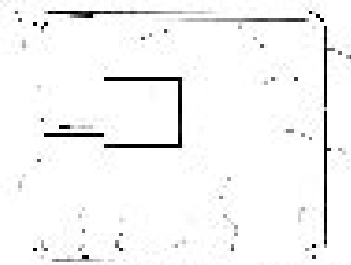
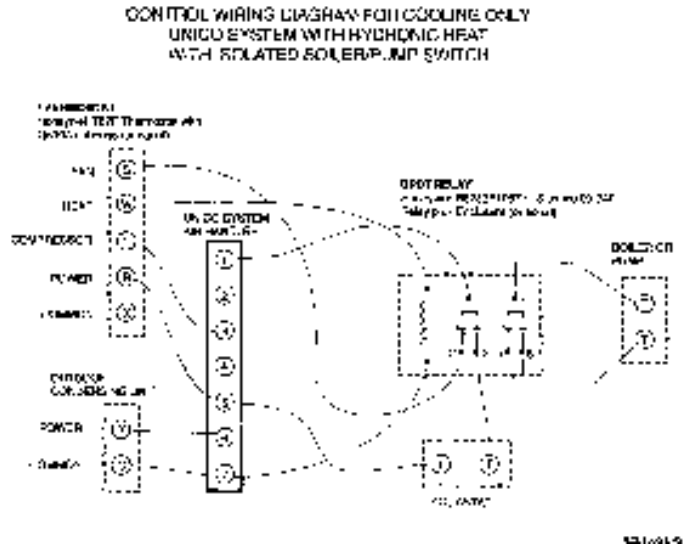


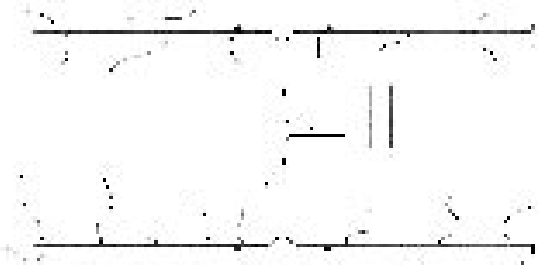
HIGH VELOCITY CENTRAL AC / HEAT UNICO

Installation Guide

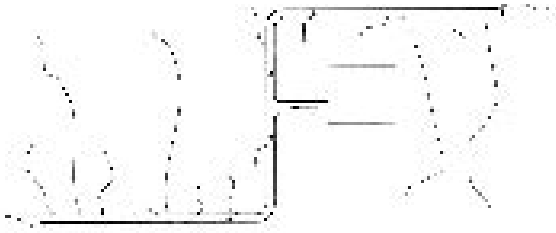
- **Minimum 6 outlets per ton** - an outlet is 10 feet of supply duct without any balancing orifices
- **10% Rule-** for supply ducts longer than 10 feet, the air is reduced by 10% for every 5 feet over 10. For example, a 30 foot run is 60% of a full outlet
- Place outlets out of traffic pattern. A corner 5" from each wall is a good location
- Keep supply duct length as close to 10 feet as possible and never less than 6 feet. Use a minimum of 3 feet of attenuator for each outlet
- Run the main trunk as long as possible. Maximum total plenum length is 150 feet. The first tee is equal to 30 feet and elbows equal to 15 feet
- **60/40 Rule-** when using a tee, split the load as close to 50/50 as possible- no more than 60/40. Always use a turning vane
- **70/30 Rule-** turn the tee 90° to make a side branch. Do not use a turning vane. Do not put more than 30% of air on the branch
- **Horseshoe patterns are the best method.** Use a tee at least 24 inches off the unit. For the 4260 unit use 9" insulated metal up to and including the tee, then 7" in both directions
- Shotgun pattern: for the 4260 unit use 9" insulated metal duct for the first 40%, then reduce to 7"
- **24 Inch Rule-** use at least 24" of straight plenum before any fitting
- Space takeoffs as evenly as possible. Space takeoffs at least 6" apart and 12" from end cap
- At start up measure the external static pressure in plenum 2' from unit before any fitting. Set as close to 1.5" of water or less (not less than 1.0" WC or more than 1.8" WC)



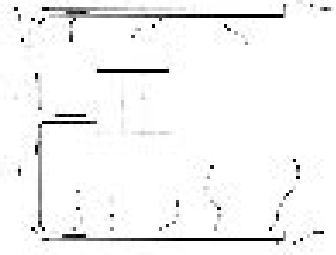
PERIMETER LOOP SYSTEM



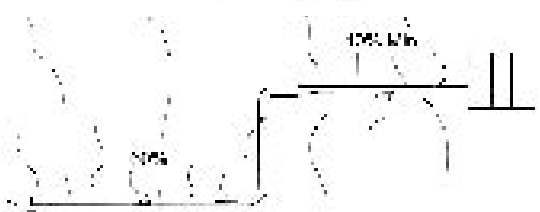
M SYSTEM



DOUBLE LEG SYSTEM



HORSESHOE SYSTEM



SHOTGUN SYSTEM



SIDE BRANCH SYSTEM

UNICHILLER AIR CONDITIONER UNICO

HVAC EQUIPMENT

Unico Plenum Sizing		
Round Size	Rectangular Equivalent	Max CFM
7.0	6½x6½, 6x8, 3½x14	600
9.0	8½x8½, 8x10, 6x12	1000
10.0	9½x9½, 8x12, 6x14	1250
11.0	10½x10½, 10x12, 8x14, 6x18	1500

