# Epic 950° by TRANSACT

# TECH SUPPORT REFERENCE GUIDE



# **CONTACT INFORMATION**

 TransAct Technologies Incorporated is the manufacturer of Ithaca brand POS, Banking, and Food Safety receipt printers, and Epic brand Gaming printers.

877.748.4222 - www.transact-tech.com

- When calling the toll free number above, enter Option 2 for Parts,
   Option 3 for Technical Support or Option 4 for RMAs.
- E-mail Technical Support at: TechSupport@transact-tech.com
- Online RMA form: www.transact-tech.com/tsg/rma.html
- Additional product support information can be found on our website: http://www.transact-tech.com/drivers/epic-950
- TransAct also maintains an FTP site for downloading documentation, utilities and firmware files: ftp://ftp.transact-tech.com

USER ID: gaming

PASSWORD: CAs1no123

or at ftp://gaming:CAs1no123@ftp.transact-tech.com

# **SERIAL PLATE INFORMATION**

#### **Date Code Identification:**

• The first letter denotes the month built, as follows:

A = January, B = February, C = March,

D = April, E = May, F = June, G = July,

H = August, I = September, J = October,

K = November L = December

 The two numbers denote the last two digits of the year built, as follows:

04 = 2004

05 = 2005...



Note: Standard Warranty: 2 years from the build date

# PRINTING SELF-TEST TICKET

#### Print a Test Ticket Using the Printer's Self-Test Procedure:

Press and Hold the printer's FEED button and release when you hear the ticket begin to print. The ticket will show the firmware version currently loaded in the printer and other useful information.

#### **Troubleshooting Tips:**

- Verify the port settings if the printer is unable to communicate.
- Verify the printer's boot loader is v1.13 or greater if the ticket fails to print out.
- If all else fails, you can load the printer with factory firmware <STST24.cbt> to restore additional default settings.

Primary Port Settings —
Shown in Hex —

Configuration Ticket

ServerPort Enabled INSERT THIS SIDE UP Model : Epic 950TM (SP.3) Firmware : S00187 UFST Rev : 6.2.1 System CRC: 78B1 Date : Nov 12 2012 S/N : Epic 950 Baud Rate: 9600 BPS 8 Bit No Parity 1 Stop Bit Handshaking : XON/XOFF Receive Error : Prints Smoothing Enabled. Custom Black Grav Eo : 0.12 mJ/sg.mm Black Eo : 0.20 mJ/sq.mm Color Paper : Custom Color Color Black/Red Color Eo : 0.20 mJ/sq.mm Black Eo : 0.38 mJ/sq.mm Density: 0 PreHeat: Off Unicode Mode : ascii Dip Switch: 02 INSERT THIS SIDE UP

# PRINTER STATUS AND BEZEL LIGHT LEDS

#### Printer Status LEDs

The printer has been outfitted with an LED panel system that provides the condition of the printer by using solid or blinking status LEDs to communicate status information. The following table lists the different LED states for specific conditions.



Condition	Ready LED	Paper LED	Open LED	Fault LED
Unit Ready	On	Off	Off	Off
Cover Open	On	Off	On	Off
Chassis Open	On	Off	Blink	Off
Ticket Out	On	On	Off	Off
Ticket Low	On	Blink	Off	Off
Head Temp Error	Blink	Off	Off	Blink
Paper Jam	On	Off	Off	Blink
Ram Error	2-Blink	Off	Off	On
CRC Checksum Error	4-Blink	Off	Off	On
EEprom Error	5-Blink	Off	Off	On
Download Mode	Blink	Off	Off	On
Configuration Mode	Blink	Off	Off	Off

#### **Bezel Status Lamp**

The printer's bezel also displays certain printer status information. See the table below:

Steady	Blinking	Blinking	Blinking
	Rapidly	Medium	Slowly
Online and Ready	Ticket is being printed Ticket in ticket taken sensor	Ticket low Chassis open Cover Open	Ticket not loaded (TOF) Ticket jam error

### PRINTER FIRMWARE VERSIONS

#### Firmware Naming Convention:

Each "Firmware Type" is unique to the supported interface and protocol. The "Firmware Family" consist of the Type and the next three digits. The "Firmware Revision" is incriminated with each firmware change within a given Firmware Family.

Туре	Family	Revision	Description
Serial	S XXX	XX	TransAct Template Language
Netplex	V XXX	XX	IGT - Netplex Protocol
Netplex	N XXX	XX	WMS - IGT's Netplex Protocol
USB	H XXX	XX	GSA - GDS Printer Protocol
USB	U XXX	XX	TransAct Template Language
USB	W XXX	XX	Pair w/ Windows Printer Driver
USB	IUN XXX	xxxx	IGT - Ithaca Universal Netplex
USB	IUU XXX	xxxx	IGT - Ithaca Universal USB

#### **Obtaining Printer Firmware:**

Firmware files <\*.cbt> are available for download from the TransAct Gaming FTP site (see Page 1). After logging in, browse to the Epic 950/Firmware folder, select the interface type and firmware version to download.

