

AMROTEC®

X-1100

2-Pocket Currency Fitness Discriminator

Operation Manual V. 1.0

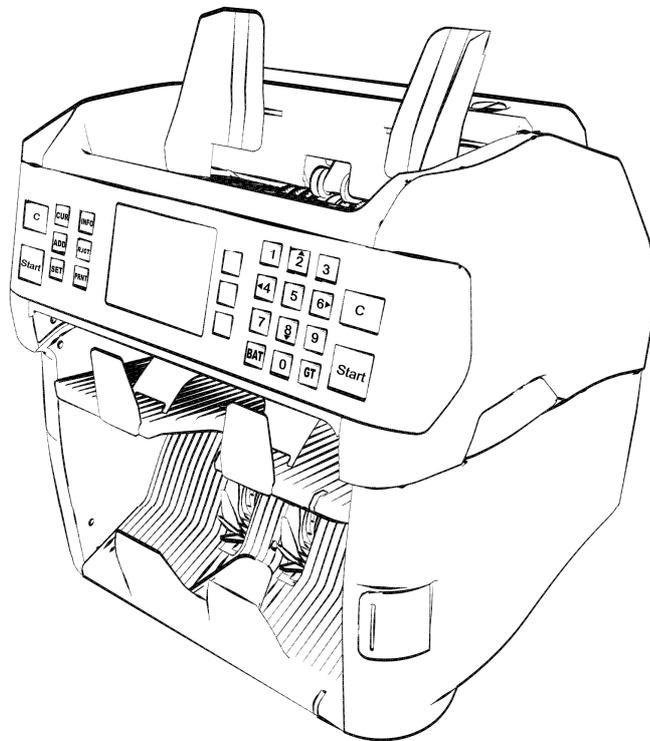


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Chapter 1. Introduction

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Changes or modifications of this product not expressly approved by manufacturer, could void manufacturer's warranty and the user's authority to operate the equipment.

Abbreviations and Acronyms Used

USB	Universal Serial Bus
IR	Infrared
MG	Magnetic
MB	Megabyte
MA	Software Developer
PC	Personal Computer
LCD	Liquid Crystal Display
SD	Secure Digital

Important Notes and Safety Instructions



Electrical Safety!

To avoid the risk of electrical shock, fire, or damage to X-1100 Currency Discriminator:

- ① Do not remove the side covers, rear or bottom cover in any situation.
- ② Do not disassemble X-1100 device by yourself or by anyone unauthorized by "AMROTEC®".
- ③ Do not use damaged or worn power cord or plugs. Always use the power cord supplied inside the original packaging carton and connect to a properly grounded power outlet or to a power strip with surge protector. The power source for X-1100 is AC 90V~240V, 60 Hz.
- ④ Keep metal objects, such as paper clips, away from the hopper and stacker. If a foreign object does fall into the X-1100 device, turn off the power and unplug X-1100 device immediately. Contact your X-1100 service provider for assistance.
- ⑤ Keep liquids away from X-1100. Do not operate the Currency Counter if it is wet. Also, do not touch the Currency Discriminator if you are wet. If a spill occurs, turn off the power and unplug X-1100 immediately. Contact one of our authorized X-1100 service providers for help.

WARNING



Warning!

The X-1100 Currency Discriminator may start operating accidentally in certain circumstances as described below. Therefore, it is important to always follow the precautions listed below:

- ① Do not wear loose clothing or jewelry while operating the X-1100 Currency Discriminator.
- ② Make sure that your hair does not touch or enter into the Currency Discriminator while it is in operation.
- ③ Do not touch banknotes that have been delivered into the stacker while the motor is still running. Wait until device completely stopped before removing banknotes from stacker pocket.
- ④ Turn off the power before performing any maintenance or error corrections that require you to put your hands into the device.
- ⑤ Keep X-1100 away from magnets, activated cellular phones, electrical appliances, or speakers within 13 cm / 5 inch.

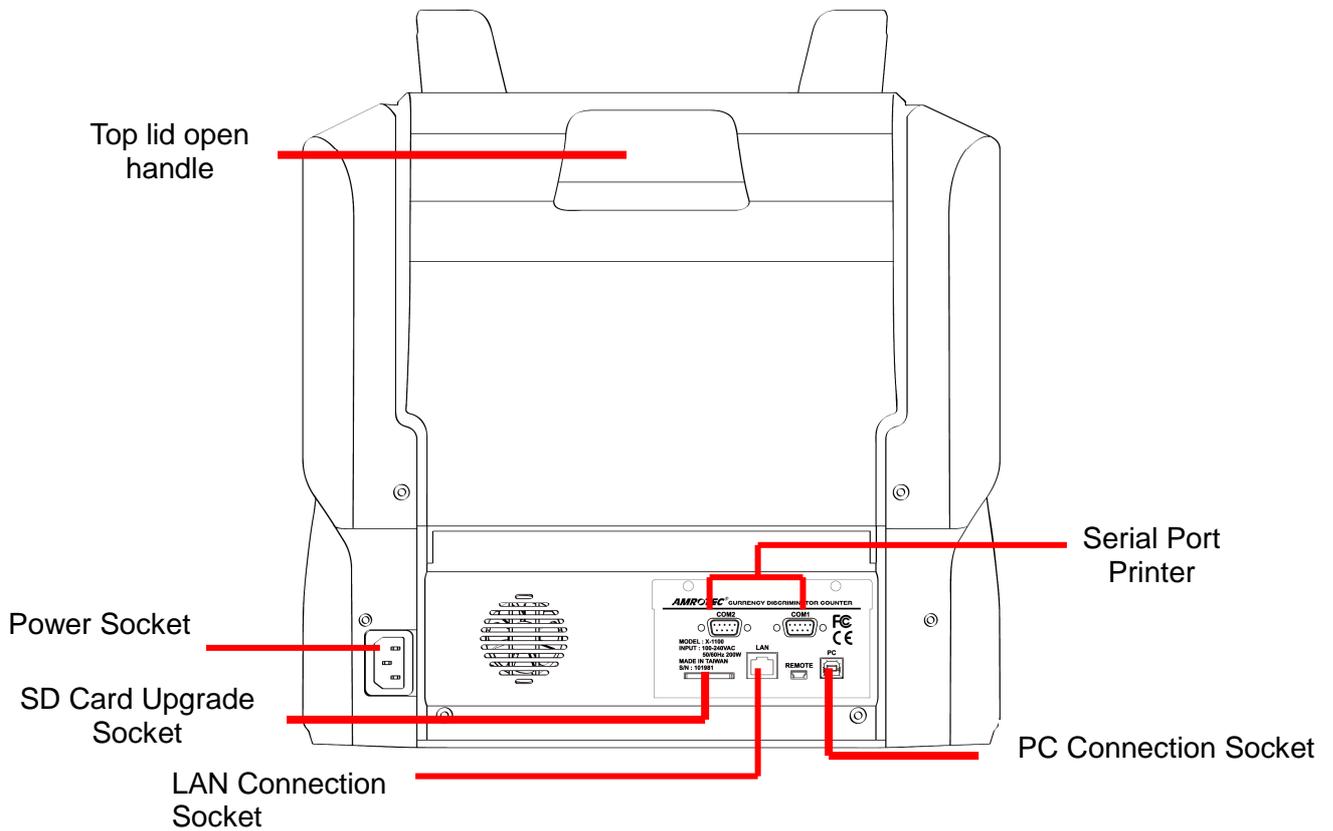
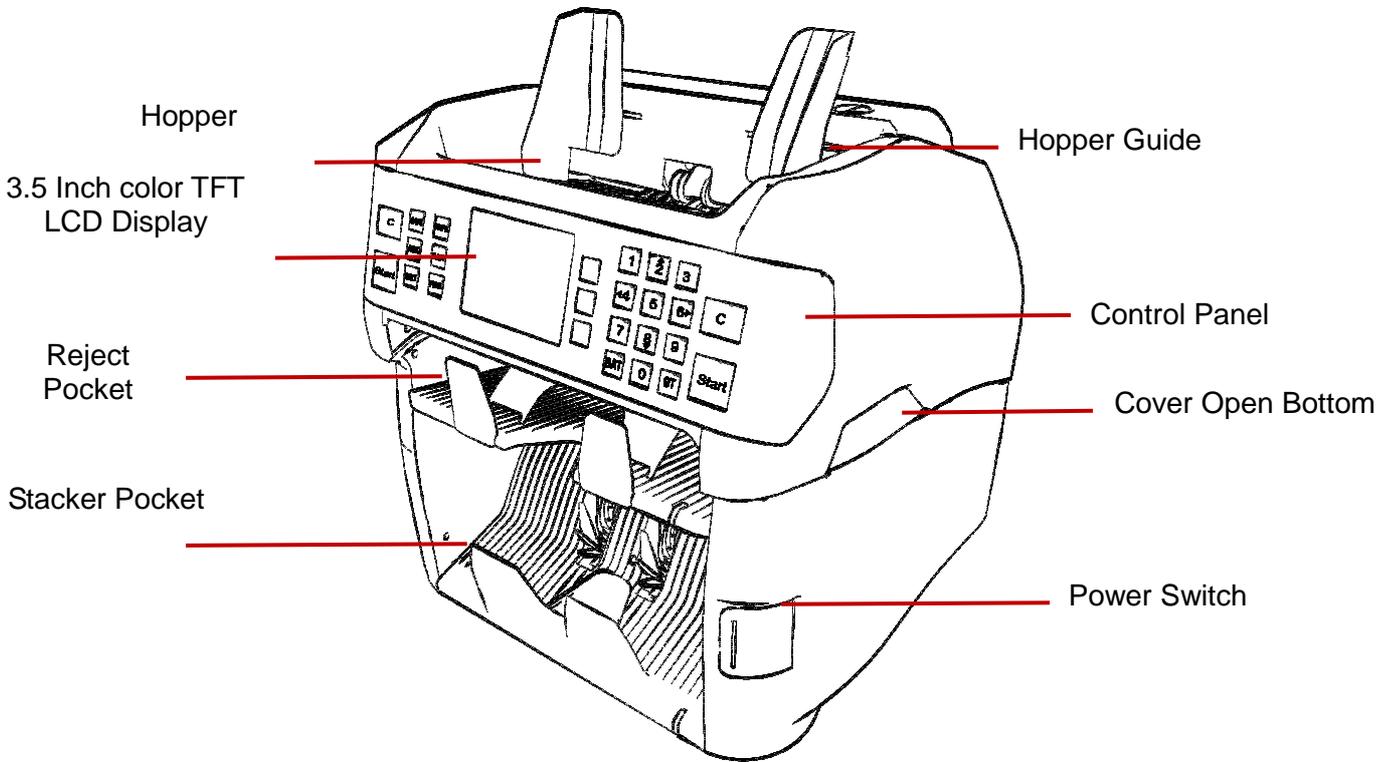


This device complies with part 15 of the FCC rules. Operation is subject to the following conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

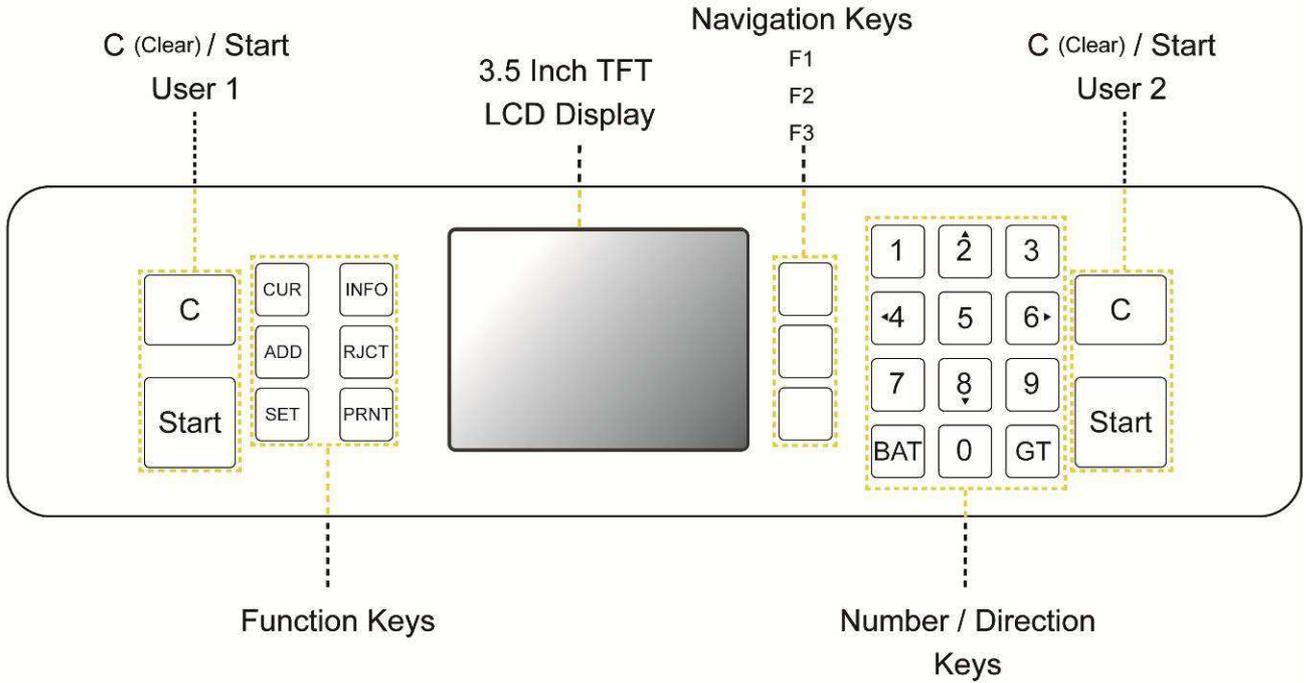
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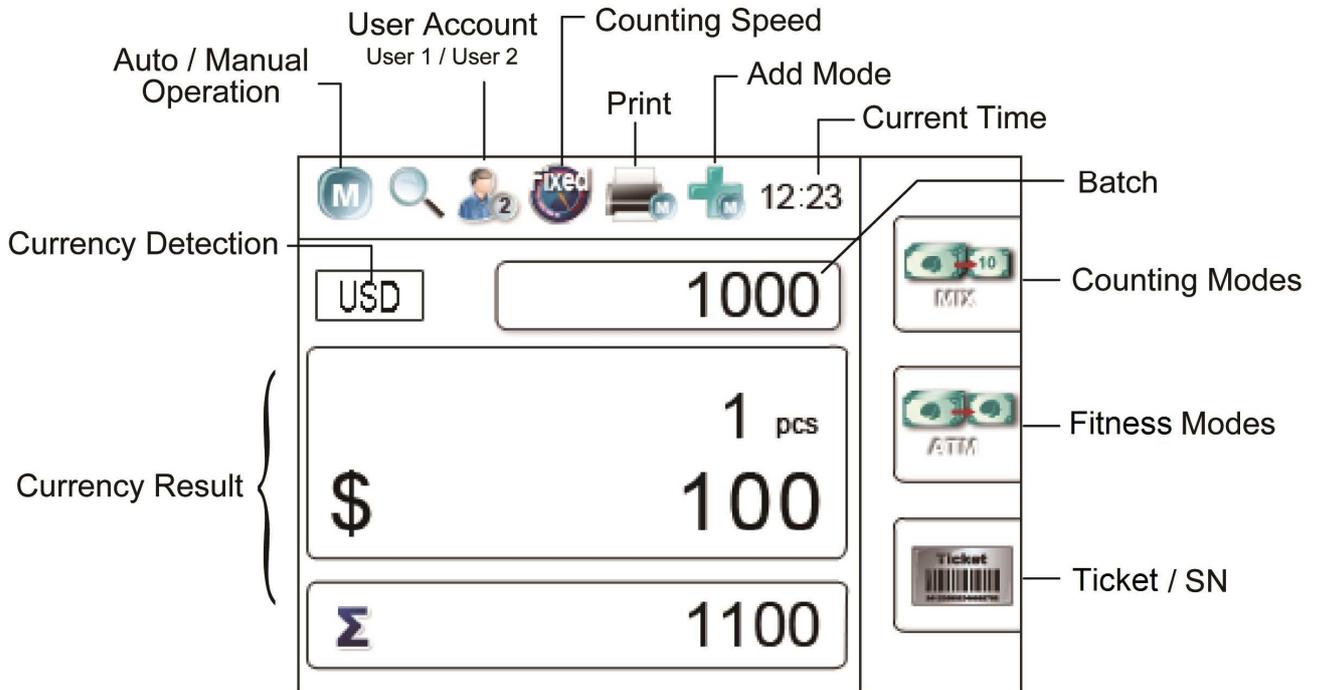
X-1100 at a Glance



