

# **SUBURBAN DynaPack**

## **SERVICE & WARRANTY MANUAL**



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# DYNAPACK

## UNIT DESCRIPTION AND PARTS IDENTIFICATION

The Dynapack unit is an indoor vertical packaged air conditioner, featuring gas heat, with the compressor and condenser section located in the bottom of the unit. The gas furnace heat exchanger is located in the center of the unit, and the indoor blower and evaporator coil are located in the top of the unit.

The supply and return ducts are connected to the top of the unit.

The Dynapack unit is to be installed on an outside wall using a wall sleeve and grille supplied by Suburban.

The outside air for the condenser section is drawn from the lower section of the wall sleeve and discharged through the top section of the wall sleeve. Combustion air for the furnace section is drawn and discharged through the top section of the wall sleeve.

The Dynapack unit is certified for 0" clearance to the indoor walls on the back and both sides. However, for ease of installation and service, a 1" clearance is recommended for the sides.

The Dynapack unit components are accessible through three separate front panels:

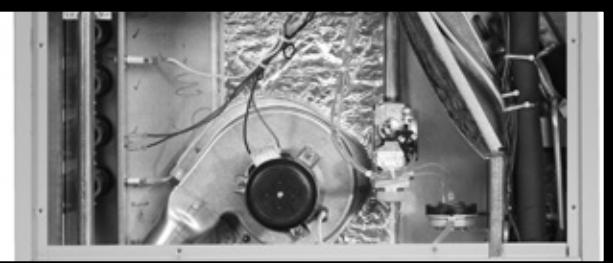
### 1. TOP PANEL

The Top Panel provides access to the control box, evaporator coil, thermal expansion valve, room air blower motor, room air motor capacitor, high limit switch, and room air motor failure limit switch. The control box contains the compressor contactor, compressor capacitor, condenser fan capacitor, transformer, and furnace control board.



### 2. MIDDLE PANEL

The Middle Panel provides access to the gas furnace heat exchanger, burners, gas orifices, gas valve, combustion air motor, furnace pressure switch, spark igniter, flame sensor and flame rollout switch.



### 3. BOTTOM PANEL

The Bottom Panel provides access to the compressor, condenser coil, condenser motor, condenser fan, and refrigerant pressure switches.



# DYNAPACK CONTROL STATUS INDICATOR

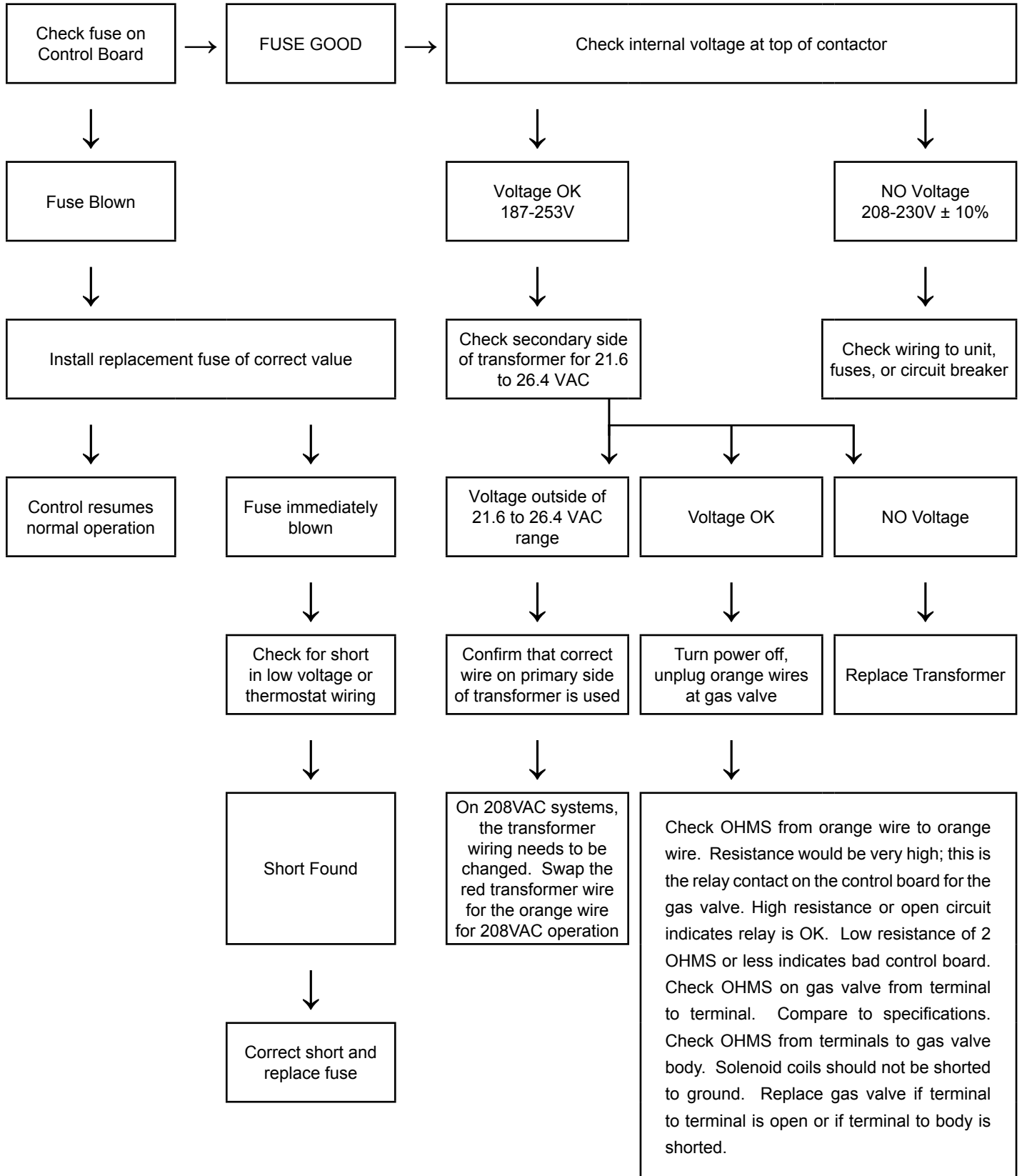
## FAULT CODES AND DESCRIPTIONS

DIAGNOSTIC LED CODE	DESCRIPTION
<b>SLOW FLASH</b>	Control OK. NO Call for Heat.
<b>FAST FLASH</b>	Control OK. Call for Heat Present.
<b>LED OFF</b>	Furnace Fails to Operate. Internal Control Fault or No Power.
<b>LED STEADY ON</b>	Control Internal Failure.
<b>LED 2 FLASHES</b>	In LOCKOUT from Failed Ignitions or Flame Losses.
<b>LED 3 FLASHES</b>	Pressure Switch OPEN with Combustion Air Blower ON, or CLOSED with Combustion Air Blower OFF.
<b>LED 4 FLASHES</b>	Limit or Rollout Switch is OPEN, Room Air Motor and Combustion Air Blower Motor Operating
<b>LED 5 FLASHES</b>	Flame Sensed while Gas Valve is OFF. Combustion Air Blower Motor and Room Air Motor Operating.
<b>LED 6 FLASHES</b>	On Board Microprocessors Disagree.

