



The Moo Cafe

AUTHENTIC BEVERAGES

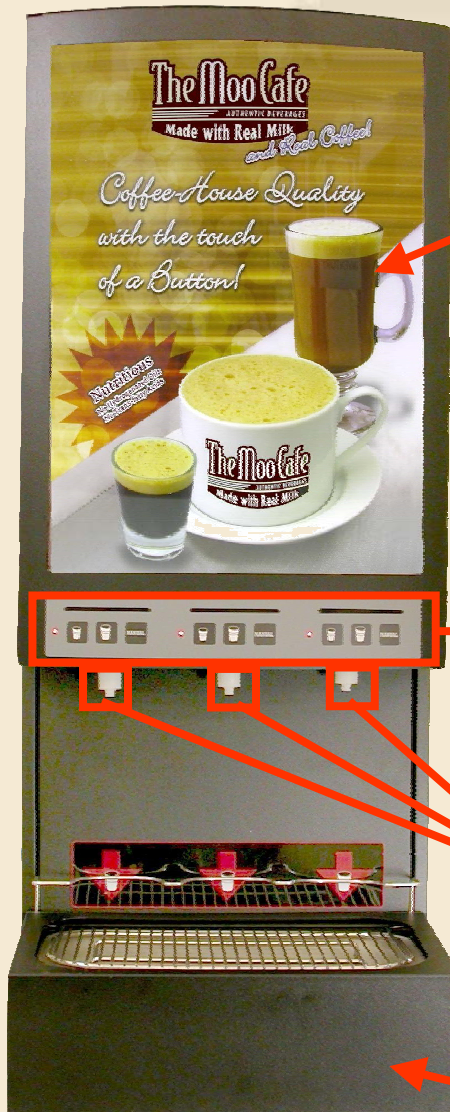
Made with Real Milk

INSTALLATION PROCEDURE

September 2006



Unit Overview



**Translucent
Door Graphic**

**Cabinet
Door**

**Programmable
Dispense Buttons**

**Dispensing
Nozzles**

**Drip Tray and
Drain Assembly**



**Door
Latch**

**Legs
(4)**

Unit Overview

**BIB
Installation
Instructions**

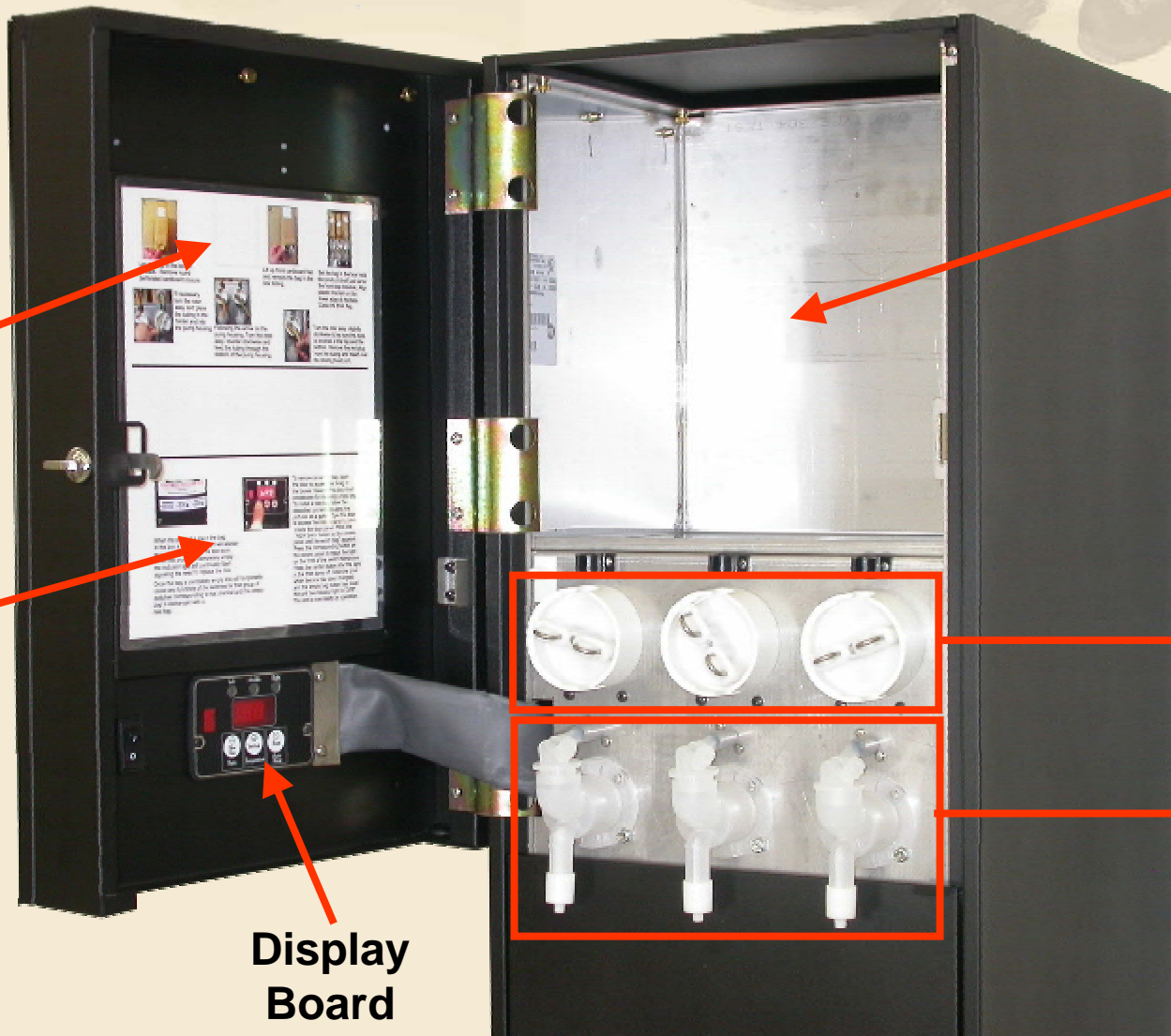
**Programming
Instructions**

**Display
Board**

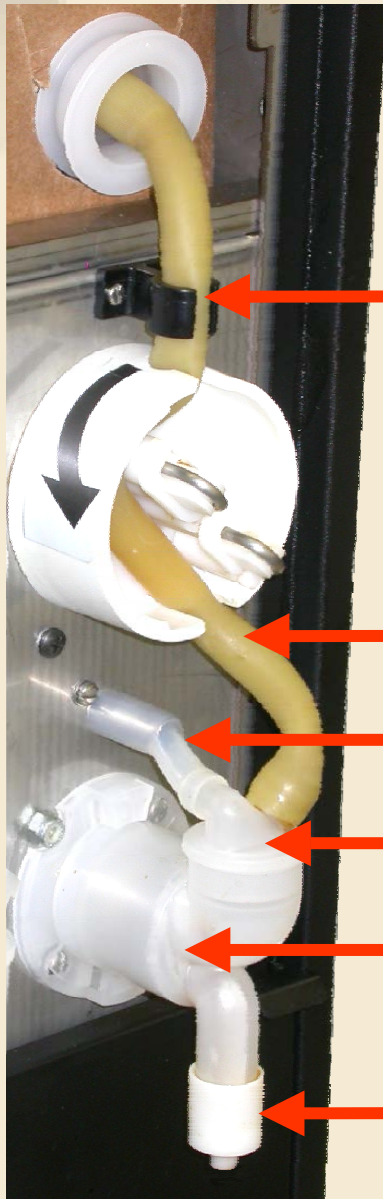
**BIB
Cabinet**

**Pump
Assemblies**

**Whipper
Assemblies**



Unit Overview



Plastic Tubing Holder

Pump Housing

Pump Rotor

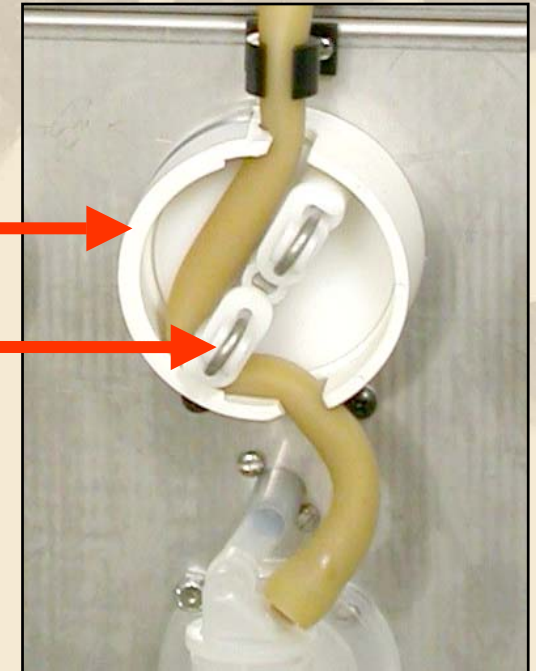
BIB Product Tube

Water Supply Tube

Whipper Dosing Head

Whipper Chamber

Whipper Restrictor



Note: Pump Rotor should only be rotated **counter-clockwise**



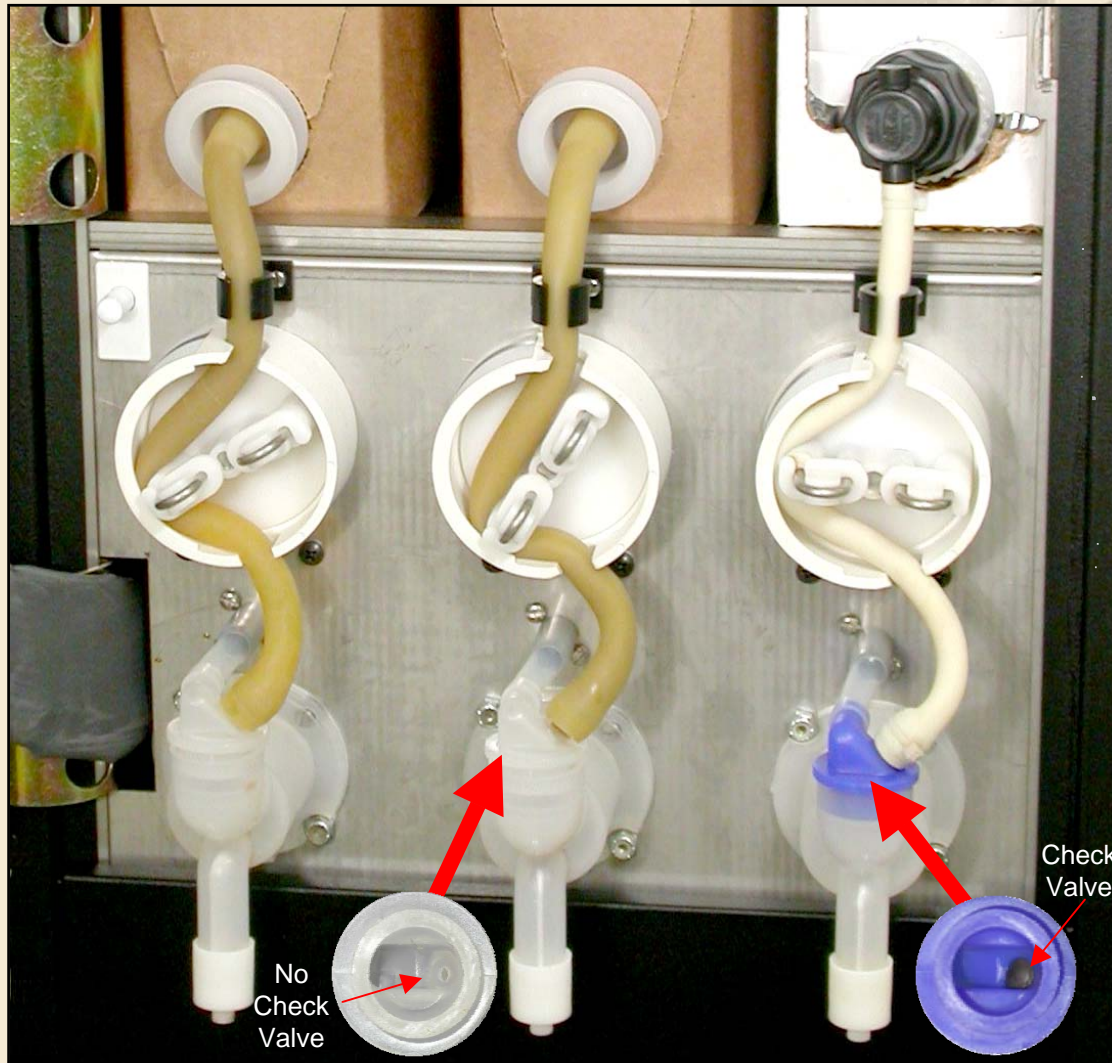
Moo

Dosing
Heads



Espresso

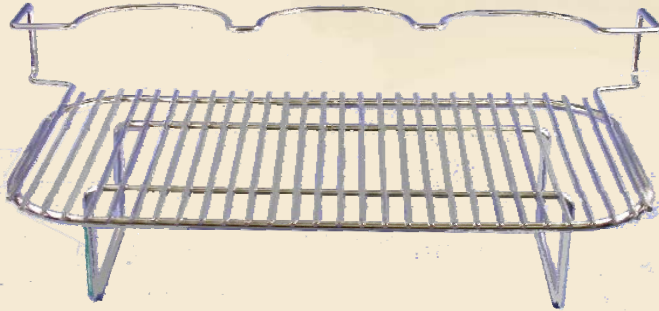
Product Overview



Shipping Carton Contents

