Polyvend, Inc. Glass Front Service Manual



Series 4000, 5000, 6000 & Mid-Size Service Manual



Polyvend Inc.

Series 4000, 5000, 6000 & Mid-Size Service Manual

RECORD OF REVISION OR CHANGES

In order to assure the availability of the most up-to-date accurate information, Polyvend Inc. periodically issues service bulletins and supplements describing equipment and manual changes. Use the chart provided below to record any changes that affect this manual or the equipment.

SERVICE BULLETIN NO.	PAGE NO.	DESCRIPTION	DATE INC.
KOOZ	#	PV 6690	
		<i>.</i>	
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Date: 3-1-88

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Models 4000, 5000 & 6000 Polyvend Automatic Snack Merchandiser

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WARRANTY =

LIMITED

Polyvend, Inc. Warrants this equipment, to the Original Purchaser only, for a period of twelve months from date of shipment, to be free from significant defects in material or workmanship. Purchased components which are part of this equipment are warranted to the extent such parts are warranted to Polyvend, except for filter cartridges, starters, light bulbs and fuses, which will be warranted for two months from date of shipment.

Should any part prove defective within the warranted period, Polyvend, Inc. will repair or replace (at its option) the defective component, but will not provide the labor, removal or reinstallation costs associated with such parts. All returned products or parts must be shipped freight prepaid to Polyvend, and Polyvend will then prepay the shipping cost of the returned goods. Polyvend reserves the right to refuse any collect shipment. Any part returned under terms of this warranty must be accompanied by a Polyvend Parts Return Form identifying the model, serial number and a brief description of the defect or failure.

This warranty applies only if the equipment is serviced and maintained in strict accordance with the instructions given in the Polyvend Service Manual, and that no unauthorized repair or disassembly has been done. Any defect caused by improper source of power supply, abuse of product, accident, alteration, vandalism, mineral build-up or improper cleaning or service techniques will not be covered by warranty.

Polyvend service or repair to items not in warranty will be subject to service charge. For warranty or service information call or write Polyvend Service Department.



700 SOUTH GERMAN LANE, CONWAY, ARKANSAS 72032 (501) 327-1301

A-559

POLYVEND MODELS Automatic Snack Merchandiser Service Manual

GENERAL

The Polyvend 4000, 5000, & 6000 machine has been developed specifically for the display merchandising market. Each of the dispensing units may be activated by push button selection of a letter (A to E) and a number (0 to 9) after sufficient credit has been established in the coin mechanism.

Two types of module dispensers (wedge and tray) are supplied for optimum production selection. Dispensers are readily removable from the front for replacement or repair.

SPECIFICATIONS

OVERALL DIMENSIONS:	FULL SIZE	MID SIZE	
Height	28½"	31½'' 28½''	(without legs)
ELECTRICAL: Primary	10/24 VAC		
CAPACITY: Wedge Dispensers		EACH 12 pieces	
Helix Dispensers-3/4" pitch		16 pieces 12 pieces	(crackers & candy) (crackers & candy)
1 1/8" pitch		10 pieces	(chips & pastry)

Note: Polyvend, Inc. is not responsible for faulty or overloaded circuits within the facility where Polyvend machines are installed. The exact load imposed by the machine is stated above. The sum of all devices connected in to a particular circuit will determine the total line load.

FOR SERVICE CALL POLYVEND, INC. 1-800-643-8250 OR 501-327-1301

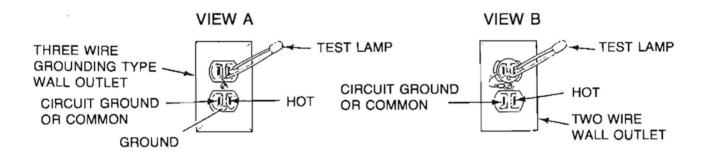


INSTALLATION INSTRUCTIONS

In order to comply with electrical safety regulations and Underwriter's Laboratories requirements, all electrical equipment must be properly polarized and grounded. The Polyvend machine 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.

Shown in view A and B are two properly grounded and polarized wall outlets. One is a three wire grounded type wall outlet (see View A), and one is a two wire wall outlet (see View B) with an adapter in place. To make a polarity check, use a 115 volt neon test lamp as shown, or a volt ohm meter. The hot side of the circuit should always be counterclockwise from the ground terminal, (which should be at the bottom).

Should the polarity at the wall outlet show any way other than that shown below, the outlet should be rewired.



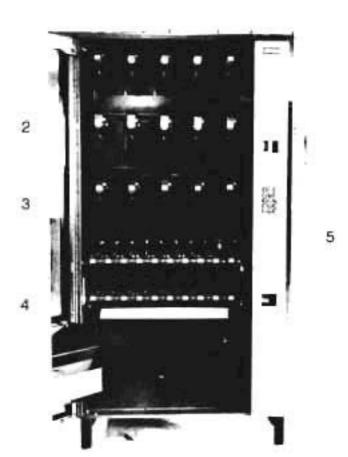
UNPACKING & INSTALLATION

- Remove shipping material from around machine by cutting the shrink wrap at the top.
 Cut downward keeping the knife over a cardboard corner post.
- Inspect for damage resulting from improper handing and, if evident, file claim immediately with the carrier.
- Remove the machine with an appliance mover or hand truck. Tip the machine backward onto the appliance mover or hand truck. Then remove the lower shipping skid.
- Place machine into position and adjust leveling legs (See No. 1) so it is level and all legs touch the floor.
- Locate small envelope inside delivery compartment and remove keys.
- Open service door (See No. 2) and remove all internal packing material.



UNPACKING & INSTALLATION Cont.

- Remove the coin changer from the top of machine, (if not already installed in machine).
- Remove envelope with price decals from product delivery compartment. Place decals on their respective dispenser locations.
 - Wedge dispensers (with plastic number tab): Place the price decal just above the number in the outline provided. (See No. 3)
 - Helix tray: Place the price decal on the front of tray, just to the right of the number. (See No. 4)
 - Gum & Mint option (if used): Place price decal on front cowling as shown. (See No. 5)





UNPACKING & INSTALLATION Cont.

- Save extra fuses, etc. found in the envelopes as spare parts for later use.
- Install coin equipment in the slide out drawer, (if not already installed). (24 volt only)-see
 Caution note at bottom of page.
- The main power cord is taped to rear of the machine. Plug the 3-pin grounded plug into a properly grounded 115V 60 HZ outlet only. (See Installation instructions on page 2)
- Set coin equipment to the desired price levels in accordance with the coin mechanism instruction sheet or the instructions provided in the "Electrical Service" portion of this manual.
- Check operation of the service door and lock.
- Check operation of machine by inserting coins.
- Ensure that all wedge dispensing chains are running free inside their guides and stop in the proper locations.
- Ensure that all helix dispensers run in their channels and stop at the proper locations for product dispensing.
- Load the machine with product. (See "Product Loading")
- Check that all wedge module arms "click" home. (See page 7)
- Check that the helix trays latch.
- Electrical panel sliding drawer must be completely closed before closing and locking the product loading door.

If additional service manuals are required, send request to:

Polyvend, Inc. 700 South German Lane Conway, Arkansas 72032 A/C (501) 327-1301

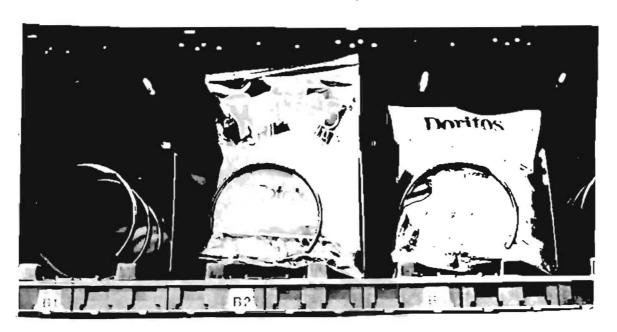
Caution: Coin equipment provided in this machine is for 24 volt operation only, which is provided by a 24 volt step-down transformer in the electrical panel. If coin equipment service should be required, do not test with 110 volt circuitry.

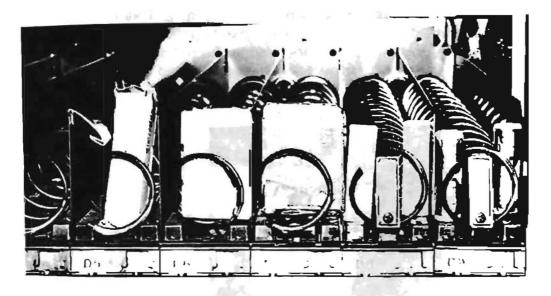


PRODUCT LOADING INSTRUCTIONS

- 1. Chips/Pastry
- 2. Candy

See Samples





PRODUCT LOADING INSTRUCTIONS

All product loading in the 4000, 5000, & 6000 Series is accomplished from the front. Using one of the keys provided, open the door to the product loading compartment.

There are three different types of dispensers:

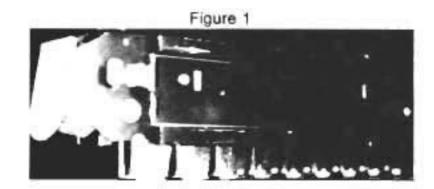
- (1) Wedge-primarily for bagged product
- (2) Helix-for bagged or boxed items
- (3) Gum and Mint Dispenser

(1) WEDGE DISPENSER

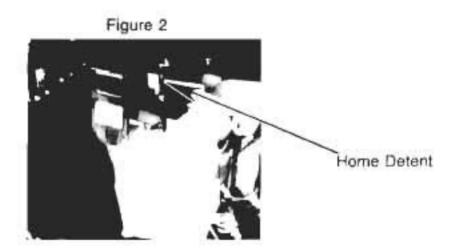
To load, release the latch on each dispenser as shown in FIGURE 1 and pull forward until the slide hits the stop.

Release Spring

Home Detent



Each bag is inserted into a wedge assembly as shown in FIGURE 2. This can be done many ways; however, there is a best way which consists of inserting the bag into the wedge at an angle and sliding the bag until centered in the wedge. Do not attempt to load last position on each chain. Release product by pressing lever up behind bag.



WARNING: DO NOT ATTEMPT TO PULL PRODUCT FROM THE BAG DISPENSER

AT ANY TIME. SUCH ACTION WILL EITHER JAM THE MECHANISM

OR PULL THE WEDGE ASSEMBLIES APART



(2) HELIX DISPENSER

If needed for narrow products use spacer rail.

FOR ADDITIONAL RAILS ORDER:

SPLIT

P/N 18244-01 for models 2000 series. P/N 18244-02 for models 4000, 5000, & 6000 series.

PRESS ON SPACER RAIL INSTALL AS SHOWN (Reversible to adjust spacing)

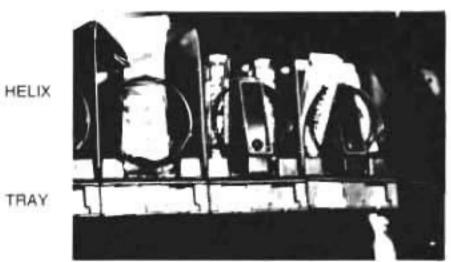


Figure 3

TALL PRODUCT SHOULD REST ON TRAY NOT ON HELIX

Polycend_

HELIX TRAY DISPENSERS

There are several helix pitches. To assure proper operation and maximum capacity, the product size should closely match the opening between the winding of the helix. The product should fit between the windings of the helix so as NOT to be tight but should fill most of the opening.

The helix sizes listed below may be used:

3/4" Helix (Thinnest Candy Bar)

1 1/8" Helix (Thin Candy Bar)

1 3/8" Helix (Medium Candy Bar)

1 5/8" Helix (Large Candy Bar)

Split Helix Available

2" Helix (Chip & Pastry)

1 5/8" Helix (Medium Chip or Pastry)

1 1/8" Helix (Large Cookies)

To load, release the white plastic stop on bottom right of tray. Lift the front edge of the helix tray while pulling forward on the tray. Pull the tray out until it hits stop. Then let it tilt down into the loading position.

At this point, check that each helix is in its proper position. The figure shows proper and improperly positioned helices.

Starting at front of the tray, insert product between each winding of the helix so that the name of the product is displayed frontward. Be sure to place product all the way to the bottom of the tray and tilt free end at top backwards. Fill from front to back and be sure not to miss any positions. After filling, lift front of tray and push tray back in all the way until the latch is engaged. Check that latch is fully engaged by pulling forward on tray and ensuring that the tray does not advance beyond latch.

