

Unit level options		Module Position: 0	
Actual airflow	16500 cfm	Inlet and casing - 500 Hz	82 dB
Unit elevation	0.00 ft	Inlet and casing - 1K Hz	82 dB
Unit size	35	Inlet and casing - 2K Hz	80 dB
Integral base frame	2.5in. integral base frame	Inlet and casing - 4K Hz	74 dB
UL listed unit	UL listed unit	Inlet and casing - 8K Hz	72 dB
High voltage location	Left	Ducted inlet - 63 Hz	86 dB
Length	198.500 in	Ducted inlet - 125 Hz	76 dB
Width	100.000 in	Ducted inlet - 250 Hz	93 dB
Installed weight	4640.3 lb	Ducted inlet - 500 Hz	81 dB
Rigging weight	4397.0 lb	Ducted inlet - 1K Hz	82 dB
Single or front discharge - 63 Hz	81 dB	Ducted inlet - 2K Hz	80 dB
Single or front discharge - 125 Hz	80 dB	Ducted inlet - 4K Hz	73 dB
Single or front discharge - 250 Hz	93 dB	Ducted inlet - 8K Hz	71 dB
Single or front discharge - 500 Hz	82 dB	Casing - 63 Hz	80 dB
Single or front discharge - 1K Hz	82 dB	Casing - 125 Hz	74 dB
Single or front discharge - 2K Hz	80 dB	Casing - 250 Hz	79 dB
Single or front discharge - 4K Hz	74 dB	Casing - 500 Hz	76 dB
Single or front discharge - 8K Hz	69 dB	Casing - 1K Hz	75 dB
Inlet and casing - 63 Hz	88 dB	Casing - 2K Hz	56 dB
Inlet and casing - 125 Hz	79 dB	Casing - 4K Hz	47 dB
Inlet and casing - 250 Hz	93 dB	Casing - 8K Hz	47 dB

Controls and VFD/starter		Module Position:	0
Factory controls package	Variable volume	Averaging temperature sensor material	1 Pt 385
Automatic Selection	Validation Only	Design Sequence	A
Controller mounting	Unit mounted	Number of transformers	2 - Transformer
Unit mounting controller location	Left	Prepackaged solution option used MP common configuration not used	
Controller type	MP580	Prepackaged solution valid unit	MBF-CW-SF-FLT-VAV
MP580 Expansion modules	1	Expansion card Total number of control points	13 control points
LCD screen and keypad	Unit		

<u>Air mixing section</u>		<u>Module Position:</u>	1
<u>Section type</u>	Air mixing section	<u>Actuator</u>	Electronic actuator
<u>Unit size</u>	35	<u>Dirty filter status</u>	Dirty filter switch and gauge
<u>Mixing section type</u>	with filter	<u>Filter condition</u>	Mid-life
<u>Filter frame</u>	4"	<u>Filter airflow</u>	16500 cfm
<u>Filter type</u>	Pleated media - MERV 8	<u>Opening 1 back - airflow</u>	16500 cfm
<u>Access door location</u>	Left	<u>Opening 1 front - airflow</u>	16500 cfm
<u>Back opening type</u>	Parallel blade damper	<u>Opening 1 top - airflow</u>	16500 cfm
<u>Back air path</u>	Entering		Opening 1 back total pressure drop 0.108 in H2O
<u>Back air path type</u>	Outside		Opening 1 top total pressure drop 0.108 in H2O
<u>Back inlet type</u>	Ducted		Greatest entry PD 0.108 in H2O
<u>Front opening type</u>	Full face opening	<u>Opening 1 back - area</u>	14.32 sq ft
<u>Front air path</u>	Leaving		Opening 1 back - face velocity 1152 ft/min
<u>Top opening type</u>	Parallel blade damper		Opening 1 front - pressure drop 0.108 in H2O
<u>Top air path</u>	Entering	<u>Opening 1 back - area</u>	40.50 sq ft
<u>Top air path type</u>	Return		Opening 1 top - area 14.32 sq ft
<u>Top inlet type</u>	Ducted		Opening 1 top - face velocity 1152 ft/min
<u>Bottom opening type</u>	No opening		Opening 1 top - pressure drop 0.108 in H2O
<u>Right side opening type</u>	No opening	<u>Filter area</u>	63.33 sq ft
<u>Left side opening type</u>	No opening	<u>Filter face velocity</u>	261 ft/min
<u>Design sequence</u>	A	<u>Filter pressure drop</u>	0.537 in H2O

