

**NAVFAC  
SPECIFICATION**

**7236002  
Repairs to BEQ 4310**

**MCAS Cherry Point, NC  
AMENDMENT #0002**

## **IMPORTANT**

**This amendment should be acknowledged when your proposal is submitted. Failure to acknowledge the amendment may constitute grounds for rejection of the proposal.**

**If your proposal has been submitted prior to the receipt of this amendment, acknowledgement should be made by telegram, which should state whether the price contained in your proposal is to remain unchanged, is to be decreased by an amount, or is to be increased by an amount. The acknowledgement must be received prior to proposal opening time.**

<b>AMENDMENT OF SOLICITATION/MODIFICATION OF CONTRACT</b>			1. CONTRACT ID CODE	PAGE 1	OF PAGES
2. AMENDMENT/MODIFICATION NO.  0002	3. EFFECTIVE DATE  10/20/2022	4. REQUISITION/PURCHASE REQ. NO.  7236002	5. PROJECT NO. (If applicable)		
6. ISSUED BY  <b>CG MCAS Cherry Point FACILITIES, ROICC B-87, 748 Roosevelt Blvd. PSC BOX 8006 CHERRY POINT, NC 28533</b>		7. ADMINISTERED BY (If other than item 6.)		Code	
8. NAME AND ADDRESS OF CONTRACTOR (No., street, county, State and ZIP Code)  <b>AMENDMENT MUST BE ACKNOWLEDGED WITH YOUR PROPOSAL</b>			<input checked="" type="checkbox"/>	9A. AMENDMENT OF SOLICITATION Repairs to BEQ 4310	
				9B. DATED (SEE ITEM 11)	
			<input type="checkbox"/>	10A. MODIFICATION OF CONTRACT/ORDER NO.	
				10B. DATED (SEE ITEM 13)	
CODE		FACILITY CODE			

**11. THIS ITEM ONLY APPLIES TO AMENDMENTS OF SOLICITATIONS**

☒ The above numbered solicitation is amended as set forth in item 14. The hour and date specified for receipt of Offers ☐ is extended ☒ is not extended. Offers must acknowledge receipt of this amendment prior to the hour and date specified in the solicitation or as amended, by one of the following methods: (a) By completing items 8 and 15, and returning 1 copy of the amendment; (b) By acknowledging receipt of this amendment on each copy of the offer submitted; or (c) By separate letter or telegram which includes a reference to the solicitation and amendment numbers. FAILURE OF YOUR ACKNOWLEDGMENT TO BE RECEIVED AT THE PLACE DESIGNATED FOR THE RECEIPT OF OFFERS PRIOR TO THE HOUR AND DATE SPECIFIED MAY RESULT IN REJECTION OF YOUR OFFER. If by virtue of this amendment you desire to change an offer already submitted, such change may be made by telegram or letter, provided each telegram or letter makes reference to the solicitation and this amendment, and is received prior to the opening hour and date specified.

**12. ACCOUNTING AND APPROPRIATION DATA (if required)**

**13. THIS ITEM APPLIES ONLY TO MODIFICATIONS OF CONTRACTS/ORDERS,  
IT MODIFIES THE CONTRACT/ORDER NO. AS DESCRIBED IN ITEM 14.**

<input type="checkbox"/>	A. THIS CHANGE ORDER IS ISSUED PURSUANT TO: (Specify authority) THE CHANGES SET FORTH IN ITEM 14. ARE MADE IN THE CONTRACT ORDER NO. IN ITEM 10A.
<input type="checkbox"/>	B. THE ABOVE NUMBERED CONTRACT/ORDER IS MODIFIED TO REFLECT THE ADMINISTRATION CHANGES (such as changes in paying office, appropriation date, etc.) SET FORTH IN ITEM 14, PURSUANT TO THE AUTHORITY OF FAR 43.103 (b).
<input type="checkbox"/>	C. THIS SUPPLEMENTAL AGREEMENT IS ENTERED INTO PURSUANT TO AUTHORITY OF:
<input type="checkbox"/>	D. OTHER: (specify type of modification and authority)

E. IMPORTANT: Contractor ☐ is not ☐ is required to sign this document and return **original** to the issuing office.

**14. DESCRIPTION OF AMENDMENT/MODIFICATION (Organized by UCF section headings, including solicitation/contract subject matter where feasible.)**

7236002 Repairs to BEQ 4310, Marine Corps Air Station Cherry Point, NC

Amendment 0002 is being issued to respond to pre-award RFI.

The deadline to submit pre-award RFI's REMAINS 28 October 2022 at 9:00 AM.

The proposal due date of 08 November 2022 at 12:00 PM local time REMAINS unchanged.

See attached.

