



GENERAL NOTES:

- THESE DRAWINGS ARE SCHEMATIC IN NATURE AND ARE NOT INTENDED TO SHOW ALL POSSIBLE CONDITIONS. (DO NOT SCALE FOR EQUIPMENT, DEVICE OR MATERIAL LOCATION) IT IS INTENDED THAT A COMPLETE HVAC SYSTEM BE PROVIDED WITH ALL NECESSARY EQUIPMENT, APPURTENANCES, AND CONTROLS, COMPLETELY COORDINATED WITH ALL DISCIPLINES. DOCUMENTS STRICTLY CONFORM WITH ALL PARAMETERS GIVEN IN THESE DOCUMENTS. ANY ITEMS AND LABOR REQUIRED FOR A COMPLETE AC/MV SYSTEM IN ACCORDANCE WITH ALL APPLICABLE CODES, STANDARDS, AND THESE CONTRACT DOCUMENTS SHALL BE FURNISHED WITHOUT INCURRING ANY ADDITIONAL COST TO THE CONTRACT. CAREFULLY REVIEW ALL CONTRACT DOCUMENTS AND THE DESIGN OF OTHER TRADES BEFORE PREPARING SHEET METAL AND PIPING SHOP DRAWINGS. EACH TRADE SHALL PREPARE ITS OWN FABRICATION AND INSTALLATION DRAWINGS FOR COORDINATION WITH ALL OTHER DISCIPLINES.
- UNLESS OTHERWISE NOTED, THE FREE AREA OF ALL EXTERNAL LOUVERS SHALL BE A MINIMUM OF 50% OF GROSS AREA.
- IN ADDITION TO THOSE SHOWN ON THE DRAWINGS THE CONTRACTOR SHALL SUPPLY AND INSTALL FIRE DAMPERS FOR AIR DUCTS PASSING THROUGH ALL FIRE RATED WALLS / SLABS IN ORDER TO FULFILL THE REQUIREMENTS OF LOCAL AUTHORITY. ALSO REFER TO FIRE LIFE SAFETY PLANS.
- ALL AIR GRILLES / LOUVERS SHALL BE MADE OF ALUMINUM UNLESS OTHERWISE SPECIFIED. THE COLOR & SURFACE FINISHING OF THE GRILLES / LOUVERS SHALL BE SUBMITTED TO ARCHITECT FOR APPROVAL BEFORE MATERIAL ORDERING. UNLESS OTHERWISE SPECIFIED, COLOR FINISH SHALL BE IN BAKED ENAMEL PAINT.
- ALL ANTI-VIBRATION MOUNTS FOR EQUIPMENT AND PIPE WORK SHALL BE OF SEISMIC SPRING TYPE UNLESS OTHERWISE SHOWN ON DRAWINGS.
- FOR PIPES, SLEEVES AND DUCTS THROUGH FIRE BARRIER, THE GAP BETWEEN THE PIPES AND ITS SLEEVES, AND THE GAP BETWEEN THE DUCTS AND FIRE BARRIERS MUST BE FIRMLY SEALED WITH FIRESTOP MATERIALS HAVING A PERIOD OF FIRE RESISTANCE EQUAL TO THE FIRE BARRIERS. DETAILS OF DUCTS AND PIPES THROUGH WALL AND FLOOR SHALL COMPLY WITH U.L. STANDARD AND REQUIREMENTS.
- MATERIAL SPECIFICATIONS ARE AS FOLLOWS: (PLEASE REFER TO TECHNICAL SPECIFICATIONS)
 - DUCT INSULATION
 - INTERNAL (ALL SUPPLY AND RETURN AC DUCTS, 3.0M UPSTREAM & DOWNSTREAM OF FANS)
 - 25mm THICK FIBERGLASS INSULATION, 48kg/m³DENSITY, MATTE FACE WITH ANTI-MICROBIAL TREATMENT
 - EXTERNAL (ALL SUPPLY/ RETURN AC DUCTS; EXHAUST DUCTS)
 - POLY DLEFIN FOAM (THERMOPEAK OR XCELLON 19-25mm THICK)
 - GALVANIZED SHEET SCHEDULE - HOT DIPPED GALVANIZED STEEL SHEET CONFORMING TO "SMACNA" ("ARJO GALFAN" BRAND) DUCT SCHEDULE SHOWN BELOW IS REPRESENTATIVE ONLY
 - FIRE DAMPER - U.L. LISTED FOR 2-HOUR FIRE RATING, CURTAIN TYPE
 - DUCT SEALANT - FIRE RESISTIVE, WATER-BASED CONFORMING TO U.L. 181B - "FOSTER" DUCT FAST OR EQUAL
- MAINTAIN DUCTWORK LEVEL AND AS HIGH AS POSSIBLE UNLESS OTHERWISE NOTED. TRANSITION RECTANGULAR DUCTWORK ON THE TOP AND THE SIDES. ALL DUCT TRANSITIONS FROM SQUARE TO ROUND SHALL BE SMOOTH SQUARE TO ROUND TRANSITIONS. SPIN-IN FITTINGS AT THE END OF CAPPED DUCTS ARE NOT ACCEPTABLE.
- ALL OPEN ENDED DUCTS SHALL BE BELLMOUTHED, SCREENED AND REINFORCED WITH 37.5mm x 37.5mm x 3.5mm GALVANIZED STEEL ANGLES BOLTED, SCREWED OR RIVETED 150mm ON CENTER (MAXIMUM) ALL AROUND THE EXTERIOR PERIMETER OF THE DUCT.
10. MOUNT THERMOSTATS, WHERE INDICATED ON PLANS AT 1500mm AFF UNLESS OTHERWISE NOTED. SEE THE ARCHITECTURAL AND INTERIOR DRAWINGS AS WELL AS THE MECHANICAL DRAWINGS FOR THE COORDINATED LOCATIONS. WHERE THERE IS A CONFLICT OF LOCATIONS AMONG THE DRAWINGS, NOTIFY THE ARCHITECT IMMEDIATELY FOR RESOLUTION.
11. ALL DIFFUSERS INSTALLED IN LAY-IN CEILING SHALL BE 4-WAY BLOW UNLESS OTHERWISE NOTED. ADJUST ALL DIFFUSERS IN CORRIDORS OR WITHIN 900mm OF A WALL TO PROVIDE 2-WAY OR 3-WAY BLOW AWAY FROM OR PARALLEL TO WALLS.
12. ALL WIRING IN THE CEILING PLENUM SHALL BE PLENUM-RATED CABLE PER NFPA-70 OR BE INSTALLED IN METAL CONDUIT.
13. INSULATE ALL SUPPLY AND RETURN AIR DUCTWORK.
14. ALL GRILLES AND DIFFUSERS SHALL BE INSTALLED WITH INTEGRAL OPPOSED BLADE VOLUME CONTROL DAMPERS OPERABLE FROM THE GRILLE/DIFFUSER FACE.
15. IN THE ABSENCE OF ANY OTHER REQUIREMENT NOT FOUND IN THE PSME CODE, THE MATERIALS, CONSTRUCTION AND INSTALLATION OF THE DUCTWORKS SHALL COMPLY WITH THE REQUIREMENT OF SMACNA OR ASHRAE STANDARDS.
16. AFTER SUBMITTAL APPROVALS AND PRIOR TO ORDERING OF ANY EQUIPMENT OR ACCESSORIES, OR BEFORE FABRICATION AND/OR ASSEMBLY OF PIPING, DUCTS AND ANY DEVICES/COMPONENTS, THE CONTRACTOR SHALL ENSURE THAT EVERYTHING HAS BEEN VERIFIED AT SITE AND COORDINATED WITH ALL THE OTHER DISCIPLINES AS TO CONSTRUCTIBILITY AND MAINTAINABILITY OF THE EQUIPMENT AND UTILITIES. IF FOR ANY REASON, CONFLICT ARISE DUE TO CONTRACTOR'S FAILURE TO FOLLOW THE ABOVE OR HIS LACK OF DUE DILIGENCE, ALL WORKS AS NECESSITATED SHALL BE PERFORMED BY THE CONTRACTOR WITHOUT ADDITIONAL COST CHANGE ORDER.
17. IN GENERAL REFER TO MECHANICAL PLANS FOR QUANTITY OF AC & VENTILATION GRILLES AND DIFFUSERS FOR REFERENCE PURPOSES REFER TO ARCHITECTURAL REFLECTED CEILING PLAN FOR LOCATION OF UTILITIES.
18. DUCT CUTS WITH CANVASS OR ANY RESILIENT MATERIAL SUCH AS RUBBER, MUST BE PROVIDED ESPECIALLY IN AREAS WHERE WALLS OR CEILING ARE ISOLATED FROM THE REST OF MAIN BUILDING STRUCTURE.
19. ALL SUSPENDED AND FLOOR MOUNTED PIPES AND EQUIPMENTS SHALL BE PROVIDED WITH PROPER ISOLATORS AS RECOMMENDED BY ASHRAE (TABLE 42 & CHAPTER 47 2003 ASHRAE HANDBOOK).
20. ALL DUCT WORKS IN AREAS WITH SUSPENDED CEILING SHALL RUN IN THE CEILING VOID UNLESS OTHERWISE NOTED.

