABLE 402.4(5)

GAS DEMAND

Identity Mark	Fuel Load
UH-1	30000 Btu/h
Grand total: 1	30000 Btu/h

GAS PIPE LENGTH

System Type	Length
MP_Propane Gas	25' - 4 1/2"



3 / P403 GAS FLOOR PLAN
1/4" = 1'-0"

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 33793 BENJAMIN D. LEWIS
02/27/2026

☒ For Construction
☐ Not for Construction
☐ Review Set
☒ Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:58 AM

Revisions

Mark	Date	Description

Drawing No.
GAS PLAN
P403
of

DOMESTIC FIXTURE SCHEDULE

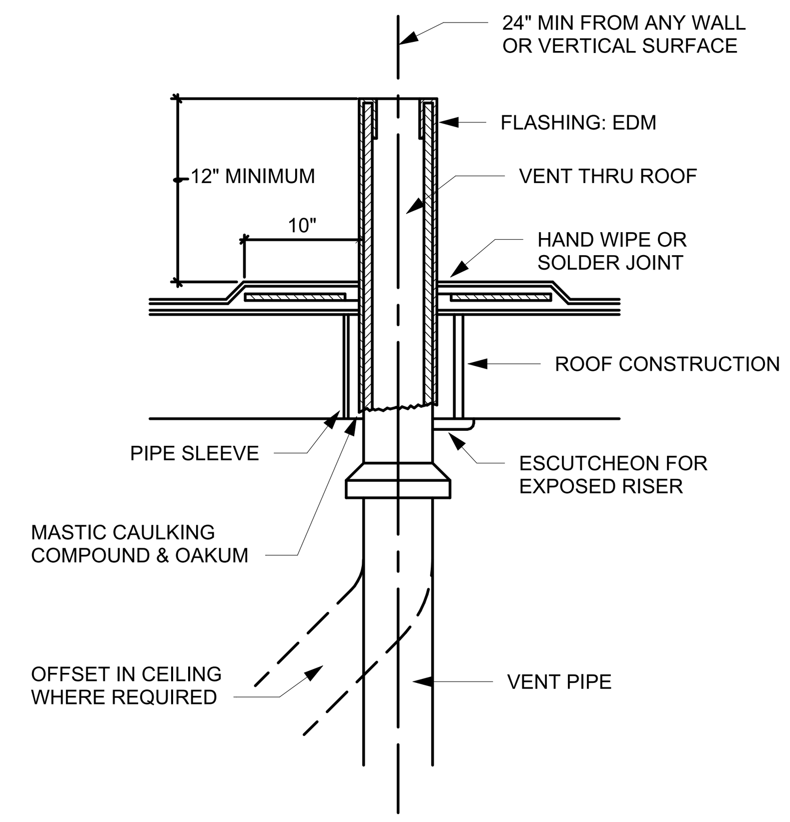
ID	DESCRIPTION	MANUFACTURER	MODEL	QTY	MATERIAL DESCRIPTION	FINISH	TRIM MANUFACTURER	TRIM MODEL	TRIM TYPE	FLOW FIXTURE WATER FLOW	FLOW FIXTURE CWT	FLOW FIXTURE HWT	FLOW FIXTURE MAX. MWT	FLUSH FIXTURE VOL. PER FLUSH	FLUSH FIXTURE MIN. VOL. PER FLUSH	WASTE ROUGH-IN PIPE SIZE	INDIRECT WASTE PIPE SIZE	VENT PIPE SIZE	COLD WATER ROUGH-IN PIPE SIZE	HOT WATER ROUGH-IN PIPE SIZE	SPECIFICATION	REMARKS
EW-1	EYEWASH - PEDESTAL	HAWS	7261	1	ABS PLASTIC	GREEN				10.0 GPM	40 °F	120 °F	85 °F				1 1/4"			1/2"	PEDESTAL EYE/FACE WASH STATION. PROVIDE THERMOSTATIC MIXING VALVE MODEL 9201EW AXION EMERGENCY TEMPERING VALVE.	
LAV-2A	LAVATORY - COUNTER - ADA	AMERICAN STANDARD	CADET	1	WHITE VITREOUS CHINA	WHITE	AMERICAN STANDARD	1340.227	MANUAL	0.5 GPM	40 °F	120 °F	105 °F			2"		2"	1/2"	1/2"	COUNTERTOP LAVATORY, SELF-RIMMING, FAUCET HOLES ON 4 " CENTERS. METERING CENTERSET CONVENTIONAL SPOUT FAUCET. VANDAL- RESISTANT SOLID BRASS CONSTRUCTION. EASY-PUSH HANDLES, GRID DRAIN, LOOSE KEY ANGLE STOPS AND SUPPLIES. MOUNT AT ADA COMPLIANT HEIGHT. INSULATE WATER AND WASTE TO MEET ADA REQUIREMENTS USING ADA INSULATION KIT.	
WC-3A	WATER CLOSET - FLOOR - PRESSURE ASSISTED TANK TYPE - ADA	AMERICAN STANDARD	CADET RIGHT HEIGHT	1	WHITE VITREOUS CHINA	WHITE	AMERICAN STANDARD	2467.016	MANUAL		40 °F		40 °F	1.6 gal	1.6 gal	3"		2"	1/2"		ELONGATED FLOOR MOUNTED PRESSURE ASSISTED TANK TYPE WATER CLOSET, WITH CHURCH 295CT ELONGATED OPEN FRONT SEAT. PROVIDE A 1/4" BRASS BALL VALVE AT WALL CONNECTION. INSTALL AT ADA COMPLIANT HEIGHT.	

Grand total: 3

NOTES:
APPROVED EQUAL ACCEPTED

ELECTRIC WATER HEATER SCHEDULE

ID	MANUFACTURER	MODEL NO.	TYPE	ELECTRIC HEAT EXCHANGER HEATING CAP	ELECTRIC HEAT EXCHANGER MAX TEMP RISE	HEATING ELEMENT QTY	HEATING ELEMENT POWER	HEATING ELEMENT SCR	EF	FLA	MCA	MOCP	VOLT	PH	REMARKS
WH-1	AO SMITH	ENJB-40W 100	STORAGE	3.0 kW	80 °F	1	3.0 kW	Yes	0.9	12.5 A	15.6 A	20.0 A	240 V	1	PROVIDE ASSE 1017 COMPLIANT MIXING VALVE; POWERS SERIES LFSH OR EQUAL.



2 P501 VENT PIPIE THROUGH ROOF DETAIL
NOT TO SCALE

FLOOR DRAIN SCHEDULE

ID	DESCRIPTION	MANUFACTURER	MODEL	QTY	MATERIAL DESCRIPTION DRAIN BODY	WASTE PIPE SIZE	SPECIFICATION	REMARKS
TD-1	TRENCH DRAIN	WATTS	DEAD LEVEL D	3	POLYPROPYLENE	4"	PRE-SLOPED TRENCH DRAIN SYSTEM WITH 6IN WIDE X 48IN LONG DUCTILE IRON FRAME, UV STABILIZED TALC-FILLED POLYPROPYLENE CHANNELS WITH 4IN NO HUB BOTTOM OR END OUTLETS. SYSTEM SHALL BE FRAME ANCHORED, WITH REINFORCED GALVANIZED SLOTTED GRATING TO SUIT DIN CLASS LOAD RATING. SYSTEM TO INCLUDE FRAME CONNECTORS, GRATE LOCKDOWNS, AND CONSTRUCTION COVERS. PROVIDE WITH MANUFACTURER'S CATCH BASIN WITH DUCTILE IRON GRATE. INSTALLATION TO BE PERFORMED IN ACCORDANCE WITH MANUFACTURER'S INSTRUCTIONS AND LOCAL BUILDING CODE.	

Grand total: 3

PIPE ACCESSORY SCHEDULE

TYPE ID	DESCRIPTION	MANUFACTURER	MODEL	COUNT	SPECIFICATION	REMARKS
SHUTOFF	BALL VALVE	WATTS	LFFBV	2		
TMV	THERMOSTATIC MIXING VALVE	POWERS	LFMM431	1	ASSE 1017 COMPLIANT	ASSE 1017 COMPLIANT

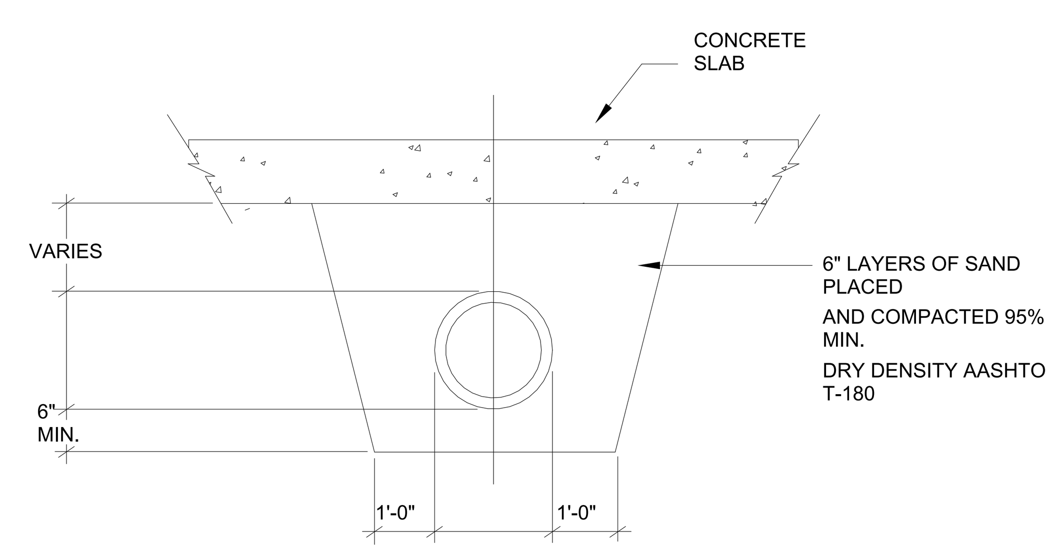
Grand total: 3

DRAINAGE FIXTURE UNIT SUMMARY

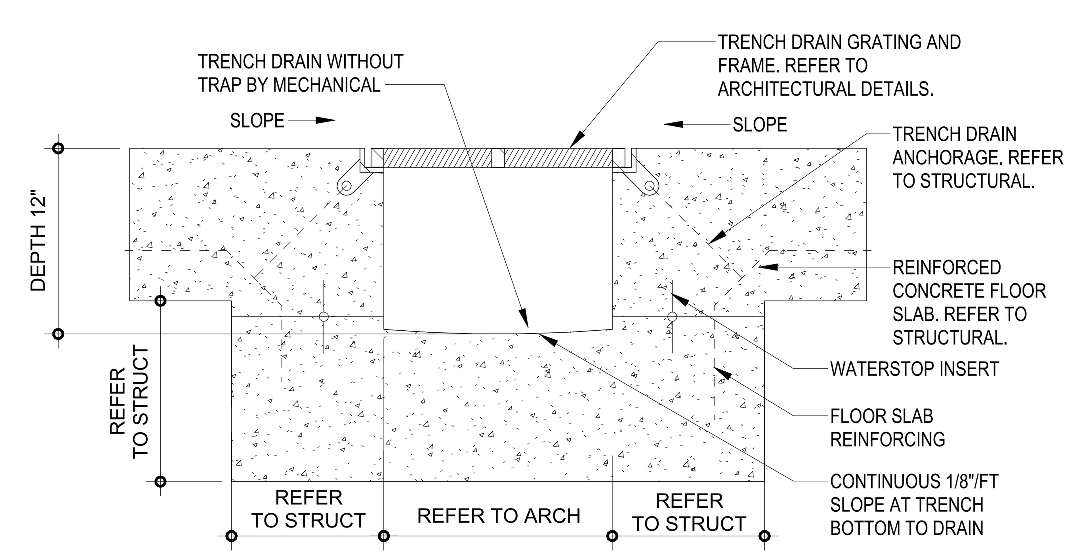
ID	FIXTURE DESCRIPTION	QTY	WASTE SIZE	DFU DEMAND UNIT	DFU DEMAND TOTAL
EW-1	EYEWASH - PEDESTAL	1	1 1/4"	2	2
LAV-2A	LAVATORY - COUNTER - ADA	1	2"	1	1
WC-3A	WATER CLOSET - FLOOR - PRESSURE ASSISTED TANK TYPE - ADA	1	3"	4	4
Grand total: 3					7

WATER SUPPLY FIXTURE UNIT SUMMARY

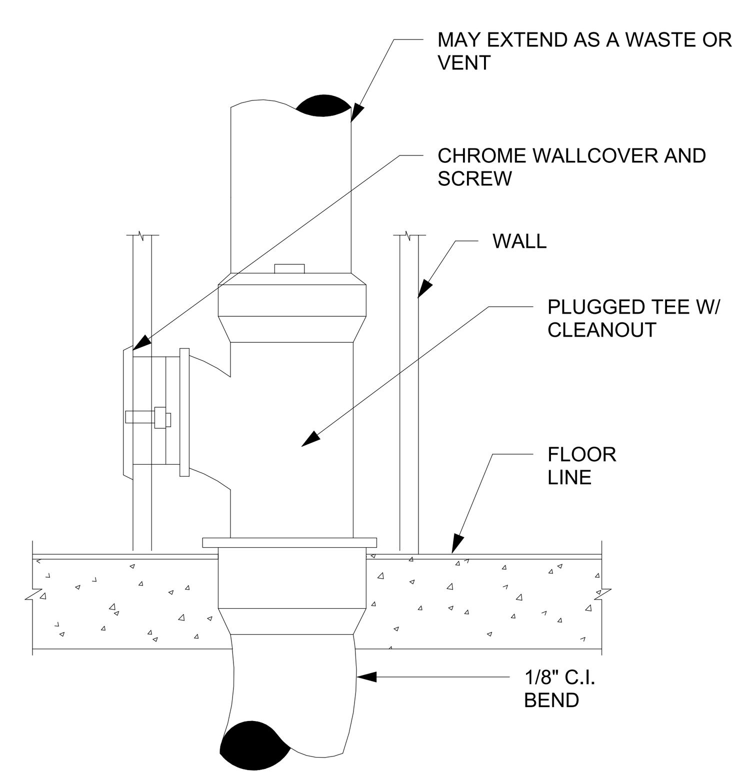
ID	FIXTURE DESCRIPTION	QTY	PIPE SIZE CW	PIPE SIZE HW	DFU DEMAND UNIT	DFU DEMAND TOTAL	CWFU DEMAND UNIT	CWFU DEMAND TOTAL	HWFU DEMAND UNIT	HWFU DEMAND TOTAL	WSFU DEMAND UNIT	WSFU DEMAND TOTAL
EW-1	EYEWASH - PEDESTAL	1	0"	1/2"	2	2	0	0	1.5	1.5	2	2
LAV-2A	LAVATORY - COUNTER - ADA	1	1/2"	1/2"	1	1	0.75	0.75	0.75	0.75	1	1
WC-3A	WATER CLOSET - FLOOR - PRESSURE ASSISTED TANK TYPE - ADA	1	1/2"		4	4	2.5	2.5	0	0	2.5	2.5
Grand total: 3						7		3.25		2.25		5.5



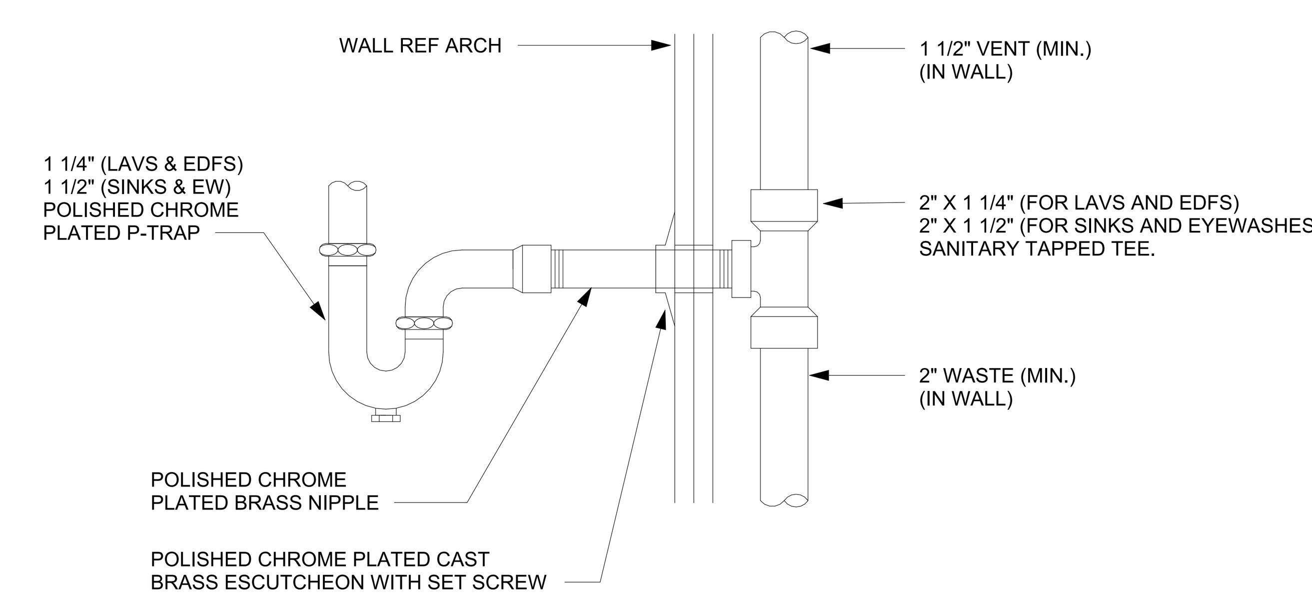
1 P501 TYPICAL PIPE UNDER SLAB DETAIL
NOT TO SCALE



10 P501 TRENCH DRAIN DETAIL
NO SCALE



6 P501 WALL CLEANOUT DETAIL
NOT TO SCALE



4 P501 TYPICAL DRAIN PIPING DETAIL
NOT TO SCALE

ARCHITECT

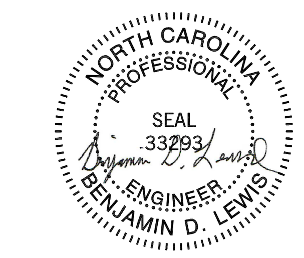
RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824



02/27/2026

☒ For Construction
☐ Not for Construction
☐ Review Set
☒ Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:50:02 AM

Revisions

Mark	Date	Description

Drawing No.
PLUMBING SCHEDULES/DETAILS

P501

of

GENERAL MECHANICAL SYMBOLS

- REVISION NUMBER - SHOWN ON PLANS
- POINT WHERE NEW CONNECTS TO EXISTING
- NUMBER OF DETAIL ON SHEET
- NUMBER OF SHEET WHERE DETAIL APPEARS
- KEYNOTE
- CONTINUATION SYMBOL
- Room 5 — ROOM NAME AND NUMBER
- ITEM TO BE DEMOLISHED
- AREA NOT IN CONTRACT
- 2" — PIPE SIZE TAG (DIAMETER)
- ABOVE GROUND PIPING
- 1/8" / 12" SLOPE — PIPE SLOPE TAG
- BELOW GROUND PIPING
- INVERT: -105' - 1" — PIPE INVERT ELEVATION TAG
- (E) — EXISTING PIPE TAG
- PIPING BEING DEMOLISHED

