



WATER SOURCE & GEOTHERMAL HEAT PUMPS SPECIFICATION DATA SHEET

Dade Broward (786) 766-6600 & Palm Beach - Treasure Coast (561) 285-2110

BFX048

WATER SOURCE & GEOTHERMAL HEAT PUMPS
R410A REFRIGERANT

WATER LOOP				GROUND WATER			
Cooling		Heating		Cooling		Heating	
Capacity	EER	Capacity	COP	Capacity	EER	Capacity	COP
51,000	18.0	58,000	5.0	57,000	27.0	50,000	4.3

GROUND LOOP				FLOW RATE	
Cooling		Heating		AIR	WATER
Capacity	EER	Capacity	COP	CFM	GPM
53,000	20.0	39,000	3.6	1,600	12.0

ELECTRICAL SPECIFICATIONS

Electrical Characteristics	Elect. Symbol	Compressor		Min Circuit Ampacity	Max Fuse Size
		RLA	LRA		
208-230/1/60	A	24.3	117	36	70
208-230/3/60	C	13.7	83.1	23	35
460/3/60	D	6.1	41	11	15
265/1/60	B	16.2	98	25	40

FLUID PRESSURE DROP

Fluid Flow (GPM)	Pressure drop	
	(FOH)	(PSIG)
6.0	3.3	1.4
8.0	5.9	2.6
10.6	10.2	4.4
12.0	13.1	5.7
15.0	20.5	8.9

	UNIT WEIGHT (lbs)		DIMENSION		
	Unit Weight	Shipping Weight	Length	Width	Height
Vertical	320	340	26.00	24.00	43.00
Horizontal	330	350	45.50	26.00	21.00

COOLING

Entering Fluid Temp. (°F)	Entering Air Fluid (°F)	Total Capacity (MBtuH)	Sensible Capacity (MBtuH)	SHF	Power Input (kW)	Heat Rejection (MBtuH)	EER
50	70 db 61 wb	53.61	35.38	0.66	2.25	59.69	30.1
59		51.60	34.40	0.67	2.53	58.61	25.1
70		49.05	33.17	0.68	2.83	57.09	20.8
86		45.65	32.01	0.70	3.34	55.44	15.9
100		41.80	29.62	0.71	3.82	53.22	12.5
50	75 db 63 wb	55.50	39.89	0.72	2.24	61.55	31.3
59		53.43	38.87	0.73	2.52	60.42	26.1
70		51.23	38.28	0.75	2.85	59.34	21.5
86		46.91	35.76	0.76	3.34	56.72	16.3
100		44.88	35.16	0.78	3.90	56.58	13.1
50	80.6 db 66.2 wb	59.08	43.83	0.74	2.22	65.05	33.7
59		57.00	43.06	0.76	2.58	64.20	27.0
70		54.16	42.05	0.78	2.84	62.25	22.8
86		51.00	40.09	0.79	3.30	60.67	18.0
100		46.30	38.74	0.84	3.82	57.74	13.8
50	85 db 71 wb	63.80	42.84	0.67	2.18	69.64	37.3
59		61.39	42.12	0.69	2.48	68.23	30.6
70		58.37	40.96	0.70	2.83	66.42	24.7
86		54.01	39.46	0.73	3.34	63.81	18.8
100		50.07	37.88	0.76	3.82	61.51	14.9

HEATING

Entering Fluid Temp. (°F)	Entering Air Fluid (°F)	Total Capacity (MBtuH)	Power Input (kW)	Heat of Absorb. (MBtuH)	COP
50	60	49.68	3.57	39.12	4.7
60		55.83	3.64	45.02	5.2
68		60.84	3.70	49.82	5.5
80		68.28	3.77	57.03	6.1
50	68	50.00	3.88	38.37	4.3
60		54.70	3.89	43.05	4.7
68		58.00	3.87	46.40	5.0
80		66.85	4.04	54.66	5.5
50	80	47.72	4.21	34.96	3.7
60		53.13	4.29	40.08	4.1
68		57.74	4.37	44.42	4.3
80		64.87	4.50	51.13	4.7

LOW TEMP HEATING

with Antifreeze by ARI-ISO 13256-1

Entering Fluid Temp. (°F)	Entering Air Fluid (°F)	Total Capacity (MBtuH)	Power Input (kW)	Heat of Absorb. (MBtuH)	COP
25	60	36.08	3.32	26.35	3.7
32		39.61	3.39	29.65	4.0
40		43.73	3.45	33.54	4.3
25	68	35.58	3.57	25.02	3.4
32		39.00	3.65	28.17	3.6
40		42.95	3.67	32.02	3.9
25	80	34.86	3.93	23.05	3.0
32		38.16	3.98	26.18	3.2
40		42.25	4.06	29.99	3.4

As a result of continuing research and development, specifications are subject to change without notice.

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