DEMOLITION - PLUMBING

GENERAL REQUIREMENTS

PROCEED WITH THE COMPLETION OF THE WORK IN MUCH A MANNER AS TO CAUSE THE LEAST POSSIBLE INTERFERENCE WITH THE OWNER'S OPERATION. ALL WORK SHALL BE DONE IN A MANNER AND TIME ACCEPTABLE TO THE

ANY EXISTING EQUIPMENT NOT SHOWN ON THE DRAWINGS AND WHICH ARE LOGICALLY EXPECTED TO CONTINUE IN SERVICE AND WHICH MAY BE INTERRUPTED OR DISTURBED DURING CONSTRUCTION, SHALL BE RECONNECTED IN AN APPROVED MANNER. IN ADDITION, ANY EXISTING EQUIPMENT REQUIRING RELOCATION OR REROUTING AS RESULT OF CONSTRUCTION, SHALL BE CONSIDERED AS PART OF THE WORK OF THIS BRANCH AND SHALL BE DONE BY THE CONTRACTOR WITH NO ADDITIONAL COMPENSATION.

THIS CONTRACTOR SHALL BE RESPONSIBLE FOR THE RECONSTRUCTION OF ANY DEMOLISHED AREAS THAT REQUIRE RECONSTRUCTION AS A RESULT OF SPECIFIED WORK. COORDINATE WITH OTHER DISCIPLINES TO MINIMIZE DEMOLITION AND RECONSTRUCTION.

DEMOLITION AND INSTALLATION OF NEW PLUMBING SYSTEMS SHALL REQUIRE SCHEDULED PHASES OF CONSTRUCTION.

DRAWINGS ARE BASED ON THE BEST INFORMATION AVAILABLE. FOR AREAS BEING REMODELED, WORK SHOWN REFLECTS INFORMATION ON ORIGINAL CONSTRUCTION DRAWINGS, OR BY SITE EVALUATION; IT IS NOT GUARANTEED 100 PERCENT ACCURATE. THIS CONTRACTOR MUST FIELD VERIFY CONDITIONS AND MAKE NECESSARY ADJUSTMENTS WITHOUT EXTRA COSTS TO THE PROJECT TO SUIT ACTUAL NEEDS.

THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE WORK NORMALLY DONE BY OTHER TRADES, AS MAY BE NECESSARY, TO FACILITATE THE INSTALLATION OF WORK IN THE EXISTING BUILDING. SUCH WORK THAT IS NORMALLY DONE BY OTHER TRADES, AND IS NOT COVERED AS A PART OF OTHER DIVISIONS, SHALL BE DONE UNDER THE DIRECTION AND AT THE EXPENSE OF THIS CONTRACTOR.

GENERAL NOTES

- 1. COORDINATE WITH OTHER TRADES TO ELIMINATE ANY CONFLICTS BETWEEN PIPING, DUCTWORK, ELECTRICAL WORK, ETC.
- 2. FOR DETAILS, EQUIPMENT CONNECTIONS, AND PIPES SIZES NOT SHOWN ON FLOOR PLANS, REFER TO DETAILS, RISERS AND SCHEDULES.
- 3. PIPE ROUTING IS SHOWN IN APPROXIMATE LOCATIONS.
- 4. PLUMBING CONTRACTOR SHALL COORDINATE WITH MECHANICAL AND GENERAL CONTRACTORS FOR VERTICAL CHASE AND WALL REQUIREMENTS.
- 5. VERIFY ALL PLUMBING EQUIPMENT CONNECTION AND ROUGH-IN REQUIREMENTS BEFORE INSTALLATION.
- 6. FINISHED FLOOR ELEVATION = 100.00 UNLESS DENOTED OTHERWISE.
- 7. PLUMBING CONTRACTOR SHALL PROVIDE ACCESSIBILITY TO ALL VALVES AND CONTROL DEVICES. FURNISH ACCESS PANELS WHERE SHOWN OR REQUIRED FOR ACCESS TO ALL CONCEALED VALVES OR OTHER EQUIPMENT FURNISHED UNDER THIS CONTRACT WHERE NO OTHER MEANS
- 8. PLUMBING CONTRACTOR TO SEE ARCHITECTURAL PLANS FOR CHANGES IN CEILING HEIGHTS.
- 9. CONTRACTOR SHALL BE RESPONSIBLE FOR INSTALLATION OF ALL REQUIRED PIPING OFFSETS FOR COMPLETE PLUMBING SYSTEM INSTALLATION.
- 10. GAS PIPE SIZING BASED ON 2 PSIG PRESSURE.
- 11. DRAWING INTENT IS TO INDICATE GENERAL ARRANGEMENT, DESIGN AND INTENT OF WORK, AND IS PARTIALLY DIAGRAMMATIC. DRAWING SHALL NOT BE SCALED.

