

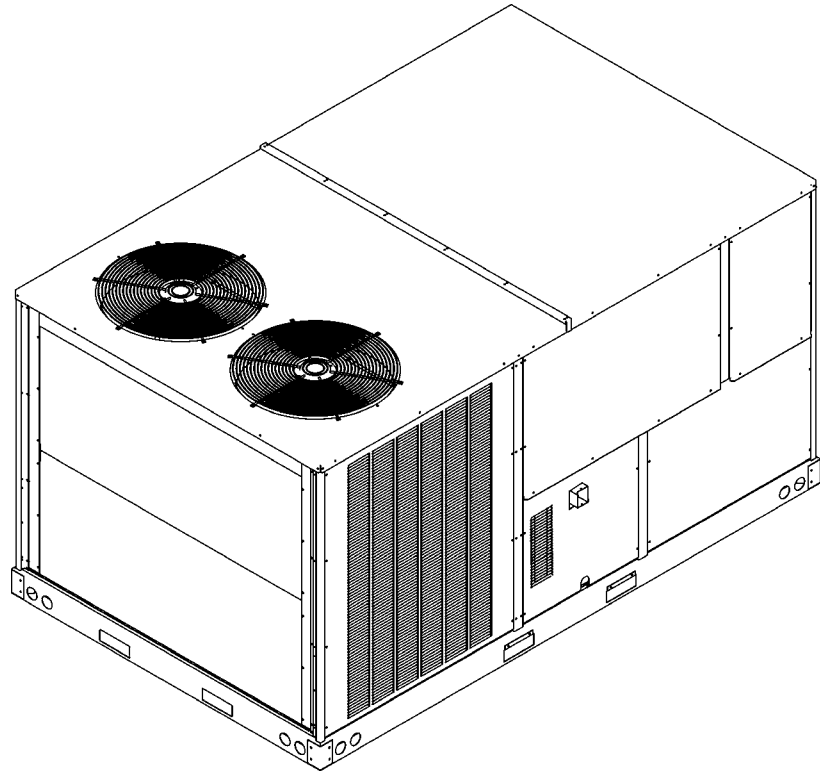
REPAIR PARTS

Commercial 7.5-12.5 Ton Package Heat Pumps

CPH090XXX3BAXCAC

CPH120XXX3BXXDAC

CPH150XXX3BXXDAC



This manual is to be used by qualified technicians only.

© 2013 Goodman Manufacturing Company, L.P. ♦ 5151 San Felipe, Suite 500 ♦ Houston, TX 77056

Important Information

Index

Functional Parts List	3
Illustration and Parts	4 - 15

Views shown are for parts illustrations only, not servicing procedures.

Text Codes:

AR - As Required

NA - Not Available

NS - Not Shown

00000000 - See Note

QTY - Quantity Example (QTY 3) (If Quantity not shown, Quantity = 1)

M - Model Example (M1) (If M Code not shown, then part is used on all Models)

Expanded Model Nomenclature:

Example M1 - Model#1 M2 - Model#2 M3 - Model#3

Goodman Manufacturing Company, L.P. is not responsible for personal injury or property damage resulting from improper service. Review all service information before beginning repairs.

Warranty service must be performed by an authorized technician, using authorized factory parts. If service is required after the warranty expires, Goodman Manufacturing Company, L.P. also recommends contacting an authorized technician and using authorized factory parts.

Goodman Manufacturing Company, L.P. reserves the right to discontinue, or change at any time, specifications or designs without notice or without incurring obligations.

For assistance within the U.S.A. contact:
Consumer Affairs Department
Goodman Manufacturing Company, L.P.
7401 Security Way
Houston, Texas 77040
877-254-4729-Telephone
713-863-2382-Facsimile

For assistance outside the U.S.A. contact:
International Division
Goodman Manufacturing Company, L.P.
7401 Security Way
Houston, Texas 77040
713-861-2500-Telephone
713-863-2382-Facsimile

