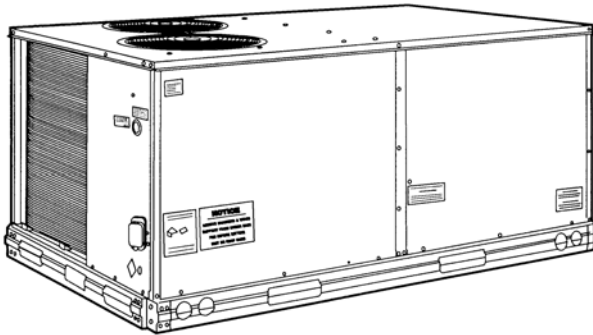


ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

RHV units with X-Vane Fan Technology are single-packaged heat pump units that are pre-wired and pre-charged with R-410A HFC refrigerant. Electric heat is available as a field-installed accessory. The units are fully factory tested and agency certified.

X-Vane™ Fan



Use of the AHRI Certified TM Mark indicates a manufacturer's participation in the program. For verification of certification for individual products, go to www.ahridirectory.org.



STANDARD FEATURES

- R-410A HFC refrigerant
- Two-stage cooling capacity control on all models
- 2023 DOE, ASHRAE 90.1, and IEEC - IEER energy compliant
- IEERs up to 15.0
- COPs up to 3.4
- Exceeds current DOE IEER efficiencies while meeting DOE's new stringent 2023 IEER efficiency requirements
- NEW Direct Drive - X-Vane Fan Technology Indoor fan system uses Vane Axial fan design and electronically commutated motor. Indoor fan motor also delivers two speed control
- Non-corrosive composite condensate pan in accordance with ASHRAE 62 Standard, sloping design; side or center drain
- Field convertible from vertical to horizontal airflow on all models, no special kit required on 090-120 models. Supply duct kit required for 150 size models only.
- Pre-painted exterior panels and primer coated interior panels tested to 500 hours salt spray protection
- TXV refrigerant metering system
- Solid-state control board and easy access terminal board
- Refrigerant filter drier on each refrigerant circuit
- Insulated cabinet

- Cooling operating range up to 125°F (52°C), and down to 40°F (4°C). Low Ambient kits allows cooling operation down to 0°F (-18°C) except on 120 units with standard operation down to 0°F.
- Rated in accordance with AHRI Standards 340/360
- Designed in accordance with UL Standard 1995
- Listed by UL and UL-Canada or ETL and ETL-Canada

MAINTENANCE FEATURES

- Large access panels with easy grip handles
- Two-inch disposable return air filters
- Tool-less filter access door
- New vane axial evaporator-fan system has no fan belts, pullies, blower shaft and blower bearings with slide out design
- Unit control board facilitating simple safety circuit troubleshooting and simplified control box arrangement

INSTALLATION FEATURES

- Thru-the-bottom power entry capability standard
- Single point electric connections
- Full perimeter base rail with built-in rigging adapters and fork truck slots

RELIABILITY FEATURES

- Scroll compressors with internal line break overload protection
- Dependable Time / Temperature defrost board and logic
- 24-volt control circuit protected with resettable circuit breaker
- Permanently lubricated evaporator-fan motor
- Totally enclosed condenser motors with permanently lubricated bearings
- Loss of charge, freeze protection, and high-pressure switches

STANDARD LIMITED PARTS WARRANTY

- 5-year electric heaters
- 5-year compressor
- 1-year parts

FACTORY INSTALLED OPTIONS INCLUDE BUT NOT LIMITED TO:

- 115-volt convenience outlet (powered and unpowered)
- Non-fused disconnect switch
- Through the base connections (field-installed option only)
- Two position/manual damper (field-installed only)
- Corrosion resistant coil options for evaporator and condenser
- Optional indoor fan motors for expanded airflow capability
- Accessory electric heat (field-installed option only)
- Smoke detectors - supply and return air
- Hinged access panels
- Integrated economizer system, low and ultra low leak versions
- Condensate overflow switch

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODEL SERIES	R	H	V	0	9	0	L	0	2	A	0	A	A	A	
Position Number	1	2	3	4	5	6	7	8	9	10	11	12	13	14	
R = Rooftop															
H = Heat Pump with Electric Heat		Type													
V = R-410A with X-Vane™ Fan		Standard Efficiency													
090 = 90,000 BTUH = 7.5 Tons															
102 = 102,000 BTUH = 8.5 Tons															
120 = 120,000 BTUH = 10 Tons															
150 = 150,000 BTUH = 12.5 Tons				Nominal Cooling Capacity											
H = 208/230-3-60															
L = 460-3-60															
S = 575-3-60								Voltage							
0 = No Heat (Field-Installed Only)														Electric Heating Capacity	
2 = Standard/Medium Static Direct Drive ECM with X-Vane Fan															
3 = High Static Direct Drive ECM with X-Vane Fan															
5 = Standard/Medium Static, Vertical Supply and Filter Status Switch															
6 = High Static, Vertical Supply and Filter Status Switch										Motor Option (Indoor Fan)					
A = None															
B = Low Leak Economizer with Barometric Relief, OA Temperature Sensor															
E = Low Leak Economizer with Barometric Relief + CO ₂ Sensor, OA Temperature Sensor															
H = Low Leak Economizer with Barometric Relief and Enthalpy Sensor															
L = Economizer with Barometric Relief + CO ₂ Sensor, Enthalpy Sensor															
U = Ultra Low Leak Economizer with Barometric Relief, OA Temperature Sensor															
W = Ultra Low Leak Economizer with Barometric Relief, Enthalpy Sensor										Outdoor Air Options / Control					
0A = Standard															
4B = Non Fused Disconnect Switch															
AA = Hinged Access Panels															
AT = Un-Powered Convenience Outlet															
BB = Powered Convenience Outlet															
BP = Return Air Smoke Detector															
BR = Supply Air Smoke Detector															
CJ = Condensate Overflow Switch										Factory-Installed Options					
A = Aluminum / Copper Cond and Evap Coil															
B = Precoat Alum/Copper Cond with Alum / Copper Evap															
C = E-Coated Alum/Copper Cond with Alum / Copper Evap															
D = E-Coated Alum / Copper Cond and Evap															
E = Copper/Copper Cond and Alum/Copper Evap															
F = Copper/Copper Cond and Evap										Condenser / Evaporator Coil Configuration					
A = Economizer controls for EconoMi\$er® IV and others (except for factory-installed EconoMi\$er X)															
B = Economizer controls for factory-installed EconoMi\$er X														Economizer Control	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

