

Plotting File: \\s\2025\Harnett County Airport #2 - PD 2025-07-21\DWG\Harnett-Airport#2-29 July 2025.dwg
 Printed By: kjd
 Printed Date: Aug 05, 2025 - 3:38pm

SHEET INDEX:

- CS COVER SHEET & INDEX TO DRAWINGS
- BCS BUILDING CODE SUMMARY
- LS BUILDING LIFE SAFETY – EGRESS PLAN
- SP DEFERRED SUBMITTALS BY OTHER
- S1 FOUNDATION PLAN & ANCHOR BOLT PLAN
- S2 FOUNDATION & FOOTING DETAILS

- G1 BUILDING FLOOR PLAN
- G2 BUILDING ELEVATIONS & SECTIONS

- E1 ELECTRICAL – RISER & NOTES
- E2 ELECTRICAL – POWER & LIGHTING PLAN
- MP MECHANICAL & PLUMBING (WATER) PLAN

PROJECT:

HARNETT REGIONAL AIRPORT HANGAR #2

497 AIRPORT ROAD
 ERWIN, NORTH CAROLINA 28339

Reviewed for Fire Code Compliance

Leslie Jackson
03/03/2026 12:51:00 PM

PROJECT TEAM:

BUILDING DEPARTMENT:

HARNETT COUNTY
 INSPECTION DEPARTMENT
 420 MCKINNEY PARKWAY
 LILLINGTON, NC 27546
 910-893-2793

PROJECT DESIGNER:

JENKINS CONSULTING ENGINEERS, P.A.
 OFFICE in EUREKA SPRINGS, NC
 KELLY J. DODSON, PE
 DOUGLAS L. JENKINS, PE
 1606 MCARTHUR ROAD
 FAYETTEVILLE, NC 28311-1002
 910-822-1724

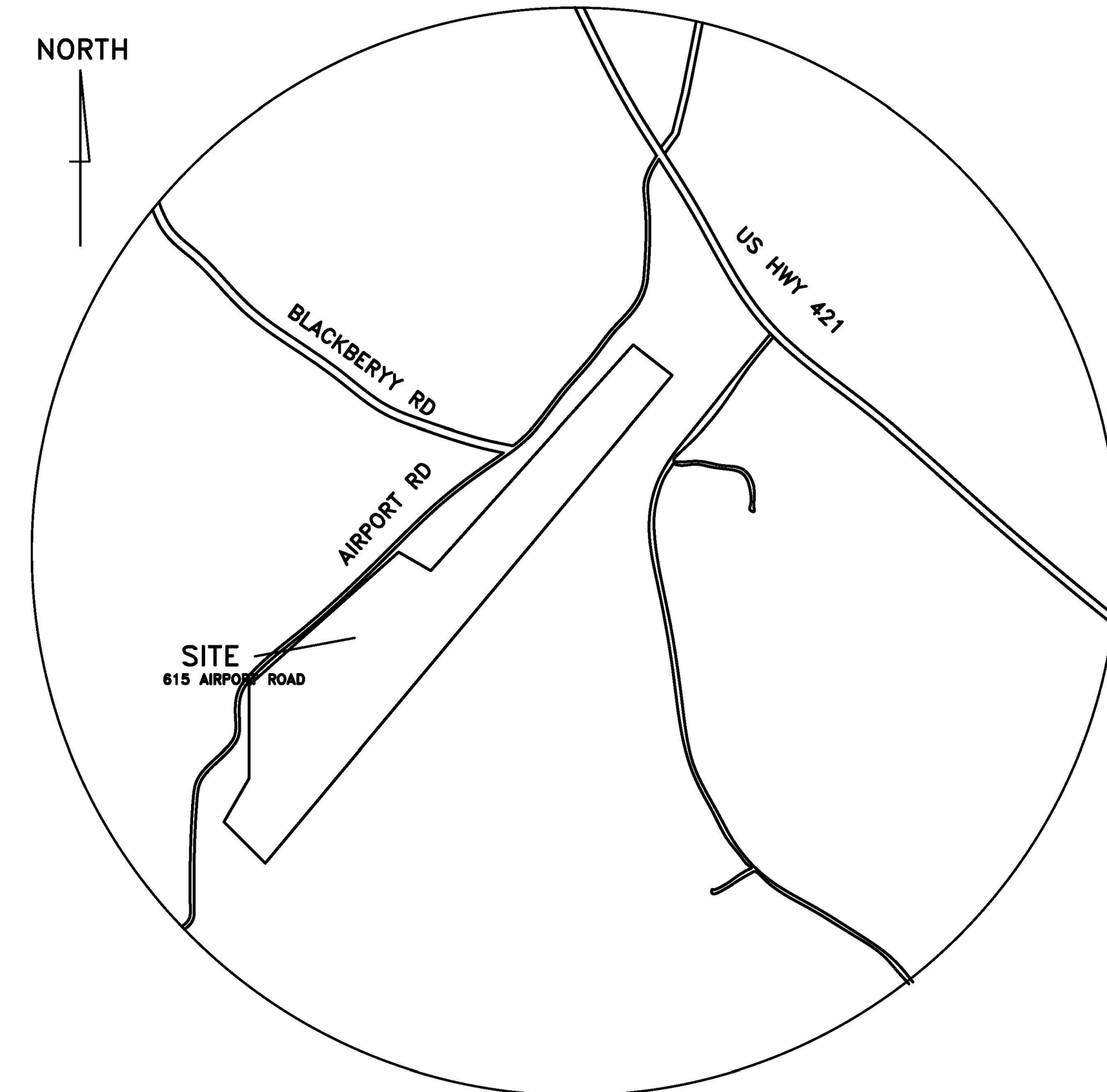
CODE REVIEW:

APPLICABLE CODES INCLUDE BUT ARE NOT LIMITED TO THE FOLLOWING:

BUILDING	2018 NC EXISTING BUILDING CODE 2018 NC BUILDING CODE
FIRE PREVENTION	2018 NC FIRE CODE
ENERGY	2018 NC ENERGY CONSERVATION CODE
PLUMBING	2018 NC PLUMBING CODE
MECHANICAL	2018 NC MECHANICAL CODE
ELECTRICAL	2020 NATIONAL ELECTRICAL CODE (NFPA-70)

VICINITY PLAN

NOT TO SCALE



BUILDING DATA:

THE PROJECT SCOPE IS TO CONSTRUCT A
 NEW BUILDING FOR USE AS AN AIRCRAFT
 HANGAR



05 AUGUST 2025

DESIGNED / CHECKED BY:	KJD
DRAWN BY:	BT
PROJECT #:	2025-07-21
DATE:	05 AUGUST 2025

FINAL DRAWING <input type="checkbox"/> FOR REVIEW PURPOSES ONLY	PRELIMINARY <input type="checkbox"/> FOR DESIGN DEVELOPMENT ONLY	FINAL DRAWING <input checked="" type="checkbox"/> FOR CONSTRUCTION
OWNER/TENANT:	CONTRACTOR/BUILDER:	

PROJECT: **HARNETT COUNTY AIRPORT HANGAR #2**
 497 AIRPORT RD. ERWIN, NC 28339
 SHEET: **COVER & INDEX TO DRAWINGS**

CS

2018 NORTH CAROLINA BUILDING CODE SUMMARY: APPENDIX B

Name of Project: **HARNETT REGIONAL AIRPORT HANGAR #2** PartID / PIN: / 0417004918000
 Address: **497 AIRPORT ROAD** Zip Code: **28339**
 Proposed Use: **AIRCRAFT HANGAR (U)**
 Owner or Authorized Agent: **BRAN RAYNOR** Phone: **910-824-1238** E-Mail: **braynor@highlandpaving.com**
 Owned By: City/County Private State
 Code Enforcement Jurisdiction: City **ERWIN** County State **NORTH CAROLINA**

CONTACT: **KELLY J. DODSON**

DESIGNER	FIRM	NAME	LICENSE #	TELEPHONE #	E-MAIL
Architectural	N/A	N/A	N/A	N/A	N/A
Civil	N/A	N/A	N/A	N/A	N/A
Electrical	JCE	DOUGLAS L. JENKINS	NC PE 28803	(910) 822-1724	buddy@jenkinsce.com
Fire Alarm	N/A	N/A	N/A	N/A	N/A
Plumbing	JCE	DOUGLAS L. JENKINS	NC PE 28803	(910) 822-1724	buddy@jenkinsce.com
Mechanical	JCE	DOUGLAS L. JENKINS	NC PE 28803	(910) 822-1724	buddy@jenkinsce.com
Sprinkler-Standpipe	N/A	N/A	N/A	N/A	N/A
Structural	JCE	KELLY J. DODSON	NC PE 42009	(910) 822-1724	kelly@jenkinsce.com
INTERIOR WALLS	N/A	N/A	N/A	N/A	N/A
Retaining Walls >5' High	N/A	N/A	N/A	N/A	N/A
Building	JCE	KELLY J. DODSON	NC PE 42009	(910) 822-1724	kelly@jenkinsce.com