ABBREVIATIONS

Ø	ROUND	LVR	LOUVER
ABV	ABOVE	LWT	LEAVING WATER TEMPERATURE
AC	AIR CONDITIONING	M/A	MIXED AIR
AD	AREA DRAIN	MAX	MAXIMUM
ADD	ADDENDUM	MBH	ONE THOUSAND BTU PER HOUR
AFF	ABOVE FINISHED FLOOR	MCF	ONE THOUSAND CUBIC FEET
AFUE	ANNUAL FUEL UTILIZATION EFFICIENCY	MD	MOTORIZED DAMPER
ALT	ALTERNATE	MECH	MECHANICAL
AP	ACCESS PANEL	MFR	MANUFACTURER
ARCH	ARCHITECT/ARCHITECTURAL	MIN	MINIMUM
BFF	BELOW FINISHED FLOOR	MISC	MISCELLANEOUS
BLW	BELOW	MTR	MOTOR
BTU	BRITISH THERMAL UNITS	MU/A	MAKE-UP/AIR
BTUH	BRITISH THERMAL UNITS PER HOUR	NC	NOISE CRITERIA
CAP	CAPACITY	NC	NORMALLY CLOSED
CB	CATCH BASIN	NIC	NOT IN CONTRACT
CFM	CUBIC FEET PER MINUTE	NO	NUMBER
CLG	CEILING	NO	NORMALLY OPEN
CO	CLEAN OUT	NTS	NOT TO SCALE
CW	COLD WATER	O	OXYGEN
D	DEGREE	O/A	OUTSIDE AIR
DB	DRY BULB	ORD	OVERFLOW ROOF DRAIN
DIA	DIAMETER	PD	PRESSURE DROP
DN	DOWN	PIV	POST INDICATOR VALVE
DW	DISTILLED WATER	PLBG	PLUMBING
EA	EACH	PRESS	PRESSURE
EAT	ENTERING AIR TEMPERATURE	PRV	PRESSURE REDUCING VALVE
ELEC	ELECTRICAL	PSI	POUNDS PER SQUARE INCH
EQUIP	EQUIPMENT	PSIG	POUNDS PER SQUARE INCH GAUGE
EWC	ELECTRIC WATER COOLER	PWR	POWER
EWT	ENTERING WATER TEMPERATURE	R	DUCT RISER
E/A	EXHAUST AIR	R/A	RETURN AIR
EXIST	EXISTING	RCP	RADIANT CEILING PANEL
F	DEGREES FAHRENHEIT	RD	ROOF DRAIN
FCO	FLOOR CLEAN OUT	REC	RECESSED
FD	FLOOR DRAIN	RED	REDUCER
FDC	FIRE DEPARTMENT CONNECTION	RH	RELATIVE HUMIDITY
FL	FLOOR	RL/A	RELIEF AIR
FO	FUEL OIL	RM	ROOM
FOV	FUEL OIL VENT	RPM	REVOLUTIONS PER MINUTE
FOR	FUEL OIL RETURN	RW	RAIN WATER
FOS	FUEL OIL SUPPLY	SF	SQUARE FOOT
FPM	FEET PER MINUTE	S/A	SUPPLY AIR
FS	FLOOR SINK	SAN	SANITARY
FT	FOOT/FEET	SF	SQUARE FOOT
FTR	FIN TUBE RADIATION	SD	SMOKE DAMPER
GAL	GALLON	SM	SURFACE MOUNT
GF	GAS-FIRED	SP	STANDPIPE
GC	GENERAL CONTRACTOR	SP	STATIC PRESSURE
GPM	GALLONS PER MINUTE	STM	STEAM
GW	GREASE WASTE	T	THERMOSTAT
HB	HOSE BIB	TD	TEMPERATURE DROP
HP	HORSE POWER	TDR	TRENCH DRAIN
HTG	HEATING	TEMP	TEMPERATURE
HTR	HEATER	TYP	TYPICAL
HW	HOT WATER	UG	UNDERGROUND
HYD	HYDRANT	VAC	VACUUM
ID	INDIRECT	V	VENT
IN	INCH	VAV	VARIABLE AIR VOLUME
INV	INVERT	VENT	VENTILATION
LB	POUND	VTR	VENT THROUGH ROOF
LB/HR	POUNDS PER HOUR	W	WASTE
LAT	LEAVING AIR TEMPERATURE	WB	WET BULB
LP	LOW PRESSURE	WCO	WALL CLEAN OUT
LPG	LIQUEFIED PETROLEUM GAS	WH	WALL HYDRANT

EQUIPMENT ABBREVIATIONS

AC	AIR CONDITIONING UNIT	EWH	ELECTRIC WATER HEATER
ACCU	AIR COOLING CONDENSING UNIT	FCU	FAN COIL UNIT
AHU	AIR HANDLING UNIT	FP	FIRE PUMP
AS	AIR SEPARATOR	GI	GREASE INTERCEPTOR
B	BOILER	GRV	GRAVITY ROOF VENTILATOR
CAS	CASSETTE DUCTLESS	HP	HEAT PUMP
CH	CHILLER	HWU	HIGH WALL UNIT
CT	COOLING TOWER	HWP	HEATING WATER PUMP
CU	CONDENSING UNIT	HRU	HEAT RECOVERY UNIT
CUH	CABINET UNIT HEATER	IDU	INDOOR DUCTED MINISPLIT
CHWP	CHILLED WATER PUMP	KHD	KITCHEN HOOD
DBP	DOMESTIC WATER BOOSTER PUMP	L	LOUVER
DC	DUCT MOUNTED COIL	PU	PACKAGED UNIT
DCP	DOMESTIC WATER CIRCULATING PUMP	PRV	POWER ROOF VENTILATOR
DEH	DEHUMIDIFIER	RE	RETURN/EXHAUST FAN
DOAS	DEDICATED OUTDOOR AIR SYSTEM	RTU	ROOFTOP UNIT
EF	EXHAUST FAN	SP	SUMP PUMP
EDC	ELECTRIC DUCT COIL	UH	UNIT HEATER
ET	EXPANSION TANK	WH	WATER HEATER

HVAC SYMBOLS

18"x12"	SQUARE DUCT SIZE TAG (WIDTH x HEIGHT)
18"/12"	OVAL DUCT SIZE TAG (WIDTH / HEIGHT)
18"Ø	ROUND DUCT SIZE TAG (DIAMETER)
(E)	EXISTING DUCT TAG
	DUCT BEING DEMOLISHED
18"x18" S/A	SUPPLY AIR
18"x18" S-O/A	CONDITIONED OUTSIDE AIR
18"x18" O/A	OUTSIDE AIR
18"x18" R/A	RETURN AIR
18"x18" T/A	TRANSFER AIR
18"x18" E/A	EXHAUST AIR
18"x18" S/A - FD	SUPPLY AIR - FABIRC DUCT
18"x18" GE/A	GREASE EXHAUST AIR
18"x18" CE/A	CONDENSATE EXHAUST AIR
18"x18" SE/A	SMOKE EXHAUST AIR
6"Ø FLUE	EXHAUST GAS FLUE
6"Ø C/A	COMBUSTION AIR
DROP	RECTANGULAR SUPPLY/OUTSIDE AIR DUCT RISE
DROP	ROUND SUPPLY/OUTSIDE AIR DUCT RISE
DROP	RECTANGULAR RETURN/TRANSFER AIR DUCT RISE
DROP	ROUND RETURN/TRANSFER AIR DUCT RISE
DROP	RECTANGULAR EXHAUST/RELIEF AIR DUCT RISE
DROP	ROUND EXHAUST/RELIEF AIR DUCT RISE

GRILLES, REGISTERS & DIFFUSERS TAG

TYPE (SEE SCHEDULE)

3-CONE DIFFUSER — SD1 400 / 10" / 24x24 / 22 H-5/7/14

CFM
NECK SIZE / MODULE SIZE
THROW-150FPM/ 100FPM/ 50FPM
THROW PATTERN
MAX NC RATING

PERFORATED DIFFUSER WITH DEFLECTORS — SD3 300 / 10" / 24x24

RG2 500 / 12"x10" / 24x24 / 18 — EGGCRATE RETURN GRILLE

ROUND DIFFUSER WITH ADJUSTABLE PATTERNS — SD9 400 / 12" / —

LOUVERED DOUBLE DEFLECTION GRILLE — SG5 500 / 12"x10"

RG11 500 / 12"x10" / 24x12 — LOUVERED GRILLE

LINEAR BAR GRILLE — SLB3 400 / 48"x2 1/2"

LINEAR DIFFUSER TAG

TYPE (SEE SCHEDULE) — LSD1 200 / 1 / 4' - 0" / 8" / 8' - 0"AFF

CFM
NUMBER OF SLOTS /
ACTIVE SLOT LENGTH (PLENUM LENGTH) /
NECK SIZE
ELEVATION (CENTER OF FACE)
SECTION TOTAL TRACK LENGTH

LINEAR SLOT DIFFUSER — LSD1 200 / 1 / 4' - 0" / 8" — 6' - 0" — LSD1 200 / 1 / 4' - 0" / 8"

MECHANICAL EQUIPMENT TAGS

HEATING COIL FLOW — VAV-XX / Htg: 3.7 GPM / VAV BOX

OPERATING WEIGHT NOT INCLUDING CURB

BOTTOM OF EQUIPMENT ELEVATION — VAV-XX / 10' - 0"

EXISTING EQUIPMENT TO REMAIN — (E)VAV-XX

NOMINAL COOLING CAPACITY

EXISTING RELOCATED EQUIPMENT — (R)VAV-XX

FUEL INPUT GAS PIPE FLOW

EQUIPMENT BY OTHERS (REFER TO OTHER DISCIPLINE FOR ADDITIONAL INFORMATION) — VAV-XX

DATA DEVICE TAGS

EQUIPMENT ID	RTU-XX	SYMBOL	
TEMPERATURE SENSOR	TS	C3H3	C3H3 DETECTOR
HUMIDITY SENSOR	HS	CH4	CH4 DETECTOR
TEMPERATURE & CO2 SENSOR	TC	CO2	CO2 DETECTOR
TEMPERATURE & HUMIDITY SENSOR	TH	CO	CO DETECTOR
THERMOSTAT	T	H2	H2 DETECTOR
HUMIDISTAT	H	H2S	H2S DETECTOR
O2 DETECTOR	O2	HZG	HAZARDOUS GAS DETECTOR
PANEL NAME BMS CONTROL PANEL	HVAC-CP-X	NO2	NO2 DETECTOR
			DUCT SMOKE DETECTOR

DAMPER TAGS

COMB. FIRE/SMOKE DAMPER
FIRE DAMPER
SMOKE DAMPER
MANUAL BALANCING DAMPER
MOTORIZED DAMPER
BACKDRAFT DAMPER

12"x12" S/A — 12"x12" S/A

PIPING SYMBOLS

CHWR	CHILLED WATER RETURN
CHWS	CHILLED WATER SUPPLY
CD	CONDENSATE DRAINAGE
CWR	CONDENSER WATER RETURN
CWS	CONDENSER WATER SUPPLY
GWR	GEOTHERMAL WATER RETURN
GWS	GEOTHERMAL WATER SUPPLY
HWR	HEATING WATER RETURN
HWS	HEATING WATER SUPPLY
G	NATURAL GAS
PG	PROPANE GAS
REF-L	REFRIGERANT-LIQUID
REF-S	REFRIGERANT-SUCTION
REF-HG	REFRIGERANT-HOT GAS
STM	STEAM
CDR	CONDENSATE RETURN

PIPE DROP
PIPE RISE
PIPE TEE
CAP
4" 2" 4"
PLUG
REDUCING 45 DEGREE TEE
45 DEGREE TEE

PIPE ACCESSORY TAGS

2" SHUTOFF BALL VALVE	2" LOCKED LOCK SHIELD VALVE	2" M-CNTRL ELEC. CONTROL
2" BALANCING BALANCING VALVE	2" PRV PRESS REDUCING	4" 3-WAY CNTRL 3-WAY ELEC. CONTROL
2" BUTTERFLY BUTTERFLY VALVE	2" QUICK QUICK OPENING	
2" CHECK CHECK VALVE	2" STRAINER	
(ALTERNATE CHECK VALVE SYMBOL)	1" GAS-CNTRL EMERG. GAS SHUTOFF	
2" CIRC CIRCUIT SETTER	1" PLUG PLUG VALVE	
2" GATE GATE VALVE	1" GAS COCK GAS SHUTOFF COCK	
2" GLOBE GLOBE VALVE	1" REG PRESS REGULATOR	

* NOTE *

ALL OF GENERAL NOTES ON THIS SHEET ARE TO BE APPLIED TO ALL OTHER DRAWINGS IN THIS SET.THE SYMBOLS AND ABBREVIATIONS SHOWN ON THIS SHEET MAY OR MAY NOT BE USED IN THIS SET OF DRAWINGS.

MECHANICAL NOTES

A. MECHANICAL PLANS ARE INTENDED TO PROVIDE INFORMATION FOR INSTALLATION OF A COMPLETE OPERATING MECHANICAL SYSTEM. PROVIDE ALL ESSENTIAL LABOR, MATERIALS AND DEVICES REQUIRED TO PRODUCE A QUALITY END PRODUCT.

B. CONTRACTOR SHALL REVIEW AND BECOME FAMILIAR WITH THE WORK OF ALL TRADES FOR PURPOSES OF COORDINATION AND ROUTING. CONTRACTOR SHALL PROVIDE REQUIRED PLANNING, COORDINATION AND SEQUENCING OF HVAC INSTALLATION WITH BUILDING COMPONENTS AND OTHER TRADES.

C. ALL WORK SHALL COMPLY WITH THE LATEST EDITION OF THE LOCAL, STATE, AND NATIONAL CODES. WORKMANSHIP SHALL MEET OR EXCEED INDUSTRY STANDARDS.

D. FABRICATE AND INSTALL DUCT PER SMACNA STANDARDS FOR 2-INCH WC WITH GALVANIZED METAL (26 GUAGE MINIMUM). DUCT SIZES SHOWN ARE NET FREE AREA REQUIRED. ALL RADIUS ELBOWS AND TEES SHALL HAVE CENTERLINE RADIUS OF 1.5 X DUCT WIDTH. ALL SQUARE ELBOWS AND TEES SHALL HAVE TURNING VANES. PRIOR TO FABRICATION, MECHANICAL CONTRACTOR SHALL FIELD VERIFY STRUCTURAL OBSTRUCTIONS AND CEILING SPACE LIMITATIONS AND MAKE NECESSARY DUCT MODIFICATIONS INCLUDING CHANGING OF ASPECT RATIOS, ADDING OFFSETS, AND SHIFTING LOCATIONS. PROTECT DUCT BY STORING IN A CLEAN AND DRY ENVIRONMENT PRIOR TO INSTALLATION. COVER ENDS OF EXPOSED WORK AT THE END OF EVERY SHIFT.

E. ALL DUCT JOINTS, SEAMS AND BRANCH TAKEOFFS SHALL BE SEALED AIR-TIGHT WITH DUCT SEALANT EQUAL TO HARDCAST IRON-GRIP OR FOIL-GRIP TAPE EQUAL TO HARDCAST AFG-1402.

F. ROUND RUNOUTS SHALL HAVE SPIN-INS WITH DAMPERS, RECTANGULAR BRANCH DUCTS SHALL HAVE 45 DEGREE TAPS WITH AIR EXTRACTORS AND ALL TEES SHALL HAVE SPLITTER DAMPERS. PROVIDE ANY OTHER DEVICES REQUIRED TO BALANCE AIR SYSTEM.

G. FLEX DUCT SHALL HAVE METALIZED VAPOR BARRIER WITH MIN. R-VALUE OF 5.0. BOTH ENDS SHALL BE SECURED WITH NYLON BANDS AND METALIZED DUCT TAPE PER MFG'S RECOMMENDATIONS AND IN ACCORDANCE WITH U.L. 181B.

H. RIGID ROUND AND RECTANGULAR DUCT SHALL BE EXTERNALLY INSULATED WITH 2-INCH THICK 3/4 LB. DENSITY FIBERGLASS BLANKET WITH FSK VAPOR BARRIER AND A MIN. R-VALUE OF 6.5. STAPLE AND SEAL ALL JOINTS WITH 4-INCH-WIDE METALIZED DUCT TAPE EQUAL TO SHURFLEX SF-683.

I. COORDINATE THE EXACT LOCATION OF ALL CEILING DIFFUSERS, REGISTERS, AND GRILLES WITH NEW AND EXISTING LIGHTING. PROVIDE DIFFUSERS AND REGISTERS WITH 4-WAY BLOW PATTERN UNLESS OTHERWISE NOTED. INSULATE AND SEAL ALL GRILLE AND DIFFUSER NECKS TO MAINTAIN VAPOR BARRIER AND ELIMINATE CONDENSATION.

J. CONDENSATE DRAINS SHALL BE SUPPLIED FOR ALL COOLING EQUIPMENT. CONTRACTOR SHALL ENSURE PROPER INSTALLATION AND DRAINAGE AS REQUIRED BY FEDERAL, STATE, AND LOCAL CODES. CONDENSATE TRAPS FOR ALL AC UNITS SHALL BE SIZED AS RECOMMENDED BY UNIT MFG. CONDENSATE PIPING AND TRAPS SHALL BE SCHEDULE 40 PVC ROUTED TO EXTERIOR OR STORM DRAIN. INSULATE INTERIOR PIPING WITH 1/2-INCH-THICK UNICELLULAR INSULATION.

K. REFRIGERANT PIPING SHALL BE TYPE ACR COPPER WITH SILVER SOLDERED JOINTS. INSTALL PER EQUIPMENT INSTALLATION INSTRUCTIONS. INSULATION SHALL BE 1-INCH-THICK MINIMUM.

L. GAS PIPING SHALL BE A-53 SCHEDULE 40 BLACK STEEL WITH MALLEABLE FITTINGS. PIPING BELOW GRADE SHALL HAVE FRP COATING AND ABOVE GRADE SHALL BE PRIMED AND PAINTED. BOND ALL GAS PIPING ABOVE GRADE AND WITHIN BUILDING. PROVIDE MAGNETIC MARKER TAPE 12-INCHES ABOVE ALL BELOW GRADE PIPING.

M. ALL PIPING SHALL BE SUPPORTED AND SECURED WITH SUITABLE HANGERS, STRAPS OR PIPE STANDS. SUPPORT WITH NO DROOPS OR SAGS. ALL HANGERS AND ATTACHMENTS SHALL BE PLATED, GALVANIZED OR PAINTED. PROVIDE ISOLATION ON PIPING OF DISSIMILAR MATERIALS.

N. POWER WIRING, DISCONNECTS AND STARTERS NOT FURNISHED WITH HVAC EQUIPMENT AND FINAL CONNECTIONS SHALL BE BY THE E.C.

O. CONTROL WIRING, RELAYS AND INTERLOCKING DEVICES SHALL BE PROVIDED BY THE M.C.

P. UL LISTED DUCT SMOKE DETECTORS SHALL BE FURNISHED, INSTALLED AND TESTED BY THE M.C. THE E.C. SHALL PROVIDE 120V POWER TO EACH DUCT SMOKE DETECTOR WHERE REQUIRED. THE M.C. SHALL PROVIDE REMOTE ALARM/TEST STATIONS FOR EACH DUCT SMOKE DETECTOR.

Q. TEMPERATURE CONTROLS FOR EACH HEATING-COOLING SYSTEM SHALL CONSIST OF AN ELECTRONIC PROGRAMMABLE HEATING-COOLING THERMOSTAT WITH HEAT-OFF-COOL-AUTO SYSTEM SWITCH AND AUTO-ON FAN SWITCH. MOUNT THERMOSTATS 48-INCHES ABOVE FINISHED FLOOR AND A MINIMUM 8 " FROM ANY OTHER SWITCHING DEVICES.

R. INSTALL EQUIPMENT TO FACILITATE SERVICING, MAINTENANCE AND REPAIR IN ACCORDANCE WITH MANUFACTURER'S INSTALLATION INSTRUCTIONS, AS WELL AS SPECIFIC INSTRUCTIONS ON PLANS. PROVIDE A 4" HOUSEKEEPING PAD FOR EACH PIECE OF MECHANICAL EQUIPMENT. COORDINATE SIZES WITH MECHANICAL EQUIPMENT SELECTED.

S. PROVIDE FLEX CONNECTORS AT ALL DUCT TO EQUIPMENT CONNECTIONS NOT HAVING INTERNALLY ISOLATED FANS.

T. CONTRACTOR SHALL BALANCE AIR SYSTEM TO QUANTITIES INDICATED ON PLANS AND PROVIDE TYPE WRITTEN REPORT WITH O AND M MANUALS.

U. ALL EQUIPMENT AND SYSTEMS SHALL BE WASHED, MECHANICAL AREAS CLEANED AND PAINTED SURFACES TOUCHED UP TO MATCH FACTORY APPLIED FINISHES. ALL DUCT SYSTEMS AND AIR HANDLERS SHALL BE VACUUMED AND WIPED CLEAN ON THE INSIDE PRIOR TO TURNING THE PROJECT OVER TO THE OWNER. SYSTEMS THAT HAVE NOT BEEN ADEQUATELY PROTECTED DURING INSTALLATION WILL REQUIRE CLEANING AGAIN AT THE END OF THE PROJECT.

V. CONTRACTOR SHALL INSTALL A NEW SET OF PLEATED FILTERS BEFORE TURNING BUILDING OVER TO OWNER.

W. CONTRACTOR SHALL PROVIDE BUILDING OWNER WITH A COMPLETE OPERATING AND MAINTENANCE MANUAL INCLUDING EQUIPMENT BASIC DATA, CONTROL INFORMATION, ROUTINE MAINTENANCE ACTIONS AND SERVICE AGENCIES' NAME, PHONE NUMBER, AND ADDRESS.

HVAC SHEET INDEX

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 033293 BENJAMIN D. LEWIS

02/27/2026

- [x] For Construction
- [ ] Not for Construction
- [ ] Review Set
- [x] Bid Set

Issue Date: 02/23/2026

Plot Date: 2/27/2026 11:49:43 AM

Revisions

Mark	Date	Description

Drawing No.