Functional Parts

Part

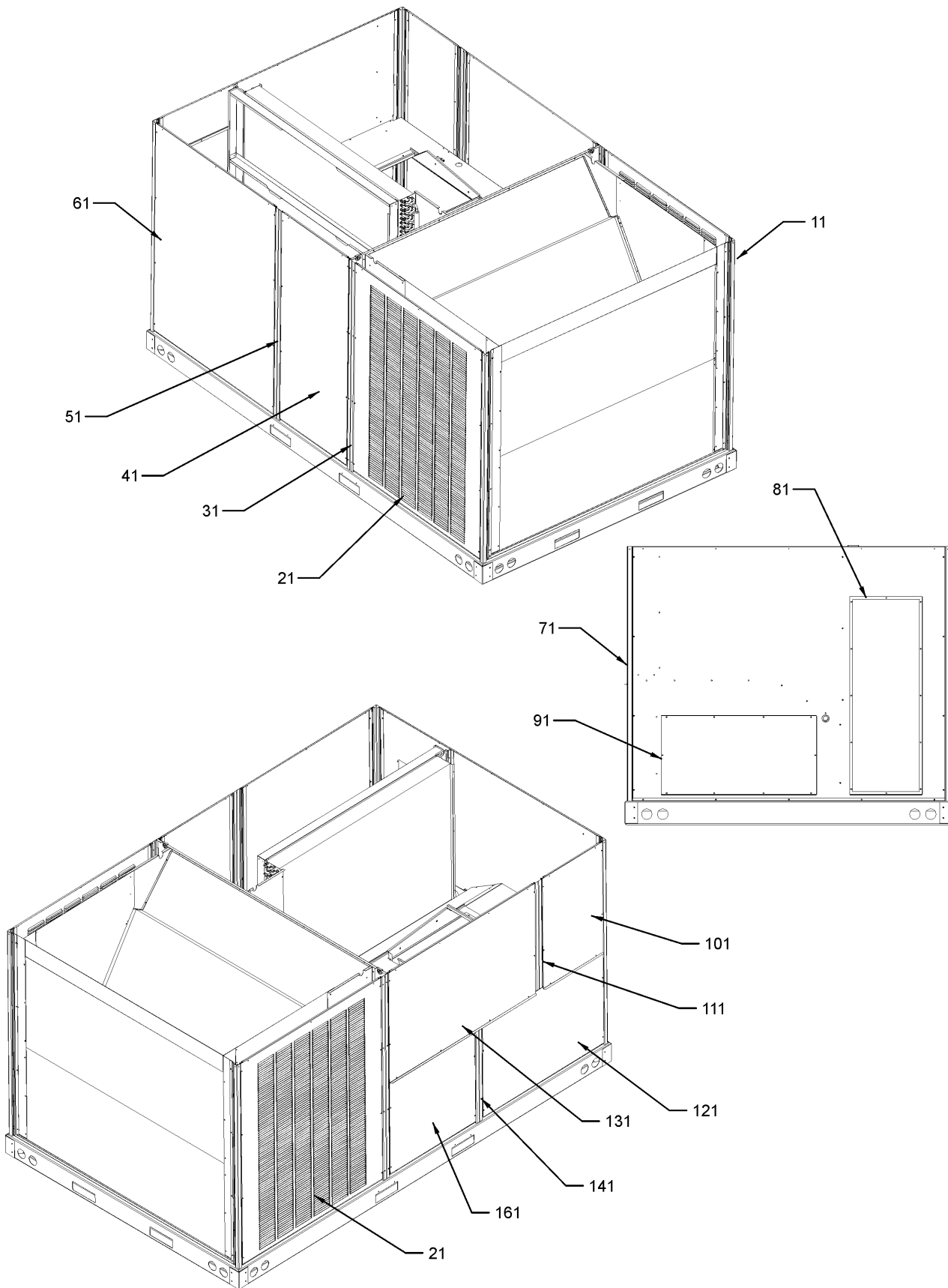
No: Description:

0130M00025	24V RELAY
B3240006	BELT DRIVE MOTOR 2 HP (M1, M2)
B3240004	BELT DRIVE MOTOR 2 HP (M3)
03-77429	BLOWER WHEEL (M1)
03-78497	BLOWER WHEEL (M2, M3)
CAP050000370VA	CAPACITOR 5/370V (QTY 2)
ZP67KCETF5130	COMP, 67500,200/230/60/3 (M3)
ZP51K5ETF5130	COMP,51000,208/230/60/3 (M2)
ZP39K5ETF5130	COMPRESSOR 39000, 200/230/60/3 (M1)
0131M00008P	COND MOTOR 1/3 HP, 1 SP, 6 PL (M2, M3)
0131M00007P	COND MOTOR 1/4 HP, 1 SP, 6 PL (M1)
CONT3P025024V	CONTACTOR 25 AMP, 3P, 24V (M1, M2)
CONT3P030024V	CONTACTOR 30 AMP, 3P, 24V (M3)
CONT2P040024V	CONTACTOR 40 AMP, 2P, 24V
0130M00030	CUT-OUT SWITCH, HIGH PRESSURE (M1, M2)
0130M00031	CUT-OUT SWITCH, HIGH PRESSURE (M1, M2)
0130M00074	CUT-OUT SWITCH, HIGH PRESSURE, C1 (M3)
0130L00003	CUT-OUT SWITCH, LOW PRESSURE (M1, M2)
0130L00002	CUT-OUT SWITCH, LOW PRESSURE (M1, M2)
0130M00075	CUT-OUT SWITCH, LOW PRESSURE, C1 (M3)
PCBDM130	DEFROST CONTROL BOARD
PCBFM131	ELECTRONIC BLOWER TIME DELAY RELAY
0150G00001	FAN BLADE (M1)
10625733	FAN BLADE 22" ALUM CCW (M2, M3)
0164L00001	NOTCHED FAN BELT AX49 (M3)
0164L00000	NOTCHED FAN BELT AX51 (M1, M2)
16330-3	POWER BLOCK
10135604	RELAY
0151M00020	REVERSING VALVE (M3)
0151M00021	REVERSING VALVE (M1, M2)
B1225022	SOLENOID COIL
B1141672	TRANSFORMER 480V, 75VA, RESETTABLE

Expanded Model Nomenclature

M1 - CPH090XXX3BAXCAC
M2 - CPH120XXX3BXXDAC
M3 - CPH150XXX3BXXDAC

Cabinet Assy



Cabinet Assy

Ref. Part No: No:	Description:	Ref. Part No: No:	Description:
-------------------	--------------	-------------------	--------------

Image 1:

11	0121L00065RFDG	CORNER POST (M1, M2)
11	0121L00979RFDG	CORNER POST (M3)
21	0152L00001	GRILLE-CONDENSER (M3)
21	0121L00511DG	LOUVERED SIDE PANEL (M1, M2)
31	0121L00738RFDG	PNT, ROLL FORM SIDE POST (M1, M2)
31	0121L00980RFDG	POST-SIDE, RF PAINTED (M3)
41	0270L00272	INSUL FILTER DOOR ASSY (M1, M2)
41	0270L00273	INSUL FILTER DOOR ASSY (M3)
51	0121L00739RFDG	PNT, RFORM, FILTER DOOR POST (M1, M2)
51	0121L00757RFDG	POST-FILTER, RF PAINTED (M3)
61	0270L00167	INSULATED ASSY, ECONOMIZER DOOR (M3)
61	0270L00175	INSULATED ASSY, ECONOMIZER DOOR (M1, M2)
71	0270L00164	INSULATED ASSY, DUCT PANEL (M3)
71	0270L00180	INSULATED ASSY, DUCT PANEL (M1, M2)
81	0270L00041	INSULATED ASSY, SUPPLY DUCT
91	0270L00040	INSULATED ASSY, RETURN DUCT
101	0121L00764DG	CONTROL DOOR (M1, M2)
101	0270L00302	CONTROL DOOR (M3)
111	0121L00817RFDG	RF, PNT, CONTROL POST (M3)
111	0121L00762RFDG	RF, PNT, POST, CONTROL BOX (M1, M2)
121	0270L00299	INSUL HEAT EXCH DOOR ASSY
131	0270L00301	INSUL BLOWER DOOR ASSY (M3)
131	0270L00298	INSUL BLWR DOOR ASSY (M1, M2)
141	0121L00765RFDG	RF, PNT, POST, BURNER BOX
161	0121L00828DG	BURNER DOOR

Expanded Model Nomenclature

M1 - CPH090XXX3BAXCAC
M2 - CPH120XXX3BXXDAC
M3 - CPH150XXX3BXXDAC

Top Panel / Tubing Assy

Image 1

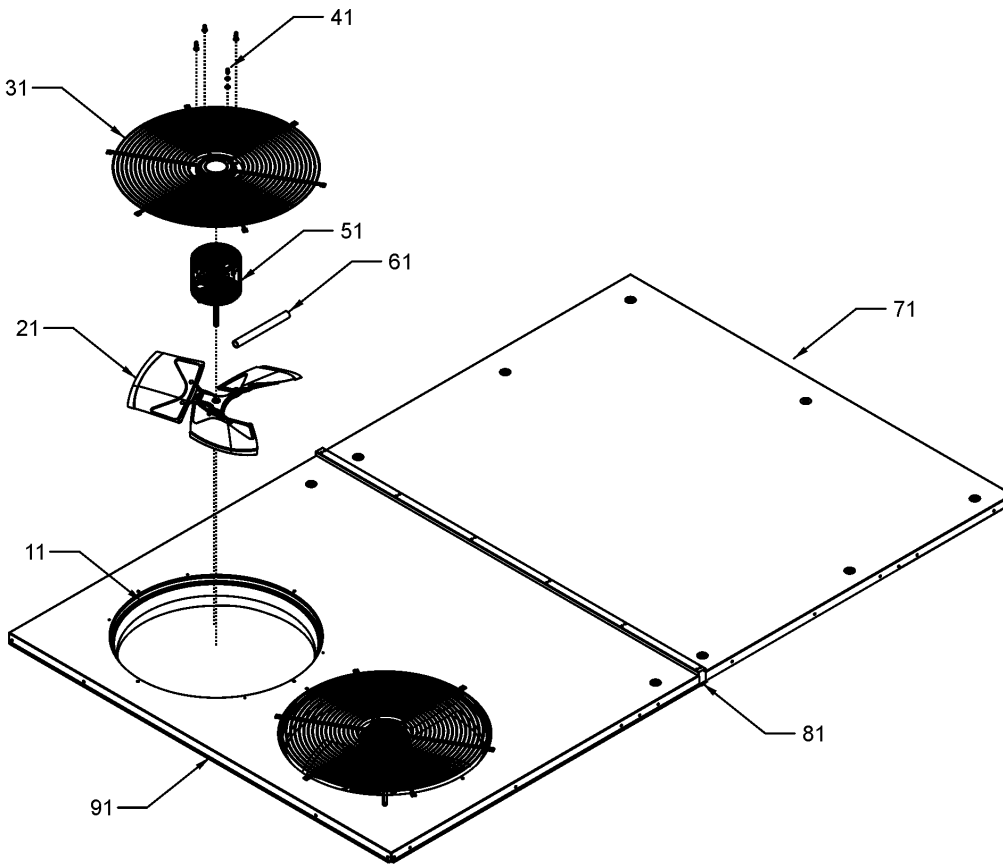
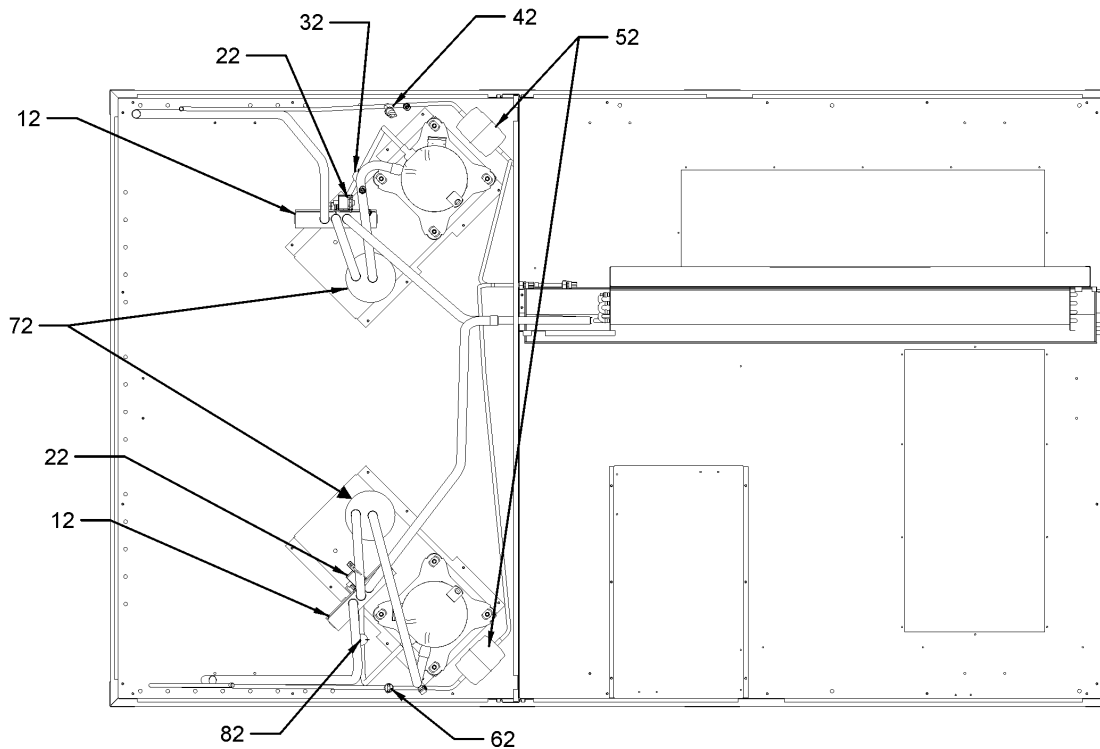