| | PLUMBING FIXTURE SCHEDULE | | | | | | | | | | | |
|---------|---------------------------|---------------|-------------------|--------------|-------------------------|--------------|-------------------------------|----------|---------------|-----------------|--------------|--|
| TAG | DESCRIPTION | MANUFACTURER | FIXTURE | FLUS | SH VALVE/FAUCET | DRA | WATER SUPPLY SIZES SANITARY S | | SANITARY SIZE | SHUT-OFF VALVES | REMARKS | |
| | | | MODEL NUMBER | MANUFACTURER | MODEL NUMBER | MANUFACTURER | MODEL NUMBER | HOT (IN) | COLD (IN) | (IN) | (Y,N OR N/A) | |
| EW/ES-1 | EYE WASH/EMERGENCY SHOWER | BRADLEY | S19-310 | | | | | NOT | E 1 | | Y | |
| FCO | FLOOR CLEANOUT | GIESE COMPANY | CUSTOM FABRICATED | | | | | | | | N/A | CUSTOM FABRICATED OF STAINLESS STEEL, 2 |
| FD-1 | FLOOR DRAIN | GIESE COMPANY | HDIT12 | | | | | | | 4 | N/A | 2 |
| HD-1 | HUB DRAIN | | FABRICATED BY PC | | | | | | | 4 | N/A | FURNISH W/ DEEP SEAL TRAP, 7 |
| MV-1 | MIXING VALVE | POWERS | ES200 | | | | | 3/4 | 3/4 | | Y | |
| S-1 | SINK | JUST MFG. | NSFB-130 | SLOAN | ETF-500-S-BDT-EL-248-40 | JUST MFG. | J-35-BLA-316 | 1/2 | 1/2 | 1-1/2 | Y | FURNISH W/ JT-150 P-TRAP |
| TD-1 | TRENCH DRAIN | ACO | CK1000S | | | | | | | 4 | N/A | 2, 4 |
| WCO | WALL CLEANOUT | WADE | 8560 | | | | | | | | N/A | FURNISH W/ 8480R COVER |
| WC-1 | WATER CLOSET | KOHLER | KINGSTON K-4330 | SLOAN | ROYAL 111 | | | | 1-1/2 | 3 | Y | FURNISH W/ K-4670-C SEAT |
| WC-2 | ADA WATER CLOSET | KOHLER | KINGSTON K-4330 | SLOAN | ROYAL 111 | | | | 1-1/2 | 3 | Y | ADA COMPLIANT, FURNISH W/ K-4670-C SEAT, 3 |
| WD-1 | WASHDOWN STATION | STRAHMAN | M-750TM | | | | | 3/4 | 3/4 | | Y | 5,6 |

NOTES: 1. EW/ES-1 IS SUPPLIED WITH TEMPERED WATER FROM MV-1. ANSI LOAD CLASS — SPECIAL DUTY (OVER 10,000 LBS.)

3. REUSE EXISTING WATER CLOSET(S) SÀLVAGED DURING DÉMOLITION. DATA GIVEN FOR INFORMATION/REPLACEMENT PURPOSES. 4. PROVIDE WITH STAINLESS STEEL SLOTTED GRATE AND C600 CATCH BASIN WITH STAINLESS STEEL SEDIMENT BUCKET. 5. PROVIDE WITH 50 FT. OF WHITE HOSE ASSEMBLY E.