- MCM-Combo Unit
- Drip Tray Assembly (drain hose included)
- Water Filter (with shut-off & mounting hardware)
- Four Inch Plastic Legs (4)
- Fluorescent Tubes (2)
- Translucent Door Graphic

Drip Tray Assembly



103426 Cup Rest



103415 Drain Pan
103425 Drain Pan Fitting
02-0158 O-Ring



103420-BPC Drip Tray Housing



103417 Drain Support Bracket
103424 Drain Receptacle
103455 Drain Hose
103452 Hose Clamp



Water Filter Accessories Bag

Product Labels

Nozzle Brush

Shut-off Assembly

Water Filter

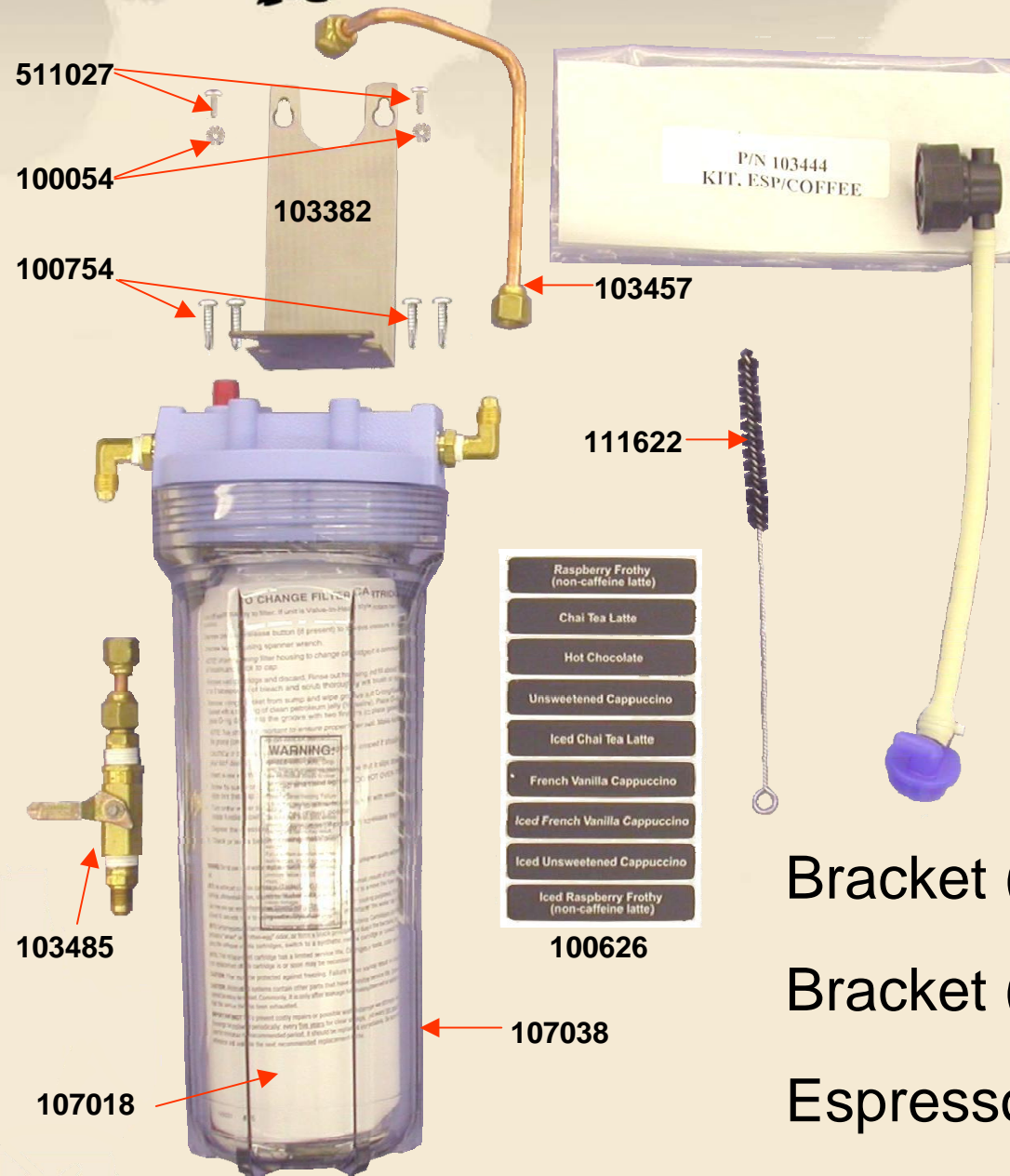
Water Filter Bracket

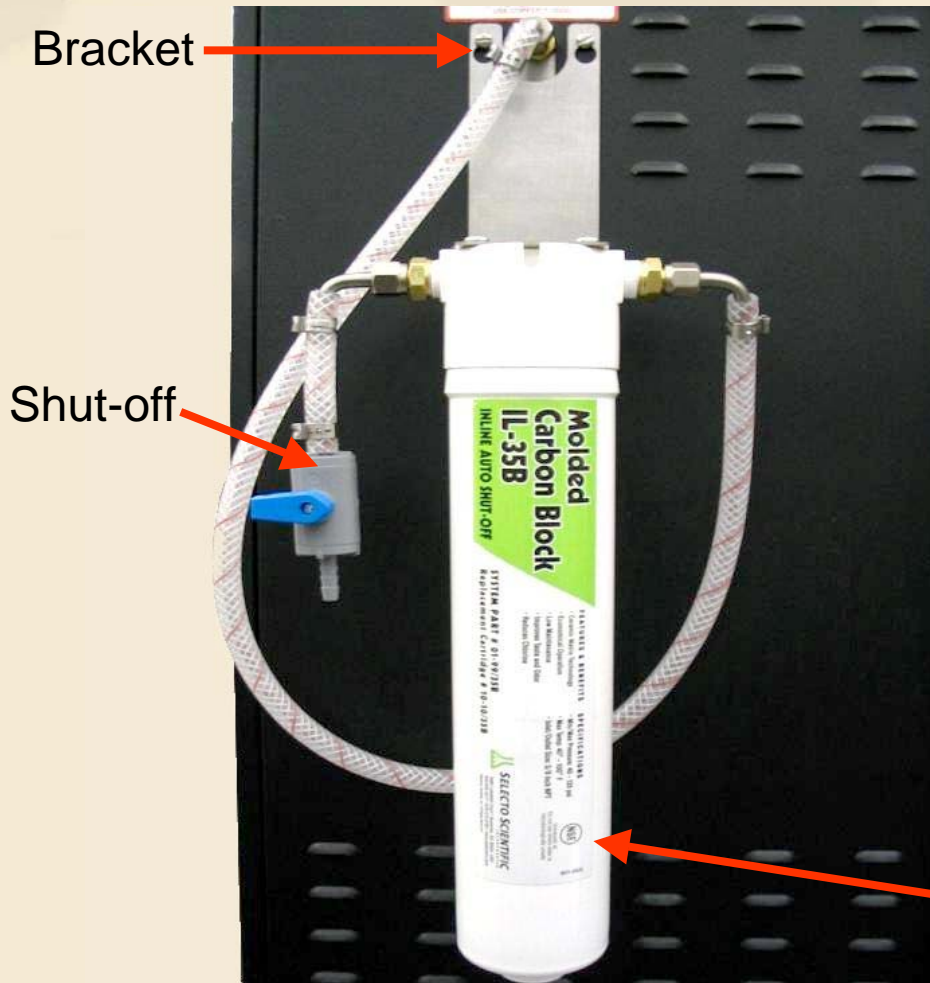
Filter to Unit Water Line

Bracket (Unit) Mounting Screws (2)

Bracket (Filter) Mounting Screws (4)

Espresso Product Packing Adapter





New Water Filter Assembly

New units will be shipped with an upgraded water filter assembly. The installation will be exactly the same as the previous filter assembly, however some of the parts (shutoff, filter, & bracket) may look slightly different.

