

HARRIMAN

AUBURN PORTLAND MANCHESTER

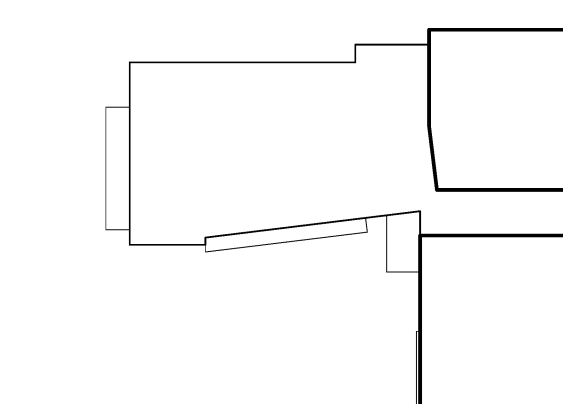
JEWISH COMMUNITY ALLIANCE OF SOUTHERN MAINE

PORTLAND, ME

Harriman Project No. 15309

Key Plan

Proj North



REGISTERS, GRILLES & DIFFUSERS SCHEDULE										
TAG	MANUFACTURER	MODEL	TYPE	NECK SIZE (IN)	DIRECTION OF BLOW	MAX NC	MAX SP (IN. W.G.)	FINISH	BORDER	NOTES
S1	PRICE INDUSTRIES	SMD SERIES	CEILING DIFFUSER	6 x 6	SEE PLANS	23	0.15	BAKED ENAMEL WHITE	SURFACE MOUNT	
S2	PRICE INDUSTRIES	SMD SERIES	CEILING DIFFUSER	9 x 9	SEE PLANS	24	0.13	BAKED ENAMEL WHITE	SURFACE MOUNT	
S3	PRICE INDUSTRIES	SMD SERIES	CEILING DIFFUSER	12 x 12	SEE PLANS	23	0.11	BAKED ENAMEL WHITE	SURFACE MOUNT	
S4	PRICE INDUSTRIES	SMD SERIES	CEILING DIFFUSER	18 x 18	SEE PLANS	23	0.10	BAKED ENAMEL WHITE	SURFACE MOUNT	
S5	PRICE INDUSTRIES	SMD SERIES	CEILING DIFFUSER	21 x 21	SEE PLANS	22	0.08	BAKED ENAMEL WHITE	SURFACE MOUNT	
S6	PRICE INDUSTRIES	500-600 SERIES	WALL GRILLE	45"x22"	SEE PLANS	20	0.00	BAKED ENAMEL WHITE	SURFACE MOUNT	4
S7	PRICE INDUSTRIES	JS SERIES	JET SLOT DIFFUSER	10" DIA	SEE PLANS	25	0.10	BAKED ENAMEL WHITE	SURFACE MOUNT	3
R1	PRICE INDUSTRIES	80 SERIES	GRID CORE	6 x 6	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
R2	PRICE INDUSTRIES	80 SERIES	GRID CORE	10 x 10	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
R3	PRICE INDUSTRIES	80 SERIES	GRID CORE	12 x 12	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
R5	PRICE INDUSTRIES	80 SERIES	GRID CORE	18 x 18	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
R6	PRICE INDUSTRIES	80 SERIES	GRID CORE	22 x 22	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
R4	PRICE INDUSTRIES	80FH SERIES	GRID CORE	14 x 14	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1,2
E1	PRICE INDUSTRIES	80 SERIES	GRID CORE	6 x 6	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
E2	PRICE INDUSTRIES	80 SERIES	GRID CORE	8 x 8	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
E3	PRICE INDUSTRIES	80 SERIES	GRID CORE	10 x 10	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
E4	PRICE INDUSTRIES	80 SERIES	GRID CORE	12 x 12	N/A	20	0.09	BAKED ENAMEL WHITE	SURFACE MOUNT	1
E5	PRICE INDUSTRIES	500-600 SERIES	WALL GRILLE	45"x22"	SEE PLANS		0.00	BAKED ENAMEL WHITE	SURFACE MOUNT	4