6. PROVIDE WITH WATTS 9D BACKFLOW PREVENTER. 7. PROVIDE STAINLESS HUB DRAIN IN SLICING AREA AND COOLER AREA.

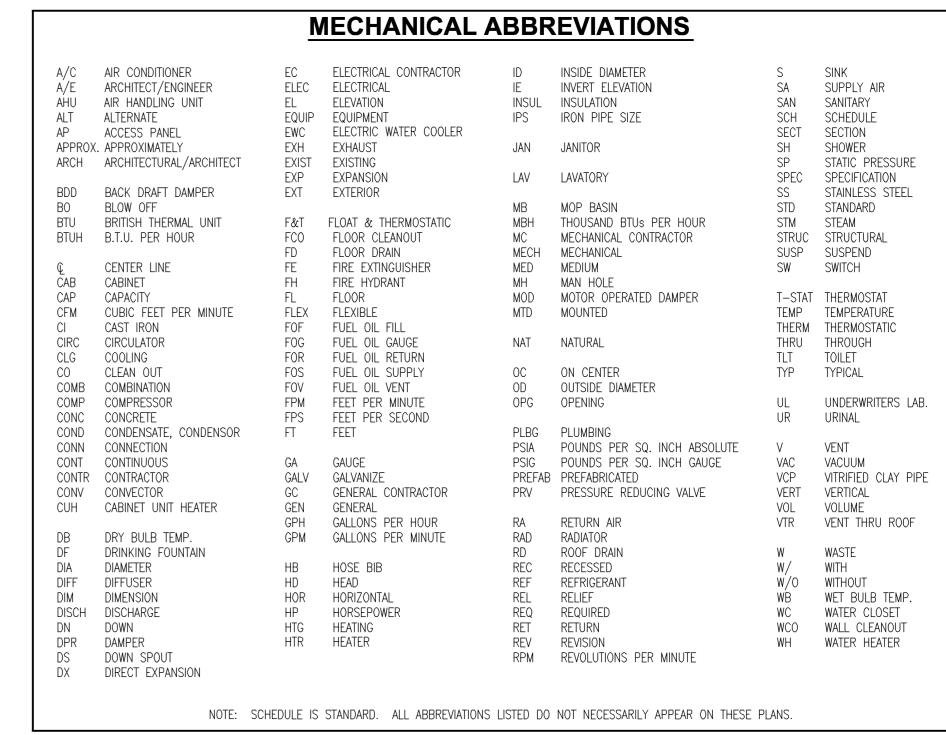
| | PUMP SCHEDULE | | | | | | | | | | | | | | |
|------|---------------|--------------|----------------|------------|-------|----------------|-------|-------|---------|-----------|---------|-------|-----------|------------|---------|
| UNIT | SERVICE | LOCATION | MANUFACTURER | MODEL | FLOW | TOTAL | MOTOR | MOTOR | SUCTION | DISCHARGE | | ELECT | RICAL DAT | ГА | REMARKS |
| NO. | | | | | RATE | HEAD | SIZE | SPEED | SIZE | SIZE | VOLTAGE | PHASE | STARTER | DISCONNECT | |
| Р | | | | | (GPM) | (FT. OF WATER) | (HP) | (RPM) | (IN.) | (IN.) | | | BY: | BY: | |
| 2 | WH-3 | UTILITY AREA | BELL & GOSSETT | NBF-12U/LW | 0.5 | 10 | 55W | 2800 | 1/2 | 1/2 | 115 | 1 | PC | EC | |

| | | | | SU | MP P | UM | P S | CHI | EDU | LE | | | | | |
|------|--------------|--------------|----------|-----------|---------------|-------|-------|-----------|----------|-------|---------|-------|-----------|------------|---------|
| UNIT | LOCATION | MANUFACTURER | MODEL | FLOW RATE | TOTAL HEAD | MOTOR | MOTOR | PUMP | BASIN | BASIN | | ELECT | RICAL DAT | ΓA | REMARKS |
| NO. | | | | (GPM) | (FT OF WATER) | SIZE | SPEED | DISCHARGE | DIAMETER | DEPTH | VOLTAGE | PHASE | STARTER | DISCONNECT | |
| SP | | | | (EA) | | (HP) | (RPM) | (IN.) | (IN.) | (IN.) | | | BY: | BY: | |
| 1 | UTILITY AREA | BJM PUMPS | SKZ15CSS | 30 | 40 | 2 | 3450 | 3 | 30 | 72 | 460 | 3 | PC | EC | |