15A. NAME AND TITLE OF SIGNER (Type or print)		16A. NAME AND TITLE OF CONTRACTING OFFICER (Type or print)	
15B. CONTRACTOR/OFFEROR (Same as Item 8)	15C. DATE SIGNED	16B. UNITED STATES OF AMERICA BY	16C. DATE SIGNED
(Signature of person authorized to sign)		(Signature of Contracting Officer)	

RFI Responses:

1. I noticed there is an existing sump pump located on the 1<sup>st</sup> floor within the corridor area that is not shown within the drawings to be demolished or replaced. The sump pump I am referring to is not associated with the steam pit. Is this sump pump to be removed/replaced? If so, may we get this sump pump added to the drawings, plumbing schedule, and specifications if it is to be different than what is already listed in the bid documents so that all bidders are aware of removal/replacement?

*Response: The sump pump spec will be the same as the one shown on the plans and details for the steam pit. It shall be removed and replaced. See drawings 12866247 and 1286652 revised 17 October 2022 that show the sump pump in question. Submit proposals in accordance with RFP, Specifications, Drawings and all amendments.*

2. I do not see any exterior wall hydrants shown within the plumbing drawings, typically these BEQ's have 4ea to be removed/replaced. If there will be exterior wall hydrants to be removed/replaced, may we have them added to the plumbing drawing set so that all bidders are aware of removal/replacement?

*Response: See 12866247 and 12866251 revised 17 October 2022 for FPWH (freeze proof wall hydrant) locations. Submit proposals in accordance with RFP, Specifications, Drawings and all amendments.*

3. I do not see a specification for the P-6 Laundry sink, may we have this item added to the plumbing specifications?

*Response: Section 2.4.6 in the 22.00.00 Specification specifies twin and double service sinks. Submit proposals in accordance with RFP, Specifications, Drawings and all amendments.*

4. I do not see a specification for the P-10 Utility Sink, may we have this item added to the plumbing specifications?

*Response: Section 2.4.6 in the 22.00.00 Specification specifies twin and double service sinks. Submit proposals in accordance with RFP, Specifications, Drawings and all amendments.*

5. If the P-10 Utility Sink is supposed to be represented as a service sink, I am unaware of one that is made of molded stone that has legs as the specification suggests. Please clarify as these are generally made of fiber glass or a plastic resin unless they are cast iron and supported by a cast iron P-trap.

*Response: Molded stone is a generic term to refer to durable plastic resin utility sink construction. Submit proposals in accordance with RFP, Specifications, Drawings and all amendments.*

6. Looking through the 23 00 00 specifications, I do not see a specification for the Underground Chilled Water piping. May we get this specification added?

*Response: See new specification section 33 61 14 Exterior Buried Preinsulated Water Piping for underground chilled water piping information. Submit proposals in accordance with RFP, Specifications, Drawings and all amendments.*

CONTINUATION SHEET

PROJECT TABLE OF CONTENTS

SECTION 33 61 14, EXTERIOR BURIED PREINSULATED WATER PIPING is added to the Project Table of Contents and accompanies this Amendment.

DOCUMENT 00 01 15 - LIST OF DRAWINGS

1.2 CONTRACT DRAWINGS

The following drawings are revised as of:

NAVFAC DWG NO.	TITLE
12866247	PD103 PARTIAL FIRST FLOOR PLANS - PLUMBING
12866251	P-102 PARTIAL FIRST FLOOR PLANS - PLUMBING
12866252	P-103 PARTIAL FIRST FLOOR PLANS - PLUMBING

These revised drawings accompany this Amendment.

SECTION 33 61 14

EXTERIOR BURIED PREINSULATED WATER PIPING  
02/10

PART 1 GENERAL

1.1 REFERENCES

The publications listed below form a part of this specification to the extent referenced. The publications are referred to within the text by the basic designation only.

AMERICAN SOCIETY OF MECHANICAL ENGINEERS (ASME)

ASME B16.18 (2021) Cast Copper Alloy Solder Joint  
Pressure Fittings

ASME B16.22 (2021) Wrought Copper and Copper Alloy  
Solder Joint Pressure Fittings

ASTM INTERNATIONAL (ASTM)

ASTM B32 (2020) Standard Specification for Solder  
Metal

ASTM B88 (2020) Standard Specification for Seamless  
Copper Water Tube

ASTM D1784 (2020) Standard Specification for Rigid  
Poly(Vinyl Chloride) (PVC) Compounds and  
Chlorinated Poly(Vinyl Chloride) (CPVC)  
Compounds

ASTM D2996 (2017) Standard Specification for  
Filament-Wound "Fiberglass"  
(Glass-Fiber-Reinforced  
Thermosetting-Resin) Pipe

1.2 SYSTEM DESCRIPTION

Provide new and modify existing exterior buried factory-prefabricated preinsulated water piping system to the first piping connection aboveground or within each building complete and ready for operation. Piping system includes chilled water piping, and related work . Chilled water piping, chilled-hot water piping, and hot water piping within each building is specified under Section 23 64 26 CHILLED WATER PIPING SYSTEMS.

