

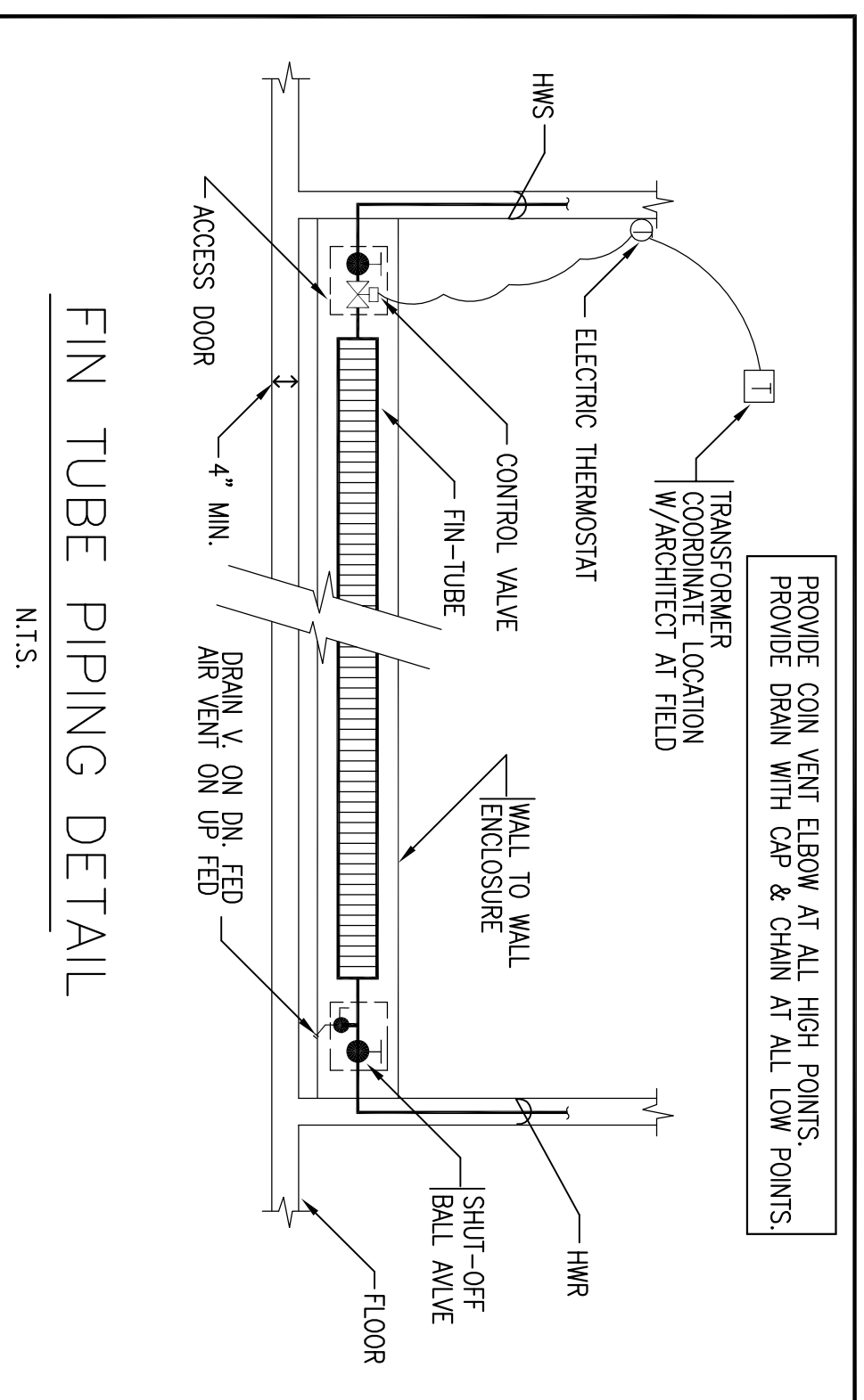
SYMBOL	DESCRIPTION
	HEAVY LINES INDICATE NEW WORK
	LIGHT LINES INDICATE EXISTING TO REMAIN
	DASHED LINES INDICATE EXISTING TO BE REMOVED
	TRANSITION SECTION
	SUPPLY AIR DIFFUSER
	EXHAUST OR RETURN AIR GRILLE
	SUPPLY AIR REGISTER
	BRANCH CONNECTION WITH VOLUME DAMPER
	VOLUME DAMPER
	FIRE DAMPER
	SMOKE DAMPER
	MOTORIZED DAMPER
	EXHAUST RISER ID.
	IN-WALL UNIT ID.
	THERMOSTAT 46" TO BOTTOM OF OPERABLE COMPONENTS
	THERMOSTAT WIRING
	CONNECT TO EXISTING
	OUTSIDE AIR
	GENERAL CONTRACTOR