Overview of Control Panel



Overview of LCD Display



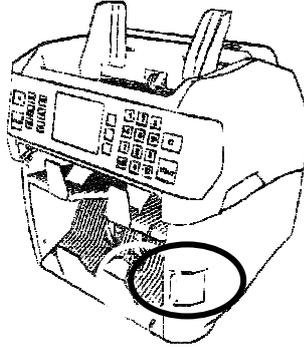
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✦ Power On / Off

To Power on X-1100 Currency Discriminator,

- ❶ Plug one end of the power cord into the A/C Power socket of the rear side of the device and the other end into a standard AC power wall outlet (properly grounded) or to a power strip.
- ❷ Push the Power Switch button located at the bottom front side of the device.
- ❸ After initializing, X-1100 will enter into main display.



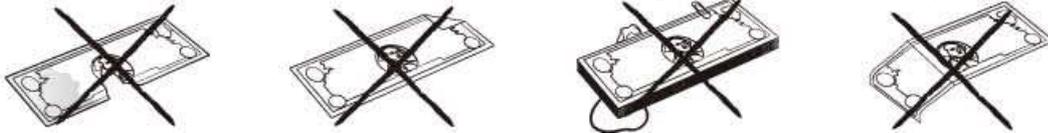
To Power off X-1100 Currency Discriminator,

- ❶ Confirm that all your counting results are saved prior to powering off the device.
- ❷ Press the Power Switch button to Power Off.

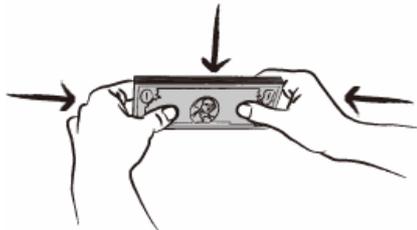
✦ How to Handle and Place Banknotes in X-1100

To count banknotes smoothly without jamming or errors, please follow the following guidelines:

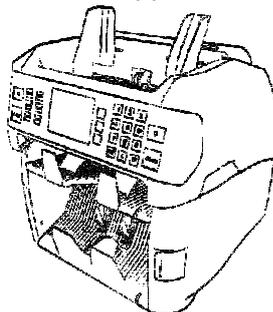
- ❶ Avoid counting wet, excessively dirty or spoiled banknotes.
- ❷ Check for foreign matters mixed within your banknotes, i.e.: paper chips, rubber bands, clips, dust, etc. which may jam the note transport path or even damage the sensors located within the path.
- ❸ Remove folds or curls from your banknotes before placing them in the note hopper.



- ❹ Align all the corners and edges of your banknotes as unevenness could cause errors.



- ❺ Place your banknotes at the center of Note hopper and adjust the hopper guides if necessary.



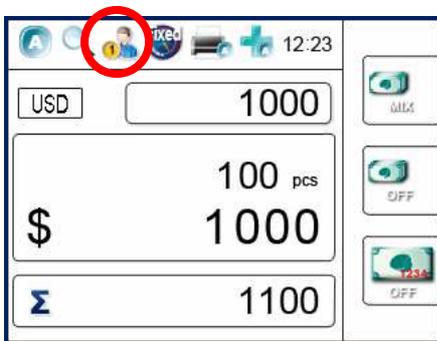
✦ Dual Users Operation

X-1100 supports counting operation by dual users in which counting results of the two users can be saved separately. Dual user's operation can also be used as having two separate settings. X-1100 is also able to print counting results of the two users on separate printers or a single printer as selected.



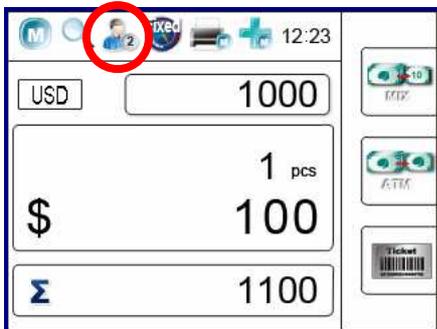
- Two sets of  and  buttons are provided on the control panel for two users operation. This function is deactivated from factory by default and can be turned on by your sales representative or service provider.

- ◆ The left side buttons are for User 1 .
- ◆ The right side buttons are for User 2 .



-  (Left Side User).

- ◆ Press the  on the left side to select User 1.
- ◆ To confirm and/or cancel all counting operation functions, use the  and  of the left side.



-  (Right Side User).

- ◆ Press  on the right side to select User 2.
- ◆ To confirm and/or cancel all counting operation functions, use the  and  of the right side.



- Clearing the counting results.

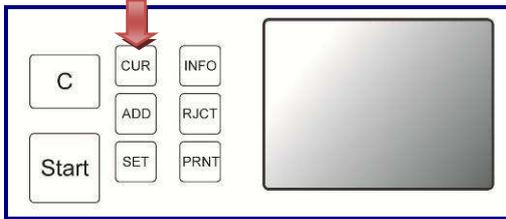
Press  of the respective current user ( / ) to clear each of the counting results.

For Users  and , all functions of counting operation are kept separately. Two users can operate X-1100 with their individual preferences and settings. The counting result and settings of the counting modes do not interfered with each other while in operation.

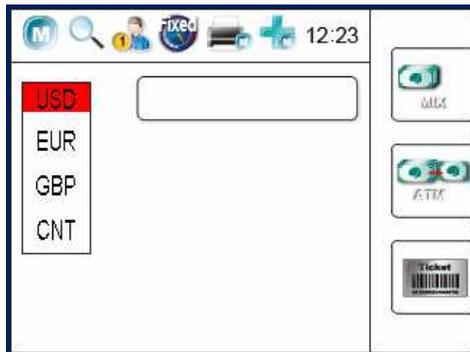
***NOTE:** Dual user operation is apply only to counting modes. It does not apply to general settings under the Setting menu.

✘ Selecting Currency, Count Mode & Density

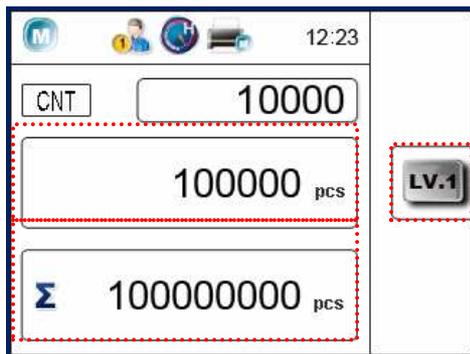
● To Select Currency (Factory pre-set) & Count Mode



- 1 key
 - ◆ Key is used to select default currency to be counted with X-1100.



- 2 To select, press and hold the .
 - ◆ All available currencies that are loaded to X-1100 will show on the LCD display.
 - ◆ Use direction keys to highlight a desired currency.
 - ◆ Press the to confirm the selection.
 - ◆ Start counting of your banknotes.



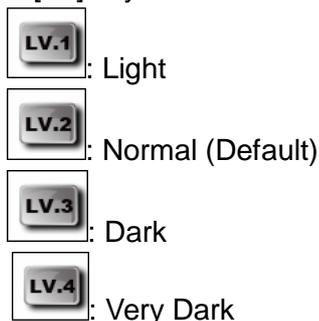
● CNT - Count Mode

- ◆ CNT mode is included under this menu.
- ◆ Press and hold key to enter into this sub-menu and select CNT mode.
- ◆ Under CNT mode, the X-1100 device counts banknotes without detecting counterfeits.
- ◆ The current counted pieces is shown on the top, and total counted quantity Σ is accumulated automatically.

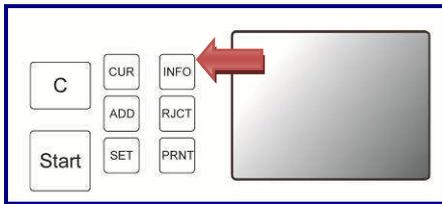
● Density Selection: (Only apply to CNT Mode)

X-1100 device software is able to adjust density for double detection purposes, based on the first banknote passed through the sensor, however, software also allows users to select a different density level to adjust double detection if causing frequent false double errors. In such case, while in CNT mode, press [F2] corresponding key to select between four different double detection level.

- ◆ Press [F2] key to select between four different Density levels:



Counting - Detail View & Manual Entry

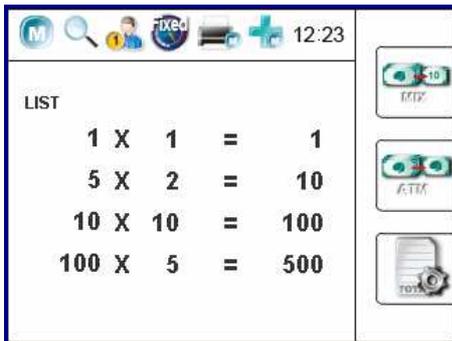


Once a count is completed, press **INFO** key to see the detail information of current transaction by each currency denominations of banknotes counted as well as to view quantity and value of counted banknotes.

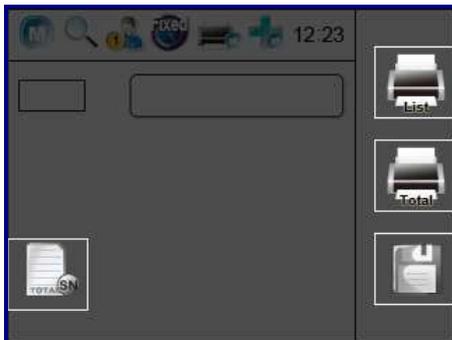
1 LIST

- LIST display screen will show the detail counting result for current count by piece qty and value by denomination, and subtotal of accepted notes including Fit banknotes (If in FIT or ATM mode).

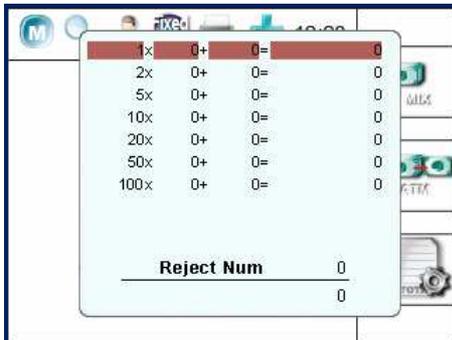
If the current page is not enough to display all the counted denomination, please use the direction keys **2** \uparrow / **8** \downarrow to change to next page.



- Press **PRNT** to enter into printing screen to print break-down results to a printer or save data to GT.
- F1 (List) will print out detailed information of banknotes
- F2 (Total) will print out the total amount of banknotes



- Press **GT** to save the data to GT or Print **GT**.
- Pressing **START** key on this screen will allow users to be able to perform manual entry by entering the number of banknotes using the keypad.



Manual Entry:

While in the INFO screen, press [F3] key to bring up the manual entry menu in where users is able to manually enter any rejected banknotes qty and value that may be fit for circulation under Fitness modes or simply genuine banknotes which could not read by sensor. Manual Entry selection of each denomination will appear on Print receipt under Manual Entry (See page 26) or under Fitness Mode (See Page 42).

2 Grand Total

- Grand Total display is only available and display when ADD function is activated.
- Press **GT** to view Grand Total List of different counted batch of straps, piece and value (Grand Accumulation View).

[Grand Total display screen will show all confirmed transactions that are accumulated.]

