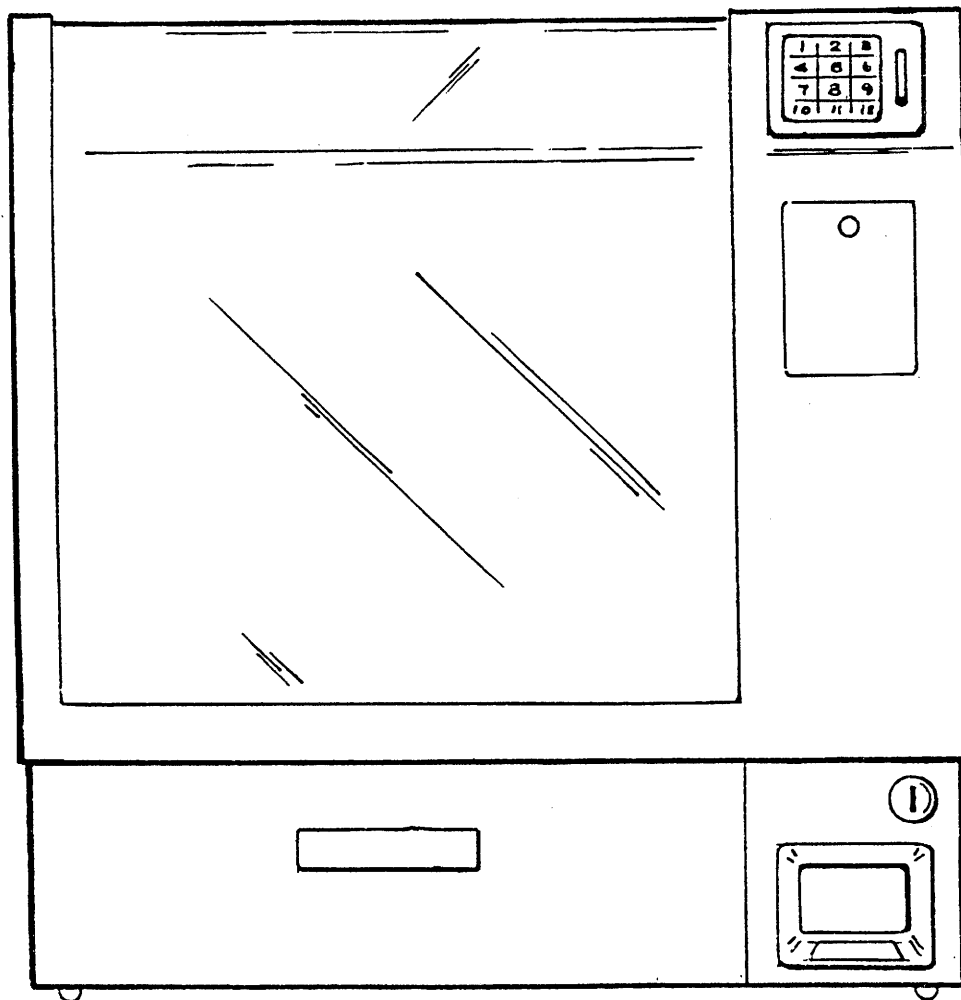


Service Manual

TABLE TOP GLASSFRONT



MODEL: 3003

Part Number 4200090

TABLE OF CONTENTS

Warranty.....	1
Introduction.....	2
Specifications.....	2
Installation.....	3, 4, 5, 6
Unpacking.....	3
Shipping Package.....	3
Grounding.....	3, 4
Power Requirements.....	4
Plug in Vendor.....	4
Coin Changer.....	4
Pricing.....	5
Loading.....	5, 6
Components.....	7, 8, 9, 10, 11, 12, 13, 14, 15
Full View.....	7
Coin Return.....	8
Selection Panel.....	8
Controller Board.....	8
Vend Motors.....	8, 9
Delivery Drawer.....	9
Main Product Shelves.....	9
Removal of Product Shelf.....	10, 11
Transformer.....	11
Circuit Breakers.....	11
Coin Mechanism.....	12, 13
Price Setting.....	14
Configurations.....	15
Wiring Diagram.....	16
Trouble Shooting Guide.....	17, 18, 19

WARRANTY

Model No. 3003 Table Top Merchandiser

1. This is a limited warranty.
2. The manufacturer warrants to the original retail purchaser each part of each new vending machine defective in its manufacture of for a period of twelve months from the date of shipment from the factory in Des Moines, Iowa. Removal or installation of parts not included. There is no warranty on the cabinet structure, light bulbs, fuses, finish or operating supplies.
3. To qualify for warranty replacement, all returns must be completed within the warranty period and accompanied by a record of the cabinet model and serial numbers. If found to be inoperative due to defects in material and/or workmanship, we, will at our option, repair or furnish a reconditioned or new replacement part at no charge. Transportation cost and removal and installation are not included in the warranty.
4. Any parts replaced during the warranty period are warranted for the time remaining on the original warranty.
5. This warranty does not apply to machines located outside of the United States, to reconditioned equipment, to equipment sold "as is" or to components designed to work on current other than 110/120 volts, 60 cycle as specified on the serial tag.
6. Title and risk of loss pass to the purchaser on delivery to the common carrier of the vending machine or replacement part. All loss and damage claims are the responsibility of the purchaser and must be filed with the delivering carrier.
7. This warranty does not include servicing.
8. The manufacturer reserves the right to make design changes, additions to, and improvements upon any of our products without incurring any obligations to incorporate same on any products previously manufactured.
9. This warranty is in lieu of all other express warranties or other obligations or liabilities on our part, and we neither assume nor authorize any person to assume for us, any other obligation for liability in connection with the sale of said machine or other part thereof. All implied warranties beyond the term of this limited warranty are disclaimed by the Company including warranty of merchantability or fitness for particular purpose.

INTRODUCTION

The Table Top Glassfront Vendor Model 3003 all of the machine functions are managed by a "Controller", located on the cover of the vendor.

The Controller Boards allows the selection to be priced separately and at various amounts, ranging from \$.00 to 3.15 in 5c increments.