Filter cartridge



Plastic Legs, Fluorescent Tubes and Translucent Door Graphic



103377



100542



102062

Machine Setup

Leg Installation

1. Install two rear unit legs.



2. Align Drain Support Bracket holes with those in bottom front of unit and install front legs.



Machine Setup



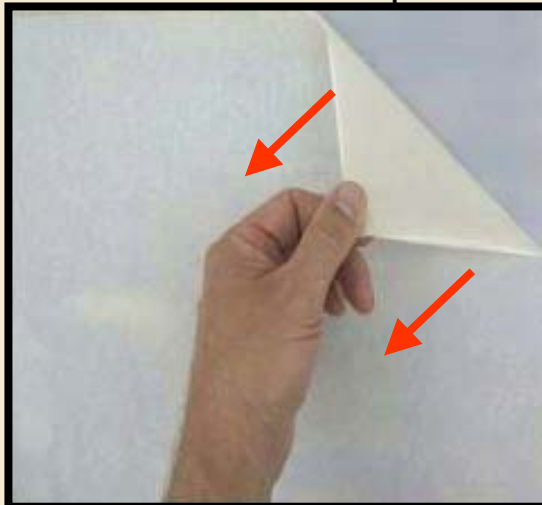
Fluorescent Tube Installation

Install two (2) fluorescent tubes in door face and rotate $\frac{1}{4}$ turn to lock in holder.

Machine Setup



Translucent Graphic



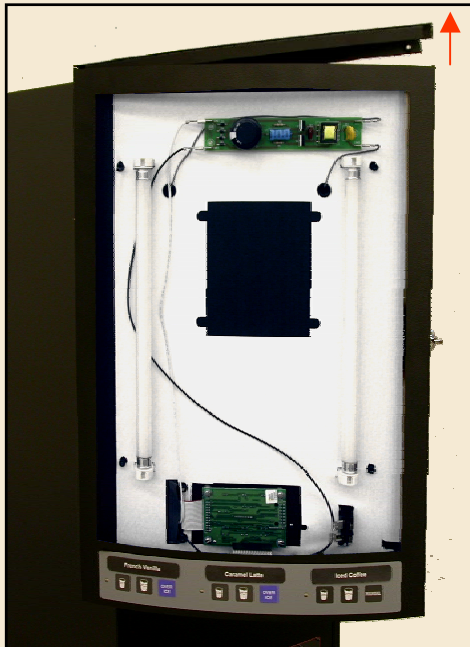
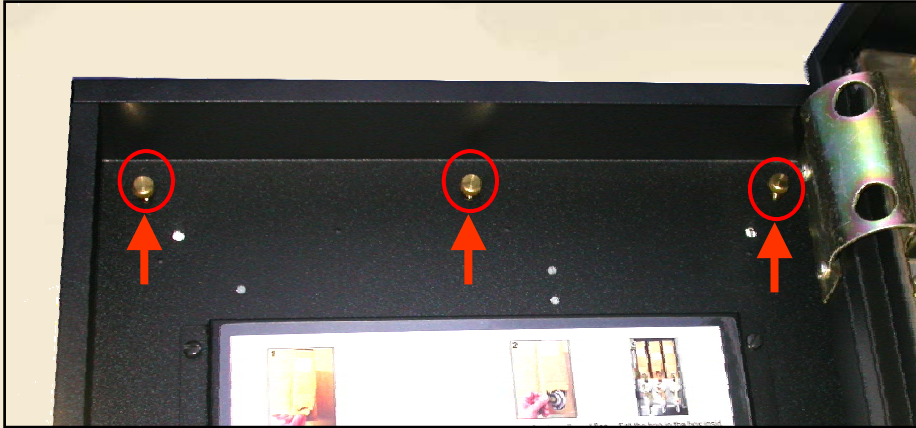
Clear Plastic Cover

Preparing the Graphic

Both the translucent graphic and the clear plastic cover shield are shipped with a protective film. Start at a corner, and carefully pull the protective film diagonally to remove.



Machine Setup



Graphic Installation

Unscrew and remove three (3) brass thumbscrews from inside top of door panel, then lift and remove door cap. Peel clear plastic on front, and white paper on rear of Graphic. Slip Graphic into slide guides and lower until sign is seated at bottom of guides. Reinstall door cap and secure with the three (3) brass thumbscrews.

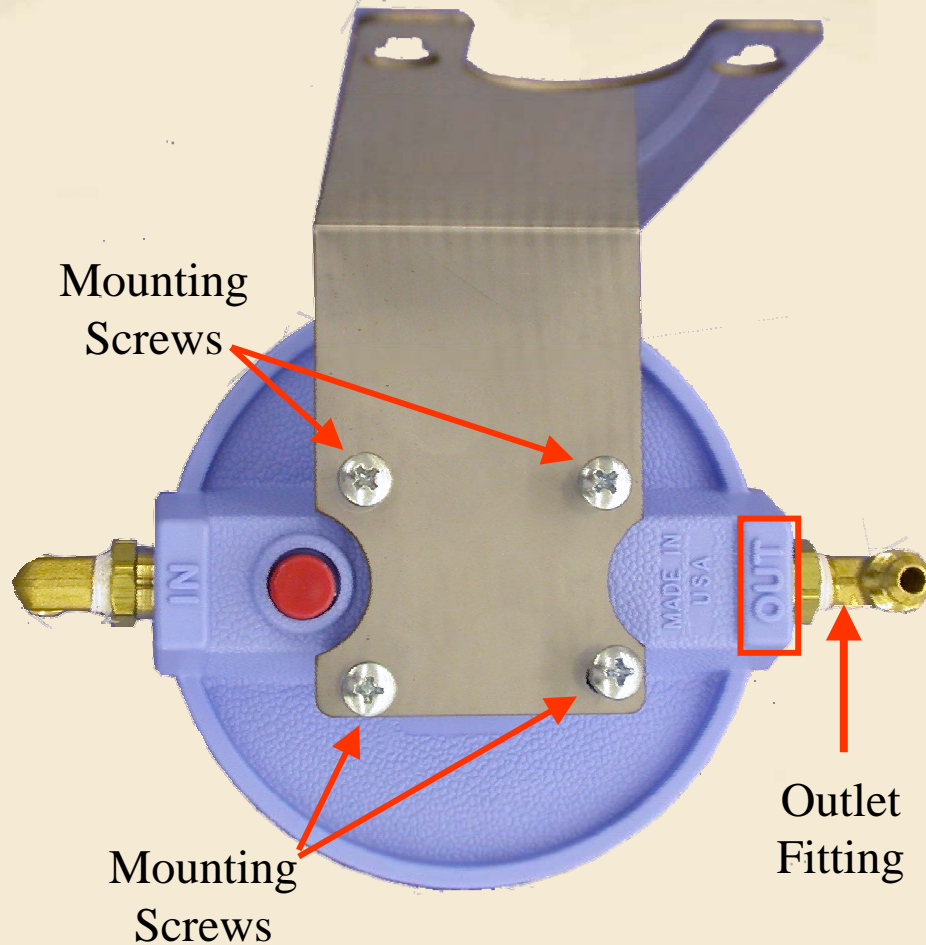
Machine Setup



Water Filter Installation Overview

The water filter will require some assembly and preparation prior to installing. The filter bracket will need to be mounted to the top of the filter, the cartridge will need to be removed from the protective bag and the filter installation instructions must be removed from the canister.

Machine Setup



Water Filter Bracket

Mount water filter bracket to filter with four (4) screws provided in accessories bag. Assure that “outlet” is on the right of bracket so the pre-formed tubing (installed in future step) will reach unit water inlet.

Machine Setup



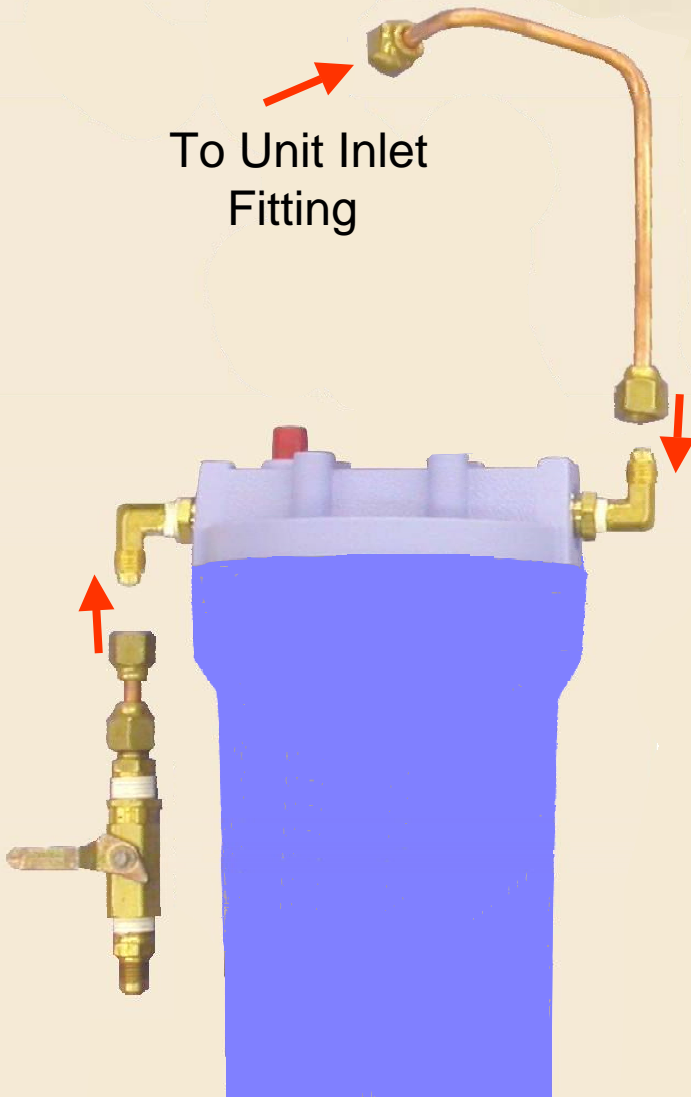
Mounting Water Filter Bracket

Locate water inlet at upper rear of unit. Install filter bracket using two (2) #8 screws and star washers provided in accessories bag.

Machine Setup

Tubing & Shutoff Connections

Run pre-formed water supply line between water filter outlet and unit water inlet.



Machine Setup

Water Supply Connection

Run water supply line between water source and shutoff inlet. It is highly recommended to leave enough extra tubing length to allow for serving unit. Equipment should be installed to comply with all federal, state and local plumbing codes. Flow requirements are a minimum of 35psi flowing pressure and a maximum of 100psi static pressure.