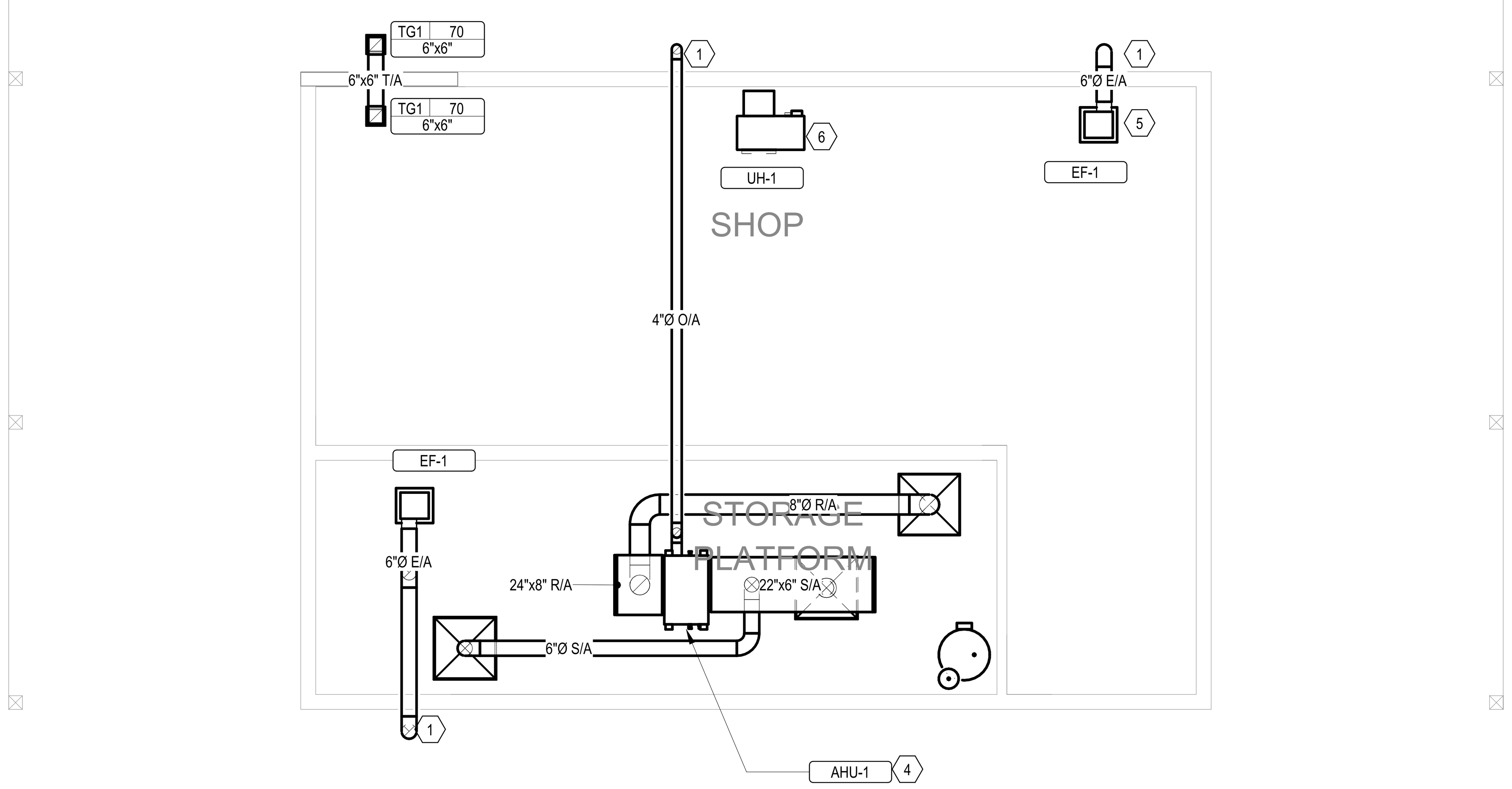
HVAC TITLE SHEET

M000

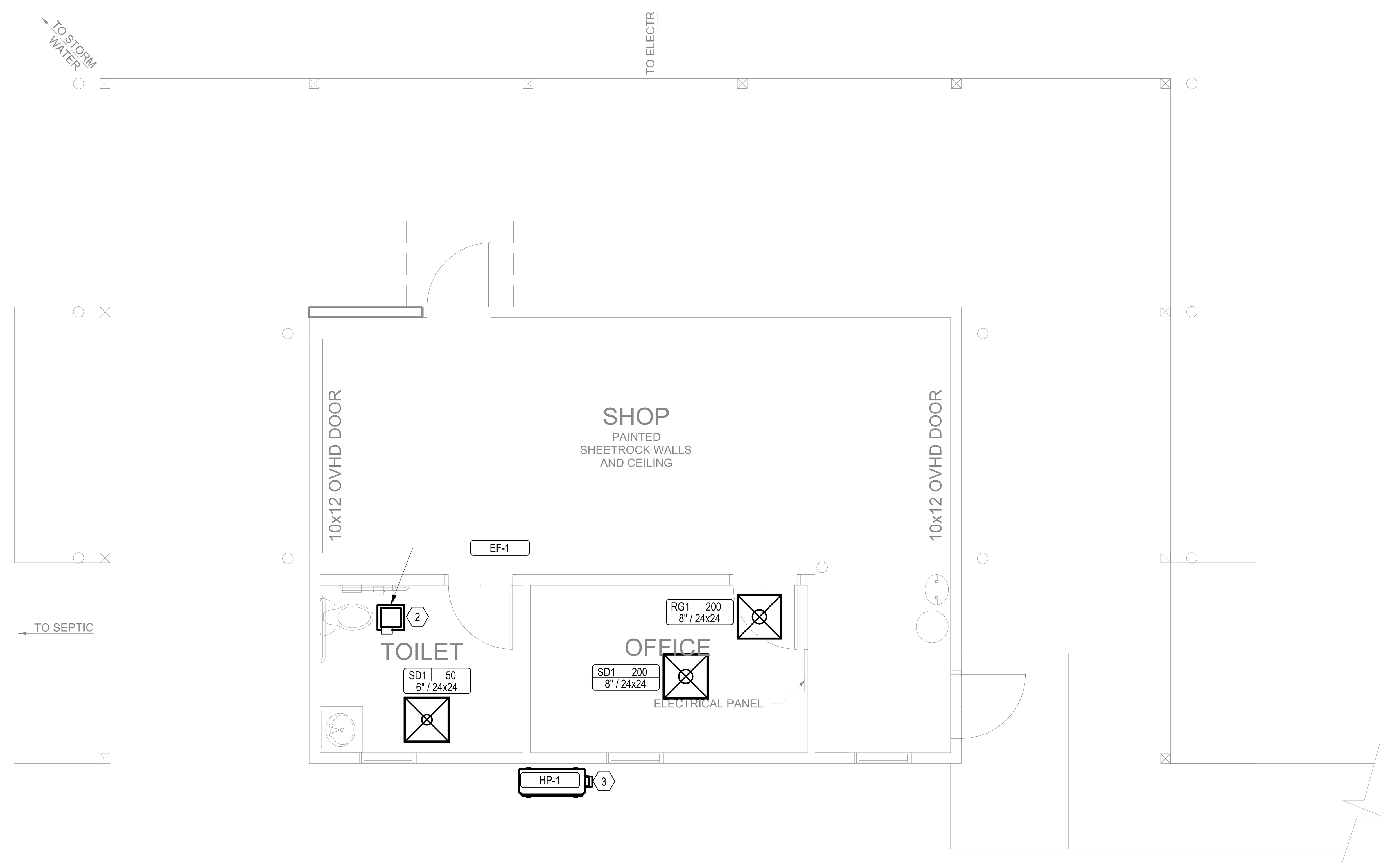
of

KEYNOTES

1 TERMINATE WITH ROUND SOFFIT UNDER EAVE VENT.
2 INTERLOCK EXHAUST FAN WITH RESTROOM LIGHT SWITCH. COORDINATE WITH EC.
3 SPLIT SYSTEM AIR-SOURCE HEAT PUMP. INSTALL PER MANUFACTURERS INSTALLATION INSTRUCTIONS.
4 INDOOR DUCTED TYPE MINI-SPLIT POWERED FROM OUTDOOR UNIT HP-1. INSTALL PER MANUFACTURERS INSTALLATION INSTRUCTIONS.
5 INTERLOCK EXHAUST FAN WITH SHOP LIGHT SWITCH. COORDINATE WITH EC.
6 PROPANE GAS-FIRED UNIT HEATER. INSTALL PER MANUFACTURERS INSTALLATION INSTRUCTIONS.



2 M101 HVAC PLAN - STORAGE PLATFORM
1/4" = 1'-0"



1 M101 HVAC PLAN - LEVEL 1
1/4" = 1'-0"

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 33293 BENJAMIN D. LEWIS
02/27/2026

For Construction
Not for Construction
Review Set
Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:45 AM

Revisions

Mark	Date	Description

Drawing No.
HVAC FLOOR PLAN
M101
of

2018 APPENDIX B
BUILDING CODE SUMMARY FOR ALL COMMERCIAL PROJECTS
MECHANICAL DESIGN
(PROVIDE ON THE MECHANICL SHEETS IF APPLICABLE)

MECHANICAL SUMMARY

MECHANICAL SYSTEMS, SERVICE SYSTEMS AND EQUIPMENT

Thermal Zone XX
- winter dry bulb: 19.3 °F
- summer dry bulb: 95 °F

Interior design conditions
- winter dry bulb: 68 °F
- summer dry bulb: 75 °F
- relative humidity: 50%

Building heating load: 2700 BTU

Building cooling load: 7100 BTU

Mechanical Spacing Conditioning System

Unitary
- description of unit: SEE PLAN
- heating efficiency: SEE PLAN
- cooling efficiency: SEE PLAN
- size category of unit: SEE PLAN

Boiler
- Size category. If oversized, state reason.: N/A

Chiller
- Size category. If oversized, state reason.: N/A

List equipment efficiencies: N/A

Outside Air Calcs - AHU-01

Space Name: Number	Area (Az)	Occupancy Category	Ocupancy Density (PEOPLE / 1000 SF)	Occupancy (Pz)	Occupancy Based: CFM / Person (Rp)	Occupancy Based: CFM (Ra * Az)	Area Based: CFM / SF (Ra)	Area Based: CFM (Ra * Az)	Breathing Zone Outdoor Airflow (Vb = Rp * Pz + Ra *Az)	ASHRAE Zone Air Distribution Effectiveness (Ez)	Zone Outdoor Airflow (Voz = Vb / Ez)	Exhaust Rate
SHOP: 1	406.3 SF	Warehouses	0	0	10 CFM	0 CFM	0.06 CFM/SF	24.38 CFM	24.38 CFM	0.8	30 CFM	
TOILET: 2	74.4 SF	Toilets - public	0	0						0.8		70 CFM
OFFICE: 3	101.5 SF	Office space	5	1	5 CFM	5 CFM	0.06 CFM/SF	6.09 CFM	11.09 CFM	0.8	14 CFM	
											44 CFM	70 CFM

GAS-FIRED UNIT HEATER SCHEDULE

ID	MANUFACTURER	MODEL NO.	TYPE	ARRANGEMENT	FAN: DESIGN AIRFLOW	FAN: OUTLET VELOCITY	FAN: DRIVE TYPE	FAN MOTOR: QTY	FAN MOTOR: POWER	FAN MOTOR: RPM	FAN MOTOR: ECM	GAS BURNER: INPUT	GAS BURNER: CAP	GAS BURNER: STAGES	FUEL: TYPE	FUEL: PRESS AVAIL	AIRSIDE: EAT(db)	AIRSIDE: LAT(db)	AFUE	SOUND PRESS LEVEL	VOLT	PH	REMARKS
UH-1	REZNOR	UDX-30	POWER VENTED	HORIZONTAL	456 CFM	475 FPM	DIRECT	1	0.06 hp	1550	No	30000 Btu/h	24600 Btu/h	1	PROPANE	2.0 psi	55.0 °F	105.0 °F	83%	40	120 V	1	1,2,3,4,5

NOTES:
1. PROVIDE INTEGRAL FACTORY DISCONNECT SWITCH.
2. PROVIDE THREADED ROD HANGERS.
3. HEATERS SIZED TO MAINTAIN 50 DEG. IN SHOP.
4. PROVIDE WITH A CONCENTRIC VENT TERMINATION KIT.
5. PROVIDE UNIT-MOUNTED FACTORY THERMOSTAT.

FAN COIL UNIT SCHEDULE

ID	MANUFACTURER	MODEL NO.	QTY	SUPPLY AIR FLOW	OUTSIDE AIR FLOW	NET CAPACITY	UNIT DIMENSIONS: LENGTH	UNIT DIMENSIONS: WIDTH	UNIT DIMENSIONS: HEIGHT	UNIT WEIGHT	MCA	VOLT	PH	FREQ	INTERLOCK ID	REMARKS
AHU-1	CARRIER	40MBDQ09---3	1	264 CFM	20 CFM	9000 Btu/h	1' - 7 15/16"	2' - 3 1/2"	7 7/8"	44 lb	1.1 A	240 V	1	60 Hz	HP-1	

SPLIT SYSTEM AIR SOURCE HEAT PUMP

ID	MANUFACTURER	MODEL NO.	QTY	NOMINAL COOLING CAP	COMPRESSOR: MOTOR RLA	COMPRESSOR: REFRIGERANT TYPE	SEER	EER	UNIT DIMENSIONS: LENGTH	UNIT DIMENSIONS: WIDTH	UNIT DIMENSIONS: HEIGHT	MCA	MOCP	VOLT	PH	FREQ	INTERLOCK ID	REMARKS
HP-1	CARRIER	37MAHAQ09	1	0.8 ton	14.25 A	R-454B	20	12.5	2' - 11 1/32"	1' - 1 15/32"	2' - 2 1/2"	15.0 A	15.0 A	240 V	1	60 Hz	AHU-1	

EXHAUST FAN SCHEDULE

ID	DESCRIPTION	MANUFACTURER	MODEL NO.	QTY	TYPE	FAN: DESIGN AIRFLOW	FAN: DRIVE TYPE	FAN MOTOR: POWER	FAN MOTOR: RPM	UNIT DIMENSIONS: LENGTH	UNIT DIMENSIONS: WIDTH	UNIT DIMENSIONS: HEIGHT	UNIT WEIGHT	FLA	MCA	MOCP	VOLT	PH	FREQ	REMARKS
EF-1	CEILING FAN	GREENHECK	SP-110-VG	2	CEILING	70 CFM	DIRECT	0.010 hp	940	10 1/2"	11 3/8"	7 5/8"	12 lb	0.2 A	0.3 A	15.0 A	120 V	1	60 Hz	1,2,3

NOTES:
1. PROVIDE FACTORY BACKDRAFT DAMPER.
2. PROVIDE WITH FACTORY ACCESSORY BIRD SCREEN.
3. PROVIDE VARI-GREEN MOTOR.

GRILLES, REGISTERS AND DIFFUSERS SCHEDULE

ID	MODEL	MATERIAL	FINISH	QTY	INSTALLATION TYPE	SPECIFICATION	NOTES
RG1	PAR	STEEL	WHITE ENAMEL	1	SURFACE MOUNT INSTALLATION	PERFORATED DIFFUSER WITH FACE MOUNTED DEFLECTORS	
SD1	TMS	STEEL	WHITE ENAMEL	2	SURFACE MOUNT INSTALLATION	HIGH PERFORMANCE 3-CONE DIFFUSER	
TG1	350RL	STEEL	WHITE ENAMEL	2	SURFACE MOUNT INSTALLATION		

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL SEAL 33293 ENGINEER BENJAMIN D. LEWIS
02/27/2026

- [x] For Construction
- [ ] Not for Construction
- [ ] Review Set
- [x] Bid Set

Issue Date: 02/23/2026

Plot Date: 2/27/2026 11:49:50 AM

Revisions

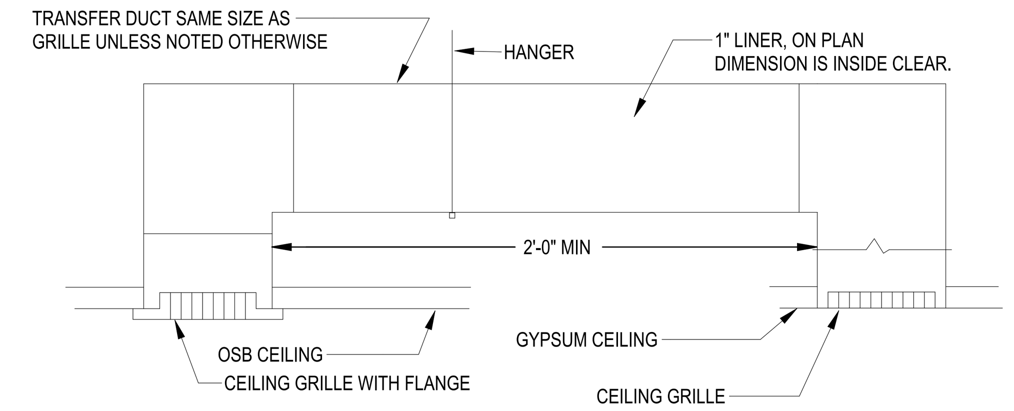
Mark	Date	Description

Drawing No.

