

24" Front Load Washer—Technical Information

MAH2400A*

- Due to possibility of personal injury or property damage, always contact an authorized technician for servicing or repair of this unit.
- Refer to Service Manual 16023430 for detailed installation, operating, testing, troubleshooting, and disassembly instructions.



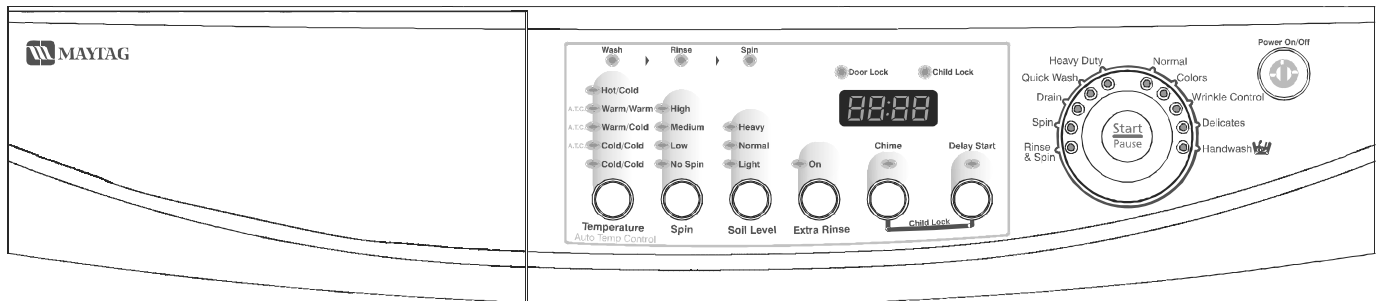
CAUTION

All safety information must be followed as provided in Service Manual 16023430.



WARNING

To avoid risk of electrical shock, personal injury or death; disconnect power to washer before servicing, unless testing requires power.



FEATURES	MAH2400AW
Controls	LED
Time Remaining Indicator	•
Start/Pause Pad	•
Wash tub	Stainless Steel
Capacity	2.4 Cu.Ft.
Baffles	3
Speed Combinations	Infinite
TumbleClean™ Wash System	•
Speed/Fabric Program	
Normal Wash Cycle	•
Wrinkle Control Cycle	•
Delicates Wash Cycle	•
Handwash Cycle	•
Rinse & Spin Cycle	•
Quick Wash Cycle	•
Heavy Duty Wash Cycle	•
Delay Start Option	19 Hours
Extra Rinse Option	•
End-of-Cycle Chime	On/Off
Child Lock Option	•
Water Level Control	IntelliFill™
Water Temperature Combinations	5
ATC (Energy Star®)	Cold = 65° / Warm = 105°
Soil Level Selections	Heavy/Normal/Light

Automatic Detergent Dispenser	Timed
Automatic Bleach Dispenser	Timed
Automatic Fabric Softener Dispenser	Timed
Self Cleaning Lint Removal	System
Suspension	2 Springs + Struts
Top	Laminate
Cabinet	Tri-Coat
Spin Speeds	
High	1200
Medium	800
Low	600
No Spin	0
Colors	W

DIMENSIONS

Width	23.75 in.
Height	33.5 in.
Depth	25.2 in.
Depth With Door Open 90°	41.25 in.

Troubleshooting Procedures



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Will Not Start

- Plug cord into live electrical outlet. Check for proper voltage.
- Check fuse or reset circuit breaker.
- Push the **Start/Pause** button to start the clothes washer.
- Close door and push the **Start/Pause** button to start the clothes washer. **Wash>Rinse>Spin** indicator LED should change from flashing (paused) to 'ON' continuously.
- Check to see if the washer is in a pause or soak period in the cycle. Wait briefly and it may start.
- Check for restricted drain system.
- Check the line filter connection terminals for good connections.
- Check the machine control board terminal connections CN7 and CN5 for good connections.
- Check for stuck buttons on console, pushing in on board tact switches. Readjust buttons on inside of console.
- Replace machine control board.

Leaking

- Make sure inlet hose connections are not leaking. Check for rubber gasket damage due to over-tightening.
- Check standpipe for leak. Wrap a dry rag around the standpipe opening. If rag becomes wet, leak is fault of home plumbing. Be sure the standpipe is capable of accepting the flow of water from the washer.
- Make sure end of drain hose is correctly inserted and secured to drain standpipe.
- Check internal hose connections (fill, drain systems, dispenser hoses & clamps).
- Check rubber boot. Remove, reposition and reinstall, if necessary.
- Check for possible kinked dispenser to outer tub hose.
- Hot water pressurization may force door open.