1.3 SUBMITTALS

Government approval is required for all submittals. Submit the following in accordance with Section 01 33 00 SUBMITTAL PROCEDURES:

SD-02 Shop Drawings

Factory-prefabricated preinsulated water piping system

Show layout of piping system. Drawings must have Professional

Engineer Seal.

SD-03 Product Data

Pipe, fittings, and end connections

Factory-prefabricated preinsulated water piping system

SD-07 Certificates

SD-08 Manufacturer's Instructions

Installation manual for buried factory-prefabricated preinsulated water piping system

## PART 2 PRODUCTS

### 2.1 BURIED FACTORY-PREFABRICATED PREINSULATED WATER PIPING SYSTEM

Piping (pipe, fittings, and end connections) system shall be suitable for working pressure of 125 psig at 250 degrees F. Piping system shall withstand H-20 highway loading with 2 feet of compacted backfill over top of conduit. Mark each section of conduit with fabricator's name, product identification, and publications to which the items conform. Provide each section of carrier pipe including factory-applied insulation and conduit, with waterproof conduit ends at both ends of each section of carrier pipe, except for piping systems which have the field joints insulated and covered with waterproof shrink sleeves.

#### 2.1.1 Factory-Applied Insulation

Polyurethane or polyisocyanate insulation, minimum density of 1.7 pcf, rated for not less than 250 degrees F, completely filling space between carrier pipe and conduit.

#### 2.1.2 Factory-Applied Conduit

Conduit material, size, and thickness shall be as follows:

Carrier Pipe (Inches)	Minimum Conduit Size (Inches)	Minimum Conduit Thickness (Inches)
2	4	0.060
3	6	0.060
4	8	0.080
6	10	0.100
8	12	0.120
10	14	0.120

- a. Plastic PVC pipe conduit: ASTM D1784, Class 12454-B compound extruded seamless PVC plastic pipe.

- b. Plastic RTR pipe conduit: ASTM D2996, filament-wound, fiberglass RTR plastic pipe, without liner.
- c. Plastic RTR factory lay-up conduit: Conduit shall be machine-applied continuous rovings of fiberglass strands saturated with isophthalic polyester or epoxy resin filament wound in helical pattern directly to the outer surface of the pipe insulation. In lieu of minimum conduit size for each size of carrier pipe, provide minimum of one inch thick insulation for 2 inch carrier pipe and provide minimum of 1.5 inch thick insulation for 3 inch and larger carrier pipe.

#### 2.1.3 Factory-Applied End Seals

Provide watertight end seal, or factory lay-up type end seal between carrier pipe and conduit. Provide sufficient surface bonding area between carrier pipe and conduit to ensure permanent watertight end seal suitable for use with temperature limits of carrier pipe.

#### 2.1.4 Factory-Prefabricated Carrier Piping

Pipe, fittings, and couplings shall be marked with manufacturer's name, product identification, and publication to which items conform. Carrier piping shall be as specified in this section. Buried carrier pipe connections between straight sections of pipe beyond 5 feet exterior of buildings may be manufacturer's standard O-ring connections designed to absorb pipe expansion and contraction at working pressure of 125 psig with no leakage. Connections at elbows and tees shall be other than O-ring connections.

### 2.2 CARRIER PIPING

#### 2.2.1 Copper Tubing

Provide copper tubing for hot domestic water piping, recirculating hot domestic water piping, chilled water piping, chilled-hot water piping, and hot water piping.

- a. Copper tubing: Provide ASTM B88, Type L copper tubing for buried factory-prefabricated preinsulated piping and for aboveground piping. Provide ASME B16.18 or ASME B16.22 solder joint fittings, unions; provide adapters as required.
- b. Solder for copper tubing: Provide ASTM B32, 95-5 tin-antimony solder or provide Plumbing Code approved lead-free solder.

#### 2.3 BURIED WARNING AND IDENTIFICATION TAPE

Provide detectable aluminum foil plastic backed tape or detectable magnetic plastic tape manufactured specifically for warning and identification of buried piping. Tape shall be detectable by an electronic detection instrument. Provide tape in rolls, 3 inches minimum width, color coded for the utility involved with warning and identification imprinted in bold black letters continuously and repeatedly over entire tape length. Warning and identification shall read "CAUTION BURIED PREINSULATED WATER PIPING BELOW" or similar wording. Use permanent code and letter coloring unaffected by moisture and other substances contained in trench backfill material.

## 2.4 CONCRETE THRUST BLOCKS

Provide concrete thrust blocks as specified in Section 03 30 00 CAST-IN-PLACE CONCRETE. Concrete shall be of 4000 psi minimum 28 day compressive strength, air-entrained admixture (3.6 ounces per cubic yard) with water-reducing admixture (22 ounces per cubic yard).