2018 NORTH CAROLINA BUILDING CODE: New Building Shell / Core First Time Interior Completions
 Addition Phased Construction - Shell Core

2018 NORTH CAROLINA EXISTING BUILDING CODE: Prescriptive Alteration Level I Historic Property
 (check all that apply) Repair Alteration Level II Change of Use
 Chapter 14 Alteration Level III

CONSTRUCTION: (date) N/A CURRENT USE (S) (Ch. 3): N/A
 RENOVATION: (date) N/A PROPOSED USE (S) (Ch. 3): AIRCRAFT HANGAR (GROUP III - NFPA 409)

OCCUPANCY RISK CATEGORY (Table 1604.5): Current: N/A Proposed: I

BASIC BUILDING DATA
 Construction Type: I-A II-A III-A IV V-A
 I-B II-B III-B NFPA 13D V-B
 Check all that apply: Partial NFPA 13 NFPA 13R NFPA 13D
 Standpipes: No Class I II III Wet Dry
 Primary Fire District: No Yes (APPENDIX D) Flood Hazard Area: No Yes
 Special Inspections Required: No Yes

FLOOR	EXISTING (sq ft)	NEW (sq ft)	SUBTOTAL
GROUND LEVEL	N/A	9,000	9,000
TOTAL SPACE AREA	N/A	9,000	9,000

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 I-2 I-3 I-4
 I-1 Condition 1 2
 I-2 Condition 1 2
 I-3 Condition 1 2 3 4 5
 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): NONE
 Incidental Uses (Table 509): NONE
 This separation is not exempt as a Non-separated Use (see exceptions).
 Special Uses (Chapter 4): 402 403 404 405 406 407 408 409 410 411 412 413
 414 415 416 417 418 419 420 421 422 423 424 425
 426 427 428 429 430
 Special Provisions (Chapter 5): 510.2 510.3 510.4 510.5 510.6 510.7 510.8 510.9
 Mixed Occupancy: No Yes Separation: 0 Hr. Exception:
 Non-separated Use (508.3) (508.3.1)
 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 of each use shall not exceed 1.

Separated Use Formula 508.4.2: $\frac{\text{Actual Area of Occupancy A}}{\text{Allowable Area of Occupancy A}} + \frac{\text{Actual Area of Occupancy B}}{\text{Allowable Area of Occupancy B}} \leq 1$
 $\frac{N/A}{N/A} + \frac{N/A}{N/A} = \dots \leq 1.00$

STORY NUMBER	DESCRIPTION AND USE	(A) BLDG AREA PER STORY (ACTUAL)	(B) TABLE 506.2.4 AREA	(C) AREA FOR FRONTAGE INCREASE 1, 5	(D) ALLOWABLE AREA PER STORY (OR UNLIMITED 2, 3)
1	AIRCRAFT HANGAR	9,000	8500	6113	14613

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 = 120 (F)
 b. Total Building Perimeter = 390 (P)
 c. Ratio (F/P) = .31 (F/P)
 d. W = minimum width (weighted average) of public way = $150 \left(\frac{W}{30} \right)$ where $W = (L_1 X_1 + L_2 X_2 + \dots + L_n X_n) / F$ (Equation 5-4)
 e. Percent of frontage increase = $100 \left[\frac{F}{P} - 0.25 \right] \times W / 30 = 71$ (X) (Equation 5-5)

FRONTAGE INCREASE WORKSHEET FOR CALCULATIONS:

EXTERIOR WALL	(F) OPEN LENGTH (feet)	(P) TOTAL LENGTH (feet)	(W) (weighted average) WIDTH OF PUBLIC WAY OR OPEN SPACE (feet)	(X) (%) FROM CALC. ABOVE	(B) FROM TABLE ABOVE	AREA INCREASE FOR COLUMN (C) ABOVE (% * TABLE AREA)
North	75	390	30			
South	75	390	30			
East	120	390	30			
West	120	390	26			
TOTAL	75	390	240	71	8500	(71*8500 = 6113)
EXAMPLE	75	100	25	42	23,500	(42*23,500 = 9,870)

2 Unlimited area applicable under conditions of Sections 507
 3 Maximum Building Area = total number of stories in the building x D (maximum 3 stories) (Section 506.2).
 4 The maximum area of open parking garages must comply with Table 406.5.4. The maximum area of air traffic control towers must comply with Table 412.3.1
 5 Frontage increase is based on the un-sprinklered area value in Table 506.2.

BUILDING CODE SUMMARY (continued)

	ALLOWABLE HEIGHT		SHOWN ON PLANS	CODE REFERENCE
	ALLOWABLE			
Building Height in Feet (Table 504.3)	65		31' - 0"	N/A
Building Height in Stories (Table 504.4)	3		1	N/A

1. Provide code reference if the "Shown on Plans" quantity is not based on Table 504.3 or 504.4.

FIRE PROTECTION REQUIREMENTS

BUILDING ELEMENT	FIRE SEPARATION DISTANCE (feet)	RATING ** (TABLE 601)		DETAIL # AND SHEET #	DESIGN # FOR RATED ASSEMBLY	SHEET # FOR RATED PENETRATION	SHEET # FOR RATED JOINTS
		REQ'D II-B	PROVIDED (W/REDUCTION)				
Structural Frame, including columns, girders, trusses	N/A	0	0	N/A	N/A	N/A	N/A
Bearing Walls	N/A	0	0	N/A	N/A	N/A	N/A
Exterior	N/A	0	0	N/A	N/A	N/A	N/A
North	N/A	0	0	N/A	N/A	N/A	N/A
East	N/A	0	0	N/A	N/A	N/A	N/A
West	N/A	0	0	N/A	N/A	N/A	N/A
South	N/A	0	0	N/A	N/A	N/A	N/A
Interior	N/A	0	0	N/A	N/A	N/A	N/A
Nonbearing walls and partitions	N/A	0	0	N/A	N/A	N/A	N/A
Exterior walls	N/A	0	0	N/A	N/A	N/A	N/A
North	N/A	0	0	N/A	N/A	N/A	N/A
East	N/A	0	0	N/A	N/A	N/A	N/A
West	N/A	0	0	N/A	N/A	N/A	N/A
South	N/A	0	0	N/A	N/A	N/A	N/A
Interior Non-Bearing Walls	N/A	0	0	N/A	N/A	N/A	N/A
Floor construction including supporting beams and joists	0	0	N/A	N/A	N/A	N/A	N/A
Floor Ceiling Assembly	0	0	N/A	N/A	N/A	N/A	N/A
Columns Supporting Floors	0	0	N/A	N/A	N/A	N/A	N/A
Roof construction including supporting beams and joists	0	0	N/A	N/A	N/A	N/A	N/A
Roof Ceiling Assembly	0	0	N/A	N/A	N/A	N/A	N/A
Columns Supporting Roof	0	0	N/A	N/A	N/A	N/A	N/A
Shaft Enclosures - Exit	0	0	N/A	N/A	N/A	N/A	N/A
Shaft Enclosures - Other	0	0	N/A	N/A	N/A	N/A	N/A
Corridor Separation	0	0	N/A	N/A	N/A	N/A	N/A
Occupancy / Fire Barrier Separation	0	0	N/A	N/A	P1	N/A	N/A
Party/Fire Wall Separation	0	0	N/A	N/A	N/A	N/A	N/A
Smoke Barrier Separation	0	0	N/A	N/A	N/A	N/A	N/A
Smoke Partition	0	0	N/A	N/A	N/A	N/A	N/A
OWNER/Dwelling Unit/ Sleeping Unit Separation	0	0	N/A	N/A	N/A	N/A	N/A
Incidental Use Separation	0	0	N/A	N/A	N/A	N/A	N/A

* Indicate section number permitting reduction

PERCENTAGE OF WALL OPENING CALCULATIONS

EXTERIOR WALL	FIRE SEPARATION DISTANCE (feet) FROM PROPERTY LINE	DEGREE OF OPENINGS PROTECTION (TABLE 705.5)	ALLOWABLE AREA (sq ft)	ACTUAL SHOWN ON PLANS (sq ft)
North	N/A	N/A	N/A	N/A
South	N/A	N/A	N/A	N/A
East	N/A	N/A	N/A	N/A
West	N/A	N/A	N/A	N/A