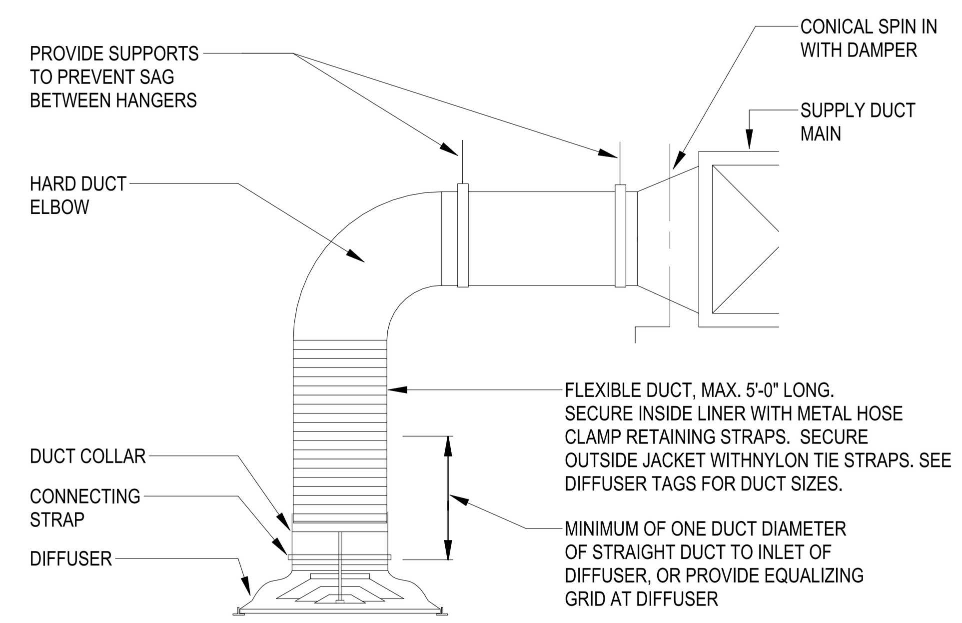
HVAC SCHEDULES

M301

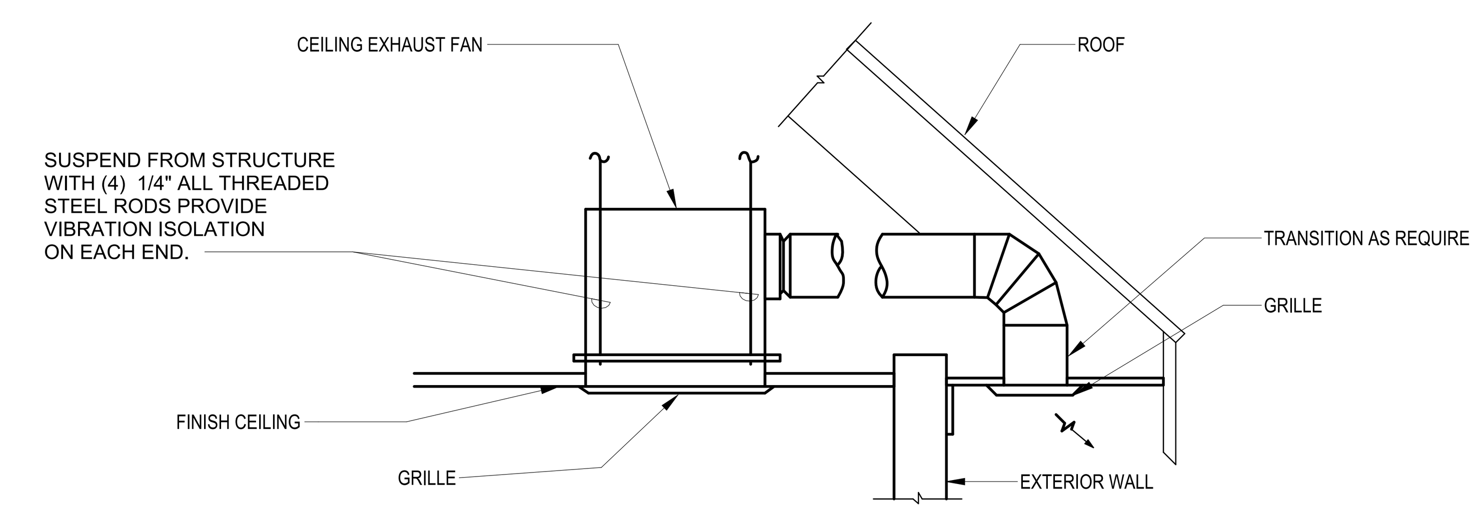
of



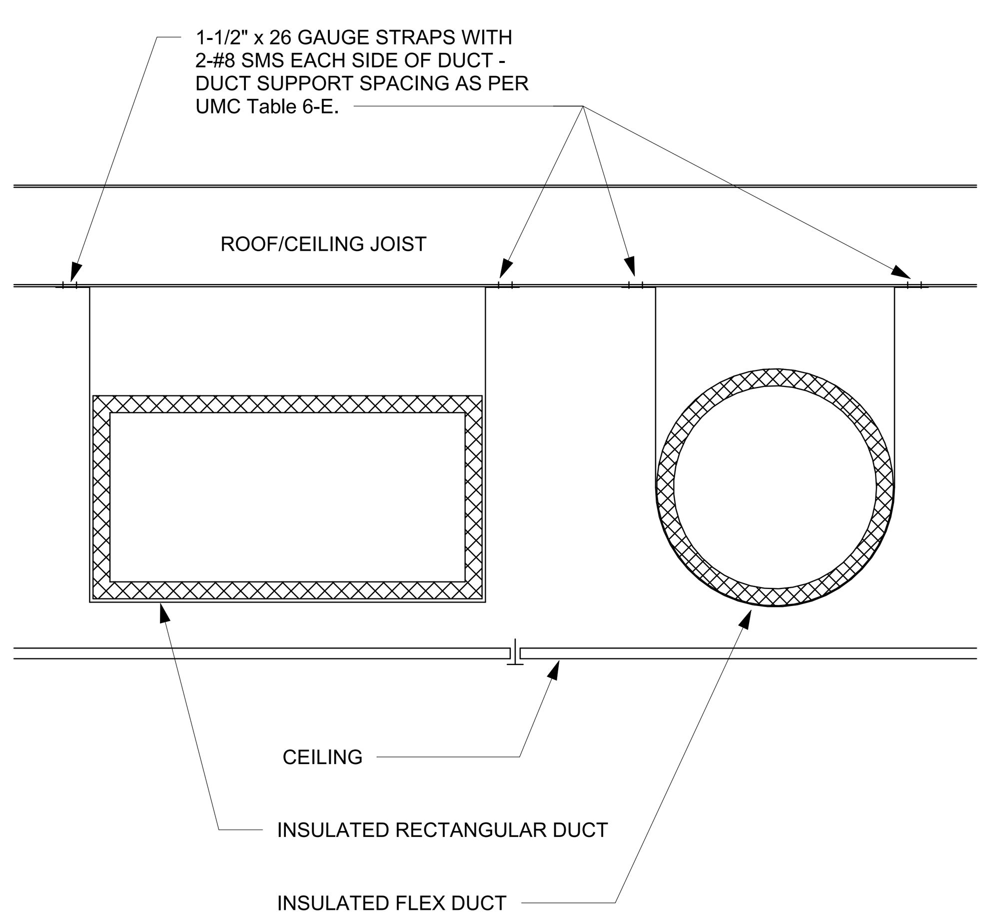
16 M401 TRANSFER DUCT DETAIL
NOT TO SCALE



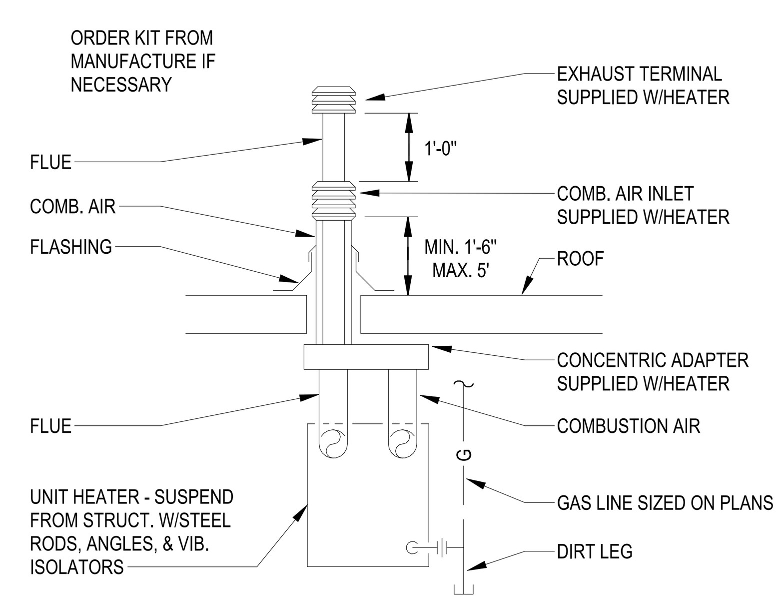
4 M401 DIFFUSER FLEXIBLE DUCT CONNECTION
NOT TO SCALE



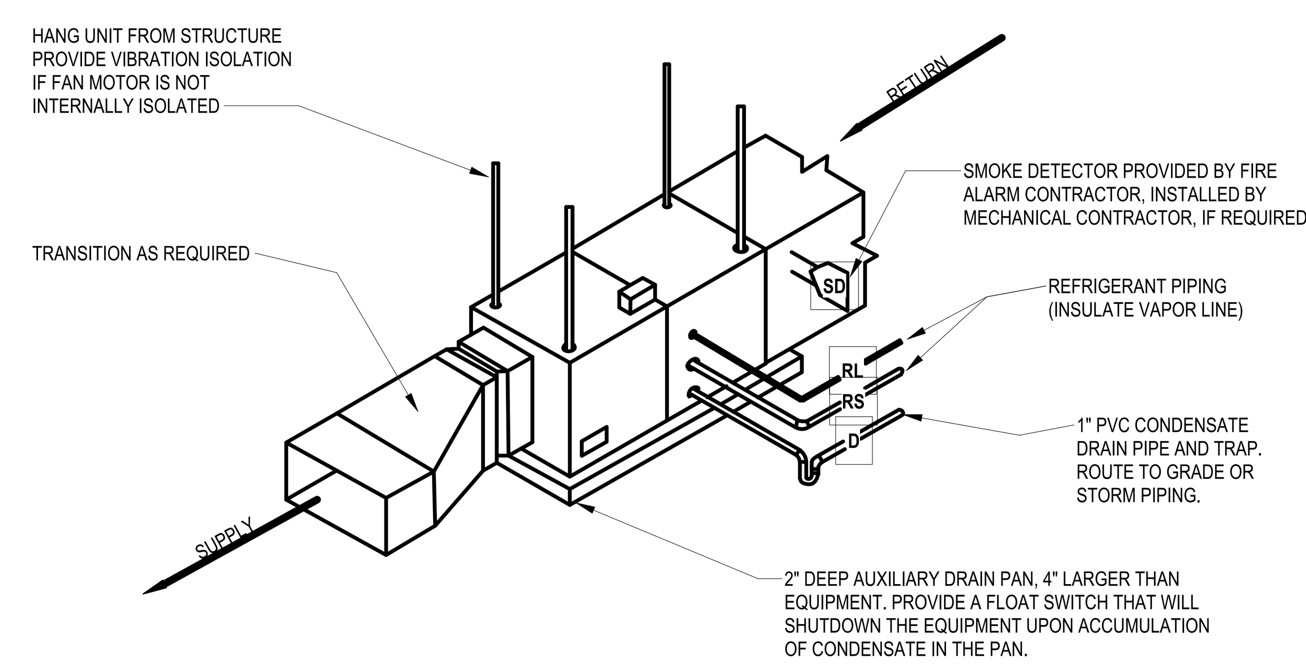
3 M401 CEILING FAN TO SOFIT DETAIL
NOT TO SCALE



5 M401 DUCT SUPPORT DETAIL
NOT TO SCALE



29 M401 GAS FIRED UNIT HEATER DETAIL
NOT TO SCALE



1 M401 AHU HORIZTONTAL MOUNTING DETAIL
NOT TO SCALE

ARCHITECT

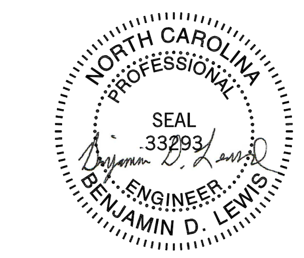
RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824



02/27/2026

- [x] For Construction
- [ ] Not for Construction
- [ ] Review Set
- [x] Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:51 AM
Revisions

Mark	Date	Description

Drawing No.
HVAC DETAILS

M401

of

ELECTRICAL ABBREVIATIONS LIST

1P	1 POLE (2P, 3P, 4P, ETC.)
A	AMPERE
AC	ABOVE COUNTER
ACLG	ABOVE CEILING
ADO	AUTOMATIC DOOR OPENER
AF	AMP FRAME
AFF	ABOVE FINISHED FLOOR
AFG	ABOVE FINISHED GRADE
AFI	ARC FAULT CIRCUIT INTERRUPTER
AHU	AIR HANDLING UNIT
AL	ALUMINUM
ALT	ALTERNATE
AMP	AMPERE
AMPL	AMPLIFIER
ANNUN	ANNUNCIATOR
APPROX	APPROXIMATELY
AQ-STAT	AQUASTAT
ARCH	ARCHITECT, ARCHITECTURAL
AS	AMP SWITCH
AT	AMP TRIP
ATS	AUTOMATIC TRANSFER SWITCH
AUTO	AUTOMATIC
AUX	AUXILIARY
AV	AUDIO VISUAL
AWG	AMERICAN WIRE GAUGE
BATT	BATTERY
BD	BOARD
BLDG	BUILDING
BMS	BUILDING MANAGEMENT SYSTEM
C	CONDUIT
CAB	CABINET
CAT	CATALOG
CATV	CABLE TELEVISION
CB	CIRCUIT BREAKER
CCTV	CLOSED CIRCUIT TELEVISION
CKT	CIRCUIT
CLG	CEILING
COMB	COMBINATION
CMPR	COMPRESSOR
CONN	CONNECTION
CONST	CONSTRUCTION
CONT	CONTINUATION OR CONTINUOUS
CONTR	CONTRACTOR
CONV	CONVECTOR
CP	CIRCULATING PUMP
CRT	CATHODE-RAY TUBE
CT	CURRENT TRANSFORMER
CTR	CENTER
CU	COPPER
DCP	DOMESTIC WATER CIRCULATING PUMP
DEPT	DEPARTMENT
DET	DETAIL
DIA	DIAMETER
DISC	DISCONNECT
DIST	DISTRIBUTION
DN	DOWN
DPR	DAMPER
DS	SAFETY DISCONNECT SWITCH
DT	DOUBLE THROW
DWG	DRAWING
EC	ELECTRICAL CONTRACTOR
ELEC	ELECTRIC, ELECTRICAL
ELEV	ELEVATOR
ELU	EMERGENCY LIGHTING UNIT
EM	EMERGENCY
EMS	ENERGY MANAGEMENT SYSTEM
EMT	ELECTRICAL METALLIC TUBING
EP	ELECTRIC PNEUMATIC
EQUIP	EQUIPMENT
EWC	ELECTRIC WATER COOLER
EXIST	EXISTING
EXH	EXHAUST
EXP	EXPLOSION PROOF
FA	FIRE ALARM
FABP	FIRE ALARM BOOSTER POWER SUPPLY PANEL
FACP	FIRE ALARM CONTROL PANEL
FCU	FAN COIL UNIT
FIXT	FIXTURE
FLR	FLOOR
FLUOR	FLUORESCENT
FU	FUSE
FUDS	FUSED SAFETY DISCONNECT SWITCH
GA	GAUGE
GAL	GALLON
GALV	GALVANIZED
GC	GENERAL CONTRACTOR
GEN	GENERATOR
GFI	GROUND FAULT CIRCUIT INTERRUPTER
GFP	GROUND FAULT PROTECTOR
GND	GROUND
GRS	GALVANIZED RIGID STEEL (CONDUIT)
GYP BD	GYPSUM BOARD
HOA	HANDS-OFF-AUTOMATIC SWITCH
HORIZ	HORIZONTAL
HP	HORSEPOWER
HPF	HIGH POWER FACTOR
HT	HEIGHT
HTG	HEATING
HTR	HEATER
HV	HIGH VOLTAGE
HVAC	HEATING, VENTILATING AND AIR CONDITIONING
IC	INTERRUPTING CAPACITY
IG	ISOLATED GROUND
IMC	INTERMEDIATE METAL CONDUIT
INCAND	INCANDESCENT
IR	INFRARED
I/W	INTERLOCK WITH
J-BOX	JUNCTION BOX
KV	KILOVOLT
KVA	KILOVOLT-AMPERE
KVAR	KILOVOLT-AMPERE REACTIVE
KW	KILOWATT
KWH	KILOWATT HOUR
LOC	LOCATE OR LOCATION
LT	LIGHT
LTG	LIGHTING
LTNG	LIGHTNING
LV	LOW VOLTAGE
MAX	MAXIMUM
MAG.S	MAGNETIC STARTER
M/C	MOMENTARY CONTACT
MC	MECHANICAL CONTRACTOR
MCB	MAIN CIRCUIT BREAKER
MCC	MOTOR CONTROL CENTER
MDC	MAIN DISTRIBUTION CENTER
MDP	MAIN DISTRIBUTION PANEL
MFR	MANUFACTURER
MFS	MAIN FUSED DISCONNECT SW
MH	MANHOLE
MIC	MICROPHONE
MIN	MINIMUM
MISC	MISCELLANEOUS
MLO	MAIN LUGS ONLY
MMS	MANUAL MOTOR STARTER
MOA	MULTIOUTLET ASSEMBLY
MSP	MOTOR STARTER PANELBOARD
MSBD	MAIN SWITCHBOARD
MT	MOUNT
MT.C	EMPTY CONDUIT
MTS	MANUAL TRANSFER SWITCH
MTR	MOTOR, MOTORIZED
N.C.	NORMALLY CLOSED
NEC	NATIONAL ELECTRICAL CODE
NEMA	NATIONAL ELECTRICAL MANUFACTURER'S ASSOCIATION
NFDS	NON-FUSED SAFETY DISCONNECT SWITCH
NIC	NOT IN CONTRACT
NL	NIGHT LIGHT
N.O.	NORMALLY OPEN
NPF	NORMAL POWER FACTOR
NTS	NOT TO SCALE
OH	OVERHEAD
OL	OVERLOADS
PA	PUBLIC ADDRESS
PB	PULL BOX OR PUSHBUTTON
PE	PNEUMATIC ELECTRIC
PED	PEDESTAL
PF	POWER FACTOR
PH	PHASE
PIV	POST INDICATING VALVE
PNL	PANEL
PP	POWER POLE
PR	PAIR
PRI	PRIMARY
PROJ	PROJECTION
PRV	POWER ROOF VENTILATOR
PT	POTENTIAL TRANSFORMER
PVC	POLYVINYL CHLORIDE (CONDUIT)
PWR	POWER
QUAN	QUANTITY
RCPT	RECEPTACLE
REQD	REQUIRED
RM	ROOM
RSC	RIGID STEEL CONDUIT
RTU	ROOF TOP UNIT
SC	SURFACE CONDUIT
SEC	SECONDARY
SHT	SHEET
SIM	SIMILAR
S/N	SOLID NEUTRAL
SPEC	SPECIFICATION
SPKR	SPEAKER
SP	SPARE
SR	SURFACE RACEWAY
SS	STAINLESS STEEL
SSW	SELECTOR SWITCH
S/S	STOP/START PUSHBUTTONS
STA	STATION
STD	STANDARD
SURF	SURFACE MOUNTED
SW	SWITCH
SWBD	SWITCHBOARD
SYM	SYMMETRICAL
SYS	SYSTEM
TEL	TELEPHONE
TEL/DATA	TELEPHONE/DATA
TERM	TERMINAL
TL	TWIST LOCK
TR	TAMPER RESISTANT
T-STAT	THERMOSTAT
TTC	TELEPHONE TERMINAL CABINET
TV	TELEVISION
TVTC	TELEVISION TERMINAL CABINET
TYP	TYPICAL
UC	UNDER COUNTER
UE	UNDERGROUND ELECTRICAL
UG	UNDERGROUND
UH	UNIT HEATER
UT	UNDERGROUND TELEPHONE
UTIL	UTILITY
UV	ULTRAVIOLET
V	VOLT
VA	VOLT-AMPERES
VDT	VIDEO DISPLAY TERMINAL
VERT	VERTICAL
VFD	VARIABLE FREQUENCY DRIVE
VOL	VOLUME
W	WATT
W/	WITH
WG	WIRE GUARD
WH	WATER HEATER
W/O	WITHOUT
WP	WEATHERPROOF
XFMR	TRANSFORMER
XFR	TRANSFER
∠	ANGLE
@	AT
▲	DELTA
'	FEET
"	INCHES
#	NUMBER
Ø	PHASE
C	CENTER LINE
P	PLATE

ELECTRICAL SYMBOL LEGEND

SYMBOL	DESCRIPTION
	LIGHTING FIXTURES, TYPICAL, RECTANGULAR FILLED CIRCLES INDICATE RECESSED, OPEN CIRCLES INDICATE SURFACE DIAGONAL LINE INDICATES LENSED OUTER DOTS INDICATE SUSPENDED
	LIGHTING FIXTURES, TYPICAL, ROUND CENTER DOT INDICATES PENDANT DIAGONAL LINE INDICATES LENSED CHEVRON INDICATES WALL WASH
	WALL-MOUNTED FIXTURES, TYPICAL
	STRIP FIXTURE
	DIRECTIONAL LIGHT, TRACK, FLOOD
	LINEAR LIGHT, TAPE LIGHT
	EMERGENCY LIGHTING UNIT, CEILING-MOUNTED, INTEGRAL BATTERY
	EMERGENCY LIGHTING UNIT, CEILING-MOUNTED, REMOTE BATTERY
	EMERGENCY LIGHTING UNIT, WALL-MOUNTED, INTEGRAL BATTERY
	EMERGENCY LIGHTING UNIT, WALL-MOUNTED, REMOTE BATTERY
	EXIT LIGHT, CEILING-MOUNTED, SHADING AND ARROWS INDICATE FACES AND DIRECTION
	EXIT LIGHT, WALL-MOUNTED, SHADING AND ARROWS INDICATE FACES AND DIRECTION
	EXIT/ELU COMBO
	POLE/AREA LIGHTS
	POST-TOP AREA LIGHT
	BOLLARD LIGHT
	DIAGONAL HATCH INDICATES LIGHT ON A CRITICAL CIRCUIT
	SOLID HATCH INDICATES LIGHT ON AN EMERGENCY OR LIFE SAFETY CIRCUIT
	SINGLE POLE SWITCH
3	3-WAY SWITCH
4	4-WAY SWITCH
K	KEYED SWITCH
	SWITCH W/PILOT
D	DIMMER SWITCH
OS	OCCUPANCY SENSOR W/ MANUAL SWITCH
EF	EXHAUST FAN SWITCH
T	TIMER SWITCH
TD	TIME DELAY SWITCH
TC	TIME CONTROL SWITCH

SYMBOL	DESCRIPTION
	SINGLE RECEPT.
	DUPLEX RECEPT.
48"	(DESIGNATES SPECIFIC MOUNTING HEIGHT) DUPLEX RECEPT.
GFI	GFI DUPLEX RECEPT. (FEED THROUGH)
WP GFI	GFI WEATHERPROOF RECEPT.
	SPLIT DUPLEX RECEPT.
	DUPLEX ISOLATED GROUND RECEPT.
	DUPLEX RECEPT. ON EMERG. CIRCUIT
	FLOOR DUPLEX RECEPT.
CLNG	CEILING DUPLEX RECEPT.
	FOURPLEX RECEPT.
	FOURPLEX RECEPT. ON EMERG. CIRCUIT
	240V RECEPTACLE
	RECEPT. ON CORD REEL
	SPECIAL RECEPT.
J	JUNCTION BOX
J	FLOOR JUNCTION BOX
J CLNG	CEILING JUNCTION BOX
PS - D2	MULTIOUTLET ASSEMBLY
	COMB. MOTOR STARTER (FUSED)
	SAFETY DISC. SW. (NON-FUSED)
	SAFETY DISC. SW. (FUSED)
R	RELAY
	PUSH BUTTON
P	POWER POLE (OPEN OFFICE STYLE)
	SURGERY SERVICE COLUMN
	STATIC GROUND RECEPTACLE
P	UTILITY SERVICE POWER POLE
XX-1	MOTOR
XX-1	IDENTITY (SEE SCHEDULE)
XX-1	EXISTING TO REMAIN
XX-1	RELOCATED
XX-1	DEMOLISHED
XF1	TRANSFORMER
	BUS DUCT W/ PLUG IN DISCONNECT CABLE TAP BOX

SYMBOL	DESCRIPTION
	TELEPHONE OUTLET
	FLOOR TELEPHONE OUTLET
1V2D	VOICE/DATA OUTLET # OF VOICE AND # OF DATA OUTLETS. FOR EXAMPLE 1V2D = 1 VOICE, 2 DATA
	FLOOR DATA OUTLET
CLNG	CEILING DATA OUTLET
M	MICROPHONE OUTLET
	CATV OUTLET
TV	TV OUTLET
V	VOLUME CONTROL
	DOOR BELL
	DOOR BUZZER
	DOOR CHIME
D	DOOR SIGNAL
	AUTO DOOR PUSH PAD
ES	ELECTRIC STRIKE
ML	MAGNETIC LOCK
CL	COMBINATION LOCK
DC	DOOR CONTACT
CR	CARD READER
	SECURITY KEYPAD
MD	MOTION DETECTOR
E	NURSE CALL EMERG. STATION
B	NURSE CALL CODE BLUE STATION
D	NURSE CALL DUTY STATION
S	NURSE CALL STAFF STATION
P	NURSE CALL PATIENT STATION
N 1	NURSE CALL DOME LIGHT (1-COLOR)
N 2	NURSE CALL DOME LIGHT (2-COLORS)

ELECTRICAL SHEET INDEX

SHEET	DESCRIPTION
E000	ELECTRICAL TITLE SHEET
E101	ELECTRICAL POWER PLAN
E201	ELECTRICAL LIGHTING PLAN
E301	ELECTRICAL SCHEDULES
E401	ELECTRICAL DETAILS
E402	ELETRICAL DETAILS

SHEET COUNT: 6

ELECTRICAL SYMBOL NOTES

SYMBOL1-1
S3

LIGHTING FIXTURE TAG DESCRIPTORS:
TOP VALUE: FIXTURE TYPE ID.
BOTTOM VALUE, NUMBER: CIRCUIT NUMBER, REFER TO DRAWINGS FOR PANEL.
BOTTOM VALUE, LOWERCASE LETTER: SWITCH DESIGNATION.
ABSENCE OF A SWITCH ID INDICATES FIXTURE IS CONTROLLED BY THE ONLY SWITCH IN THE SPACE.
"x" IN PLACE OF THE SWITCH ID INDICATES NIGHT LIGHT, UNSWITCHED.