Figure 6



Candy Helix in Detent Position

Figure 7



Chip (Large) Helix in Detent Position

NOTICE

Special loading instructions for box type product or thick flat bottom candy.

Candy Tray Only!!

Certain candies and cigarettes have flat or semi-flat bottoms which are thick and wide. Polyvend has designed into our helix the flexibility to be 100% sure of the vending of this type of product. By moving the position of the helix and thus the kicker, it ensures the best dispensing for boxed products. You simply unlock the helix by twisting the helix counterclockwise and continuing the rotation 90 degrees, and relock the helix by twisting clockwise 10 to 15 degrees. The helix should be in the position as shown below.

Figure 4

Kicker 90 degrees from normal for thick or box type product.



SPLIT

Kicker at bottom normal



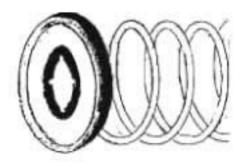


Figure 5

As you can see, the coupling has two locking pins and the hub has four slots. Unlock by twisting left and lock by twisting right.



HELIX DISPENSERS

Visual observation of the helix trays and the assembly drawing will aid in the removal of these assemblies. However, notice of the following instructions will further reduce handling.

HELIX REMOVAL

An individual helix can be removed for cleaning, repair, or replacement with a different pitch while the tray is either in or out of the machine by grasping the helix and twisting 1/4 turn counterclockwise. Then pull forward.

HELIX TRAY REMOVAL

Lift the white cam on the right side of the helix tray to clear latch and pull forward until contacting the stop that allows the tray to tilt down for loading. Lift the front of the tray and lift the same white cam while pulling forward. To clear the machine, grasp the tray at front and back, lift it out to place on a work surface.

To replace, reverse the operation. Grasp the tray, engage the rear rollers in the track and slide the tray high to clear the stop and push into the loading position. Load product, lift, and push into the latched position.

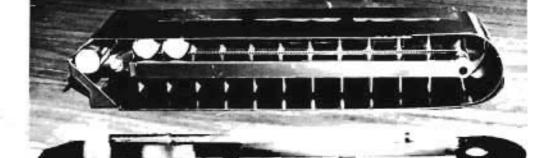


(3) GUM & MINT DISPENSER (OPTIONAL)

This five select gum, mint or tube candy dispenser is available in kit form or can be installed at the factory at the time your machine is built. Each module will hold twenty-four (24) items up to one inch in diameter, and five inches in length. All machines are prewired from the factory (see figure 10). The unused harness plugs to the motor harness installed on the kit. See installation instructions on next page.

Loading Instructions

- Lift and pull module forward, clear of tracks.
- 2. Remove side plate and load product. (See below)
- 3. Re-install side plate and reverse procedure #1.
- Re-program machine.



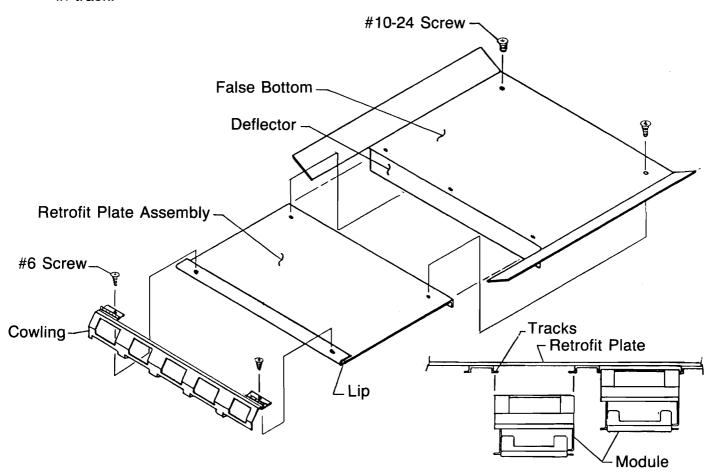
Loading Position

Snap cover in position with leading edge of cover under bracket as shown.

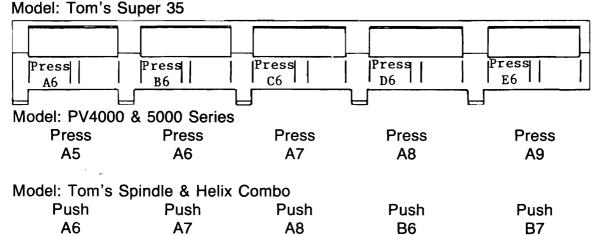


GUM & MINT INSTALLATION INSTRUCTIONS

- 1. Remove deflector from front of false bottom and discard screws and deflector.
- 2. Attach retrofit plate assembly by sliding plate under false bottom so that lip engages front edge of false bottom (use 2 large screws provided), and connect harness to mating plug near power box.
- 3. Attach hinged cowling. (Use 2 small screws provided.)
- 4. Tilt cowling up and slide modules into tracks on retrofit plate as illustrated. Lift up on front of module during last few inches of travel to allow front stop block to fall into notch in track.



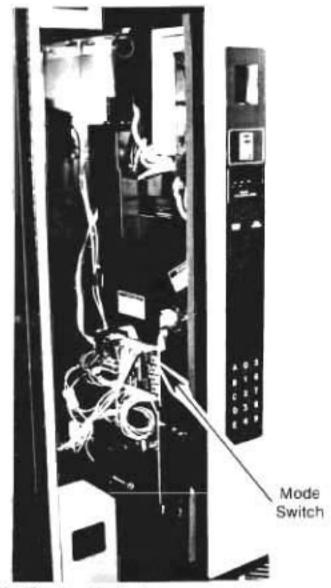
5. ATTACH SELECTION NUMBER DECALS TO COWLING FRONT AS FOLLOWS:





PRICE SETTING INSTRUCTIONS

- Open the service door and pull out the sliding drawer to obtain access to the controller board. Locate the controller board directly above the coin mechanism.
- Push MODE switch (top switch on the controller board) and release. (See controller picture to the right.)
- Make any selection by pressing a letter and a number. The current price will be displayed. To increase price in nickle increments; press "9". To decrease price; press "4". When desired price is reached, release the button. If more selections are to be set at the same price press "5". (The beeper will turn on and off repeatably during this mode.) Now press each selection to be set at this price. (First the "letter", then the "number".) Pressing "0" will return you to the service mode. Repeat step 3 until all selection prices have been set. The Vendor can be returned to the Sales Mode. by pressing the Mode Switch again or it will automatically return to the sales mode 25 seconds after the operation has been made. DO NOT forget to label the end of the cover bar with the appropriate price sticker.



To free vend or test vend:

Press Mode Switch to place the Controller in the Service Mode, then:

- To run all selections, press "8". Each selection will run in turn showing first the selection number then the price of that selection in turn starting with "E" and the highest number in each row*.
- To run 1 horizontal row (eg. "A"), press "7", then press row letter. Each selection in that row will run in turn starting with the highest number.
- To run individual selections, press "6" then the selection letter and number.

NOTE: To STOP a function such as vending all selections press and hold "0" until the operation stops.

"In this mode, "0" is considered to be the highest number.



COIN COLLECTION

The coin bank is located in the bottom right hand side of machine and is accessible when the front door is opened. An optional lock and key are available to provide additional security. To open, tilt the top of the bank to the left until it can be removed. Lift and remove coin bank, empty the coins and replace by reversing the procedure. (Figure 8)



All electrical components in this compartment are low voltage. (See Figure 9) The 115v transformer, light ballast, fuses are located in a power box attached to the right rear brace in the back of the storage area. (See Figure 10 for high voltage electrical box.)



Figure 8



Figure 9



CONTROL PANEL REMOVAL (Slide Out Drawer)

With service door open, pull "slide out" drawer to the stop. Reach up from below the "Display Bottom" to the rear of the drawer and disconnect the two harness connections. Now release the stop spring (enter top of drawer) and pull drawer to full open. Remove (4) screws from slide in center of drawer. Two must be removed through the large hole in center slide section. Be careful **NOT** to allow drawer to fall when removing these screws, then lift and remove from guides. Reverse this procedure to reinstall.

REAR ACCESS PANEL

A large access panel is provided on the rear of the machine. Its only purpose is to permit access to the wiring in the rear of the machine. To remove it, locate the keys provided in the spare parts bag, insert them into the locks and unlock them. Pull top away from cabinet then lift the bottom of the door away from the cabinet and remove. Handle carefully to prevent dropping and damage.

NOTE: Rear access panel is for convenience only. ALL SERVICE CAN BE HANDLED FROM FRONT OF MACHINE.

STORAGE COMPARTMENT

The storage compartment is shown below the product display area and is accessed by opening the front door. Leave room for the delivery compartment when using the storage area.

GUM & MINT HARNESS

110 VOLT FUSE

LAMP STARTER

HIGH VOLTAGE ELECTRICAL BOX

COIN BOX

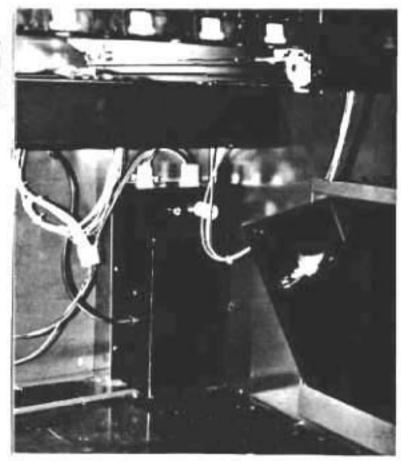


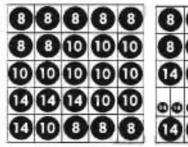
Figure 10





Capacity/Configuration Chart

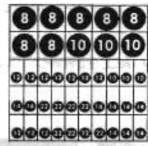
5000 SERIES



PV5525 CAPACITY 246* PV5530 CAPACITY 354*



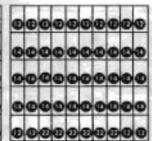
PV5535 CAPACITY 428*



PV5540 CAPACITY 538*

•)	•)	•)	1	0	0	0
0	0	0	0	0	0	0	9	0	0
0	0	0	0	0	0	•	0	Ø	0
0	0	9	9	0	0	0	0	0	0
			6		6	•	•		6

PV5545 CAPACITY 598*



PV5550 CAPACITY 720

MODEL PV2210



PV2210 CAPACITY 109

Snack	Product	Candy	Product
Helix	Thickness		Thickness
11 Count	1"	17 Count	t %
8 Count	1%"	12 Count	1
6 Count	11/8"	10 Coun	t 1%"

6000 SERIES

0	0	0	0	0	Ī
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0	0	0	0	0	
0	0	0	0	0	1
			0		
0	0	0	Ŏ	8	Ì
	P	663	0		,

CAPACITY 290*

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PV6635 CAPACITY 390*

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PV6640 CAPACITY 476*

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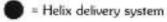
PV6645 CAPACITY 586*

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0	0	ø	Ð	Ø	Ø	0	Φ	Ø	0

PV6650 CAPACITY 644

Product	Size	Capability
Froduct	Size	Capadillity

Snack Helix	Product Thickness	Candy Helix	Product Thickness
14 Count	1"	22 Count	%"
10 Count	11/2"	14 Count	1"
8 Count	1%	12 Count	11/4"
	5000	10 Count	11/2"



^{*}Optional gum and mint adds 5 selections and 120 items to capacities shown.

Polycend* Capacity/Configuration Chart

4000M SERIES

PV4416M PV4424M CAPACITY 306* PV4420M 0000

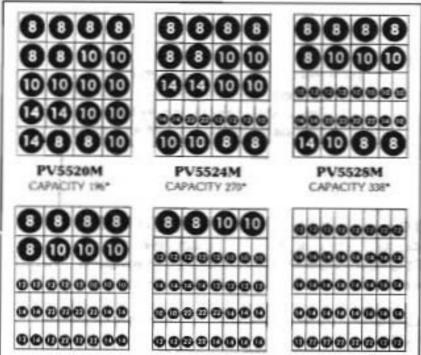
•	,	•	,	•	,	Ų	9
0	0	0	Φ	Φ	0	0	0
0	Ø	Φ	0	Ø	ø	Φ	0
0	0	Θ	0	0	0	9	0
		1	44	25	M		

CAPACITY 370*

00000000 0000000 00000000 0000000

PV4432M CAPACITY 448*

5000M SERIES



6000M SERIES

0000	0000
2000	2000
0000	0000
$\mathbf{\omega}$	\mathbf{o}
0	$\mathbf{G}\mathbf{G}\mathbf{G}\mathbf{G}$
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CAPACITY 202*	CAPACITY 301*
8888	8888
8888	
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<b>6000</b>	0000000
PV6632M	PV6636M
CAPACITY 372*	CAPACITY 464*
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Product	Size	Canabil	itu
a a consequence	ALC: UK	- Capacia	** 3

Snack Helix	Product Thickness	Candy Helix	Product Thickness
14 Count	1"	22 Cour	nt %"
10 Count	1½"	14 Cour	nt 1"
8 Count	1%-	12 Cour	nt 11/4"
		10 Cour	at 11/2"

PV5532M

CAPACITY 436*

PV5536M

CAPACITY 482*

PV5540M

CAPACITY 578*

⁼ Helix delivery system

^{*}Optional gum and mint adds 4 selections and 96 items to capacities shown.