AIRCONDITIONING UNIT SCHEDULE

LEGEND	DESCRIPTION	LOCATION	ELECTRICAL		
			PHASE	VOLT	HERTZ
ACU 1	3 TR CEILING MOUNTED SPLIT TYPE (INVERTER) ACU	OFFICE/RECEPTION AREA	1	230	60
ACU 2	1 HP WALL MOUNTED SPLIT TYPE (INVERTER) ACU	DIV. CHIEF	1	230	60
ACU 3	1 HP WALL MOUNTED SPLIT TYPE (INVERTER) ACU	PANTRY/STO.	1	230	60
ACU 4	1 HP WINDOW TYPE (INVERTER) ACU	HALLWAY/LOUNGE	1	230	60

1 AIRCONDITIONING AND VENTILATING PLAN
M1 M1 SCALE : 1:120 M

SATISFACTORY TO:

CLEOFE C. ESPINELI
DTC. BID-ICT

 ENGINEERING DEPARTMENT PUBLIC WORKS & TECHNICAL SERVICES GROUP BLDG. 255 BARRYMAN ROAD, SUBIC BAY FREEPORT ZONE	CADD BY: 	CHECKED BY: 	REVIEWED BY: 	RECOMMENDED: 	APPROVED: 	SUBIC BAY METROPOLITAN AUTHORITY SUBIC BAY FREEPORT ZONE	PROJECT TITLE: OFFICE RENOVATION AND REHABILITATION OF BID-ICT	SHEET NO. M-1
	DESIGNED: 	EDISON D. ICO DIV. CHIEF III PDD	GARY P. FERNANDEZ MANAGER, ENG'G DEPARTMENT	MARCO A. ESTABILLO DA FOR PWTSG	ATTY. WILMA T. EISMA CHAIRMAN & ADMINISTRATOR		LOC. BLDG 662 TAFT ST. SBFZ	14 of 14