# TROUBLE SHOOTING GUIDE

## DYNAPACK FAULT CODE

**FAULT: LED OFF - Furnace fails to operate; internal control fault or no power.**



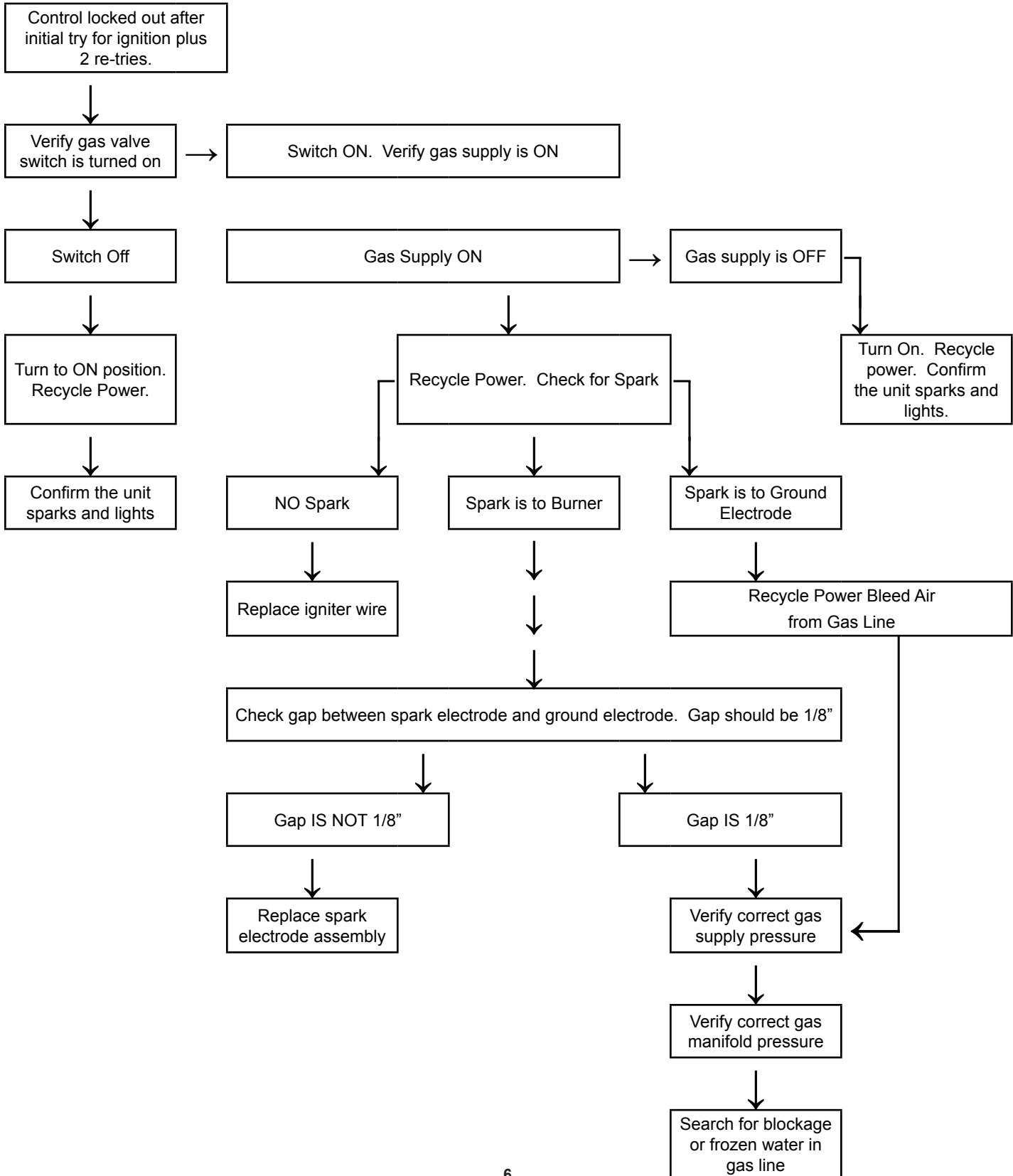
# TROUBLE SHOOTING GUIDE

## DYNAPACK FAULT CODE

### FAULT: LED STEADY ON - Control Internal Failure

Control has detected a fault on the control board. Replace the Control Board.

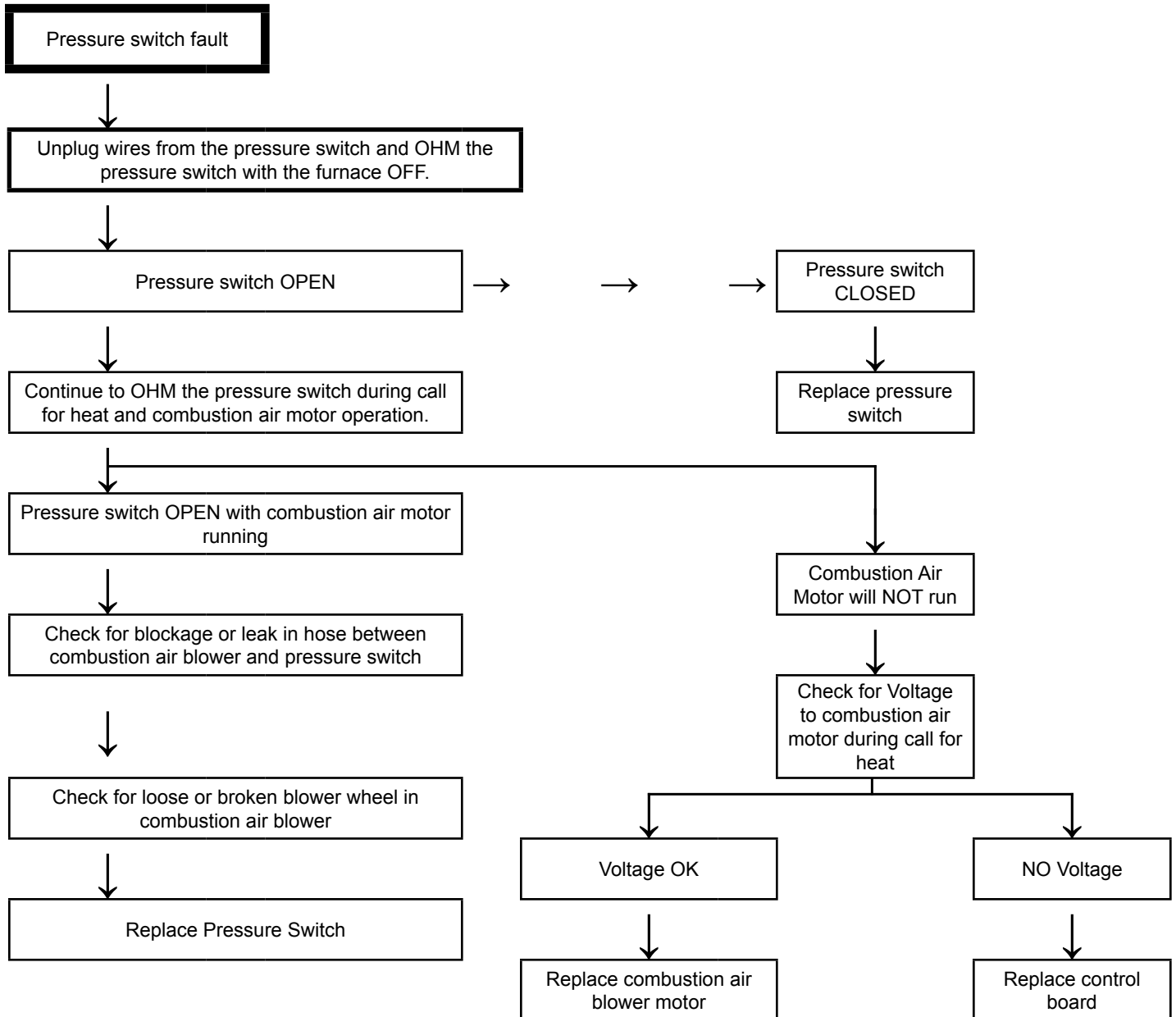
### FAULT: LED 2 FLASHES - In LOCKOUT from failed ignitions or flame losses.



