

1 MECHANICAL PLAN
SCALE: 1/8"=1'

HEATING, VENTILATING AND AIR CONDITIONING:

INTENT:

THE INTENT OF THIS SPECIFICATION IS TO PROVIDE A STANDARD HVAC INSTALLATION FOR THE FACILITY WHICH IS FREE FROM HAZARD, EFFICIENT, SERVICEABLE, CAPABLE OF MAINTAINING SPECIFIED MAXIMUM RELATIVE HUMIDITY AND TEMPERATURE AS SPECIFIED AND EASY TO MAINTAIN. THE EQUIPMENT, SYSTEMS, AND CONTROLS SHALL BE DESIGNED AND INSTALLED IN SUCH A MANNER THAT WILL ENCOURAGE THE CONSERVATION OF ENERGY WITHOUT UNNECESSARY HARDSHIP OR INCONVENIENCE TO TENANT.

ALL WORK, MATERIALS AND EQUIPMENT SHALL BE GUARANTEED FOR ONE YEAR FROM THE DATE OF ACCEPTANCE BY TENANT. ANY APPEARING WITHIN THE ONE YEAR GUARANTEE SHALL BE REMOVED AND REPLACED AT NO EXPENSE AND TO THE COMPLETE SATISFACTION OF THE TENANT.

CODES, RULES AND REGULATIONS:

THE INSTALLATION SHALL COMPLY WITH ALL FEDERAL, STATE, AND LOCAL AUTHORITIES HAVING JURISDICTION AND THE RULES AND REGULATIONS OF THE SERVING UTILITY, AND ALSO THE REQUIREMENTS OF THE NATIONAL BOARD OF FIRE UNDERWRITERS, WHERE THE CONTRACT REQUIREMENTS ARE IN EXCESS OF APPLICABLE CODES, RULES AND REGULATIONS, THE CONTRACT PROVISIONS SHALL GOVERN.

ARRANGE AND PAY FOR ALL INSPECTION WORK OF THIS SECTION REQUIRED BY LOCAL BUILDING INSPECTOR, OBTAIN AND PAY FOR ALL PERMITS AND LICENSES, AND GIVE ALL NOTICES, PAY ALL FEES, COMPLY WITH ALL EXISTING LAWS, ORDINANCES, RULES AND REGULATIONS, BEARING ON THE CONDUCT OF THE WORK AS SPECIFIED AND DRAWN.

INSPECTION AUTHORITY CERTIFICATE OF APPROVAL SHALL BE FURNISHED TO THE TENANT BEFORE FINAL ACCEPTANCE WILL BE GIVEN.

IF THE CONTRACTOR OBSERVES THAT THE DRAWINGS OR SPECIFICATIONS ARE AT VARIANCE WITH ANY LAWS, ORDINANCES, RULES AND REGULATIONS, HE SHALL PROMPTLY NOTIFY THE ARCHITECT-ENGINEER IN WRITING.

IF THE CONTRACTOR PERFORMS ANY WORK KNOWING IT TO BE CONTRARY TO THE ABOVE, AND WITHOUT NOTICE TO THE ARCHITECT-ENGINEER, HE SHALL BEAR ALL EXPENSE REQUIRED TO MAKE THE WORK TO CONFORM IN AN ACCEPTABLE MANNER.

NEMA:

ELECTRICAL COMPONENTS USED IN THIS APPLICATION SHALL BE RATED IN ACCORDANCE WITH NEMA STANDARDS.

SCOPE OF WORK:

FURNISH A COMPLETE SYSTEM OF HEATING, AIR CONDITIONING AND ALL VENTILATING, THE DESIGN OF WHICH SHALL BE BASED UPON THE USE OF A CEILING SUPPLY AND IN-UNIT RETURN AIR SYSTEM.

WORK INCLUDED UNDER THIS SECTION, WITHOUT LIMITING THE GENERALITY THEREOF, CONSISTS OF FURNISHING AND INSTALLING ALL MATERIALS, LABOR, EQUIPMENT, AND SERVICES NECESSARY FOR AND REASONABLY INCIDENTAL TO THE HEATING, VENTILATING AND AIR CONDITIONING SYSTEM AS SHOWN ON THE DRAWINGS AND SPECIFIED HEREIN IN GENERAL, AS FOLLOWS:

1. AIR HANDLING UNIT, CONDENSING UNITS AND ASSOCIATED REFRIGERANT AND CONDENSATE PIPING.
2. SHEET METAL WORK, INCLUDING DUCTWORK, DIFFUSERS AND REGISTERS, AND GAS UNIT HEATER.
3. DUCT FURNACES GAS FIRED (OR AS OTHERWISE SPECIFIED).
4. UNIT HEATERS, GAS FIRED (OR AS OTHERWISE SPECIFIED).
5. EXHAUST FANS, INTAKE LOUVERS.
6. INSULATION, PIPE AND DUCT.
7. ENVIRONMENTAL CONTROL PANELS, ALL SYSTEMS SENSORS AND RELATED THERMOSTATS.
8. TESTING AND BALANCING.
9. PROVIDE ALL TEMPORARY HOOK REQUIRED TO TEST OUT EQUIPMENT.