RHV RTU ONLY ELECTRIC HEATER SELECTION

ELECTRIC HEATERS - Fully assembled for easy slide-in installation. Refer to charts below for wide range of UL-approved kW's per unit. Control two-stage and dual heaters with two-stage heating thermostat. Must use accessory single-point electrical connection package where listed. Use the latest Equipment Selection Program for selecting single point kits and heaters.

MODELS WITH ELECTRIC HEAT (SEE BELOW FOR NON-FUSED DISCONNECT SWITCH)

RHV 090	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXXA00			
						NO C.O. or Unpowered C.O.		w/PWRD C.O.	
						NO P.E.	w/ P.E. (Pwr'd fr/unit)	NO P.E.	w/ P.E. (Pwr'd fr/unit)
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047
			CRHEATER421A00	25.0	23.0	047	047	047	047
			CRHEATER422A00	33.0	30.3	052	052	052	052
			CRHEATER423A00	41.7	38.3	052	052	052	052
HIGH		CRHEATER420A00	15.0	13.8	047	047	047	047	
		CRHEATER421A00	25.0	23.0	047	047	047	052	
		CRHEATER422A00	33.0	30.3	052	052	052	052	
		CRHEATER423A00	41.7	38.3	052	052	052	052	
575-3-60	STD/ MED	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	047	052	
	HIGH	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	047	052	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODELS WITH ELECTRIC HEAT AND FACTORY INSTALLED NON-FUSED DISCONNECT SWITCH

RHV 090	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXXA00			
						NO C.O. or Unpowered C.O.		w/PWRD C.O.	
						NO P.E.	w/ P.E. (Pwrd fr/unit)	NO P.E.	w/ P.E. (Pwrd fr/unit)
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047
			CRHEATER421A00	25.0	23.0	047	047	047	047
			CRHEATER422A00	33.0	30.3	052	052	052	052
			CRHEATER423A00	41.7	38.3	052	052	052	052
HIGH		CRHEATER420A00	15.0	13.8	047	047	047	047	
		CRHEATER421A00	25.0	23.0	047	047	047	052	
		CRHEATER422A00	33.0	30.3	052	052	052	052	
		CRHEATER423A00	41.7	38.3	052	052	052	052	
575-3-60	STD/ MED	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	047	052	
	HIGH	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	047	052	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODELS WITH ELECTRIC HEAT (SEE BELOW FOR NON-FUSED DISCONNECT SWITCH)

RHV 102	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXA00			
						NO C.O. or Unpowered C.O.		w/PWRD C.O.	
						NO P.E.	w/ P.E. (Pwrd fr/unit)	NO P.E.	w/ P.E. (Pwrd fr/unit)
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047
			CRHEATER421A00	25.0	23.0	047	047	047	052
			CRHEATER422A00	33.0	30.3	052	052	052	052
			CRHEATER423A00	41.7	38.3	052	052	052	052
HIGH		CRHEATER420A00	15.0	13.8	047	047	047	047	
		CRHEATER421A00	25.0	23.0	047	047	047	052	
		CRHEATER422A00	33.0	30.3	052	052	052	052	
		CRHEATER423A00	41.7	38.3	052	052	052	052	
575-3-60	STD/ MED	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	052	052	
	HIGH	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	052	052	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODELS WITH ELECTRIC HEAT AND FACTORY INSTALLED NON-FUSED DISCONNECT SWITCH

RHV 102	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXXA00			
						NO C.O. or Unpowered C.O.		w/PWRD C.O.	
						NO P.E.	w/ P.E. (Pwrd fr/unit)	NO P.E.	w/ P.E. (Pwrd fr/unit)
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER414A00	25.0	18.8/23.0	051	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047
			CRHEATER421A00	25.0	23.0	047	047	047	052
			CRHEATER422A00	33.0	30.3	052	052	052	052
			CRHEATER423A00	41.7	38.3	052	052	052	052
HIGH		CRHEATER420A00	15.0	13.8	047	047	047	047	
		CRHEATER421A00	25.0	23.0	047	047	047	052	
		CRHEATER422A00	33.0	30.3	052	052	052	052	
		CRHEATER423A00	41.7	38.3	052	052	052	052	
575-3-60	STD/ MED	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	052	052	
	HIGH	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	047	052	052	052	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODELS WITH ELECTRIC HEAT (SEE BELOW FOR NON-FUSED DISCONNECT SWITCH)