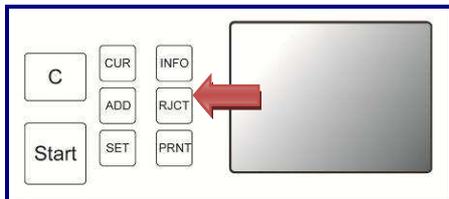
Grand Total			
USD	1x	55=	55
	2x	100=	200
	5x	500=	2500
	10x	500=	5000
	20x	500=	10000
	50x	500=	25000
	100x	500=	50000
Σ		2655 pcs	18620

Daily Result 28. Apr. 2013 ◀▶		
USD	1x	55= 55
	2x	100= 200
	5x	500= 2500
	10x	500= 5000
	20x	500= 10000
	50x	500= 25000
	100x	500= 50000
Σ		2655 pcs 18620

③ Daily Result

- ◆ Daily Result / Day Total is available when ADD mode is activated.
- ◆ Under Daily Result, all confirmed transactions for one full day is accumulated.
- ◆ Press **GT** twice to view Day Total of all confirmed count for that day.
- ◆ Further, all counted information within 30 days are saved into machine's memory. Press **4** / **6** to change the Day Total counting information for different dates.
- ◆ Press **GT** three times to exit the Daily Result / Grand Total screen

✦ Reject Reasons



Once counting is completed, press **RJCT** key to see reject reason information of all rejected banknotes that are delivered to Reject Pocket.

Reject Reasons			
0	Double	0	Skew
0	Chain	0	Note Gate
2	Soiled Note	1	Folded Corner - Note
0	Stained Note	0	Holes - Note
0	Taped Note	10	Torn Note
1	IR Suspect	0	UV Suspect
0	MG Suspect	0	IMG Suspect
0	Unknown Doc.	0	SN Error
0	Other Errors	Σ	14

① Reject Reasons # 1

- ◆ On this screen, user can view the number of rejected banknotes appear next to each category of Reject Reasons.
- ◆ Total of rejected banknotes is showed on the bottom left of the LCD display as **Σ**.
- ◆ **Definition of Reject Reasons:**
There are various reasons a banknote can be rejected to reject stacker during a counting operation. The below is a complete list of all reasons for rejects:

- **Double:** Double Banknotes detected.
- **Skew:** A banknote skewed during the transportation.
- **Chain:** Chain of banknotes in the bill path.
- **Note Gate:** The gap between two notes is too close
- **Soiled Note:** Soiled banknotes (Unfit)
- **Folded Corner - Note:** Angular banknotes too large
- **Stained Note:** Stains on banknotes (Unfit)
- **Holes-Note:** Large hole on banknotes (Unfit)
- **Taped Note:** Tape found on the banknote (Unfit)
- **Torn Note:** Torn banknotes (Unfit)
- **IR Suspect:** Infrared Error (Suspect banknote).

- **UV Suspect:** Ultraviolet Error (Suspect banknote).
- **MG Suspect:** Magnetic error (Suspect banknote)
- **IMG Suspect:** Image error (Suspect banknote)
- **Unknow Doc.:** An unknown image (unrecognizable)
- **SN Error:** Banknote serial number recognition error.
- **Other Error:** Other error (other types of bill recognition errors that are not defined above)

Reject Reasons	
No	Reject Reason
0001	Unknown Doc.
0002	IR Suspect
0003	MG Suspect
0004	IMG Suspect
0005	UV Suspect
0006	Taped Note
0007	Skew

100 Other Errors 2 114

② Reject Reasons # 2 (Each bill by bill):

- ◆ Once Reject Reasons #1 is viewed, press [Start]  button to bring up this screen showing reject reasons for each bill by bill.
- ◆ This Screen will show reject reason for each banknote in the order it was rejected from bottom to top in the reject pocket.

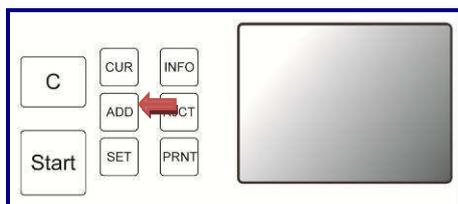
Add mode

ADD function provides a cumulative piece count in [CNT] mode. As to all discriminating counting modes (MIX, SINGLE, FACE, ORIENT, FITNESS etc), the ADD function accumulates quantity and amount of each running total to Grand total and Day total, thereby saves counting results into device memory.

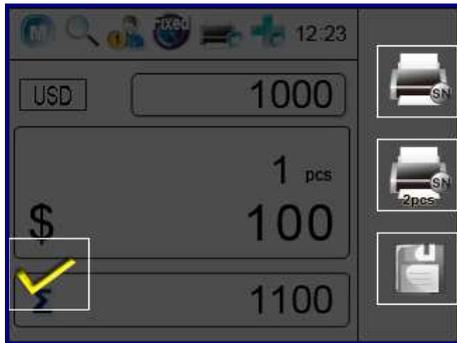
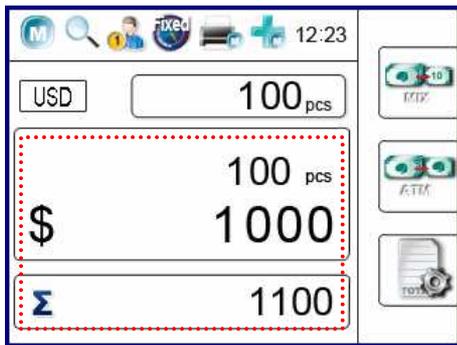
Under SET  menu, machine operator can assign ADD function to be either "automatic accumulation" or "manual accumulation" of counting results (See Page 18). For example,

- ◆  **(Auto Add Mode):** X-1100 device will add currency counting result to Grand Total automatically once counting is completed and banknotes are removed from the stacker.
- ◆  **(Manual Add Mode):** Under Manual Add Mode, Grand Total has to be added manually for each count by users. See below for detail explanation:

Follow the below steps to activate automatic accumulation or manual accumulation of ADD function which affects how results are stored in Grand Total and Day Total count.



- ① Add  symbol always visible on the top taskbar of the LCD display screen ensuring activation of either automatic accumulation or manual accumulation of ADD function.



- If  (Auto Add Mode) is activated, then, machine will automatically save current counting results (Amount, pieces and total) to Grand Total and Day Total.

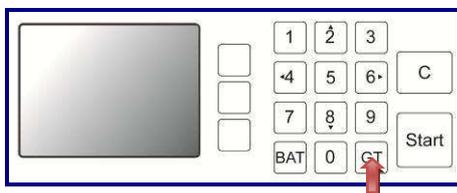
The saved transaction is accumulated to Grand Total and Day Total.

- IF  (Manual Add Mode) is selected, press  key on the control panel to enter into confirming results and Printing menu screen.
- Under Print screen, press  / F1 or F2 key to confirm the transaction and print counting results (F1=Single or F2=Dual receipts) to an external printer.
- Press  / F3 to save the counting results to Grand total and Day Total memory.

✘ Grand Total

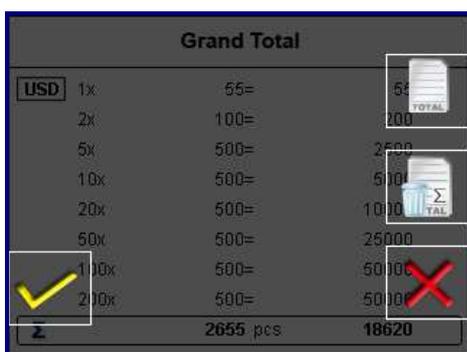
Grand Total feature is to save accumulated different counting results to the memory and display to users when GT is selected. To save a transaction to Grand Total, it can be achieved by two ways . For example,

-  (Auto Add Mode): X-1100 device will add currency counting result to Grand Total automatically once counting is completed and banknotes are removed from the stacker.
-  (Manual Add Mode): Under Manual Add Mode, Grand Total has to be added manually by users for each count.



 Under Manual Add Mode,

- After counting is completed, press  key to enter into Grand Total screen.



- Press  key corresponding to  for confirming the transaction.

Grand Total			
USD	1x	55=	55
	2x	100=	200
	5x	500=	2500
	10x	500=	5000
	20x	500=	10000
	50x	500=	25000
	100x	500=	50000
Σ		2655 pcs	18620

③ The current transaction is accumulated to Grand Total as illustrated on the diagram screen.

Grand Total			
USD	1x	55=	55
	2x	100=	200
	5x	500=	2500
	10x	500=	5000
	20x	500=	10000
	50x	500=	25000
	100x	500=	50000
Σ		2655 pcs	18620

Print options are shown on the right: F1 (Print current transaction), F2 (Delete the record), F3 (Exit the print mode). A yellow checkmark is next to the 100x row, and a red X is next to the 200x row.

④ Press **PRNT** again to enter into the print mode, and different options are appeared for selection.

- ◆ F1: Print current transaction.
- ◆ F2: Delete the record.
- ◆ F3: Exit the print mode.

⇒ Make your proper selection and return to main screen.

✦ Day Total

Day Total feature is to view and print out all confirmed counting results for current day or a particular day up to the past 30 days. To accumulate a total count for a given day.



① At the end of the day or when required to see accumulated count result for the day, press **GT** key twice to enter into Day Total screen.

Daily Result 28. Apr. 2013 ↔			
USD	1x	55=	55
	2x	100=	200
	5x	500=	2500
	10x	500=	5000
	20x	500=	10000
	50x	500=	25000
	100x	500=	50000
Σ		2655 pcs	18620

② All the confirmed transaction of a day is listed on the display. Further, all counted information within 30 days are also saved into machine's memory.

- ◆ Press **←/→** to change the Day Total counting information for different dates.

Daily Result 28. Apr. 2013 ↔			
USD	1x	55=	55
	2x	100=	200
	5x	500=	2500
	10x	500=	5000
	20x	500=	10000
	50x	500=	25000
	100x	500=	50000
Σ		2655 pcs	18620

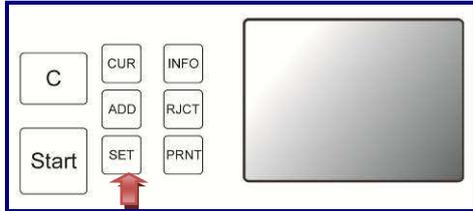
Print options are shown on the right: F2 (Print All Day), PRINT (Print One Day), F3 (Exit). A red X is next to the 200x row.

③ Press **PRNT** key to enter into printing options to print out day total receipt whether for all day or a single day.

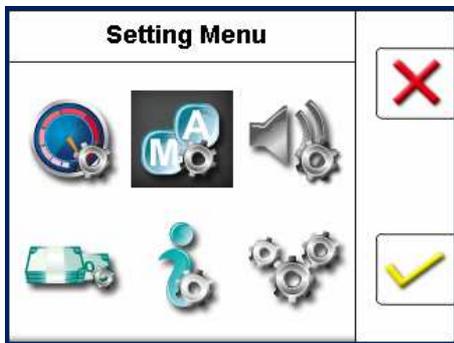
- ◆ F2: Print All Day.
- ◆ PRINT: Print One Day.
- ◆ F3: Exit ⇒ Make your proper selection and return to main screen.

✦ Auto / Manual Modes for Start, Add and Print functions

By browsing through Setting Menu, operator can select to operate machine in automatic or manual mode for various features, such as start of the machine operation or accumulation after a count is completed or printing of counting results. To select these automatic and manual feature and operate X-1100 device between Automatic and Manual Start counting mode, Automatic and Manual printing and accumulation mode, follow the steps below:

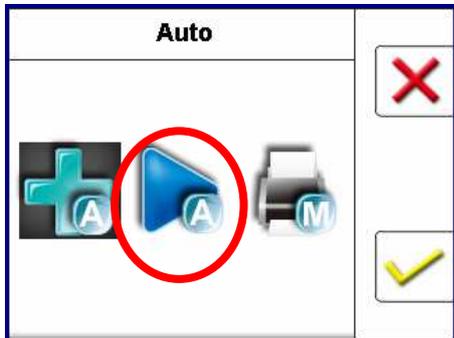


- 1 Press key to enter into Setting Menu.
- 2 Select icon by using direction keys / to enter into Auto and Manual ADD sub-menu, or Auto and Start sub-menu, or Auto or Manual Printing sub-menu as described below:



(Auto Add Mode): X-1100 device will add currency counting result to Grand Total automatically once counting is completed and banknotes are removed from the stacker.

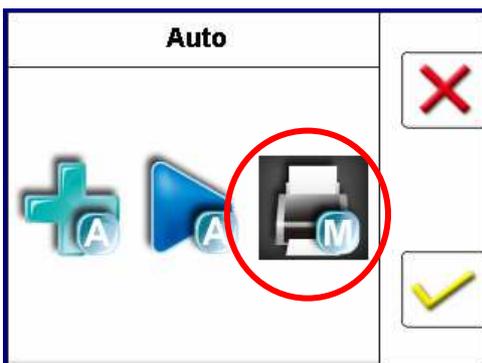
(Manual Add Mode): Under Manual Add Mode, Grand Total has to be added manually for each count.



(Auto Start Mode): If Auto Start Mode is selected, the X-1100 device automatically feeds banknotes on the hopper and start counting.

(Manual Start Mode): If Manual Start Mode is selected, the X-1100 device will only feed banknotes and start counting after key is pressed.

- ◆ Press / F3 to choose Auto or Manual Start Counting mode or Add mode, and press to confirm the selection.