Image 2



Top Panel / Tubing Assy

Ref. Part No: No:	Description:	Ref. Part No: No:	Description:
-------------------	--------------	-------------------	--------------

Image 1:

11	0161L00000	VENTURI RING 22" (QTY 2)
21	0150G00001	FAN BLADE (M1)
21	10625733	FAN BLADE 22" ALUM CCW (M2, M3)
31	0152G00002	FAN GRILLE (QTY 2)
41	0163M00006P	ACORN NUT 5/16 HEX BLACK (QTY 8)
51	0131M00008P	COND MOTOR 1/3 HP, 1 SP, 6 PL (M2, M3)
51	0131M00007P	COND MOTOR 1/4 HP, 1 SP, 6 PL (M1)
61	17788000083F	PVC CONDUIT 8.25" (QTY 2)
71	0121L00497DG	EVAP TOP PANEL
81	20455902	SPLICE GASKET .50 X .25 (QTY 5)
91	0121L01014DG	COND TOP PANEL
NS	0163M00175	CAP WITH O-RING (QTY 4)
NS	0259L00096	COND MOTOR HARNESS (M3)
NS	0259L00025	COND MOTOR HARNESS 230V (M1, M2)
NS	0259L00027	COND MOTOR HARNESS 230V

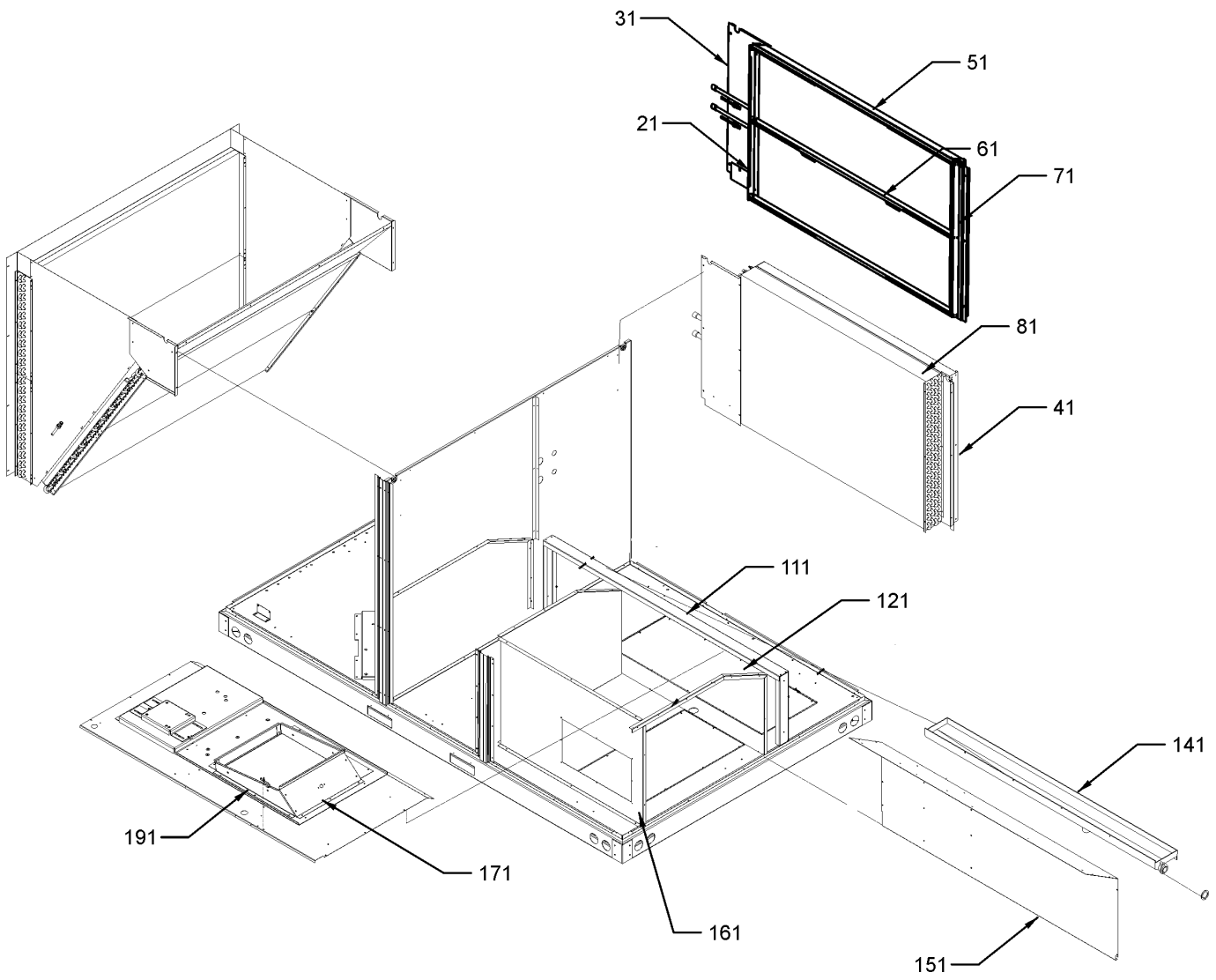
Image 2:

12	0151M00020	REVERSING VALVE (M3)
12	0151M00021	REVERSING VALVE (M1, M2)
22	B1225022	SOLENOID COIL
32	0130M00031	CUT-OUT SWITCH, HIGH PRESSURE (M1, M2)
32	0130M00074	CUT-OUT SWITCH, HIGH PRESSURE, C1 (M3)
42	0130L00003	CUT-OUT SWITCH, LOW PRESSURE (M1, M2)
42	0130M00075	CUT-OUT SWITCH, LOW PRESSURE, C1 (M3)
52	0151M00012	BI-FLOW FILTER DRIER (M3)
52	20485201	BI-FLOW FILTER DRIER (M1, M2)
62	0130L00002	CUT-OUT SWITCH, LOW PRESSURE (M1, M2)
62	0130M00075	CUT-OUT SWITCH, LOW PRESSURE, C2 (M3)
72	0151L00001	ACCUMULATOR (M3)
72	B1226207	ACCUMULATOR .875 (M1, M2)
82	0130M00030	CUT-OUT SWITCH, HIGH PRESSURE (M1, M2)
82	0130M00074	CUT-OUT SWITCH, HIGH PRESSURE, C2 (M3)
NS	B1373315	ACCESS FITTING (QTY 4)
NS	0130M00102	CONTROL, DEFROST (M1, M2)
NS	0130M00104	CONTROL, DEFROST

Expanded Model Nomenclature

M1 - CPH090XXX3BAXCAC
M2 - CPH120XXX3BXXDAC
M3 - CPH150XXX3BXXDAC

Partition Assy



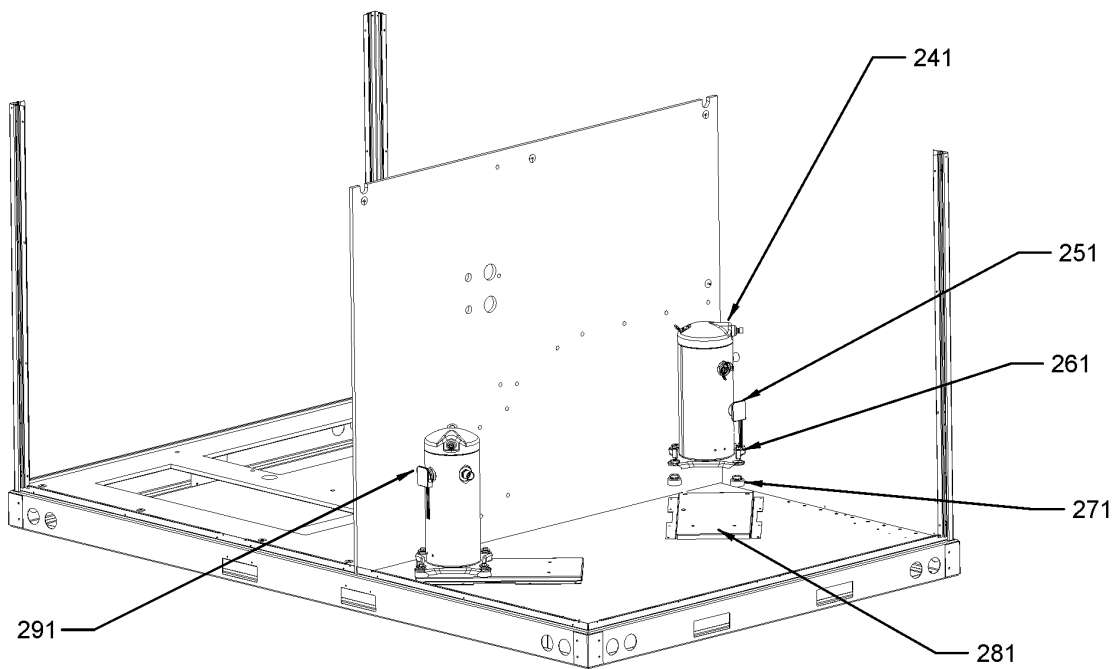
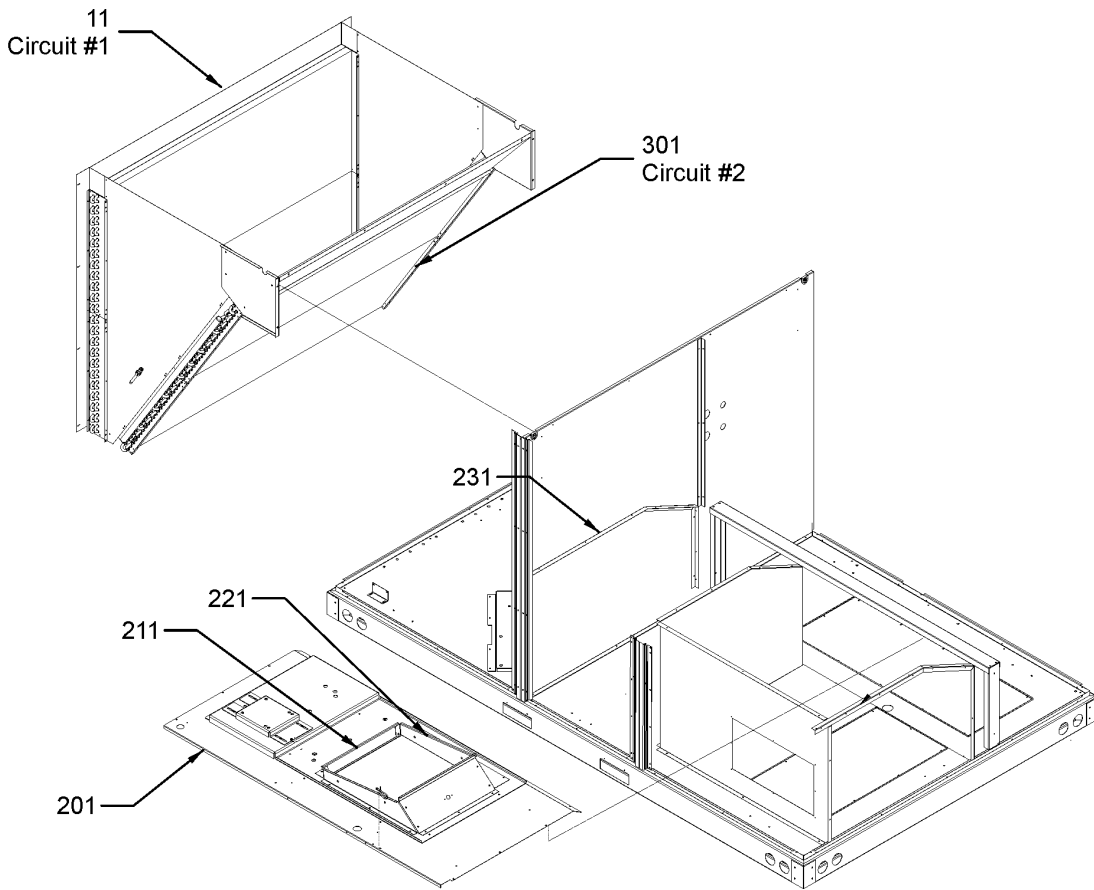
Partition Assy