EXW1
1

EXIT LIGHTS. STEM INDICATES WALL MOUNTING. NO STEM INDICATES CEILING MOUNTING. SHADED AREA INDICATES ILLUMINATED FACE(S). ARROW INDICATES DIRECTIONAL ARROW ON ILLUMINATED FACE(S). THE CIRCUIT DESIGNATION IS INDICATED BY A NUMBER. EXAMPLE: THE WALL MOUNTED EXIT LIGHT TYPE "E1" WITH SINGLE FACE AND DIRECTIONAL ARROW IS CONNECTED TO CIRCUIT 1.

1d

DEVICES. THE CIRCUIT DESIGNATION IS INDICATED BY A NUMBER. THE SWITCH DESIGNATION IS INDICATED BY A LOWER CASE LETTER. EXAMPLE: SPLIT DUPLEX RECEPTACLE IS CONNECTED TO CIRCUIT 1 AND ONE RECEPTACLE OUTLET IS CONTROLLED BY SWITCH "d".

d

THE CONTROL DEVICE DESIGNATION IS INDICATED BY A LOWER CASE LETTER. EXAMPLE: SINGLE POLE SWITCH "d" TO CONTROL LIGHTING FIXTURES INDICATED BY "d".

D
e

WALL BOX DIMMER WITH SIZE AS INDICATED AT DEVICE. EXAMPLE: 600 WATT WALL BOX DIMMER TO CONTROL LIGHTING FIXTURES INDICATED BY "e". SEE SPECIFICATIONS FOR WATTAGE IF NOT INDICATED.

ELEC-1
2,4

SPECIAL CONNECTIONS. THE EQUIPMENT IS INDICATED BY A NUMBER IN A CIRCLE. SEE THE MOTOR AND EQUIPMENT SCHEDULE FOR THE LOAD DESCRIPTION AND TYPE OF CONNECTION. THE CIRCUIT DESIGNATION IS INDICATED BY NUMBER(S) ADJACENT TO THE SYMBOL. EXAMPLE: EQUIPMENT NO. ELEC-1; 1 PHASE CONNECTION TO CIRCUITS 2, 4.

PANELBOARDS. PANELBOARD DOORS MAY BE SHOWN TO INDICATE OPENING SIDE OF RECESSED PANELBOARDS. SEE PANELBOARD IDENTIFICATION FOR DESIGNATION CODES.

FLOOR CLEARANCE AREA

XX-1

MOTOR CONNECTIONS. THE MOTOR IS INDICATED BY A NUMBER WITHIN OR CHARACTERS ADJACENT TO THE MOTOR SYMBOL. SEE THE MOTOR AND EQUIPMENT SCHEDULE FOR THE MOTOR DESCRIPTION AND ELECTRICAL REQUIREMENTS.

XF1

TRANSFORMERS. THE TRANSFORMER TYPE IS INDICATED BY A NUMBER FOLLOWING THE UPPER CASE LETTERS "XF". SEE THE TRANSFORMER SCHEDULE OR THE SINGLE LINE DIAGRAM FOR THE TRANSFORMER DESCRIPTION AND REQUIREMENTS. EXAMPLE: TRANSFORMER TYPE "XF1".

CONDUIT IN CEILING, FLOOR OR WALL AS REQUIRED BY FIELD CONDITIONS

CONDUIT IN FLOOR

#12

CONDUIT SHOWN WITHOUT SLASH MARKS SHALL CONTAIN 1 # 12 CONDUCTOR PER PHASE, NEUTRAL, AND GROUND IN 1/2" CONDUIT UNLESS SPECIFIC EQUIPMENT REQUIRES A DIFFERENT SIZE.

#10

CONDUIT SHOWN SHALL CONTAIN 1 # 10 CONDUCTOR PER PHASE IN ELECTRICAL CODE SIZED MINIMUM CONDUIT UNLESS A CONDUCTOR AND CONDUIT SIZE IS SHOWN ADJACENT.

P4N-102
1, 3, 5

HOME RUN TO BRANCH CIRCUIT PANELBOARD. THE PANELBOARD DESIGNATION IS SHOWN ADJACENT TO THE HOME RUN ARROW AS A NUMERATOR AND THE CIRCUIT DESIGNATION IS SHOWN AS THE DENOMINATOR. CIRCUIT BREAKER SIZES (AMPS/NUMBER OF POLES) ARE SHOWN IN THE PANELBOARD SCHEDULE WITH THE CORRESPONDING PANELBOARD AND CIRCUIT DESIGNATION. EXAMPLE: HOME RUN TO PANELBOARD P4N-102; CIRCUITS 1, 3, 5.

GRAPHICAL REPRESENTATION OF PHASING, TYPICAL FOR ALL SYMBOLS.

EXISTING TO REMAIN
EXISTING TO BE REMOVED
NEW

ITEM TO BE REMOVED
AREA NOT IN CONTRACT

1 — REVISION NUMBER - SHOWN ON PLANS

NUMBER OF DETAIL ON SHEET
NUMBER OF SHEET WHERE DETAIL APPEARS

1 — KEYED NOTE (SEE SCHEDULE)

Room 6 — ROOM NAME AND NUMBER

PANELBOARD IDENTIFICATION

P4N-102

1. EQUIPMENT DESIGNATION:
L = LIGHTING
P = POWER
D = DISTRIBUTION
S = SWITCHBOARD
M = MOTOR CONTROL CENTER
R = RELAY PANEL

2. VOLTAGE DESIGNATION:
1 = 120/240V - 1PH
2 = 240V - 3PH
3 = 208Y/120V - 3PH
4 = 480Y/277V - 3PH
5 = 120/208 - 1PH
6 = SPECIAL

3. SYSTEM DESIGNATION:
N = NORMAL
E = EMERGENCY
C = POWER CONDITIONED
U = UNINTERRUPTIBLE POWER SOURCE

4. FLOOR DESIGNATION:
B = BASEMENT
G = GROUND
1 = FIRST FLOOR
2 = SECOND FLOOR
ETC.

5. PANEL NO. DESIGNATION:
01 = PANELBOARD #1
02 = PANELBOARD #2
03 = PANELBOARD #3
ETC.

ELECTRICAL NOTES

A. ELECTRICAL PLANS ARE INTENDED TO PROVIDE INFORMATION FOR INSTALLATION OF A COMPLETE ELECTRICAL SYSTEM. PROVIDE ALL ESSENTIAL LABOR, MATERIALS & DEVICES REQUIRED TO PRODUCE A QUALITY END PRODUCT.

B. CONTRACTOR SHALL REVIEW & BECOME FAMILIAR WITH THE WORK OF ALL TRADES FOR PURPOSES OF COORDINATION AND ROUTING. CONTRACTOR SHALL PROVIDE REQUIRED PLANNING, COORDINATION AND SEQUENCING OF ELECTRICAL INSTALLATION WITH BUILDING COMPONENTS AND OTHER TRADES.

C. ALL WORK SHALL COMPLY WITH THE LATEST EDITION OF NATIONAL ELECTRICAL CODE (NEC). WORKMANSHIP SHALL MEET OR EXCEED INDUSTRY STANDARDS.

D. ELECTRICAL CONTRACTOR SHALL PROVIDE ALL DISCONNECTS, STARTERS, DEVICES AND ELECTRICAL COMPONENTS UNLESS SPECIFICALLY NOTED AS PROVIDED BY OTHERS.

E. ELECTRICAL CONTRACTOR SHALL PROVIDE ALL LINE AND LOAD SIDE WIRING INCLUDING ALL TERMINATIONS TO EQUIPMENT PROVIDED UNDER OTHER TRADES. POWER WIRING TO CONTROL DEVICES SHALL BE PROVIDED BY E.C.. INTERLOCK WIRING SHALL BE PROVIDED BY THE CONTRACTOR INSTALLING THE CONTROL DEVICE.

F. ALL WIRING, PANELBOARDS, DEVICES AND OTHER LIKE MATERIALS SHALL BE UL LISTED & LABELED. ALL MATERIALS SHALL MEET THE NEC FOR THE INTENDED USE AND INSTALLED IN ACCORDANCE WITH THE NEC.

G. PROVIDE THHN/THWN COPPER WIRE. PROVIDE A MINIMUM WIRE SIZE OF #12. ALL WIRE #8 AND LARGER SHALL BE STRANDED. CONDUCTORS AND CONDUIT ON PLANS AND SCHEDULES REFLECT AMPACITIES PER NEC 310-16 75C RATING. CONTRACTOR SHALL VERIFY ALL TERMINATIONS, LUGS, ETC. ARE RATED FOR USE PER NEC 110-4C. OTHERWISE, PROVIDE CONDUCTOR AND CONDUIT SIZED PER LOWEST TEMPERATURE RATING OF ANY TERMINATION WITHIN A CIRCUIT. PROVIDE CABLE OR CONDUIT AND WIRE AS REQUIRED TO ACHIEVE CIRCUITING SHOWN. SIZE CONDUCTORS PER NEC AMPACITY AND WIRE FILL CRITERIA. PROVIDE DEDICATED NEUTRAL AND GROUND CONDUCTORS FOR CIRCUITING, UNLESS NOTED OTHERWISE. INCREASE BRANCH CIRCUIT AND/OR FEEDER CONDUCTORS INCLUDING EQUIPMENT GROUNDING CONDUCTORS PROPORTIONALLY FOR NO MORE THAN 3% VOLTAGE DROP ON BRANCH CIRCUITS AND 2% ON FEEDERS PER ENERGY CODE.

H. PROVIDE M.C. CABLE FOR ALL SINGLE PHASE BRANCH CIRCUITS 30 AMPS AND SMALLER. PROVIDE CONDUIT FOR ALL OTHER WIRING. EMT OR RIGID SHALL BE USED WHERE EXPOSED TO PHYSICAL DAMAGE. CONDUIT ABOVE GRADE SHALL BE STEEL. CONDUIT BELOW GRADE MAY BE PVC CHANGING TO STEEL IN THE ELBOW TURNING UP. EMT SHALL NOT BE USED IN DIRECT CONTACT WITH THE EARTH OR WHERE EXPOSED TO SEVERE PHYSICAL DAMAGE. FITTINGS ON STEEL CONDUIT SHALL BE COMPRESSION TYPE.

I. NONMETALLIC-SHEATHED CABLE MAY BE UTILZED WHERE COMPLIANT WITH LATEST EDITION OF THE NATIONAL ELECTRIC CODE SECTION 334. E.C. SHALL VERIFY WITH LOCAL AHJ'S THAT NONMETALLIC-SHEATHED CABLE SHALL BE ACCEPTABLE FOR USE PRIOR TO CONSTRUCTION.

J. CONDUCTORS OPERATING AT 50 VOLTS OR GREATER SHALL BE IN RACEWAY. RACEWAY WITHIN THE STRUCTURE ABOVE THE FLOOR SLAB SHALL BE METAL. RACEWAY BELOW THE FLOOR SLAB AND UNDERGROUND RACEWAY OUTSIDE THE STRUCTURE SHALL BE PVC. LOW VOLTAGE CABLES OR CONDUCTORS OPERATING AT LESS THAN 50 VOLTS SHALL BE IN METAL RACEWAY WHERE INSTALLED WITHIN WALLS OR INACCESSIBLE SPACES. LOW VOLTAGE CABLES MAY BE RUN IN CABLE TRAY WHERE NOTED. LOW VOLTAGE CABLES MAY BE RUN IN CABLE SUPPORT HOOKS ABOVE ACCESSIBLE CEILINGS WHERE NOTED. LOW VOLTAGE CABLE SHALL BE PLENUM RATED IN PLENUM SPACES.

K. PROVIDE ONE-INCH EMPTY CONDUITS EXTENDING ABOVE CEILING FOR ALL TELEPHONE AND DATA OUTLETS SHOWN ON PLANS. PROVIDE PROTECTIVE BUSHINGS ON ENDS OF CONDUIT. ALL CABLING IS PROVIDED BY OTHERS.

L. PROVIDE 3/4-INCH EMPTY CONDUITS TERMINATING ABOVE THE CEILING FOR ALL HVAC THERMOSTATS. JUNCTION BOXES SHALL MATCH ORIENTATION OF THERMOSTATS PROVIDED BY M.C.. MOUNT JUNCTION BOXES 48-INCHES A.F.F. UNLESS NOTED OTHERWISE. PROVIDE PROTECTIVE BUSHINGS ON ENDS OF CONDUIT. ALSO, PROVIDE DOUBLE GANG BOX AT 84 " AFF OVER THERMOSTATS OR WHERE SHOWN ON PLANS FOR REMOTE ALARM/TEST STATIONS OF HVAC DUCT SMOKE DETECTORS (NOT REQUIRED IF CENTRAL FIRE ALARM SYSTEM EXISTS).

M. PANELBOARDS FOR SERVICE ENTRANCE SHALL BE SERVICE ENTRANCE RATED. PROVIDE NEMA 3R PANELBOARDS WHERE LOCATED OUTSIDE. PROVIDE NEUTRAL AND GROUNDING BARS IN ALL PANELBOARDS UNLESS NOTED OTHERWISE. GROUND ALL SERVICE ENTRANCE PANELS IN ACCORDANCE WITH THE NEC.

N. PROVIDE TYPEWRITTEN PANEL SCHEDULES IN EACH PANEL INDICATING THE LOAD DESCRIPTION FOR EACH BREAKER. LABEL PANELS ON PANEL FACE WITH PHENOLIC LABELS INDICATING PANEL NUMBER OR LETTER DESIGNATION, VOLTAGE AND PHASE.

O. PROVIDE FUSED AND NON-FUSED DISCONNECT SWITCHES AS INDICATED ON PLANS. DISCONNECTS LOCATED OUTSIDE SHALL BE NEMA-3R. PROVIDE REJECTION CLIPS IN FUSED DISCONNECTS.

P. PROVIDE HORSEPOWER RATED STARTERS AND DISCONNECTS WHEN CONNECTED TO MOTORS. STARTERS SHALL BE PROVIDED WITH OVERLOAD SIZED-TO-MATCH MOTOR RATINGS.

Q. PROVIDE LIGHTING AS SCHEDULED IN THE FIXTURE SCHEDULE OR OTHERWISE NOTED ON PLANS. LIGHTING INSTALLED IN SUSPENDED CEILINGS SHALL BE SUPPORTED INDEPENDENTLYOF THE CEILING GRID SYSTEM.

R. PROVIDE EMERGENCY AND EXIT LIGHTS AS SHOWN ON PLANS. POWER SHALL BE PROVIDED FROM LIGHTING CIRCUITS ON THE UNSWITCHED LEG OF THE CIRCUIT SUCH THAT POWER TO THE EMERGENCY AND EXIT LIGHTS IS NOT DISCONNECTED WHEN NORMAL LIGHTING IS OFF. EXTERIOR EMERGENCY LIGHTS SHALL BE WIRED SUCH THAT PHOTOCELL AND/OR TIME CLOCK OPERATION DOES NOT DISCONNECT POWER TO BATTERIES.

S. COORDINATE LOCATIONS OF DEVICES WITH ARCHITECTURAL ELEVATIONS AND DETAILS. ARCHITECTURAL ELEVATIONS AND DETAILS TAKE PRECEDENCE OVER LOCATIONS SHOWN ON ELECTRICAL DRAWINGS.

T. RECEPTACLES SHALL BE 20 AMP, 120V UNLESS NOTED OTHERWISE.

U. RECEPTACLES ABOVE COUNTERTOPS AND ADJACENT TO SINKS & LAVATORIES SHALL BE GROUND FAULT.

V. RECEPTACLES INSTALLED OUTSIDE SHALL BE GROUND FAULT WITH "IN USE" WEATHERPROOF COVERS.

W. WALL SWITCHES SHALL BE SINGLE POLE, 20 AMP, 120/277V.

X. PROVIDE STANDARD SIZE WALL PLATES FOR ALL DEVICES AND BLANK WALL PLATES FOR JUNCTION BOXES. WALL PLATES SHALL BE HIGH IMPACT, SMOOTH NYLON, COLOR TO MATCH DEVICE.

Y. UL LISTED DUCT SMOKE DETECTORS SHALL BE FURNISHED, INSTALLED & TESTED BY THE M.C.. THE E.C. SHALL PROVIDE 120V POWER TO EACH DUCT SMOKE DETECTOR WHERE REQUIRED. THE M.C. SHALL PROVIDE REMOTE ALARM/TEST STATIONS FOR EACH DUCT SMOKE DETECTOR.

Z. IT IS THE RESPONSIBILITY OF THIS CONTRACTOR TO COORDINATE INSTALLATION OF ELECTRICAL SYSTEMS AND THOSE REQUIRING ELECTRICAL CONNECTIONS TO MAINTAIN NEC REQUIRED CLEARANCES, INCLUDED BUT NOT LIMITED TO AREAS ABOVE ACCESSIBLE CEILINGS.

AA. FIELD COORDINATE FINAL MECHANICAL AND EQUIPMENT LOCATIONS ALONG WITH CONNECTION REQUIREMENTS AND CONTROL WIRING PRIOR TO ROUGH-IN. ADJUST CORRESPONDING CIRCUIT BREAKER RATINGS AND BRANCH CIRCUITING ACCORDINGLY.

AB. THE CONTRACTOR IS RESPONSIBLE FOR MAKING FINAL WIRING TERMINATIONS TO PRE-INSTALLED RECEPTACLES IN OFFICE FURNITURE. CONTRACTOR IS RESPONSIBLE FOR WIRING AND INSTALLING VOICE/DATA DEVICES IN OFFICE FURNITURE. COORDINATE PLACEMENT OF DEVICES WITH FURNITURE LAY-OUT.