No Tumble

- Start normal cycle with an empty machine and allow a fill to check tumble.
- Fabric cycles such as NORMAL, DELICATES, HAND WASH, & WRINKLE CONTROL only tumble periodically, every 60 seconds.
- Washer does not tumble during most fills or during presoak.
- Perform **Board Output Test**.
- Check for loose connections at machine control board, pressure switch, motor, tach harness and motor control.
- Check motor windings resistance. (Pins 8 & 9 = 3.6 ohms, pins 1 & 10 = 1.1 ohms, Pins 5 & 10 = 1.1 ohms)

- Check belt.
- Washer with heat option does not tumble while heating. (Export washers only)

Will Not Spin

- Check to make sure the door is fully closed.
- Check for water left inside the washer. If present, see **Will Not Drain**.
- Perform **Board Output Test**. Will washer spin? Possible unbalanced load scenario previously.
- Check for loose connections at machine control board, pressure switch, motor, tach harness and motor control.
- Check belt.

No Water Fill

- Test water fill. Perform **Board Output Test**.
- Check to make sure water supply is turned on fully.
- With no clothes in washer normal water level is between the 4th and 5th hole on the spinner back wall.
- Check electrical circuit and connections at the water valve, and pressure switch.
- Check for kinks in inlet hoses.
- Check for clogged inlet screens.
- Visually check hot and cold separately for fill.
- Check for low water pressure. May be dependent on pressure entering home. Variations may occur due to usage in the home at the time machine is used.
- Check for frozen pipes and hoses.
- Check resistance of water valve coils. (normal 1.18K ohms; CN3 connector – Cold (BU) – Bleach (OR) – Hot (RD))
- Check for loose connections at the pressure switch or on the machine control board, connector CN4.

Tub Full of Suds

- Check for restricted drain system. See **Will Not Drain** and **Will Not Spin**.
- Check for loose wire connections at control board and pump.
- Perform **Board Output Test**.
- Use high efficiency or low sudsing detergent specially formulated for front load washers.
- Reduce detergent amount for that specific load size and soil level. Towel loads have a minimal amount of soil present and typically create more suds.
- Check to see if belt is off motor and pulley.
- Run the clothes washer through another complete cycle using the coldest water, tablespoon of salt and no detergent.

Troubleshooting Procedures



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Wet Clothes

- Very small clothes loads can cause unbalanced loads. Add additional towels.
- Excessive suds may have been present, due to not using High-Efficiency detergent. Reduce amount of detergent usage.
- See **Will Not Spin**.
- "Low" **Spin Speed** was selected.

Will Not Lock

- Door not all the way closed or not properly aligned. Possible laundry load is too large to close door.
- Place washer into **Service Mode** and check for diagnostic codes 4 & 18.
- Perform **Board Output Test**. Check door lock system.
- Check electrical connections at lock switch assembly and machine control board (CN2).

Will Not Unlock

- Push door closed to make sure nothing from inside is pressing against it, which may keep it from unlocking.
- Display shows "**L0**". Press **Power Off**, **Start/Pause** or unplug washer. Door will unlock after 3 minutes.
- Door locked from water level too high. Opening door will result in water draining from door opening.
- Place washer into **Service Mode**.
- Perform **Board Output Test**. Check door lock system for loose connections.

Will Not Drain

- Check for restricted drain system.
- In cold climates check for frozen drain hose.
- Check for 120 VAC at the pump when a spin cycle is selected.
- Check pump motor winding resistance. (14.2 ohms)
- Check that the machine control correctly senses the water level in the washer. See **Board Input Test**.
- Go to **Board Output Test** and perform **Pump Out Test**.
- Check the machine control board connections at CN3 (Pin 1) for the pump. Should see 110-120VAC.
- Check tub to pump hose for twist in hose.

Wrong Water Temperature

- Check that both faucets are turned on fully.

- Make sure water heater is set to deliver a minimum of 120°F (49°C) hot water at the tap. Also check water heater capacity and recovery rate.
- If the water heater is located a long distance from washer, the water line may need to be purged prior to starting wash cycle.
- Too Hot/Too Cold: This washer uses a reduced amount of water, while the control board meters the incoming flow to regulate the actual temperature of the water in the tub. This may appear to be significantly warmer/cooler than expected.
- Make sure the temperature selection is correct.
- Disconnect inlet hoses from the Water Valve and clean the valve screens of any debris.

Noisy and/or Vibration/Walking

- Check if the washer was properly leveled and the locking nuts are securely tightened up against the base frame of the washer.
- Check and determine all five of the shipping bolts and spacers have been fully removed from the rear panel of the washer.
- Check for proper load size and distribution. If clothes load is too small, add a few towels to balance the clothes load better.
- Check the tightness of the rear pulley bolt. Tighten if necessary.
- Clean floor and bottom side of washer feet.