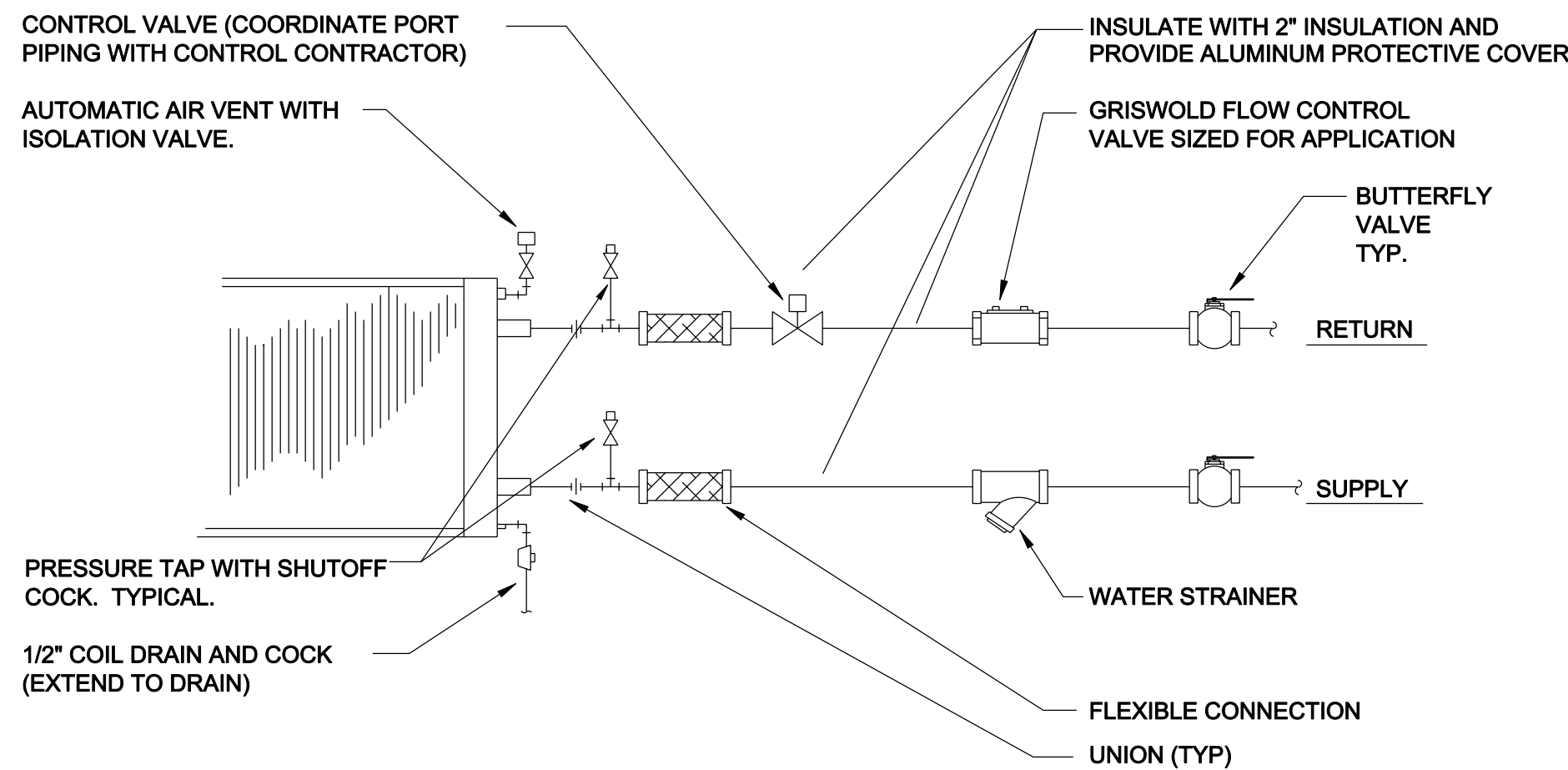
Coil section		Module Position: 2	
Section type	Horizontal coil	Target valve pressure drop 4.00 psig	
Unit size	35	Elec coil control valve type 2-way	
Section size	Large	Elec coil valve style input Ball valve	
Access door location	Left	Coil type UU	
Coil application	Cooling coil	Valve normal position Normally closed	
Changeover coil	No	Rows 8 rows	
System type	Chilled water	Fin type Delta flo H (Hi efficient)	
Coil supply/cabinet side	Left	Fin material Aluminum fins	
Coil casing	Stainless steel	Tube diameter 1/2in. tube diameter	
Unit coil height	Unit coil height	Tube matl/wall thickness .016" copper tubes	
Drain pan	Stainless steel	Turbulators Yes	
Drain connection location	Left	Corrosion resistant coating None	
Design sequence	B	Coil face velocity 472 ft/min	
Apply AHRI ranges	No	Air pressure drop 0.861 in H2O	
Coil performance airflow	16500 cfm	J trap dimension 1.922 in	
Coil elevation	0.00 ft	H trap dimension 3.844 in	
Entering dry bulb	80.00 F	Leaving fluid temperature 57.00 F	
Entering wet bulb	67.00 F	Fluid pressure drop 11.07 ft H2O	
Leaving dry bulb	52.00 F	Fluid volume 29.10 gal	
Leaving wet bulb	51.87 F	Fluid velocity 2.38 f/s	
Sensible capacity	509.27 MBH	Coil face area 34.94 sq ft	
Total capacity	753.17 MBH	Coil rigging weight 632.0 lb	
Fin spacing	105 Per Foot	Coil installed weight 875.3 lb	
Entering fluid temperature	45.00 F	Actual valve pressure drop 102.419 in H2O	
Fluid temperature rise	12.00 F	Elec coil valve style output Globe valve	
Standard fluid flow rate	125.11 gpm	Coil section pressure drop 0.861 in H2O	
Coil fouling factor	0.00000 hr-sq ft-deg F/Btu	Section length 48.000 in	
Fluid type	Water	Section height 67.250 in	
Coil fluid percentage	100.00 %	Section width 100.000 in	
Averaging temperature sensor	Entering air avg temp sensor	Section weight 1231.3 lb	
Low limit switch	Leaving air		