RHV 120	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXA00			
						NO C.O. or Unpowered C.O.		w/PWRD C.O.	
						NO P.E.	w/ P.E. (Pwrd fr/unit)	NO P.E.	w/ P.E. (Pwrd fr/unit)
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	051	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	053	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	054	
		CRHEATER417A00	50.0	37.6/45.9	053	053	053	054	
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	051	051	051	
		CRHEATER412A00	16.0	12.0/14.7	049	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	053	053	053	
		CRHEATER416A00	42.4	31.8/38.9	053	054	054	054	
		CRHEATER417A00	50.0	37.6/45.9	053	054	054	054	
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047
			CRHEATER422A00	33.0	30.3	052	052	052	052
			CRHEATER423A00	41.7	38.3	052	052	052	052
			CRHEATER424A00	50.0	45.9	052	052	052	052
HIGH		CRHEATER420A00	15.0	13.8	047	047	047	047	
		CRHEATER422A00	33.0	30.3	052	052	052	052	
		CRHEATER423A00	41.7	38.3	052	052	052	052	
		CRHEATER424A00	50.0	45.9	052	052	052	052	
		CRHEATER425A00	18.0	16.5	047	047	047	047	
575-3-60	STD/ MED	CRHEATER427A00	36.0	33.1	052	052	052	052	
		CRHEATER428A00	50.0	45.9	052	052	052	052	
		CRHEATER425A00	18.0	16.5	047	047	047	047	
	HIGH	CRHEATER427A00	36.0	33.1	052	052	052	052	
		CRHEATER428A00	50.0	45.9	052	052	052	052	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODELS WITH ELECTRIC HEAT AND FACTORY INSTALLED NON-FUSED DISCONNECT SWITCH

RHV 120	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXXA00			
						NO C.O. or Unpowered C.O.		w/PWRD C.O.	
						NO P.E.	w/ P.E. (Pwrd fr/unit)	NO P.E.	w/ P.E. (Pwrd fr/unit)
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	051	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	053	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	054	
		CRHEATER417A00	50.0	37.6/45.9	053	053	053	054	
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	051	051	051	
		CRHEATER412A00	16.0	12.0/14.7	049	051	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	053	053	053	
		CRHEATER416A00	42.4	31.8/38.9	053	054	054	054	
		CRHEATER417A00	50.0	37.6/45.9	053	054	054	054	
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047
			CRHEATER422A00	33.0	30.3	052	052	052	052
CRHEATER423A00			41.7	38.3	052	052	052	052	
CRHEATER424A00			50.0	45.9	052	052	052	052	
HIGH		CRHEATER420A00	15.0	13.8	047	047	047	047	
		CRHEATER422A00	33.0	30.3	052	052	052	052	
		CRHEATER423A00	41.7	38.3	052	052	052	052	
		CRHEATER424A00	50.0	45.9	052	052	052	052	
575-3-60	STD/ MED	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	052	052	052	052	
		CRHEATER428A00	50.0	45.9	052	052	052	052	
	HIGH	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	052	052	052	052	
		CRHEATER428A00	50.0	45.9	052	052	052	052	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODELS WITH ELECTRIC HEAT (SEE BELOW FOR NON-FUSED DISCONNECT SWITCH)

RHV 150	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXA00				
						NO C.O. or Unpowered C.O.		w/PWRD C.O.		
						NO P.E.	w/ P.E. (Pwrđ fr/unit)	NO P.E.	w/ P.E. (Pwrđ fr/unit)	
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049		
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049		
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051		
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053		
		CRHEATER417A00	50.0	37.6/45.9	053	053	053	053		
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	049	051	051		
		CRHEATER412A00	16.0	12.0/14.7	049	049	051	051		
		CRHEATER415A00	32.0	24.0/29.4	051	051	053	053		
		CRHEATER416A00	42.4	31.8/38.9	053	053	054	054		
		CRHEATER417A00	50.0	37.6/45.9	053	053	054	054		
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047	
			CRHEATER422A00	33.0	30.3	052	052	052	052	
			CRHEATER423A00	41.7	38.3	052	052	052	052	
			CRHEATER424A00	50.0	45.9	052	052	052	052	
		HIGH	CRHEATER420A00	15.0	13.8	047	047	047	047	
CRHEATER422A00			33.0	30.3	052	052	052	052		
CRHEATER423A00			41.7	38.3	052	052	052	052		
CRHEATER424A00			50.0	45.9	052	052	052	052		
575-3-60			STD/ MED	CRHEATER425A00	18.0	16.5	047	047	047	047
				CRHEATER427A00	36.0	33.1	052	052	052	052
	CRHEATER428A00	50.0		45.9	052	052	052	052		
	HIGH	CRHEATER425A00	18.0	16.5	047	047	047	047		
		CRHEATER427A00	36.0	33.1	052	052	052	052		
		CRHEATER428A00	50.0	45.9	052	052	052	052		