NOTES:  
1. 1/2"X1/2"X1/2" GRID  
2. PROVIDE TWO EXTRA SETS OF FILTERS. COORDINATE STORAGE WITH OWNER  
3. PROVIDE 2" SLOT WIDTH, 1" SLOT, 6" INLET WITH ENGINEERED PLENUM  
4. PROVIDE HARD CEILING CLIP PER MANUFACTURER RECOMMENDATION FOR SIDE-WALL INSTALLATION

GENERAL NOTES:  
A. NC BASED ON ROOM ABSORPTION OF 10 dB. RE: 10-12 WATTS  
B. NC AND SP ARE RATED WITHOUT INTEGRAL OBD.  
C. TESTING & BALANCING SUBCONTRACTOR SHALL ADJUST VANE PATTERNS AS SCHEDULED AND AS INDICATED ON PLANS BEFORE TESTING & BALANCING. RE-ADJUST AS NECESSARY AFTER CLEANING, PAINTING, AND OTHER ACTIONS.

LOUVER SCHEDULE												
TAG	MFR	MODEL	SERVICE	AIR FLOW (CFM)	MAX FACE VELOCITY (FPM)	MIN FREE AREA (%)	RATED APD (IN WG)	HEIGHT X WIDTH (IN)	DEPTH (IN)	SPACE (IN)	ANGLE (DEG. F)	NOTES
L-1	GREENHECK	EDJ-603	MECHANICAL ROOM	300	300	50	0.09	25x16	6	4	37/45	1

EXPANSION TANK SCHEDULE									
TAG	MANUFACTURER	MODEL	SERVICE	VOLUME (GAL)	MIN TEMP. (DEG. F)	MAX TEMP. (DEG. F)	DIAMETER (IN)	HEIGHT (IN)	NOTES
ET-1	TACO	CA90	B-182	23	55	200	20	29	
ET-2	AMITROL	ST-5-C	HRU-1	2.1	55	200	10	11	

CABINET UNIT HEATER SCHEDULE															
TAG	MANUFACTURER	MODEL	SERVICE	FLOW (CFM)	OUTPUT	EWI (DEG. F)	LWT (DEG. F)	FLOW (GPM)	WPD (FT. WG)	DIMENSIONS (W x D x H) (IN)	MOUNTING HEIGHT AFF (IN.)	CONTROL VALVE	ELECTRIC	NOTES	
													HP	VOLTS	PHASE
CUH-1	DAIKIN APPLIED	FHV5103	CORRIDOR	0	0.0	180	-460	0.0	0	40.5 x 10 x 27.6	VARIABLE		0	115 V	1
CUH-2	DAIKIN APPLIED	FHV5103	LOBBY	0	0.0	180	-460	0.0	0	40.5 x 10 x 27.6	VARIABLE		0	115 V	1
CUH-3	DAIKIN APPLIED	FHV5103	VEST	0	0.0	180	-460	0.0	0	40.5 x 10 x 27.6	VARIABLE		0	115 V	1
CUH-4	DAIKIN APPLIED	FHV5103		0	0.0	180	-460	0.0	0	40.5 x 10 x 27.6	VARIABLE		0	115 V	1

NOTES:  
1. CONTROLS CONTRACTOR SHALL PROVIDE CONTROL VALVE AND AQUASTAT.  
2. AQUASTAT SHALL BE ENCLOSED IN CABINET AND ACCESSIBLE THROUGH CABINET ACCESS DOOR.  
3. PROVIDE LIMITED ACCESS FASTENERS.  
4. PROVIDE INLET AND OUTLET DUCT COLLARS.  
5. PROVIDE HIGH STATIC MOTOR.  
6. PROVIDE HIGH CAPACITY G ROW COIL.  
7. PROVIDE FACTORY WALL SEAL KIT.