SYMBOL	DESCRIPTION
	SANITARY OR STORM DRAIN ABOVE GROUND
	SANITARY DRAIN BELOW GROUND
	STORM DRAIN BELOW GROUND
	GAS PIPING
	VENT ABOVE GROUND
	VENT BELOW GROUND
	FLOOR DRAIN (FD)
	DRAIN WITH P-TRAP
	COLD WATER PIPE (CW)
	HOT WATER PIPE (HW)
	BALL VALVE
	PLUMBING FIXTURE
	CLEANOUT ON EXPOSED PIPE
	FLOOR CLEANOUT
	GAS COCK
	HOSE BIBB
	WALL HYDRANT

SYMBOL	DESCRIPTION
	FIRE MAIN
	SPRINKLER MAIN
	SPRINKLER BRANCH
	GAS VALVE W/ELEC. SWITCH
	FLOW ALARM SWITCH
	SPRINKLER ZONE CONTROL ASSEMBLY (SEE DETAIL)
	PUMP (P) OR JOCKEY
	DRY ALARM VALVE
	WET ALARM VALVE
	CHECK VALVE
	DRAIN VALVE
	UPRIGHT SPRINKLER
	PENDANT SPRINKLER
	SIZE WALL SPRINKLER
	FIRE VALVE ASSEMBLY 2-1/2" X 2-1/2" X 1-1/2" PRESSURE VALVE

DIFFUSER/REGISTER SCHEDULE

LEGEND:	DESCRIPTION	MODEL
(NA) - Y x Y - ZZZ		
A	100% FACE CEILING DIFFUSER FOR 2'-2" x 2'-4" CEILING INSTALLATION. PROVIDE ROUND TO SQUARE ADAPTOR. OPPOSED BLADE VOLUME DAMPER FOR FRIE RATED CEILING INSTALLATION. PROVIDE REMOTE CONTROL CEILING INSULATION.	METALARE MODEL 5500-65
A1	100% FACE CEILING DIFFUSER FOR 2'-2" x 2'-4" CEILING INSTALLATION. PROVIDE ROUND TO SQUARE ADAPTOR. DOUBLE DEFLECTION REGISTER FOR FRIE RATED CEILING INSTALLATION.	METALARE MODEL 5500-15
B	DOUBLE DEFLECTION REGISTER FOR SHEET ROCK CEILING INSTALLATION. PROVIDE ROUND TO SQUARE ADAPTOR. DOUBLE DEFLECTION REGISTER FOR FRIE RATED CEILING INSTALLATION.	METALARE MODEL V4040
C	DOUBLE DEFLECTION REGISTER FOR SHEET ROCK CEILING INSTALLATION. PROVIDE ROUND TO SQUARE ADAPTOR. DOUBLE DEFLECTION REGISTER FOR FRIE RATED CEILING INSTALLATION.	METALARE MODEL 6000
E	DOUBLE DEFLECTION GRILLE FOR SHEET ROCK CEILING INSTALLATION. PROVIDE ROUND TO SQUARE ADAPTOR. DOUBLE DEFLECTION GRILLE FOR FRIE RATED CEILING INSTALLATION.	METALARE MODEL RH
F	PERFORATED FACE RETURN GRILLE FOR 2'-2" x 2'-4" CEILING INSTALLATION. PROVIDE ROUND TO SQUARE ADAPTOR. PROVIDE REMOTE CONTROL DAMPER FOR THE RATED CEILING INSTALLATION.	METALARE MODEL 7000R



FINNED TUBE RADIATION SCHEDULE									
TAG	ENCLOSURE TYPE	ENCLOSURE SIZE	TUBE SIZE	FIN SIZE	RNW/ FT	CAP BR/FT	FRONT PANEL	BACK PANEL	MODEL
FR-1	SLOPING	15 7/16" x 3 9/16"	3/4"-C	2 3/4" x 3 3/4"	50	800	16 GA	18 GA	STERLING R04

- NOTES:
1. CAPACITIES ARE BASED ON 170 DEGREES AVERAGE WATER TEMPERATURE.
2. PROVIDE SHUT OFF VALVE FOR EACH PIECE OF RADIATION.
3. PROVIDE SHUT OFF VALVE WITH FUSED DISCONNECT SWITCH AT ALL HIGH POINTS.
4. CONTRACTOR SHALL MATCH EXISTING FINNED TUBE.