#### TransAct Firmware Disclaimer:

The firmware within all gaming ticket printers is subject to regulatory approval. It is the casino's responsibility to ensure only approved firmware for the specific game platform is installed to avoid potential fines imposed by the regulatory body. Please contact the game manufacture and/or regulatory agency to confirm the approval status prior to using any new printer firmware version(s) in your games.

# **GAME INTERFACE OPTIONS**

**Serial Interface** (Use with Type 'S' firmware)

Communication board #95-04998L (14-pin connector)



Netplex Interface (Use with Type 'V' firmware)

- Communication board #95-05001L (10-pin connector)
- Powered through 8-pin pigtail connector



USB Interface (Use with Type 'U', 'H', 'W', 'IUN' and 'IUU' firmware)

- Communication board #95-05472L (4-pin USB connector and 6-pin Netplex connection)
- · Powered through a 4-pin Molex connector



Note: The Inner Chassis is compatible with all firmware versions.

# **RACKING/UN-RACKING THE INNER CHASSIS**

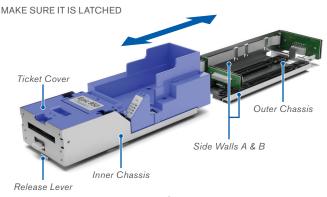
#### To Remove the Inner Chassis:

- Pull on the Ticket Cover to release the rear detents, pulling the Inner Chassis towards you until its latches catch the forward detent slots.
- Push the Inner Chassis back in slightly, pull on the Release Lever and pull forward on the Inner Chassis to un-dock it from the Outer Chassis.

#### To Return the Inner Chassis: (see warning before racking)

- Align the base of the Inner Chassis with the outer walls of the Outer Chassis, seating it within side walls A and B as shown.
   Make certain it's straight so the Inner Chassis doesn't damage the flex cable.
- While pulling outwards on the Release Lever, slide the Inner Chassis towards the rear of the Outer Chassis. Push the Inner Chassis all the way to the back until it stops. When fully seated, the front metal plate of the Inner Chassis and the front left edge of the Outer Chassis are flush.

**ATTENTION:** Interconnect PC Board Assembly must be latched in position shown. Check by trying to move the board by hand prior to racking.



# PREVENTIVE MAINTENANCE

- 1. Remove Inner Chassis as shown on Page 7.
- Open top cover all the way to allow airflow between print-head and platen roller.
- 3. Remove any loose particles using compressed air.
- 4. Clean ticket burst area (under top cover) with a lint free cloth.
- Supply power to the printer either by reinstalling it back into a game or using the Download Kit's power supply.
- 6. Open cleaning card pouch and remove cleaning card.
- 7. Insert cleaning card into feed path while applying some tension thereby cleaning the entire surface of the platen roller.
- 8. Open the top cover and remove the cleaning card.
- 9. Repeat process if necessary.
- 10. Properly dispose of used cleaning card.

#### Waffletechnology Cleaning Cards with Cutout Notches:

 Insert cleaning card into feed path with the notches towards the leading edge and use the FEED button to feed it through 2x.

#### ATTENTION:

- IPA solvents can damage rubber rollers with frequent use.
   TransAct recommends a maximum usage of 2x annually.
- The thermal print-head's life can be reduced with excessive friction. When cleaning the component directly, TransAct recommends using IPA solvent on non-abrasive, lint-free cloth.

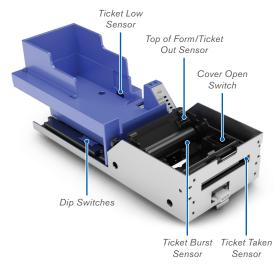
#### **Purchasing Cleaning Cards:**

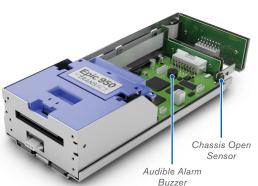
Cleaning cards are available through TransAct.

Description: 2.5" x 6" Cleaning Cards (QTY 15)

TransAct Part Number: 200-00155

# **SENSORS AND SWITCHES**





Ticket Bucket not shown for clarity

# **SENSORS**

#### Chassis Open Sensor

- · Detects when the printer is racked out
- · Metal tab on chassis blocks optical sensor
- · Test OPEN lamp flashes

#### Cover Open Switch

- · Detects when the top cover is open
- · Issue magnet or mount position
- · Test OPEN lamp on when cover open

#### Top of Form Sensor

- · Used for loading and aligning ticket media
- · Turns on the feed motor when loading
- Detects black mark on ticket media
- · Test PAPER lamp turns off when aligned

#### **Ticket Low Sensor**

- · Activates when 6 to 8 ticket are remaining
- · Can be disabled using Dip Switch 2
- · Test PAPER lamp flashes on ticket low