BOILER SCHEDULE										
TAG	MFR	MODEL	FUEL GAS	INPUT (MBH)	OUTPUT (MBH)	ELECTRICAL			WEIGHT (LBS)	NOTES
						AMPS	VOLT	PHASE		
B-182	WEIL-MCLAIN	EVG399	NATURAL	399	383	20	120	1	260	

PUMP SCHEDULE												
TAG	MFR	MODEL	SERVICE	FLOW (GPM)	HEAD (FT/WG)	SPEED (RPM)	ELECTRICAL			MOTOR CONTROL	NOTES	
							POWER	PHASE	VOLT			
P-1	TACO	VR20-1	MAIN HEATING LOOP	30	40	VARIABLE	1.09 HP	1	110	INTEGRAL VFD		
P-2	TACO	VR20-1	MAIN HEATING LOOP	30	40	VARIABLE	1.09 HP	1	110	INTEGRAL VFD		
P-3	TACO	VR20-1	HRU-1 HEATING COIL	10	30	VARIABLE	1.09 HP	1	110	INTEGRAL VFD		
P-4	TACO	0013	BOILER B-1	20	15	3250	1/6 HP	1	110	CONSTANT SPEED		
P-5	TACO	0013	BOILER B-2	20	15	3250	1/6 HP	1	110	CONSTANT SPEED		

AIR SEPARATOR SCHEDULE									
TAG	MFR	MODEL	PIPE SIZE (IN)	DESIGN FLOW (GPM)	WPD (FT/WG)	DIAMETER (IN)	HEIGHT (IN)	NOTES	
AS-1	TACO	49002A-125	2	30	1	10	15.5		
AS-2	TACO	433	1 1/2	10		6	8	1	

NOTES:  
1. PROVIDE HY-VENT 400 AUTOMATIC AIR VENT

### HEAT RECOVERY UNIT SCHEDULE

TAG	MFR	MODEL	FAN SECTION (SUPPLY FAN/EXHAUST FAN)				OUTDOOR AIR				INDOOR AIR				SUPPLY AIR				HOT WATER COIL				FILTERS											
			AIRFLOW (CFM)	TYPE	RPM	E.S.P. (IN. W.G.)	T.S.P. (IN. W.G.)	VOLTS/PHASE	POWER (HP)	SUMMER DB (DEG. F)	SUMMER WB (DEG. F)	WINTER DB (DEG. F)	WINTER WB (DEG. F)	SUMMER DB (DEG. F)	SUMMER RH (%)	WINTER DB (DEG. F)	WINTER RH (%)	SUMMER DB (DEG. F)	SUMMER WB (DEG. F)	WINTER DB (DEG. F)	WINTER WB (DEG. F)	EAT-DB (DEG. F)	LAT-DB (DEG. F)	A.P.D. (IN. W.G.)	EWT (DEG. F)	LWT (DEG. F)	FLOW RATE (GPM)	W.P.D. (IN. W.G.)	ROWS	EFFICIENCY	QTY (TOTAL)	SIZE (INXIN)	WEIGHT	NOTES
HRU-1	XETEX	XLTH 40/20-54	6580	AP PLENUM/AP PLENUM	1822/1439	1.5/1.5	3.45/3.20	208/3	7.5/5	90	76	-10	-10	80	61.2	80	71.2	83.7	73.3	63.4	41.1	63.4	96.4	0.15	150	120	16	11.62	2	MERV 8	8	24X24	6500	

### FLAT PLATE HEAT EXCHANGER SCHEDULE

TAG	MANUFACTURER	MODEL	SERVICE	PERFORMANCE				LOAD SIDE (30% PROPYLENE GLYCOL MIXTURE)				NOTES
				BTUH	GPM	EWT	LWT	BTUH	GPM	EWT	LWT	
HEX-1	TACO	TFP SERIES	HRU-1	150000	10	162	142	150000	10	140	160	