Hot Water Heat Coil Capacity MBtuH & Pressure Drop						
Model	GPM	Press Drop Ft. Head	CFM	MBtuH @		
				120°ewt	160°ewt	200°ewt
HW2430	4	12.9	400	19.3	34.9	50.7
	8	48.1	400	19.9	36.0	52.1
	4	12.9	600	26.7	48.4	70.4
	8	48.1	600	28.2	50.9	73.8
HW3660	4	7.8	600	28.8	52.2	75.7
	8	28.7	600	30.9	55.4	80.2
	4	7.8	800	35.0	63.5	92.2
	8	28.7	800	42.0	76.0	110.0
	4	7.8	1000	39.9	72.5	105.0
	8	28.7	1000	45.2	81.8	118.5
	4	7.8	1250	45.0	81.8	119.0
	8	28.7	1250	52.5	98.0	142.0

Part #	Description/Used With
UPC-01-1218	Return Air Box w/ Grill & Filter 14x20
UPC-04-1218	Return Air Duct 12" x 10'
UPC-104-1218	Adapter, Return, 1218
UPC-01-2430	Return Air Box w/ Grill & Filter 25x14
UPC-04-2430	Return Air Duct 14" x 10'
UPC-59-2430	Return Air Adaptor (cooling module MC2430)
UPC-104-2430	Adapter, Return, Cooling Module, MH2430
UPC-01-3642	Return Air Box w/ Grill & Filter 30x14
UPC-04-3642	Return Air Duct 18" x 10'
UPC-59-3642	Return Air Adaptor (cooling module MC3642)
UPC-104-3642	Adapter, Return, Cooling Module, MH3642
UPC-01-4860	Return Air Box w/ Grill & Filter 30x24
UPC-04-4860	Return Air Duct 20" x 10'
UPC-59-4860	Return Air Adaptor (cooling module MC4860)
UPC-104-4860	Adapter, Return, Cooling Module, MH4860

Part #	Description/Used With
UPC-80F-1	Fiberglass Single Install Kit ¹
UPC-80M-1	Metal Single Install Kit ¹
UPC-89F-5A	Fiberglass 5 Outlet Install Kit ²
UPC-89M-5A	Metal 5 Outlet Install Kit ²
UPC-26C	Attenuator Tube 12'
UPC-26GR6.5	Attenuator Tube 12' R-6.0 ³
UPC-25	Aluminum Supply Tubing 25'
UPC-56B	Supply Outlet w/ Toggles & Screws ⁴
UPC-58-15	15° Angles Supply Outlet
UPC-58-30	30° Angles Supply Outlet
UPC-66	Die-cast Aluminum Slotted Outlet
UPC-67	Plastic Slotted Outlet
UPC020B	Secondary Drain Pan (2 module 2430)
UPC020C	Secondary Drain Pan (3 module 2430)
UPC024B	Secondary Drain Pan (2 module 3642)
UPC024C	Secondary Drain Pan (3 mod. 3642, 2 mod. 4860)
UPC024D	Secondary Drain Pan (3 module 4860)
UPC-91	Secondary Drain Pan (M1218)
UPC-54	Clamp Pliers
UPC-55	2" Fiberglass Hole Cutter
EW1	Optional 2-5 Year Parts Warranty
EW2	Optional 2-5 Year Parts & Labor Warranty
EW3	Optional 2-10 Year Parts Warranty
EW4	Optional 2-10 Year Parts & Labor Warranty

¹Includes supply outlet, 12' attenuator, take-off, winter shut off, 4 clamps, 2 toggles & screws, & coupling
²Includes 5 outlets, 5 take-offs, 5 shut-offs, 20 clamps, toggles & screws, 1 balancing kit, & 5 couplings
³Also available in R-4.2 & R-8.
⁴Also available in Red Oak, White Oak, Mahogany, Maple, Poplar, Walnut, Birch, Cherry & Pine

(Sound Attenuator tubes should be used for each outlet)

UNICHILLER AIR CONDITIONER UNICO

Features:

- Corrosion resistant pump
- Brazed plate evaporator
- Adjustable water temperature control, fully automatic
- Corrosion resistant fans (aluminum)
- Thermostatic Expansion valve
- High and low pressure limit switches
- Flow switch
- Hermetically sealed refrigerant system, no need for charging
- Scroll Compressor
- ½ hp Pump
- 3500 RPM Pump Speed



Model	CFM	Capacity MBtuH	Refrigerant	Amps	Max Flow GPM	Dimensions H x W x D	Supply Connection	Return. Connection	Weight
UCH-036-1	3900	36.0	R-22	17.8	7.2	49 ⁷ / ₈ x39 ⁷ / ₈ x16 ¹ / ₄	1	1½	280
UCH-048-1	3900	48.0	R-22	22.0	9.6	49 ⁷ / ₈ x39 ⁷ / ₈ x16 ¹ / ₄	1	1½	292
UCH-060-1	3900	60.0	R-22	29.3	12.0	49 ⁷ / ₈ x39 ⁷ / ₈ x16 ¹ / ₄	1	1½	313

