

# EL2KELEC Mach 3 Hot Sheet

## Balboa Instruments System PN 54670

System Model # E2P-EL2KELEC-YCAH

Software Version # 30

EPN # 2472

Base PCBA – PN 55313

PCB EL2000 – PN 22896 Rev B

HEX File – 10011430

Base Panels

ML900 – PN 52654

**ML700 – PN 52649**

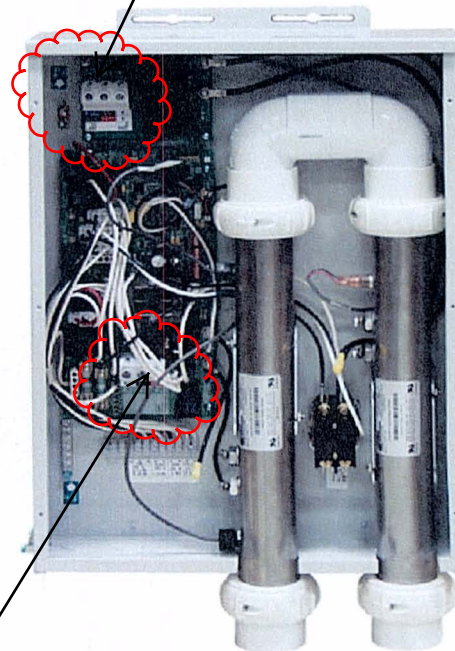
ML400 – PN 52684

### System live amp draw test:

1. low pump 1 and 5,5 heater - 24 amps
2. Pump 1- hi speed w/heater 5.5
3. Pump 1 hi speed and pump 2 with 5.5 heater 38 amps

Terminal Block A -  
requires 4 wire 60A  
service for the  
control pack, pumps  
and primary 5.5KW  
heater.

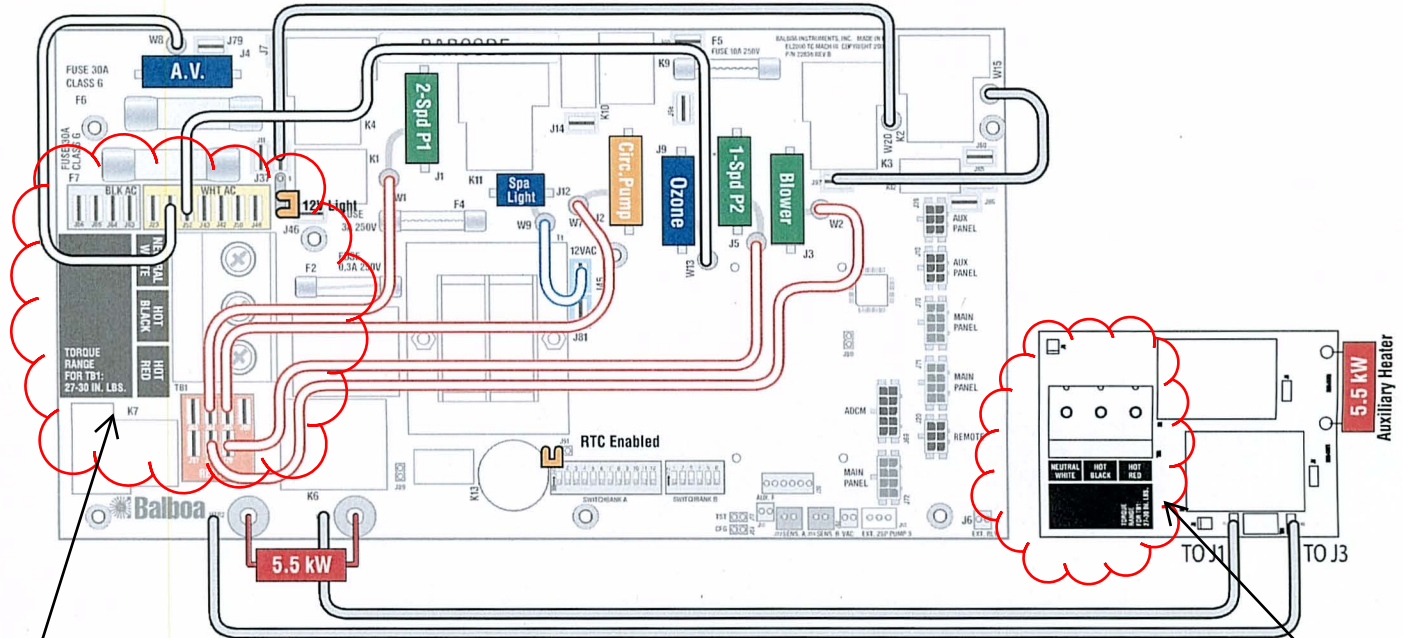
Terminal Block B -  
requires 4 wire 30A  
service for the  
secondary 5.5KW  
heater