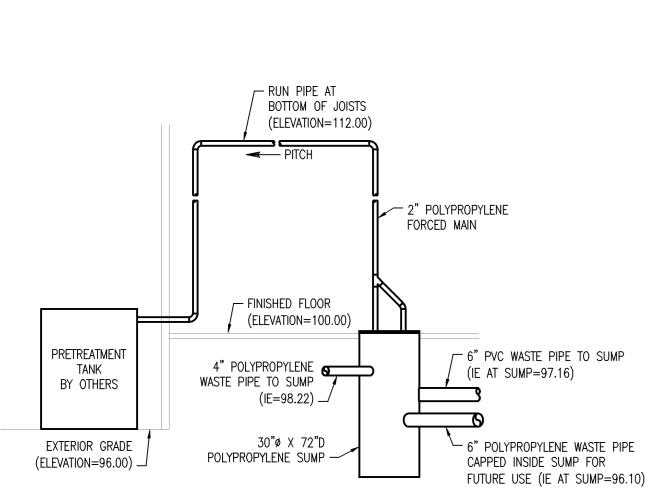
| | DOMESTIC HOT WATER HEATER SCHEDULE | | | | | | | | | | | | |
|------|---|--------------|-----------|--------|-------|---------|-------------|----------|----------|---------|-------|--------|---------|
| UNIT | LOCATION | MANUFACTURER | MODEL NO. | INPUT | AIR | EXHAUST | TEMPERATURE | RECOVERY | TANK | ELECT | RICAL | UNIT | REMARKS |
| NO. | | | | | INLET | OUTLET | RISE | CAPACITY | CAPACITY | VOLTAGE | PHASE | WEIGHT | |
| WH | | | | (MBH) | (IN.) | (IN.) | (°F) | (GPH) | (GAL.) | | | (LBS.) | |
| 3 | UTILITY AREA | CAMUS | MFNW2500 | 2500.0 | 14 | 14 | 130 | 1960 | 140 | 115 | 1 | 4000 | 1, 2, 3 |
| | OTES: 1. UNIT IS PACKAGED MOUNTED SKID CONSISTING OF (1) WATER HEATER, (1) 1/3 HP PUMP, AND (1) 140 GALLON STORAGE TANK. 2. SINGLE POINT POWER CONNECTION TO SKID BY EC REQUIRED. 3. COMBUSTION FAN = 1HP (16 AMPS), PUMP = 1/3HP (8 AMPS). | | | | | | | | | | | | |