The vending sequence of the Table Top Glassfront is a "First-in", "First-out", eliminating the need for stock rotation. The product drawers feature the "Vend The Item You See", therefore, a display item is not necessary.

The drawers are equipped with individual 24 volt D.C. motors and augers for each selection, along with a complete wiring harness for different drawer configurations. The top drawer may be filled in it's normal vend position; then raise the drawer and lock in up position to fill the lower drawer.

The capacity and product size may be varied by adding or reducing motors and augers in each drawer.

This service manual applies to the basic vendor and model as designated by the model code number. All correspondence and inquiries pertaining to specific machines should reference these numbers. Should you have questions pertaining to this manual or vendor, please contact your Local Distributor or Selectivend Service, 165 North 10th Street, Waukee, Iowa.

SPECIFICATIONS:

Height	23 inches	Coin Mechanism
Width	22 inches	Coinco C-300
Depth	24 1/4 inches	

POWER REQUIREMENTS
115 VAC, 60 CYCLES

TRANSFORMER
115 VAC PRIMARY
26 VAC SECONDARY
12 VAC SECONDARY

OPERATING AMPS
.5 AMPS

OPTIONAL EQUIPMENT
Cabinet Stand

CAPACITY
Small Auger - 11, 14, or 16 Items
Large Auger - 8 Items

INSTALLATION (CONTINUED)

UNPACKING

Remove all packing material and tape from the vendor. Certain parts are taped for shipment to prevent damage in transit. To try to operate the vendor without removing the tape from the moving parts may result in damage to the vendor.

This machine was thoroughly inspected before leaving the factory and the CARRIER has accepted this vendor as their responsibility. Any damage or irregularities should be noted at the time of delivery and immediately reported to the delivering carrier. Request a written inspection report form from the claims inspector to file any freight claim for damage. (FILE CLAIM WITH THE CARRIER, NOT THE MANUFACTURER) within fifteen (15) days after receipt of the machine.

SHIPPING PACKAGE

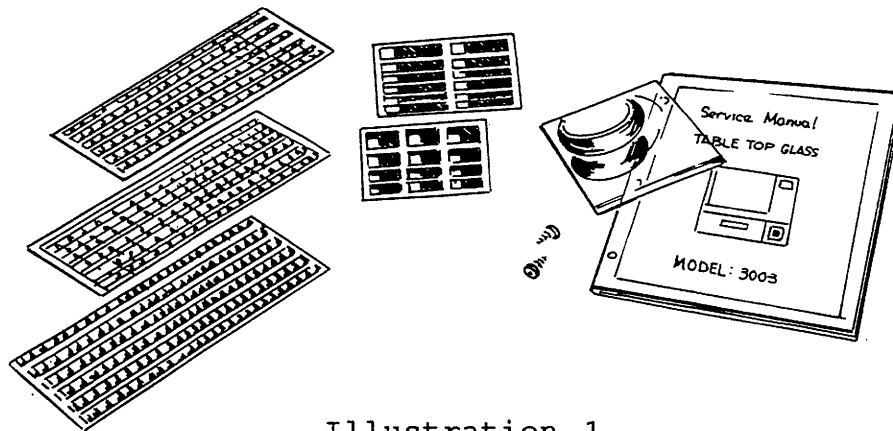


Illustration 1

Enclosed in the shipping package will be the following:
Selection labels number 1 through 12
Selection price labels
Mounting kit Two #10 wood screws / two flat washers
Pusher, small auger - two

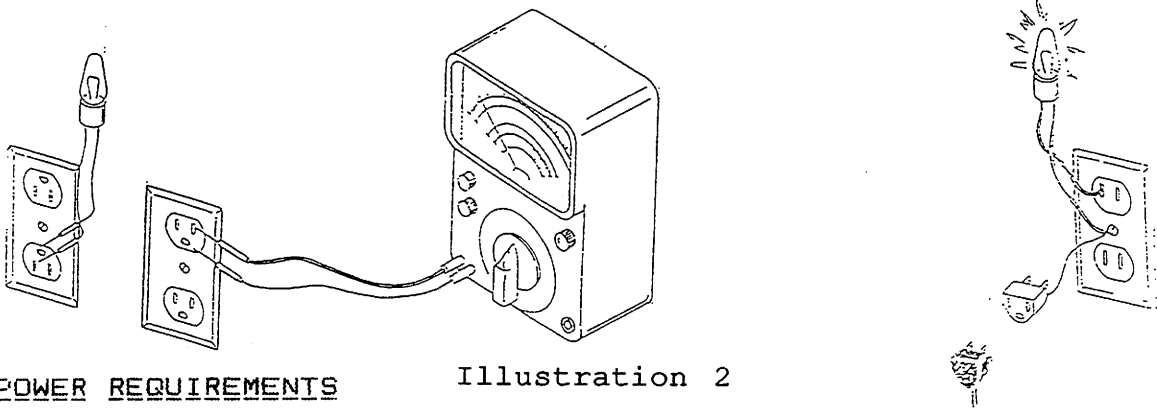
GROUNDING

All electrical equipment must be properly polarized and grounded. This vendor is wired so that it is properly polarized in accordance with the electrical code. If the wall outlet is wired and grounded properly, then the vendor will connect properly.

INSTALLATION (CONTINUED)

GROUNDING (CONTINUED)

Shown in Illustration 2 are two properly grounded and polarized wall outlets. One is a three wire grounding type wall outlet and one is a two wire wall outlet (See Illustration 1) with an adaptor in place. To make a polarity check, use a volt-ohm meter or a 115 volt neon test light as shown. The hot side of the circuit should always be counter clockwise from the grounded terminal with the grounded terminal at the bottom. If the polarity at the wall outlet shows any other way, than shown in the two figures indicated below, the outlet needs to be rewired.



POWER REQUIREMENTS

Illustration 2

The vendor requires 115 volts AC, 60 cycle, 5 AMP electrical circuit.

