PERFORMANCE DATA NO LOAD & NO DOOR OPENINGS AT 37°/0° CONTROL SETTING

Type A with Run / Start Capacitor	65°F (18°C) Ambient	90°F (32°C) Ambient
Operating Time	70 to 90%	90 to 100%
Freezer Temperature	-6° to 6°F (-21° to -14°C)	-6° to 6°F (-21° to -14°C)
Refrigerator Temperature	34° to 44°F (1° to 7°C)	34° to 44°F (1° to 7°C)
VCZ Temperature	-6° to 45°F -21° to 7°C	-6° to 45°F -21° to 7°C
Low Side Pressure	-1 to 3 psig (98 to 124 kPa)	.8 to 3 psig (107 to 120 kPa)
High Side Pressure (last 1/3 cycle)	69 to 83 psig (577 to 672 kPa)	117 to 128 psig (907 to 982 kPa)
Wattage (last 1/3 cycle)	45 to 55	54 to 74
Amps (running)	.7 to .9	.8 to 1.1
Base Voltage	115 vac (127 vac max)	

DEFROST SPECIFICATIONS

Cabinet Size:		Thermal Cutout	Heater		Defrost Thermistor Termination
		Cut-out	Watts	Ohms	Cut-out
22' CD	Freezer	162°F (72.2°C)	258 +/- 5	51.3 +/- 5	48°F (8°C)
	Fresh Food				38°F (3°C)
	Fresh Food Ice Maker	162°F (72.2°C)	70 +/- 5	189 +/- 5	61°F (16°C)

Electronic Timer - (ADC) Defrost 34 minutes every 12-96 hours of compressor run time.

CONDENSER FAN MOTOR

Watts		RPM		Amps
.75	1.25	1100 ± 100	40 L/S	
Nominal Input Power (W) @ 80% Duty	Max Input Power (W)	Speed (R/Min) *@80% Duty @ 100%	Air Flow in Free Air (0 Pa)	.104 A Max (@12V DC/20°C)

ERROR CODES / SPECIAL MODES

Display		Interpretation	Mode	Display			Activate	Deactivate
FZ	FF			FZ	FF	Other		
Er	t1	Fzr Temp Sensor Open/Shorted	Manual Defrost	d	F		Fz + (^) and FF + (^) for 10 secs	Any Key
Er	t2	Fzr Defrost Sensor Open/Shorted	Demo / Showroom			Demo Light On	Fz + (^) and FF - (v) for 10 secs	Fz + (^) and FF - (v) for 10 secs
Er	t3	FF Temp Sensor Open/Shorted	Sabbath	Sb	Sb		Fz - (v) and FF + (^) for 5 secs	Fz - (v) and FF + (^) for 5 secs
Er	t4	FF Defrost Sensor Open/Shorted	System Diagnostics			All LEDs Lit	Fz + (^) and Fz- (v) for 10 secs	Fz + (^) and Fz- (v) for 10 secs
Er	t5	VCZ Temp Sensor Open/Shorted	°F/°C Display			°F or °C	FF + (^) and FF - (v) for 5 secs	FF + (^) and FF - (v) for 5 secs
Er	t6	Ice Maker Tray Sensor Open/Shorted	Sleep Mode			Display always on	"Crush" and "Light" keys for 5 secs	"Crush" and "Light" keys for 5 secs
Er	CE	Communication Error UI to Main Board	**Notes:** Always check for pin back-outs, pinched or damaged wires before replacing components. Determine whether failure is caused by the component, main control board or wiring. **Contact TID before replacing main control board.** Refer to Service Manual for additional information.					
dl	SP	Chute Flapper Not Closed						

FRESH FOOD ICE MAKER FILL TIME ADJUSTMENT MODE

NOTE: First consider water filter condition before adjusting fill time.

Activate:	Press Cube and Crush keys for 10 secs. Press FZ + (^) or - (v) key to adjust (1-4).
Deactivate:	Resets to Normal Operation after 10 secs

Setting #	Pressure Condition	Fill Time
1	Normal-High	3.9 seconds
2	Low	4.6 seconds
3	Very Low	5.8 seconds
4	Extremely Low	7.5 seconds

SERVICE DATA SHEET

A15500203

ICE & WATER - AUTOMATIC DEFROST
BOTTOM FREEZER - R134a

IMPORTANT: PLEASE RETURN THIS SHEET TO ITS ORIGINAL LOCATION.