THERMOMETER ----

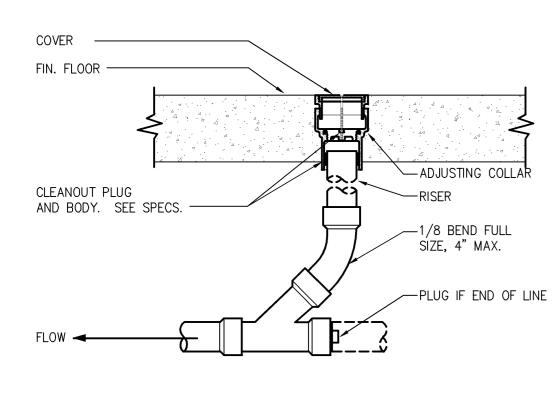
COLD WATER



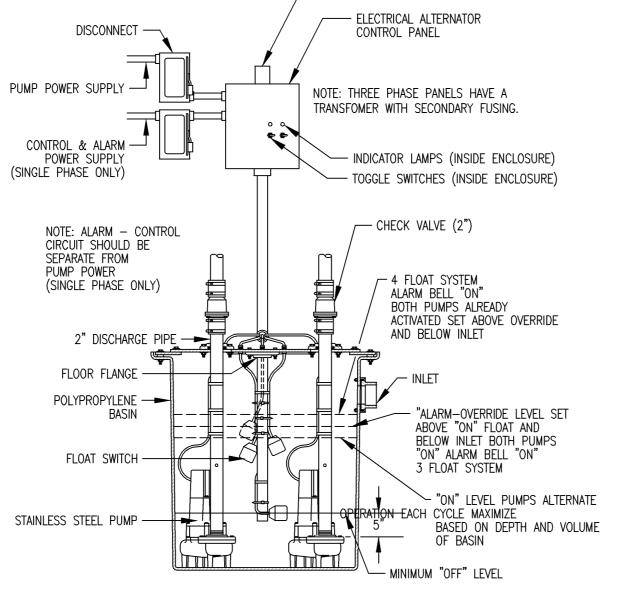
| | MPRISE A STANDARD LIST; | NICAL ABBREVIA | | |
|--|--|---|--|--|
| | — VAC VACUUM — DI DEIONIZED WATER — SW SOFT WATER — FS FIRE LINE — FS FIRE SPRINKLER — CA COMPRESSED AIR — CS CONDENSER WATER SUPPLY | | 1 2 3 4 5 1 2 3 4 5 10 11 12 13 18 19 20 21 22 1. SIDE CONNECTION 12 2. ELBOW DOWN 13 3. ELBOW UP 10 4. SHUT-OFF VALVE 11 5. BALANCING VALVE 11 6. CONTROL VALVE 11 7. PRESSURE REDUCING VALVE 2 | 6 7 8 9 14 15 16 17 23 24 25 26 4. EXP. JOINT W/ PIPE GUIDE 5. REDUCER 6. STRAINER 7. UNION 8. DIRECTION OF FLOW 9. STEAM TRAP 0. PITCH PIPE DOWN |
| —————————————————————————————————————— | — CR— CONDENSER WATER RETURN — CHWS— CHILLED WATER SUPPLY — CHWR— CHILLED | —HPC— HIGH PRESSURE CONDENSATE —G— GAS —FOF— FUEL OIL FILL | 9. CHECK VALVE 2 10. AIR VENT 2 11. PRESSURE GAUGE 2 12. THERMOMETER 2 | 1. VALVE IN VERTICAL PIPE 2. 3—WAY CONTROL VALVE 3. CIRCUIT SETTER 4. BALL VALVE 5. BUTTERFLY VALVE 6. TRIPLE DUTY VALVE |
| HOT WATER | WATER RETURN REFRIGERANT LIQUID RS——RS——REFRIGERANT SUCTION HOT WATER HEATING SUPPLY HOT WATER HEATING RETURN | —FOS— FUEL OIL SUPPLY —FOR— FUEL OIL RETURN —FOV— FUEL OIL VENT —FOG— FUEL OIL GAUGE | NUMBER OF DETAIL M3 NUMBER OF SHEET RTU EQUIPMENT TYPE | WHERE SECTION APPEARS |
| ⊕ED FLOOR DRAIN ③RD ROOF DRAIN ○DS DOWN SPOUT → HB HOSE BIB | | PENDANT TYPE | THERMOSTAT CONNECT NEW TO EXISTING AIR FLOW ON NEGATIVE SIDE AIR FLOW ON SUPPLY SIDE | LINETYPES ——————————————————————————————————— |











----- ALARM LIGHT



4" X 4" TREATED WOOD

BETWEEN BLOCK & ROOF. -

THIS CONTRACTOR SHALL BE RESPONSIBLE

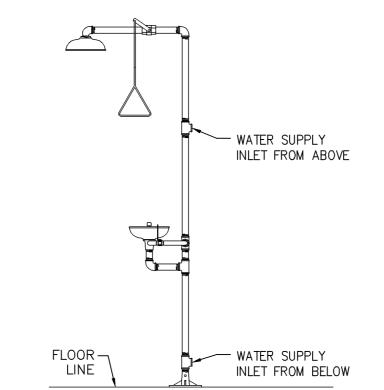
S GAS PIPE SUPPORT

FOR LOCATING SUPPORTS 8'-0" O.C.,

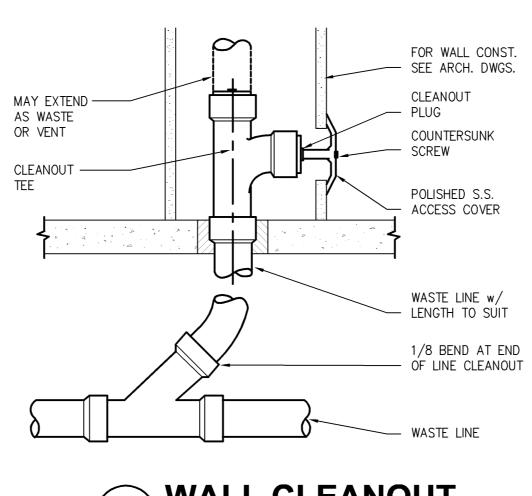
END OF EACH LOOP & NEAR ELBOWS.