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

MODELS WITH ELECTRIC HEAT AND FACTORY INSTALLED NON-FUSED DISCONNECT SWITCH

RHV 150	NOM. V-Ph-Hz	IFM TYPE	Electric Heater Part No.	Nominal (kW)	Application (kW)	Single Point Kit Part Number CRSINGLEXXXA00			
						NO C.O. or Unpowered C.O.		w/PWRD C.O.	
						NO P.E.	w/ P.E. (Pwrd fr/unit)	NO P.E.	w/ P.E. (Pwrd fr/unit)
208/230-3-60	STD/ MED	CRHEATER411A00	10.4	7.8/9.6	049	049	049	049	
		CRHEATER412A00	16.0	12.0/14.7	049	049	049	049	
		CRHEATER415A00	32.0	24.0/29.4	051	051	051	051	
		CRHEATER416A00	42.4	31.8/38.9	053	053	053	053	
		CRHEATER417A00	50.0	37.6/45.9	053	053	053	053	
	HIGH	CRHEATER411A00	10.4	7.8/9.6	049	049	051	051	
		CRHEATER412A00	16.0	12.0/14.7	049	049	051	051	
		CRHEATER415A00	32.0	24.0/29.4	051	051	053	053	
		CRHEATER416A00	42.4	31.8/38.9	053	053	054	054	
		CRHEATER417A00	50.0	37.6/45.9	053	053	054	054	
	460-3-60	STD/ MED	CRHEATER420A00	15.0	13.8	047	047	047	047
			CRHEATER422A00	33.0	30.3	052	052	052	052
			CRHEATER423A00	41.7	38.3	052	052	052	052
			CRHEATER424A00	50.0	45.9	052	052	052	052
HIGH		CRHEATER420A00	15.0	13.8	047	047	047	047	
		CRHEATER422A00	33.0	30.3	052	052	052	052	
		CRHEATER423A00	41.7	38.3	052	052	052	052	
		CRHEATER424A00	50.0	45.9	052	052	052	052	
575-3-60	STD/ MED	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	052	052	052	052	
		CRHEATER428A00	50.0	45.9	052	052	052	052	
	HIGH	CRHEATER425A00	18.0	16.5	047	047	047	047	
		CRHEATER427A00	36.0	33.1	052	052	052	052	
		CRHEATER428A00	50.0	45.9	052	052	052	052	

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

FIELD-INSTALLED ACCESSORIES

ECONOMIZER IV — (DESIGNED FOR 1-SPEED INDOOR FAN MOTOR CONTROL OPERATION ONLY) — LOW LEAK CONTROLLER INCLUDED

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE	UNIT AIRFLOW
CRECOMZR021A03	Low Leak Vertical EconoMi\$er IV with solid-state controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in non-DDC applications.	090-120 Elect. Mech Control	Vertical Air Models
CRECOMZR062A00	Low Leak Vertical EconoMi\$er IV with solid-state controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in non-DDC applications.	150 Elect. Mech Control	Vertical Air Models
CRECOMZR025A02	Low Leak Horizontal EconoMi\$er IV with solid-state controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in non-DDC applications.	090-120 Elect. Mech Control	Horizontal Air Models
CRECOMZR064A00	Low Leak Horizontal EconoMi\$er IV with solid-state controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in non-DDC applications.	150 Elect. Mech Control	Horizontal Air Models

NOTES:

1. EconoMi\$er IV cannot be installed with an EconoMi\$er X, Manual Damper or Motorized Damper.
2. When installed on a unit with hinged panels, hinged panel access kit is also required.
3. RHV 090-150 models use two speed indoor fan logic, the above options are for single stage motor control. See Application Tip for further guidance when using this.

ECONOMIZER IV SENSORS ECONOMIZER SENSOR USAGE CHART — FIELD ACCESSORY ECONOMIZER IV ONLY

DESIRED CONTROL METHOD	ECONOMIZER IV ONLY IF YOU HAVE: FIELD INSTALLED DRY BULB ACCESSORY ECONOMIZER IV
Single Dry Bulb Temperature Control	None: Outside Air-dry bulb sensor is factory-installed
Differential Dry Bulb Temperature Control	CRTEMPSN002A00
Single Enthalpy Control	(1) --HH--57AC-078 (Fast P/N ABX078ENT)
Differential Enthalpy Control	(1) --HH--57AC-078 (Fast P/N ABX078ENT) and (1) CRENTDIF004A00
To Add CO₂ DCV Control with above: Duct Mounted	CRCBDIOX005A00

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

ECONOMIZER IV — SENSORS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRTEMPN002A00	Outdoor or return dry bulb temperature sensor used with electro-mechanical control.	EconoMiSer IV
CRCBDIOX005A00	CO ₂ sensor for use in return airstream. Also includes aspirator box required for duct mounting.	EconoMiSer IV and EconoMiSer X
--HH--57AC-078 (Fast P/N ABX078ENT)	Accusensor II enthalpy control upgrade.	EconoMiSer IV
CRENTDIF004A00	Return air enthalpy sensor used with EconoMiSer IV and --HH--57AC-078 (Fast P/N ABX078ENT) for differential enthalpy control.	EconoMiSer IV

ECONOMIZER X (FOR 2-SPEED X-Vane INDOOR FAN MOTOR) - LOW LEAK, CONTROLLER INCLUDED

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE	UNIT AIR FLOW
CRECOMZR078A00	Low Leak Vertical EconoMiSer X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in electromechanical controls only. Controller meets California Title 24 Section 120.2 Fault Detection and Diagnostic (FDD) requirements.	090-120 Elect. Mech Control	Vertical Air Models
CRECOMZR080A00	Low Leak Vertical EconoMiSer X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in electromechanical controls only. Controller meets California Title 24 Section 120.2 Fault Detection and Diagnostic (FDD) requirements.	150 Elect. Mech Control	Vertical Air Models
CRECOMZR079A00	Low Leak Horizontal EconoMiSer X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in electromechanical controls only. Controller meets California Title 24 Section 120.2 Fault Detection and Diagnostic (FDD) requirements.	090-120 Elect. Mech Control	Horizontal Air Models
CRECOMZR081A00	Low Leak Horizontal EconoMiSer X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air sensors, and CO ₂ sensor compatible, for use in electro-mechanical controls only. Controller meets California Title 24 Section 120.2 Fault Detection and Diagnostic (FDD) requirements.	150 Elect. Mech Control	Horizontal Air Models

NOTES:

1. EconoMiSer X cannot be installed with an EconoMiSer IV, Manual Damper or Motorized Damper.
2. When installed on a unit with hinged panels, hinged panel access kit is also required.

