Harrison Township District 10
Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ARCHITECT

App Architecture

615 Woodside Drive
Englewood, Ohio 45322
(937) 836-8898

ELECTRICAL AND MECHANICAL ENGINEERS

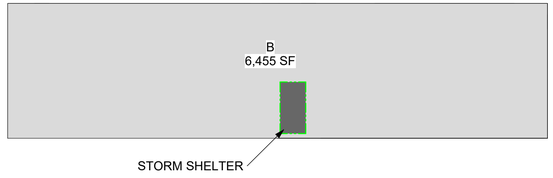
L2 Engineering, LLC

7949 Washington Woods Drive
Dayton, OH 45459
(937) 361-6731

STRUCTURAL ENGINEERS

L2 Engineering, LLC

7949 Washington Woods Drive
Dayton, OH 45459
(937) 361-6731



D4 USE GROUP PLAN
3/64" = 1'-0"

VICINITY MAP

CODE INFORMATION (OEBC 2024)

2024 OHIO EXISTING BUILDING CODE (OEBC)

COMPLIANCE METHOD

2024 OHIO EXISTING BUILDING CODE (OEBC)
SECTION 301.3.1 PRESCRIPTIVE COMPLIANCE METHOD
COMPLIANCE WITH OEBC SECTIONS 302-309 AND CHAPTER 5.
ALTERATIONS TO COMPLY WITH REQUIREMENTS OF THE CODE FOR NEW CONSTRUCTION (OBC 2024).

2024 OHIO BUILDING CODE (OBC)

PROJECT DESCRIPTION

PROJECT CONSISTS OF A RENOVATION OF AN EXISTING OFFICE BUILDING INTO A FUNCTIONAL SHERIFF SUBSTATION FOR HARRISON TOWNSHIP.

USE GROUP CLASSIFICATION

OBC (302) USE GROUP = B BUSINESS - SHERIFF SUBSTATION

CONSTRUCTION TYPE CLASSIFICATION

OBC (602) CONSTRUCTION TYPE = V B

HEIGHT AND AREA LIMITATIONS

BUILDING DESCRIPTION: B 2 STORIES/9,000 SF STORY ALLOWABLE

ACTUAL HEIGHT AND FLOOR AREA: 1 STORY/6,455 SF (NO CHANGE)

FIRE PROTECTION

BUILDING DESCRIPTION : NON-SPRINKLERED

STORM SHELTER PROVISIONS

REFER TO SHEET G0.3 FOR STORM SHELTER INFORMATION.

PLUMBING FIXTURES REQUIRED

	WC	LAV.	SHOWER	DF	SERVICE SINK
REQUIRED:	1	1	0	1	1
PROPOSED*	5	9	2	0*	1

*Drinking fountains shall not be required for an occupant load of 15 or fewer. When water dispensers are provided, drinking fountains shall not be required.

ACCESSIBILITY STANDARD

EXISTING BUILDINGS: OBC 2024, CHAPTER 11, ACCESSIBILITY AND ICC A117.1-2009

OCCUPANT LOAD

OBC (1004) ALLOWABLE B = 6,440 SF/150 = 43 OCCUPANTS ALLOWABLE
15 OCCUPANTS DECLARED

DRAWING INDEX

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147
Todd A. Gindelberger - License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

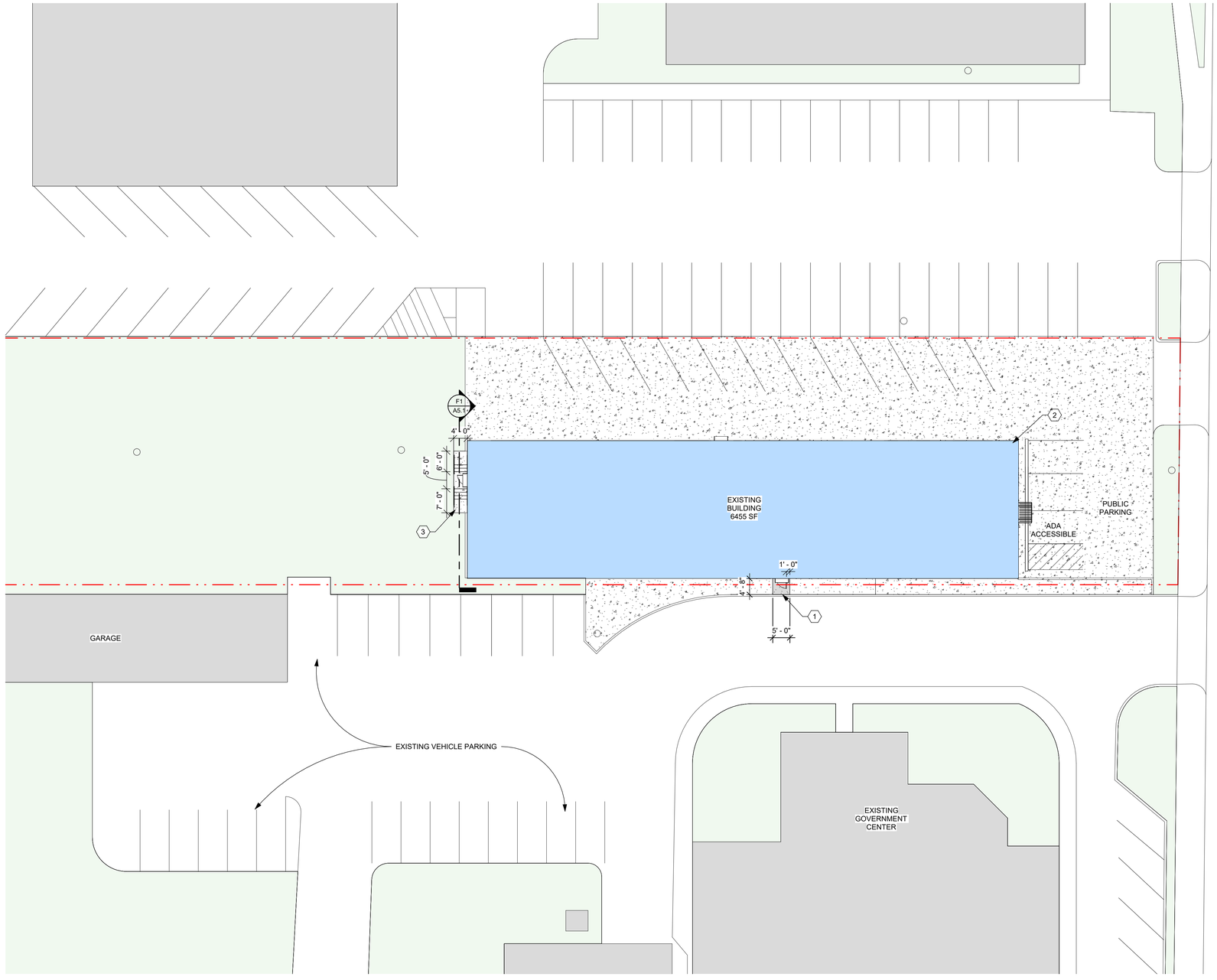
DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
COVER SHEET

SHEET NO.
G0.1

1/21/2026 9:53:05 AM

*BOUNDARY DATA BASED ON GIS INFORMATION FROM MONTGOMERY COUNTY AUDITOR OFFICE'S PARCEL MAP. FOR SCHEMATIC PURPOSES ONLY. THIS IS NOT A SURVEY



F1 SITE PLAN STUDY
1/16" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 CONCRETE PAD. REFER TO SHEET A5.1 FOR DETAILS.

2 ONCE FOUNDATION IS REPAIRED, REGRADE, PATCH, AND REPAIR PAVING AT THIS CORNER TO DIVERT WATER AWAY FROM BUILDING.

3 CONCRETE PAD AND STEPS TO BE COORDINATED WITH OWNER. REFER TO SHEET A5.1 FOR DETAILS.

GENERAL NOTES

A. ARCHITECTURAL SITE PLAN IS PROVIDED FOR REFERENCE ONLY.

B. HARRISON TOWNSHIP OWNS BOTH THE PARCEL WHICH THE PROPOSED SHERIFF STATION IS LOCATED, THE PARCEL WHERE THE EXISTING GOVERNMENT CENTER IS LOCATED.

C. HARRISON TOWNSHIP ZONING AND STREET DEPARTMENT IS ADDRESSING ZONING ITEMS AND PARKING DISTRIBUTION BETWEEN THE TWO PARCELS. G.C. SHALL INCLUDE PATCHING AND REPAIR OF AREAS DISTRIBUTED BY CONSTRUCTION AND SAL AND RESTRIPE THE 6001 NORTH DIXIE DRIVE PARCEL.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147
Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
ARCHITECTURAL SITE PLAN

SHEET NO.
G0.2

1/21/2026 9:53:09 AM

STORM SHELTER INFORMATION

GOVERNING CODES:
- OBC 2024, SECTION 423 STORM SHELTERS
- ICC 500 2020

THIS SHELTER IS CLASSIFIED AS A COMMUNITY TORNADO SHELTER.
THE SHELTER IS LOCATED ON THE MAIN FLOOR LEVEL OF THE SHERIFF STATION.

THE SHELTER IS DESIGNED TO ACCOMMODATE 15 OCCUPANTS OF THE SHERIFF STATION.

ICC 500, 2020 CHAPTER 1: APPLICATION AND ADMINISTRATION

DESIGN INFORMATION PER 106.2.1 IS LOCATED OR REFERENCED ON THIS SHEET.

ITEM 2: USE OF COMMUNITY STORM SHELTER IS BY BUILDING OCCUPANTS ONLY.
ITEM 9: DESIGN WIND PRESSURES ARE INCLUDED IN STRUCTURAL STORM SHELTER CALCULATIONS SECTION 1: DESIGN LOADS FOR BASIC DESIGN WIND LOAD AND SECTION 6 & 7 FOR COMPONENTS AND CLADDING WIND LOAD DESIGNS.
ITEM 20: FOUNDATION CAPACITY REQUIREMENTS AND REINFORCEMENT ARE INCLUDED ON STRUCTURAL SHEET S4.2 STRUCTURAL SECTIONS
ITEM 21: POST INSTALLED ANCHORS ARE USED FOR THE INSTALLATION OF THE IMPACT RESISTANT DOOR, AND THE WALL OPENING PLATE SHROUDS. REFER TO SHEETS A0.3, A0.6 AND S5.4 FOR ADDITIONAL INFORMATION.

ICC 500, 2020 CHAPTER 3: STRUCTURAL DESIGN AND TESTING CRITERIA

THE TORNADO SHELTER HAS BEEN DESIGNED PER THE REQUIREMENTS OF ICC 500 - 2020.

- SHELTER DESIGN WIND SPEED, V(ult): 250 mph
- WIND EXPOSURE CATEGORY: C
- INTERNAL PRESSURE COEFFICIENT (GCpi): +/- 0.55
- TOPOGRAPHICAL FACTOR: 1.0
- DIRECTIONALITY FACTOR: 1.0
- MINIMUM FOUNDATION CAPACITY REQUIREMENTS: REFER TO STRUCTURAL DRAWINGS
- SHELTER INSTALLATION REQUIREMENTS: REFER TO STRUCTURAL DRAWINGS

REFER TO STRUCTURAL DRAWINGS FOR ADDITIONAL STRUCTURAL NOTES AND DETAILS.

ICC 500, 2020 CHAPTER 4: SITING

THE SHELTER IS NOT BEING CONSTRUCTED WITHIN AN AREA SUSCEPTIBLE TO FLOODING PER FEMA.

THE SITE IS LOCATED OUTSIDE OF ANY FLOOD PLAINS. THEREFORE, BASE FLOOD ELEVATION IS NOT APPLICABLE.

THE SHELTER FINISHED FLOOR ELEVATION IS 100' - 0".

ICC 500 2020, SECTION 502 OCCUPANCY DENSITY IN COMMUNITY SHELTERS

TABLE 501.1.1 (TORNADO) - OCCUPANCY DENSITY
- 5 SF/STANDING OR SEATED MINIMUM
- 10 SF/WHEELCHAIR SPACE (1:200)

501.1.2.2 - ALTERNATIVE CALCULATION OF USABLE FLOOR AREA

GROSS AREA = 16' x 8' - 3 1/4"	**=**	**132.33 SF**
WALL AREA	**-**	**29.23 SF**
FIXED OBJECTS	**-**	**15.57 SF**
NET CLEAR AREA		**87.53 SF**

MAXIMUM OCCUPANCY = 14 OCCUPANTS + 1 WHEELCHAIR
DECLARED BUILDING OCCUPANCY = 15 OCCUPANTS

501.2 - NUMBER OF DOORS
- BASED ON SHELTER OCCUPANCY, ONLY ONE MEANS OF EGRESS IS REQUIRED.
- PER EXCEPTION LISTED UNDER 501.2, NO EMERGENCY ESCAPE OPENING IS REQUIRED FOR SHELTERS WITH AN OCCUPANT LOAD NOT EXCEEDING 15 OCCUPANTS.

501.3 - DIRECTION OF SWING
- DOOR SHALL SWING INTO THE SHELTER SPACE IN ACCORDANCE WITH OBC 2024.
- DOOR ASSEMBLY TO BE TESTED AND LABELED IN ACCORDANCE WITH ICC 500 2020, CHAPTER 8 AND ASTM E361.

504 - SIGNAGE FOR COMMUNITY SHELTERS
- REFER TO VIEWS F3 AND F5 ON THIS SHEET FOR SIGNAGE LOCATIONS.
- REFER TO SIGNAGE LEGEND ON SHEET A.03 FOR SIGNAGE DETAILS.

ICC 500, 2020 CHAPTER 6: FIRE SAFETY

601.1 - FIRE SEPARATION
- ALL SHELTER WALLS ARE 2 HOUR FIRE RATED PARTITIONS. UL DESIGN NO. U905.
- SHELTER HORIZONTAL ASSEMBLY (CEILING/ROOF) IS A 2 HR. RATED ASSEMBLY. UL DESIGN NO. D219.

602 - FIRE EXTINGUISHERS
- A WALL HUNG FIRE EXTINGUISHER IS PROVIDED MEETING IBC AND NFPA 10 REQUIREMENTS.
- REFER TO SHEET A0.1 FOR MOUNTING DETAILS.

ICC 500, 2020 CHAPTER 7: SHELTER ESSENTIAL FEATURES AND ACCESSORIES

SECTION 702: TORNADO SHELTERS
STORM SHELTER OCCUPANCY IS 15 PEOPLE.

702.4.2 MECHANICAL VENTILATION.
- AN OUTDOOR AIR FLOW RATE OF 5 CFM PER OCCUPANT IS REQUIRED. AT 15 PEOPLE, A TOTAL AIRFLOW RATE OF 80 CFM IS REQUIRED.
  - THE REQUIRED AIRFLOW IS PROVIDED BY EF-3 LOCATED WITHIN THE STORM SHELTER. EF-3 IS POWERED THROUGH THE STORM SHELTER UPS AND WILL OPERATE CONTINUOUSLY THROUGH THE 2-HOUR TIME PERIOD.
  - OUTSIDE AIR IS PROVIDED TO THE STORM SHELTER THROUGH A 6/6 TRANSFER AIR DUCT. THE OUTSIDE AIR DUCT HAS A MOTORIZED CONTROL DAMPER INSTALLED INSIDE OF THE STORM SHELTER. THE DAMPER HAS AN ACTUATOR THAT IS POWERED CLOSED, SPRING RETURN, FAIL OPEN.
  - WHEN THE STORM SHELTER IS IN USE DURING A TORNADO EVENT, THE SHELTER OCCUPANTS MAY ACTIVATE THE MANUAL SWITCH TO OPEN THE DAMPER. THE DAMPER HAS A BUILT-IN FAIL SAFE TO AUTOMATICALLY OPEN UPON THE LOSS OF NORMAL AND BACKUP GENERATOR POWER IF THE USER DOES NOT ACTIVATE THE MANUAL SWITCH PRIOR.

TABLE 702.3
- ONE WATER CLOSET IS REQUIRED.
- THE LAVATORY IS NOT REQUIRED.
- HAND SANITIZER WILL BE STORED BY THE OWNER.

BASED ON 3 WATER CLOSET USES PER 8HR PERIOD PER OCCUPANT (FROM L.E.E.D.), IN A 2 HR PERIOD THAT IS 3/4 USES PER PERSON.
FOR 15 PEOPLE, 12 FLUSHES WILL BE REQUIRED.

THE TANK WILL BE FILLED ON ENTRY INTO THE SPACE AS A STORM SHELTER, THE POLICE DEPARTMENT WILL BE REQUIRED TO STORE ENOUGH WATER TO ACCOMMODATE 12 FLUSHES.

EACH TANK FILL/FLUSH REQUIRES 1.6 GALLONS OF WATER, 1.6 GALLONS PER FLUSH X 12= 19.2 GALLONS MINIMUM OF POTABLE WATER NEED TO BE MADE AVAILABLE FOR WATER CLOSET USAGE.

ADDITIONAL POTABLE WATER SHALL BE STORED FOR DRINKING.
INCLUDE THESE REQUIREMENTS IN THE OWNER'S INSTRUCTIONS.

REFER TO PLUMBING DRAWINGS FOR ADDITIONAL INFORMATION.

702.8 EMERGENCY LIGHTING
- LIGHTING FIXTURES WILL BE CONNECTED TO AN EMERGENCY BATTERY BACK-UP TO POWER LIGHTS IN SHELTER FOR A MINIMUM OF 2 HOURS UPON LOSS OF NORMAL POWER. REFER TO ELECTRICAL DRAWINGS FOR DETAILS.
- A MINIMUM OF (3) FLASHLIGHTS >150 LUMENS EACH ARE TO BE STORED IN THE SHELTER.

STORM SHELTER SPECIAL INSTRUCTIONS

STORM EVENT OPERATIONS PLAN

POSITION DESIGNATED PERSONNEL AT DOOR TO ENSURE THAT ONCE ALL OCCUPANTS ARE INSIDE SHELTER, DOOR REMAINS CLOSED AND LOCKED DURING THE ENTIRE STORM EVENT.
- OPENING DOOR DURING HIGH PRE-EVENT OR EVENT WINDS COULD DAMAGE THE DEVICE, REMOVE THE DEVICE, OR MAKE IT WHERE THE DEVICE CANNOT BE RE-CLOSED MAKING ALL SHELTER OCCUPANTS VULNERABLE TO THE WIND EVENT FOR WHICH THEY ARE SEEKING PROTECTION.

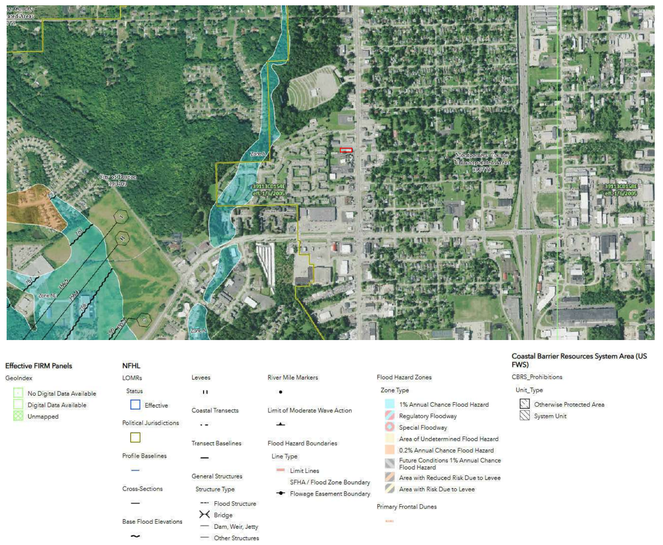
SHELTER OCCUPANTS ARE NOT TO PHYSICALLY CONTACT THE EXTERIOR WALLS OR OPENING PROTECTIVE DEVICES OF THE SHELTER.
- VERY LARGE POINT LOADS CREATED BY DEBRIS MAY BE EXERTED ON THE EXTERIOR WALL AND THIS KINETIC ENERGY MAY BE TRANSFERRED THROUGH THE SHELTER WALL WHICH COULD INJURE AN INDIVIDUAL THAT IS CONTACT WITH THE EXTERIOR WALL OF THE SHELTER.

STORAGE CABINET CONTENTS

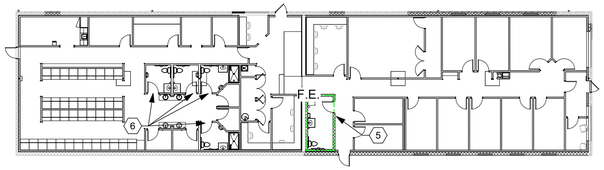
- 19.2 GALLONS OF POTABLE WATER FOR TOILET FLUSHING (TO BE STORED ON BOTTOM SHELF)
- 2 CASES OF 16 OZ. WATER BOTTLES (EQUALING 3 GALLONS) FOR DRINKING
- HAND SANITIZER
- FIRST AID KIT COMPLYING WITH ANSI/ISEAI Z308.1
- (3) FLASHLIGHTS WITH > 150 LUMENS OUTPUT EACH
- EVACUATION TOOLS
  - HAMMER
  - PRY BAR
  - WORK GLOVES

STORM SHELTER EVENT OPERATIONS PLAN – MECHANICAL VENTILATION

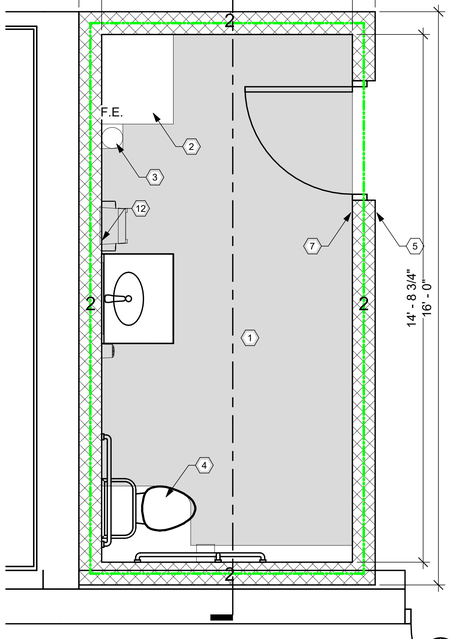
THE STORM SHELTER IS EQUIPPED WITH A MECHANICAL VENTILATION SYSTEM TO PROVIDE OUTSIDE AIR DURING USE. THE RESTROOM EXHAUST FAN INSIDE OF THE SHELTER WILL PULL OUTSIDE AIR IN AND VENTILATE EXHAUST AIR OUT. THE FAN IS POWERED THROUGH THE STORM SHELTER UPS AND WILL CONTINUE TO OPERATE IF THE BUILDING LOSES NORMAL AND GENERATOR BACKUP POWER UNDER A TORNADO STRIKE. THE STORM SHELTER HAS A DEDICATED OUTSIDE AIR INTAKE DUCT AND CONTROL DAMPER THAT IS MANUALLY CONTROLLED THROUGH A TOGGLE SWITCH. UNDER NORMAL BUILDING OPERATION, THE SWITCH SHALL REMAIN IN THE "DAMPER CLOSED" POSITION TO STOP OUTSIDE AIR INFILTRATION COMING INTO THE CONDITIONED BUILDING. WHEN THE STORM SHELTER IS IN USE DURING A TORNADO EVENT, TURN THE SWITCH TO THE "DAMPER OPEN" POSITION TO PROVIDE OUTSIDE AIR TO THE STORM SHELTER. THE OUTSIDE AIR DAMPER HAS A FAIL-SAFE BUILT INTO AUTOMATICALLY OPEN THE DAMPER IN THE EVENT OF BUILDING NORMAL AND BACKUP POWER LOSS. IF THE CONTROL SWITCH IS NOT ACTUATED PRIOR TO NORMAL AND BACKUP POWER LOSS, THE DAMPER FAIL-SAFE WILL OPEN THE DAMPER



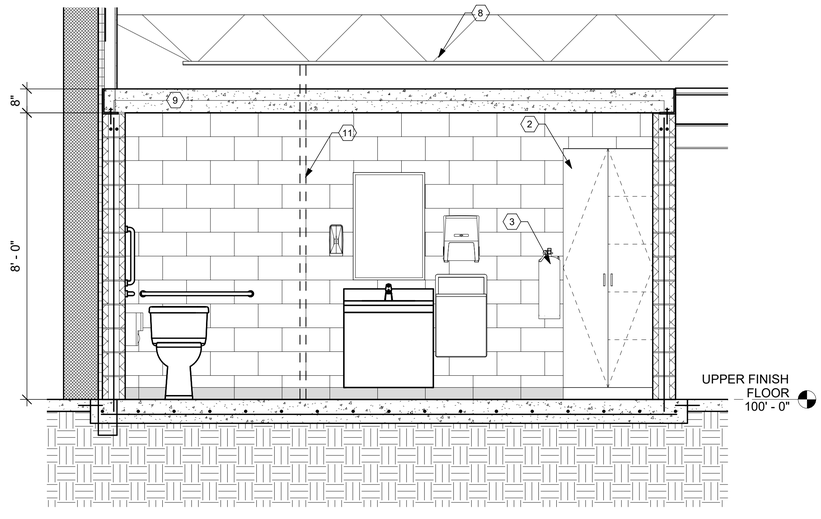
C4 NATIONAL FLOOD HAZARD FIRMETTE
NOT TO SCALE



D4 STORM SHELTER KEY PLAN
1" = 20'-0"



F2 STORM SHELTER 119 ENLARGED PLAN
1/2" = 1'-0"



F4 STORM SHELTER SECTION (SEE F5/A7.2 FOR ACCESSORIES AND DIM. INFO.)
1/2" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 SHADED AREA REPRESENTS ACTUAL CLEAR FLOOR AREA OF 87.53 SF. TOTAL ROOM AREA IS 103.10 SF.

2 STORAGE CABINET FOR WATER AND EMERGENCY SUPPLIES. REFER TO A8.1.

3 WALL MOUNTED FIRE EXTINGUISHER. REFER TO SHEET A0.1 FOR DETAILS.

4 ADA TOILET. REFER TO PLUMBING DRAWINGS AND SHEET A0.1 FOR DETAILS.

5 SIGN TYPE 5. REFER TO SIGNAGE LEGEND ON SHEET A0.3 FOR DETAILS.

6 SIGN TYPE 1. REFER TO SIGNAGE LEGEND ON SHEET A0.3 FOR DETAILS.

7 SIGN TYPE 7. REFER TO SIGNAGE LEGEND ON SHEET A0.3 FOR DETAILS.

8 CONCRETE LID IS INDEPENDENT OF ROOD STRUCTURE ABOVE. REFER TO STRUCTURAL DRAWINGS FOR DETAILS.

9 REFER TO HVAC DRAWINGS FOR DUCT PENETRATIONS. REFER TO STRUCTURAL DRAWINGS FOR SHROUD DETAILS.

10 REFER TO STRUCTURAL DRAWINGS FOR CONCRETE REBAR REINFROCEMENT DETAILS.

11 PRIVACY CUBICLE AND CURTAIN TRACK.

12 SIGN TYPE 10. REFER TO SIGNAGE LEGEND ON SHEET A0.3 FOR DETAILS.

GENERAL NOTES

A. THIS SHEET CONTAINS A GENERAL OVERVIEW OF THE TORNADO SHELTER INFORMATION. FOR FURTHER NOTES AND DETAILS REFER TO THE PERTINENT DISCIPLINE'S DRAWINGS CONTAINED IN THIS SET.

B. REFER TO STRUCTURAL DRAWINGS FOR REINFORCEMENT DETAILS.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836-8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER REGISTERED ARCHITECT 12147
Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
STORM SHELTER

SHEET NO.
G0.3

1/21/2026 9:53:07 AM

ARCHITECTURAL SPECIFICATIONS

DIVISION 00 - PROCUREMENT AND CONTRACTING REQUIREMENTS

DOCUMENT 00 2000 - INSTRUCTIONS FOR PROCUREMENT

1. REFER TO THE HARRISON TOWNSHIP REQUIREMENTS

* *

DIVISION 01 - GENERAL REQUIREMENTS

SECTION 01 1000 - SUMMARY

1. PROJECT IDENTIFICATION:
   A. PROJECT NAME: HARRISON TWP DISTRICT 10 SHERIFF SUBSTATION RENOVATION
   B. PROJECT LOCATION: 6001 N. DIXIE DR. DAYTON, OHIO 45414
   C. OWNER: HARRISON TOWNSHIP, OHIO
2. TYPE OF CONTRACT: SINGLE PRIME CONTRACT
   A. ITEM 1: BASE BID: LUMP SUM
   B. ITEM 2: PHASE II - DELETE WORK AS INDICATED
   C. ITEM 3: DELETE NEW TRANSOM WINDOWS - NORTH AND SOUTH SIDE
3. WORK PHASES:
   A. PHASE I:
      a. INTERIOR SELECTIVE DEMOLITION OF WALLS, FLOORING, CEILINGS AND CORRESPONDING PLUMBING, HVAC AND ELECTRICAL EQUIPMENT AND DEVICES.
      b. NEW WALLS, DOORS, CEILINGS, FINISHES, CASEWORK AND CORRESPONDING PLUMBING, HVAC AND ELECTRICAL EQUIPMENT AND DEVICES.
   B. PHASE II:
      a. ALT. 1 - DELETE WORK FOR THIS PHASE.
4. TIME OF COMPLETION: SINGLE PHASE BID - SIX (6) MONTHS FROM NOTICE TO PROCEED.
5. USE OF PREMISES:
   A. OWNER WILL NOT OCCUPY PREMISES DURING ENTIRE CONSTRUCTION PERIOD.
   B. ON-SITE WORK HOURS SHALL BE PERFORMED INSIDE THE BUILDING DURING NORMAL WORKING HOURS OF (7:00) A.M. TO (5:00) P.M., MONDAY THROUGH FRIDAY AND AS COORDINATED WITH OWNER.

SECTION 01 2600 - CONTRACT MODIFICATION PROCEDURES

1. MINOR CHANGES IN THE WORK: PROVIDED BY CONTRACTOR WITHOUT ADJUSTMENT TO CONTRACT SUM OR CONTRACT TIME.
2. CHANGE ORDERS PER GENERAL CONDITIONS (IN BID BOOKLET).

SECTION 01 3100 - PROJECT MANAGEMENT AND COORDINATION

1. COORDINATION: COORDINATE CONSTRUCTION OPERATIONS OF PROJECT TO ENSURE EFFICIENT AND ORDERLY INSTALLATION OF EACH PART OF THE WORK.
2. PROJECT MEETINGS:
   A. PRECONSTRUCTION CONFERENCE: PRIOR TO STARTING CONSTRUCTION.
   B. PROGRESS MEETINGS: WEEKLY, ON JOB SITE.
3. REQUEST FOR INFORMATION (RFI): SUBMIT ON APPROVED FORM WHEN NEEDED FOR ADDITIONAL INFORMATION, CLARIFICATION OR INTERPRETATION.

SECTION 01 3200 - CONSTRUCTION PROGRESS DOCUMENTATION

1. CONTRACTOR'S CONSTRUCTION SCHEDULE: BAR-CHART SCHEDULE.

SECTION 01 3300 - SUBMITTAL PROCEDURES

1. TRANSMITTAL FORM: AIA G810 (OR APPROVED EQUAL).
2. PRODUCT SUBMITTALS:
   A. PRODUCT DATA: ELECTRONIC.
   B. SHOP DRAWINGS: ELECTRONIC TO SCALE DRAWINGS.
   C. SAMPLES: (2) SETS.
3. SUBCONTRACTOR AND MATERIAL SUPPLIER LIST: IDENTIFY INDIVIDUALS OR FIRMS FOR EACH PORTION OF WORK.

SECTION 01 4200 - REFERENCES

1. APPLICABILITY OF INDUSTRY STANDARDS: UNLESS THE CONTRACT DOCUMENTS INCLUDE MORE STRINGENT REQUIREMENTS, APPLICABLE CONSTRUCTION INDUSTRY STANDARDS HAVE THE SAME FORCE AND EFFECT AS IF BOUND OR COPIED DIRECTLY INTO THE CONTRACT DOCUMENTS TO THE EXTENT REFERENCED. SUCH STANDARDS ARE MADE PART OF THE CONTRACT DOCUMENTS BY REFERENCE.
2. PUBLICATION DATES OF INDUSTRY STANDARDS: COMPLY WITH STANDARDS IN EFFECT AS OF DATE OF CONTRACT DOCUMENTS.

SECTION 01 5000 - TEMPORARY FACILITIES AND CONTROLS

1. TEMPORARY UTILITY INSTALLATION AS FOLLOWS:
   A. GENERAL: INSTALL TEMPORARY SERVICE OR CONNECT TO EXISTING SERVICE.
   B. SEWERS AND DRAINAGE: USE OWNER'S EXISTING WATER SERVICE FACILITIES.
   C. SANITARY FACILITIES: USE OWNER'S EXISTING TOILET FACILITIES. COORDINATE WITH OWNER.
   D. HEATING (AND COOLING):
      a. PROVIDE TEMPORARY HEATING (AND COOLING) REQUIRED BY CONSTRUCTION ACTIVITIES FOR CURING OR DRYING AND PROTECTION OF COMPLETED INSTALLATION OF MATERIALS AND EQUIPMENT.
      b. MAINTAIN HEATING (AND COOLING) OF AREAS NOT UNDER CONSTRUCTION TO MEET OWNER STANDARDS.
   E. VENTILATION AND HUMIDITY CONTROL: PROVIDE TEMPORARY VENTILATION REQUIRED BY CONSTRUCTION ACTIVITIES FOR CURING OR DRYING AND PROTECTION OF COMPLETED INSTALLATION OF MATERIALS AND EQUIPMENT.
   F. ELECTRIC POWER SERVICE:
      a. USE OWNER'S EXISTING POWER SERVICE AND DISTRIBUTION SYSTEM.
      b. MAINTAIN ELECTRICAL SERVICE FROM OWNER'S EXISTING POWER SERVICE IN AREAS NOT UNDER CONSTRUCTION.
   G. LIGHTING: PROVIDE TEMPORARY LIGHTING WITH LOCAL SWITCHING THAT PROVIDES ADEQUATE ILLUMINATION FOR CONSTRUCTION OPERATIONS, OBSERVATIONS, INSPECTIONS, AND TRAFFIC CONDITIONS.
   H. TELEPHONE SERVICE:
      a. MAINTAIN EXISTING TELEPHONE SERVICE IN ALL AREAS NOT UNDER CONSTRUCTION.
2. TEMPORARY EQUIPMENT INCLUDES THE FOLLOWING:
   A. FIRE EXTINGUISHERS: PORTABLE, UL RATED; WITH CLASS AND EXTINGUISHING AGENT AS REQUIRED BY LOCATIONS AND CLASSES OF FIRE EXPOSURES.
3. TEMPORARY SECURITY AND PROTECTION FACILITIES AS FOLLOWS:
   A. FENCE BARRICADES AROUND EXTERIOR.
   B. SECURED DOORS OR OPENINGS.
4. TEMPORARY SUPPORT FACILITIES AS FOLLOWS:
   A. PROJECT IDENTIFICATION SIGN(S): SIGNAGE TO IDENTIFY AREAS OF WORK AND RESTRICTED ACCESS.

SECTION 01 6000 - PRODUCT REQUIREMENTS

1. PRODUCT SUBSTITUTIONS: CONSIDERED IF APPROVED BY OWNER AND ARCHITECT.
2. GENERAL PRODUCT REQUIREMENTS: PROVIDE PRODUCTS COMPLYING WITH CONTRACT DOCUMENTS, UNDAMAGED, AND, UNLESS OTHERWISE INDICATED, ARE NEW AT TIME OF INSTALLATION.
3. PRODUCT DELIVERY, STORAGE, AND HANDLING: USE MEANS AND METHODS THAT WILL PREVENT PRODUCT DAMAGE, DETERIORATION, AND LOSS, INCLUDING THEFT.

SECTION 01 7300 - EXECUTION

1. EXAMINATION OF EXISTING CONDITIONS: INVESTIGATE AND VERIFY THE EXISTENCE AND LOCATION OF MECHANICAL AND ELECTRICAL SYSTEMS AND OTHER CONSTRUCTION, INCLUDING UNDERGROUND UTILITIES AND CONSTRUCTION, AFFECTING THE WORK.
2. ACCEPTANCE OF CONDITIONS: EXAMINE SUBSTRATES, AREAS, AND CONDITIONS, WITH INSTALLER OR APPLICATOR, FOR COMPLIANCE WITH REQUIREMENTS FOR INSTALLATION TOLERANCES AND OTHER CONDITIONS AFFECTING PERFORMANCE.
3. COORDINATE WITH AUTHORITIES HAVING JURISDICTION THE ADJUSTMENT, MOVING, OR RELOCATION OF EXISTING UTILITY SERVICES OR STRUCTURES.
4. FIELD MEASUREMENTS: TAKEN PRIOR TO INSTALLATION TO FIT THE WORK PROPERLY AND VERIFY DIMENSIONS BEFORE FABRICATION.
5. CONSTRUCTION LAYOUT: LOCATE AND LAYOUT SITE IMPROVEMENTS AND CONTROL LINES AND LEVELS FOR BUILDING STRUCTURE.
6. FIELD ENGINEERING: LOCATE, ESTABLISH, AND MAINTAIN BENCHMARKS, CONTROL POINTS, AND SIMILAR REFERENCE POINTS PRIOR TO AND DURING CONSTRUCTION OPERATIONS.
7. INSTALLATION: LOCATE THE WORK AND COMPONENTS ACCURATELY, IN CORRECT ALIGNMENT AND ELEVATION, AND IN ACCORDANCE WITH MANUFACTURER'S WRITTEN INSTRUCTIONS AND RECOMMENDATIONS FOR INSTALLING PRODUCTS IN APPLICATIONS INDICATED.
8. PROGRESS CLEANING: CLEAN PROJECT SITE AND WORK AREAS DAILY, INCLUDING COMMON AREAS. COORDINATE PROGRESS CLEANING FOR JOINT-AREAS WHERE MORE THAN ONE INSTALLER HAS WORKED. MAINTAIN PROJECT SITE FREE OF WASTE MATERIALS AND DEBRIS. BURYING OR BURNING OF WASTE MATERIALS ON-SITE NOT PERMITTED.
9. START EQUIPMENT AND OPERATING COMPONENTS TO CONFIRM PROPER OPERATION. REMOVE MALFUNCTIONING UNITS, REPLACE WITH NEW UNITS AND RETEST.
10. CORRECTION OF WORK: REPAIR OR REMOVE AND REPLACE DEFECTIVE CONSTRUCTION.

SECTION 01 7329 - CUTTING AND PATCHING

1. PROVIDE TEMPORARY SUPPORT OF WORK TO BE CUT.
2. CUT IN PLACE CONSTRUCTION USING METHODS LEAST LIKELY TO DAMAGE ELEMENTS RETAINED OR ADJOINING CONSTRUCTION.
3. CUT OFF PIPE OR CONDUIT IN WALLS OR PARTITIONS TO BE REMOVED. CAP, VALVE, OR PLUG AND SEAL REMAINING PORTION OF PIPE OR CONDUIT.
4. PATCH CONSTRUCTION BY FILLING, REPAIRING, REFINISHING, CLOSING UP, AND SIMILAR OPERATIONS FOLLOWING PERFORMANCE OF OTHER WORK. PATCH WITH DURABLE SEAMS THAT ARE AS INVISIBLE AS POSSIBLE.

SECTION 01 7419 - CONSTRUCTION WASTE MANAGEMENT AND DISPOSAL

1. DISPOSAL OF WASTE: REMOVE WASTE MATERIALS FROM PROJECT SITE AND LEGALLY DISPOSE OFF SITE. DO NOT BURN WASTE MATERIALS.

SECTION 01 7700 - CLOSEOUT PROCEDURES

1. SUBMIT LIST OF ITEMS TO BE COMPLETED AND CORRECTED AND WRITTEN REQUEST FOR AN INSPECTION. COMPLETE AND CORRECT ITEMS ON PUNCH LIST.
2. FINAL CLEANING: CLEAN EACH SURFACE OR UNIT TO CONDITION EXPECTED IN AN AVERAGE COMMERCIAL BUILDING CLEANING AND MAINTENANCE PROGRAM. COMPLY WITH MANUFACTURER'S WRITTEN INSTRUCTIONS. REMOVE DEBRIS AND SURFACE DUST, CLEAN GLASS, REMOVE SOILS AND STAINS, CLEAN LIGHT LENSES AND DUCTWORK, AND REPLACE AIR FILTERS AND LIGHT BULBS USED DURING CONSTRUCTION.
3. WARRANTIES: SUBMIT WRITTEN WARRANTIES FOR DESIGNATED PORTIONS OF WORK.

SECTION 01 7823 - OPERATION AND MAINTENANCE DATA

1. OPERATION AND MAINTENANCE MANUALS:
   A. (2) SETS (BINDERS WITH TABLE OF CONTENTS) FOR SYSTEMS, SUBSYSTEMS, AND EQUIPMENT.
   B. (1) ELECTRONIC COPY; BOOKMARKED .PDF.
2. EMERGENCY MANUALS:
   A. (2) SETS (BINDERS WITH TABLE OF CONTENTS) FOR INSTRUCTIONS AND PROCEDURE FOR EMERGENCIES (FIRE, FLOOD, GAS LEAK, WATER LEAK, POWER FAILURE, WATER OUTAGE, ETC.)
   B. (1) ELECTRONIC COPY; BOOKMARKED .PDF.

SECTION 01 7839 - PROJECT RECORD DOCUMENTS

1. RECORD DRAWINGS: (1) SET MARKED TO SHOW ACTUAL INSTALLATION WHERE VARIES FROM ORIGINAL.
2. RECORD SPECIFICATIONS: (1) SET MARKED TO INDICATE ACTUAL PRODUCT INSTALLATION WHERE VARIES FROM ORIGINAL. (INCLUDE COPIES OF ADDENDA AND CHANGE ORDERS).

* *

DIVISION 02 - EXISTING CONDITIONS

SECTION 02 4119 - SELECTIVE STRUCTURE DEMOLITION

1. SELECTIVE DEMOLITION: DEMOLISH AND REMOVE EXISTING CONSTRUCTION ONLY TO THE EXTENT REQUIRED BY NEW CONSTRUCTION AND AS INDICATED ON DRAWINGS. USE METHODS REQUIRED TO COMPLETE THE WORK WITHIN LIMITATIONS OF GOVERNING REGULATIONS.
2. MAINTAIN UTILITY SERVICES AND MECHANICAL/ELECTRICAL SYSTEMS TO REMAIN AND PROTECT THEM AGAINST DAMAGE DURING SELECTIVE DEMOLITION OPERATIONS.
3. PROVIDE AND MAINTAIN SHORING, BRACING, AND STRUCTURAL SUPPORTS TO PRESERVE STABILITY AND PREVENT MOVEMENT, SETTLEMENT, OR COLLAPSE OF CONSTRUCTION AND FINISHES TO REMAIN.
4. EXCEPT FOR ITEMS TO BE REUSED, SALVAGED, OR REINSTALLED, REMOVE DEMOLISHED MATERIALS FROM PROJECT SITE AND LEGALLY DISPOSE.

* *

DIVISION 03 - CONCRETE

SECTION 033000 - CAST-IN-PLACE CONCRETE

1. CONCRETE WORK SHALL BE ACCOMPLISHED IN ACCORDANCE WITH THE LATEST "AMERICAN CONCRETE INSTITUTE" RECOMMENDATIONS.
2. CONCRETE MIXES FOR BUILDING ELEMENTS: SUPPORTED SLABS, BEAMS: (4000) PSI U.N.O. STRUCTURAL DRAWINGS.
3. FINISHING FORMED SURFACES: EXPOSED WALLS AND OTHER SURFACES SHALL RECEIVE SMOOTH-FORMED FINISH.
4. FINISHING FLOORS AND SLABS: APPLY TROWEL FINISH TO SURFACES EXPOSED TO VIEW AND TO BE COVERED WITH FINISH FLOORING MATERIAL. APPLY CURING AND SEALING COMPOUND UNIFORMLY TO FLOORS.

* *

DIVISION 04 - MASONRY

SECTION 042000 - UNIT MASONRY

1. CONCRETE MASONRY UNITS: ASTM C 90 WITH UNIT COMPRESSIVE STRENGTH OF (1900) PSI, WEIGHT CLASSIFICATION OF (NORMAL WEIGHT), AND SIZED 3/8" LESS THAN NOMINAL DIMENSIONS.
2. MORTAR:
   A. MATERIALS: PORTLAND CEMENT, HYDRATED LIME, AGGREGATES AND WATER.
   B. MIXES: COMPLY WITH ASTM C 270; TYPE N.
3. TIES AND ANCHORS: HOT-DIPPED GALVANIZED STEEL WIRE OR SHEET, ADJUSTABLE ANCHORS.

* *

DIVISION 06 - WOOD, PLASTICS, AND COMPOSITES

SECTION 06 4116 - PLASTIC-LAMINATE-FACED ARCHITECTURAL CABINETS

1. ACTION SUBMITTALS
   A. PRODUCT DATA: FOR EACH TYPE OF PRODUCT, INCLUDING, PANEL PRODUCTS, HIGH-PRESSURE DECORATIVE LAMINATE, ADHESIVE FOR BONDING PLASTIC LAMINATE, CABINET HARDWARE AND ACCESSORIES.
   B. SHOP DRAWINGS: SHOW LOCATION OF EACH ITEM, DIMENSIONED PLANS AND ELEVATIONS, LARGE-SCALE DETAILS, ATTACHMENT DEVICES, AND OTHER COMPONENTS.
      a. SHOW DETAILS FULL SIZE.
      b. SHOW LOCATIONS AND SIZES OF FURRING, BLOCKING, AND HANGING STRIPS, INCLUDING CONCEALED BLOCKING AND REINFORCEMENT SPECIFIED IN OTHER SECTIONS.
      c. SHOW LOCATIONS AND SIZES OF CUTOUTS AND HOLES FOR AND OTHER ITEMS INSTALLED IN ARCHITECTURAL PLASTIC-LAMINATE CABINETS.
      d. APPLY AWI QUALITY CERTIFICATION PROGRAM LABEL TO SHOP DRAWINGS.
   C. SAMPLES FOR VERIFICATION:
      a. WOOD-GRAIN PLASTIC LAMINATES, 8 X 10 INCHES, FOR EACH TYPE, PATTERN AND SURFACE FINISH.
2. INFORMATIONAL SUBMITTALS
   A. QUALIFICATION DATA: FOR FABRICATOR.
   B. SINGLE SOURCE RESPONSIBILITY: PROVIDE AND INSTALL THIS WORK FROM A SINGLE FABRICATOR.
3. QUALITY ASSURANCE
   A. FABRICATOR QUALIFICATIONS: SHOP THAT EMPLOYS SKILLED WORKERS WHO CUSTOM FABRICATE PRODUCTS SIMILAR TO THOSE REQUIRED FOR THIS PROJECT.
4. FIELD CONDITIONS
   A. ENVIRONMENTAL LIMITATIONS: DO NOT DELIVER OR INSTALL CABINETS UNTIL BUILDING IS ENCLOSED, WET WORK IS COMPLETE, AND HVAC SYSTEM IS OPERATING AND MAINTAINING TEMPERATURE BETWEEN 60 AND 90 DEG F (16 AND 32 DEG C) AND RELATIVE HUMIDITY BETWEEN 25 AND 55 PERCENT DURING THE REMAINDER OF THE CONSTRUCTION PERIOD.
   B. FIELD MEASUREMENTS: WHERE CABINETS ARE INDICATED TO FIT TO OTHER CONSTRUCTION, VERIFY DIMENSIONS OF OTHER CONSTRUCTION BY FIELD MEASUREMENTS BEFORE FABRICATION, AND INDICATE MEASUREMENTS ON SHOP DRAWINGS. COORDINATE FABRICATION SCHEDULE WITH CONSTRUCTION PROGRESS TO AVOID DELAYING THE WORK.
      a. LOCATE CONCEALED FRAMING, BLOCKING, AND REINFORCEMENTS THAT SUPPORT CABINETS BY FIELD MEASUREMENTS BEFORE BEING ENCLOSED, AND INDICATE MEASUREMENTS ON SHOP DRAWINGS.
   C. ESTABLISHED DIMENSIONS: WHERE CABINETS ARE INDICATED TO FIT TO OTHER CONSTRUCTION, ESTABLISH DIMENSIONS FOR AREAS WHERE CABINETS ARE TO FIT. PROVIDE ALLOWANCE FOR TRIMMING AT SITE, AND COORDINATE CONSTRUCTION TO ENSURE THAT ACTUAL DIMENSIONS CORRESPOND TO ESTABLISHED DIMENSIONS.
5. COORDINATION
   A. COORDINATE SIZES AND LOCATIONS OF FRAMING, BLOCKING, FURRING, REINFORCEMENTS, AND OTHER RELATED UNITS OF WORK SPECIFIED IN OTHER SECTIONS TO ENSURE THAT CABINETS CAN BE SUPPORTED AND INSTALLED AS INDICATED.
6. PRODUCTS - PLASTIC-LAMINATE-FACED ARCHITECTURAL CABINETS
   A. QUALITY STANDARD: UNLESS OTHERWISE INDICATED, COMPLY WITH THE "ARCHITECTURAL WOODWORK STANDARDS" FOR GRADES OF ARCHITECTURAL PLASTIC-LAMINATE CABINETS INDICATED FOR CONSTRUCTION, FINISHES, INSTALLATION, AND OTHER REQUIREMENTS.
   B. GRADE: PREMIUM.
   C. TYPE OF CONSTRUCTION: FRAMELESS.
   D. CABINET, DOOR, AND DRAWER FRONT INTERFACE STYLE: FLUSH OVERLAY.
   E. HIGH-PRESSURE DECORATIVE LAMINATE: NEMA LD 3, GRADES AS INDICATED OR IF NOT INDICATED, AS REQUIRED BY WOODWORK QUALITY STANDARD.
      a. MANUFACTURERS: SUBJECT TO COMPLIANCE WITH REQUIREMENTS, PROVIDE PRODUCTS AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
   F. LAMINATE CLADDING FOR EXPOSED SURFACES:
      a. HORIZONTAL SURFACES: GRADE HGS.
      b. VERTICAL SURFACES: GRADE VGS.
      c. EDGES: 3MM MATCHING LAMINATE IN COLOR, PATTERN, AND FINISH.
      d. PATTERN DIRECTION: VERTICALLY FOR DRAWER FRONTS, DOORS, AND FIXED PANELS.
   G. MATERIALS FOR SEMIEXPOSED SURFACES:
      a. SURFACES OTHER THAN DRAWER BODIES: HIGH-PRESSURE DECORATIVE LAMINATE, NEMA LD 3, GRADE VGS.
         1. EDGES OF PLASTIC-LAMINATE SHELVES: PVC EDGE BANDING, 0.12 INCH (3 MM) THICK, MATCHING LAMINATE IN COLOR, PATTERN, AND FINISH.
         2. FOR SEMIEXPOSED BACKS OF PANELS WITH EXPOSED PLASTIC-LAMINATE SURFACES, PROVIDE SURFACE OF HIGH-PRESSURE DECORATIVE LAMINATE, NEMA LD 3, GRADE VGS.
   H. CONCEALED BACKS OF PANELS WITH EXPOSED PLASTIC-LAMINATE SURFACES: HIGH-PRESSURE DECORATIVE LAMINATE, NEMA LD 3, GRADE BKL.
   I. COLORS, PATTERNS, AND FINISHES: PROVIDE MATERIALS AND PRODUCTS THAT RESULT IN COLORS AND TEXTURES OF EXPOSED LAMINATE SURFACES COMPLYING WITH THE FOLLOWING REQUIREMENTS:
      a. MATCH ARCHITECT'S SAMPLE.
   J. CABINET HARDWARE:
      a. HINGES: 2 1/2 INCH, 5-KNUCKLE STEEL HINGES MADE FROM 0.093 INCH THICK METAL AS FOLLOWS:
         - PRODUCT: ROCKFORD PROCESS CONTROL (RPC) MODEL NO. 376-101 WITH HOSPITAL TIP NON-REMOVABLE PIN.
         - SEMICONCEALED HINGES FOR FLUSH OVERLAY DOORS: BAMA A156.9.
         - FINISH: 26D DULL CHROME
      b. (KITCHENETTES AND BREAK ROOMS ONLY) FRAMELESS CONCEALED HINGES (EUROPEAN TYPE): BHMA A156.9, TYPE B01602, 125 DEGREES OF OPENING, SELF-CLOSING. PROVIDE TWO HINGES FOR DOORS LESS THAN 48 INCHES HIGH, AND PROVIDE THREE HINGES FOR DOORS MORE THAN 48 INCHES HIGH.
      c. DOOR AND DRAWER PULLS: BACK MOUNTED, SOLID METAL, 6 INCHES LONG, 5/16" IN DIAMETER, LANSA BY IKEA.
      d. ADJUSTABLE SHELF STANDARDS AND SUPPORTS: KNAPE AND VOGT #255 STEEL STANDARDS AND #256 STEEL SUPPORTS.
      e. CLOSET SHELF STANDARDS AND SUPPORTS: KNAPE AND VOGT KV185 HEAVY DUTY DOUBLE SLOTTED SHELF BRACKETS AND KV85 HEAVY DUTY DOUBLE SLOTTED SHELF STANDARDS.
      f. DRAWER SLIDES: BHMA A156.9, B05091
         - (KITCHENETTES AND BREAK ROOMS ONLY) HEAVY DUTY (GRADE 1HD-100 AND GRADE 1HD-200); CONCEALED UNDERMOUNT; FULLOVERTRAVEL- EXTENSION TYPE; ZINCPLATED STEEL BALL-BEARING SLIDES; INTEGRATED SOFT-CLOSE; AIR DAMPENING.
      g. EXPOSED HARDWARE FINISHES: FOR EXPOSED HARDWARE, PROVIDE FINISH THAT COMPLIES WITH BHMA A156.9 FOR BHMA FINISH NUMBER INDICATED.
         - SATIN CHROMIUM PLATED: BHMA 626 FOR BRASS OR BRONZE BASE; BHMA 652 FOR STEEL BASE.
7. SOLID SURFACE COUNTERTOP MATERIALS
   A. SOLID SURFACE MATERIAL: HOMOGENEOUS-FILLED PLASTIC RESIN COMPLYING WITH ICPA SS-1.
      A. MANUFACTURER: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      B. TYPE: PROVIDE STANDARD TYPE UNLESS SPECIAL PURPOSE TYPE IS INDICATED.
      C. INTEGRAL SINK BOWLS: COMPLY WITH CSA B45.5/IAPMO Z124. PROVIDE MODELS/SIZES INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      D. COLORS AND PATTERNS: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
   B. COUNTERTOP FABRICATION
      A. FABRICATE COUNTERTOPS ACCORDING TO SOLID SURFACE MATERIAL MANUFACTURER'S WRITTEN INSTRUCTIONS AND TO THE AWI/AWMAC/WI'S "ARCHITECTURAL WOODWORK STANDARDS."
         1. GRADE: PREMIUM.
      B. CONFIGURATION:
         1. FRONT: FABRICATE TOPS WITH SHOP-APPLIED EDGES OF MATERIALS AND CONFIGURATION INDICATED ON THE DRAWINGS.
         2. BACKSPLASH: SET ON BACKSPLASHES AND SIDE SPLASHES. PROVIDE WITH COVED CORNER TRIM UNITS FOR JOINING BACK AND SIDE SPLASHES FOR SEAMLESS FABRICATION.
         3. END SPLASH: MATCHING BACKSPLASH.
      C. COUNTERTOPS: 1/2-INCH- (12.7-MM-) THICK, SOLID SURFACE MATERIAL WITH FRONT EDGE BUILT UP WITH SAME MATERIAL.
      D. BACKSPLASHES: 1/2-INCH- (12.7-MM-) THICK, SOLID SURFACE MATERIAL.
      E. FABRICATE TOPS WITH SHOP-APPLIED EDGES AND BACKSPLASHES UNLESS OTHERWISE INDICATED. COMPLY WITH SOLID SURFACE MATERIAL MANUFACTURER'S WRITTEN INSTRUCTIONS FOR ADHESIVES, SEALERS, FABRICATION, AND FINISHING.
         1. INSTALL INTEGRAL SINK BOWLS IN COUNTERTOPS IN THE SHOP.
8. WOOD MATERIALS
   A. WOOD PRODUCTS: PROVIDE MATERIALS THAT COMPLY WITH REQUIREMENTS OF REFERENCED QUALITY STANDARD FOR EACH TYPE OF WOODWORK AND QUALITY GRADE SPECIFIED UNLESS OTHERWISE INDICATED.
      a. WOOD MOISTURE CONTENT: 5 TO 10 PERCENT.
   B. COMPOSITE WOOD AND AGRIFIBER PRODUCTS: PROVIDE MATERIALS THAT COMPLY WITH REQUIREMENTS OF REFERENCED QUALITY STANDARD FOR EACH TYPE OF WOODWORK AND QUALITY GRADE SPECIFIED UNLESS OTHERWISE INDICATED.
      a. MEDIUM-DENSITY FIBERBOARD: ANSI A208.2, MD.
      b. PARTICLEBOARD: ANSI A208.1, GRADE M-2.
      c. SOFTWOOD PLYWOOD: DOC PS 1, MEDIUM-DENSITY OVERLAY.
      d. VENEER-FACED PANEL PRODUCTS (HARDWOOD PLYWOOD): HPVA HP-1.
9. FABRICATION
   A. FABRICATE CABINETS TO DIMENSIONS, PROFILES, AND DETAILS INDICATED.
   B. COMPLETE FABRICATION, INCLUDING ASSEMBLY AND HARDWARE APPLICATION, TO MAXIMUM EXTENT POSSIBLE BEFORE SHIPMENT TO PROJECT SITE. DISASSEMBLE COMPONENTS ONLY AS NECESSARY FOR SHIPMENT AND INSTALLATION. WHERE NECESSARY FOR FITTING AT SITE, PROVIDE AMPLE ALLOWANCE FOR SCRIBING, TRIMMING, AND FITTING.
      a. SHOP-CUT OPENINGS TO MAXIMUM EXTENT POSSIBLE TO RECEIVE HARDWARE, APPLIANCES, ELECTRICAL WORK, AND SIMILAR ITEMS. LOCATE OPENINGS ACCURATELY AND USE TEMPLATES OR ROUGHING-IN DIAGRAMS TO PRODUCE ACCURATELY SIZED AND SHAPED OPENINGS. SAND EDGES OF CUTOUTS TO REMOVE SPLINTERS AND BURRS.
10. INSTALLATION PREPARATION
    A. BEFORE INSTALLATION, CONDITION CABINETS TO AVERAGE PREVAILING HUMIDITY CONDITIONS IN INSTALLATION AREAS.
    B. BEFORE INSTALLING CABINETS, EXAMINE SHOP-FABRICATED WORK FOR COMPLETION AND COMPLETE WORK AS REQUIRED.
11. INSTALLATION
    A. GRADE: INSTALL CABINETS TO COMPLY WITH SAME GRADE AS ITEM TO BE INSTALLED.
    B. ASSEMBLE CABINETS AND COMPLETE FABRICATION AT PROJECT SITE TO THE EXTENT THAT IT WAS NOT COMPLETED IN THE SHOP.
    C. INSTALL CABINETS LEVEL, PLUMB, TRUE, AND STRAIGHT. SHIM AS REQUIRED WITH CONCEALED SHIMS. INSTALL LEVEL AND PLUMB TO A TOLERANCE OF 1/8 INCH IN 96 INCHES (3 MM IN 2400 MM).
    D. SCRIBE AND CUT CABINETS TO FIT ADJOINING WORK, REFINISH CUT SURFACES, AND REPAIR DAMAGED FINISH AT CUTS.
    E. ANCHOR CABINETS TO ANCHORS OR BLOCKING BUILT IN OR DIRECTLY ATTACHED TO SUBSTRATES. SECURE WITH COUNTERSUNK, CONCEALED FASTENERS AND BLIND NAILING. USE FINE FINISHING NAILS OR FINISHING SCREWS FOR EXPOSED FASTENING, COUNTERSUNK AND FILLED FLUSH WITH WOODWORK.
       a. USE FILLER MATCHING FINISH OF ITEMS BEING INSTALLED.
    F. CABINETS: INSTALL WITHOUT DISTORTION SO DOORS AND DRAWERS FIT OPENINGS PROPERLY AND ARE ACCURATELY ALIGNED. ADJUST HARDWARE TO CENTER DOORS AND DRAWERS IN OPENINGS AND TO PROVIDE UNENCUMBERED OPERATION. COMPLETE INSTALLATION OF HARDWARE AND ACCESSORY ITEMS AS INDICATED.
       a. INSTALL CABINETS WITH NO MORE THAN 1/8 INCH IN 96-INCH (3 MM IN 2400-MM) SAG, BOW, OR OTHER VARIATION FROM A STRAIGHT LINE.
       b. FASTEN WALL CABINETS THROUGH BACK, NEAR TOP AND BOTTOM, AND AT ENDS NOT MORE THAN 16 INCHES (400 MM) O.C. WITH NO. 10 WAFER-HEAD SHEET METAL SCREWS THROUGH METAL BACKING OR METAL FRAMING BEHIND WALL FINISH.
12. ADJUSTING AND CLEANING
    A. REPAIR DAMAGED AND DEFECTIVE CABINETS, WHERE POSSIBLE, TO ELIMINATE FUNCTIONAL AND VISUAL DEFECTS; WHERE NOT POSSIBLE TO REPAIR, REPLACE WOODWORK. ADJUST JOINERY FOR UNIFORM APPEARANCE.
    B. CLEAN, LUBRICATE, AND ADJUST HARDWARE.
    C. CLEAN CABINETS ON EXPOSED AND SEMIEXPOSED SURFACES.

* *

DIVISION 07 - THERMAL AND MOISTURE PROTECTION

SECTION 07 2100 - THERMAL INSULATION

1. GENERAL
   A. BATT INSULATION FOR FILLING PERIMETER WINDOW AND DOOR SHIM SPACES AND CREVICES IN EXTERIOR WALL.
   B. BOARD INSULATION AT EXTERIOR WALLS.
2. PRODUCTS
   A. APPLICATIONS
      a. INSULATION OVER METAL STUD FRAMED WALLS, CONTINUOUS: EXTRUDED POLYSTYRENE (XPS) BOARD.
      b. INSULATION IN METAL FRAMED WALLS: BATT INSULATION WITH SEPARATE VAPOR RETARDER.
   B. FOAM BOARD INSULATION MATERIALS
      a. EXTRUDED POLYSTYRENE (XPS) BOARD INSULATION: COMPLY WITH ASTM C578 WITH EITHER NATURAL SKIN OR CUT CELL SURFACES.
      b. TYPE AND COMPRESSIVE RESISTANCE: TYPE XII 15 PSI (104 KPA), MINIMUM.
      c. FLAME SPREAD INDEX (FDI): CLASS A - 0 TO 25, WHEN TESTED IN ACCORDANCE WITH ASTM E84.
      d. SMOKE DEVELOPED INDEX (SDI): 450 OR LESS, WHEN TESTED IN ACCORDANCE WITH ASTM E84.
   C. MINERAL FIBER BLANKET INSULATION MATERIALS
      a. FLEXIBLE GLASS FIBER BLANKET THERMAL INSULATION: PREFORMED INSULATION, COMPLYING WITH ASTM C665: FRICTION FIT.
      b. FLAME SPREAD INDEX: 25 OR LESS, WHEN TESTED IN ACCORDANCE WITH ASTM E84.
      c. SMOKE DEVELOPED INDEX: 50 OR LESS, WHEN TESTED IN ACCORDANCE WITH ASTM E84.
      d. COMBUSTIBILITY: NON-COMBUSTIBLE, WHEN TESTED IN ACCORDANCE WITH ASTM E136, EXCEPT FOR FACING IF ANY.
3. EXECUTION
   A. EXAMINATION
      a. VERIFY THAT SUBSTRATE, ADJACENT MATERIALS, AND INSULATION MATERIALS ARE DRY AND THAT SUBSTRATES ARE READY TO RECEIVE INSULATION AND ADHESIVE.

SECTION 07 9200 - JOINT SEALANTS

1. MAINTAIN WATERTIGHT AND AIRTIGHT CONTINUOUS SEALS WITHOUT STAINING OR DETERIORATING ADJOINING SUBSTRATES.
2. MATERIALS: COMPATIBLE WITH ONE ANOTHER AND WITH SUBSTRATES UNDER CONDITIONS OF SERVICE AND APPL

ARCHITECTURAL SPECIFICATIONS

DIVISION 09 - FINISHES

SECTION 09 2216 - NON-STRUCTURAL METAL FRAMING

1. FRAMING MEMBERS, GENERAL: COMPLY WITH ASTM C 754 FOR CONDITIONS INDICATED.
   A. STEEL SHEET COMPONENTS: ASTM C 645.
   B. PROTECTIVE COATING: ASTM A 653/A 653M G40, HOT-DIP GALVANIZED.
2. SUSPENSION SYSTEM COMPONENTS:
   A. TIE WIRE: ASTM A 641/A, CLASS 1, ZINC COATING, 0.0625".
   B. WIRE HANGERS: ASTM A 641/A, CLASS 1, ZINC COATING, 0.162".
   C. CARRYING CHANNELS: COLD-ROLLED, STEEL SHEET, 0.0538" WITH MINIMUM 1/2" FLANGES.
   D. FURRING CHANNELS: COLD-ROLLED, STEEL SHEET, 0.0538" WITH MINIMUM 1/2" FLANGES, 3/4" DEEP.
   E. HAT-SHAPED RIGID FURRING CHANNELS: ASTM C 645, 7/8".
3. STEEL FRAMING FOR FRAMED ASSEMBLIES:
   A. STEEL STUDS AND RUNNERS: ASTM C 645. (0.0312, 20 GAUGE), (1-5/8" AND 6") DEPTH (AND SLIP-TYPE HEAD JOINTS).
   B. RESILIENT FURRING CHANNELS: 1/2" DEEP, ASYMMETRICAL.
   C. COLD-ROLLED FURRING CHANNELS: 0.053", WITH 1/2" FLANGES AND 3/4" DEEP (UNLESS OTHERWISE INDICATED).
4. INSTALLATION STANDARD: ASTM C 754 AND (ASTM C 840 FOR GYPSUM BOARD ASSEMBLIES). INSTALL FRAMING AND BLOCKING TO SUPPORT FIXTURES, EQUIPMENT SERVICES, GRAB BARS, TOILET ACCESSORIES, OR SIMILAR CONSTRUCTION. INSTALL STUDS AT 16" O.C.

SECTION 09 2900 - GYPSUM BOARD

1. INTERIOR GYPSUM BOARD: ASTM A 36.
   A. TYPICAL CONDITIONS: 5/8" TYPE X.
   B. WET WALLS: 5/8" TYPE X, MOISTURE AND MOLD RESISTANT.
   C. FIRE WALLS: 5/8" TYPE C.
2. AUXILIARY MATERIALS:
   A. JOINT TREATMENT: JOINT TAPE AND COMPOUND FOR APPROPRIATE MATERIALS & APPLICATION.
   B. TRIM ACCESSORIES: CONTROL JOINTS, CORNER BEADS,BULLNOSE BEADS, AND EDGE BEADS.
   C. FASTENERS: STEEL DRILL SCREWS, ASTM C 100 (LAMINATING ADHESIVE FOR DIRECT ADHERENCE).
   D. SOUND ATTENUATION BLANKETS: (2') ASTM C 665, TYPE I.
3. APPLICATION AND FINISH: COMPLY WITH ASTM C 840. (SINGLE-LAYER) APPLICATION WITH EDGE AND END JOINTS OVER SUPPORTS AND VERTICAL JOINTS STAGGERED ON OPPOSITE SIDES OF PARTITIONS. ATTACH TRIM ACCORDING TO MANUFACTURER'S WRITTEN INSTRUCTIONS. FINISH BOARD IN CONCEALED AREAS TO LEVEL 1 AND TO LEVEL 4 IN EXPOSED AREAS.