Ref. Part No:	No:	Description:	Ref. Part No:	No:	Description:
<i>Image 1:</i>					
21	0121L00519	FILTER ANGLE-VERTICAL (RETURN SIDE) (M3)			
21	0121L00650	FILTER ANGLE-VERTICAL (RETURN SIDE) (M1, M2)			
31	0121L00210	EVAP EXTENSION-RETURN SIDE (M1, M2)			
31	0121L00517	EVAP EXTENSION-RETURN SIDE (M3)			
41	0121L00843	EXTENSION-EVAP HPIN (M1, M2)			
41	0121L00845	EXTENSION-EVAP HPIN (M3)			
51	0121L00649	FILTER ANGLE - HORIZONTAL (M1, M2)			
51	0121L00399	FILTER ANGLE-HORIZONTAL (M3)			
61	0121L00648	FILTER ANGLE - HORIZONTAL (CENTER) (M1, M2)			
61	0270L00161	FILTER ANGLE-HORIZONTAL (CENTER) (M3)			
71	0121L00358	FILTER ANGLE-VERTICAL (HAIRPIN SIDE) (M1, M2)			
71	0121L00520	FILTER ANGLE-VERTICAL (HAIRPIN SIDE) (M3)			
81	0202L00004	EVAP COIL TUBING ASSY (M1)			
81	0202L00007	EVAP COIL TUBING ASSY (M2)			
81	0202L00044	TUBING ASSY, EVAP COIL (M3)			
111	0121L00372	DRAIN PAN SUPPORT (M3)			
111	0121L00508	DRAIN PAN SUPPORT (M1, M2)			
121	0121L00103	MOUNTING ANGLE, DECK-DUCT SIDE			
141	0161L00002	DRAIN PAN			
151	0121L00374	DECK SIDE CHANNEL			
161	0121L00365	ELECTRIC HEAT PANEL			
171	0121L00090	BLOWER TRANSITION, RH END (M1)			
171	0121L00168	BLOWER TRANSITION, RH END (M2, M3)			
191	0121L00092	BLOWER TRANSITION, FRONT			
NS	0121L00827	BLOCK OFF, CONTROL BOX (M3)			
NS	0160L00021	FILTER (M1, M2)			
NS	B1369611	FILTER 20 X 25 X 2 (M3)			
NS	0162L00003	FLOWRATOR [EVAP] (M1)			
NS	0162L00011	FLOWRATOR [EVAP] (M2)			
NS	0162M00129	FLOWRATOR [EVAP] (M3)			

Expanded Model Nomenclature

M1 - CPH090XXX3BAXCAC
M2 - CPH120XXX3BXXDAC
M3 - CPH150XXX3BXXDAC

Compressor / Condenser / Partition Assy



Compressor / Condenser / Partition Assy

Ref. Part No: No:	Description:	Ref. Part No: No:	Description:
-------------------	--------------	-------------------	--------------

Image 1:

11	0201L00002	COND TUBING ASSY C1 (M1)
11	0201L00015	COND TUBING ASSY C1 (M2)
11	0201L00078	TUBING ASSY, COND COIL (M3)
201	0121L00928	BLOWER DECK
211	0121L00097	BLOWER TRANSITION, LH END (M1)
211	0121L00169	BLOWER TRANSITION, LH END (M2, M3)
221	0121L00094	BLOWER TRANSITION, BACK (M2, M3)
221	0121L00145	BLOWER TRANSITION, BACK (M1)
231	0121L00102	MOUNTING ANGLE, DECK-COND SIDE
241	ZP67KCETF5130	COMP, 67500,200/230/60/3 (M3)
241	ZP51K5ETF5130	COMP,51000,208/230/60/3 (M2)
241	ZP39K5ETF5130	COMPRESSOR 39000, 200/230/60/3 (M1)
251	0159L00005	COMPRESSOR SCROLL HARNESS (M1, M2)
251	0159L00009	COMPRESSOR SCROLL HARNESS (M3)
261	M0221641	TF SHOULDER SCREW (QTY 8)
271	B1339533	COMPRESSOR GROMMET (QTY 8)
281	0121L00408	COMPRESSOR MOUNTING PLATE (QTY 2)
291	0159L00004	COMPRESSOR SCROLL HARNESS (M1, M2)
291	0159L00033	COMPRESSOR SCROLL HARNESS (M3)
301	0201L00002	COND TUBING ASSY C2 (M1)
301	0201L00016	COND TUBING ASSY C2 (M2)
301	0201L00093	COND TUBING ASSY C2 (M3)
NS	0162L00002	FLOWRATOR [COND] (M1)
NS	0162L00006	FLOWRATOR [COND] (M2)
NS	0162M00125	FLOWRATOR [COND] (M3)

Expanded Model Nomenclature

M1 - CPH090XXX3BAXCAC
M2 - CPH120XXX3BXXDAC
M3 - CPH150XXX3BXXDAC

Blower Assembly and Control Box Assembly

Image 1

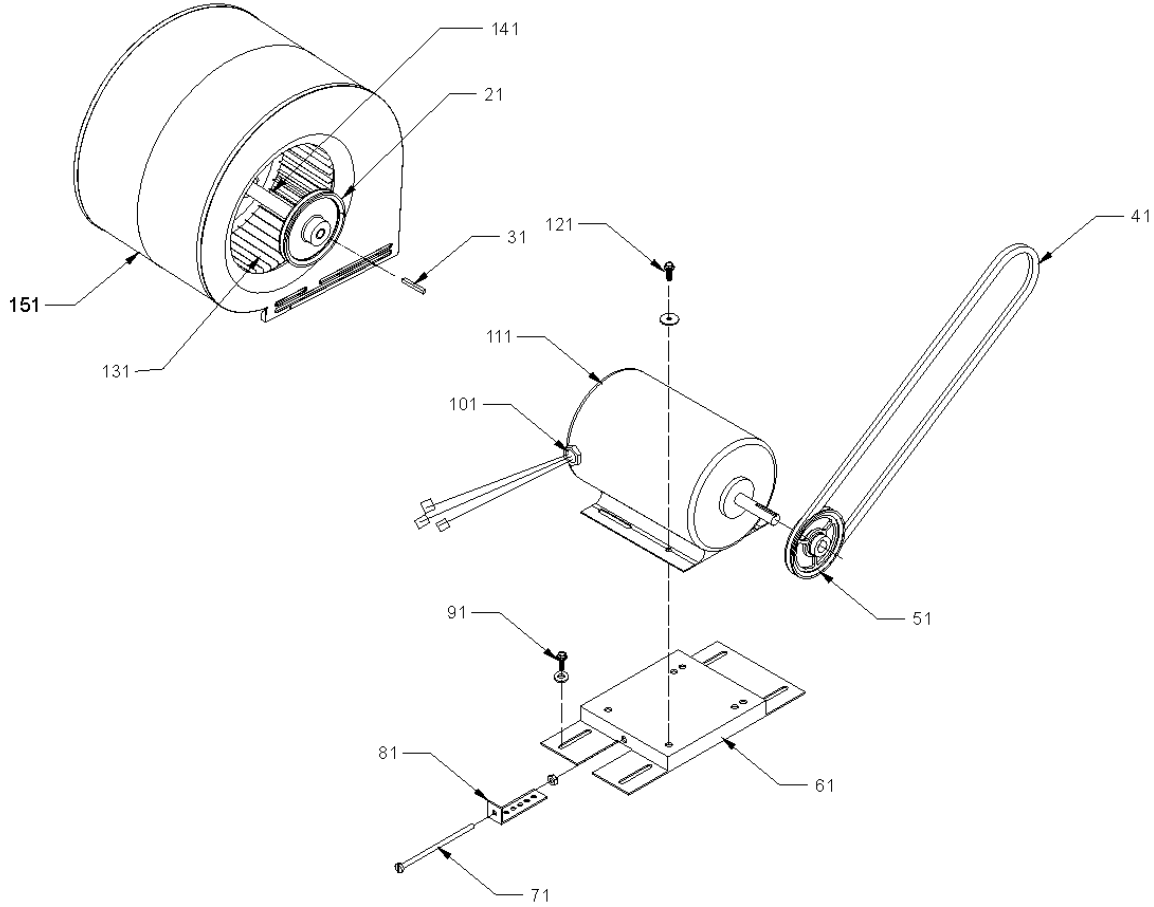
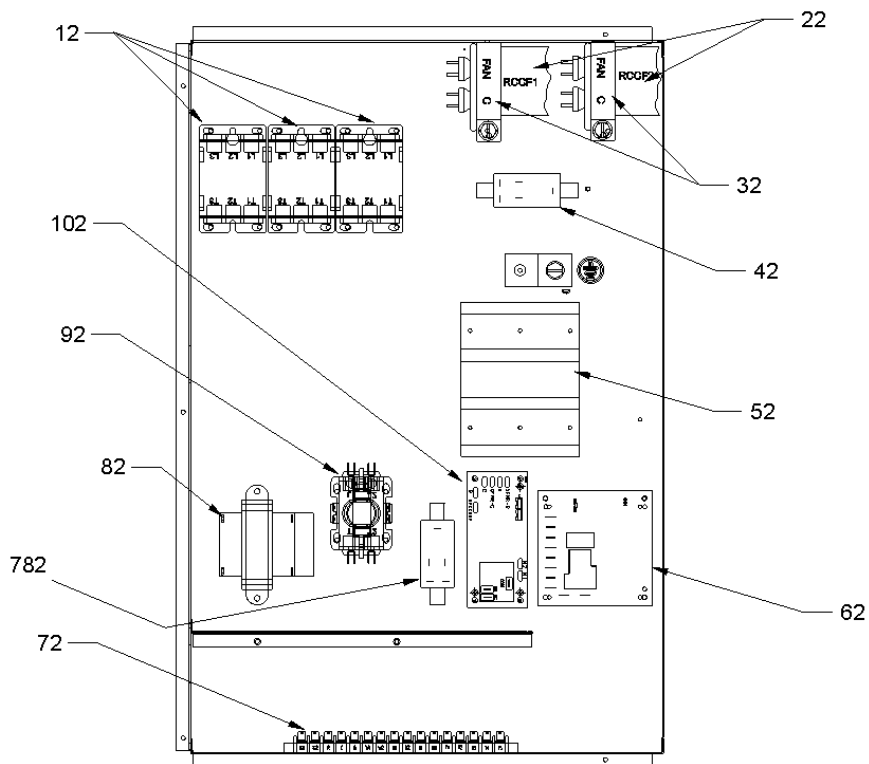


