

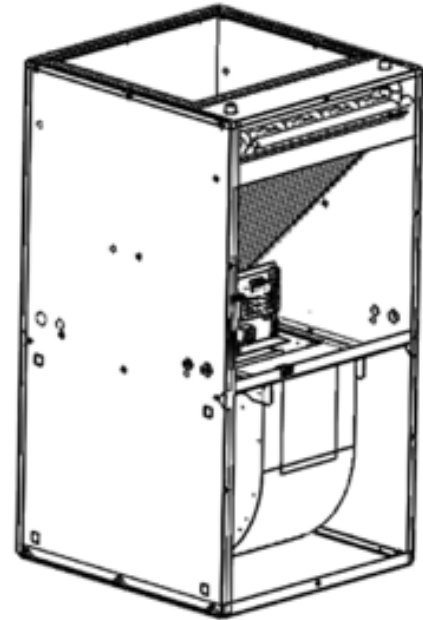
# SUBMITTAL DATA



**MODEL NO** VHB504A HYDRONIC AIR HANDLER

**JOB NAME:** ..... **LOCATION:** ..... **DATE:** .....  
**PURCHASER:** ..... **ENGINEER:** .....  
**SUBMITTED TO:** ..... **FOR:** ..... **REVIEW ( )** **APPROVAL ( )**

- CHOICE OF INDEPENDENT HEATING ( 8 SPEEDS) & INDEPENDENT COOLING ( 8 SPEEDS) Adjusted in 100 cfm increments
- 
- BUILT-IN DEHUMIDIFICATION OPTION
- ZONING CAPABILITIES
- INTELLIGENT DHW PRIORITY
- HOT WATER COIL FREEZE PROTECTION BUILT-IN
- TO STAGE COOLING
- PREMIUM HOT WATER COIL
- INSULATED CABINET
- 24-HOUR PUMP CIRCULATION TIMER
- CONSTANT CFM ECM BLOWER WITH CONTINUOUS LOW SPEED FAN
- WARM UP & COOL DOWN OF HEATING COIL ON EVERY CALL FOR HEAT (P911)
- SUITABLE FOR LOW VELOCITY OR MID VELOCITY APPLICATIONS
- DYNAMIC CONTROL STRATEGY
- AHRI CERTIFIED CONDENSOR AND EVAPORATOR AVAILABLE



HEATING PERFORMANCE (BTUH) AMBIENT AIR ENTERING 70°F

CFM	GPM	140*	160*	180*
900	3	42,720	55,160	67,640
	4	45,910	59,250	72,610
	5	47,960	61,860	75,790
1000	3	45,210	58,400	71,620
	4	48,930	63,160	77,430
	5	51,340	66,240	81,170
1100	3	47,450	61,310	75,210
	4	51,700	66,750	81,840
	5	54,480	70,310	86,170
1200	3	49,480	63,950	78,460
	4	54,240	70,050	85,910
	5	57,400	74,090	90,830
1300	3	51,320	66,340	81,400
	4	56,590	73,100	89,670
	5	60,120	77,620	95,170

SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE.

SPECIFICATION	VALUE
Heating Capacities	50,000 BTU/h @ 3GPM @ 140F
Cooling Capacities	1 to 4 tons up to 0.7" wc 1 to 3 tons up to 1.4" wc
Airflow	1600 CFM up to 0.7" wc 1200 CFM up to 1.4" wc
Dimensions	21 1/8" W x 22" D x 39 3/4" H
Power	120V-60-1 6A 15A fuse
Blower Motor	3/4 HP – ECM fully variable
Control	Modulating, 1 and 2 stage
Compatibilities	Alizé and any type of A/C-HP Smart Duct w/ Smart Zoning System Any 1-2 stage thermostat and Dettson's communicating thermostat for Smart Duct System
Construction	Multiposition Cabinet: 22 Ga powder coated steel Inner panels 22 Ga galvanized steel Insulation 1/2" inside blower compartment and door
Certification	CSA (US & Canada) CSA-C22.2 No.236-05, 3rd Edition, Feb.2005 - Heating and Cooling Equipment UL 1995, 3rd Edition, Feb.2005 - Heating and Cooling Equipment NSF 372: Drinking Water Systems Components – Lead Content

Features	V-series Hydromaxx	Notes
CFM Increments 720-1600 Heating & 300-500 cfm per ton Cooling speeds, adjust in 100 CFM increments	Yes	1
Switch 24V to Power Accessories	avail @ term	
Built in Dehumidification Option	Yes	2
Zoning Option	Yes	3,11
Intelligent DHW Priority	Yes	4
Hot Water Coil Freeze Protection Built-in	optional	
Two Stage Cooling	Yes	5
2 Stage or single Stage Heating	Yes	6
Premium Hot Water Coil	Yes	
Insulated Cabinet	Yes	
Standard Pump Included	yes	
Can operate STD Pump or EC	Yes	7,8
24 Hour Pump Circulation Timer	Yes	
Multi-Position	Yes	
Constant CFM ECM Blower with Continuous Low Speed Fan	Yes	9,10
Warm Up & Cool Down of Heating Coil on Every Call for Heat	Yes	
Suitable for Low Velocity or Mid Velocity Applications	Yes	
Constant Pressure Technology	Yes	1
Warm Up & Cool Down of Heating Coil on Every Call for Heat	Yes	

1. Choose the required CFM independently for heating & cooling modes .
2. Removes humidity faster in colling modes, resulting in increased comfort.
3. Factory supplied option; field installed up to 4 zones.
4. Unit monitors length of DHW calls and takes action to maximize comfort when flow switch is installed.
5. 2 stage cooling, can operate more efficient A/C units.
6. Can operate in Full modulation, 3 stage or single stage heating mode.
7. Allows for the correct sizing of pump for the designed system.
8. Allows for choice of STD AC pump or ECM pump.
9. Motor automatically ramps up to provide Constant CFM as filters get dirty.
10. Continuous fan can operate at selected heat cfm or 1/2 of selected heat CFM.
11. Automatically adjusts air flow to compensate for opening and closing of the vents. Reduces noise & energy.