# TROUBLE SHOOTING GUIDE

## DYNAPACK FAULT CODE

**FAULT: LED 3 FLASHES - Pressure switch open with Combustion Air Blower ON, or with Combustion Air Blower OFF.**

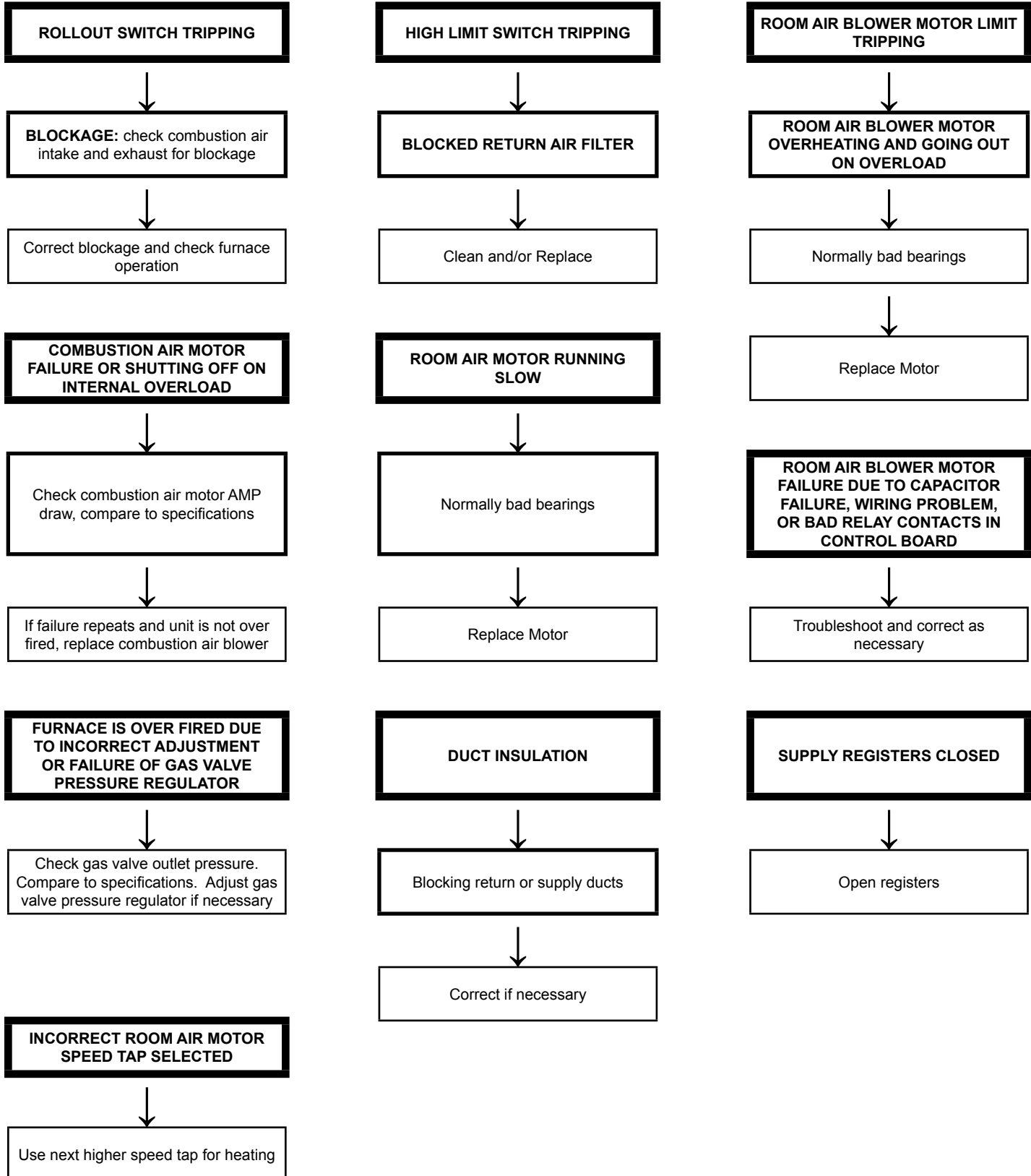


# TROUBLE SHOOTING GUIDE

## DYNAPACK FAULT CODE

**FAULT: LED 4 FLASHES - Limit or rollout switch is OPEN, room air motor and Combustion Air Blower motor are operating.**

There are three limit switches wired into this circuit: flame rollout limit switch, high supply air temperature limit switch, and room air blower motor failure limit switch.





# TROUBLE SHOOTING GUIDE

## DYNAPACK FAULT CODE

### **FAULT: LED 5 FLASHES - Flame sensed while gas valve OFF. Combustion Air Blower Motor and Room Air Blower Motor Operating.**

Control senses flame for four seconds or more. When flame is no longer sensed, control goes into soft lockout.

Check high voltage wires to ensure they are not wrapped around flame sensing wire, which can cause induced voltage. Route flame sensing wire separately if necessary

### **LOCKOUT MODES**

<b>SOFT LOCKOUT:</b>	Lockout shall automatically reset after one hour. Lockout may be manually reset by removing power from the control board for more than one (1) second, or by removing the thermostat call for heat for more than one second, and less than twenty (20) seconds.
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<b>HARD LOCKOUT:</b>	If the control board detects a fault, the LED will be energized steady and the control board will lockout as long as a fault remains. A hard lockout will automatically reset if the hardware fault clears.
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<b>POWER INTERRUPTION:</b>	During a momentary power interruption, or at voltage levels below minimum operating voltage, the system will self-recover without lockout once the voltage returns to the operating range.
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### **FAULT: LED 6 FLASHES - On Board Microprocessors Disagree**

Control board microprocessors disagree. Replace control board.