Rubber Feet Leaving Marks on Floor

- Use a pencil eraser to remove mark.
- Walk washer into location, do not drag.

Additive Cups Full of Water

- Small amount of water in bottom of additive cups is normal.
- Remove and wash Dispenser Tray, removable Cup, and Rinse Cap.
- Level washer.

Buttons do not Respond

- Options cannot be changed while cycle is running. Press **Start/Pause** once to pause cycle while making selections. Press **Start/Pause** again to restart washer.
- Child Lock feature has been selected. To disable feature press and hold **Chime** and **Delay Start** simultaneously until a beep is heard.
- When display shows "**End**", only the **Power Off** button will function. Press **Power Off** and make new cycle selections.

Troubleshooting Procedures



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Consumer Information Codes

If the consumer observes codes on display, see table below.

LED Display	Description
dc	Distribute Clothes: The load is unbalanced, preventing high-speed spin. Redistribute clothes. See Diagnostic Code 10.
nd	No Drain: The machine has tried to drain.
od	Open the Door: The door has not been opened for the last three completed cycles.
nF	No fill: the machine has tried to fill. See No Water Fill.
dL	Latch Unlocked: Close door tightly to enable locking.
LE	Water fill error. Go to fill test.
tE	Sump thermistor failure. Check for loose wires. Replace sump thermistor.
3E	Drive system is not working correctly. Bad windings, speed sensor, wiring connections, or Control Board.
LO	The door will not unlock after 3 attempts.
FL	The washer failed to lock the door after 3 attempts.
OE	A fault is detected in the water level sensor. Data (frequency) shows the water level is at or above the overflow level.

Service Mode

Service Mode enables service personnel to verify the operation of the washing machine and diagnose problems. Service Mode can be entered in the middle of any wash cycle without interrupting the cycle. While in Service Mode, the technician can cancel the current cycle, set a continuous running mode, start a variety of special service tests and view diagnostic displays.

Enter / Exit Service Mode

To enter Service Mode press the **Spin** and **Temperature** keys for three seconds or until the control beeps.

NOTE: The washer must be 'ON' before Service Mode can be entered.

The motor speed will be displayed when started (motor not running display will be 0). The present state of the machine will not be changed (i.e., the current cycle in progress will not be interrupted and only the display will change). All LED's will be turned 'OFF' except the "Door Lock" LED. It will continue to display the condition of the door lock.

To exit: 1) Press **Spin** and **Temperature** keys for 3 seconds again, or 2) press **Power Off**, or 3) unplug the machine. Pressing the **Start/Pause** button while running a test will pause the individual test, while remaining in Service Mode.

Access Service Tests and Diagnostic Features while in Service Mode.

The following table summarizes special tests and features available in Service Mode, along with methods of activation and cancellation.







Test or Display	Press LED to Start	Press LED to Cancel
Quick Spin Test	Press Delay Start and Temperature	Press Delay start and Temperature Press Power Off (exits Service Mode)
Hold Quick Spin Step (holds predefined RPM)	Press Start Pause (during test)	Press Delay Start and Temperature (cancels hold & resumes next step)

Troubleshooting Procedures

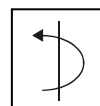


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Test or Display	Press LED to Start	Press LED to Cancel
 Fast Time-Down / Advance to Next Step	Press Spin to start test. Press Start/Pause during cycle to advance.	Press Spin
 Quick Service Cycle	Press Temperature and Soil Level	Press Power Off (also exits Service Mode)
Hold Quick Service Cycle Step	Press Delay Start and Chime together	Press Delay Start and Chime to resume
 LED/Switch Test	Press Delay Start (then individual buttons to test) Rotate Cycle Selector clockwise, the LED's around it will be toggled. Rotate counter clockwise, the 7-segment LED's toggle. Press Start/Pause button inside the "Rotary Cycle Selector, all of the LED's around the Rotary Cycle Selector will be toggled.	Press Power Off twice after starting test
 Board Input Test	Press Temperature	Press Temperature
 Board Output Test / System Check	Press Temperature and Extra Rinse	Press Temperature and Extra Rinse
 Diagnostic Code Display (Initial)	Press Chime – 1 st code displays	Press Chime again

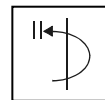
Test or Display	Press LED to Start	Press LED to Cancel
All Diagnostic Codes	Rotate Cycle Selector either direction	N/A
Cycle Count No. for Diagnostic Code	Press and hold Start/Pause in center of cycle selector knob, while diagnostic code is displayed	Release Start/Pause (returns to diagnostic code display)
Clear All Diagnostic Codes	Press Delay Start + Soil Level together while displaying diagnostic codes	
Display Software Version	Press Soil Level . Press 2 times for displays with only 2 character positions.	Press Soil Level a 3 rd time
Cycle Count	Press Extra Rinse	