## **ELECTRICAL SERVICE**

#### CONFIGURATION

Configuration will occur during power-up and will test for motor presence using the undercurrent test only.

On power-up the display will show the number of motors that are in working order. All motors which meet the under-current limit will be included in the configuration. Any motor which was configured but is not found will have its fail flag set.

During normal vending a motor's fail flag will be set if:

- a) the under-current test fails (motor draws less than 35ma).
- b) the over current test fails (motor draws more than 444ma at any time after 250 ms have elasped since motor start).
- c) the motor meets the current limits but fails to home within 8 seconds or fails to leave "home" within 1 second of motor start.

On entering Service Mode those motors which have a failed flag set will be displayed as discussed in the Service Mode section. If a service vend is attempted on a failed motor the fail flag will reset regardless of the outcome. If the vend fails due to an under-current test the corresponding motor missing flag will be set.

The motor missing flag will be reset whenever a vend (normal or service) successfully passed the under-current test.

# **OPERATING MOTORS**

The system will operate in one of two modes: Sales or Service. On power-up (after completing configuration); the machine is in Sales Mode. Service Mode may be selected by pressing the MODE switch mounted on the control board. The system will return to Sales Mode if the MODE switch is pressed again or after 25 seconds of no Service Mode activity.

# SALES MODE

In Sales Mode the controller will control the dispensing of products according to customer credit and selection inputs. The controller will communicate with the coin mechanism and as credit is entered it will be displayed. If the coin mechanism indicates that an exact change situation exists the controller will illuminate the "exact change ONLY" LED.

When the customer makes a selection on the key panel, row A to E and (within 5 seconds) column 0 to 9, the accumulated credit will be compared to the price set for this product and if the credit is equal to or exceeds the set price that selection will be vended and selection price will be deducted from the credit value and the change returned.



The vend will be considered unsuccessful if the motor exhibits under or over current operation or fails to home within 8 seconds. The vend will not be attempted if the motor has already been detected as failed or if the selection made is invalid (not configured). In any such case, credit will not be deducted and the "Alternate Selection" message will be flashed at a 1 Hz rate for 10 seconds or until a new selection is made.

If there is insufficient credit for the selection made the "Selection Price" message will be flashed at a 1 Hz rate for 10 seconds or until enough credit is added and the product reselected, or a lower price selection entered. Correct selection price will be displayed during this time. The original selection will have been cancelled.

If power fails during a vend, the selected motor will not be reenergized when power returns and its fail flag will be set. All credit will have been lost.

# SERVICE/PROGRAM MODE

This mode will be entered by depressing the "MODE BUTTON", located on the controller. The numeric keys of the alphanumeric keypanel will then allow the operator to program and interrogate the controller.

On depressing the MODE switch the display will sequence through (for 1.5 seconds each); the alphanumeric selection codes of any motors which the controller believes to have failed. Pressing and holding "0" button will abort this sequence display. If the controller has not received a credit command from the coin mechanism within the previous 24 hours of continuous powered operation, "CHANGE" is displayed.

A selection menu of program modes will now be available to the operator. Control of these program modes is by use of the numeric keys whose functions are listed below:

Key 0: Cancel Multi-Set Price mode.

Key 1: Cancel Multi-Set Price mode.

Key 2: Display Configuration.

Key 3: Remove missing motor from configuration.

Key 4: Decrease Price.

Key 5: Enter Multi-Set Price mode.

Key 6: Service Vend by individual selection.

Key 7: Service Vend by machine row.

Key 8: Service Vend whole machine configuration.

Key 9: Increase Price.

The operator will now be capable of displaying the price of any product by entering its alphanumeric selection code. The operator will be allowed 5 seconds to complete entering a selection code—else it will be cancelled.

To exit from the SERVICE/PROGRAM mode the operator may press the MODE switch a second time or allow a period of inactivity in excess of 25 seconds to elapse. Either way the machine will revert to the SALES mode of operation.



The following paragraphs explain each KEY function listed above in more detail.

## KEY 0

This key will be used to cancel from the Multi-Set Price mode. This key will also be used to terminate the execution of the Service Vend by machine row or Service Vend by whole machine configuration modes.

## KEY 1

This key will allow you to cancel Multi-Set Price mode.

# KEY 2

This key will be used to check motors (configuration test). Then displays the number found for 1.5 seconds.

#### KEY 3

Press and hold button until several "beeps" are heard. This will remove any motor(s) that were previously configured but have since been removed and are no longer wanted in the existing machine configuration.

## KEY 4

This key will be used to decrease the price of a product. If on entering the program mode the operator wishes to alter the price of a product he will first select the product by means of its alphanumeric selection code. The current price of that product will then be displayed. To decrease the price (in base coin units) he must press KEY 4. If pressed for more than 0.5 seconds, the price will be decreased at a 0.25 second rate until the key is released. If the minimum price is reached (250 x base coin unit), the price will roll over to 0 and continue to be decreased. Releasing this key will return the operator to the selection menu of program modes condition. (Warning: If price has a letter to the left (i.e. C.45), the letter represents a high price, (in this case \$12.45). A = 10.00 B = 11.00 C = 12.00.)

## KEY 5

This key will be used to set the same price for many selections. The desired price is first set by using Keys 4 and 9 (see appropriate sections) for a particular product. To set this price for many products Key 5 will then be depressed (beeping notes this mode) followed by the alphanumeric selection codes for the desired products. On completion of this operation, pressing Key 0 will return the operator to the selection menu of program modes condition. Inactivity for over 25 seconds will return to the SALES mode.

# KEY 6

This key will be used to service vend a particular selection. Depressing Key 6 followed by the alphanumeric selection code will result in the controller attempting to vend that product. During the vend cycle the display will indicate the selection price. If the vend is unsuccessful or the motor is not included in the configuration the horn will beep 3 times and the display will show the failed selection code for 1.5 seconds, otherwise it will blank. The operation will be returned to the selection menu of program modes condition.



## KEY 7

This key will be used to service vend a row of products in the machine. Depressing Key 7 followed by the alpha selection code identifying the row will result in the controller attempting to vend each configured product in the row selected. During the vend cycle for each product, the display will indicate the price of that vend. If any vends are unsuccessful, on completion of the row or prior use of the 0 KEY the horn will beep 3 times and the display will sequence once through the failed selections, displaying each for 1.5 seconds. If no failures, the display will blank. The operation will be returned to the selection menu of program modes condition.

## KEY 8

This key will be used to service vend every selection in the machine. Depressing Key 8 will result in the controller attempting to vend each configured product in the machine. During the vend cycle for each product, the display will indicate the price of that vend. If any vends are unsuccessful, on completion of all row's; prior use of the 0 Key, the horn will beep 3 times and the display will sequence through the failed selections, displaying each for 1.5 seconds. If no failures, the displays will blank.

# KEY 9

This key will be used to increase the price of a product. If on entering the program mode the operator wishes to alter the price of a product he will first select the product by means of its alphanumeric selection code. The current price of that product will then be displayed. To increase the price (in base coin units), he will press Key 9, if held depressed for more than 0.5 seconds, the price will be increased at a 0.25 second rate until the key is released. The price will roll over from 0 to maximum price (250 x base coin value) and continue to be increased. Once released control will return the operation to the selection menu of program modes condition. A price of 0 will not be considered as a valid price.



# TROUBLESHOOTING CHARTS

# **CAUTION**

BEFORE CHANGING, DISCONNECTING OR CONNECTING ANY ELECTRICAL COMPONENTS, REMOVE THE FUSE OR UNPLUG THE MACHINE FROM THE WALL

	SYMPTOM	PROBABLE CAUSE	CORRECTIVE ACTION
All coins deposited are rejected		Machine not level	Level cabinet
		Defective coin mech	Replace
		Display blank, no power	Check fuse, transformer, and power at wall outlet
		Defective controller assembly	Replace
2.	Selection motor fails to turn on	Insufficient credit established	Check to see that selection price is same as deposited amount. Note message on display.
		Defective motor assembly	Test vend bad motor. Replace if defective.
		Defective controller	Replace
3.	All selection motors do not run (Test or free	Defective controller assembly	Replace
	vend)	Connection broken	Trace wire harness—See Note (1) for color code
4.	Selection motor does not complete cycle	Defective full cycle switch or defective motor	Replace motor ass'y
		Defective components on motor PC board assembly	Replace motor ass'y
		Defective controller assembly	Replace
5.	Selection motor continuously cycles	Defective full cycle switch	Replace motor ass'y
		Defective controller assembly	Replace controller motor assembly
6.	Two motors run simultaneously. See Note (1)	Defective controller assembly	Replace
	on next page.	Defective motor	Replace
		Defective motor in gum and mint motor circuit	Locate and replace defective motor
		Shorted harness or connector	Replace or repair



7.	Incorrect change dispensed	Defective coin mechanism	Replace
	•	Defective controller	Replace

NOTE (1): The motors in the machine are arranged in a  $5 \times 10$  matrix. This means that all motors have a wire common to all other motors in that row. Example: all motors in the "A" row have the white wire with black stripe in common. Likewise, all the motors in a column have a wire in common. Example: all motors in column 2 have a red wire in common.

The following is the wire color guide for the motor matrix:

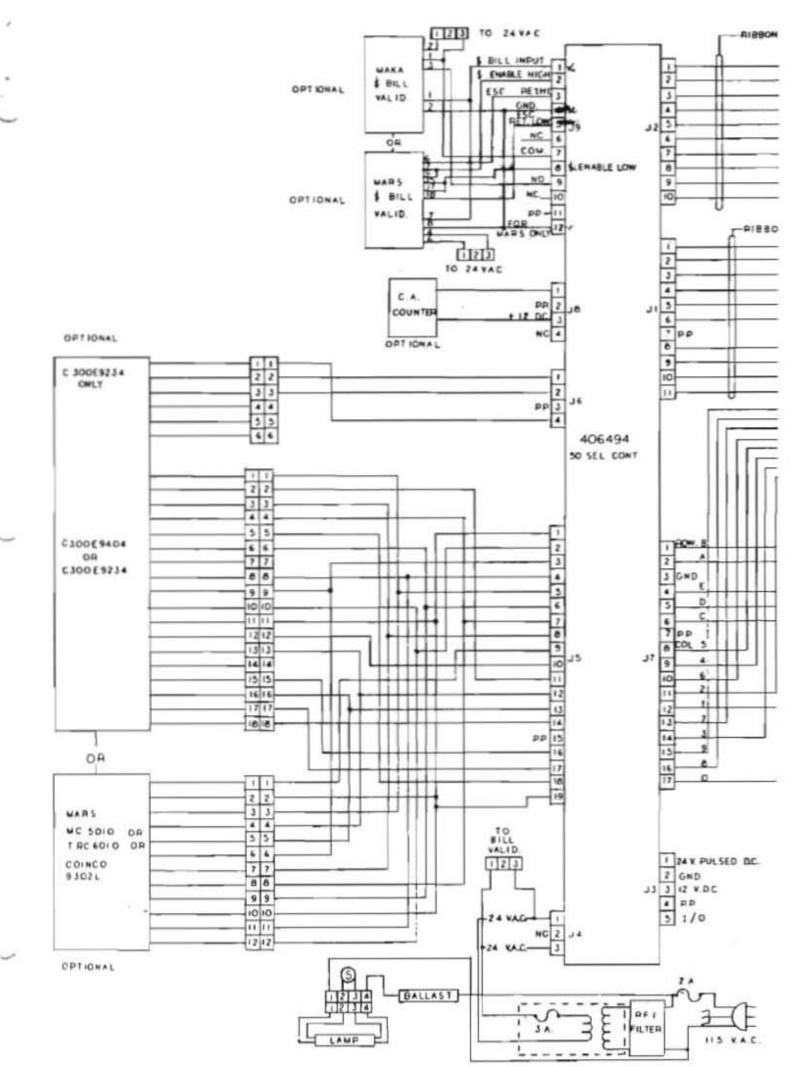
	Wire Color
Row "A"	White/Black
Row "B"	White/Brown
Row "C"	White/Red
Row "D"	White/Orange
Row "E"	White/Yellow