SYSTEM DIAGNOSTIC MODE

Activate:	Press FZ + (^) and FZ- (v) for 10 secs
Deactivate:	Press FZ + (^) and FZ- (v) for 10 secs

FZ Display	Test	Activation/ Deactivation	FF Display	Passing result
--	First Screen			All LEDs on UI illuminated.
--	Second Screen	--		Blank UI display, no LEDs illuminated.
2	Freezer Defrost Heater	Press Cube button	on, oF, Temperature	Freezer Defrost Sensor Temp displayed in FF display. Increase in temp should be noticed.
8	Main Water Valve	Press Cube button	on, oF	"on" when on and "oF" when off. ***Valve will not shut off automatically. Test has to be turned off with Cube button.
11	Cube/Crush Solenoid	Press Cube button	on, oF	FF display shows "on" when on and "oF" when off. Cube solenoid will activate. Do not leave on for more than 1 minute.
53	Dispenser Water Valve	Press Cube button	on, oF	"on" when on and "oF" when off. ***Valve will not shut off automatically. Test has to be turned off with Cube button.
56	Ice Maker Water Valve	Press Cube button	on, oF	"on" when on and "oF" when off. ***Valve will not shut off automatically. Test has to be turned off with Cube button.
71	Fresh Food Defrost Heater	Press Cube button	on, oF, Temperature	Fresh Food Defrost Sensor Temp displayed in FF display. Increase in temp should be noticed.
72	Fresh Food IM Defrost Heater	Press Cube button	on, oF, Temperature	Fresh Food IM Defrost Sensor Temp displayed in FF display. Increase in temp should be noticed.
74	VCZ Balance Heater	Press Cube button	on, oF	"on" when on and "oF" when off. Maximum run time of 5 minutes for this test.
79	Fill Tube Heater	Press Cube button	on, oF	"on" when on and "oF" when off. Maximum run time of 5 minutes for this test.
10	Auger Motor	Press Cube button	on, oF	"on" when on and "oF" when off.
13	Fresh Food Light	Press Cube button	on, oF	"on" when on and "oF" when off. Open Door to check status of light.
14	VCZ Light	Press Cube button	on, oF	"on" when on and "oF" when off. Open Door to check status of light.
15	Freezer Evaporator Fan	Press Cube button	on, Mi, oF	Fan runs at 3 speeds: Max speed when "on", medium speed when "Mi", and stopped when "oF".
17	VCZ Fan	Press Cube button	on, Mi, oF	Fan runs at 3 speeds: Max speed when "on", medium speed when "Mi", and stopped when "oF".
18	Condenser Fan	Press Cube button	on, Mi, oF	Fan runs at 3 speeds: Max speed when "on", medium speed when "Mi", and stopped when "oF".
20	Freezer Light	Press Cube button	on, oF	"on" when on and "oF" when off. Open Door to check status of light.
38	VCC Compressor	Press Cube button	on, oF	"on" at full speed when on and "oF" when off.
47	Ice Chute Heater	Press Cube button	on, oF	"on" when on and "oF" when off.
62	Ice Maker Evap Fan	Press Cube button	on, oF	"on" when on and "oF" when off.