Quick Spin Test

While in Service Mode, press **Delay Start** and **Temperature** keys to start a **Quick Spin** Test. Quick Spin test steps are as follows:

- 1) Lock the door.
- 2) Spin clockwise and stop.
- 3) Spin counterclockwise and stop.
- 4) Spin counterclockwise, start Drain Pump and spin to maximum RPM. Hold for 25 seconds.
- 5) Coast down, stop and turn 'OFF' Drain Pump.
- 6) Unlock Door after 60 seconds. Beeps once.



Hold Quick Spin Step

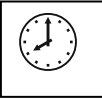
If the **Start Pause** key is pressed during the Quick Spin test, the machine will hold at the current speed for up to 10 minutes. At the end of 10 minutes, the machine will resume and finish the Quick Spin test. To cancel the Hold and allow the Spin Test to continue, press the **Delay Start** and **Temperature** keys.

Troubleshooting Procedures



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Fast Time Down Test

While any test or cycle is running in Service Mode, pressing the **Spin** key will start the fast time down test. Pressing the **Start/Pause** will advance the program to the next cycle stage.

Cycle stages are located at key locations in the machine operation. As the program is advanced it will index as follows: The end of each fill (the same as the beginning of a tumble session for Wash, or Rinse); at the beginning of a drain session; at the beginning of a spin session (at this position, check the water level, if over reset level, drain first before entering the spin function); at the beginning of a fill session; at the beginning of Bleach fill; at the beginning of Fabric Softener fill; and every 3 minutes during the tumble sessions (Wash, and Rinses).



Quick Service Cycle

While in Service Mode, pressing the **Temperature** and **Soil Level** key for 3 seconds will start a Quick Service Cycle.

This will be a quick check of all systems. If display shows **od** then open and close door. Pressing **Chime** will advance to the next cycle.

The following steps are performed: Display shows “**sc**”.

1. Lock door and pump starts.
2. Hot water for 5 seconds and then turn ‘OFF’.
3. Cold water for 5 seconds and then turn ‘OFF’.
4. Bleach valve for 5 seconds and then turn ‘OFF’.
5. Dispense softener using cold water and bleach water for 5 seconds and then turn ‘OFF’.
6. Turn ‘ON’ Hot and Cold valves until the control detects proper water level. During this time, tumble at 45 rpm for 5 seconds in a clockwise direction, pause for 2 seconds, tumble at 45 rpm for 5 seconds in a counterclockwise direction, pause for 2 seconds. Continue pattern until the water level is detected. Minimum time for this segment to be 5 seconds. After water height is achieved, continue tumble pattern for another 14 seconds. If the washer is equipped, turn ‘ON’ heater for first 5 seconds of this tumble pattern. Advance the washer to next step if water is not connected to machine.
7. Drain and spin to maximum speed. Machine will achieve maximum speed using the safest, fastest method.
8. Display a “**PA**” (Passed) continuously for 5 seconds if no diagnostic codes were logged during the test. Washer will return to the normal Service Mode at the end of the 10 second period.

9. Unlock the door when the RPM is zero.

The “**SC**” in the display will blink as an indication of failure, and continue blinking until the quick service cycle test has reached the end. Any diagnostic code logged during this test will result in failure of the test, but will not necessarily stop the test.

During the Quick Service Cycle, pressing the **Chime** key will advance to the next step. Pressing the **Delay Start** and **Chime** keys will suspend the machine at the current step for up to 30 minutes or until **Delay Start** and **Chime** are pressed again. All LEDs should flash ‘ON’ and ‘OFF’ while the system is suspended or on hold.



LED/Switch Test

While in Service Mode, press and hold the **Delay Start** key to start a LED/Switch check. All the LEDs can be toggled or slewed by pressing the key associated with the LED or set of LEDs. Each time the **Rotary Cycle Selector** is rotated clockwise, the LED’s around it will be toggled in a clockwise motion. If the **Rotary Cycle Selector** is rotated counter clockwise, the 7-segment LED’s toggle. If the **Start/Pause** button inside the Rotary Cycle Selector is pressed, all of the LED’s around the Rotary Cycle Selector will be toggled. All keys (including the **Power Off** button) must be pressed within 5 minutes for this test to pass. “**PA**” will be displayed for five (5) seconds once all keys have been pressed and the test is completed. Following 20 seconds of inactivity at any point, this test will exit without any display. The **Power Off** switch pad must be pressed twice within 30 seconds to cancel this test.