AC. SECURITY SYSTEM TO BE PROVIDED UNDER SEPARATE CONTRACT. IT IS THE RESPONSIBILITY OF THIS CONTRACTOR TO PROVIDE CONDUIT PROVISIONS, BACK BOXES, ROUGH-INS, SLEEVES AND POWER TO HEAD END EQUIPMENT FOR EXACT REQUIREMENTS PRIOR TO START OF WORK.

AD. TV OUTLETS, VOLUME CONTROLS, NURSE CALL DOME LIGHTS, NURSE CALL DEVICES, TELEPHONE OUTLETS, DATA OUTLETS, AND FIRE ALARM DEVICES SHALL CONSIST OF A BACK BOX WTIH CONDUIT STUBBED ABOVE THE ACCESSIBLE CEILING, SEE STUB UP DETAIL.VERIFY SIZE OF BACK BOX REQUIRED WITH DEVICE TO BE INSTALLED. LOCATE BACK BOXES 6" FROM ADJACENT POWER RECEPTACLE INTENDED FOR COMPUTER USE.

AE. VERIFY ALL UTILITY REQUIREMENTS FOR ELECTRICAL SERVICE (PRIOR TO STARTING ANY WORK) SUCH AS VOLTAGE, PHASES, FAULT CURRENT, ETC... AND COORDINATED EXACT LOCATION OF INCOMING ELECTRICAL SERVICE WITH LOCAL POWER COMPANY PRIOR TO PROJECT START. NOTIFY ENGINEER OF ANY DIFFERENCES FROM WHAT IS SHOWN ON PLANS.

AF. THE ELECTRICAL CONTRACTOR SHALL REQUEST A SELECTIVE BREAKER COORDINATION STUDY FROM THE ELECTRICAL GEAR MANUFACTURER PER NEC 700 REQUIREMENTS.

AG. PROVIDE ENGRAVED PHENOLIC NAMEPLATES FOR ALL PANELBOARDS AND DISCONNECT SWITCHES, WHITE LETTERS ON BLACK BACKGROUND. NAMEPLATE SHALL CONTAIN EQUIPMENT DESIGNATION, VOLTAGE, FEEDER COURSE, AIC RATING, & DATE INSTALLED.

AH. PROVIDE "FLASH HAZARD" LABELS FOR ALL PANELBOARDS IN ACCORDANCE WITH NEC REQUIREMENTS.

AI. ALL TERMINALS/LUGS SHALL BE 60 DEGREE/75 DEGREE RATED.

AJ. ALL WATER HEATERS SHALL HAVE DISCONNECT SIZED PER 422.11(E)(3).

AK. IN REQUIRED FIRE RATED WALLS AND PARTITIONS, OPENINGS FOR INSTALLATION OF BOXES THAT ARE GREATER THAN 16 SUARE INCHES SHALL BE PROTECTED AS REQ'D BY U.L. COORDINATE CLOSELY WITH THE GENERAL CONTRACTOR TO ENSURE THAT THE INTEGRITY OF THE U.L. RATING IS MAINTAINED.

AL. OUTLET BOXES FOR DEVICES MOUNTED ON OPPOSITE SIDES OF FIRE RATED PARTITIONS SHALL NOT BE MOUNTED IN THE SAME WALL CAVITY. SPERATE WALL PENETRATIONS BY MOUNTING ON OPPOSITE SIDES OF WALL STUDS OR OTHER VERTICAL STRUCTURAL MEMBER IN THE WALL.

AM. THE ELECTRICAL COTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING RESTRAINTS TO RESIST THE EARTHUQUAKE EFFECTS ON THE ELECTRICAL SYSTEM. THE REQUIREMENTS FOR THOSE RESTRAINTS ARE FOUND IN THE IBC, THE ANCHORING OF THE EQUIPMENT SHALL COMPLY WITH IBC 1621.1.7.

AN. WHERE PENETRATIONS ARE MADE THROUGH A REQUIRED FIRE-RESISTIVE WALL, FLOOR, OR PARTITION FOR THE PURPOSE OF RUNNING RACEWAY CARRYING ELECTRICAL, TELEPHONE, TELEVISION, OR LOCAL COMMUNICATION AND/OR SIGNALING CIRCUITS, THE OPENING AREOUND THE RACEWAY SHALL BE FIRE STOPPED PER THE STATE BUILDING CODE. COORDINATION WITH THE GENERAL CONTRACTOR SHALL BE MAINTAINED TO ENSURE THAT THIS FIRE STOPPING IS ACCOMPLISHED. USE APPROVED ASSEMBLES SUCH AS THE FOLLOWING:

a. CONDUIT PENETRATIONS OF 1, 2, 3, & 4 HOUR GYP BOARD WALLS - U. L. #WL1001

b. CONDUIT PENETRATIONS OF 2, 3, &4 HOUR CONCRETE OR BLOCK WALLS - U. L.#CAJ1001

c. CONDUIT PENETRATIONS OF 2, 3, & 4 HOUR CONCRETE FLOORS - U.L.#CAJ1001

d. CONDUIT PENETRATIONS OF 1 HOUR GYPBOARD CEILING ASSEMBLY - L526

e. MULT. CONDUIT PENETRATIONS OF 2, 3, & 4 HOUR CONCRETE OR BLOCK WALL OR FLOOR - CAJ1042

AO. FLOOR BOX RECEPTACLE LOCATIONS TO BE COORDINATED WITH ELECTRICAL CONTRACTOR, FURNITURE CONTRACTOR, AND MILLWORK.

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 33793 BENJAMIN D. LEWIS
02/27/2026

For Construction
Not for Construction
Review Set
Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:30 AM

Revisions

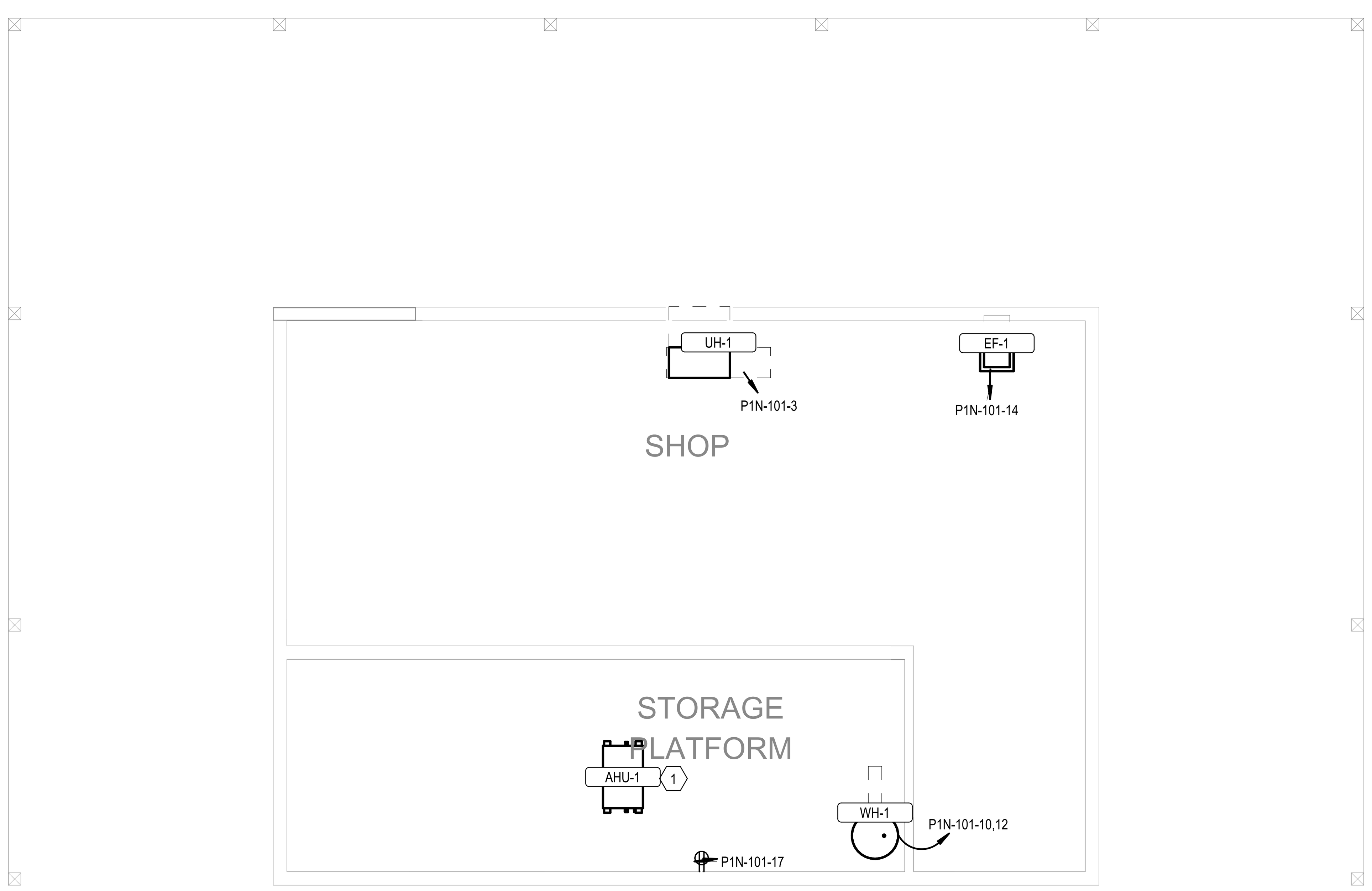
Mark	Date	Description

Drawing No.
ELECTRICAL TITLE SHEET

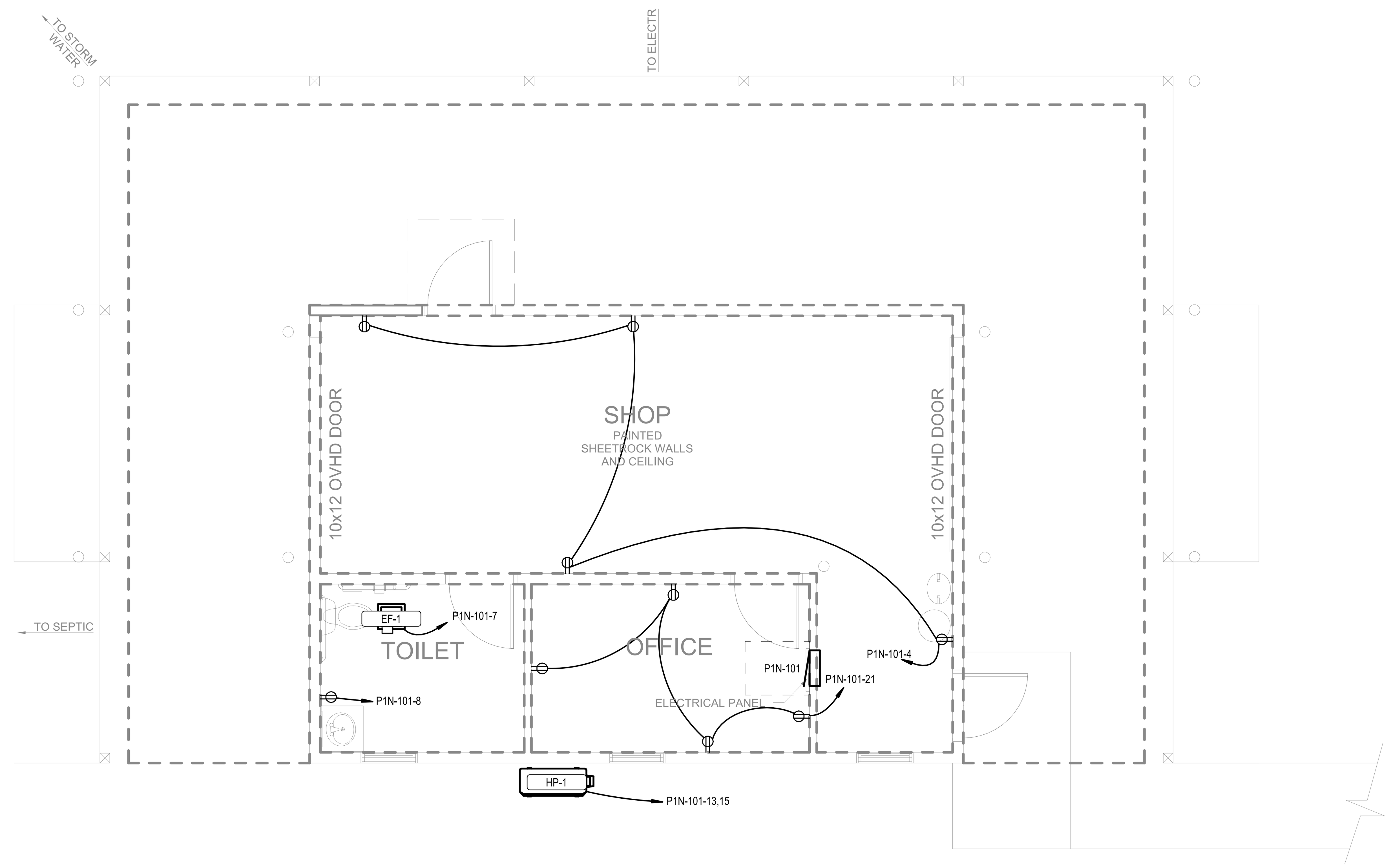
E000

of

KEYNOTES
1 AHU-1 POWER FROM HP-1.



2 E101 ELECTRICAL POWER PLAN - STORAGE PLATFORM
1/4" = 1'-0"



1 E101 ELECTRICAL POWER PLAN - LEVEL 1
1/4" = 1'-0"

ARCHITECT

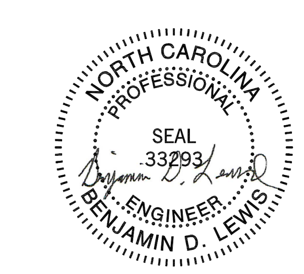
RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824



02/27/2026

☒ For Construction
☐ Not for Construction
☐ Review Set
☒ Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:32 AM

Revisions

Mark	Date	Description

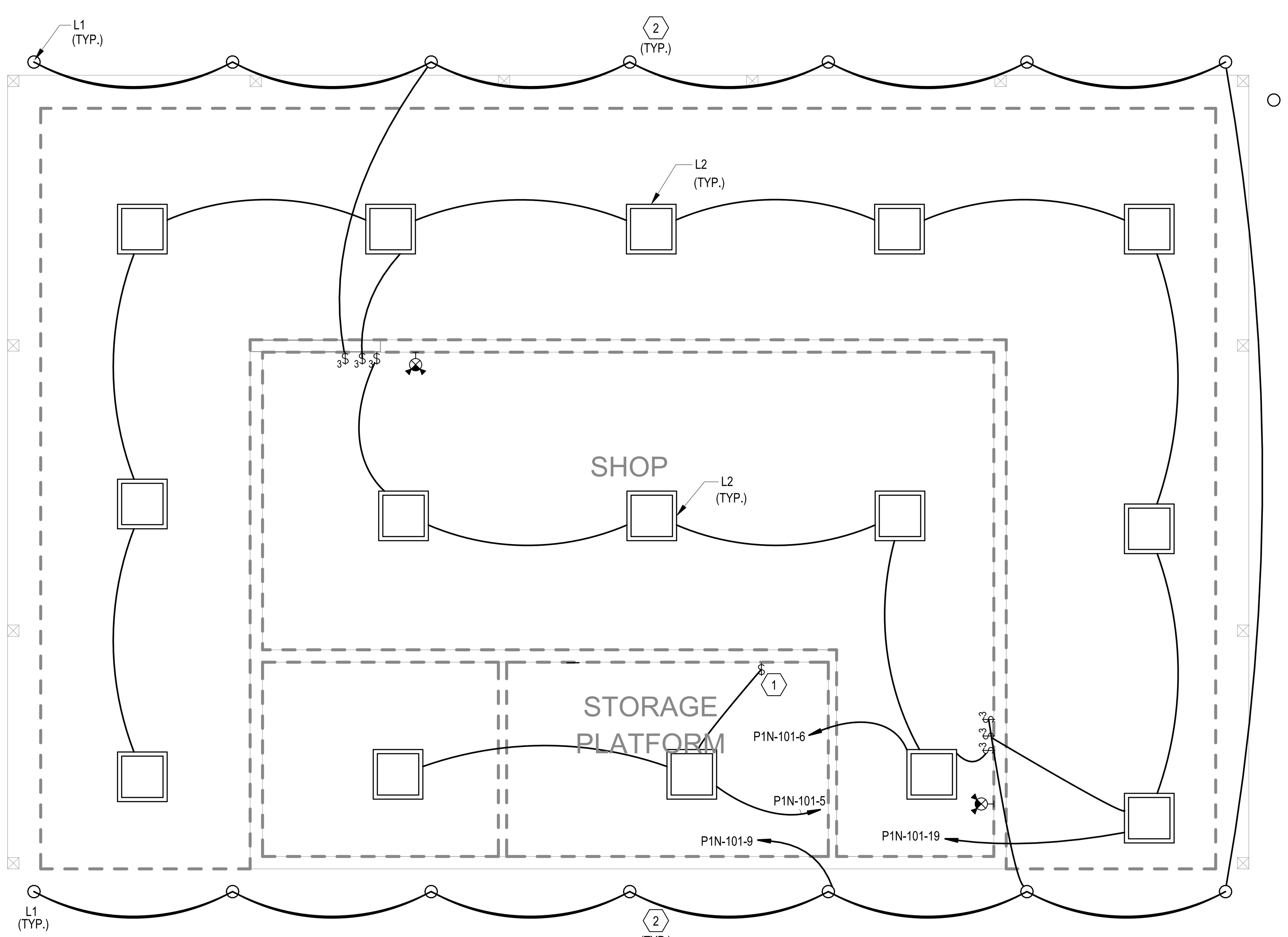
Drawing No.
ELECTRICAL POWER PLAN

E101

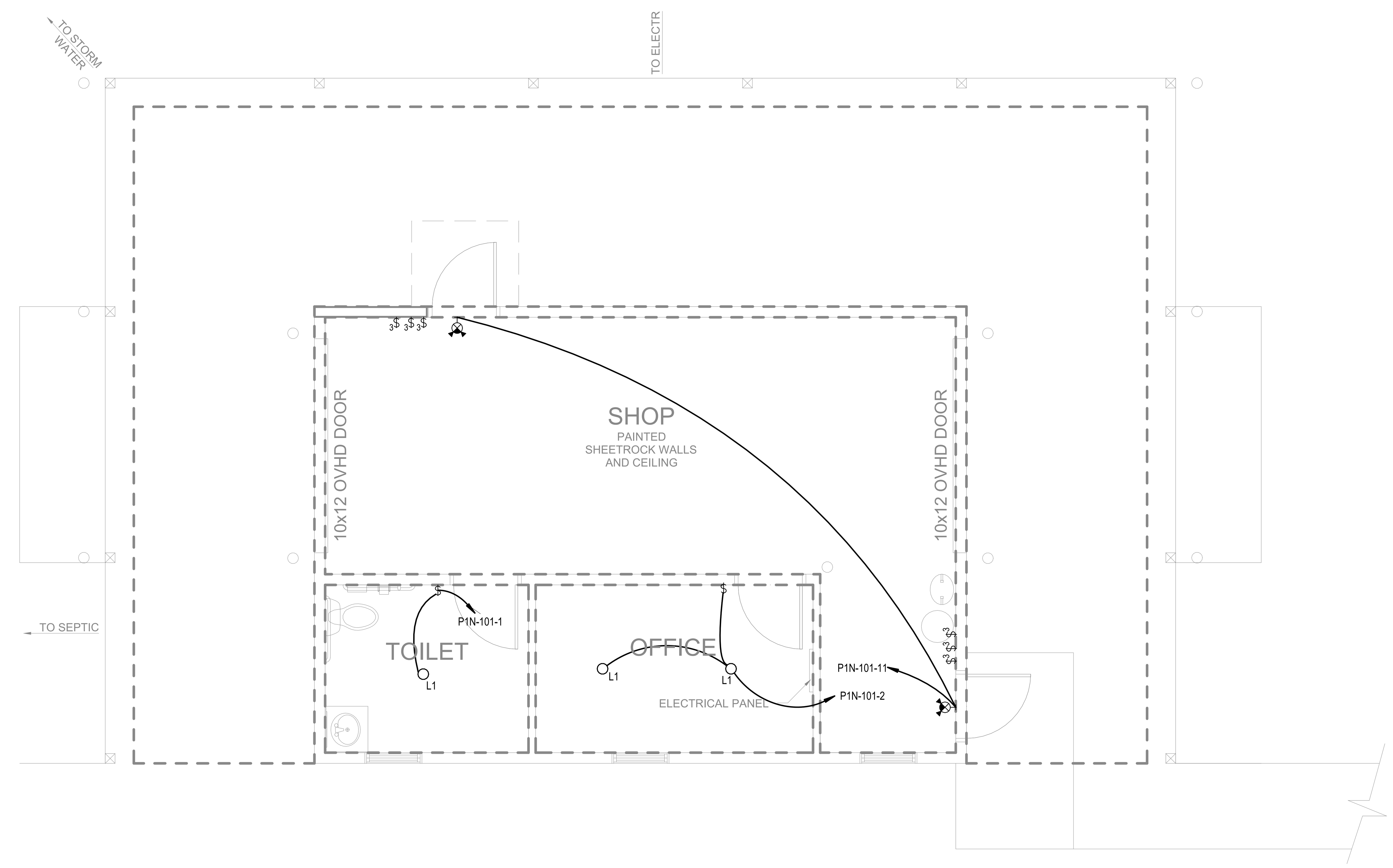
of

KEYNOTES

1	PROVIDE A SWITCH FOR THE STORAGE PLATFORM LIGHTS IN A CONVENIENT LOCATION. COORDINATE WITH OWNER/ARCHITECT.
2	INSTALL RECESSED CAN LIGHTS IN SOFFIT/EAVE AT 8' ON CENTER.