To water supply

Machine Setup



Drip Tray Housing Installation

Align Drip Tray Housing guides with Drain Support Bracket arms and slide toward rear of unit.

Machine Setup



Drip Tray Installation

Align Drip Tray drain with Drain Support Bracket drain receiver and push down until seated. Route Drain Support Bracket hose into location drain assuring a downward pitch to allow for proper drainage. Equipment should be installed to comply with all federal, state and local plumbing codes.

Note: Assure rubber gasket of drip tray is properly seated in drain to avoid leakage.

Machine Setup



Drip Tray Wireform Installation

Lower Drip Tray Wireform
into Drip Tray

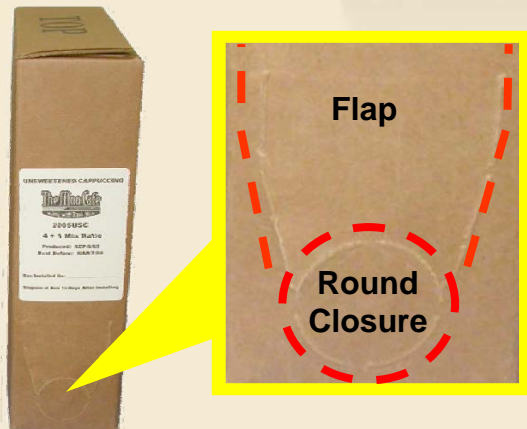


Machine Start up

1. Turn on water to unit and check for leaks
2. Plug unit into electrical supply (120V, 3 pole, 4 wire grounding type receptacle). Hot water will begin filling.
3. Activate the Light Switch (toggle up) located on the inside of the door panel.
4. The LCD window will display self test message briefly, then sanitation indicators will light. However, unit will not begin sanitizing until tank temperature reaches 160 degrees F. The sanitizing cycle may be canceled by pressing Rinse/Auto Rinse button.
5. Allow approximately 6-8 minutes for the tank to fill. If tank does not fill within 10 minutes, a "FIL" error message will appear on LCD screen.
6. Allow up to 50 minutes for the water to reach 175 degrees. The heat up time will depend upon the location's water temperature and available voltage.
7. Open product door, hook up Moo products, then close door. Note that unit is equipped with a safety lock device that will not allow product pumps to run while door is open.
8. Set-up and calibrate the Moo Product for each channel while unit is heating up.



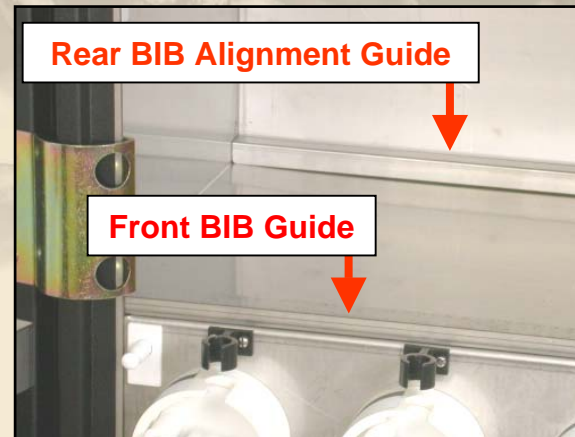
Moo BIB Installation Instructions



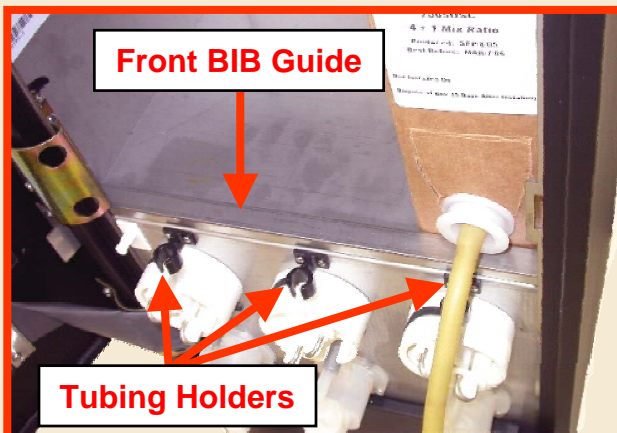
Lay BIB on back and remove round perforated cardboard closure



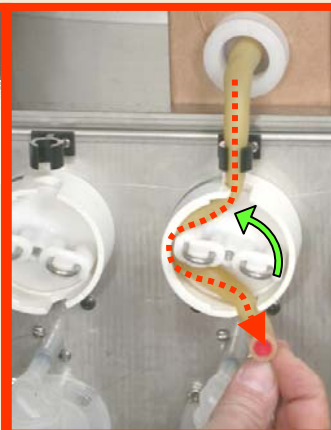
Lift up front cardboard flap and remove BIB tubing, then re-close flap



Assure front and rear BIB alignment guides are in place before installing packaging



Set BIB on product shelf just behind front BIB guide. Align BIB tubing with plastic tubing holder, then clamp tubing inside holder



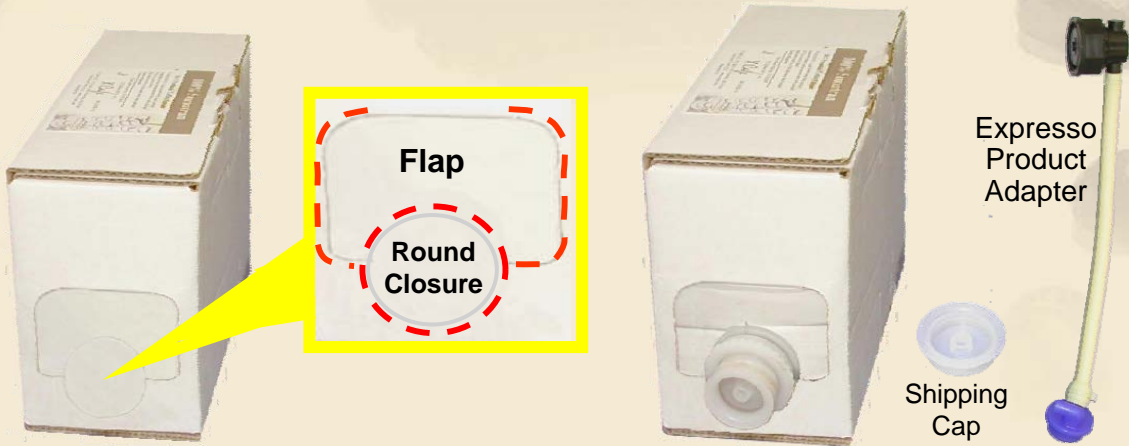
Route tubing through top pump housing cutout, then around left side of rotor and out bottom cutout. Turn rotor assembly **counter-clockwise** if necessary.



Turn rotor assembly **counter-clockwise** to assure tubing is pinched at top and bottom. Then remove red plug from tubing and install tube over dosing head port.

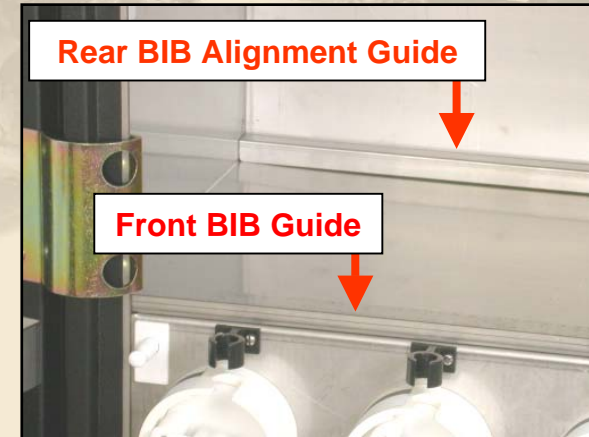


Expresso BIB Installation Instructions

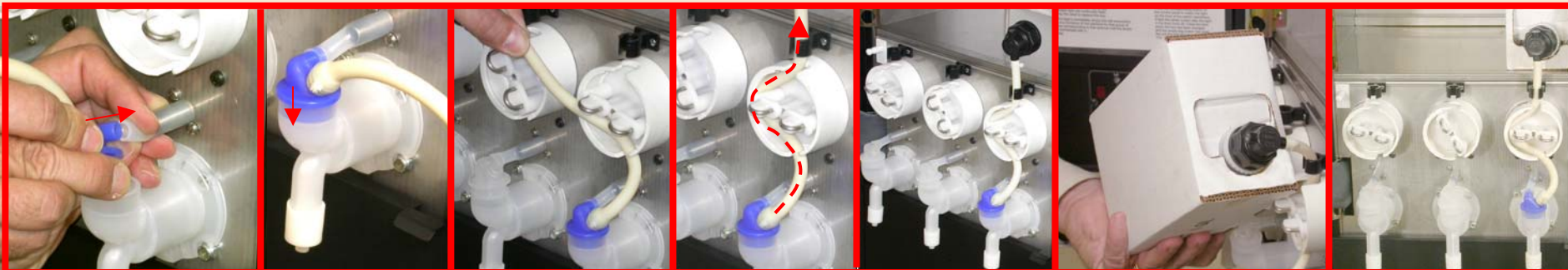


Lay BIB on back and remove round perforated cardboard closure.

Lift up front cardboard flap, remove BIB connector, then re-close flap. Remove Expresso Product Adapter from unit accessory bag.



Assure that front and rear BIB alignment guides are in place.



Remove Moo product dosing head from Whipper Chamber and water supply tube. Install Expresso Product Adapter dosing head into water supply tube and snap on Whipper Chamber.

Route Expresso Product Adapter tubing through bottom pump housing cutout, then around left side of rotor and out top housing cutout. Turn rotor assembly **counter-clockwise** if necessary. Place tubing in plastic clip.

Holding Expresso BIB with connection upwards, remove shipping cap and install Product Adapter Connector. Set BIB on product shelf just behind front BIB guide



Machine Calibration Instructions

Overview:

Machine **H2O settings** are calibrated at the factory and normally do not need adjustment unless a dispensing valve is replaced or the measured dispense volume does not match the displayed setting.

Concentrate settings should be performed at initial set-up and each time the product density (or viscosity) changes. If same product is used (i.e. just changing out an empty box of the same product), channel does not need recalibration.