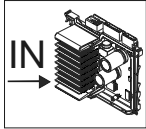
Switch	Action
Delay Start	Press once
Chime	Press once
Extra Rinse	Press once
Soil Level	Press 4 times
Spin	Press 5 times
Temperature	Press 6 times
Selector Knob	Rotate 1 full revolution clockwise
Selector Knob	1 position counterclockwise
Start Pause	Press once
Power Off	Press once

Troubleshooting Procedures



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Board Input Test

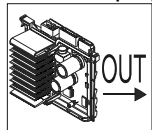
While in Service Mode, pressing the **Temperature** key will begin the **Board Input Test**. This test turns 'ON' a specified output after a key press. Pressing the

Temperature key again cancels the test. (Display shows **IN**).

While in Service Mode follow chart to check respective function.

Selection	Function	Display
Rotary Cycle Selector Set To Normal Press Start Pause	Lock State	UL or LO
Rotary Cycle Selector Set To Wrinkle Control Press Start Pause	High Water Level	▬ □ Below Level ▬ ▽ Above Level
Rotary Cycle Selector Set To Colors Press Start Pause	Low Water Level	▬ □ Below Level ▬ ▽ Above Level
Rotary Cycle Selector Set To Hand Wash Press Start Pause	*Tub Balance	UC Balanced UD Unbalanced
Press Delay Start	Water Temperature	Degrees F
Rotary Cycle Selector Set To Delicates Press Start Pause	Water Temperature	Degrees C

* "U0" will be displayed during the time when the machine is correcting for the unbalance; e.g. slowing down to redistribute the load or to get to a lower spin speed. Once the situation has been corrected (i.e. the load has begun tumbling or the lower speed has resulted in an acceptable amount of unbalance) "U0" will be displayed again.



Board Output Test

While in Service Mode, pressing the **Temperature** and **Extra Rinse** key will begin the **Board Output Test**. This test turns 'ON' a specified output after a key press. (Pressing the **Temperature** and **Extra Rinse** key again cancels the test.) Only one output can be 'ON' at any time. All outputs will be turned 'OFF' after five (5) minutes of inactivity.

While in Service Mode follow chart to check respective function.

Selection	Component	Function
Rotary Cycle Selector Set To Heavy Duty Press Start Pause	Main Relay	Off To On or On To Off
Rotary Cycle Selector Set To Normal Press Start Pause	Hot Water Valve	Valve On 2nd Press Valve Off
Rotary Cycle Selector Set To Wrinkle Control Press Start Pause	Cold Water Valve	Valve On 2nd Press Valve Off
Rotary Cycle Selector Set To Delicates Press Start Pause	Bleach Valve	Valve On 2nd Press Valve Off
Rotary Cycle Selector Set To Quick Wash Press Start Pause	Drain Pump	Pump On 2nd Press Pump Off
Press Delay Start	Motor	Motor On * 2nd Press Motor Off
Press Chime	Door Lock	1 Attempt To Unlock
Press Temperature	Door Lock	Lock Door
Extra Rinse	Bleach Valve and Cold Water Valve	Fabric Softener Fill 2nd Press Valves Off

***Note:** Function may not occur for up to 20 seconds.

The "Delay Start" LED is 'ON'. When activated, the machine will tumble for 5 seconds in the CW direction, pause for 2 seconds, tumble in the CCW direction for 5 seconds, pause for 2 seconds; repeating this pattern until the Delay Start button is pressed again. All tumble speeds are 45 rpm.

Display Diagnostic Codes



The diagnostic code display can be toggled 'ON' and 'OFF' from Service Mode by pressing the **Chime** key and rotating the cycle select knob. The display will show a "d".

Rotating the Cycle Selector knob in either direction will cycle through the list of codes one code at a time with no wrap. Once an initial direction is selected by the user (either Clockwise or Counterclockwise), subsequent movements of the knob in the same direction will show older codes. If the user changes direction and turns the knob in the opposite direction, the more recent code will be displayed. If rotation is continued to the limits of the

Troubleshooting Procedures



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list, the display will remain at the top or the end of the list. A pair of dashes “- -” will be displayed at the end of the list of diagnostic codes. If the user navigates up the list of codes, when the control reaches the top, it will again show “d”.

A code generated during the current cycle will be displayed with the Spin Indicator LED turned ‘ON’. If no cycle is currently running, a code generated during the previous cycle will be displayed with the Spin Indicator LED turned ‘ON’.

Access Other Features

While a diagnostic code is displayed, if the **Start Pause** button on the rotary cycle selector knob is pressed and held, the machine will display the number of cycles since the diagnostic code occurred. To clear the diagnostic list, press the **Delay Start** and **Soil Level** keys for 3 seconds while viewing the list.