Image 2



Blower Assembly and Control Box Assembly

Ref. Part No: No:	Description:	Ref. Part No: No:	Description:
-------------------	--------------	-------------------	--------------

Image 1:

21	B3204310	FIXED SHEAVE AK66 (M3)
21	0163L00011	FIXED SHEAVE AK74 (M1, M2)
31	B1398604	STEEL KEY (000158812) 2.0"
41	0164L00001	NOTCHED FAN BELT AX49 (M3)
41	0164L00000	NOTCHED FAN BELT AX51 (M1, M2)
51	0163L00012	VARIABLE PITCH SHEAVE VL40
61	0270L00015	MOTOR BASE ASSY
71	0163M00045	BOLT 1/4-20 X 4"
81	3225000F	BELT TIGHTENER ANGLE
91	B1446707	SCREW 5/16-18 X 1" (QTY 4)
101	B1393726	ELECT. CONNECTING BUSHING
111	B3240004	BELT DRIVE MOTOR 2 HP (M3)
111	B3240006	BELT DRIVE MOTOR 2 HP (M1, M2)
121	B1393738	BOLT 1/4-20 X 3/4" (QTY 4)
131	03-77429	BLOWER WHEEL (M1)
131	03-78497	BLOWER WHEEL (M2, M3)
141	04-11525	BLOWER SHAFT (M1)
141	04-11526	BLOWER SHAFT (M2, M3)
151	04-01525	BLOWER HOUSING (M1)
151	04-01526	BLOWER HOUSING (M2, M3)
NS	04-02196	BEARING & FRAME ASSY
NS	0259L00008	MOTOR HARNESS-BELT DRIVE

Image 2:

12	CONT3P025024V	CONTACTOR 25 AMP, 3P, 24V (M1, M2)
12	CONT3P030024V	CONTACTOR 30 AMP, 3P, 24V (M3)
22	CAP0500000370VA	CAPACITOR 5/370V (QTY 2)
32	20520901	CAPACITOR STRAP (QTY 2)
42	10135604	RELAY
52	16330-3	POWER BLOCK
62	PCBDM130	DEFROST CONTROL BOARD
72	0130M00038	TERMINAL BOARD
82	B1141672	TRANSFORMER 480V, 75VA, RESETTABLE
92	CONT2P040024V	CONTACTOR 40 AMP, 2P, 24V
102	PCBFM131	ELECTRONIC BLOWER TIME DELAY RELAY
782	0130M00025	24V RELAY
NS	0259L00030	ECONOMIZER HARNESS (M1, M2)
NS	0259L00098	ECONOMIZER HARNESS (M3)
NS	0259L00086	HARNESS, CONTROL
NS	0259L00032	LCM HARNESS, ELECTRIC HEAT
NS	0259L00087	POWER HARNESS

Expanded Model Nomenclature

M1 - CPH090XXX3BAXCAC
M2 - CPH120XXX3BXXDAC
M3 - CPH150XXX3BXXDAC

Accessory Parts List

Ref. Part No: No:	Description:	Ref. Part No: No:	Description:
------------------------------	---------------------	------------------------------	---------------------

Image 1:

NS	DNECONHP90120	ECONOMIZER DOWNFLOW HP (M1)
NS	LAKT09150FIHP3	LOW AMBIENT KIT-7.5-12.5 T 230 (M1)
NS	SDRKT01FI75T12	SMOKE DETECTOR ASSEMBLY (M2, M3)

Expanded Model Nomenclature

M1 - CPH090XXX3BAXCAC

M2 - CPH120XXX3BXXDAC

M3 - CPH150XXX3BXXDAC