LIFE SAFETY SYSTEM REQUIREMENTS

Emergency Lighting: Yes No
 Exit Signs: Yes No
 Fire Alarm: Yes No
 Smoke Detection Systems: Yes No Partial Duct Detectors
 Carbon Monoxide Detection: Yes No
 Life Safety Systems Generator: Yes No

LIFE SAFETY PLAN REQUIREMENTS

Life Safety Plan Sheet #: LS

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 access travel distances (1017)
 Common path of travel distances [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 (903)
 The square footage of each smoke compartment for Occupancy Classification I-8 (407.5)
 Note any code exceptions or table notes that may have been utilized regarding the items above

ACCESSIBLE DWELLING UNITS (SECTION 1107)

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
NONE REQUIRED							

ACCESSIBLE PARKING (SECTION 1106)

LOT OR PARKING AREA	TOTAL # OF PARKING SPACES		# OF ACCESSIBLE SPACES PROVIDED			TOTAL # ACCESSIBLE PROVIDED
	REQUIRED	PROVIDED	REGULAR WITH 5' ACCESS AISLE	VAN SPACES WITH 132" ACCESS AISLE	96" ACCESS AISLE	
SEE CIVIL DRAWING						
TOTAL						

BUILDING CODE SUMMARY (continued)

PLUMBING FIXTURE REQUIREMENTS (TABLE 2802.1)

USE	WATER CLOSETS			URINALS	LAVATORIES			SHOWERS/TUBS	DRINKING FOUNTAINS		SERVICE SINK
	MALE	FEMALE	UNISEX		MALE	FEMALE	UNISEX		REGULAR	ACCESSIBLE	
UTILITY (U)	0	0			0	0					0
PROVIDED (TOTAL)	0	0			0	0					0

***NOTE: THIS BUSINESS HAS OCCUPANT LOADS LESS THAN 25. NO HI-LOW DRINKING FOUNTAIN IS REQUIRED.

SPECIAL APPROVALS:
 Special approval: (Local Jurisdiction, Department of Insurance, OSC, DPL, DHS, ICC, etc., describe below)
N/A

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: (if checked, the remainder of this section is not applicable.)
 Exempt Building: Provide code or statutory reference: _____

Climate Zone: 3A 4A 5A HARNETT COUNTY

Method of Compliance:
 Energy Code: Performance Prescriptive
 ASHRAE 90.1: Performance Prescriptive
 Other: Performance (specify source) _____ Value of total assembly: _____

THERMAL ENVELOPE (Prescriptive method only)
 Roof/Ceiling Assembly (each assembly)
 Description of assembly: METAL BUILDING ROOF PANEL
 U-Value of total assembly: _____
 R-Value of insulation: R-10 + R-19 FC
 Skylights in each assembly: NONE
 U-Value of skylight: _____
 Total square footage of skylights in each assembly: _____

Exterior Walls (each assembly)
 Description of assembly: METAL BUILDING WALL PANEL WITH R-19 INSULATION
 U-Value of total assembly: _____
 R-Value of insulation: R-19
 Openings (windows or doors with glazing)
 U-Value of assembly: 0.31 (0.32 MAX)
 Solar heat gain coefficient: 0.23 (0.25 MAX)
 Projection factor: _____
 Door R-Values: 2.7

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: 6" CONCRETE SLAB
 U-Value of total assembly: _____
 R-Value of insulation: _____
 Horizontal/vertical requirement: _____
 slab heated: _____

MECHANICAL SUMMARY (SEE DRAWING SHEET M1)
 ELECTRICAL SUMMARY (SEE DRAWING SHEET E1)

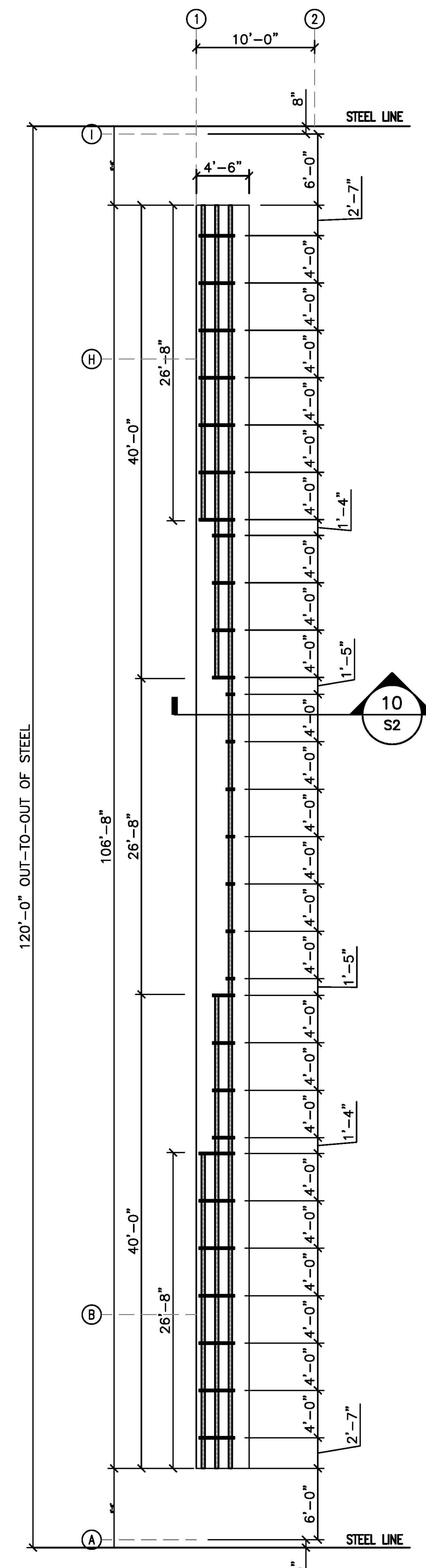
CUMBERLAND COUNTY
 BUILDING CODE SUMMARY
 for:
 HARNETT REGIONAL AIRPORT HANGAR #2

497 AIRPORT RD
 ERWIN, NORTH CAROLINA, 28339

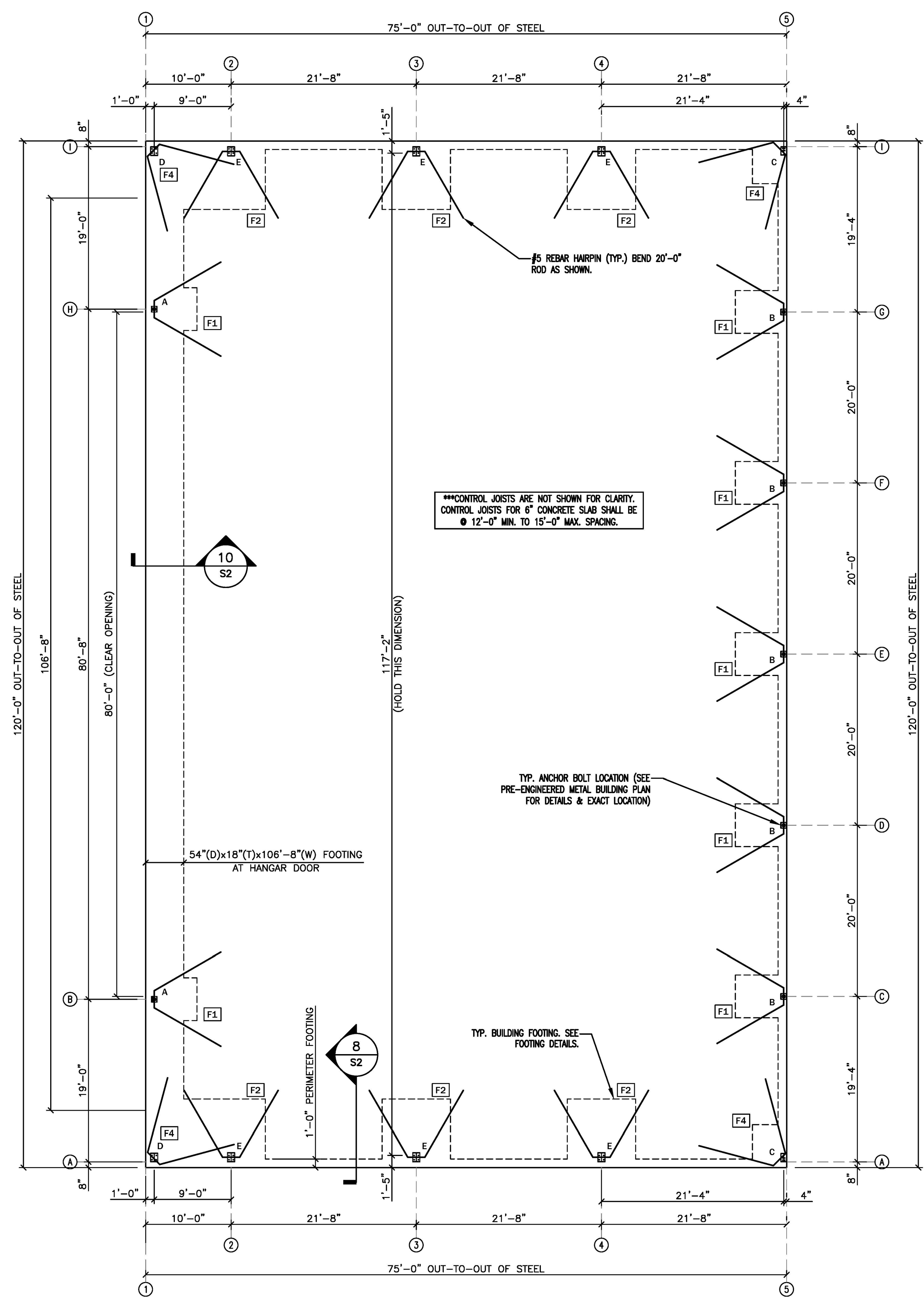
PROJECT: **HARNETT COUNTY AIRPORT HANGAR #2**
 SHEET: **BCS**
 497 AIRPORT RD. ERWIN, NC 28339
 BUILDING CODE SUMMARY
 DESIGNED / CHECKED BY: **KJD**
 DRAWN BY: **BT**
 PROJECT #: **2025-07-21**
 DATE: **05 AUGUST 2025**
 FINAL DRAWING [] FOR REVIEW PURPOSES ONLY
 PRELIMINARY [] FOR DESIGN DEVELOPMENT ONLY
 FINAL DRAWING [] FOR CONSTRUCTION
 OWNER/TENANT: _____
 CONTRACTOR/BUILDER: _____