# SPECIFICATIONS FOR INSTALLATION AND TROUBLESHOOTING OF DUCT WORK 2010-2012 PRODUCTION

INDOOR CFM vs STATIC PRESSURE (wet coil + air filter)						
Model Number	Blower speed	0.10" wc	0.20" wc	0.30" wc	0.40" wc	0.50" wc
DYPA18ACA036	LO	369	324	278	236	201
	MED LO	587	549	514	474	428
	MED HI	744	717	673	630	584
	HI	946	895	841	784	732
DYPA24ACA048	LO	566	540	507	479	440
	MED LO	873	819	770	720	668
	MED HI	927	876	821	767	709
	HI	1019	962	899	842	781
DYPA30ACA060	LO	624	603	567	515	462
	MED LO	764	733	677	630	568
	MED HI	883	835	779	718	655
	HI	982	932	872	810	748
DYPA36AC1A060	LO	420	360	285	NR	NR
	MED LO	525	475	425	375	325
	MED	755	715	670	625	575
	MED HI	985	950	920	890	855
	HI	1110	1080	1050	1015	980

Model Number	Recommended Heating Speed	Approx. CFM	Approx. Temp Rise F	Recommended Cooling Speed	Approx. CFM
DYPA018ACA036	medium low	550	50	medium low	550
DYPA018ACA048	medium high	720	50	medium low	550
DYPA018ACA060	high	850	50	medium low	550
DYPA024ACA036	low	540	50	medium low	820
DYPA024ACA048	medium low	820	45	medium low	820
DYPA024ACA060	high	920	50	medium low	820
DYPA030ACA036	low	600	45	high	950
DYPA030ACA048	medium low	740	50	high	950
DYPA030ACA060	high	950	50	high	950
DYPA036AC1A036	medium low	525	50	high	1100
DYPA036AC1A048	medium	755	45	high	1100
DYPA036AC1A060	medium hi	985	45	high	1100

## **HEATING ADJUSTMENTS**

Measure input and output gas pressure per installation manual.

## **TEMPERATURE RISE**

Measure return and supply air close to the furnace. Compare to nameplate range. May require selecting a different blower speed. Refer to installation manual for heating adjustments.

## **COOLING ADJUSTMENTS**

The only cooling adjustment that can be made is in the blower speed. Measure return and supply air close to the unit. The proper cooling operation is obtained if there is a 20 degree drop in air temperature through the air conditioner unit. Refer to installation manual for cooling adjustments.

# UNIT AND COMPONENT SPECIFICATIONS

## 2010-2012 PRODUCTION

<b>ELECTRICAL DATA</b>	<b>DYPA18</b>	<b>DYPA24</b>	<b>DYPA30</b>	<b>DYPA36</b>
Volts / Phase / Cycle	208 - 230 / 1 / 60			
Minimum Circuit Ampacity	12.6	17.3	20.5	25.2
Maximum Fuse / HACR Breaker Size	20	25	30	40

<b>COMPRESSOR DATA</b>	<b>DYPA18</b>	<b>DYPA24</b>	<b>DYPA30</b>	<b>DYPA36</b>
Type	RECIPROCATING			
Refrigerant Type (HCFC)	R410A	R410A	R410A	R410A
Unit Refrigerant Charge Ounces	75	90	90	96
Rated Load Amps	8.3	10.9	13.1	16.0
Locked Rotor Amps	43	54	74	88
Maximum Continuous Current	13	17	20.5	25
Run Capacitor	30 @ 370V	35 @ 370V	40 @ 370V	45 @ 370V

<b>GAS CONTROLS &amp; ADDITIONAL DATA</b>	<b>DYPA18</b>	<b>DYPA24</b>	<b>DYPA30</b>	<b>DYPA36</b>
Gas (Specify)	NATURAL GAS			
Ignition System: Solid-State	Direct Spark			
Gas Connection Size	1/2" NPT			
Condensate Connection Size	3/4" NPT			

<b>MOTORS</b>	<b>DYPA18</b>	<b>DYPA24</b>	<b>DYPA30</b>	<b>DYPA36</b>
Room Air Blower Motor FLA / HP / RPM	1.3 / .25 / 1060	2.8 / .5 / 1075	2.8 / .5 / 1075	3.5 / .33 / 1100
Combustion Air Blower Motor	0.9	0.9	0.9	.09
Condenser Fan Motor FLA / HP / RPM	0.9 / .125 / 1075	0.9 / .125 / 1075	1.3 / .25 / 1075	1.3 / .25 / 1075
Room Air Motor Capacitor	7.5 @ 370V			N/A
Condenser Motor Capacitor	5.0 @ 370V			

LOW VOLTAGE TRANSFORMER	208 / 230 - 24VAC, 40VA
CONTACTOR	2 pole, 25 RLA, 125 LRA, 24VAC Coil
REFRIGERANT FILTER DRIER	3 Cubic Inch, 3/8" ID Connections
REFRIGERANT HI PRESSURE SWITCH	Open on Rise @ 620 psig, Closes @ 420 psig
REFRIGERANT LOW PRESSURE SWITCH	Open on Fall @ 40 psig, Closes @ 60 psig

*\*\*Specifications subject to change without notice.  
Installation must be in accordance with local codes and regulations.*

# UNIT AND COMPONENT SPECIFICATIONS

## 2010-2012 PRODUCTION

MODEL	COOLING			HEATING				
	Btuh	EER	Refrigerant	INPUT Btuh	OUTPUT Btuh	AFUE	Natural Gas Orifice	LP Gas Orifice
DYPA18ACA036	17,000	9.7	R - 410A	35,500	28,400	80%	1.7 mm	0.042" (#58 Drill)
DYPA18ACA048				47,500	38,000			
DYPA18ACA060				59,000	47,200			
DYPA24ACA036	23,600	9.15	R - 410A	35,500	28,400	80%	1.7 mm	0.042" (#58 Drill)
DYPA24ACA048				47,500	38,000			
DYPA24ACA060				59,000	47,200			
DYPA30ACA036	28,400	9	R - 410A	35,500	28,400	80%	1.7 mm	0.042" (#58 Drill)
DYPA30ACA048				47,500	38,000			
DYPA30ACA060				59,000	47,200			
DYPA36AC1A036	34,800	10	R - 410A	35,500	28,400	80%	1.7 mm	0.042" (#58 Drill)
DYPA36AC1A048				47,500	38,000			
DYPA36AC1A060				59,000	47,200			

# SPECIFICATIONS FOR INSTALLATION AND TROUBLESHOOTING OF DUCT WORK DYNAPACK “S” SERIES & “H” SERIES

<b>INDOOR CFM vs STATIC PRESSURE (Dry coil + no air filter)</b>											
<b>Model Number</b>	<b>Blower Speed</b>	<b>0.10" wc</b>	<b>0.15" wc</b>	<b>0.20" wc</b>	<b>0.25" wc</b>	<b>0.30" wc</b>	<b>0.40" wc</b>	<b>0.50" wc</b>	<b>0.60" wc</b>	<b>0.70" wc</b>	<b>0.80" wc</b>
DYPA12AC1A***	LO	497	473	448	424	400	348	296	247	212	160
	MED LO	577	562	547	522	497	458	415	357	317	281
	MED	757	748	739	716	692	670	635	586	558	521
	MED HI	937	920	905	888	872	852	827	790	728	677
	HI	1060	1050	1042	1015	977	927	876	824	758	700
DYPA18AC1A***	LO	512	491	469	428	387	320	285	250	213	179
	MED LO	596	568	540	522	504	447	415	381	324	291
	MED	773	761	748	730	711	675	640	622	586	550
	MED HI	972	955	938	927	915	874	850	825	796	766
	HI	1108	1091	1074	1057	1039	1002	970	917	868	796
DYPA24AC1A***	LO	504	483	461	420	379	312	252	207	N/R	N/R
	MED LO	588	560	532	514	496	439	377	320	262	202
	MED	765	753	740	722	703	667	622	572	532	482
	MED HI	964	947	930	919	907	866	828	782	757	702
	HI	1100	1083	1066	1049	1031	994	962	922	882	827
DYPA30AC1A***	LO	490	465	440	415	385	310	225	170	N/R	N/R
	MED LO	570	540	520	500	476	415	365	310	250	205
	MED	768	755	741	732	704	666	621	580	535	500
	MED HI	934	922	913	895	873	835	800	760	730	690
	HI	1064	1046	1017	1009	995	965	935	900	875	828
DYPA36AC1A***	LO	490	465	440	415	385	310	225	170	N/R	N/R
	MED LO	570	540	520	500	476	415	365	310	250	205
	MED	768	755	741	732	704	666	621	580	535	500
	MED HI	934	922	913	895	873	835	800	760	730	690
	HI	1064	1046	1017	1009	995	965	935	900	875	828