PLUG IN VENDOR

When the vendor is plugged into the proper circuit, the following should occur:

1. Correct change light will come on.
2. Beep will sound.

COIN CHANGER

The Table Top Glassfront vendor incorporates the use of a Coinco C-300 24 volt coin changer. The changer is mounted in the main cabinet on the right hand side divider. (See Coin Mechanism)

FILL THE COIN TUBES (Approximately 45 nickels and 67 dimes)

1. Unlock the top lid and raise the lid to full open position.
2. Fill nickels in changer coin tube.
3. Fill dimes in changer coin tube.
4. Correct change light will go out.

INSTALLATION (CONTINUED)

PRICING

1. Set prices at the Controller
(See Price Setting)
2. Place price labels on each selection.
3. Use coins to test each selection for operation and change payout.

LOADING

Open the lid to a full open position. The small diameter selection augers will hold 11, 14, or 16 items between the loops or spaces, depending on which auger is installed. The large diameter selection auger will hold eight (8) items between the loops and spaces.

When loading products into the augers, start at the last space or loop and place the products toward the front making sure to place a product into each "space" of the auger.

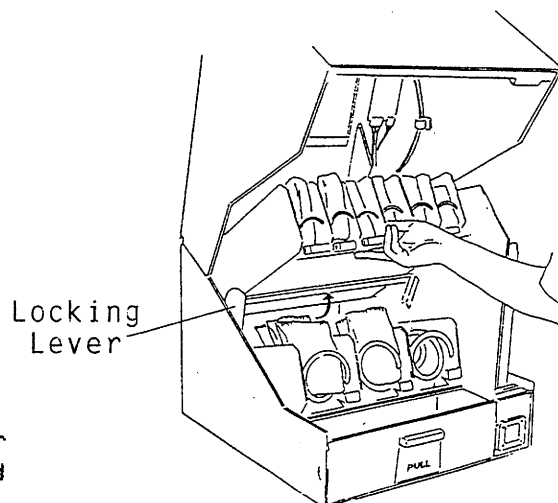


Illustration 3

TOP SHELF

With the lid in a full open position and the lid support engaged holding the lid open, the top shelf may be loaded with the product. Fill the product in the selection auger starting at the back and filling forward making sure to place an item in every loop or space of the auger.

BOTTOM SHELF

With the lid in a full open position and the lid support engaged holding the lid open, the top shelf may be tilted up and locked in the up position by using the locking lever on the right side divider. The bottom shelf may then be pulled forward in the vendor to reach the back of the selection auger loops or spaces for ease of filling item into the augers.

INSTALLATION (CONTINUED)

TO CLOSE VENDOR AFTER LOADING:

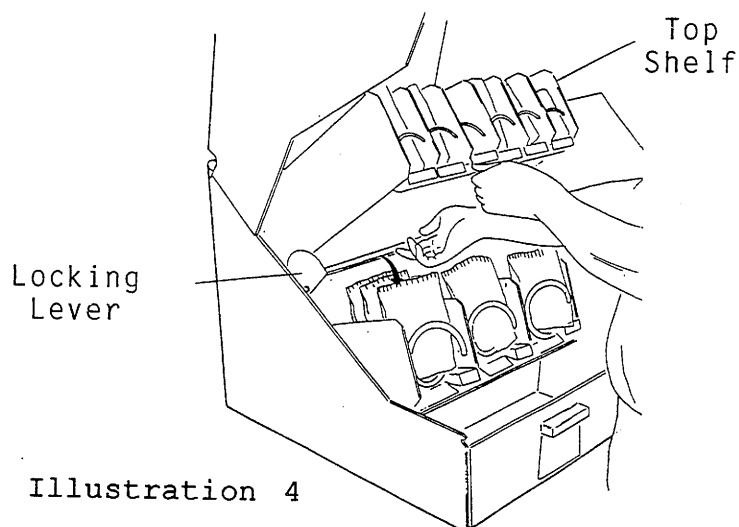


Illustration 4

1. Push bottom shelf back into the vend position in the cabinet.
2. Raise up on the top shelf and release the locking lever holding top shelf in the up position.
3. Lower top shelf to the vend position resting on the support pins.
4. Push up on lid and release the support by pulling forward on the support and lower the lid to the closed position.
5. Secure the lip and lock in place by using keyed lock in the coin return and cash box assembly.

IMPORTANT Product must not be forced into the spiral spaces. All product should fit freely. The width of the product must be greater than the diameter of the snack spiral. If the product is smaller it may fall through the spiral when the product is in the front vend position.