SPLIT SYSTEM HVAC UNIT SCHEDULE									
TAG	NOMINAL TONS	MIN. O.A. CMH	TOT. MHR	SENS. MHR	ESP. IN W.G.	HP	TAG	HEATING COIL (EA/UNIT)	CONDENSING SECTION
HMAC-5	5	2000	56.6	40.7	3/4"	3/4	HC-6	2000	70/90
									86
									8.6
									36"x24"
									2
									15"
									2"
									28.8
									169
									30.2
									37.4
									50
									208/1
									389R020A/75493A

- NOTES:
1. PROVIDE THERMOSTAT AND FUSED DISCONNECT SWITCH.

FIRE PROTECTION SPECIFICATION

- BEFORE BIDDING THE JOB, CONTRACTOR SHALL VISIT THE JOB SITE AND VERIFY EXISTING CONDITIONS. REPORT ADDRESS CONDITIONS IN WRITING TO ARCHITECT.
- SPRINKLER SYSTEM SHALL BE DESIGNED, FURNISHED AND INSTALLED IN ACCORDANCE WITH NFPA-13.
- SPRINKLER PIPING SHALL BE SCH 40 BLACK STEEL WITH 125 LB. CAST IRON THREADED JOINTS.
- SPRINKLER HEADS SHALL BE CONCEALED TYPE AS MANUFACTURED BY RELIABLE OR EQUAL.
- CONTRACTOR SHALL PERFORM FLOW TEST AND HYDRAULIC CALCULATIONS TO SIZE PIPING, SPRINKLER HEADS AND SHUT OFF BALL VALVES. FLOW TEST SHALL BE HYDRAULICALLY CALCULATED FOR LIGHT HAZARD OCCUPANCY. FLOW TEST SHALL BE 1.0 GPM/FSFT FOR THE MOST REMOTE 1500 SQFT WITH A 150 GPM HOSE ALLOWANCE.
- INSTALL 1" TEST VALVE AT THE END OF THE SYSTEM. EXTEND THE DRAIN TO FLOOR DRAIN IN TOILET AREA.
- APPLY AND OBTAIN PERMIT AND APPROVAL FROM LANDLORD'S INSURANCE COMPANY, FIRE DEPARTMENT AND STATE AND LOCAL AUTHORITIES.
- COORDINATE WITH ARCHITECT AND ARCHITECTURAL REFLECTED CEILING PLAN FOR THE LOCATION OF SPRINKLER HEADS. SPRINKLER HEADS SHALL BE INSTALLED IN THE MIDDLE OF THE TILE.
- COORDINATE SPRINKLER WORK WITH OTHER DISCIPLINES.
- THE SYSTEM SHALL BE HYDROSTATICALLY TESTED AT NOT LESS THAN 200 PSI PRESSURE FOR 2 HOURS. THERE WILL BE NO VISIBLE LEAKAGE WHEN THE SYSTEM IS SUBJECT TO THE HYDROSTATIC PRESSURE TEST. LANDLORD'S REPRESENTATIVE MUST WITNESS THE TESTING.
- GUARANTEE ALL WORK AND MATERIAL FOR ONE YEAR FROM THE DATE OF ACCEPTANCE.

PLUMBING SPECIFICATION

- SCOPE OF WORK
 - SANITARY WASTE AND VENT PIPING SYSTEM.
 - FLUING FRIGIDES
 - WATER PIPING, VALVES, AND FITTINGS.
 - INSULATION.
 - PERMITS.
 - ALL OHS, DRILLING AND PATCHING.
- B. MATERIALS
- SANITARY AND VENT PIPING: JOINTS BELOW GROUND : SMC BELL AND SPACED WITH FISH ON JOINTS. ABOVE GROUND : TYPE "P" COPPER PIPE WITH 95-5 SOLDER WATER PIPING : TYPE "P" COPPER PIPE WITH 95-5 SOLDER
 - INSULATE ALL HOT AND COLD WATER PIPING WITH 1" FIBERGLASS INSULATION WITH ALL SERVICE JOCKEY.
 - PLUMBING FIXTURES: EASY LIFT 1517, 15" x 17" OVER ALL, 18 GAUGE SS SINK, FULLY COATED UNDERSEAL. SELF DRAINING WETTER FACETS 8835, ON 4" OR CENTERS WITH 4" WREST. WETTER FACETS 8835, ON 4" OR CENTERS WITH 4" WREST. WETTER FACETS 8835, ON 4" OR CENTERS WITH 4" WREST. BRASS "P" TRAP EXHIBITION PLATE, COP STRAINER.