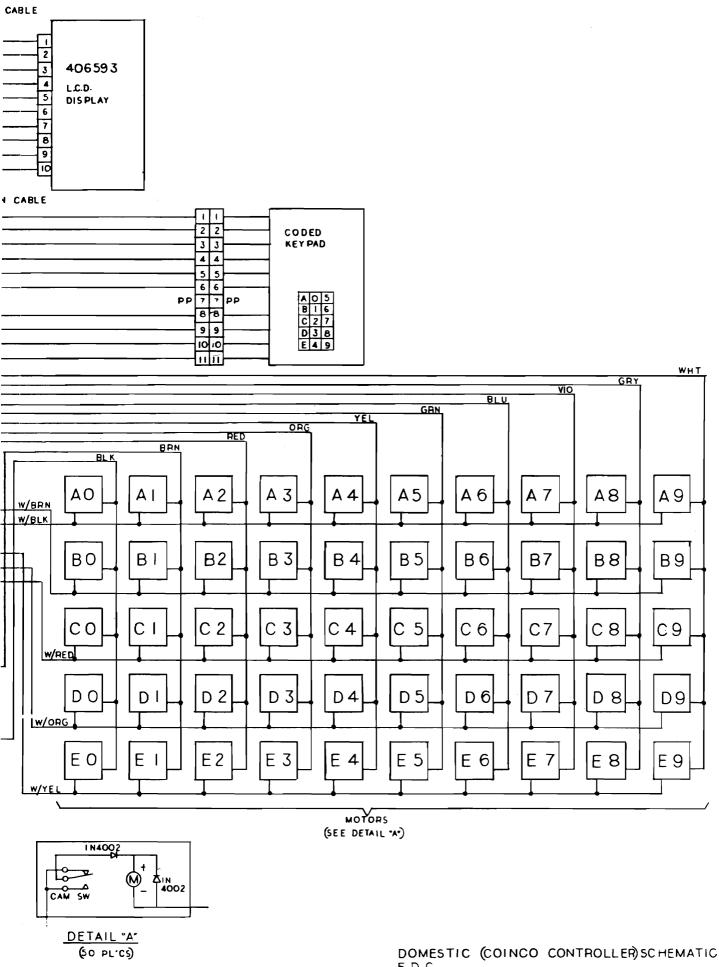
(Tray harnesses use only the White/Black since they can be used in any row.)

Column	"0"	Black
Column	"1"	Brown
Column	"2"	Red
Column	"3"	Orange
Column	"4"	Yellow
Column	"5"	Green
Column	"6"	Blue
Column	"7"	Violet
Column	"8"	Gray
Column	"9"	White

SYMPTOM	PROBABLE CAUSE	CORRECTIVE ACTION
Selection no. shown when service mode entered	Motor Disconnected	Reconnect motor
controller.	Defective motor	Replace motor
	Motor jammed	Free jammed motor
"Change" message when service mode entered	No customers last 24 hours	No action required
	No coin mechanisms communications	Replace coin mech.
		Replace controller







E.D.C. 3-4-88

# WEDGE MODULE

FIGURE 12 illustrates the wedge chain dispenser used in the machine. It consists of:

- 1) Motor Assembly
- 2) Module Arm
- 3) Rack Module & Slide Assembly

When a product selection is made, an electric signal from the selector switch starts the motor, and the controller will supply power until the switch signals that the vend is complete. This advances the dispensing chain one step. As the leading chain segment moves around the front sprocket, the hook of the following segment acts as a lever to activate the white slide and lifter of the front segment, forcing the spring loaded cylinders upward (SEE FIG. 12). This upward movement releases the wedged grip maintained on the merchandise bag, and the bag drops to the delivery compartment, completing the vend.

In a previous section on loading, a warning was given about pulling products out of the dispenser. If a forceful pull in a downward direction is used, it will cause the metal cylinders to seat against the plastic dispenser chain segment. The product cannot be released and the module may hang in cycle which causes the machine to be inoperative. A good indication of someone pulling on the bags is chain parts found lying loose in the machine. Even if less force is used, tolerances will be changed, causing eventual failure of the dispensing chain.

## DISPENSERS

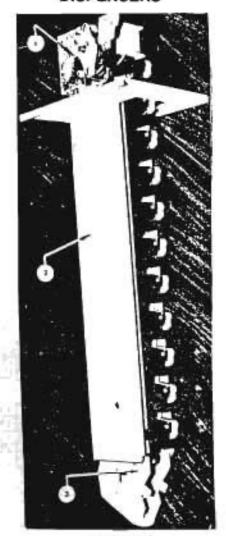
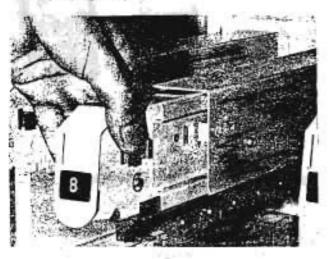


Figure 12

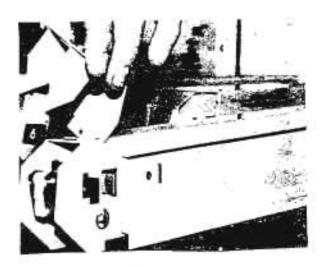
The correct way to remove product is actually easier, and consists of pushing up on the white-colored release lever immediately behind the product. This causes the product to fall into your hand without harming the dispenser.

There is a particular type of bag made of glassine material that cannot be vended with Polyvend wedge chain. This is a coated material that covers the metal cylinders with wax causing the bags to fall out freely. Occasionally, dispensing chains must be replaced or repaired. These chains are timed on installation and must be removed with care. Figures 13-16 show the sequence of operations to accomplish this task.

 Release the latch on the dispenser and pull slide number and price out to its stop. (Fig. 13)



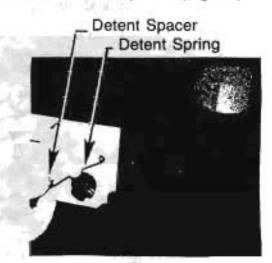
 Remove the dispenser number and price cover. (Fig. 14)



* Remove the screw from the side of the dispenser (Fig. 15) which serves as the stop and pull slide from the machine.



 Release the detent spring by pushing the flat end down and pulling it out from under the detent spacer. (Fig. 16)



 Still holding slide vertical, lift bottom of chain outward and away from the slide.
 Push upward. The chain should easily slide free. (Fig. 17)

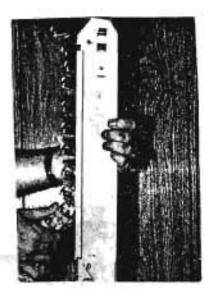


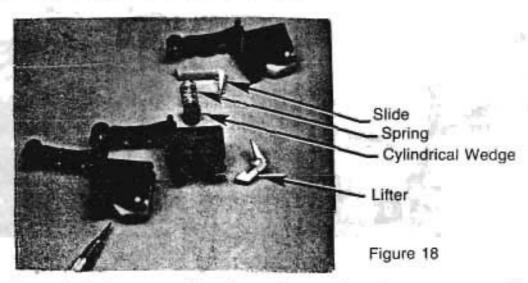
Figure 17

# WEDGE ASSEMBLY REPAIR (Figure 18)

To repair the assembly and replace damaged components, remove the chain and snap out the damaged link.

This link is made up of the basic chain housing segment (Black), a cylinder lifter (White), a slide (White), two cylindrical wedge components and a compression spring. (Fig. 18)

To disassemble, hold the link between both hands and push the cylinder lifter stub shafts outward with both thumb nails. It will pop out (retain with fingers) and may be removed. Next, the slide may be removed. Take care the compression spring isn't lost as the slide is removed. Now, the spring will fall free and the cylindrical wedge components will follow when the link is inverted. When reassembling the lifter, be sure the "flat" edge is against the cylindrical wedge and not against the slide.



All that remains is to reassemble using replacement parts as necessary. When the link has been repaired, snap it back on the chain.



Point front end of slide up and grasp the chain with thumb and fingers. Pull the chain support pin up and over the chain support slide while rotating the chain backward to normal rotation. Repeat until eight (8) pins are on top of the slide, which will allow enough slack to unhook the chain. (Fig. 19)

Support Pin Chain Support

Figure 19

Figure 20

* Unhook chain by grasping one link near the support pin and the next link near the snap connector — then gently twist the chain until it snaps loose. (Fig. 20)

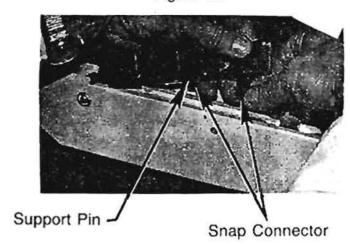


Figure 21

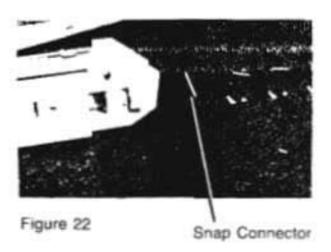
 Hold slide vertical with the front end up, and the chain will fall free of the inner portion of the slide. (Fig. 21)

Figure 21

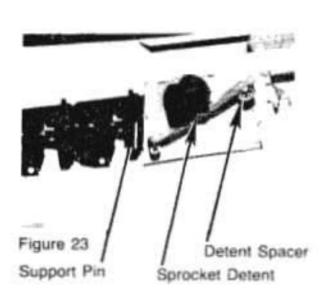




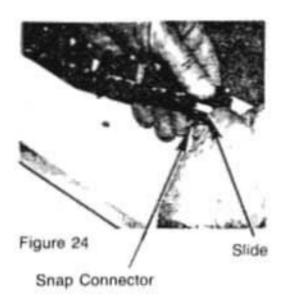
* To replace chain, lay dispenser on its top and insert the chain end through the front of the module. (The snap connector end must be inserted from the front as shown or chain rotation will be wrong). Continue pushing the chain -through the dispenser until equal lengths of chain are sticking out each end. (Fig. 22)



* To time the chain, re-engage the detent spring by turning the sprocket to the detent position and pushing the detent spring end under the detent spacer. Align a support pin with the back edge of the module. (During the next step, be careful NOT to move the chain forward or backward as this would misalign the support pin and therefore, chain timing would be wrong.) (Fig. 23)



 Grasp both ends of the chain and pull it over the bottom of the module. Push the white color slide out of the way and push the snap connector onto the support pin. (Fig. 24)



* To place the chain guide pins in the chain support slide, grasp the chain with one hand and rotate it in the direction of normal rotation, while holding the detent sprocket in with one thumb. (Fig. 25)

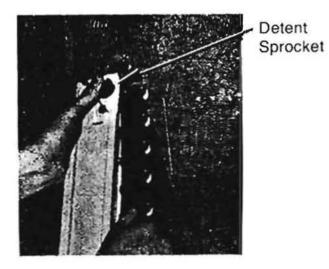


Figure 25

* Continue pulling the chain until three complete revolutions have been made. With the detent spring in the detent position, the leading chain segment will be in the position shown if the timing is correct. (Fig. 26)

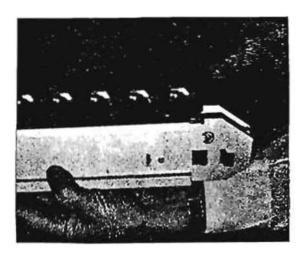


Figure 26



# **CLEANING INSTRUCTIONS**

# **Painted Surfaces:**

All painted surfaces can be cleaned with a clean cloth and any common brand of household detergent. Do not use harsh abrasive materials on the painted surfaces that would mar the paint.

# Glass Items:

The glass product loading door and the push plexiglass delivery door may be cleaned with any commercial window cleaner.



#### POLYVEND SHIPPING POLICY

The following information is being given to you to assist you in the safe delivery of your merchandise and in expeding of freight damage claims.