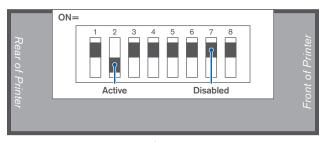
#### **Ticket Burst Sensor**

- Used to detect paper movement
- · Test with ticket loaded open/close cover
- · Ticket should realign, if blocked it backs out
- · Clean remove from bottom of print mech

#### **Ticket Taken Sensor**

- · Detects when patron removes the ticket
- · Test bezel flashes rapidly when blocked
- Issue cabinet airflow, printer +5 years old
- Clean blow out and/or ultrasonic bath
- NEW sealed optical sensor (95-05152L)

# **DIP SWITCH SETTINGS**



Dip Switches

Switch 1 is the closest to the rear of the printer. The Active position is towards the outside edge of the printer.

Power cycle printer to read dip switch changes.

SW-1	Reserved and must be in the Disabled position. If activated, the printer will be held in reset.		
SW-2	Configures Ticket Low. The Disabled position prevents ticket low from being detected.		
SW-3			
SW-4	Occasionally these switches are used for special options. Please refer to the Firmware Release documentation for more information.		
SW-5			
SW-6			
SW-7	Activates the Smart Suite features. Must be active to use the status features of the Bench Test utility.  Must be active on Bally Alpha Class 3 games or disabled for all other games.		
SW-8	Activates 2-color operation (color ticket media required)		

# FLEX CABLE REPLACEMENT

#### Installation:

When installing the cable into the Outer Chassis, make the rear connection first (A). Then create a loop in the cable so it can be easily slipped over the clip closest to the connector (B), then repeat for remaining clips. Release the sliding connector board's latches by lifting up on the two levers and push the board towards the rear to allow enough slack to mate the front connection. Now mate the front connection to the sliding board and pull the sliding board forward until it is firmly latched.

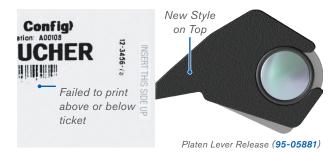
**Description:** Flex Cable



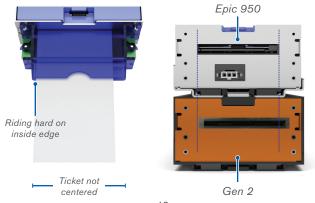


# **TROUBLESHOOTING**

- Test sensors using button panel and bezel lamps
- · Most issues are resolved by blowing out dust
- · Strange behavior Verify firmware family
- · Comm error after printer swap Check Dip Switch 7
- NEW levers resolve half print issue (95-05881)



Frequent ticket jams - Check bezel alignment



# DOWNLOAD AND TEST HARDWARE

#### Required Download Hardware:

New USB Programming Cable: 95-13318L

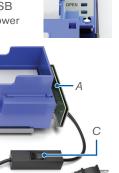
New Epic 950 Download Kit (Coming Soon):

100-06693L

You can also change firmware with just the USB Programming Cable if you use the game to power



USB Programming Cable 95-13318L



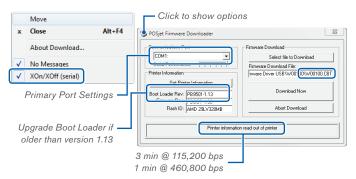
#### Download Mode:

The printer must be put into a special mode to allow firmware downloading. Preference is to preload a ticket beforehand to allow the configuration ticket to printout as an indication that the flash process has finished.

- 1. Rack-out the printer (A) verify OPEN lamp flashing
- 2. Open the Top Cover (B) verify OPEN lamp On solid
- 3. Power off the printer (C) no lamps should be On
- 4. Hold the FEED button (D) while applying power (C)
- 5. Wait for FAULT lamp On and READY lamp flashing
- 6. Download Load Mode, release the FEED button (D)
- 7. Allow printing, Rack-in (A) and close Top Cover (B)

# FLASHING PRINTER FIRMWARE

The latest version of the downloader utility can be found on our website and FTP sites.



#### Utility one-time setup:

- 1. Click the upper left icon to show the option menu.
- 2. Checkmark the Xon/Xoff (Serial) option.
- 3. Select or Enter the PC assigned COMM Port number.
- 4. Adjust the Serial Performance slider to the right.
  - Recommend setting is 115200 Baud
  - b. USB Program Cable supports 460800 Baud

#### Flashing printer firmware:

- Click the Get Printer Information button. Recheck all steps if textboxes don't populate.
- Verify that Boot Loader Rev: is 1.13 or greater. Available on our FTP site and same flash process.
- Click Select file to Download button. Choose an approved firmware version to flash.
- 4. Click the **Download Now** button to begin flash.
- 5. Wait for Flash Update In Progress to finish.
- 6. Verify firmware version on configuration ticket.



TACT001037\_RevA