## 2.5 PIPE SLEEVES

Provide where piping passes entirely through walls and floors. Provide sleeves of sufficient length to pass through entire thickness of walls and floors. Provide one inch minimum clearance between exterior of piping or pipe insulation, and interior of sleeve or core-drilled hole. Firmly pack space with mineral wool insulation. Seal space at both ends of sleeve or core-drilled hole with plastic waterproof cement which will dry to a firm but pliable mass, or provide mechanically adjustable segmented elastomeric seal. In fire walls and fire floors, seal both ends of sleeves or core-drilled holes with UL listed fill, void, or cavity material.

- a. Sleeves in masonry and concrete walls and floors: Provide hot-dip galvanized steel, ductile-iron, or cast-iron sleeves. Core drilling of masonry and concrete may be provided in lieu of sleeves when cavities in the core-drilled hole are grouted smooth.
- b. Sleeves in other than masonry and Concrete walls and floors: Provide 26 gage galvanized steel sheet.

## PART 3 EXECUTION

### 3.1 INSTALLATION

Installation of exterior buried factory-prefabricated preinsulated water piping systems shall be in accordance with manufacturer's installation manual. Deviations shall not be permitted unless authorized in writing by Contracting Officer. Install piping straight and true to bear evenly on sand bedding material. Installation and field assembly of plastic RTR piping shall be in accordance with the Federal Agency Approved Brochure.

- a. Cleaning of piping: Keep interior and ends of new piping and existing piping affected by the Contractor's operations, cleaned of water and foreign matter during installation by means of plugs or other approved methods. When work is not in progress, securely close open ends of pipe and fittings to prevent entry of water and foreign matter. Inspect piping before placing into position.
- b. Demolition: Remove materials so as not to damage materials which are to remain. Replace existing work damaged by the Contractor's operations with new work of the same construction.

### 3.2 FIELD JOINTS

- a. Carrier piping joints without concrete anchor: Pressure test and approve piping joints. Provide joints with polyurethane or polyisocyanate insulation of same type and thickness as insulation on carrier piping. Provide waterproof shrink sleeves to cover insulation and overlap not less than 6 inches of each end of conduit section.
- b. Carrier piping joints with concrete anchor: Pressure test and approve piping joints. Provide each elbow and tee with concrete anchors



(thrust blocks). Provide waterproof end seals between carrier piping and conduit adjacent to each carrier pipe fitting. Encase carrier pipe fitting and at least 2 inches of each end of conduit with a minimum of 6 inches of concrete.

### 3.3 BURIED FACTORY-PREFABRICATED PREINSULATED PIPE INSTALLATION

- a. Assembly and alignment: Assemble carrier pipe and fittings according to manufacturer's installation manual; assemble plastic RTR piping in accordance with the Federal Agency Approved Brochure. Maintain proper alignment during assembly of joints.
- b. Bedding: Accurately grade trench bedding with a minimum of 6 inches of manufactured or natural sand. Backfill sand to a minimum of 6 inches above and below conduit. Lay bedding to firmly support conduit along entire length.
- c. Concrete thrust blocks: Encase each elbow and tee of carrier pipe in thrust block with minimum of 3 square feet of thrust-bearing surface cast against undisturbed soil, minimum pipe-to-bearing surface single dimension of 10 inches perpendicular to bearing surface, and minimum volume of 9 cubic feet, except as indicated otherwise. Disturbed soil under and around thrust blocks shall be compacted.

### 3.4 FIELD QUALITY CONTROL

Before final acceptance of work, test each system to demonstrate compliance with contract requirements. Thoroughly flush and clean piping before placing in operation. Flush piping at minimum velocity of 8 fps. Correct defects in the work and repeat tests until work is in compliance with contract requirements. Furnish potable water, electricity, instruments, connecting devices, and personnel for tests.