Diagnostic Codes

Diag. Code	Description	Trigger	Action to be taken
1	No Drain	The water level fails to drop below the Low Water level reset within 15 minutes, before a spin begins.	Displays "nd" Go to " Will Not Drain " Troubleshooting Section
2	Not Used		
3	No Fill	Continuous fill of 12 minutes. Total fill of 20 minutes.	Displays "nF" Go to " No Water Fill ".
4-7	Not Used		
8	Water level sensor fault.	Input signal from water level Sensor is out of range, Washer will beep and pause the wash cycle.	Displays "LE" Go to " No Water Fill ".

Diag. Code	Description	Trigger	Action to be taken
9	Not Used		
10	Unbalance detected during final spin, which prevented the spinner from exceeding 400 rpm.	Never exceeded 400 rpm due to an unbalanced load. If detected, washer will pause and alert user to redistribute the load.	LED – Will display "dc" Go to "Machine Control Board Output Test".
11	Will not remember machine settings.	Difficulty in reading memory.	Go to " Clear diagnostic codes " Disconnect and reconnect the washer power cord at power supply outlet. If condition still exists, replace machine control board.
12-17	Not Used		
18	Detected door lock switch open during cycle when not expected.	Open door lock switch with motor running.	Check for loose wire connections Clear the diagnostic code and recheck; if reoccurs, perform Diagnostic Motor/Machine Control Board test Check for faulty motor relay on the machine control board.

Troubleshooting Procedures



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Diag. Code	Description	Trigger	Action to be taken
E	Water sensor level fault.	Water level in the machine is believed to be above the overflow level. When this condition is detected, the machine will automatically begin pumping water out of the machine until it falls below the overflow level.	First check to see that water valve is not stuck. If water valve is OK, check water level sensor.
19-24	Not Used		
25	Motor tach signal exists without motor running.	Tach signal exists without torque commanded or when not expected. (Abnormal condition only).	Displays " bE ". Replace motor control board.
26-28	Not Used		

Diag. Code	Description	Trigger	Action to be taken
29	Sump thermistor failure (Optional)	Abnormal high/low temp or ohm resistance seen	Displays " tE ". - Loose or pinched wires - Bad sump thermistor
30-39	Not Used		
3E	Motor failure	Motor speed indicator error. Motor won't turn.	Displays " 3E ". Check the motor windings, the speed sensor, wiring connections, or Control Board.
40-92	Not Used		

Exit Service Mode

To exit: 1) Press **Spin** and **Temperature** keys for 3 seconds again, or 2) press **Power Off**, or 3) unplug the machine. After five (5) minutes of inactivity (user key presses) in Service Mode, the machine will exit the Service Mode and resume normal operations. Pressing the **Power Off** key will completely exit Service Mode. If a cycle is running, cancel the cycle. Pressing the **Start/Pause** key while running a test will pause the individual test, while remaining in Service Mode. A power loss during Service Mode will cancel this mode.