63	Flip Mullion Heater (DC)	Press Cube button	on, oF	"on" when on and "oF" when off.
66	Dispenser Light	Press Cube button	on, oF	"on" when on and "oF" when off.
70	Fresh Food Evap Fan	Press Cube button	on, Mi, oF	Fan runs at 3 speeds: Max speed when "on", medium speed when "Mi", and stopped when "oF".
76	VCZ Damper Heater	Press Cube button	on, oF	"on" when on and "oF" when off.
77	VCZ Damper	Press Cube button	OP, CL, Flashing "1"	When activated, the freezer evaporator fan will run at high speed. "OP" when damper is open. "CL" when damper is closed. "1" will flash when damper is moving.
36	Ice Chute Flapper Motor	Press Cube button	OP, CL, Flashing "1"	"OP" when chute door is open. "CL" when chute door is closed. "1" will flash when chute door is moving. "ER" will display if the door does not open or close.
50	Ice Maker Harvest Test	Press Cube button	"Go", Flashing "1"	Remove bucket to see rotation of tray. "Go" will be shown in the FF display when the tray is in the horizontal (home) position. A Flashing "1" will be displayed when the tray is moving. If an error is detected "ER" will be displayed.
78	Ice Maker Bail Arm Test	Press Cube button	"Em", Fu", Flashing "1"	Remove bucket to test. Allow bail arm to drop, "Em" will be displayed when tray returns to horizontal (home) position. Hold bail arm up/keep from dropping. "Fu" will be displayed when tray returns to horizontal (home) position. A Flashing "1" will be displayed when the tray is moving. "Er" will be displayed if an error is detected.
61	Stepper Motor Valve	Press Cube button	"03", "00", "01", "02", Flashing "1", Temperature	FF display will show the temperature of the corresponding evaporator defrost sensor. A drop in temperature should be noted. "03" is the OP postion. All evaporators should have refrigerant flow and the FF defrost sensor temp will be displayed. "00" is the CL position. The IM defrost sensor temperature will be shown in the FF display. Temperature should not drop—possibly increase. "01" is the IM/FZ evaporator position. The IM defrost sensor temperature will be shown in the FF display. A drop in temperature should be noted. "02" is the FF/IM/FZ evaporator position. The FF defrost sensor will be shown in the FF display. A drop in temperature should be noted. A flashing "1" will be shown in the FF display while the valve is moving from position to position.
23	Fresh Food Door Switch	Open/Close the Door	"CL", "OP"	When the FF door is opened, an "OP" will be shown in the FF display. When the FF door is closed, a "CL" will be showin in the FF display.
24	Freezer Drawer Switch	Open/Close the Door	"CL", "OP"	When the FF door is opened, an "OP" will be shown in the FF display. When the FF door is closed, a "CL" will be showin in the FF display.