Fan section		Module Position:		3
Section type	Fan	Static pressure origin	Program calculated	
Fan application	Supply fan	Single or front discharge	63 Hz	81 dB
Unit size	35	Single or front discharge	125 Hz	80 dB
Inlet location	Back inlet	Single or front discharge	250 Hz	93 dB
Fan orientation	Plenum fan	Single or front discharge	500 Hz	82 dB
Fan discharge	Front top	Single or front discharge	1K Hz	82 dB
Access door location	Left	Single or front discharge	2K Hz	80 dB
Window	Left	Single or front discharge	4K Hz	74 dB
Drive location	Left side drive	Single or front discharge	8K Hz	69 dB
Design sequence	A	Inlet and casing	63 Hz	88 dB
Motor horsepower per fan	20 hp	Inlet and casing	125 Hz	79 dB
Motor class	NEMA premium compliant ODP	Inlet and casing	250 Hz	93 dB
Motor voltage	460/3	Inlet and casing	500 Hz	82 dB
Cycle	60 cycles/sec	Inlet and casing	1K Hz	82 dB
Drive service factor	1.5 fixed drive	Inlet and casing	2K Hz	80 dB
Motor RPM	1800	Inlet and casing	4K Hz	74 dB
Marine LED light	Marine LED light	Inlet and casing	8K Hz	72 dB
Fan airflow	16500 cfm	Ducted inlet	63 Hz	86 dB

Overall ESP	1.750 in H ₂ O	Ducted inlet - 125 Hz	76 dB
Unit entering ESP	0.875 in H ₂ O	Ducted inlet - 250 Hz	93 dB
Unit discharge ESP	0.875 in H ₂ O	Ducted inlet - 500 Hz	81 dB
Elevation	0.00 ft	Ducted inlet - 1K Hz	82 dB
Minimum temperature	40.00 F	Ducted inlet - 2K Hz	80 dB
Design temperature	70.00 F	Ducted inlet - 4K Hz	73 dB
Fan size and type	32in. belt-drive plenum, class 2	Ducted inlet - 8K Hz	71 dB
Total brake horsepower	18.311 hp	Casing - 63 Hz	80 dB
Total brake horsepower at min temp	19.411 hp	Casing - 125 Hz	74 dB
Total static pressure	3.986 in H ₂ O	Casing - 250 Hz	79 dB
Speed	1235 rpm	Casing - 500 Hz	76 dB
Fan module pressure drop	1.776 in H ₂ O	Casing - 1K Hz	75 dB
Section height	67.250 in	Casing - 2K Hz	56 dB
Section length	53.500 in	Casing - 4K Hz	47 dB
Section width	100.000 in	Casing - 8K Hz	47 dB
Section weight	1786.0 lb		