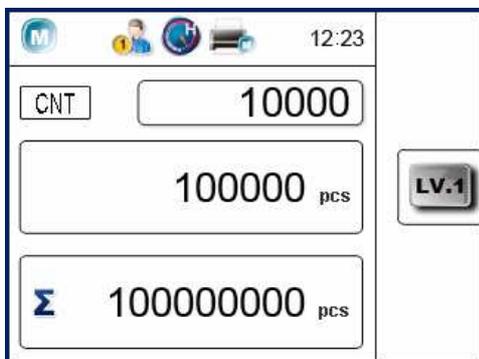
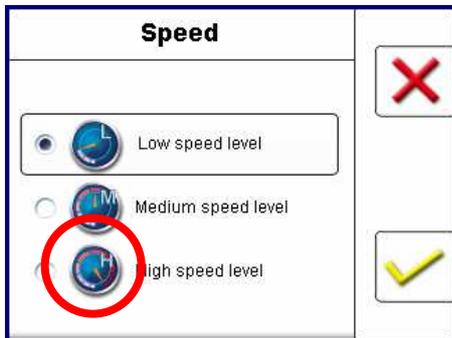
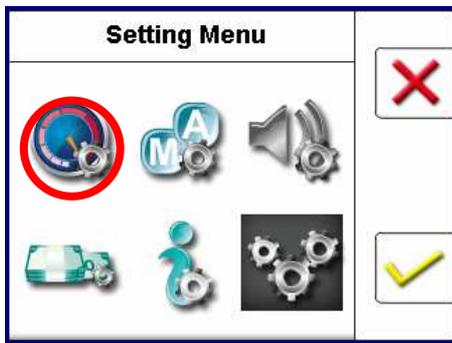
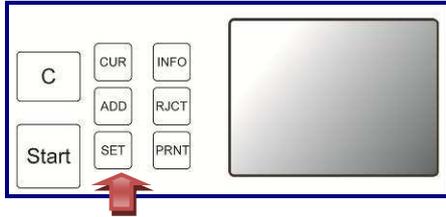


(Auto Print Mode): If Auto Print Mode is selected, X-1100 automatically prints current results to a printer (if connected) once counting is completed and banknotes are removed.

(Manual Print Mode): If Manual print Mode is selected, user needs to press [PRNT] button to enter the Print menu to print the results to the printer.

✘ Counting Speed [Only in CNT - Piece Mode]

The X-1100 device is configured to count circulated banknotes [CNT mode] quantity at high-speed from factory, however, software allows user to adjust counting speed to count banknotes at lower speed if necessary. Note that, the counting speed of X-1100 device is fixed for all discriminating modes at about 750 banknotes per minute and not adjustable. To adjust variable counting speeds in [CNT] mode,



❶ Enter into Setting Menu by pressing key.

❷ Under Setting Menu, select Speed setting icon  to enter into Speed setting menu.

◆ Confirm your selection by pressing F3 / .

◆ Always use direction keys ← / → to scroll through various sub-menu settings.

❸ Under  speed menu, choose from one of the three speed settings from Low, Medium or High speed level as below:

◆ Low speed level : 600 notes / minutes.

◆ Medium speed level : 900 notes / minutes.

◆ High speed level : 1200 notes / minutes.

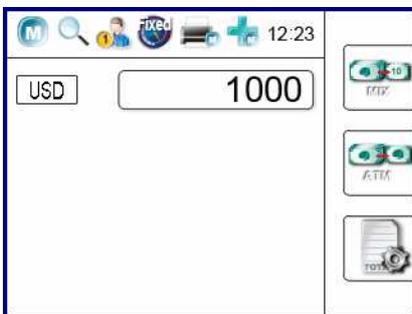
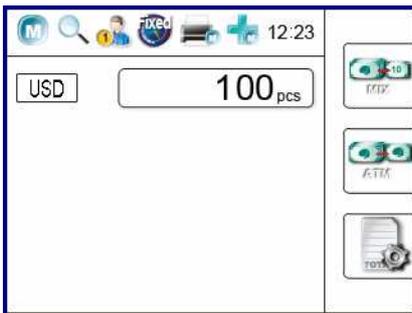
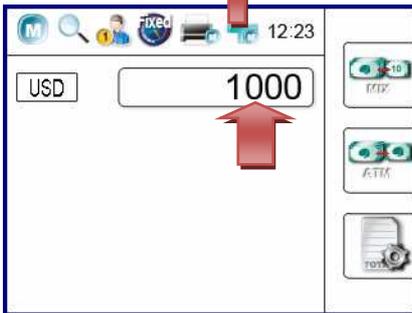
➔ Confirm your selection by pressing F3 / .

➔ Always use direction keys ↑ / ↓ to scroll between three speeds.

❹ Selected speed will be shown on the top taskbar.

✘ Batch Counting

X-1100 device allows users to set counting of banknotes by a preset batch number by quantity apply to all counting modes or fixed strap or by a specific amount applies to certain counting modes.



- ❶ Press **BAT** key to activate the function.
 - ◆ A batch number by pieces (1-999) or preset (5, 10, 20, 25, 50, 100) or amount can be set using this batch function as described below in details.
- ❷ Enter your desire batch quantity or amount by pressing the numeric number keys (0 - 9).
- ❸ Always press **Start** key to confirm and save your preset batch setting and to return to main screen.
- ❹ The preset batch qty or amount will be shown on the upper section of the display.

❺ Set batch by quantity (Pieces)

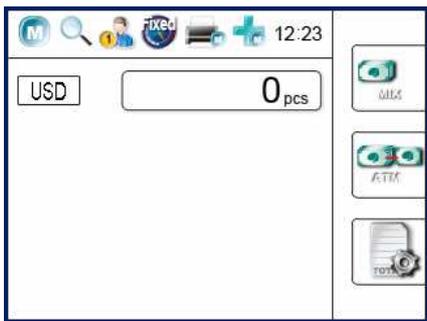
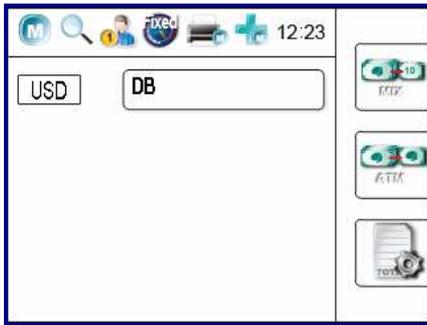
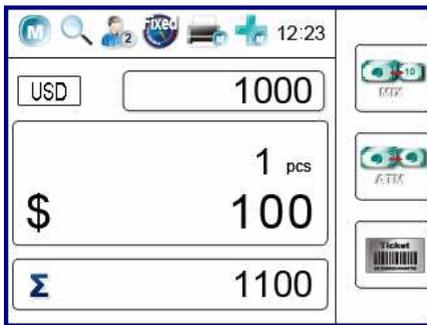
- ◆ User can set batch qty from 1-999 by pressing [BAT] key one time followed by numeric keys (0-9).
- ◆ User can enter into factory preset batch qty of 5, 10, 20, 25, 50 or 100 by continue pressing [BAT] key until desire batch number is achieved.

BAT → (---) → 5 → 10 → 20 → 25 → 50 → 100 → DB

- ◆ When a batch number is set, the device counts up to the preset number and stops once the preset batch quantity is reached. Remove all banknotes from stacker to continue the batch count or insert more banknotes if incomplete batch.

❻ Set batch by amount (Amount)

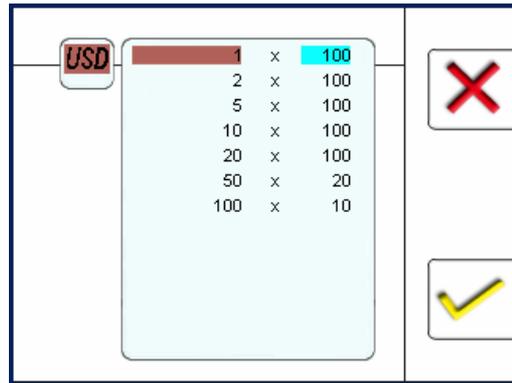
- ◆ User can set a batch by amount by pressing **BAT** key 8 times (after preset batch quantity is displayed in sequence). Enter amount by using numeric keys(0-9) and then confirm the selection by pressing **Start** key.
- ◆ The device will count banknotes up to the preset amount and stops when counted total reaches the preset batch amount. Batch by amount is only available in discriminating modes, such as MIX, SINGLE etc. Banknotes that are over the batch amount will deliver to Reject Pocket along with suspicious banknotes, if any is detected during counting.



7 Denomination Batch (DB) - FED Strap Limit guideline

To set DB function, continue pressing **BAT** key until DB displays on Batch window. Press **Start** to confirm your selection.

The device will count banknotes based on fixed batch numbers (Fed Strap limit) set in the Denomination Batch set menu. Note that this denomination batch (DB) feature is only available in Single, Face, Issue, and Sort modes.

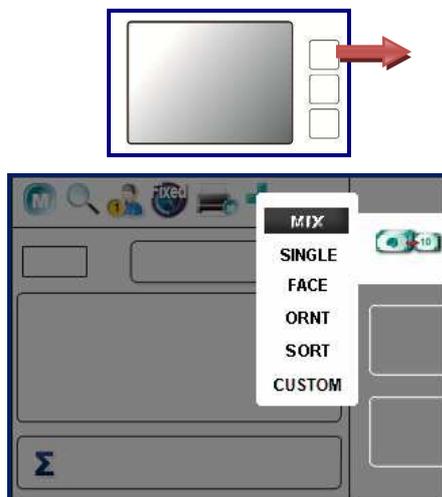


8 Cancel the batch:

- ◆ Press **BAT** to enter into batch setting mode.
- ◆ Press the **C** key several times to clear the preset number or amount until it shows 0.
- ◆ Press **Start** to confirm the setting and return to main screen.
- ◆ The preset batch is now cancelled.

✦ Sorting Modes

X-1100 Currency Discriminator device is equipped with various discriminating and sorting counting modes, such as MIX, SINGLE, FACE, ORIENT, SORT etc. These discriminating and sorting modes can be selected by pressing [F1] key as illustrated below:



- 1 Continue pressing [F1] key to select your desired Discriminating or Sorting Mode. The available operation Modes will show sequentially on the taskbar of the LCD Display screen. Press and hold [F1] key to see all available modes.
- 2 Use **2**↑ and **8**↓ or **4**← and **6**→ to highlight your desired operation mode.
- 3 Press **Start** to confirm your selection.

✦ Definition of Various Discriminating & Sorting modes:

MIX MIX Value Mode (mixture of banknotes)



- ◆ Counts mixture denomination of banknotes for their denominations and value and delivers all recognized banknotes to Stacker Pocket. All unrecognized and suspicious notes deliver to the Reject Pocket.

SINGLE SINGLE Mode (First Detected banknote)



- ◆ Counts banknotes with the denomination of the first detected genuine banknotes as standard and delivers to Stacker Pocket. Device delivers banknotes with different denominations, unrecognized banknotes and suspicious notes to the Reject Pocket.

FACE FACE Sorting Mode



- ◆ Counts banknotes with the Face of the first detected genuine note as standard and delivers to Stacker Pocket. Delivers banknotes with different faces, unrecognized and suspicious notes to the Reject Pocket.

*NOTE: Further sorting function for the Face Sorting Mode can be set under the Setting Mode menu. Please refer to P.32.

ORNT ORNT (Orientation) Sorting Mode



- ◆ Counts banknotes with the Orientation of the first detected genuine banknote as standard and delivers to Stacker. Delivers unrecognized, suspicious and wrong or misorientation banknotes to the Reject Pocket.

*NOTE: Further sorting functions for the Orientation Sorting Mode can be set under the Setting Mode menu. Please refer to P.32.

SORT SORT Mode (for Organized Strap)



- ◆ Counts strap of Organized banknotes by its face and denomination while allowing change of denomination / new denomination to start a new count and continue in such manner until all banknotes are counted and sorted.

CUSTOM Custom Sorting Mode



- ◆ This function is a combination of SINGL, FACE, ORNT, SORT etc counting modes. User can combine more than one counting and sorting modes feature according to their requirements.

✘ Fitness mode

X-1100 device is equipped with Fitness Sorting feature for US\$ as standard feature. In Fitness Sorting mode, the device sorts banknotes according to different uses and fitness quality requirement by their conditions, such as dirty (soil), tape, holes, tears, missing or folded series etc. Levels of various fitness conditions under different category of Fitness can be adjusted and described in Page 41. As such, device delivers fit quality banknotes to main Stacker Pocket while unfit quality banknotes delivers to the Reject Pocket. Users can enter into Fitness sorting mode by pressing [F2] key and toggle through different fitness category by pressing it constantly:

[F2] Continue pressing → ATM → FIT → UNFIT → OFF

Definations of Different Fitness Sorting modes:

ATM



Under ATM sorting mode, device separates ATM quality banknotes from FIT or UNFIT banknotes a stack as required by financial institutions for their daily ATM cash replenishment need. By doing so, users' ATM machines are able to dispense banknotes properly, increase overall productivity and reduce service calls.

FIT



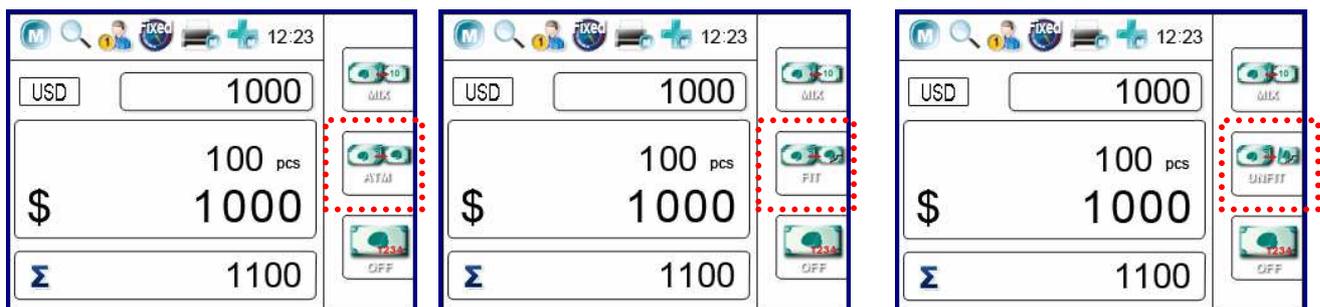
Under FIT sorting mode, device separates banknotes according to fitness sorting guideline set by Federal Reserve bank (FRB) as part of their currency recirculation policy apply to dirty (soil), tape, holes, tears, missing or folded conditions of banknotes. See Federal Reserve Bank Fitness Sorting guideline posted on FRB website:
[https://www.frb services.org/operations/currency/currency_quality_program.html]

UNFIT



Under UNFIT sorting mode, device separates banknotes that are not suitable for recirculation as per fitness sorting guideline set by Federal Reserve Bank (FRB) as the part of currency recirculation policy apply to dirty (soil), tape, holes, tears, missing or folded, suspect etc conditions of banknotes. See Federal Reserve Bank Fitness Sorting guideline posted on FRB website:
[https://www.frb services.org/operations/currency/currency_quality_program.html]

Examples of Screens showing various Sorting modes (ATM, FIT and UNFIT):



✦ Other Optional Counting modes:

X-1100 is capable of capturing banknote serial number or reading and decoding casino tickets with barcode embedded and such and sends to printer or PC software if one is developed and interfaced with X-1100 device by user. If one of these feature is equipped, user is able to enter into those counting mode, such as SN (Serial Number) reading and Printing or TITO (Casino Ticket decoding) etc by pressing [F3] key. Please refer to page 35 - 36 for detail explanation of various parameter and adjustment for Serial number reading feature and barcode ticket reading features (optional features).