COMPONENTS

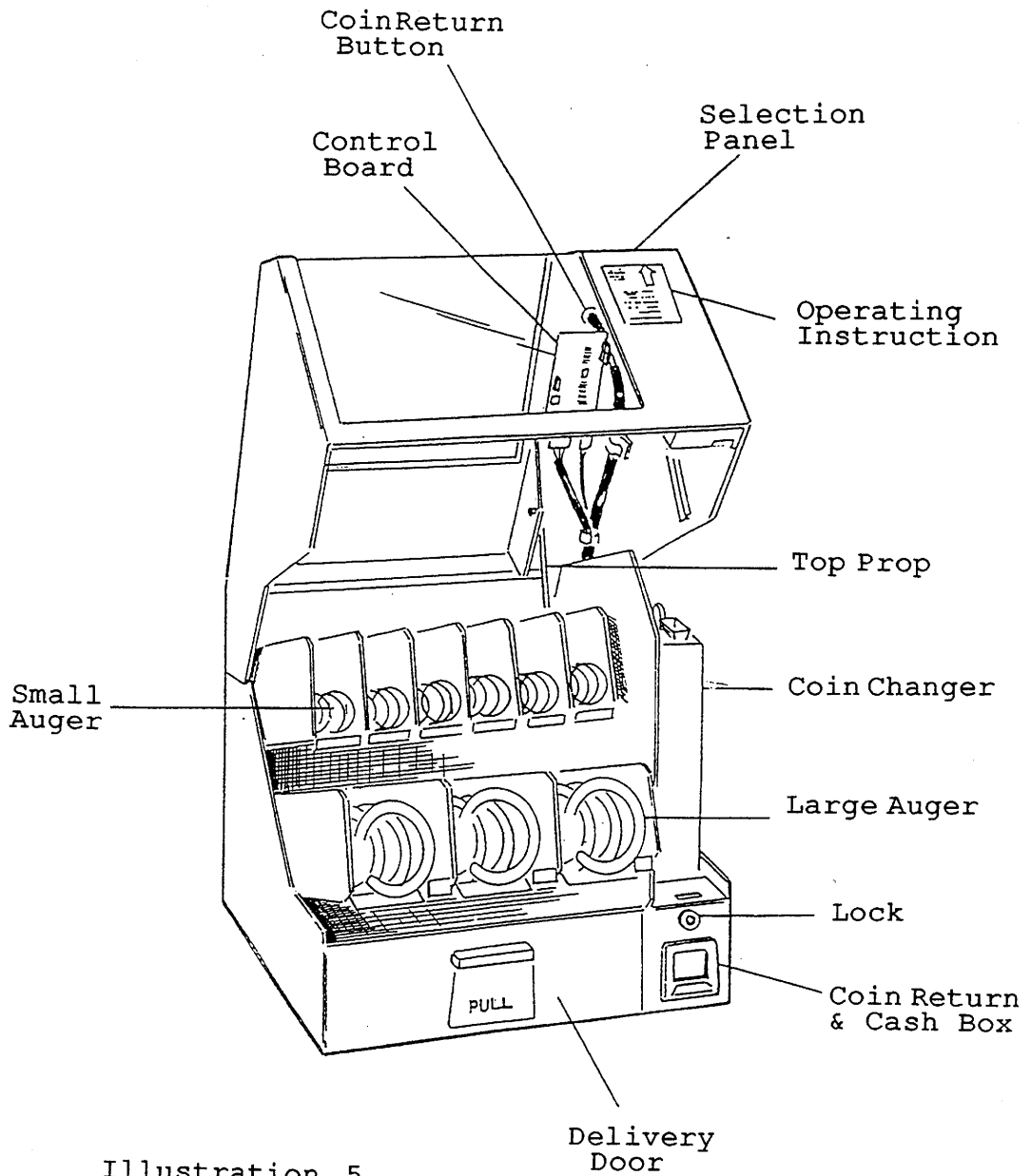


Illustration 5

FULL VIEW

COMPONENTS

COIN RETURN BUTTON:

The coin return button located on the top cover when depressed activates the coin acceptor to scavenge or clear the acceptor of any damaged coins. The coins will be channeled through the coin changer to the coin return cup located in the base of the vendor.

SELECTION PANEL:

The selection panel, located in the top cover, is a self enclosed membrane switch panel. This eliminates the need for individual switches and wiring. The selection panel is used to activate the vend circuit when making a selection and in the price setting mode to establish a vend price for a selection.

CONTROLLER BOARD:

The controller board (See Ill. 6), located on the top cover, directs the function of all components in the Table Top Glassfront vendor.

On the controller board is the service mode switch and the price setting switches. The service mode switch is used when setting prices in the vendor. The price setting switches are located in a red block with the white dip switches enclosed. When the top of the dip switch is pushed in the switch it is in the "ON POSITION".

1 = 5c	3 = 20¢	5 = 80¢
2 = 10¢	4 = 40¢	6 = \$1.60

Vend price is set by adding the value of all DIP switches in the "On" position.

EXAMPLE: Switches #2 and #4 in the "ON POSITION" = 50¢ vend price.

VEND MOTORS

The Table Top Glassfront incorporates the use of current limited "DC MOTORS". DO NOT TRY TO TURN MOTORS BY HAND. DAMAGE TO THE MOTOR WILL RESULT.

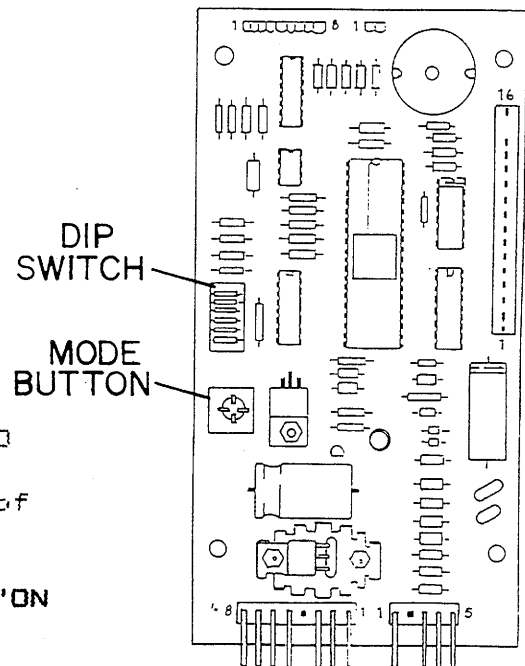


Illustration 6

COMPONENTS (CONTINUED)

VEND MOTORS (CONTINUED)

The vend motors are held in place by a "T" shaped lock and slide up and down in the back portion of the drawer unit. The motors are identical and can be changed with any other motor in the unit.

DELIVERY DRAWER:

The delivery drawer, located in the front of the main cabinet, is pulled forward or out after products are vended. When the drawer is pulled out an Anti-Theft guard will come forward covering the drawer to prevent access to the other items in the vendor.

COIN RETURN CUP, CASH BOX AND KEYED LOCK:

The coin return cup and the cash box is a one piece two compartment slide in assembly. The front portion is the coin return cup and the back portion is the cash box area.

Incorporated in the front of the assembly is a keyed lock for the drawer and lid assemblies. In the closed or locked position the keyed lock will secure the coin return and cash box assembly and activate the locking assembly for the lid of the vendor. THE KEYS FOR THIS LOCK WILL BE SHIPPED TAPED INSIDE THE COIN RETURN CUP.

MAIN PRODUCT SHELVES:

There are two (2) main product shelves per machine, each containing various selections, depending on the configuration of the shelves. Each selection has it's own vend motor and motor switch mounted to the back of the shelf. Each shelf has it's own wiring harness and plug for connecting to the remainder of the circuit through the cabinet. The motors and motor switches are the same on all shelves. It is possible to change configuration in each shelf by adding or removing motors and augers.

NOTE: When changing configuration of the shelves you will have to re-program the machine for price and selection.