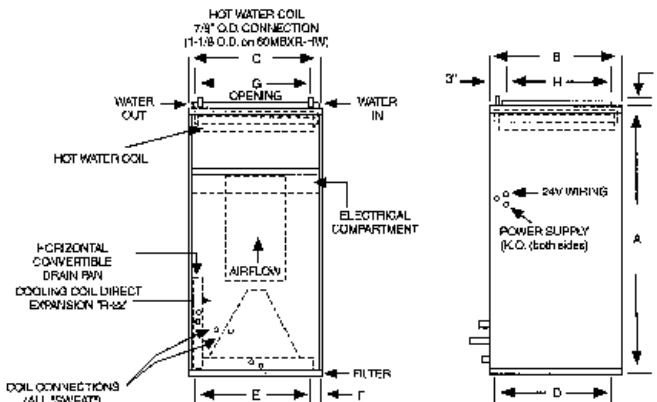
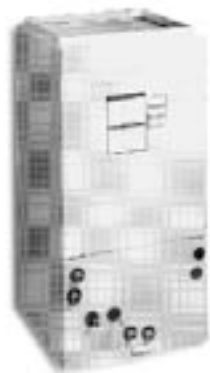


MBXB HYDRONIC AIR HANDLERS FIRST COMPANY

NEW FEATURES:

- Multi-function micro processor reduces the number of electrical controls and increases integrated features
- Units can be directly wired from boiler without additional controls
- 45 Second heating start delay high
- Efficiency cooling up to 12 SEER

- Hydronic heating coil
- Manual air vent on hotwater coil
- Three or four speed 120V motor
- Factory installed filter
- Baked-on enamel finish
- 4 Position airflow: upflow, downflow, or horizontal



Model	Dimensions								Wgt.	Filter Size	Ref. Conn.
	A	B	C	D	E	F	G	H			
18MBXB-3HW	40	20	20	18½	16	2	18	16	123	18 x 20	3/8-5/8
24MBXB-3HW	40	20	20	18½	16	2	18	16	130	18 x 20	3/8-5/8
30MBXB-3HW	42	23	20	21½	16	2	18	19	130	20 x 22	3/8-3/4
36MBXB-3HW	42	23	20	21½	16	2	18	19	135	20 x 22	3/8-3/4
48MBXB-3HW	48	28	21¼	26¼	17¼	2	18	24	145	20 x 25	1/2-7/8
60MBXB-4HW	52	28	25¼	26¼	21¼	2	22	24	155	(2) 14 x 24	1/2-7/8

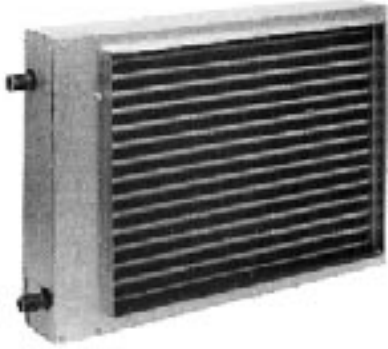
Model	Motor HP	Amps	Motor Speed	CFM@ Lo 0.1"	CFM@ Hi 0.3"	CFM@ Lo 0.5"	GPM	Pressure Drop Ft.	BTUH Htg. @120°	BTUH Htg. @140°	BTUH Htg. @180°
18MBXB-3HW	1/5	2.8	Low	325	550	295	1	0.22	13.6	19.0	29.9
			Med	680	420	2	0.83	17.8	24.9	39.1	
			High	810	500	3	1.83	19.1	26.8	42.1	
24MBXB-3HW	1/5	5.1	Low	755	725	510	1	0.22	15.9	22.2	34.9
			Med	835	580	2	0.83	21.0	29.4	46.2	
			High	920	645	3	1.83	22.8	31.9	50.2	
30MBXB-3HW	1/5	5.1	Low	670	780	510	2	1.04	22.7	31.8	50.0
			Med	840	690	4	3.64	26.3	36.8	57.9	
			High	1095	880	6	7.55	28.0	39.1	61.5	
36MBXB-3HW	1/2	8.5	Low	1170	1140	940	2	1.04	28.4	39.7	62.4
			Med	1260	1000	4	3.64	33.3	46.6	73.3	
			High	1310	1050	6	7.55	35.7	50.0	78.5	
48MBXB-3HW	3/4	10.7	Low	1260	1460	1050	2	0.41	35.9	50.3	79.0
			Med	1550	1340	4	1.40	45.9	64.3	101.0	
			High	1780	1530	6	2.90	49.7	69.6	109.4	
60MBXB-3HW	1	11.5	Low	1540	1710	1260	5	1.86	54.9	76.8	120.7
			Med	1840	1525	7	3.33	58.6	82.0	128.9	
			High	2125	1810	9	5.15	61.1	85.6	134.5	

Accessories	
978-5HP	1½ & 2 Ton R22 Expansion Valve Kit
978-6HP	2½ & 3 Ton R22 Expansion Valve Kit
978-7HP	3½, 4 & 5 Ton R22 Expansion Valve Kit
978P-5HP	1½ & 2 Ton R410 Expansion Valve Kit
978P-6HP	2½ & 3 Ton R410 Expansion Valve Kit
978P-7HP	3½, 4 & 5 Ton R410 Expansion Valve Kit
941-1	Freeze Protector