1'-4" = 1'-0"
 2'-0" = 1'-0"
 4'-0" = 1'-0"
 6'-0" = 1'-0"
 8'-0" = 1'-0"
 10'-0" = 1'-0"
 12'-0" = 1'-0"
 14'-0" = 1'-0"
 16'-0" = 1'-0"
 18'-0" = 1'-0"
 20'-0" = 1'-0"
 22'-0" = 1'-0"
 24'-0" = 1'-0"
 26'-0" = 1'-0"
 28'-0" = 1'-0"
 30'-0" = 1'-0"
 32'-0" = 1'-0"
 34'-0" = 1'-0"
 36'-0" = 1'-0"
 38'-0" = 1'-0"
 40'-0" = 1'-0"
 42'-0" = 1'-0"
 44'-0" = 1'-0"
 46'-0" = 1'-0"
 48'-0" = 1'-0"
 50'-0" = 1'-0"
 52'-0" = 1'-0"
 54'-0" = 1'-0"
 56'-0" = 1'-0"
 58'-0" = 1'-0"
 60'-0" = 1'-0"
 62'-0" = 1'-0"
 64'-0" = 1'-0"
 66'-0" = 1'-0"
 68'-0" = 1'-0"
 70'-0" = 1'-0"
 72'-0" = 1'-0"
 74'-0" = 1'-0"
 76'-0" = 1'-0"
 78'-0" = 1'-0"
 80'-0" = 1'-0"
 82'-0" = 1'-0"
 84'-0" = 1'-0"
 86'-0" = 1'-0"
 88'-0" = 1'-0"
 90'-0" = 1'-0"
 92'-0" = 1'-0"
 94'-0" = 1'-0"
 96'-0" = 1'-0"
 98'-0" = 1'-0"
 100'-0" = 1'-0"
 102'-0" = 1'-0"
 104'-0" = 1'-0"
 106'-0" = 1'-0"
 108'-0" = 1'-0"
 110'-0" = 1'-0"
 112'-0" = 1'-0"
 114'-0" = 1'-0"
 116'-0" = 1'-0"
 118'-0" = 1'-0"
 120'-0" = 1'-0"
 122'-0" = 1'-0"
 124'-0" = 1'-0"
 126'-0" = 1'-0"
 128'-0" = 1'-0"
 130'-0" = 1'-0"
 132'-0" = 1'-0"
 134'-0" = 1'-0"
 136'-0" = 1'-0"
 138'-0" = 1'-0"
 140'-0" = 1'-0"
 142'-0" = 1'-0"
 144'-0" = 1'-0"
 146'-0" = 1'-0"
 148'-0" = 1'-0"
 150'-0" = 1'-0"
 152'-0" = 1'-0"
 154'-0" = 1'-0"
 156'-0" = 1'-0"
 158'-0" = 1'-0"
 160'-0" = 1'-0"
 162'-0" = 1'-0"
 164'-0" = 1'-0"
 166'-0" = 1'-0"
 168'-0" = 1'-0"
 170'-0" = 1'-0"
 172'-0" =

Plotting File: \\s\2025\Harnett County Airport #2 - PD 2025-07-21\DWG\Harnett-Airport#2-29 July 2025.dwg
 Printed By: jk
 Printed Date: Aug 05, 2025 - 3:46pm
 SCALE: 1/8" = 1'-0" SCALE: 3/16" = 1'-0" SCALE: 1/4" = 1'-0" SCALE: 1/2" = 1'-0" SCALE: 3/4" = 1'-0" SCALE: 1" = 1'-0" SCALE: 1-1/2" = 1'-0" SCALE: 2" = 1'-0" SCALE: 4" = 1'-0" SCALE: 8" = 1'-0" SCALE: 16" = 1'-0"



2
S1 HANGAR DOOR ANCHOR PLAN
 SCALE: 1/8" = 1'-0"



1
S1 PIER & ANCHOR BOLT PLAN
 SCALE: 1/8" = 1'-0"

LEGEND
 F3 FOOTING DETAIL NUMBER, SEE DETAIL ON SHEET S2
 B ANCHOR PLATE, SEE PRE-ENGINEERED METAL BUILDING PLAN FOR DETAIL



DESIGNED / CHECKED BY: **KJD**
 DRAWN BY: **BT**
 PROJECT #: **2025-07-21**
 DATE: **05 AUGUST 2025**

FINAL DRAWING FOR REVIEW PURPOSES ONLY
 PRELIMINARY FOR DESIGN DEVELOPMENT ONLY
 FINAL DRAWING FOR CONSTRUCTION
 OWNER/TENANT: _____
 CONTRACTOR/BUILDER: _____

PROJECT: **HARNETT COUNTY AIRPORT HANGAR #2**
 497 AIRPORT RD. ERWIN, NC 28339
 SHEET: **FOUNDATION PLAN & ANCHOR BOLT PLAN**

S1

1'-4" 8" 4" 2'-0" 0 4" 1'-0" 6" 1'-0" 2'-8" 0 4" 1'-0" 4" 1'-0" 2'-0" 0 4" 1'-0" 8" 0 1'-0" 2'-0" 0 4" 1'-0" 10'-8" 0 2'-8" 5'-4" 0 4" 1'-0" 16" 0 2'-8" 5'-4" 0 4" 1'-0" 32'-0" 0 7'-6" 0 10'-0" 0 16'-0" 0 24'-0" 0 32'-0" 0 40'-0" 0 48'-0" 0 56'-0" 0 64'-0" 0 72'-0" 0 80'-0" 0 88'-0" 0 96'-0" 0 104'-0" 0 112'-0" 0 120'-0" 0 128'-0" 0 136'-0" 0 144'-0" 0 152'-0" 0 160'-0" 0 168'-0" 0 176'-0" 0 184'-0" 0 192'-0" 0 200'-0" 0 208'-0" 0 216'-0" 0 224'-0" 0 232'-0" 0 240'-0" 0 248'-0" 0 256'-0" 0 264'-0" 0 272'-0" 0 280'-0" 0 288'-0" 0 296'-0" 0 304'-0" 0 312'-0" 0 320'-0" 0 328'-0" 0 336'-0" 0 344'-0" 0 352'-0" 0 360'-0" 0 368'-0" 0 376'-0" 0 384'-0" 0 392'-0" 0 400'-0" 0 408'-0" 0 416'-0" 0 424'-0" 0 432'-0" 0 440'-0" 0 448'-0" 0 456'-0" 0 464'-0" 0 472'-0" 0 480'-0" 0 488'-0" 0 496'-0" 0 504'-0" 0 512'-0" 0 520'-0" 0 528'-0" 0 536'-0" 0 544'-0" 0 552'-0" 0 560'-0" 0 568'-0" 0 576'-0" 0 584'-0" 0 592'-0" 0 600'-0" 0 608'-0" 0 616'-0" 0 624'-0" 0 632'-0" 0 640'-0" 0 648'-0" 0 656'-0" 0 664'-0" 0 672'-0" 0 680'-0" 0 688'-0" 0 696'-0" 0 704'-0" 0 712'-0" 0 720'-0" 0 728'-0" 0 736'-0" 0 744'-0" 0 752'-0" 0 760'-0" 0 768'-0" 0 776'-0" 0 784'-0" 0 792'-0" 0 800'-0" 0 808'-0" 0 816'-0" 0 824'-0" 0 832'-0" 0 840'-0" 0 848'-0" 0 856'-0" 0 864'-0" 0 872'-0" 0 880'-0" 0 888'-0" 0 896'-0" 0 904'-0" 0 912'-0" 0 920'-0" 0 928'-0" 0 936'-0" 0 944'-0" 0 952'-0" 0 960'-0" 0 968'-0" 0 976'-0" 0 984'-0" 0 992'-0" 0 1000'-0" 0

