

**HARBOR FREIGHT TOOLS' GAS DEMAND**

ROOFTOP UNIT (RTU-01, NEW)	240.0 CFH (240,000 BTU/HR)
ROOFTOP UNIT (RTU-02, NEW)	240.0 CFH (240,000 BTU/HR)
ROOFTOP UNIT (RTU-03, NEW)	240.0 CFH (240,000 BTU/HR)
ROOFTOP UNIT (RTU-04, NEW)	240.0 CFH (240,000 BTU/HR)
GAS-FIRED UNIT HEATER (UH-01, NEW)	120.0 CFH (240,000 BTU/HR)
<b>TOTAL GAS DEMAND</b>	<b>1,080.0 CFH (1,080,000 BTU/HR)</b>

- NOTES:**
- GAS PRESSURE APPEARS TO BE 7" W.C. CONFIRM GAS DELIVERY PRESSURE PRIOR TO STARTING WORK.
  - GAS PIPE SIZES ARE BASED ON THE 2020 INTERNATIONAL FUEL GAS CODE TABLE 402.4(2) SCHEDULE 40 METALLIC PIPE. INLET PRESSURE OF LESS THAN 2 PSI; PRESSURE DROP OF 0.5 IN W.C AND 200 FEET (TOTAL LENGTH OF PIPE).

**NOTE:**  
PLUMBING CONTRACTOR SHALL RELOCATE ALL REQUIRED PIPING; WATER, VENTS, GAS, SANITARY WASTE, ETC., AS NECESSARY TO MAINTAIN A MINIMUM CLEARANCE OF 13'-6" ABOVE FINISHED FLOOR.

**NOTE:**  
THE FORMER TENANT WAS A SUPERMARKET. THERE ARE MULTIPLE FLOORHUB DRAINS, FLOOR SINKS, CLEANOUTS, WATER LINES, ETC... LOCATED THROUGHOUT THE LEASE SPACE. REFER TO PLUMBING DEMOLITION NOTES ON THIS DRAWING FOR ADDITIONAL INFORMATION.

**GAS PIPING NOTES:**

- PLUMBING CONTRACTOR TO NOTIFY THE AUTHORITY HAVING JURISDICTION WHEN THE INSTALLATION IS READY FOR INSPECTION (AT ROUGH-IN PRIOR TO COVERING AND FINAL).
- PLUMBING CONTRACTOR SHALL FURNISH AND INSTALL GAS PRESSURE REGULATOR, MANUAL SHUT-OFF VALVE, DRIPS AND/OR SEDIMENT TRAPS AT EACH PIECE OF EQUIPMENT AND AT THE OUTLET OF THE METER. VALVES AND DRIPS SHALL BE READILY ACCESSIBLE TO PERMIT CLEANING, EMPTYING OR SERVICING.
- GAS PIPING IS SIZED WITH LONGEST LENGTH METHOD AND BASED ON THE INTERNATIONAL FUEL GAS CODE; SCHEDULE 40 METALLIC PIPE TABLE 402.4(2).
- PLUMBING CONTRACTOR SHALL BE RESPONSIBLE FOR PRESSURE TESTING AND INSPECTION PRIOR TO ACCEPTANCE, PER NFPA 54. TEST PRESSURE SHALL BE NO LESS THAN 1-1/2 TIMES THE MAXIMUM WORKING PRESSURE, BUT NOT LESS THAN 3 PSI. TEST SHALL BE NOT LESS THAN 1/2 HOUR PER 500 CF OF PIPE VOLUME.
- GAS PIPING ABOVE GROUND SHALL BE SCHEDULE 40 BLACK STEEL WITH 125 POUND BLACK MALLEABLE IRON SCREWED FITTINGS FOR 2" AND SMALLER AND WELDED FOR 2-1/2" AND ABOVE. GAS PIPING COMPOUND AT JOINTS SHALL BE PER NFPA BULLETIN #54 AND LOCAL CODES. GAS VALVES SHALL BE UL LISTED FOR GAS SERVICE SUCH AS DEZURICK MODEL S-425 FOR 2" AND LESS AND MODEL F-425 FOR 2-1/2" AND LARGER. NOTE: WELDED PIPE TO BE WITH APPROVED WELD-LO-LET FITTINGS.
- GAS PIPING SERVING HARBOR FREIGHT TOOLS' LEASE SPACE IS TO BE PRIMED AND PAINTED WITH TWO (2) COATS OF RUST RESISTANT PAINT. PAINT EXTERIOR GAS PIPING TO MATCH BUILDING COLOR AND NEW GAS PIPING ON ROOF SHALL BE PAINTED SAFETY YELLOW AS REQUIRED BY SECTION 404 OF THE INTERNATIONAL FUEL GAS CODE.