HWC HYDRONIC COILS FIRST COMPANY

HVAC EQUIPMENT

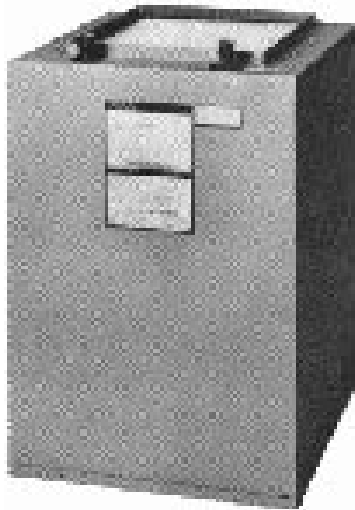


Model	Face Area	Size HxWxD	GPM	Press Drop Ft.	CFM	Cap @ 120°	Cap @ 140°	Cap @ 180°
HWC1520	15x20	17x4x24 ¹ / ₄	3	1.2	800/1200	24.2/30.1	33.8/42.2	53.1/66.3
			5	3.4		26.4/33.8	36.9/47.3	58.0/74.3
			7	6.7		27.6/35.7	38.6/50.0	60.6/78.6
HWC2025	20x25	22x4x29 ¹ / ₄	3	0.6	1400/1800	36.6/41.4	51.2/58.0	80.5/91.1
			5	1.7		41.4/47.5	58.0/66.5	91.2/104.6
			7	3.4		44.1/51.3	61.7/71.8	97.0/112.8

HYDRONIC AIR HANDLER FIRST COMPANY

FWA-HW Series

Upflow, Downflow, Horizontal Hot Water Air Handler



- Factory installed filter
- Blower delay on call for heat
- All Motors are 120V
- 4 Position airflow - upflow, downflow, or horizontal
- Manual air vent on coil
- May be used w/field added cooling coil for AC

Model	Size HxWxD	SA Size	RA Size	Filter	HP	Amps @120v	CFM Hi @.5"	GPM	Press Drop Ft	Cap. @ 120°	Cap. @ 140°	Cap. @ 180°
FWA30-HW	27 ¹ / ₂ x20x20	18 ¹ / ₄ x16 ¹ / ₄	17x18	20x20	1/5	2.7	710	2	0.83	21.1	29.5	46.4
								3	1.8	22.9	32.0	50.3
								4	3.2	24.1	33.7	53.0
FWA50-HW	27 ¹ / ₂ x20x23	18 ¹ / ₄ x19 ¹ / ₄	20x18	20x22 ¹ / ₄	1/2	8.1	1265	2	1.1	29.9	41.9	65.8
								3.5	2.9	36.3	50.8	79.8
								6	7.6	38.1	53.4	83.9
FWA60-HW	27 ¹ / ₂ x20x23	18 ¹ / ₄ x19 ¹ / ₄	20x18	20x22 ¹ / ₄	1/2	8.1	1150	2	0.6	36.0	50.4	79.2
								3.5	1.6	41.3	57.8	90.8
								6	4.3	45.7	64.0	100.6



COMMERCIAL AIR HANDLERS FIRST COMPANY

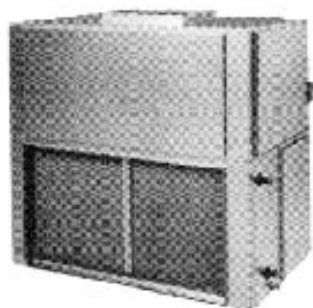
CHW/CVW Hydronic Air Handling Units

CHW-DD Hydronic Direct Drive Blower/Coil Unit

- Compact design can be used in conditioned area or as remote units with ducting
- Standard 4 row coils can be used for heating or cooling
- Separate filter panels are provided on both sides of unit
- CHW-DD model provides a competitive alternative to belt driven models, (can be used where external static pressures do not exceed .60)
- ETL and A.R.I. listed
- Available in 2-20 tons
- Options for CHW/CVW models include 6 row heating/cooling coils, motor and mixing box options and discharge plenums



**CHW/CHX/CHW-DD
Horizontal Unit**



CVW/CVX Vertical Unit

CHX / CVX Heat Pump/Direct Expansion Units

- Compact design has large removable panels for ease of service and installation, (separate filter panels located on either side of unit)
- Available in 2-20 ton models
- 2-5 ton models feature piston-type metering devices and are approved for either straight cool or heat pump operation
- 7 $\frac{1}{2}$ -20 ton models have factory installed expansion valves and are approved for straight cool only operation
- 7 $\frac{1}{2}$ ton models have single circuit coils; 10-20 ton models dual circuit coils
- Options include separate 2 row hot water coils, expansion valves for 2-5 ton models, motor and mixing box options and discharge plenums