Our terms of sale are F.O.B. our factory; the responsibility for damage in transit is the carrier's whether it be visible or concealed damage. We have taken every precaution to insure safe arrival of this equipment, but our responsibility ceases when the shipment is turned over to the carrier.

The acceptance of this shipment by the carrier is an acknowledgement that the equipment was delivered to them in good condition and properly packed. The carrier who delivers this merchandise to your door is responsible for its safe delivery.

#### PROCEDURE FOR VISIBLE DAMAGE

- IT IS VERY IMPORTANT TO INSPECT ALL FREIGHT DELIVERIES, WHETHER MACHINES OR PARTS, IMMEDIATELY. If there is any visible damage you have the right to refuse the merchandise or to accept the damaged shipment. If you accept it, make certain that you have the deliveryman note on the freight bill the nature and extent of damage.
- After you determine extent and cost of damage, notify the delivering carrier's office by phone, and confirm with a written notice within 15 days requesting an inspection of the damaged merchandise. Keep a copy of the inspection request for claim purposes. Do not destroy the packing material until shipment is inspected and claim is settled.
- 3. When inspector arrives, ask for claim form. In filing a claim, you may make a cash settlement with the carrier for the full invoice price of the merchandise or contact Polyvend, Inc., telephone (501) 327-1301, and make arrangements to have merchandise returned for repair, and file claim for repair charges. Do not return merchandise without authorization from Polyvend, Inc., Traffic Manager. Ask carrier to return "DEADHEAD". Do not claim more than cash price of machine plus freight.



### POLYVEND SHIPPING POLICY — Cont.

#### PROCEDURE FOR CONCEALED DAMAGE

- 1. If there is no visible damage, YOU MUST OPEN THE SHIPMENT WITHIN 15 DAYS AND INSPECT FOR CONCEALED DAMAGE. If there is concealed damage, notify the delivering carrier by phone immediately asking for an inspection, confirm in writing and keep a copy of the request for claim purposes. If you fail to notify the carrier within 15 days of delivery, by telephone and in writing, the freight company is no longer liable for the damage and will probably refuse your claim. Do not destroy packing material until shipment is inspected and claim is settled.
- 2. After inspection by carrier, file claim for damages at once. (See Item 4). On concealed damage, unless it can be proven that the carrier is responsible for the damage, they will probably want to settle on a compromise basis. Therefore, the faster you inspect your delivery and notify the carrier, the better the chances are for full settlement. If the claim is disallowed, check on the possibility of a compromise.

#### PROCEDURES FOR SHORTAGES

- If the shipment delivered to you is not in accordance with the quantity of cartons as shown on your receipt, do not accept it until such shortages are noted on the Freight Bill or Bill of Lading and signed by the truck driver. Failure to do this releases the carrier from any responsibility.
- 2. If the item that is short is not delivered within a reasonable time, then file a claim with the delivering carrier for the invoice or cash price of the item that was not delivered.

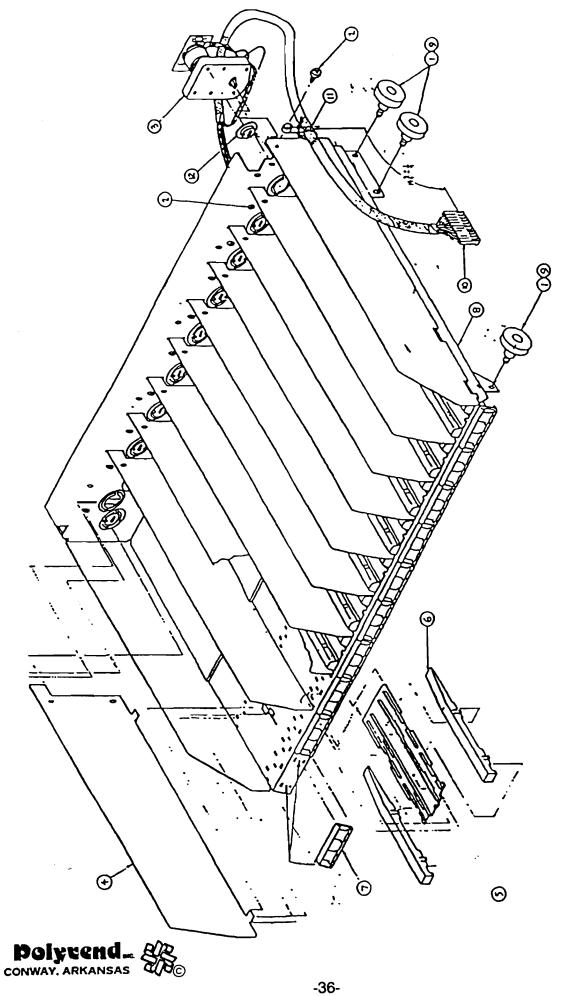
Claims for loss or damage will not be deducted from your invoice while awaiting adjustment of such claims.

For further information or any other problems regarding deliveries of Polyvend merchandise, contact our Traffic Manager, Gene Huss, at (501) 327-1301.



Of course, we at	A 1 0 0 2 2			*14744
Polyvend stand behind			-7	NO 00494
all of our equipment, and	FROM			** UU434
there is a 12-month war-	, FROM			PARTS RETURN FORM
ranty on all major com-			_ا	
ponents. All we ask is that	_	DOLVACND INC		FOR REPAIR OR REPLACEMENT ONLY
you label the part with a	SHIP	POLYVEND, INC.	ı	ALL RETURNED PARTS MUST MAVE RETURN GOODS TAG
Polyvend Return Goods	TO	CONWAY, ARKANSAS 72032 (501) 327-1301		
Tag and return it to us,	QTY PART NO.	DESCRIPTION	DEFECTS	MACH SER # R/G TAG #
freight prepaid, along with a Polyvend Parts Return	GTY PART NO.	DESCRIPTION	DEFECTS	MACH SENS N/O 120 S
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model, serial number and	<del></del>			
POLYVEND INCORPORATED-RETURN GOOD				
Customer	02970	<del></del>		
City	Governments  Cover includes			
RETURN GOODS TO Polyvend, Inc. P.O. See 1165, German	Lane, Conway, AR 72032			
Part No. Desc. Defect/ Serial No. Remarks				
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			- ·	
INSTRUCTIONS  USE A SEPARATE TAG FOR CREDIT OUP ACCOUNT . INV EACH TYPE PART	MO			
COMPLETE DETACH & MAIL  THIS CARD TO ADDRESS  PRINTED ON REVERSE SIDE  REPLACE OUR P.O. NO	N P O. NO			
DATE RETURNED		_	<del></del>	
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a brief description of why	<del></del>			
the part is being returned.				
We'll promptly repair				
or replace the component				
and then ship it back to				
you prepaid.				
	100 15 (4/7 <b>e</b> )	POLYVEND C	OPY	

Parts Return Form



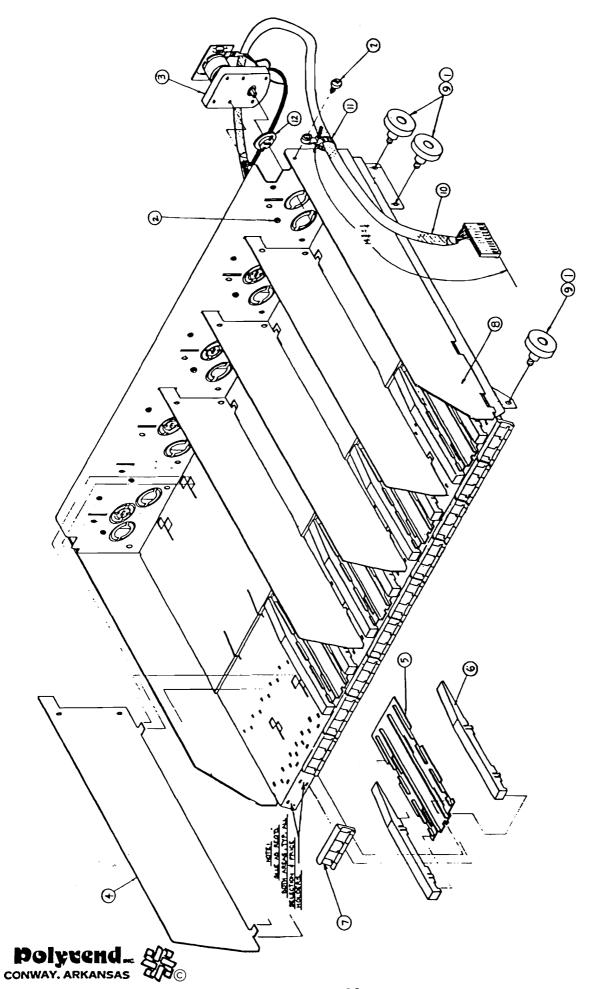
# CANDY TRAY ASSEMBLIES FULL SIZE MACHINES

ITEM	PART NO.	DESCRIPTION	18818-10M QTY.	18818-10C QTY.
1	18821	Nut-Hex 1/4-20, Center Lock	6	6
2	ST-2614-BLK	Screw - #8-18 x 1/2	21	21
3	17595-3DC	Motor - DC (360 Degree Cam)	10	
	18162-3CC	Motor - DC Coinco 360		10
4	17843-BLK	Tray Divider	9	9
5	17853	Tray Filler Bottom	10	10
6	17854	Helix Tray Rail	20	20
7	17858	Sel/Price Holder	10	10
8	18820-BLK	Tray-Weld Ass'y	1	1
9	17403	Roller-Tray	6	6
10	18389	Harness-Sliding Tray	1	1
11	80569	Tie - Harness	1	1
12	17537	Coupling - Plastic Hub	10	10
	13856	Loctite 422 (As Req'd)		

# CANDY TRAY ASSEMBLIES MID SIZE MACHINES

ITEM	PART NO.	DESCRIPTION	18486-8 <b>M</b> QTY.	18486-8C QTY.
1	18821	Nut-Hex 1/4-20, Center Lock	6	6
2	ST-2614-BLK	Screw - #8-18 x 1/2	17	17
3	18162-3CC	Motor - DC Coinco 360	10	10
4	17843-BLK	Tray Divider	7	7
5	17853	Tray Filler Bottom	8	8
6	17854	Helix Tray Rail	16	16
7	17858	Sel/Price Holder	8	8
8	18483-BLK	Tray-Weld Ass'y	1	1
9	17403	Roller-Tray	6	6
10	18484	Harness-Sliding Tray	1	1
11	80569	Tie - Harness	1	1
12	17537	Coupling - Plastic Hub	8	8
	13856	Loctite 422 (As Req'd)		





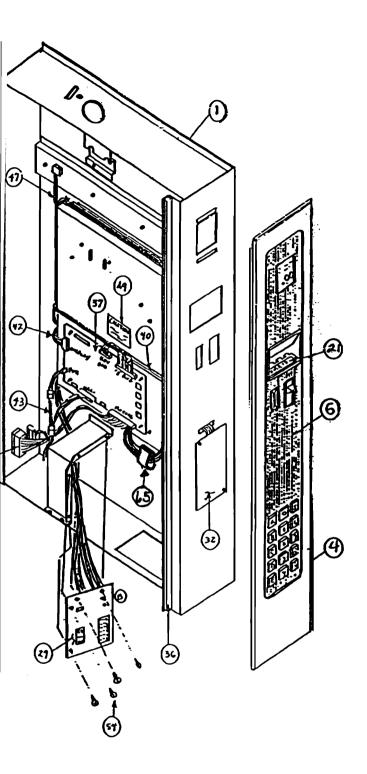
# PASTRY TRAY ASSEMBLIES FULL SIZE MACHINES

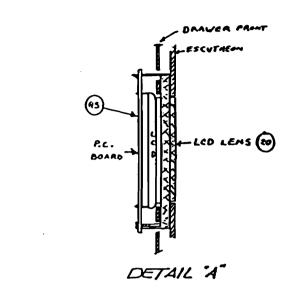
ITEM	PART NO.	DESCRIPTION	18818-5 <b>M</b> QTY.	18818-5C QTY.
1	18821	Nut-Hex 1/4-20, Center Lock	6	6
2	ST-2614-BLK	Screw - #8-18 x 1/2	11	11
3	17595-3DC	Motor - DC (360 Degree Cam)	5	
	18162-3CC	Motor - DC Coinco 360		5
4	17843-BLK	Tray Divider	4	4
5	17853	Tray Filler Bottom	5	5
6	17854	Helix Tray Rail	10	10
7	17858	Sel/Price Holder	5	5
8	18820-BLK	Tray-Weld Ass'y	1	1
9	17403	Roller-Tray	6	6
11	80569	Tie - Harness	1	1
12	17537 13856	Coupling - Plastic Hub Loctite 422 (As Req'd)	5	5