THE RESTROOMS AND LUNCH ROOMS SHALL BE DESIGNED TO MAINTAIN 70 DEGREES F.D.B. INDOOR WINTER CONDITIONS. THE DESIGN AND INSTALLATION SHALL CONFORM WITH THE LATEST PUBLICATIONS AND STANDARDS AS RECOMMENDED BY ASHRAE UNLESS OTHERWISE NOTED IN THE FOLLOWING PARAGRAPHS.

PROTECTION:

THIS CONTRACTOR SHALL BE RESPONSIBLE FOR THE PERFECT OPERATION OF THE ENTIRE SYSTEM AND MUST MAKE GOOD AT HIS OWN EXPENSE ANY PART OF THE WORK WHICH MAY BE STOPPED UP, OR BECOME INOPERATIVE DUE TO LEAVING THE WORK UNPROTECTED DURING CONSTRUCTION OF THE SYSTEM OR WHICH MAY BREAK OR FAIL IN ANY MANNER BY REASONS OF POOR WORKMANSHIP OR DEFECTIVE MATERIALS FOR A PERIOD ONE YEAR FROM THE DATE OF FINAL ACCEPTANCE OF THE WORK.

GAURANTEE:

ALL WORK, MATERIALS, AND EQUIPMENT SHALL BE GAURANTEED FOR ONE YEAR EXCEPT, COMPRESSORS SHALL BE FOR 5 YEARS FROM TENANTS OPENING DATE. ANY DEFECTIVE ITEMS APPEARING WITHIN THE GAURANTEE PERIOD SHALL BE REMOVED AND REPLACED AT NO EXPENSE AND TO THE COMPLETE SATISFACTION OF TENANT. OPERATIONS AND MAINTENANCE MANUALS WILL BE PROVIDED TO OWNER.

DESIGN CONDITIONS:

WALLS AND PARTITIONS WILL INCLUDE 3 1/2" BATT INSULATION, WHERE INDICATED ON PLANS. CEILING WILL INCLUDE 6" BATT INSULATION WHERE INDICATED ON PLANS. GLASS SHALL BE FIELD VERIFIED TO ASCERTAIN DESIGN CONDITIONS. OVERHANG OR SHADING AS PER BUILDING DETAILS. OFFICE AREAS: SUMMER: 75 DEGREES, 50% RH INSIDE (APPROX.) 100 DEGREES DB, 78 DEGREES WB OUTSIDE WINTER: 70 DEGREES DB INSIDE, 10 DEGREES WB OUTSIDE.

GRILLS AND DIFFUSERS:

SUPPLY: EQUAL TO 'TITUS' MODEL TDCA AND 'TITUS' 300 SERIES OR EQUAL. 2'X2' LAYIN W/DAMPER, SIDE WALL DIFFUSERS AS SIZED ON PLANS. RETURN: EQUAL TO 'TITUS' 50FF

THERMOSTATS:

HONEYWELL SINGLE STAGE W/NIGHT SET BACK, T7300 OR EQUAL.

DUCTS:

GALVANIZED SHEET METAL W/2" FIBERGLASS INSULATION MAX 8' LENGTHS FOR FLEXIBLE DUCTWORK MIN. R-5 ALL DUCT SEAMS TO BE SEALED WITH UL181A OR 181B TAPES AND MASTICS. MECHANICAL FASTENERS AND SEALANTS MUST BE USED TO CONNECT DUCTS TO AIR DISTRIBUTION EQUIPMENT, BALANCING DEVICES PER IMC 603.15

FIRE DAMPERS:

ALL DUCT PENETRATING A FIRE WALL WILL HAVE FIRE/SMOKE DAMPERS.

A/C SCHEDULE	
MARK	AC-1-4
ENT. AIR (DB/WB)	80/67
AMBIENT TEMP.	95
NOM. TONS	5T
CFM	2000
HT. (BTU)	78000
V./ PHASE	208, 3 PH
FLA	30
MANUFACTURER	TRANE,
MODEL	
WEIGHT	298
SEER 12	

NOTES: SPLIT SYSTEM W/ HORIZONTAL AIR HANDLERS

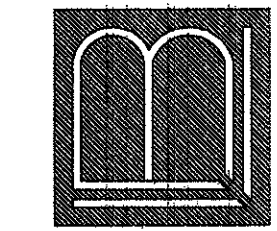
REVISIONS

ADDISON AIRPORT ADDITION

ADDISON, TEXAS

ENGINEERING BUILDING DESIGN

LARRY L. BLACKMON 3505 JIM WRIGHT FRVY. FORT WORTH, TEXAS 76106 (817) 737-8004



12-12-02

DATE 121202

SCALE 1/8" = 1'

DRAWING NO. M1

M1

NOTE TO BIDDERS: THE DRAWINGS HEREIN IS TO BE USED BY THE BIDDERS FOR THE PURPOSE OF PREPARING BIDS. ALL BIDDERS SHALL BE RESPONSIBLE FOR PROVIDING AND INSTALLING A COMPLETE WORKING SYSTEM WHETHER SHOWN OR NOT ON THE DRAWINGS.