SECTION 09 3013 - CERAMIC TILING

1. TILE PRODUCTS
   A. TILE TYPE (PT-1): COLORBODY PORCELAIN TILE FOR FLOORS.
      a. MANUFACTURERS: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      B. COMPOSITION: PORCELAIN.
      C. FACE SIZE: 12" X 24".
      D. FACE: PATTERN OF DESIGN INDICATED, WITH SQUARE EDGES.
      E. SURFACE: SLIP-RESISTANT.
      F. TILE COLOR, PATTERN, AND FINISH: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      G. GROUT COLOR: AS SELECTED BY ARCHITECT FROM MANUFACTURER'S FULL RANGE.
   B. TILE TYPE (PT-2, PWT-1): COLORBODY PORCELAIN TILE FOR FLOORS AND WALLS.
      a. MANUFACTURERS: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      B. COMPOSITION: PORCELAIN.
      C. FACE SIZE: 12" X 12".
      D. FACE: PATTERN OF DESIGN INDICATED, WITH SQUARE EDGES.
      E. SURFACE: SLIP-RESISTANT.
      F. TILE COLOR, PATTERN, AND FINISH: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      g. GROUT COLOR: AS SELECTED BY ARCHITECT FROM MANUFACTURER'S FULL RANGE.
   C. TILE TYPE (PT-3, PWT-2): COLORBODY PORCELAIN TILE FOR FLOORS AND WALLS.
      a. MANUFACTURERS: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      B. COMPOSITION: PORCELAIN.
      C. FACE SIZE: MOSAIC TILES ON 12" X 12" SHEET.
      D. FACE: PATTERN OF DESIGN INDICATED, WITH SQUARE EDGES.
      E. SURFACE: SLIP-RESISTANT.
      F. TILE COLOR, PATTERN, AND FINISH: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      g. GROUT COLOR: AS SELECTED BY ARCHITECT FROM MANUFACTURER'S FULL RANGE.
   D. TILE TYPE (PTWB): COLORBODY PORCELAIN TILE FOR FLOORS AND WALLS.
      a. MANUFACTURERS: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      B. COMPOSITION: PORCELAIN.
      C. FACE SIZE: 6" X 12".
      D. FACE: PATTERN OF DESIGN INDICATED, WITH SQUARE EDGES.
      E. SURFACE: SLIP-RESISTANT.
      F. TILE COLOR, PATTERN, AND FINISH: AS INDICATED ON THE MATERIAL LEGEND ON THE DRAWINGS.
      g. GROUT COLOR: AS SELECTED BY ARCHITECT FROM MANUFACTURER'S FULL RANGE.
2. OTHER MATERIALS:
   A. SETTING AND GROUTING MATERIALS: LARGE FORMAT, THIN-SET MORTAR: POLYMER-MODIFED MORTAR, MAPEI KERAFLEX PLUS. READY-TO -USE SPECIALTY GROUT, WITH COLOR-COATED QUARTZ AGGREGATE, MAPEI FLEXCOLOR CQ.
   B. ELASTOMERIC SEALANTS: (ONE-PART, MILDEW-RESISTANT SILICONE SEALANT,ASTM C 290, TYPE S, GRADE NS, CLASS 25 (DOW 786 OR PECORA 898)).
   C. CEMENTITIOUS BACKER UNITS: (1/2") THICK, ANSI A118.9 (USG DUROCK OR G-P DENS-SHIELD).
   D. WATERPROOFING MEMBRANE: NONE REQUIRED.
   E. METAL EDGE STRIPS: ANGLE OR L-SHAPE, HEIGHT TO MATCH TILE AND SETTING-BED THICKNESS, METALLIC OR COMBINATION OF METAL AND PVC OR NEOPRENE BASE, DESIGNED SPECIFICALLY FOR FLOORING APPLICATIONS; EXPOSED-EDGE MATERIAL:
      A. MANUFACTURER: SUBJECT TO COMPLIANCE WITH REQUIREMENTS, PROVIDE THE FOLLOWING:
         1. SCHLUTER.
      B. STYLE: SCHIENE, SATIN ANODIZED ALUMINUM.
   F. METAL REDUCER STRIPS: HEIGHT TO MATCH TILE AND SETTING-BED THICKNESS, METALLIC OR COMBINATION OF METAL AND PVC OR NEOPRENE BASE, DESIGNED SPECIFICALLY FOR FLOORING APPLICATIONS; EXPOSED-EDGE MATERIAL:
      A. MANUFACTURER: SUBJECT TO COMPLIANCE WITH REQUIREMENTS, PROVIDE THE FOLLOWING:
         1. SCHLUTER.
      B. STYLE:
         1. SCHIENE, SATIN ANODIZED ALUMINUM.
         2. ADA COMPLIANT
   G. TILE CLEANER: A NEUTRAL CLEANER CAPABLE OF REMOVING SOIL AND RESIDUE WITHOUT HARMING TILE AND GROUT SURFACES, SPECIFICALLY APPROVED FOR MATERIALS AND INSTALLATIONS INDICATED BY TILE AND GROUT MANUFACTURERS.
3. INSTALLATION:
   A. COMPLY WITH APPLICABLE PARTS OF ANSI A108 SERIES "SPECIFICATIONS FOR INSTALLATION OF CERAMIC TILE AND TCA'S "HANDBOOK FOR CERAMIC TILE INSTALLATION" PROVIDE EXPANSION, CONTROL, AND ISOLATION JOINTS.
      a. INTERIOR FLOOR INSTALLATION ON CONCRETE: THIN-SET SETTING MORTAR AND GROUT DESIGNED FOR LARGE FORMAT TILE.
      b. WALL TILE INSTALLATION: THIN-SET, ORGANIC ADHESIVE, ANSI A108.4.
   B. PREINSTALLATION MEETING REQUIRED PRIOR TO TILE INSTALLATION.
4. CLEANING AND PROTECTING
   A. CLEANING: ON COMPLETION OF PLACEMENT AND GROUTING, CLEAN ALL CERAMIC TILE SURFACES SO THEY ARE FREE OF FOREIGN MATTER.
      a. REMOVE GROUT RESIDUE FROM TILE AS SOON AS POSSIBLE.
      b. CLEAN GROUT SMEARS AND HAZE FROM TILE ACCORDING TO TILE AND GROUT MANUFACTURER'S WRITTEN INSTRUCTIONS. USE ONLY CLEANERS RECOMMENDED BY TILE AND GROUT MANUFACTURERS AND ONLY AFTER DETERMINING THAT CLEANERS ARE SAFE TO USE BY TESTING ON SAMPLES OF TILE AND OTHER SURFACES TO BE CLEANED. PROTECT METAL SURFACES AND PLUMBING FIXTURES FROM EFFECTS OF CLEANING. FLUSH SURFACES WITH CLEAN WATER BEFORE AND AFTER CLEANING.
   B. WHEN RECOMMENDED BY TILE MANUFACTURER, APPLY COAT OF NEUTRAL PROTECTIVE CLEANER TO COMPLETED TILE WALLS AND FLOORS. PROTECT INSTALLED TILE WORK WITH KRAFT PAPER OR OTHER HEAVY COVERING DURING CONSTRUCTION PERIOD TO PREVENT STAINING, DAMAGE, AND WEAR.
   C. PROHIBIT FOOT AND WHEEL TRAFFIC FROM TILED FLOORS FOR AT LEAST SEVEN DAYS AFTER GROUTING IS COMPLETED.
   D. BEFORE FINAL INSPECTION, REMOVE PROTECTIVE COVERINGS AND RINSE NEUTRAL CLEANER FROM TILE SURFACES.

SECTION 09 5113 - ACOUSTICAL PANEL CEILINGS

1. ACOUSTICAL PANELS: CLASS A, (WET-FORMED MINERAL FIBER) COMPLYING WITH ASTM E 1264 CLASSIFICATIONS FOR TYPES, PATTERNS, ACOUSTICAL RATINGS AND LIGHT REFLECTANCE.
   A. ACOUSTICAL PANEL: 24" X 24" X 3/4".
   B. ACOUSTICAL PANEL: 24" X 48" X 3/4".
   C. REFER TO MATERIAL LEGEND FOR MANUFACTURER AND MODEL.
2. METAL SUSPENSION SYSTEM: WIDE-FACE, CAPPED, DOUBLE-WEB, STEEL, INTERMEDIATE-DUTY, WITH PAINTED WHITE ALUMINUM CAP AND COMPLYING WITH ASTM A 653. (MANUFACTURERS: ARMSTRONG, CHICAGO METALLIC, AND USG.)
3. METAL EDGE MOLDINGS AND TRIM: ROLL-FORMED SHEET-METAL, OF SAME MATERIAL, FINISH , AND COLOR AS GRID.
4. INSTALL TO COMPLY WITH ASTM C 636, PER MANUFACTURER'S WRITTEN INSTRUCTIONS, AND CISCA'S "CEILING SYSTEM HANDBOOK". SUPPORT LIGHT FIXTURES AT FOUR CORNERS WITH WIRE HANGERS.

SECTION 09 6513 - RESILIENT WALL BASE AND ACCESSORIES

1. RESILIENT WALL BASE:
   A. ASTM F 1861, TYPE (TS), GROUP (I), COVE STYLE, WITH (PRE-FORMED OUTSIDE CORNERS).
   B. THERMOSET RUBBER WALL BASE - 6".
2. PREPARE AND INSTALL COMPLYING WITH MANUFACTURER'S WRITTEN INSTRUCTIONS TO ENSURE ADHESION.

SECTION 09 9100 - PAINTING

1. PRODUCTS: COMPLY WITH "MPI APPROVED PRODUCTS LIST". APPROVED MANUFACTURER(S): (BENJAMIN MOORE) (SHERWIN-WILLIAMS).
2. INTERIOR PAINTING WITH CUSTOM (PREMIUM) GRADE SYSTEMS:
   A. STEEL SUBSTRATES:
      a. PRIME COAT: ALKYD METAL PRIMER (MPI #76).
      b. TOPCOAT: INTERIOR ALKYD (SEMIGLOSS) (MPI #47).
   B. WOOD PANELS AND TRIM:
      a. PRIME COAT: INTERIOR LATEX WOOD PRIMER/SEALER (MPI #39).
      b. TOPCOAT: INTERIOR ALKYD (SEMIGLOSS) (MPI #47).
   C. GYPSUM BOARD SUBSTRATES:
      a. PRIMER: INTERIOR LATEX PRIMER/SEALER (MPI #50).
      b. TOPCOAT:INTERIOR LATEX (SATIN) (MPI #43). (NOTE: PREMIUM GRADE REQUIRES INTERMEDIATE COAT MATCHING TOPCOAT).
3. STAINING AND TRANSPARENT FINISHING WITH CUSTOM (PREMIUM) GRADE SYSTEMS:
   A. INTERIOR FINISH CARPENTRY SUBSTRATES: POLYURETHANE VARNISH OVER STAIN SYSTEM (MPI INT 63E).
      a. STAIN COAT: INTERIOR SEMI-TRANSPARENT WOOD STAIN.
      b. TWO FINISH COATS: INTERIOR, OIL-MODIFIED, CLEAR URETHANE SATIN.
4. PREPARE AND APPLY COMPLYING WITH REQUIREMENTS IN "MPI ARCHITECTURAL PAINT SPECIFICATIONS MANUAL" AND MANUFACTURER'S WRITTEN INSTRUCTIONS.
   A. APPLY ONLY WHEN SURFACE AND AIR TEMPERATURES ARE BETWEEN 50 & 95 DEG F.
   B. CLEAN SUBSTRATES OF SUBSTANCES THAT COULD IMPAIR BONDING, INCLUDING DIRT, OIL, GREASE, RUST, AND INCOMPATIBLE PAINT.
   C. COUNTERSINK STEEL NAILS AND PUTTY (TINTED).
   D. APPLY BY BRUSH UNLESS OTHERWISE NOTED OR APPROVED.
   E. APPLY ADDITIONAL COATS UNTIL UNDERCOATS OR OTHER CONDITIONS DO NOT SHOW THROUGH.

SECTION 10 2800 - TOILET, BATH, AND LAUNDRY ACCESSORIES

1. SUMMARY
   A. SECTION INCLUDES:
      A. PUBLIC-USE WASHROOM ACCESSORIES.
   B. OWNER-FURNISHED MATERIAL:
      A. REFER TO DRAWINGS.
2. ACTION SUBMITTALS
   A. PRODUCT DATA: FOR EACH TYPE OF PRODUCT INDICATED. INCLUDE THE FOLLOWING:
      A. CONSTRUCTION DETAILS AND DIMENSIONS.
      B. ANCHORING AND MOUNTING REQUIREMENTS, INCLUDING REQUIREMENTS FOR CUTOUTS IN OTHER WORK AND SUBSTRATE PREPARATION.
      C. MATERIAL AND FINISH DESCRIPTIONS.
      D. FEATURES THAT WILL BE INCLUDED FOR PROJECT.
      E. MANUFACTURER'S WARRANTY.
   B. PRODUCT SCHEDULE: INDICATING TYPES, QUANTITIES, SIZES, AND INSTALLATION LOCATIONS BY ROOM OF EACH ACCESSORY REQUIRED.
      A. IDENTIFY LOCATIONS USING ROOM DESIGNATIONS INDICATED.
      B. IDENTIFY PRODUCTS USING DESIGNATIONS INDICATED.
3. CLOSEOUT SUBMITTALS
   A. MAINTENANCE DATA: FOR TOILET AND BATH ACCESSORIES TO INCLUDE IN MAINTENANCE MANUALS.
4. QUALITY ASSURANCE
   A. SOURCE LIMITATIONS: FOR PRODUCTS LISTED TOGETHER IN THE SAME PART 2 ARTICLES, OBTAIN PRODUCTS FROM SINGLE SOURCE FROM SINGLE MANUFACTURER.
5. COORDINATION
   A. COORDINATE ACCESSORY LOCATIONS WITH OTHER WORK TO PREVENT INTERFERENCE WITH CLEARANCES REQUIRED FOR ACCESS BY PEOPLE WITH DISABILITIES, AND FOR PROPER INSTALLATION, ADJUSTMENT, OPERATION, CLEANING, AND SERVICING OF ACCESSORIES.
   B. DELIVER INSERTS AND ANCHORING DEVICES SET INTO CONCRETE OR MASONRY AS REQUIRED TO PREVENT DELAYING THE WORK.
6. PRODUCT MATERIALS
   A. STAINLESS STEEL: ASTM A 666, TYPE 304, 0.031-INCH (0.8-MM) MINIMUM NOMINAL THICKNESS UNLESS OTHERWISE INDICATED.
   B. STEEL SHEET: ASTM A 1008/A 1008M, DESIGNATION CS (COLD ROLLED, COMMERCIAL STEEL), 0.036-INCH (0.9-MM) MINIMUM NOMINAL THICKNESS.
   C. GALVANIZED-STEEL SHEET: ASTM A 653/A 653M, WITH G60 (Z180) HOT-DIP ZINC COATING.
   D. GALVANIZED-STEEL MOUNTING DEVICES: ASTM A 153/A 153M, HOT-DIP GALVANIZED AFTER FABRICATION.
   E. FASTENERS: SCREWS, BOLTS, AND OTHER DEVICES OF SAME MATERIAL AS ACCESSORY UNIT AND TAMPER-AND-THEFT RESISTANT WHERE EXPOSED, AND OF GALVANIZED STEEL WHERE CONCEALED.
   F. MIRRORS: ASTM C 1503, MIRROR GLAZING QUALITY, CLEAR-GLASS MIRRORS, NOMINAL 6.0 MM THICK.
      A. ABS PLASTIC: ACRYLONITRILE-BUTADIENE-STYRENE RESIN FORMULATION.
7. WASHROOM ACCESSORIES
   A. SUBJECT TO COMPLIANCE WITH REQUIREMENTS, PROVIDE PRODUCT INDICATED IN PARAGRAPHS BELOW OR COMPARABLE PRODUCT BY ONE OF THE FOLLOWING:
      A. BOBRICK
      B. AMERICAN SPECIALTIES, INC.
      C. BRADLEY CORPORATION.
      D. GEORGIA PACIFIC
   B. T01 - LIQUID SOAP DISPENSER
      A. DIAL FIT UNIVERSAL TOUCH FREE DISPENSER SLATE-IL. CASE UPC; 17000166261.
   C. T02 - PAPER TOWEL DISPENSER
      a. EMOTION 10 AUTOMATED PAPER TOWEL DISPENSER BY GEORGIA PACIFIC.
   D. T03 - MIRROR WITH FRAME:
      A. BASIS-OF-DESIGN PRODUCT: BOBRICK, B-165 SERIES.
      B. FRAME: TYPE-430 STAINLESS STEEL, 1/2" X 1/2" X 3/8" (13 X 13 X 9.5MM) CHANNEL WITH 1/4" (6MM) RETURN AT REAR FOR SNAP LOCK-ING DESIGN; 1/2" X 1/2" X 1/2" (13 X 13 X 13MM) CHANNEL FOR LOCK TAB DESIGN, WITH BRIGHT POLISHED FINISH.
         1. CORNERS: MANUFACTURER'S STANDARD.
      c. MIRROR: 1/4" (6MM) SELECT FLOAT GLASS.
      d. MOUNTING: CONCEALED WALL HANGER. 16 GAUGE COLD ROLL STEEL CONSTRUCTION. INCORPORATES UPPER AND LOWER SUPPORT MEMBERS, WHICH ENGAGE BACKPLATE LOUVERS TO KEEP MIRROR AGAINST WALL.
      e. SIZE: 24 X 36 INCHES.
   E. T04 - TOILET TISSUE DISPENSER
      a. OWNER FURNISHED CONTRACTOR INSTALLED.
      b. EXISTING. TO BE SALVAGED AND REUSED.
   G. T06 - GRAB BARS:
      A. BASIS-OF-DESIGN PRODUCT: BOBRICK, B-6806 SERIES
      B. CONFIGURATION: AS INDICATED ON DRAWINGS.
      C. LENGTH:
         1. (1) @ 18" VERTICAL BAR
         2. (1) @ 36" HORIZONTAL BAR
         3. (1) @ 42" HORIZONTAL BAR
      D. MOUNTING: FLANGES WITH CONCEALED FASTENERS.
      E. MATERIAL: STAINLESS STEEL, 0.05 INCH (1.3 MM) THICK.
         1. FINISH: SMOOTH, NO. 4 FINISH (SATIN) ON ENDS AND SLIP-RESISTANT TEXTURE IN GRIP AREA.
         2. OUTSIDE DIAMETER: 1-1/2 INCHES (38 MM).
   H. T08 - WASTE RECEPTACLE
      A. BASIS-OF-DESIGN: BOBRICK, B-3644.
      b. RECESSED WASTE RECEPTACLE SHALL BE TYPE-304 STAINLESS STEEL WITH ALL-WELDED CONSTRUCTION; EXPOSED SURFACES SHALL HAVE SATIN FINISH. FLANGE SHALL BE DRAWN AND BEVELED, ONE-PIECE, SEAMLESS CONSTRUCTION. REMOVABLE WASTE RECEPTACLE SHALL BE SECURED TO CABINET WITH A TUMBLER LOCK, HAVE FRONT AND SIDE EDGES OF BOTTOM AND ALL TOP EDGES HEMMED FOR SAFE HANDLING, AND SHALL HAVE A MINIMUM CAPACITY OF 12-GAL. (45.4-L).
      C. INCLUDE LINERMATE 3944-134.
      D. BOBRICK B-277 FOR STORM SHELTER (118).
   I. T09 - WALL STOP
      A. BASIS OF DESIGN: ROCKWOOD, 430-RKW
      B. CONVEX SOLID CAST WALL STOP WITH US32D FINISH.
1. INSTALLATION
   A. INSTALL ACCESSORIES ACCORDING TO MANUFACTURERS' WRITTEN INSTRUCTIONS, USING FASTENERS APPROPRIATE TO SUBSTRATE INDICATED AND RECOMMENDED BY UNIT MANUFACTURER. INSTALL UNITS LEVEL, PLUMB, AND FIRMLY ANCHORED IN LOCATIONS AND AT HEIGHTS INDICATED.
   B. GRAB BARS: INSTALL TO WITHSTAND A DOWNWARD LOAD OF AT LEAST 250 LBF (1112 N), WHEN TESTED ACCORDING TO ASTM F 446.
2. ADJUSTING AND CLEANING
   A. ADJUST ACCESSORIES FOR UNENCUMBERED, SMOOTH OPERATION. REPLACE DAMAGED OR DEFECTIVE ITEMS.
   B. REMOVE TEMPORARY LABELS AND PROTECTIVE COATINGS.
   C. CLEAN AND POLISH EXPOSED SURFACES ACCORDING TO MANUFACTURER'S WRITTEN RECOMMENDATIONS.

END OF ARCHITECTURAL SPECIFICATIONS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836-8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER REGISTERED ARCHITECT 12147

Todd A. Gindelberger - License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

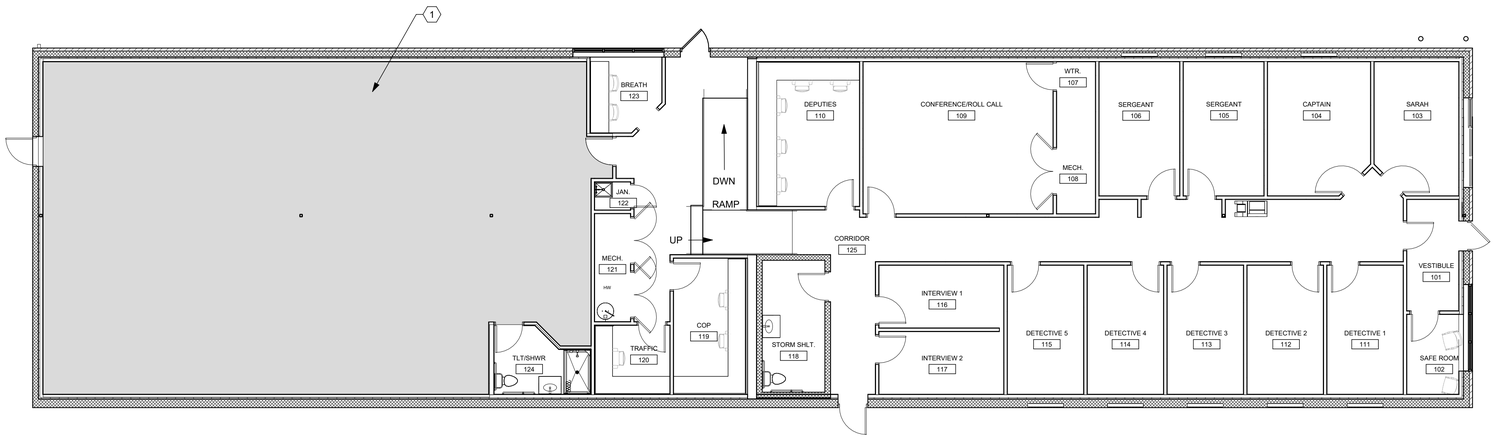
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
SPECIFICATIONS

SHEET NO.
G0.5

1/21/2026 9:53:19 AM



PHASE 2

E1 PHASING PLAN
1/8" = 1'-0"

CONSTRUCTION NOTES

(00) INDICATES CONSTRUCTION NOTE.

1 PHASE ONE CONSTRUCTION TO CREATE "TRUE SHELL". FLOORS TO BE FINSIHED. EGRESS DOOR 140B TO BE INSTALLED. EXTERIOR WALLS TO BE COMPLETED EXCEPT FOR FINISH FACE GYPSUM BOARD.

GENERAL NOTES

A. THIS SHEET CONTAINS A GENERAL OVERVIEW OF A PHASING PLAN SCOPE.
   PHASE 1: COMPLETE ENTIRE PROJECT BOTH EAST AND WEST OF THE FLOOR PLAN.
   PHASE 2: SHADED AREA SHOULD NOT TO BE COMPLETED WITH EXCEPTION OF STRUCTURAL REINFORCING (INCLUDING STUDS AND INSULATION), CONCRETE SLAB REPAIR, HVAC TRUNKS, AND NEW EGRESS DOOR 140B.
B. REFER TO MEP DRAWINGS FOR ADDITIONAL PHASING NOTES.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
PHASING

SHEET NO.
G0.6

12/12/2026 9:53:10 AM

ABBREVIATIONS

SYMBOL	
@	AT
&	AND
∠	ANGLE
Ø	DIAMETER
℄	CENTER LINE
PL	PLATE

A	
ABV	ABOVE
A/C	AIR CONDITIONING
AFF	ABOVE FINISHED FLOOR
AHU	AIR HANDLER UNIT
AL	ALUMINUM
ALT	ALTERNATE
ANOD	ANODIZED
ANCH	ANCHOR
APPROX	APPROXIMATELY
ARCH	ARCHITECT OR ARCHITECTURAL
ATTEN	ATTENUATED
AUTO	AUTOMATIC
AVG	AVERAGE

B	
BLDG	BUILDING
BLK	BLOCK
BLKG	BLOCKING
BOT	BOTTOM
BRG	BEARING
BSMT	BASEMENT

C	
CAB	CABINET
CB	CATCH BASIN
C/C	CENTER TO CENTER
CF	CUBIC FOOT
CFCI	CONTRACTOR FURNISH, CONTRACTOR INSTALL
CFOI	CONTRACTOR FURNISH, OWNER INSTALL
CG	CORNER GUARD
CJ	CONTROL JOINT
CLG	CEILING
CL	CLOSET
CLR	CLEAR
CMU	CONCRETE MASONRY UNIT
CO	CLEAN OUT
COL	COLUMN
CONC	CONCRETE
CONST	CONSTRUCTION
CONT	CONTINUOUS OR CONTINUE
CPU	CENTRAL PROCESSING UNIT (COMPUTER)
CY	CUBIC YARD

D	
DBL	DOUBLE
DEMO	DEMOLISH, DEMOLITION
DF	DRINKING FOUNTAIN
DIA	DIAMETER
DIM	DIMENSION
DISP	DISPENSER
DIV	DIVISION
DS	DOWNSPOUT
DWG	DRAWING
DTL	DETAIL

E	
EA	EACH
EC	ELECTRICAL CONTRACTOR
EIFS	EXTERIOR INSULATION AND FINISH SYSTEM
EJ	EXPANSION JOINT
ELEC	ELECTRIC OR ELECTRICAL
ELEV	ELEVATION OR ELEVATOR
EMERG	EMERGENCY
EQ	EQUAL
EQUIP	EQUIPMENT
EWC	ELECTRIC WATER COOLER
EXIST OR EX	EXISTING
EXP	EXPANSION
EXT	EXTERIOR

F	
FD	FLOOR DRAIN
FE	FIRE EXTINGUISHER
FEC	FIRE EXTINGUISHER CABINET
FF	FINISH FLOOR
FIN	FINISH OR FINISHED
FLR	FLOOR
FND	FOUNDATION
FRT	FIRE RETARDANT TREATED WOOD
FS	FILLER STRIP
FT	FOOT OR FEET OR FULLY TEMPERED
FTG	FOOTING
FUR	FURRING
FV	FIELD VERIFY
FOW	FACE OF WALL

G	
GA	GAUGE
GALV	GALVANIZED
GC	GENERAL CONTRACTOR
GD	GRADE OR GRADING
GEN	GENERAL
GL	GLASS OR GLAZING
GND	GROUND
GYP	GYPSUM
GWB	GYPSUM BOARD
GWT	GLAZED WALL TILE

H	
HB	HOSE BIBB
HDW	HARDWARE
HM	HOLLOW METAL
HORIZ	HORIZONTAL
HT	HEIGHT
HVAC	HEATING, VENTILATION & AIR CONDITIONING
HWD	HARDWARE

I	
ID	INSIDE DIAMETER
IN	INCH
INCL	INCLUDE (D) (ING)
INT	INTERIOR
INV	INVERT

J	
JB	JUNCTION BOX
JC	JANITOR CLOSET

L	
L	LONG
LAV	LAVATORY
LBS	POUNDS
LH	LEFT HAND
LL	LIVE LOAD
LLH	LONG LEG HORIZONTAL
LLV	LONG LEG VERTICAL
LTL	LINTEL
LVR	LOUVER

M	
M	MEN OR METER
MAS	MASONRY
MAT	MATERIAL
MAX	MAXIMUM
MC	MECHANICAL CONTRACTOR
MECH	MECHANICAL
MFR	MANUFACTURER
MH	MOUNTING HEIGHT, MANHOLE
MIL	THOUSANDTHS OF AN INCH
MM	MILLIMETER
MIN	MINIMUM
MISC	MISCELLANEOUS
MO	MASONRY OPENING
MTD	MOUNTED
MTL	METAL

N	
N	NORTH OR NITROGEN
NC	NURSE CALL
NIC	NOT IN CONTRACT
NO	NUMBER OR NITROUS OXIDE
NOM	NOMINAL
NRC	NOISE REDUCTION COEFFICIENT
NTS	NOT TO SCALE

O	
OD	OUTSIDE DIAMETER
OFCI	OWNER FURNISH, CONTRACTOR INSTALL
OFOI	OWNER FURNISH, OWNER INSTALL
OFVI	OWNER FURNISH, VENDOR INSTALL
OH	OVERHEAD
OHD	OVERHEAD DOOR
OPNG	OPENING
OPP	OPPOSITE
O_2	OXYGEN

P	
PAR	PARALLEL
PC	PLUMBING CONTRACTOR
PCF	POUNDS PER CUBIC FOOT
PL	PLATE OR PROPERTY LINE
PLBG	PLUMBING
PLWD	PLYWOOD
PME	PLUMBING, MECHANICAL & ELECTRICAL
PNL	PANEL
PR	PAIR
PSF	POUNDS PER SQUARE FOOT
PSI	POUNDS PER SQUARE INCH
PVC	POLYVINYL CHLORIDE

Q	
QTY	QUANTITY

R	
R	RADIUS
RA	RETURN AIR
RB	RUBBER BASE
RD	ROOF DRAIN
RECEPT	RECEPTACLE
REF	REFERENCE
REINF	REINFORCE
REQD	REQUIRED
RET	RETURN
REV	REVISION
RH	RIGHT HAND
RM	ROOM
RO	ROUGH OPENING
ROW	RIGHT OF WAY

S	
S	SOUTH
SAN	SANITARY
SB	SINK BASE
SCHED	SCHEDULE
SEAL	SEALANT
SECT	SECTION
SF	SQUARE FEET
SG	SAFETY GLASS
SH	SPRINKLER HEAD OR SHOWER HEAD
SHT	SHEET
SHTG	SHEATHING
SIM	SIMILAR
SPEC	SPECIFICATION(S)
SPK	SPEAKER
SQ	SQUARE
ST	STREET
STC	SOUND TRANSMISSION CLASSIFICATION
STD	STANDARD
STL	STEEL
STR	STRUCTURAL
SUSP	SUSPENDED
SV	SHEET VINYL
SYS	SYSTEM

T	
T & G	TONGUE & GROOVE
TB	TOWEL BAR
T&B	TOP AND BOTTOM
TEL	TELEPHONE
TOC	TOP OF CONCRETE
TOS	TOP OF STEEL
TOM	TOP OF MASONRY
TOW	TOP OF WALL
TRANS	TRANSFORMER
TV	TELEVISION
TYP	TYPICAL

U	
UC	UNDER CABINET OR COUNTER
UH	UNIT HEATER
UL	UNDERWRITERS LABORATORY
UNO	UNLESS NOTED OTHERWISE

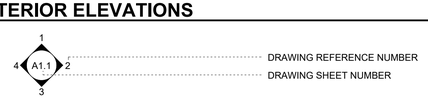
V	
V	VACUUM
VB	VAPOR BARRIER
VCT	VINYL COMPOSITION TILE
VERT	VERTICAL
VS	VACUUM SLIDE

W	
W	WIDE OR WEST OR WOMEN
W/	WITH
W/O	WITHOUT
WC	WATER CLOSET OR WALL CABINET
WD	WOOD
WIN	WINDOW
WP	WORK POINT
WPT	WOOD PRESERVATIVE TREATMENT
WT	WEIGHT
WWF	WELDED WIRE FABRIC

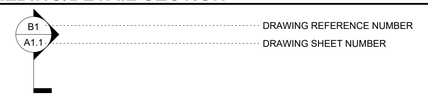
REFERENCE SYMBOLS

DRAWING TITLE

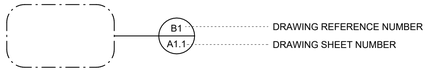
INTERIOR ELEVATIONS



BUILDING/DETAIL SECTION



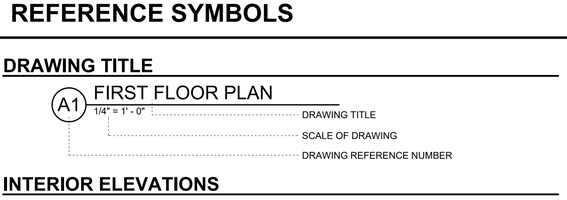
ENLARGED DETAIL



EXTERIOR ELEVATIONS

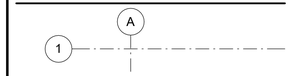
MATCH LINE

MATERIAL SYMBOLS IN SECTION



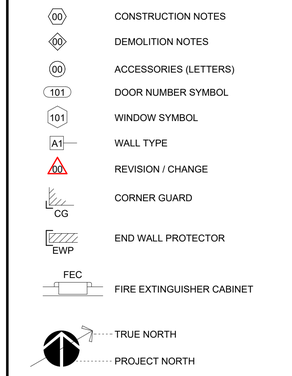
DRAWING SYMBOLS

COLUMN CENTER LINES



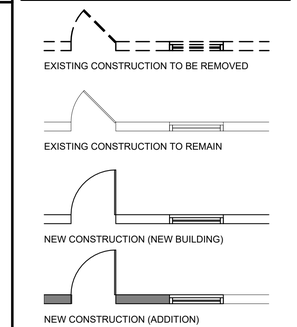
ROOM SYMBOL

PLAN SYMBOLS

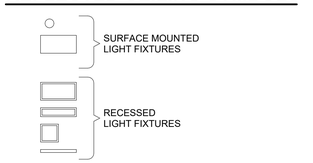


ELEVATION SYMBOLS

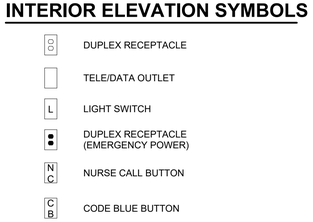
TYPICAL WALL CONVENTIONS



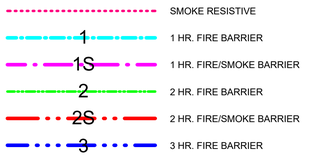
REFLECTED CEILING SYMBOLS



INTERIOR ELEVATION SYMBOLS



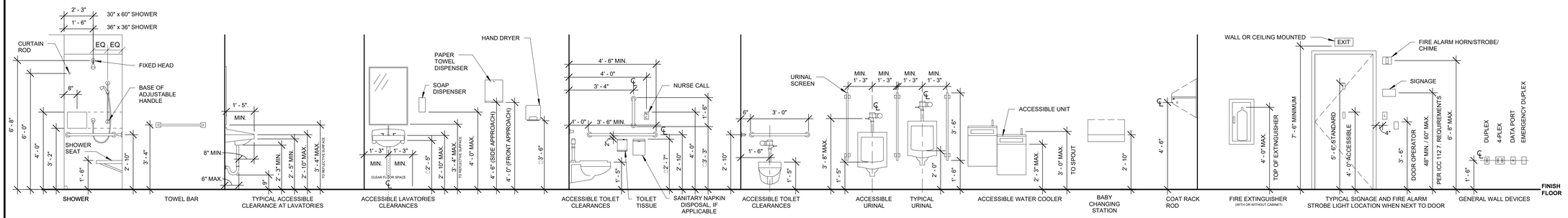
FIRE BARRIER LEGEND



ALL SYMBOLS OR ABBREVIATIONS MIGHT NOT NECESSARILY BE USED ON THIS PROJECT.
ADDITIONAL SYMBOLS OR ABBREVIATIONS MAY APPEAR ON SUBSEQUENT SHEETS.

MOUNTING & CLEARANCE STANDARDS N.T.S.

(FOLLOW THESE UNLESS NOTED OTHERWISE)



ACCESSIBLE FIXTURES, ACCESSORIES & DIMENSIONS ARE BASED ON: ICC 117.1 - 2017 FOR NEW CONSTRUCTION AND ICC 117.1 - 2009 FOR EXISTING BUILDINGS.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836.8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT TODD A. GINDELBERGER 12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
ABBREVIATIONS AND SYMBOLS

SHEET NO.
A0.1

1/21/2026 9:53:12 AM

MATERIAL LEGEND

SORT MATERIAL	ITEM	MATERIAL	MANUFACTURER	MATERIAL MODEL NO.	CONTACT INFO	COLOR	FLAME / SMOKE	REMARKS
BASE								
BASE	PTWB-1	CERAMIC TILE WALL BASE 6"	CROSSVILLE	NVM02.10612CBS (6"x12")	MICEALA CARNEVALE-WETZEL, 512.500.5135 (m)	NICKLE PLATE		1
BASE	RB-1	RUBBER BASE	FLEXCO	COVED RUBBER BASE, 4"x120'-0"	ROD SEABOLT, 513.560.1040 (m)	01, BLACK DAHLIA	CLASS A, ≤ 450	
BASE	RB-2	RUBBER BASE	FLEXCO	COVED RUBBER BASE, 6"x120'-0"	ROD SEABOLT, 513.560.1040 (m)	01, BLACK DAHLIA	CLASS A, ≤ 450	2
CABINETS								
CABINETS	PL-1	PLASTIC LAMINATE	WILSONART	7949K-18, FINISH 18 -LINEARITY	KATIE MASON, 614.971.9636 (m)	ASIAN NIGHT	CLASS B	
CABINETS	PL-2	PLASTIC LAMINATE	WILSONART	4990-38	KATIE MASON, 614.971.9636 (m)	FLAX LINEN		3
CABINETS	SSM-1	SOLID SURFACE	LX HAUSYS	LO16	MICHELLE ALLEN 513.214.9939(m)	LUSTRE	CLASS A	
CABINETS	SSM-2	SOLID SURFACE	LX HAUSYS	GT909	MICHELLE ALLEN 513.214.9939(m)	ARMADILLO	CLASS A	4
CABINETS	SSM-3	SOLID SURFACE	LX HAUSYS	OVAL ADA BOWL, MODEL 1613	MICHELLE ALLEN 513.214.9939(m)	ARCTIC WHITE		
CEILING								
CEILING	APC-1	ACOUSTIC PANEL CEILING	ARMSTRONG	MESA 686, 24"x24"	JEN McCOY, 513.919.2263 (m)	WHITE	CLASS A	
CEILING	APC-2	ACOUSTIC PANEL CEILING	ARMSTRONG	MESA 684, 24"X48"	JEN McCOY, 513.919.2263 (m)	WHITE	CLASS A	
CEILING	GYB / P-1	GYPSUM BOARD PAINTED	SHERWIN WILLIAMS	SW 7007	KAREN McILWAIN, 317.714.5610 (m)	CEILING BRIGHT WHITE		
DOORS								
DOORS	DEP-1	DOOR & FRAME PAINT	SHERWIN WILLIAMS	SW 6258	KAREN McILWAIN, 317.714.5610 (m)	TRICORN BLACK		
FLOOR								
FLOOR	C-1	CARPET (TILES)	TARKETT	MEALSTROM, 04849, 24"x24", ETHOS MODULAR	GREG WELDON, 513.909.9033 (m)	33212, TERRA FIRMA	CLASS 1,≤ 450	5,6
FLOOR	MAT-1	WALK-OFF MAT	SHAW CONTRACT	5T103, WELCOME II TILE, 24"x24"	THERESA SCHNIDER, 513.581.0321 (m)	CHARCOAL, 31549	CLASS 1,≤ 450	5
FLOOR	MCT-1	MCT (MARMOLEUM COMPOSITION TILE)	FORBO	MCT-3048	KEVIN SHORT, 440.715.3327 (m)	GRAPHITE	CLASS 1,≤ 450	5,6,8
FLOOR	MCT-2	MCT (MARMOLEUM COMPOSITION TILE)	FORBO	MCT-629	KEVIN SHORT, 440.715.3327 (m)	EIGER	CLASS 1,≤ 450	7
FLOOR	PC-1	POLISHED CONCRETE						
FLOOR	PT-1	PORCELAIN TILE (FLOOR)	CROSSVILLE	NVMO2. 12"x24"	MICEALA CARNEVALE-WETZEL, 512.500.5135 (m)	NICKLE PLATE		8,9
FLOOR	SC-1	SEALED CONCRETE						
SPECIALTY								
SPECIALTY	CG-1	CORNER GUARD	INPRO CORP	STAINLESS STEEL	KRISTI ASHFORD, 513.646.2163 (m)	STAINLESS		10
SPECIALTY	CR-1	CHAIR RAIL	LX HAUSYS	GT909	MICHELLE ALLEN 513.214.9939(m)	ARMADILLO	CLASS A	4
SPECIALTY	TB-1	TACKBOARD MATERIAL						
WALL								
WALL	EP-1	ENAMEL/EPOXY PAINT	SHERWIN WILLIAMS	SW 7570	KAREN McILWAIN, 317.714.5610 (m)	EGRET WHITE		
WALL	P-1	PAINT	SHERWIN WILLIAMS	SW 7570	KAREN McILWAIN, 317.714.5610 (m)	EGRET WHITE		
WALL	P-2	PAINT	SHERWIN WILLIAMS	SW 7674	KAREN McILWAIN, 317.714.5610 (m)	PEPPERCORN		
WALL	P-3	PAINT	SHERWIN WILLIAMS	SW 7641	KAREN McILWAIN, 317.714.5610 (m)	COLLONADE GRAY		
WALL	PT-1	PORCELAIN WALL TILE	CROSSVILLE	NVMO2. 12"x24"	MICEALA CARNEVALE-WETZEL, 512.500.5135 (m)	NICKLE PLATE		
WALL	VWP-1	VINYL WALL PROTECTION	INPRO CORP	LEGACY PATTERN .040 THICKNESS	KRISTI ASHFORD, 513.646.2163 (m)	2405	CLASS A	
WALL	VWP-2	VINYL WALL PROTECTION	INPRO CORP	0113, .060	KRISTI ASHFORD, 513.646.2163 (m)	TAUPE	CLASS A	

MATERIAL LEGEND REMARKS

No.	REMARK
1.	6x12" UNPOLISHED", TOP EDGE TO BE CAPPED WITH SCHLUTER RONDEC STRIP WHERE TILE BASE DOESN 'T DIE INTO TILE EDGE ON WET WALL -AS NOTED ON INTERIOR ELEVATION/FINISH PLANS. UPPER SIDE OF TILE BASE TO BE CAPPED WITH SCHLUTER RONDEC, FINISHING AND EDGE PROTECTION STRIP, 9.5MM. THIS CONDITION ONLY EXISTS ON NON-TILED WALLS.
2.	USE 6" RUBBER BASE AT WET LOCATIONS AS NOTED, EXCEPT FOR JANITORS CLOSET AND TILED WALLS.
3.	ITEM USED FOR COUNTER TOP, USE MATCHING PVC-EDGE BANDING FOR PLASTIC LAMINATE ONLY.
4.	ITEM USED FOR CHAIR RAIL. REFER TO INTERIOR FINISH PLAN AND MATERIAL LEGEND FOR LOCATIONS AND EXTENTS.
5.	ASHLAR INSTALL, USE WITH TRANSITION STRIP, CTA-XX-H, 1/4" TO 1/8" MATERIAL, COLOR 'BLACK, MFG: JOHNSONITE/TARKETT WHERE CPT ABUTS RESILIENT FLOOR (MCT).
6.	QUARTER TURN INSTALL. WHERE MCT TRANSITIONS TO PT, USE REDUCER, CTA-XX-K, 3/8" TO 1/8". COLOR BLACK, MFG TARKETT/JOHNSONITE.
7.	QUARTER TURN INSTALL, ACCENT INSET AT CONFERENCE ROLL-CALL, REFER TO INTERIOR FINISHES PLAN FOR LOCATIONS AND EXTENT OF ACCENT.
8.	WHERE MCT TRANSITIONS TO PT, USE REDUCER,CTA-XX-K, 3/8" TO 1/8". COLOR BLACK, MFG TARKETT/JOHNSONITE.
9.	STACKED INSTALLATION, GROUT JOINT 3MM, GROUT: TBD.
10.	STAINLESS STEEL CORNER GUARD, REFER TO INTERIOR FINISH PLAN FOR LOCATIONS.

ROOM FINISH SCHEDULE

Number	ROOM NAME	FLOOR	BASE	WAINSCOT		WALLS				CEILING	REMARKS
				MAT.	HT.	N	S	E	W	MAT.	
101	VESTIBULE	MAT-1	RB-1			P-1	P-1	P-1	P-1	APC-1	HIGH ABUSE GWB.
102	SAFE ROOM	MAT-1	RB-1			P-1	P-1	P-1	P-1	APC-1	HIGH ABUSE GWB.
103	OFFICE	C-1	RB-1	CR-1	2' 6"	P-2	P-1	P-2	P-1	APC-1	
104	CAPTAIN	C-1	RB-1	CR-1	2' 6"	P-2	P-1	P-1	P-2	APC-1	
105	SERGEANT	C-1	RB-1	CR-1	2' 6"	P-2	P-1	P-2	P-1	APC-1	
106	SERGEANT	C-1	RB-1	CR-1	2' 6"	P-2	P-1	P-1	P-2	APC-1	
107	WTR.	SC-1	RB-1			P-1	P-1	P-1	P-1	APC-1	
108	MECH	SC-1	RB-1			P-1	P-1	P-1	P-1	APC-1	
109	CONFERENCE/ROLL CALL	MCT-1/2	RB-1	CR-1	2' 6"	P-3/VWP-1	P-3VWP-1	P-3/VWP-1	P-3/VWP-1	APC-1	VWP-1 UP TO CHAIR RAIL ONLY.
110	DEPUTIES	MCT-1	RB-1	CR-1	2' 6"	P-1/VWP-2	P-1	P-1	P-1/VWP-2	APC-1	VWP-2 BELOW COUNTER.
111	DETECTIVE 1	C-1	RB-1	CR-1	2' 6"	P-1	P-1	P-1	P-1	APC-1	CR-1 EXCLUDE N WALL.
112	DETECTIVE 2	C-1	RB-1	CR-1	2' 6"	P-1	P-1	P-1	P-1	APC-1	CR-1 EXCLUDE N WALL.
113	DETECTIVE 3	C-1	RB-1	CR-1	2' 6"	P-1	P-1	P-1	P-1	APC-1	CR-1 EXCLUDE N WALL.
114	DETECTIVE 4	C-1	RB-1	CR-1	2' 6"	P-1	P-1	P-1	P-1	APC-1	CR-1 EXCLUDE N WALL.
115	DETECTIVE 5	C-1	RB-1	CR-1	2' 6"	P-1	P-1	P-1	P-1	APC-1	CR-1 EXCLUDE N WALL.
116	INTERVIEW 1	C-1	RB-1			VWP-2	VWP-2	VWP-2	VWP-2	GYB/P-1	HIGH ABUSE SOUND ATTENUATION GWB, VWP-2 RUNS FULL HEIGHT THIS AREA.USE COLOR MATCH CAULK AT ALL SEAMS
117	INTERVIEW 2	C-1	RB-1			VWP-2	VWP-2	VWP-2	VWP-2	GYB/P-1	HIGH ABUSE SOUND ATTENUATION GWB, VWP-2 RUNS FULL HEIGHT THIS AREA.USE COLOR MATCH CAULK AT ALL SEAMS
118	STORM SHLT/TLT	PC-1	PTWB-1			EP-1	EP-1	EP-1	EP-1	P-1	CEILING P-1 ON CONCRETE.
119	COP	MCT-1	RB-1			P-1	P-1/VWP-2	P-1/VWP-2	P-1	APC-1	HIGH ABUSE VINYL BELOW COUNTER.
120	TRAFFIC	MCT-1	RB-1			P-1/VWP-2	P-1/VWP-2	P-1/VWP-2	P-1/VWP-2	APC-1	HIGH ABUSE VINYL BELOW COUNTER.
121	MECH.	SC-1	RB-1			P-1	P-1	P-1	P-1	APC-1	
122	JAN.	SC-1	RB-1			EP-1/VWP-2	EP-1/VWP-2	EP-1/VWP-2	EP-1/VWP-2	APC-1	
123	BREATH	MCT-1	RB-1	CR-1	2' 6"	P-1	P-1	P-1	P-1/VWP-2	APC-1	HIGH ABUSE GWB.
124	TLT/SHWR	PT-1	PTWB-1			EP-1	PTW-1	EP-1	PTW-1	GYB/EP-1	REFER TO INTERIOR ELEVATIONS FOR LOCATIONS AND EXTENT OF MATERIALS
125	CORRIDOR	MCT-1	RB-1	CG-1		P-1	P-1	P-1	P-1	APC-2	
125.01	COPY	MCT-1	RB-1	CG-1		P-1	P-1	P-1	P-1	APC-2	
125.02	CHARGING	MCT-1	RB-1	CG-1		P-1	P-1	P-1	P-1	APC-2	
126	IT	MCT-1	RB-1			P-1	P-1	P-1	P-1	APC-1	
127	WEAPONS CLEAN	MCT-1	RB-1			P-1	P-1	P-1	P-1	APC-1	
128	EQUIPMENT BAGS	MCT-1	RB-1			VWP-2	P-1	VWP-2	VWP-2	APC-1	VWP-2 FULL HEIGHT, EXCLUDE SOUTH WALL.
129	FILE STORAGE	MCT-1	RB-1			P-1	P-1	P-1	P-1	APC-1	
130	BREAK ROOM	MCT-1	RB-1			P-1	P-1	P-1	P-1	APC-1	
131	TLT	PT-1	PTWB-1			PTW-1	EP-1	PTW-1	EP-1	APC-1	REFER TO INTERIOR ELEVATIONS FOR LOCATIONS AND EXTENT OF MATERIALS
132	TLT	PT-1	PTWB-1			PTW-1	EP-1	EP-1	PTW-1	APC-1	REFER TO INTERIOR ELEVATIONS FOR LOCATIONS AND EXTENT OF MATERIALS
133	TLT/SHWR	PT-1	PTWB-1			PTW-1	EP-1	EP-1	PTW-1	GYB/EP-1	REFER TO INTERIOR ELEVATIONS FOR LOCATIONS AND EXTENT OF MATERIALS
134	CHANGE 1	PT-1	PTWB-1			P-1	P-1	P-1	P-1	APC-1	
135	CHANGE 2	PT-1	PTWB-1			P-1	P-1	P-1	P-1	APC-1	
136	ACCESSIBLE CHANGE 2	PT-1	PTWB-1			P-1	P-1	P-1	P-1	APC-1	
137	ACCESSIBLE CHANGE 1	PT-1	PTWB-1			P-1	P-1	P-1	P-1	APC-1	
138	PERSONAL GEAR	PT-1	PTWB-1	CG-1		P-1	P-1	P-1	P-1	APC-1	
139	PERSONAL GEAR CHANGING ROOM	PT-1	PTWB-1	CG-1		P-1	P-1	P-1	P-1	APC-1	
140	CORRIDOR	MCT-1	RB-1	CG-1		P-1	P-1	P-1	P-1	APC-1	

ROOM FINISH SCHEDULE REMARKS

No.	REMARK
1.	

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER REGISTERED ARCHITECT 12147

Todd A. Gindelberger - License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

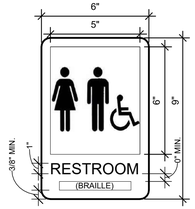
DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
FINISH SCHEDULES

SHEET NO.
A0.2

1/21/2026 9:53:13 AM

SIGNAGE LEGEND



UNISEX RESTROOM - TYPE 1

3" = 1'-0"

SIGN NOTES

A. ALL SIGNS SHALL HAVE BRAILLE LETTERING BENEATH TEXT, TYPICAL.

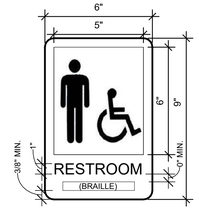
B. SIGNS MOUNTED ON GLASS AT DOOR NEED TO BE MOUNTED WITH ADHESIVE AND MATCHING BACKER PLATE FOR OTHER SIDE OF GLASS.

C. TEXT AND GRAPHICS TO BE NON-GLARE COLOR IN HIGH CONTRAST WITH BACKGROUND. SELECTED BY ARCHITECT FROM MANUFACTURER'S STANDARD COLORS.

D. BACKGROUND TO BE NON-GLARE COLOR IN HIGH CONTRAST WITH TEXT AND GRAPHICS. SELECTED BY ARCHITECT FROM MANUFACTURER'S STANDARD COLORS.

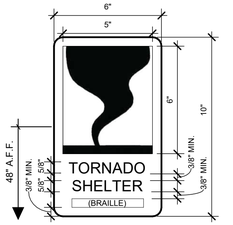
E. 1/2" RADIUS CORNERS.

F. ALL TEXT ON SIGNS LOCATED NEXT TO INTERIOR DOORS WILL BE 1/32" RAISED CHARACTERS, UPPERCASE, AND VIEWABLE AT LESS THAN 6 FEET.



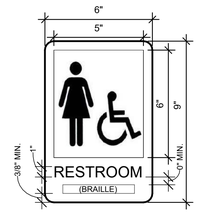
MEN'S RESTROOM - TYPE 2

3" = 1'-0"



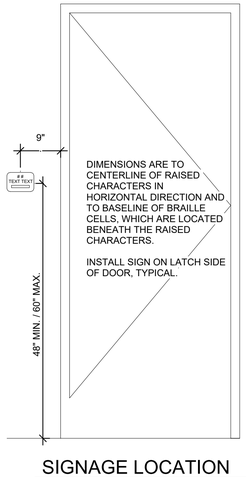
TORNADO SHELTER - TYPE 5

3" = 1'-0"



WOMEN'S RESTROOM - TYPE 3

3" = 1'-0"

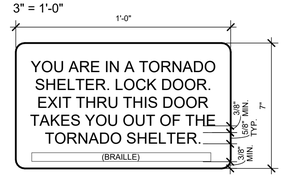


SIGNAGE LOCATION

3/4" = 1'-0"

TORNADO SHELTER - TYPE 6

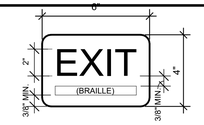
3" = 1'-0"



TORNADO SHELTER - TYPE 7A

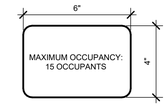
3" = 1'-0"

TORNADO SHELTER - TYPE 7



EXIT SIGN - TYPE 4

3" = 1'-0"



OCCUPANCY SIGN - TYPE 8

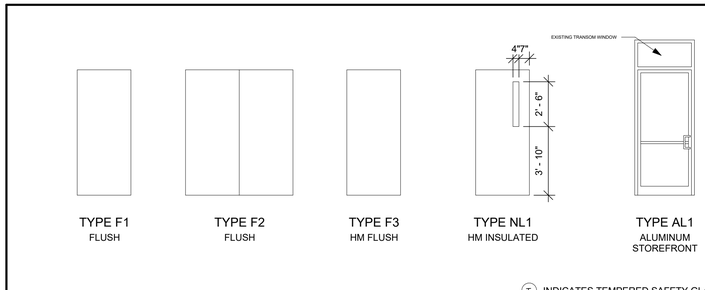
3" = 1'-0"

DOOR AND FRAME SCHEDULE

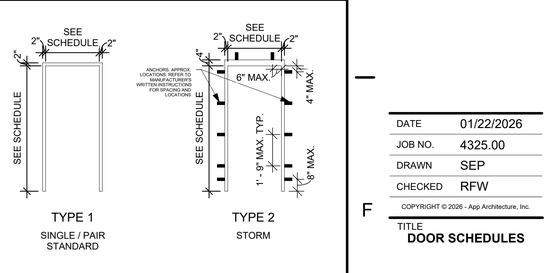
DOOR No.	ROOM NAME	HDW. SET	DOOR SIZE W	DOOR SIZE H	DOOR SIZE T	DOOR MAT.	DOOR TYPE	DOOR FIN.	DOOR U/C	FRAME MAT.	FRAME TYPE	FRAME FIN.	FRAME DETAILS HEAD	FRAME DETAILS JAMB	FRAME DETAILS SILL	FIRE RTG.	REMARKS
101A	VESTIBULE	3.0	3' - 0"	7' - 0"	2"	EX.	AL1			ALUM.M			D5/A0.6	D3/A0.6	E3/A0.7		1.
101B	VESTIBULE	10.0	3' - 0"	7' - 0"	1 3/4"	HM	NL1			HM			B4/A0.6	B1/A0.6	B2/A0.6	1 1/2 HR	
102	VESTIBULE	9.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
103	OFFICE	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
104	CAPTAIN	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
105	SERGEANT	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
106	SERGEANT	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
107	CONFERENCE/ROLL CALL	4.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
108	CONFERENCE/ROLL CALL	4.0A	5' - 0"	7' - 0"	1 3/4"	WD	F2			HM			B4/A0.6	B1/A0.6	B2/A0.6		
109	CONFERENCE/ROLL CALL	7.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
110	DEPUTIES	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
111	DETECTIVE 1	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
112	DETECTIVE 2	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
113	DETECTIVE 3	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
114	DETECTIVE 4	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
115	DETECTIVE 5	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
116	INTERVIEW 1	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
117	INTERVIEW 2	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
118	STORM SHLT/TLT	1.0	3' - 0"	7' - 0"	1 3/4"	HM	NL1			HM			C1/A0.7	C3/A0.7	B2/A0.6	1 1/2 HR	
119	COP	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
120	TRAFFIC	6.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
121A	MECH.	4.0A	5' - 0"	7' - 0"	1 3/4"	WD	F2			HM			B4/A0.6	B1/A0.6	B2/A0.6		
121B	MECH.	4.0A	5' - 0"	7' - 0"	1 3/4"	WD	F2			HM			B4/A0.6	B1/A0.6	B2/A0.6		
122	JAN.	8.0	2' - 6"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
123	BREATH		3' - 0"	7' - 0"	1 3/4"					HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
124	TLT/SHWR	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
125A	CORRIDOR	2.0	3' - 0"	7' - 0"	1 3/4"	HM	NL1			HM			E5/A0.7	C5/A0.7		1 1/2 HR	2.
125B	CORRIDOR	2.0	3' - 0"	7' - 0"	1 3/4"	HM	EX.			HM						-	3.
126	IT	5.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
127	WEAPONS CLEAN		3' - 0"	7' - 0"	1 3/4"					HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
128	EQUIPMENT BAGS	5.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
129	FILE STORAGE	5.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
130	BREAK ROOM		4' - 0"	7' - 0"	1 3/4"					HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
131	PERSONAL GEAR CHANGING ROOM	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
132	TLT	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
133	PERSONAL GEAR CHANGING ROOM	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
134	PERSONAL GEAR CHANGING ROOM	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
135	CHANGE 2	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
136	ACCESSIBLE CHANGE 2	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
137	ACCESSIBLE CHANGE 1	8.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
140A	CORRIDOR	10.0	3' - 0"	7' - 0"	1 3/4"	WD	F1			HM			B4/A0.6	B1/A0.6	B2/A0.6	-	
140B	CORRIDOR	2.0	3' - 0"	7' - 0"	1 3/4"	HM	F3			HM			E5/A0.7	C5/A0.7		-	2.

DOOR REMARKS

No.	REMARK
1.	RELOCATED STOREFRONT DOOR AND TRANSOM.
2.	INSULATED.
3.	EXISTING.



DOOR ELEVATIONS



FRAME ELEVATIONS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836.8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT TODD A. GINDELBERGER 12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

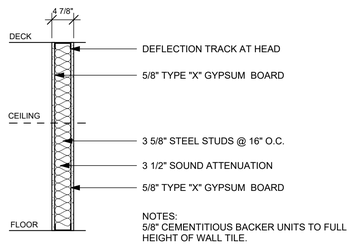
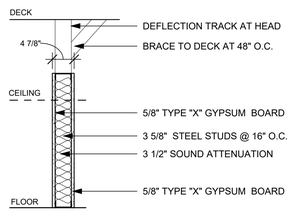
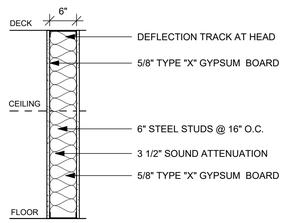
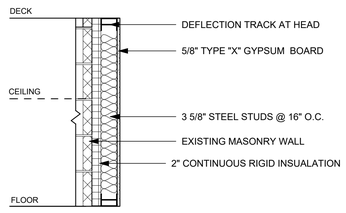
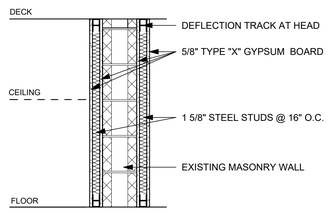
DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

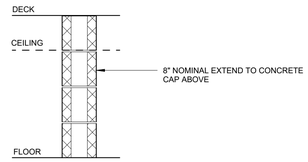
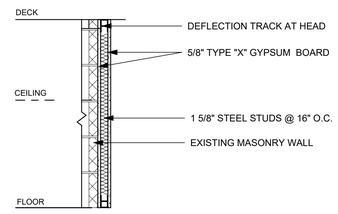
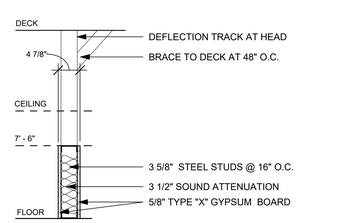
TITLE
DOOR SCHEDULES

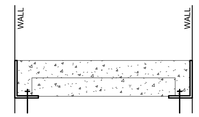
SHEET NO.
A0.3

12/1/2026 9:43:15 AM

INTERIOR WALL TYPES SCHEDULE

TYPE	BASE WALL WIDTH	FIRE RATING TESTING AGENCY, ASSEMBLY NO.	DETAILS & NOTES
A1	3 5/8"	- -	 NOTES: 5/8" CEMENTITIOUS BACKER UNITS TO FULL HEIGHT OF WALL TILE.
A2	3 5/8"		
A3	6"		
A4	3 5/8"		
A5	1 5/8"		

TYPE	BASE WALL WIDTH	FIRE RATING TESTING AGENCY, ASSEMBLY NO.	DETAILS & NOTES
M1	7 5/8"	2 HR. UL: U905	
A6	1 5/8"		
A7	3 5/8"		

TYPE	BASE WALL WIDTH	FIRE RATING TESTING AGENCY, ASSEMBLY NO.	DETAILS & NOTES
		2 HR. UL: D219	

GENERAL NOTES

A. MOISTURE/MOLD RESISTANT GYPSUM BOARD SHALL BE USED BEHIND ALL SINKS, SERVICE SINKS AND SHOWER AREAS. EXTEND MINIMUM 24" BEYOND PLUMBING FIXTURES.

B. PROVIDE & INSTALL DEFLECTION TRACK AT ALL INTERIOR WALLS THAT EXTEND TO DECK.

C. UL TEST NUMBERS FOR INTERIOR PARTITIONS WILL VARY DEPENDING ON THE MANUFACTURER OF COMPONENTS ACTUALLY USED. MAINTAIN RATING AND ADVISE IF WALL THICKNESS WILL CHANGE.

D. DRYWALL CONTRACTOR TO PAINT WALL RATINGS LABELS AT MAXIMUM 12 FEET O.C. ON ALL FIRE RATED PARTITIONS. LABEL TO BE PAINTED ABOVE CEILING WITH A STENCIL MIN. OF 4 INCHES IN HEIGHT, BLACK COLOR.

E. FIRE RATED WALLS AND SMOKE PARTITIONS ARE TO BE CONSTRUCTED TIGHT TO STRUCTURE, PIPING AND OTHER PENETRATIONS. ALL PENETRATIONS AND PERIMETER OF WALLS TO BE FIRE CAULKED.

F. STEEL STUD PARTITIONS SHALL BE BRACED TO STRUCTURE ABOVE.

G. REFER TO FLOOR PLANS FOR LOCATIONS OF INTERIOR PARTITION TYPES.

H. REFER TO SHEET AX.X FOR TYPICAL INTERIOR PARTITIONS DETAILS.

I. ALL PARTITIONS SCHEDULED RECEIVE WALL TILE SHALL HAVE CEMENTITIOUS BACKER UNIT TO FULL HEIGHT OF WALL TILE.

J. ALL PENETRATIONS IN FIRE RATED PARTITIONS SHALL BE FIRESTOPPED, WHETHER THEY ARE NEW OR EXISTING. INCLUDING THOSE CREATED BY THE REMOVAL OF AN EXISTING PENETRATING ITEM. FIRESTOPPING SYSTEMS SHALL BE FM OR U.L. LABORATORY APPROVED PRODUCTS.

K. APPLY ACOUSTICAL SEALANT AT ENTIRE PERIMETER OF ALL GYPSUM BOARD PARTITIONS.

L. AT ALL STC-RATED ACOUSTICAL / SOUND CONTROL TYPE PARTITIONS APPLY ACOUSTICAL SEALANT AT PERIMETER OF PARTITION AND AROUND ELECTRICAL RECEPTACLES, PIPES AND & DUCT PENETRATIONS. ACOUSTICAL SEALANT SHALL BE APPLIED TO BOTH FACES OF PARTITION.

M. EXISTING BUILDING FLOOR TO DECK HEIGHTS FOR AREAS OF WORK:

- FIRST FLOOR TO ROOF ROOMS 101-118: F.V. VARIABLE - DECK SLOPES SOUTH TO NORTH
- FIRST FLOOR TO ROOF ROOMS 119-140: F.V. VARIABLE - DECK SLOPES SOUTH TO NORTH

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

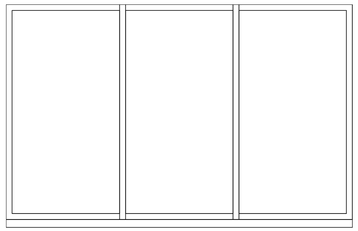
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

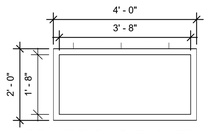
TITLE
WALL TYPES

SHEET NO.
A0.4

1/21/2026 9:53:17 AM



B1 SF-1
1/2" = 1'-0"



B3 SF-3 (BID ALT)
1/2" = 1'-0"

WINDOW AND STOREFRONT SCHEDULE

Type	R.O. Width	R.O. Height	Frame Material	Head	Jamb	Sill	Glazing Thickness	Glazing Type	Head Height	Comments
SF-1	3' - 4"	6' - 0"	ALUM.						8' - 8"	1.
SF-2	3' - 6"	6' - 0"	ALUM.						8' - 8"	EXISTING.
SF-3	4' - 0"	2' - 0"	ALUM.	F3/A0.6 & E1/A0.7	F1/A0.6 & F1/A0.7	F5/A0.6 & F3/A0.7			7' - 4"	2.