Calibration applies to the following :

- A. Hot Water flow rate
- B. Concentrate flow from pumps (liquid BIB)
- C. Cold Water (ambient) flow rate



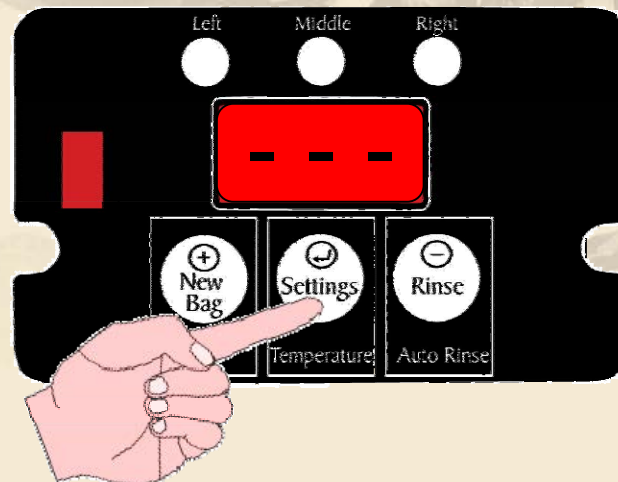
Note: Pull door safety switch out to place unit in “Service Mode” during product calibration process. Pumps will not operate and P1, P2 or P3 error codes will display if not calibrating in “Service Mode”.

Machine Calibration Instructions

Concentrate Calibration

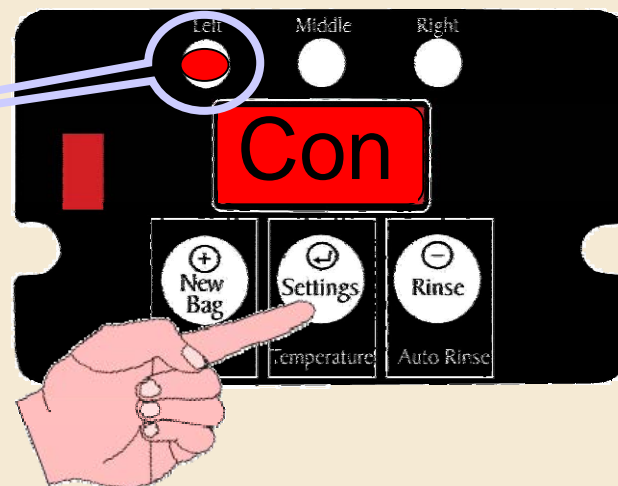
Step 1

Press & hold “Settings” (middle) button
After approximately 5 seconds,
display will change to “- - -”



Step 2

Continue holding button until display
changes to “Con” and “Left”
Channel indicator light is displayed
(takes approximately 8 seconds),
then release “Settings” button.





Machine Calibration Instructions

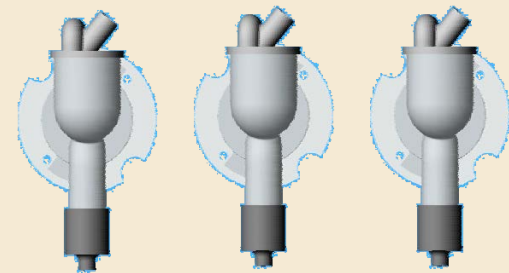
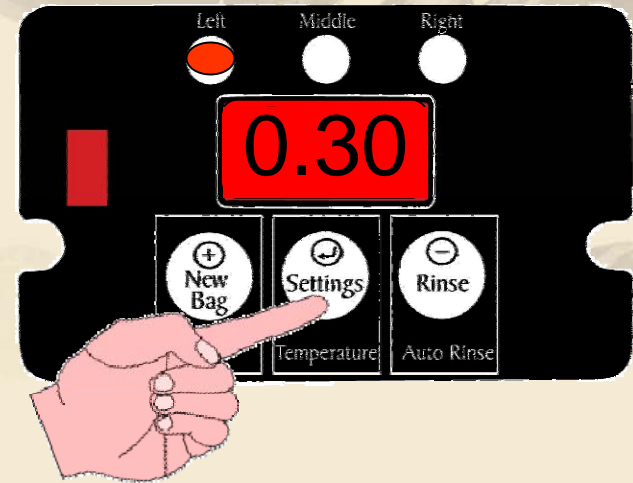
Concentrate Calibration

Step 3

Press “Settings” (middle) button.

Display will change to “0:30” (30 seconds).

Place measuring cup (preferably at least a 12 fl oz graduated cup) under the dispensing head to be calibrated as indicated by channel light.

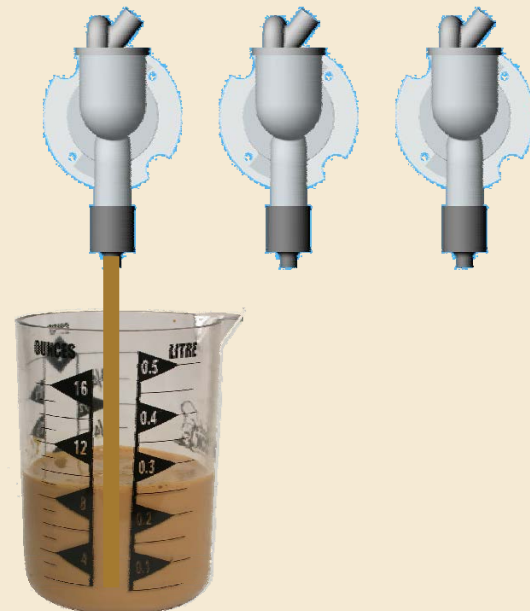
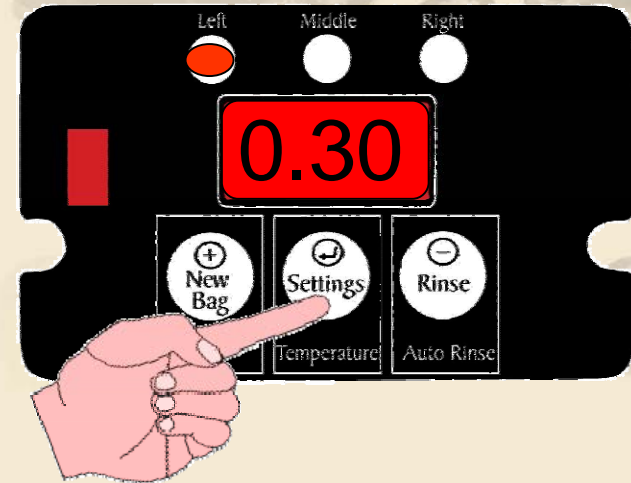


Machine Calibration Instructions

Concentrate Calibration

Step 4

Press “Settings” button again,
machine will pump concentrate into
measuring cup for 30 seconds.

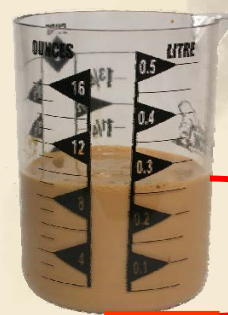


Machine Calibration Instructions

Concentrate Calibration

Step 4 (continued)

When concentrate stops, read
concentrate volume (in ounces) from cup.



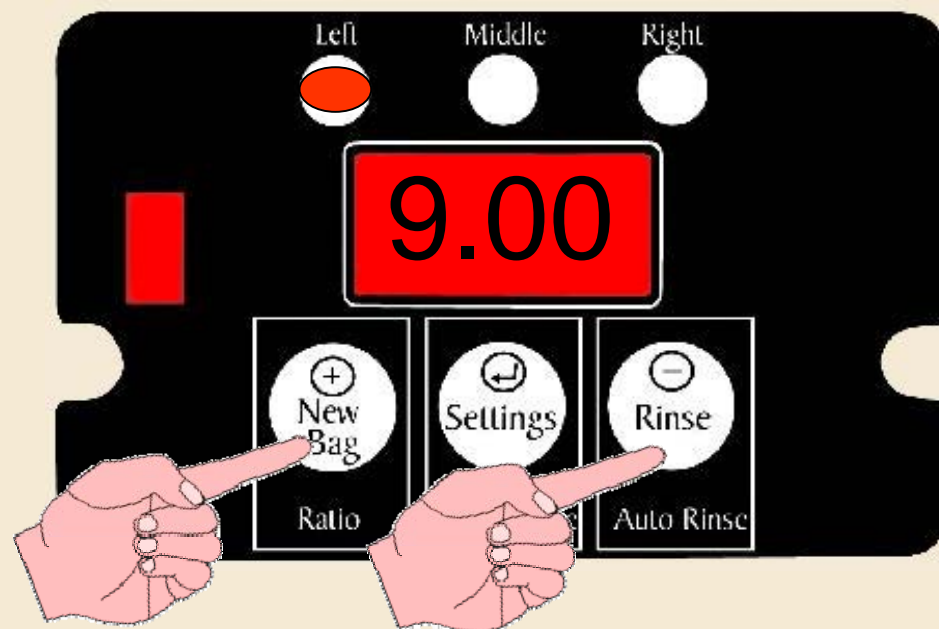
9.0 ounces

Enter measured value into display

Toggle left button
New Bag (+)
to increase value



Toggle right button
Rinse (-)
to decrease value

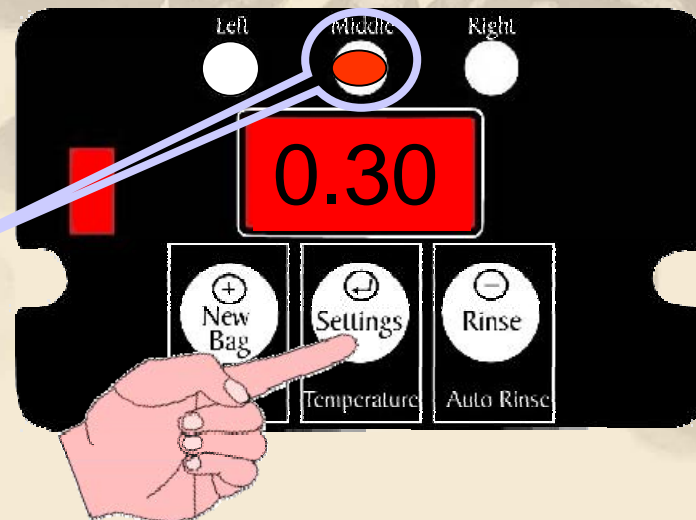


Machine Calibration Instructions

Concentrate Calibration

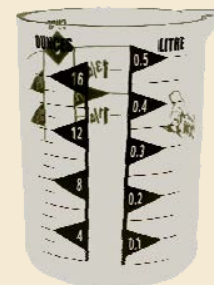
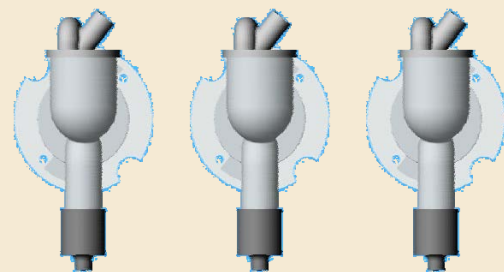
Step 5

Press “Settings” to store settings. Display will change to 0:30, and “Middle” Channel Indicator light (middle dispensing head) will illuminate.