By continue pressing [F3] key, user can scroll through various optional sorting modes as below:

[F3] Continue pressing → SN (if available) → Ticket → OFF

SN (Serial Number) (Optional)



This feature reads and Prints the serial number on the banknotes.

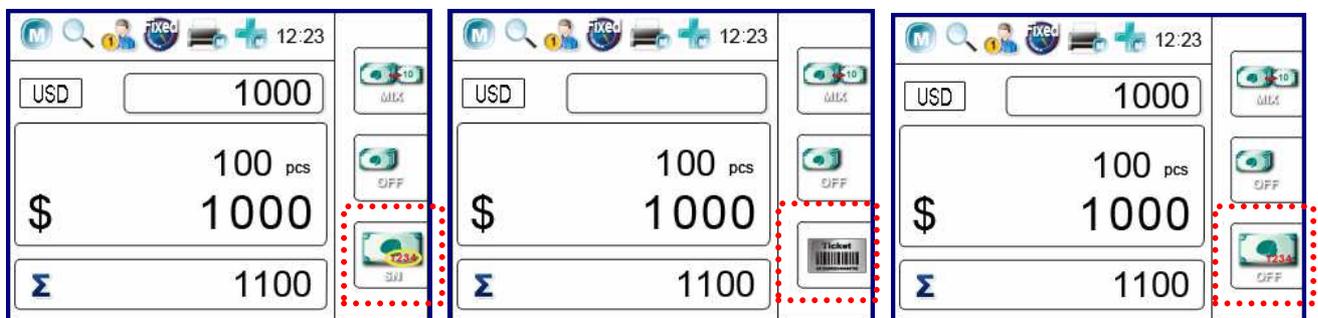
Under this mode, device reads serial numbers of accepted banknotes and prints as image format to a connected thermal printer. X-1100 is able to transmit S/N data to an external PC software (PC software must be developed by customer at their own risk and expenses). AMROTEC® bears no responsibilities for any aspect of third party software to this connectivity.

Ticket (Barcoded Casino Ticket)



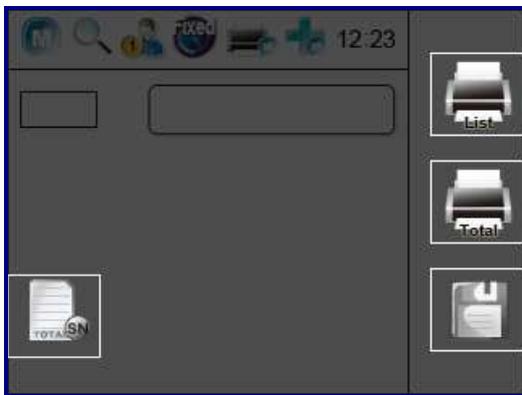
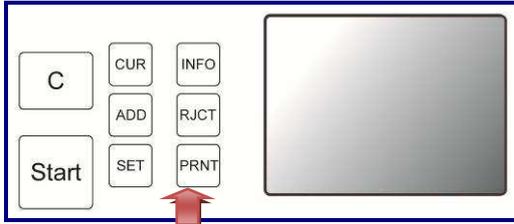
Under Ticket mode, X-1100 reads bar code printed casino tickets and sends barcode decoding data as well as full images (optional - if equipped) to a printer (factory configured) or to certain PC application software. PC software must be developed and interfaced with X-1100 by customers or software integrators at their own risk and expenses. AMROTEC® bears no responsibilities for any aspect of third party software to this connectivity.

Examples of Screens showing various Sorting modes:



✘ Printing the Summary

Users can print counting results by connecting a single or dual printers (Dot matrix or thermal printers) via serial ports located at the rear side of X-1100 device. Contact us for a list of Printers that are approved by AMROTEC® and work with our X-Series devices.



Grand Total			
USD	1x	55=	55
	2x	100=	200
	5x	500=	2500
	10x	500=	5100
	20x	500=	10100
	50x	500=	25000
	100x	500=	50100
	200x	500=	100100
	Z	2655 pcs	18620

- 1 Connect a single (preferred) printer with COM 2 Port at the rear of the X-1100 device with serial cable. If Dual Users feature is activated and device is used by two users, both users can print their individual reports using one single printer.
- 2 Press the [PRNT] key to print after a count is completed unless "Auto Print" function is activated in which printer automatically prints report as soon as banknotes are removed from Stacker Pocket.
- 3 Follow the message on the display to proceed.



: Print one receipt of a counting result.



: Print two receipts of same result.

- ◆  / : Print one piece of breakdown list.
- ◆ Press to cancel the operation.

4 Printing receipt.

The print receipt lists the " Report title", "Machine Serial Number", "Currency name", "Quantity by denominations", "Subtotal" and "Total Quantity and Amount". The below is an example of typical printing report under MIX Denomination counting and USER 1 mode with Manual Input Entry.

Examples of Various Print receipt in MIX modes:

Print Receipt in MIX Mode

X-Series Currency Discriminator			
			NO:00001
Machine ID : X1100A-B01BX			
Machine SN : 000000			

Currency: USD			
Mode : MIX			
Fitness Mode : None			

X1100A-B01BX ENTRY			
Denom	Pcs	Amount	
\$ 1	3	\$ 3	
\$ 2	0	\$ 0	
\$ 5	8	\$ 40	
\$ 10	3	\$ 30	
\$ 20	0	\$ 0	
\$ 50	0	\$ 0	
\$ 100	0	\$ 0	

TOTAL	14	\$ 73	
Reject Qty	10		

Print Receipt in MIX Mode with Manual Input

X-Series Currency Discriminator			
			NO:00003
Machine ID : X1100A-B01BX			
Machine SN : 000000			

Currency: USD			
Mode : MIX			
Fitness Mode : None			

X1100A-B01BX ENTRY			
Denom	Pcs	Amount	
\$ 1	3	\$ 3	
\$ 2	0	\$ 0	
\$ 5	8	\$ 40	
\$ 10	3	\$ 30	
\$ 20	0	\$ 0	
\$ 50	0	\$ 0	
\$ 100	0	\$ 0	

Sub.T	14	\$ 73	

MANUAL ENTRY			
Denom	Pcs	Amount	
\$ 1	4	\$ 4	
\$ 2	5	\$ 10	
\$ 5	6	\$ 30	
\$ 10	7	\$ 70	
\$ 20	8	\$ 160	
\$ 50	9	\$ 450	
\$ 100	10	\$ 1000	

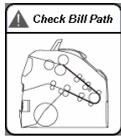
Sub.T	49	\$ 1724	

TOTAL	63	\$ 1797	
Reject Qty	10		

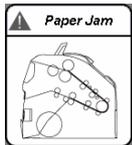
✘ Clear error message

Warning! Please Turn OFF the machine prior accessing to machine bill path

Check the Bill Path



- ◆ Please open the bill path safely and check to make sure no foreign matter inside.

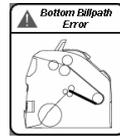


- ◆ Please open the bill path safely and remove any jammed banknotes from it.

Open Bill Path



- ◆ Bottom bill path is opened. Please close it securely before operating the device.



Bottom Bill Path Error

- ◆ Please open the bottom bill path and check to make sure no foreign matter inside.
- ◆ When Error with bottom bill path, please open the bottom path securely and remove any jammed banknotes inside.



- ◆ Top bill path is opened. Please close it securely before operating the device.

Remove Banknotes



- ◆ Please remove the banknotes from hopper and place them again.



- ◆ Please remove the banknotes from reject pocket. After removing it, the operation continues.



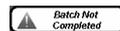
- ◆ The reject pocket is full. Please remove banknotes from reject pocket to resume.



- ◆ Please remove the banknotes from the stacker. After removing them, the operation continues.



- ◆ The stacker is full. Please remove the banknotes from the stacker.



- ◆ The counted quantity doesn't reach preset number. Please check again.

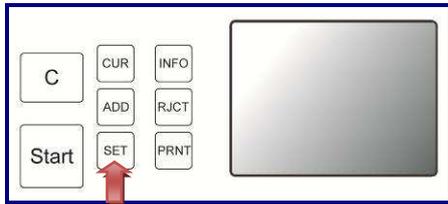
Error (Motor, Solenoid, Suspicious note and Serial number buffer overrun)

	<ul style="list-style-type: none"> ◆ Please check if the motor error occurs when powered on. ◆ Please make sure the encoder is working correctly. ◆ If the error still occurs, please contact your sales rep. 		<ul style="list-style-type: none"> ◆ Please check if there is any note jammed in the bottom bill path. ◆ Please Remove jammed note safely and test again.
	<ul style="list-style-type: none"> ◆ The memory buffer for serial number recognition is 500 pieces. ◆ Please press “  ” to clear the record of serial numbers. ◆ After removing notes from the stacker, the device will resume counting operation. 		<ul style="list-style-type: none"> ◆ There are banknotes being rejected, having suspect due to lack of genuine security features.

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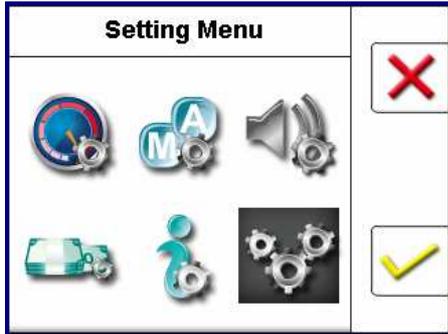
✦ Set Functions and Various Parameter Settings

This chapter is reserved for trained operator or service professional.



❶ Enter into Setting Menu

- ◆ Press to enter into device setting menu to change various functions and parameters.

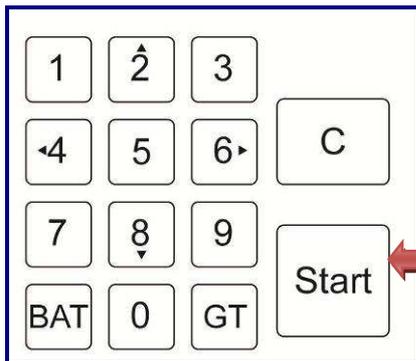


❷ Highlighting icons with direction keys.

- ◆ Under the Setting menu, the numeric number keys turn to direction keys as indicated on the panel:

- : ↑(Up)
- : ↓(Down)
- : ←(Left)
- : →(Right).

- ◆ Use these 4 direction keys to select specific setting menu items.



❸ Confirming the selection.

- ◆ After highlighting a desired icon, press to confirm the selection.

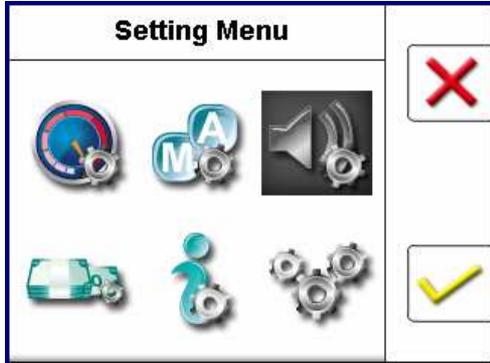
❹ Return to main screen.

- ◆ Press to return to previous or main screen

	Speed Options (See Page 19)
	Auto On/Off (See Page 18)
	Sound Setting
	Sorting Mode Setting
	Setup Device Mode
	Information (N/A)

□ Sound Settings

X-1100 is equipped with various sound settings including warning alarm, keys and suspect alarm sound. These sound settings can be turned ON or OFF by browsing through this Sound Settings menu.

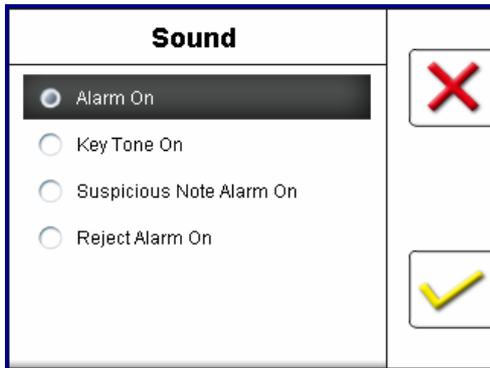


1 Highlight the icon  to enter into Sound menu.

2 Confirm selection with .

● Warning Sound

If Warning sound is turned ON, device will sound on in case there is a device malfunction or related with safety issues. Along with warning sound, warning messages and/or error messages will appear on the screen as well. (Default setting: ON)



1 Highlight the "Alarm On" option.

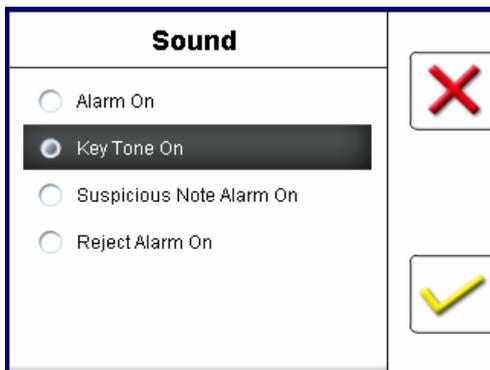
2 Confirm Selection with .