25	VCZ Drawer Switch	Open/Close the Door	"CL", "OP"	When the FF door is opened, an "OP" will be shown in the FF display. When the FF door is closed, a "CL" will be showin in the FF display.
28	Dispenser Paddle	Press the Dispenser Paddle	on, oF	When the paddle is pressed, "on" will be displayed in the FF display. When the paddle is released, or not pressed, "oF" will be displayed in the FF display.
29	Fresh Food Sensor	--	current temperature, "OP", "SH"	No activation needed. FF display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
30	Freezer Sensor	--	current temperature, "OP", "SH"	No activation needed. FF display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
31	Fresh Food Defrost Sensor	--	current temperature, "OP", "SH"	No activation needed. Fresh food display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
32	VCZ Sensor	--	current temperature, "OP", "SH"	No activation needed. FF display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
33	Ambient Temp Sensor	--	current temperature, "OP", "SH"	No activation needed. FF display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
39	Freezer Defrost Sensor	--	current temperature, "OP", "SH"	No activation needed. FF display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
45	Ice Maker Tray Sensor	--	current temperature, "OP", "SH"	No activation needed. FF display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
68	Ice Maker Defrost Sensor	--	current temperature, "OP", "SH"	No activation needed. FF display will show current sensor temperature. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
64	Humidity Sensor	--	current humidity, "OP", "SH"	No activation needed. FF display will show current relative humidity as a percentage. "OP" will show if the sensor is open. "SH" will show if the sensor is shorted.
--	No Test	--		
a-	Main Board Software Paramters	--	software revision digits	The current software revision will be shown simultaneously on both displays. For example: 0049953C will be shown as 0-0, 0-0, 4-4, 9-9, 9-9, 5-5, 3-3, C-C (FZ-FF).
b-	Main Board Firmware Version	--	firmware revision digits	The current firmware revision will be shown simultaneously on both displays. For example: JHB10G00 will be shown as J-J, H-H, B-B, 1-1, 0-0, G-G, 0-0, 0-0 (FZ-FF).
c-	Dispenser UI Firmware Version	--	firmware revision digits	The current firmware revision will be shown simultaneously on both displays. For example: LHFE0700 will be shown as L-L, H-H, F-F, E-E, 0-0, 7-7, 0-0, 0-0 (FZ-FF).
d-	VCZ UI Firmware Version	--	firmware revision digits	The current firmware revision will be shown simultaneously on both displays. For example: MHFE0600 will be shown as M-M, H-H, F-F, E-E, 0-0, 6-6, 0-0, 0-0 (FZ-FF).
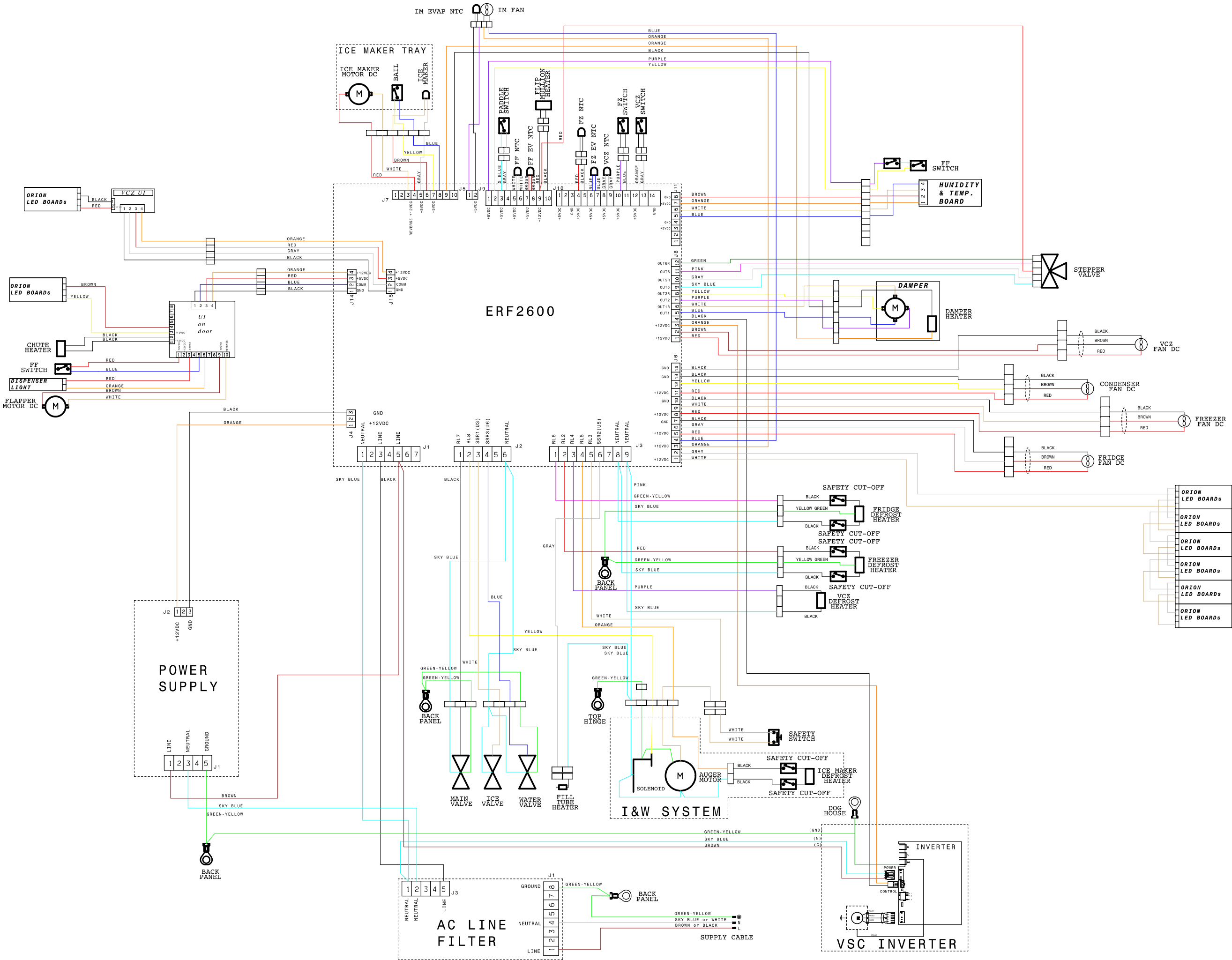
Wire Diagram A07488502 F