2 E201 ELECTRICAL LIGHTING PLAN - STORAGE PLATFORM
1/4" = 1'-0"



1 E201 ELECTRICAL LIGHTING PLAN - LEVEL 1
1/4" = 1'-0"

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL SEAL 33793 ENGINEER BENJAMIN D. LEWIS
02/27/2026

☒ For Construction
☐ Not for Construction
☐ Review Set
☒ Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:34 AM
Revisions

Mark	Date	Description

Drawing No.
ELECTRICAL LIGHTING PLAN

E201

of

Branch Panel: P1N-101

Location: OFFICE 3
Supply From:
Mounting: RECESSED
Enclosure: NEMA1

Volts: 120/240
Phases: 1
Wires: 3

A.I.C. Rating: 65,000 AMPS SYMMETRICAL
Mains Type: MAIN CB
Mains Rating: 100.0 A
MCB Rating: 100.0 A

Notes:

CKT	Circuit Description	Trip	Poles	A		B		Poles	Trip	Circuit Description	CKT
1	LITES TOILET 2	20.0 A	1	0 VA	27 VA			1	20.0 A	LITES OFFICE 3	2
3	UH-1	20.0 A	1			216 VA	720 VA	1	20.0 A	RCPT SHOP 1	4
5	LITES STORAGE PLATFORM	20.0 A	1	70 VA	141 VA			1	20.0 A	LITES SHOP	6
7	TOILET EF-1	20.0 A	1			24 VA	180 VA	1	20.0 A	RCPT TOILET 2	8
9	LITES UNDER EAVE	20.0 A	1	187 VA	1500 VA			2	20.0 A	WATER HEATER	10
11	LITES SHOP 1 EM. EXIT	20.0 A	1			10 VA	1500 VA				12
13	HVAC - HP1	20.0 A	2	1800 VA	24 VA			1	20.0 A	SHOP EF-1	14
15						1800 VA					16
17	RCPT OFFICE 3	20.0 A	1	180 VA							18
19	LITES DRY STORAGE	20.0 A	1			317 VA					20
21	RCPT OFFICE 3	20.0 A	1	720 VA							22
23											24
			Total Load:	4649 VA		4766 VA					
			Total Amps:	38.7 A		39.7 A					

Legend:

Load Classification	Connected Load	Demand Factor	Estimated Demand	Panel Totals	
HVAC	3864 VA	100.00%	3864 VA		
LITES	751 VA	125.00%	939 VA	Total Conn. Load:	9415 VA
RCPT	1800 VA	100.00%	1800 VA	Total Est. Demand:	9603 VA
WATER HEATER	3000 VA	100.00%	3000 VA	Total Conn.:	39.2 A
				Total Est. Demand:	40.0 A

Notes:
AIC IS ASSUMED. EC TO VERIFY BEFORE PURCHASE AND INSTALLATION.

GENERAL PANEL NOTE

1. PER NEC 110.24 ELECTRICAL CONTRACTOR TO ENSURE SERVICE EQUIPMENT LEGIBLY MARKED WITH AVAILABLE FAULT CURRENT.
2. PER NEC 408.4 CLEAR IDENTIFICATION OF CIRCUITS AND THEIR MODIFICATIONS IS ESSENTIAL FOR SAFETY AND FUNCTIONALITY. EACH CIRCUIT MUST BE DISTINCTLY LABELED TO REFLECT ITS SPECIFIC PURPOSE, ALLOWING FOR EASY DIFFERENTIATION FROM OTHERS. UNUSED DEVICES SHOULD ALSO BE MARKED APPROPRIATELY. THIS IDENTIFICATION MUST BE DOCUMENTED IN A CIRCUIT DIRECTORY, WHICH SHOULD BE ACCESSIBLE NEAR THE PANEL OR AT EACH SWITCH OR CIRCUIT BREAKER. ADDITIONALLY, ALL SWITCHBOARDS AND PANELBOARDS MUST HAVE PERMANENT, DURABLE LABELS INDICATING THEIR POWER SOURCES, ENSURING THAT THE INFORMATION IS CLEAR AND NOT HANDWRITTEN.

ABBREVIATIONS/DEFINITIONS:

RCPT	RECEPTACLE
PWR	POWER
HEAT	HEATING ELEMENT
HVAC	HVAC EQUIPMENT
LITES	LIGHTING
MN/MTR	MOTOR
FA	FIRE ALARM

AIC RATING FOR PANELS:

1. ELECTRICAL CONTRACTOR TO SIZE AIC RATING FOR PANELS APPROPRIATELY TO PANEL VOLTAGE AND CURRENT RATING.
2. DEFAULT RATING FOR ALL PANELS TO BE 65,000 AMPS .

ELECTRICAL CIRCUIT SCHEDULE

PANEL	COUNT	RATING/POLES	CONNECTION TYPE
P1N-101	14	20.0 A / 1P	Breaker
P1N-101	2	20.0 A / 2P	Breaker

LOAD CALCULATIONS

LOAD CLASSIFICATION	LARGEST	1Ø	3Ø	TOTAL LOAD
HVAC	216 W	264 W	0 W	264 W
LITES	35 W	804 W	0 W	804 W
RCPT	180 W	1800 W	0 W	1800 W
WATER HEATER	3000 W	3000 W	0 W	3000 W

LIGHTING FIXTURE SCHEDULE

	CONSTRUCTION			LIGHT SOURCE						ELECTRICAL				PRODUCT	
TYPE	DESCRIPTION	LENS/LOUVER	MOUNTING	LAMP	LUMENS DOWN	LUMENS UP	CCT	CRI	PROJECTED LIFE	BALLAST/DRIVER	VOLT	WATTS	EMERGENCY COMPONENT	MANUFACTURER	Model
EW3	EXIT/ELU COMBO, RED LETTERING	--	WALL	LED	1045 lm	0 lm	4000 K	70	--	--	120 V	4 W	BATTERY	LITHONIA	LHQM LED R HO
L1	6" SEMIRECESSED	--	SEMI RECESSED	LED	1200 lm	0 lm	3500 K	90	60,000 HOURS	LED DRIVER, 0-10V DIMMING, 1%	120 V	12 W	--	WAC LIGHTING	R6ERDR-W9CS-WT
L2	2X2 SURFACE MOUNT	SMOOTH FROSTED	SURFACE	LED	3300 lm	0 lm	5000 K	82	60,000 HOURS	LED DRIVER, 0-10V DIMMING, 1%	120 V	32 W	--	LITHONIA	CPANL 2X2 33LM SWW7 120 TD DCMK

NOTES:
1. APPROVED EQUAL ACCEPTED.
2. LIGHTING SPECIFIED FOR PERFORMANCE AND ELECTRICAL CONNECTIVITY. STYLE NOT CONSIDERED.
3. 90-MINUTE BATTERY BACK UP FOR EMERGENCY EGRESS LIGHTS.

IDENTITY KEY:
L1 : INDOOR RECESSED
L2 : 2x2 SURFACE MOUNT
L3 : UNDER CANOPY
L4 : STRIP
L3 - A : 2'
L3 - B : 4'
L3 - C : 8'
L5 : ROUND RECESSED
L5 - A : 6"
L5 - B : 8"
L6 : WALL PACK
- EM : EMERGENCY FIXTURE
-S : SPECIALLY RATED FIXTURE
EW1 : TWO HEAD EMERGENCY EGRESS
EW2 : SINGLE HEAD EMERGENCY OUTDOOR EGRESS
EW3 : EMERGENCY EXIT WALL COMBO
EW4 : EMERGENCY EXIT CEILING COMBO

LIGHTING FIXTURE SCHEDULE NOTES

1. LIGHTING FIXTURE CATALOG NUMBERS ARE INDICATIVE OF THE STYLE OF THE FIXTURE REQUIRED. CONTRACTOR SHALL COORDINATE WITH FIELD CONDITIONS & ARCHITECT'S FINISH SCHEDULE TO PROVIDE FIXTURES WITH THE PROPER TRIM, VOLTAGE, AND OPTIONS NECESSARY FOR A COMPLETE INSTALLATION.
2. DOUBLE-FACED EXIT FIXTURES SHALL BE OF THE SAME MANUFACTURER AND SERIES AS THE CORRESPONDING SINGLE FACED FIXTURES SCHEDULED.
3. THE BATTERY PACKS FOR ALL EXIT AND EMERGENCY LIGHT FIXTURES SHALL BE CAPABLE OF POVIDING EMERGENCY POWER TO THE FIXTURES FOR A MINIMUM OF 90 MINUTES.
4. SUBMITTALS FOR ALL LIGHT FIXTURES SHALL BE REQUIRED. SUBMITTAL DATA SHALL INCLUDE COMPLATE PHOTOMETRIC DATA AS WELL AS DATA ON MATERIAL, FINISHES, SUPPORTS, REFLECTORS, LENSES, ETC.
5. FIXTURES SHALL BE INDEPENDANTLY SUPPORTED DIRECTLY FROM THE STRUCTURE WITH CODE GAUGE WIRE AT A MINIMUM OF FOUR CORNERS.
6. ALL FIXTURES RECESSED IN FIRE RATED CEILINGS, SHALL BE INSTALLED WITH AND APPROVED TENT ENCLOSURE BY G.C. OR BE U.L. RATED FOR SUE IN RATED CEILINGS. VERIFY WITH ARCHITECTURAL PLANS.
7. ALL RECESSED FIXTURES INSTALLED IN CEILINGS, INDICATED BY ARCHITECT AS HAVING INSLUATION INSTALLED OVER CEILING AND FIXTURES, SHALL BE U.I. RATED FOR DIRECT CONTACT WITH INSULATION OR INSTALLED INSIDE AN APPROPRIATE AIR-TIGHT ASSEMBLY WITH A 0.5" CLEARANCE FROM COMBUSTIBLE MATERIALS AND WITH 3" CLEARANCE FROM INSTALLATION MATERIAL. VERIFY WITH ARCHITECTURAL PLANS.
7. VERIFY ALL FIXTURE VOLTAGES PRIOR TO ORDERING.
8. ADA MOUNTING: IN COMMON USE AREA, PENDANT LIGHTS SHALL BE MOUNTED A MINIMUM OF 80" A.F.F. UNLESS LOCATED ABOVE A FIXED ELEMENT. WALL MOUNTED FIXTURES BETWEEN 27" AND 80" A.F.F. SHALL NOTE XTEND MORE THAT 4" FROM THE WALL OR BASE OR HAVE FIXED PROTECTION AT 27" A.F.F. OR LOWER WHEN THESE ELEMENTS ARE LOCATED ALONG A CIRCULATION ROUTE.
9. **THE ELECTRICAL CONTRACTOR SHALL VERIFY WITH HIS SUPPLIER THAT LIGHTING FIXTURES AND LIGHTING CONTROLS, INCLUDING DIMMERS, ARE COMPATIBLE.**

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 33293 BENJAMIN D. LEWIS
02/27/2026

For Construction
Not for Construction
Review Set
Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:36 AM

Revisions

Mark	Date	Description

Drawing No.
ELECTRICAL SCHEDULES

E301

of

2018 APPENDIX B
BUILDING CODE SUMMARY FOR ALL COMMERCIAL PROJECTS
ELECTRICAL DESIGN
(PROVIDE ON THE ELECTRICAL SHEETS IF APPLICABLE)

ELECTRICAL SUMMARY

ELECTRICAL SYSTEM AND EQUIPMENT

Method of Compliance: Energy Code: ☒ Prescriptive ☐ Performance
ASHRAE 90.1: ☐ Prescriptive ☐ Performance

Lighting schedule (each fixture type)
- lamp type required in fixture
- number of lamps in fixture
- ballast type used in the fixture (1)
- number of ballasts in fixture
- total wattage per fixture
- total interior wattage specified vs. allowed (whole building or space by space)
- total exterior wattage specified vs. allowed

Additional Efficiency Package Options
(When using the 2018 NCECC; not required for ASHRAE 90.1)
- ☐ C406.2 More Efficient Mechanical Equipment
- ☐ C406.3 Reduced Lighting Power Density
- ☐ C406.4 Enhanced Digital Lighting Controls
- ☐ C406.5 On-Site Renewable Energy
- ☐ C406.6 Dedicated Outdoor Air System
- ☐ C406.7 Reduced Energy Use in Service Water Heating

CONDUIT AND WIRE SCHEDULE

FEEDER TYPE	COPPER CONDUCTORS		CONDUIT SIZE			
	Ø & N	GND	2Ø+N+GND	3Ø+GND	3Ø+N+GND	3Ø+2N+2GND
20	#12	#12	16 (1/2")	16 (1/2")	16 (1/2")	21 (3/4")
30	#10	#10	16 (1/2")	16 (1/2")	21 (3/4")	21 (3/4")
40	#8	#10	21 (3/4")	21 (3/4")	27 (1")	27 (1")
55	#6	#10	27 (1")	27 (1")	27 (1")	27 (1")
70	#4	#8	35 (1 1/4")	35 (1 1/4")	35 (1 1/4")	35 (1 1/4")
85	#3	#8	35 (1 1/4")	35 (1 1/4")	35 (1 1/4")	41 (1 1/2")
95	#2	#8	35 (1 1/4")	35 (1 1/4")	41 (1 1/2")	41 (1 1/2")
110	#1	#6	41 (1 1/2")	41 (1 1/2")	41 (1 1/2")	53 (2")
150	#1/0	#6	41 (1 1/2")	41 (1 1/2")	53 (2")	53 (2")
175	#2/0	#6	53 (2")	53 (2")	53 (2")	63 (2 1/2")
200	#3/0	#6	53 (2")	53 (2")	53 (2")	63 (2 1/2")
230	#4/0	#4	53 (2")	53 (2")	63 (2 1/2")	63 (2 1/2")
255	250 kCM	#4	63 (2 1/2")	63 (2 1/2")	63 (2 1/2")	78 (3")
285	300 kCM	#4	63 (2 1/2")	78 (3")	78 (3")	78 (3")
310	350 kCM	#3	78 (3")	78 (3")	78 (3")	91 (3 1/2")
335	400 kCM	#3	78 (3")	78 (3")	78 (3")	91 (3 1/2")
380	500 kCM	#3	78 (3")	78 (3")	91 (3 1/2")	103 (4")
510	(2) 250 kCM	(2) #1	(2) 63 (2 1/2")	(2) 63 (2 1/2")	(2) 78 (3")	(2) 78 (3")
570	(2) 300 kCM	(2) #1	(2) 63 (2 1/2")	(2) 63 (2 1/2")	(2) 78 (3")	(2) 91 (3 1/2")
620	(2) 350 kCM	(2) #1	(2) 78 (3")	(2) 78 (3")	(2) 78 (3")	(2) 91 (3 1/2")
760	(2) 500 kCM	(2) #1/0	(2) 78 (3")	(2) 78 (3")	(2) 91 (3 1/2")	(2) 103 (4")
1005	(3) 400 kCM	(3) #2/0	(3) 78 (3")	(3) 78 (3")	(3) 78 (3")	(3) 91 (3 1/2")
1240	(4) 350 kCM	(4) #3/0	(4) 78 (3")	(4) 78 (3")	(4) 78 (3")	(4) 91 (3 1/2")
1260	(3) 600 kCM	(3) #3/0	(3) 91 (3 1/2")	(3) 91 (3 1/2")	(3) 103 (4")	(3) 129 (5")
1675	(5) 400 kCM	(5) #4/0	(5) 78 (3")	(5) 78 (3")	(5) 91 (3 1/2")	(5) 103 (4")
1680	(4) 600 kCM	(4) #4/0	(4) 91 (3 1/2")	(4) 91 (3 1/2")	(4) 103 (4")	(4) 129 (5")
2010	(6) 400 kCM	(6) 250 kCM	(6) 78 (3")	(6) 78 (3")	(6) 91 (3 1/2")	(6) 103 (4")
2100	(5) 600 kCM	(5) 250 kCM	(5) 91 (3 1/2")	(5) 91 (3 1/2")	(5) 103 (4")	(5) 129 (5")
2520	(6) 600 kCM	(6) 350 kCM	(6) 91 (3 1/2")	(6) 91 (3 1/2")	(6) 103 (4")	(6) 129 (5")
2660	(7) 500 kCM	(7) 350 kCM	(7) 91 (3 1/2")	(7) 91 (3 1/2")	(7) 91 (3 1/2")	(7) 129 (5")
3040	(8) 500 kCM	(8) 400 kCM	(8) 91 (3 1/2")	(8) 91 (3 1/2")	(8) 91 (3 1/2")	(8) 129 (5")
4275	(8) 750 kCM	(8) 500 kCM	(8) 103 (4")	(8) 103 (4")	(8) 129 (5")	(8) 129 (5")
EQ	EQUIPMENT FEEDER - REFER TO ELECTRICAL EQUIPMENT SCHEDULE					

200 - 4 - 1G FEEDER DESIGNATION

GROUND CONDUCTORS:
(0) - NO GROUND
(1G) - EQUIPMENT GND OR ISOLATED GND
(2G) - EQUIPMENT GND AND ISOLATED GND

SYSTEM DESCRIPTION:
(3) - 1Ø, 3W OR 3Ø, 3W
(4) - 3Ø, 4W
(5) - 3Ø, 5W (2 NEUTRALS)

CONDUCTOR AMPACITY:
(SEE FEEDER SCHEDULE)

GENERAL NOTES:

A. THE ABOVE FEEDER SCHEDULE IS A SCHEDULE OF TYPICAL FEEDERS AND SOME SIZES MAY NOT BE UTILIZED.

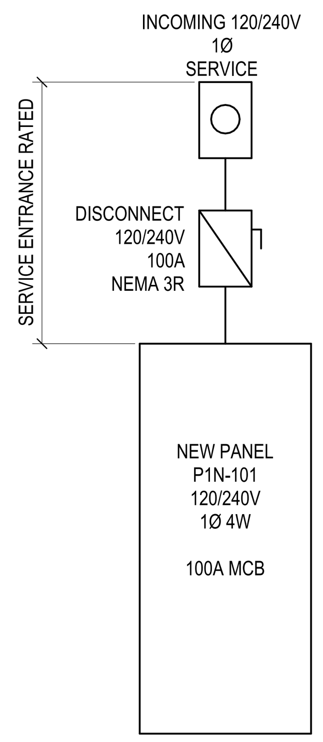
B. ALL CONDUCTOR AMPACITIES ARE BASED ON TABLE 310-15(b)(16) OF THE NEC FOR COPPER CONDUCTOR TYPE THW/THWN.

C. FEEDER SIZES SHOWN ON THE RISER DIAGRAM INDICATE FEEDER AMPACITIES AND DO NOT NECESSARILY CORRESPOND TO CIRCUIT BREAKER AMPACITIES. CERTAIN FEEDERS MAY BE SIZED FOR THE DURATION FACTORS REQUIRED BY CODE AND/OR ARE OVERSIZED FOR VOLTAGE DROP.

D. WHERE MULTIPLE CONDUITS AND CONDUCTORS ARE INDICATED FOR A SINGLE FEEDER, EACH CONDUIT SHALL CONTAIN 1 PARALLEL PHASE, NEUTRAL, AND GROUND CONDUCTORS INDICATED.

E. CONDUIT ABOVE GRADE INDOORS SHALL BE EMT. CONDUIT ABOVE GRADE OUTDOORS SHALL BE GALVANIZED IMC OR RMC. CONDUIT BELOW GRADE SHALL BE PVC WITH GALVANIZED RMC ELBOWS. CONDUIT SIZE INDICATED IS MINIMUM SIZE REGARDLESS OF CONDUIT TYPE.

F. CONDUITS SIZED LARGER THAN INDICATED SHALL BE PERMITTED FOR RUNS WITH UP TO (4) 90° ELBOWS, OR FOR PULLING LONGER RUNS.