C. EXECUTION

- BEFORE BIDDING THE JOB, CONTRACTOR SHALL VISIT THE JOB SITE AND VERIFY EXISTING CONDITIONS. REPORT ADDRESS CONDITIONS IN WRITING TO ARCHITECT.
- ALL PLUMBING WORK SHALL COMPLY TO STATE AND LOCAL CODE REQUIREMENTS.
- PLUMBING CONTRACTOR SHALL OBTAIN AND PAY FOR ALL PERMITS AND INSPECTIONS.
- FURNISH ALL LABOR, MATERIALS, EQUIPMENT AND SERVICES NECESSARY FOR THE PROPER AND COMPLETE INSTALLATION OF ALL PLUMBING WORK SHOWN ON THE DRAWING.
- ALL NEW WASTE AND VENT PIPING SHALL BE APPROVED BY LOCAL INSPECTOR.
- INSTALL BALL VALVE AND UNION ON ALL HOT AND COLD WATER CONNECTIONS TO EQUIPMENT.
- GUARANTEE ALL WORK AND MATERIAL FOR ONE YEAR FROM THE DATE OF ACCEPTANCE.

HMAC SPECIFICATION

- SCOPE OF WORK
 - NEW SPLIT TYPE A/C UNITS W/HOT WATER COILS
 - DUCTWORK, DIFFUSERS, AND GRILLES.
 - INSULATION AND CONTROL WIRING.
 - TESTING AND BALANCING.
 - PERMITS.
 - GUARANTEE AND WARRANTIES.
 - PLUMBING AND REPAIRS TO EXISTING SYSTEMS.
 - PIPING, BASEBOARD RADIATION.
- B. MATERIALS
- ALL SUPPLY AND RETURN AIR DUCTWORK SHALL BE CONSTRUCTED FROM GALVANIZED SHEET METAL IN ACCORDANCE WITH SMACNA STANDARDS.
 - SUPPLY DUCTWORK AND OUTSIDE AIR DUCT SHALL BE INSULATED ON OUTSIDE WITH 1 1/2" THICK FIBERGLASS INSULATION WITH VAPOR BARRIERS. RETURN DUCTWORK SHALL BE INSULATED WITH 1 1/2" THICK FIBERGLASS INSULATION. INSULATION SHALL BE 1" THICK FIBERGLASS INSULATION ALL AROUND WHERE LIKEN.
 - WATER PIPING SHALL BE TYPE "P" COPPER WITH SOLDER JOINTS.
 - REFRIGERANT PIPING SHALL BE PRECHARGED COPPER.
 - INSULATE WATER PIPING WITH 1 1/2" THICK FIBERGLASS INSULATION OR ADAPTED. REFRIGERANT PIPING WITH 1 1/2" THICK FIBERGLASS INSULATION.
 - VALVES SHALL BE FULL PORT BALL VALVES W/BLEEDERS.
 - DUCT LINER SHALL BE SHOULDER THERMAKOTE™ SEAL ALL CUT EDGES.

C. EXECUTION

- BEFORE BIDDING THE JOB, CONTRACTOR SHALL VISIT THE JOB SITE AND VERIFY EXISTING CONDITIONS. REPORT ADDRESS CONDITIONS IN WRITING TO ARCHITECT.
- MAXIMUM LENGTH OF FLEX DUCT SHALL BE 4 FT.
- ALL DUCT SIZES ARE CLEAR INSIDE DIMENSIONS.
- COORDINATE DIFFUSER AND GRILLE LOCATIONS WITH ARCHITECTURAL REFLECTED CEILING PLAN.
- COORDINATE ALL DUCTWORK WITH OTHER DISCIPLINES.
- CONTRACTOR SHALL PROVIDE ALL CONTROLS AND CONTROL WIRING. CONTRACTOR SHALL PROVIDE ALL NECESSARY DEVICES TO OPERATE THE SYSTEM AS FOLLOWS:
DURING OCCUPIED HOURS SUPPLY AIR FAN SHALL RUN AT MINIMUM OUTSIDE AIR AND THE UNIT SHALL MAINTAIN SPACE TEMPERATURE BY EXHAUSTING THE COOLING OR HEATING SECTION OF THE UNITS. SYSTEM SHALL ALSO EXHAUST THE HOT WATER CIRCULATION FOR BALANCE. PROVIDE ZONE VALVE AND THERMOSTAT FOR BALANCE. PROVIDE ZONE VALVE AND THERMOSTAT FOR BALANCE. PROVIDE ZONE VALVE AND THERMOSTAT FOR BALANCE.
- CONTRACTOR SHALL PROVIDE AIR BALANCING INCLUDING TESTING AND ADJUSTMENT OF EACH DIFFUSER AND GRILLE. SUBMIT BALANCING REPORT. GUARANTEE ALL WORK AND MATERIAL FOR ONE YEAR FROM THE DATE OF ACCEPTANCE.

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Revisions	No.	Date

Project: CEDARS REHABILITATION CTR. ADDITION

630 OCEAN AVENUE
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DATE ISSUED	SCALE	BY	CHKD

AS NOTED

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