<b>Model</b>	<b>Recommended Heating Speed</b>	<b>Approx. CFM</b>	<b>Approx. Temp Rise F</b>	<b>Recommended Cooling Speed</b>	<b>Approx. CFM</b>
DYPA12AC1A036	medium	700	38	Low	400
DYPA12AC1A048	medium	700	50	Low	400
DYPA18AC1A036	medium	700	38	medium low	550
DYPA18AC1A048	medium	700	50	medium low	550
DYPA18AC1A060	medium high	900	50	medium low	550
DYPA24AC1A036	medium	700	38	medium	700
DYPA24AC1A048	medium high	900	40	medium	700
DYPA24AC1A060	medium high	900	50	medium	700
DYPA30AC1A036	medium	700	38	medium high	900
DYPA30AC1A048	medium high	900	40	medium high	900
DYPA30AC1A060	medium high	900	50	medium high	900
DYPA36AC1A036	medium	700	38	high	1000
DYPA36AC1A048	medium high	900	40	high	1000
DYPA36AC1A060	medium high	900	50	high	1000

# UNIT AND COMPONENT SPECIFICATIONS DYNAPACK "S" SERIES

S SERIES MODELS	HEATING			COOLING				Sound Pressure Levels	
	Input Btuh	Output Btuh	Thermal Efficiencies	Btuh	SEER <sup>1</sup>	EER <sup>2</sup>	Refrigerant	Indoor (dBA)	Outdoor (dBA)
DYPA12AC1A036	35,500	28,400	82%	12,000	11	10.2	R-410A	64	69
DYPA12AC1A048	47,500	38,000							
DYPA18AC1A036	35,500	28,400	82%	17,000	12	10.6	R-410A	64	69
DYPA18AC1A048	47,500	38,000							
DYPA18AC1A060	59,000	47,200							
DYPA24AC1A036	35,500	28,400	82%	25,200	12.1	10.6	R-410A	64	69
DYPA24AC1A048	47,500	38,000							
DYPA24AC1A060	59,000	47,200							
DYPA30AC1A036	35,500	28,400	82%	30,200	12.35	10.7	R-410A	64	74
DYPA30AC1A048	47,500	38,000							
DYPA30AC1A060	59,000	47,200							
DYPA36AC1A036	35,500	28,400	82%	34,800	11.5	10	R-410A	64	74
DYPA36AC1A048	47,500	38,000							
DYPA36AC1A060	59,000	47,200							

<sup>1</sup> - The official energy descriptor recognized by Department of Energy for this type of unit is EER.

<sup>2</sup> - Unit tested to ANSI / AHRI Standard 390

ELECTRICAL DATA	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Volts/Phase/Cycle	208/230-1-60				
Minimum circuit ampacity	11.5	13.2	16.9	20.7	25.2
Maximum fuse/HACR breaker size	15	20	25	30	40

COMPRESSOR	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Type	Rotary	Reciprocating			
Refrigerant type (HCFC)	R410A				
Unit refrigerant charge ounces	35 oz.	40 oz.	85 oz.	96 oz.	96 oz.
Rated load amps	5.2	8.3	10.9	13.1	16
Locked rotor amps	25	43	54	74	88
Maximum continuous current	7.9	13	17	20.5	25.2

GAS CONTROLS AND ADDITIONAL DATA	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Gas (specify)	Natural				
Ignition System: solid state	Direct Spark				
Gas connection size	1/2 inch NPT				
Condensate connection size	3/4 inch NPT				

MOTORS	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Indoor motor (ECM) FLA/HP/RPM	4.0 / .50 / 1050				
Condenser motor FLA/HP/RPM	0.9 / .125 / 1075			1.3 / .25 / 1075	
Combustion motor FLA	0.9				

Specifications subject to change without notice.

MODEL	Dimensions In Inches	
	A	B
DYPA12	60-1/2	23-7/8
DYPA18	60-1/2	23-7/8
DYPA24	60-1/2	23-7/8
DYPA30	64-1/2	27-7/8
DYPA36	64-1/2	27-7/8

# UNIT AND COMPONENT SPECIFICATIONS DYNAPACK "H" SERIES

MODEL	COOLING				HEATING			SOUND PRESSURE LEVELS	
	Btuh	Seer <sup>1</sup>	EER <sup>2</sup>	Refrigerant	Input Btuh	Output Btuh	AFUE	Indoor (dBA)	Outdoor (dBA)
DYPA12AC1A039H	12,000	11	10.2	R-410A	39,000	35,900	92%	64	69
DYPA18AC1A039H	17,500	12	10.6	R-410A	39,000	35,900	92%	64	69
DYPA24AC1A039H	25,200	12.1	10.6	R-410A	39,000	35,900	92%	64	69
DYPA30AC1A039H	30,200	12.35	10.7	R-410A	39,000	35,900	92%	64	74
DYPA36AC1A039H	34,800	11.5	10	R-410A	39,000	35,900	92%	64	74

<sup>1</sup>The official energy descriptor recognized by Department of Energy for this type of unit is EER.

<sup>2</sup>Unit Tested to ANSI/AHRI Standard 390

ELECTRICAL DATA	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Volts/Phase/Cycle	208/230-1-60				
Minimum circuit ampacity	10.9	14.8	18	20.5	25.2
Maximum fuse/HACR breaker size	15	20	25	30	40

COMPRESSOR	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Type	Rotary Reciprocating				
Refrigerant type (HCFC)	R410A				
Unit refrigerant charge ounces	35 oz.	40 oz.	85 oz.	96 oz.	96 oz.
Rated load amps	5.2	8.3	10.9	13.1	16
Locked rotor amps	25	43	54	74	88
Maximum continuous current	7.9	13	17	20.5	25.2

GAS CONTROLS AND ADDITIONAL DATA	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Gas (specify)	Natural				
Ignition system: solid state	Direct Spark				
Gas connection size	1/2 inch NPT				
Condensate connection size	3/4 inch NPT				