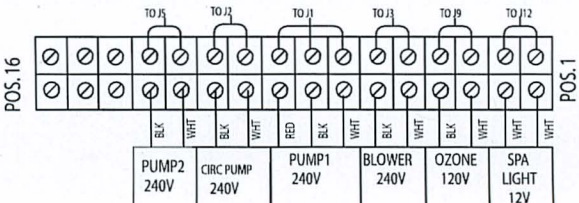
# Wiring Configuration and DIP Settings

## Setup 1 (As Manufactured)

- 240V Pump 1, 2-Speed
- 240V Pump 2, 1-Speed
- 240V Blower, 1-Speed
- 240V Circ Pump (Optional)
- 12V Spa Light
- 120V Ozone
- 120V AW (Stereo)
- 240V 5.5kW Heater
- 240V 5.5kW Auxiliary Heater
- ML900 or ML700 Main Panel

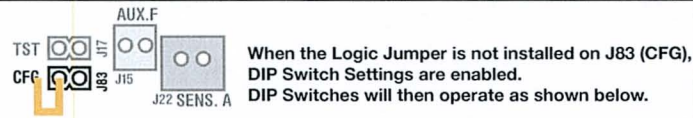


Terminal Block A - requires 4 wire 60A service for the control pack, pumps and primary 5.5KW heater

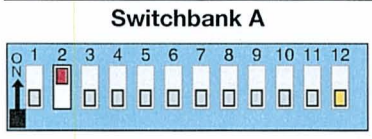


Terminal Block B - requires 4 wire 30A service for the secondary 5.5KW heater

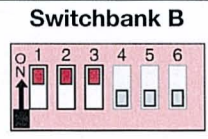
**WARNING:** Main Power to system should be turned OFF BEFORE adjusting DIP switches.  
**WARNING:** Persistent Memory (A12) must be RESET to allow new DIP switch settings to take effect. (See Persistent Memory page)



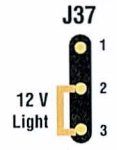
SSID #
100
114
30



- A1, Test Mode OFF
- A2, High Amp
- A3, Filter by Time
- A4, 12 Hr Time
- A5, Degrees F
- A6, Short Timeouts
- A7, Cleanup Cycle OFF
- A8, 1Hr O<sub>3</sub> Supress OFF
- A9/A10, No Circ Pump
- A11, O<sub>3</sub> w/ P1 Low and P1 is 2-Spd
- A12, Memory Retained



- B1, Pump 2 1-Speed
- B2, Pump 2 Enabled
- B3, Blower Enabled
- B4, No Fiber/Wheel
- B5, Pump 3 Disabled
- B6, Panel Scrunching OFF



**Wiring Color Key**

- 120 Volt Connections
- 240 Volt Connections
- Black AC Jumpers
- 12 Volt Connections
- Relay Control Wires

**Board Connector Key**

- 1 Typically Line voltage
- 2 Typically Line voltage for 2-speed pumps
- 3 Neutral (Common)
- 4 Ground

Note flat sides in connector

ON= Ozone in low speed

# Panel Configurations

Note: RTC jumper (J91) on Main PCBA must be OFF (1 pin only)

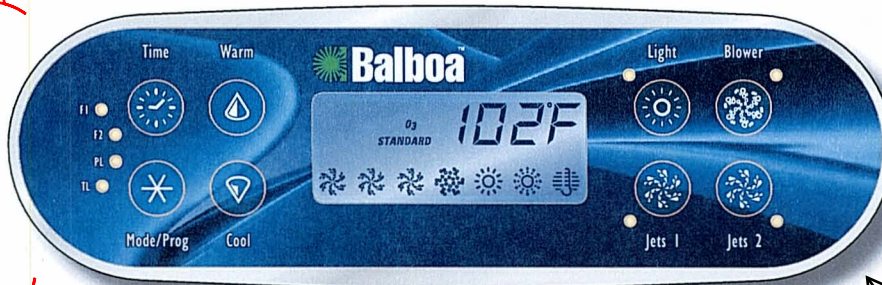


**TIME CAPABLE**

ML900

PN 52654 with Overlay PN 40026

- Connects to Main Panel terminal J70, J71, or J72



ML700

PN 52649 with Overlay PN 11281

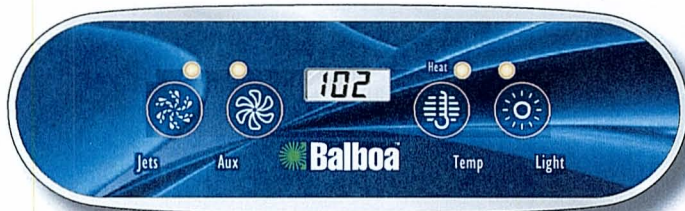
- Connects to Main Panel terminal J70, J71, or J72

Topside control panel

Note: Connects to Main Panel terminal J70, J71, or J72

Note: RTC Jumper (J91) on Main PCBA must be ON (both pins jumpered), unless a Time Capable panel is also used.

**NON-TIME CAPABLE**



ML400

PN 52684 with Overlay PN 11345

Terminal Block B -  
requires 4 wire 30A GFCI  
service for the secondary  
5.5KW heater

Terminal Block A -  
requires 4 wire 60A  
GFCI service for the  
control pack, pumps and  
primary 5.5KW heater