**GAS PIPING HANGER SPACING SCHEDULE**

STEEL PIPE, NOMINAL SIZE OF PIPE (INCHES)	SPACING OF SUPPORT (FEET)	NOMINAL SIZE OF TUBING, SMOOTH-WALL (INCHES O.D.)	SPACING OF SUPPORT (FEET)
1/2	6	1/2	4
3/4 TO 1	8	5/8 OR 3/4	6
1-1/4 OR LARGER (HORIZONTAL)	10	7/8 OR 1 (HORIZONTAL)	8
1-1/4 OR LARGER (VERTICAL)	EVERY FLOOR LEVEL	1 OR LARGER (VERTICAL)	EVERY FLOOR LEVEL

**PLUMBING DEMISE CRITERIA:**

**WATER SERVICE:**  
THERE IS AN EXISTING 1-1/2" DOMESTIC WATER SERVICE AND METER LOCATED NEAR THE FIRE SERVICE IN THE REAR OF THE HARBOR FREIGHT TOOLS' LEASE SPACE. HARBOR FREIGHT TOOLS TO SPLIT THE SERVICE AND PROVIDE THE ADJACENT LEASE SPACE WITH A 1" WATER LINE STUBBED INTO THE ADJACENT LEASE SPACE. NOTE: EXISTING WATER METER TO BE UTILIZED FOR HARBOR FREIGHT TOOLS' LEASE SPACE. FIELD VERIFY EXACT SIZE AND LOCATION OF EXISTING INCOMING DOMESTIC WATER SERVICE SERVING HARBOR FREIGHT TOOLS' LEASE SPACE PRIOR TO STARTING WORK. THERE IS NO BACKFLOW PREVENTER CURRENTLY INSTALLED ON THE DOMESTIC WATER SERVICE, FURNISH AND INSTALL BACKFLOW PREVENTER AS REQUIRED.

**SEWER SERVICE:**  
EXISTING TOILET ROOMS ARE LOCATED IN THE REAR OF THE SPACE, UNDERNEATH THE EXISTING MEZZANINE. HARBOR FREIGHT TOOLS TO TRENCH NEW SANITARY LINE APPROXIMATELY 50 FEET TO THE NEW RESTROOM LOCATION AT THE SALES STOCK DIVIDE AND TO REWORK CONCRETE AT REQUIRED. PLUMBING CONTRACTOR SHALL FIELD VERIFY EXACT LOCATION, SIZE, DIRECTION OF FLOW AND INVERT ELEVATION OF EXISTING SANITARY SEWER PRIOR TO STARTING ANY WORK. ALL NEW CONCRETE PATCHING FROM TRENCHING OF EXISTING CONCRETE SLAB FLOOR SHALL BE PATCHED TO MATCH EXISTING MATERIALS BY GENERAL CONTRACTOR. HARBOR FREIGHT TOOLS' PLUMBING CONTRACTOR SHALL FLUSH EXISTING SANITARY SYSTEM TO ENSURE IT IS IN PROPER WORKING CONDITION. NOTE: HARBOR FREIGHT TOOLS TO PROVIDE A NEW 4" SANITARY SEWER STUB INTO THE ADJACENT LEASE SPACE, JUST PAST THE NEW DEMISING WALL.

**GAS SERVICE:**  
THERE IS AN EXISTING 1-1/2" GAS LINE RUNNING INTO THE METER WITH MULTIPLE 2" LINES OUT OF THE METER SERVING THE SPACE. HARBOR FREIGHT TOOLS TO MAINTAIN EXISTING SERVICE AND PIPING FOR THE ADJACENT LEASE SPACE, AND TO INSTALL A NEW METER AND PIPING AS REQUIRED FOR HARBOR FREIGHT TOOLS' LEASE SPACE. COORDINATE WORK WITH LOCAL GAS COMPANY. NEW GAS DEMAND = 1,080.0 CFH. FIELD VERIFY EXISTING CONDITIONS PRIOR TO STARTING WORK.