STOREFRONT REMARKS

No.	REMARK
1	EXISTING STOREFRONT UNIT TO BE RELOCATED. F.V. SIZE.
2	MATCH FINISHES OF EXISTING TO REMAIN.
3	FIELD VERIFY DIMENSIONS OF ALL EXISTING STOREFRONTS.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER
12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

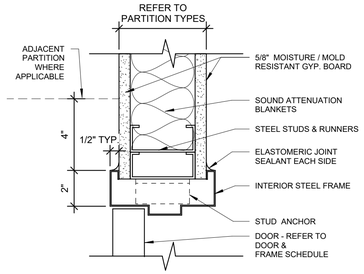
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

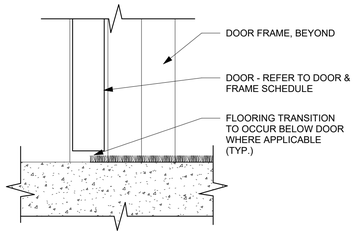
TITLE
WINDOW SCHEDULE AND ELEVATIONS (BID ALT)

SHEET NO.
A0.5

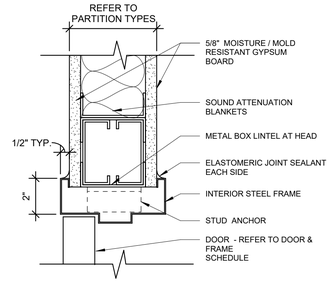
1/21/2026 9:53:17 AM



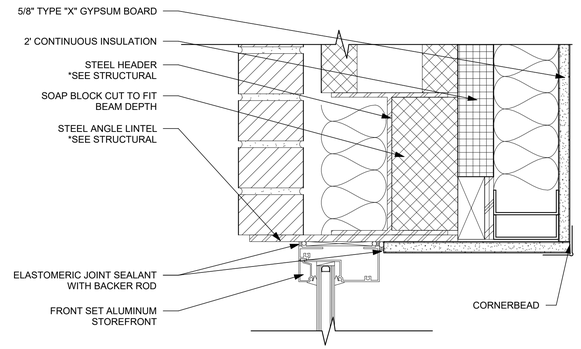
B1 TYP. INT. DOOR JAMB DETAIL
3" = 1'-0"



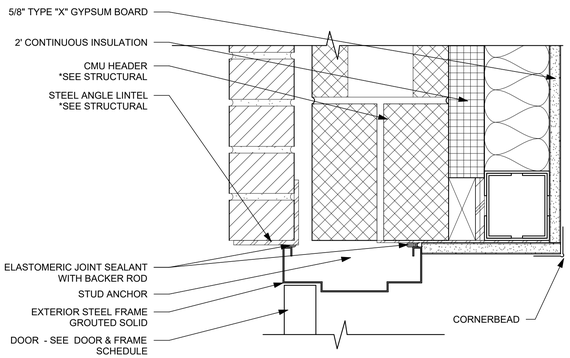
B2 TYP. INT. DOOR SILL DETAIL
3" = 1'-0"



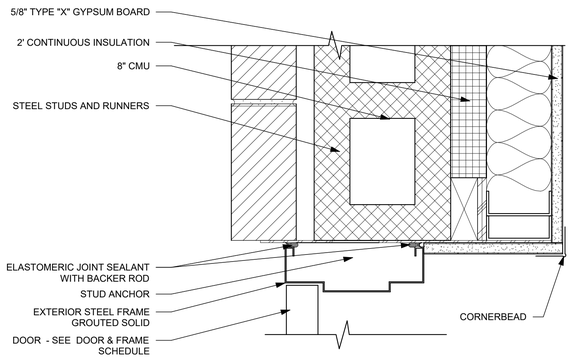
B4 TYP. INTERIOR DOOR HEAD DETAIL
3" = 1'-0"



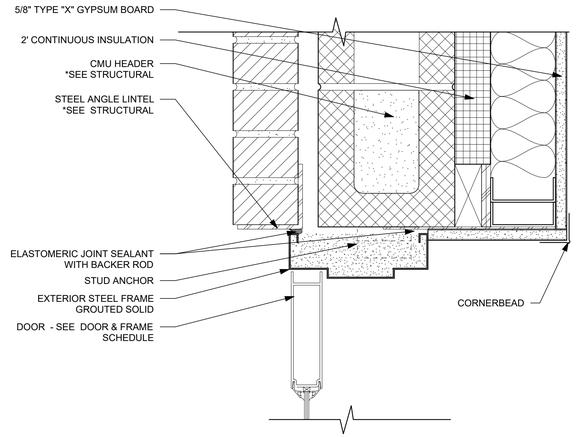
B5 WINDOW (SF-3) HEAD DETAIL - EXISTING STOREFRONT
3" = 1'-0"



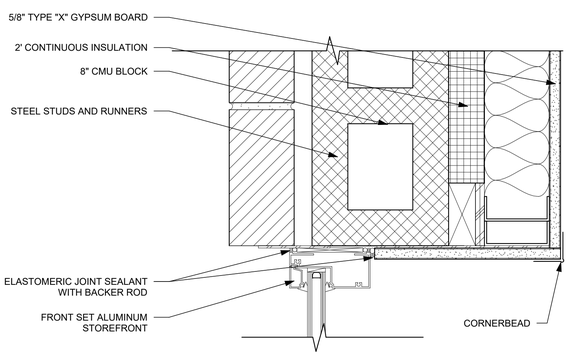
D1 DOOR HEAD DETAIL - BRICK
3" = 1'-0"



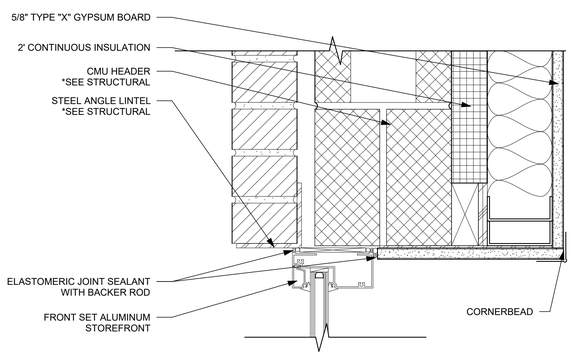
D3 DOOR JAMB DETAIL - BRICK
3" = 1'-0"



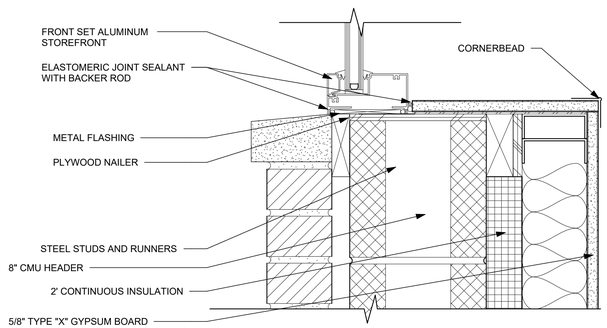
D5 DOOR HEAD DETAIL - BRICK (STOREFRONT)
3" = 1'-0"



F1 WINDOW (SF-3) JAMB DETAIL - BRICK
3" = 1'-0"



F3 WINDOW (SF-3) HEAD DETAIL - BRICK
3" = 1'-0"



F5 WINDOW SILL DETAIL - BRICK (STOREFRONT)
3" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836.8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER 12147 REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

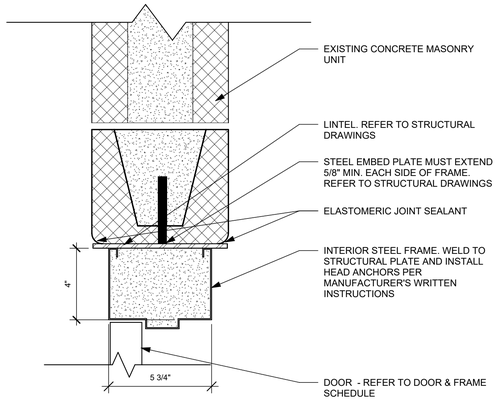
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

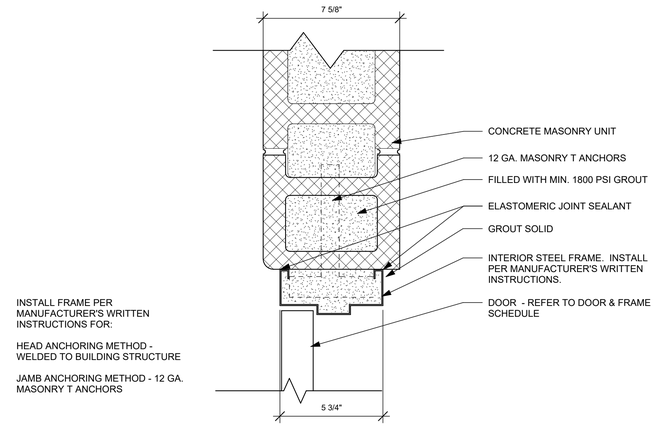
TITLE
DOOR AND WINDOW DETAILS

SHEET NO.
A0.6

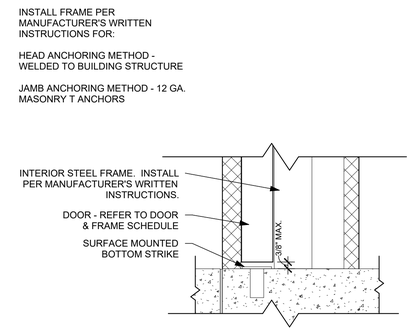
1/21/2026 9:53:19 AM



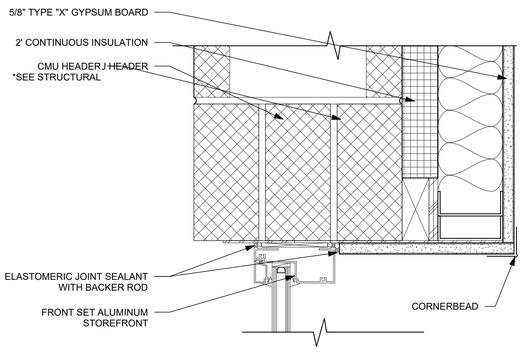
C1 HEAD DETAIL - CMU WALL (STORM SHELTER)
3" = 1'-0"



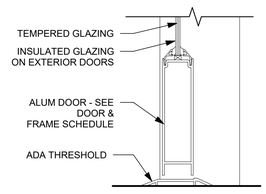
C3 JAMB DETAIL - CMU (STORM SHELTER)
3" = 1'-0"



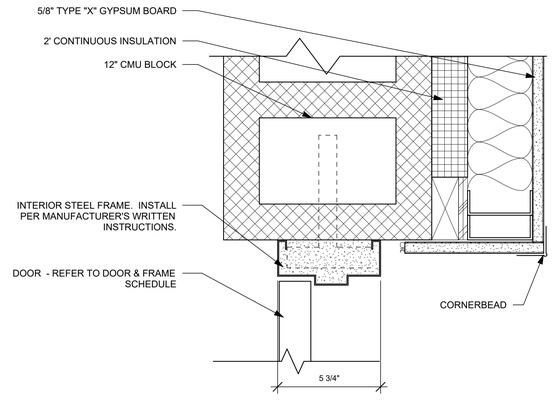
C5 SILL DETAIL - HOLLOW METAL (STORM SHELTER)
3" = 1'-0"



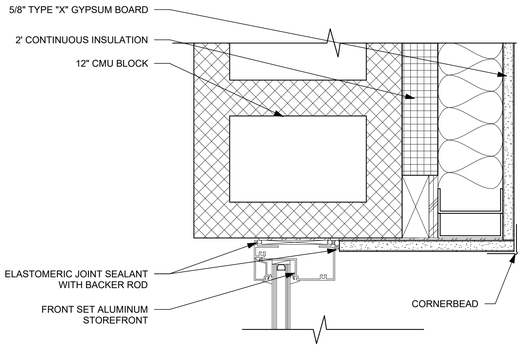
E1 WINDOW (SF-3) HEAD DETAIL - BLOCK
3" = 1'-0"



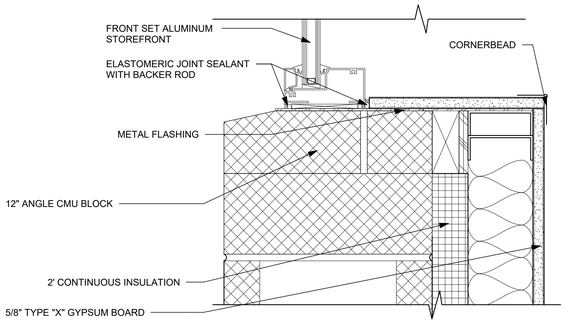
E3 SILL DETAIL - EXISTING RELOCATED STOREFRONT
3" = 1'-0"



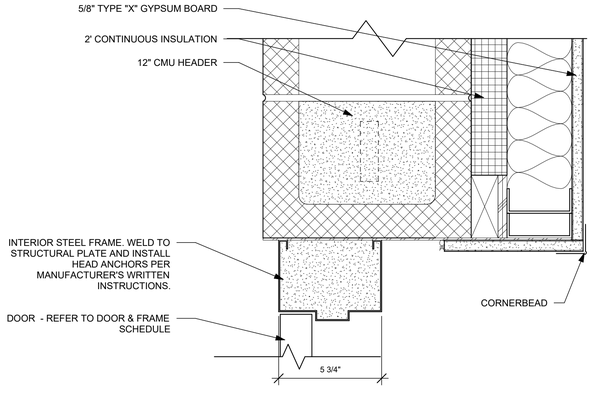
E5 JAMB DETAIL - CMU
3" = 1'-0"



F1 WINDOW (SF-3) JAMB DETAIL - BLOCK
3" = 1'-0"



F3 WINDOW (SF-3) SILL DETAIL - BLOCK
3" = 1'-0"



F5 HEAD DETAIL - CMU WALL
3" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER 12147 REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

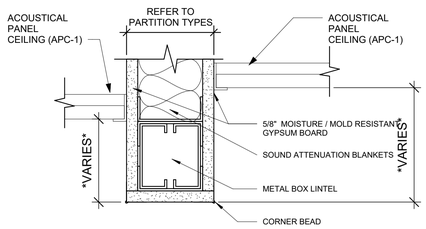
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

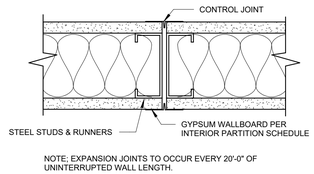
TITLE
DOOR AND WINDOW DETAILS

SHEET NO.
A0.7

1/21/2026 9:53:19 AM

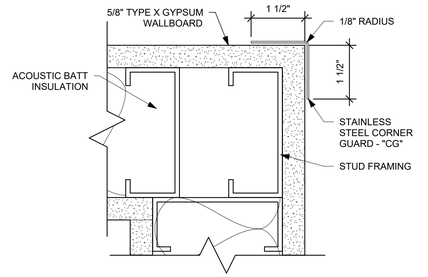


B1 TYP. BULKHEAD DETAIL
3" = 1'-0"

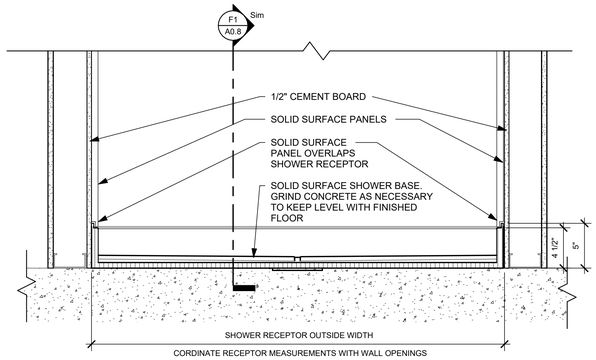


NOTE: EXPANSION JOINTS TO OCCUR EVERY 20'-0" OF UNINTERRUPTED WALL LENGTH.

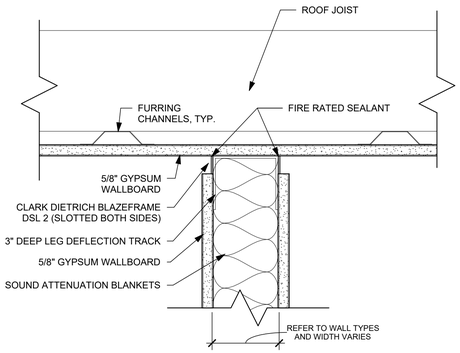
B3 TYP. GWB EXPANSION DETAIL
3" = 1'-0"



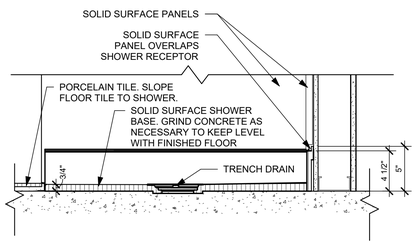
B4 CG-1 CORNER GUARD
6" = 1'-0"



D1 TYP. SHOWER RECEPTOR DETAIL
1 1/2" = 1'-0"



D4 TYPICAL DEFLECTION TRACK DETAIL
3" = 1'-0"



F1 TYP. SHOWER RECEPTOR DETAIL SECTION
1 1/2" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER 12147 REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

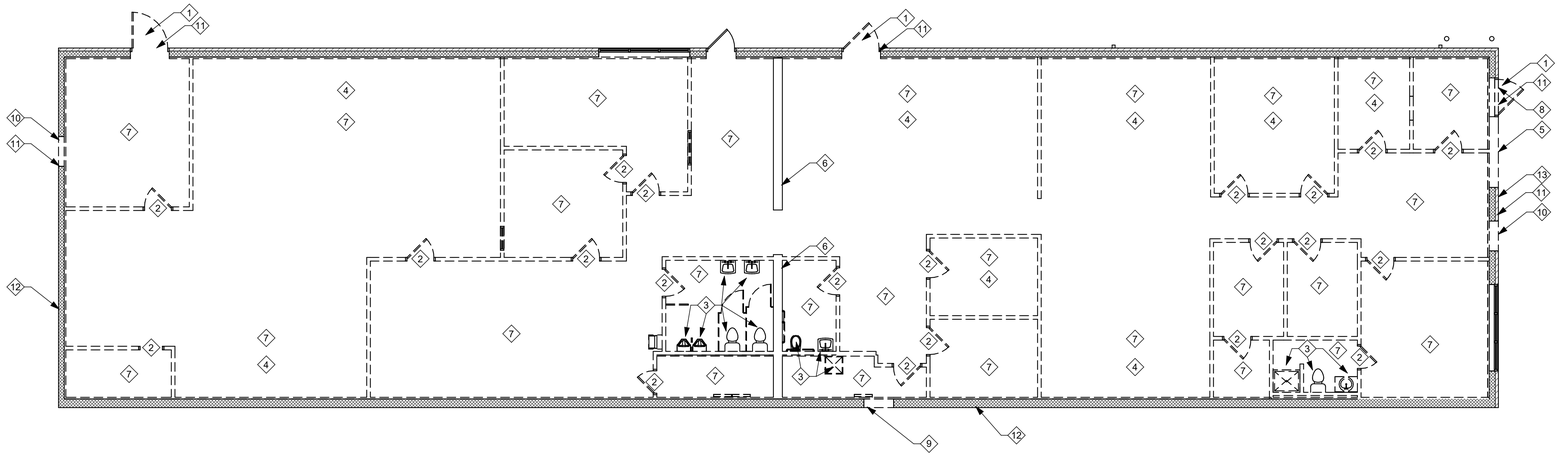
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
INTERIOR DETAILS

SHEET NO.
A0.8

1/21/2026 9:53:19 AM



E1 DEMOLITION PLAN
1/8" = 1'-0"

DEMOLITION NOTES

(00) INDICATES DEMOLITION NOTE.

1 REMOVE EXISTING DOOR AND FRAME TO RELOCATE. INFILL TO MATCH EXISTING EXTERIOR WALL TYPE AND CONSTRUCTION. REFER TO SHEET A1.1 FOR RELOCATION.

2 REMOVE EXISTING DOOR AND FRAME.

3 REMOVE EXISTING PLUMBING FIXTURES. REFER TO PLUMBING DRAWINGS.

4 REMOVE EXISTING CASEWORK AND WALL FIXTURES.

5 REMOVE PORTION OF EXISTING WALL FOR NEW STOREFRONT. REFER TO SHEET A1.1.

6 PRESERVE EXISTING MASONRY WALL, REMOVE FURRING.

7 REMOVE EXISTING FLOOR FINISH. CLEAN AND PREPARE SLAB BELOW FOR NEW FLOORING MATERIAL

8 REMOVE EXISTING CANOPY.

9 REMOVE PORTION OF EXISTING WALL FOR NEW DOOR.

10 REMOVE PORTION OF EXISTING WALL FOR DOOR RELOCATION.

11 REPAIR BRICK EXTERIOR AFTER REMOVAL TO MATCH EXISTING.

12 BLOCK WALLS. ALLOW FOR 200 SF OF REPAIR. PROVIDE SF ALLOWANCE FOR ADDITIONAL TUCKPOINTING AS REQUIRED.

13 REMOVE EXISTING WINDOW (SF-1) AND FRAME TO RELOCATE. INFILL TO MATCH EXISTING EXTERIOR WALL TYPE AND CONSTRUCTION. REFER TO SHEET A1.1 FOR RELOCATION.

GENERAL NOTES

A. PRIOR TO DEMOLITION, FIELD INVESTIGATE EXISTING CONDITIONS AND NOTIFY ARCHITECT AND OWNER OF ANY DISCREPANCIES.

B. PRIOR TO DEMOLITION, VERIFY THAT EXISTING UTILITIES HAVE BEEN DISCONNECTED AND CAPPED, AND TEMPORARY SHORING IS IN PLACE TO PREVENT MOVEMENT, SETTLEMENT, OR COLLAPSE OF CONSTRUCTION.

C. REFER TO MECHANICAL, PLUMBING, ELECTRICAL AND STRUCTURAL DRAWINGS FOR ADDITIONAL DEMOLITION WORK.

D. REPAIR, LEVEL, AND PREPARE EXISTING CONCRETE FLOOR SLABS TO RECEIVE NEW FLOOR FINISH. REFER TO ARCHITECTURAL ROOM FINISH SCHEDULE AND SPECIFICATIONS FOR ADDITIONAL INFORMATION.

E. PRIOR TO DISPOSAL OF EXISTING EQUIPMENT AND/OR FIXTURES COORDINATE WITH OWNER.

F. CONTRACTOR(S) SHALL BE RESPONSIBLE FOR REMOVING ALL CONSTRUCTION DEBRIS FROM JOB SITE IN A LEGAL AND TIMELY MANNER. LOCATION(S) OF JOBSITE DUMPSTER SHALL BE COORDINATED WITH OWNER PRIOR TO START OF CONSTRUCTION.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147

Todd A. Gindelberger - License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

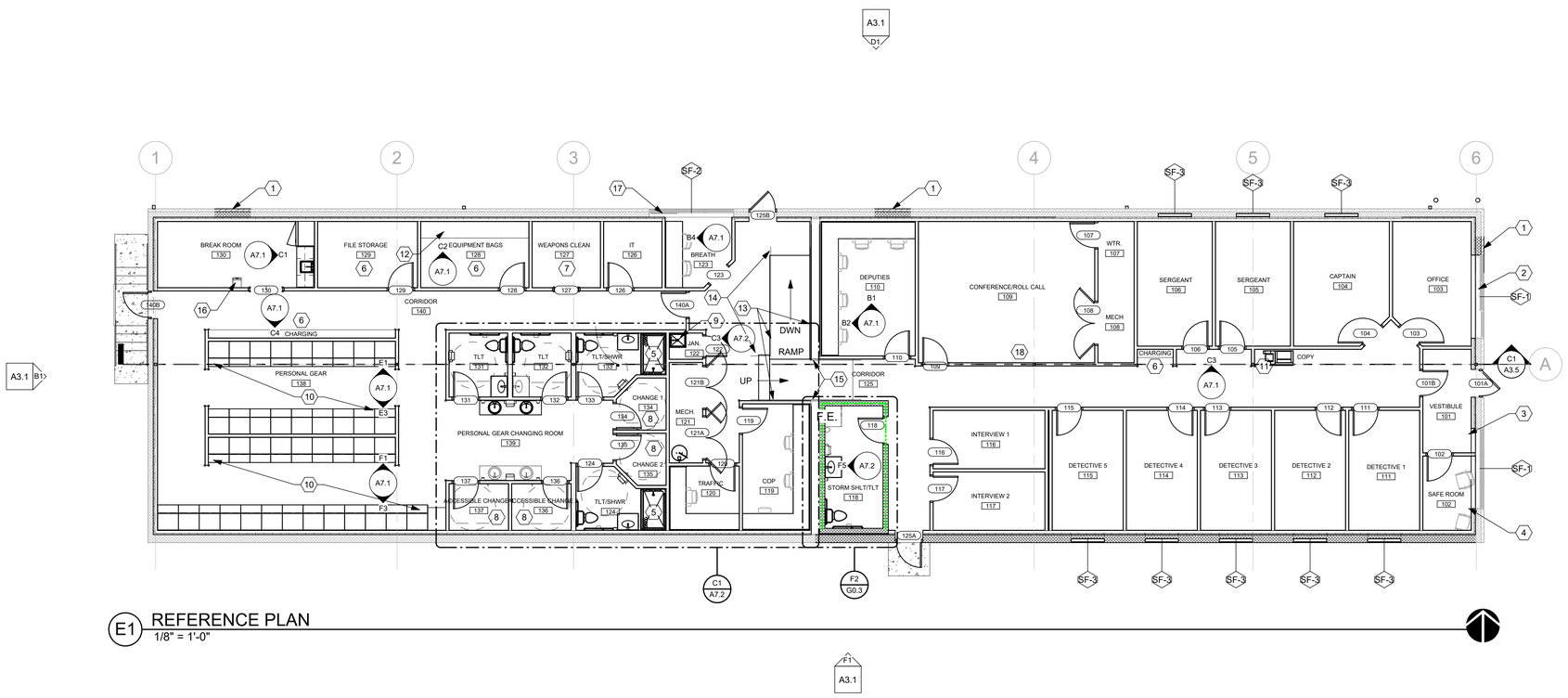
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
DEMOLITION PLAN

SHEET NO.
A1.0

1/21/2026 9:53:21 AM



E1 REFERENCE PLAN
1/8" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 EXTERIOR INFILL. REFER TO SHEET A1.0.

2 RELOCATE. REFER TO SHEET A1.0.

3 NOT USED.

4 SAFE ROOM. INSTALL EMERGENCY LOCK AND 911 CALL BOX.

5 SHOWER PAN RECESSED IN CONCRETE. SHOWER PAN ACTS AS FLOOR DRAIN FOR ROOM.

6 WALL MOUNTED SHELVES. REFER TO CASEWORK DETAILS ON A8.2.

7 WALL MOUNTED SECURE FIREARM RACK. REFER TO INTERIOR ELEVATIONS FOR DETAILS.

8 ADA CHANGING BENCH 20" x 42". 17 1/2" HEIGHT.

9 MOP SINK WITH MOP HOLDERS ABOVE. REFER TO PLUMBING DRAWINGS.

10 GEAR LOCKERS WITH POWER HOOKUPS. COORDINATE WITH ELECTRICAL DRAWINGS.

11 ALCOVE FOR COPIER.

12 HEAVY DUTY TACTICAL GEAR SHELF. REFER T CASEWORK DETAILS ON SHEET A8.1.

13 EXISTING FLOOR MOUNTED HANDRAILS TO BE RETAINED AND PAINTED P-1. PROVIDE 1 1/2" SPACING BETWEEN RAILS AND WALLS TO BE BUILT.

14 EXISTING FLOOR MOUNTED HANDRAIL RETAIN AND PAINT. ADD EXTENSION ALONG LENGTH OF STEPS. MATCH EXISTING.

15 REMOVE EXISTING WALL MOUNT HANDRAIL AND RE-INSTALL TO NEW WALLS. EXTEND ALONG STEPS. PAINT TO MATCH EXISTING CONDITIONS.

16 DRINKING WATER DISPENSER.

17 APPLY OPAQUE 3M FILM TO INSIDE FACE OF GLAZING PANE.

18 RELOCATED EXISTING MAILBOXES. COORDINATE WITH OWNER.

GENERAL NOTES

A. ALL INTERIOR PARTITIONS ARE TYPE A1 U.N.O. UNLESS OTHERWISE NOTED.

B. ALL PARTITIONS ARE TO BE BRACED TO STRUCTURE ABOVE U.N.O.

C. PROVIDE FIRE RETARDANT WOOD BLOCKING BEHIND ALL WALL HUNG ACCESSORIES, CABINETS, FURNISHINGS, HANDRAILS U.N.O.

D. REFER TO INTERIOR ELEVATIONS FOR TOILET ROOM ACCESSORY CALLOUTS.

E. FOR EXTERIOR PAD REFER TO SHEET G0.2.

F. REFER TO FINISHED FLOOR PLAN FOR CORNER GUARD AND END WALL GUARD LOCATIONS.

G. ALL EXPOSED STRUCTURAL STEEL TO BE EPOXY PAINTED.

H. DIMENSIONS ARE FROM FINISHED FACE TO FINISHED FACE U.N.O.

I. FURNITURE AND EQUIPMENT SHOWN FOR REFERENCE ONLY.

J. HINGE SIDE OF DOORS ARE 6" FROM ADJACENT WALL U.N.O.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER 12147 REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

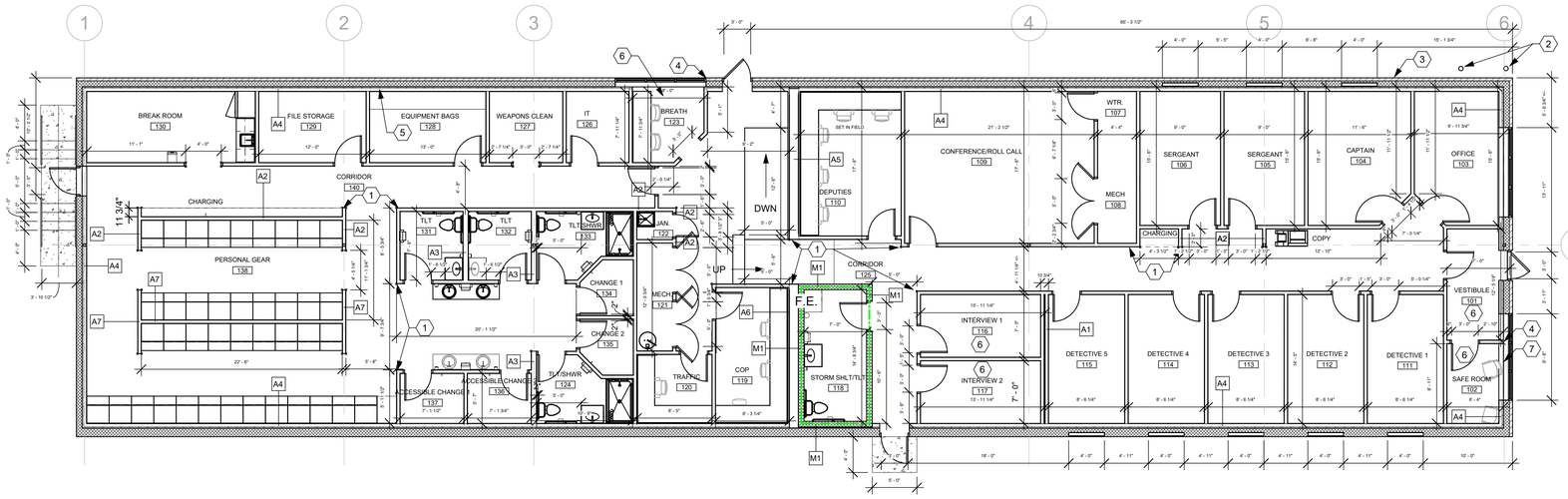
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
REFERENCE PLAN

SHEET NO.
A1.1

12/1/2026 9:53:22 AM



E1 DIMENSION PLAN
1/8" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 ALIGN.

2 CONCRETE BOLLARD. REFER TO SHEET A5.1 FOR DETAILS.

3 REPAIR EXISTING FOUNDATION TO MATCH EXISTING EXTERIOR WALL TYPE. REFER TO STRUCTURAL DRAWINGS.

4 CENTER WALL ON MULLION.

5 PROVIDE 1/2" PLYWOOD BACKUP BEHIND GYP. BD. THIS WALL. SEE ALSO SHEET A8.1 F6.

6 HIGH ABUSE GYPSUM WALL BOARD THIS ROOM. SEE ALSO ROOM FINISH SCHEDULE.

7 PROVIDE BLINDS IN ROOM 102. COORDINATE WITH OWENR.

GENERAL NOTES

A. ALL INTERIOR PARTITIONS ARE TYPE A1 U.N.O. UNLESS OTHERWISE NOTED.

B. ALL PARTITIONS ARE TO BE BRACED TO STRUCTURE ABOVE U.N.O.

C. PROVIDE FIRE RETARDANT WOOD BLOCKING BEHIND ALL WALL HUNG ACCESSORIES, CABINETS, FURNISHINGS, HANDRAILS U.N.O.

D. REFER TO INTERIOR ELEVATIONS FOR TOILET ROOM ACCESSORY CALLOUTS.

E. FOR SIDEWALKS AND EXTERIOR PADS REFER TO CIVIL SITE AND LANDSCAPE PLANS.

F. REFER TO FINISHED FLOOR PLAN FOR CORNER GUARD AND END WALL GUARD LOCATIONS.

G. ALL EXPOSED STRUCTURAL STEEL TO BE EPOXY PAINTED.

H. DIMENSIONS ARE FROM FINISHED FACE TO FINISHED FACE U.N.O.

I. FURNITURE AND EQUIPMENT SHOWN FOR REFERENCE ONLY.

J. HINGE SIDE OF DOORS ARE 6" FROM ADJACENT WALL U.N.O.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147
Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

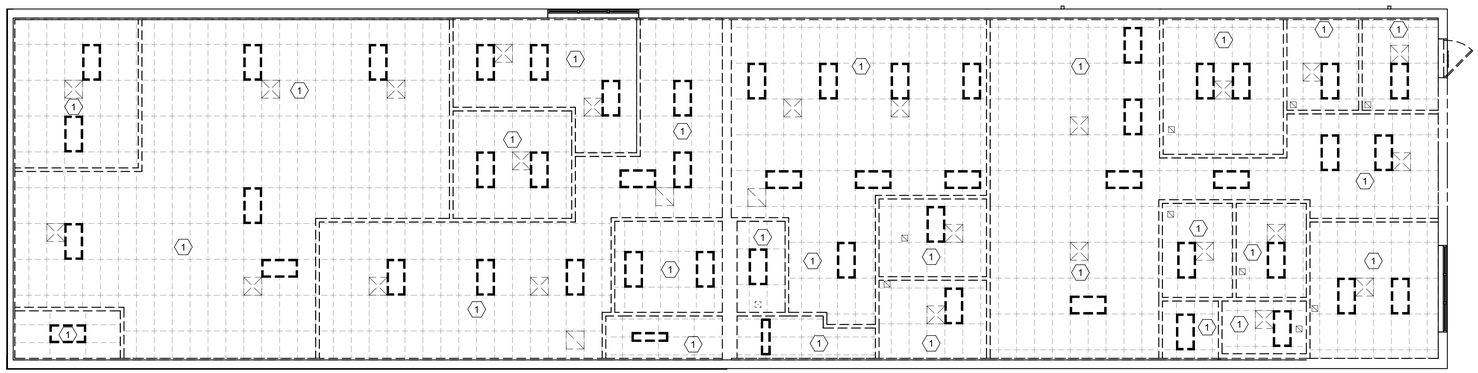
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
DIMENSION PLAN

SHEET NO.
A1.2

12/1/2026 9:53:29 AM



E1 DEMOLITION CEILING PLAN
1/8" = 1'-0"

DEMOLITION NOTES

00 INDICATES DEMOLITION NOTE.

1 REMOVE EXISTING CEILING AND GRID.

GENERAL NOTES

A. PRIOR TO DEMOLITION, FIELD INVESTIGATE EXISTING CONDITIONS AND NOTIFY ARCHITECT AND OWNER OF ANY DISCREPANCIES.

B. PRIOR TO DEMOLITION, VERIFY THAT EXISTING UTILITIES HAVE BEEN DISCONNECTED AND CAPPED, AND TEMPORARY SHORING IS IN PLACE TO PREVENT MOVEMENT, SETTLEMENT, OR COLLAPSE OF CONSTRUCTION.

C. REFER TO MECHANICAL, PLUMBING, ELECTRICAL AND STRUCTURAL DRAWINGS FOR ADDITIONAL DEMOLITION WORK.

D. PRIOR TO DISPOSAL OF EXISTING EQUIPMENT AND/OR FIXTURES COORDINATE WITH OWNER.

E. CONTRACTOR(S) SHALL BE RESPONSIBLE FOR REMOVING ALL CONSTRUCTION DEBRIS FROM JOB SITE IN A LEGAL AND TIMELY MANNER. LOCATION(S) OF JOBSITE DUMPSTER SHALL BE COORDINATED WITH OWNER PRIOR TO START OF CONSTRUCTION.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO · TODD A. GINDELBERGER · 12147 · REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

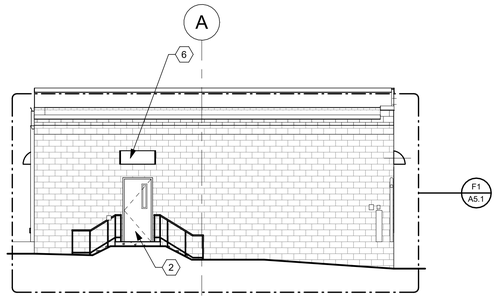
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

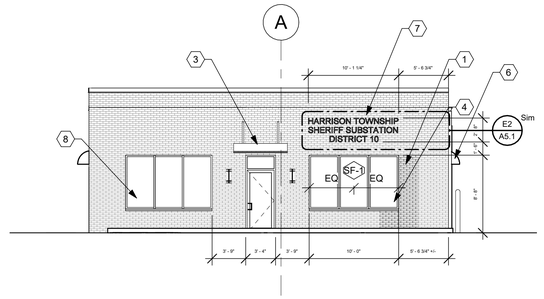
TITLE
DEMOLITION REFLECTED CEILING PLAN

SHEET NO.
A2.1

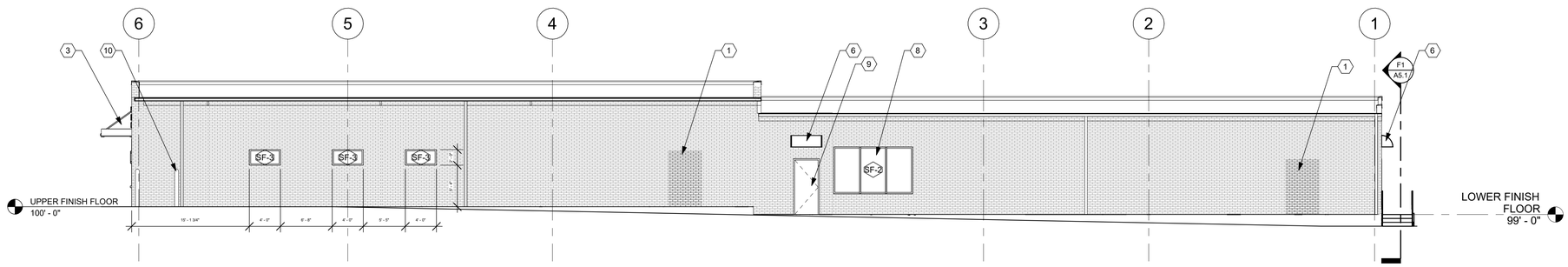
1/21/2026 9:53:26 AM



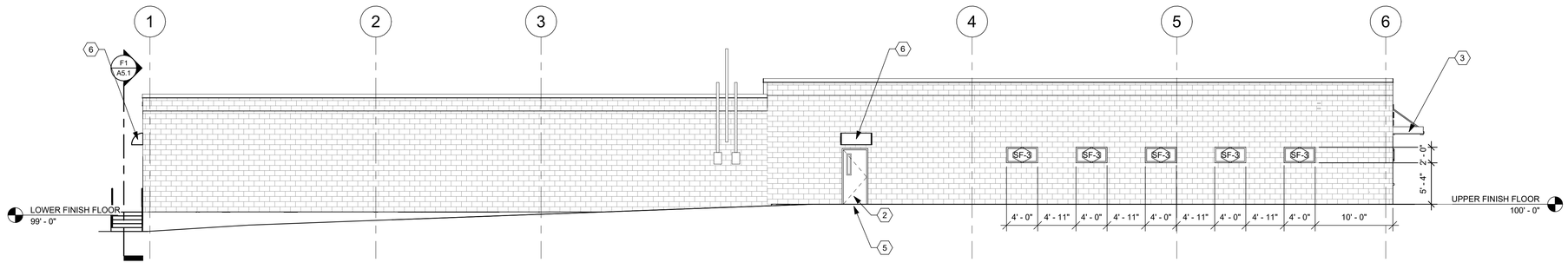
B1 EXTERIOR ELEVATION - WEST
1/8" = 1'-0"



B4 EXTERIOR ELEVATION - EAST
1/8" = 1'-0"



D1 EXTERIOR ELEVATION - NORTH
1/8" = 1'-0"



F1 EXTERIOR ELEVATION - SOUTH
1/8" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 MASONRY INFILL AFTER DOOR REMOVAL. MATCH EXISTING.

2 NEW INSULATED HOLLOW METAL DOOR.

3 SUSPENDED CABLE ALUMINUM CANOPY. REFER TO SHEET A5.1 AND STRUCTURAL DRAWINGS FOR DETAILS.

4 MATCH EXISTING RELOCATED WINDOW HEIGHT.

5 TOP OF PAD ALIGNS WITH FINISH FLOOR.

6 EXISTING CANOPY - RETAIN.

7 SIGNAGE BY ELLET DESIGN COMPANY OR EQUAL. CENTER OVER WINDOW.

8 EXISTING WINDOW TO REMAIN. RECAULK EXTERIOR.

9 EXISTING DOOR TO REMAIN. RECAULK EXTERIOR.

10 PATCH AND REPAIR FOUNDATION, MASONRY, AND PAVING AT THIS LOCATION.

GENERAL NOTES

A. EXISTING GUTTERS AND DOWNSPOUTS TO REMAIN REPAIR AS NEEDED. MAINTAIN OUTLETS TO FLOW AWAY FROM BUILDING.

B. CAULK ALL NEW AND EXISTING WINDOWS, DOORS, PENETRATIONS, AND EXPANSION JOINTS.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836-8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

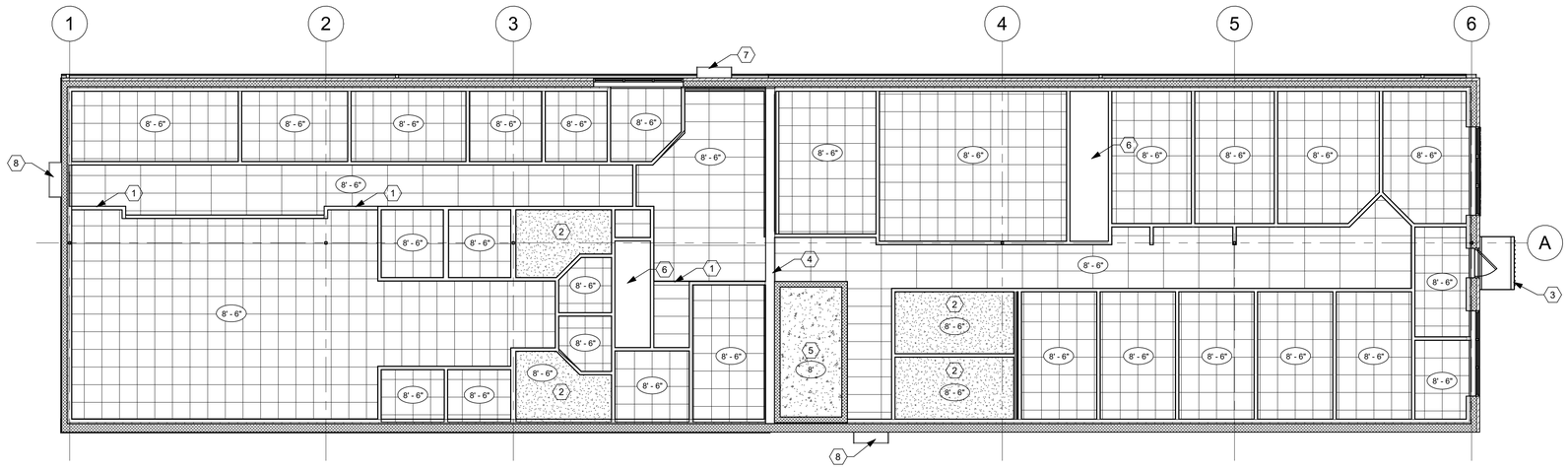
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
EXTERIOR ELEVATIONS

SHEET NO.
A3.1

12/12/2026 9:53:39 AM



E1 REFLECTED CEILING PLAN
1/8" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 FRAMED BULKHEAD AT 8'-6" AFF.

2 FRAMED GYPSUM CEILING.

3 SUSPENDED CABLE ALUMINUM CANOPY. REFER TO SHEET A5.1 AND STRUCTURAL DRAWINGS FOR DETAILS.

4 KEEP EXISTING FRAMED OPENING.

5 CONCRETE LID OF STORM SHELTER IS INDEPENDENT OF SURROUNDING WALL STRUCTURES. REFER TO STRUCTURAL DRAWINGS FOR DETAILS.

6 LEAVE EXPOSED.

7 EXISTING CANOPY - RETAIN.

8 MATCH EXISTING CANOPY AT EGRESS DOOR 125B.

GENERAL NOTES

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER
12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

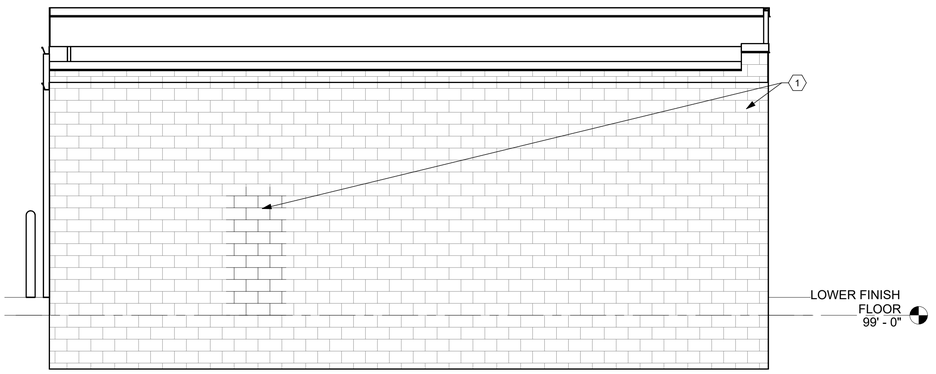
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
REFLECTED CEILING PLAN

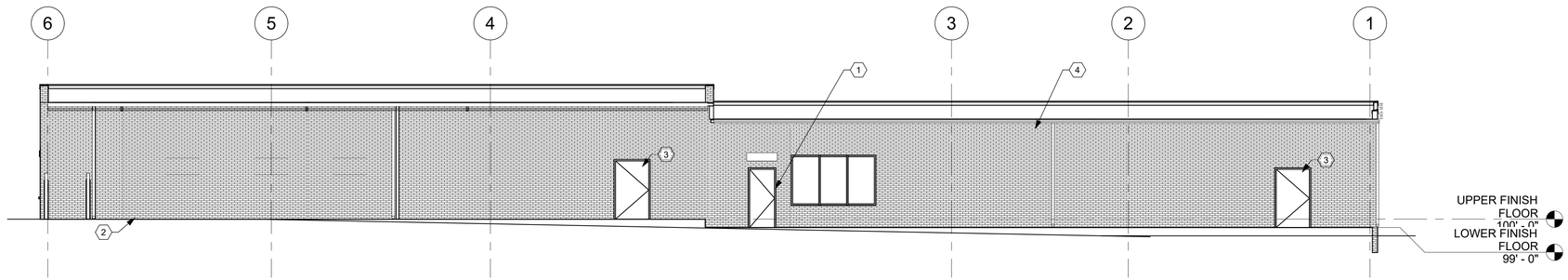
SHEET NO.
A2.2

1/21/2026 9:53:27 AM

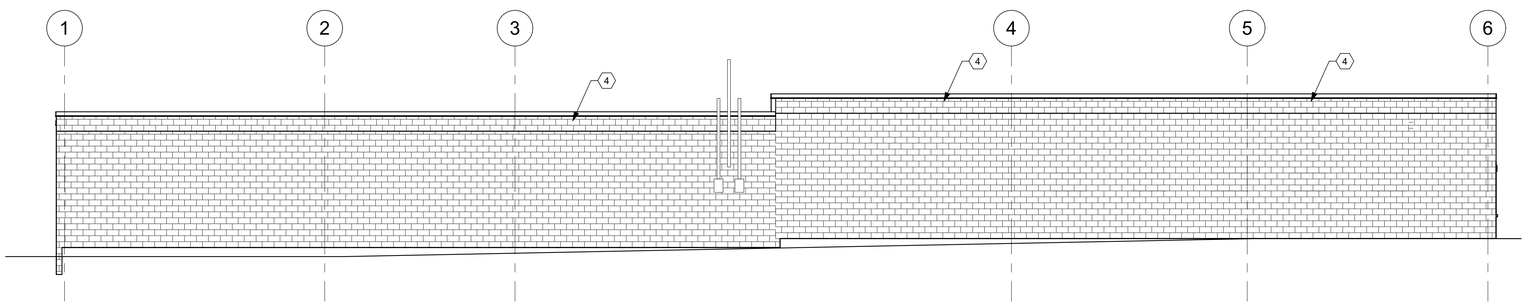


C1 EXTERIOR ELEVATION - WEST REPAIR
1/4" = 1'-0"

C4 WEST ELEVATION EXISTING
12" = 1'-0"



D1 EXTERIOR ELEVATION - NORTH REPAIR
1/8" = 1'-0"



F1 EXTERIOR ELEVATION - SOUTH REPAIR
1/8" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 TUCKPOINT AND REPAINT ENTIRE EXISTING WALL AFTER DOOR INSTALLATION.

2 REPAIR EXISTING FOUNDATION TO MATCH EXISTING EXTERIOR WALL TYPE, REFER TO STRUCTURAL DRAWINGS.

3 REMOVE EXISTING DOOR AND INFILL TO MATCH EXISTING EXTERIOR WALL TYPE.

4 TUCKPOINT EXISTING WALL. PROVIDE ALLOWANCE FOR 200 SF. REPAINT ENTIRE WALL.

GENERAL NOTES

A. EXISTING GUTTERS AND DOWNSPOUTS TO REMAIN REPAIR AS NEEDED. MAINTAIN OUTLETS TO FLOW AWAY FROM BUILDING.

B. CAULK ALL NEW AND EXISTING WINDOWS, DOORS, PENETRATIONS, AND EXPANSION JOINTS.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER
12147

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

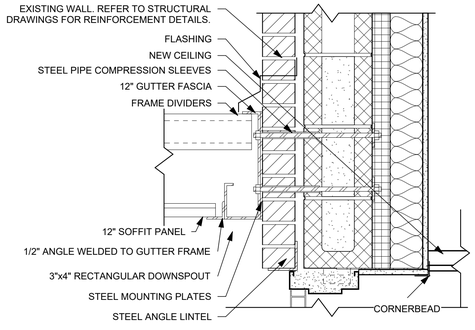
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

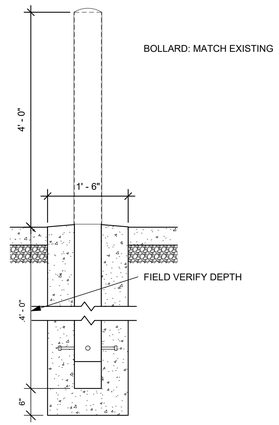
TITLE
EXTERIOR ELEVATIONS EXISTING

SHEET NO.
A3.2

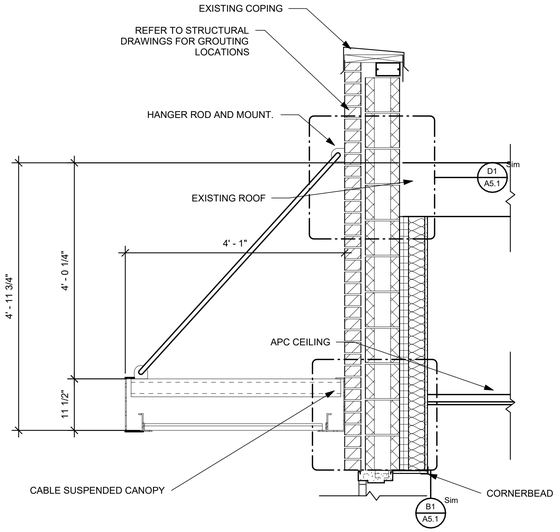
1/21/2026 9:53:31 AM



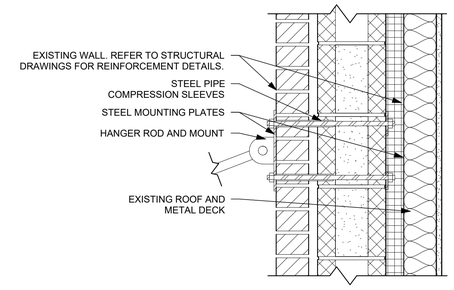
B1 CANOPY CONNECTION DETAIL 2
1 1/2" = 1'-0"



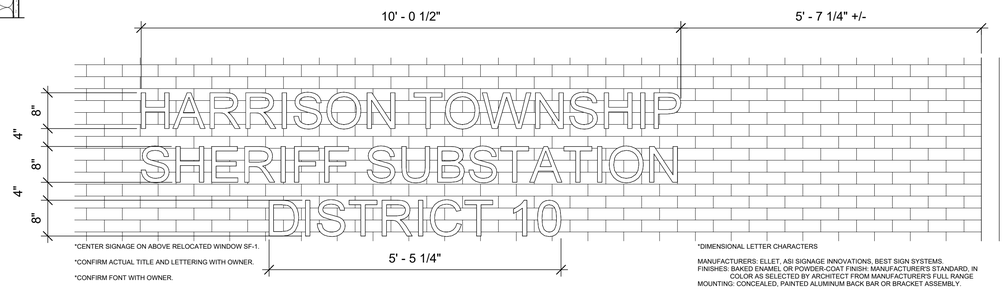
C2 PIPE BOLLARD DETAIL
3/4" = 1'-0"



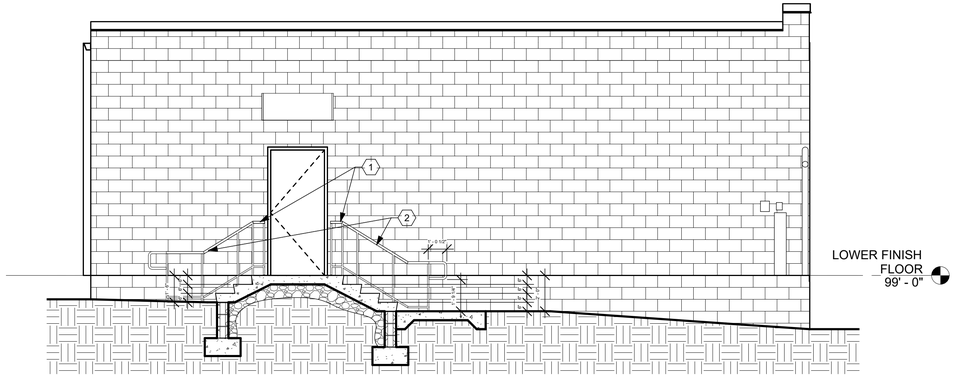
C3 CANOPY DETAIL
3/4" = 1'-0"



D1 CANOPY CONNECTION DETAIL 1
1 1/2" = 1'-0"



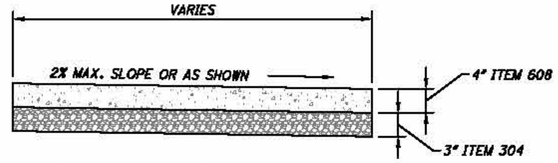
E2 SIGNAGE DETAIL
3/4" = 1'-0"



1 1 1/2" PIPE HANDRAIL. SPACE BETWEEN RAILS NOT TO EXCEED 21".

2 SURFACE MOUNT RAILS TO TOP OF STAIRS WITH SHALLOW BREAKOUT SCREWS. ATTACHMENT TO RESIST LINEAR LOAD OF 50 LBS. PER LINEAR FOOT. USE ESCUTHEON PLATE.

F1 EXTERIOR STEPS SECTION
1/4" = 1'-0"



NOTES

A. WALK TO BE POURED ON 3" MINIMUM ODOT #304.

B. PROVIDE EDGING AND BROOM FINISH TO ALL EXPOSED SURFACES.

C. CONCRETE SHALL CONFORM TO ODOT ITEM 499 CONCRETE AND WORK SHALL CONFORM TO ODOT ITEM 608, UNLESS OTHERWISE SPECIFIED WITHIN.

D. USE WHITE PIGMENTED CURING COMPOUND IMMEDIATELY AFTER FINISHING SURFACES. ANY OTHER METHOD OR TYPE OF CURING COMPOUND MUST BE PREAPPROVED.

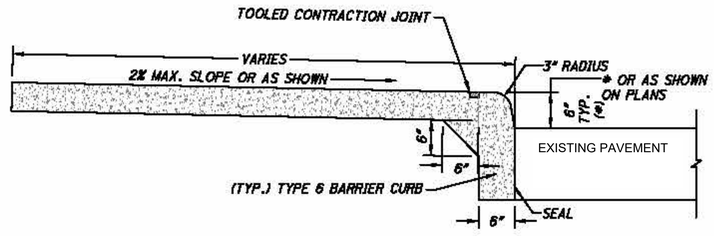
E. ALL CONCRETE SHALL BE ODOT QC-IP.

F. PROPOSED CONCRETE WALK SHALL BE JOINTED AS CLOSE TO SQUARE AS POSSIBLE. JOINT SPACING MAY VARY SLIGHTLY DEPENDING ON THE LENGTH AND WIDTH OF THE PROPOSED SIDEWALK AREAS. JOINT SPACING SHALL TYPICALLY RANGE FROM 4'X4' TO 10'X10'. IN ALL CASES THE SIDEWALK SHALL BE JOINTED SO THAT THE MAXIMUM ASPECT RATIO (OF PANEL LENGTH TO WIDTH) OF THE JOINTING IS 1.25:1 OR LESS. CONTRACTOR TO VERIFY METHOD AND TYPE OF CONTROL JOINTING WITH OWNER PRIOR TO PERFORMING WORK.

G. SIDEWALK SHALL HAVE EXPANSION JOINTS EVERY 100'.

H. CONCRETE TO INCLUDE 3 LBS/CY OF EITHER EUCLID CHEMICAL TUFSTRAND SF, FORTA FERRO SYNTHETIC MACROFIBERS OR APPROVED EQUIVALENT MEETING ASTM C 1116 TYPE 3, MINIMUM 2" LENGTH, ASPECT RATIO 50 TO 90. CONTRACTOR SHALL CONTACT THE FIBER MANUFACTURER'S SUPPLIER 48 HOURS PRIOR TO ORDERING THE FIRST BATCH OF CONCRETE FOR APPROPRIATE MIXING AND FINISHING PROCEDURES.

CONCRETE WALK
NTS



NOTES

A. WALK TO BE POURED ON 3" MINIMUM ODOT #304.

B. (*) HEIGHT VARIES WITH CURB EXPOSURE. ASTERISK INDICATES PROPOSED TOP OF CURB SPOT GRADE ELEVATION WITH CURB EXPOSURE THAT VARIES FROM THE STANDARD 0.50' (6") CURB.

C. PROVIDE EDGING AND BROOM FINISH TO ALL EXPOSED SURFACES.

D. CONCRETE SHALL CONFORM TO ODOT ITEM 499 CONCRETE AND WORK SHALL CONFORM TO ODOT ITEM 608, UNLESS OTHERWISE SPECIFIED WITHIN.

E. USE WHITE PIGMENTED CURING COMPOUND IMMEDIATELY AFTER FINISHING SURFACES. ANY OTHER METHOD OR TYPE OF CURING COMPOUND MUST BE PREAPPROVED.

F. ALL CONCRETE SHALL BE ODOT QC-IP.

G. PROPOSED CONCRETE SIDEWALK SHALL BE JOINTED AS CLOSE TO SQUARE AS POSSIBLE. JOINT SPACING MAY VARY SLIGHTLY DEPENDING ON THE LENGTH AND WIDTH OF THE PROPOSED SIDEWALK AREAS. JOINT SPACING SHALL TYPICALLY RANGE FROM 4'X4' TO 10'X10'. IN ALL CASES THE SIDEWALK SHALL BE JOINTED SO THAT THE MAXIMUM ASPECT RATIO (OF PANEL LENGTH TO WIDTH) OF THE JOINTING IS 1.25:1 OR LESS. CONTRACTOR TO VERIFY METHOD AND TYPE OF CONTROL JOINTING WITH OWNER PRIOR TO PERFORMING WORK.

H. CURB/SIDEWALK SHALL HAVE EXPANSION JOINTS EVERY 100'.

I. CONCRETE TO INCLUDE 3 LBS/CY OF EITHER EUCLID CHEMICAL TUFSTRAND SF, FORTA FERRO SYNTHETIC MACROFIBERS OR APPROVED EQUIVALENT MEETING ASTM C 1116 TYPE 3, MINIMUM 2" LENGTH, ASPECT RATIO 50 TO 90. CONTRACTOR SHALL CONTACT THE FIBER MANUFACTURER'S SUPPLIER 48 HOURS PRIOR TO ORDERING THE FIRST BATCH OF CONCRETE FOR APPROPRIATE MIXING AND FINISHING PROCEDURES.

COMBINED CURB AND WALK
NTS

F5 PAD AND CURB DETAILS
1 1/2" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836-8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER 12147 REGISTERED ARCHITECT
Todd A. Gindelberger. License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

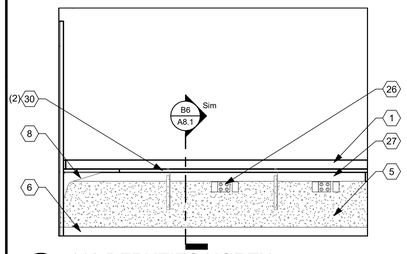
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

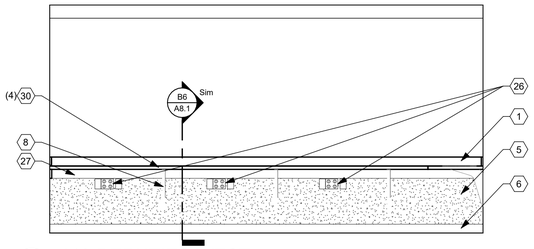
TITLE
EXTERIOR DETAILS

SHEET NO.
A5.1

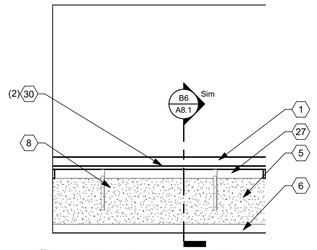
12/1/2026 9:53:32 AM



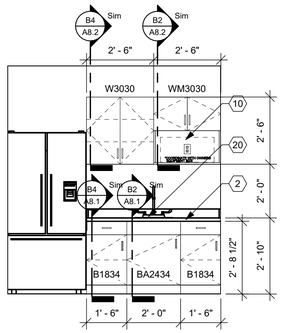
B1 110 DEPUTIES NORTH
3/8" = 1'-0"



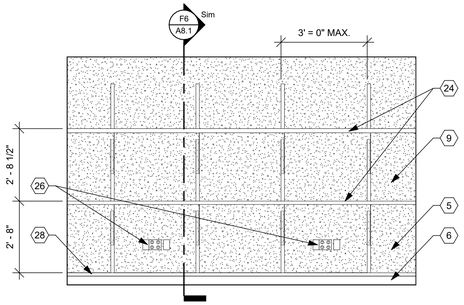
B2 110 DEPUTIES WEST
3/8" = 1'-0"



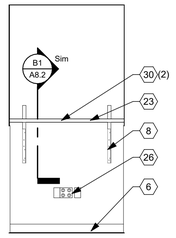
B4 123 BREATH WEST
3/8" = 1'-0"



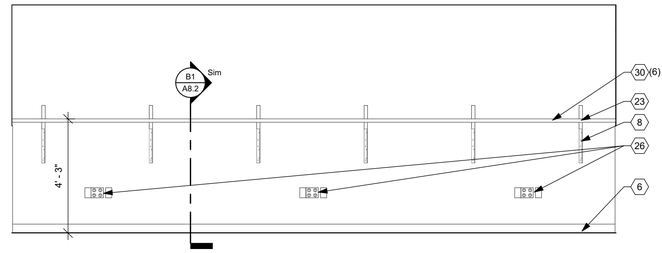
C1 130 BREAK ROOM EAST
3/8" = 1'-0"



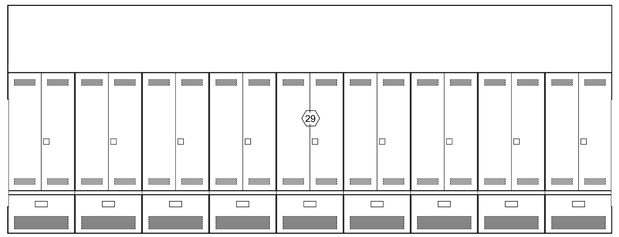
C2 128 EQUIPMENT BAGS
3/8" = 1'-0"



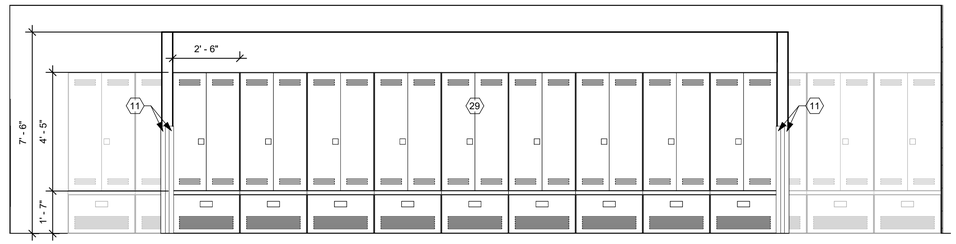
C3 125 CHARGING NORTH
3/8" = 1'-0"



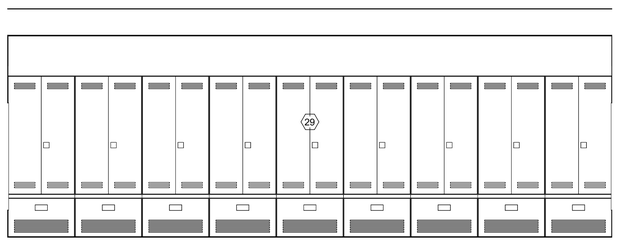
C4 140 CORRIDOR CHARGING SOUTH
3/8" = 1'-0"



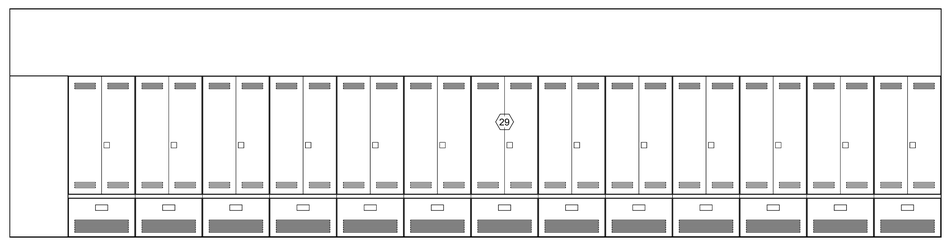
E1 139 LOCKERS NORTH
3/8" = 1'-0"



E3 139 LOCKERS SOUTH
3/8" = 1'-0"



F1 139 LOCKERS NORTH
3/8" = 1'-0"



F3 139 LOCKERS SOUTH
3/8" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 PLASTIC LAMINATE (PL-2) WORKSTATION COUNTER. REFER TO FINISH SCHEDULE.

2 SOLID SURFACE COUNTERTOP (SSM-1). REFER TO FINISH SCHEDULE.

3 SOLID SURFACE SHOWER AND ENCLOSURE. REFER TO SHEET A0.8 AND PLUMBING DRAWINGS FOR DETAILS.

4 12" x 24" WALL TILE (PT-2) ON WET WALLS. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1

5 HIGH ABUSE VINYL WALL PROTECTION UP TO COUNTER. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

6 RUBBER (RB-1) BASE. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

7 CERAMIC TILE WALL BASE 4" (CTWB-2) BASE. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

8 METAL WORKTOP SUPPRT BRACKET. TYP. SPACING 4'-0" O.C. MAX. COLOR AS SPECIFIED.

9 HIGH ABUSE VINYL WALL PROTECTION BEHIND SHELVING. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

10 MICROWAVE CABINET. COORDINATE PLACEMENT OF ELECTRICAL OUTLET.

11 CORNER GUARD. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

12 WALL MOUNTED GRAB BARS. REFER TO MOUNTING AND CLEARANCE STANDARDS ON SHEET A0.1.

13 WALL MOUNTED PAPER TOWEL DISPENSER. C-FOLD TYPE.

14 WALL MOUNTED SOAP DISPENSER.

15 WALL MOUNTED TOILET TISSUE DISPENSER.

16 WALL MOUNTED WASTE RECEPTACLE.

17 SHOWER MOUNTED GRAB BARS. REFER TO MOUNTING AND CLEARANCE STANDARDS ON SHEET A0.1.

18 SHOWER ROD. REFER TO SPECIFICATIONS.

19 INTEGRAL SOLID SURFACE SHOWER SHELVES.

20 SINK. REFER TO PLUMBING DRAWINGS.

21 24" x 36" WA;; HUNG MIRROR. REFER TO MOUNTING AND CLEARANCE STANDARDS ON SHEET A0.1 FOR DETAILS.

22 LIGHT FIXTURE MOUNTED ABOVE MIRROR. REFER TO ELECTRICAL DRAWINGS.

23 CHARGING PLASTIC LAMINATE SHELVING. REFER TO SHEET A8.2 B1.

24 HEAVY DUTY SHELVING AND BRACKETS AT 3'-0" O.C.

25 NOT USED.

26 ELECTRICAL OUTLETS. REFER TO ELECTRICAL DRAWINGS.

27 WALL CLEAT. PAINT.

28 PLASTIC LAMINATE BASED SHELF.

29 PREMANUFACTURED GEAR LOCKER UNITS. BASIS OF DESIGN AIRFLOW: SENTINEL LAW ENFORCEMENT LOCKERS. REFER TO SPECIFICATIONS.