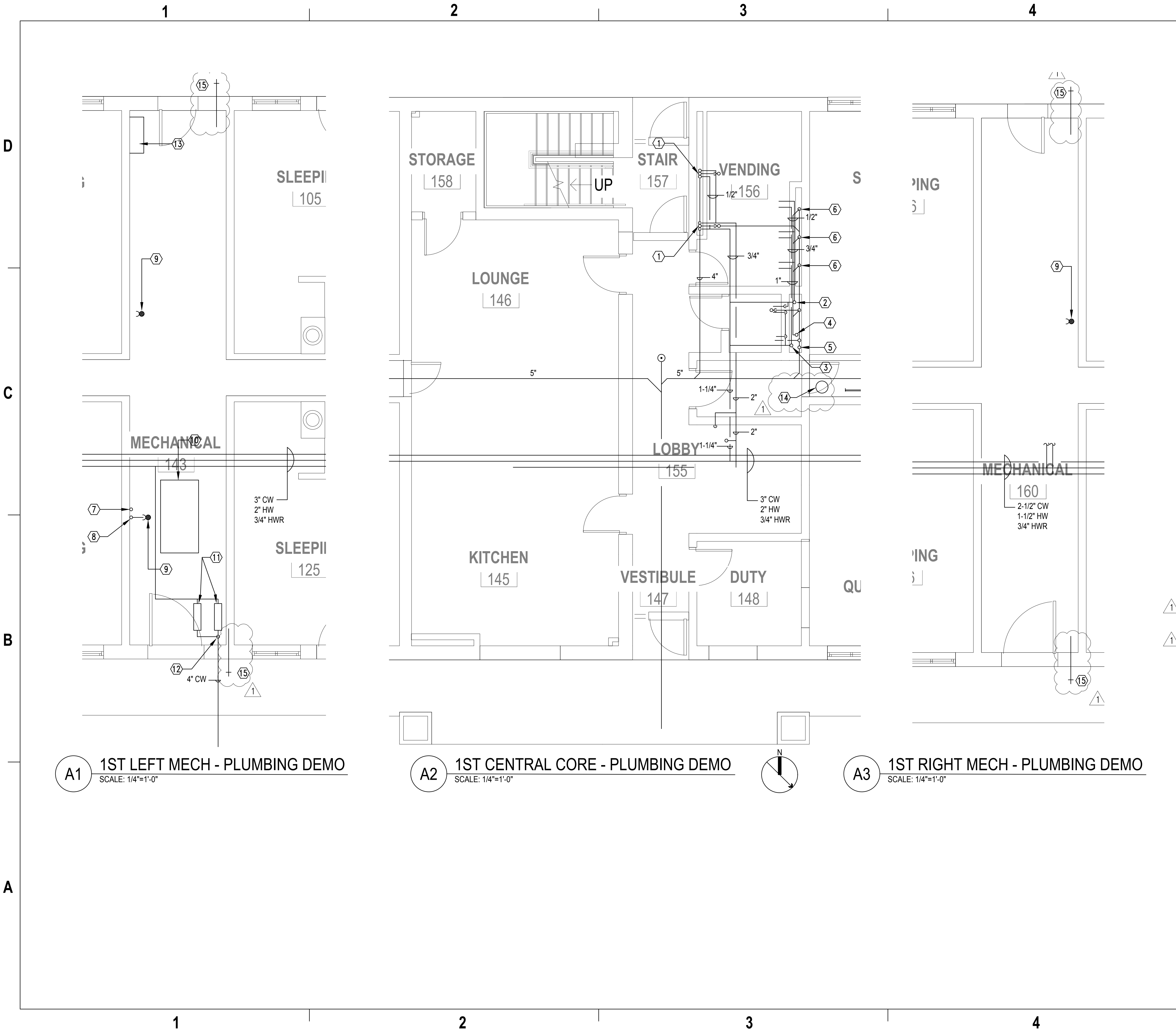
- a. Field tests of carrier piping: Do not cover carrier piping joints with insulation or concrete anchors (thrust blocks), until carrier piping joints pass field tests.
- b. Hydrostatic pressure test: Test piping system at 200 psig for minimum holding period of 2 hours during which time pressure shall not drop more than 4 psi; test plastic RTR piping in accordance with Federal Agency Approved Brochure. Pressure drop greater than 4 psi corrected for temperature variation constitutes failure. Valve off piping system and disconnect method of piping system pressurization before starting the 2 hour pressure holding period. During hydrostatic pressure test, examine piping system for leaks. Repair leaking joints, replace damaged and porous pipe and fittings with new materials, and repeat tests.
- c. Thrust blocks: If O-ring connections are used, provide temporary thrust blocks prior to hydrostatic pressure testing of piping system. Place bedding and backfill around center portion of piping system, leaving thrust blocks and field joints clear for observation. After successful completion of hydrostatic pressure test, cast concrete thrust blocks.
- d. Field inspections: Prior to initial operation, inspect piping system for compliance with drawings, specifications, and manufacturer's

CP2202M REPAIRS TO BEQ 4310  
MARINE CORPS AIR STATION, CHERRY POINT, NC

N40085-19-D-9247  
10/2022

submittals.

-- End of Section --



### GENERAL SHEET NOTES

#	DESCRIPTION	DATE	APPR
1706122			
RESPONSE TO REF #2			

### DEMOLITION KEYNOTES

- 1 REMOVE EXISTING 3/4" CW & HW RISER & 3" WASTE AND 2" VENT STACK IN THIS AREA.
- 2 REMOVE EXISTING 1-1/4" HW RISER.
- 3 REMOVE EXISTING 2" CW RISER.
- 4 REMOVE EXISTING 4" VENT RISER.
- 5 REMOVE EXISTING 4" WASTE RISER.
- 6 REMOVE EXISTING WASHER BOX AND ASSOCIATED PIPING.
- 7 REMOVE EXISTING 2" VENT.
- 8 REMOVE EXISTING 3" WASTE RISER.
- 9 REMOVE EXISTING FLOOR DRAIN.
- 10 REMOVE EXISTING WATER STORAGE TANK AND ASSOCIATED PIPING.
- 11 REMOVE EXISTING BACKFLOW PREVENTERS. THEY ARE MOUNTED ON TOP OF EACH OTHER. SHOWN THIS WAY FOR CLARITY.
- 12 REMOVE EXISTING PRESSURE REDUCING VALVE AND CW SHUTOFF VALVE.
- 13 REMOVE EXISTING SUMP PUMP AND ASSOCIATED PIPING FROM STEAM PIT.
- 14 REMOVE EXISTING SUMP PUMP AND ASSOCIATED PIPING FROM CRAWL SPACE.
- 15 REMOVE EXISTING FPWH AND ASSOCIATED PIPING.