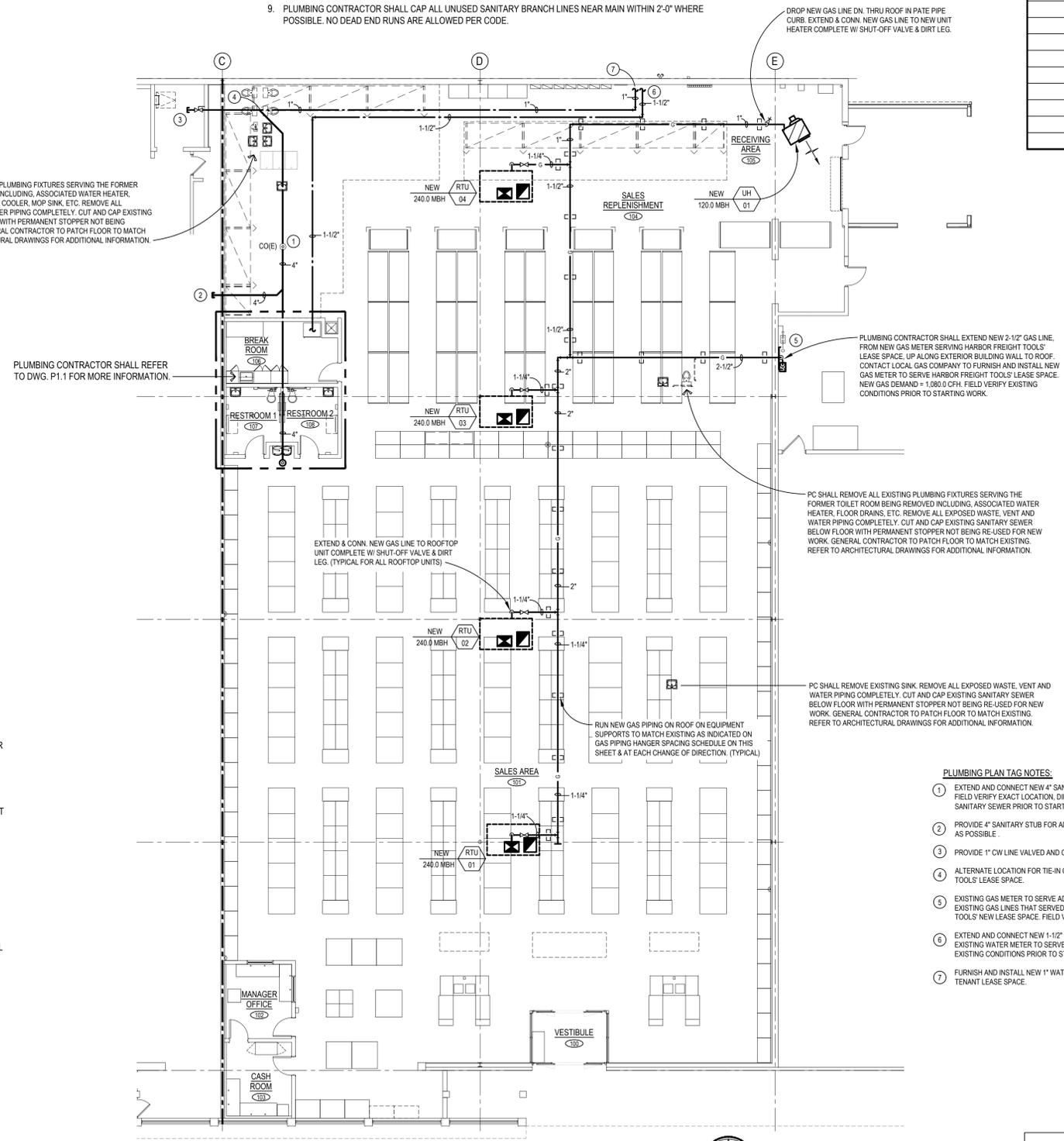
**STORM SERVICE:**  
WATER EVACUATES ROOF TO THE FRONT OF THE SPACE TO ROOF DRAINS TO AN INTERIOR COLLECTOR TO A SUBGRADE SYSTEM HIDDEN IN THE SPACE. PLUMBING CONTRACTOR SHALL INSULATE ANY MISSING OR DAMAGED INSULATION ON THE INTERIOR STORM LEADER AND ROOF DRAIN SUMP. PIPE INSULATION SHALL BE 1" THICK SIMILAR TO DOMESTIC COLD WATER. PLUMBING CONTRACTOR TO COORDINATE WITH GENERAL CONTRACTOR FOR CLEANING OF ROOF DRAIN STRAINERS TO ENSURE PROPER WORKING CONDITION.