30 PROVIDE GROMMETS IN QUANTITIES INDICATED. COORDINATE LOCATION IN FIELD.

31 ROBE HOOK.

GENERAL NOTES

A. EXAMPLE OF CASEWORK DIMENSIONS (2436) INDICATES 24" WIDTH X 36" HEIGHT. FOR DEPTH REFER TO TYPICAL CASEWORK DETAILS U.N.O.
B. PROVIDE 3/4" PLASTIC LAMINATE SCRIBE AGAINST FINISHED WALLS AT BASE, WALL AND TALL CABINETS.
C. ALL BASE & WALL CABINET PL-2 U.N.O.
D. INSTALL SOLID WOOD (FIRE TREATED) (CONTRACTOR OPTION SHEET STEEL) BLOCKING IN WALLS BEHIND WALL MOUNTED ITEMS INCLUDING CASEWORK, TOILET ACCESSORIES, ETC.
E. REFER TO ELECTRICAL DRAWINGS FOR ELECTRICAL RECEPTACLE LOCATIONS.
F. ALL PLASTIC LAMINATE GRAIN TO RUN VERTICALLY U.N.O.
G. ALL OUTSIDE CORNERS OF PLAM COUNTERTOPS SHALL PROJECT 1" PAST CABINET/SUPPORT AND SHALL HAVE 1 1/2" RADIUS CORNER EXCEPT AT REFRIGERATORS AND EQUIPMENT, WHERE SQUARE CORNERS AND 1/4" PROJECTION SHALL BE USED.
H. ALL COUNTERTOPS 25" DEEP U.N.O.
I. REFER TO SHEET A0..2 FOR FINISHES DESCRIPTION AND ABBREVIATIONS.
J. REFER TO SHEET A0.1 FOR TOILET ACCESSORY MOUNTING HEIGHTS.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836-8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO REGISTERED ARCHITECT
TODD A. GINDELBERGER 12147

Todd A. Gindelberger. License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

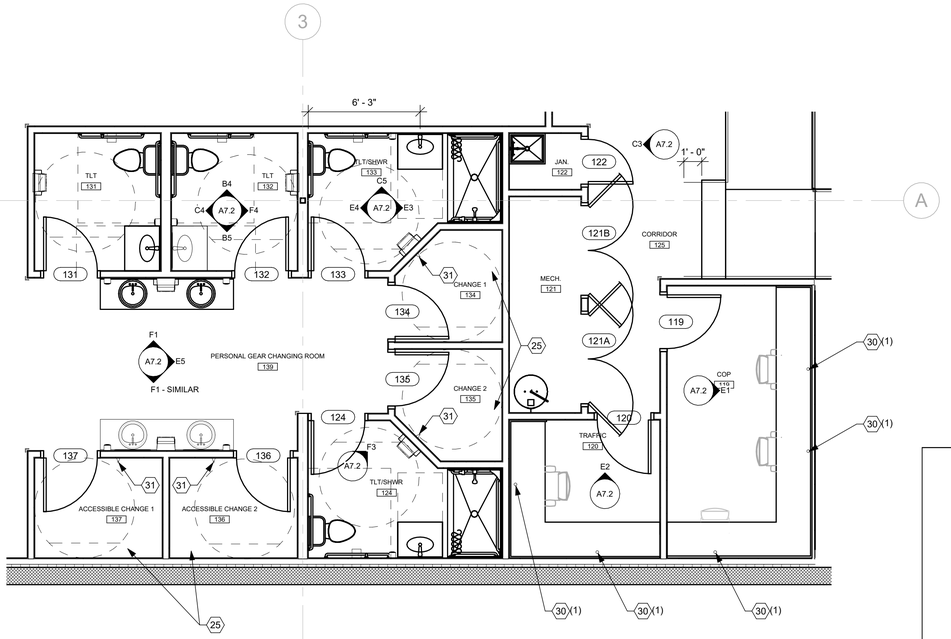
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

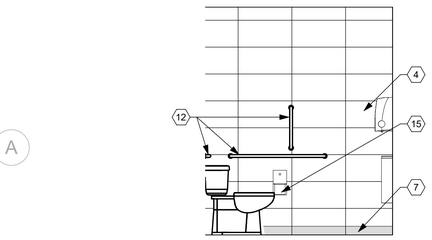
TITLE
INTERIOR ELEVATIONS

SHEET NO.
A7.1

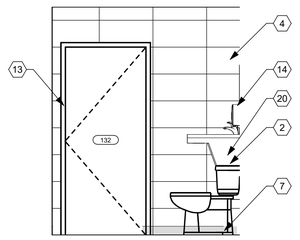
1/21/2026 9:53:34 AM



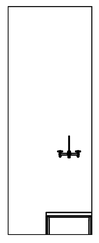
C1 ENLARGED FLOOR PLAN D
1/4" = 1'-0"



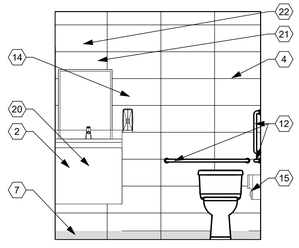
B4 132 TLT NORTH
3/8" = 1'-0"



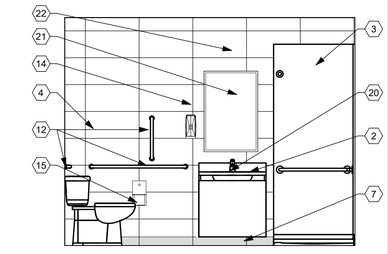
B5 132 TLT SOUTH
3/8" = 1'-0"



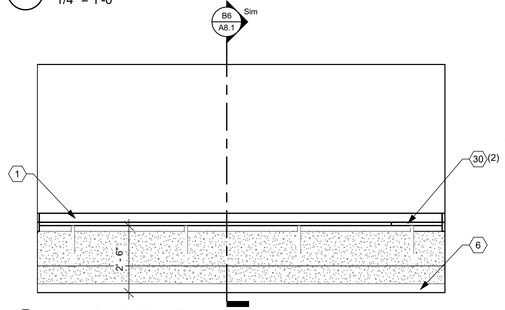
C3 122 JAN. WEST
3/8" = 1'-0"



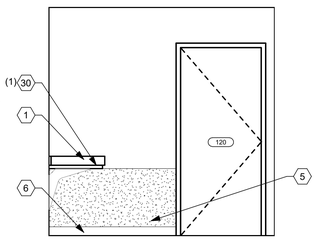
C4 132 TLT WEST
3/8" = 1'-0"



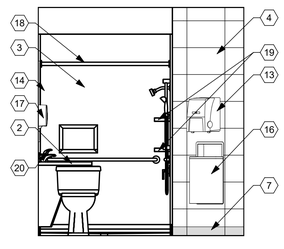
C5 133 ADA TLT NORTH
3/8" = 1'-0"



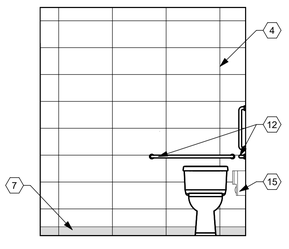
E1 119 COP EAST
3/8" = 1'-0"



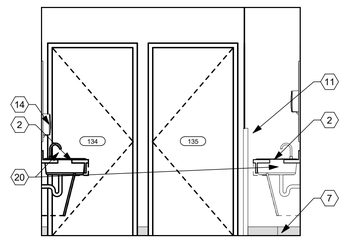
E2 120 TRAFFIC NORTH
3/8" = 1'-0"



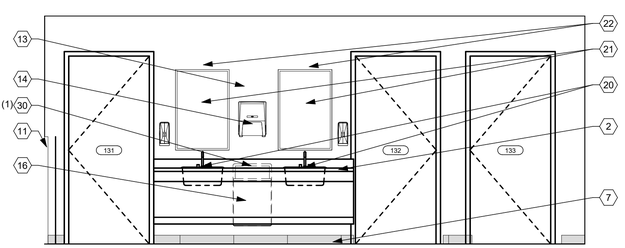
E3 134 ADA TLT EAST
3/8" = 1'-0"



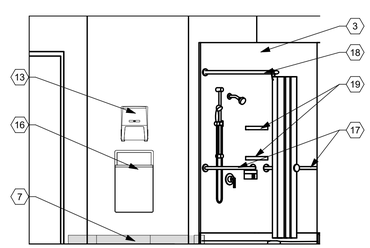
E4 134 ADA TLT WEST
3/8" = 1'-0"



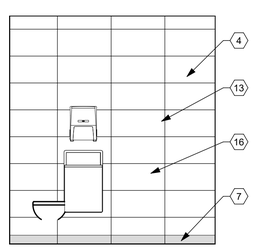
E5 139 PERSONAL GEAR CHANGING EAST
3/8" = 1'-0"



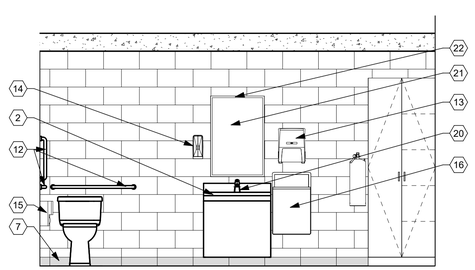
F1 139 PERSONAL GEAR CHANGING NORTH
3/8" = 1'-0"



F3 124 TLT/SHWR NORTH EAST
3/8" = 1'-0"



F4 132 TLT EAST
3/8" = 1'-0"



F5 118 TLT/STORM SHELTER WEST
3/8" = 1'-0"

CONSTRUCTION NOTES

00 INDICATES CONSTRUCTION NOTE.

1 PLASTIC LAMINATE (PL-2) WORKSTATION COUNTER. REFER TO FINISH SCHEDULE.

2 SOLID SURFACE COUNTERTOP (SSM-1). REFER TO FINISH SCHEDULE.

3 SOLID SURFACE SHOWER AND ENCLOSURE. REFER TO SHEET A0.8 AND PLUMBING DRAWINGS FOR DETAILS.

4 12" x 24" WALL TILE (PT-2) ON WET WALLS. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1

5 HIGH ABUSE VINYL WALL PROTECTION UP TO COUNTER. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

6 RUBBER (RB-1) BASE. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

7 CERAMIC TILE WALL BASE 4" (CTWB-2) BASE. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

8 METAL WORKTOP SUPPRT BRACKET. TYP. SPACING 4'-0" O.C. MAX. COLOR AS SPECIFIED.

9 HIGH ABUSE VINYL WALL PROTECTION BEHIND SHELVING. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

10 MICROWAVE CABINET. COORDINATE PLACEMENT OF ELECTRICAL OUTLET.

11 CORNER GUARD. REFER TO FINISH SCHEDULE A0.2 AND FINISH FLOOR PLAN A9.1.

12 WALL MOUNTED GRAB BARS. REFER TO MOUNTING AND CLEARANCE STANDARDS ON SHEET A0.1.

13 WALL MOUNTED PAPER TOWEL DISPENSER. C-FOLD TYPE.

14 WALL MOUNTED SOAP DISPENSER.

15 WALL MOUNTED TOILET TISSUE DISPENSER.

16 WALL MOUNTED WASTE RECEPTACLE.

17 SHOWER MOUNTED GRAB BARS. REFER TO MOUNTING AND CLEARANCE STANDARDS ON SHEET A0.1.

18 SHOWER ROD. REFER TO SPECIFICATIONS.

19 INTEGRAL SOLID SURFACE SHOWER SHELVES.

20 SINK. REFER TO PLUMBING DRAWINGS.

21 24" x 36" WA;; HUNG MIRROR. REFER TO MOUNTING AND CLEARANCE STANDARDS ON SHEET A0.1 FOR DETAILS.

22 LIGHT FIXTURE MOUNTED ABOVE MIRROR. REFER TO ELECTRICAL DRAWINGS.

23 CHARGING PLASTIC LAMINATE SHELVING. REFER TO SHEET A8.2 B1.

24 HEAVY DUTY SHELVING AND BRACKETS AT 3'-0" O.C.

25 NOT USED.

26 ELECTRICAL OUTLETS. REFER TO ELECTRICAL DRAWINGS.

27 WALL CLEAT. PAINT.

28 PLASTIC LAMINATE BASED SHELF.

29 PREMANUFACTURED GEAR LOCKER UNITS. BASIS OF DESIGN AIRFLOW: SENTINEL LAW ENFORCEMENT LOCKERS. REFER TO SPECIFICATIONS.

30 PROVIDE GROMMETS IN QUANTITIES INDICATED. COORDINATE LOCATION IN FIELD.

31 ROBE HOOK.

GENERAL NOTES

A. EXAMPLE OF CASEWORK DIMENSIONS (2436) INDICATES 24" WIDTH X 36" HEIGHT. FOR DEPTH REFER TO TYPICAL CASEWORK DETAILS U.N.O.
B. PROVIDE 3/4" PLASTIC LAMINATE SCRIBE AGAINST FINISHED WALLS AT BASE, WALL AND TALL CABINETS.
C. ALL BASE & WALL CABINET PL-2 U.N.O.
D. INSTALL SOLID WOOD (FIRE TREATED) (CONTRACTOR OPTION SHEET STEEL) BLOCKING IN WALLS BEHIND WALL MOUNTED ITEMS INCLUDING CASEWORK, TOILET ACCESSORIES, ETC.
E. REFER TO ELECTRICAL DRAWINGS FOR ELECTRICAL RECEPTACLE LOCATIONS.
F. ALL PLASTIC LAMINATE GRAIN TO RUN VERTICALLY U.N.O.
G. ALL OUTSIDE CORNERS OF PLAM COUNTERTOPS SHALL PROJECT 1" PAST CABINET/SUPPORT AND SHALL HAVE 1 1/2" RADIUS CORNER EXCEPT AT REFRIGERATORS AND EQUIPMENT, WHERE SQUARE CORNERS AND 1/4" PROJECTION SHALL BE USED.
H. ALL COUNTERTOPS 25" DEEP U.N.O.
I. REFER TO SHEET A0..2 FOR FINISHES DESCRIPTION AND ABBREVIATIONS.
J. REFER TO SHEET A0.1 FOR TOILET ACCESSORY MOUNTING HEIGHTS.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836.8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER 12147 REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

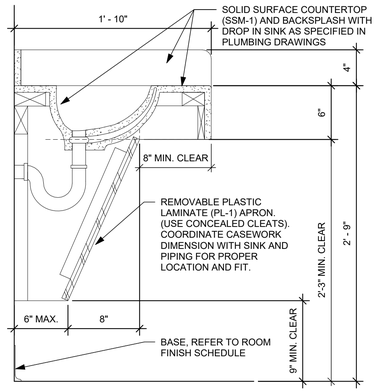
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

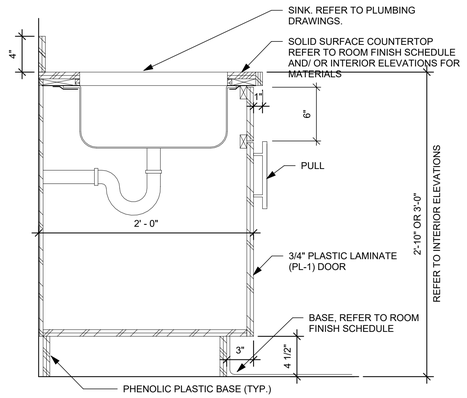
TITLE
INTERIOR ELEVATIONS

SHEET NO.
A7.2

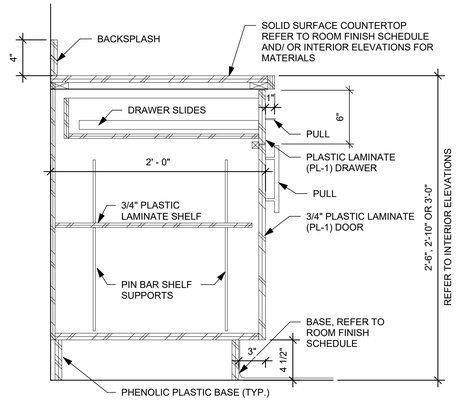
12/1/2026 9:53:36 AM



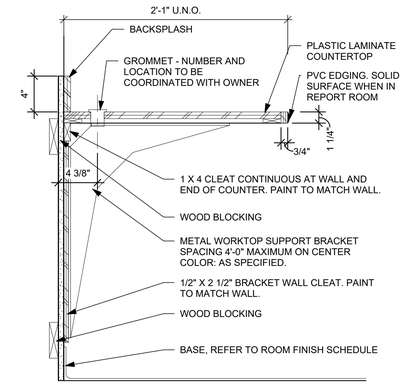
B1 "ADA" SINK (SADA) DETAIL
1 1/2" = 1'-0"



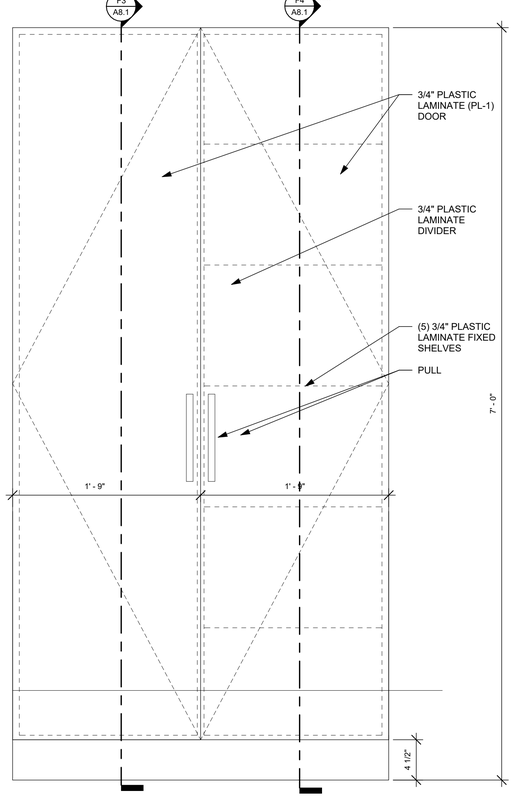
B2 TYP. SINK BASE CABINET (SB) DETAIL
1 1/2" = 1'-0"



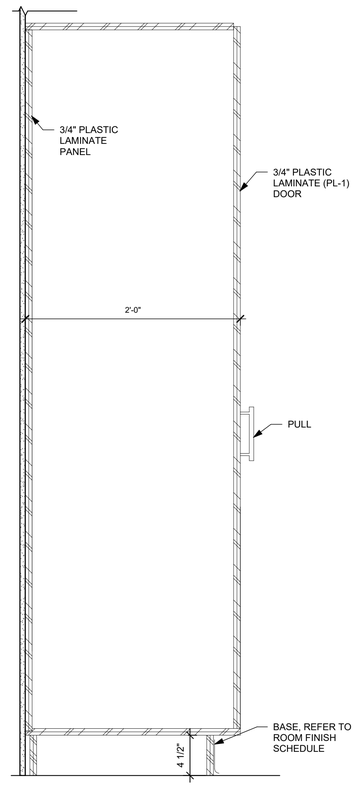
B4 TYP. BASE CABINET (B) DETAIL
1 1/2" = 1'-0"



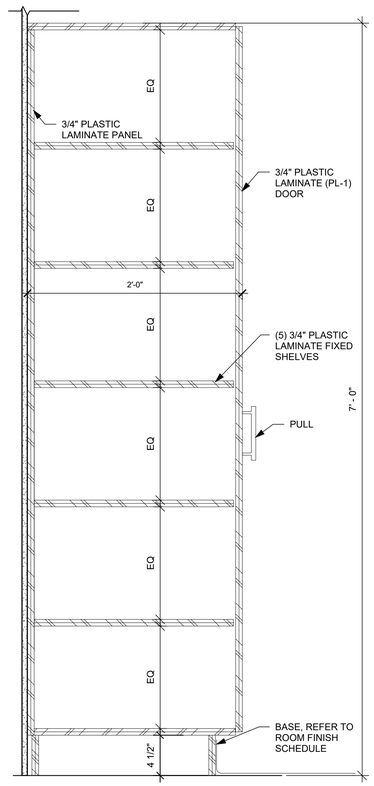
B6 TYP. WORK SURFACE DETAIL
1 1/2" = 1'-0"



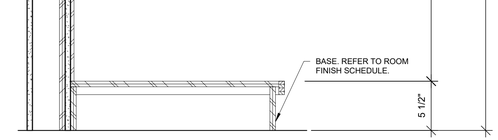
F1 STORM CABINET (SC) ELEVATION
1 1/2" = 1'-0"



F3 STORM CABINET (SC) - OPEN
1 1/2" = 1'-0"



F4 STORM CABINET (SC) - SHELVES
1 1/2" = 1'-0"



F6 HEAVY DUTY TACTICAL GEAR SHELF
1 1/2" = 1'-0"

1/21/2026 9:53:37 AM

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937-836-8898 F 937-832-3696
www.app-arch.com

STATE OF OHIO
TODD A. GINDELBERGER
12147
REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

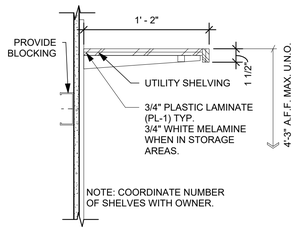
ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

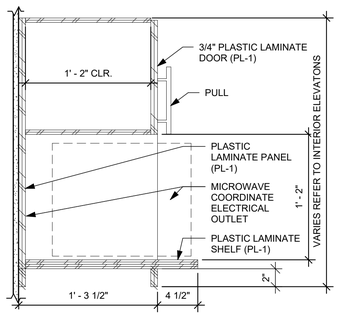
DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
CASEWORK DETAILS

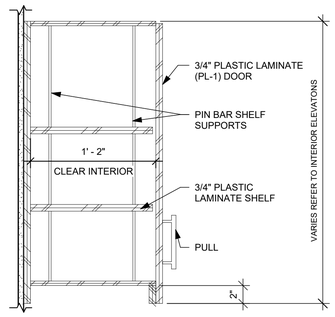
SHEET NO.
A8.1



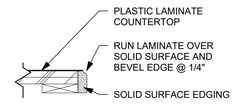
B1 ADJUSTABLE SHELVING (ADJS)
1 1/2" = 1'-0"



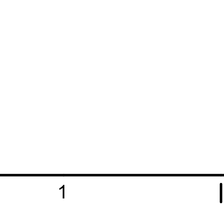
B2 MICROWAVE WALL (MW) CABINET
1 1/2" = 1'-0"



B4 WALL CABINET (W) DETAIL
1 1/2" = 1'-0"



B5 SOLID SURFACE COUNTER EDGE
3" = 1'-0"



C1 CHAIR RAIL PROFILE DETAIL
3" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO TODD A. GINDELBERGER 12147 REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

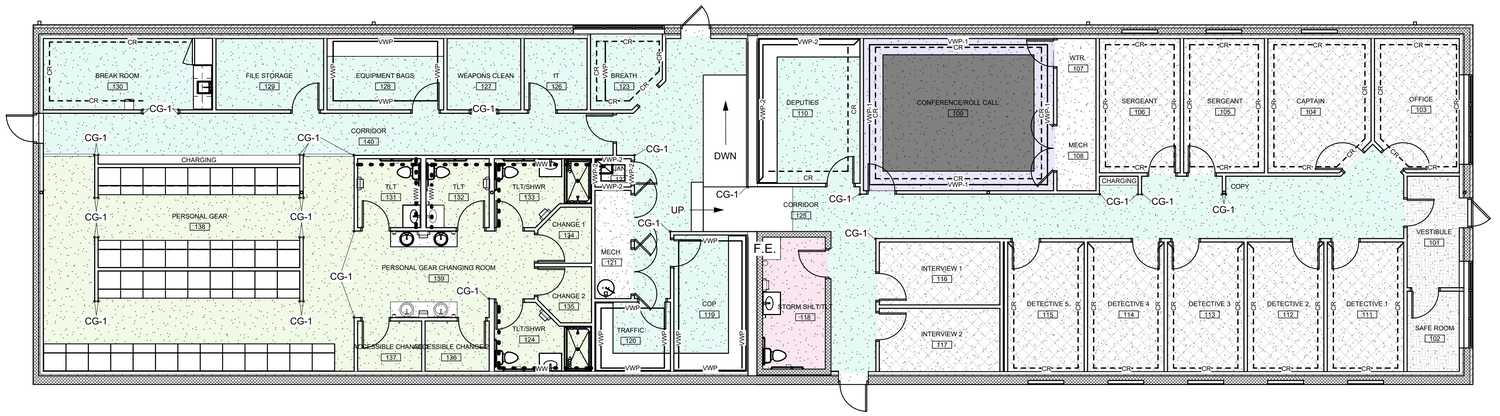
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
CASEWORK DETAILS

SHEET NO.
A8.2

12/12/2026 9:53:39 AM



E1 FINISH FLOOR PLAN
1/8" = 1'-0"

FINISH LEGEND

- C-1 - CARPET
- MAT-1 - WALK-OFF MAT
- MCT-1 - MARMOLEUM COMPOSITION TILE
- MCT-1/2 - MARMOLEUM COMPOSITION TILE
- PC-1 - POLISHED CONCRETE
- PT-1 - PORCELAIN TILE
- SC-1 - SEALED CONCRETE
- VWP - VINYL WALL PROTECTION
- VWC - VINYL WALL COVERING
- CR - CHAIR RAIL
- WW - WALL TILE PWT-1 (WET WALLS)
- CG-1 - CORNER GUARD
- EWP-1 - END WALL PROTECTION
- SG-1 - STEEL IMPACT GUARD

BASIS OF DESIGN: OMEGA CORNER SHIELD HEAVY DUTY CORNER GUARDS. REFER TO E1/A0.4.

GENERAL NOTES

A. REPAIR, LEVEL, AND PREPARE EXISTING CONCRETE FLOOR SLABS TO RECEIVE NEW FLOOR FINISH. REFER TO ARCHITECTURAL ROOM FINISH SCHEDULE AND SPECIFICATIONS FOR ADDITIONAL INFORMATION.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO · TODD A. GINDELBERGER · 12147 · REGISTERED ARCHITECT

Todd A. Gindelberger, License #12147
Expiration Date 12/31/2027

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01/22/2026
JOB NO.	4325.00
DRAWN	SEP
CHECKED	RFW

TITLE
FINISH FLOOR PLAN

SHEET NO.
A9.1

12/1/2026 9:53:39 AM

A. GENERAL:

1. THE STRUCTURAL ENGINEER OF RECORD IS RESPONSIBLE FOR THE ADEQUACY OF THE STRUCTURAL DESIGN AS SHOWN IN THE CONTRACT DOCUMENTS WHICH DEPICT THE STRUCTURE IN ITS COMPLETED FORM. THE STRUCTURE IS DESIGNED TO BE CAPABLE OF WITHSTANDING CODE PRESCRIBED DESIGN FORCES AND FULLY STABLE WHEN THE STRUCTURE IS FULLY CONSTRUCTED (I.E., FULLY BUILT). IT IS SOLEY THE RESPONSIBILITY OF OTHERS TO DETERMINE ERECTION PROCEDURE AND SEQUENCE AS WELL AS TO PROVIDE FOR THE SAFETY OF THE STRUCTURE AND ITS COMPONENTS PARTS DURING ERECTION. THIS INCLUDES THE ADDITION OF WHATEVER SHORING, SHEETING, TEMPORARY BRACING, GUYS, TIE DOWNS, OR DE-WATERING WHICH MIGHT BE NECESSARY. SUCH MATERIAL SHALL REMAIN THE CONTRACTOR'S PROPERTY AFTER THE COMPLETION OF THE PROJECT.
2. IT IS SOLELY THE CONTRACTOR'S RESPONSIBILITY TO FOLLOW ALL APPLICABLE SAFETY CODES AND REGULATIONS DURING ALL PHASES OF CONSTRUCTION.
3. ALL ELEVATIONS GIVEN ON THE STRUCTURAL DRAWINGS ARE BASED ON THE GROUND FLOOR DATUM OF 100'-0" (U.N.O.).
4. THE STRUCTURAL ENGINEER OF RECORD IS RESPONSIBLE FOR THE ADEQUACY OF THE STRUCTURAL DESIGN AS SHOWN IN THE CONTRACT DOCUMENTS WHICH DEPICT THE STRUCTURE IN ITS COMPLETED FORM. THE STRUCTURE IS DESIGNED TO BE CAPABLE OF WITHSTANDING CODE PRESCRIBED DESIGN FORCES AND FULLY STABLE WHEN THE STRUCTURE IS FULLY CONSTRUCTED (I.E., FULLY BUILT). IT IS SOLEY THE RESPONSIBILITY OF OTHERS TO DETERMINE ERECTION PROCEDURE AND SEQUENCE AS WELL AS TO PROVIDE FOR THE SAFETY OF THE STRUCTURE AND ITS COMPONENTS PARTS DURING ERECTION. THIS INCLUDES THE ADDITION OF WHATEVER SHORING, SHEETING, TEMPORARY BRACING, GUYS, TIE DOWNS, OR DE-WATERING WHICH MIGHT BE NECESSARY. SUCH MATERIAL SHALL REMAIN THE CONTRACTOR'S PROPERTY AFTER THE COMPLETION OF THE PROJECT.
5. STRUCTURAL DRAWINGS ARE INTENDED TO BE USED WITH THE OTHER DRAWINGS RELEASED FOR THE PROJECT. CONTRACTOR TO COORDINATE, TO THE EXTENT POSSIBLE, SUCH INTERRELATIONSHIPS IN PROJECT SHOP DRAWINGS AND FIELD WORK.
6. DO NOT SCALE THESE DRAWINGS, USE DIMENSIONAL DATA PROVIDED.
7. REFER TO ARCHITECTURAL DRAWINGS AND SPECIFICATIONS FOR FIRE RATING REQUIREMENTS, FIRE-PROOFING METHODS, AND FIRE-PROOFING MATERIALS FOR STRUCTUREAL MEMBERS.

B. DELEGATED DESIGN / DEFERRED SUBMITTALS:

1. DELEGATED DESIGN AND DEFERRED SUBMITTALS ARE ITEMS DESIGNED BY OTHERS. SHOP DRAWINGS AND CALCULATIONS SHALL BE GENERATED FOR THE DESIGN AND FABRICATION OF ALL DELEGATED DESIGN AND DEFERRED SUBMITTALS ITEMS INDICATED BELOW. THESE DRAWINGS AND CALCULATIONS SHALL BE SEALED AND SIGNED BY A PROFESSIONAL ENGINEER IN THE STATE WHERE THE PROJECT IS TO BE CONSTRUCTED. FOR ITEMS INDICATED AS "DESIGNED BY THE CONTRACTOR", "DESIGNED BY SUPPLIER", "DESIGNED BY FABRICATOR" AND "DESIGNED BY INSTALLER", IF THESE ENTITIES ARE NOT PROVIDING THEIR OWN ENGINEERING WITH THEIR DESIGNS COMPLETED BY A PROFESSIONAL ENGINEER WHO WILL SEAL AND SIGN THEIR SUBMITTALS THEN THESE ENTITIES WILL INDEPENDENTLY CONTRACT A THIRD PARTY TO PROVIDE THIS SERVICE ON THEIR BEHALF. UNLESS SPECIFIED ON THE DRAWINGS OR IN THE SPECIFICATIONS, DELEGATED DESIGN ITEMS SHALL BE DESIGNED FOR ALL CODE DEFINED LOADS PLUS INDUSTRY STANDARD LOADS INCLUDING GRAVITY LOADS AND LATERAL LOADS DUE TO WIND AND SEISMIC. SEE THE RELEVANT SECTIONS OF THE GENERAL NOTES SHEETS FOR ADDITIONAL DESIGN REQUIREMENTS. CALCULATIONS SHALL INCLUDE REVIEW OF THE CAPACITIES OF ALL SUPPORTING STRUCTURAL ELEMENTS INCLUDING LOCAL STRESSES DUE TO THE CONNECTION METHODS SELECTED. ADDITIONALLY, THE CALCULATIONS AND DRAWINGS SHALL CLEARLY INDICATE THE MAGNITUDES AND DIRECTIONS OF THE LOADS IMPARTED ON THE SUPPORTING STRUCTURAL ELEMENTS. THE LOADING CRITERIA USED FOR DESIGN OF THE DELEGATED DESIGN SYSTEMS AND COMPONENTS SHALL BE CLEARLY INDICATED ON THE DRAWINGS AND CALCULATIONS, REGARDLESS OF WHETHER THEY ARE MANDATED BY THE ENGINEER OF RECORD BY WAY OF THE DRAWING AND SPECIFICATIONS OR DERIVED BY THE DESIGNER.
2. TEMPORARY SHORING: FOUNDATIONS - SHEET PILING, PILES AND LAGGING REQUIRED FOR INSTALLATION OF FOUNDATIONS AND FOUNDATION WALLS SHALL BE DESIGNED BY THE CONTRACTOR. EXCAVATIONS REQUIRED FOR FOUNDATION AND FOUNDATION WALL CONSTRUCTION NEXT TO EXISTING BUILDINGS, NEAR PROPERTY LINES AND NEAR OR OVER UTILITIES MUST BE CONSIDERED BY THE CONTRACTOR IN EVALUATING SHORING REQUIREMENTS.
3. MECHANICAL, ELECTRICAL, PLUMBING AND FIRE PROTECTION COMPONENTS: ROOF-TOP UNITS - DESIGN OF THE MECHANICAL UNIT CURB, CONNECTIONS OF THE UNIT TO THE CURB AND CONNECTIONS OF THE CURB TO STRUCTURE SHALL BE PROVIDED BY THE MECHANICAL UNIT CONTRACTOR. ADDITIONAL SUPPORT FRAMING FOR SUPPORTING THE GRAVITY AND LATERAL LOADS SHALL BE DESIGNED, ENGINEERED AND PROVIDED IF IT IS NOT INDICATED ON THE STRUCTURAL DRAWINGS. IF ADDITIONAL SUPPORT FRAMING IS PROVIDED, THE STRUCTURAL ADEQUACY SHALL BE VERIFIED FOR ALL ASCE 7-16 LOAD COMBINATIONS. SHOPS DRAWINGS AND CALCULATIONS PROVIDED BY THE MECHANICAL CONTRACTOR SHALL PROVIDE DETAILS INDICATING THESE CONNECTIONS. SUPPORT AND BRACING OF DUCTWORK, PIPING, CONDUIT AND CABLE TRAYS ASSOCIATED WITH MECHANICAL, ELECTRICAL, PLUMBING AND FIRE PROTECTION COMPONENTS SHALL BE PROVIDED BY THE CONTRACTOR INSTALLING THE COMPONENTS. FOR PROJECTS IN SEISMIC DESIGN CATEGORY C, D AND HIGHER, SEISMIC BRACING OF ALL MECHANICAL AND ELECTRICAL COMPONENTS REQUIRED BY THE ASCE 7-16 SHALL BE DESIGNED BY THE MECHANICAL CONTRACTOR AND CLEARLY INDICATED AND DETAILED ON THE SHOP DRAWINGS.
4. SUPPORTS FOR INTERIOR FINISHES AND ACCOUTREMENTS:
INTERIOR PARTITIONS, SOFFITS AND STOREFRONT SYSTEMS NOT PART OF THE MAIN BUILDING SHELL SHALL BE DESIGNED BY THE SUPPLIER. SUPPORTS AND CONNECTION TO STRUCTURE REQUIRED FOR ARTWORK, SPECIALTY LIGHTING SYSTEMS, MONITORS, VIDEO EQUIPMENT AND PROJECTION SCREENS, TELEVISIONS AND ANY OTHER MISCELLANEOUS ITEMS SHALL BE PROVIDED BY THE SUPPLIER.
5. WINDOWS, STOREFRONTS, GLAZING AND CURTAIN WALL SYSTEMS:
ALL EXTERIOR AND INTERIOR GLAZING SYSTEMS AND THEIR CONNECTIONS TO STRUCTURE SHALL BE DESIGNED BY THE SUPPLIER. CONNECTION LOCATIONS SHALL BE CLEARLY INDICATED AND COORDINATED WITH ARCHITECTURAL AND STRUCTURAL DETAILS.

   DUE TO MOVEMENT OF THE STRUCTURAL FRAMING SYSTEMS FROM LATERAL WIND AND SEISMIC FORCES, THE GLAZING SYSTEM MUST BE DESIGNED TO ACCOMMODATE 3/4" HORIZONTAL STORY DRIFT IN EACH DIRECTION AT EACH STORY LEVEL. THE DESIGN STORY DRIFT IS THE DIFFERENCE IN LATERAL DISPLACEMENT OF THE TOP OF THE STORY UNDER CONSIDERATION RELATIVE TO THE BOTTOM OF THAT STORY (TOP OF THE STORY BELOW).

   THE CONNECTIONS OF THE GLAZING SYSTEM TO STRUCTURE CAN BE DESIGNED FOR THIS RELATIVE HORIZONTAL MOVEMENT. THE CONNECTIONS SHALL BE DESIGNED FOR 3/4" HORIZONTAL (IN-PLANE) MOVEMENT IN ADDITION TO THE VERTICAL DEFLECTION REQUIREMENTS AS NOTED IN THE PLANS, DETAILS AND SPECIFICATIONS. IF THE CONNECTIONS ARE NOT DESIGNED FOR THE LATERAL MOVEMENT, THE GLAZING SYSTEM SHALL BE DESIGNED TO ACCOMMODATE 3/8" HORIZONTAL STORY DRIFT IN EACH DIRECTION AT EACH STORY LEVEL TO ACCOUNT FOR DIFFERENTIAL DISPLACEMENTS FROM LOAD REVERSALS IN THE STRUCTURAL SYSTEMS.
6. RAILING AND GUARDRAILS:
THE INTERIOR AND EXTERIOR RAILING AND GUARDRAILS SHALL BE DESIGN BY THE FABRICATOR. UNLESS SPECIFICALLY DETAILED ON THE ARCHITECTURAL OR STRUCTURAL DRAWINGS, THE FABRICATOR SHALL DESIGN THE CONNECTIONS TO STRUCTURE AND VERIFY THE CAPACITY OF THE RECEIVING STRUCTURAL ELEMENTS FOR LOADS DUE TO THEIR CONNECTIONS. RAILING SHOP DRAWINGS SHALL BE SUBMITTED TO THE BUILDING OFFICIAL HAVING JURISDICTION, FOR REVIEW AND APPROVAL PRIOR TO THIS WORK COMMENCING.
7. CANOPY AND MISCELLANEOUS EXTERIOR FRAMING:
ALL CANOPIES, NOT OTHERWISE DETAILED, SHALL BE DESIGNED BY THE SUPPLIER. SUPPORTS AND CONNECTIONS TO STRUCTURE REQUIRED FOR CANOPIES AND OTHER MISCELLANEOUS EXTERIOR FRAMING ITEMS SHALL BE PROVIDED BY THE SUPPLIER. ASSOCIATED SHOP DRAWINGS SHALL BE SUBMITTED TO THE BUILDING OFFICIAL HAVING JURISDICTION, FOR REVIEW AND APPROVAL PRIOR TO THIS WORK COMMENCING. THIS IS TO BE A DEFERRED SUBMITTAL UNDER THIS PERMIT.

C. SOIL/STRUCTURE INTERACTION & SOIL PREPARATION INFORMATION:

1. DO NOT BACKFILL WALLS UNTIL CONCRETE HAS ATTAINED FOURTEEN (14) DAY STRENGTH OR LATERAL BRACING IS PROVIDED.
2. FOUNDATIONS HAVE BEEN DESIGNED ASSUMING AN ALLOWABLE SOIL BEARING PRESSURE OF 1,500 POUNDS PER SQUARE FOOT (PSF) FOR SPREAD FOOTINGS FOR BUILDING COLUMNS AND CONTINUOUS FOOTINGS FOR BEARING WALLS. SOIL CONDITIONS SHALL BE INSPECTED BY A GEOTECHNICAL ENGINEER OR AN APPOINTED REPRESENTATIVE OF THE GEOTECHNICAL ENGINEER PRIOR TO CONCRETE PLACEMENT. THE GEOTECHNICAL ENGINEER (OR REPRESENTATIVE) SHALL BE THE SOLE JUDGE AS TO THE SUITABILITY OF THE BEARING MATERIAL.

D. DESIGN LOADS:

1. CODE REFERENCES:

   a. OHIO BUILDING CODE (OBC) - 2024
   b. ICC 500-2020, STANDARD FOR THE DESIGN AND CONSTRUCTION OF STORM SHELTERS
   c. ASCE 7-22, MINIMUM DESIGN LOADS FOR BUILDINGS AND OTHER STRUCTURES
   d. BUILDING CODE REQUIREMENTS FOR STRUCTURAL CONCRETE AND COMMENTARY, ACI 318 - 2019
   e. BUILDING CODE REQUIREMENTS FOR MASONRY STRUCTURES AND SPECIFICATIONS FOR MASONRY STRUCTURES AND COMMENTARIES, ACI 530 - 2016
   f. COLD-FORMED STEEL DESIGN MANUAL, AISI - 2017
   g. SPECIFICATIONS FOR THE DESIGN OF COLD-FORMED STEEL STRUCTURAL MEMBERS, AISI - 2017
   h. CATALOG OF STANDARD SPECIFICATIONS AND LOAD TABLES FOR STEEL JOISTS AND JOIST GIRDERS, STEEL JOIST INSTITUTE - 2017
   i. STEEL DECK INSTITUTE FLOOR DECK DESIGN MANUAL, 1st EDITION - MARCH 2014
   j. STEEL DECK INSTITUTE ROOF DECK DESIGN MANUAL, 1st EDITION - MAY 2013
   k. STEEL DECK INSTITUTE DIAPHRAGM DESIGN MANUAL, 4th EDITION - SEPTEMBER 2015
   l. STEEL DECK INSTITUTE MANUAL OF CONSTRUCTION WITH STEEL DECK - OCTOBER 2016
   m. STEEL DECK INSTITUTE STANDARD PRACTICE DETAILS - MAY 2001
   n. MANUAL OF STEEL CONSTRUCTION - AISC, 15th EDITION - 2017
   o. SPECIFICATION FOR STRUCTURAL JOINTS USING ASTM A325 OF A490 BOLTS - 01 AUGUST 2014
   p. STRUCTURAL WELDING CODE - STEEL, ANSI/AWS D1.1 - 2015
   q. FEMA 405 - NEHRP RECOMMENDED PROVISIONS FOR SEISMIC REGULATIONS FOR NEW BLDGS AND OTHER STRUCTURES - 2015

DEAD LOADS:

ROOF DEAD LOAD	20 PSF

LIVE LOADS:

FLOOR LIVE LOADS:

OCCUPANCY TYPES:	DISTRIBUTED LOADS	CONCENTRATED LOAD (ON 2.5 SF AREA
STORM SHELTER FLOOR LIVE LOAD	100 PSF	
CORRIDORS AND PUBLIC AREAS	100 PSF	1,000 POUNDS
STAIRS/LANDINGS/EXITWAYS	100 PSF	300 POUNDS (ON 4.5 SQ IN OF AREA)

ROOF LIVE LOAD:

STORM SHELTER ROOF LIVE LOAD	100 PSF (Lrt)
MINIMUM DESIGN ROOF LIVE LOAD	20 PSF

SNOW LOAD PARAMETERS:

a.	GROUND SNOW LOAD, Pg	20 PSF
b.	FLAT-ROOF SNOW LOAD, Pf	16.8 PSF
c.	THERMAL FACTOR, Ct	1.0
d.	EXPOSURE FACTOR, Ce	1.0
e.	ROOF SLOPE FACTOR, Cs	1.0
f.	SNOW LOAD IMPORTANCE FACTOR, I	1.2

WIND DESIGN PARAMETERS:

a. STORM SHELTER DESIGN WIND SPEED = 250 MPH (Vt)
b. ULTIMATE DESIGN WIND SPEED = 115 MPH
c. WIND LOAD IMPORTANCE FACTOR = 1.25
d. WIND EXPOSURE = EXPOSURE C
e. MAIN WIND DESIGN VELOCITY PRESSURES:

HEIGHT (FT.)	WINDWARD WALL	LEEWARD WALL	SIDEWALLS
0 - 15	22.0 PSF	-17.8 PSF / -10.3 PSF	-22.8 PSF
15 - 20	22.9 PSF	-17.8 PSF / -10.3 PSF	-22.8 PSF
20 - 25	23.7 PSF	-17.8 PSF / -10.3 PSF	-22.8 PSF
25 - 30	24.5 PSF	-17.8 PSF / -10.3 PSF	-22.8 PSF
30 - 35	25.3 PSF	-17.8 PSF / -10.3 PSF	-22.8 PSF

COMPONENT AND CLADDING - WALLS

AREA (SQ. FT.)	INTERIOR ZONE	EDGE ZONE
10	30.8 PSF	37.9 PSF
100	26.6 PSF	29.4 PSF
200	25.4 PSF	27.0 PSF
500	23.7 PSF	23.7 PSF

SEISMIC DESIGN PARAMETERS:

a.	OCCUPANCY CATEGORY	IV
b.	SITE CLASS	D
c.	IMPORTANCE FACTOR	1.25
d.	SEISMIC DESIGN CATEGORY:	B
e.	RESPONSE MODIFICATION COEFFICIENT, R	2
f.	0.2 SECOND DESIGN SPECTRAL RESPONSE, Sds	15.6%
g.	1.0 SECOND DESIGN SPECTRAL RESPONSE, Sd1	11.3%
h.	DEFLECTION AMPLIFICATION FACTOR, Cd	1-3/4
i.	ANALYSIS PROCEDURE: EQUIVALENT LATERAL FORCE PROCEDURE	
j.	SEISMIC FORCE-RESISTING SYSTEM: ORDINARY REINFORCED MASONRY SHEAR WALLS	
k.	SEISMIC BASE SHEAR: V = Cs x WEIGHT	

LOADS ON HANDRAIL & GUARDRAIL SYSTEMS:

a. HANDRAILS AND GUARDRAILS SHALL BE DESIGNED TO WITHSTAND A LOAD OF 200 POUNDS IN ANY DIRECTION, AT ANY POINT ALONG THE TOP RAIL.
b. HANDRAILS AND GUARDRAILS SHALL BE DESIGNED TO WITHSTAND A LOAD OF 50 POUNDS-PER-LINEAR-FOOT IN ANY DIRECTION ALONG THE TOP RAIL. THIS DEMAND NEED NOT BE CONSIDERED CONCURRENTLY WITH THE LOAD IN 'a'.
c. INTERMEDIATE RAILS AND PANEL FILLERS SHALL BE DESIGNED TO WITHSTAND A HORIZONTALLY APPLIED LOAD OF 50 POUNDS ON AN AREA NOT TO EXCEED 12" x 12". THE REACTIONS FROM THIS LOAD NEED NOT BE CONSIDERED CONCURRENTLY WITH THE LOADS IN 'a' & 'b'.

E. REINFORCED CONCRETE:

1. MATERIALS
   a. STRUCTRUAL CONCRETE OVERVIEW

LOCATION	f'c (PSI)
FOUNDATIONS AND GRADE BEAMS	3000
TYP. INTERIOR CONCRETE	4000
EXTERIOR CONCRETE EXPOSED TO DE-ICING	4500, 6% AIR
BACKFILL BELOW FOOTINGS, CONCRETE FILL IN STRUCTURES	1500

   b. ALL DEFORMED REINFORCING BARS: FY = 60,000 P.S.I.
   c. WELDED WIRE FABRIC: ASTM A185
2. FIELD MANUAL:

   PROVIDE AT LEAST ONE COPY OF THE LATEST ACI FIELD REFERENCE MANUAL, SP-15, IN THE FIELD OFFICE AT ALL TIMES.
3. CONTINGENCIES:

   PROVIDE LEAN CONCRETE UNDER FOUNDATIONS FOR ACCIDENTAL OVER-EXCAVATION, SOFT SPOTS AND TRENCHES.
4. FOOTINGS, PIERS, WALLS AND SLABS:
   a. DOWELS IN FOOTINGS TO MATCH VERTICAL PIER OR WALL REINFORCING, U.N.O.
   b. PROVIDE CORNER BARS AT WALL AND FOOTING CORNERS TO MATCH HORIZONTAL REINFORCING, MINIMUM LENGTH OF EACH LEG - 45 BAR DIAMETERS. (PLACE AS PER DETAILS U.N.O.).
   c. PROVIDE 10 MIL. POLYETHYLENE VAPOR RETARDER AND 4" COMPACTED AGGREGATE SUBBASE MATERIAL ON TOP IN ACCORDANCE WITH THE TYPICAL SLAB DETAILS. UNDER ALL INTERIOR SLABS ON GRADE, VAPOR RETARDER SHALL BE CARRIED TO AND PLACED IN CONTACT W/RIGID INSULATION AT INTERIOR FACE OF EXTERIOR FOUNDATION WALLS. SEE SPECIFICATIONS FOR FURTHER INFORMATION.
5. CONSTRUCTION JOINTS:

   CONSTRUCTION JOINTS PERMITTED ONLY WHERE SHOWN OR AS APPROVED BY THE STRUCTURAL ENGINEER. ALL CONSTRUCTION JOINTS ARE TO BE KEYED.
6. CHAMFER:

   PROVIDE 3/4" CHAMFER AT ALL EXPOSED EDGES OF CONCRETE, U.N.O.
7. MISCELLANEOUS:
   a. SEE ARCHITECTURAL, MECHANICAL, ELECTRICAL, AND PLUMBING DRAWINGS FOR OPENINGS AND COORDINATE WORK WITH THE CONSTRUCTION MANAGER AND OTHER TRADES. IF OPENING IS NOT SHOWN ON THE STRUCTURAL DRAWINGS, OBTAIN PRIOR APPROVAL.
8. CONCRETE COVER:

   U.N.O. DETAIL REINFORCING TO PROVIDE MINIMUM CONCRETE COVER AS FOLLOWS:

CONCRETE CAST AGAINST AND PERMANENTLY EXPOSED TO EARTH:	3 IN.
CONCRETE EXPOSED TO EARTH OR WEATHER:	
No. 6 - No. No. 18 BARS	2 IN.
No. 5 BAR, W31 OR D31 WIRE, AND SMALLER	1 1/2 IN.
CONCRETE NOT EXPOSED TO EARTH OR WEATHER OR IN CONTACT WITH GROUND:	
SLABS, WALLS, AND JOISTS:	
No. 14 AND No. 18 BARS	1 1/2 IN.
No. 11 BARS AND SMALLER	3/4 IN.
BEAMS AND COLUMNS:	
PRIMARY REINFORCEMENT, STIRRUPS, TIES AND SPIRALS	1 1/2 IN.
SURFACES EXPOSED TO LIQUIDS:	2 IN.
SLABS ON GRADE - 1/3 SLAB THICKNESS FROM TOP OF SLAB OR AS SHOWN ON DRAWINGS	

TENSION LAP SCHEDULE:
f'c = 3000 PSI TENSION LAP SPLICE LENGTHS (INCHES) - TOP BARS (NOTES 1 AND 2)

BAR COVER (INCHES)	3/4			1 1/2			1 1/2		
BAR SPACING (INCHES)	2 1/2	4	>=6	2 1/2	4	>=6	2 1/2	4	>=6
#4	29	29	29	29	29	29	29	29	29
#5	36	36	36	36	36	36	36	36	36
#6	43	43	43	43	43	43	43	43	43
#7	69	69	69	66	63	63	66	63	63
#8	-	-	-	86	72	72	86	72	72
#9	-	-	-	109	81	63	109	81	81

f'c = 4000 PSI TENSION LAP SPLICE LENGTHS (INCHES) - TOP BARS (NOTES 1 AND 2)

BAR COVER (INCHES)	3/4			1 1/2			1 1/2		
BAR SPACING (INCHES)	2 1/2	4	>=6	2 1/2	4	>=6	2 1/2	4	>=6
#4	25	25	25	25	25	25	25	25	25
#5	31	31	31	31	31	31	31	31	31
#6	37	37	37	37	37	37	37	37	37
#7	60	60	60	57	54	54	57	54	54
#8	-	-	-	74	62	62	74	62	62
#9	-	-	-	94	70	70	94	70	70

NOTES:
1. TOP BARS ARE DEFINED AS HORIZONTAL BARS WITH MORE THAN 12" OF CONCRETE CAST BELOW THE BARS.
2. FOR BARS OTHER THAN TOP BARS, DIVIDE DEVELOPMENT LENGTH SPECIFIED IN TABLE BY 1.3.
3. INTERPOLATE FOR SPLICE LENGTHS AS NECESSARY
4. TENSION LAP SPLICES ARE BASED ON CLASS B. FOR CLASS A, DIVIDE BY 1.3. UNLESS NOTED OTHERWISE IN DRAWINGS, ASSUME ALL SPLICES AS CLASS B.
5. IF SPLICE DIMENSION IS INDICATED IN DRAWINGS, PROVIDE LARGER SPLICE LENGTH.
6. LAP SPLICE TABLES ARE BASED ON ACI 318002, SECTIONS 12.2.2, 12.2.3 & 12.14.2
7. VALUES SHOWN IN TABLE MAY BE LOWERED WITH Ktr IF TRANSVERSE REINFORCEMENT EXISTS PER 12.2.3.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JONATHAN MICHAEL REIS
PE-77926
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JMR
CHECKED	JMR

TITLE
GENERAL NOTES

SHEET NO.
S0.1

1/17/2026 9:42:24 AM

F. STRUCTRUAL STEEL:

1. GENERAL:
THE STRUCTURAL STEEL IS DESIGNED TO BE CAPABLE OF WITHSTANDING CODE PRESCRIBED DESIGN FORCES AND FULLY STABLE WHEN THE STRUCTURE (I.E., BUILDING) IS TOTALLY CONSTRUCTED (I.E. ,FULLY BUILT). THE STEEL ERECTOR SHALL DETERMINE, FURNISH, AND INSTALL ALL TEMPORARY SUPPORTS, SUCH AS TEMPORARY GUYS, BEAMS, FALSE-WORK, CRIBBING OR OTHER ELEMENTS REQUIRED FOR THE ERECTION OPERATION. THE STEEL ERECTOR SHALL PROVIDE THESE TEMPORARY SUPPORTS THAT SHALL BE SUFFICIENT TO SECURE THE BARE STRUCTURAL STEEL FRAMING, OR ANY PORTION THEREOF, AGAINST LOADS THAT ARE LIKELY TO BE ENCOUNTERED DURING ERECTION INCLUDING THOSE DUE TO WIND AND THOSE THAT RESULT FROM ERECTION OPERATIONS.

STEEL FABRICATOR AND ERECTOR FOR ALL STEEL SHALL FOLLOW ALL APPLICABLE REQUIREMENTS OF THE LATEST DOL PUBLICATION "SAFETY STANDARDS FOR STEEL ERECTIONS FINAL RULE".

2. MATERIALS:

a. W-SHAPE MEMBERS: ASTM A572, Fy=50 KSI, AND PER AISC TECHNICAL BULLETIN #3 (OR ASTM A992), AND ASTM 6
b. CHANNELS, M-SHAPES, S-SHAPES: ASTM A572, Fy=50 KSI, AND ASTM 6
c. HOLLOW STRUCTURAL SHAPES (DESIGNATED AS HSS OR TS): ASTM 500, GRADE B, (ROUND HSS -> Fy=42 KSI) (SQUARE & RECTANGULAR HSS -> Fy = 46 KSI)
d. TEES: SAME MATERIAL OF THE FULL SECTIONS THAT WAS SPLIT TO MAKE THE TEE SECTION
e. MISC. STEEL, PLATES, AND ANGLES: ASTM A36 Fy=36 KSI, OR ASTM A572, GRADE 42 WHERE NOTED ON THE DRAWINGS, AND ASTM A6
f. HIGH STRENGTH BOLTS: ASTM A325 OR A490
g. ANCHOR BOLTS: ASTM F1554, GRADE 55
h. ELECTRODES: E70XX

3. STANDARDS AND CODES:
WELDING PERSONNEL AND PROCEDURES ARE TO BE QUALIFIED PER AWS D1.1 UNLESS SPECIFICALLY SHOWN OTHERWISE. DESIGN, FABRICATION, AND ERECTION TO BE GOVERNED BY THE LATEST REVISIONS OF:

a. AISC CODE OF STANDARD PRACTICE FOR STEEL BUILDINGS AND BRIDGES.

b. STRUCTURAL WELDING CODE, AWS D1.1 OF THE AMERICAN WELDING SOCIETY

c. AISC SPECIFICATION FOR STRUCTURAL JOINTS USING ASTM A325 OR 490 BOLTS.

4. CONNECTIONS:

a. CONNECTIONS MAY BE BOLTED OR WELDED. THE FABRICATOR IS RESPONSIBLE FOR THE DESIGN OF CONNECTIONS NOT DESIGNED ON THE DRAWINGS. GENERALLY, CONNECTIONS SHOWN ON THE STRUCTURAL DRAWINGS ARE SCHEMATIC AND ARE ONLY INTENDED TO SHOW THE RELATIONSHIP OF MEMBERS CONNECTED. ANY CONNECTION THAT IS NOT SHOWN OR IS NOT COMPLETELY DETAILED ON THE STRUCTURAL DRAWINGS SHALL BE DESIGNED BY AN ENGINEER, REGISTERED IN THE STATE OF OHIO, RETAINED BY THE FABRICATOR. IT IS THE RESPONSIBILITY OF THE FABRICATOR TO PROVIDE ALL STIFFENER PLATES, ETC., THAT MAY BE REQUIRED IN ADDITION TO THOSE SHOWN ON THE STRUCTURAL SCHEMATIC DETAILS TO ENSURE THAT THE MEMBERS CONNECTED TOGETHER HAVE ADEQUATE STRENGTH AT THE CONNECTION. COMPLETELY DETAILED INCLUDES PROVIDING THE FOLLOWING INFORMATION ON THE DETAIL.

i. ALL PLATE DIMENSIONS AND GRADES
ii. ALL WELD SIZES, LENGTHS, PITCHES AND RETURNS
iii. ALL HOLE SIZES AND SPACINGS,
iv. NUMBER AND TYPES OF BOLTS

b. CONNECTIONS SHALL BE DESIGNED FOR ONE-HALF OF THE ALLOWABLE LOAD ON THE MEMBER, AS DEFINED IN THE AISC TABLES FOR ALLOWABLE LOADS ON BEAMS AS Wc/2L OR THE REACTIONS SHOWN ON THE DRAWINGS, WHICHEVER IS GREATER.

c. MOMENT CONNECTIONS SHALL BE DESIGNED FOR THE FULL MOMENT CAPACITY WHERE MAGNITUDE IS NOT SHOWN ON DRAWINGS AND THE SHEAR OBTAINED FROM NOTE b. ABOVE.

d. THE MINIMUM PLATE THICKNESS SHALL BE 3/8", THE MINIMUM BOLT DIAMETER SHALL BE 3/4", THE MINIMUM WELD SHALL BE 1/4"x Z" LONG AND THE MINIMUM LOAD ON ANY CONNECTION SHALL BE 10 KIPS.

e. PROVIDE WELDED STIFFENER PLATES ON BOTH SIDES OF THE WEB OF BEAMS AT POINT OF CONCENTRATED LOADS, INCLUDING BEAMS SUPPORTING COLUMNS OR RUNNING OVER THE TOPS OF COLUMNS, OR GIRDERS, AND AT THE LOCATION OF CHANGE OF SLOPE (KINKS) AT ANY MEMBER. MINIMUM STIFFENER PLATE THICKNESS SHALL BE 5/8" OR FLANGE THICKNESS OF THE COLUMN ABOVE OR BELOW, WHICHEVER IS GREATER.

f. SLIP CRITICAL CONNECTIONS OF A325SC OR A490SC BOLTS SHALL BE USED FOR ALL BOLTED CONNECTIONS OF MOMENT CONNECTIONS, CANTILEVERS AND AS SHOWN ON THE DRAWINGS. OVERSIZED AND LONG-SLOTTED HOLES ARE ALLOWED FOR SLIP CRITICAL CONNECTIONS. ALL OTHER BOLTED CONNECTIONS SHALL BE BEARING TYPE USING A325N OR A490N BOLTS.

g. PROTRUDING BOLT HEADS, SHAFTS OR NUTS SHALL NOT EXTEND INTO NOR PROHIBIT THE APPLICATION OF ARCHITECTURAL FINISHES AND THEY SHALL NOT EXTEND INTO NOR PROHIBIT THE PLACEMENT OF STEEL DECKING TO THE CORRECT LINE AND ELEVATION.

h. SHOP DRAWINGS SHALL INDICATE THE TYPE OF BOLT USED IN EACH CONNECTION AND THE ALLOWABLE BALUES USED FOR THE BARIOUS BOLT TYPES.

i. FABRICATOR SHALL PROVIDE FILLER PLATES BETWEEN ALL DOUBLE ANGLES AT INTERVALS SUCH THAT THE SLENDERNESS RATIO OF A SINGLE ANGLE DOES NOT CONTROL.

j. ALL EXPOSED WELDS SHALL BE GROUND SMOOTH.

k. SPLICING OF STEEL MEMBERS, UNLESS SHOWN ON THE DRAWINGS, IS PROHIBITED WITHOUT WRITTEN APPROVAL OF THE STRUCTURAL ENGINEER OF RECORD.

5. PAINT:

a. DO NOT PAINT STEEL OR ANCHOR BOLTS WHICH WILL BE ENCASED IN CONCRETE OR MASONRY.

6. METAL DECK:

a. METAL DECK TO BE AS SHOWN ON THE DRAWINGS.

b. ANCHORAGE TO BE AS ASHOWN ON DRAWINGS & PER STEEL DECK INSTITUTE SPECS. UNO.

c. DO NOT SUSPEND PIPES OR DUCTS FROM ROOF DECK.

d. FABRICATE DECK UNITS IN LENGTHS TO SPAN THREE OR MORE SUPPORT SPACINGS.

e. DECKING MANUFACTURER SHALL COORDINATE SIZE AND LOCATION OF ROOF OPENINGS WITH MECHANICAL DRAWINGS.

f. METAL ROOF DECK USED IN THE BUILDING SHALL NOT HAVE SECTION PROPERTIES PER FOOT OF WIDTH LESS THAN THE FOLLOWING:
1.5" 20GA. TYPE B: Ip=0.201 IN^3, Sn=0.247 IN^3."

F. STRUCTURAL STEEL (Cont.):

7. STEEL JOISTS:

a. ALL JOISTS SHALL BE DESIGNED, FABRICATED, AND ERECTED IN ACCORDANCE WITH THE LATEST EDITION OF THE STANDARD SPECIFICATIONS OF THE STEEL JOIST INSTITUTE.

b. JOIST SIZES INDICATED ON PLANS ARE MINIMUMS. JOIST MANUFACTURER SHALL DESIGN AND SUBMIT CALCULATIONS BY AN ENGINEER REGISTERED IN THE STATE OF OHIO. FOR JOISTS HAVING ANY ADDITIONAL CONCENTRATED LOADS, SUCH AS MECHANICAL EQUIPMENT, SUSPENDED FOLDING PARTITIONS, ETC., OR UN-BRACED COMPRESSION CHORDS AND/OR OTHER UNUSUAL CONDITIONS, MANUFACTURER SHALL ADJUST CHORD AND WEB SIZES ACCORDINGLY, BUT SHALL NOT ALTER DEPTH UNLESS APPROVED IN WRITING.

c. CONTRACTOR SHALL SUBMIT SHOP DRAWINGS FOR REVIEW PRIOR TO MANUFACTURE. SHOP DRAWINGS AND CALCULATIONS SHALL INCLUDE DETAILS OF ANY OPTIONAL FIELD SPLICES AND IF HIGH STRENGTH BOLTS OR FULL PENETRATION WELDS ARE UTILIZED, CONTRACTOR SHALL RETAIN AN INDEPENDENT TESTING LAB TO CERTIFY COMPLIANCE WITH AISC AND AWS SPECIFICATIONS, RESPECTIVELY.

d. JOISTS MUST NOT ALIGN WITH CMU WALLS BELOW. CENTERLINE OF JOIST SHALL BE A MINIMUM OF 6" AWAY FROM FACE OF CMU WALL BELOW.

8. MISCELLANEOUS:

a. PROVIDE HOLES FOR OTHERS AS NOTED. IF OPENING IS NOT SHOWN ON THE STRUCTURAL DRAWINGS, OBTAIN PRIOR APPROVAL.

b. STEEL SUPPORTING OR CONNECTING TO MECHANICAL AND OTHER EQUIPMENT AS SHOWN ON DRAWINGS IS SHOWN FOR BIDDING PURPOSES ONLY. CONTRACTOR SHALL RECONCILE EXACT SIZE AND LOCATION WITH MECH. AND OTHER REQUIREMENTS BEFORE PROCEEDING WITH HIS WORK.

c. GROUT UNDER BEARING PLATES TO BE NON-SHRINKING, NON-METALLIC TYPE.

d. ALL COLUMN ANCHOR BOLTS TO BE SET BY LICENSED SURVEYOR.

e. PROVIDE HEAVY HEX NUT AND COMPATIBLE WASHER AT ALL ANCHOR BOLTS.

f. MIN. BEAM BEARING ON MASONRY SHALL BE 8".

g. MIN. BEAM BEARING ON STEEL SHALL BE 4".

h. NO CHANGE IN SIZE OR POSITION OF THE STRUCTURAL ELEMENTS SHALL BE MADE AND HOLES, SLOTS, CUTS, ETC., ARE NOT PERMITTED THROUGH ANY MEMBER UNLESS THEY ARE DETAILED ON THE APPROVED SHOP DRAWINGS.

i. FABRICATE ALL BEAMS WITH THE MILL CAMBER UP.

j. ALL EXPOSED STEEL ITEMS SHALL BE GALVANIZED.

G. LIGHT GAUGE STEEL FRAMING:

1. ALL LIGHT GAUGE METAL STUD FRAMING, INCLUDING HEADERS, SILLS, TRACKS AND OTHER ASSOCIATED FRAMING MEMBERS AND ACCESSORIES, AND THEIR CONNECTIONS TO STRUCTURE IS A DELEGATED DESIGN TO BE PROVIDED BY THE LIGHT GAUGE FRAMING CONTRACTOR. ALL LIGHT GAUGE STRUCTURAL MEMBERS SHALL BE DESIGNED IN ACCORDANCE WITH THE LATEST EDITION OF THE AISI "SPECIFICATION FOR THE DESIGN OF COLD-FORMED STEEL STRUCTURAL MEMBERS." SEE SPECIFICATIONS FOR ADDITIONAL INFORMATION AND DESIGN REQUIREMENTS. THE LIGHT GAUGE METAL STUD FRAMING AND THE CONNECTIONS TO STRUCTURE SHOWN ON THE STRUCTURAL DRAWINGS ARE PROVIDED FOR DESIGN INTENT ONLY. THE DEPTH OF THE METAL STUDS SHOWN IN THE DETAILS SHALL BE PROVIDED.

2. THE DESIGN OF ALL LIGHT GAUGE FRAMING MEMBERS AND THEIR CONNECTIONS TO STRUCTURE SHALL BE PERFORMED BY A REGISTERED ENGINEER RETAINED BY THE LIGHT GAUGE FRAMING CONTRACTOR. SUBMIT SEALED STRUCTURAL CALCULATIONS FOR REVIEW ALONG WITH THE LIGHT GAUGE FRAMING SHOP DRAWINGS. CONNECTIONS OF ALL FRAMING MEMBERS SHALL BE WITH SELF-DRILLING GALVANIZED SCREWS OR WELDING. SCREWS AND WELDS SHALL BE OF SUFFICIENT SIZE TO RESIST ALL REQUIRED LOADS INCLUDING WIND. ALL WELDS SHALL BE TOUCHED-UP WITH A ZINC-RICH GALVANIZING PAINT.

3. METAL TRACKS SHALL HAVE 1.50-INCH FLANGES AND MATCH THE MATERIAL GAUGE OF THE IN-FRAMING METAL STUDS, U.N.O. THE IN-FRAMING METAL STUDS SHALL BE CONNECTED TO EACH TRACK FLANGE WITH ONE #10 SCREW. FULL HEIGHT BACK-TO-BACK DOUBLE STUDS SHALL BE PROVIDED AT ALL WALL ENDS, CORNERS AND EACH SIDE OF OPENINGS (JAMBS). ALL BOX BEAM HEADERS SHALL BEAR ON AN 18-GAUGE TRIMMER STUD WITH A NESTED TRACK, MINIMUM, U.N.O.