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

OTHER THAN ICP FIELD-SUPPLIED ECONOMIZERS WITH W7220 CONTROLLER - REQUIRED

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE	UNIT AIR FLOW
CRECOHRN001A00	Due to the X-Vane Axial Fan Unit Control Board, any other field furnished economizer that uses the W7220 controller will require this wiring harness to properly adapt and function. Item is required for unit and economizer match up. ICP furnished economizers do not require this part.	090-150	All

ECONOMIZER X - (FOR 2-SPEED X-Vane INDOOR FAN MOTOR) - ULTRA LOW LEAK, CONTROLLER INCLUDED

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE	UNIT AIR FLOW
CRECOMZR069A01	Ultra Low Leak - Vertical EconoMi\$er X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in electromechanical controls only. Includes return, outside air, and relief air damper leakage that meets Title 24 section 140.4 and ASHRAE 90.1 requirements. Controller meets California Title 24 Fault Detection and Diagnostic (FDD) requirements. Also meets AMCA Class 1A economizer damper test standards and labeling.	090-120 Elect. Mech Control	Vertical Air Models
CRECOMZR071A01	Ultra Low Leak - Vertical EconoMi\$er X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in electromechanical controls only. Includes return, outside air, and relief air damper leakage that meets Title 24 section 140.4 and ASHRAE 90.1 requirements. Controller meets California Title 24 Fault Detection and Diagnostic (FDD) requirements. Also meets AMCA Class 1A economizer damper test standards and labeling.	150 Elect. Mech Control	Vertical Air Models
CRECOMZR085A00	Ultra Low Leak - Horizontal EconoMi\$er X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO ₂ sensor compatible, for use in electromechanical controls only. Includes return, outside air, and relief air damper leakage that meets Title 24 section 140.4 and ASHRAE 90.1 requirements. Controller meets California Title 24 Fault Detection and Diagnostic (FDD) requirements. Also meets AMCA Class 1A economizer damper test standards and labeling. Accessory also includes a separate barometric relief damper and hood assemble to be installed on the unit's side intake panel.	090-120 Elect. Mech. Control	Horizontal Air Models

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE	UNIT AIR FLOW
CRECOMZR086A00	Ultra Low Leak - Horizontal EconoMi\$er X with solid-state W7220 controller, gear-driven, modulating damper, spring return actuator, up to 100% barometric relief, supply and outdoor air temperature sensors, and CO2 sensor compatible, for use in electromechanical controls only. Includes return, outside air, and relief air damper leakage that meets Title 24 section 140.4 and ASHRAE 90.1 requirements. Controller meets California Title 24 Fault Detection and Diagnostic (FDD) requirements. Also meets AMCA Class 1A economizer damper test standards and labeling. Accessory also includes a separate barometric relief damper and hood assemble to be installed on the unit's side intake panel.	150 Elect. Mech. Control	Horizontal Air Models

NOTES:

1. EconoMi\$er X cannot be installed with an EconoMi\$er IV, Manual Damper or Motorized Damper.
2. When installed on a unit with hinged panels, hinged panel access kit is also required.

OTHER THAN ICP FIELD-SUPPLIED ECONOMIZERS WITH W7220 CONTROLLER - REQUIRED

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE	UNIT AIR FLOW
CRECOHRN001A00	Due to the X-Vane Axial Fan Unit Control Board, any other field furnished economizer that uses the W7220 controller will require this wiring harness to properly adapt and function. Item is required for unit and economizer match up. ICP furnished economizers do not require this part.	090-150 Elect. Mech Control with W7220 controller	All

ECONOMI\$ER X SENSORS ECONOMIZER SENSOR USAGE CHART – FIELD / FACTORY ECONOMI\$ER X ONLY

DESIRED CONTROL METHOD	ECONOMI\$ER X IF YOU HAVE:		
	FIELD INSTALLED DRY BULB ACCESSORY ECONOMI\$ER X	FACTORY INSTALLED DRY BULB SENSOR ECONOMI\$ER X	FACTORY INSTALLED ENTHALPY SENSOR ECONOMI\$ER X
Single Dry Bulb Temperature Control	None: Outside Air-dry bulb sensor is factory-installed	None: Outside Air-dry bulb sensor is factory-installed	None: Outside Air-dry bulb sensor is factory-installed
Differential Dry Bulb Temperature Control	(1) --HH--57AC-081 (Fast P/N 1185124)	(1) --HH--57AC-081 (Fast P/N 1185124)	N/A
Single Enthalpy Control	(1) --HH--57AC-081 (Fast P/N 1185124)	(1) --HH--57AC-081 (Fast P/N 1185124)	None: Outside Air Enthalpy sensor is factory-installed
Differential Enthalpy Control	(2) --HH--57AC-081 (Fast P/N 1185124)	(1) --HH--57AC-081 (Fast P/N 1185124)	(1) --HH--57AC-081 (EconoMi\$er X) (Fast P/N 1185124)
To Add CO₂ DCV Control with above Duct Mount	(1) CRCBDIOX005A00	(1) CRCBDIOX005A00	(1) CRCBDIOX005A00

NOTE: OAT (Dry Bulb Sensor) and SAT sensors included with EconoMi\$er X.