3 Press  / F1 to turn off the alarm sound feature.

4 Press  / F3 to turn on the alarm sound feature.

5 Press  to confirm setting and return to the Sound menu.

● Key Sound



To turn ON or OFF the key sound while pressing X-1100 device control panel buttons. (Default: ON)

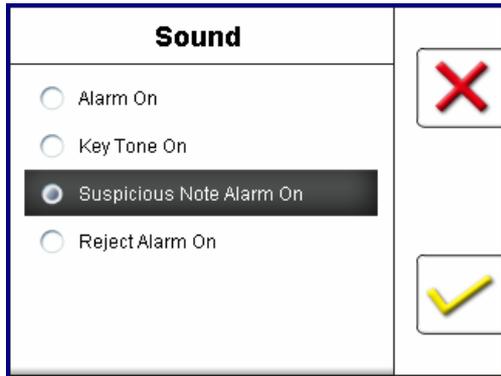
1 Highlight the "Key Tone On" option and confirm selection by pressing  key.

2 Press  / F1 to turn off the key sound feature.

3 Press  / F3 to turn on the key sound feature.

4 Press  to confirm setting and return to previous menu screen.

● Suspect Sound

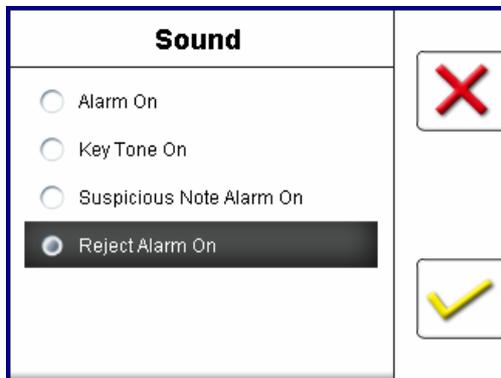


To turn ON or OFF alarm sound when a banknote is detected as suspicious. (Default: ON)

- 1 Highlight the "Suspect Note Alarm On" option.
- 2 Confirm selection by pressing  key.
- 3 Press  / F1 to turn Off the suspect sound feature.
- 4 Press  / F3 to turn On suspect the sound feature.
- 5 Press  to confirm setting and return to previous menu screen.

● Reject Sound

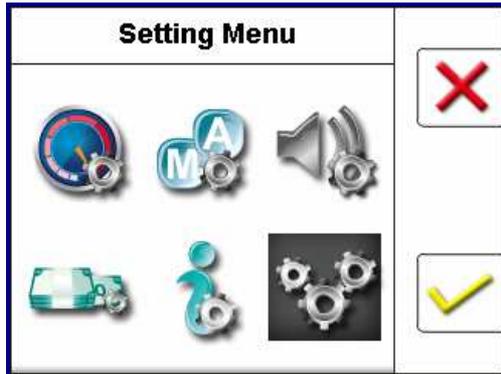
To turn Off sound when a banknote is delivered to Reject Pocket for various reasons from non-read by sensor or suspected banknote etc. (Default: ON)



- 1 Highlight the "Reject Alarm On" option.
- 2 Confirm selection by pressing  key.
- 3 Press  / F1 to turn off the suspect sound feature.
- 4 Press  / F3 to turn on suspect the sound feature.
- 5 Press  to confirm setting and return to previous menu screen.

□ Sorting Mode Setting

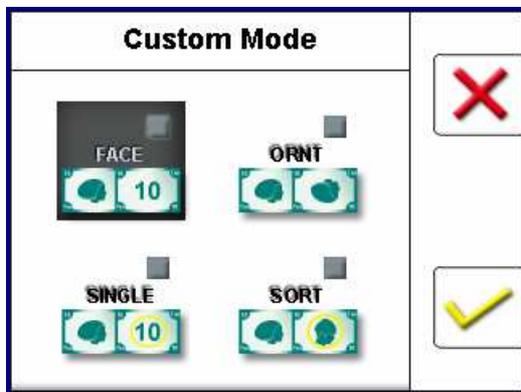
From factory, X-1100 device is equipped with various discriminating and Sorting Modes. However, under Sorting Mode settings, authorized service personal is able to turn ON or OFF certain Modes, such as Facing, Orientation, Denomination and Issue. Once such selection is carried out, new Mode setting is automatically saved under CUSTOM mode. To enter into Sorting Mode Setting, press  to enter into Setting Menu and highlight the  icon, followed by  /  F3 key to confirm your selection.



- ❶ Highlight the  icon.
 - ❷ Confirm Selection with  /  F3 key.
 - ❸ Undo any selection with  / F1 key
- ⇒ Always Use direction keys  ↑ /  ↓ or  ← /  → for highlighting.

● Face Sorting Mode

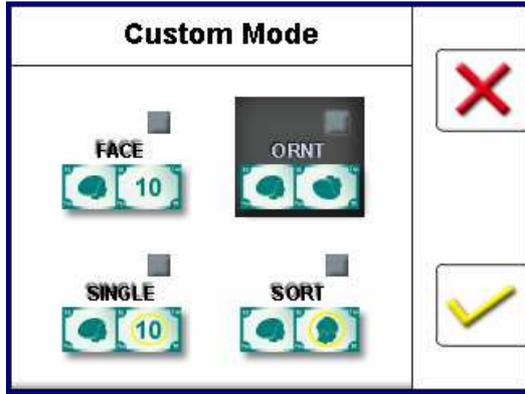
Activate FACE Sorting mode to count banknotes having same face for a single denomination banknotes. (Default: FACE Only - Turned ON)



- ❶ Highlight the [FACE]  icon.
- ❷ Confirm setting.
 - ◆ Press  / F3 to confirm setting and press  return to previous screen.
- ❸ Remove the selection with  / F1 key.

● Orientation Sorting Mode

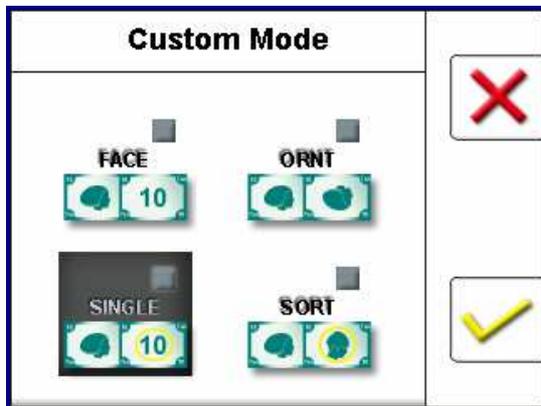
Activate ORIENT [ORNT] Sorting mode to count banknotes having same orientation on same face for a single denomination banknotes. (Default: ORNT - Turned ON)



- ❶ Highlight the [ORNT] icon .
- ❷ Confirm setting.
 - ◆ Press  / F3 to confirm setting and press  to return to previous screen.
- ❸ Remove the selection with  / F1 key.

● SINGLE Sorting Mode

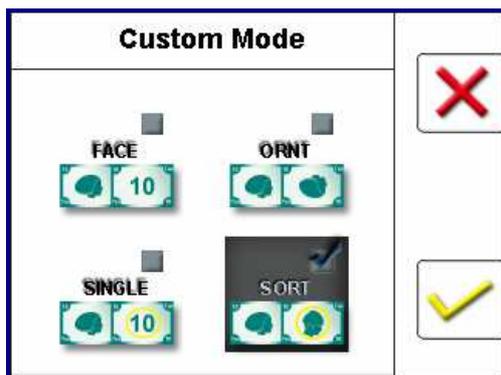
Activate [SINGL] Sorting mode to single / sort out one denomination or first detected denomination from the rest denomination banknotes. (Default: SINGLE - Turned ON)



- ❶ Highlight the [SINGL] icon .
- ❷ Confirm setting.
 - ◆ Press  to confirm setting and press  to return to previous screen.
- ❸ Remove the selection with  / F1 key.

● SORT Mode (Organized Strap)

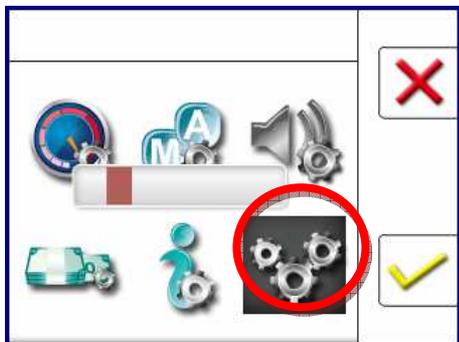
Activate SORT mode to count organized Strap of banknotes for mixture denominations (Default: SORT - Turned ON). Usually retail straps combine with 4 denominations (\$1, \$5, \$10, \$20) while \$50 and \$100 left on top. Remove \$50 and \$100 from that strap and with ADD mode ON, start counting rest of the strap in SORT mode and once finished and 4 denomination banknotes are sorted, remove all reject bills from reject stacker. Mix rejected banknotes with \$50 and \$100 and complete the count in MIX mode. Total from SORT mode count will add to MIX mode count, thereby giving users a complete count of all Organized Straps from Retail deposit.



- ❶ Highlight the icon SORT .
- ❷ Confirm setting.
 - ◆ Press  to confirm setting and press  to return to previous screen.
- ❸ Remove the selection with  / F1 key.

□ Set Up Device Mode

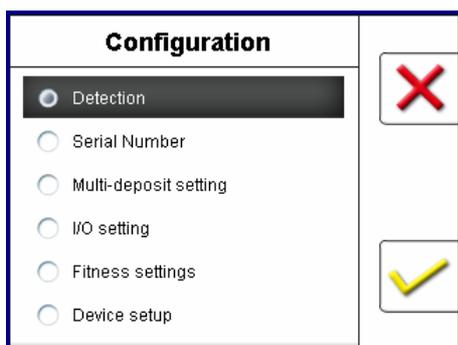
Under Set Up Device Mode, authorized service personal are able to change various settings related to Detection module, Serial number reading feature, Barcode ticket readings, I/O settings, Fitness level Settings as well as Device Set up. Due to sensitive nature of these settings, a password will be prompted to enter into this Set Up Device Mode settings menu.



[Please contact your service provider for password to gain access to this menu settings if absolutely necessary]

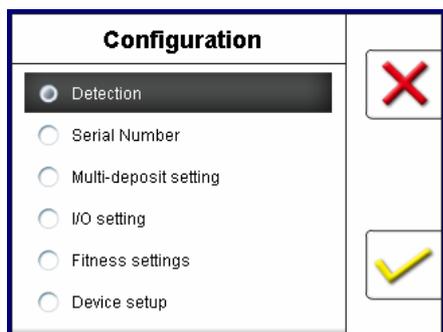
General steps to follow for Trained Users:

- ❶ Highlight the icon  for Set Up Device Mode.
- ❷ Confirm selection with  /  / F3 or remove any selection with  / F1 key.
- ❸ Enter the password [XXXXXXX] when prompted.
- ❹ Use  /  or  /  to highlight a desire menu.
- ❺ Select your desire item menu for Configuration.



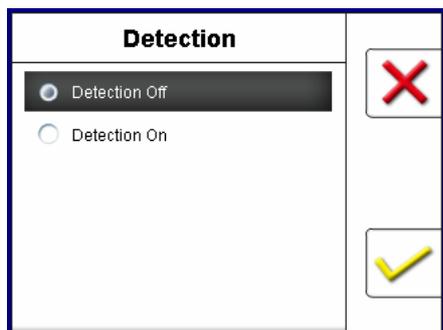
● Detection On / Off

Counting of banknotes with or without counterfeit detection ON, apply to all discriminating modes (Default: On)



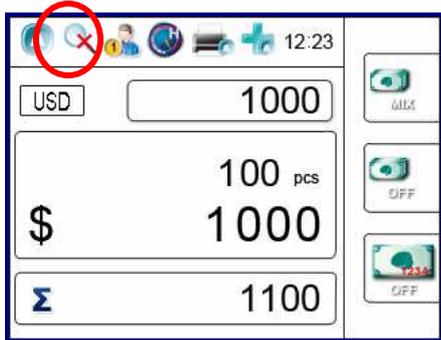
- ❶ While in Configuration menu, highlight **[Detection]** sub-menu to enter into the ON / OFF selection area.

- ❷ Confirm selection with pressing any of these  /  / F3 keys.



- ❸ Highlight and select Detection On or Off using direction keys, followed by  /  / F3 keys to confirm the setting.

- ◆  : This Icon will display on main screen task bar if suspect detection is turned on. The device delivers suspicious banknotes to reject pocket

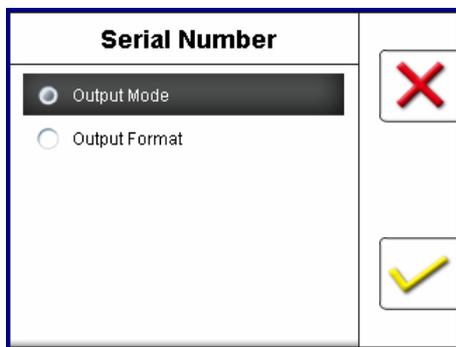


during a counting process.

- ◆  : This Icon will display on main screen task bar if suspect detection is turned off. The device processes banknotes for its denomination and value without checking for any suspect detection.

● Serial Number

Under this menu, service professional is able to choose a desire Output Mode for reading and printing out serial number of banknotes. (Default: Normal Printout)

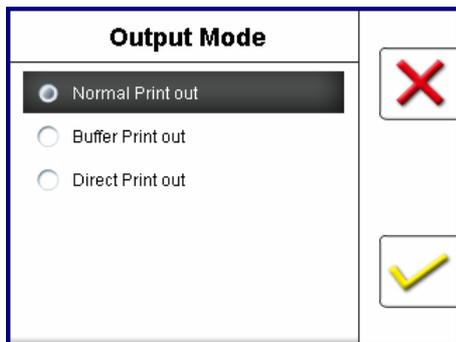


- 1 While in Configuration, highlight **[Serial Number]** sub-menu and Confirm selection to enter into Output and Printing Mode selection area.