Empty and move the measuring cup under the middle dispensing head. Repeat steps 1-4 for the middle and right dispense head.

When Right dispense settings are stored, display changes to “Con”.

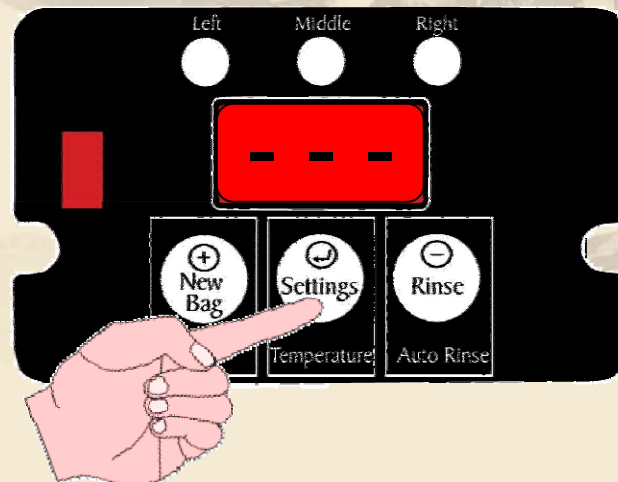


Machine Calibration Instructions

Water Calibration (if necessary)

Step 1

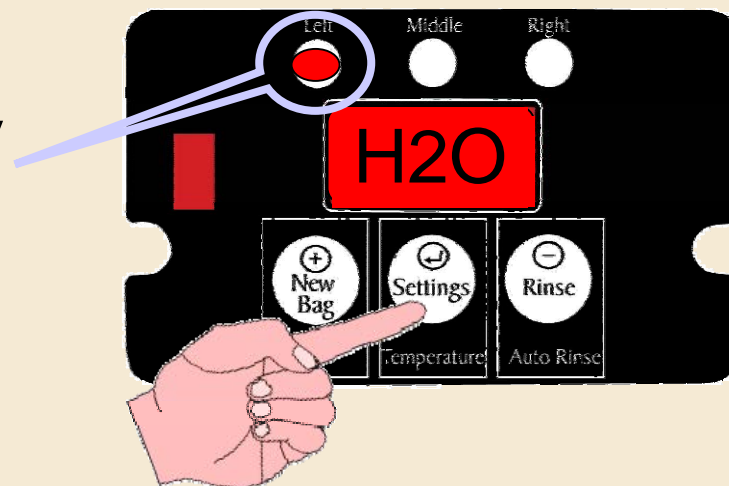
Press & hold “Settings” button,
after approximately 5 seconds
Display will change to“- - -”



Step 2

Continue holding button for
approximately 8 more seconds, (display
changes to “Con” and “Left”
Channel indicator light is displayed.

Without releasing button, continue
holding button for an additional 8
seconds, display will change to H2O.





Machine Calibration Instructions

Water Calibration (if necessary)

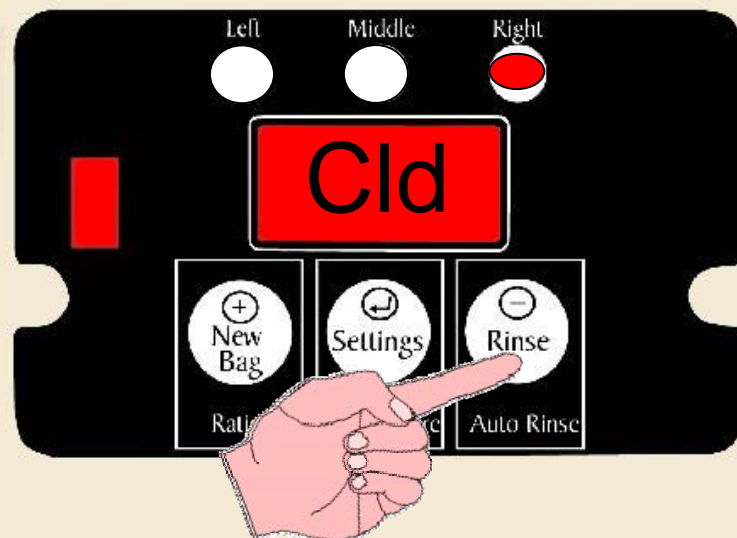
H2O Ambient Calibration is a factory. Settings should not need re-calibration unless the measured dispense volume does not match the displayed setting.

Note:

Continuing to step #3 begins the calibration the unit for Hot Water settings. If you would like to skip hot water settings and proceed directly to Cold Water settings, perform the following step.

Press “Rinse” (right) button three times. Channel indicator light will move to middle position with first press, right position with second press and display will change to “Cld” (Cold) after third.

Continue with step #3 for either Hot or Cold water calibration.



Machine Calibration Instructions

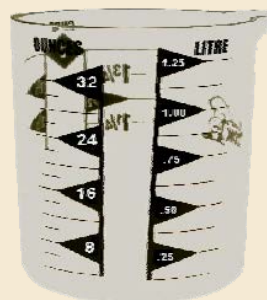
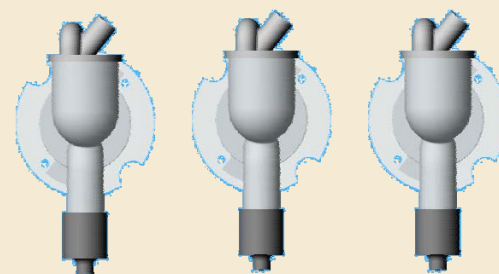
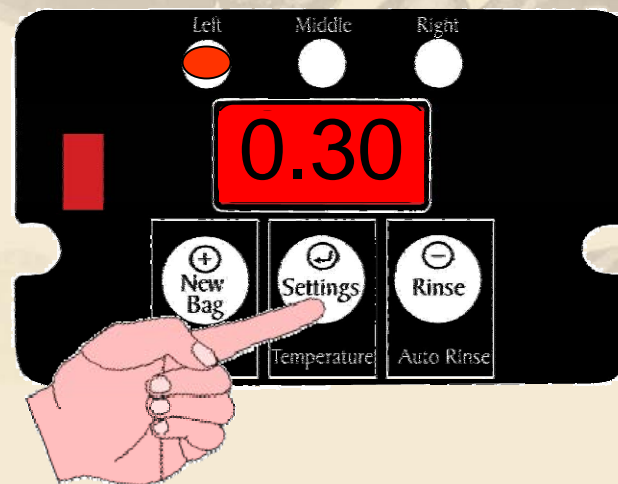
Water Calibration

Step 3

Press “Settings” (middle) button.

Display will change to “0:30” (30 seconds).

Place measuring cup (preferably at least a 32 fl oz graduated cup) under the dispensing head to be calibrated as indicated by channel light.

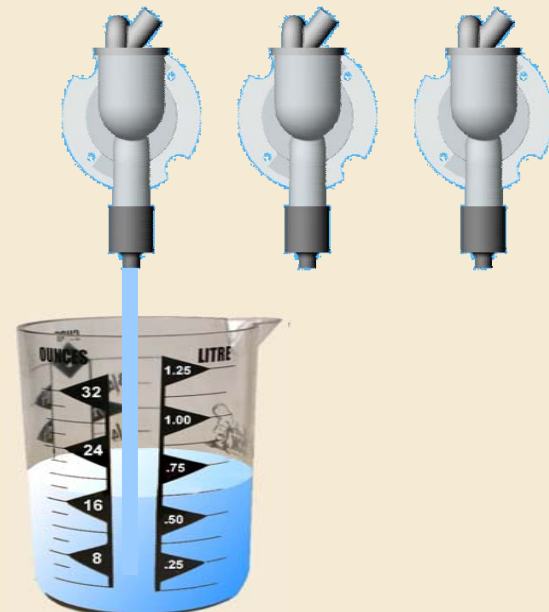
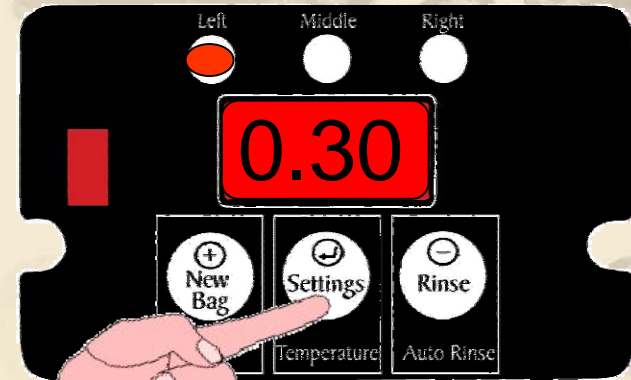


Machine Calibration Instructions

Water Calibration

Step 4

Press “Settings” button again, machine will pump water into measuring cup for 30 seconds.

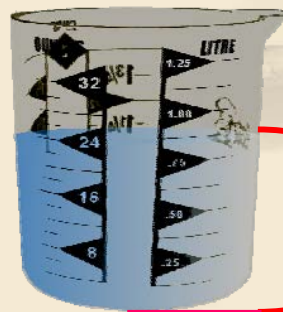


Machine Calibration Instructions

Water Calibration

Step 4 (continued)

When concentrate stops, read water volume (in ounces) from cup.