COMPONENTS (CONTINUED)

REMOVAL OF PRODUCT SHELF:

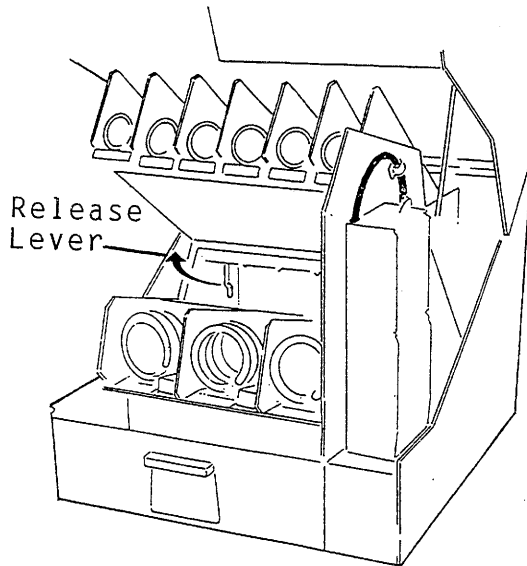


Illustration 7

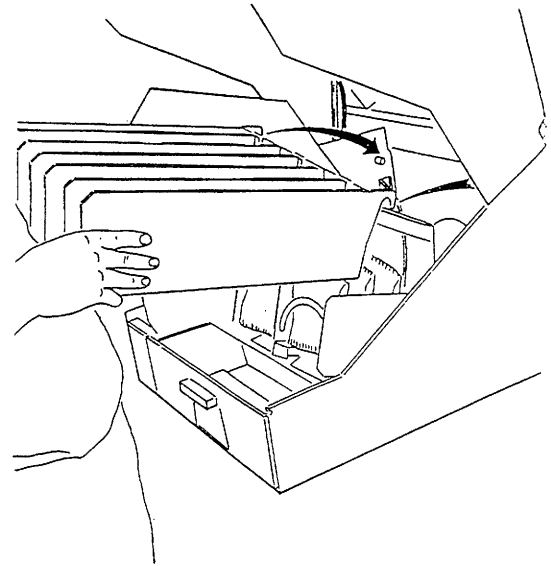


Illustration 8

The two (2) product shelves are held in place on mounting pins on each side of the shelf.

To remove the top shelf proceed as follows:

1. Open the lid to a full open position.
2. Disconnect the plug connection for the top shelf.
3. Pull forward on the release lever and hold forward.
4. Lift up on shelf and pull out to remove.

To re-install the top shelf proceed as follows:

1. Place shelf in position on mounting pins.
2. Re-connect harness plug to shelf.

COMPONENTS (CONTINUED)

REMOVAL OF PRODUCT SHELF: (CONTINUED)

To remove the bottom shelf proceed as follows:

1. Remove the top shelf as described in proceeding section.
2. Disconnect harness plug from shelf.
3. Lift up on shelf and pull shelf forward out of cabinet.

To re-install the bottom shelf proceed as follows:

1. Place bottom shelf in position on mounting pins.
2. Re-connect plug to wiring harness.

TRANSFORMER:

The transformer, located in the base of the cabinet on the right side, is a 115 VAC primary with two (2) secondary lines - 12 VAC and 26 VAC.

CIRCUIT BREAKERS:

The two (2) 1.5 amp circuit breakers, located on the transformer cover protects the controller board and the coin mechanism in the Table Top Glassfront Vendor.

COIN MECHANISM:

The table top glassfront vendor uses a Coinco C-300 24 volt coin mechanism only. The coin mechanism is shipped in the main carton on top of the glassfront vendor. The coin mechanism is mounted in the main cabinet on the right hand side divider and is secured by three philip-head screws. See Illustration 9.

PROCEDURE TO INSTALL THE COIN MECHANISM:

1. Disconnect the electrical power to the vendor.
2. Remove the coin mechanism from the carton.
3. Remove the coin acceptor upper portion of the coin mechanism. See Illustration 10. By lifting up of two plastic locking lever on each side of the acceptor. While holding levers up pull forward on the acceptor to remove from mechanism.
4. Locate the three mounting screws on the right inside divider (See Illustration 11) and loosen these screws 2 turns counter clockwise, to allow for the coin mechanism to slide behind the screw heads.
5. Notice on the inside of the upper portion of the coin mechanism, with the acceptor removed, the three slotted holes. See Illustration 12.