ELECTRICAL LEGEND

	DUPLEX RECEPTACLE; MOUNT AT 18" A.F.F.
	DUPLEX RECEPTACLE; MOUNT AT 18" A.F.F.; TAMPER RESISTANT
	DUPLEX RECEPTACLE; GROUND FAULT CIRCUIT INTERRUPTER
	DUPLEX RECEPTACLE; WEATHERPROOF GROUND FAULT CIRCUIT INTERRUPTER
	QUAD RECEPTACLE; MOUNT AT 18" A.F.F.
	2 POLE 208/240V RECEPTACLE
	CEILING MOUNTED DUPLEX RECEPTACLE
	FLOOR MOUNTED RECEPTACLE
	SINGLE POLE POWER/LIGHTING HOMERUN
	2-POLE POWER HOMERUN
	3-POLE POWER HOMERUN (3 PHASE)
	WALL MOUNTED DATA OUTLET
	WALL MOUNTED VOICE (TELEPHONE) OUTLET
	WALL MOUNTED VOICE/DATA OUTLET
	TIMECLOCK
	TELEVISION OUTLET
	DISCONNECT
	JUNCTION BOX
	POWER PANEL
	SWITCH
	3-WAY SWITCH
	SWITCH WITH DIMMER
	OCCUPANCY SENSOR WITH MANUAL OVERRIDE
	LAY-IN/SURFACE MOUNTED LED LIGHT FIXTURE
	LAY-IN/SURFACE MOUNTED LED; NIGHT LIGHT
	PENDANT LIGHT
	CAN LIGHT
	EMERGENCY LIGHT
	EXIT/EMERGENCY COMBO
	EXIT LIGHT
	REMOTE HEAD FOR EXIT LIGHTING
	EXTERIOR MOUNTED WALL PACK

ELECTRICAL NOTES:
ALL WORK SHALL BE IN ACCORDANCE WITH 2020 NEC.

WIRE AND CABLE SHALL BE INSULATED, TYPE THHN, 600 VOLTS, WITH COPPER CONDUCTORS, CONDUCTOR SIZES NO. 8 AWG AND LARGER MAY BE STRANDED, CONDUCTOR SIZES NO. 10 AWG AND SMALLER MAY BE SOLID OR STRANDED.

ROMEX CAN NOT BE USED IN THIS PROJECT. MC CAN BE USED.

FMT SHALL BE GALVANIZED STEEL TUBING 1/2-INCH MINIMUM SIZE, EQUAL TO ELECTRUMITE BRAND OR APPROVED AND USED ONLY WITH HEXAGONAL ALL-STEEL COMPRESSION FITTINGS. MC CABLE MAY BE SUBSTITUTED FOR CONDUIT RACEWAYS WHERE PERMITTED BY THE CODE AND APPROVED BY OWNER.

PLASTIC CONDUIT SHALL BE RIGID, 3/4-INCH MINIMUM, NONMETALLIC, HEAVY DUTY, POLYVINYLCHLORIDE (PVC) TYPE I WILL BE USED FOR CONCRETE ENCASEMENT. FITTINGS SHALL BE THE SAME MATERIALS AND MANUFACTURER AS THE PLASTIC CONDUIT.

FLEXIBLE METAL CONDUIT SHALL BE 1/2-INCH MINIMUM SINGLE STRIP, STEEL, HOT DIPPED GALVANIZED INSIDE AND OUTSIDE, MAXIMUM LENGTH OF 72 INCHES FOR LIGHTING, AND 36 INCHES FOR MOTORS. FLEXIBLE METAL CONDUIT SHALL BE LIQUID TIGHT OR WATER TIGHT WITH PVC JACKET WHERE USED IN DAMP, WET, OR OUTSIDE AREAS, AND LIQUID TIGHT OR WATER TIGHT CONNECTORS SHALL BE USED.

NO RECEPTACLES OR TELEPHONE OUTLETS ARE TO BE MOUNTED BACK TO BACK, KEEP AT LEAST 1 1/2 INCHES BETWEEN RECEPTACLES AND TELEPHONE OUTLETS.

ALL CONDUCTORS SHALL BE COPPER WITH A MINIMUM SIZE OF #12 AWG EXCEPT FOR FIRE ALARM. THESE CONDUCTORS SHOULD COMPLY WITH NFPA REQUIREMENTS.

THE ELECTRICAL CONTRACTOR SHALL ALIGN ALL FIXTURES, SMOKE DETECTORS, CEILING DIFFUSERS, ETC. AS REQUIRED TO PROVIDE A UNIFORM PRESENTATION. FOLLOW THE REFLECTED CEILING PLAN IF PROVIDED.

CIRCUIT BREAKERS AND WIRE ARE SIZED FOR SPECIFIC EQUIPMENT. BEFORE ORDERING WIRE, BREAKERS, FIXTURES, CONDUIT, AND ETC. FOR THIS PROJECT, THE ELECTRICAL CONTRACTOR SHALL COORDINATE WITH THE OTHER CONTRACTORS ON THE JOB AND VERIFY THE ELECTRICAL DATA FOR THE EQUIPMENT THAT WILL BE ACTUALLY INSTALLED. RECOMPUTE WIRE AND BREAKER SIZES IF REQUIRED BY THE NEC.

THE MOUNTING HEIGHTS AND LOCATIONS OF ALL WALL MOUNTED OUTLETS AND JUNCTION BOXES SHALL BE REVIEWED AND COORDINATED WITH THE GENERAL CONTRACTOR AND OWNER PRIOR TO INSTALLATION FOR USE WITH ACTUAL EQUIPMENT.

ALL LIGHT SWITCHES, RECEPTACLES, WALL PLATES, TELEPHONE/COMPUTER OUTLET BOXES, AND CABLE OUTLET BOXES SHALL BE WHITE.

EACH CONTRACTOR WILL PROVIDE HIS OWN SUPPORT OF ALL DEVICES AND EQUIPMENT PROVIDED IN HIS CONTRACT AND SHALL SUPPORT SUCH EQUIPMENT PER APPROVED GOVERNING CODES. UNACCEPTABLE WORKMANSHIP OR MATERIALS SHALL BE REPLACED AT THE ELECTRICAL CONTRACTORS EXPENSE.

THE ELECTRICAL CONTRACTOR SHALL REFER TO THE DRAWINGS FOR FLOOR PLAN AND BUILDING ELEVATION DIMENSIONS.

THE ELECTRICAL CONTRACTOR SHALL COORDINATE WITH OTHER TRADES INVOLVED IN THIS PROJECT PRIOR TO INSTALLATION OF HIS EQUIPMENT, SO AS TO AVOID CONFLICTS DURING CONSTRUCTION AND ALLOW FOR OPTIMUM WORKING SPACE AND MAINTENANCE. THINK OF OTHER CONTRACTORS AND THEIR REQUIREMENTS IN VERTICAL CHASES AND WALL MOUNT SPACE. ALL CONTRACTORS TO FOLLOW THIS ORDER OF PRIORITY:

1. STORM AND SANITARY SEWER LINES
2. DUCTWORK AND HVAC SYSTEMS
3. HOT AND COLD WATER LINES
4. RIGID CONDUIT
5. CABLE

THE ELECTRICAL CONTRACTOR TO ORGANIZE HIS CONDUIT, WIRE, AND CABLE RUNS IN ATTIC SPACES AND ABOVE CEILINGS, MAKE RUNS PARALLEL, PERPENDICULAR, AND GROUPED TOGETHER WHERE POSSIBLE. LOCATE MAJOR GROUPINGS OVER HALLWAYS AND AREAS OF PUBLIC ACCESS. FREE RUNS OF PHONE, TELEVISION, SECURITY, ALARM, AND OTHER CABLES IS NOT ACCEPTABLE.