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

ECONOMIZER X SENSORS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRCBDIOX005A00	CO ₂ sensor for use in return airstream. Also includes aspirator box required for duct mounting.	EconoMi\$er IV and EconoMi\$er X
--HH--57AC-081 (Fast P/N 1185124)	Enthalpy control for W7220 controller only. (One required for single enthalpy, two required for different enthalpy.)	EconoMi\$er X

ACCESSORY KITS FOR VERTICAL RETURN APPLICATIONS ONLY - SIDE HINGED FILTER ACCESS DOOR (090 - 150) VERTICAL RETURN AIR FLOW ONLY

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRHPLSIDE03A00	Accessory kit provides hinged filter access through the unit return air side duct panel. This side access filter door may be required when the standard factory filter access panel is not easily accessible due to job site limitations or an increase in height typically seen when using an adapter curb. Kit come with hinged access door and frame and self-tapping screws with washers.	090-120
CRHPLSIDE04A00	Accessory kit provides hinged filter access through the unit return air side duct panel. This side access filter door may be required when the standard factory filter access panel is not easily accessible due to job site limitations or an increase in height typically seen when using an adapter curb. Kit come with hinged access door and frame and self-tapping screws with washers.	150

ACCESSORY KITS FOR UNITS WITH HINGED ACCESS (PANELS 090 - 150) VERTICAL & SOME HORIZONTAL

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRPECONV004A00	Accessory angle kit is required when field installing a vertical economizer, a vertical power exhaust, all 2 position dampers and all manual hoods on units that has hinged access doors. Includes angle and seal strip.	090-120
CRPECONV007B00	Accessory angle kit is required when field installing a vertical economizer, a vertical power exhaust, all 2 position dampers and all manual hoods on units that has hinged access doors. Includes angle and seal strip.	150

HORIZONTAL

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRHNGPNL002A00	Hinged door kit replaces the standard filter access door shipped with the horizontal economizer accessory, with a hinged filter access door. Includes door panel, angle and seal strip.	090-120
CRHNGPNL003A00	Hinged door kit replaces the standard filter access door shipped with the horizontal economizer accessory, with a hinged filter access door. Includes door panel, angle and seal strip.	150

NOTE: This Horizontal Hinged Door Kit is not compatible with: Horizontal EconoMi\$er Accessory Kits: CRECOMZR085A00, CRECOMZR086A00, CRECOMZR087A00, and CRECOMZR088A00

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

POWER EXHAUST ACCESSORIES VERTICAL

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRPWREXH022A01	Power Exhaust System	090-120 208/230-3-60 Vertical Power Exhaust requires a vertical economizer.
CRPWREXH023A01	Power Exhaust System	090-120 460-3-60 Vertical Power Exhaust requires a vertical economizer.
CRPWREXH080A00	Power Exhaust System	150 208/230-3-60 Vertical Power Exhaust requires a vertical economizer.
CRPWREXH081A00	Power Exhaust System	150 460-3-60 Vertical Power Exhaust requires a vertical economizer.

NOTE: Vertical Power Exhaust requires a vertical economizer.

HORIZONTAL

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRPWREXH028A01	Horizontal Power Exhaust (208/230-3-60) - Mounted on Return Ductwork	090-120
CRPWREXH029A01	Horizontal Power Exhaust - (460-3-60) - Mounted on Return Ductwork	090-120
CRPWREXH082A00	Horizontal Power Exhaust (208/230-3-60) - Mounted on Return Ductwork	150
CRPWREXH083A00	Horizontal Power Exhaust (460-3-60) - Mounted on Return Ductwork	150

575-V TRANSFORMERS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
--HT--01AH-859 (Fast P/N 1171494)	Transformer for conversion from 575 volt to 208/230 volt power exhaust applications.	Convert from 575 volt to 208/230 volt Power Exhaust applications.

NOTES:

1. Vertical power exhaust package includes exhaust hood, screens and propeller fan system.
2. 24" Roof curbs are NOT required with vertical power exhaust.
3. Horizontal power exhaust should be duct-mounted in the return ductwork and is supplied with a single fan and wiring harness.
4. Both vertical and horizontal power exhaust packages can be used with EconoMi\$er IV.
5. Order --HT--01AH-859 (Fast P/N 1171494) for 575-v applications.

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

OUTDOOR AIR DAMPER ACCESSORIES MANUAL OUTDOOR AIR DAMPERS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRMANDPR002A03	25% Open Manual Outdoor Air Damper Package	090-120
CRMANDPR002A02	50% Open Manual Outdoor Air Damper Package	090-120
CRMANDPR011A00	50% Open Manual Outdoor Air Damper Package	150

NOTES:

1. Manual Dampers cannot be installed with an EconoMi\$er IV, EconoMi\$er X or Motorized 2-position damper.
2. Application consideration needs to be given to the use of manual outdoor air damper on these models due to the varying fan speed of the X-Vane Vane Axial Fan System and fixed outdoor air capability of these devices.
3. Manual and Motorized 2-position dampers are not compatible with a power exhaust module.
4. Manual dampers include hood assembly, bird screen, adjustable damper blade (to allow up to the rated outdoor air %), and bottom panel.