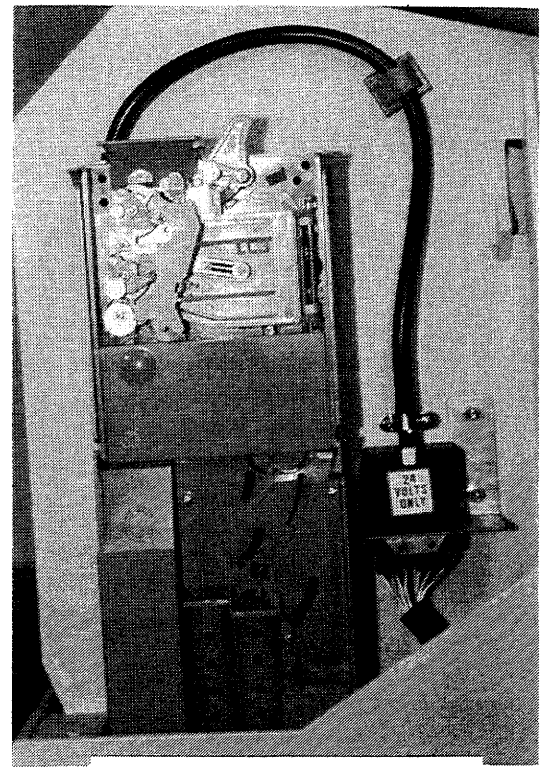


Illustration 9

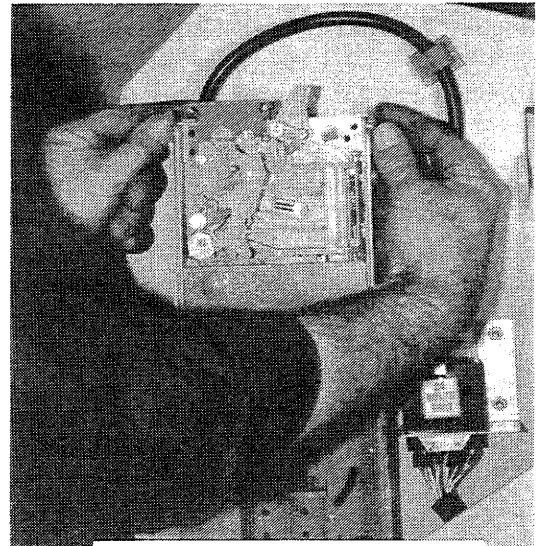


Illustration 10

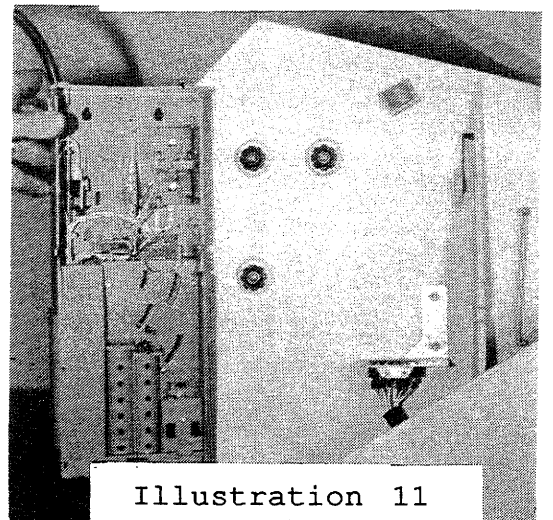


Illustration 11

PROCEDURE TO INSTALL COIN MECHANISM:

6. Position the coin mechanism on the mounting screw by using the three keyed holes. Allowing the screw heads to enter the holes and coin mechanism to slide down behind the screw heads. See Illustration 12
7. Using a philip head screw driver, snug the mounting screw up to the coin mechanism. See Illustration 14.
8. After securing the coin mechanism reinstall the coin acceptor removed in step 3. To install the coin acceptor, position the bottom pins of the acceptor into the coin mechanism and press firmly at the top outer edges to lock the acceptor under the locking levers.
9. Plug the coin mechanism into the rectable provided to the right on the coin mechanism. Notice the mechanism plug will only plug in one way into the rectable. See Illustration 13. Secure the coin mechanism cable into the plastic clamp provided.
10. Re-connect the electrical power to the vendor.

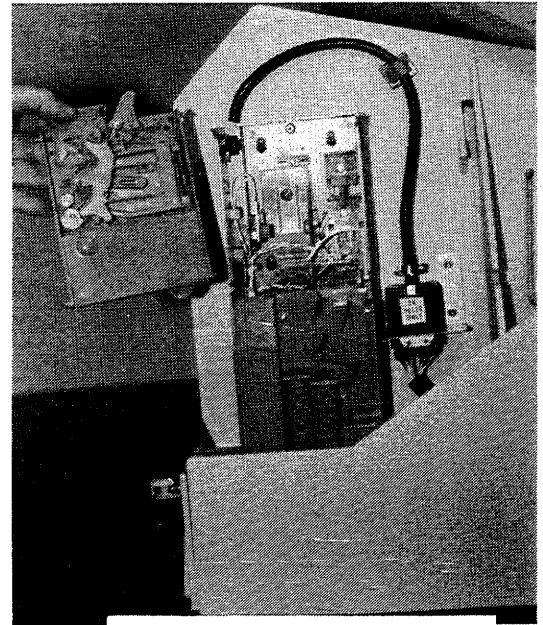


Illustration 12

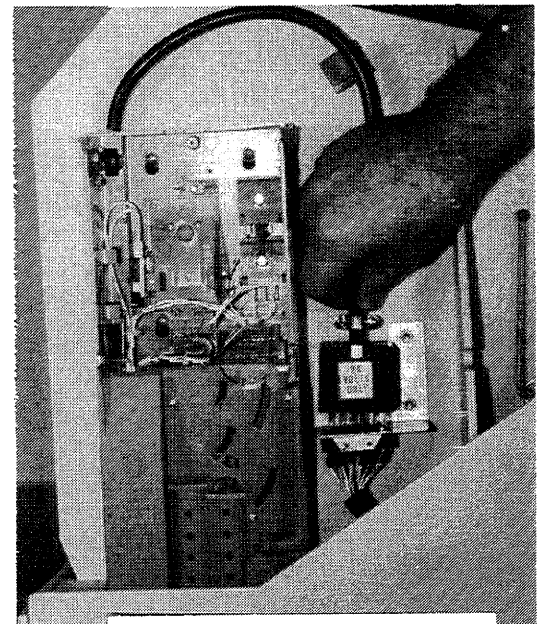


Illustration 13

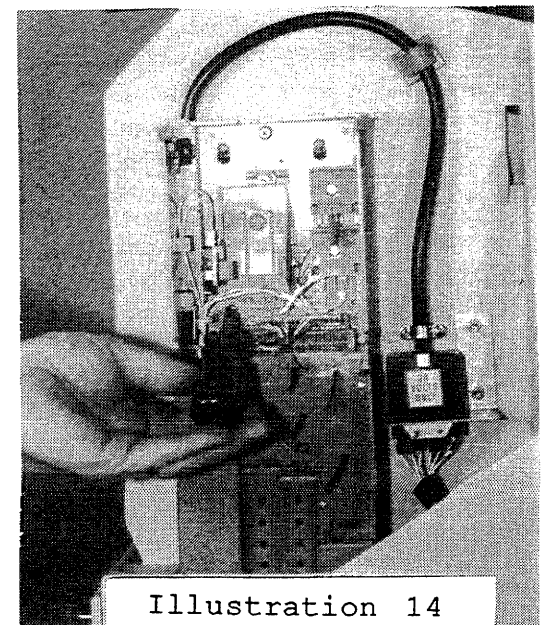


Illustration 14

PRICE SETTING

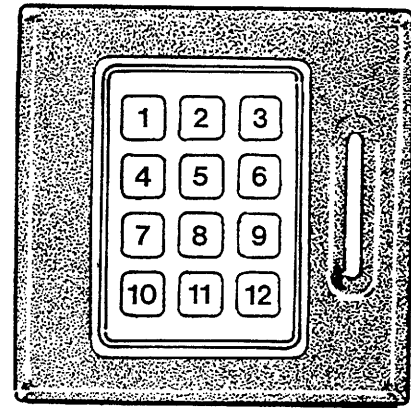
Pricing is done at the controller board and in conjunction with the selection panel. On the controller board is a block of pricing "DIP" switches and a service mode switch. (See Illustration 6 on page 6).