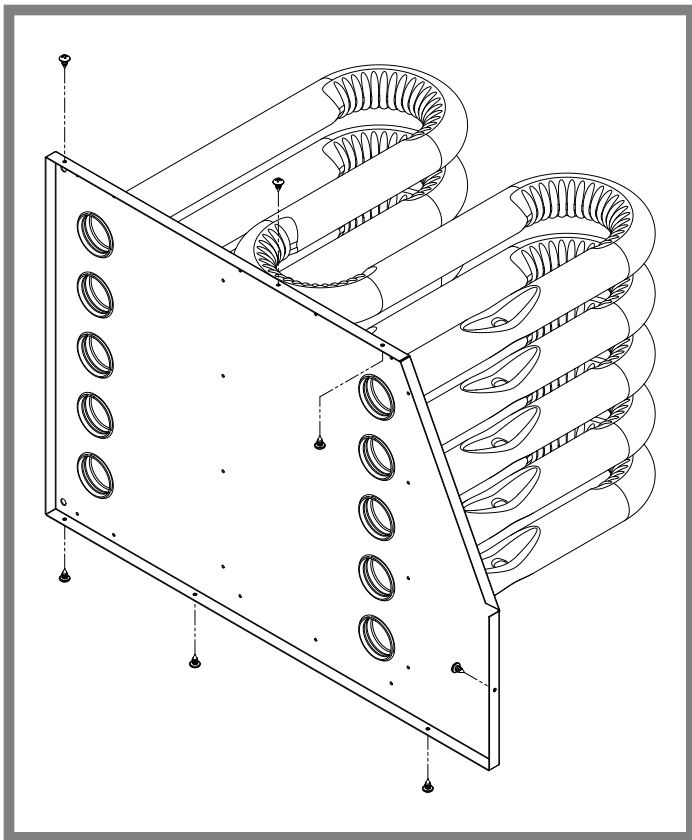
MOTORS	DYPA12	DYPA18	DYPA24	DYPA30	DYPA36
Indoor motor(ECM) FLA/HP/RPM	4.0/.50/1050				
Condensor motor FLA/HP/RPM	0.9/.125/1075 1.3/.25/1075				
Combustion motor FLA	0.9				

Specifications subject to change without notice.

MODEL	Dimensions In Inches		
	A	B	C
DYPA12, 18	60-1/2	23-7/8	23-1/2
DYPA24	60-1/2	23-7/8	23-1/2
DYPA30	64-1/2	27-7/8	27-1/2
DYPA36	64-1/2	27-7/8	27-1/2

# COMBUSTION CHAMBER REMOVAL

1. REMOVE CENTER & TOP PANEL SCREWS
  - a. Lay panels aside
2. TURN OFF GAS SUPPLY
3. DISCONNECT PIPING AT GAS VALVE
4. UNPLUG GAS VALVE WIRES – MOVE ASIDE
5. REMOVE 4 SCREWS THAT SECURE MANIFOLD TO BURNER BOX
  - a. Lay manifold and gas valve aside
6. UNPLUG WIRES AT ELECTRODE, FLAME PROBE, AND ROLLOUT LIMIT SWITCH
  - a. Move aside
7. REMOVE 2 SCREWS THAT SECURE PRESSURE SWITCH
  - a. Move switch aside
8. UNPLUG COMBUSTION AIR MOTOR WIRES
  - a. Move aside



9. REMOVE (4) SCREWS THAT SECURE BURNER BOX TO COMBUSTION CHAMBER
  - a. Lay burner box aside
10. REMOVE VENT PIPE SCREW
  - a. Remove 1 screw from combustion air blower.
  - b. Remove 4 screws that secure vent pipe bracket seal to unit
  - c. Pull tube loose from combustion air blower
  - d. Rotate pipe toward center of unit and pull down from hole
  - e. Lay pipe on top of condenser motor
11. REMOVE (9) SCREWS THAT SECURE COMBUSTION CHAMBER TO UNIT AS PER ILLUSTRATION
  - a. Grasp combustion air blower and pull combustion chamber outward over top of insulation  
**NOTE:** Insulation can impede removal
  - b. Lay aside

**NOTES:** To assist in combustion chamber replacement, removal of room air blower housing will allow servicer to grasp chamber and move around when aligning holes. Use awl or ice pick to align.

A metal shield lying on top of insulation will protect insulation when sliding chamber into unit.

Secure screws in top & bottom of chamber. Leave screws loose to allow movement of chamber; tighten after all screws are installed.

Repair any torn insulation with foil tape.

Assure vent pipe is in correct position upon re-installing combustion chamber.

Check for gas leaks when connecting piping to gas valve. Repair any leaks.



# CONDENSER MOTOR REMOVAL

1. REMOVE BOTTOM PANEL SCREWS
    - a. Lay aside screws and panel
  2. LOOSEN SET SCREW ON FAN PULL FAN BLADE UPWARD OFF SHAFT – LAY ASIDE
- NOTE:** if fan will not come off, cut shaft off motor to remove
3. DISCONNECT MOTOR WIRES AND CUT WIRE TIES TO ALLOW WIRES TO BE PULLED DOWNWARD TOWARD MOTOR
  4. LOOSEN NUT ON CONDENSER MOTOR BRACKET AND PULL MOTOR FROM BRACKET
    - a. Replace motor

**REVERSE STEPS FOR INSTALLATION OF NEW MOTOR.**

**NOTE:** Place a block of wood or other material under condenser motor for support during replacement.

## EVAPORATOR COIL

1. REMOVE TOP PANEL – LAY ASIDE
2. TO ACCESS EVAPORATOR WILL REQUIRE REMOVAL OF CONTROL BOX.

## CONDENSER COIL

1. REMOVE BOTTOM PANEL – LAY ASIDE.
2. THIS ALLOWS ACCESS TO COIL AREA

## COMPRESSOR

1. REMOVE BOTTOM PANEL – LAY ASIDE

**NOTE:** Compressor has built-in overload. Refer to compressor data. **(page 12)**

## COMBUSTION AIR MOTOR REMOVAL

1. REMOVE MIDDLE PANEL – LAY ASIDE
2. REMOVE (1) SCREW FROM EXHAUST TUBE
3. DISCONNECT WIRES FOR COMBUSTION AIR MOTOR
4. PULL OUTWARD TO ALLOW REMOVAL
5. REMOVE FOUR (4) NUTS AND REMOVE COMBUSTION AIR BLOWER ASSEMBLY

# ROOM AIR MOTOR REMOVAL

1. REMOVE TOP PANEL SCREWS
  - a. Lay panel aside
2. DISCONNECT ALL WIRES FOR MOTOR AND PUSH ASIDE
3. REMOVE 2 SCREWS THAT SECURE BLOWER HOUSING TO UNIT
  - a. Pull blower housing out of unit
  - b. Set housing aside
4. LOOSE SET SCREW ON BLOWER WHEEL
5. LOOSEN BELLY BAND CLAMP
6. REMOVE MOTOR

**NOTE:** Reverse steps to replace motor, spin wheel to assure no rubs

# ROOM AIR BLOWER WHEEL

1. SAME STEPS AS ABOVE
2. REMOVE CUT OFF FROM HOUSING
3. REMOVE WHEEL
4. REVERSE STEPS

**NOTE:** Spin wheel to assure no rub

# WARRANTY INFORMATION

## **AREAS OF RESPONSIBILITY FOR WARRANTY**

It is the qualified service contractor's responsibility to determine if the product they are servicing is under warranty.