HVAC
EQUIPMENT

Model	Capacity MBtuH	SA Size W x D	RA Size W x D	Line Size	Dimensions H x W x D	Filter Size "	Std. Motor H.P.	Volts/Phase	CFM Hi @.5"	Wgt.
24CHW4	24	8 $\frac{7}{8}$ x 10 $\frac{7}{8}$	18 x 16 $\frac{1}{4}$	$\frac{3}{8}$	18 $\frac{1}{4}$ x 32 $\frac{1}{2}$ x 18	16 x 25	$\frac{1}{4}$	115/1	830	185
24CHW4-DD	24	8 $\frac{3}{4}$ x 10 $\frac{7}{8}$	18 x 16 $\frac{1}{4}$	$\frac{3}{8}$	18 $\frac{1}{4}$ x 32 $\frac{1}{2}$ x 18	16 x 25	$\frac{1}{5}$	115/1	820	150
24CVW4	24	11 x 9	18 x 16 $\frac{1}{4}$	$\frac{3}{8}$	34 $\frac{1}{2}$ x 28 $\frac{1}{2}$ x 31 $\frac{3}{4}$	16 x 25	$\frac{1}{4}$	115/1	830	185
36CHW4	36	10 $\frac{7}{8}$ x 12 $\frac{5}{8}$	27 $\frac{1}{2}$ x 16 $\frac{1}{4}$	$\frac{3}{8}$	18 $\frac{1}{4}$ x 42 x 18	16 x 16 (2)	$\frac{1}{3}$	115/1	870	225
36CHW4-DD	36	11 $\frac{1}{4}$ x 10 $\frac{3}{4}$	27 $\frac{1}{2}$ x 16 $\frac{1}{4}$	$\frac{3}{8}$	18 $\frac{1}{4}$ x 42 x 18	16 16 (2)	$\frac{1}{3}$	115/1	1090	175
36CVW4	36	10 $\frac{7}{8}$ x 12 $\frac{5}{8}$	27 $\frac{1}{2}$ x 16 $\frac{1}{4}$	$\frac{3}{8}$	34 $\frac{1}{4}$ x 38 x 31 $\frac{3}{4}$	16 x 16 (2)	$\frac{1}{3}$	115/1	870	225
48CHW4	48	13 $\frac{5}{8}$ x 11 $\frac{7}{8}$	29 x 20 $\frac{1}{4}$	$\frac{3}{8}$	22 $\frac{1}{4}$ x 43 $\frac{1}{2}$ x 22	16 x 20 (2)	$\frac{1}{2}$	115/1	785	265
48CHW4-DD	48	12 $\frac{3}{8}$ x 10 $\frac{3}{4}$	29 x 20 $\frac{1}{4}$	$\frac{3}{8}$	20 $\frac{1}{4}$ x 43 $\frac{1}{2}$ x 22	16 x 20 (2)	$\frac{1}{2}$	115/1	1390	210
48CVW4	48	11 $\frac{3}{4}$ x 13 $\frac{5}{8}$	29 x 20 $\frac{1}{4}$	$\frac{3}{8}$	41 $\frac{1}{8}$ x 39 $\frac{1}{2}$ x 31 $\frac{3}{4}$	16 x 20 (2)	$\frac{1}{2}$	115/1	785	265
60CHW4	60	16 x 13 $\frac{7}{8}$	36 x 20 $\frac{1}{4}$	$\frac{3}{8}$	22 $\frac{1}{4}$ x 50 $\frac{1}{2}$ x 22	20 x 20 (2)	$\frac{1}{2}$	115/1	600	345
60CHW4-DD	60	11 $\frac{1}{8}$ x 11 $\frac{3}{4}$	36 x 20 $\frac{1}{4}$	$\frac{3}{8}$	22 $\frac{1}{4}$ x 50 $\frac{1}{2}$ x 22	20 x 20 (2)	$\frac{1}{2}$	115/1	1390	210
60CVW4	60	13 $\frac{7}{8}$ x 16	36 x 20 $\frac{1}{4}$	$\frac{3}{8}$	44 $\frac{1}{4}$ x 46 $\frac{1}{2}$ x 31 $\frac{1}{4}$	20 x 20 (2)	$\frac{1}{2}$	115/1	600	345
24CHX4	24	8 $\frac{3}{4}$ x 10 $\frac{7}{8}$	18 x 16 $\frac{1}{4}$	$\frac{3}{8}$	18 $\frac{1}{4}$ x 31 x 18	16 x 25	$\frac{1}{4}$	115/1	830	185
24CVX4	24	11 x 9	18 x 16 $\frac{1}{4}$	$\frac{3}{8}$	34 $\frac{1}{2}$ x 28 $\frac{1}{2}$ x 31 $\frac{3}{4}$	16 x 25	$\frac{1}{4}$	115/1	830	185
36CHX4	36	12 $\frac{1}{4}$ x 10 $\frac{7}{8}$	27 $\frac{1}{2}$ x 16 $\frac{1}{4}$	$\frac{3}{8}$	18 $\frac{1}{4}$ x 40 $\frac{1}{2}$ x 18	16 x 16 (2)	$\frac{1}{3}$	115/1	870	215
36CVX4	36	10 $\frac{7}{8}$ x 12 $\frac{5}{8}$	27 $\frac{1}{2}$ x 16 $\frac{1}{4}$	$\frac{3}{8}$	34 $\frac{1}{2}$ x 28 $\frac{1}{2}$ x 31 $\frac{3}{4}$	16 x 16 (2)	$\frac{1}{3}$	115/1	870	225
48CHX4	48	13 $\frac{5}{8}$ x 11 $\frac{7}{8}$	29 x 20 $\frac{1}{4}$	$\frac{3}{8}$	22 $\frac{1}{4}$ x 42 x 22	16 x 20 (2)	$\frac{1}{2}$	115/1	785	250
48CVX4	48	11 $\frac{3}{4}$ x 13 $\frac{5}{8}$	29 x 20 $\frac{1}{4}$	$\frac{3}{8}$	41 $\frac{1}{8}$ x 39 $\frac{1}{2}$ x 31 $\frac{3}{4}$	16 x 20 (2)	$\frac{1}{2}$	115/1	785	250
60CHX4	60	16 x 13 $\frac{7}{8}$	36 x 20 $\frac{1}{4}$	$\frac{3}{8}$	22 $\frac{1}{4}$ x 49 x 22	20 x 20 (2)	$\frac{1}{2}$	115/1	600	320
60CVX4	60	13 $\frac{7}{8}$ x 16	36 x 20 $\frac{1}{4}$	$\frac{3}{8}$	44 $\frac{1}{4}$ x 46 $\frac{1}{2}$ x 31 $\frac{3}{4}$	20 x 20 (2)	$\frac{1}{2}$	115/1	600	320