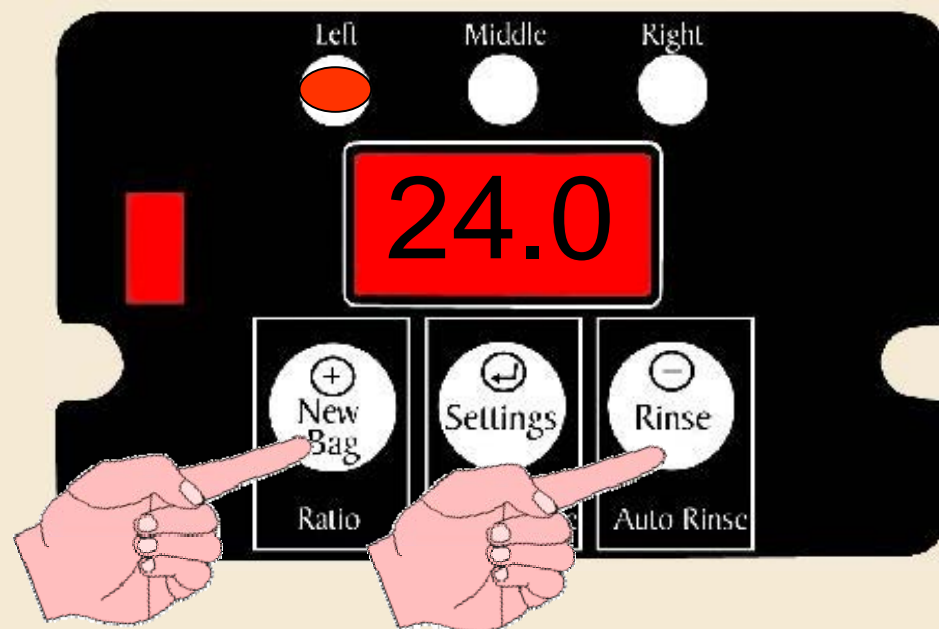
24.0 ounces

Enter measured value into display

Toggle left button
New Bag (+)
to increase value



Toggle right button
Rinse (-)
to decrease value



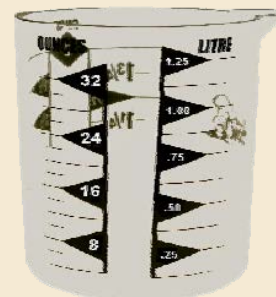
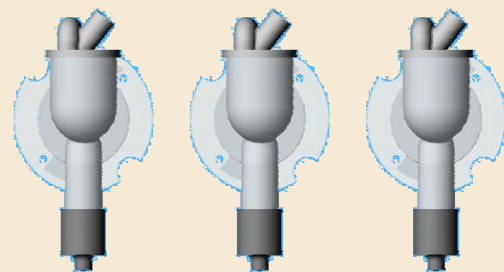
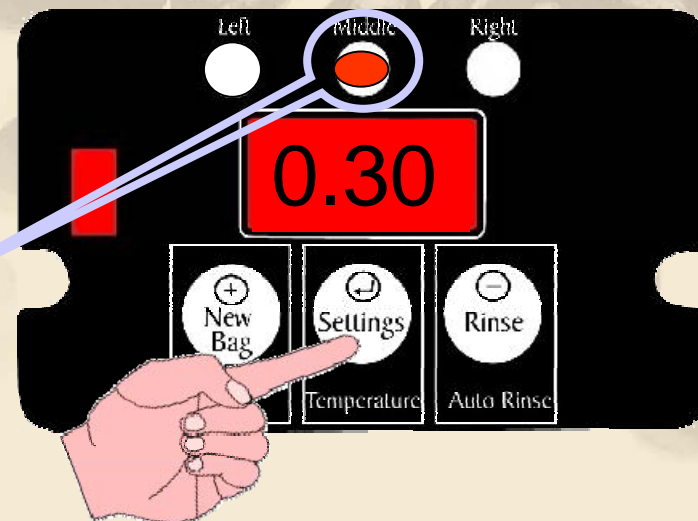
Machine Calibration Instructions

Water Calibration

Step 5

Press “Settings” to store settings. Display will change to 0:30, and “Middle” Channel Indicator light (middle dispensing head) will illuminate.

Empty and move the measuring cup under the middle dispensing head. Repeat steps 3-5 for the middle and right dispense heads.



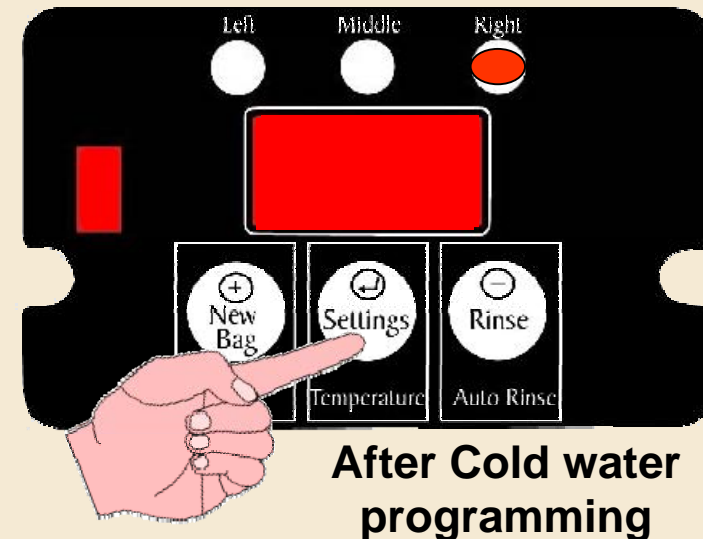
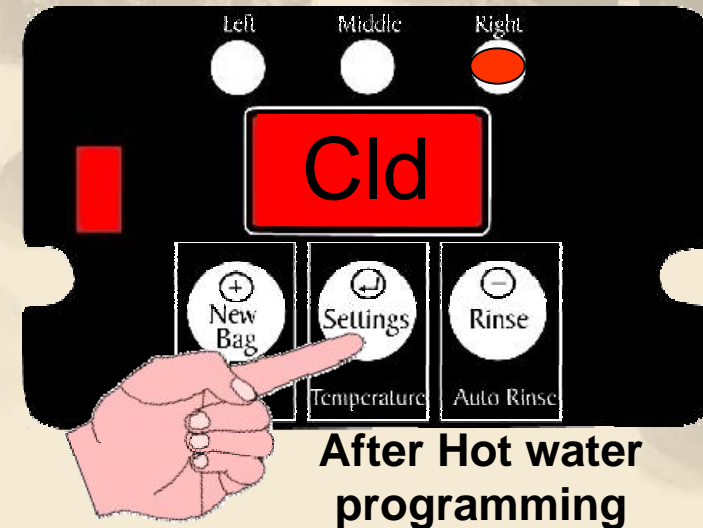
Machine Calibration Instructions

Step 7

In Hot water calibration mode, when right dispense settings are stored, display changes to “Cld” prompting you to repeat steps 3-5 for Cold Water calibration of each dispensing head.

In Cold water calibration mode, when right dispense settings are stored, display changes to “Pro” (program).

With “Pro” displayed, Press “Settings” twice to enter settings as default and exit program mode. (Note: En4 is a factory setting and should not be changed). Display will go blank once settings are entered.

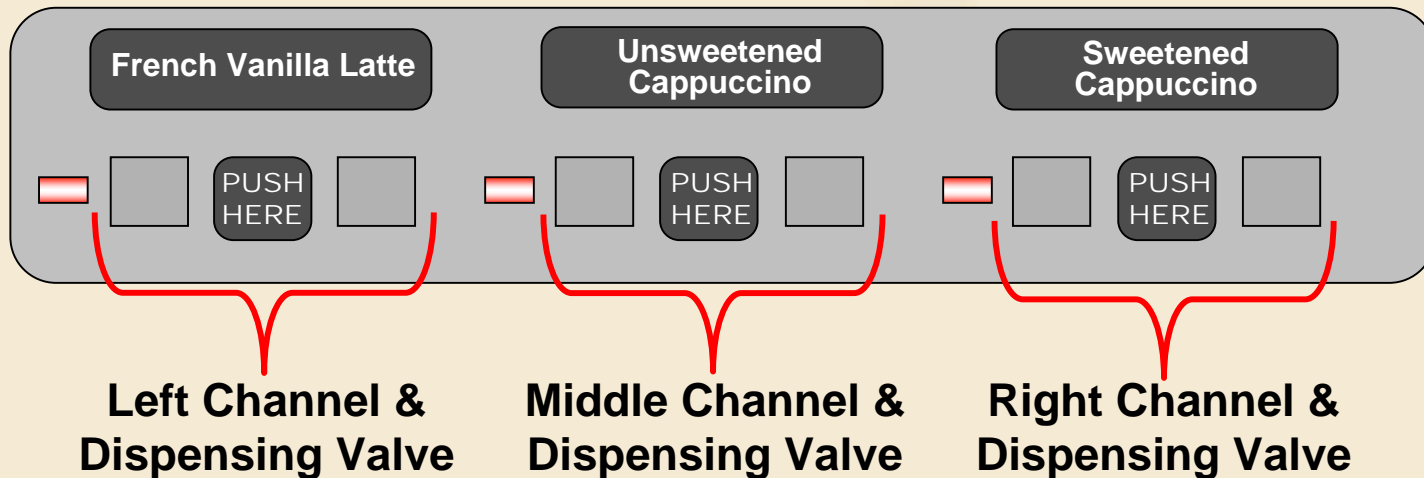


Programmable Buttons (3 per channel)

Each button on the door switch is programmable for the following:

A. Button Enable - Enables or disables each individual button.

Example: Enable center button only for a manual dispense, hot or cold product.



Indicates buttons that have been enabled



Indicates buttons that have been disabled

Programmable Buttons

B. Portion Control Allows for the ability to set a volume dispense (in ounces) for any button.

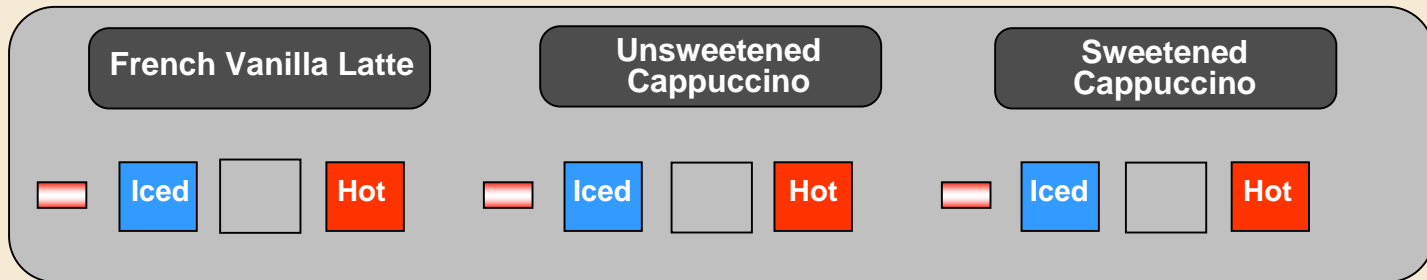
Example: Program the 1st button for each dispense for a small cup dispense, the center button for a large cup dispense, and the 3rd button for a manual dispense



Programmable Buttons

C. Hot/Cold Water Dispense Allows customer choice of hot or cold (ambient) dispense per button

Example: Program the 1st & 3rd buttons on each channel “Hot” & “Iced” (ambient).



