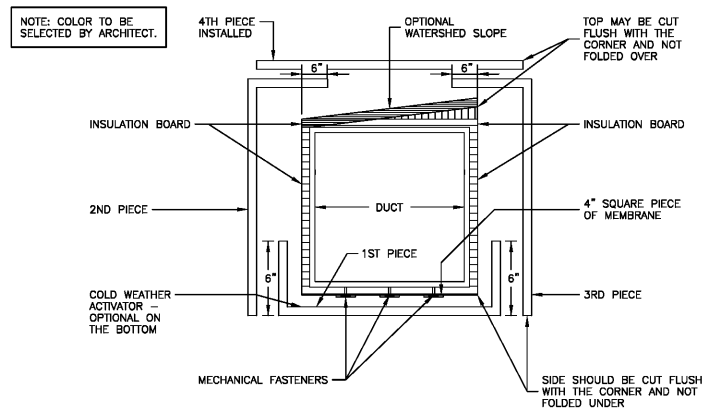


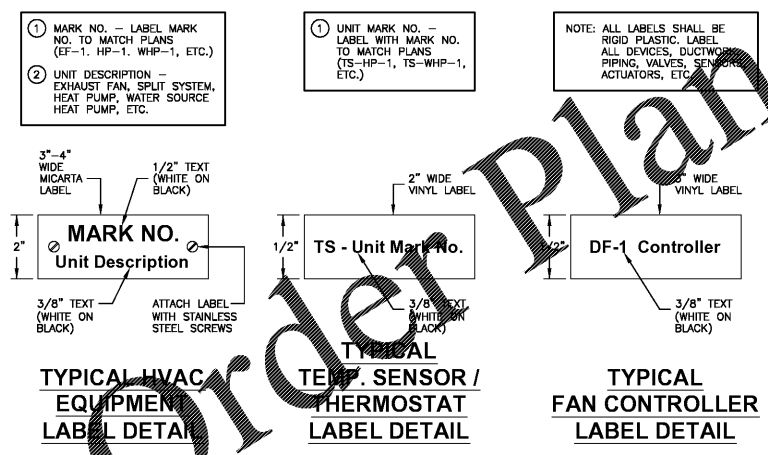
TYPICAL GAS CONNECTION TO EQUIPMENT DETAIL

NOT TO SCALE



TYPICAL EXTERIOR DUCT WITH ALUMAGUARD DETAIL

NOT TO SCALE



LABELING DETAILS

NOT TO SCALE

EXISTING GAS PACKAGED UNIT EQUIPMENT SCHEDULE

MARK NO.	BASE BID/ ALTERNATE	NOMINAL FAN CFM	EXT. STATIC IN. WC	OSA CFM (BASE BID)	OSA CFM (ALT. #1)	COOLING CAPACITY					HEATING CAPACITY		MODEL NO. DATA		NOTES	
						TOTAL CAPACITY MBH	SENS. CAPACITY MBH	CONDENSER E.A.T.	EVAPORATOR E.W.B. TEMP	EER	IEER	NATURAL GAS INPUT (MBH)	NATURAL GAS OUTPUT (MBH)	MANUFACTURER (OR APPROVED EQUAL)		UNIT MODEL NO.
GPU 1	BASE BID	6,000	0.7"	1,495	755	186.1	139.1	95	80/67	EXISTING	EXISTING	350/250	284/203	TRANE	YSH180G3RH	SEE BELOW
GPU 2	BASE BID	6,000	0.7"	1,495	755	186.1	139.1	95	80/67	EXISTING	EXISTING	350/250	284/203	TRANE	YSH180G3RH	SEE BELOW
TOTAL		12,000		2,990	1,510	372.2										

- UNIT TO INCLUDE NEW ROOM SENSOR INTERFACED TO BUILDING AUTOMATION SYSTEM.
- UNIT GPU-1 AND GPU-2 ARE EXISTING UNITS (SEE PLANS FOR ADDITIONAL INFORMATION).
- UNIT OUTSIDE AIR SHALL BE MODULATED WITH CO2 SENSOR. DURING UNOCCUPIED MODE, DAMPER SHALL BE CLOSED. DURING OCCUPIED MODE, DAMPER SHALL BE AT MINIMUM 25% OF SCHEDULED OSA CFM. DURING OCCUPIED MODE, WHEN 1000 PPM (ADJ.) IS REACHED, DAMPER SHALL MODULATE FROM MINIMUM OUTSIDE AIR TO SCHEDULED OSA CFM UNLESS IN ECONOMIZER MODE. REFERENCE PLANS FOR LOCATION.
- EXISTING UNITS SHALL INCLUDE COMPLETE TEST AND BALANCE INCLUDING ENTERING AND LEAVING COIL TEMPERATURES (DB/WB) IN EACH OPERATING MODE.
- FURNISH AND INSTALL NEW MERV 13 FILTERS FOR EXISTING GAS PACKAGED UNIT EQUIPMENT.