### VRF FAN COIL UNIT SCHEDULE

TAG	MANUFACTURER	MODEL	FLOW (CFM)	COIL		HEATING		ELECTRIC			WEIGHT (LBS)	NOTES
				TOTAL CAPACITY (BTU/H)	SENSIBLE CAPACITY (BTU/H)	TOTAL CAPACITY (BTU/H)	PHASE	VOLT	MCA (A)	MOPD (A)		
AC-1	DAIKIN AC (AMERICAS), INC.	FXM12PVJU	450	12000	9700	13500	1	230	1.4	15	99	
AC-2	DAIKIN AC (AMERICAS), INC.	FXM20PVJU	317	9500	7800	10500	1	230	0.6	15	99	
AC-3	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-4	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-5	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-6	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-7	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-8	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-9	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-10	DAIKIN AC (AMERICAS), INC.	FXM38PVJU	1377	36000	28800	40000	1	230	2.9	15	139	
AC-11	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-12	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-13	DAIKIN AC (AMERICAS), INC.	FXM18PVJU	635	18000	14400	20000	1	230	1.6	15	99	
AC-14	DAIKIN AC (AMERICAS), INC.	FXM20PVJU	317	9500	7800	10500	1	230	0.6	15	99	
AC-15	DAIKIN AC (AMERICAS), INC.	FXM24PVJU	688	24000	15600	27000	1	230	1.8	15	99	
AC-16	DAIKIN AC (AMERICAS), INC.	FXM28PVJU	1377	48000	35800	54000	1	230	2.8	15	99	
AC-17	DAIKIN AC (AMERICAS), INC.	FXM18PVJU	635	18000	14400	20000	1	230	1.6	15	99	
AC-18	DAIKIN AC (AMERICAS), INC.	FXM30PVJU	1094	30000	23800	34000	1	230	2.8	15	99	
AC-19	DAIKIN AC (AMERICAS), INC.	FXM28PVJU	1377	48000	35800	54000	1	230	2.8	15	99	
AC-20	DAIKIN AC (AMERICAS), INC.	FXM24PVJU	688	24000	15600	27000	1	230	1.8	15	99	
AC-21	DAIKIN AC (AMERICAS), INC.	FXM28PVJU	1377	48000	35800	54000	1	230	2.8	15	99	
AC-22	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-23	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-24	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-25	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-26	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-27	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-28	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	
AC-29	DAIKIN AC (AMERICAS), INC.	FXM48PVJU	1377	48000	35800	54000	1	230	3.4	15	144	

### FAN SCHEDULE

TAG	MFR	MODEL	SERVICE	AIR FLOW (CFM)	E.S.P. (IN.WG)	RPM	SONES	BREAK HORSE POWER (HP)	ELECTRICAL				NOTES	
									HP	PHASE	VOLT	MOTOR CONTROL	DRIVE	
EF-3	GREENHECK	GV-071-6	MECHANICAL ROOM	300	0.25	1672	9.3	0.13	1/6	1	115	STARTER	BELT	

### RADIANT FLOOR MANIFOLD SCHEDULE

TAG	MFR	# ZONES	CIRCUITS	FLOW (GPM)	PRESSUR E DROP (FT. W.G.)	REQUIRED TEMP. (DEG. F)	SUPPLIED TEMP. (DEG. F)	TEMP DROP (DEG. F)	MANIFOLD TYPE	CONTROL TYPE	# ACTUATORS	NOTES
MANIFOLD-1	VEIGA	3	8	1.8	2.3	101	133	20	SS, 1 1/4"	CIRCUIT	8	
MANIFOLD-2	VEIGA	2	6	1.0	1.5	95	133	20	SS, 1 1/4"	CIRCUIT	6	
MANIFOLD-3	VEIGA	2	4	0.8	2.7	101	133	20	SS, 1 1/4"	CIRCUIT	4	
MANIFOLD-4	VEIGA	1	17	4.5	2.4	96	133	20	SS, 1 1/4"	MANIFOLD	0	
MANIFOLD-5	VEIGA	1	17	4.5	2.4	96	133	20	SS, 1 1/4"	MANIFOLD	0	
MANIFOLD-6	VEIGA	1	8	2.1	2.4	96	133	20	SS, 1 1/4"	MANIFOLD	0	
MANIFOLD-7	VEIGA	1	6	1.1	1.7	90	133	20	SS, 1 1/4"	CIRCUIT	6	
MANIFOLD-8	VEIGA	2	7	1.8	2.3	98	133	20	SS, 1 1/4"	CIRCUIT	7	
MANIFOLD-9	VEIGA	2	6	1.3	2.2	96	133	20	SS, 1 1/4"	CIR		