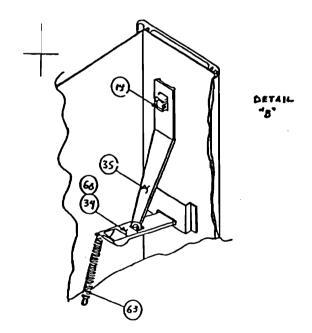
# PASTRY TRAY ASSEMBLIES MID SIZE MACHINES

ITEM	PART NO.	DESCRIPTION	18486-4M QTY.	18486-4C QTY.
1	18821	Nut-Hex 1/4-20, Center Lock	6	6
2	ST-2614-BLK	Screw - #8-18 x 1/2	9	9
3	18162-3CC	Motor - DC Coinco 360	5	5
4	17843-BLK	Tray Divider	3	3
5	17853	Tray Filler Bottom	4	4
6	17854	Helix Tray Rail	8	8
7	17858	Sel/Price Holder	4	4
8	18483-BLK	Tray-Weld Ass'y	1	1
9	17403	Roller-Tray	6	6
11	80569	Tie - Harness	1	1
12	17537	Coupling - Plastic Hub	4	4

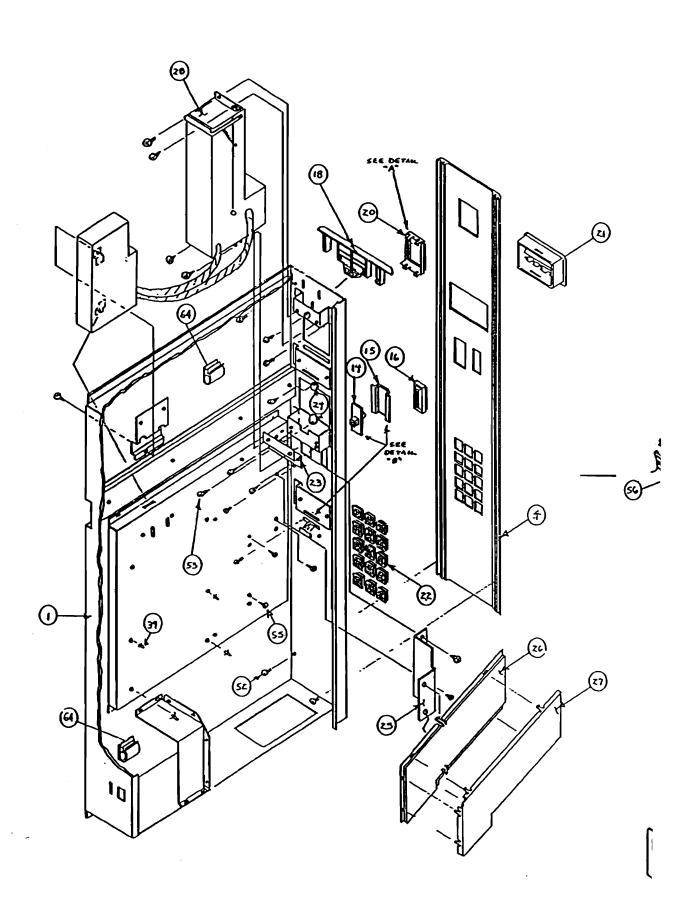






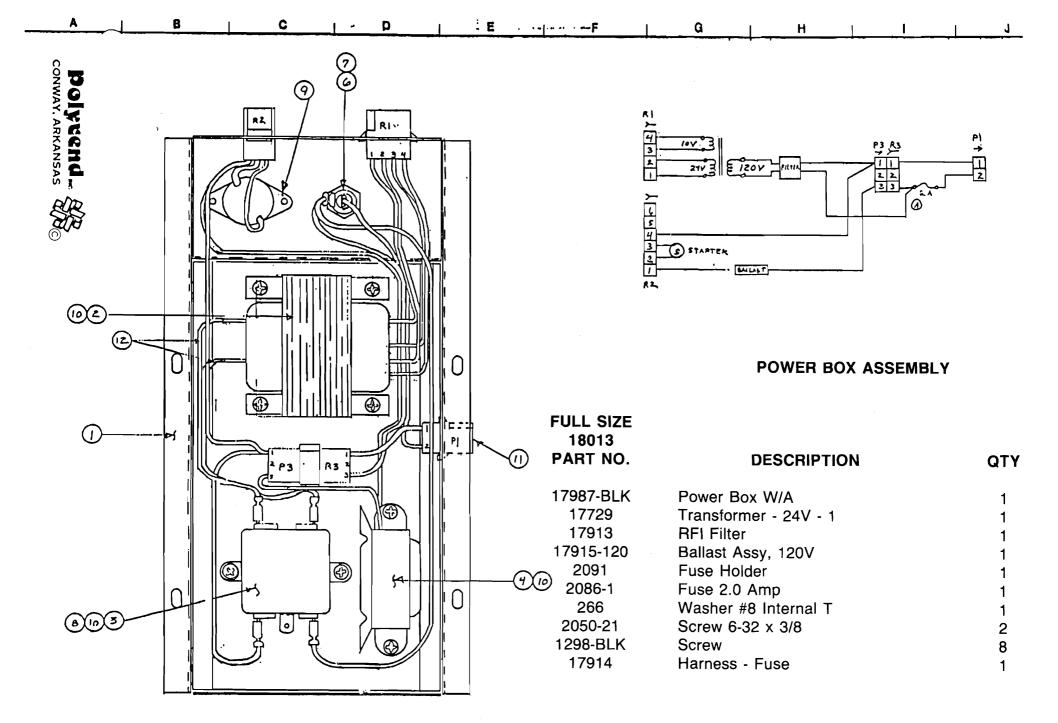


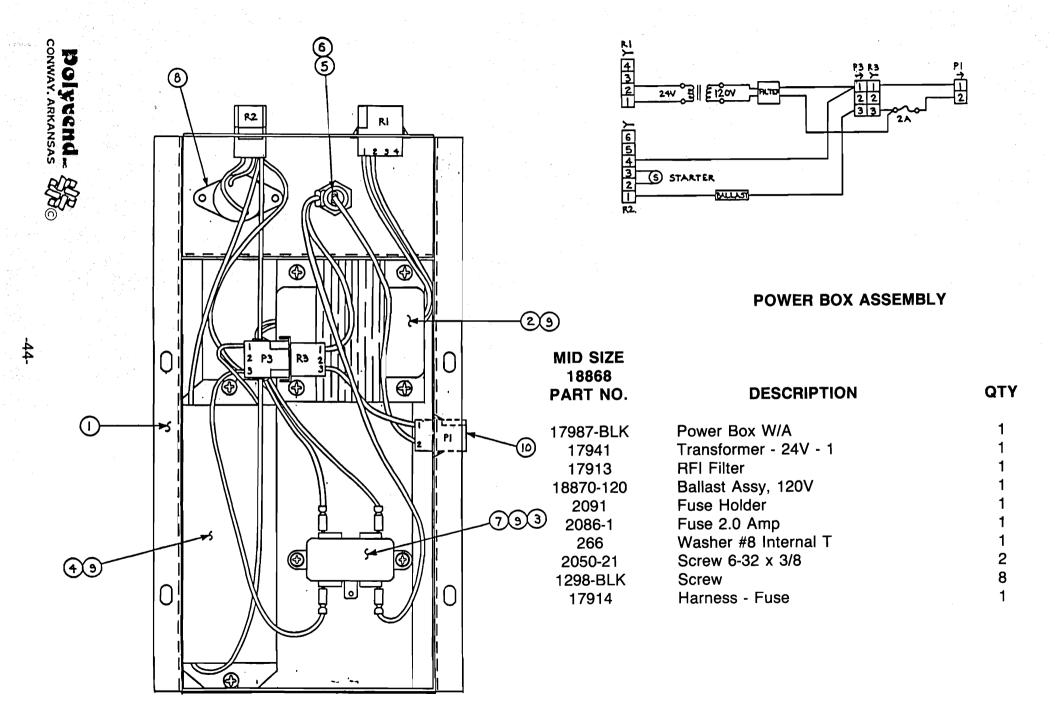
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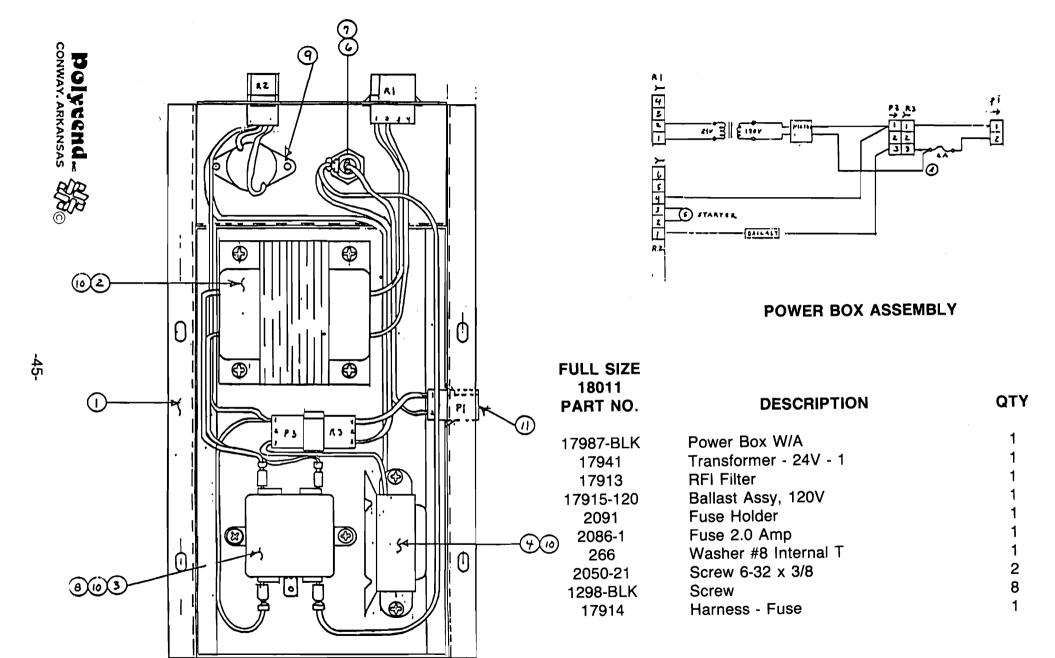


	SLIDING DRAWE	R PART NO	18041-CVC	18041-CNC	18041-TVC	18041-TNC	18041-WTV	18041-WTO
ITEN	PART NO.	DESCRIPTION	QTY	QTY	QTY	QTY	QTY	QTY
1	17958-BLK	DRAWER W/A SLIDING ESCUTCHEON-MID DRAWER	i	1	1	1	1	1
4	17959-GTO	ESCUTCHEON-MID DRAWER ESCUTCHEON-MID DRAWER DECAL - ESCUTCHEON	1	1	1	1		
6	18069-BWH	DECAL - ESCUTCHEON DECAL - ESCUTCHEON	1	1		1		
6	18069-CWO	DECAL - ESCUTCHEON DECAL - ESCUTCHEON		·	1			
6		DECAL - ESCUTCHEON DECAL - ESCUTCHEON					1	1
- 14 15	17901		1 1	1 1	1	i i	! 1	<u>i</u> i
16 15	17916-BLK	INSERT COIN -US CAP - MID-ESCUTCHEON	1	1 1	1	1	1	1
18 20 21	17310	CAP - MID-ESCUTCHEON LENS - READOUT INSERT - VALIDATOR	1	1	1 1	1 1	1	1 1
- 22 - 22 23	18274-A>E	BUTTON-SELECTION BRACKET-VALIDATOR MTG.	(SET) 1	(SET) 1	(SET) 1 1	(SET) 1	(SET) 1 1	(SET) 1
24 25	18144-BLK	RETAINER-VAL. INSERT BRACKET-COIN CHUTE	2	i	2 1	1	. 2 1	1
26 27		REAR - COIN CHUTE COVER - COIN CHUTE	1 1	1 1	1 1	1 1	1 1	1 1
28 29	18027-CA	VALIDATOR - MAKA 24V BRACKET ASS'Y - JONES	i i	1	1 1	1	1 1	i
32 34	17798-BLK	KEY PAD - CA PLATE - SCAVENGE	1 1	1	1	1	1	1
35 36 37	810-00	LINK - SCAVENGE STRIP-NEOPRENE (2.8ft) CONTROLLER - CA	1	1	1	1	1 1	1
39	11808	SUPPORT - CIRCUIT BD	4 1	4	4	4	4 1	<b>4</b> 1
42 43	17907	CABLE DISPLAY HARNESS - POWER	1 1	1 1	1 1	1 1	1 1	1 1
→ 45 45	17937	GRAPHICS READOUT-LCD DISPLAY CA - LCD	1	1	1	i	1	1
47 49	17390	HARNESS CA - MAKA DECAL - CAUTION	1	i	1 1	1	1	1
52 53 54	1298-BLK	SCREW #10 PAN SCREW #8 PAN SCREW #8 PAN	11 5	5 5	7 11 5	o 5	/ 11 5	- 6 5 5
55 58	11894	SCREW #8 HARNESS-INTERCONNECT	3	3 1	3 1	3 1	3 1	3 1
57 63	18145-BLK	FILLER-VALIDATOR EXTENSION SPRING	1	1 1	i	i 1	1	1 1
64 65	8538-02	CLAMP-HARNESS CLAMP-HARNESS	2 1	1 1	2 1	1 1	2 1	1 1