The pricing "DIP" switches correspond to prices as follows:

1 = 5¢	3 = 20¢	5 = 80¢
2 = 10¢	4 = 40¢	6 = \$1.60

The block is marked on and off to the position of the "Dip" switches. "Vend Price" is set by adding the value of all "DIP" switches in the "ON POSITION".

EXAMPLE: Switches #1 and #4 in the "ON POSITION" = 45 vend price.



Selection Panel

Illustration 15

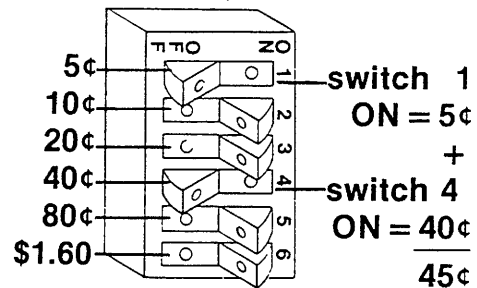


Illustration 16

The vend price may range from 0c to \$3.15 depending on what combination of "DIP" switches are in the "On" position.

SEQUENCE FOR PRICE SETTING:

1. Set all DIP switches to the "Off" position.
2. Set the DIP switches equaling the vend price to be set in the "On" position.
3. Depress the service mode switch on the controller board. (A beep will sound)
4. Using the selection number panel, depress the selection number or numbers to receive the vend price set on the DIP switches. (A beep will sound)
5. The controller will remain in the service mode for thirty (30) seconds from last depressing of a selection number. (A beep will sound)
6. To continue to set different prices set the block of DIP switches to the desired vend price. Depress the selection number to receive price.
7. Continue to set all vend prices in the vendor in the above manner. After completing the price setting, it is recommended, before closing and locking the vendor, that the service mode switches be depressed to re-activate the controller to the sales mode.

NOTE: Selection Price set to .00 will free vend.

CONFIGURATIONS:

The selection augers and motor may be changed to accommodate different variation of products. Large augers may be replaced with two (2) small augers or two (2) small augers may be changed to one (1) large auger.

Changing two small augers to one large auger -
Proceed as follows:

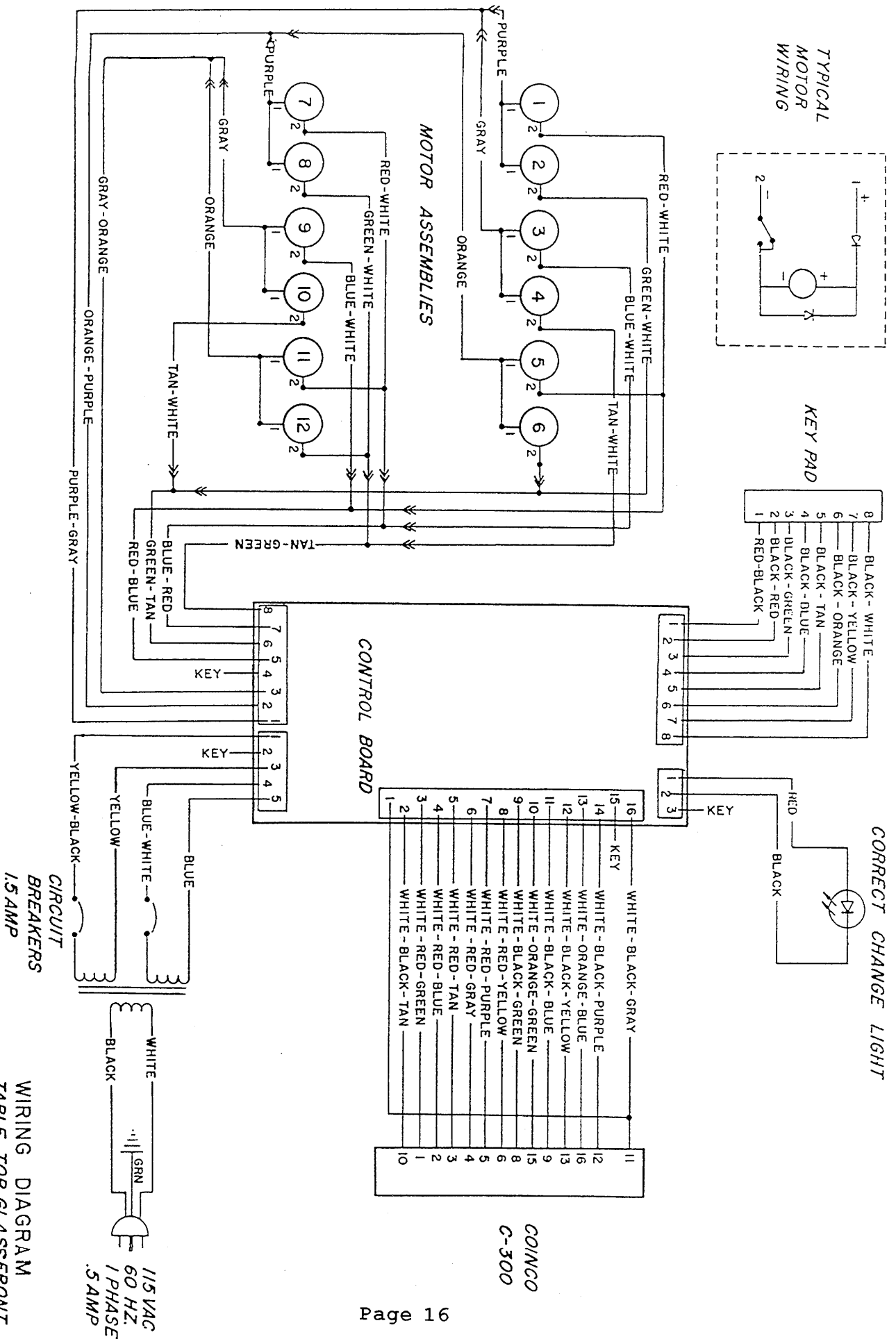
1. Remove shelf for ease of change (See removal of product shelves)
2. Remove the two small augers to be changed.
3. Remove center divider by lifting up and removing from shelf.
4. Remove the two adjustable liners.
5. Remove the vend motor to the right by disconnecting the wires and lifting out of the slot.
6. Move existing vend motor from the left slot to the center slot. Leave wiring connected.
7. Install wide adjustable liner.
8. Install large auger.
9. Set vend price.
10. Test vend the selection.