BLOCK. PROVIDE SCRAP

PIECE OF ROOFING



EYE-WASH STATION



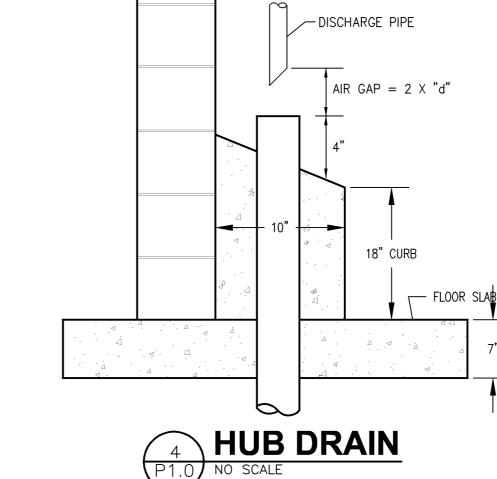


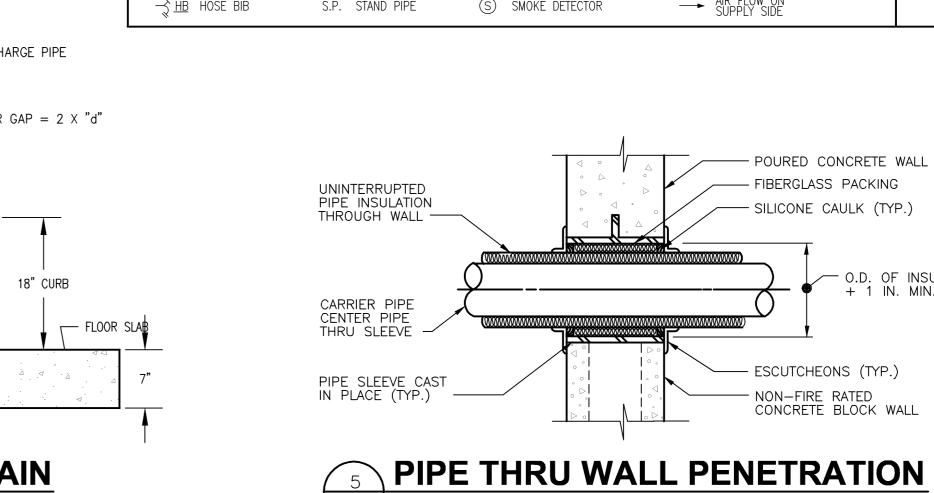
STRAP GAS PIPE TO

- FASTEN STRAP TO

ROOF

BLOCK





| — —— "A" | |
|-----------|--|
| | - HANGER ROD |
| | |
| | -VAPOR BARRIER INSULATION |
| | SHEET STEEL SHIELD AT LEAST 12" LONG |

CLEVIS HANGER

| | PIPE HANGER | | HANGER ROD | | | |
|--------|-----------------|-----------------|------------|--------|-----------------|--|
| PIPE | MAXIMUM SPACING | IN FEET OF SPAN | ll | ROD | ENGINEER DATA | |
| SIZĒ | SCH. 40 | CU TUBING | | SIZE | RECOMMENDED | |
| 1/2" | 7' | 5' | | "A" | MAX LOAD (LBS.) | |
| 3/4" | 7' | 5' | [| 3/8" | 610 | |
| 1" | 7' | 6' | ll | 1/2" | 1130 | |
| 1-1/4" | 7' | 7' | l | 5/8" | 1810 | |
| 1-1/2" | 9' | 8' | ll | 3/4" | 2710 | |
| 2" | 10' | 8' | ll | 7/8" | 3770 | |
| 2-1/2" | 11' | 9' | ll | 1" | 4960 | |
| 3" | 12' | 10' | l | 1-1/8" | 6230 | |
| 3-1/2" | 13' | 11' | ll | 1-1/4" | 8000 | |
| 4" | 14' | 12' | ll | 1-3/8" | 9470 | |
| 5" | 16' | 13' | | 1-1/2" | 11630 | |
| 6" | 17' | 14' | | | | |
| 8" | 19' | 16' | | | | |

- POURED CONCRETE WALL

- SILICONE CAULK (TYP.)

O.D. OF INSULATION + 1 IN. MIN.

- FIBERGLASS PACKING

— ESCUTCHEONS (TYP.)

CONCRETE BLOCK WALL

NON-FIRE RATED

DOMESTIC HW MIXING VALVE

PIPING SIZED ON PLANS -7

140° \

— THERMOSTATIC MIXING VALVE

| | | CLEVIS HANGER |
|---|------|----------------------|
| 1 | P1.0 | NO SCALE |

1. FOR PRODUCTION AREA, RODS SHALL BE PARTIALLY THREADED STAINLESS STEEL.

> **DRAWING LIST** P21.0 PLUMBING SYMBOLS, ABBREVIATIONS, SCHEDULES & DETAILS P22.0 PLUMBING PLANS

0412A

DRAWING NO.

ОШ

Port

SYMBOLS, ATIONS, & DETAIL!

LUMBING SY ABBREVIATHEDULES &