**PLUMBING DEMOLITION GENERAL NOTES:**

- THE PLUMBING CONTRACTOR SHALL FIELD VERIFY LOCATIONS OF ALL EXISTING PIPING, EQUIPMENT AND FIXTURES REQUIRING DEMOLITION. THE CONTRACTOR SHALL COORDINATE ALL DEMOLITION WORK WITH THE ARCHITECT, GENERAL CONTRACTOR, AND WITH THE OWNER.
- THE PLUMBING CONTRACTOR SHALL CUT EXISTING SANITARY AND WASTE PIPING 3" BELOW FLOOR AND PLUG WITH PERMANANT STOPPER.
- THE PLUMBING CONTRACTOR SHALL REMOVE ANY FLOOR DRAINS THAT ARE NOT USED FOR NEW SPACE LAYOUT. CUT WASTE LINE TO 3" BELOW FLOOR AND PLUG WITH PERMANANT STOPPER.
- THE PLUMBING DEMOLITION WORK SHALL BE PERFORMED EXCLUSIVELY BY THE PLUMBING CONTRACTOR UNLESS OTHERWISE INDICATED.
- ALL PATCHING AND SEALING OF WALLS, FLOORS, CEILINGS, ETC... TO BE DONE BY GENERAL CONTRACTOR.
- THE PLUMBING CONTRACTOR TO MAKE ALL FINAL PLUMBING CONNECTIONS TO FIXTURES & EQUIPMENT.
- THE PLUMBING CONTRACTOR SHALL CUT AND CAP UNUSED EXISTING WATER AND VENT LINES BELOW FLOOR.
- THE PLUMBING CONTRACTOR SHALL REMOVE ALL UNUSED EXPOSED EXISTING WASTE, VENT, GAS AND WATER PIPING COMPLETE.
- PLUMBING CONTRACTOR SHALL CAP ALL UNUSED SANITARY BRANCH LINES NEAR MAIN WITHIN 2'-0" WHERE POSSIBLE. NO DEAD END RUNS ARE ALLOWED PER CODE.

**PLUMBING LEGEND**

SYMBOL	DESCRIPTION
---	COLD WATER PIPING (CW)
---	HOT WATER PIPING (HW)
---	SANITARY SEWER (BELOW GRADE)
⊙	CLEANOUT
---	SANITARY VENT PIPING
---	GAS PIPING
---	SHUT-OFF VALVE IN RISER
---	SHUT-OFF VALVE
---	RISER DOWN (ELBOW)
---	RISER UP (ELBOW)
---	BRANCH-TOP CONNECTION
---	BRANCH-BOTTOM CONNECTION
---	TEE
---	ELBOW
WC	WATER CLOSET
LAV	LAVATORY
SK	SINK
DF	DRINKING FOUNTAIN
MS	MOP SINK
LL	LANDLORD
PC	PLUMBING CONTRACTOR
GC	GENERAL CONTRACTOR
EC	ELECTRICAL CONTRACTOR
MC	MECHANICAL CONTRACTOR



**PLUMBING PLAN TAG NOTES:**

- EXTEND AND CONNECT NEW 4" SANITARY SEWER INTO LOCATION OF EXISTING CLEANOUT. FIELD VERIFY EXACT LOCATION, DIRECTION OF FLOW, AND INVERT ELEVATION OF EXISTING SANITARY SEWER PRIOR TO STARTING WORK.
- PROVIDE 4" SANITARY STUB FOR ADJACENT LEASE SPACE. 4" SANITARY STUB TO BE AS DEEP AS POSSIBLE.
- PROVIDE 1" CW LINE VALVED AND CAPPED FOR ADJACENT LEASE SPACE.
- ALTERNATE LOCATION FOR TIE-IN OF NEW 4" SANITARY SEWER SERVING HARBOR FREIGHT TOOLS' LEASE SPACE.
- EXISTING GAS METER TO SERVE ADJACENT TENANT'S LEASE SPACE. CUT AND CAP ANY EXISTING GAS LINES THAT SERVED GAS-FIRED EQUIPMENT LOCATED WITHIN HARBOR FREIGHT TOOLS' NEW LEASE SPACE. FIELD VERIFY EXISTING CONDITIONS PRIOR TO STARTING WORK.
- EXTEND AND CONNECT NEW 1-1/2" CW LINE INTO EXISTING 1-1/2" METERED CW LINE. NOTE: EXISTING WATER METER TO SERVE HARBOR FREIGHT TOOLS' LEASE SPACE. FIELD VERIFY EXISTING CONDITIONS PRIOR TO STARTING WORK.
- FURNISH AND INSTALL NEW 1" WATER SUBMETER AND 1" WATER LINE TO SERVE ADJACENT TENANT LEASE SPACE.

**PLUMBING PLAN**  
SCALE: 3/32" = 1'-0"

**NOTE:** PLUMBING CONTRACTOR SHALL REFER TO DWG. M1.3 FOR PLUMBING SPECIFICATIONS



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**REVISIONS**

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**PLUMBING PLAN**  
DATE: 9/22/21  
JOB NO.: 20420  
**P1.0**  
SHEET NO.