- 2 Confirm selection with pressing any of these  /  / F3 keys.

- 3 Highlight using direction  /  and select an Output Mode for printing serial numbers

Output Mode



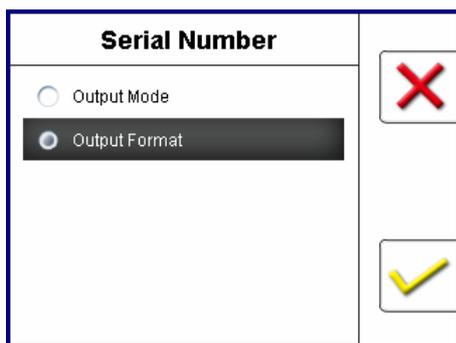
Select from one of the below three printout mode:

- ◆ **Normal Printout** : Print out serial numbers of counted banknotes and save the record in the buffer memory. The record can be printed out in 2 receipts. Limitation to 500 notes.

- ◆ **Buffer Printout** : Save the serial number of counted notes in the buffer memory and print out as receipt once users require. Limitation to 500 banknotes.

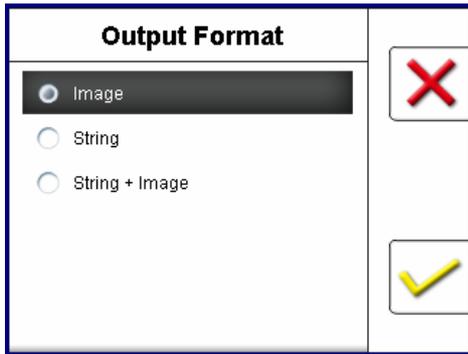
- ◆ **Direct Printout** : Real time printing out receipt of serial numbers. Without limitation to numbers of banknotes, but the machine doesn't save counting result in the buffer memory.

Output Format



- 1 Press  /  / F3 keys to confirm your selection and return to previous screen.

- 2 Press  [F1] to unselect your selection.



Select from one of the below three Output Format for Serial number data transferring to external PC application software (if developed by third party):

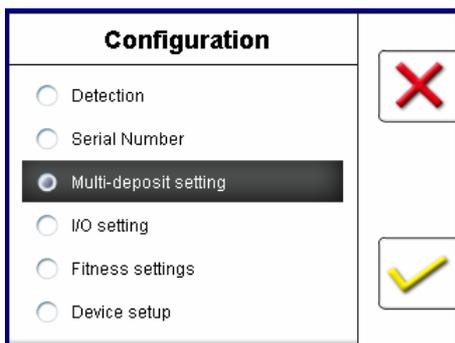
- ◆ **Image** : With image of serial number.
- ◆ **String** : With string of serial number.
- ◆ **Image & String** : With image and string of serial number.

① Press  /  / F3 keys to confirm your selection and return to previous screen.

② Press  [F1] to unselect your selection.

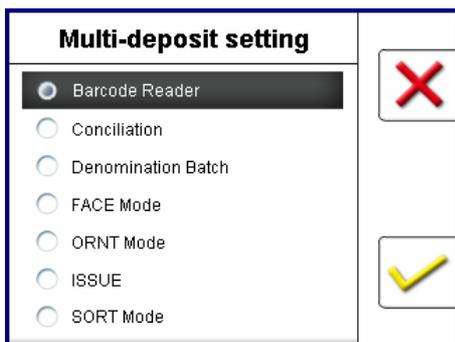
● Multi-Deposit setting

Under this menu, service professional is able to select Multi-Deposit setting to choose various deposit requirements using external barcode reader or perform cash reconciliation if available.



① While in Configuration, highlight [**Multi-deposit setting**] sub-menu and CONFIRM selection with pressing any of these  /  / F3 keys.

② Highlight using direction  /  and select a Multi-deposit setting menu item for various deposit requirement.



Barcode Reader

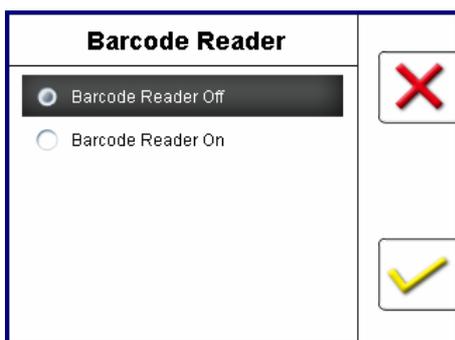
① Select [**Barcode Reader**] to activate reading of barcoded document, such as tickets using an external barcode scanner. Confirm your selection with pressing any of these  /  / F3 keys.

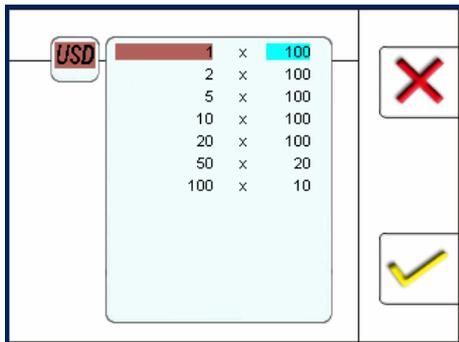
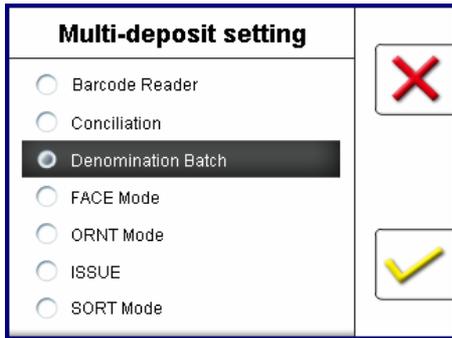
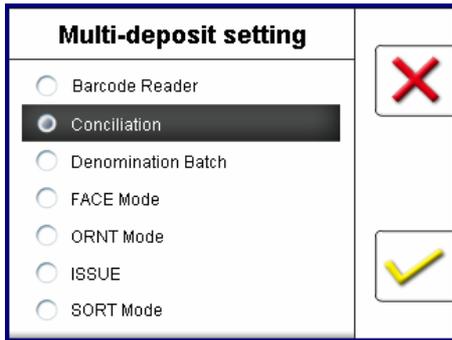
② In Barcode Reader menu, service personal has the options to turn ON or OFF Barcode Reader feature.

- ◆ Barcode Reader off
- ◆ Barcode Reader on

③ Confirm your setting by pressing  /  / F3 key and return to previous screen.

④ Press  [F1] to unselect your selection.





Deposit Conciliation:

❶ Select [**Deposit Conciliation**] function if device is connected with a teller software application and properly interfaced by the teller software company.

❷ Activate the feature by pressing / / F3 key and return to previous screen. ❸ Press [F1] to unselect your selection.

Denomination Batch:

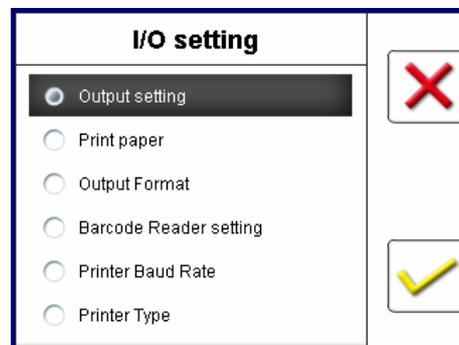
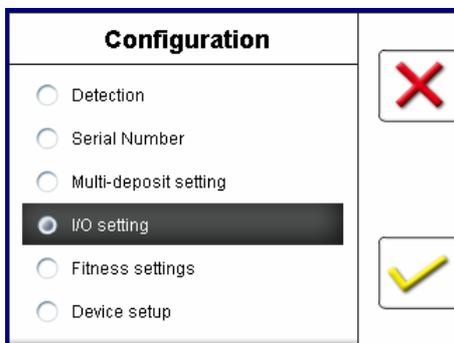
❶ While in Multi-deposit setting, select [**Denomination Batch**] sub-menu and Confirm selection by pressing / F3 and to enter into DB menu setting screen. By Default, DB setting is set according to Federal Reserve bank strap deposit guideline, however, user could also change the DB setting for each denomination and save it accordingly.

❷ If require new denomination batch setting, highlight denomination using direction ↑ / ↓ and START / F3 to confirm the denomination and use (0-9) to choose your desire batch number. Press [C] to clear batch number or press START / F3 to confirm your selection.

❸ Once it is selected, press [C] to Exit to previous menu.

● I/O setting

Under this menu, service professional is able to select number of external printers to be connected, printer paper width, type of printers, barcode reader settings (if equipped), printer baud rate etc.

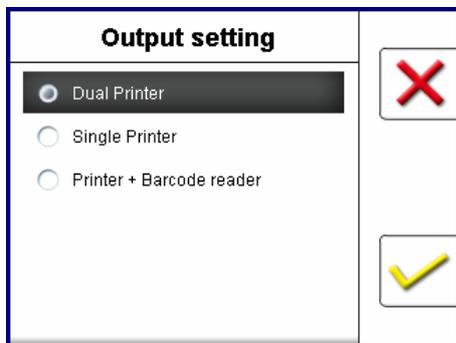
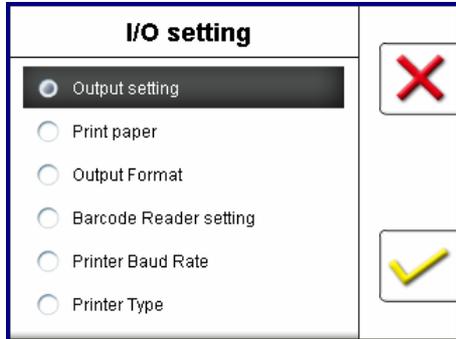


➔ While in Configuration, highlight [**I/O setting**] menu and Confirm selection with pressing any of these / / F3 keys. Press to return to previous screen.

➔ Highlight using direction ↑ / ↓ and select a I/O setting sub- menu item for various input / output setting selection.

◆ Output Setting

Under this setting, service personal is able to select number or type of Printers from using of Single printer or Dual printers for Dual users, and even an additional barcode scanner.



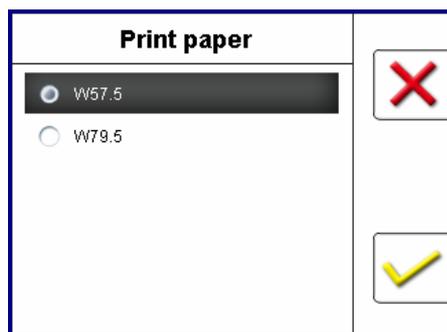
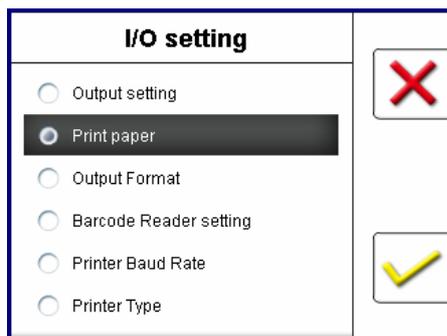
Definition of Printer Output setting:

- ◆ **Dual Printers:** Two printers can be connected for Dual users. Two printer ports are activated.
- ◆ **Single Printer (COM1):** Dual users share one printer.
- ◆ **Printer (COM1) + Barcode reader (COM2):** Dual users share one printer and one barcode reader / scanner.

- ① Highlight your printer output Device by using direction  / , and followed by either  /  / F3 key to confirm your selection.
- ② Press  to return to previous screen / exit.

◆ Printer Paper

Service personal is able to setup paper size of the connected printer. (Default: W(79.5))



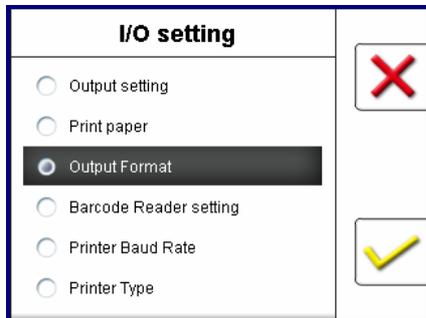
- ① Select "Print paper" sub-menu item.
- ② Check the paper size of the connected thermal or Dot Matrix Receipt printer and select correct width for your printer.

- ◆  : 2 inches paper.
- ◆  : 3 inches paper.

- ③ Confirm setting.
 - ◆ Press either  /  / F3 to confirm setting and to return to previous menu.
 - ◆ Press  to exit to main screen.

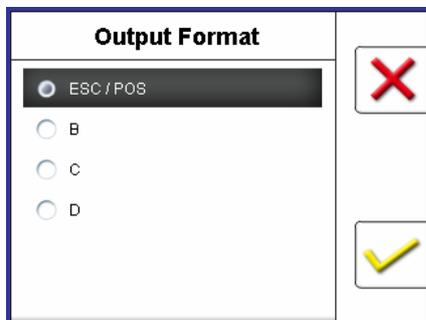
◆ Output Format

Using this sub-menu item, service personal is able to select output format of Printer output format.



❶ Highlight printer "Output Format" and press  / F3 to confirm selection

- ❷ Select one of the printer output format:
- ◆ ESC/POS : Apply to the ordinary printer.
 - ◆ B : The default for casino (N/A).
 - ◆ C : The default for casino (N/A)
 - ◆ D : The default for casino (N/A).



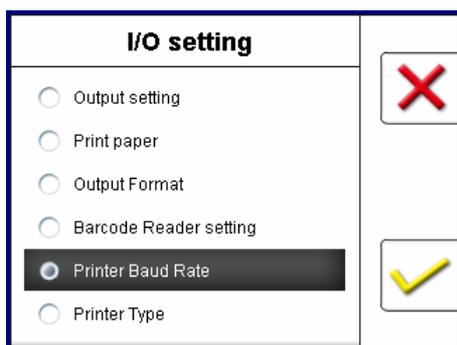
❸ Confirm setting.
After selecting your desire printer output format, press either  /  / F3 to confirm your selection and return to previous menu. Press  to exit to main screen.