It is the equipment owner's responsibility to provide the qualified service contractor with proof that the equipment is under warranty.

It is the SUBURBAN Direct Sales Representative's (hereafter referred to as the S.D.S.R.) Responsibility to administer the warranty, provide an adequate inventory of parts to supply the qualified service company and make warranty payments and credits within the time frame agreed upon between the S.D.S.R. and service company.

It is SUBURBAN Manufacturing Company's responsibility to provide assistance to qualified service contractors having difficulty diagnosing problems, and provide timely approval of warranty claims.

## **WHEN DOES THE WARRANTY START?**

**REPLACEMENT UNIT** - The date established by the authorized S.D.S.R. at the time of the equipment start-up; **OR**, the date the equipment is first set, connected and wired in a manner to operate.

**NEW CONSTRUCTION** - The date established by the authorized S.D.S.R. at the time of the equipment start-up; **OR**, a dated copy of the installing contractor's invoice describing the model. (See Start-Up Report).

In the case of condominiums and co-operatives, SUBURBAN allows (at no additional charge) a grace period of **up to one year** to allow the developer to sell the condominium or co-operative apartment.

The S.D.S.R. **must** submit a written request for a delayed warranty start to SUBURBAN Manufacturing Company at the time the equipment is ordered.

In these cases, the warranty start date will be the closing date on the sale of the condo or co-op, or the first anniversary of the temporary or permanent Certificate of Occupancy.

**In no case shall the warranty start date exceed 12 months from the date the equipment is set and connected in a manner to operate.**

When an equipment owner cannot or will not provide the necessary information to determine the warranty start date, SUBURBAN will consider the warranty to begin on the date the equipment was shipped by SUBURBAN or our S.D.S.R.

## **WHAT DOES THE WARRANTY COVER?**

See the product warranties that are part of this manual or printed on the back page of the "Installation and Operating Manual" that is included with each unit.

The warranty covers replacement of defective parts and a labor allowance to cover the cost of diagnosis, part removal, part replacement and testing. For details, see the warranty and labor allowance schedules that are part of this manual.

## **WHAT IS NOT COVERED?**

See the "**LIMITATION OF WARRANTIES**" and "**SUBURBAN WILL NOT BE RESPONSIBLE FOR:**" sections of the warranty. These two sections are not all inclusive and any question of warrantability should be addressed to SUBURBAN **prior** to service being performed.

**IF THE PROBLEM IS A DIRECT RESULT OF IMPROPER INSTALLATION, IMPROPER SET-UP, OR IS A PART OF NORMAL CUSTOMER MAINTENANCE OR ADJUSTMENT, SUBURBAN WILL NOT BE RESPONSIBLE FOR ANY SERVICE EXPENSE. SERVICE WORK PERFORMED THAT CANNOT BE ATTRIBUTED TO DEFECTS IN MATERIAL AND SUBURBAN FACTORY WORKMANSHIP MUST NOT BE BILLED TO SUBURBAN OR OUR S.D.S.R. IN CASES WHERE SUBURBAN IS NOT LIABLE FOR THE SERVICE WORK, THE RESPONSIBLE PARTY SHOULD BE CONTACTED FOR PAYMENT OF YOUR SERVICES.**

# WARRANTY INFORMATION

## WHAT IF NO PARTS ARE USED IN THE WARRANTY REPAIR?

Contact the SUBURBAN Service Department immediately at (423) 775-2131, Ext. 7102 and explain the situation and associated costs. If the Service Manager accepts your claim, he will issue you an authorization number that **must** be included on your invoice.

No labor will be paid for field repair of component parts such as motors, module boards, gas valves, etc., which are considered non-repairable parts.

## HOW TO CLAIM WARRANTY LABOR REIMBURSEMENT

The qualified service agency **must** provide the following complete information to be eligible for labor reimbursement.

The following information is required:

1. Customer's name, business, address and phone number.
2. Model number and serial number of each unit serviced.
3. Date of service.
4. Warranty start date.
5. Description of problem.
6. Description of repair, including part number replaced.
7. Invoice amount from the flat rate scale.
8. Warranty part tag number or repair authorization number. (Attach the warranty part tag to each part, complete with model and serial number of each appliance and the reason for the part exchange. The warranty tag is a four part tag. The top white copy is to be attached to the warranty claim form, the green copy is yours, the service company keeps the yellow copy, and the hard copy remains attached to the part.)
9. Warranty claims should be submitted within **90 days** of repair.

Present your invoice to your S.D.S.R. for payment. If any of the above information is not clearly stated, the S.D.S.R. may refuse payment. If the invoiced amount is not within the allowable warranty service limits, the S.D.S.R. may refuse payment or delay payment until authorization is received from SUBURBAN.

# WARRANTY INFORMATION

## **HOW TO OBTAIN REPLACEMENT WARRANTY PARTS**

To repair the unit, use a part from your service inventory. If you use parts from your inventory, you must turn in the defective part to your S.D.S.R.; **OR** take the part to your S.D.S.R. and exchange it for a new part.

***(NOTE: SUBURBAN'S warranty does not allow for time chasing parts or removing and replacing parts from a spare chassis. Be sure you discuss spare parts availability with the S.D.S.R. when you accept the responsibility of warranty service contractor. Poor parts availability will effect the down time to which the equipment owner will be subject, and they may want to purchase a spare chassis or parts inventory.)***

Return **ALL** defective parts to your S.D.S.R. to be replaced, refunded or invoice credited. **(NOTE: Parts with physical damage may not be accepted; handle carefully.)**

Warranty part tags are available from your S.D.S.R. If you are filing for a labor claim, you should reference the part tag number on your invoice. A warranty part tag or a repair authorization number **must** be listed on all labor claims. (See "WHAT IF NO PARTS ARE USED IN THE WARRANTY REPAIR?", Page 3.)

**IF YOU ARE ASKED TO PERFORM WARRANTY SERVICE THAT IS NOT COVERED BY THE FLAT RATE LABOR SCHEDULE, OR HAVE SPECIAL CIRCUMSTANCES, CONTACT YOUR S.D.S.R. PRIOR TO STARTING THE WORK. AT THAT TIME, PROVIDE AN EXPLANATION OF THE WORK TO BE PERFORMED, PROVIDE A QUOTE AND ASK FOR A SUBURBAN WARRANTY AUTHORIZATION NUMBER.**

## **HOW LONG ARE REPLACEMENT PARTS WARRANTED?**

Replacement parts are warrantied for 90 days or the remainder of the original equipment warranty, whichever covers the longest period of time.

**PARTS REMOVED FOR WARRANTY SERVICE MUST BE RETURNED TO THE AUTHORIZED S.D.S.R. WITH YOUR LABOR CLAIM. IF REPAIR IS NOT LISTED, CONTACT YOUR S.D.S.R. WITH A QUOTE AND REQUEST AUTHORIZATION TO REPAIR.**

**S.D.S.R. DISPOSITION OF IN-WARRANTY SERVICE PARTS:** Your qualified service companies who perform warranty work should return all in-warranty parts, with completed warranty tags attached, for your review and disposition. **Effective September 1, 1999, the following five parts will be required to be returned to the factory. The parts that must be returned are module boards, gas valves, compressors, motors, and combustion chambers.** All other items should be held at your location and can be scrapped in 30 days, unless you are notified to return them.