Accessories Model/Description	For Unit/Model	Manifold Conn.
2 Row Hot Water Coil		
24HWK	24 CHX/ CVX-24 CHW/CVW	$\frac{7}{8}$ O.D.
36HWK	36 CHX/ CVX-36 CHW/CVW	$\frac{7}{8}$ O.D.
48HWK	48 CHX/ CVX-48 CHW/CVW	$\frac{7}{8}$ O.D.
60HWK	60 CHX/ CVX-48 CHW/CVW	$\frac{7}{8}$ O.D.
Discharge Plenum		
24DP	24 CHW/ CHX/ CHW-DD	6" depth
36DP	36 CHW/ CHX/ CHW-DD	
48DP	48 CHW/ CHX/ CHW-DD	
60DP	60 CHW/ CHX/ CHW-DD	

48 Hour Quick Ship Available



HUMIDIFIERS LOBB

Features: Water Saver Models

- A uniquely environmentally friendly recycling feature.
- Reduces water waste up to 65%
- Increase in efficiency of the humidification

Warranty (all models):

Lifetime - humidifier's housing.
2 years on parts.

Model #	Description	Plenum Opening (H x W)	Capacity (Gal.)	Water Savings	Solenoid	Electrical Data
WSP-2	Water Saver Plus 2 Flow-Thru	9 ¹ / ₄ x 9 ¹ / ₄	17 GPD@120°F	45%-65%	24V	120V-0.70 AMP
WS	Water Saver Flow-Thru	9 ¹ / ₄ x 9 ¹ / ₄	17 GPD@120°F	45%-65%	24V	120V-0.70 AMP

Model #	Description	Dimensions (H x W x L)	Capacity (Gal.)	Water Supply	Electrical Data	Wgt.
WA-1	Drum By-pass	12 x 11 ¹ / ₂ x 13 ¹ / ₄	14 GPD@120°F	1/4 tubing	24 Volt	12
WA-2	Drum By-pass	12 x 10 ¹ / ₂ x 9	11 GPD@120°F	1/4 tubing	24 Volt	9



Part #	Used For	Description
824	WSP2, WS	Evaporator Pad
826	WSP2, WS	Solenoid
156	All	Transformer
135	All	Saddle Valve
157	All	Humdistat
108	WA-1, WA-2	Motor
124	WA-1	Evaporator Pad
224	WA-2	Evaporator Pad
139	WA-1, WA-2	Float Valve

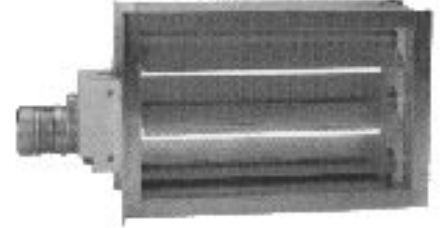
ULTRA-ZONE™

EWC Zoning Systems for HVAC Designs

ZONING SYSTEMS ULTRA-ZONE

Dampers

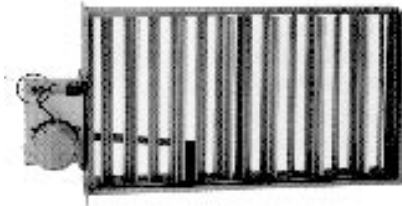
ND	ND Series Damper. Heavy duty frame, revolutionary motor with greater reliability. LED operation indicator and simple 3 wire hook up. The ND has a 97% leak proof rating. Side or bottom mount actuator. Special order sizes up to 30" x 30"
SMDL & BMDL	SMDL & BMDL are the same damper as SMD & BMD except with a revolutionary new motor. The motor has a three wire hook up and LED's to display the status of the damper.
RD	Round Damper. Available in sizes from 4" to 14".
URD	Round single blade motorized damper (URD-ESR is spring return)
EBD	Self contained bypass dampers with adjustable operation from 0.1" to 4.0" of pressure. Requires 24VAC to operate.
PRD	Static Pressure Relief Damper.