4. METAL STUDS SHALL BE C-SHAPED WITH 50 KSI YIELD STRENGTH FOR 12, 14 AND 16 GAUGE MATERIALS, AND 33 KSI FOR 18 AND 20 GAUGE MATERIALS. FOR ALL METAL STUDS, THE MINIMUM SECTION PROPERTIES SHALL CONFORM TO SSMA GUIDELINES. BRIDGING SHALL BE PROVIDED IN CONFORMANCE WITH THE MANUFACTURER'S SPECIFICATIONS TO OBTAIN THE FULL FLEXURAL CAPACITY OF THE SECTION.

5. ALL STRUCTURAL MEMBERS SHALL BE FORMED FROM CORROSION RESISTANT STEEL, CORRESPONDING TO THE REQUIREMENTS OF ASTM A653. ALL LIGHT GAUGE STEEL MEMBERS SHALL BE ZINC COATED MEETING THE REQUIREMENTS OF ASTM A924. ALL STRUCTURAL LIGHT GAUGE MEMBERS SHALL BE CONSTRUCTED WITH UNPUNCHED SOLID WEBS, UNLESS OTHERWISE NOTED.

6. CONNECTIONS AT LIGHT GAUGE MATERIAL CONSTRUCTED WITH #10 HILTI KWIK-FLEX OR GRABBER SCREWS, UNLESS OTHERWISE NOTED.

7. ALL FRAMING COMPONENTS SHALL BE CUT SQUARELY FOR TIGHT ATTACHMENT TO PERPENDICULAR MEMBERS, OR, AS REQUIRED, FOR AN ANGULAR FIT AGAINST ABUTTING MEMBERS.

8. SPLICES IN FRAMING MEMBERS, OTHER THAN RUNNING TRACK, SHALL NOT BE PERMITTED.

9. WEB STIFFENERS SHALL BE PROVIDED AT REACTION POINTS, AND/OR AT POINTS OF CONCENTRATED LOADS AS REQUIRED.

10. JOIST BRIDGING SHALL BE PROVIDED TO BRACE MEMBERS AS REQUIRED TO DEVELOP FULL MEMBER STRENGTH.

11. END BLOCKING SHALL BE PROVIDED WHERE JOIST ENDS ARE NOT OTHERWISE RESTRAINED FROM ROTATION.

12. STRUCTURAL MEMBERS NOTED SHALL HAVE SECTION PROPERTIES AS INDICATED IN THE "PRODUCT TECHNICAL INFORMATION" DOCUMENT BY STEEL STUD MANUFACTURERS ASSOCIATION (SSMA).

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JONATHAN MICHAEL REIS
PE-77926
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JMR
CHECKED	JMR

TITLE
GENERAL NOTES

SHEET NO.
S0.2

1/17/2026 9:42:24 AM

TABLE 1705.2.1 REQUIRED SPECIAL INSPECTIONS AND TESTS OF STEEL CONSTRUCTION

VERIFICATION AND INSPECTION	CONTINUOUS	PERIODIC	REFERENCED STANDARD
1. MATERIAL IDENTIFICATION AND TESTING OF HIGH-STRENGTH BOLTS, NUTS, AND WASHERS:			
a. IDENTIFICATION MARKINGS TO CONFORM TO ASTM STANDARDS SPECIFIED IN THE APPROVED CONSTRUCTION DOCUMENTS.	- -	x	AISC 360: SECTION A3.3 AND APPLICABLE ASTM MATERIAL STANDARDS
b. MANUFACTURE'S CERTIFICATE OF COMPLIANCE REQUIRED.	- -	x	
c. TESTING OF HIGH-STRENGTH BOLTS, NUTS AND WASHERS.	- -	- -	
2. INSPECTION OF HIGH-STRENGTH BOLTING:			
a. SNUG-TIGHT JOINTS.	- -	x	AISC 360: SECTION M2.5
b. PRETENSIONED AND SLIP-CRITICAL JOINTS USING TURN-OF-NUT WITH MATCHMARKING, TWIST-OFF BOLT OR DIRECT TENSION INDICATOR METHODS OF I NSTALLATION.	- -	x	
c. PRETENSIONED AND SLIP-CRITICAL JOINTS USING TURN-OF-NUT WITHOUT MATCHMARKING OR CALIBRATED WRENCH METHODS OF INSTALLATION.	x	- -	
3. MATERIAL IDENTIFICATION AND TESTING OF STRUCTURAL STEEL AND COLD-FORMED DECK:			
a. FOR STRUCTURAL STEEL, IDENTIFICATION MARKINGS TO CONFORM TO AISC 360.	- -	x	AISC 360: SECTION N2.1 AND APPLICABLE ASTM MATERIAL STANDARDS
b. FOR OTHER STEEL, IDENTIFICATION MARKINGS TO CONFORM TO ASTM STANDARDS SPECIFIED IN THE APPROVED CONSTRUCTION DOCUMENTS.	- -	x	
c. MANUFACTURER'S CERTIFIED TEST REPORTS.	- -	x	
d. TESTING OF UNIDENTIFIED STEEL.	- -	- -	
4. MATERIAL IDENTIFICATION OF WELDING CONSUMABLES AND TESTING OF WELDED ELEMENTS:			
a. IDENTIFICATION MARKINGS TO CONFORM TO AWS SPECIFICATION IN THE APPROVED CONSTRUCTION DOCUMENTS.	- -	x	AISC 360: A3.5, N3.2, & N5.5 AND APPLICABLE AWS A5 DOCUMENTS
b. MANUFACTURER'S CERTIFICATE OF COMPLIANCE REQUIRED.	- -	x	
c. NONDESTRUCTIVE TESTING OF WELDED JOINTS.	- -	- -	
5. INSPECTION OF WELDING:			
a. STRUCTURAL STEEL AND COLD-FORMED STEEL DECK:			
i. COMPLETE AND PARTIAL PENETRATION GROOVE WELDS.	x	- -	
ii. MULTIPASS FILLET WELDS.	x	- -	
iii. SINGLE-PASS FILLET WELDS > 5/16"	x	- -	AISC 360: J2, M2.4 & M4.5 AWS D1.1 & AWS D1.8
iv. PLUG AND SLOT WELDS.	x	- -	
v. SINGLE-PASS FILLET WELDS 5/16" OR LESS.	- -	x	
vi. FLOOR AND ROOF DECK WELDS.	- -	x	AWS D1.3, SDI QA/QC
vii. END-WELDED STUDS.	- -	x	AWS D1.1
viii. WELDED SHEET STEEL FOR COLD-FORMED FRAMING MEMBERS.	- -	x	AWS D1.3
b. REINFORCING STEEL:			
i. VERIFICATION OF WELDABILITY OF REINFORCING STEEL OTHER THAN ASTM A706	- -	x	
ii. REINFORCING STEEL RESISTING FLEXURAL AND AXIAL FORCES IN INTERMEDIATE AND SPECIAL MOMENT FRAMES, AND BOUNDARY ELEMENTS OF SPECIAL STRUCTURAL WALLS OF CONCRETE AND SHEAR REINFORCEMENT.	x	- -	AWS D1.4, ACI 318: 18.2.8, 25.5.7.4 & 26.6.4.1
iii. SHEAR REINFORCEMENT.	x	- -	
iv. OTHER REINFORCING STEEL.	- -	x	
v. TESTS OF REINFORCING BARS.	- -	- -	
6. INSPECTION OF STEEL FRAME JOINT DETAILS FOR COMPLIANCE:			
a. DETAILS SUCH AS BRACING AND STIFFENING.	- -	x	AISC 360: N5.8
b. MEMBER LOCATIONS	- -	x	
c. APPLICATION OF JOINT DETAILS AT EACH CONNECTION.	- -	x	

TABLE 1705.3 REQUIRED SPECIAL INSPECTIONS AND TESTS OF CONCRETE CONSTRUCTION

VERIFICATION AND INSPECTION	CONTINUOUS	PERIODIC	REFERENCED STANDARD	IBC REFERENCE
1. INSPECT REINFORCEMENT, INCLUDING PRESTRESSING TENDONS, AND VERIFY PLACEMENT.	- -	x	ACI 318: Ch. 20, 25.2, 25.3, 26.6.1-26.6.3	1908.4
2. REINFORCING BAR WELDING:				
a. VERIFY WELDABILITY OF REINFORCING BARS OTHER THAN ASTM A706;	- -	x	AWS D1.4 ACI 318: 26.6.4	- -
b. INSPECT SINGLE-PASS FILLET WELDS, MAXIMUM 5/16";	- -	x		
c. INSPECT ALL OTHER WELDS.	x	- -		
3. INSPECT ANCHORS CAST IN CONCRETE.	- -	x	ACI 318: 17.8.2	- -
4. INSPECT ANCHORS POST-INSTALLED IN HARDENED CONCRETE MEMBERS.				
a. ADHESIVE ANCHORS INSTALLED IN HORIZONTALLY OR UPWARDLY INCLINDED ORIENTATIONS TO RESIST SUSTAINED TENSION LOADS.	x	- -	ACI 318: 17.8.2.4	- -
b. MECHANICAL ANCHORS AND ADHESIVE ANCHORS NOT IDENTIFIED IN 4.a	- -	x	ACI 318: 17.8.2	
5. VERIFY USE OF REQUIRED DESIGN MIX.	- -	x	ACI 318: Ch. 19, 26.4.3, 26.4.4	1904.1, 1904.2 1908.2, 1908.3
6. PRIOR TO CONCRETE PLACEMENT, FABRICATE SPECIMENS FOR STRENGTH TESTS, PERFORM SLUMP AND AIR CONTENT TESTS, AND DETERMINE THE TEMPERATURE OF THE CONCRETE.	x	- -	ASTM C172, ASTM C31 ACI 318: 26.4, 26.12	1908.10
7. INSPECT CONCRETE AND SHOTCRETE PLACEMENT FOR PROPER APPLICATION TECHNIQUES.	x	- -	ACI 318: 26.5	1908.6 - 1908.8
8. VERIFY MAINTENANCE OF SPECIFIED CURING TEMPERATURE AND TECHNIQUES.	- -	x	ACI 318: 26.5.3-26.5.5	1908.9
9. INSPECT PRE-STRESSED CONCRETE FOR:				
a. APPLICATION OF PRE-STRESSING FORCES;	x	- -	ACI 318: 26.10	- -
b. GROUTING OF BONDED PRE-STRESSING TENDONS	x	- -		
10. INSPECT ERECTION OF PRECAST CONCRETE MEMBERS.	- -	x	ACI 318: 26.9	- -
11. VERIFY IN-SITU CONCRETE STRENGTH, PRIOR TO STESSING OF TENDONS IN POST-TENSIONED CONCRETE AND PRIOR TO REMOVAL OF SHORES AND FORMS FROM BEAMS AND STUCTURAL SLABS.	- -	x	ACI 318: 26.11.2	- -
12. INSPECT FORMWORK FOR SHAPE, LOCATION AND DIMENSIONS OF THE CONCRETE MEMBER BEING FORMED.	- -	x	ACI 318: 26.11.1.2(b)	- -

TABLE 1705.6 REQUIRED SPECIAL INSPECTIONS AND TESTS OF SOILS

VERIFICATION AND INSPECTION	CONTINUOUS	PERIODIC
1. VERIFY MATERIALS BELOW SHALLOW FOUNDATIONS ARE ADEQUATE TO ACHIEVE THE DESIGN BEARING CAPACITY.	- -	x
2. VERIFY EXCAVATIONS ARE EXTENDED TO PROPER DEPTH AND HAVE REACHED PROPER MATERIAL.	- -	x
3. PERFOM CLASSIFICATION AND TESTING OF COMPACTED FILL MATERIALS.	- -	x
4. VERIFY USE OF PROPER MATERIALS, DENSITIES AND LIFT THICKNESS DURING PLACEMENT AND COMPACTION OF COMPACTED FILL.	x	- -
5. PRIOR TO PLACEMENT OF COMPACTED FILL, INSPECT SUBGRADE AND VERIFY THAT SITE HAS BEEN PREPARED PROPERLY.	- -	x

SPECIAL INSPECTION PROGRAM NOTES:

1. PERIODIC INSPECTION FREQUENCY DETERMINED BY THE DESIGN PROFESSIONAL, UNLESS NEEDED OTHERWISE.
2. CONTINUOUS OR PERIODIC SELECTION TO BE MADE BY THE DESIGN PROFESSIONAL BASED ON BUILDING CATEGORY AND DESIGN METHODOLOGY. SPECIAL INSPECTION/TESTING PROGRAM.
3. THE SPECIAL INSPECTOR SHALL BE A QUALIFIED PERSON WHO SHALL DEMONSTRATE COMPETENCE TO THE SATISFACTION OF THE BUILDING OFFICIAL FOR THE INSPECTION OF THE PARTICULAR TYPE OF CONSTRUCTION OR OPERATION STIPULATED.
4. IF NECESSARY, THE CONTRACTOR SHALL ARRANGE A PRE-CONSTRUCTION MEETING WITH THE ARCHITECT, ENGINEER, BUILDING OFFICIAL, AND TESTING AGENCY TO REVIEW THE SPECIAL INSPECTION REQUIREMENTS.
5. DUTIES OF THE SPECIAL INSPECTOR INCLUDE, BUT ARE NOT LIMITED TO:
   A. ACKNOWLEDGE AND CONFORM TO THE SPECIAL INSPECTION REQUIREMENTS OF OBC.
   B. THE SPECIAL INSPECTOR SHALL OBSERVE THE WORK FOR CONFORMANCE WITH THE APPROVED PERMIT PLANS AND SPECIFICATIONS. ALL DISCREPANCIES SHALL BE BROUGHT TO IMMEDIATE ATTENTION OF THE CONTRACTOR FOR CORRECTION, THEN, IF UNCORRECTED, TO THE ATTENTION OF THE ARCHITECT, THE ENGINEER AND THE BUILDING OFFICIAL.
   C. THE SPECIAL INSPECTOR SHALL FURNISH INSPECTION REPORTS FOR EACH INSPECTION TO THE CONTRACTOR, THE ARCHITECT, THE ENGINEER AND THE BUILDING OFFICIAL AS A MINIMUM. THE REPORTS SHALL BE DISTRIBUTED IN A TIMELY MANNER.
   D. INSPECTION FOR PREFABRICATED COMPONENTS SHALL BE THE SAME AS IF THE MATERIAL WAS INSTALLED ON SITE. CONTINUOUS INSPECTION SHALL NOT BE REQUIRED DURING THE PREFABRICATION IF THE APPROVED AGENCY CERTIFIES THE CONSTRUCTION AND FURNISHES EVIDENCE OF COMPLIANCE.
   E. THE SPECIAL INSPECTOR SHALL SUBMIT A FINAL REPORT STATING WHETHER THE WORK REQUIRING INSPECTION WAS INSPECTED AND WHETHER THE WORK WAS COMPLETED IN CONFORMANCE WITH THE APPROVED PLANS AND SPECIFICATION AND IN CONFORMANCE WITH ANY APPLICABLE WORKMANSHIP PROVISIONS OF THE APPLICABLE CODE.
6. SPECIAL INSPECTION AND TESTING REQUIREMENTS APPLY EQUALLY TO ALL BIDDER DESIGNED COMPONENTS.

A
A/E - ARCHITECT/ENGINEER
AB - ANCHOR BOLT/ROD
AFF - ABOVE FINISH FLOOR
ARCH. - ARCHITECT (URAL)
B
BFF - BELOW FINISH FLOOR
BLK - BLOCK (ING)
BM - BEAM
BRG - BEARING
BU - BUILT UP
B/ - BOTTOM OF
C
CAM (C=) - CAMBER
CIP - CAST-IN-PLACE
CJ - CONTROL JOINT
CL - CENTERLINE
CLR - CLEAR
CMU - CONCRETE MASONRY UNIT
COL - COLUMN
CONC - CONCRETE
CONN - CONNECT (ION)
CONT - CONTINUOUS
CONTR - CONTRACT (OR)
CTR - CENTER
CU - CUBIC
D
D - DEEP, DEPTH
DBL - DOUBLE
DEMO - DEMOLITION, DEMOLISH
DET - DETAIL
DIA - DIAMETER
DIAG - DIAGONAL, DIAGRAM
DIM - DIMENSION
DIR - DIRECTION
DL - DEAD LOAD
DR - DRAIN
DWG - DRAWING
E
EA - EACH
EF - EACH FACE
EJ - EXPANSION JOINT
EL, ELEV - ELEVATION
EMBED - EMBEDMENT
EQ - EQUAL
EST - ESTIMATE
EW - EACH WAY
EQUIP - EQUIPMENT
EXP - EXPANSION
EXT - EXTERIOR
F
FD - FLOOR DRAIN
FF - FINISHED FLOOR
FIN - FINISH (ED)
FLG - FLANGE
FLR - FLOOR (ING)
FOC - FACE OF CONCRETE
FOM - FACE OF MASONRY
FOS - FACE OF STUD
FOW - FACE OF WALL
FS - FAR SIDE
FT - FOOT, FEET
FTG - FOOTING
FRMG - FRAMING
FUT - FUTURE
G
GA - GAGE, GAUGE
GALV - GALVANIZED
GC - GENERAL CONTRACTOR
GEN - GENERAL
GL - GRADE LINE
GLU-LAM - GLUE-LAMINATED BEAM
GR BM - GRADE BEAM
GYP BD - GYPSUM BOARD
H
H - HIGH
HAS - HEADED ANCHOR STUD
HC - HOLLOW CORE
HDR - HEADER
HGR - HANGER
HORIZ - HORIZONTAL
HR - HANDRAIL
HS - HIGH STRENGTH
HSB - HIGH STRENGTH BOLT
HSS - HOLLOW STRUCTURAL SHAPE
HT - HEIGHT
I
ID - INSIDE DIAMETER
INCL - INCLUDING
INT - INTERIOR
J
JST - JOIST
JT - JOINT
K
K - KIPS (1000 lbs.)
KCJ - KEYED CONSTRUCTION JOINT
KLF - KIPS PER LINEAR FOOT
KSF - KIPS PER SQUARE FOOT
KSI - KIPS PER SQUARE INCH
L
L - ANGLE
LL - DOUBLE ANGLE
LBS - POUNDS
LG - LONG
LL - LIVE LOAD
LLH - LONG LEG HORIZONTAL
LLV - LONG LEG VERTICAL
LOC - LOCATION
LONG - LONGITUDINAL
LSL - LAMINATED STRAND LUMBER
LT WT - LIGHT WEIGHT
LVL - LAMINATED VENEER LUMBER
M
MATL - MATERIAL
MAX - MAXIMUM
MBR - MEMBER
MC - MISCELLANEOUS CHANNEL
MECH - MECHANICAL
MEZZ - MEZZANINE
MFD - MANUFACTURED
MFR - MANUFACTURER
MIN - MINIMUM
MISC - MISCELLANEOUS
MTL - METAL
N
NA - NOT APPLICABLE
NIC - NOT IN CONTRACT
NO - NUMBER
NOM - NOMINAL
NS - NEAR SIDE
NTS - NOT TO SCALE
O
OC - ON CENTER
OD - OUTSIDE DIAMETER
OH DR - OVERHEAD DOOR
OPNG - OPENING
OPP - OPPOSITE
OSB - ORIENTED STRAND BOARD
OVS - OVERSIZED
P
PAF - POWDER ACTUATED FASTENER
PCF - POUNDS PER CUBIC FOOT
PL - PLATE
PLF - POUNDS PER LINEAR FOOT
PLYWD - PLYWOOD
PNL - PANEL
PR - PAIR, PIPE RAIL
PRCST - PRECAST
PREFAB - PREFABRICATED
PSF - POUNDS PER SQUARE FOOT
PSI - POUNDS PER SQUARE INCH
PT - POST TENSION (ED), PRESSURE TREATED
R
R - RADIUS
RCP - REINFORCED CONCRETE PIPE
RD - ROOF DRAIN
REF - REFERENCE
REINF - REINFORCING
REQ'D - REQUIRED
REV - REVISION
RO - ROUGH OPENING
S
SCHED - SCHEDULE
SECT - SECTION
SHT - SHEET
SHTHG - SHEATHING
SIM - SIMILAR
SL - SNOW LOAD
SLV - SLEEVE
SOG - SLAB-ON-GRADE
SPEC - SPECIFICATION
SQ - SQUARE
SSL - SHORT SLOTTED
SST - STAINLESS STEEL
STD - STANDARD
STIF - STIFFENER
STL - STEEL
SUSP - SUSPENDED
SW - SHEAR WALL
SYMM - SYMMETRICAL
T
T&B - TOP AND BOTTOM
T&G - TONGUE AND GROOVE
TBD - TO BE DETERMINED
THK - THICK (NESS)
TL - TOTAL LOAD
TO - TOP OF
TOB - TOP OF BEAM
TOC - TOP OF CONCRETE
TOCW - TOP OF CONCRETE WALL
TOF - TOP OF FOOTING
TOM - TOP OF MASONRY
TOS - TOP OF STEEL
TOW - TOP OF WALL
TRANS - TRANSVERSE
TYP - TYPICAL
U
UNO - UNLESS NOTED OTHERWISE
V
V - SHEAR
VERT - VERTICAL
VIF - VERIFY IN FIELD
VR - VAPOR RETARDER
VRFY - VERIFY
W
W - WIDTH
W/ - WITH
W/O - WITHOUT
WD - WOOD
WF - WIDE FLANGE
WL - WIND LOAD
WLD - WELD (ED)
WP - WATERPROOFING, WORK POINT
WS - WATERSTOP
WT - WEIGHT
WWF - WELDED WIRE FABRIC
Y
YD - YARD

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JONATHAN MICHAEL REIS
PE-77926
REGISTERED PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

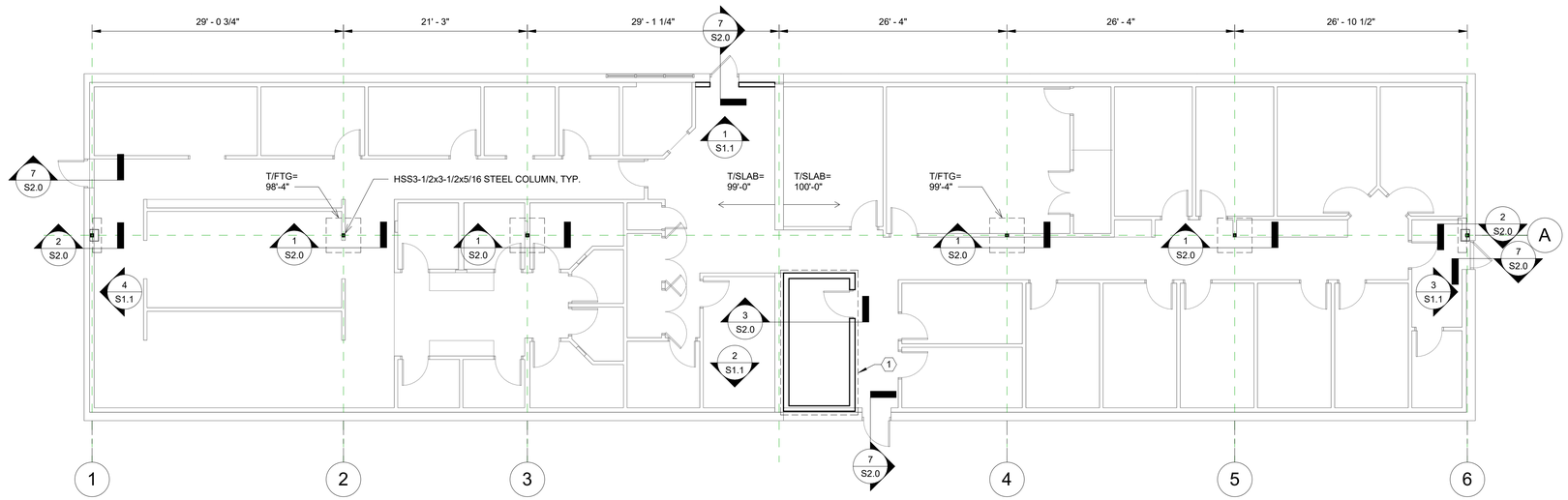
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JMR
CHECKED	JMR

TITLE
SPECIAL INSPECTIONS

SHEET NO.
S0.3

1/17/2026 9:42:25 AM



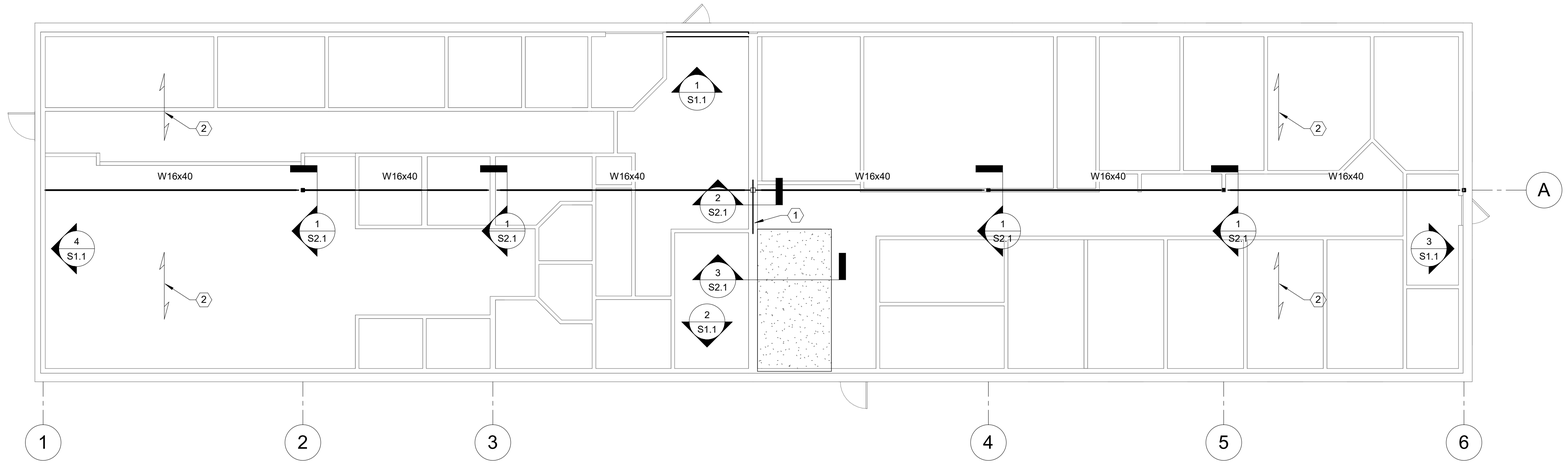
1 FOUNDATION PLAN
1/8" = 1'-0"

FOUNDATION NOTES:

1. FULLY GROUT ALL EXISTING BELOW-GRADE CMU AND REPLACE ANY DAMAGED BLOCKS.
2. CENTER ALL COLUMN FOOTINGS UNDER COLUMN CENTERLINES, U.N.O.

PLAN NOTES:

1. PROVIDE AN 8" THICKENED SLAB w/ #4 BARS AT 12" O.C. EACH WAY.



2 ROOF FRAMING PLAN
1/8" = 1'-0"

FRAMING NOTES:

1. INSPECT FASTENER PATTERN OF EXISTING METAL ROOF DECK. PROVIDE #12 TEK SCREWS AT SUPPORTS USING 36/4 PATTERN AND PROVIDE #10 TEK SCREWS AT 12" O.C. AT ALL SIDELAPS [UNLESS ALREADY INSTALLED].
2. INSTALL 4" WIDE CARBON FIBER STRAPS AT 48" O.C. TO INSIDE FACE OF EXISTING PERIMETER CMU WALLS, TYP. CONTRACTOR HAS THE OPTION TO INSERT (1) #5 REBAR AND GROUT THE CELLS SOLID [FULL-HEIGHT] AT 48" O.C. INSTEAD OF CARBON FIBER VERTICAL STRAPPING.
3. AT EXISTING BRICK VENEER, INSTALL VENEER TIES AT 16" O.C. [VERTICALLY] & 32" O.C. [HORIZONTALLY].

PLAN NOTES:

1. NEW W8x35 STEEL BEAM TO BEAR ON EXISTING CMU WALL. PROVIDE 7-1/2" x 7-1/2" x 1/2" STEEL BEARING PLATE w/ (1) 1/2" DIA. x 24" LONG THREADED ROD [GROUT CELLS AT BEARING, TYP.]
2. EXISTING ROOF FRAMING MEMBERS: 20" DEEP STEEL BAR JOISTS AT 5'-0" O.C.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JONATHAN MICHAEL REIS
PE-77926
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

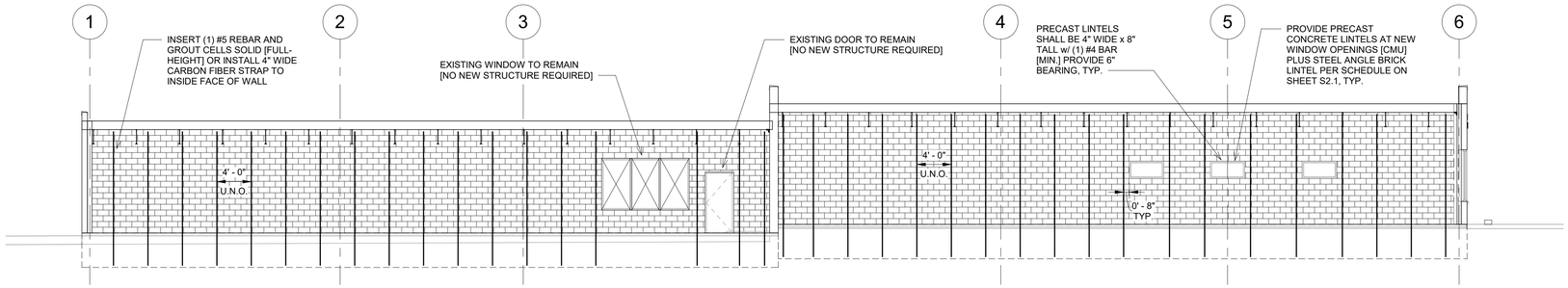
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JMR
CHECKED	JMR

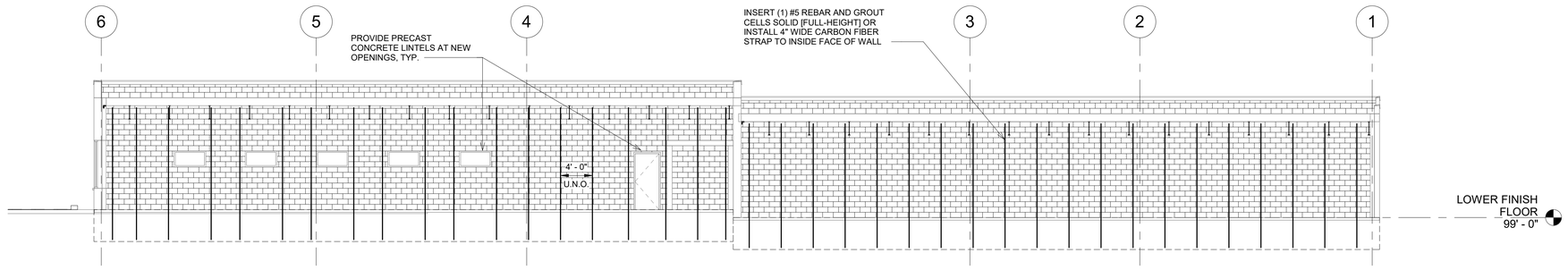
TITLE
STRUCTURAL PLANS

SHEET NO.
S1.0

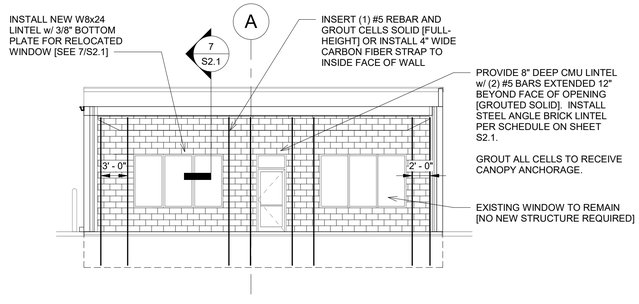
1/17/2026 9:42:25 AM



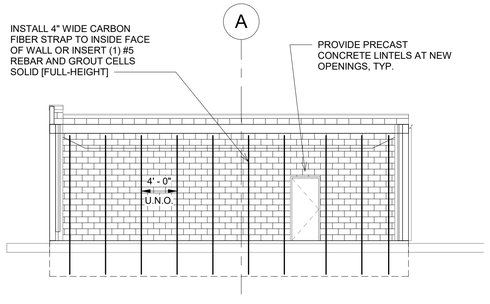
1 NORTH WALL ELEVATION (INSIDE)
1/8" = 1'-0"



2 SOUTH WALL ELEVATION (INSIDE)
1/8" = 1'-0"



3 EAST WALL ELEVATION (INSIDE)
1/8" = 1'-0"



4 WEST WALL ELEVATION (INSIDE)
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JONATHAN MICHAEL REIS
PE-77926
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

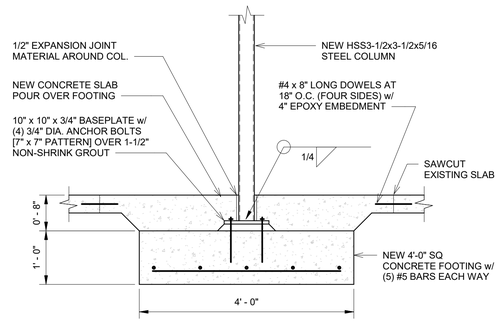
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JMR
CHECKED	JMR

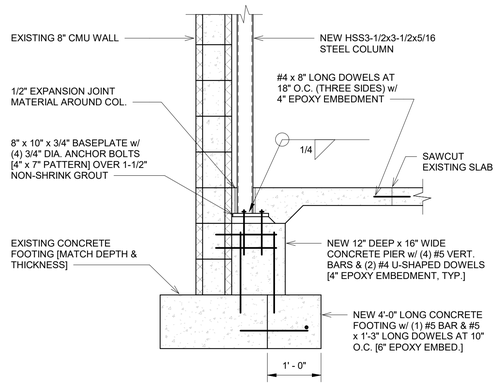
TITLE
STRUCTURAL ELEVATIONS

SHEET NO.
S1.1

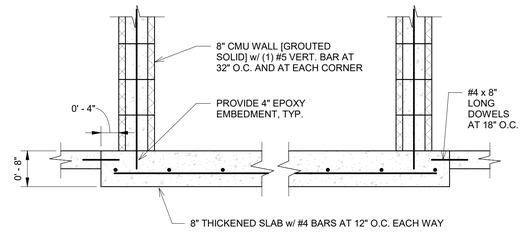
1/17/2026 9:42:26 AM



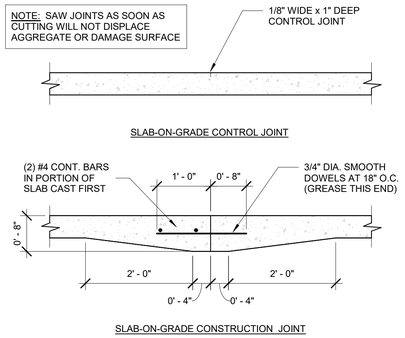
1 FND DETAIL - NEW INTERIOR COL.
3/4" = 1'-0"



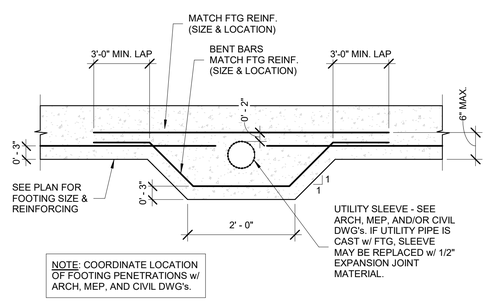
2 FND DETAIL - NEW COL. (PERIMETER)
3/4" = 1'-0"



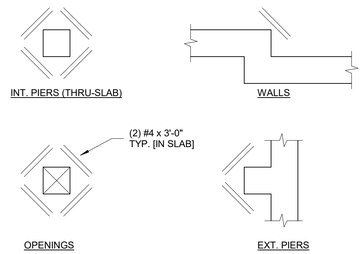
3 FND DETAIL - STORM SHELTER
3/4" = 1'-0"



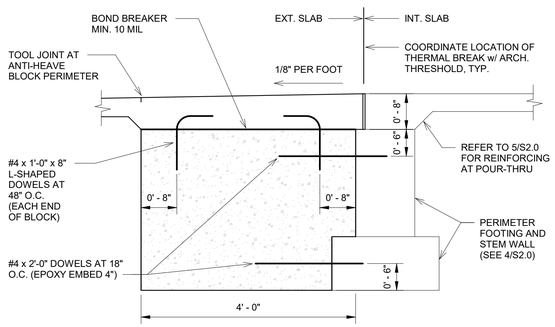
4 TYP. DETAIL - SLAB JOINTS
3/4" = 1'-0"



5 TYP. DETAIL - PIPE SLEEVE THRU FTG
3/4" = 1'-0"



6 TYP. DETAIL - SLAB REINF. AT REENTRANT CORNERS
3/16" = 1'-0"



7 TYP. DETAIL - ANTI-HEAVE BLOCK
3/4" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JONATHAN MICHAEL REIS
PE-77926
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

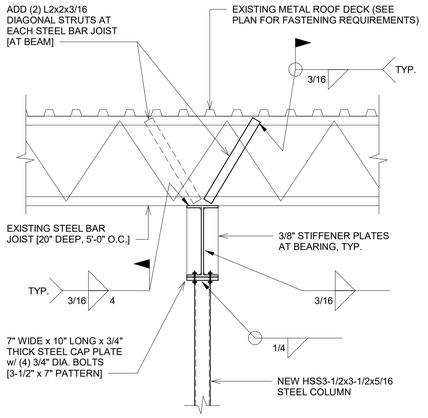
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JMR
CHECKED	JMR

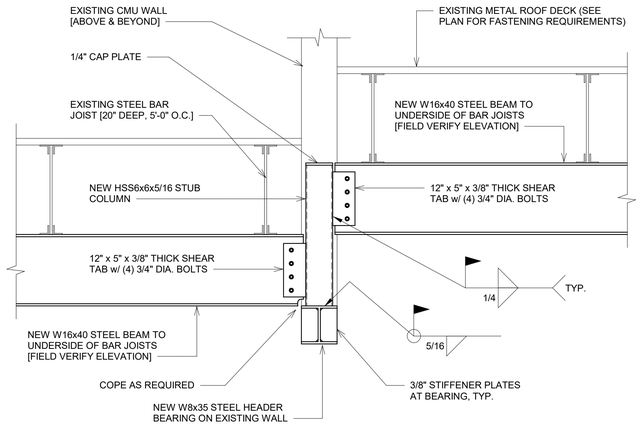
TITLE
STRUCTURAL DETAILS

SHEET NO.
S2.0

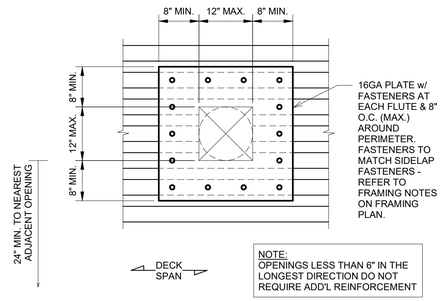
1/17/2026 9:42:26 AM



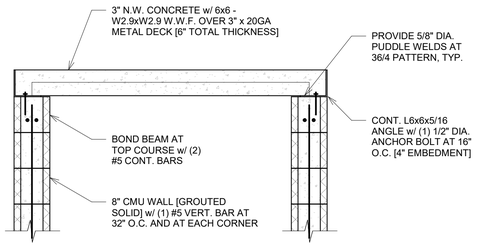
1 FRM DETAIL - NEW BEAM AT COL.
3/4" = 1'-0"



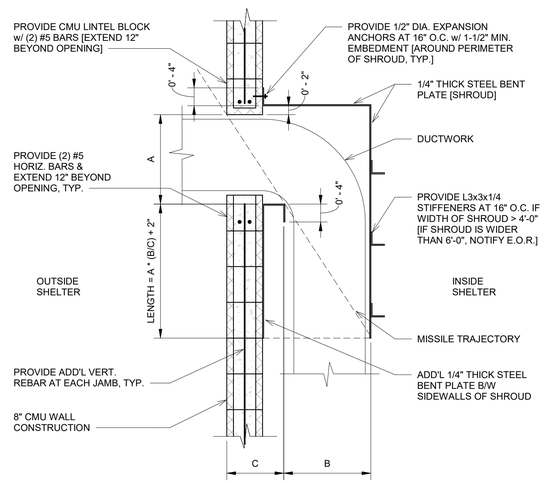
2 FRM DETAIL - HEADER AT EXIST. WALL
3/4" = 1'-0"



5 TYP. DETAIL - ROOF OPENING UNDER 12"
3/4" = 1'-0"

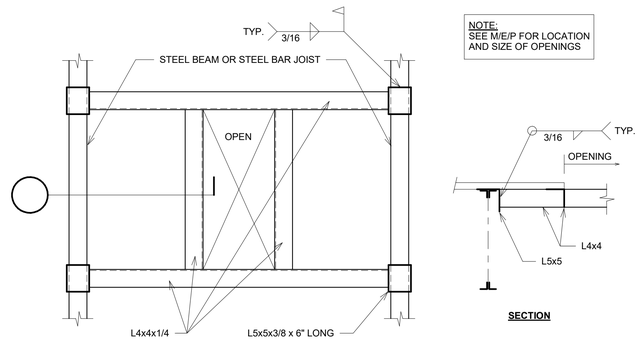


3 FRM DETAIL - STORM SHELTER ROOF
3/4" = 1'-0"



NOTE:
1. PLATE SHROUDS ARE REQUIRED FOR ALL OPENINGS (MECH, ELEC, PLUMB, ETC.) EXCEEDING 3-1/2 SQUARE INCHES OR WITH A DIAMETER OVER 2".
2. SHROUD MAY BE ORIENTED UP OR DOWN.
3. NOTIFY E.O.R. IF SHROUD DIMENSIONS DEVIATE FROM THOSE SHOWN.

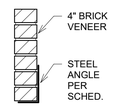
4 STORM SHELTER - WALL OPENING SHROUD
3/4" = 1'-0"



6 TYP. DETAIL - ROOF OPENING OVER 12"
3/4" = 1'-0"

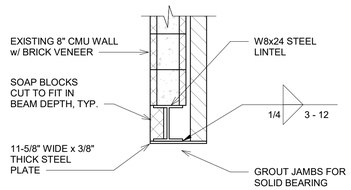
BRICK LINTEL SCHEDULE

OPENING WIDTH	SUPPORT		
	ANGLE SIZE	MIN. BRG. EA. END	
UP TO 3'-6"	L 3-1/2 x 3 x 1/4 (LLH)	4"	
UP TO 4'-6"	L 3-1/2 x 3-1/2 x 1/4	4"	
UP TO 5'-6"	L 4 x 3-1/2 x 1/4 (LLV)	6"	
UP TO 7'-0"	L 5 x 3-1/2 x 1/4 (LLV)	6"	
UP TO 8'-0"	L 6 x 3-1/2 x 5/16 (LLV)	6"	
UP TO 10'-0"	L 6 x 3-1/2 x 3/8 (LLV)	7"	



SECTION

ADDITIONAL REMARKS:
1. USE ABOVE ANGLE SIZES AT ALL MASONRY OPENINGS EXCEPT WHERE DETAILED OTHERWISE.
2. SEE ARCH. DRAWINGS FOR LOCATION AND SIZE OF MASONRY OPENINGS.



7 FRM DETAIL - STEEL LINTEL
3/4" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JONATHAN MICHAEL REIS
PE-77926
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JMR
CHECKED	JMR

TITLE
STRUCTURAL DETAILS

SHEET NO.
S2.1

1/17/2026 9:42:27 AM

PLUMBING SPECIFICATIONS

A. GENERAL CONDITIONS

1. WORK UNDER THIS CONTRACT SHALL CONSIST OF, BUT NOT LIMITED TO; FURNISHINGS, INSTALLATION, TESTING, AND WARRANTY OF PLUMBING AS INDICATED ON THE DRAWINGS AND AS SPECIFIED HEREIN.
2. PLUMBING SHALL BE INSTALLED BY A LICENSED CONTRACTOR. WARRANTY SHALL BE FOR ONE YEAR FROM DATE OF FINAL ACCEPTANCE.
3. THE WORD "PROVIDE" SHALL BE DEFINED TO MEAN "FURNISH AND INSTALL, COMPLETE, AND OPERATING."
4. WHERE THE WORD "EQUAL TO" IS USED THE CONTRACTOR SHALL HAVE THE OPTION OF SELECTING BETWEEN ON OF THE ADDITIONAL NAMES OR MANUFACTURERS LISTED OR MAY SUBMIT PRODUCTS SUBJECT TO ENGINEER'S APPROVAL.
5. ALL PERMIT AND INSPECTION FEES ARE TO BE INCLUDED IN CONTRACTOR'S SCOPE.
6. PROVIDE THE OWNER CERTIFICATES OF APPROVAL FROM INSPECTION AGENCIES.
7. WORK MUST CONFORM TO ALL APPLICABLE LOCAL, STATE, AND FEDERAL LAWS; ORDINANCES; AND REGULATIONS.

B. INSTALLATIONS

1. INSPECT THE EXISTING FACILITY AND VERIFY LOCATIONS OF ALL EXISTING UTILITIES.
2. DRAWINGS INDICATE THE GENERAL ARRANGEMENT OF SYSTEMS. HOWEVER, MAKE FIELD ADJUSTMENTS TO INSURE CORRECT FIT.
3. PIPING SHALL NOT BE INSTALLED ABOVE ELECTRICAL EQUIPMENT OR ABOVE ACCESS TO SAME PER "NEC" GUIDELINES.
4. WORK SHALL BE PLANNED AND EXECUTED TO PROVIDE REASONABLY CONTINUOUS SERVICE OF EXISTING FACILITIES.
5. PROVIDE WALL OR CEILING ACCESS PANELS WHERE REQUIRED FOR ACCESS TO CONCEALED VALVES, EQUIPMENT, ETC. PANELS SHALL BE MINIMUM 18"x18" OR LARGER AS REQUIRED AND SHALL BE COMPATIBLE WITH THE AREA IN WHICH THEY ARE INSTALLED. PANELS IN FIRE RATED BUILDING ELEMENTS SHALL BE LABELED IN COMPLIANCE WITH THE RATING OF THE BUILDING ELEMENT.
6. PROVIDE ALL CUTTING AND PATCHING NECESSARY TO INSTALL THE WORK. SAW CUT OR DRILL OPENINGS.
7. ALL FERROUS METAL WHICH IS NOT FACTORY, SHOP PAINTED, GALVANIZED WHICH WILL BE EXPOSED IN FINISHED AREAS OR OUTSIDE THE BUILDING SHALL BE PRIME COATED.
8. PROVIDE PIPE SLEEVES AT PENETRATIONS OF BUILDING ELEMENTS. SLEEVES MAY BE GALVANIZED SHEET METAL OR STEEL PIPE. FIRE STOPPING SHALL BE PROVIDED AT ALL PENETRATIONS THROUGH FIRE RATED ASSEMBLIES. FIRE STOPPING SHALL BE UL LISTED AND PROVIDE A FIRE RATING EQUAL TO THAT OF THE CONSTRUCTION BEING PENETRATED.
9. PROVIDE PIPE LABELING AND VALVE TAGGING USING MANUFACTURED LABELS: TAGS IN COMPLIANCE WITH ANSI A13.1.
10. FLUSH NEW PIPING SYSTEM PRIOR TO OPERATION. PROVIDE SERVICES OF A FIRM REGULARLY ENGAGED IN DISINFECTION SERVICES TO DISINFECT THE DOMESTIC WATER SYSTEM IN ACCORDANCE WITH AWWA GUIDELINES.
11. PREPARE TEST AND INSPECTION REPORTS.
12. TEST AND CERTIFY BACKFLOW PREVENTERS AND PRESSURE VACUUM BREAKERS ACCORDING TO CODE AND STANDARD PER AUTHORITY HAVING JURISDICTION.
13. REPLACE DEFECTIVE PRODUCTS AND / OR MATERIALS WITH NEW.
14. PROVIDE ATMOSPHERIC VENT DRAIN CONNECTION ON BACKFLOW PREVENTERS AND EXTEND PIPING TO FLOOR DRAIN FOR INDIRECT DISCHARGE WITH MINIMUM 2" AIR GAP.
15. INSTALLED PLUMBING PIPE, FITTINGS, VALVES, TRIM AND ETC. IN CONTACT WITH POTABLE WATER, SHALL BE MADE OF LEAD FREE MATERIALS IN COMPLIANCE WITH NSF / ANSI 61, SECTION 8 AND NSF / ANSI 372, IN CONFORMANCE WITH PUBLIC LAW 111-380 (S3874) ALSO KNOWN AS THE " REDUCTION IN LEAD IN DRINKING WATER ACT" EFFECTIVE JANUARY 4, 2014.

C. SUBMITTALS

1. BEFORE CONSTRUCTION OR INSTALLATION OF MATERIALS OR EQUIPMENT; CONTRACTOR SHALL SUBMIT AN ELECTRONIC COPY OF SHOP DRAWINGS TO BE REVIEWED BY THE ENGINEER.
2. SHOP DRAWINGS SHALL INDICATE INDIVIDUAL COMPONENTS, MODEL NUMBERS, AND ELECTRICAL INFORMATION.
3. SHOP DRAWINGS FOR THE FOLLOWING SHALL BE SUBMITTED.
   A. PIPE AND PIPE FITTINGS
   B. VALVES
   C. WATER HEATERS
   D. HANGERS
   E. PLUMBING FIXTURES & EQUIPMENT
   F. INSULATION
   G. DRAINS, CLEANOUTS, AND CARRIERS

D. TESTING

1. ALL PIPING PROVIDED SHALL BE PRESSURE TESTED.
   A. DOMESTIC WATER: HYDROSTATIC AT 125 PSI FOR 1.5 TIMES MAXIMUM OPERATING PRESSURE FOR 6 HOURS.
   B. UNDERGROUND WATER: HYDROSTATIC AT 125 PSI FOR 6 HOURS AND/OR IN CONFORMANCE WITH AWWA PROCEDURES.
   C. SOIL, WASTE, AND VENT: IN CONFORMANCE WITH GOVERNING PLUMBING CODE.
   D. INTERIOR NATURAL GAS: 50 PSI COMPRESSED AIR FOR 6 HOURS.

E. EXCAVATION

1. EXCAVATE FOR ALL UNDERGROUND PIPING. BACKFILL AND COMPACT TO FINISH GRADE OR TO LEVELS CONSISTENT WITH THE GENERAL CONTRACTOR'S ACTIVITIES. PROVIDE COMPACTED BACKFILL OF GRADED PEA GRAVEL, GRADED COURSE SAND, OR CRUSHED LIMESTONE (MAXIMUM 0.75" SIZE) UNDER ANY PAVED OR OTHER HARD SURFACED AREAS. EXCAVATION, TRENCH WALL SUPPORTING AND OPEN TRENCH BARRICADING, AND SIGNAGE SHALL BE PER OSHA AND LOCAL REQUIREMENTS. A UTILITY LOCATOR SERVICE SHALL BE PROVIDED TO IDENTIFY AND / OR VERIFY THE LOCATION OF EXISTING PRIVATE UTILITIES WITHIN THE EXCAVATION AREA.

F. HANGERS

1. ALL INTERIOR ABOVE GRADE PIPING SHALL BE SUPPORTED BY ATTACHMENT TO THE BUILDING STRUCTURAL ELEMENTS. HANGER ROD SIZES AND HANGER / SUPPORT SPACING SHALL BE PER THE FOLLOWING SCHEDULES.

PIPE SIZE	MINIMUM HANGER ROD DIAMETER
≤ 1"	0.25"
1.25" - 3"	0.375"
4" - 6"	0.5"

PIPE MATERIAL SIZE	MAXIMUM HANGER / SUPPORT SPACING
VERTICAL	
STEEL	BASE AND 15'
COPPER	BASE AND 10'
CAST IRON	BASE AND EACH FLOOR LEVEL
PLASTIC	PER MANUFACTURER
HORIZONTAL	
STEEL/ ≤ 2"	8'
STEEL/ 2.5" - 6"	10'
STEEL/ > 6"	12'
COPPER/ ≤ 1.25"	6'
COPPER/ ≤ 1.5" - 2"	8'
COPPER/ > 2"	10'
CAST IRON	10' AND EACH FITTING / JOINT
PLASTIC	PER MANUFACTURER

G. INSULATION

1. PROVIDE INSULATION ON ALL NEW DOMESTIC WATER WITH FIBERGLASS / TUBULAR CLOSED CELL PIPE INSULATION IN COMPLIANCE WITH ASHRAE 90.1. FIBERGLASS INSULATION SHALL BE FACTORY MOLDED TUBULAR FIBERGLASS WITH ALL SERVICE JACKET, INTEGRAL VAPOR BARRIER, AND FACTORY ADHESIVE OVERLAPPING JOINTS. PROVIDE FACTORY MOLDED PVC COVERS AND INSULATION FOR FITTINGS, VALVES, AND DEVICES. TUBULAR CLOSED CELL INSULATION SHALL BE FOAM PLASTIC TYPE WITH PRESSURE-SENSITIVE ADHESIVE TAPE CLOSURE SYSTEM AND / OR VAPOR SEALING ADHESIVE. COMPOSITE INSULATING SYSTEMS SHALL NOT EXCEED A MAXIMUM FLAME SPREAD OF 25 AND SMOKE DEVELOPMENT OF 50 AS ESTABLISHED BY NFPA TEST METHODS. FIBERGLASS INSULATION MANUFACTURERS: OWENS-CORNING, JOHNS MANVILLE, MASON, OR KNAUFF. TUBULAR CLOSED CELL INSULATION SHALL BE EQUAL TO ARMSTRONG ARMACELL ARMAFLEX 2000. INSULATION THICKNESS SHALL COMPLY WITH THE FOLLOWING SCHEDULE:

PIPE SYSTEM	RUNOUTS <12'	≤ 1"	1.25"- 2"	2.5" - 4"	5" - 6"	≥ 6"
DOMESTIC COLD WATER	0.5"	0.5"	0.5"	1.0"	1.0"	1.0"
DOMESTIC HOT WATER	0.5"	1.0"	1.0"	1.5"	1.5"	1.5"

H. PLUMBING FIXTURES

1. PROVIDE PLUMBING FIXTURES COMPLETE WITH SUPPORTS, CARRIERS, AND SUPPLY AND WASTE TRIM. SUPPLIES TO EACH FIXTURE SHALL BE INDIVIDUALLY VALVED. ALL WASTE AND SUPPLY TRIM SHALL BE CHROME PLATED BRASS. FIXTURES SHALL BE WHITE UNLESS OTHERWISE SPECIFIED. SEAL JOINTS AROUND EACH FIXTURE AT THE WALL, FLOOR, AND ANY ADJACENT CONSTRUCTION. JOINT SEALANT SHALL BE ONE PART, MILDEW RESISTANT SILICONE, ASTM C920, TYPE S, GRADE NS, CLASS 25 WITH FUNGICIDE, EQUAL TO PECORA 898.

I. VALVES

1. VALVES SHALL BE TWO-PIECE, BRONZE BODY, BALL TYPE, 150 WSP, EQUAL TO NIBCO T-580-80-LF AND / OR T-585-80-LF. CHECK VALVES SHALL BE BRONZE, SWING TYPE, 125 WSP, EQUAL TO NIBCO T-413-Y-LF.

J. PIPING

1. INTERIOR DOMESTIC WATER: PIPING ABOVE GRADE SHALL BE TYPE L SEAMLESS HARD DRAWN COPPER TUBING WITH WROUGHT COPPER OR CAST BRONZE FITTINGS AND SOLDERED JOINTS OR ASTM F876, NSF/ANSI 14 APPROVED PEX TUBING WITH CRIMPED, THREADED AND / OR PUSH-FIT TYPE FITTINGS. SOLDER SHALL BE LEAD-FREE TIN ALLOW, 95-5 TIN-ANTIMONY, OR SILVER BEARING TIN. UNDER FLOOR BURIED PIPING SHALL BE TYPE K SOFT COPPER TUBING WITH SILVER BRAZED JOINTS. PIPE NIPPLES EXTENDING OUT OF THE WALL TO SERVE FIXTURES SHALL BE CHROME PLATED BRASS WITH SCREWED ENDS.
2. INTERIOR SOIL, WASTE, AND VENT: PIPING IN GRADE BELOW THE FLOOR SLAB, SHALL BE SCHEDULE 40 PVC, ASTM D2665, JOINTS SHALL BE SOLVENT WELDED. PIPING LOCATED ABOVE GRADE SHALL BE SCHEDULE 40 PVC, ASTM D2665 OR NO-HUB CAST IRON, ASTM A-74, CISPI 301, FITTINGS SHALL BE SOLVENT WELDED FOR PVC OR NEOPRENE SLEEVES WITH HEAVY DUTY BOLTED STAINLESS STEEL COMPRESSION BAND FOR CAST IRON. CAST IRON PIPE SHALL BE PROVIDED IN PLENUM RATED SPACES. FITTINGS SHALL BE DRAINAGE TYPE. FLOOR DRAIN TRAPS SHALL BE THE SAME MATERIAL AS THE CONNECTING PIPING. PROVIDE CLEANOUTS WHERE SHOWN ON THE DRAWINGS AND WHERE REQUIRED BY THE GOVERNING PLUMBING CODE.
3. INTERIOR NATURAL GAS PIPING: PIPING SHALL BE SCHEDULE 40 BLACK STEEL, ASTM A53, TYPE E OR F. FITTINGS SHALL BE STEEL WELDING TYPE AND THREADED MALLEABLE IRON TYPE, CONSISTENT WITH JOINT REQUIREMENTS. JOINTS SHALL BE WELDED, EXCEPT THAT THREADED JOINTS MAY BE USED ON THREADED VALVES AND UNIONS, AT FINAL CONNECTIONS TO EQUIPMENT. VALVES, UNIONS, AND THREADED JOINTS ARE NOT PERMITTED IN INACCESSIBLE CONCEALED LOCATIONS. SHUTOFF VALVES 2" AND SMALLER SHALL BE TWO-PIECE FORGED BRASS BALL VALVE, 600 PSI NON-SHOCK WOG, SCREWED ENDS, EQUAL TO HAMMOND 8901. SHUTOFF VALVES 2.5" AND LARGER SHALL BE IRON BODY LUBRICATED PLUG VALVE, 200 PSI, FLANGED ENDS, EQUAL TO NORDSTROM #143. MATERIALS AND INSTALLATION SHALL CONFORM TO THE INTERNATIONAL FUEL GAS CODE AND NFPA 54 NATIONAL FUEL GAS CODE. VENT PIPING SHALL BE EXTENDED INDIVIDUALLY FROM EACH GAS VENTING DEVICE TO OUTSIDE THE BUILDING.

PLUMBING GENERAL NOTES

GENERAL PLUMBING NOTES:

1. ALL MANUFACTURERS AND MODEL NUMBERS LISTED IN THE DRAWING SET ARE LISTED AS A BASIS OF DESIGN TO SET A LEVEL OF QUALITY AND STANDARD. OTHER MANUFACTURER AND MODEL NUMBERS "EQUAL TO" MAKE AND MODEL NUMBERS LISTED MAY BE ACCEPTABLE.
2. REFER TO ARCHITECTURAL DRAWINGS FOR PLUMBING FIXTURE HEIGHTS AND LOCATIONS.
3. CONTRACTOR SHALL COORDINATE SCOPE OF WORK WITH ALL OTHER DISCIPLINES INVOLVED IN PROJECT, (ARCHITECT, CIVIL, ELECTRICAL, MECHANICAL, SPRINKLER, STRUCTURAL, ETC.), FOR ADDITIONAL INFORMATION, COORDINATION AND INSTALLATION REQUIREMENTS.
4. WHERE DESIGN INFORMATION IS IN-ADEQUATE OR INCOMPLETE WITH REGARD TO PROJECT SCOPE OR CODE / ORDINANCE COMPLIANCE IN ORDER TO PROVIDE A COMPLETE PROJECT BID OR PRICE, THE PLUMBING CONTRACTOR SHALL BRING SUCH ITEM / ITEMS TO THE ATTENTION OF THE ARCHITECT OR ENGINEER PRIOR TO BIDDING OR PRICING THE PROJECT. IMPLICIT IN SUBMISSION OF A BID OR PRICE TO PERFORM THE WORK INDICATED IN THIS DRAWING SET IS THE STATEMENT THAT THE PROJECT SCOPE AS SHOWN ON THE PLANS WILL BE COMPLETE, OPERATIONAL, AND IN ACCORDANCE WITH APPLICABLE CODES AND STANDARDS.

GENERAL PLUMBING DEMOLITION NOTES:

1. AREAS OF DEMOLITION ARE BASED ON EXISTING RECORD DRAWINGS AND ALL NOTED DEMOLITION IS ASSUMED TO BE WITHIN THE DESIGNATED AREAS SHOWN. PROVIDE ALL NECESSARY DEMOLITION AS REQUIRED TO COMPLY WITH THE DESIGN INTENT OF THESE DOCUMENTS WHETHER SPECIFICALLY FOUND IN AREA SHOWN OR IN ADJACENT SPACES, AND AS REQUIRED TO MEET LOCAL CODE REQUIREMENTS. PLUMBING SYSTEMS (DOMESTIC WATER SUPPLY, NATURAL GAS, SANITARY WASTE AND VENT AND STORM, ETC.) IN ALL OTHER EXISTING AREAS ARE TO REMAIN OPERATIONAL UNLESS NOTED OTHERWISE. NOTIFY OWNER PRIOR TO INTERRUPTING BUILDING SERVICES.
2. THE CONTRACTOR SHALL MAKE ALL PROVISIONS TO PROTECT THE PREMISES FROM DAMAGE DURING DEMOLITION WORK.
3. THIS CONTRACTOR IS RESPONSIBLE FOR FIELD VERIFYING THE QUANTITY, LOCATION AND ROUTING OF ALL EXISTING PLUMBING RELATED DEVICES, FIXTURES, PIPING SYSTEMS, DRAINS AND APPURTENANCES PRIOR TO BIDDING PROJECT.
4. PLUMBING DEMOLITION IS TO INCLUDE THE REMOVAL OF ALL UNUSED PLUMBING RELATED DEVICES, PIPE, HANGERS, SUPPORTS, INSULATION, ETC. AS WELL AS ANY PREVIOUSLY ABANDONED PLUMBING PIPING SYSTEMS AND ALL MISCELLANEOUS ITEMS ASSOCIATED WITH THE CURRENTLY DEMOLISHED PLUMBING SYSTEMS NOT REMOVED UNDER THE GENERAL DEMOLITION WORK NOTED ON THE ARCHITECTURAL DRAWINGS, AS REQUIRED TO COMPLY WITH THE DESIGN INTENT OF THESE DOCUMENTS, WHETHER SPECIFICALLY NOTED OR NOT, AND AS REQUIRED TO MEET LOCAL CODE REQUIREMENTS.
5. COORDINATE THE TEMPORARY SHUT OFF OF THE EXISTING PLUMBING SYSTEMS TO THIS FACILITY, WHEN NECESSARY, WITH THE OWNER PRIOR TO BEGINNING WORK. LOCATE AND IDENTIFY THE ACTIVE AND THE "TO BE DEMOLISHED" PLUMBING SYSTEMS, PRIOR TO STARTING ANY DEMOLITION WORK. WHERE PORTIONS OF THE EXISTING PIPING SYSTEMS ARE TO BE RETAINED AND REUSED, DEMOLISH PIPING AS INDICATED AND CAP ENDS OF INACTIVE SYSTEMS BRANCHES WITHIN 12" OF THE ACTIVE SYSTEM, TO AVOID A DEAD-END CONDITION.
6. PRIOR TO ANY CORE DRILLING OR DESTRUCTIVE REMOVAL OF EXISTING FLOOR AREAS, PLUMBING CONTRACTOR SHALL ELECTRONICALLY SCAN FLOOR FOR POSSIBLE CONDUIT, PIPING OR ANCILLARY MATERIALS WHICH MAY BE ENCOUNTERED AND BRING POTENTIAL CONFLICTS TO THE ATTENTION OF THE CONSTRUCTION MANAGER WHERE IN CONFLICT WITH NEW PLUMBING INSTALLATIONS. REPAIR OF DAMAGED ITEMS DUE TO INADEQUATE IDENTIFICATION WILL BE THE RESPONSIBILITY OF THE RESPONSIBLE CONTRACTOR.
7. IT IS THE RESPONSIBILITY OF THE PLUMBING CONTRACTOR TO LEGALLY DISPOSE OF ALL PLUMBING RELATED EQUIPMENT, FIXTURES, PIPING, FITTINGS, HANGERS, DRAINS, APPURTENANCES, DEBRIS, ETC. DEMOLISHED AS PART OF THIS SCOPE OF WORK.

STORM SHELTER NOTES

GENERAL DESIGN NOTES:

STORM SHELTER SHALL BE DESIGNED IN COMPLIANCE WITH OBC 2024, SECTION 423 AND ICC 500 2020.

STORM SHELTER IS CLASSIFIED AS A COMMUNITY TORNADO SHELTER, IS LOCATED ON THE MAIN FLOOR LEVEL OF THE POLICE STATION AND IS DESIGNED TO ACCOMMODATE 16 PEOPLE.

REFER TO ARCHITECTURAL SHEET G0.3 FOR ADDITIONAL INFORMATION.

STRUCTURAL DESIGN CRITERIA:

PENETRATIONS THROUGH THE STORM SHELTER ENVELOPE LARGER THAN 3.5 SQUARE INCHES IN AREA FOR RECTANGULAR PENETRATIONS OR 2.5" IN DIAMETER FOR CIRCULAR PENETRATIONS SHALL BE PROVIDED WITH AN OPENING PROTECTIVE DEVICE. REFER TO STRUCTURAL DRAWINGS FOR DETAILS OF PROTECTIVE DEVICES.

SHELTER ESSENTIAL FEATURES:

SHELTER CAPACITY IS **16** PEOPLE. ONE WATER CLOSET IS REQUIRED. THE LAVATORY IS NOT REQUIRED. HAND SANITIZER WILL BE STORED BY THE OWNER.

BASED ON 3 WATER CLOSET USES PER 8 HOUR PERIOD (FROM LEED) IN A 2 HOUR PERIOD THAT WOULD EQUAL 0.75 USES PER PERSON. FOR 16 PEOPLE, 12 FLUSHES WOULD BE REQUIRED. THE WATER CLOSET TANK WILL BE FILLED UPON ENTERING INTO THE SHELTER SO ENOUGH WATER FOR 11 FLUSHES IS REQUIRED TO BE STORED IN THE SHELTER. AT 1.6 GALLONS PER FLUSH THAT WILL REQUIRE 17.6 GALLONS MINIMUM STORED FOR WATER CLOSET USAGE. ADDITIONAL POTABLE WATER SHALL BE STORED FOR DRINKING. INCLUDE THESE REQUIREMENTS IN THE OWNER'S INSTRUCTIONS.