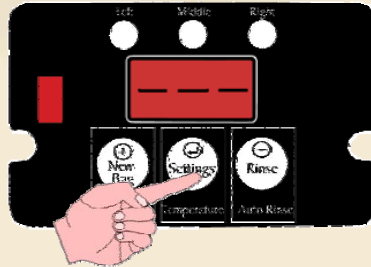
Indicates buttons that have been disabled

Multi Level Programming Instructions

Product Ratio Instructions

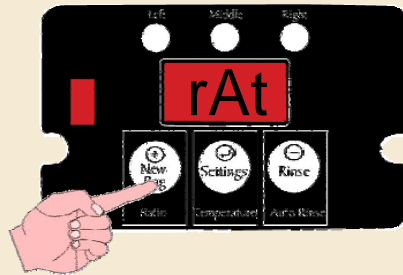
Step 1

Press and hold Settings button until display changes to



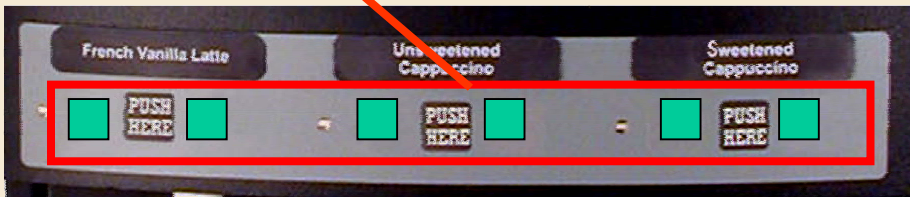
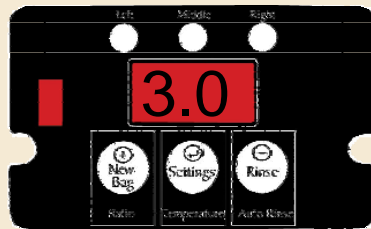
Step 2

Press and hold New Bag button until display changes to



Step 3

Press desired button on front screen to program. Display will change to a Ratio Value



Step 4

Toggle Ratio Value with:

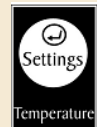
New Bag (+) to increase



Rinse (-) to decrease



When desired ratio value is obtained, press Set-up button to lock-in setting



Ratio value is now locked in. Display changes to

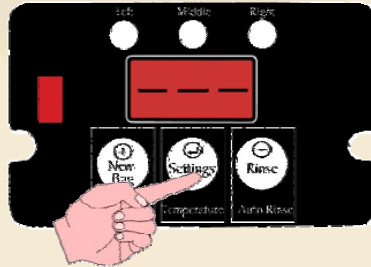


Repeat step 3 & 4 for remaining flavor buttons

Portion Control

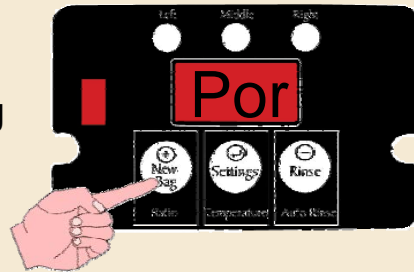
Step 1

Press and hold Settings button until display changes to



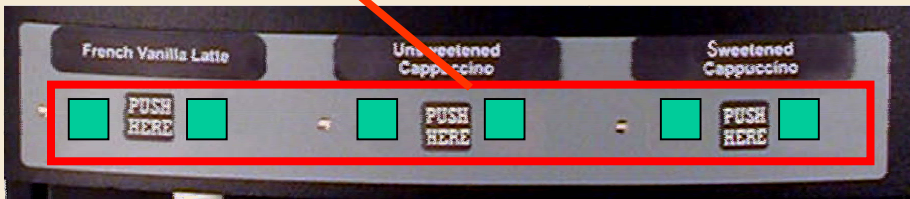
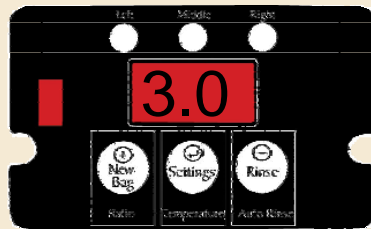
Step 2

Press and hold New Bag button until display changes to



Step 3

Press desired button on front screen to program. Display will change to a Ounce Volume Value



Step 4

Toggle Ratio Value with:

New Bag (+) to increase



Rinse (-) to decrease



When desired volume value is obtained, press Set-up button to lock-in setting



Portion Control value is now locked in. Display changes to

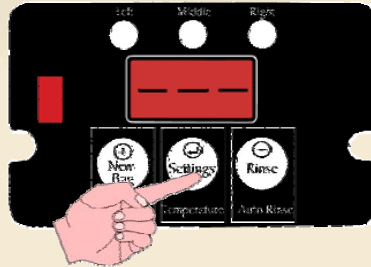


Repeat step 3 & 4 for remaining flavor buttons

Button-Manual Dispense –Enable/Disable

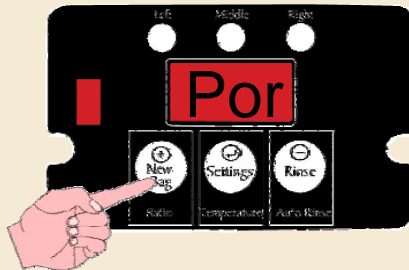
Step 1

Press and hold Settings button until display changes to



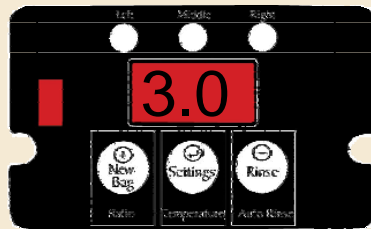
Step 2

Press and hold New Bag button until display changes to



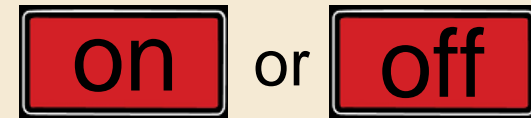
Step 3

Press desired button on front screen to program. Display will change to a Ounce Volume Value



Step 4

Toggle Ratio Value with New Bag (+) or Rinse (-) buttons until display reads



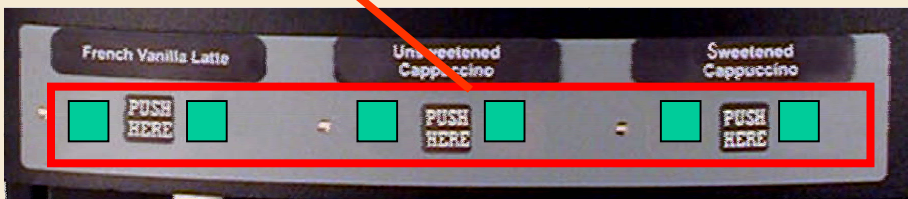
If “off” is selected, button is disabled.

If “on” is selected, button is set for Manual Dispense.

Press center button to store selection



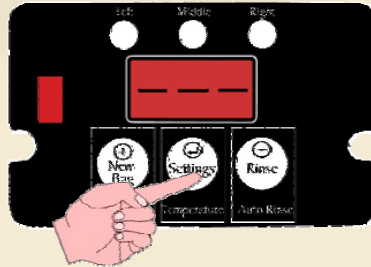
Repeat step 3 & 4 for remaining flavor buttons



Hot/Cold Water Selection

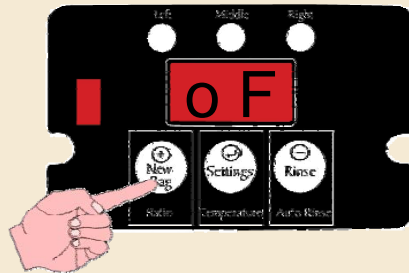
Step 1

Press and hold Settings button until display changes to



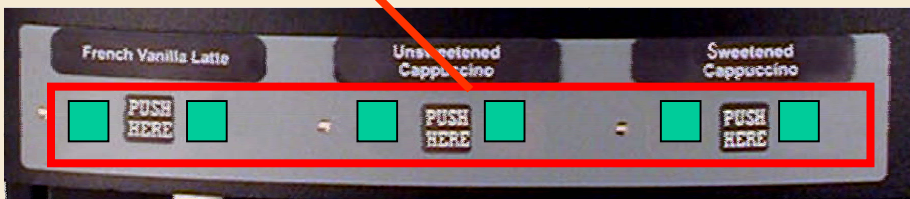
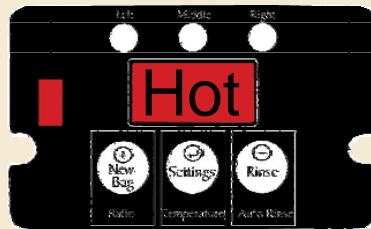
Step 2

Press and hold New Bag button until display changes to



Step 3

Press desired button on front screen to program. Display will change to a Temp Option



Step 4

Press New Bag (+) or Rinse (-) buttons until display reads "hot" or "cold (ambient)" water temperature



Hot or **Cld**

Press Settings button to store selection



Temp choice is now locked in for button.

Display changes to

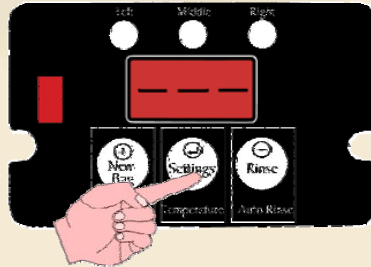


Repeat step 3 & 4 for remaining flavor buttons

Whipper Motor –Enable/Disable

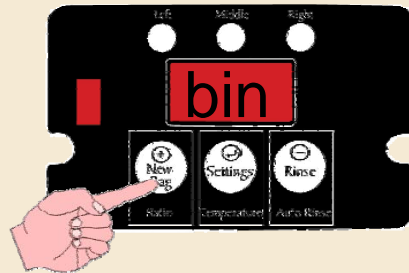
Step 1

Press and hold Settings button until display changes to



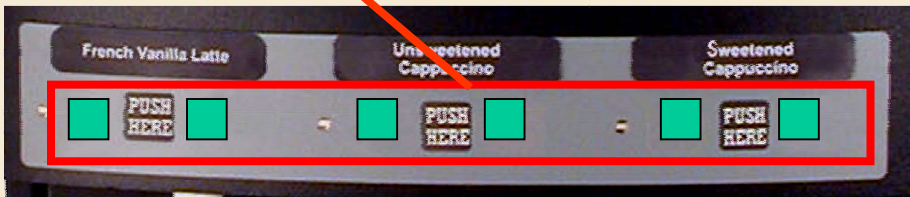
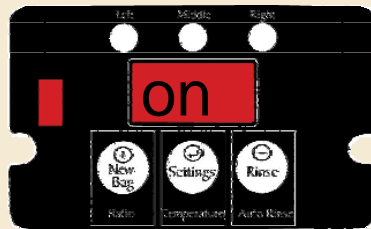
Step 2

Press and hold New Bag button until display changes to



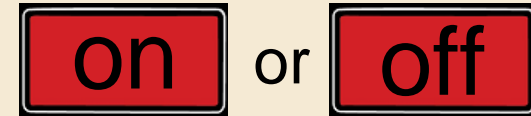
Step 3

Press desired button on front screen to program.
Display will change to
“On” or “Off”



Step 4

Press New Bag (+) or Rinse (-) buttons until display reads



If “off” is selected, Whipper is disabled.

If “on” is selected, Whipper enabled.

Press center button to store selection



Repeat step 3 & 4 for remaining flavor buttons