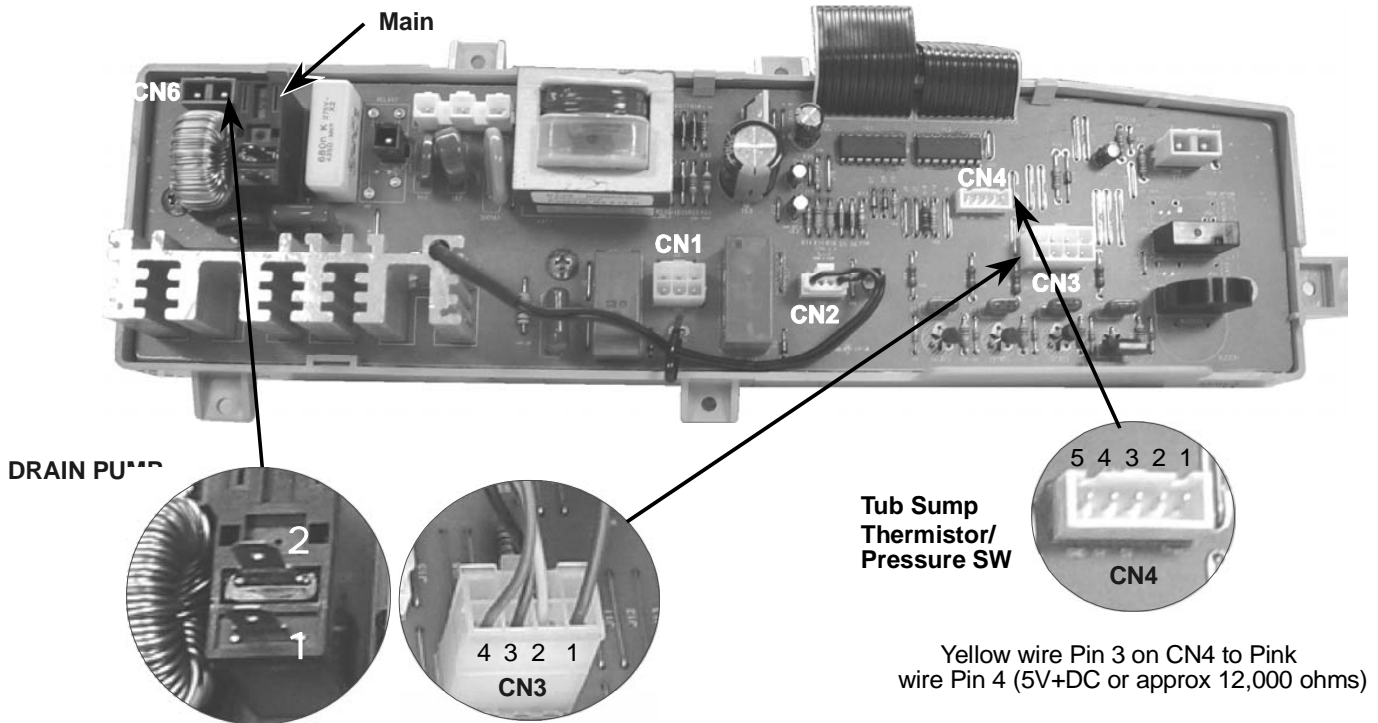
Troubleshooting Procedures

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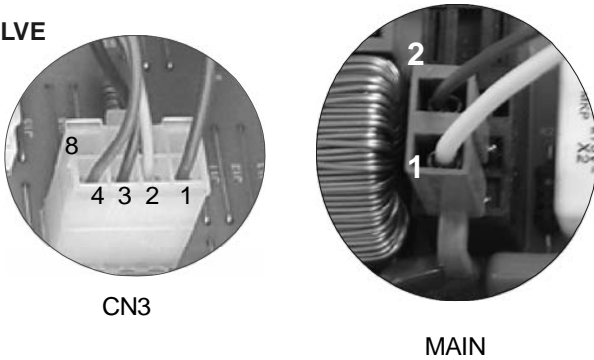
Component Diagnostics

NOTE: For ohm checks unplug harness connector on console and test from wire insertion side of the harness connectors.



Blue wire Pin 2 on CN6 to Gray wire Pin 1 on CN3 120V or approx 16 ohms

WATER VALVE



(Hot Valve) Red wire Pin 4 on CN3 to White wire Pin 1 on Main. Approx 11,000 ohms or 120 volts.

(Bleach Valve) Orange wire Pin 3 on CN3 to Whitewire Pin 1 on Main. Approx 11,000 or 120 volts.

(Cold Valve) Blue wire Pin 2 on CN3 to White wire Pin 1 on Main. Approx 11,000 ohms or 120 volts.

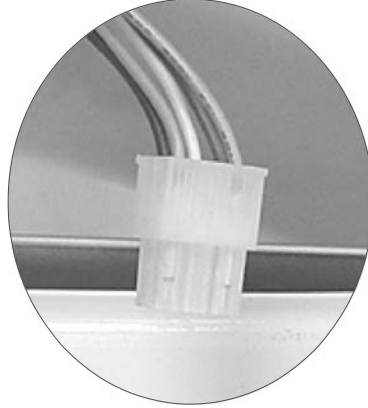
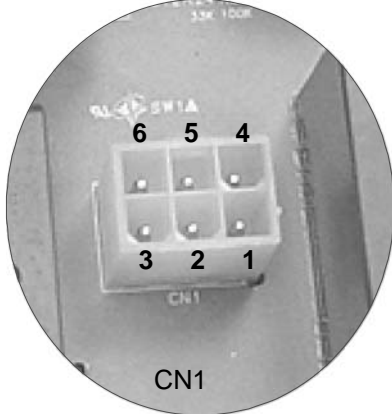
Component Testing Procedures



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Motor windings



- (CN1)** Unplug connector and test Resistance.
- Rotor** Orange Pin 1 to Gray Pin 3 = approx 3.65 ohms.
- Stator** Yellow Pin 5 to Violet Pin 4 = approx 1.1 ohms.
- Stator** Yellow Pin 5 to Blue Pin 6 = approx 1.1 ohms.