NAVFAC

SEAL

033773

DANNY BRUSH

8/11/22

CRENSHAW CONSULTING

1000 W. 10TH ST. SUITE 200

PORTLAND, ME 04106

207-875-1075

APPROVED

FOR COMMANDER NAVFAC

ACTIVITY

SATISFACTORY TO DATE

DES PRC DRW PRC CHK DLB

PM/DM

BRANCH MANAGER

CHIEF ENGINEER

FIRE PROTECTION

NAVAL FACILITIES ENGINEERING SYSTEMS COMMAND

NAVAL FACILITIES ENGINEERING SYSTEMS COMMAND ~ MID-ATLANTIC

MID-ATLANTIC DC CORE

MARINE CORPS AIR STATION

CHERRY POINT, NC

REPAIRS AND IMPROVEMENTS TO

BEQ BLDG 4310

PARTIAL FIRST FLOOR PLANS - PLUMBING DEMOLITION

SCALE: AS INDICATED

EPROJECT NO.:

STA. PROJ. NO.:

WO# 7236002

NAVFAC DRAWING NO. 12866247

SHEET 82 OF 150

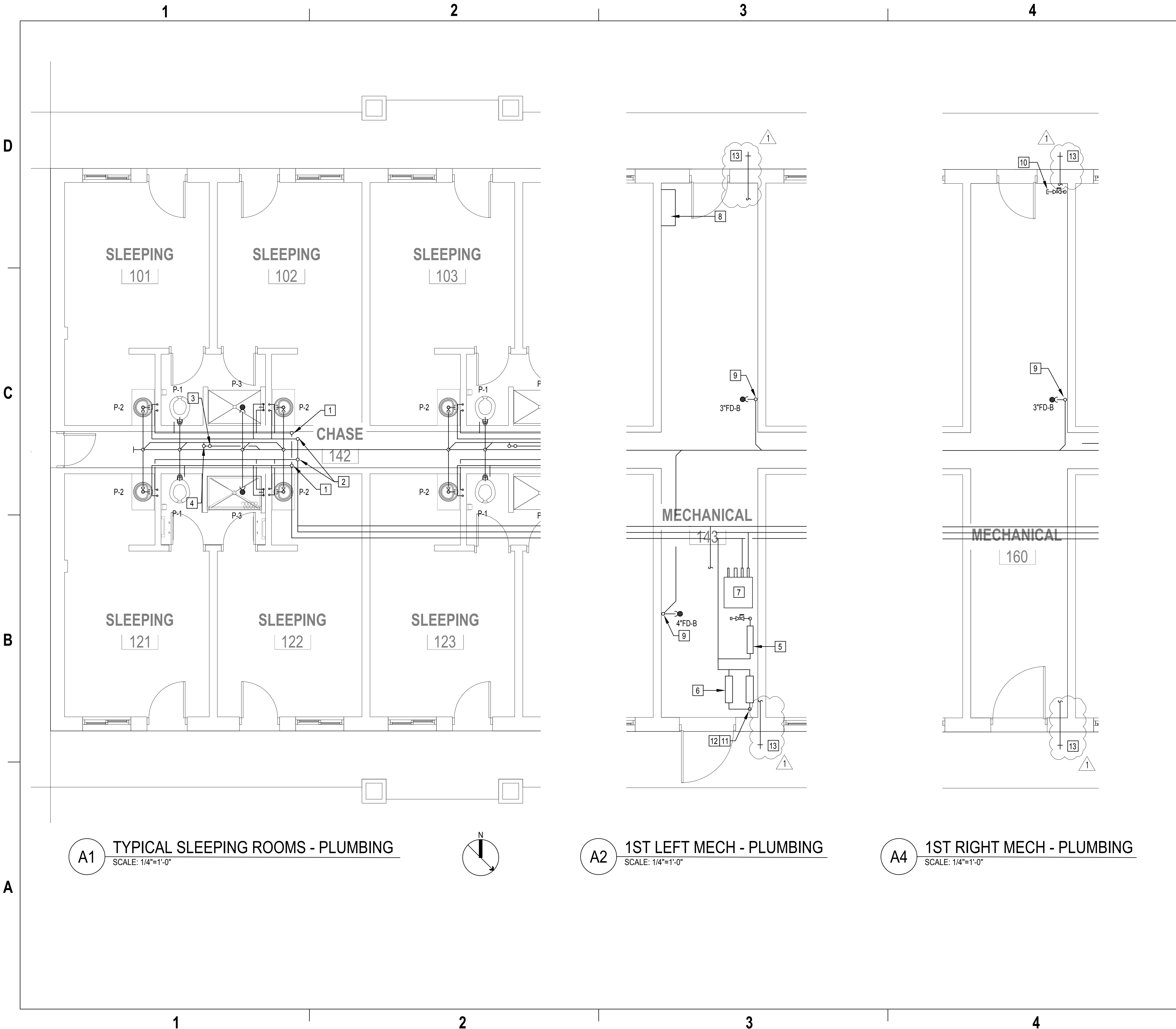
PD103

DRAWING REVISION: 25 AUGUST 2020

GRAPHIC SCALE: 1/4"=1'-0"