MOTORIZED OUTDOOR AIR DAMPERS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRTWOPOS011A00	Motorized 2-position outdoor air damper (25-100% Outdoor Air)	090-120
CRTWOPOS014A00	Motorized 2-position outdoor air damper (25-100% Outdoor Air)	150

NOTES:

1. Motorized dampers cannot be installed with an EconoMi\$er IV, EconoMi\$er X or manual damper.
2. Motorized dampers include bottom panel with opening (100% two-position damper includes 30% barometric relief capability), and adjustable damper (to allow up to the rated outdoor air %).
3. Motorized dampers will close on loss of power to the rooftop unit.
4. Manual and 2-position motorized dampers are not compatible with a power exhaust module.
5. Application consideration needs to be given to the use of two-position damper on these models due to the varying fan speed of the X-Vane Vane Axial Fan System and fixed outdoor air capability of these devices.

STANDARD FULL PERIMETER ROOF CURBS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRRFCURB003A01	14-inch (356 mm) Tall Roof Curb. Complies with NRCA standards. Ductwork attaches to the roof curb. Includes thru-the-bottom capability.	090-120
CRRFCURB004A01	24-inch (607 mm) Tall Roof Curb. Complies with NRCA standards. Ductwork attaches to the roof curb. Includes thru-the-bottom capability.	090-120
CRRFCURB074A00	14-inch Roof Curb. Complies with NRCA standards. Ductwork attaches to the roof curb. Includes thru-the-bottom capability.	150
CRRFCURB075A00	24-inch (607 mm) Tall Roof Curb. Complies with NRCA standards. Ductwork attaches to the roof curb. Includes thru-the-bottom capability.	150

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

THRU-THE-BOTTOM CONNECTION KITS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRBTMPWR002A01	Thru-the-bottom electrical connections and thru-the-curb (not thru the bottom) gas connections. Includes a 1-1/4-inch (32 mm) diameter liquid tight conduit fitting for high voltage power wires and (2) 1/2-inch (13 mm) diameter liquid tight conduit fittings for thermostat wires and convenience outlet wires. Includes a 3/4-inch (19 mm) inside pipe coupling and gas plate assembly for thru-the-curb connections. Provides for watertight seals.	090-120
CRBTMPWR004A01	Thru-the bottom power, control and gas connections. Includes a 1-1/4-inch diameter liquid tight conduit fitting for high voltage power wires, (2) 1/2-inch diameter liquid tight conduits for thermostat wires and convenience outlet wires and 3/4-inch gas adapter fitting for gas piping. Provides for watertight seal.	090-120
CRBTMPWR005A00	Thru-the bottom power, control and gas connections. Includes a 1-1/4-inch diameter liquid tight conduit fitting for high voltage power wires, (2) 1/2-inch diameter liquid tight conduits for thermostat wires and convenience outlet wires and 3/4-inch gas adapter fitting for gas piping, 4 cover plates, and gaskets for watertight seal.	150
CRBTMPWR006A00	Thru-the bottom power, control and gas connections. Includes a 1-1/2-inch diameter liquid tight conduit fitting for high voltage power wires, (2) 1/2-inch diameter liquid tight conduits for thermostat wires and convenience outlet wires and 3/4-inch gas adapter fitting for gas piping, 4 cover plates, and gaskets for watertight seal.	150
CRBTMPWR007A00	Thru-the bottom power, control and gas connections. Includes a 2-inch diameter liquid tight conduit fitting for high voltage power wires, (2) 1/2-inch diameter liquid tight conduits for thermostat wires and convenience outlet wires and 3/4-inch gas adapter fitting for gas piping, 4 cover plates, and gaskets for watertight seal.	150

NOTE: Access to the bottom of the RTU is required to install a thru-the-bottom connection kit. Recommend installing kit prior to installing RTU on roof curb.

LOUVERED HAIL GUARDS — CONDENSER COIL

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRLVHLGD004A00	Louvered Condenser Coil Hail Guard — Includes louvered panel(s) to protect condenser coil from damage and vandalism.	090-120
CRLVHLGD024A00	Louvered Condenser Coil Hail Guard — Includes louvered panel(s) to protect condenser coil from damage and vandalism.	150

MERV-8 FILTER KITS

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
20X20X2-M8-R-P4	Air Filter kit including QTY:4 20x20x2 MERV-8 replacement air filters	090-120
18X24X2-M8-R-P6	Air Filter kit including QTY:6 18x24x2 MERV-8 replacement air filters	150

NOTES:

1. Fast Parts List Price - Subject to change on a quarterly basis and should be verified through Fast Parts prior to quoting. Filter kits must be ordered through Fast Parts systems.
2. The standard filters that ship in a unit are construction type throw away filters which are not MERV rated. When purchasing upgraded filters for field use, please account for the additional static as shown in the Equipment Selection Program.
3. All filter kits to be purchased through Fast Parts and are subject to Fast Parts pricing.

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

4" FILTER RACK ACCESSORY

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRFLTTRK005A00	Air Filter rack designed to hold 4" MERV 8 or MERV 13 filters sized for Qty:4 16x20x4. Filters not included in kit.	090-120
CRFLTTRK006A00	Air Filter rack designed to hold 4" MERV 8 or MERV 13 filters sized for Qty:4 16x20x4 & Qty:2 20x20x4. Filters not included in kit.	150

UV-C ACCESSORY KIT

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRUVCKIT003A00	Field-installed high-output, low temperature ultraviolet lamps pointed directly at cooling coil and condensate pan.	090-120
CRUVCKIT006A00	Field-installed high-output, low temperature ultraviolet lamps pointed directly at cooling coil and condensate pan.	150

