

## Instructions to Install Retrofit Kit Studio ST Machine

**\*\* TURN MACHINE POWER OFF BEFORE INSTALLATION \*\***  
**READ ALL INSTRUCTIONS BEFORE STARTING INSTALLATION**

### RVMC-120ST-1L Retrofit Kit Contents

PART NAME	QUANTITY	PART NUMBER
PCBA, AP120-ST/SL Retrofit VMC	1	10-0349-10
Studio ST VMC Mounting Plate	1	05-1175-00
Cable, Studio ST/SL Keypad Adapter	1	11-1710-00
Cable, Studio ST - AP120 Power Adapter	1	11-1710-10
Cable, Studio ST - AP120 8080 Display Adapter	1	11-1710-20
Cable, Studio ST - AP120 Golden Eye Adapter	1	11-1710-30
Cable, Studio ST - AP120 Light Relay Adapter	1	11-1710-40
Cable, Studio ST - AP120 Motor Adapter	1	11-1710-50
Cable, DEX (long)	1	DEX-27L-01
Hardware for Studio ST	1	05-0169-03

#### Tools Needed:

Screwdriver, Philips (control board)

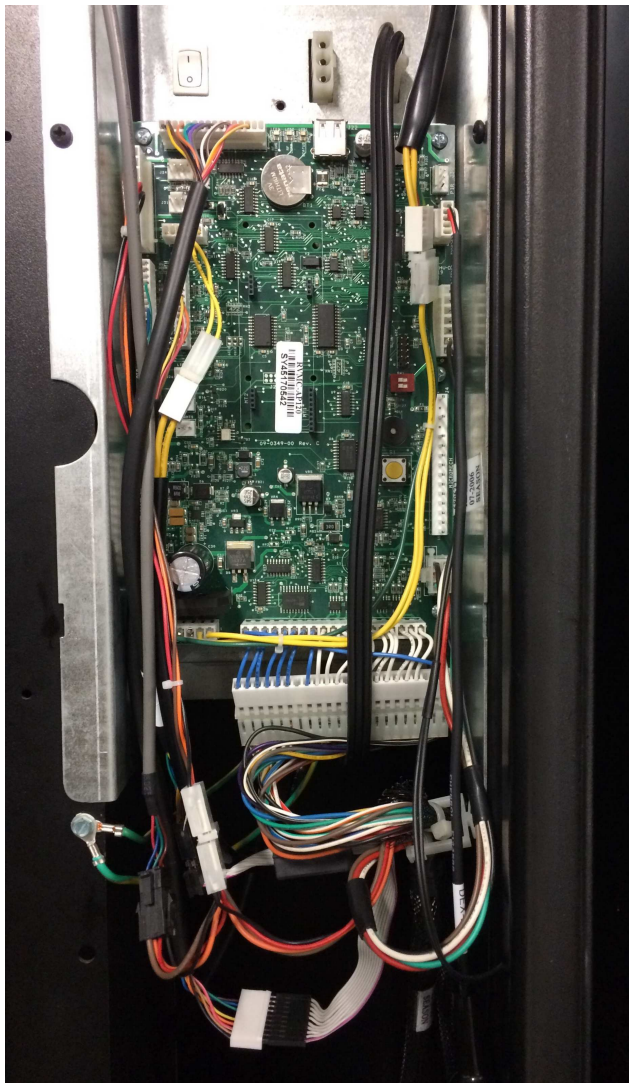
Note: The new control board installation uses the machine's current vacuum fluorescent display.

#### Installation Procedure:

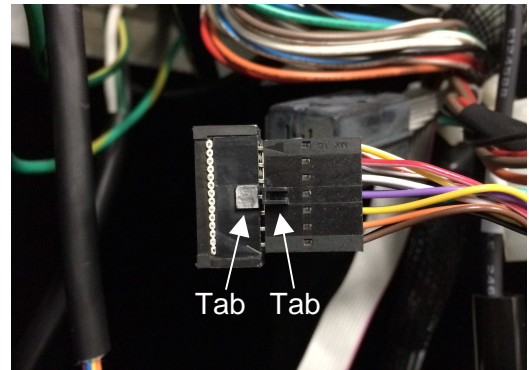
1. Unplug all cables from the existing control board.
2. Remove the metal control board cover. Discard.
3. Unscrew the 6 screws holding the existing control board and remove the board. Discard the board, but keep the screws for the next Step 4.
4. Install the new **05-1175-00** control board mounting plate by screwing it onto the standoffs where the original board was located. Use the 6 screws removed in Step 3. The 5 hex standoffs should be facing outwards on the mounting plate with 2 on the left and 3 on the right.
5. Install the new **10-0349-10** control board using the five 1/4" long 6-32 screws (supplied in kit). The red dip switch, beeper, and yellow service push button should be on the right. Note the control board is static sensitive so take care when handling it.
6. Insure that Dip Switch 1 (top) is **OFF** (to left) for ST mode. Dip Switch 2 (bottom) is **ON** (to right) if drop sensors are used or **OFF** (to left) if no drop sensors used.
7. Connect the pin end of the new **11-1710-50 AP120 Motor Adapter** cable to the existing motor cable. Connect the other end to the bottom of the control board **Motor** header **J6**.
8. Connect the pin end of the new **11-1710-10 AP120 Power Adapter** cable to the original power cable. Connect the other end to the bottom left of the control board **Power** header **J5**.
9. Connect the pin end of the new **11-1710-20 AP120 8080 Display Adapter** cable to the original display cable. Be careful of the orientation. **The tabs on the connectors should match.** (See Picture) Connect the other end to the top of the control board **Display** header **J12**.

10. Connect the pin end of the new **11-1710-00 Studio ST/SL Keypad Adapter** cable to the existing keypad cable. Connect the other end of the cable to the two keypad control board headers **J7** and **J23**. **J7** is located on the upper left board edge and **J23** just to the right of it. The connectors are keyed differently so they can only go on the correct headers. The keys are towards the top.
11. Connect the pin end of the new **11-1710-30 Golden Eye Adapter** cable to the existing drop sensor cable. Connect the other end to the upper left side **Vend Sensor** header **J11**.
12. Connect the pin end of the new **11-1710-40 Light Relay Adapter** cable to the existing lighting cable. Connect the other end to the upper left side **Alarm** header **J32**.
13. Connect the new **DEX-27L-01 DEX** cable to the upper right side DEX header **J2**. Let the cable dangle or wire tie as desired.
14. Connect the existing Door Switch cable to the **Service** header **J3**.
15. Connect the existing MDB cable to the **MDB** header **J8**.

***Finished !!***



**10-0349-10 Control Board**



**Display connection.** Tab on original cable must match tab on new **11-1710-20 Display Adapter** cable

Add wire ties as needed to dress up cables.  
(4 supplied in kit)

**Setup Menu Keypad**

- Scroll Up – Key <
- Scroll Down – Key >
- Enter – Key #
- Cancel – Key C