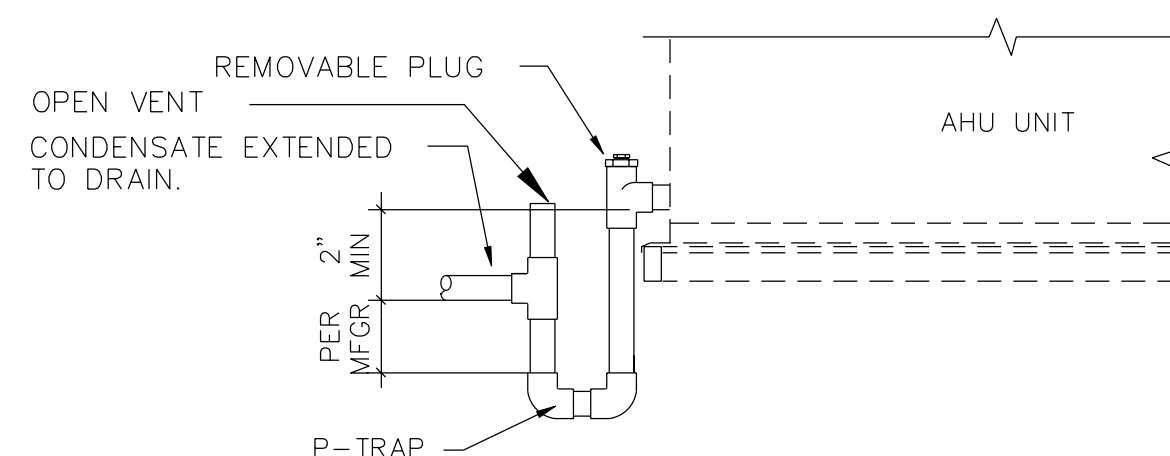
Controls section		Module Position:		4
Section type	Controls and starter/VFD	Design sequence		A
Unit size	Unit size 35	Section length		24.500 in
Starter/VFD	Supply section	Section width		100.000 in
Controls application type	Internal NEMA	Section height		67.250 in
Controller door	Left	Section weight		318.0 lb
Supply fan high voltage door	Left			

Filter section	Module Position:			5
Section type	Filter	Filter condition	Mid-life	
Unit size	35	Filter area	63.33 sq ft	
Filter type	Angled filter	Filter face velocity	261 ft/min	
Filter frame	4in. filter frame	Filter pressure drop	0.705 in H2O	
Access door location	Left	Filter section pressure drop	0.705 in H2O	
Primary filter type 1	4in. cartridge - 95% eff	- MERV 14	Section length	24.500 in
Prefilter filter type	No prefilter	Section width	100.000 in	
Design sequence	A	Section height	67.250 in	
Dirty filter status	Dirty filter switch and filter gage	Section weight	707.0 lb	
Filter airflow	16500 cfm			