PLUMBING LEGEND

SYMBOL	DESCRIPTION
—V—	VENT PIPING
—SAN—	SANITARY PIPING
—GW—	GREASE WASTE PIPING
—NG—	NATURAL GAS PIPING
— —	DOMESTIC COLD WATER PIPING
— —	DOMESTIC HOT WATER PIPING
— — —	DOMESTIC HOT WATER RETURN PIPING
—FW—	DOMESTIC FILTERED WATER PIPING
	BALL VALVE
	CHECK VALVE
	BALANCING VALVE
	BACKFLOW PREVENTER
	HOT WATER RETURN RECIRCULATION PUMP
	PIPE CAP
	PIPE UP
	PIPE DOWN
	EXISTING PIPING TO REMAIN
	EXISTING PIPING TO BE DEMOLISHED
	NEW PIPING
	FLOW ARROW
	PIPE CONTINUATION / BREAK SYMBOL
	CONNECT TO EXITING
##	KEYNOTE DESIGNATION
XX#	PLUMBING FIXTURE "UP TO" DESIGNATION
K##	KITCHEN EQUIPMENT DESIGNATION
1 / P2.1	NUMBER OF DETAIL ON SHEET / NUMBER ON SHEET WHERE DETAIL APPEARS

ABBREVIATIONS	
ADA	AMERICAN WITH DISABILITIES ACT
AGA	AMERICAN GAS ASSOCIATION
AFF	ABOVE FINISHED FLOOR
AFG	ABOVE FINISHED GRADE
BFP	BACKFLOW PREVENTER
CFH	CUBIC FEET PER HOUR
CO	CLEANOUT
CW	DOMESTIC COLD WATER
DS	DOWNSPOUT
DW	DISHWASHER
ET	EXPANSION TANK
EX	EXISTING
FCO	FLOOR CLEANOUT
FD	FLOOR DRAIN
FS	FLOOR SINK
FU	FIXTURE UNIT
FSEC	FOOD SERVICE EQUIPMENT CONTRACTOR
GMR	GAS METER / REGULATOR
GS	GAS SERVICE
GT	GREASE TRAP OR KITCHEN WASTE
HB	HOSE BIBB
HD	HUB DRAIN
HW	DOMESTIC HOT WATER
HWR	DOMESTIC HOT WATER RETURN
IFGC	INTERNATIONAL FUEL GAS CODE
IND	INDIRECT WASTE
INV	INVERT ELEVATION
IPC	INTERNATIONAL PLUMBING CODE
LBS	POUNDS
LV	LAVATORY
MB	MOP BASIN
MIN	MINIMUM
NG	NATURAL GAS
N/C	NORMALLY CLOSED
N/O	NORMALLY OPEN
NP	NON POTABLE WATER
NTS	NOT TO SCALE
OD	OVERFLOW STORM DRAIN
ODS	OVERFLOW DOWNSPOUT
_PC	"STATE" PLUMBING CODE
PSI	POUNDS PER SQUARE INCH
PSIG	POUNDS PER SQUARE INCH GAUGE
RD	ROOF DRAIN
RPZ	REDUCED PRESSURE BACKFLOW PREVENTER
RR	RETURN RISER
SAN	SANITARY
SD	STORM DRAIN
SK	SINK
SR	SUPPLY RISER
TD	TRENCH DRAIN
TOT	TOTAL
TP	TRAP PRIMER
TYP	TYPICAL
UR	URINAL
VR	VENT RISER
VS	VENT STACK
VTR	VENT THRU ROOF
WC	WATER CLOSET OR WATER COLUMN
WCO	WALL CLEANOUT
WH	WATER HEATER
WS	WATER SERVICE
WTC	WATER COOLER
YCO	YARD CLEANOUT

NOTE

THE SYMBOLS AND ABBREVIATIONS INDICATED ON THIS SHEET MAY OR MAY NOT BE USED IN THIS SET OF DRAWINGS.

PLUMBING INDEX OF DRAWINGS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 76872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	SMS
CHECKED	JLW

TITLE
PLUMBING LEGEND AND GENERAL NOTES

SHEET NO.
P0.1

1/16/2026 11:12:14 AM

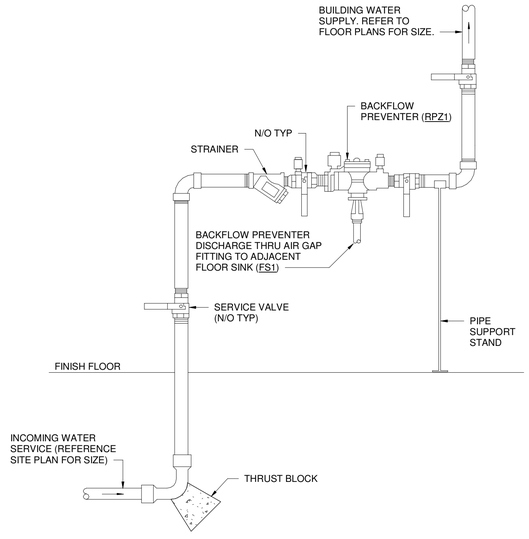
GAS PIPE SIZING

PIPE SIZE (BLACK STEEL)	MAX CFH
0.5"	40
0.75"	83
1"	157
1.25"	322
1.5"	482
2"	928
2.5"	1,480
3"	2,610

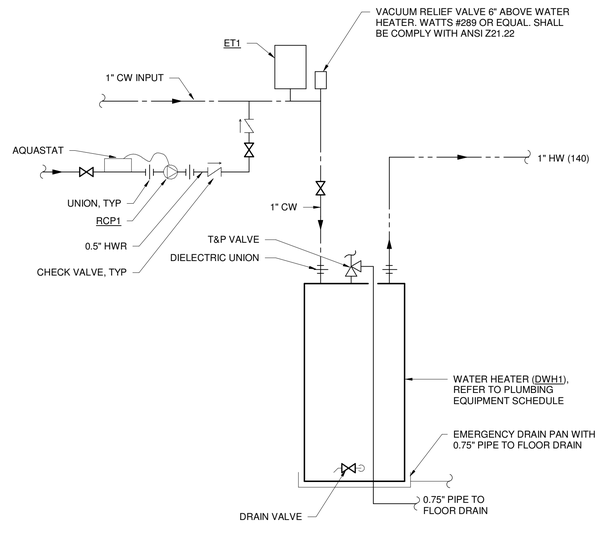
GENERAL NOTES:
1. SIZING BASED ON LESS THAN 2 PSIG PRESSURE, 0.5 PSIG DROP PER TABLE 402.4(2) OF IFGC
2. TOTAL DEVELOPED LENGTH = 150 FT.

WATER HAMMER ARRESTOR SIZING TABLE (PER PDI)

CONNECTION SIZE	FIXTURE UNITS	CROSS REF. PDI
0.5"	1-11	A
0.75"	12-32	B
1"	33-60	C
1.25"	61-113	D
1.5"	114-154	E
2"	155-300	F



① WATER SERVICE DETAIL
NTS



② WATER HEATER DETAIL
NTS

PLUMBING FIXTURE SCHEDULE

PLAN MARK	FIXTURE TYPE	DESCRIPTION	SAN	VENT	CW	HW	ACCESSORIES	NOTES
A1	WATER CLOSET - FLOOR SET - FLUSH TANK - ADA	AMERICAN STANDARD MODEL #2467.016 "CADET RIGHT HEIGHT", 16.5" HEIGHT, ELONGATED BOWL, FLOOR SET, 1.6 GPF, FLUSH TANK WATER CLOSET.	3.0"	1.5"	1.00"		PROVIDE (1) SUPPLY STOP AND OPEN FRONT SEAT.	1,2,3,4,5
B1	LAVATORY - VANITY - ADA	AMERICAN STANDARD MODEL #0476.028, "AQUALYN", 4" CENTER, DROP-IN SINK. AMERICAN STANDARD MODEL #7075.056, 0.5" GPM, SINGLE LEVER HANDLE, MANUAL FAUCET.	1.5"	1.5"	0.50"	0.5"	PROVIDE P-TRAP, (2) SUPPLY STOPS, P-TRAP SUPPLY WRAP KIT, AND ASSE 1070 APPROVED THERMOSTATIC MIXING VAVLE AND SET TO 105 DEGREES F.	1,2,3,6,7
B2	LAVATORY - COUNTERTOP - ADA	AMERICAN STANDARD MODEL #0495.221 "OVALYN" 4" CENTER, UNDERCOUNTER SINK. AMERICAN STANDARD MODEL #7075.056, 0.5" GPM, SINGLE LEVER HANDLE, MANUAL FAUCET.	1.5"	1.5"	0.50"	0.5"	PROVIDE P-TRAP, (2) SUPPLY STOPS, P-TRAP SUPPLY WRAP KIT, AND ASSE 1070 APPROVED THERMOSTATIC MIXING VAVLE AND SET TO 105 DEGREES F.	1,2,3,6,7
C1	SHOWER - ADA	SYMMONS MODEL #C-96-500-B30-V-X-1.5 "TEMPTROL COMMERCIAL", SHOWER / HAND SHOWER SYSTEM WITH TEMPTROL PRESSURE BALANCING TU / SHOWER VALVE AND SYSMMONS DUAL OUTLET DIVERTER VALVE.	2.0"	1.5"	0.50"	0.5"		
D1	MOP SINK - 24"x24"x10"	MUSTEE MODEL #63M, DURACAST, FLOOR MOUNTED, INTEGRAL DRAIN. T&S BRASS MODEL #B-0655-BSTR SERVICE FAUCET, CHROME PLATED WITH VACUUM BREAKER, INTEGRAL STOPS, PAIL HOOK AND 0.75" HOSE THREAD ON SPOUT.	3.0"	1.5"	0.50"	0.5"	MUSTEE MODEL #65.600 MOP HANGER, BUMPER GUARDS, DURAGUARD WALL GUARDS.	1,2,3,8
E1	SINK - UNDERMOUNT - SINGLE BOWL - ADA	ELKAY MODEL #ELUHAD121255PD "LUSTERTONE", SINGLE BOWL, STAINLESS STEEL, ADA COMPLIANT, 4" CENTERS, UNDERMOUNT SINK. ELKAY MODEL #LK406GN08T4, 4" CENTERSET, DECK MOUNT, 8" GOOSENECK SPOUT, 4" WRISTBLADE HANDLES FAUCET.	1.5"	1.5"	0.50"	0.5"	PROVIDE P-TRAP, (2) SUPPLY STOPS, BASKET STRAINER AND BADGER 5 INSINKERATOR GARBAGE DISPOSAL.	1,2,3

NOTES:

1. REFER TO SPECIFICATIONS, DRAWINGS, DETAILS AND ISOMETRICS FOR ADDITIONAL INFORMATION.
2. REFER TO ARCHITECTURAL DRAWINGS FOR FIXTURE HEIGHTS AND LOCATION REQUIREMENTS.
3. CAULK / SEAL AROUND PERIMETER OF FIXTURE UNIT.
4. FLUSH LEVER TO BE ON WIDE AREA SIDE OF TOILET ROOM PARTITION.
5. PROVIDE A WATER HAMMER ARRESTOR. SIZE PER TABLE ON THIS SHEET.
6. LAVATORY MUST BE MOUNTED PER MANUFACTURER ACCESSIBILITY REQUIREMENTS IN ORDER TO COMPLY WITH ADA GUIDELINES FOR PROPER KNEE CLEARANCE.
7. PROVIDE A GRID STRAINER DRAIN.
8. COORDINATE MOUNTING OF ACCESSORIES WITH ARCHITECT.

PLUMBING EQUIPMENT SCHEDULE

PLAN MARK	DESCRIPTION	COLD WATER	HOT WATER (120°F)	HOT WATER (140°F)	NATURAL GAS (CFH)	NON POTABLE	WASTE	INDIRECT	FLOOR DRAIN	NOTES
DWH1	AO SMITH MODEL #GCR-40, 40 GALLON GAS WATER HEATER. 40 CFH, 20" DIAMETER x 58.25" HEIGHT	1"	-	1"	40	-	X	X	X	1,2
ET1	EXPANSION TANK - DOMESTIC WATER SYSTEM - WATTS #PLT-5 - 150 PSI RATING	0.75"	-	-	-	-	-	-	-	1,3
RCP1	HOT WATER RECIRCULATION PUMP - EQUAL TO BELL & GOSSETT MODEL #e34V/BTPRC	-	-	0.75"	-	-	-	-	-	1
RPZ1	REDUCED PRESSURE BACKFLOW ASSEMBLY - EQUAL TO WATTS MODEL #LF009-QT-S	1.5"	-	-	-	-	-	-	-	1,4

NOTES:

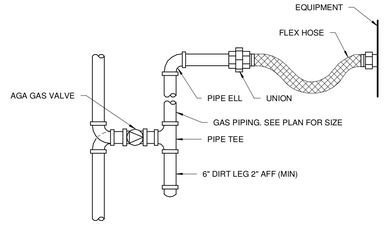
1. REFER TO MANUFACTURER'S INSTALLATION INSTRUCTIONS FOR INSTALLATION REQUIREMENTS.
2. SET WATER HEATER TEMPERATURE TO 140 DEGREES FAHRENHEIT.
3. INSTALL ON COLD WATER INLET SIDE OF WATER HEATER.
4. PROVIDE WATTS AIR GAP FITTING MODEL #909AG-F AND DISCHARGE TO BUILDING EXTERIOR.

DRAIN AND CLEANOUT SCHEDULE

PLAN MARK	APPROVED SUPPLIERS - J.R. SMITH, JOSAM, WATTS, ZURN ZURN CATALOG NO.	TYPE: FLOOR	TYPE: ROOF	TYPE: WALL	TYPE: DECK	BODY: CAST IRON	BODY: BRASS	BODY: ACID RESIST.	BODY: STAINLESS STEEL	OUTLET: SIZE	OUTLET: BOTTOM	OUTLET: SIDE	STRAINER/GRATE: SIZE	STRAINER/GRATE: ADJUSTABLE	STRAINER/GRATE: FLAT	STRAINER/GRATE: DOME	STRAINER/GRATE: RECESSED	STRAINER/GRATE: FUNNEL	STRAINER/GRATE: HINGED	STRAINER/GRATE: 1/2 GRATE	TOP FINISH: NICKEL-BRONZE	TOP FINISH: CAST IRON	TOP FINISH: POLYETHYLENE	TOP FINISH: STAINLESS STEEL	ADDITIONAL FEATURES: ANCHOR FLANGE	ADDITIONAL FEATURES: FLASHING CLAMP	ADDITIONAL FEATURES: DBL. DRAINAGE	ADDITIONAL FEATURES: SED. BUCKET	ADDITIONAL FEATURES: AUX. STRAINER	ADDITIONAL FEATURES: GRAVELSTOP	ADDITIONAL FEATURES: U'DECK CLAMP	ADDITIONAL FEATURES: TRAP PRIMER	SEE NOTE
FD1	Z507	X	-	-	-	X	-	-	-	3"	X	-	7"	-	X	-	-	-	-	-	-	X	-	-	-	X	X	X	-	-	-	-	1,2
FS1	Z1751-2	X	-	-	-	-	-	-	X	4"	X	-	12"x12"x8"	-	-	-	-	-	-	X	-	-	-	X	-	-	-	-	-	-	-	-	1,2
FCO	ZN1400-B	X	-	-	-	X	-	-	-	6"	X	-	7-7/8"	X	-	-	-	-	-	-	X	-	-	-	-	-	-	-	-	-	-	-	1

NOTES:

1. REFER TO MANUFACTURER'S INSTALLATION INSTRUCTIONS FOR INSTALLATION REQUIREMENTS.
2. PROVIDE TRAP SEAL PROTECTION DEVICE EQUAL TO Z1072.



③ GAS EQUIPMENT CONNECTION DETAIL
NTS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 74872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	SMS
CHECKED	JLW

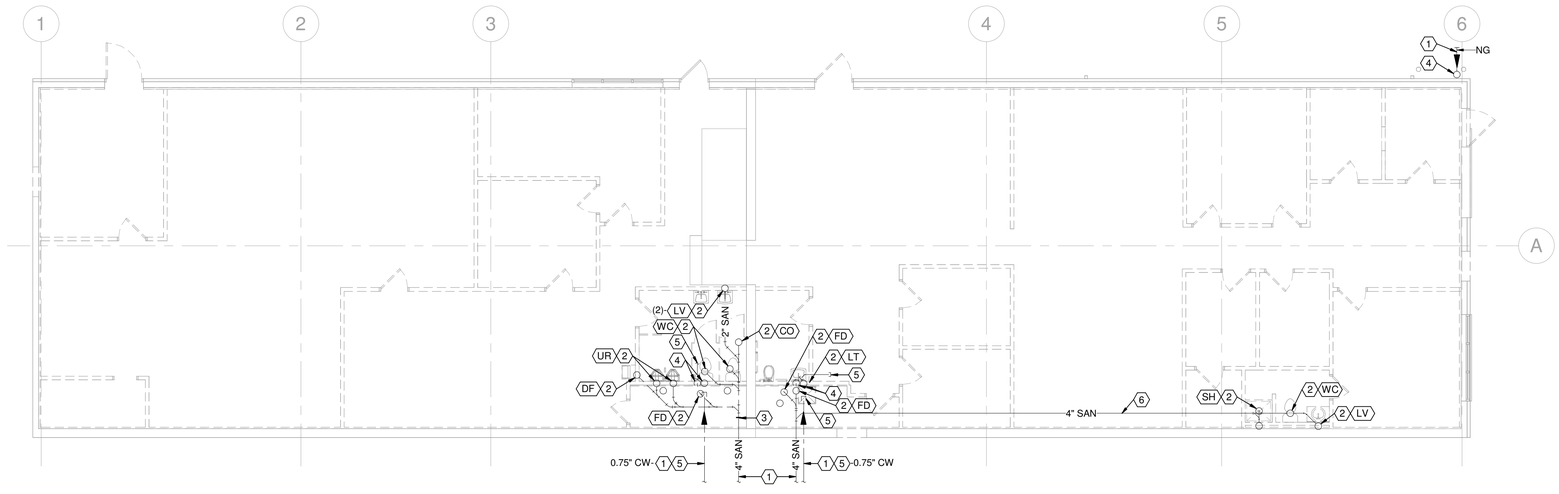
TITLE
PLUMBING DETAILS AND SCHEDULES

SHEET NO.
P0.2

1/16/2026 11:12:14 AM

DRAWING NOTES

1. EXISTING TO REMAIN.
2. REMOVE EXISTING PLUMBING FIXTURE IN ITS ENTIRETY AND CAP SANITARY PIPING BELOW GRADE AND PATCH AND REPAIR CONCRETE FLOOR TO SMOOTH FINISH. REFER TO ARCHITECTURAL DRAWINGS FOR FLOOR FINISH AND TO PLUMBING SPECIFICATION NOTE 'E' ON SHEET P0.1 FOR ADDITIONAL INFORMATION.
3. POINT OF CONNECTION IN NEW WORK.
4. REFER TO SHEET P1.1 FOR CONTINUATION OF PIPING.
5. EXISTING PIPING TO BE CAPPED ON BOTH ENDS AND ABANDONED BELOW GRADE.
6. EXISTING SANITARY PIPING TO BE CAPPED ON EACH END BELOW FLOOR SLAB AND ABANDONED. PATCH AND REPAIR CONCRETE FLOOR TO SMOOTH FINISH. REFER TO ARCHITECTURAL DRAWINGS FOR FLOOR FINISH AND TO PLUMBING SPECIFICATION NOTE 'E' ON SHEET P0.1 FOR ADDITIONAL INFORMATION.



1 BELOW FLOOR PLUMBING PLAN - DEMOLITION
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL
PE - 76872
STATE OF OHIO
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	SMS
CHECKED	JLW

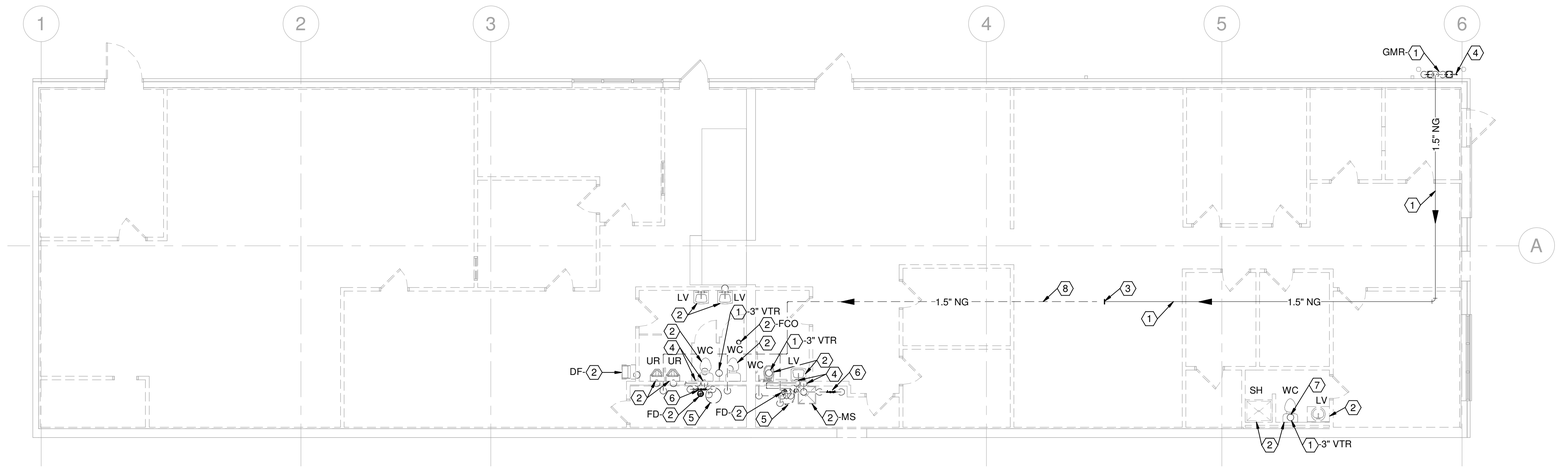
TITLE
PLUMBING BELOW FLOOR PLAN - DEMOLITION

SHEET NO.
P1.0

1/16/2026 11:12:15 AM

DRAWING NOTES

1. EXISTING TO REMAIN.
2. REMOVE EXISTING PLUMBING FIXTURE IN ITS ENTIRETY.
3. POINT OF CONNECTION IN NEW WORK.
4. REFER TO SHEET P1.0 FOR CONTINUATION OF PIPING.
5. REMOVE EXISTING WATER HEATER IN ITS ENTIRETY.
6. REMOVE EXISTING WATER SERVICE BACKFLOW PREVENTER AND ALL PIPING BACK TO POINT OF CONNECTION IN NEW WORK.
7. EXISTING VENT THROUGH ROOF TO BE ABANDONED IN PLACE. CAP EXISTING VENT THROUGH ROOF PIPING ON BOTH ENDS.
8. REMOVE EXISTING NATURAL GAS PIPING, HANGERS, ETC. BACK TO POINT OF CONNECTION IN NEW WORK.



1 PLUMBING PLAN - DEMOLITION
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 74872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	Author
CHECKED	Checker

TITLE
PLUMBING FLOOR PLAN - DEMOLITION

SHEET NO.
P1.1

1/16/2026 11:12:15 AM

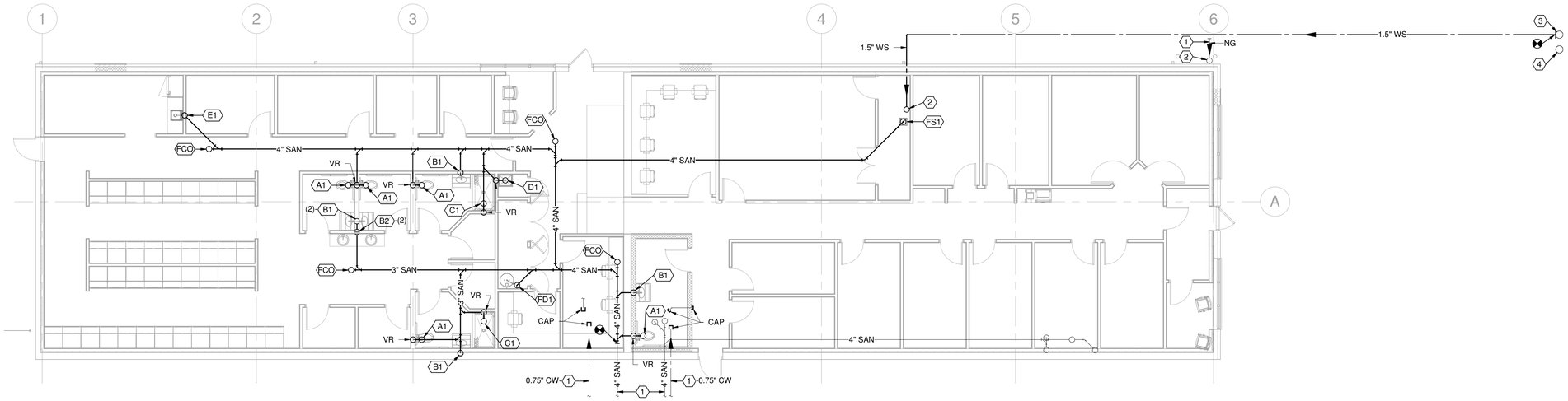
BASE BID DESCRIPTION

A. THE PLUMBING BASE BID FOR THE WEST AREA SHALL INCLUDE ALL PLUMBING SCOPE SHOWN ON THIS SHEET.

B. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO SHELL THE WEST AREA SPACE. THIS INCLUDES NOT INSTALLING THE PLUMBING FIXTURES IN FULL, AND PROVIDING CAPPED STUBS ON THE SANITARY SYSTEM ABOVE THE FINISHED FLOOR. REFER TO SHEET P2.2 FOR ALTERNATE PLUMBING PLAN FOR FURTHER DETAILS.

DRAWING NOTES

1. EXISTING TO REMAIN.
2. REFER TO SHEET P2.1 FOR CONTINUATION OF PIPING.
3. EXISTING WATER METER PIT. PROVIDE NEW 1.5" CONNECTION TO EXISTING WATER METER. COORDINATE WATER METER REQUIREMENTS WITH WATER UTILITY COMPANY.
4. EXISTING WATER METER PIT TO BE ABANDONED IN PLACE. PROVIDE 0.75" CAP ON EXISTING WATER SERVICE ON DISCHARGE SIDE OF WATER METER AND ON EXISTING WATER SERVICE TO BUILDING. EXISTING WATER SERVICE PIPE TO BE ABANDONED IN PLACE.



1 BELOW FLOOR PLUMBING PLAN - NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL PE - 74872 REGISTERED PROFESSIONAL ENGINEER STATE OF OHIO

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE		
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	SMS
CHECKED	JLW

TITLE
PLUMBING BELOW FLOOR PLAN - NEW WORK

SHEET NO.
P2.0

1/6/2026 11:12:16 AM

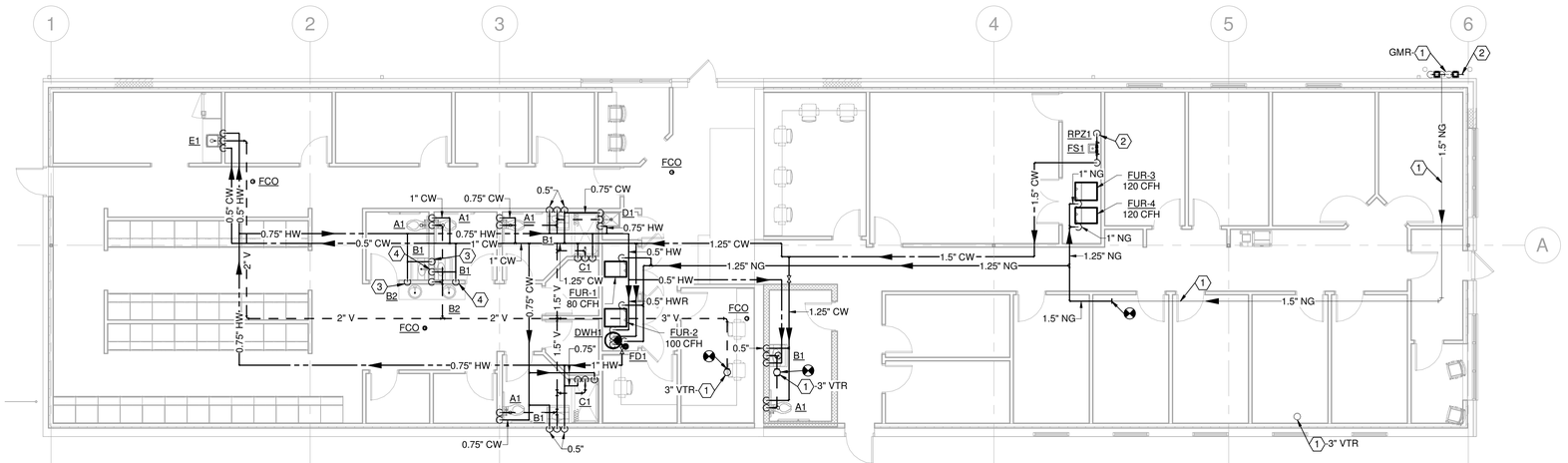
BASE BID DESCRIPTION

A. THE PLUMBING BASE BID FOR THE WEST AREA SHALL INCLUDE ALL PLUMBING SCOPE SHOWN ON THIS SHEET.

B. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO SHELL THE WEST AREA SPACE. THIS INCLUDES NOT INSTALLING THE PLUMBING FIXTURES, ABOVE FLOOR SANITARY WASTE AND VENT PIPING AND COLD AND HOT WATER SUPPLY PIPING, AND PROVIDING CAPPED STUBS ON THE SANITARY SYSTEM ABOVE THE FINISHED FLOOR. REFER TO SHEET P2.3 FOR ALTERNATE PLUMBING PLAN FOR FURTHER DETAILS.

DRAWING NOTES

1. EXISTING TO REMAIN.
2. REFER TO SHEET P2.0 FOR CONTINUATION OF PIPING.
3. ROUTE 0.5" DOMESTIC HOT WATER PIPING DOWN IN WALL AND SERVE BOTH "B1 AND / OR B2" FIXTURES.
4. ROUTE 0.5" DOMESTIC COLD WATER PIPING DOWN IN WALL AND SERVE BOTH "B1" AND / OR "B2" FIXTURES.



1 PLUMBING PLAN - NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 74872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	SMS
CHECKED	JLW

TITLE
PLUMBING FLOOR PLAN - NEW WORK

SHEET NO.
P2.1

1/16/2026 11:12:16 AM

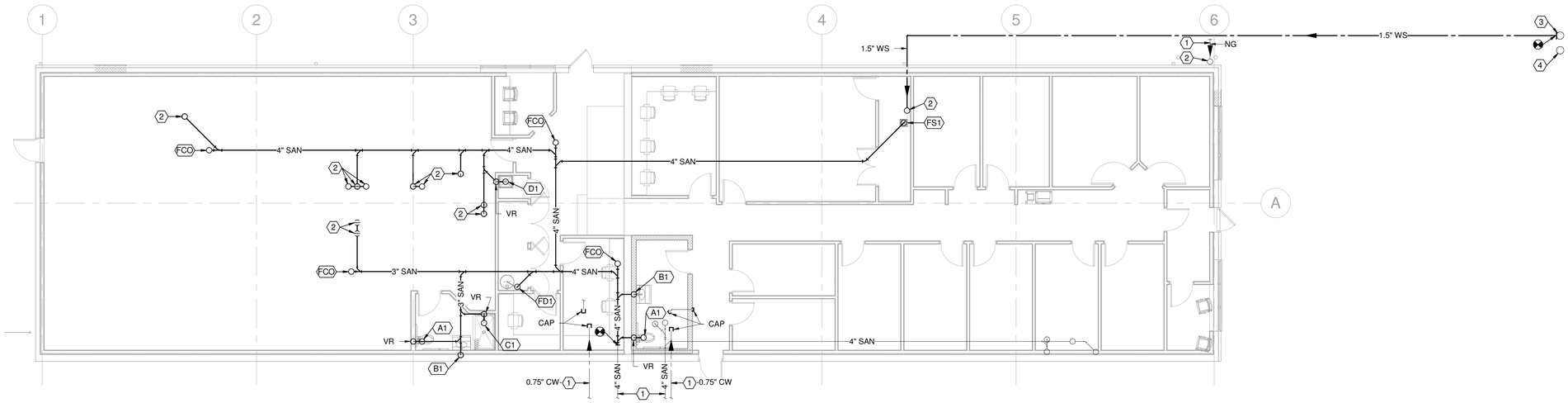
ALTERNATE DESCRIPTION

A. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO REDUCE THE BASE BID PLUMBING DESIGN FOR THE WEST AREA TO ONLY AS SHOWN ON THIS PLAN. THIS INCLUDES NOT INSTALLING THE PLUMBING FIXTURES IN FULL, AND PROVIDING CAPPED STUBS ON THE SANITARY SYSTEM ABOVE THE FINISHED FLOOR.

B. REFER TO SHEET P2.0 FOR THE BASE BID PLUMBING SCOPE OF WORK.

DRAWING NOTES

1. EXISTING TO REMAIN.
2. REFER TO SHEET P2.1 FOR CONTINUATION OF PIPING.
3. EXISTING WATER METER PIT. PROVIDE NEW 1.5" CONNECTION TO EXISTING WATER METER. COORDINATE WATER METER REQUIREMENTS WITH WATER UTILITY COMPANY.
4. EXISTING WATER METER PIT TO BE ABANDONED IN PLACE. PROVIDE 0.75" CAP ON EXISTING WATER SERVICE ON DISCHARGE SIDE OF WATER METER AND ON EXISTING WATER SERVICE TO BUILDING. EXISTING WATER SERVICE PIPE TO BE ABANDONED IN PLACE.



1 BELOW FLOOR PLUMBING ALTERNATE PLAN - NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY J. WETZEL
PE - 74872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	Author
CHECKED	Checker

TITLE
PLUMBING BELOW FLOOR ALTERNATE PLAN

SHEET NO.
P2.2

1/6/2026 11:12:17 AM

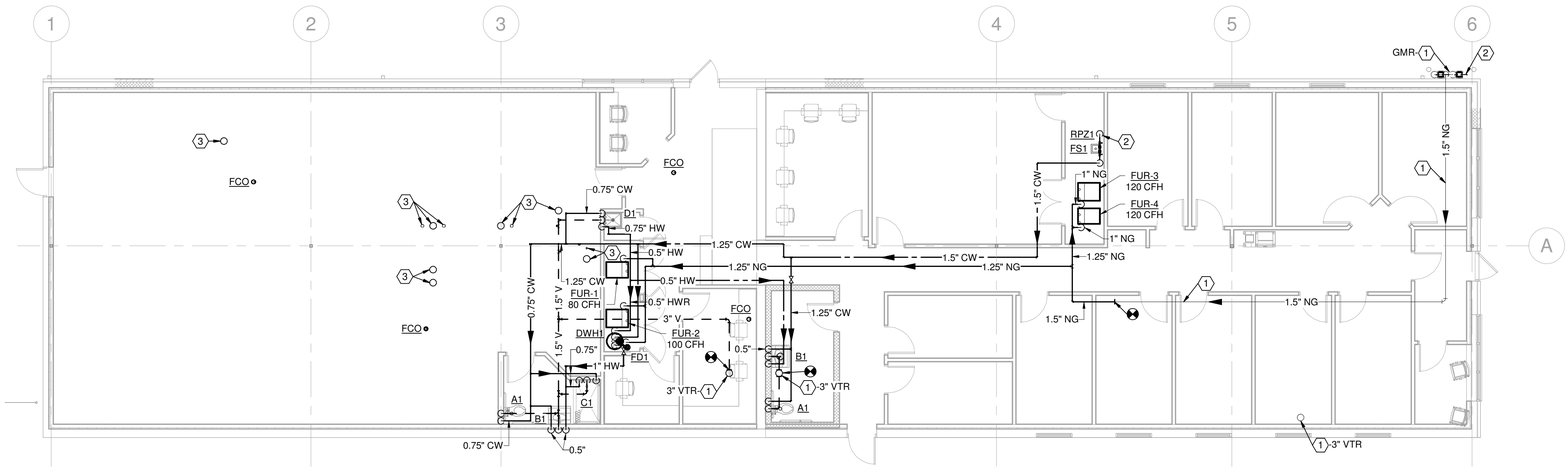
ALTERNATE DESCRIPTION

A. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO REDUCE THE BASE BID PLUMBING DESIGN FOR THE WEST AREA TO ONLY AS SHOWN ON THIS PLAN. THIS INCLUDES NOT INSTALLING THE PLUMBING FIXTURES, ABOVE FLOOR SANITARY WASTE AND VENT PIPING, AND COLD AND HOT WATER SUPPLY PIPING.

B. REFER TO SHEET P2.1 FOR THE BASE BID PLUMBING SCOPE OF WORK.

DRAWING NOTES

1. EXISTING TO REMAIN.
2. REFER TO SHEET P2.0 FOR CONTINUATION OF PIPING.
3. CAP PIPE APPROXIMATELY 6" ABOVE FINISHED FLOOR.



1 PLUMBING ALTERNATE PLAN - NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY J. WETZEL
PE - 74872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

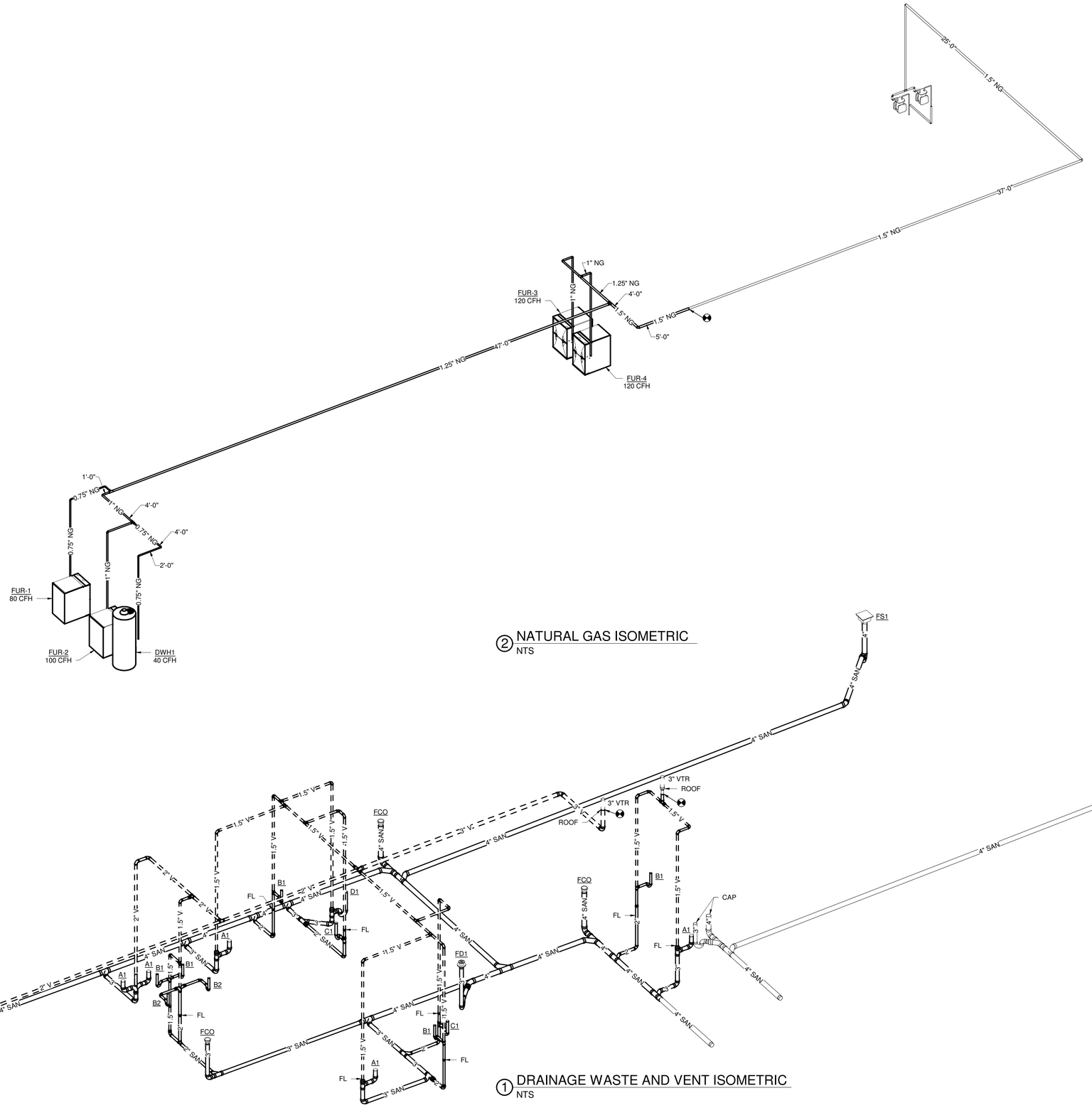
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	Author
CHECKED	Checker

TITLE
PLUMBING ALTERNATE FLOOR PLAN

SHEET NO.
P2.3

1/6/2026 11:12:17 AM



2 NATURAL GAS ISOMETRIC
NTS

1 DRAINAGE WASTE AND VENT ISOMETRIC
NTS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY J. WETZEL
PE - 74872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE		
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	Author
CHECKED	Checker

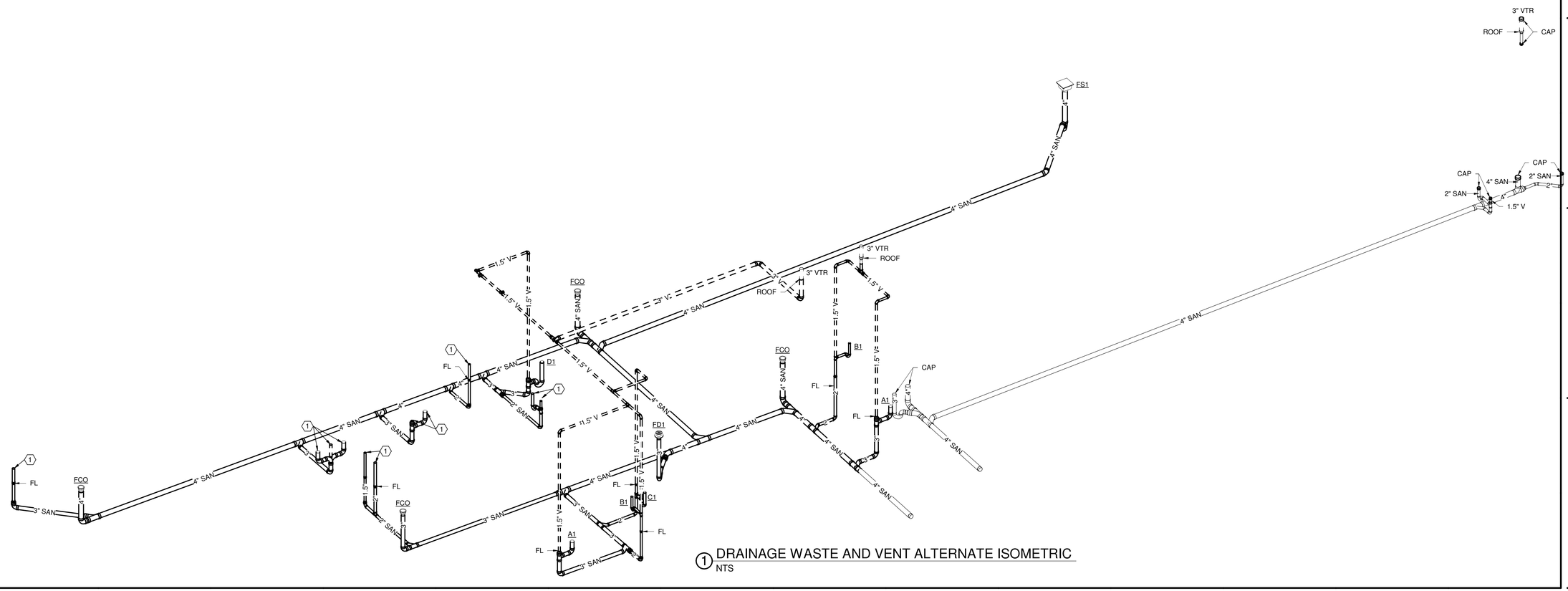
TITLE
PLUMBING ISOMETRICS

SHEET NO.
P3.1

1/16/2026 11:12:18 AM

DRAWING NOTES

1. CAP PIPE APPROXIMATELY 6" ABOVE FINISHED FLOOR.



① DRAINAGE WASTE AND VENT ALTERNATE ISOMETRIC
NTS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL
PE - 76872
STATE OF OHIO
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	Author
CHECKED	Checker

TITLE
PLUMBING ALTERNATE ISOMETRICS

SHEET NO.
P3.2

1/16/2026 11:12:19 AM

GENERAL NOTES

A. DO NOT SCALE DRAWINGS. IF DIMENSIONS CANNOT BE DETERMINED OR DOCUMENTS ARE IN CONFLICT (WITH THEMSELVES OR FIELD CONDITIONS), THE CONTRACTOR MUST OBTAIN CLARIFICATION FROM THE ARCHITECT PRIOR TO CONTINUATION OF WORK.

B. CONTRACTOR(S) SHALL VISIT THE SITE TO ACQUAINT THEMSELVES WITH THE EXISTING OR NEWLY INSTALLED CONDITIONS. CONTRACTOR(S) SHALL FIELD VERIFY ALL DIMENSIONS, ELEVATIONS, UTILITIES, AND EXISTING OR NEWLY INSTALLED CONDITIONS PRIOR TO CONSTRUCTION.

C. THE CONSTRUCTION DOCUMENTS AND DRAWING NOTES / SPECIFICATIONS ARE INTENDED TO DESCRIBE AND PROVIDE FOR A FINISHED PIECE OF WORK. THE WORK SHALL BE COMPLETED IN EVERY DETAIL EVEN THOUGH EVERY ITEM NECESSARILY INVOLVED IS NOT PARTICULARLY MENTIONED OR SPECIFIED. ALL WORK SHALL BE INSTALLED AS SHOWN ON THE DRAWINGS AND / OR MANUFACTURER'S SPECIFICATIONS AND INSTALLATION INSTRUCTIONS. IF ANY CONTRACTOR IS IN DOUBT AS TO THE TRUE MEANING OF ANY PART OF THE DOCUMENTS, OR FINDS DISCREPANCIES IN OR OMISSIONS FROM ANY PART OF THE DOCUMENTS, HE MUST CONTACT THE ARCHITECT FOR CLARIFICATION.

D. ALL DIMENSIONS ARE TO FACE OF STUD, CONCRETE, MASONRY, OR CENTERLINE OF COLUMN, UNLESS NOTED OTHERWISE. WHEN EXISTING CONDITIONS ARE SHOWN, DIMENSIONS ARE TO FACE OF EXISTING FINISH, UNLESS NOTED OTHERWISE

E. FINISH FLOOR ELEVATIONS ARE FOR GENERAL REFERENCE. REFER TO CIVIL SHEETS FOR ACTUAL FINISH FLOOR ELEVATIONS.

F. EQUIPMENT AND FURNITURE SHOWN IS FOR REFERENCE ONLY, EQUIPMENT AND FURNITURE PROVIDED BY OWNER (UNLESS NOTED OTHERWISE). COORDINATE EQUIPMENT AND FURNITURE INSTALLATION AND UTILITY CONNECTIONS WITH OWNER AND OWNER'S SUPPLIER.

G. **DEFINITIONS:**
NECESSARY: WORK NEEDED TO COMPLETE THE WORK TO "MAKE IT OPERATIONAL".

REQUIRED: WORK NEEDED TO BE IN COMPLIANCE WITH BUILDING CODE, GOVERNING CODE, OR JURISDICTION HAVING AUTHORITY.

PROVIDE: RESPONSIBLE FOR PURCHASE, DELIVERY, RECEIVING, INSPECTION, STORAGE, PREPARATION, AND INSTALLATION OF ITEM(S).

FURNISH: RESPONSIBLE FOR PURCHASE AND DELIVERY OF ITEM(S).

INSTALL: RESPONSIBLE FOR RECEIVING, INSPECTION, STORAGE, PREPARATION, AND INSTALLATION OF ITEM(S).

BASIS OF DESIGN: AN ACCEPTABLE MANUFACTURER OR PRODUCT, DESIGNATED BY THE DESIGN PROFESSIONAL, WHICH EXHIBITS THE INTENDED STANDARDS AND DESIGN CRITERIA THAT MUST BE MET FOR PERFORMANCE. THE ITEM(S) INDICATED MAY BE PROVIDED OR AN ITEM OF EQUIVALENT APPEARANCE, AESTHETIC, QUALITY, MATERIAL, CONSTRUCTION, AND PERFORMANCE MAY BE SUBSTITUTED SUBJECT TO THE ARCHITECT'S OR DESIGN PROFESSIONAL'S APPROVAL. (REFER TO THE "SUBSTITUTIONS" SPECIFICATION FOR ADDITIONAL INFORMATION)

OR EQUAL: MAY FOLLOW A "BASIS OF DESIGN" OR OTHER SPECIFIED MANUFACTURER OR PRODUCT AND INDICATES THAT AN ITEM OF EQUIVALENT APPEARANCE, AESTHETIC, QUALITY, MATERIAL, CONSTRUCTION, AND PERFORMANCE MAY BE SUBSTITUTED SUBJECT TO THE ARCHITECT'S OR DESIGN PROFESSIONAL'S APPROVAL. (REFER TO THE "SUBSTITUTIONS" SPECIFICATION FOR ADDITIONAL INFORMATION)

HVAC GENERAL SPECIFICATIONS

A. UPON COMPLETION OF ALL HVAC WORK, THE CONTRACTOR SHALL SUBMIT (2) COPIES OF THE MANUFACTURER'S OPERATION AND MAINTENANCE MANUALS FOR ALL EQUIPMENT TO THE OWNER. THE CONTRACTOR SHALL PROVIDE TO THE ARCHITECT A COMPLETE SET OF RECORD DRAWINGS WITH ANY AND ALL CHANGES OR MODIFICATIONS TO THE DESIGN, CONSTRUCTION, SYSTEMS, OR EQUIPMENT CLEARLY INDICATED; SHOP DRAWINGS; INFORMATION ON THE THERMOSTATS, CONTROL WIRING DIAGRAMS, AND OTHER PERTINENT INFORMATION.

B. **HVAC EQUIPMENT:** ALL EQUIPMENT SHALL BE COMPLETE IN EVERY RESPECT WITH ALL DEVICES, APPURTENANCES, AND ACCESSORIES PROVIDED TO MEET THE DESIGN INTENT AND OPERATION OF THE SYSTEMS SHOWN ON THE DRAWINGS AND SPECIFIED HEREIN. EQUIPMENT SHALL BE INSTALLED IN STRICT ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS. ALL AIR CONDITIONING EQUIPMENT MUST HAVE A CONDENSATE DRAIN AND BE TRAPPED IN ACCORDANCE WITH MANUFACTURER'S DATA. ALL COMPRESSORS ARE TO INCLUDE A 5-YEAR EXTENDED WARRANTY.

C. **REFRIGERANT LINE SET**: HVAC CONTRACTOR TO SIZE REFRIGERANT LINE SET SIZES PER MANUFACTURER'S RECOMMENDATIONS AND FIELD CONDITIONS. LINES EXCEEDING 150 FEET IN LENGTH REQUIRE A PUMP (SIZED AND PROVIDED BY THE HVAC CONTRACTOR).

D. **NOISE AND VIBRATION:** MECHANICAL AND ELECTRICAL EQUIPMENT IS TO OPERATE WITHOUT OBJECTIONABLE NOISE OR VIBRATION. ALL MOTOR OPERATED OR ROTATING EQUIPMENT IS TO BE VIBRATION ISOLATED OR FREE FROM ALL BEAMS, COLUMNS, FLOORS, CEILINGS, JOISTS, WALLS, AND OTHER PARTS OF THE BUILDING STRUCTURE. HANGER RODS FOR ALL PIPING, EQUIPMENT, AND DUCTWORK CONNECTED TO MOTOR OPERATED OR ROTATING EQUIPMENT IS TO BE PROVIDED WITH KINETICS OR APPROVED EQUAL FIBERGLASS ISOLATOR HANGERS. PROVIDE FLEXIBLE COLLARS IN ALL CONNECTIONS BETWEEN VIBRATING EQUIPMENT (FANS, ROOFTOP UNITS, ETC.) AND DUCTS. THE FLEXIBLE CONNECTION IS TO BE RATED FOR THE OPERATING PRESSURE OF THE SYSTEM.

E. **CURBS AND STEEL FRAMING FOR SUPPORT:** PROVIDE ALL NECESSARY CURBS AND STEEL FRAMING REQUIRED TO INSTALL ALL HVAC EQUIPMENT AS DESCRIBED OR IMPLIED ON THE DRAWINGS. CURBS SHALL BE OF THE SAME MANUFACTURER OF THE EQUIPMENT SUPPORTED. INSULATE UNDER THE COMPRESSOR SECTION TO PREVENT CONDENSATION. ALL CURBS MUST BE INSTALLED SO THAT TOP OF CURBS ARE LEVEL.

F. **DUCTWORK:** DUCTWORK IS TO BE FABRICATED WITH GALVANIZED SHEET STEEL (NO FIBERGLASS ALLOWED) IN ACCORDANCE WITH SMACNA "HVAC DUCT CONSTRUCTION STANDARDS-METAL AND FLEXIBLE" AND NAIMA "FIBROUS GLASS DUCT CONSTRUCTION STANDARDS," LATEST EDITIONS; CONFORMING TO THE REQUIREMENTS IN THE REFERENCED STANDARD FOR METAL THICKNESS, REINFORCING TYPES AND INTERVALS, TIE ROD APPLICATIONS, AND JOINT TYPES AND INTERVALS. ALL JOINTS, SEAMS, AND CONNECTIONS MUST BE SECURELY FASTENED AND SEALED AIRTIGHT IN COMPLIANCE WITH THE INTERNATIONAL ENERGY CONSERVATION CODE AND OHIO MECHANICAL CODE.

G. **BRANCH DUCTWORK:** ALL DUCT BRANCHES TO DIFFUSERS ARE TO BE RECTANGULAR OR ROUND RIGID DUCT. ALL BRANCH TAKEOFFS FROM RECTANGULAR MAINS TO BE CONNECTED TO SPIN COLLARS WITH SCOOPS AND QUADRANT DAMPERS.

H. **FLEXIBLE DUCTWORK:** FLEX DUCTWORK IS TO BE NFPA 90 AND 90A APPROVED INDICATING NO VINYL, TESTED IN ACCORDANCE WITH UL 181, AND LISTED AND LABELED AS CLASS 0 OR CLASS 1 DUCT. NO FLEX DUCT RUN TO EXCEED **5'-0" MAXIMUM** TOTAL LENGTH AT ANY ONE LOCATION. ALL FLEX CONNECTIONS TO BE TAPED AND STRAPPED PER MANUFACTURER'S INSTRUCTIONS.

I. **DUCTWORK INSULATION:** INSTALL INSULATION PRODUCTS IN ACCORDANCE WITH THE MANUFACTURER'S WRITTEN INSTRUCTIONS AND IN ACCORDANCE WITH RECOGNIZED INDUSTRY PRACTICES. INSULATION MUST COMPLY WITH NFPA 90A. DUCT SIZES SHOWN ON DRAWINGS ARE INSIDE CLEAR DIMENSIONS. INSULATE DUCTWORK PER THE DUCT CONSTRUCTION SCHEDULE. PROVIDE DUCTWORK INSULATION WITHOUT INTERRUPTION THROUGH WALLS, FLOORS, AND SIMILAR PENETRATIONS. ALL INSULATION SHALL HAVE A FLAME SPREAD RATING OF NOT MORE THAN 25 AND A SMOKE DEVELOPED RATING OF NO HIGHER THAN 50 WHEN TESTED IN ACCORDANCE WITH ASTM C411, OR AS REQUIRED BY LOCAL CODES.

J. WHERE ROUND DUCTWORK IS INDICATED ON PLANS, PROVIDE RECTANGULAR DUCTWORK, IF ROUND DUCTWORK CANNOT BE INSTALLED BECAUSE OF OBSTRUCTIONS, INSUFFICIENT CLEARANCES OR OTHER CAUSES DUE TO FIELD CONDITIONS. CONTRACTOR'S OPTION TO INSTALL RECTANGULAR DUCTWORK IN LIEU OF INDICATED ROUND DUCTWORK AT OTHER LOCATIONS. SIZE ALL RECTANGULAR DUCTWORK CONVERSIONS COMPARABLE TO INDICATED DUCTWORK SIZE PER SMACNA "HVAC DUCT CONSTRUCTION STANDARDS-METAL AND FLEXIBLE," LATEST EDITION. SHOULD THE CONTRACTOR BE IN DOUBT OF THE REQUIREMENTS UNDER THIS SECTION, DUCTWORK SIZING, OR SHOULD ANY DISCREPANCY BE REVEALED BASED ON FIELD CONDITIONS, IMMEDIATELY CONTACT THE ARCHITECT FOR CLARIFICATION.

K. PROVIDE A FLEXIBLE CONNECTION BETWEEN EQUIPMENT AND RIGID DUCT ON ALL SUPPLY AND RETURN DUCTWORK.

L. **DIFFUSERS, GRILLES, REGISTERS, AND DAMPERS:** PROVIDE DIFFUSERS, GRILLES, AND REGISTERS AS SCHEDULED. DEVICES TO BE COMPLETE WITH BALANCING DAMPERS, FRAMES, AND ALL ACCESSORIES, FINISH AS INDICATED. PROVIDE UL LISTED (UL555) FIRE RATED DAMPERS AT ALL FIRE PARTITION OR FIRE BARRIER PENETRATIONS, WHETHER SHOWN OR NOT SHOWN ON THE PLANS. ALL GRAVITY DAMPERS REQUIRE SEALS.

M. **SUPPORT AND BRACING:** INSTALL RIGID ROUND AND RECTANGULAR METAL DUCTWORK WITH APPROVED SUPPORT SYSTEMS INDICATED IN SMACNA STANDARDS AND STATE BUILDING CODE. SUPPORT HORIZONTAL DUCTS AT A MAXIMUM INTERVAL OF 10 FEET AND WITHIN 2 FEET OF EACH ELBOW AND WITHIN 4 FEET OF EACH BRANCH INTERSECTION USING DOUBLE STRAP HANGERS ON EACH SIDE OF FITTING. SUPPORT VERTICAL DUCTS AT A MAXIMUM INTERVAL OF 10 FEET AND AT EACH FLOOR. FLEXIBLE AND OTHER FACTORY MADE DUCTS SHALL BE SUPPORTED IN ACCORDANCE WITH THE MANUFACTURER'S INSTALLATION INSTRUCTIONS. NO WOOD SHALL BE USED TO SUPPORT OR BRACE DUCTS. PROVIDE SWAY AND SEISMIC BRACING AS REQUIRED BY STATE AND LOCAL CODES. PROVIDE FIXED ANCHORS AT EACH MECHANICAL DIFFUSER OR GRILLE TO CEILING GRID. CEILING GRID CONTRACTOR TO PROVIDE SUPPORT WIRES AT OPPOSITE CORNERS OF LIGHT FIXTURES, MECHANICAL DIFFUSERS, AND GRILLES TO STRUCTURE ABOVE.

HVAC GENERAL SPECIFICATIONS CONT'D

N. **CONTROLS:** EACH UNIT TO BE CONTROLLED BY THERMOSTAT WITH PROPER STAGES OF HEATING AND COOLING - MOUNTED AT 48" AFF (REFER TO MECHANICAL SHEETS FOR MODEL NO. AND LOCATION). CONTROL WIRING IS TO BE FURNISHED AND INSTALLED BY THE HVAC CONTRACTOR. POWER WIRING IS TO BE FURNISHED AND INSTALLED BY THE ELECTRICAL CONTRACTOR. THERMOSTAT SHALL BE 7-DAY PROGRAMMABLE AND SHALL BE SETUP TO INCLUDE 5 DEGREE DEADBAND, TEMPERATURE OVERLAP RESTRICTION AND TEMPERATURE SETBACK DURING UNOCCUPIED HOURS.

O. **POWER AND CONTROL WIRING:** ELECTRICAL CONTRACTOR TO PROVIDE ALL NECESSARY POWER WIRING FOR HVAC EQUIPMENT FROM SUITABLE FUSED DISCONNECT SOURCE TO UNIT WITH FUSED DISCONNECT TO MEET NATIONAL ELECTRIC CODE (NEC), STATE AND LOCAL CODES. HVAC CONTRACTOR TO PROVIDE 24 VOLT OR LESS CONTROL WIRING.

P. **STARTUP:** HVAC CONTRACTOR TO PROVIDE STARTUP PER MANUFACTURER'S WRITTEN RECOMMENDATIONS.

Q. **AIRFLOW AND TESTING:** ALL DUCT AS PER SMACNA GUIDELINES. THE SYSTEM TO BE BALANCED AND TESTED BY AN INDEPENDENT, "NEBB" CERTIFIED, BALANCING CONTRACTOR PER "NEBB"

a. PROCEDURES. THE HVAC CONTRACTOR SHALL INCLUDE THE COST OF THE BALANCING AND TESTING IN HIS BID. THE BALANCING CONTRACTOR SHALL FURNISH ALL LABOR, MATERIALS, TRANSPORTATION, AND EQUIPMENT NECESSARY TO COMPLETELY BALANCE THE AIR FLOW FOR THE HVAC SYSTEMS AS SHOWN ON THE DRAWINGS. HVAC CONTRACTOR SHALL INSTALL NEW FILTERS IN ALL UNITS PRIOR TO THE AIR BALANCE. THE COMPLETE AIR BALANCE SHALL TAKE PLACE WITH OUTSIDE AIR DAMPERS IN MINIMUM POSITION. BALANCE THE SYSTEM TO WITHIN +-5 PERCENT OF THE DESIGN REQUIREMENTS. THE HVAC CONTRACTOR AT NO ADDITIONAL COST SHALL PERFORM ANY REQUIRED CHANGES REQUIRED TO ACHIEVE SPECIFIED FLOW RATES. ALL CONTROL SEQUENCES SHALL BE TESTED (INTERLOCKED EQUIPMENT, SMOKE DETECTORS, SMOKE EVACUATION, ECONOMIZER, CO2 SENSORS, ETC.) AND OPERATING STATUS RECORDED IN THE REPORT. A DIGITAL OR THREE (3) PRINTED COPIES OF THE BALANCE AND TESTING REPORT SHALL BE PROVIDED TO THE OWNER. OWNER'S REPRESENTATIVE, OR ARCHITECT BEFORE PROJECT CLOSE OUT FOR REVIEW. THE BALANCING CONTRACTOR SHALL RECHECK ANY ITEMS THAT THE OWNER OR ARCHITECT DEEMS REASONABLY NECESSARY AT NO ADDITIONAL COST TO THE OWNER.

R. VENTILATION AND COMBUSTION AIR INTAKE: PROVIDE OUTSIDE VENTILATION AIR BY NATURAL VENTILATION OR MECHANICAL EQUIPMENT AS REQUIRED BY THE MECHANICAL CODE (REFER TO OUTSIDE AIR VENTILATION SCHEDULE). IF GAS-FIRED EQUIPMENT IS USED, VERIFY THAT THE MECHANICAL ROOM AND / OR MECHANICAL EQUIPMENT ARE PROVIDED WITH ADEQUATE COMBUSTION AND DILUTION AIR IN COMPLIANCE WITH THE MECHANICAL CODE, PROVIDE ADDITIONAL AIR AS REQUIRED. PROVIDE A VENT DESIGNED FOR THE TYPE OF APPLIANCE BEING VENTED FOR ALL GAS-FIRED EQUIPMENT TO THE EXTERIOR. PROVIDE VENTS DIRECTLY TO THE EXTERIOR FOR ALL EXHAUST FANS. ALL EXHAUST AND INTAKE OPENINGS MUST BE LOCATED A MINIMUM OF 10 FEET FROM LIT LINES OR BUILDINGS ON THE SAME LOT.

S. PROVIDE A SMOKE DETECTOR IN RETURN AIR SYSTEMS WITH A DESIGN CAPACITY GREATER THAN 2,000 CFM IN THE RETURN AIR DUCT OR PLENUM UPSTREAM OF ANY FILTERS, EXHAUST AIR CONNECTIONS, OUTDOOR AIR CONNECTIONS, OR DECONTAMINATION EQUIPMENT AND APPLIANCES (PER OMC SECTION 606.2.1). WHERE TWO OR MORE UNITS SHARE THE SAME RETURN, THE COMBINED AMOUNT OF CFM SHALL BE USED IN DETERMINING WHETHER A DUCT SMOKE DETECTOR IS REQUIRED. COORDINATE THESE REQUIREMENTS BETWEEN THE HVAC AND THE ELECTRICAL OR FIRE ALARM CONTRACTORS.

T. PROVIDE ACCESS TO ALL DAMPERS, CONTROLS, AND OTHER ITEMS IN DUCTWORK THAT REQUIRE SERVICE OR INSPECTION. IF THE ACCESS PANEL LOCATION IS EXPOSED, THE OWNER OR THE ARCHITECT MUST APPROVE IT PRIOR TO INSTALLATION. ACCESS PANELS ARE NOT REQUIRED ABOVE LAY-IN GRID TYPE CEILINGS.

U. ALL HVAC EVAPORATORS AND COOLING COILS REQUIRE A CONDENSATE DRAIN, WHICH IS CONVEYED TO AN APPROPRIATE PLACE OF DISPOSAL (TYPICALLY INDIRECTLY INTO A FLOOR DRAIN). A SECONDARY DRAIN OR AUXILIARY DRAIN PAN [WITH A SEPARATE DRAIN OR A WATER LEVEL DETECTION DEVICE CONFORMING TO UL 508 THAT WILL SHUT OFF THE EQUIPMENT SERVED PRIOR TO OVERFLOW OF THE AUXILIARY DRAIN PAN] IS REQUIRED FOR ANY EQUIPMENT THAT PRODUCES CONDENSATE AND WHERE DAMAGE MAY OCCUR AS A RESULT OF OVERFLOW FROM THE EQUIPMENT DRAIN PAN OR STOPPAGE IN THE CONDENSATE DRAIN (PER OMC SECTION 307.2.3). COORDINATE THESE REQUIREMENTS BETWEEN THE HVAC AND PLUMBING CONTRACTORS AND THE ARCHITECT.

V. ALL ROOF AND/OR EXTERIOR WALL PENETRATIONS ARE TO BE SEALED AIR AND WATER TIGHT, COORDINATE WITH THE GENERAL CONTRACTOR AND OTHER SUB-CONTRACTORS. ALL EQUIPMENT, PIPES, DUCTS, ETC. ARE TO BE INSTALLED CONCEALED ABOVE THE CEILING UNLESS SHOWN OTHERWISE.

W. VERIFY ALL SUSPENDED MECHANICAL LOADS WITH ARCHITECT PRIOR TO ORDERING NEW MECHANICAL EQUIPMENT.

X. HVAC CONTRACTOR TO COORDINATE ROUTING AND LOCATION OF ALL DEVICES WITH BUILDING STRUCTURE AND OTHER CEILING MOUNTED DEVICES.

Y. HVAC CONTRACTOR TO REVIEW DRAWINGS FOR COMPLIANCE WITH LOCAL CODES AND WITH AUTHORITIES HAVING JURISDICTION OVER THIS PROJECT. CONTACT ARCHITECT WITH ANY QUESTIONS OR CONCERNS.