NOTE:
1. PROVIDE ALL GROUNDING AND BONDING PER LATEST EDITION OF NEC.
2. SEE WIRE AND CONDUIT SCHEDULE FOR CONNECTION RATINGS.
3. ALL PANELS DEFAULT TO 42 CIRC, UNLESS OTHERWISE STATED.

1 / E401 POWER RISER
NOT TO SCALE

KEYNOTES
1 SEE LIGHTING FIXTURE SCHEDULE FOR MORE INFORMATION.

TABLE "A"
WORKING CLEARANCES

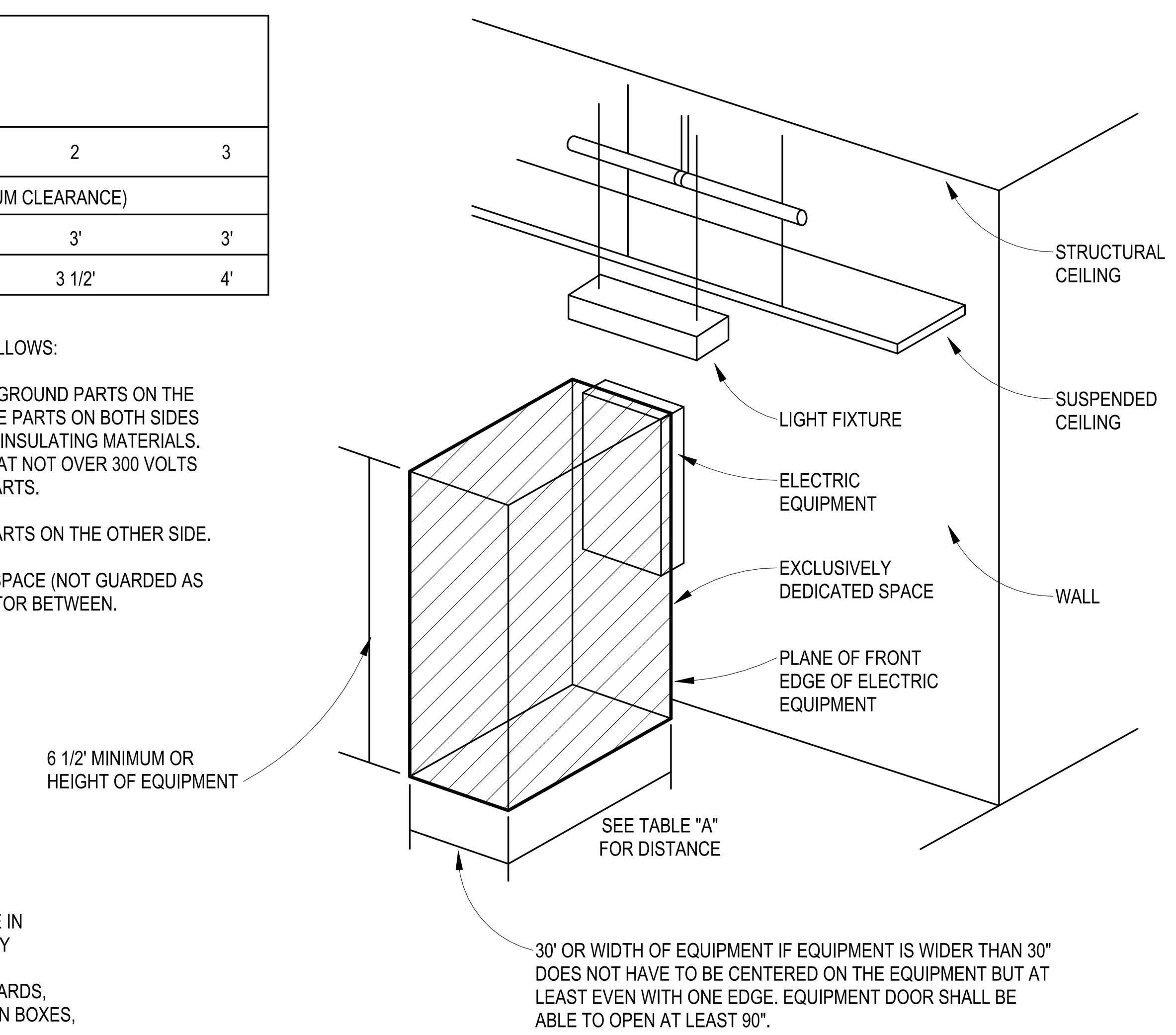
VOLTAGE TO GROUND	CONDITION: 1	2	3
NOMINAL	(MINIMUM CLEARANCE)		
0-150	3'	3'	3'
151-600	3'	3 1/2'	4'

WHERE THE "CONDITIONS" ARE AS FOLLOWS:

1. EXPOSED LIVE PARTS ON ONE SIDE AND NO LIVE OR GROUND PARTS ON THE OTHER SIDE OF THE WORKING SPACE, OR EXPOSED LIVE PARTS ON BOTH SIDES EFFECTIVELY GUARDED BY SUITABLE WOOD OR OTHER INSULATING MATERIALS. INSULATED WIRE OR INSULATED BUSBARS OPERATING AT NOT OVER 300 VOLTS SHALL NOT BE CONSIDERED LIVE PARTS.

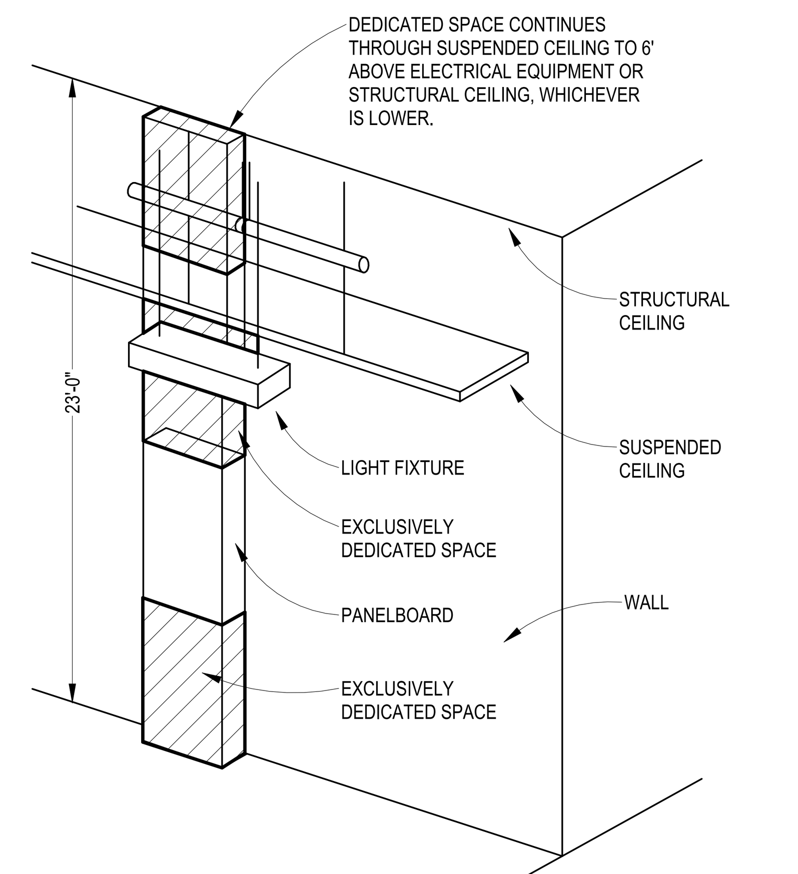
2. EXPOSED LIVE PARTS ON ONE SIDE AND GROUNDED PARTS ON THE OTHER SIDE.

3. EXPOSED LIVE PARTS ON BOTH SIDES OF THE WORK SPACE (NOT GUARDED AS PROVIDED IN CONDITION 1) WITH THE OPERATOR BETWEEN.



NOTES:
1. THIS FIGURE ILLUSTRATES THE WORKING SPACE IN FRONT OF ELECTRICAL EQUIPMENT REQUIRED BY NEC SECTION 110.26.
2. THIS INCLUDES BUT IS NOT LIMTED TO PANELBOARDS, SAFETY SWITCHES, MOTOR STARTERS, JUNCTION BOXES, AND OTHER ELECTRICAL EQUIPMENT.

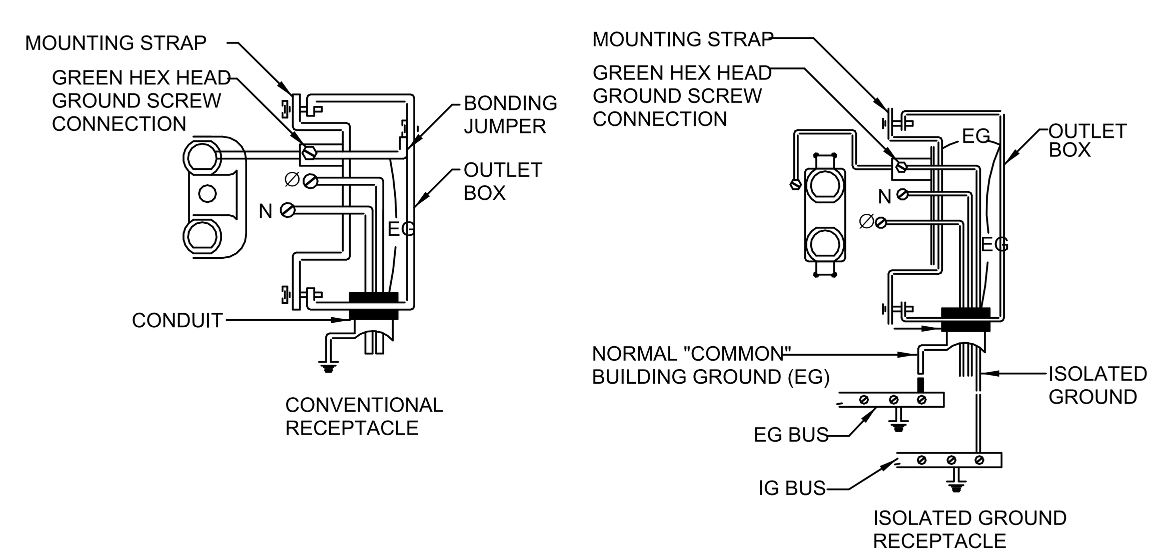
ALL ELECTRIC EQUIPMENT



NOTES:
1. THIS FIGURE ILLUSTRATES THE ADDITIONAL EXCLUSIVELY DEDICATED SPACE REQUIRES OVER AND UNDER PANELBOARDS FOR CABLES, RACEWAYS, ETC, TO AND FROM PANELBAORDS REQUIRED BY NEC SECTION 100.26.
2. NO PIPING, DUCTWORK, OR EQUIPMENT FOREIGN TO THE ELECTRICAL EQUIPMENT OR ARCHITECTURAL APPURTENANCES SHALL BE PERMITTED TO BE INSTALLED IN, ENTER OR PASS THROUGH THE DEDICATED SPACES SHOWN. FOR EXCEPTIONS SEE NEC SECTION 110.26F.

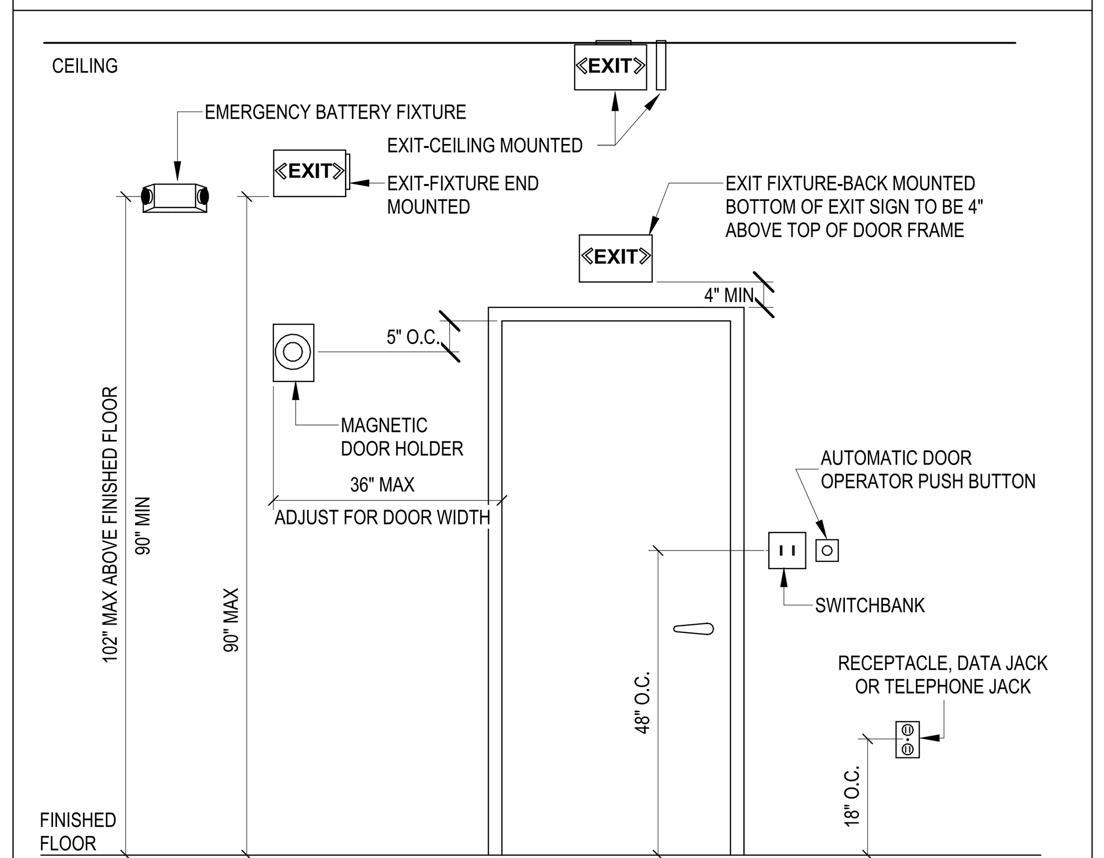
PANELBOARDS

3 / E401 DEDICATED WORKING SPACE
NOT TO SCALE



4 / E401 RECEPTACLE WIRING DETAIL
NOT TO SCALE

TYPICAL MOUNTING HEIGHTS



5 / E401 TYPICAL MOUNTING HEIGHTS
NOT TO SCALE

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL SEAL 33293 ENGINEER BENJAMIN D. LEWIS
02/27/2026

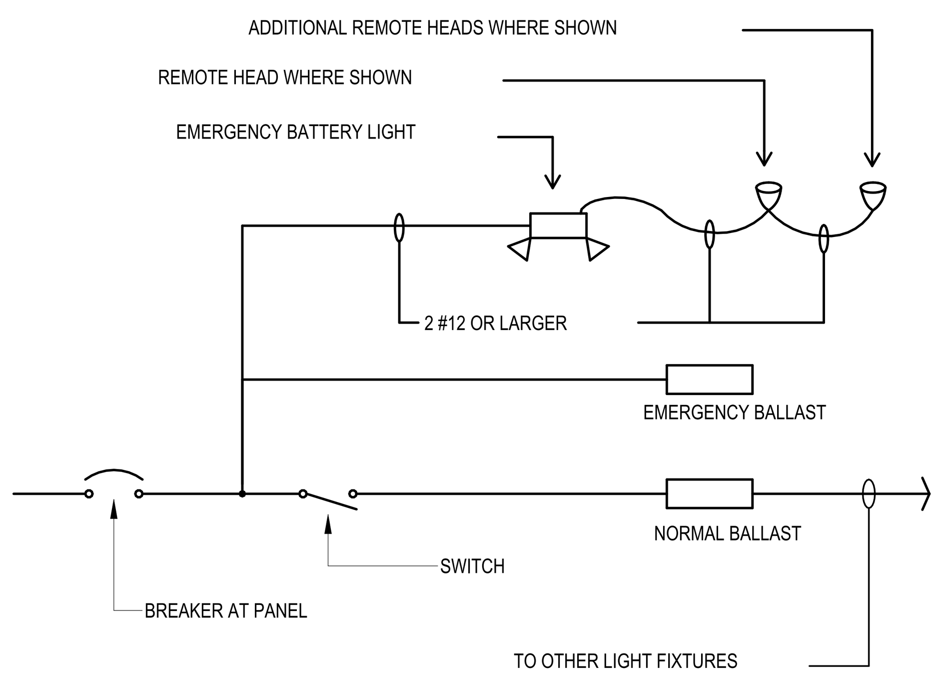
☒ For Construction
☐ Not for Construction
☐ Review Set
☒ Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:40 AM

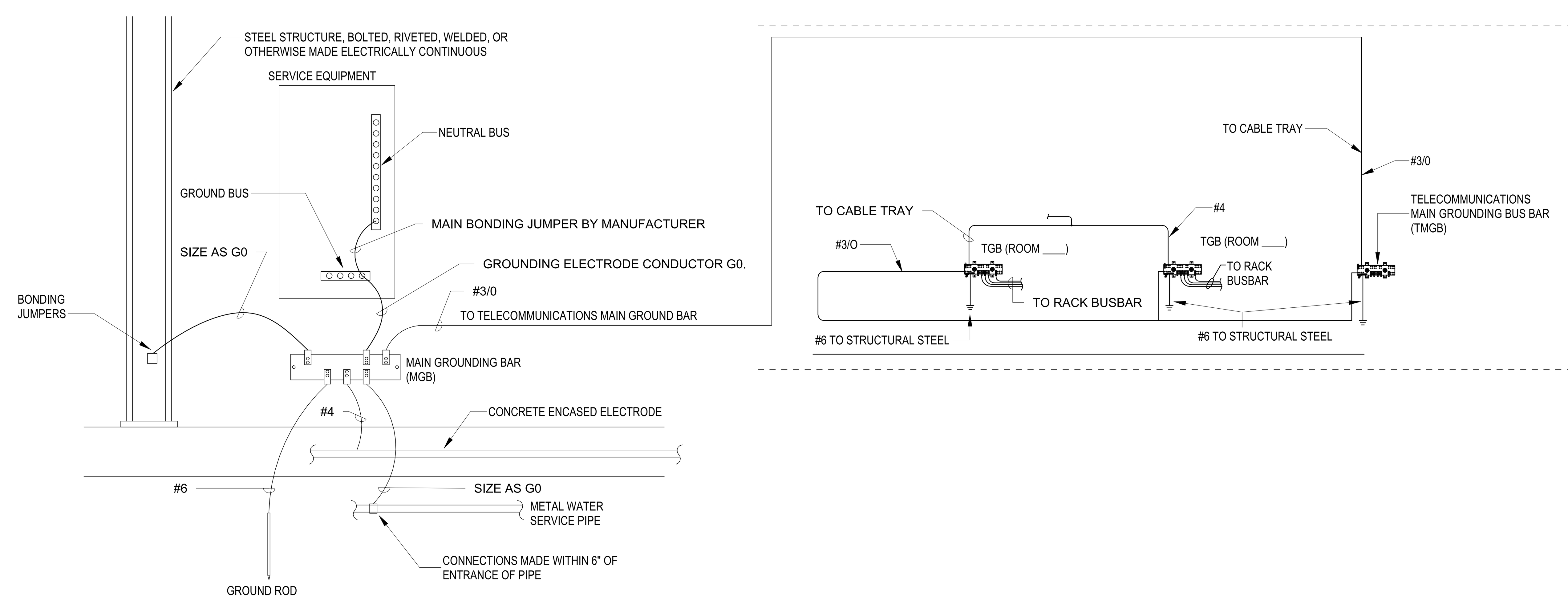
Revisions

Mark	Date	Description

Drawing No.
ELECTRICAL DETAILS
E401
of



2 E402 EMERGENCY LIGHTING WIRING DIAGRAM
NOT TO SCALE



1 E402 SERVICE GROUND DETAIL
NOT TO SCALE

ARCHITECT

RON W. WEBB
1659 W. HANRAHAN ROAD
AYDEN, NC. 28513
TEL: (252) 531-2711

Archer Lodge Maintenance Building

Town Of Archer Lodge NC
14094 Buffalo Rd.
Archer Lodge, NC 27527

PROJECT CONSULTANTS

KAIROS PROJECT GROUP, INC.
CONSULTING ENGINEERS
120 SOMMERVILLE PARK ROAD
RALEIGH, NC 27603 | 919-719-3475
WWW.KPGNC.COM | NC FIRM #: C-3824

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 33793 BENJAMIN D. LEWIS
02/27/2026

- [x] For Construction
- [ ] Not for Construction
- [ ] Review Set
- [x] Bid Set

Issue Date: 02/23/2026
Plot Date: 2/27/2026 11:49:41 AM

Revisions

Mark	Date	Description

Drawing No.
ELETRICAL DETAILS

E402

of