# WARRANTY FLAT RATE SERVICE SCHEDULE

Only ONE service call/trip charge will be paid per location although multiple units may be serviced.

If the repair is not listed, contact Suburban Technical Service Department at 423-775-2131, extension 7102 for authorization to repair and to establish a flat rate time. If your actual time exceeds the time listed below to perform the repair, please contact the Suburban Technical Service Department.

**NOTE:** If there is not a factory approval of this additional time, flat rate time will be used to calculate labor reimbursement.

PARTS REPLACED	FLAT RATE TIME
	Hours
Room Air Motor	.70
Room Air Motor Wheel	.50
Compressor/ Room Air /Condenser Fan Motor Capacitor	.30
Combustion Air Motor Assembly	.50
Gas Valve	.50
Burner	.50
Transformer	.40
Pressure Switch	.30
Combustion Chamber Assembly	1.50
Compressor Contactor	.40
Flame Probe	.25
Condenser Fan Motor	.80
Condenser Motor Fan Blade	.40
Compressor	2.50
Condenser Coil	1.50
Evaporator Coil	2.00
Limit Switch / Blower/ High/ Rollout	.25
Module Board	.40
Ignitor	.25
Expansion Valve	1.50

The following parts are required to be returned for warranty consideration module boards, gas valves, compressors, motors and combustion chambers. Return to the Authorized Direct Sales Representative with the labor claim form.



# SUBURBAN LIMITED WARRANTY DYNAPACK

## ONE YEAR LIMITED WARRANTY

This SUBURBAN product is warranted to the original purchaser to be free from defects in material and workmanship under normal use and maintenance for a period of one year from the date of installation whether or not actual use begins on that date. It is the responsibility of the consumer/owner to establish the warranty period. Suburban does not use warranty registration cards for its standard warranty. You are required to furnish proof of installation date which may be a Bill of Sale or other payment records which verifies the original installation. A new or remanufactured part to replace any defective part will be provided to your dealer, service agency or local gas company, at Suburban's sole option, without charge for the part itself, FOB the shipping point. THE EXCHANGED PART WILL BE WARRANTED FOR ONLY THE UNEXPIRED PORTION OF THE ORIGINAL WARRANTY. Defective parts must be returned to Suburban, transportation charges prepaid (Suburban is not responsible for any freight charges), where Suburban will establish to its sole satisfaction that the part was or became defective under normal use and maintenance. Said first year repairs, made by a recommended Suburban service agency, will qualify for labor reimbursement (to the service agency only) up to a maximum as established by Suburban's flat rate schedule effective at that time. No reimbursement will be made for transportation, diagnosing, shipping or handling. THIS WARRANTY APPLIES ONLY TO THE PRODUCT IN ITS ORIGINAL INSTALLATION LOCATION AND IS VOIDED IF THE PRODUCT IS REINSTALLED ELSEWHERE.

## FOUR YEAR LIMITED WARRANTY ON HEAT EXCHANGER AND COMPRESSOR

During the second through fifth years after the date of original installation, Suburban further warrants the heat exchanger against defects in material and workmanship under normal use and maintenance. A replacement heat exchanger will be provided under the same conditions as stated in the one year warranty EXCEPT no labor reimbursement will be provided.

During the second through fifth years after the date of original installation, Suburban further warrants the compressor against defects in material or workmanship under normal use and maintenance. A new or re-manufactured compressor will be provided at Suburban's sole option under the same conditions as stated in the one year warranty EXCEPT no labor reimbursement will be provided.

## LIMITATION OF WARRANTIES

ALL IMPLIED WARRANTIES (INCLUDING IMPLIED WARRANTIES OF MERCHANTABILITY) ARE HEREBY LIMITED IN DURATION TO THE PERIOD FOR WHICH EACH LIMITED WARRANTY IS GIVEN. SOME STATES DO NOT ALLOW LIMITATIONS ON HOW LONG AN IMPLIED WARRANTY LASTS SO THE ABOVE LIMITATIONS MAY NOT APPLY TO YOU. THE EXPRESSED WARRANTIES MADE IN THIS WARRANTY ARE EXCLUSIVE AND MAY NOT BE ALTERED, ENLARGED, OR CHANGED BY ANY DISTRIBUTOR, DEALER OR OTHER PERSON WHOMSOEVER.

ALL WORK UNDER THE TERMS OF THIS WARRANTY SHALL BE PERFORMED DURING NORMAL WORKING HOURS. ALL REPLACEMENT PARTS ASSUME AS THEIR WARRANTY PERIOD ONLY THE REMAINING TIME PERIOD OF THIS WARRANTY.

## SUBURBAN WILL NOT BE RESPONSIBLE FOR:

1. Normal maintenance as outlined in the owner's installation, operating and service instructions manual including cleaning of component parts; such as, orifices and burners.
2. Failure to start and/or operate due to voltage or gas conditions, blown fuses, open circuit breakers, loose or disconnected wires, low gas pressure or other damages due to inadequacy or interruption or electrical service or gas supply.
3. Damage or repairs required as a consequence of faulty or incorrect installation not in conformance with Suburban instructions.
4. Damage as a result of floods, winds, lightning, accidents, corrosive atmosphere or other conditions beyond the control of Suburban.
5. Costs incurred in gaining access to the furnace.
6. Parts or accessories not supplied by Suburban.
7. Damage or repairs needed as a consequence of any misapplication, abuse, unreasonable use, unauthorized alteration, improper service, improper operation or failure to provide reasonable and necessary maintenance.
8. Freight charges incurred from parts replacements.
9. Fuel or electricity costs or increases in such costs from any reason whatsoever.
10. Suburban products whose serial number has been altered, defaced or removed.
11. Suburban products installed or warranty claims originating outside the Continental U.S.A., Alaska, Hawaii and Canada.
12. ANY SPECIAL, INDIRECT OR CONSEQUENTIAL PROPERTY, ECONOMIC OR COMMERCIAL DAMAGE OF ANY NATURE WHATSOEVER.

Some states do not allow the exclusion of incidental or consequential damages, so the above limitation may not apply to you.

NO REPRESENTATIVE, DEALER OR OTHER PERSON IS AUTHORIZED TO ASSUME FOR SUBURBAN MANUFACTURING COMPANY ANY ADDITIONAL, DIFFERENT OR OTHER LIABILITY IN CONNECTION WITH THE SALE OF THIS SUBURBAN PRODUCT.

This warranty gives you specific legal rights, and you may also have other rights which vary from state to state.

## IF YOU HAVE A PRODUCT PROBLEM

### FIRST:

Contact the installer of the equipment or the selling dealer for warranty service. You may find his name on the product or with your homeowners manual. If his name is not known, call your builder or general contractor if yours is a new structure.

### SECOND:

Contact the Suburban distributor who supplied the product to the installer/dealer.

### THIRD:

Contact: Suburban Manufacturing Company  
Customer Service Department  
676 Broadway Street  
Dayton, Tennessee 37321  
(423) 775-2131, Ext. 7101  
Fax: (423) 775-7015  
www.suburbanmanufacturing.com





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