DUCTWORK SYMBOL LEGEND

SUPPLY OR OUTSIDE AIR DUCT UP	RADIUS RECTANGULAR ELBOW
RETURN OR EXHAUST AIR DUCT UP	SUPPLY OR OUTSIDE AIR ROUND DUCT UP
SUPPLY OR OUTSIDE AIR DUCT DOWN	RETURN OR EXHAUST AIR ROUND DUCT UP
RETURN OR EXHAUST AIR DUCT DOWN	ROUND DUCT DOWN
SUPPLY OR OUTSIDE AIR DUCT OFFSET	ROUND OFFSET
RETURN AIR DUCT OFFSET	ROUND ELBOW
MANUAL BALANCING DAMPER	ROUND WYE
MOTORIZED DAMPER	RECTANGULAR BRANCH TAKEOFF
FIREDAMPER	RECTANGULAR DUCT TERMINATION
RECTANGULAR TO ROUND TRANSITION	ROUND DUCT TERMINATION
RECTANGULAR TRANSITION	
STANDARD RECTANGULAR ELBOW	

ANNOTATION SYMBOL LEGEND

T — THERMOSTAT OR TEMP. SENSOR	4 / H-100 — SECTION SYMBOL
H — HUMIDISTAT	
S — SWITCH	RTU / 12 — EQUIPMENT PLAN MARK
10 — KEYED NOTE SYMBOL	
CONNECT TO EXISTING	4 / H-100 — DETAIL SYMBOL
1-01 — VAV TERMINAL UNIT MARK	
AHU-1 — EQUIPMENT MARK	
A-8"ø 250 / A-24x12 250 — AIR DEVICE MARK - NECK SIZE / AIRFLOW	
8"ø — ROUND DUCT SIZE	
24x12 — RECTANGULAR DUCT SIZE	

AIR DEVICE AND DUCT ACCESS. LEGEND

RETURN AIR GRILLE	SUPPLY AIR DIFFUSER (HARD CONNECTION)
SUPPLY AIR DIFFUSER WITH FLEXIBLE RUNOUT AND DAMPER	RETURN OR EXH. GRILLE (HARD CONNECTION)
SIDEWALL DIFFUSER	14X14 TRANSFER OPENING IN WALL
SUPPLY AIR DIFFUSER (HARD CONNECTION)	TRANSFER OPENING IN WALL
RETURN OR EXH. GRILLE (HARD CONNECTION)	

PIPE SYMBOL LEGEND

C	PIPE DOWN
O	PIPE UP
	TEE DOWN
	TEE UP
	PIPE BREAK (FOR CLARITY)
E	CAPPED PIPE
RS	REFRIGERANT SUCTION PIPE
RHG	REFRIGERANT HOT GAS PIPE

HVAC INDEX OF DRAWINGS

HVAC DESIGN CRITERIA

GENERAL DESIGN INFORMATION

BUILDING LOCATION: DAYTON, OHIO

OUTDOOR DESIGN INFORMATION

SUMMER DRY BULB: 90.3°F (ASHRAE 0.4%)
SUMMER WET BULB: 73.6°F (ASHRAE 0.4%)
WINTER DRY BULB: 0.6°F (ASHRAE 99.6%)

INDOOR DESIGN INFORMATION

INDOOR SUMMER DRY BULB: 75°F
INDOOR SUMMER RH%: 60% MAX.
INDOOR WINTER DRY BULB: 70°F
INDOOR WINTER RH%: AMBIENT

APPLICABLE CODES

MECHANICAL: OHIO MECHANICAL CODE 2024
PLUMBING: OHIO PLUMBING CODE 2024
ENERGY: ASHRAE 90.1-2019
VENTILATION: ASHRAE 62.1-2019

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL
PE - 76872
REGISTERED PROFESSIONAL ENGINEER
STATE OF OHIO

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	-

TITLE
HVAC LEGEND AND GENERAL NOTES

SHEET NO.
H0.1

1/16/2026 10:48:34 AM

FURNACE SCHEDULE

PLAN MARK	BASIS OF DESIGN MANUFACTURER	BASIS OF DESIGN MODEL	CFM	VENT. AIR (CFM)	E.S.P. (IN.WC)	HEATING INPUT (BTUH)	HEATING OUTPUT (BTUH)	NOM. COOL CAPACITY (TONS)	DIMENSION WIDTH	DIMENSION LENGTH	DIMENSION HEIGHT	ELECTRICAL VOLTAGE	ELECTRICAL PHASE	ELECTRICAL MCA	ELECTRICAL MOCP	NOTES
FUR-1	CARRIER	59SP6080V21	1200	200	0.5	80,000	75,000	3	29.5"	21"	35"	120 V	1	16.9 A	20 A	1,2,3,4,5,6
FUR-2	CARRIER	59SP6100V21	1600	300	0.5	100,000	93,000	4	29.5"	21"	35"	120 V	1	16.7 A	20 A	1,2,3,4,5
FUR-3	CARRIER	59SP6120V24	1950	225	0.5	120,000	111,000	5	29.5"	24"	35"	120 V	1	16.7 A	20 A	1,2,3,4,5
FUR-4	CARRIER	59SP6120V24	1950	175	0.5	120,000	111,000	5	29.5"	24"	35"	120 V	1	16.7 A	20 A	1,2,3,4,5

GENERAL NOTES:
A. ACCEPTABLE ALTERNATE MANUFACTURERS: TRANE OR DAIKIN.
B. REFRIGERANT PIPING TO BE SIZED BY MANUFACTURER.

NOTES:
1. PROVIDE WITH NON-FUSED DISCONNECT SWITCH.
2. PROVIDE MATCHED EVAPORATOR COIL AND CONDENSING UNIT.
3. PROVIDE WITH FILTER RACK AND 1" PLEATED SPARE SET OF FILTERS.
4. PROVIDE CONCENTRIC VENT KIT.
5. PROVIDE WITH 7-DAY PROGRAMMABLE THERMOSTAT.
6. **UNIT TO BE PROVIDED UNDER BASE BID AND EXCLUDED UNDER DEDUCT ALTERNATE.**

AIR CONDITIONING UNIT SCHEDULE

PLAN MARK	ASSOCIATED INDOOR UNIT	BASIS OF DESIGN MANUFACTURER	BASIS OF DESIGN MODEL	NOM. COOL CAPACITY (TONS)	MIN. SEER	DIMENSION WIDTH	DIMENSION LENGTH	DIMENSION HEIGHT	ELECTRIC VOLTAGE	ELECTRIC PHASE	ELECTRIC MCA	ELECTRIC MOCP	NOTES
CU-1	FUR-1	CARRIER	26SPA636	3	16	35"	35"	29"	208 V	1	17.6 A	30 A	1
CU-2	FUR-2	CARRIER	26SPA648	4	16	35"	35"	32"	208 V	1	29.1 A	40 A	
CU-3	FUR-3	CARRIER	26SPA660	5	16	35"	35"	46"	208 V	1	31.1 A	50 A	
CU-4	FUR-4	CARRIER	26SPA660	5	16	35"	35"	46"	208 V	1	31.1 A	50 A	

GENERAL NOTES:
A. ACCEPTABLE ALTERNATE MANUFACTURER BY TRANE OR DAIKIN.
B. CAPACITIES LISTED ARE BASED ON AHRI CONDITIONS.

NOTES:
1. **UNIT TO BE PROVIDED UNDER BASE BID AND EXCLUDED UNDER DEDUCT ALTERNATE.**

FUR-1 VENTILATION SCHEDULE

ROOM NUMBER	ROOM NAME	OCCUPANCY TYPE	AREA (SF)	VENTILATION AIR OCCUPANT DENSITY (#/1000SF)	VENTILATION AIR PEOPLE AIR RATE (CFM/PERSON)	VENTILATION AIR AREA AIR RATE (CFM/SF)	VENTILATION AIR NUMBER OF PEOPLE	VENTILATION AIR MINIMUM OA AIRFLOW (CFM)	EXHAUST AIR PLUMBING FIXTURE COUNT	EXHAUST AIR EXHAUST RATE PER FIXTURE (CFM)	EXHAUST AIR AREA EXHAUST RATE (CFM/SF)	MINIMUM EXHAUST REQ'D
126	IT	OFFICE	56	5	5	0.06	1	8				
127	WEAPONS CLEAN	UNOCC. STORAGE	65									
128	EQUIPMENT BAGS	UNOCC. STORAGE	103									
129	FILE STORAGE	UNOCC. STORAGE	95									
130	BREAK ROOM	BREAK	150	25	5	0.06	4	29				
140	CORRIDOR	CORRIDOR	297	0	0	0.06	0	18				
			766					55				0

FUR-2 VENTILATION SCHEDULE

ROOM NUMBER	ROOM NAME	OCCUPANCY TYPE	AREA (SF)	VENTILATION AIR OCCUPANT DENSITY (#/1000SF)	VENTILATION AIR PEOPLE AIR RATE (CFM/PERSON)	VENTILATION AIR AREA AIR RATE (CFM/SF)	VENTILATION AIR NUMBER OF PEOPLE	VENTILATION AIR MINIMUM OA AIRFLOW (CFM)	EXHAUST AIR PLUMBING FIXTURE COUNT	EXHAUST AIR EXHAUST RATE PER FIXTURE (CFM)	EXHAUST AIR AREA EXHAUST RATE (CFM/SF)	MINIMUM EXHAUST REQ'D
131	TLT	N/A	54						1	50	0	50
132	TLT	N/A	54						1	50	0	50
133	TLT/SHWR	N/A	70						2	50	0	100
134	CHANGE 1	N/A	34									
135	CHANGE 2	N/A	34									
136	CHANGE 3	N/A	40									
137	CHANGE 4	N/A	40									
138	PERSONAL GEAR	LOCKER	786						0	0	0.5	393
139	PERSONAL GEAR CHANGING ROOM	N/A	155									
			1266					0				593

FUR-3 VENTILATION SCHEDULE

ROOM NUMBER	ROOM NAME	OCCUPANCY TYPE	AREA (SF)	VENTILATION AIR OCCUPANT DENSITY (#/1000SF)	VENTILATION AIR PEOPLE AIR RATE (CFM/PERSON)	VENTILATION AIR AREA AIR RATE (CFM/SF)	VENTILATION AIR NUMBER OF PEOPLE	VENTILATION AIR MINIMUM OA AIRFLOW (CFM)	EXHAUST AIR PLUMBING FIXTURE COUNT	EXHAUST AIR EXHAUST RATE PER FIXTURE (CFM)	EXHAUST AIR AREA EXHAUST RATE (CFM/SF)	MINIMUM EXHAUST REQ'D
101	VESTIBULE		74									
103	OFFICE	OFFICE	135	5	5	0.06	1	13				
104	CAPTAIN	OFFICE	166	5	5	0.06	1	15				
105	SERGEANT	OFFICE	135	5	5	0.06	1	13				
106	SERGEANT	OFFICE	135	5	5	0.06	1	13				
109	CONFERENCE/ROLL CALL	CONFERENCE	360	50	5	0.06	18	112				
110	DEPUTIES	OFFICE	186	5	5	0.06	1	16				
123	BREATH	OFFICE	61	5	5	0.06	1	9				
125	CORRIDOR	CORRIDOR	438	0	0	0.06	0	26				
			1689					217				0

FUR-4 VENTILATION SCHEDULE

ROOM NUMBER	ROOM NAME	OCCUPANCY TYPE	AREA (SF)	VENTILATION AIR OCCUPANT DENSITY (#/1000SF)	VENTILATION AIR PEOPLE AIR RATE (CFM/PERSON)	VENTILATION AIR AREA AIR RATE (CFM/SF)	VENTILATION AIR NUMBER OF PEOPLE	VENTILATION AIR MINIMUM OA AIRFLOW (CFM)	EXHAUST AIR PLUMBING FIXTURE COUNT	EXHAUST AIR EXHAUST RATE PER FIXTURE (CFM)	EXHAUST AIR AREA EXHAUST RATE (CFM/SF)	MINIMUM EXHAUST REQ'D
102	SAFE ROOM	OFFICE	52	5	5	0.06	1	8				
111	DETECTIVE 1	OFFICE	123	5	5	0.06	1	12				
112	DETECTIVE 2	OFFICE	123	5	5	0.06	1	12				
113	DETECTIVE 3	OFFICE	123	5	5	0.06	1	12				
114	DETECTIVE 4	OFFICE	123	5	5	0.06	1	12				
115	DETECTIVE 5	OFFICE	123	5	5	0.06	1	12				
116	INTERVIEW 1	OFFICE	98	5	5	0.06	1	11				
117	INTERVIEW 2	OFFICE	98	5	5	0.06	1	11				
118	STORM SHLT/TLT	STORM SHELTER	103	140	5	0	15	75	1	50	0	50
119	COP	OFFICE	126	5	5	0.06	1	13				
120	TRAFFIC	OFFICE	65	5	5	0.06	1	9				
124	TLT/SHWR		70									
125	CORRIDOR	CORRIDOR	335	0	0	0.06	0	20				
			1558					207				50

AIR INLETS AND OUTLETS SCHEDULE

PLAN MARK	DESCRIPTION	BASIS OF DESIGN MANUF.	BASIS OF DESIGN MODEL	MOUNTING	FINISH	MATERIAL	ACCESSORIES	NOTES
A1	SQUARE FACE CEILING DIFFUSER, 24x24 FACE	TITUS	TMS	LAY-IN	WHITE	STEEL	-	
A2	SQUARE FACE CEILING DIFFUSER, 24x24 FACE	TITUS	TMS	SURFACE	WHITE	STEEL	OPP. BLADE DMPR.	
A3	SQUARE FACE CEILING DIFFUSER, 12x12 FACE	TITUS	TMS	LAY-IN	WHITE	STEEL	-	
B1	EGGCRATE RETURN GRILLE	TITUS	50F	LAY-IN	WHITE	STEEL	-	
B2	EGGCRATE RETURN GRILLE	TITUS	50F	SURFACE	WHITE	STEEL	OPP. BLADE DMPR.	
C1	DOUBLE DEFLECTION SUPPLY GRILLE	TITUS	272RL	SURFACE	WHITE	STEEL	OPP. BLADE DMPR.	
D1	RETURN GRILLE	TITUS	350RL	SURFACE	WHITE	STEEL	OPP. BLADE DMPR.	

GENERAL NOTES:
A. LAY-IN AIR DEVICES SHALL BE DESIGNED TO INSTALL INTO A 24"x24" OR 24"x48" ACT CEILING SYSTEM
B. ACCEPTABLE ALTERNATE MANUFACTURERS: PRICE, KREUGER AND TUTTLE & BAILEY
C. PROVIDE AUXILIARY MOUNTING FRAME FOR DEVICES INSTALLED WITHIN GYPSUM, PLASTER, TILE OR OTHER SIMILAR SURFACE
D. UNLESS OTHERWISE DESIGNATED ON PLANS, SUPPLY DIFFUSERS SHALL BE 4-WAY DIRECTIONAL DISCHARGE.

NOTES:
1. .

FAN SCHEDULE

PLAN MARK	DESCRIPTION	BASIS OF DESIGN MANUF.	BASIS OF DESIGN MODEL	CFM	E.S.P. (IN.WC)	DRIVE	ELECTRICAL HP	ELECTRICAL VOLTAGE	ELECTRICAL PHASE	APPROX. ROOF/ WALL OPENING (IN.)	NOTES
EF-1	CEILING EXHAUST	GREENHECK	SP-A125	110	0.25	DIRECT	0.1	120 V	1		2,4,5
EF-2	CEILING EXHAUST	GREENHECK	SP-A125	110	0.25	DIRECT	0.1	120 V	1		2,4,5
EF-3	CEILING EXHAUST	GREENHECK	SP-A125	110	0.25	DIRECT	0.1	120 V	1		2,4,5
EF-4	CEILING EXHAUST	GREENHECK	SP-A125	110	0.25	DIRECT	0.1	120 V	1		2,4
EF-5	CENTRIFUGAL DOWNBLAST	GREENHECK	G-090-D	400	0.3	DIRECT	0.1	120 V	1	13.5"x13.5"	1,3,5
EF-6	INLINE CENTRIFUGAL	GREENHECK	SQ-70	130	0.2	DIRECT	0.1	120 V	1		2,4

GENERAL NOTES:
A. ACCEPTABLE ALTERNATE MANUFACTURERS: COOK, CARNES & PENNBARRY

NOTES:
1. PROVIDE WITH MINIMUM 12" HIGH ROOF CURB, DISCONNECT SWITCH, GRAVITY BACKDRAFT DAMPER AND BIRDSCREEN.
2. PROVIDE WITH INTEGRAL DISCONNECT SWITCH, SOLID STATE SPEED CONTROLLER AND GRAVITY BACKDRAFT DAMPER.
3. FAN SHALL BE CONTROLLED BY WALL SWITCH.
4. FAN CONTROLLED BY OCCUPANCY SENSOR.
5. **UNIT TO BE PROVIDED UNDER BASE BID AND EXCLUDED UNDER DEDUCT ALTERNATE.**

DUCTWORK CONSTRUCTION SCHEDULE

DUCT SYSTEM	SHAPE	PRESS. CLASS W.G.	MATERIAL	LINER THK.	LINER TYPE	LINER D	INSULATION THK.	INSULATION TYPE	INSULATION D	INSULATION JACKET	NOTES
CONCEALED SUPPLY	RND/RECT	-/+2"	GS	-	-	-	1.5"	FGW	-	FFJ	2
CONCEALED RETURN	RND/RECT	-/+2"	GS	-	-	-	1.5"	FGW	-	FFJ	
CONCEALED SUPPLY AIR DEVICE RUNOUT	RND	+1"	IFD	-	-	-	1.5"	IFD	-	FFJ	1
OUTSIDE AIR	RND/RECT	-1"	GS	-	-	-	1.5"	FGW	-	FFJ	
EXHAUST	RND/RECT	-1"	GS	-	-	-	-	-	-	-	
TRANSFER AIR DUCT	RECT	-/+1"	GS	1"	PFL	-	-	-	-	-	3

GENERAL NOTES:
A. ALL PAINTING BY GENERAL CONTRACTOR.
B. ALL DUCT JOINTS AND SEAMS SHALL BE SEALED PER OMC CHAPTER 5.

SCHEDULE NOTES:
1. ROUND RUNOUTS TO AIR DEVICES SHALL BE EXTERNALLY INSULATED.
2. INCLUDES DUCTWORK ROUTED IN ABOVE CEILING PLENUM SPACES.
3. IN LIEU OF RIGID DUCT AND LINER, INSULATED DUCTBOARD MAY BE USED WHEN NOT PASSING THROUGH WALL ASSEMBLY.

ABBREVIATIONS:

AIFD	ACOUSTICAL INSULATED FLEX-DUCT	FFJ	FOIL FACED JACKET	PGGS	PAINTGRIP GALVANIZED STEEL
ALUM	ALUMINUM	FGW	FIBERGLASS WRAP	PVCGS	PVC COATED GALVANIZED STEEL
ABA	ADHESIVE BACKED ALUMINUM	FPW	FIRE WRAP	RECT	RECTANGULAR
ASJ	ALL SERVICE JACKET	GS	GALVANIZED STEEL	RND	ROUND
CS	CARBON STEEL	GSSP	GALVANIZED STEEL SPIRAL PIPE	SS	STAINLESS STEEL
D	DENSITY (PCF)	IFD	INSULATED FLEXIBLE DUCT	TH	THICKNESS
DWI	DOUBLEWALL INSULATED	MFF	MATT FACED FIBERGLASS	UFD	UNINSULATED FLEXIBLE DUCT
ETPS	EXTRUDED POLYSTYRENE	PFD	PERFORATED FABRIC DUCT		
FB	FIBERGLASS BOARD	PFL	PREFORMED LINER		

GRAVITY VENTILATOR SCHEDULE

PLAN MARK	BASIS OF DESIGN MANUF.	BASIS OF DESIGN MODEL	SERVICE	CFM	E.S.P. (IN)	DUCT SIZE	THROAT AREA (SF)	NOTES
GRV-1	GREENHECK	GRSI-10	RELIEF	330	0.01	12"x12"	0.82	1,2,3
GIV-2	GREENHECK	GRSI-10	INTAKE	500	0.01	12"x12"	0.82	1,2
GIV-3	GREENHECK	GRSI-10	INTAKE	400	0.01	12"x12"	0.82	1,2

GENERAL NOTES:
A. ACCEPTABLE ALTERNATE MANUFACTURERS: COOK, CARNES & PENNBARRY

NOTES:
1. PROVIDE GRAVITY BACKDRAFT DAMPER.
2. PROVIDE 14" HIGH ROOF CURB FOR FLAT ROOF.
3. **UNIT TO BE PROVIDED UNDER BASE BID AND EXCLUDED UNDER ALTERNATE #1.**

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 76872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

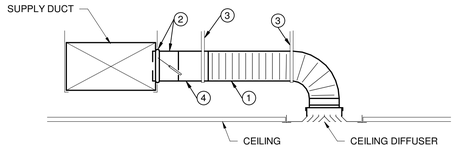
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	-

TITLE
HVAC SCHEDULES

SHEET NO.
H0.2

1/16/2026 10:49:34 AM



NOTES

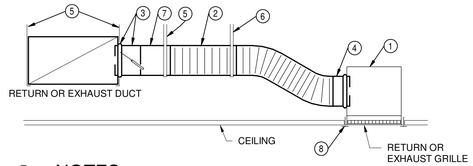
1 INSULATED FLEXIBLE DUCT SAME DIAMETER AS BRANCH DUCT, 6 FT. MAXIMUM TOTAL LENGTH PER AIR DEVICE. STRETCH FLEXIBLE DUCT TO AT LEAST 90% OF FULLY EXTENDED LENGTH.

2 BRANCH TAP FITTING, STRAIGHT SIDE WITH MANUAL DAMPER. DAMPER SHAFT IN HORIZONTAL. INTEGRAL INSULATION GUARD SLEEVE REQUIRED FOR TAP FITTING TO MAIN DUCT WITH INTERNAL INSULATION, AND EXTENDED DAMPER SHAFT AND HANDLE WITH STAND-OFF TO ACCOMMODATE EXTERNAL INSULATION.

3 DUCT STRAP HANGER. ATTACH TO STRUCTURE.

4 ROUND SHEET METAL BRANCH DUCT, SAME SIZE AS DIFFUSER INLET UNLESS NOTED OTHERWISE.

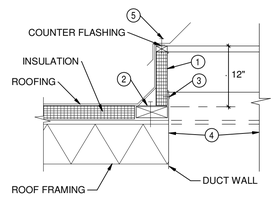
① CEILING DIFFUSER CONNECTION
NTS



NOTES

1. SHEET METAL PLENUM, FULL SIZE OF GRILLE NECK, MINIMUM 4" TALLER THAN DUCT RUNOUT SIZE, WITH SAME INTERNAL OR EXTERNAL INSULATION AS RETURN OR EXHAUST DUCT, CONNECT TO GRILLE.
2. FLEXIBLE DUCT, SAME DIAMETER AS BRANCH DUCT, 7 FT. MAXIMUM TOTAL LENGTH PER AIR DEVICE. STRETCH FLEXIBLE DUCT TO AT LEAST 90% OF FULLY EXTENDED LENGTH.
3. BRANCH TAP FITTING, STRAIGHT SIDE WITH MANUAL DAMPER. DAMPER SHAFT IN HORIZONTAL. INTEGRAL INSULATION GUARD SLEEVE REQUIRED FOR TAP FITTING TO MAIN DUCT WITH INTERNAL INSULATION. EXTENDED DAMPER SHAFT AND HANDLE WITH STAND-OFF REQUIRED FOR EXTERNALLY INSULATED DUCTWORK.
4. TAP FITTING, NO DAMPER.
5. DUCT STRAP HANGER. ATTACH TO STRUCTURE.
6. STRAP HANGER REQUIRED IF LENGTH OF FLEXIBLE DUCT IS LONGER THAN 4 FT.
7. ROUND SHEET METAL BRANCH DUCT, SIZE AS INDICATED IN ADJACENT SCHEDULE UNLESS NOTED OTHERWISE ON PLANS.
8. CEILING T-BAR SUPPORT (FOR LAY-IN APPLICATIONS). COORDINATE AND VERIFY T-BAR TYPE FOR COMPATIBILITY WITH GRILLE.

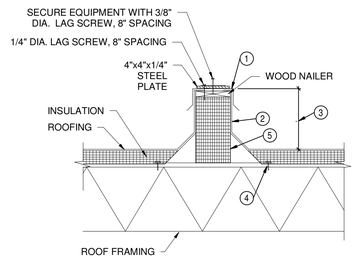
② RETURN/EXHAUST GRILLE DUCTED CONNECTION
NTS



NOTES

1. INSULATED STEEL CURB.
2. PROVIDE PRESSURE TREATED RIGID WOOD BLOCK FRAME SAME THICKNESS AS ROOF INSULATION. SECURE CURB MOUNTING FLANGE AND BLOCKING TO ROOF DECK WITH 1/4" x 3" LAG SCREW, EVERY 8".
3. #8 SHEET METAL SCREW.
4. ROOF DECK OPENING. COORDINATE REQUIRED OPENING SIZE.
5. SECURE FAN TO CURB USING 1/4"x2" GALVANIZED LAG SCREW MINIMUM 8" O/C.
6. SECURE CURB TO ROOF DECK USING 1/4"x3" GALVANIZED LAG SCREW MINIMUM 8" O/C.

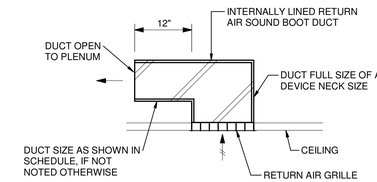
③ ROOF EQUIPMENT CURB MOUNTING DETAIL
NTS



NOTES

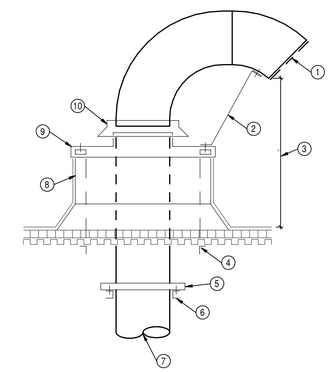
1. PROVIDE COUNTER-FLASHING.
2. HEAVY GAUGE CONTINUOUS SUPPORT EXTENDS 6" BEYOND LAST EQUIPMENT LEG. SCREW ATTACHMENT TO DECK.
3. MINIMUM 12 INCHES.
4. 1/4" DIA. LAG SCREW TO DECK, SPACED EVERY 8".
5. 18" HIGH INSULATED STEEL CURB.

④ ROOF EQUIPMENT SUPPORT
NTS



AIR DEVICE SIZE	DUCT SIZE
12x12	12x10
24x12	12x12
24x24	24x12

⑤ TRANSFER AIR SOUND BOOT
NTS



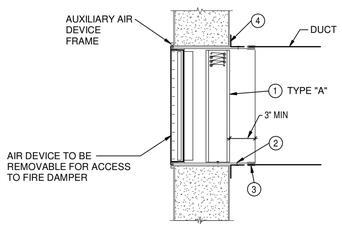
NOTES

1. 1/2" MESH BIRDSCREEN.
2. 2" WIDE x 1/8" THICK STEEL SUPPORTS.
3. 3'-0" CLEARANCE TYPICAL ALL VENTS.
4. STRUCTURAL FRAMING FOR OPENING. COORDINATE REQUIRED OPENING DIMENSIONS.
5. SUPPORT RING. FASTEN TO DUCTWORK AND CHANNEL.
6. CHANNEL SUPPORT FROM ADJACENT JOISTS.
7. FROM LAUNDRY EQUIPMENT.
8. 16" HIGH CURB. REFER TO CURB DETAIL THIS SHEET FOR INSTALLATION.
9. FLASHING COLLAR FASTEN TO DUCTS.
10. STORM COLLAR FASTEN TO DUCT.

GENERAL NOTES

A. PAINT ALL EXTERIOR DUCTWORK AND DEVICES WITH TWO COATS OF ENAMEL. ALL EXTERIOR SHEET METAL SHALL BE "PAINT-GRIP" CONSTRUCTION.

⑥ VENT DUCTS THROUGH ROOF
NTS



FIRE DAMPER NOTES

GENERAL NOTES

A. FIRE DAMPERS SHALL BE UL LABELED.

B. INSTALLATION OF FIRE DAMPERS AND ACCESSORIES SHALL CONFORM TO NFPA 90A, SMACNA AND MANUFACTURER'S INSTRUCTIONS.

C. DETAILS SHOW INSTALLATION OF FIRE DAMPER IN WALL. DAMPER INSTALLATION IN FLOOR SIMILAR. COORDINATE REQUIRED ACCESS LOCATIONS.

D. INSULATE RETAINING ANGLES FOR SYSTEMS REQUIRED TO BE INSULATED.

NOTES

1. FIRE DAMPER, FOLDED BLADE CURTAIN TYPE, EXCEPT AS NOTED. VERTICAL MOUNT, GRAVITY DROP; HORIZONTAL MOUNT, SPRING LOADED TO CLOSE. REFER TO SPECS FOR VELOCITY LIMITATIONS OF EACH TYPE. REFER TO DRAWINGS FOR STATIC OR DYNAMIC REQUIREMENTS.

   TYPE "A" - BLADES STORED IN AIR STREAM. RECTANGULAR, ROUND OR OVAL DUCT CONNECTION.

2. SHEET METAL WALL SLEEVE, SAME MATERIAL AS DUCT (EXCEPT GALVANIZED SHEET METAL FOR FIBERGLASS DUCT).
   SHEET METAL GAUGE PER SMACNA. USE EXTENDED HEAVY GAUGE SLEEVES WHEN INSTALLED CONDITION REQUIRES.

3. DUCT/SLEEVE CONNECTION. BREAKAWAY TYPE SHOWN. CONNECTION MAY BE RIGID TYPE IF ALLOWED BY CODE AUTHORITY.

4. RETAINING ANGLE ALL FOUR SIDES, GAUGE PER SMACNA. 1" MINIMUM OVERLAP OF WALL OPENING. LONGER LEG MAY BE REQUIRED TO ATTAIN REQUIRED OVERLAP. BOLT, SCREW OR TACK WELD TO WALL SLEEVE. SPACING OF FASTENERS PER SMACNA.

⑦ FIRE DAMPER AT AIR DEVICE - WALL
NTS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 76872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	JLW

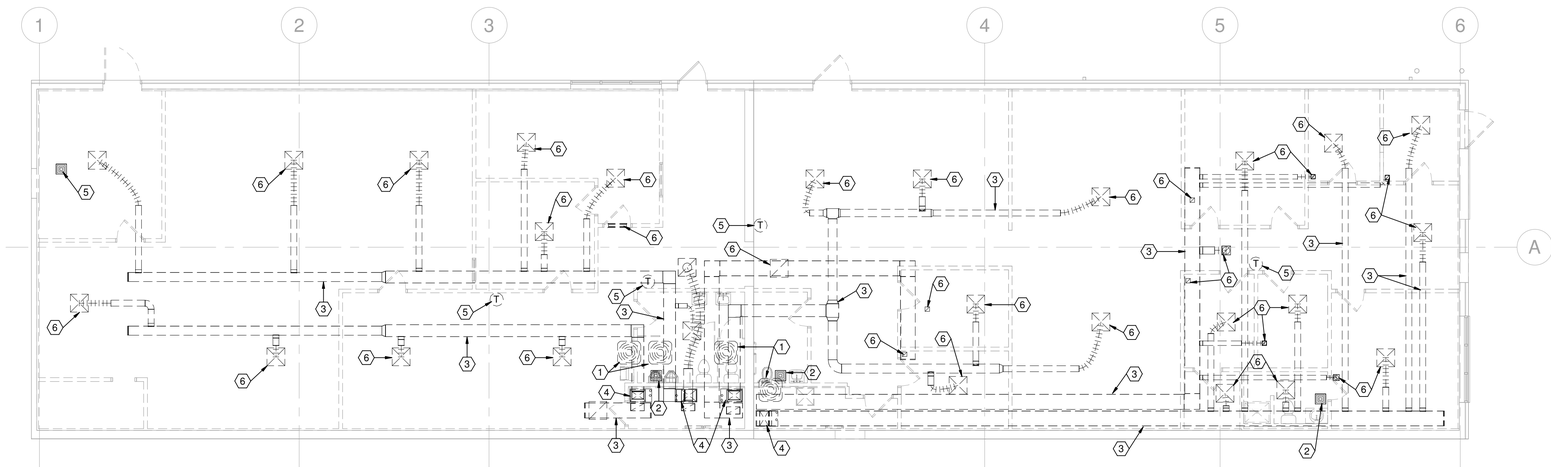
TITLE
HVAC DETAILS

SHEET NO.
H0.3

11/6/2026 10:49:35 AM

DRAWING NOTES

1. EXISTING ROOF MOUNTED AIR CONDITIONER AND ASSOCIATED REFRIGERANT PIPING, SUPPORTS, CONTROL WIRING, ETC. TO BE REMOVED. EXISTING ROOF SHALL BE REPAIRED CONSISTENT WITH EXISTING MATERIALS AND METHODS.
2. EXISTING EXHAUST FAN AND ASSOCIATED DUCTWORK, WIRING, CONTROLS ETC. TO BE REMOVED.
3. EXISTING DUCTWORK TO BE REMOVED AS INDICATED.
4. EXISTING GAS FURNACE AND ASSOCIATED WIRING, CONTROLS SUPPORTS, ETC. TO BE REMOVED.
5. EXISTING THERMOSTAT AND WIRING TO BE REMOVED.
6. EXISTING AIR DEVICE AND ASSOCIATED DUCTWORK TO BE REMOVED.



1 FLOOR PLAN - DEMOLITION
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 76872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	-

TITLE
HVAC FLOOR PLAN - DEMOLITION

SHEET NO.
H1.1

11/6/2026 10:49:05 AM

BASE BID DESCRIPTION

A. THE HVAC BASE BID FOR THE WEST AREA SHALL INCLUDE ALL HVAC SCOPE SHOWN ON THIS SHEET.

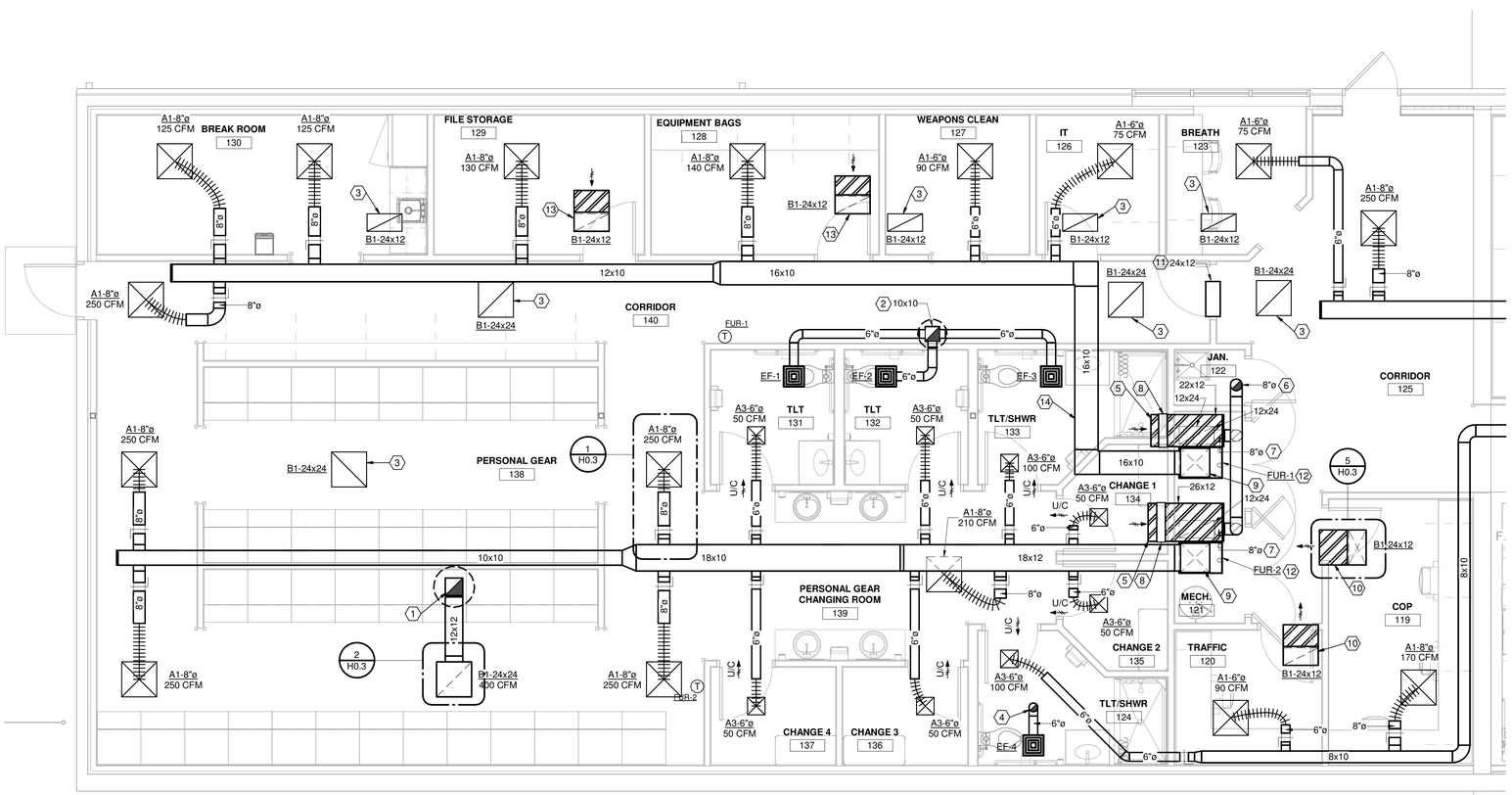
B. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO SHELL THE WEST AREA SPACE. THIS INCLUDES NOT INSTALLING THE FUR-1 FULL SYSTEM, EXHAUST FAN SYSTEMS EF-1, EF-2, EF-3 AND EF-5, GRAVITY VENTILATOR GRV-1 AND PORTION OF FUR-2 DUCT SYSTEM. REFER TO SHEET H2.4 FOR ALTERNATE HVAC PLAN FOR FURTHER DETAILS.

GENERAL NOTES

A. ALL DUCTWORK AND PIPING SHALL BE SEISMICALLY BRACED AND SUPPORTED FROM THE STRUCTURE BASED ON THE BUILDING BEING AN ESSENTIAL FACILITY. ALL SEISMIC BRACING CALCULATIONS AND DESIGN SHALL BE DELEGATED DESIGN AND THE RESPONSIBILITY OF THIS CONTRACTOR.

DRAWING NOTES

1. DUCT UP TO EXHAUST FAN ON ROOF. REFER TO ROOF PLAN FOR CONTINUATION.
2. DUCT UP TO ROOF MOUNTED GRAVITY RELIEF VENTILATOR. REFER TO ROOF PLAN FOR CONTINUATION.
3. GRILLE OPEN TO RETURN AIR PLENUM.
4. DUCT UP THROUGH ROOF. TERMINATE WITH GOOSENECK WITH BIRDSCREEN.
5. DUCT OPEN TO PLENUM SPACE.
6. VENTILATION AIR INTAKE DUCT UP THROUGH ROOF TO INTAKE VENTILATOR. CONTRACTOR SHALL PATCH AND SEAL PENETRATION WEATHERTIGHT.
7. PROVIDE VENTILATION AIR DUCT TO RETURN MAIN DUCT. PROVIDE WITH MANUAL BALANCE DAMPER. BALANCE VENTILATION AIR TO AIRFLOW INDICATED IN VENTILATION SCHEDULE.
8. PROVIDE DUCT MOUNTED SMOKE DETECTOR. PROVIDE WITH VISUAL ALARM INDICATOR. INDICATOR SHALL BE MOUNTED IN CEILING OR WALL IN CORRIDOR FOR VISIBILITY. ALL WIRING BY E.C.
9. PROVIDE SUPPLY DUCT PLENUM FROM UNIT UP INTO PLENUM SPACE.
10. PROVIDE TRANSFER AIR DUCT WITH 1" LINER UP FROM GRILLE THROUGH PLENUM AND ROOM WALL. REFER TO DETAIL ON SHEET H0.3 FOR SIZE.
11. PROVIDE TRANSFER AIR DUCT ABOVE CEILING THROUGH WALL. SIZE AS INDICATED.
12. PROVIDE GAS FURNACE. UTILIZE UNIT FULL SIZE SIDE RETURN CONNECTION. PROVIDE WITH 2" WIDE FILTER. PROVIDE FLEXIBLE DUCT CONNECTION IN RETURN MAIN AND AT UNIT SUPPLY CONNECTION. ROUTE SCHEDULE 40 PVC VENT PIPING UP THROUGH ROOF AND TERMINATE PER MANUFACTURER GUIDELINES.
13. PROVIDE TRANSFER AIR GRILLE AND SOUND BOOT. REFER TO DETAIL ON SHEET H0.3.
14. DUCT TO RISE OVER STRUCTURAL BEAM AND BACK DOWN WITHIN ROOF JOIST SPACE



1 FLOOR PLAN - WEST - NEW WORK
1/4" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL PE - 76872 REGISTERED PROFESSIONAL ENGINEER STATE OF OHIO

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	-

TITLE
HVAC FLOOR PLAN - WEST - NEW WORK

SHEET NO.
H2.1

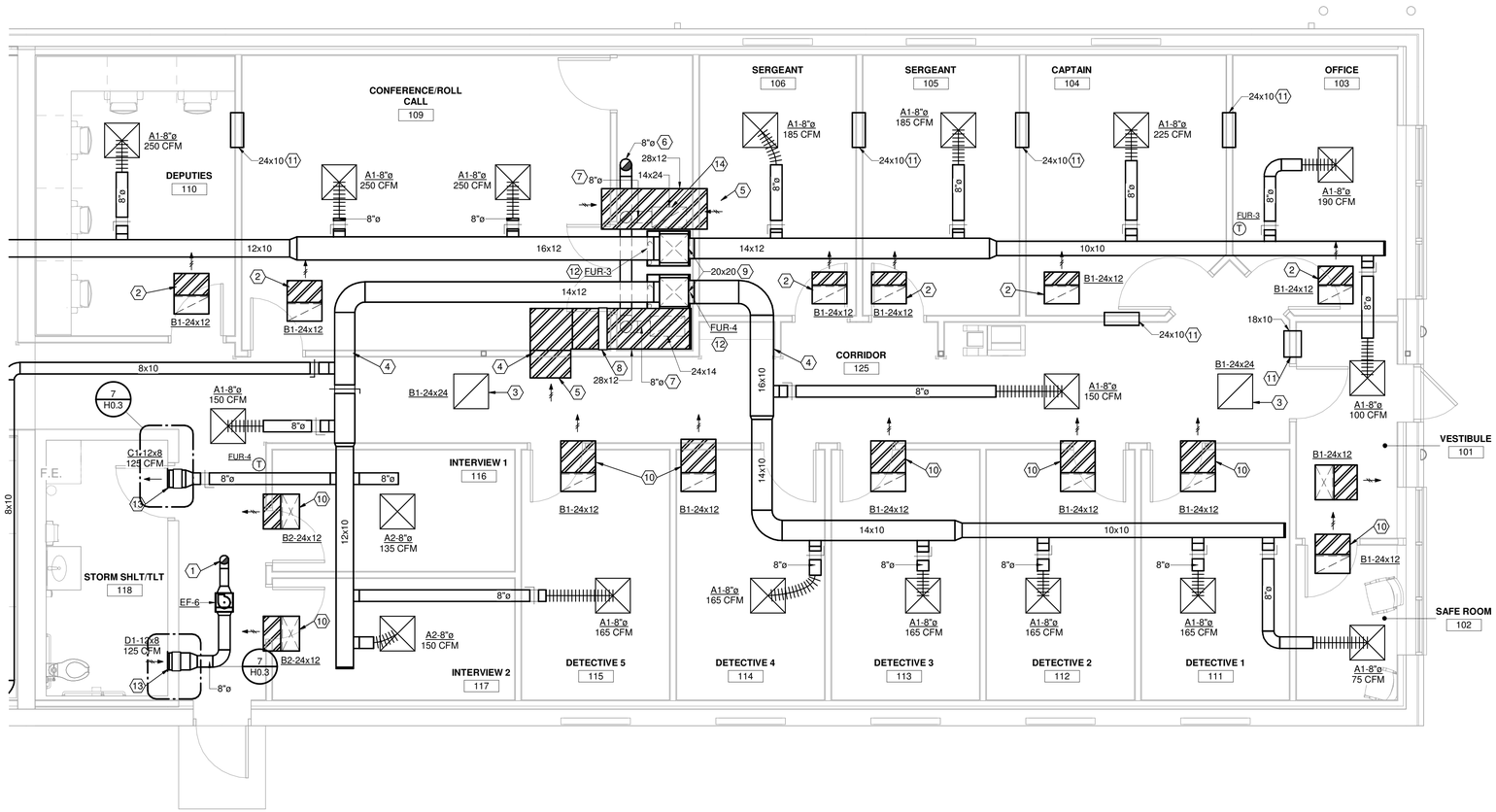
1/15/2026 10:49:26 AM

GENERAL NOTES

A. ALL DUCTWORK AND PIPING SHALL BE SEISMICALLY BRACED AND SUPPORTED FROM THE STRUCTURE BASED ON THE BUILDING BEING AN ESSENTIAL FACILITY. ALL SEISMIC BRACING CALCULATIONS AND DESIGN SHALL BE DELEGATED DESIGN AND THE RESPONSIBILITY OF THIS CONTRACTOR.

DRAWING NOTES

1. DUCT UP THROUGH ROOF AND TERMINATE WITH GOOSENECK. REFER TO DETAIL ON SHEET H0.3.
2. PROVIDE TRANSFER AIR GRILLE AND SOUND BOOT. REFER TO DETAIL ON SHEET H0.3
3. GRILLE OPEN TO RETURN AIR PLENUM.
4. DUCT TO RISE OVER STRUCTURAL BEAM AND BACK DOWN WITHIN ROOF JOIST SPACE
5. DUCT OPEN TO PLENUM SPACE.
6. VENTILATION AIR INTAKE DUCT UP THROUGH ROOF TO INTAKE VENTILATOR. CONTRACTOR SHALL PATCH AND SEAL PENETRATION WEATHERTIGHT.
7. PROVIDE VENTILATION AIR DUCT TO RETURN MAIN DUCT. PROVIDE WITH MANUAL BALANCE DAMPER. BALANCE VENTILATION AIR TO AIRFLOW INDICATED IN VENTILATION SCHEDULE.
8. PROVIDE DUCT MOUNTED SMOKE DETECTOR. PROVIDE WITH VISUAL ALARM INDICATOR. INDICATOR SHALL BE MOUNTED IN CEILING OR WALL IN CORRIDOR FOR VISIBILITY. ALL WIRING BY E.C.
9. PROVIDE SUPPLY DUCT PLENUM FROM UNIT UP INTO PLENUM SPACE.
10. PROVIDE TRANSFER AIR DUCT WITH 1" LINER UP FROM GRILLE THROUGH PLENUM AND ROOM WALL. REFER TO DETAIL ON SHEET H0.3 FOR SIZE.
11. PROVIDE TRANSFER AIR DUCT ABOVE CEILING THROUGH WALL. SIZE AS INDICATED.
12. PROVIDE GAS FURNACE. UNIT MOUNTED ON FULL UNIT SIZE DEPTH BY MIN. 18" TALL BOTTOM RETURN STRUCTURAL PLENUM. PROVIDE WITH 2" WIDE FILTER RACK IN PLENUM. PROVIDE FLEXIBLE DUCT CONNECTION FROM RETURN MAIN TO PLENUM BOX AND AT UNIT SUPPLY CONNECTION.
13. GRILLE FOR STORM SHELTER SHALL BE LOCATED IN BLOCK WALL. LOCATE GRILLE IN BLOCK SPACING. FINAL LOCATION TO BE FIELD COORDINATED. PROVIDE WITH 3-HOUR FIRE DAMPER. REFER TO FIRE DAMPER DETAILS ON SHEET H0.3.
14. PROVIDE DUCT MOUNTED SMOKE DETECTOR IN VERTICAL RETURN AIR DUCT MAIN. DETECTOR MUST BE PLACED UPSTREAM OF THE VENTILATION AIR CONNECTION TO PREVENT AIR DILUTION. PROVIDE WITH VISUAL ALARM INDICATOR. INDICATOR SHALL BE MOUNTED IN CEILING OR WALL IN CORRIDOR FOR VISIBILITY. ALL WIRING BY E.C.



1 FLOOR PLAN - EAST - NEW WORK
1/4" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL PE - 74872 REGISTERED PROFESSIONAL ENGINEER STATE OF OHIO

Harrison Township District 10 Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	-

TITLE
HVAC FLOOR PLAN - EAST - NEW WORK

SHEET NO.
H2.2

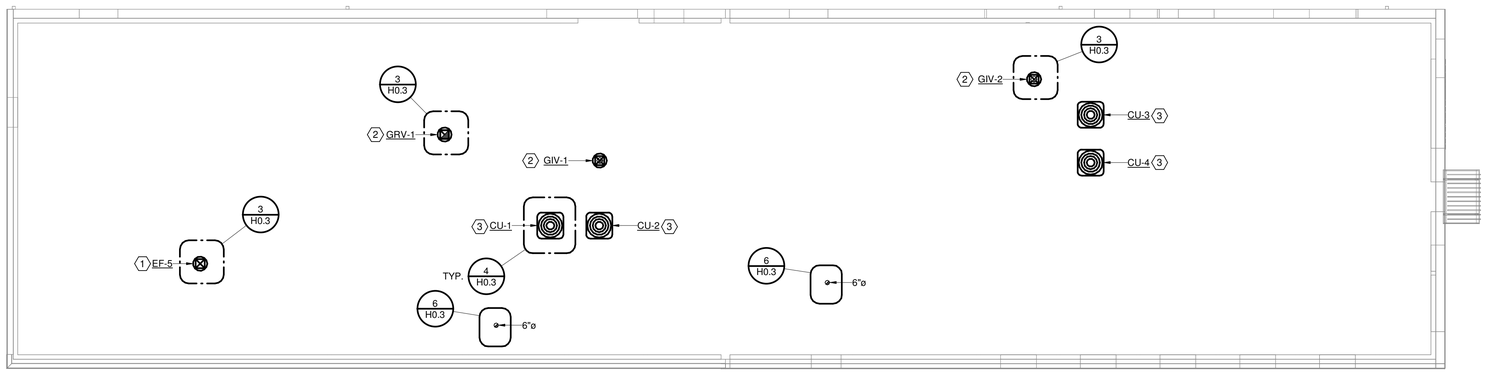
1/16/2026 10:49:26 AM

GENERAL NOTES

A. ALL ROOF CUTTING, PATCHING AND SEALING SHALL BE THE RESPONSIBILITY OF THIS CONTRACTOR. PENETRATIONS SHALL BE SEALED WEATHERTIGHT CONSISTENT WITH MATERIALS, MEANS AND METHODS OF THE EXISTING ROOF ASSEMBLY.

DRAWING NOTES

1. PROVIDE NEW EXHAUST FAN MOUNTED ON ROOF CURB. EXISTING ROOFING SHALL BE CUT AND PATCHED FOR NEW CURB AND OPENING.
2. PROVIDE NEW GRAVITY RELIEF VENTILATOR MOUNTED ON CURB. EXISTING ROOFING SHALL BE CUT AND PATCHED FOR NEW CURB AND OPENING.
3. PROVIDE NEW CONDENSING UNIT ON ROOF. PROVIDE WITH EQUIPMENT SUPPORT RAILS SECURED TO ROOF STRUCTURE. PATCH ROOF CONSISTENT WITH EXISTING MATERIALS AND METHODS.



1 ROOF PLAN - NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 75872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	-

TITLE
HVAC ROOF PLAN

SHEET NO.
H2.3

1/16/2026 10:49:36 AM

ALTERNATE DESCRIPTION

A. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO REDUCE THE BASE BID HVAC DESIGN FOR THE WEST AREA TO ONLY AS SHOWN ON THIS PLAN. THIS INCLUDES NOT INSTALLING THE FUR-1 FULL SYSTEM, EXHAUST FAN SYSTEMS EF-1, EF-2, EF-3 AND EF-5, GRAVITY VENTILATOR GIV-1 AND PORTION OF FUR-2 DUCT SYSTEM.

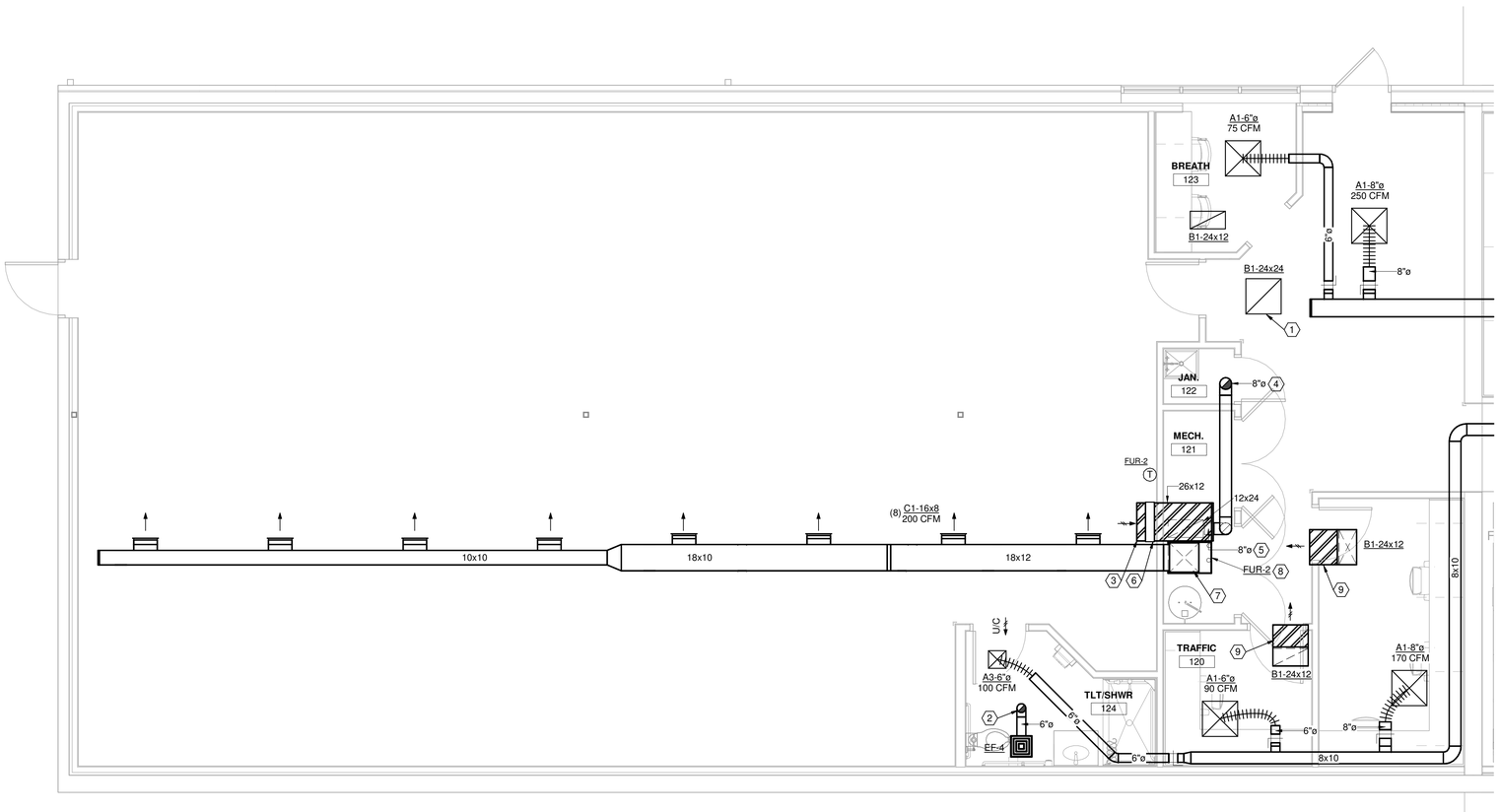
B. REFER TO SHEET H2.1 FOR THE BASE BID HVAC SCOPE OF WORK.

GENERAL NOTES

A. ALL DUCTWORK AND PIPING SHALL BE SEISMICALLY BRACED AND SUPPORTED FROM THE STRUCTURE BASED ON THE BUILDING BEING AN ESSENTIAL FACILITY. ALL SEISMIC BRACING CALCULATIONS AND DESIGN SHALL BE DELEGATED DESIGN AND THE RESPONSIBILITY OF THIS CONTRACTOR.

DRAWING NOTES

1. GRILLE OPEN TO RETURN AIR PLENUM.
2. DUCT UP THROUGH ROOF. TERMINATE WITH GOOSENECK WITH BIRDSCREEN.
3. DUCT OPEN TO PLENUM SPACE.
4. VENTILATION AIR INTAKE DUCT UP THROUGH ROOF TO INTAKE VENTILATOR. CONTRACTOR SHALL PATCH AND SEAL PENETRATION WEATHERTIGHT.
5. PROVIDE VENTILATION AIR DUCT TO RETURN MAIN DUCT. PROVIDE WITH MANUAL BALANCE DAMPER. BALANCE VENTILATION AIR TO AIRFLOW INDICATED IN VENTILATION SCHEDULE.
6. PROVIDE DUCT MOUNTED SMOKE DETECTOR. PROVIDE WITH VISUAL ALARM INDICATOR. INDICATOR SHALL BE MOUNTED IN CEILING OR WALL IN CORRIDOR FOR VISIBILITY. ALL WIRING BY E.C.
7. PROVIDE SUPPLY DUCT PLENUM FROM UNIT UP INTO PLENUM SPACE.
8. PROVIDE GAS FURNACE. UTILIZE UNIT FULL SIZE SIDE RETURN CONNECTION. PROVIDE WITH 2" WIDE FILTER. PROVIDE FLEXIBLE DUCT CONNECTION IN RETURN MAIN AND AT UNIT SUPPLY CONNECTION. ROUTE SCHEDULE 40 PVC VENT PIPING UP THROUGH ROOF AND TERMINATE PER MANUFACTURER GUIDELINES.
9. PROVIDE TRANSFER AIR DUCT WITH 1" LINER UP FROM GRILLE THROUGH PLENUM AND ROOM WALL. REFER TO DETAIL ON SHEET H0.3 FOR SIZE.



1 HVAC ALTERNATE 1 PLAN - WEST
1/4" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL
PE - 74872
STATE OF OHIO
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JLW
CHECKED	JLW

TITLE
HVAC ALTERNATE PLAN

SHEET NO.
H2.4

11/6/2026 10:49:37 AM

GENERAL LIGHTING/POWER NOTES

1. LIGHT FIXTURES DESIGNATED AS "NIGHT LIGHTS" SHALL BE ON UNSWITCHED CIRCUIT, UNLESS NOTED.
2. EXIT LIGHTS SHALL BE ON UNSWITCHED CIRCUIT, UNLESS NOTED.
3. ALL RECESSED DOWNLIGHTS MOUNTED IN GRID CEILING SHALL BE CENTERED IN CEILING TILE, UNLESS NOTED.
4. IN ALL MECHANICAL ROOMS, COORDINATE EXACT LOCATION OF LIGHT FIXTURES WITH HVAC DUCTWORK.
5. CONDUCTORS FOR BRANCH CIRCUITRY ARE #12 AWG MINIMUM, UNLESS NOTED. DERATE PER CODE WHERE CIRCUITS ARE COMBINED.
6. PROVIDE A GREEN GROUND CONDUCTOR IN ALL BRANCH CIRCUITRY. DERATE PER CODE WHERE CIRCUITS ARE COMBINED.
7. ALL CONDUIT DROPS FOR PLENUM RATED CABLES SHALL BE PROVIDED WITH A CONDUIT BUSHING ABOVE CEILING.
8. WHERE TERMINATED IN J-BOX, ALL SPARE CIRCUITRY SHALL BE LABELED WITH PANEL AND CIRCUIT NUMBER.
9. COORDINATE WITH MECHANICAL CONTRACTOR AND PROVIDE ALL NECESSARY AUXILIARY CONTACTS, RELAY, ETC. IN MOTOR STARTERS FOR REQUIRED CONTROL OF MECHANICAL EQUIPMENT.
10. DO NOT SUPPORT CONDUIT OFF OF CEILING GRID, CEILING GRID SUPPORTS, MECHANICAL SUPPORTS, OR ANY OTHER TRADE'S SUPPORTS. INSTALL CONDUITS AND BOXES ON SEPARATE SUPPORTS FROM BAR JOIST OR STRUCTURE.
11. COORDINATE OUTLET LOCATIONS FOR ALL KITCHEN AND BAR EQUIPMENT PRIOR TO ROUGH-IN.
12. NEW FIRE ALARM DEVICES SHOWN FOR REFERENCE ONLY. FINAL DESIGN AND PERMIT DRAWINGS TO BE PROVIDED BY FIRE ALARM MANUFACTURERS THROUGH A DELEGATED DESIGN APPROACH. ANNUNCIATING STROBES SHALL BE SYNCHRONIZED. PROVIDE ADEQUATE POWER FOR NEW PANELS TO SUPPORT ALL NEW DEVICES PROVIDING ADDITIONAL 20% CAPACITY ON NAC CIRCUIT.

ABBREVIATIONS

A	AMPS
AFF	ABOVE FINISHED FLOOR
AFG	ABOVE FINISHED GRADE
BKR	BREAKER
C	CONDUIT
CATV	CABLE TELEVISION
CUH	CABINET UNIT HEATER
CKT	CIRCUIT
Cu	COPPER
E	EXISTING
EF	EXHAUST FAN
ELEC	ELECTRICAL
EM	EMERGENCY
EMT	EMERGENCY METALLIC TUBING
FCU	FAN COIL UNIT
G	GROUND
GFI	GROUND FAULT INTERRUPTER
GRC	GALVANIZED RIGID CONDUIT
HP	HORSEPOWER
J	JUNCTION BOX
KVA	KILOVOLT AMPERE
KW	KILOWATTS
LGTG	LIGHTING
MECH	MECHANICAL
NIC	NOT IN CONTRACT
NL	NIGHT LIGHT
NTS	NOT TO SCALE
PVC	POLYVINYL CHLORIDE
P	PHASE (POLE)
TTB	TELEPHONE TERMINAL BOX
TYP	TYPICAL
UON	UNLESS OTHERWISE NOTED
UV	UNIT VENTILATOR
V	VOLTS
VAV	VARIABLE AIR VOLUME
VIF	VERIFY IN FIELD
W	WATTS
WC	WATER COOLER
WP	WEATHERPROOF
UH	UNIT HEATER
UNO	UNLESS NOTED OTHERWISE

GENERAL PROJECT NOTES

1. WORK SHALL BE DONE IN ACCORDANCE WITH LOCAL, STATE OF OHIO, 2023 NEC AND NATIONAL CODES, RECOMMENDATIONS, REGULATIONS, AND REQUIREMENTS.
2. COORDINATE ELECTRICAL REQUIREMENTS FOR NEW WORK WITH THE PLUMBING AND MECHANICAL CONTRACTORS. VERIFY VOLTAGE, PHASE AND ACCESSORY REQUIREMENTS, SUCH AS MOTOR STARTERS AND DISCONNECTS.
3. CONTRACTOR SHALL PERFORM ALL CUTTING AND PATCHING AS REQUIRED FOR HIS WORK. OPENING IN WALLS, FLOORS AND CEILINGS SHALL BE FILLED IN, PATCHED, PAINTED AND FINISHED IN A MANNER TO MATCH THE QUALITY OF THE EXISTING, LIKE ADJACENT SURFACES.
4. NEW OPENINGS IN EXISTING WALLS AND FLOORS SHALL BE CORE DRILLED OR SAW CUT. OPENINGS IN NEW WALLS AND FLOORS SHALL BE PLANNED AND COORDINATED WITH GENERAL CONTRACTOR FOR THE INSTALLATION OF APPROPRIATE SLEEVES.
5. ALL CONDUIT SHALL BE 3/4" MINIMUM U.N.O. MC CABLE IS ALLOWED.
6. CONDUIT SHALL BE CONCEALED IN CEILING OR WALLS WHEREVER POSSIBLE.
7. ALL BRANCH CIRCUITS AND FEEDERS SHALL CONTAIN A GREEN INSULATED GROUND CONDUCTOR. GROUNDING BY MEANS OF RACEWAY IS NOT PERMITTED.
8. REFER TO MECHANICAL, PLUMBING, AND ARCHITECTURAL PLANS FOR EXACT LOCATION OF EQUIPMENT.
9. CONTRACTOR SHALL COORDINATE EXACT HEIGHT OF DEVICES DESIGNED AS OVER COUNTER WITH CASE WORK AND FURNITURE DRAWINGS.
10. VERIFY CEILING TYPES PER THE ARCHITECTURAL REFLECTED CEILING PLAN. PROVIDE APPROPRIATE TYPE FIXTURE, LAY-IN FOR GRID, FLANGE FOR DRYWALL, ETC.
11. VERIFY AND COORDINATE MOUNTING HEIGHTS AND LOCATIONS OF ALL DEVICES MOUNTED IN CASEWORK OR ABOVE COUNTERS WITH SPECIFIC EQUIPMENT FURNISHED.
12. NO MORE THAN 3 PHASE CONDUCTORS SHALL BE INSTALLED IN ANY ONE CIRCUIT, UNLESS NOTED OTHERWISE. EACH BRANCH CIRCUIT SHALL CONTAIN THEIR OWN NEUTRAL CONDUCTOR. NO SHARED NEUTRALS.
13. CONTRACTOR SHALL PROVIDE ALL FIRESTOPPING FOR CONDUIT OR CABLE TRAY PENETRATIONS THAT PENETRATE ACOUSTICAL RATED OR SMOKE AND FIRE RATED ASSEMBLIES. SEE ARCHITECTURAL DRAWINGS FOR LOCATIONS OF ALL RATED ASSEMBLIES. ALL RATED PENETRATIONS SHALL BE FIRESTOPPED TO ORIGINAL ASSEMBLY RATING. ALL NON-RATED FLOOR PENETRATIONS SHALL BE SEALED WATER TIGHT WITH A FLEXIBLE SEALANT.
14. PROVIDE ALL PULL BOXES, IN ACCESSIBLE AREA, THAT EXCEED NEC NUMBER OF BENDS OR LENGTH IN FEEDER AND BRANCH CIRCUITS. INSTALL BOXES WHERE REQUIRED PER CODE.
15. ALL WIRING DEVICES SHALL BE OF HEAVY DUTY COMMERCIAL GRADE CONSTRUCTION. REFER TO ARCHITECTURAL SHEETS AND CODE SHEET FOR ALL FIRE-RATED PARTITION LOCATIONS AND RATINGS. COORDINATE COLORS WITH ARCHITECT.
16. CONTRACTOR IS RESPONSIBLE FOR ALL CORE-DRILLS REQUIRED FOR INSTALLATION OF ELECTRICAL WORK.
17. ROUTING OF CIRCUITRY INSTALLED IN CASEWORK, CABINETRIES, ETC. SHALL BE COORDINATED FOR PROPER CONCEALMENT AND FUNCTION OF CASEWORK, CABINETRIES, ETC.
18. VERIFY THE LOCATION OF ALL UTILITIES PRIOR TO EXCAVATION, TRENCHING, OR DRILLING.
19. ALL ROOF PENETRATIONS OR PATCHES SHALL BE MADE PER ROOFING MANUFACTURER WARRANTY REQUIREMENTS.
20. ALL EXPOSED METAL CONDUITS ARE TO BE PAINTED TO MATCH THE ADJACENT SURFACE. COORDINATION OF PAINTING OF CONDUIT IS TO BE BY THE ELECTRICAL CONTRACTOR, WITH PAINTING BY OTHERS.
21. ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ALL REQUIRED JUNCTION BOXES, PULL BOXES. ETC FOR A COMPLETE INSTALLATION PER THE N.E.C. AND LOCAL CODES. ALL CONDUCTORS SHALL BE RATED FOR 90 DEGREE CELSIUS.
22. COORDINATE WORK WITH OTHER TRADES. COORDINATION OR SCHEDULING SHALL BE RESPONSIBILITY OF THE INVOLVED CONTRACTORS.
23. ALL LOW VOLTAGE CABLING INSTALLED IN SPACES WITHOUT A LAY-IN OR WITH A HARD CEILING SHALL BE INSTALLED IN CONDUIT AND BOXES.
24. ALL LOADS CALCULATED AND SHARED ON THESE PLANS ARE INTENDED FOR ENGINEERING USE ONLY AND NOT INTENDED TO BE USED BY ANYONE ELSE FOR ANY REASON. ANY USE OF THESE CALCULATIONS BY ANYONE OTHER THAN L2 ENGINEERING IS DONE AT THEIR OWN RISK.
25. FINAL COORDINATION WITH EQUIPMENT IS THE RESPONSIBILTY OF THE E.C. COORDINATION SHOWN ON PLANS IS FOR THE BASIS OF DESIGN. ANY CHANGES TO EQUIPMENT FOR ANY REASON MUST BE COORDINATED BY THE E.C. PRIOR TO ROUGH IN OR PURCHASING OF ELECTRICAL EQUIPMENT.