Changing one large auger to two small augers -
Proceed as follows:

1. Remove shelf for ease of change (See removal of product shelves)
2. Remove the large auger to be changed by pulling forward on the hub of the auger.
3. Remove the wide adjustable liner.
4. Move the vend motor from the center slot to the left slot and leave wires connected.
5. Install new vend motor in the right hand slot and connect existing harness wires to the proper terminals.

- NOTE: Make sure when connecting the wires to the new motor that the wires are connected to the proper terminals. Improper wiring could damage motor and the controller board.
6. Install new narrow adjustable liners.
 7. Install new small augers by inserting into motor and pressing auger spine inward towards motor.

- NOTE: For some narrow candy selection it will be necessary to index auger to different starting positions. The spline on the auger shaft allows for auger to be indexed every 20 degrees of rotation
8. Set the vend price for the new selections.
 9. Test vend selections.



WIRING DIAGRAM
 TABLE TOP GLASSFRONT
 Model No. 3003
 P/N 4200074

TROUBLE SHOOTING GUIDE

The following table contains a listing of possible trouble symptoms that could occur during vendor operation, the probable cause and suggested remedy.

PROBLEM	CAUSE	CORRECTIVE ACTION
Vendor rejects all coins	Machine not plugged into outlet	Plug machine into wall outlet
	Fuse or circuit breaker tripped at supply	Replace fuse or reset circuit breaker
	Damage or defective power cord	Repair or replace power cord
	Circuit breaker tripped in machine	Repair short causing the breaker to trip and reset breaker
	Five pin connector off of control board or loose	Connect five pin connector
	Broken or disconnected blue, blue-white, yellow or yellow-black from transformer to control board	Repair broken wire or reconnect wire
	Dirt or foreign material in coin acceptor	Clean the coin acceptor
	Sixteen pin connector on control board to coin mechanism unplugged or bad contact or miss aligned with pins on the control board	Check sixteen pin connector for continuity and bad connection to board
	Coin mechanism is not plugged into receptacle or loose connection	Check coin mechanism plug or tighten connections
	Bad coin mechanism	Replace coin mechanism
	Bad transformer	Replace transformer
	Bad control board	Check for burnt components or cracked control board

TROUBLE SHOOTING GUIDE

PROBLEM	CAUSE	CORRECTIVE ACTION
<p>Vendor accepts coins, will not vend or more selections</p>	<p>Harness from control board to key pad disconnected, loose or broken wire</p>	<p>Connect harness to the control board, check for loose or broken wire or connector</p>
	<p>Harness from control board to shelves disconnected, loose or broken</p>	<p>Connect harness to control board. Check for loose or broken wire or connector</p>
	<p>Shelf harness disconnected, loose or broken</p>	<p>Connect shelf harness to main control harness. Check for loose or broken wire or connector</p>
	<p>Jammed vend motor</p>	<p>Check to make sure product is not too tight fitting in the auger</p>
	<p>Wire connection to vend motor disconnected or loose</p>	<p>Check vend motor wiring for loose or broken wire and wired properly</p>
	<p>Wire connection to common of vend switch is disconnected or loose</p>	<p>Check switch wiring for broken, loose, or mis-wired connection</p>
	<p>Wires from vend switch to the motor circuit board broken or loose</p>	<p>Check for bad solder joint at circuit board</p>
	<p>Selection price set wrong</p>	<p>Check selection for proper price setting and price label</p>
<p>Bad control board</p>	<p>Replace the control board</p>	
<p>Vendor accepts coins and vends product - will not give out change or wrong change</p>	<p>Selection price not set properly</p>	<p>Check selection price and price label</p>
	<p>Coin mechanism payout tubes jammed</p>	<p>Check for bent coins in the payout tubes of the coin mechanism</p>
	<p>Coin mechanism bad</p>	<p>Replace coin mechanism</p>
	<p>Control board bad</p>	<p>Replace the control board</p>
	<p>Faulty key pad (selection buttons)</p>	<p>Replace key pad</p>

TROUBLE SHOOTING GUIDE

PROBLEM	CAUSE	CORRECTIVE ACTION
Vend motor stopped during cycle	Product jammed in the auger Faulty vend motor Vend motor switch or wiring loose or broken	Product too thick for auger spaces - remove product Depress service mode switch wait 5 seconds, depress service mode switch again to go into sales mode. Try to vend the jammed selection. If it does not operate, change the vend motor Check the switch for continuity and wiring to the switch and motor circuit board for loose broken wires
<p>NOTE Do NOT attempt to turn the auger or motor by hand. Damage to the motor may result.</p>		
Product does not vend properly - hangs on front of shelf	Product too large for auger Product hangs up under auger at front edge Product not loaded properly in the auger	Change product Index auger to different starting position Install product pusher on auger Sliding shelf liner not adjusted properly See: Product loading
Auger came out of vend motor during cycle	End cap missing from the auger shaft behind the motor	Replace end cap
Product delivery drawer binding	Foreign material in the track for the drawer Linkage arm broke Drawer return spring off or broke Anti-theft cover binding in track or not in track properly	Check track and clean Replace linkage arm Replace spring Clean track and the anti-theft cover aligning pins for sliding properly