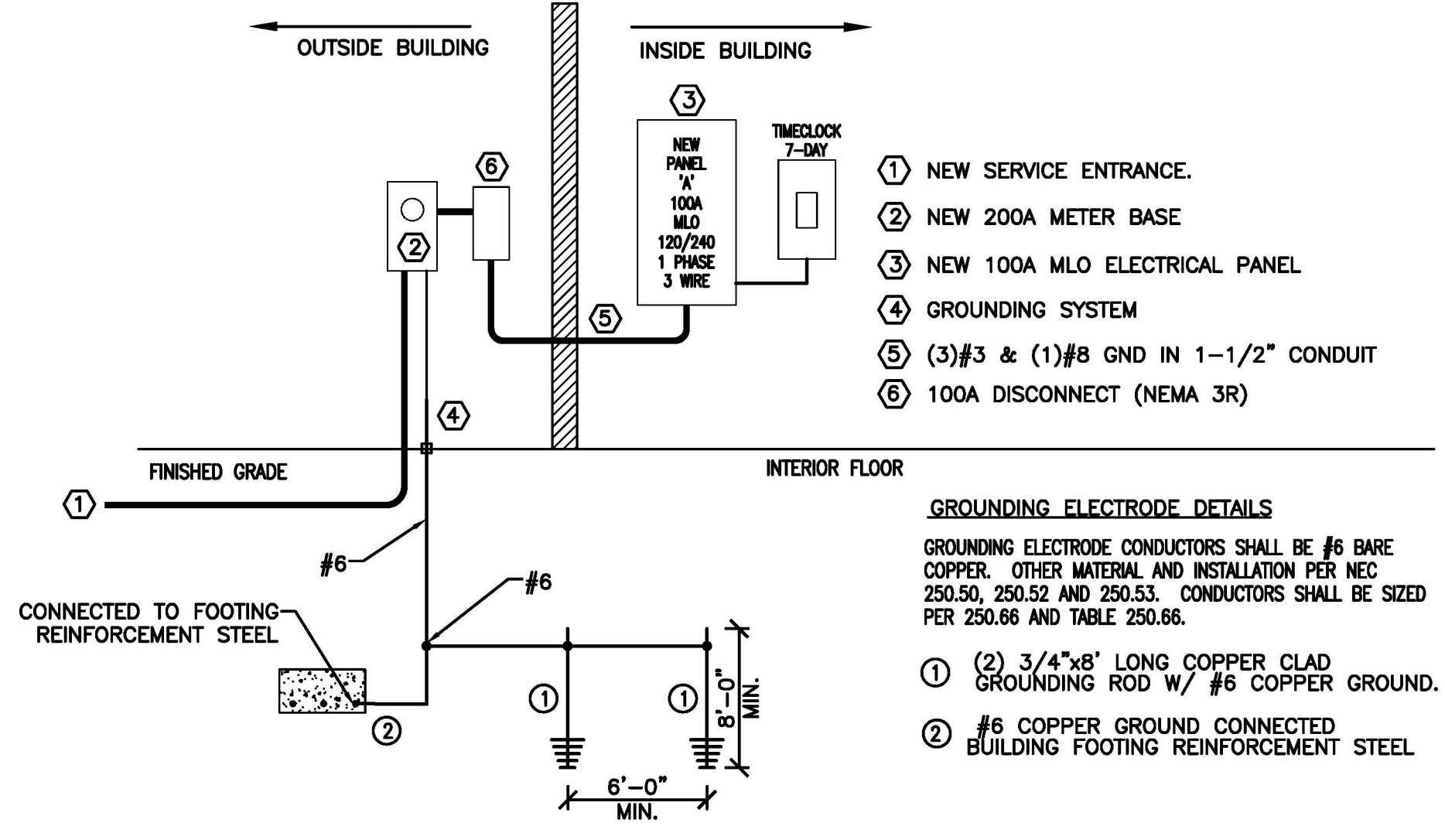
ALL DISCONNECT SWITCHES AND BREAKER SIZES SHOWN FOR MECHANICAL EQUIPMENT, KITCHEN EQUIPMENT, AND ETC. SHALL BE VERIFIED BEFORE PURCHASE AND INSTALLATION OF SAID EQUIPMENT WITH THE EQUIPMENT SUPPLIER AND MECHANICAL CONTRACTOR. WHERE EQUIPMENT PENETRATES EXTERIOR WALLS OR ROOF, THEY SHALL BE PROPERLY SEALED.

EXHAUST FANS ARE TO BE PROVIDED AND INSTALLED BY THE MECHANICAL CONTRACTOR, AND ELECTRICAL WIRING BY THE ELECTRICAL CONTRACTOR.

THE ELECTRICAL CONTRACTOR SHALL PROVIDE NAMEPLATES FOR IDENTIFICATION OF ALL EQUIPMENT, SWITCHES, PANELS, ETC. THE NAMEPLATES SHALL BE LAMINATED PHENOLIC PLASTIC, BLACK FRONT AND BACK WITH WHITE CORE, WHITE ENGRAVED LETTERS (1/4 INCH MINIMUM), ETCHED INTO THE WHITE CORE. NAME TAGS TO BE MOUNTED WITH SELF-TAPPING SHEET METAL SCREWS.

THE ELECTRICAL CONTRACTOR IS NOT TO SCALE THE DRAWINGS FOR RECEPTACLES AND LIGHT FIXTURES TO BE INSTALLED. THE DRAWINGS ARE FOR DIAGRAMMATIC PURPOSES ONLY TO SHOW GENERAL LOCATION. THE ELECTRICAL CONTRACTOR TO COORDINATE EXACT LOCATION OF RECEPTACLES AND LIGHT FIXTURES WITH THE GENERAL CONTRACTOR AND/OR CASEWORK DRAWINGS.

ALL LIGHT SWITCHES AND RECEPTACLES SHALL BE RATED FOR 20 AMP UNLESS NOTED OTHERWISE.



LIGHT FIXTURE SCHEDULE

TAG	DESCRIPTION	SIZE	MOUNTING	LENS	COLOR	LUMENS	BULB	BALLAST TYPE	HOUSING	VOLTAGE	WATTAGE	MANU/MODEL NUMBER	REMARKS
A	LED HIGH BAY LIGHT	16"ø	HANGING	N/A	5000 K	30,000	LED	LED DRIVER	STEEL	120	215	LITHONIA NO. JEFL 30L 50K 80CRI OR EQUAL	COLOR TEMP. SELECT BY OTHERS
B	EXTERIOR WALL PACK	17" X 9"	HANGING	N/A	5000 K	16,000	LED	LED DRIVER	STEEL	120	112	LITHONIA NO. TWR2 LED ALD SSW2 UVOLT PE DBDXTD	COLOR TEMP. SELECT BY OTHERS
EM	EMERGENCY	N/A	WALL	N/A	N/A	N/A	(2) LAMPS	ELECTRONIC	POLYCARBONATE	120/240		LITHONIA ELM2L OR EQUAL (FOR RESTROOMS/UTILITY ROOMS)	6 VOLT NICAD BATTERY TEST SWITCH, POWER INDICATOR
EX	EXIT SIGN	N/A	WALL	SINGLE	N/A	N/A	LED LIGHT	LED DRIVER	POLYCARBONATE	120/240		LITHONIA LHQM S W 3 R 120/240 EL N OR EQUAL	6 VOLT NICAD BATTERY, (2) REMOTE HEADS

PANEL "A"

PHASE LOADING	DESCRIPTION	WIRE SIZE	WIRE TYPE	CT. NO.	CT. BKR. TRIP	PHASE	DESCRIPTION	WIRE SIZE	WIRE TYPE	CT. NO.	CT. BKR. TRIP	PHASE	
1.72	LIGHT - LEFT BAY	#12	20/1	1	2	20/1	LIGHT - RIGHT BAY	#12	C	3	4	20/1	
1.72	LIGHT - CENTER BAY	#12	20/1	3	4	20/1	LIGHT EXTERIOR + TIMECLOCK	#12	C	5	6	20/1	
0.55	RECEPT - LEFT WALL	#12	20/1	5	6	20/1	RECEPT - RIGHT WALL	#12	R	7	8		
0.55	RECEPT - REAR WALL	#12	20/1	7	8					9	10		
										11	12		
										13	14		
										15	16		
										17	18		
										19	20		
										21	22		
										23	24		
										25	26		
										26	28		
										29	30		
SUB-TOTAL (KVA)						SUB-TOTAL (KVA)						2.25	0.55
H-HVAC LOAD						C-CONTINUOUS LOAD						TOTAL CONNECTED LOAD = 7.34 KVA	
K-KITCHEN LOAD						N-NON CONTINUOUS LOAD						TOTAL AMPS = 30.58 A	
E-ESTIMATED LOAD						R-RECEPTACLE LOAD						TOTAL OF: 30 SPACES	