Warranty:
Parts - 5 years from installation

HVAC EQUIPMENT

Model	6"	8"	10"	12"	14"	16"	18"	20"	22"	24"
ND or NDSR-8" High	*	*	*	*	*	*	*	*	*	*
ND or NDSR-10" High				*	*	*	*	*	*	*
ND or NDSR-12" High				*	*	*	*	*	*	*
SMDL or BMDL-8" High		*	*	*	*	*	*	*	*	*
SMDL or BMDL-10" High		*	*	*	*	*	*	*	*	*
SMDL or BMDL-12" High				*	*	*	*	*	*	*
BMD or SMD-8" High			*	*	*	*	*	*	*	*
BMD or SMD-12" High				*	*	*	*	*	*	*
URD-Round Damper	*	*	*	*	*	*	*	*	*	*
EBM Round Damper			*	*	*	*	*	*	*	*
EBM Damper Rectangular 8"				*	*	*	*	*	*	*
EBM Damper Rectangular 12"				*	*	*	*	*	*	*
PRD-Relief 8" High			*	*	*	*	*	*	*	*



ULTRA-ZONE™

EWC Zoning Systems for HVAC Designs

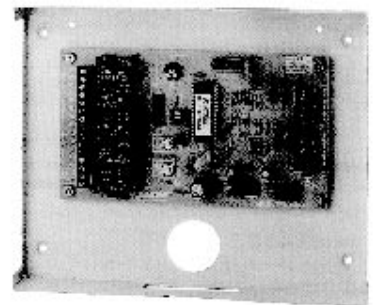
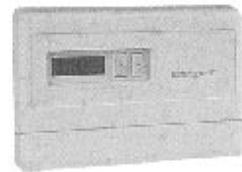
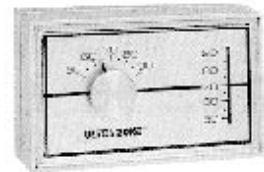
ZONING SYSTEMS ULTRA-ZONE

HVAC
EQUIPMENT

Thermostats	
EWT-261	Programmable thermostat for use on all zones on the STE panels. Six wires required. Battery Powered
EWT	Standard thermostat used for damper control or as zone thermostat on any panel. Three wires required.
EWT-AC	Programmable auto-changeover thermostat for use on all zones on any panel but the ST-E. Four wires required.
TSB-M	Six wire sub-base for use with 3 wire thermostat. Use this sub-base for zone 1 system changeover on ST-E panels or on any other panel

Control Panels	
ST-*E	<ul style="list-style-type: none"> • Single zone heat/cool panel. • Change-over controlled by #1 thermostat • Can be wired together to serve up to 8 zones
NCM-300	<ul style="list-style-type: none"> • Control panel for stage, dual fuel or heat pump 2-3 zones • Auto heating and cooling changeover • Equipped with an SAS sensor • LED lights show damper and system operation • Compatible with dual transformer systems ie hydro-air
BMPlus	<ul style="list-style-type: none"> • A control panel for use in single stage, two stage, or heat pump installations. • Auto heating and cooling changeover. The changeover purge cycle 5 minutes. • Will work with virtually any thermostat. • Equipped with an SAS sensor for field adjustable high and low limit control. • Can control staging based on time or outdoor temperature with optional OAS sensor.
UZC**	<ul style="list-style-type: none"> • A control panel for up to 29 zones, up to 3 stage heat, 2 stage cooling • Auto change-over with adjustable change-over delay and mode purge time • Compatible with virtually any 3 or 4 wire thermostat - RYW for heat/cool, G for fan • Zone thermostats are sgl zone. Staging controlled by field adjustable run time setting • Unoccupied switch allows all zones to be set back from 1 location • Built-in fresh air control or combustion air damper • LED lights show damper and system operation • SAS (supply air sensor) can protect equipment from overheating, or coil freeze-ups • OAS (outdoor air sensor) used as economizer control

Zoning Systems for HVAC	
Part#	Description
ST-2E	2 Zone Single Stage Heat Cool
ST-3E	3 Zone Single Sage Heat Cool
NCM-300	2-3 Zone, 1,2 Stg Ht, 1 Stg Cool
UZC-3	2-3 Zone, 1,2,3 Stg Ht, 1,2 Stg Cool
UZC-5	4-5 Zone, 1,2,3 Stg Ht, 1,2 Stg Cool
UZC-7	6-7 Zone, 1,2,3 Stg Ht, 1,2 Stg Cool
UZC-9	8-9 Zone, 1,2,3 Stg Ht, 1,2 Stg Cool
UZC-11	10-11 Zone, 1,2,3 Stg Ht, 1,2 Stg Cool
UZC-13	12-13 Zone, 1,2,3 Stg Ht, 1,2 Stg Cool
UZC-15	14-15 Zone, 1,2,3 Stg Ht, 1,2 Stg Cool
UEX-22	UZC Expansion Panel
BMPlus-3000	2-3 Zone, One or Two Stage Heat / Cool Panel Auto-Changover
BMPlus-5000	4-5 Zone, One or Two Stage Heat / Cool Panel Auto-Changover
BMPlus-7000	6-7 Zone, One or Two Stage Heat / Cool Panel Auto-Changover
XM-2	Two Zone Expansion Panel for BMPlus Panels
OAS	Outdoor Sensors for Use w/ UZC, BMPlus Panels