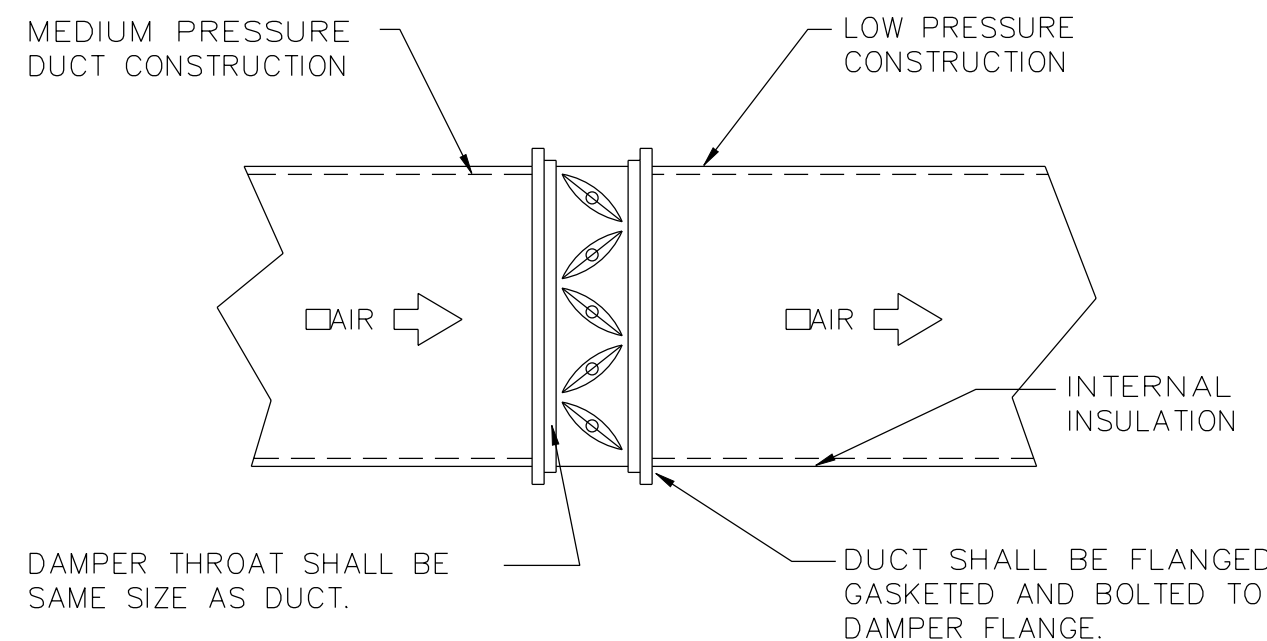


COIL PIPING SCHEMATIC

NOT TO SCALE

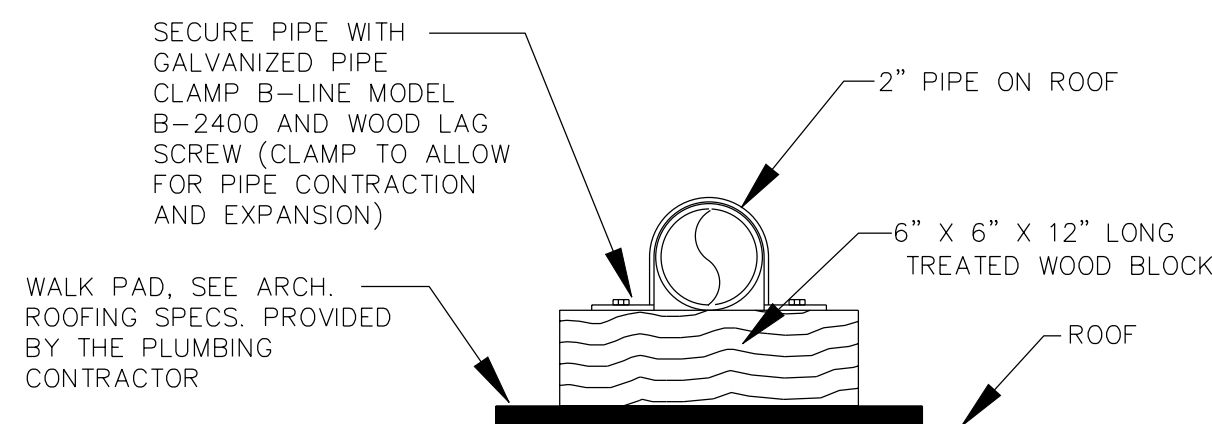


CONDENSATE CONNECTION DETAIL



TYPICAL DAMPER INSTALLATION

NOT TO SCALE

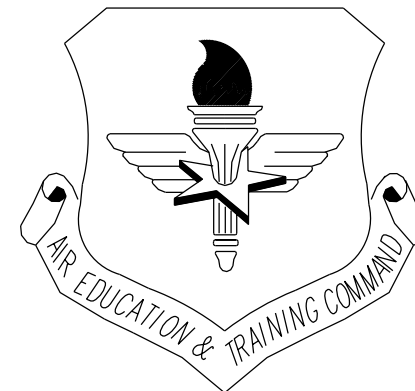


PIPING SHALL BE SUPPORTED AT ALL ELBOWS AND TEES AND AT SPACING SPECIFIED BY CODE.

PIPING SHALL BE SLOPED AND ROUTED TO PREVENT TRAPPING CONDENSATE (EXCEPT AT DIRT LEGS) AND TO FACILITATE CONDENSATE DRAINAGE.

CONDENSATE PIPING ON ROOF

NOT TO SCALE



LITTLE ROCK A.F.B.
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PROJECT TITLE: REPAIR & RENOVATE MEDICAL CLINIC PH V
LITTLE ROCK AIR FORCE BASE
JACKSONVILLE, ARKANSAS
CHANGE ORDER TO PHASE V - 100% SUBMITTAL

SHEET TITLE

**MECHANICAL
S-4 SCHEDULES & DETAILS**

DRAWN BY GMT	LEAD DESIGNER GMT
TECH REVIEWER	PROJECT NUMBER NKAK#06-8006-
DESIGNED BY GMT	SHEET
DATE MARCH 1, 2010	M-402
SCALE AS SHOWN	16 OF 29

AS-BUILT