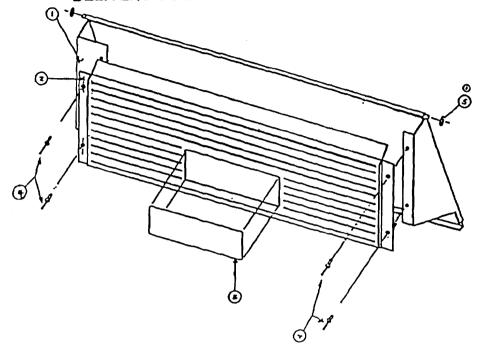




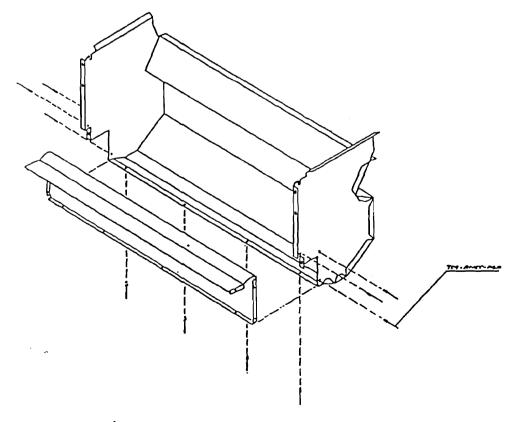








### **DELIVERY COMPARTMENT**



## DELIVERY DOOR ASSEMBLIES Full Size Machine

		''Push''		"Press H	ere''	"Press Here"	
Item	Description	Blk/Blk	Qty	Blk/Blk	Qty	Brn/Blk	Qty
<del>-</del> .	Door Assembly-Delivery	18042		18042-Blk		18042-DB	
1	Door W/A - Del Rear	18031-Blk	1	18031-Blk	1	18031-Blk	1
2	Door Del - Front	17931-Blk	1	17931-Blk	1	17931-DB	1
3	Decal	18037	1	18093-Blk	1	18093	1
4	Rivets	729	4	729	4	729	4

## DELIVERY COMPARTMENT ASSEMBLIES Full Size Machine

1 18687

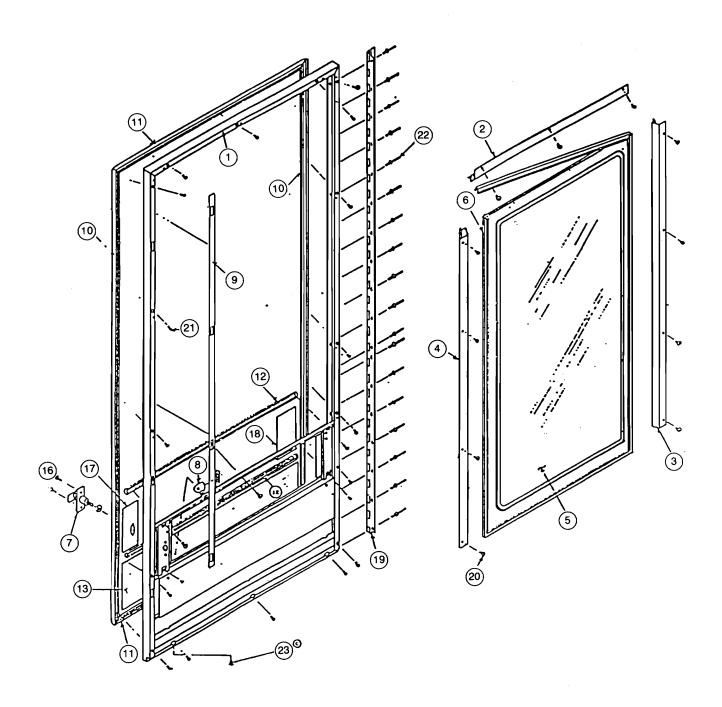
## DELIVERY DOOR ASSEMBLIES Mid Size Machine

		''Push''		"Press He	ere''	"Press Here"	
Item	Description	Blk/Blk	Qty	Blk/Blk	Qty	Brn/Blk	Qty
	Door Assembly-Delivery	18516		18516-B	llk	18516-D	В
1	Door W/A - Del Rear	18031-Blk	1	18031-Blk	1	18031-Blk	1
2	Door Del - Front	18512-Blk	1	18512-Blk	1	18512-DB	1
3	Decal	18037	1	18093-Blk	1	18093	1
4	Rivets	729	4	729	4	729	4

# DELIVERY COMPARTMENT ASSEMBLIES Mid Size Machine

1 18492





For use with P.P. 49, 50 & 51

## **FULL SIZE SERVICE DOOR ASSEMBLIES**

Item	Description	Part No.	Qty	Part No.	Qty.	Part No.	Qty.	Part No.	Qty.
_	Door Assembly-Service	18040-D	В	18040-RE	ΞD	18040-TF	RA	18040-S0 (CONTEM	
1	Door W/A-Service	17924-DB	1	17924-RED	1	17924-DB	1	17924-SGB	1
2	Holder-Glass-Top	17934-BLK	1	17934-BLK	1	17934-BLK	1	17934-BLK	1
3	Holder-Glass-LH	17954-BLK	1	17954-BLK	1	17954-BLK	1	17954-BLK	1
4	Holder-Glass-RH	17954-BLK	1	17954-BLK	1	17954-BLK	1	17954-BLK	1
5	Glass-Service Door	18222	1	18221	1	18222	1	18221	1
6	Gasket-Service Door	17970	12	17970	12	17970	12	17970	12
7	Lock Asy-Srvc Door	14325-BLK	1	14325-BLK	1	14325-BLK	1	14325-BLK	1
8	Cam-Lock, Service	17457-BLK	1	17457-BLK	1	17457-BLK	1	17457-BLK	1
9	Bar W/A-Locking	18001-BLK	1	18001-BLK	1	18001-BLK	1	18001-BLK	1
10	Trim-LS & RS Door	17956-DB	2	17955-BLK	2	17956-GT	2	17956-GT	2
11	Trim - Door-Top & BTM	17957-DB	2	17957-BLK	2	17957-GT	2	17957-GT	2
12	Trim-Del Comp. Mid	17967-DB	2	17967-BLK	2	17967-GT	2	17967-GT	2
13	Panel-Clear, Lower	18102	1						
13	Panel-Walnut, Service					9100-06	1		
13	Panel Blk. Lower SD							18288	1
16	Screw #10-24	746	2	746	2	746	2	746	2
17	Panel-Decor R.H.	17932-DB	1	17932-BLK	1	17932-DB	1	17932-BLK	1
18	Panel-Decor L.H.	17933-DB	1	17933-BLK	1	17933-DB	1	17933-BLK	1
19	Hinge-Service Door	18774-DB	1	18774-RED	1	18774-DB	1	18774-SGB	1
20	Screw	1868-BLK	11	1868-BLK	11	1868-BLK	11	1868-BLK	11
21	Screw	18033	22	18033	19	18033	22	18033	22
22	Rivet	729	18	729	18	729	18	729	18
23	Retaining Plug	18442	1	18442	1	18442	1	18442	1
24	Trim-Service Door Hinge	18873-DB	1	18873-RED	1	18873-DB	1	18873-SGB	1



# MID SIZE SERVICE DOOR ASSEMBLIES WITH LONG GLASS

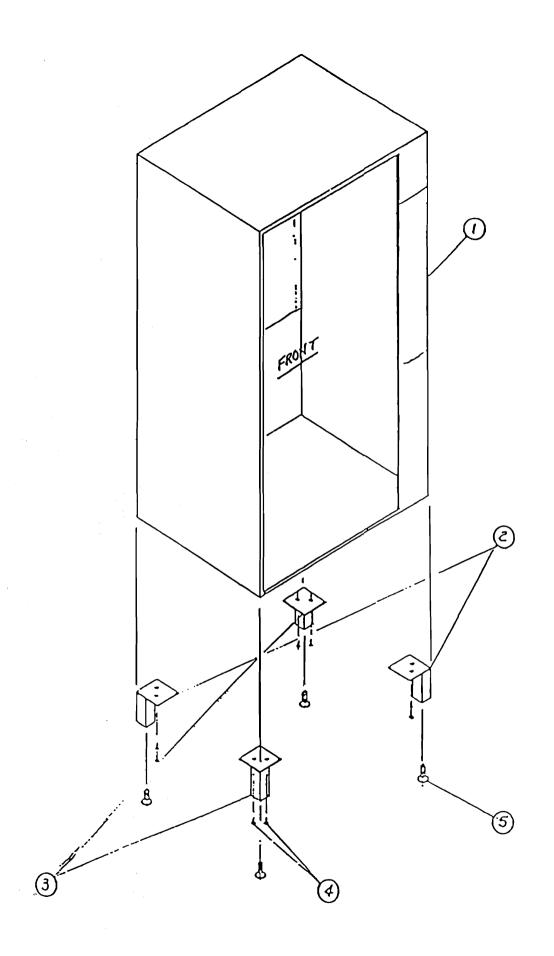
Item	Description	Part No.	Qty	Part No.	Qty.	Part No.	Qty.	Part No.	Qty.
_	Door Assembly-Service	18759-D	В	18759-RE	ΞD	18759-TF	RA	18759-SG	
								(CONTEM	IP)
1	Door W/A-Service	18721-DB	1	18721-RED	1	18721-DB	1	18721-SGB	1
2	Holder-Glass-Top	18499-BLK	1	18499-BLK	1	18499-BLK	1	18499-BLK	1
3	Holder-Glass-LH	17954-BLK	1	17954-BLK	1	17954-BLK	1	17954-BLK	1
4	Holder-Glass-RH	17954-BLK	1	17954-BLK	1	17954-BLK	1	17954-BLK	1
5	Glass-Service Door	18760	1	18761	1	18760	1	18761	1
6	Gasket-Service Door	17970	12	17970	12	17970	12	17970	12
7	Lock Asy-Srvc Door	14325-BLK	1	14325-BLK	1	14325-BLK	1	14325-BLK	1
8	Cam-Lock, Service	17457-BLK	1	17457-BLK	1	17457-BLK	1	17457-BLK	1
9	Bar W/A-Locking	18001-BLK	1	18001-BLK	1	18001-BLK	1	18001-BLK	1
10	Trim-LS & RS Door	17956-GT	2	17955-BLK	2	17956-GT	2	17956-GT	2
11	Trim - Door-Top & BTM	18501-GT	2	18501-BLK	2	18501-GT	2	18501-GT	2
12	Trim-Del Comp. Mid	18502-GT	2	18502-BLK	2	17967-GT	2	18502-GT	2
13	Panel-Clear, Lower	18778-01	1					18778-01	1
13	Panel-Walnut Service					9100-08	1		
16	Screw #10-24	746	2	746	2	746	2	746	2
17	Panel-Decor R.H.	17932-DB	1	17932-BLK	1	17932-DB	1	17932-BLK	1
18	Panel-Decor L.H.	17933-DB	1	17933-BLK	1	17933-DB	1	17933-BLK	1
19	Hinge-Service Door	18774-DB	1	18774-RED	1	18774-DB	1	18774-SGB	1
20	Screw	1868-BLK	11	1868-BLK	11	1868-BLK	11	1868-BLK	11
21	Screw	18033	22	18033	19	18033	19	18033	22
22	Rivet	729	18	729	18	729	18	729	18
23	Retaining Plug	18442	1	18442	1	18442	1	18442	1
24	Trim-Serv Door Hinge	18873-DB	1	18873-RED	1	18873-DB	1	18873-SGB	1