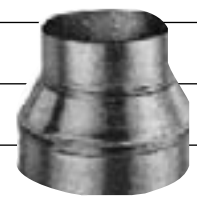


DUCT WORK SOUTHWARK

4 Pc. Elbows	3"	4"	5"	6"	7"	8"	9"	10"	12"	14"	16"	18"	20"
24Ga.			*	*	*	*	*	*	*	*	*	*	*
26Ga.	*	*	*	*	*	*	*	*	*	*	*	*	
30Ga.	*	*	*	*	*	*	*	*	*	*	*	*	

Snaplock Pipe	3"	4"	5"	6"	7"	8"	9"	10"	12"	14"	16"	18"	20"
24Ga.x2'			*	*	*	*	*	*	*	*	*	*	*
26Ga.x2		*	*	*	*	*	*	*	*	*	*	*	
26Ga.x5'		*	*	*	*	*	*	*	*	*	*	*	
30Ga.x5'	*	*	*	*	*	*	*	*	*	*	*	*	
30Ga.x10'	*	*	*	*	*	*	*	*	*	*	*	*	

#58 Reducers	3"	4"	5"	6"	7"	8"	9"	10"	12"	14"	16"	18"
4"	*											
5"	*	*										
6"	*	*	*									
7"	*	*	*	*								
8"			*	*	*							
9"			*	*	*	*						
10"				*	*	*	*					
12"						*	*	*				
14"						*	*	*	*			
16"								*	*	*		
18"										*	*	
20"												



	3"	4"	5"	6"	7"	8"	9"	10"	12"	14"	16"	18"	20"
#44 Damper		*	*	*	*	*	*	*	*				
#54 Tee	*	*	*	*	*	*	*	*	*	*			
#55 Tee Cap	*	*	*	*	*	*	*	*	*	*	*	*	*
#62 Top T.O.		*	*	*	*	*	*	*	*	*			
#62FG Top T.O.		*	*	*	*	*	*	*	*	*			
#62AFG T.O.			*	*	*	*	*	*	*	*			
#63A Adj. T.O.		*	*	*	*	*	*	*	*	*			
#63FG T.O.		*	*	*	*	*	*	*	*	*			
#63 T.O.		*	*	*	*	*	*	*	*	*			
#95 Draft Dvtr.	*	*	*	*	*	*	*	*	*	*			
#97LS T.O.		*	*	*	*	*	*	*	*	*	*	*	*
#97FG T.O.		*	*	*	*	*	*	*	*	*	*	*	*
#97FGWD T.O.		*	*	*	*	*	*	*	*	*	*	*	*



#62



#63



#63A



#54



#44

DUCT ACCESSORIES

DUCT WORK SOUTHWARK

DUCT ACCESSORIES



#13 Flat 45



#14 Flat 90



#15 Vert. 45



#810 RA Kit



#23 Offset



#16 Vert. 90



#23AT Offset T. O.



#20 Take Off



#35 Reducer



#113 45



#114 90



#115 V-45



#116 V-90



#124 Boot



#127 Boot



#106 Boot



355 Box



360 Box

Item	8 W	10 W	12 W	14 W	16 W	18 W	20 W	24 W
96" Joint 8" h			*		*		*	*
96" Joint 10" h			*		*		*	*
60" Joint 8" h	*	*	*	*	*	*	*	*
60" Joint 10" h			*		*		*	*
#13 Flat 45 8" h	*	*	*	*	*	*	*	*
#13 Flat 45 10" h			*		*		*	*
#14 Flat 90 8" h	*	*	*	*	*	*	*	*
#14 Flat 90 10" h			*		*		*	*
#15 Vert 45 8" h	*	*	*	*	*	*	*	*
#15 Vert 45 10" h			*		*		*	*
#16 Vert 90 8" h	*	*	*	*	*	*	*	*
#16 Vert 90 10" h			*		*		*	*
#20 Collar 8" h	*	*	*	*	*	*	*	*
#20 Collar 10" h			*		*		*	*
#21 End Cap 8" h	*	*	*	*	*	*	*	*
#21 End Cap 10" h			*		*		*	*
#23 Offset 8" h	*	*	*	*	*	*	*	*
#23 Offset 10" h			*		*		*	*
#23AT Offset 8" h				*	*	*	*	*
#23AT Offset 10" h			*		*		*	*

Item	
#810	Return Air Kit Kit 20x10-20x16
#811	Return Air Kit Kit 25x10-25x16
#812	Return Air Kit Kit 20x10-20x14
#813	Return Air Kit
#35	2" Trunk Reducer
#35	4" Trunk Reducer
#35	6" Trunk Reducer
#35	8" Trunk Reducer
#6	8' S-Cleat
#8	8' Drive Cleat
#37	10' Rigid S-Cleat

Oval Fittings	6" Oval	7" Oval
#100 100" Oval Pipe	*	*
#113 Flat 45	*	*
#114 Flat 90	*	*
#115 Vert 45	*	*
#116 Vert 90	*	*
#124 Angle Boot	*	*
#127 Strgt Boot	*	*
#106 Reverse Boot	*	*
#110 Stack Head	*	*
#355 Strgt Oval Box	*	*
#360 Angle Oval Box	*	*