Cycle Chart

Cycle	Temp	Wash							Rinse 1					Rinse 2					Spin				Total (minutes)	
		Drain	Fill/Tumble	Soak	Wash	Loose /Cool	Sub Total	Drain	Midterm Spin	Fill/Tumble	Rinse	Loose/Anti-suds Fill	Sub Total	Drain	Midterm Spin	Fill/Tumble	Rinse	Loose/Anti-suds Fill	Sub Total	Drain	Final Spin	Loose		Sub Total
Heavy Duty	W/C	(1)	(2)	3	34	1	41	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	71
	W/W	(1)	(2)	3	34	1	41	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	71
	H/C(N)	(1)	(2)	3	34	1	41	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	71
Normal	C/C(N)	(1)	(2)	3	18	1	25	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	55
	CC	(1)	(2)	3	18	1	25	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	55
	W/C	(1)	(2)	3	18	1	25	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	55
	W/W	(1)	(2)	3	18	1	25	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	55
Wrinkle Control	H/C(N)	(1)	(2)	3	16	1	23	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	55
	C/C(N)	(1)	(2)	3	16	1	23	(1)	-	(2)	4	2	7	(1)	-	(2)	4	2	7	(1)	(6)	(1)	8	45
	CC	(1)	(2)	3	16	1	23	(1)	-	(2)	4	2	7	(1)	-	(2)	4	2	7	(1)	(6)	(1)	8	45
	W/C	(1)	(2)	3	16	1	23	(1)	-	(2)	4	2	7	(1)	-	(2)	4	2	7	(1)	(6)	(1)	8	45
Colors	W/W	(1)	(2)	3	16	1	23	(1)	-	(2)	4	2	7	(1)	-	(2)	4	2	7	(1)	(6)	(1)	8	45
	H/C(N)	(1)	(2)	3	16	1	23	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	53
	CC	(1)	(2)	3	16	1	23	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	53
	W/C	(1)	(2)	3	16	1	23	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	53
Delicate	W/W	(1)	(2)	3	16	1	23	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	53
	H/C(N)	(1)	(2)	3	16	1	23	(1)	(4)	(2)	4	2	11	(1)	(4)	(2)	4	2	11	(1)	(6)	(1)	8	53
	C/C(N)	(1)	(2)	-	10	-	13	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	45
	CC	(1)	(2)	-	10	-	13	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	45
Handwash	W/C	(1)	(2)	-	10	-	13	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	45
	W/W	(1)	(2)	-	10	-	13	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	45
	C/C(N)	(1)	(2)	-	8	-	11	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	43
	CC	(1)	(2)	-	8	-	11	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	43
Quick Wash	W/C	(1)	(2)	-	8	-	11	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	43
	W/W	(1)	(2)	-	8	-	11	(1)	(4)	(2)	5	2	12	(1)	(4)	(2)	5	2	12	(1)	(6)	(1)	8	43
	C/C(N)	(1)	(2)	3	4	1	11	(1)	-	(2)	2	2	5	(1)	-	(2)	2	2	5	(1)	(6)	(1)	8	29
	CC	(1)	(2)	3	4	1	11	(1)	-	(2)	2	2	5	(1)	-	(2)	2	2	5	(1)	(6)	(1)	8	29
Drain	W/C	(1)	(2)	3	4	1	11	(1)	-	(2)	2	2	5	(1)	-	(2)	2	2	5	(1)	(6)	(1)	8	29
	W/W	(1)	(2)	3	4	1	11	(1)	-	(2)	2	2	5	(1)	-	(2)	2	2	5	(1)	(6)	(1)	8	29
	H/C(N)	(1)	(2)	3	4	1	11	(1)	-	(2)	2	2	5	(1)	-	(2)	2	2	5	(1)	(6)	(1)	8	29
	Spin	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	(1)	-	-	1	1
Rinse & Spin	C/C(N)	-	-	-	-	-	-	(1)	-	(2)	4	2	7	-	-	-	-	-	-	(1)	(6)	(1)	8	8
	CC	-	-	-	-	-	-	(1)	-	(2)	4	2	7	-	-	-	-	-	-	(1)	(6)	(1)	8	15
	W/C	-	-	-	-	-	-	(1)	-	(2)	4	2	7	-	-	-	-	-	-	(1)	(6)	(1)	8	15
	W/W	-	-	-	-	-	-	(1)	-	(2)	4	2	7	-	-	-	-	-	-	(1)	(6)	(1)	8	15
	H/C(N)	-	-	-	-	-	-	(1)	-	(2)	4	2	7	-	-	-	-	-	-	(1)	(6)	(1)	8	15

Wiring Diagram



WARNING

To avoid risk of electrical shock, personal injury, or death; disconnect power to washer before servicing, unless testing requires power.

SCHEMATIC DIAGRAM