# MID SIZE SERVICE DOOR ASSEMBLIES WITH SHORT GLASS

Item	Description	Part No.	Qty	Part No.	Qty.	Part No.	Qty.		
	Door Assembly-Service	18510-D	В	18510-RE	ΞD	18510-TF	AF	18510-SG (CONTEM	
1	Door W/A - Service	18508-DB	1	18508-RED	1	18508-DB	1	18508-SGB	1
2	Holder-Glass-Top	18499-BLK	1	18499-BLK	1	18499-BLK	1	18499-BLK	1
3	Glass Holder-Side LH	18504-BLK	1	18504-LBK	1	18504-LBK	1	18504-LBK	1
4	Glass Holder-Side RS	18504-RBK	1	18504-RBK	1	18504-RBK	1	18504-RBK	1
5	Glass-Service Door	18500	1	18762	1	18500	1	18500	1
6	Gasket-Service Door	17970	12	17970	12	17970	12	17970	12
7	Lock Asy-Srvc Door	14325-BLK	1	14325-BLK	1	14325-BLK	1	14325-BLK	1
8	Cam-Lock, Service	17457-BLK	1	17457-BLK	1	17457-BLK	1	17457-BLK	1
9	Bar W/A-Locking	18509-BLK	1	18509-BLK	1	18509-BLK	1	18509-BLK	1
10	Trim-LS & RS Door	17956-GT	2	17955-BLK	2	17956-GT	2	17956-GT	2
11	Trim - Door-Top & BTM	18501-GT	2	18501-BLK	2	18501-GT	2	18501-GT	2
12	Trim-Del Comp. Mid	18502-GT	2	18502-BLK	2	18502-GT	2	18502-GT	2
13	Panel-Clear, Lower	18778-00	1					18878-00	1
13	Panel-Walnut, Service					9100-07	1		
16	Screw #10-24	746	2	746	2	746	2	746	2
17	Panel-Decor R.H.	17932-DB	1	17932-BLK	1	17932-DB	1	17932-BLK	1
18	Panel-Decor L.H.	17933-DB	1	17933-BLK	1	17933-DB	1	17933-BLK	1
19	Hinge-Service Door	18774-DB	1	18774-RED	1	18774-DB	1	18774-SGB	1
20	Screw	1868-BLK	11	1868-BLK	11	1868-BLK	11	1868-BLK	11
21	Screw	18033	22	18033	19	18033	22	18033	19
22	Rivet	729	18	729	18	729	18	729	18
23	Retaining Plug	18442	1	18442	1	18442	1	18442	1
24	Trim-Serv Door Hinge	18873-DB	1	18873-RED	1	18873-DB	1	18873-SGB	1







# CABINET SHELL ASSEMBLY FULL SIZE

### **SPECIFY COLOR**

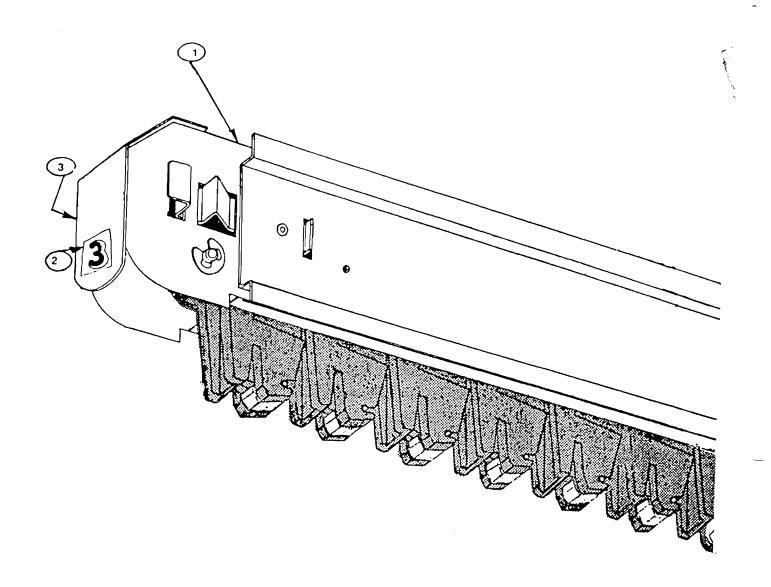
1 Cabinet	18862-DB 18862-WB 18862-RED 18862-SGB	Dark Brown Wittenb' Brown Red Semi-Gloss Black		
2 Leg & Plate	18747	R.H.	Black	
3 Leg & Plate	18747	L.H.	Black	
4 Screw 1/4-20	318			
5 Leg Equalizer	12766			

# CABINET SHELL ASSEMBLY MID SIZE

### **Specify Color**

1 Cabinet	18497-DB 18497-DBS 18497-WB 18497-RED 18497-RDS 18497-SGB	Dark Brown (Long Glass) Dark Brown (Short Glass) Wittenb' Brown Red (Long Glass) Red (Short Glass) Semi-Gloss Black
2 Leg & Plate 3 Leg & Plate 4 Screw 1/4-20 5 Leg Egualizer	18747 18747 318 12766	R.H. Black L.H. Black

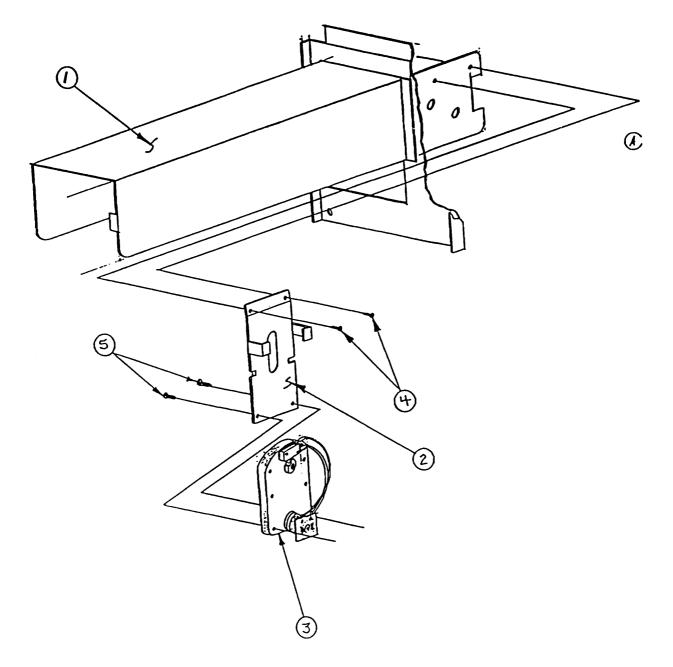




## **RACK MODULE ASSEMBLY**

ITEM	PART NO.	NOMENCLATURE
1	10484-01	Rack Module Assembly
2	18068	Decals - Selection Number (Complete set numbers 1 thru 20)
3 ,	12287-01	Tab and Stripper Assembly - Plastic

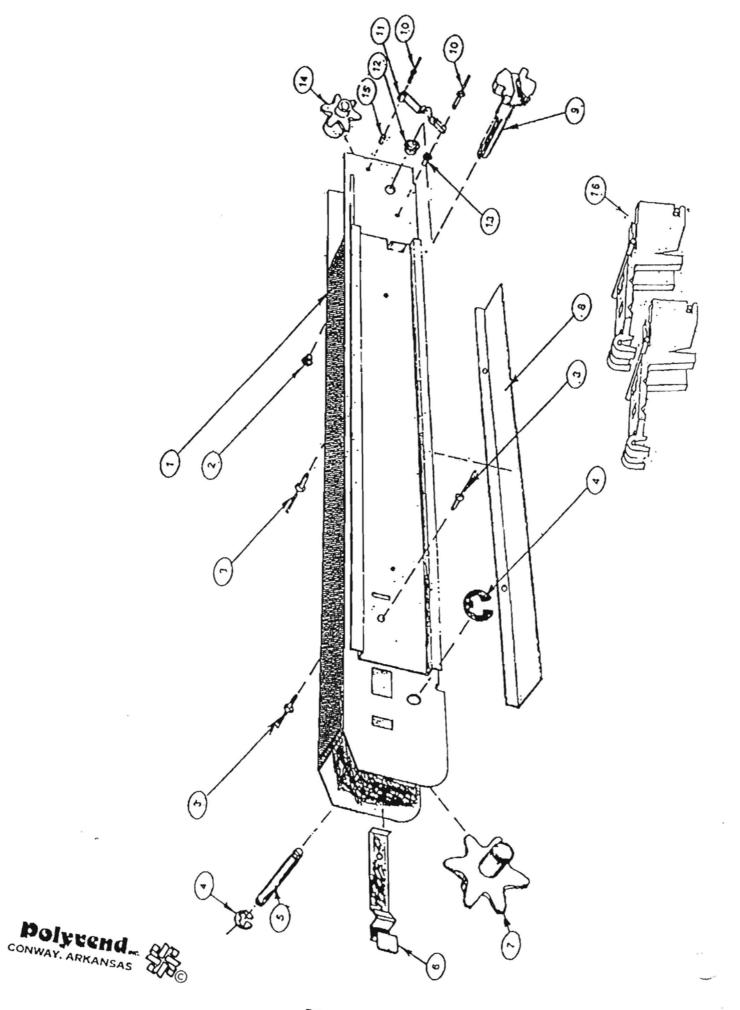




## **MODULE ARM COMPLETE 17777-BLK**

PART NO.	NOMENCLATURE
10483-BLK	Module Arm
1298	Screw #8-18 x 3/8"
17595-1DC	Motor Assembly - Complete D.C. (180° cam)
1868	Screw - #8-32 x 1/4 Type (4 ea.)
	B Pan Hd Ph Recess
	ZPYD
17658-BLK	Plate, Mounting
	10483-BLK 1298 17595-1DC 1868

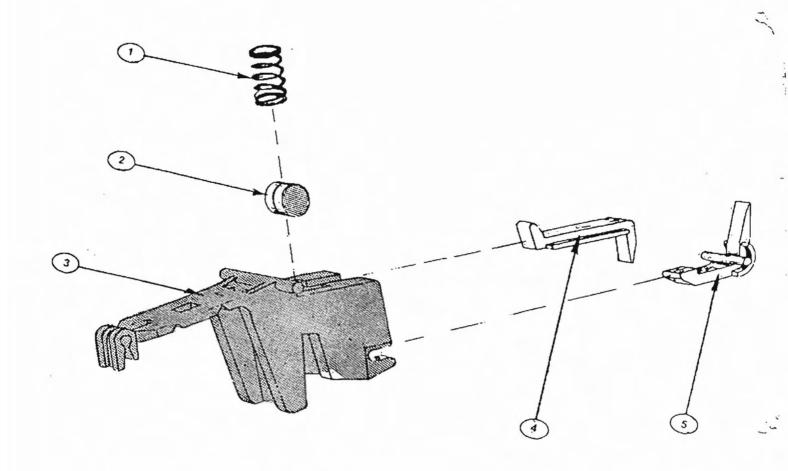




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## **RACK MODULE - B-10484**

ITEM	PART NO.	NOMENCLATURE
1	10495-01	Slide & Module Assembly
2	730	Bushing
3	729	"Pop" Rivet SD-42-BS
4	2559	"E" Ring, Tru Arc
5	2558	Front Sprocket Shaft
6	1744	Spring Lock
7	2565	Sprocket - Front
8	1774	Chain Guide
9	1741	Sprocket Shaft - Rear
10	1642	"Pop" Rivet SD-45-BS
11	1743	Spring, Rear Sprocket, Detent
12	1178	Bearing Bushing
13	1745	Spacer - Detent, Spring "T"
14	2563	Sprocket - Rear
15	1869	Spacer - Detent, Spring "Plain"
16	10487	Chain Assy., Complete - Wedge



## **CHAIN SEGMENT ASSEMBLY A-10416**

PART NO.	NOMENCLATURE
A-1720	Spring Compression
A-1754	Wedge, Cylindrical (2 req)
D-1723	Chain Housing Segment
C-1717	Slide
C-1719	Lifter, Cylinder
	A-1720 A-1754 D-1723 C-1717





1200

### Polyrend ...

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### Polyrend ar.

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