EXISTING GAS PACKAGED UNIT ELECTRICAL SCHEDULE

MARK NO.	BASE BID/ ALTERNATE	VOLTAGE	COMPRESSOR QTY	COMPRESSOR R.L.A. (EACH)	OUTDOOR FAN QTY	OUTDOOR FAN F.L.A. (EACH)	INDOOR FAN MOTOR H.P.	MINIMUM CIRCUIT AMPS	MAXIMUM OVERCURRENT PROTECTION	SINGLE POINT CONNECTION	APPROXIMATE UNIT WEIGHT (LBS)	NOTES
GPU 1	BASE BID	208/230-3-60	2	(1,2) 29.4,15.6	2	2.7	EXISTING	68	90	YES	2,700	-
GPU 2	BASE BID	208/230-3-60	2	(1,2) 29.4,15.6	2	2.7	EXISTING	68	90	YES	2,700	-

ELECTRIC COOLING / GAS HEATING EQUIPMENT SCHEDULE

MARK NO.	BASE BID/ ALTERNATE	NOMINAL FAN CFM	MAXIMUM OSA CFM	MIN. OSA CFM	SENS. CAP. MBH	TOTAL CAP. MBH	COOLING CAPACITY					HEATING CAPACITY		MODEL NO. DATA		NOTES
							COND. E.A.T.	EWAP. E.W.B. TEMP	MIN. SEER	NAT. GAS INPUT MBH	NAT. GAS OUTPUT MBH	MANUFACTURER (OR APPROVED EQUAL)	INDOOR UNIT MODEL NO.	OUTDOOR UNIT MODEL NO.		
GF 1	BASE BID	1,400	100		31.4	41.9	95	80/67	14.5	80	75	TRANE	S9X1B080	4TTA4042	SEE BELOW	

- UNIT TO INCLUDE A 24 HOUR PROGRAMMABLE AUTOMATIC CHANGEOVER ELECTRONIC SETBACK COMMUNICATING THERMOSTAT/HUMIDISTAT. THERMOSTAT SHALL BE JOHNSON CONTROLS THERMO COMMUNICATING THERMOSTAT AND SHALL BE INTERFACED TO THE EXISTING CAMPUS JCI BUILDING AUTOMATION SYSTEM.
- UNIT TO INCLUDE CARRY-ON COOLING COIL, EXTERNAL FILTER MOUNTING, AND FILTER KIT.
- UNIT TO INCLUDE CONDENSER HAIL GUARD AND FILTER RACK.
- UNIT TO INCLUDE MODULATING HOT GAS REHEAT AND HOT GAS BYPASS FOR DEHUMIDIFICATION CONTROL FOR ROOM NEUTRAL DISCHARGE (72) MINIMUM OF 18"-20" RISE IS REQUIRED.
- VERTICAL UNITS TO BE MOUNTED ON A STEEL ANGLE PLENUM. PRIME AND PAINT STEEL TO MATCH UNIT. VERIFY PLENUM HEIGHT WITH EQUIPMENT SUPPLIER.
- R410A REFRIGERANT.
- AIR LE = 92-96%
- CONCENTRIC VENT/INTAKE.
- CRANKCASE HEATER, TIMED OFF CONTROL.
- UNIT TO INCLUDE LOW AMBIENT CONTROLS TO 0 DEG F.
- UNIT SHALL INCLUDE CARBON DIOXIDE DETECTOR AND MODULATING MOTORIZED DAMPER. MAXIMUM OSA SHALL BE AS SCHEDULED. DURING OCCUPIED MODE, MINIMUM OSA SHALL BE 25% OF SCHEDULED OSA CFM. WHEN 800 TO 1000 PPM (ADJUSTABLE) IS REACHED DURING OCCUPIED MODE, DAMPER SHALL MODULATE BETWEEN MINIMUM AND MAXIMUM POSITION. DURING UNOCCUPIED MODE, OSA DAMPER SHALL BE CLOSED.
- UNIT SHALL BE ASHRAE 90.1-2013 COMPLIANT.
- UNIT SHALL INCLUDE MERV 13 FILTERS.

APPROVED EQUALS: AMERICAN STANDARD, BRYANT, CARRIER, LENNOX, AND RHEEM

ELECTRIC COOLING / GAS HEATING EQUIPMENT ELECT. DATA

MARK NO.	BASE BID/ ALTERNATE	OUTDOOR UNIT					INDOOR UNIT					SINGLE POINT CONNECTION	
		VOLTAGE	COMPRESSOR R.L.A.	FAN F.L.A.	MINIMUM CIRCUIT AMPS	MAXIMUM OVERCURRENT PROTECTION	WEIGHT (LBS.)	VOLTAGE	FAN (HP)	MINIMUM CIRCUIT AMPS	MAXIMUM OVERCURRENT PROTECTION		WEIGHT (LBS.)
GF 1	BASE BID	208/230-3-60	11.2	1.05	15	25	220	120-1-60	3/4	10.3	15	135	YES

HVAC SCHEDULES AND DETAILS

WHORTON ENGINEERING, INC.
 HVAC - PLUMBING - PROCESS CONTROL

Randee Whorton
 RANDALL WHORTON, P.E.
 PHONE: (256) 820-9897

DATE 01-20-2021
 25 SUMMERALL GATE ROAD
 ANNISTON, ALABAMA 38205

WHORTON ENGINEERING PROJECT NO. 19212



Facilities Management
 1161 West Samford Avenue
 Auburn University, AL 36849
 Phone: (334) 844-4810
 Fax: (334) 844-9458
 Safety is our first priority.
 Think Safety. Act Safely.

No.	Revision	Date



JMR-H Architecture, P.C.
 446 Dexter Avenue
 Montgomery, AL 36104
 Phone: (334) 420-5672
 Fax: (334) 420-5692
 JMR-H Project Number: 19-968
 Drawn By: DT

Auburn University Building
 Ham Wilson Arena Renovations
 Project Number 19-451

SHEET TITLE:
 HVAC SCHEDULES
 AND DETAILS

DRAWN BY:
 JH
 CHECKED BY:
 RDW
 DATE:
 JANUARY 21, 2021
 FILE NUMBER:

PROJECT NUMBER:
 19-451
 SHEET NUMBER:

M1.3