4' 0' 2' 4' 8'

DESIGN COMPLETE - ISSUE FOR CONSTRUCTION - AUGUST 2022



GENERAL SHEET NOTES

NEW WORK KEYNOTES

1

CW UP AND DOWN, SEE RISER ON SHEET P-703.

2

HW UP AND DOWN, SEE RISER ON SHEET P-703.

3

WASTE PIPING UP & DOWN, SEE RISER ON SHEET P-702.

4

VENT PIPING UP & DOWN, SEE RISER ON SHEET P-702.

5

1-1/4" BACKFLOW PREVENTER FOR CW MAKE-UP FOR HVAC.

6

BACKFLOW PREVENTERS SHALL BE STACKED HORIZONTALLY AT THIS LOCATION. SHOWN SEPARATED FOR DRAWING CLARITY. SEE SHEET P-501 FOR DETAIL.

7

FEED FORWARD INSTANTANEOUS STEAM SYSTEM. SEE SHEET P-501 FOR DETAIL.

8

PROVIDE SUMP PUMP IN PIT. PIPE DISCHARGE FROM SUMP PUMP INTO NEAREST FLOOR DRAIN (INDIRECT). SEE SHEET P-501 FOR DETAIL.

9

3" WASTE UP

10

PROVIDE 1-1/4" BALL VALVE FOR CW MAKE-UP FOR HVAC.

11

4" CW UP FROM BELOW SLAB TO OVERHEAD. ROUTE TO OTHER END OF MECHANICAL ROOM AND TIE INTO INCOMING SIDE OF BFP'S. LABEL ALL PIPING UPSTREAM OF BFP'S AS "UNPROTECTED. DO NOT TAP."

12

WATER METER. SEE BACKFLOW PREVENTER DETAIL C4 ON SHEET P-501 FOR FURTHER INFORMATION.

13

NEW FPWH.

1706122

RESPONSE TO RF# 12

DATE

SYN

DESCRIPTION

APPR

APPROVED

FOR COMMANDER NAVFAC

ACTIVITY

SATISFACTORY TO DATE

DES ☒ DES ☒ DRW ☒ PRC ☒ CHK ☒ DLB

PM/DM

BRANCH MANAGER

CHIEF ENGINEER

FIRE PROTECTION

DEPARTMENT OF THE NAVY

NAVAL FACILITIES ENGINEERING SYSTEMS COMMAND

NAVAL FACILITIES ENGINEERING SYSTEMS COMMAND ~ MID-ATLANTIC

MIDLANT DC CORE

MARINE CORPS AIR STATION

CHERRY POINT, NC

REPAIRS AND IMPROVEMENTS TO

BEQ BLDG 4310

PARTIAL FIRST FLOOR PLANS - PLUMBING

SCALE: AS INDICATED

PROJECT NO.:

STA. PROJ. NO.:

WO# 7236002

NAVFAC DRAWING NO. 12866251

SHEET 86 OF 150

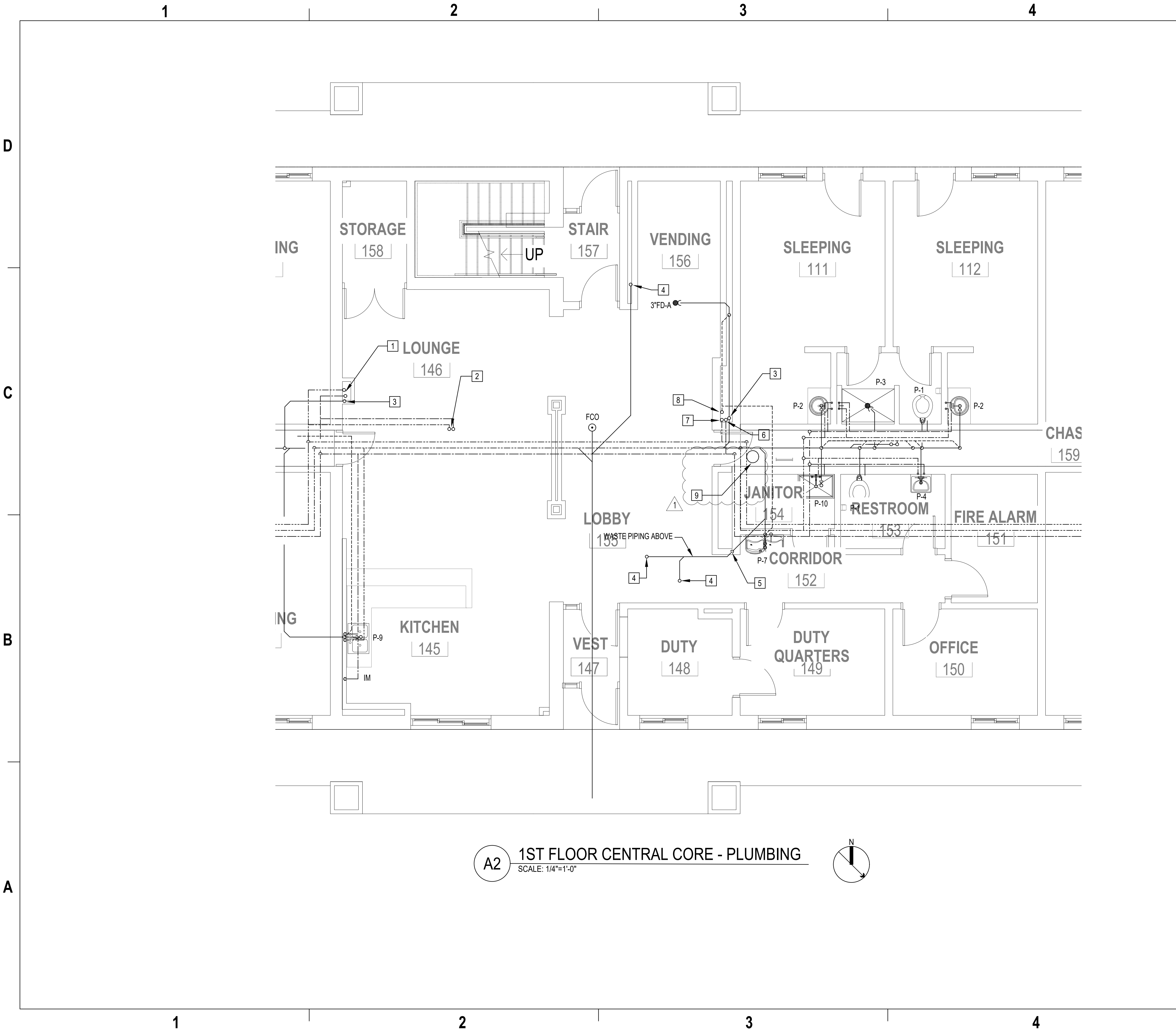
P-102

DRAWING REVISION: 25 AUGUST 2020

GRAPHIC SCALE: 1/4"=1'-0"

4' 0' 2' 4' 8'

DESIGN COMPLETE - ISSUE FOR CONSTRUCTION - AUGUST 2022



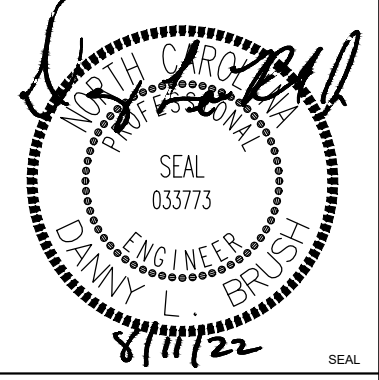
A2 1ST FLOOR CENTRAL CORE - PLUMBING  
SCALE: 1/4"=1'-0"

GENERAL SHEET NOTES

NEW WORK KEYNOTES

- 1 3/4" CW AND HW UP.
- 2 1" CW AND HW UP.
- 3 4" WASTE UP.
- 4 2" WASTE UP.
- 5 2" WASTE DOWN.
- 6 2" CW UP.
- 7 1" HW UP.
- 8 3" VENT UP.
- 9 NEW SUMP PUMP.

#	RESPONSE TO RFI #2	DATE	APPR
1706122			



APPROVED

FOR COMMANDER NAVFAC

ACTIVITY

SATISFACTORY TO DATE

DES PRC DRW PRC CHK DLB

PMCM

BRANCH MANAGER

CHIEF ENGINEER

FIRE PROTECTION

DEPARTMENT OF THE NAVY  
NAVAL FACILITIES ENGINEERING SYSTEMS COMMAND  
MID-ATLANTIC  
NAVAL STATION - NORFOLK, VA  
MARINE CORPS AIR STATION  
CHERRY POINT, NC  
REPAIRS AND IMPROVEMENTS TO  
BEQ BLDG 4310  
PARTIAL FIRST FLOOR PLANS - PLUMBING

SCALE: AS INDICATED

PROJECT NO.

STA. PROJ. NO.

WO# 7236002

NAVFAC DRAWING NO.

12866252

SHEET 87 OF 150

P-103

DRAWING REVISION: 26 AUGUST 2020