ITEM	CONNECTED LOAD (KVA)	ESTIMATED LOAD (KVA)
HVAC	0	0
LIGHTING	5.71	7.13
RECEPTACLES	1.65 (7-10.00*80+10.00)	1.65
MISC. EQUIPMENT	0	0
TOTAL CONNECTED	7.34 KVA	30.58 AMPS
ESTIMATED DEMAND	8.78 KVA	36.58 AMPS

APPENDIX B ELECTRICAL DESIGN 2018 BUILDING CODE SUMMARY

PROJECT NAME: **HARNETT COUNTY AIRPORT HANGAR #2**

ELECTRICAL SUMMARY
 ELECTRICAL SYSTEM AND EQUIPMENT
 METHOD OF COMPLIANCE: X PRESCRIPTIVE PERFORMANCE
 ENERGY CODE: X PRESCRIPTIVE PERFORMANCE
 ASHRAE 90.1: PRESCRIPTIVE PERFORMANCE

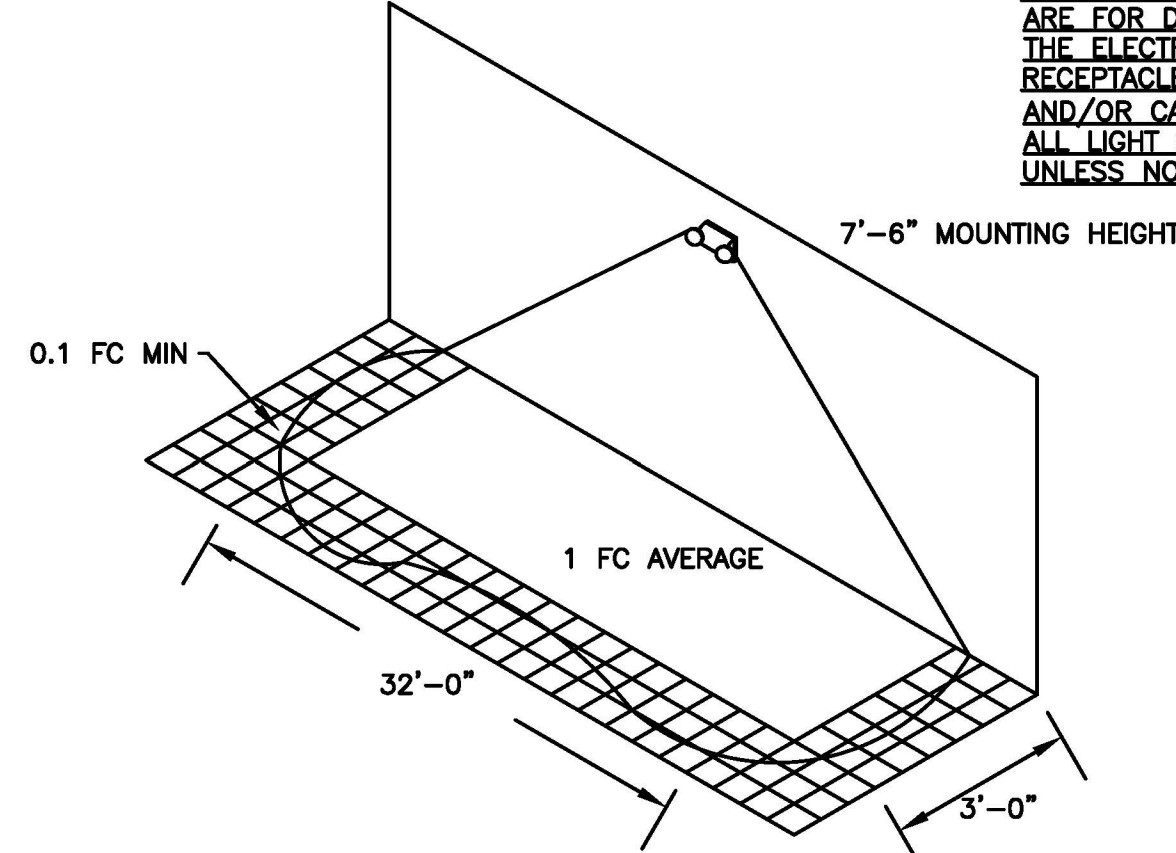
LIGHTING SCHEDULE (EACH FIXTURE TYPE)
 LAMP TYPE REQUIRED IN FIXTURE LED
 NUMBER OF LAMPS IN FIXTURE (SEE FIXTURE SCHEDULE)
 BALLAST TYPE USED IN THE FIXTURE ELECTRONIC
 NUMBER OF BALLASTS IN FIXTURE 1
 TOTAL WATTAGE PER FIXTURE VARIES PER FIXTURE
 TOTAL INTERIOR WATTAGE SPECIFIED VERSUS ALLOWED 7,200 ALLOWED - 5,710 SPECIFIED
 TOTAL EXTERIOR WATTAGE SPECIFIED VERSUS ALLOWED N/A

SECTION C406 ADDITIONAL EFFICIENCY PACKAGE OPTIONS
 C406.1 BUILDINGS SHALL HAVE AT LEAST ONE OF THE FOLLOWING PRESCRIPTIVE COMPLIANCE (REQUIRED FOR NEW BUILDINGS, OPTIONAL FOR EXISTING BUILDINGS)

1. MORE EFFICIENT MECHANICAL EQUIPMENT PER C406.2
2. REDUCED LIGHTING POWER DENSITY PER C406.3
3. ENHANCED LIGHTING CONTROL SYSTEMS PER C406.4
4. ON-SITE SUPPLY OF RENEWABLE ENERGY PER C406.5
5. DEDICATED OUTDOOR AIR SYSTEM PER C406.6
6. HIGHER EFFICIENCY SERVICE WATER HEATING PER C406.7

DESIGNER STATEMENT:
 TO THE BEST OF MY KNOWLEDGE AND BELIEF, THE DESIGN OF THIS BUILDING COMPLIES WITH THE ELECTRICAL SYSTEM AND EQUIPMENT REQUIREMENTS OF THE 2018 NC ENERGY CONSERVATION CODE.

SIGNED: *Buddy Jenkins*
 NAME: BUDDY JENKINS
 TITLE: PROFESSIONAL ENGINEER



ASSUMES OPEN SPACE WITH NO OBSTRUCTIONS, MOUNTING HEIGHT: 7'-6"; 10'-0" CEILING HEIGHT, AND REFLECTANCES 80/50/20

MOUNTING HEIGHT	ILLUMINATION LEVEL	EMERGENCY LIGHT FIXTURE PERFORMANCE MODEL: LITHONIA ELM2L			
		SINGLE LUMINAIRE COVERAGE		MULTIPLE LUMINAIRE SPACING	
		3' PATH OF EGRESS	6' PATH OF EGRESS	3' PATH OF EGRESS	6' PATH OF EGRESS
7'-6"	1FC AVG	32'	24'	35'	28'
10'	1FC AVG	20'	14'	27'	23'