ELECTRICAL LEGEND

LIGHTING

A1	LIGHTING FIXTURE. REFER TO FIXTURE SCHEDULE. LETTER INDICATES TYPE.
A1 NL	EMERGENCY LIGHTING FIXTURE WITH EMERGENCY BATTERY BACKUP. "NL" INDICATES NIGHT LIGHT CIRCUIT. REFER TO FIXTURE SCHEDULE FOR BATTERY REQUIREMENTS.
C1	LIGHTING FIXTURE. LETTER INDICATES TYPE.
C1	EMERGENCY LIGHTING FIXTURE WITH EMERGENCY BATTERY BACKUP.
X1	CEILING MOUNTED EXIT SIGN. REFER TO FIXTURE SCHEDULE. SHADED AREA DENOTES FACE(S) OF UNIT. CONNECT TO LOCAL UNSWITCHED LIGHTING CIRCUIT.
X1	WALL MOUNTED EXIT SIGN. REFER TO FIXTURE SCHEDULE. SHADED AREA DENOTES FACE(S) OF UNIT. CONNECT TO LOCAL UNSWITCHED LIGHTING CIRCUIT.
EM	EMERGENCY EGRESS LIGHT. REFER TO FIXTURE SCHEDULE.
D	CEILING MOUNTED DAYLIGHT SENSOR.
OC	CEILING MOUNTED OCCUPANCY SENSOR.
$	SINGLE POLE WALL SWITCH. 120/277 VOLT, 20 AMP. 44" AFF.
3 $	THREE WAY WALL SWITCH. 120/277V, 20 AMP. 44" AFF
4 $	FOUR WAY WALL SWITCH. 120/277V, 20 AMP. 44" AFF
OC $	OCCUPANCY SENSOR WALL SWITCH. 120/277V, 20 AMP. 44" AFF
DOC $	OCCUPANCY SENSOR WALL SWITCH WITH 0-10V DIMMING. 120/277V, 20 AMP. 44" AFF
P $	SINGLE POLE WALL SWITCH WITH PILOT LIGHT. 120/277V, 20 AMP. 44" AFF
⌑	EXTERIOR LIGHT FIXTURE. ER, EXISTING TO REMAIN, PL1 - NEW FIXTURE. REFER TO FIXTURE SCHEDULE.
PC	PHOTOCELL

POWER

	DUPLEX RECEPTACLE. 120 VOLT, 20 AMP. 18" AFF UNO.
U	DUPLEX RECEPTACLE WITH USB PLUG. 120 VOLT, 20 AMP. 18" AFF UNO.
	DUPLEX RECEPTACLE MOUNTED AT 44" OR ABOVE BACKSPLASH. 120 VOLT, 20 AMP.
	DOUBLE DUPLEX RECEPTACLE. 120 VOLT, 20 AMP. 18" AFF UNO.
	120 VOLT DOUBLE DUPLEX, 20 AMP RECEPTACLE MOUNTED AT 46" AFF OR 4" ABOVE BACKSPLASH.
GF/WP	DUPLEX RECEPTACLE WITH GROUND FAULT PROTECTION. 120 VOLT, 20 AMP. 18" AFF UNO, WP-WEATHERPROOF BOX
	FLUSH FLOOR DUPLEX, DATA, AND AV RECEPTACLE IN FLOOR BOX
	120 VOLT SINGLE 20 AMP RECEPTACLE.
C	DUPLEX RECEPTACLE. CEILING MOUNTED
	SPECIAL PURPOSE RECEPTACE. REFER TO FLOOR PLANS FOR NEMA CONFIGURATION.
$m	FRACTIONAL HP MOTOR STARTER WITH THERMAL OVERLOADS.
	ELECTRICAL MOTOR.
XXX-1	HOMERUN TO PANELBOARD. NOTION INDICATES PANEL AND CIRCUIT NUMBER. (ALL CONDUCTORS SHALL BE #10 UNLESS NOTED OTHERWISE.)
	ELECTRICAL PANELBOARD.
J	JUNCTION BOX.
	CONDUIT STUB-OUT AND CAP BELOW GRADE. MARK STUB-OUT AT GRADE LEVEL.
UE	UNDERGROUND HIGH VOLTAGE OR SECONDARY SERVICE FEED.
4X	SAFETY DISCONNECT SWITCH (NON-FUSED). 4X INDICATES ENCLOSURE TYPE.
	SAFETY DISCONNECT SWITCH (FUSED).
	COMBINATON MOTOR STARTER/DISCONNECT. WITH HOA SWITCH AT UNIT (FUSIBLE). OR (CIRCUIT BREAKER FOR ELEVATOR).
T1	TRANSFORMER (NUMBER INDICATES WHICH TRANSFORMER).
HD	HAND DRYER, VERIFY MOUNTING WITH SUPPLIER

GENERAL

2 / E4.1	DETAIL # ____ DETAIL REFERENCE TAG, DRAWING # REFER TO DETAIL SHEETS
XX	KEYNOTE FOR DRAWING
2 / E4.1	DETAIL REFERENCE TAG (SECTION)
EF-1	MECHANICAL EQUIPMENT TAG. REFER TO EQUIPMENT DATA SCHEDULE.
	INDICATES NEW WORK.
	INDICATES TO BE REMOVED.
	INDICATES EXISTING TO REMAIN.

FIRE ALARM

F	FIRE ALARM PULL STATION, 44" AFF MOUNTING HEIGHT
F	FIRE ALARM HORN/STROBE. 80" AFF MOUNTING HEIGHT
D R	FIRE ALARM DUCT MOUNTED SMOKE DETECTOR. S = SUPPLY, R = RETURN - COORDINATE WITH DUCTWORK. MAKE SAMPLING TUBE FULL WIDTH OF DUCT IN LENGTH. PROVIDE SMOKE DETECTOR FOR DAMPER OPERATION AND 120 VOLT POWER CONNECTION AS SHOWN ON THE POWER DRAWINGS. COORDINATE ALL CONNECTIONS WITH MECHANICAL CONTRACTOR. CONNECT TO ALARM SYSTEM.
S	FIRE ALARM CEILING MOUNTED SMOKE DETECTOR.
FAAP	FIRE ALARM ANNUNCIATOR PANEL.
FACP	FIRE ALARM CONTROL PANEL.
F	FIRE ALARM STROBE. 80" AFF MOUNTING HEIGHT.
BL WP	BLUE EXTERIOR STROBE LIGHT FOR FIRE DEPARTMENT CONNECTION WP - WEATHERPROOF
FS	SPRINKLER SYSTEM FLOW SWITCH FURNISHED AND INSTALLED BY THE FIRE PROTECTION CONTRACTOR, CONNECTED BY ELECTRICAL CONTRACTOR.
TS	SPRINKLER SYSTEM GATE VALVE. SUPERVISORY SWITCH FURNISHED AND INSTALLED BY THE FIRE PROTECTION CONTRACTOR, CONNECTED BY ELECTRICAL CONTRACTOR.
F WP	FIRE ALARM STROBE. 80" AFF MOUNTING HEIGHT.
	MAGNETIC DOOR HOLD OPEN.
RPS	FIRE ALARM REMOTE POWER SUPPLY.
Z	FIRE ALARM MONITOR MODULE.
R	FIRE ALARM CONTROL RELAY MODULE.
E.O.L.R.	END OF THE LINE RESISTOR.
KB	FIRE ALARM CONTROL RELAY MODULE.
CO	CARBON MONOXIDE DETECTOR

DATA & COMMUNICATION

2	DATA /COMMUNICATION OUTLET. TWO PORTS REFER TO DETAIL FOR MOUNTING REQUIREMENTS.
W	WALL PHONE. 54" AFF.
	DATA OUTLET. 18" AFF.
4	DATA/COMMUNTICATION. FOUR PORT DATA, 18" AFF.
6	DATA/COMMUNTICATION. FOUR PORT DATA, 18" AFF.
WAP	WIRELESS ACCESS CONNECTION POINT WITH CEILING MOUNTED CISCO WIRELESS DEVICE.

ELECTRICAL INDEX OF DRAWINGS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

REGISTERED PROFESSIONAL ENGINEER
STATE OF OHIO
JEFFREY L. WETZEL
PE - 76872

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
ELECTRICAL LEGEND AND GENERAL NOTES

SHEET NO.
E0.1

1/16/2026 11:16:18 AM

EQUIPMENT ELECTRICAL DATA SCHEDULE

PLAN SYMBOL	DESCRIPTION/LOCATION	LOAD CHARACTERISTICS						STARTER						DISCONNECT					CTRL DEVICE			PANEL	CIRCUIT	FEEDER SIZE/ RACEWAY	NOTES	PLAN SYMBOL
		KW	HP	VOLTAGE	PHASE	FLA	SPEED DRIVE	TYPE	NEMA SIZE	FURNISH BY	INSTALL BY	AUXIL. RELAY	LOCATION	TYPE	FURNISH BY	INSTALL BY	SWITCH/ FUSE SIZE	LOCATION	TYPE	FURNISH BY	INSTALL BY					
CU-1	CONDENSING UNIT	-	-	208	1	14.08	-	-	-	-	-	-	-	-	-	-	30A	-	-	-	-	B	7,9	(2) #10 (1) #10 GDN IN .75"C	-	CU-1
CU-2	CONDENSING UNIT	-	-	208	1	23.28	-	-	-	-	-	-	-	-	-	-	40A	-	-	-	-	B	8,10	(2) #8 (1) #10 GDN IN 1"C	-	CU-2
CU-3	CONDENSING UNIT	-	-	208	1	24.88	-	-	-	-	-	-	-	-	-	-	50A	-	-	-	-	B	1,3	(2) #8 (1) #10 GDN IN 1"C	-	CU-3
CU-4	CONDENSING UNIT	-	-	208	1	24.88	-	-	-	-	-	-	-	-	-	-	50A	-	-	-	-	B	2,4	(2) #8 (1) #10 GDN IN 1"C	-	CU-4
FUR-1	FURNACE	-	-	120	1	13.52	-	-	-	-	-	-	-	-	-	-	15A	-	-	-	-	B	11	(2) #12 (1) #12 GRD IN .75"C	-	FUR-1
FUR-2	FURNACE	-	-	120	1	13.36	-	-	-	-	-	-	-	-	-	-	15A	-	-	-	-	B	12	(2) #12 (1) #12 GRD IN .75"C	-	FUR-2
FUR-3	FURNACE	-	-	120	1	13.36	-	-	-	-	-	-	-	-	-	-	15A	-	-	-	-	B	13	(2) #12 (1) #12 GRD IN .75"C	-	FUR-3
FUR-4	FURNACE	-	-	120	1	13.36	-	-	-	-	-	-	-	-	-	-	15A	-	-	-	-	B	14	(2) #12 (1) #12 GRD IN .75"C	-	FUR-4
EF-1	EXHAUST FAN	-	.01	120	1	-	-	-	-	-	-	-	-	-	-	-	20A	-	-	-	-	A	37	(2) #12 (1) #12 GRD IN .75"C	-	EF-1
EF-2	EXHAUST FAN	-	.01	120	1	-	-	-	-	-	-	-	-	-	-	-	20A	-	-	-	-	A	37	(2) #12 (1) #12 GRD IN .75"C	-	EF-2
EF-3	EXHAUST FAN	-	.01	120	1	-	-	-	-	-	-	-	-	-	-	-	20A	-	-	-	-	A	37	(2) #12 (1) #12 GRD IN .75"C	-	EF-3
EF-4	EXHAUST FAN	-	.01	120	1	-	-	-	-	-	-	-	-	-	-	-	20A	-	-	-	-	A	37	(2) #12 (1) #12 GRD IN .75"C	-	EF-4
EF-5	EXHAUST FAN	-	.01	120	1	-	-	-	-	-	-	-	-	-	-	-	20A	-	-	-	-	A	37	(2) #12 (1) #12 GRD IN .75"C	-	EF-5
EF-6	EXHAUST FAN	-	.01	120	1	-	-	-	-	-	-	-	-	-	-	-	20A	-	-	-	-	A	37	(2) #12 (1) #12 GRD IN .75"C	-	EF-6

ABBREVIATIONS:

CC - CONTROL CONTRACTOR
CP - CORD/PLUG
EC - ELECTRICAL CONTRACTOR
ES - EQUIPMENT SUPPLIER
FS - FUSED SWITCH
FSC - FIRE SUPPRESSION CONTRACTOR
FSEC - FOOD SERVICE EQUIP. CONTRACTOR
FVNR - FULL VOLTAGE NON-REVERSING
GC - GENERAL CONTRACTOR
HC - HEATING CONTRACTOR
PC - PLUMBING CONTRACTOR
SC - SPRINKLER CONTRACTOR
VC - VENTILATION CONTRACTOR
TS - THERMOSTAT
NFS - NON FUSED SWITCH
SW - HORSEPOWER RATED SWITCH

NOTES:

1 - XXX

LIGHTING FIXTURE SCHEDULE

FIXTURE SYMBOL	FIXTURE VOLTAGE	FIXTURE INPUT WATTS	TEMPERATURE (K)	DELIVERED LUMENS	MANUFACTURER AND MODEL NUMBER	OTHER ACCEPTABLE MANUFACTURER	DIFFUSER MEDIA	CLASSIFICATION	TRIM COLOR						MOUNTING	SIZE (IN.)			NOTES
								EM - EMERGENCY N - NORMAL HAZ - HAZARDOUS HB - HIGH BAY LB - LOW BAY HM - HIGH MAST	WHITE	NICKEL	CHROME	BRUSHED NICKEL	STANDARD	SEE NOTE	S - SURFACE R - RECESSED SM - STEM MTD. WM - WALL MTD. C - CHAIN MTD. UC - UNDER CAB. CS - CEIL. SURF.	DIAMETER OR WIDTH	LENGTH	DEPTH	
A1	UNV	24	3500	3061	ILP #DNT4-30L-U-935	AS PRE-APPROVED	ACRYLIC	N	X						S	2.8	49.3	2.5	-
B1	UNV	30	3500	3684	ILP #VPAN22-33L-U-35	AS PRE-APPROVED	FROSTED ACRYLIC	N	X						R	24.1	24.1	5.2	-
B2	UNV	28	3500	3578	ILP #VPAN24-33L-U-35	AS PRE-APPROVED	FROSTED ACRYLIC	N	X						R	24.1	48.1	5.2	-
C1	UNV	17	3500	2030	GREENCREATIVE #SLFT-6-9-CCT5S-DUALDIM	AS PRE-APPROVED	POLYCARBONATE	N	X						R	6	DIA	4.12	-
-	-	-	-	-	-	AS PRE-APPROVED	-	-	X	X	X	X	X	X	-	-	-	-	-
-	-	-	-	-	-	AS PRE-APPROVED	-	-	X	X	X	X	X	X	-	-	-	-	-
X1	-	-	-	-	COMPASS #CCR	AS PRE-APPROVED	EMERGENCY EGRESS	EM	X						UNIVERSAL	19.25	8.125	1.75	-
ER	-	-	-	-	COMPASS #CORS	AS PRE-APPROVED	EMERGENCY EGRESS	EM	X						WM-8'-0"	4,5	DIA	6.7	-
	-	-	-	-	COMPASS #CU2	AS PRE-APPROVED	EMERGENCY EGRESS	EM	X						WM-8'-0"	4	9	2.75	-

NOTES:

1. BLACK/ GOLD.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
JEFFREY L. WETZEL
PE - 75872
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
ELECTRICAL EQUIPMENT AND LIGHTING SCHEDULE

SHEET NO.
E0.2

1/16/2026 11:16:19 AM

ELECTRICAL SPECIFICATIONS

GENERAL PROVISIONS

A. REFERENCE

1. THE GENERAL CONDITIONS AND OTHER CONTRACT DRAWINGS AS SET FORTH IN THE FOREGOING PAGES ARE HEREBY INCORPORATED INTO AND BECOME A PART OF THE SPECIFICATIONS FOR WORK UNDER THIS PROJECT, INSOFAR AS THEY APPLY HERETO.

2. ALL SPECIFICATIONS UNDER THIS DIVISION TITLE ARE DIRECTED TO AND ARE THE RESPONSIBILITY OF THE ELECTRICAL CONTRACTOR. UNLESS OTHER TRADES OR PERSONS ARE SPECIFICALLY MENTIONED, "ELECTRICAL CONTRACTOR" IS INFERRED AND INTENDED.

B. CONTRACT DRAWINGS

1. THE DRAWINGS ACCOMPANYING THESE SPECIFICATIONS ARE COMPLEMENTARY EACH TO THE OTHER AND WHAT IS CALLED FOR BY ONE SHALL BE AS IF CALLED FOR BY BOTH.

2. CONSULT ALL CONTRACT DRAWINGS WHICH MAY AFFECT THE LOCATION OF EQUIPMENT, CONDUIT AND WIRING AND MAKE MINOR ADJUSTMENTS IN LOCATION TO SECURE COORDINATION.

3. WIRING LAYOUT IS SCHEMATIC AND EXACT LOCATIONS SHALL BE DETERMINED BY FIELD CONDITIONS.

4. OTHER THAN MINOR ADJUSTMENTS SHALL BE SUBMITTED TO THE OWNER'S REPRESENTATIVE FOR APPROVAL BEFORE PROCEEDING WITH THE WORK.

C. JOB-SITE COPY OF DOCUMENTS

1. MAINTAIN AT THE SITE, ONE COPY OF ALL DRAWINGS, SPECIFICATIONS, ADDENDA APPROVED SHOP DRAWINGS, CHANGE ORDERS AND OTHER MODIFICATIONS, IN GOOD ORDER AND MARKED TO RECORD ALL CHANGES MADE DURING CONSTRUCTION. THESE SHALL BE AVAILABLE TO THE OWNER'S REPRESENTATIVE. THE DRAWINGS MARKED TO RECORD ALL CHANGES MADE DURING CONSTRUCTION SHALL BE DELIVERED TO THE OWNER'S REPRESENTATIVE FOR THE OWNER UPON COMPLETION OF THE WORK. AN ADDITIONAL SET OF DRAWINGS WILL BE FURNISHED BY THE OWNER'S REPRESENTATIVE FOR THIS PURPOSE UPON REQUEST.

D. MANUFACTURER'S DRAWINGS

1. THE CONTRACTOR SHALL SUBMIT TO THE ARCHITECT FOR REVIEW, (4) COPIES OF MANUFACTURER'S DRAWINGS AND WIRING DIAGRAMS (OR ELECTRONIC SUBMITTALS IN PDF FORMAT). THE ENGINEER WILL REVIEW CONTRACTOR'S SHOP DRAWINGS AND RELATED SUBMITTALS (AS INDICATED BELOW) WITH RESPECT TO THE ABILITY OF THE DETAILED WORK, WHEN COMPLETE, TO BE A PROPERLY FUNCTIONING INTEGRAL ELEMENT OF THE OVERALL SYSTEM DESIGNED BY THE ENGINEER. BEFORE SUBMITTING A SHOP DRAWING OR ANY RELATED MATERIAL TO THE ENGINEER, CONTRACTOR SHALL: REVIEW EACH SUCH SUBMISSION FOR CONFORMANCE WITH THE MEANS, METHODS, TECHNIQUES, SEQUENCES, AND OPERATIONS OF CONSTRUCTION. AND SAFETY PRECAUTIONS AND PROGRAMS INCIDENTAL THERETO, ALL OF WHICH ARE THE SOLE RESPONSIBILITY OF CONTRACTOR; APPROVE EACH SUCH SUBMISSION BEFORE SUBMITTING IT; AND SO STAMP EACH SUCH SUBMISSION BEFORE SUBMITTING IT. THE ENGINEER SHALL ASSUME THAT NO SHOP DRAWING OR RELATED SUBMITTAL COMPRISES A VARIATION UNLESS CONTRACTOR ADVISES ENGINEER OTHERWISE VIA A WRITTEN INSTRUMENT WHICH IS ACKNOWLEDGED BY ENGINEER IN WRITING. THE ITEMS, TYPES OF SUBMITTALS AND RELATED MATERIAL (IF ANY) CALLED FOR ARE INDICATED BELOW:

ITEMS SHOP DRAWINGS TYPE SUBMITTALS REQUIRED

LIGHTING FIXTURES
WIRING DEVICES
LIGHTING CONTROLS

E. GUARANTEES

1. THE ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR ALL DEFECTS, REPAIRS AND REPLACEMENTS IN MATERIALS AND WORKMANSHIP FOR A PERIOD OF ONE (1) YEAR AFTER DATE OF SUBSTANTIAL COMPLETION AS DETERMINED BY THE OWNER'S REPRESENTATIVE. PRODUCT GUARANTEES GREATER THAN ONE (1) YEAR SHALL BE PASSED ALONG TO THE OWNER FOR FULL BENEFIT OF THE MANUFACTURER'S WARRANTY.

WORK INCLUDED

A. INSTALLATION, MATERIALS, AND WORKMANSHIP

6. FURNISH AND INSTALL ALL NECESSARY ANCHORS, SUPPORTS, STRAPS, BOXES, FITTINGS AND OTHER SIMILAR APPURTENANCES NOT INDICATED ON THE DRAWINGS BUT WHICH ARE REQUIRED FOR A COMPLETE AND PROPERLY INSTALLED SYSTEM CONSISTENT WITH THE ARCHITECTURAL TREATMENT OF THE BUILDING.

7. THE ELECTRICAL CONTRACTOR, INSOFAR AS THE WORK IS CONCERNED, SHALL AT ALL TIMES KEEP THE PREMISES IN A NEAT AND ORDERLY CONDITION, AND AT THE COMPLETION OF THE WORK, SHALL PROPERLY CLEAN UP AND CART AWAY DEBRIS AND EXCESS MATERIALS. ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR THE COST OF DUMPSTER & REFUSE DISPOSAL AS REQUIRED FOR ELECTRICAL WORK.

8. ALL MATERIALS SHALL BE NEW AND UNDETERIORATED AND OF A QUALITY NOT LESS THAN THE MINIMUM SPECIFIED.

B. COORDINATION OF PLANS AND SPECIFICATIONS

1. CONTACT THE OWNER'S REPRESENTATIVE IMMEDIATELY IF THERE IS ANY QUESTIONS REGARDING THE MEANING OR INTENT OF EITHER PLANS OR SPECIFICATIONS, OR UPON NOTICING ANY DISCREPANCIES OR OMISSIONS IN EITHER PLANS OR SPECIFICATIONS.

C. CUTTING AND PATCHING

1. PATCHING SHALL MATCH EXISTING SURFACES IN KIND AND FINISH AND SHALL BE DONE BY THE GENERAL CONTRACTOR AT THE ELECTRICAL CONTRACTOR'S EXPENSE.

2. REPAIR OF DAMAGES, BY THE ELECTRICAL CONTRACTOR, TO NEWLY PATCHED AND REFINISHED AREAS SHALL BE DONE BY THE GENERAL CONTRACTOR AT THE ELECTRICAL CONTRACTOR'S EXPENSE, TO MATCH EXISTING CONDITION.

3. WHERE REQUIRED TO MAINTAIN FIRE RATING, OPENINGS SHALL BE SEALED UTILIZING 3M BRAND FIRE BARRIER PENETRATION SEALING SYSTEMS. FIRE BARRIER OR FIRE STOP SYSTEMS FROM CROUSE-HINDS, THOMAS & BETTS OR DOW CORNING MAY BE USED AT CONTRACTOR'S OPTION. THIS INCLUDES HOLES LEFT DUE TO REMOVAL OF EXISTING CONDUITS, BUS DUCT, ETC. OPENINGS SHALL BE TEMPORARILY FIRE STOPPED UNTIL PERMANENT FIRE STOPPING IS DONE.

D. CLEANING AND PAINTING

1. ALL ELECTRICAL EQUIPMENT SHALL BE KEPT DRY AND CLEAN DURING THE CONSTRUCTION PERIOD. INTERIOR OF ALL ENCLOSURES SHALL BE CLEANED OF DIRT AND DEBRIS BEFORE INSTALLING TRIM OR COVERS.

2. ALL FINISHED SURFACES OF EQUIPMENT FURNISHED UNDER THIS CONTRACT SHALL BE THOROUGHLY CLEANED OF DIRT AND ALL SCRATCHED OR DAMAGED SURFACES SHALL BE TOUCHED UP WITH MATCHING MATERIALS BEFORE FINAL ACCEPTANCE OF THE WORK.

3. WHEN ALL WORK IS COMPLETED AND ALL WORK HAS BEEN SATISFACTORILY TESTED AND ACCEPTED BY THE OWNER'S REPRESENTATIVE, ALL CONDUIT AND OTHER EXPOSED SURFACES SHALL BE THOROUGHLY CLEANED.

CODES AND FEES

A. CODES:

1. ALL WORK PERFORMED UNDER THIS SPECIFICATION SHALL BE DONE IN ACCORDANCE WITH THE LATEST EDITION OF THE NATIONAL ELECTRICAL CODE AS PREPARED AND PUBLISHED BY THE NATIONAL FIRE PROTECTION ASSOCIATION AND ANY APPLICABLE STATE OR LOCAL CODES.

B. FEES:

1. OBTAIN AND PAY FOR ANY AND ALL PERMITS REQUIRED BY ALL LAWS AND REGULATIONS AND PUBLIC AUTHORITY HAVING SUCH JURISDICTION.

TESTS AND SPECIFICAITONS

A. OBTAIN ALL INSPECTIONS REQUIRED BY ALL LAWS, ORDINANCES, RULES, REGULATIONS OR PUBLIC AUTHORITY HAVING JURISDICTION AND OBTAIN CERTIFICATES OF SUCH INSPECTIONS AND SUBMIT SAME TO THE OWNER'S REPRESENTATIVE. PAY ALL FEES, CHARGES AND OTHER EXPENSES IN CONNECTION THEREIN. OBTAIN OCCUPANCY PERMIT AS REQUIRED BY OWNER. FINAL PAYMENT SHALL NOT BE MADE UNTIL OCCUPANCY PERMIT IS OBTAINED.

B. WORK SHALL BE UNACCEPTABLE WHEN FOUND TO BE DEFECTIVE OR CONTRARY TO THE PLANS SPECIFICATIONS, CODES SPECIFIED OR ACCEPTED STANDARDS OF GOOD WORKMANSHIP.

C. THE CONTRACTOR SHALL PROMPTLY CORRECT ALL WORK FOUND UNACCEPTABLE BY THE OWNER'S REPRESENTATIVE WHETHER OBSERVED BEFORE OR AFTER SUBSTANTIAL COMPLETION AND WHETHER OR NOT FABRICATED, INSTALLED OR COMPLETED. THE CONTRACTOR SHALL BEAR ALL COSTS OF CORRECTING SUCH UNACCEPTABLE WORK, INCLUDING COMPENSATION FOR THE OWNERS REPRESENTATIVE ADDITIONAL SERVICES MADE NECESSARY THEREBY.

D. THE ELECTRICAL CONTRACTOR SHALL TEST AND OBTAIN ACCEPTANCE FOR THE FOLLOWING SYSTEMS:

1. EMERGENCY LIGHTING.
2. RECEPTACLE AND EQUIPMENT POWER.
3. LIGHTING.
4. LIGHTING CONTROLS

CONDUIT

A. FURNISH AND INSTALL ALL CONDUITS, BOXES, FITTINGS, ETC., FOR A COMPLETE RACEWAY SYSTEM.

B. ALL WIRING SHALL BE RUN IN EMT CONDUIT OR MC CABLE UNLESS OTHERWISE NOTED.

C. ALL CONDUIT SIZES STATED HEREIN OR MARKED ON THE DRAWINGS ARE MINIMUM SIZE AND SHALL BE NO LESS THAN 1/2" UNLESS OTHERWISE NOTED.

D. ALL CONDUIT SHALL BE SUBSTANTIALLY SUPPORTED BY PIPE STRAPS OR SUITABLE CLAMPS OR HANGERS ATTACHED TO THE ELEMENTS OF THE BUILDING STRUCTURE TO PROVIDE RIGID INSTALLATION; IN NO CASE SHALL CONDUIT BE ATTACHED OR SUPPORTED FROM ADJOINING PIPE OR INSTALLED IN SUCH A MANNER AS TO PREVENT THE READY REMOVAL OF OTHER PIPE FOR REPAIRS. "MINERALAC" TYPE SUPPORTS AND "UNISTRUT" TYPE ONE BOLT SUPPORTS WITH SQUARE ENDS SHALL NOT BE USED AT ANY LOCATION.

WIRE AND CABLE

A. ALL CONDUCTORS SHALL BE STRANDED AND OF THE AWG SIZE AND TYPE SHOWN ON THE DRAWINGS. WHERE NO SIZE OR TYPE IS SHOWN, CONDUCTORS SHALL NOT BE LESS THAN #12 TYPE XHHW, THHN, OR THWN. ALL CONDUCTORS SHALL BE COPPER AND HAVE 600 VOLT INSULATION; BE UL LABELED AND OF AMERICAN MANUFACTURER.

B. ALL CONNECTIONS ARE TO BE MADE USING PRESSURE TYPE TERMINALS.

C. THE FOLLOWING COLOR CODE SHALL BE USED:

	208 VOLT
PHASE A	BLACK
PHASE B	RED
PHASE C	BLUE
NEUTRAL	WHITE
EQUIPMENT GROUND	GREEN

D. CONDUCTORS NO. 10 AWG OR SMALLER SHALL HAVE INSULATION COLORED AS NOTED ABOVE.

E. CONDUCTORS NO.8 AWG OR LARGER SHALL HAVE INSULATION COLORED AS NOTED ABOVE OR COLORED TAPE, MINIMUM SIZE 1/2", WRAPPED TWICE AROUND AT THE FOLLOWING POINTS:

1. AT EACH TERMINAL.
2. AT EACH CONDUIT ENTRANCE.
3. AT INTERVALS NOT MORE THAN 12 INCHES APART.
4. IN ALL BOXES, PANEL TUBS, SWITCHBOARDS, ETC.

F. ALL BRANCH CIRCUITS SHALL BE MARKED IN THE PANELBOARD GUTTERS. MARKERS SHALL INDICATE CORRESPONDING BRANCH-CIRCUIT NUMBERS.

G. EACH BRANCH CIRCUIT REQUIRING A NEUTRAL SHALL BE FURNISHED WITH A SEPARATE INDIVIDUAL NEUTRAL CONDUCTOR.

BOXES AND PLATES

A. FURNISH AND INSTALL ALL OUTLET, JUNCTION, AND PULLBOXES AS INDICATED ON THE DRAWINGS AND AS NECESSARY TO INSTALL THE REQUIRED CONDUIT AND WIRING IN A NEAT AND WORKMANLIKE MANNER.

B. PULLBOXES AND JUNCTION BOXES SHALL BE GALVANIZED AND OF THE CORRECT SIZE AND SIZE AND GAUGE, IN ACCORDANCE WITH CODE REQUIREMENTS AND SHALL BE UL LABELED.

C. FLUSH OUTLET, JUNCTION AND PULLBOXES SHALL BE PRESSED STEEL GALVANIZED OR SHERARDIZED AND SHALL BE A MINIMUM OF 4" SQUARE OR OCTAGONAL SIMILAR TO APPLETON #40.

D. SWITCH PLATES ON FLUSH AND CAST BOXES SHALL BE SIERRA NOS. P-1, P-2, P-3 ETC., AS REQUIRED, AND SHALL BE MADE OF BLACK PLASTIC.

E. DUPLEX RECEPTACLE PLATES ON FLUSH AND CAST BOXES SHALL BE SIERRA NO. P-8 BLACK PLASTIC.

F. ALL BOXES SHALL BE RIGIDLY SUPPORTED FROM BUILDING STRUCTURE INDEPENDENT OF THE CONDUIT SYSTEM. BOXES CAST INTO MASONRY OR CONCRETE ARE CONSIDERED TO BE RIGIDLY SUPPORTED.

SWITCHES

A.	120V-20A	LEGRAND #CS20AAC1BK, HUBBELL #CS120BK, EATON #CS120BK
	120V-20A 3-WAY	LEGRAND #CS20AAC3BK, HUBBELL #CS320BK, EATON #CS320BK
	120V-20A 4-WAY	LEGRAND #CS20AAC4BK, HUBBELL #CS420BK, EATON #CS420BK
	120V-20A OC	LEGRAND #DSW-301-BK, HUBBELL #AD2000BK22, EATON #OSD10A-BK
	120V-20A DOC	LEGRAND #DW-311-BK, HUBBELL #ADD2000BK1, EATON #OS10D7-BK
	120V-20A PILOT	LEGRAND #692WG, HUBBELL #HBL1221PL, EATON #AH1221PL

RECEPTACLES

A.	120V-20A	LEGRAND #CR20BK, HUBBELL #CR20BK, EATON #CR20BK
	120V-20A TR	LEGRAND #TR20BK, HUBBELL #CR20BKTR, EATON #TRCR20BK
	120V-20A GF	LEGRAND #2097TRABK, HUBBELL #GFRTR20BK, EATON #SGF20BK
	120V-20A USB	LEGRAND #TR20USBAC6BK, HUBBELL #USB20ACPDBK, EATON #TRUSBPDAC20BK
	120V-20A WP/GF	LEGRAND #2097TRWRBK, HUBBELL #GFRTW20BK, EATON #TWRSGF20BK

WIRING DEVICES

A. WIRING DEVICES SHALL BE FURNISHED IN STRICT ACCORDANCE WITH THE CATALOG NUMBERS AND MANUFACTURERS LISTED IN THE SCHEDULE WHICH FOLLOWS. OTHER SPECIAL PURPOSE DEVICES SHALL BE AS SPECIFIED ON THE DRAWINGS.

B. COORDINATE DEVICE COLOR WITH ARCHITECT.

IDENTIFICATION

H. EACH PIECE OF ELECTRICAL EQUIPMENT AND INDIVIDUAL SWITCHES, ALL DISCONNECTS, STARTERS ALL EXHAUST FAN MANUAL STARTING SWITCHES, ALL POWER AND LIGHTING PANELS, ALL CABINETS AND PULL BOXES, ETC., SHALL BE IDENTIFIED ON THE FRONT COVER OR TRIM WITH ITS NAME AND/OR DESIGNATION NUMBER OR LETTER AS SHOWN ON THE DRAWINGS AND WITH THE VOLTAGE AVAILABLE WITHIN THE PANEL.

I. IDENTIFICATION SHALL BE IN THE FORM OF LAMINATED PLASTIC NAMEPLATES, BLACK FACE, WITH THE LETTERS ENGRAVED INTO THE WHITE BACKGROUND, MINIMUM 1/4" HIGH. PLATES SHALL BE DRILLED ON EACH END FOR SHEETMETAL SCREW ATTACHMENT, NO "DYMO" OR SIMILAR TYPE LABELS WILL BE ALLOWED.

J. THE FOLLOWING IS AN EXAMPLE OF THE NAMEPLATE LAYOUT AND WORDING:

AC-1 DICONNECT
208V - 1Ø CKT B-1,2

K. PLASTIC NAMEPLATES SHALL BE ATTACHED TO FACE OF ELECTRICAL DEVICE BY SHEETMETAL SCREWS. LOCATE PLATE SO WORDING READS HORIZONTALLY AND PLATE DOES NOT OBSTRUCT OTHER IDENTIFICATION PLATES, LATCHES OR OPERATORS.

L. WHERE CIRCUIT BREAKERS OR FUSES ARE APPLIED IN COMPLIANCE WITH THE SERIES COMBINATION RATINGS MARKED ON THE EQUIPMENT BY THE MANUFACTURER, THE EQUIPMENT ENCLOSURE(S) SHALL BE LEGIBLY MARKED IN THE FIELD TO INDICATE THE EQUIPMENT HAS BEEN APPLIED WITH A SERIES COMBINATION RATING. THE MARKING SHALL BE READILY VISIBLE AND STATE "CAUTION - SERIES RATED SYSTEM."

GROUNDING

A. ALL FEEDERS AND BRANCH CIRCUITS OVER 100 VOLTS SHALL INCLUDE A GROUNDING CONDUCTOR SIZED IN ACCORDANCE WITH NEC TABLE 250.122, EXCEPT NOT BE SMALLER THAN #12 FOR POWER AND LIGHTING CIRCUITS AND #14 FOR CONTROL CIRCUITS. ALL GROUND CONDUCTORS SHALL BE GREEN, OR AS SPECIFIED UNDER SECTION "WIRE AND CABLE."

B. ALL GROUND CLAMPS SHALL BE PENN-UNION "GPL" TYPE OR SIMILAR BY O.Z. OR BURNDY.

C. CONDUIT FOR SOLITARY GROUND CONDUCTORS SHALL BE RIGID SCHEDULE 40 PVC NON-METALLIC ELECTRICAL CONDUIT WITH UL LABEL. SOLITARY GROUND CONDUCTORS SHALL NOT BE PLACED THROUGH METALLIC SLEEVES OR CONDUITS AND SHALL NOT BE COMPLETELY ENCIRCLED BY METALLIC HANGERS OR SUPPORTS.

D. THE GROUND CONDUCTOR SHALL BE CONNECTED TO THE NEUTRAL IN ONLY TWO LOCATIONS - ON THE SUPPLY SIDE OF THE SERVICE DISCONNECT MEANS PER NEC 250.24 AND ON SEPARATELY DERIVED SYSTEMS PER NEC 250.30.

E. AT EACH RECEPTACLE BOX, THE GROUND CONDUCTOR SHALL ENTER AND CONNECT, WITH NORMAL WIRING CONNECTOR, TO: 1) THE GROUND PIGTAIL TO RECEPTACLE; 2) THE GROUND PIGTAIL TO BOX GROUND SCREW; AND 3) THE OUTGOING GROUND CONDUCTOR TO NEXT DEVICE, IF NOT AT END OF RUN, METAL TO METAL CONTACT BETWEEN THE DEVICE YOKE AND THE OUTLET BOX IS NOT ACCEPTABLE AS A BOND FOR EITHER SURFACE MOUNTED BOXES OR FLUSH TYPE BOXES.

F. CONDUIT SYSTEM SHALL BE ELECTRICALLY CONTINUOUS. ALL LOCK NUTS SHALL CUT THROUGH ENAMELED OR PAINTED SURFACES ON ENCLOSURES, WHERE ENCLOSURES AND NON-CURRENT CARRYING METALS ARE ISOLATED FROM THE CONDUIT SYSTEM, USE BONDING JUMPERS WITH APPROVED CLAMPS. WHERE REDUCING WASHERS ARE USED AND WHERE CONCENTRIC OR ECCENTRIC KNOCKOUTS ARE NOT COMPLETELY REMOVED BONDING BUSHINGS SHALL BE REQUIRED.

LIGHTING FIXTURES

A. FLUSH FIXTURES MAY BE FURNISHED WITH PRE-WIRED FEATURE PROVIDED THEY ARE UL APPROVED FOR 75.C WIRING AND THE JUNCTION BOX CAPACITY IS SUFFICIENT FOR THE CIRCUIT WIRING REQUIREMENTS.

B. CLEARANCES FOR RECESSED PORTIONS OF FIXTURES FROM COMBUSTIBLE MATERIAL AND THERMAL INSULATION, SHALL BE IN ACCORDANCE WITH NEC ARTICLE 410.66.

C. ANY FIXTURES SCRATCHED, BENT, CRACKED OR IN ANY WAY DAMAGED BEFORE ACCEPTANCE BY OWNER SHALL BE REPLACED AT THIS CONTRACTOR'S EXPENSE.

D. ALL FIXTURES SHALL BE IN WORKING ORDER AT THE TIME OF FINAL ACCEPTANCE OF THE WORK BY THE OWNER.

E. ALL LIGHTING FIXTURES ARE TO BE GROUNDED ON THE INTERIOR OF THE FIXTURE HOUSING, ON CLEAN BARE METAL (FREE OF PAINT). BY USE OF A PIGTAIL AND FASTENED BY A SCREW USED FOR NO OTHER PURPOSE.

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL
PE - 76872
REGISTERED
PROFESSIONAL ENGINEER
STATE OF OHIO

Harrison Township District 10 Sheriff Substation Renovation

6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
ELECTRICAL SPECIFICATIONS

SHEET NO.
E0.3

1/16/2026 11:16:19 AM

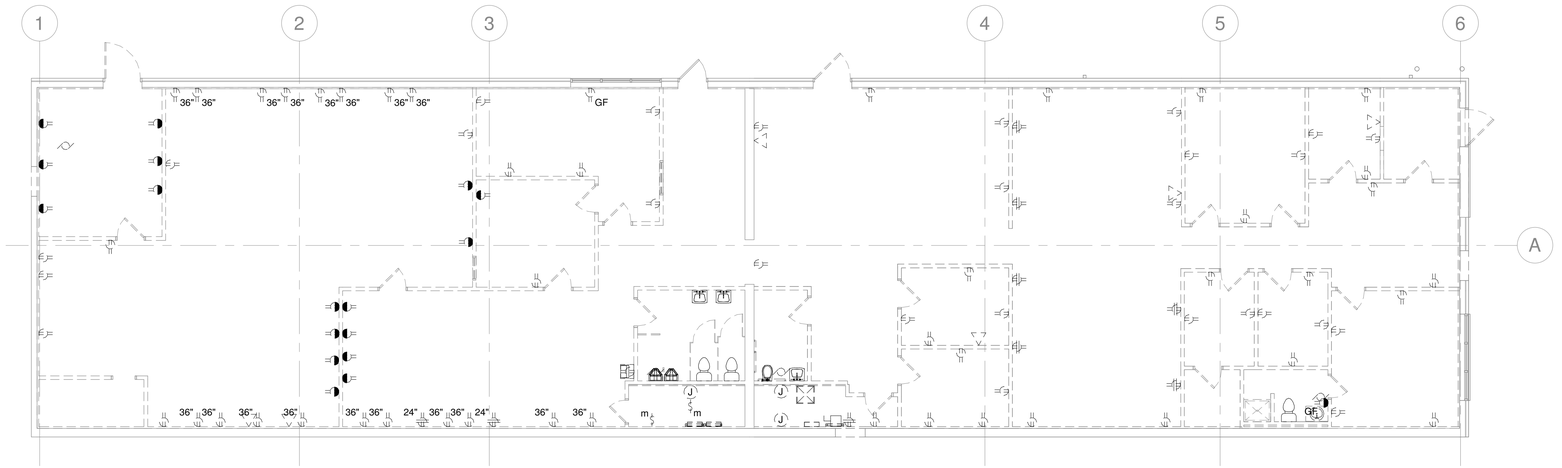
GENERAL ELECTRICAL DEMO NOTES

A. EXISTING CONDITIONS SHOWN ON THIS DRAWING ARE TAKEN FROM ORIGINAL DRAWINGS AND FIELD INVESTIGATION. ALL EXISTING CONDITIONS MUST BE VERIFIED PRIOR TO BID. FIELD CONDITIONS SHALL GOVERN.

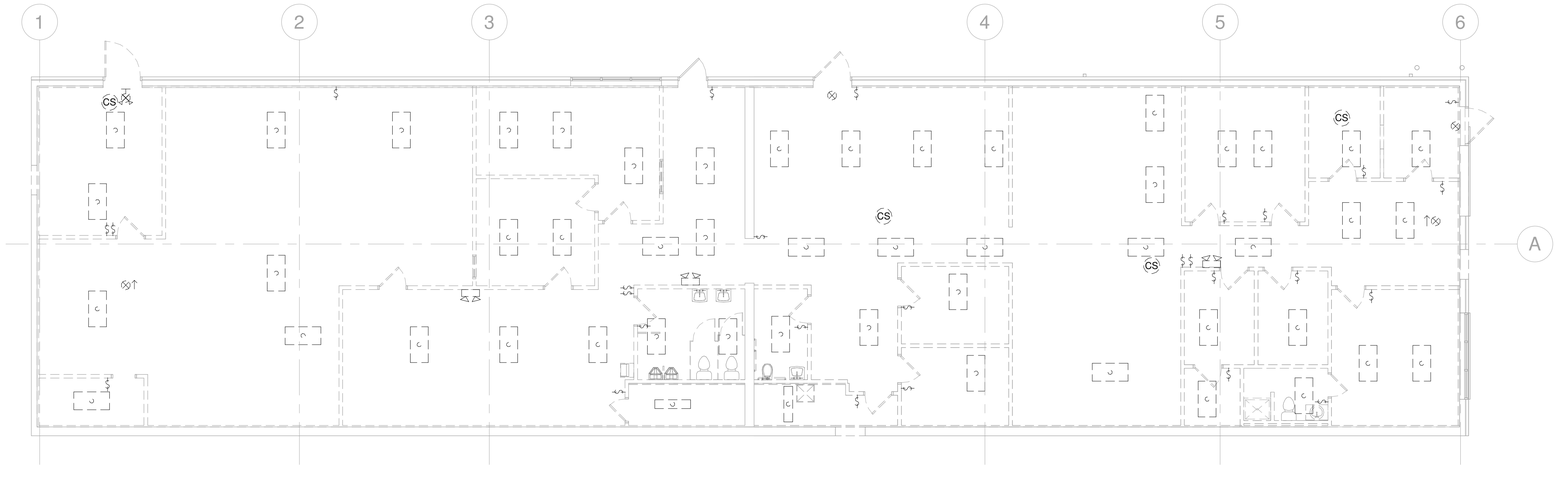
B. ALL CEILING MOUNTED DEVICES NOT SPECIFICALLY INDICATED IN THE PROJECT AREA SHALL BE REMOVED AND REINSTALLED TO FACILITATE INSTALLATION OF NEW CEILINGS/LIGHT FIXTURES.

C. ALL CONDUIT, WIRING, BOXES, AND RACEWAY THAT IS NOT BEING REUSED SHALL BE REMOVED BACK TO PANEL FROM WHERE IT ORIGINATES OR TO NEXT ACTIVE DEVICE.

D. ALL EXISTING DEVICES REMAINING SHALL BE REPLACED WITH NEW.



① POWER PLAN DEMOLITION
1/8" = 1'-0"



② LIGHTING PLAN DEMOLITION
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
REGISTERED
WETZEL
PE - 74872
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
ELECTRICAL POWER AND LIGHTING - DEMOLITION

SHEET NO.
E1.1

1/16/2026 11:16:19 AM

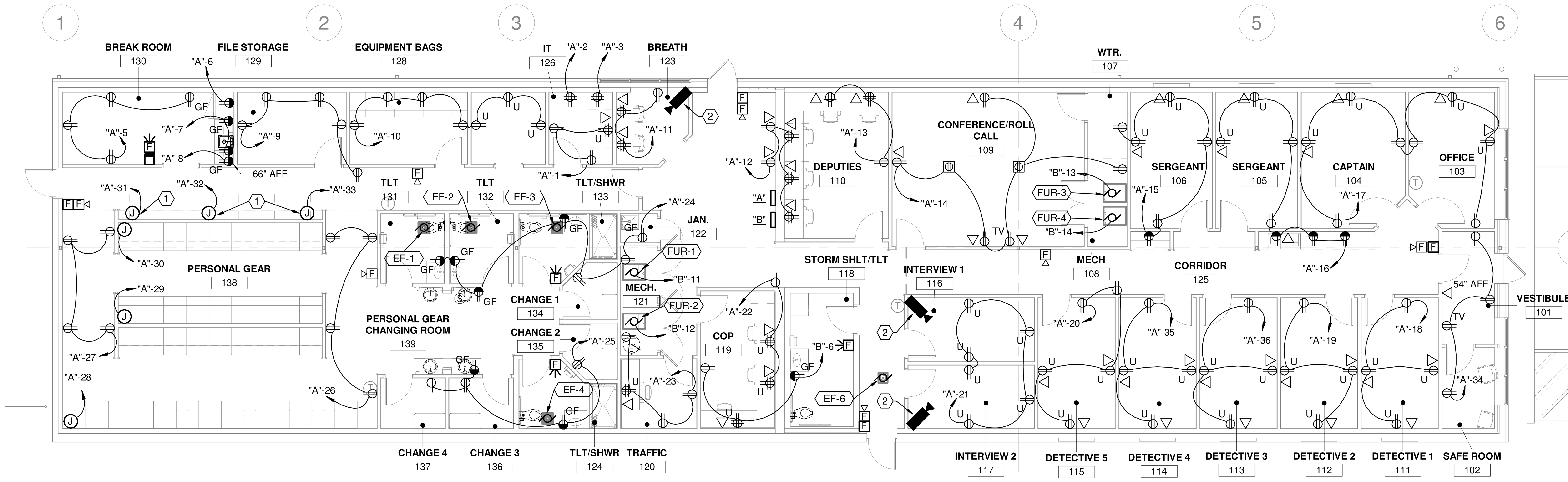
BASE BID DESCRIPTION

A. THE ELECTRICAL BASE BID FOR THE WEST AREA SHALL INCLUDE ALL ELECTRICAL SCOPE SHOWN ON THIS SHEET.

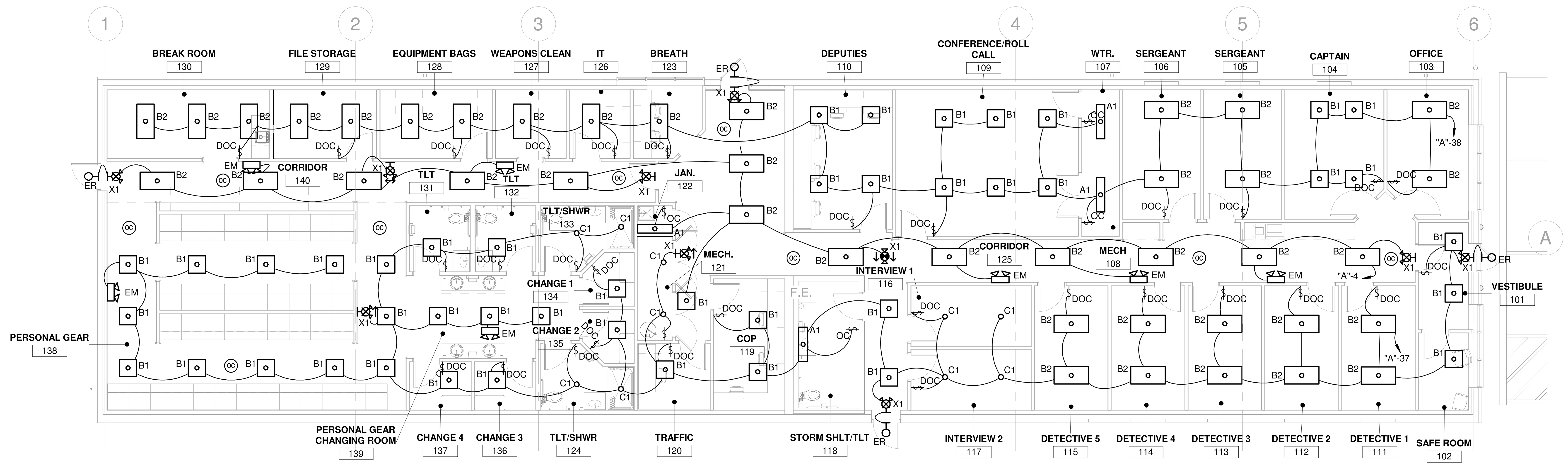
B. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO SHELL THE WEST AREA SPACE. REFER TO SHEET E2.2 FOR ALTERNATE ELECTRICAL PLAN FOR FURTHER DETAILS.

DRAWING NOTES

1. PROVIDE 6' STEEL MULTIOUTLET SYSTEM WITH TAMPER RESISTANT RECEPTACLES AT 9" ON CENTER. LEGRAND #WH20GB609 OR EQUAL.
2. SECURITY CAMERAS BY OWNER. ELECTRICAL CONTRACTOR TO COORDINATE WITH IT VENDOR.



2 POWER PLAN NEW WORK
1/8" = 1'-0"



1 LIGHTING PLAN NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO JEFFREY L. WETZEL PE-76872 REGISTERED PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
ELECTRICAL POWER AND LIGHTING - NEW WORK

SHEET NO.
E2.1

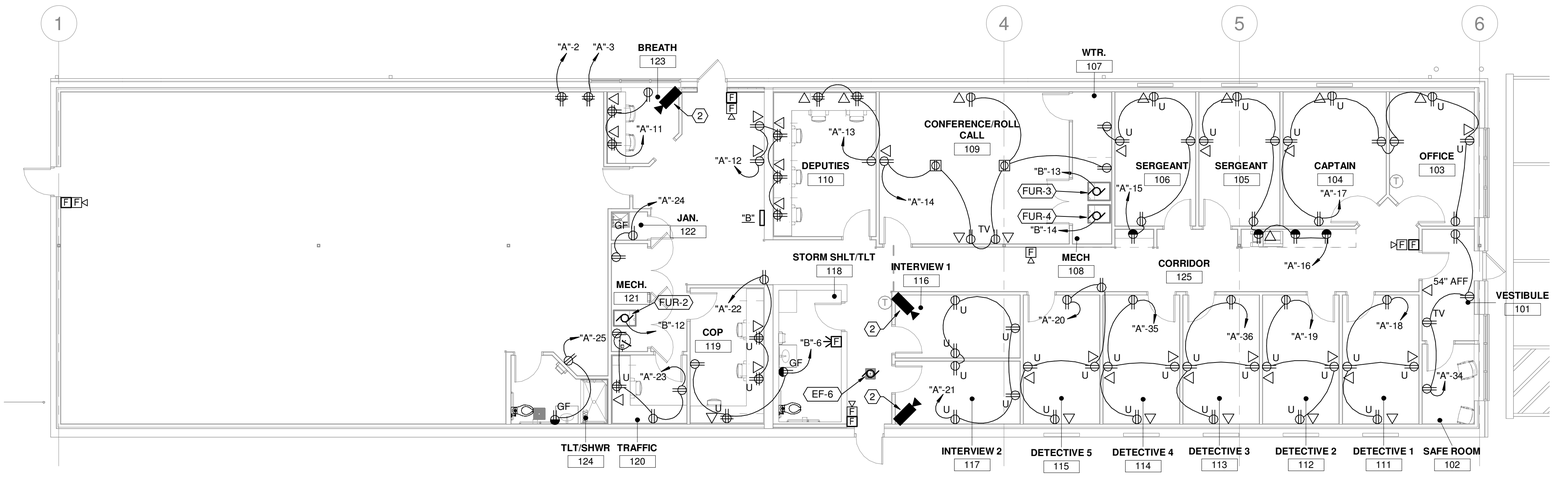
ALTERNATE DESCRIPTION

A. AS A DEDUCT ALTERNATE, CONTRACTOR SHALL PROVIDE THE COST REDUCTION TO REDUCE THE BASE BID ELECTRICAL DESIGN FOR THE WEST AREA TO ONLY AS SHOWN ON THIS PLAN.

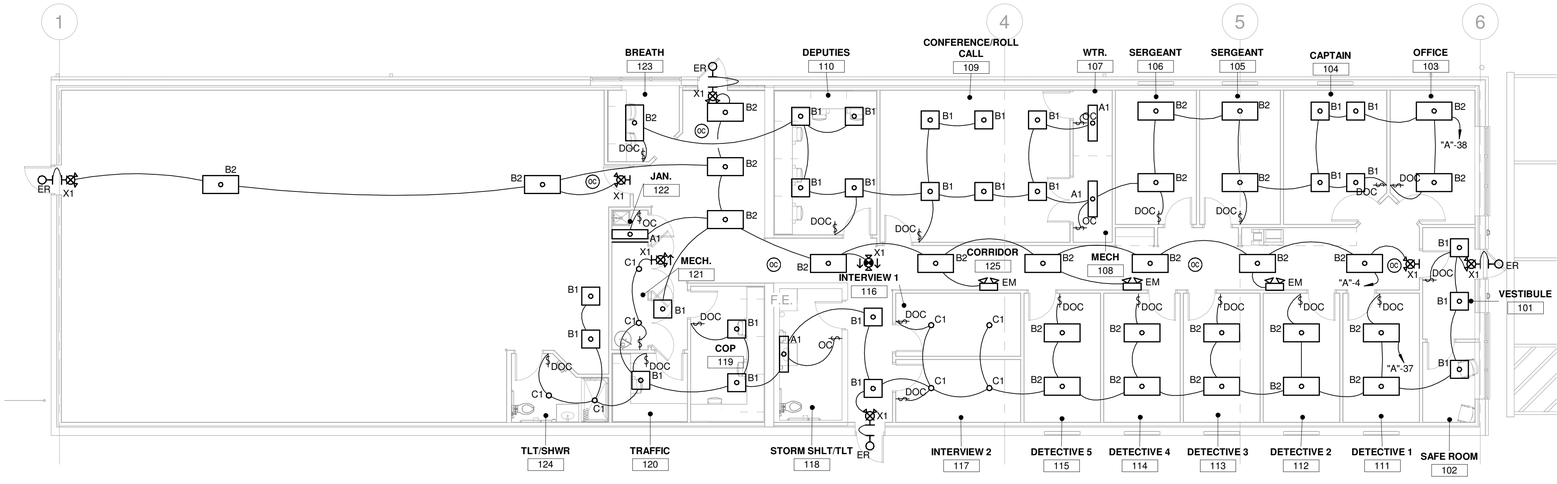
B. REFER TO SHEET E2.1 FOR THE BASE BID ELECTRICAL SCOPE OF WORK.

DRAWING NOTES

1. PROVIDE 6' STEEL MULTIOUTLET SYSTEM WITH TAMPER RESISTANT RECEPTACLES AT 9" ON CENTER. LEGRAND #WH20GB609 OR EQUAL.
2. SECURITY CAMERAS BY OWNER. ELECTRICAL CONTRACTOR TO COORDINATE WITH IT VENDOR.
3. EC TO PROVIDE TEMPORARY SUPPORT FROM STRUCTURE FOR LIGHTING FIXTURES UNTIL CEILING GRID INSTALLATION.



2 POWER PLAN ALTERNATE 1 NEW WORK
1/8" = 1'-0"



1 LIGHTING PLAN ALTERNATE 1 NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
REGISTERED
PROFESSIONAL ENGINEER
JEFFREY L. WETZEL
PE - 76872

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

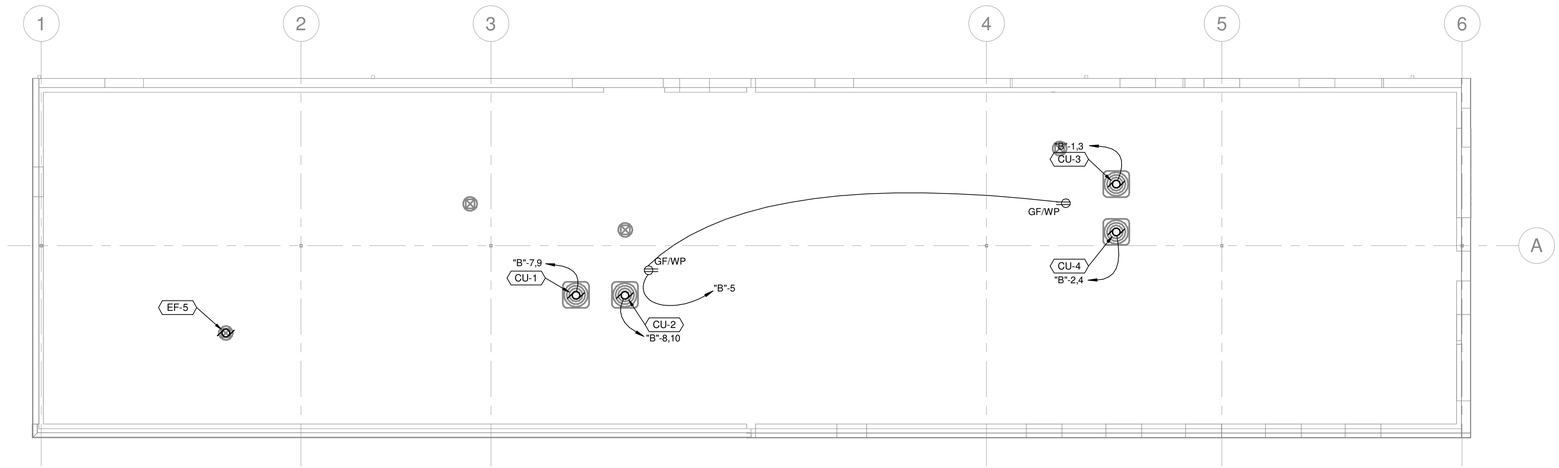
ISSUE		
NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
ELECTRICAL POWER AND LIGHTING - NEW WORK - ALTERNATE 1

SHEET NO.
E2.2

1/16/2026 11:18:24 AM



1 ROOF POWER PLAN NEW WORK
1/8" = 1'-0"

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

JEFFREY L. WETZEL
PE - 74872
STATE OF OHIO
REGISTERED
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
ELECTRICAL POWER ROOF PLAN - NEW WORK

SHEET NO.
E3.1

1/15/2026 11:16:24 AM

Branch Panel: "A"

Location: CORRIDOR 125 | **Volts:** 120/208 Wye | **A.I.C. Rating:**
Supply From: | **Phases:** 3 | **Mains Type:**
Mounting: Surface | **Wires:** 4 | **Mains Rating:** 200 A
Enclosure: Type 1 | **MCB Rating:** 200 A

Notes:

CKT	Circuit Description	Trip	Poles	A		B		C		Poles	Trip	Circuit Description	CKT
1	RCPT - IT (126)	20 A	1	720	360					1	20 A	RCPT - IT (126)	2
3	RCPT - IT (126)	20 A	1			360	446			1	20 A	LTG - CORRIDOR	4
5	RCPT - BREAK ROOM (130)	20 A	1					720	180	1	20 A	RCPT - REFRIGERATOR BREAK ROOM (130)	6
7	RCPT - BREAK ROOM (130)	20 A	1	360	180					1	20 A	RCPT - MICROWAVE BREAK ROOM (130)	8
9	RCPT - FILE STORAGE (129)	20 A	1			900	1260			1	20 A	RCPT - EQUIPMENT BAGS (128)	10
11	RCPT - BREATH (123)	20 A	1					900	1440	1	20 A	RCPT - DEPUTIES (110)	12
13	RCPT - DEPUTIES (110)	20 A	1	900	1620					1	20 A	CONFERENCE / ROOL CALL (109)	14
15	RCPT - SERGEANT (106)	20 A	1			1080	1260			1	20 A	RCPT - SERGEANT (105)	16
17	RCPT - CAPTAIN (104) / SARAH (103)	20 A	1					1440	720	1	20 A	RCPT - DETECTIVE (111) / SAFE ROOM (102)	18
19	RCPT - DETECTIVE 2 (112)	20 A	1	720	900					1	20 A	RCPT - DETECTIVE 4 (115)	20
21	RCPT - INTERVIEW 2 (117)	20 A	1			1080	900			1	20 A	RCPT - COP (119) AND STORM SHLT. (116)	22
23	RCPT - TRAFFIC (120)	20 A	1					720	1260	1	20 A	RCPT - TLT (131-134)	24
25	RCPT - CHANGE 2,3, AND 4 (135-137)	20 A	1	900	720					1	20 A	RCPT - PERSONAL GEAR (138)	26
27	RCPT - PERSONAL GEAR (138)	20 A	1			720	180			1	20 A	J-BOX - PERSONAL GEAR (138)	28
29	J-BOX - PERSONAL GEAR (138)	20 A	1					180	180	1	20 A	J-BOX - PERSONAL GEAR (138)	30
31	J-BOX - PERSONAL GEAR PLUG MOLD (138)	20 A	1	180	180					1	20 A	J-BOX - PERSONAL GEAR PLUG MOLD (138)	32
33	J-BOX - PERSONAL GEAR PLUG MOLD (138)	20 A	1			180	720			1	20 A	RCPT - SAFE ROOM (102)	34
35	RCPT - DETECTIVE 4 (114)	20 A	1					720	720	1	20 A	RCPT - DETECTIVE 3 (113)	36
37	LTG - SOUTH SIDE	20 A	1	1344	916					1	20 A	LTG - NORTH SIDE	38
39	SPARE	20 A	1			0	0			1	20 A	SPARE	40
41	SPARE	20 A	1					0	0	1	20 A	SPARE	42
43	SPARE	20 A	1	0	0					1	20 A	SPARE	44
45	SPARE	20 A	1			0	0			1	20 A	SPARE	46
47	SPACE	--	1					--	--	1	--	SPACE	48
49	SPACE	--	1	--	--					1	--	SPACE	50
51	SPACE	--	1			--	--			1	--	SPACE	52
53	SPACE	--	1					--	--	1	--	SPACE	54
			Total Load:	10000 VA		9086 VA		9180 VA					
			Total Amps:	83 A		76 A		77 A					

Legend:

Load Classification	Connected Load	Demand Factor	Estimated Demand	Panel Totals	
Receptacle	25560 VA	69.56%	17780 VA		
Lighting	2706 VA	100.00%	2706 VA	**Total Conn. Load:**	28266 VA
				Total Est. Demand:	20486 VA
				Total Conn.:	78 A
				Total Est. Demand:	57 A

Notes:

Branch Panel: "B"

Location: CORRIDOR 125 | **Volts:** 120/208 Wye | **A.I.C. Rating:**
Supply From: | **Phases:** 3 | **Mains Type:**
Mounting: Surface | **Wires:** 4 | **Mains Rating:** 200 A
Enclosure: Type 1 | **MCB Rating:** 200 A

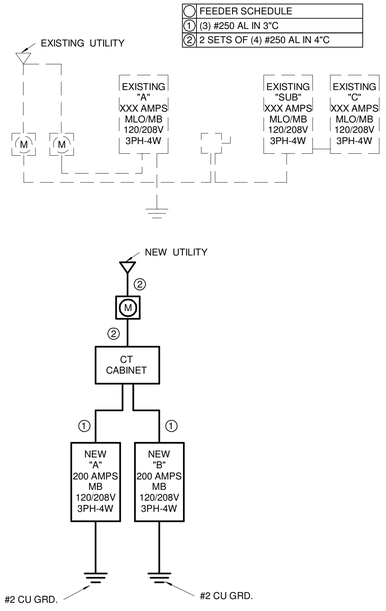
Notes:

CKT	Circuit Description	Trip	Poles	A		B		C		Poles	Trip	Circuit Description	CKT
1	CU-3	20 A	2	2779	2729					2	20 A	CU-4	2
3	--	--	--			2779	2729			--	--	--	4
5	RCPT - ROOF GF/WP	20 A	1					360	720	1	20 A	RCPT - COP (119) AND STORM SHLT. (116)	6
7	CU-1	20 A	2	2729	2779					2	20 A	CU-2	8
9	--	--	--			2729	2779			--	--	--	10
11	FUR-1	20 A	1					1622	1603	1	20 A	FUR-2	12
13	FUR-3	20 A	1	1603	1603					1	20 A	FUR-4	14
15													16
17													18
19													20
21													22
23													24
25													26
27													28
29													30
31													32
33													34
35													36
37													38
39													40
41													42
			Total Load:	14222 VA		11016 VA		4306 VA					
			Total Amps:	127 A		100 A		36 A					

Legend:

Load Classification	Connected Load	Demand Factor	Estimated Demand	Panel Totals	
Cooling	22031 VA	100.00%	22031 VA		
HVAC	6432 VA	100.00%	6432 VA	**Total Conn. Load:**	29543 VA
Receptacle	1080 VA	100.00%	1080 VA	**Total Est. Demand:**	29543 VA
				Total Conn.:	82 A
				Total Est. Demand:	82 A

Notes:



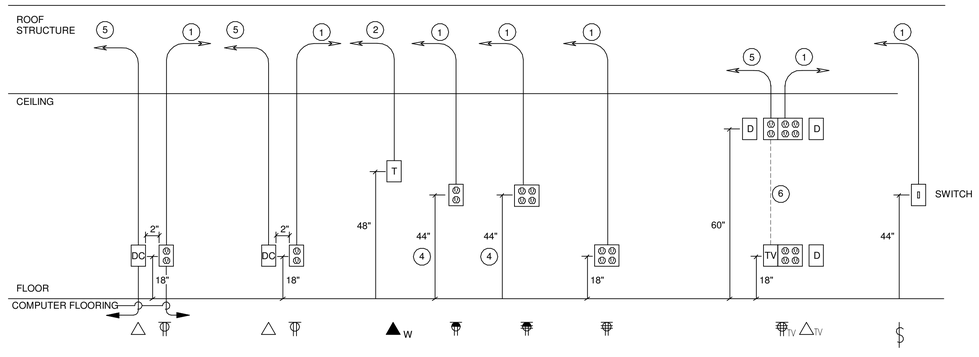
1 SINGLELINE 1
1 1/2" = 1'-0"

DETAIL NOTES:

1. 120V RECEPTACLE BRANCH CIRCUIT. REFER TO POWER PLANS
2. 3/4" CONDUIT WITH CABLES TO CABLETRAY/DATA/COMM. BACKBOARD.
3. SWITCH LEG.
4. OR 4" ABOVE BACKSPLASH
5. STUB 1" CONDUIT TO ABOVE ACCESSIBLE CEILING. PROVIDE BUSHING
6. 1" CONDUIT

LEGEND

- DC DATA/COMMUNICATIONS OUTLET
- T TELEPHONE OUTLET
- TV AV BOX
- 120V POWER OUTLET
- SWITCH
- DOUBLE DUPLEX 120V POWER OUTLET



TYPICAL DEVICE ELEVATION DETAILS

App Architecture
creative focused design
615 Woodside Drive, Englewood, Ohio 45322
T 937.836.8898 F 937.832.3696
www.app-arch.com

STATE OF OHIO
REGISTERED
WETZEL
PE - 76872
PROFESSIONAL ENGINEER

Harrison Township District 10
Sheriff Substation Renovation
6001 N Dixie Dr, Dayton, OH 45414

ISSUE

NO.	DATE	DESCRIPTION
	01/22/2026	FOR CONSTRUCTION

DATE	01.22.2026
JOB NO.	2025139
DRAWN	JZC
CHECKED	RLS

TITLE
PANELBOARD SCHEDULES AND SINGLE LINE DIAGRAM

SHEET NO.
E4.1

1/15/2026 11:16:24 AM