SPECIAL - 150 SIZES SPECIFIC ACCESSORIES

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRDISBKT001A00	Disconnect Switch Bracket - Provides a pre-engineered and sized mounting bracket for applications requiring a unit mounted fused and non-fused disconnect of greater than 100 amps. Bracket assures that no damage will occur to coils when mounting with screws and other fasteners.	150 Only
CRDUCTCV002A00	Supply Duct Cover - This supply duct cover is required when field converting the factory standard vertical duct supply to horizontal duct supply configuration. One required per unit.	150 Only

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

CONTROLS ACCESSORIES

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRPHASE3001A02	Phase Monitor Control — Provides phase loss/phase reversal protection.	208/230-3-60 460-3-60
CRPHASE3002A00	Phase Monitor Control — Provides phase loss/phase reversal protection.	575-3-60
CRTIMEGD001A00	Time Guard II — Automatically prevents the compressor from restarting for at least 4 minutes and 45 seconds after shutdown of the compressor. Not required when a corporate programmable thermostat is applied or with a SystemVu, or RTU Open control. (One required per compressor.)	Std. Controls
CRSDTEST001A00	Smoke detector remote test/reset/alarm indicator kit.	ALL
CRSDHNSB001A00	Horn/Strobe annunciator with clear colored lens, 24V AC/DC works with listed factory or field-installed smoke detectors. NOTE: A field-supplied 24V transformer is also required for each application. P201-4701 is recommended and can be purchased through Fast Parts.	ALL
CRWINSTR001A00	Winter Start Package - Contains time delay relay for timed bypass of low-pressure switch on startup. (One required per refrigerant circuit.) NOTE: If mechanical cooling is below 40 degrees ambient it is necessary, consider additional low-ambient control measures (for example, economizer or low ambient controls).	ALL
CRSTATUS001A00	Fan/Filter Status Switch - Indicator light not included.	ALL
CRCONVOUT01A00	20 Amp non (unit) powered convenience outlet kit is to provide a flexible installation method that will allow code compliance for height requirements of the GFCI outlet from finished roof surface on the range of rooftop and split system products as well as the capability to relocate the outlet into a more convenient location if necessary.	ALL
P201-4701	Transformer 75VA120/240/460-24	ALL
CRCNDOVR003A00	Condensate Overflow Switch — Includes electronic controller and sensor. Compressor(s) turn off if the drain trap becomes plugged. It can be used in down flow or side discharge units.	ALL
CRSMKSEN003A00	Smoke Detector Control Module — Controller that can control either return and/or supply smoke detectors. One required per unit.	ALL
CRSMKKIT003A00	Smoke Detector — Sensor with sampling tube, and exhaust tube. Can be used in return or supply air. One required for use with return or supply, two required if both return air and supply air detection is required. Brackets included for both vertical and horizontal configurations.	ALL

NOTE: If mechanical cooling below 40°F ambient is necessary, consider additional low-ambient control measures (for example, economizer or Low Ambient Controls).

WINTER START KIT

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRWINSTR001A00	Winter Start Package - Contains time delay relay for timed bypass of low pressure switch on startup. (One required per refrigerant circuit.)	ALL

NOTE: This control allows mechanical cooling operation down to 25°F (−4°C). If mechanical cooling below 25°F (−4°C) is necessary, consider low ambient control measures such as Low Ambient Kit or economizer.

ACCESSORY USAGE GUIDE FOR RHV 090-150 7.5, 8.5, 10, 12.5 TONS

LOW AMBIENT ACCESSORY USAGE AND PARTS

UNITS	VOLTAGE	MOTOR	OTHER CONTROL NEEDED	CAPACITOR	TRANSFORMER KIT	LOW AMBIENT CONTROLLER
090, 102 and 150	208/230-3-60	(1) HC40GE233	(1) CRWINSTR001A00	Keep Factory Installed	N/A	(1) CRLAMBKT002A00
	460-3-60	(2) HC40GE463	(1) CRWINSTR001A00	Replace with (1) HC93CA013	N/A	(1) CRLAMBKT002A00
	575-3-60	(2) HC40GE463	(1) CRWINSTR001A00	Replace with (1) HC93CA013	(1) CRTRXKIT003A00	(1) CRLAMBKT002A00

NOTE: The Capacitor Straps in the unit can be reused. If needed part numbers are as follows: HC93CA013 uses 50DK507522.

LEGEND

N/A — Not Applicable eminent

() — Quantity Required

LOW AMBIENT CONTROLS (SIZE 090, 102, 150)

ORDERING NUMBER	DESCRIPTION	APPLICATION USAGE
CRLAMBKT002A00	Low Ambient Solid-State Variable Speed Motor Controller enables cooling down to 0° F by varying the speed on the condenser fan.	Refer to Low Ambient Usage Table Above
HC40GE233	Low Ambient Compatible Condenser Fan Motor	Refer to Low Ambient Usage Table Above
HC40GE463	Low Ambient Compatible Condenser Fan Motor	Refer to Low Ambient Usage Table Above
HC93CA013	Dual MFD 10 + 10	Refer to Low Ambient Usage Table Above
CRTRXKIT003A00	Transformer Kit: Used in conjunction with the above low ambient controls. It converts 575-v to a 460-v condenser motor.	Refer to Low Ambient Usage Table Above

NOTES:

1. Fast Parts List Price - Subject to change on a quarterly basis and should be verified with Fast Parts prior to quoting.
2. One CRWINSTR001A00 required per refrigerant circuit.
3. 120 Size models operate down to 0°F (-18°C) standard. No Low Ambient Kit is available, just one CRWINSTR001A00 Winter Start Kit.