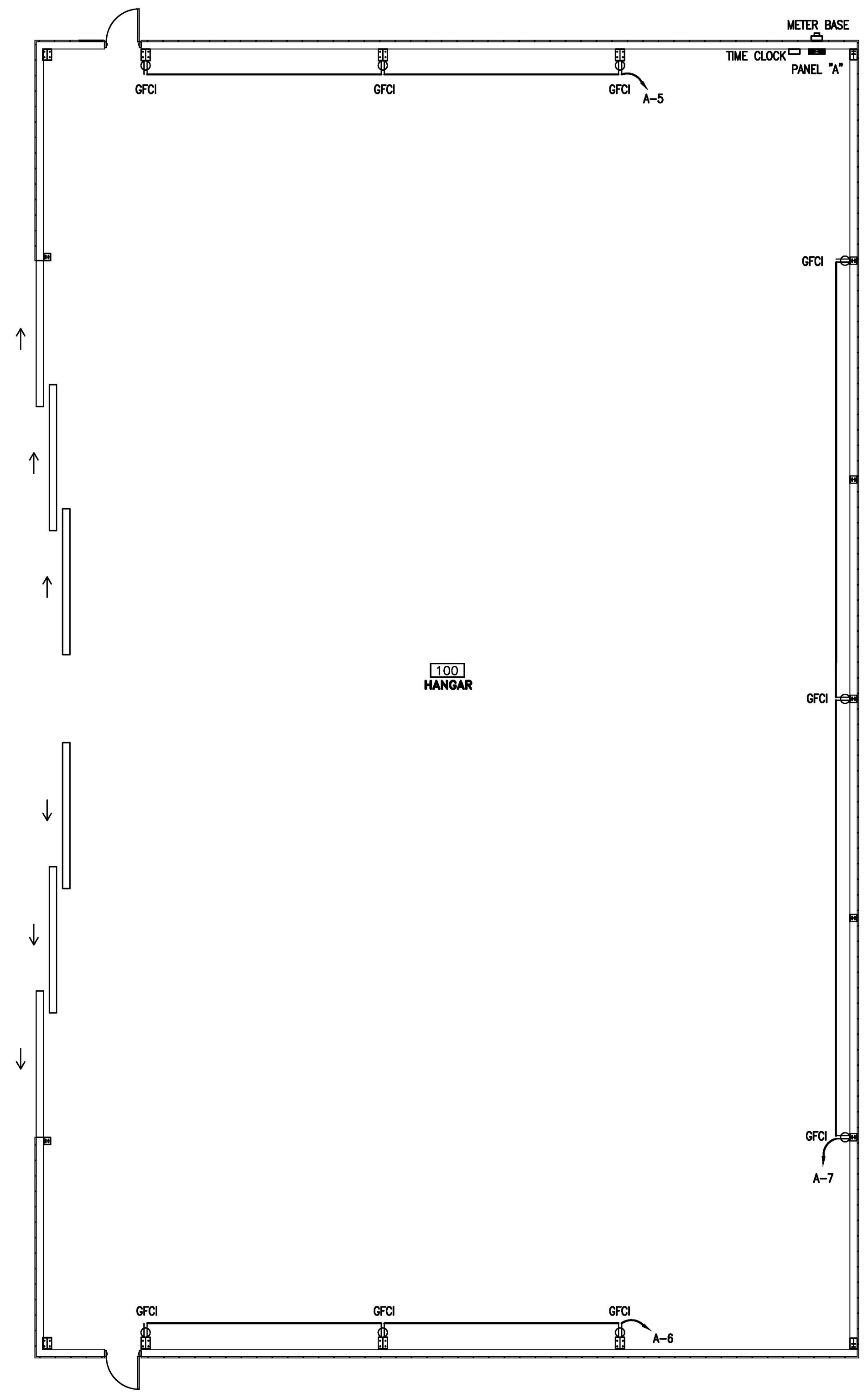


DESIGNED / CHECKED BY: BJ
 DRAWN BY: BT
 PROJECT #: 2025-07-21
 DATE: 05 AUGUST 2025

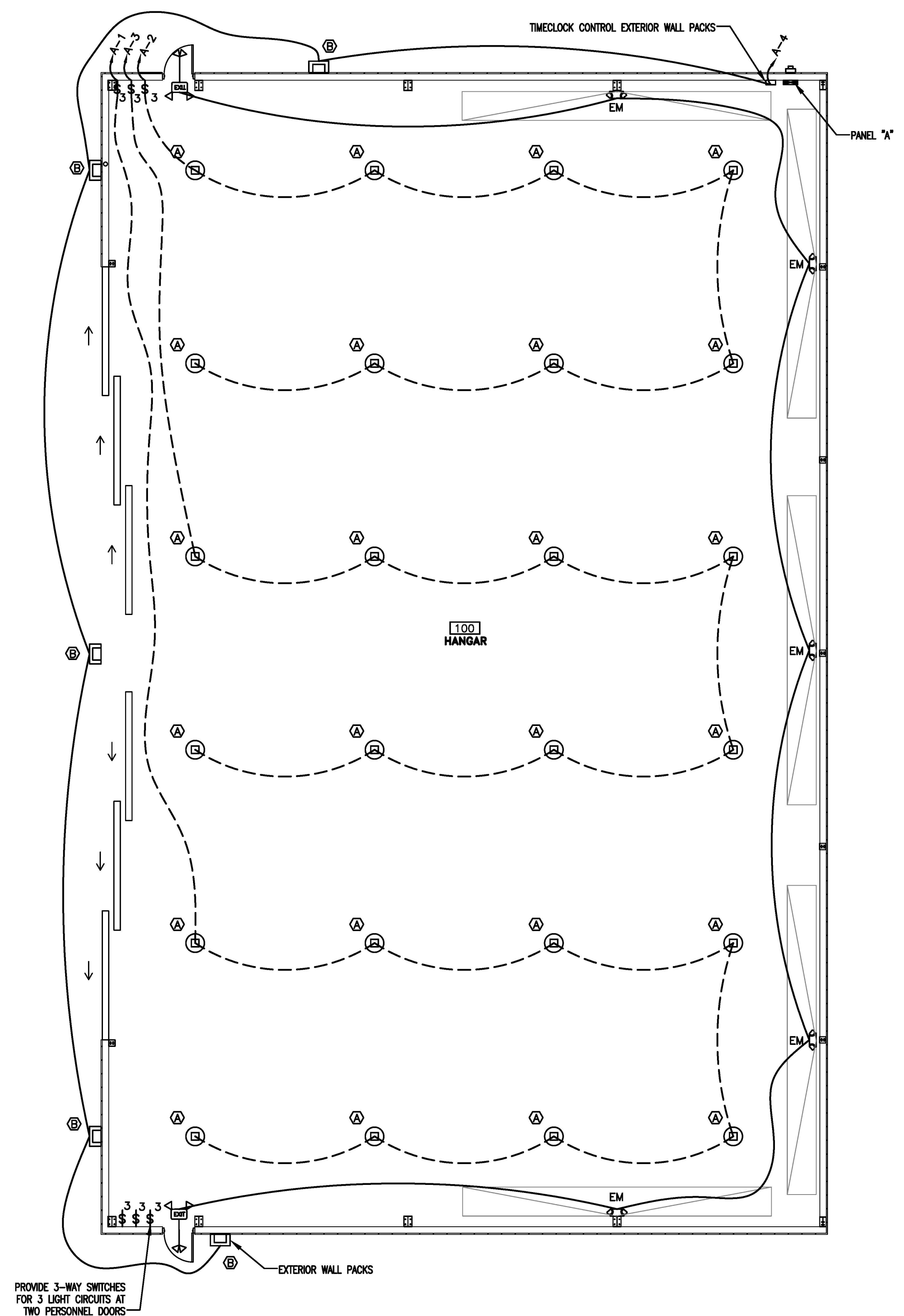
FINAL DRAWING [] FOR REVIEW PURPOSES ONLY
 PRELIMINARY [] FOR DESIGN DEVELOPMENT
 FINAL DRAWING [] FOR CONSTRUCTION

OWNER/TENANT:
 CONTRACTOR/BUILDER:

Plotting File: \\s\2025\Harnett County Airport #2 PD 2025-07-21\DWG\Harnett-Airport#2-29 July 2025.dwg
 Project By: BJJ
 Printed Date: Aug 05, 2025 - 3:46pm
 SCALE: 1/8" = 1'-0" (0, 4', 8', 16', 0, 2'-8", 5'-4", 10'-8", 0, 2', 4', 8', 0, 1', 2', 4', 0, 8', 1'-4", 2'-8", 0, 6', 1'-0", 2'-0", 0, 4', 8', 1'-4")
 SCALE: 1/4" = 1'-0" (0, 4', 8', 0, 2'-8", 0, 6', 1'-0", 2'-0", 0, 4', 8', 1'-4")
 SCALE: 1/2" = 1'-0" (0, 1', 2', 4', 0, 8', 1'-4")
 SCALE: 3/4" = 1'-0" (0, 8', 1'-4")
 SCALE: 1" = 1'-0" (0, 6', 1'-0", 2'-0", 0, 4', 8', 1'-4")
 SCALE: 1-1/2" = 1'-0" (0, 8', 1'-4")
 SCALE: 1" = 1'-0" (0, 6', 1'-0", 2'-0", 0, 4', 8', 1'-4")
 SCALE: 1" = 1'-0" (0, 6', 1'-0", 2'-0", 0, 4', 8', 1'-4")



1 POWER PLAN
 E2
 SCALE: 1/8" = 1'-0" (0, 4', 8', 16')



2 LIGHTING PLAN
 E2
 SCALE: 1/8" = 1'-0" (0, 4', 8', 16')



DESIGNED / CHECKED BY:	BJJ
DRAWN BY:	BT
PROJECT #:	2025-07-21
DATE:	05 AUGUST 2025

FINAL DRAWING <input type="checkbox"/> FOR REVIEW PURPOSES ONLY	OWNER/TENANT:
PRELIMINARY <input type="checkbox"/> FOR DESIGN DEVELOPMENT ONLY	CONTRACTOR/BUILDER:
FINAL DRAWING <input checked="" type="checkbox"/> FOR CONSTRUCTION	

PROJECT: **HARNETT COUNTY AIRPORT HANGAR #2**
 497 AIRPORT RD. ERWIN, NC 28339
 SHEET: **ELECTRICAL - POWER & LIGHTING PLAN**

E2