◆ Barcode Reader setting

If Barcode Reader is connected, please contact us for further instructions.

◆ Printer Baud Rate:

To setup baud rate for connected printers to print out receipt. (Default: 115200)



❶ Highlight and select Printer Baud Rate sub-menu.

❷ Confirm Selection with any  /  / F3 key.

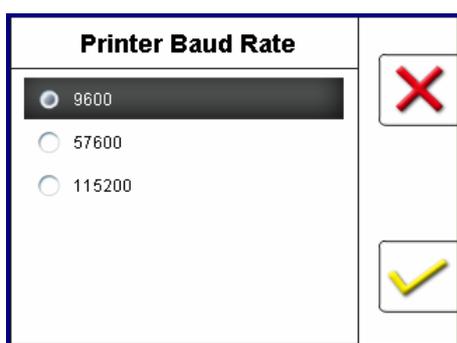
❸ Find appropriate baud rate for your printer.

- ◆  :9600bps
- ◆  :38400bps
- ◆  :115200bps

❹ Select the baud rate of the connected thermal printer. Use  /  to move up and down.

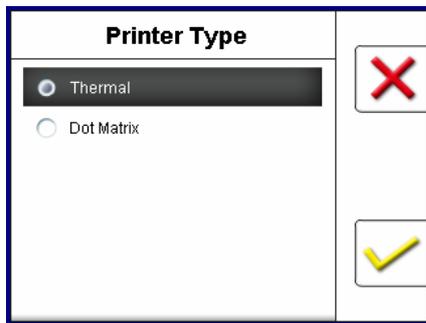
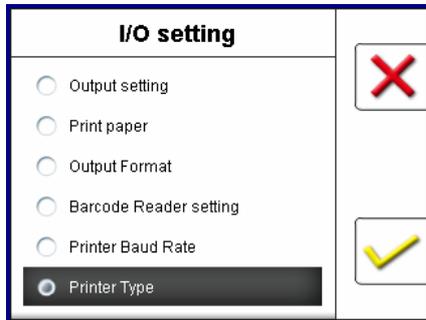
❺ Confirm setting.

Press either  /  / F3 key to confirm your setting and return to previous screen. Press  to exit to main screen.



◆ Printer Type

Using this sub-menu item, service personal is able to select appropriate Printer type.

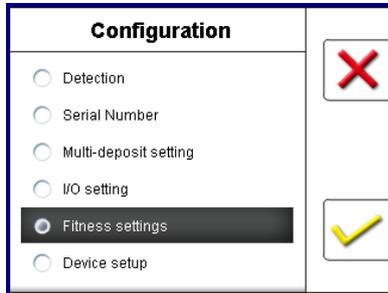


- ❶ Highlight and select Printer Type sub-menu.
- ❷ Confirm selection with either / / F3 key.
- ❸ Choose and select your appropriate Printer Type.
 - ◆ Thermal
 - ◆ Dot matrix
- ❹ Confirm setting.

Press either / / F3 key to confirm your setting and return to previous screen. Press to exit to main screen.

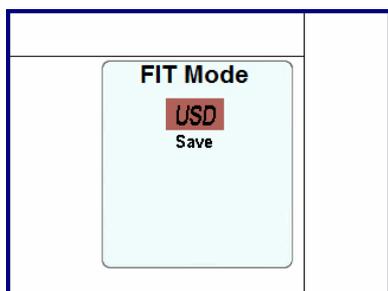
● Fitness setting

Under this setting menu, trained Service Personal is able to adjust various fitness sorting levels from FIT - ATM - UNFIT fitness criterias.



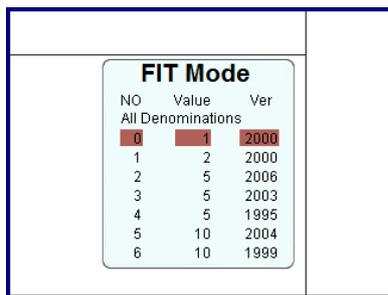
- 1 Highlight and select Fitness settings using direction keys $\boxed{2}$ ↑ / $\boxed{8}$ ↓.

- 2 Confirm selection with either $\boxed{\text{Start}}$ / $\boxed{\checkmark}$ / F3 key.



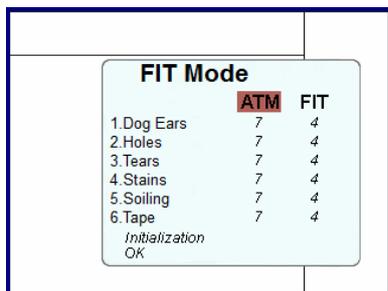
- 3 Under FIT Mode, highlight and select the Currency that to be adjusted. For USA model, choose **USD** Currency. If multiple currencies are equipped with, you would have the option to choose other country's currencies for fitness level criteria.

- ◆ Save your settings after all adjustment is made.



- 4 Next, select All denomination or a particular denomination of banknote and it's version (issue) to able to adjust various fitness criteria level. If **"All Denominations"** option is selected, it will change settings for all currency denominations. If particular denomination is selected, for example US\$5, there are three separate issues released, so, select the issue year of \$5 to adjust it's fitness level criterias.

- ◆ Use $\boxed{2}$ ↑ / $\boxed{8}$ ↓ or $\boxed{4}$ ← / $\boxed{6}$ → for highlighting.
- ◆ As appropriate denomination and issues are selected, enter into FIT Mode as below:



- 5 Under FIT Mode, service personal is able to toggle between ATM or FIT fitness and adjust various fitness sorting criteria.

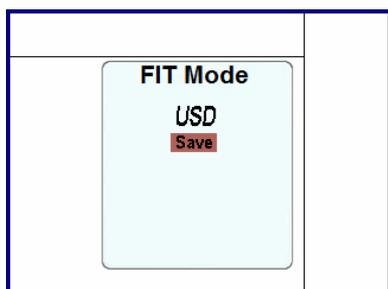
Select the Desired Level of Fitness criteria.

- ◆ Use $\boxed{2}$ ↑ / $\boxed{8}$ ↓ or $\boxed{4}$ ← / $\boxed{6}$ → for highlighting.
- ◆ The higher the value → the more sensitive.

- 6 To Confirm setting.

Press $\boxed{\text{Start}}$ to confirm setting and return to previous menu.

- 7 If it is necessary to return to factory's default fitness level setting, then proceed with Initialization to Restore factory Default settings. Make sure Initialization is "OK" to complete this process.



- 8 To save your selected setting, highlight SAVE and $\boxed{\text{Start}}$

Various Print Reports under FITNESS Mode:

[ATM Fit mode without Manual Input]

X-Series Currency Discriminator			
			NO:00005
Machine ID : X1100A-B01BX			
Machine SN : 000000			

Currency: USD			
Mode : MIX			
Fitness Mode : ATM			

X1100A-B01BX ENTRY			
ATM			
Denom	Pcs	Amount	
\$ 1	3	\$ 3	
\$ 2	0	\$ 0	
\$ 5	8	\$ 40	
\$ 10	3	\$ 30	
\$ 20	0	\$ 0	
\$ 50	0	\$ 0	
\$ 100	0	\$ 0	

Sub.T	14	\$ 73	

TOTAL	14	\$ 73	
Reject Qty	6		

[ATM Fit Mode with Manual Entry Input]

X-Series Currency Discriminator			
			NO:00007
Machine ID : X1100A-B01BX			
Machine SN : 000000			

Currency: USD			
Mode : MIX			
Fitness Mode : ATM			

X1100A-B01BX ENTRY			
ATM			
Denom	Pcs	Amount	
\$ 1	3	\$ 3	
	(9)	(\$9)	
\$ 2	0	\$ 0	
	(4)	(\$8)	
\$ 5	8	\$ 40	
	(8)	(\$40)	
\$ 10	3	\$ 30	
	(6)	(\$60)	
\$ 20	0	\$ 0	
	(2)	(\$40)	
\$ 50	0	\$ 0	
	(4)	(\$200)	
\$ 100	0	\$ 0	
	(9)	(\$900)	

Sub.T	14	\$ 73	[Sub-Total of ATM Fit Notes]
	(42)	(\$1257)	[Total Manual Entry Notes]

TOTAL	56	\$ 1330	[Total ATM Fit Notes]
Reject Qty	6		[Reject Banknotes /Unfit]

[FIT and ATM Mode Accumulation]

Currency: USD			
Mode : MIX			
Fitness Mode : FIT			

X1100A-B01BX ENTRY			
ATM			
Denom	Pcs	Amount	
\$ 1	3	\$ 3	
\$ 2	0	\$ 0	
\$ 5	8	\$ 40	
\$ 10	3	\$ 30	
\$ 20	0	\$ 0	
\$ 50	0	\$ 0	
\$ 100	0	\$ 0	

Sub.T	14	\$ 73	

FIT			
Denom	Pcs	Amount	
\$ 1	3	\$ 3	
\$ 2	0	\$ 0	
\$ 5	8	\$ 40	
\$ 10	3	\$ 30	
\$ 20	0	\$ 0	
\$ 50	0	\$ 0	
\$ 100	0	\$ 0	

Sub.T	14	\$ 73	

TOTAL	28	\$ 146	
Reject Qty	9		

[Fit and ATM -LIST View]

X-Series Currency Discriminator			
			NO:00003
Machine ID : X1100A-B01BX			
Machine SN : 000000			

Currency: USD			
Mode : MIX			
Fitness Mode : ATM			

X1100A-B01BX ENTRY			
ATM			
Denom	Pcs	Amount	
Sub.T	14	\$ 73	[Total ATM Fit Notes]
	(38)	(\$1079)	[Total Manual Input]

FIT			
Denom	Pcs	Amount	
Sub.T	14	\$ 73	[Total FIT Notes]

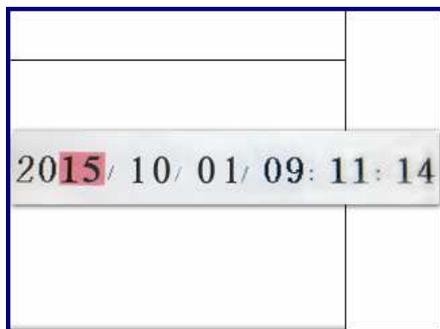
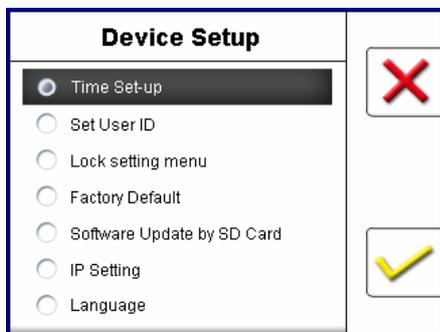
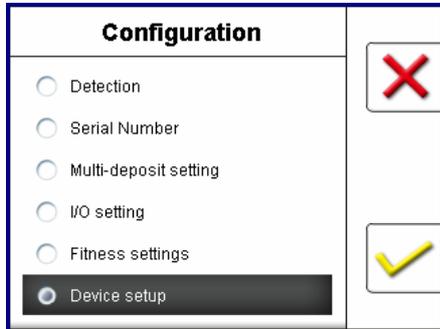
UNFIT			
Denom	Pcs	Amount	
Sub.T	0	\$ 0	

TOTAL	66	\$ 1225	[Total ATM+FIT Notes]
Reject Qty	9		[Rejected Unfit notes]

● Device Setup

◆ Time Set-up

This feature is to setup appropriate date and time information of your X-1100 device. This date and time will appear on your device system as well as on any print receipt.



❶ Highlight and select Device Setup, and confirm by either press  /  / F3 key.

❷ Highlight and select Time Set-up, and confirm by either pressing  /  / F3 key.

❸ Change date and time setting.

- ◆ Use direction keys  /  or  /  to highlight a desire zone to modify.

❹ Press  /  / F3 to select and confirm the desire zone.

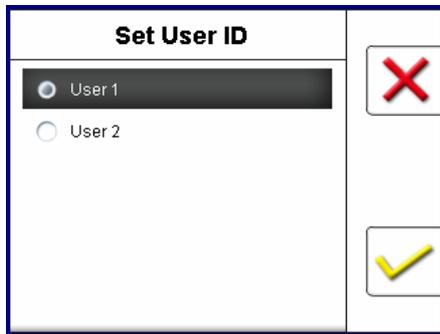
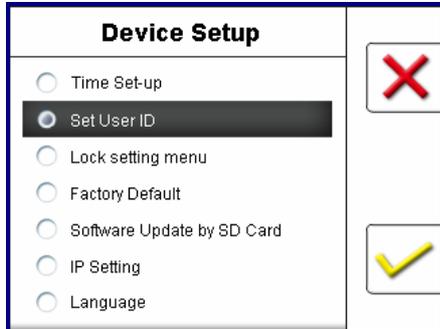
- ◆ The color of the selected zone will change from pink to red.

❺ Use numeric number keys on the control panel to change date and time settings.

❻ Press  to return to previous screen and exit.

◆ Set User ID

Under this sub-menu, service professional is able to select the user ID that requires various modifications (customization).



❶ Highlight and select Set User ID, Press / /F3 key to confirm the selection.

❷ There are two User ID to select from:

- ◆ User 1
- ◆ User 2

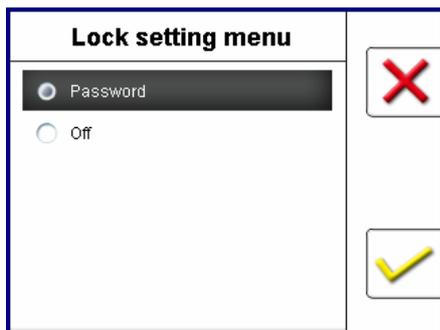
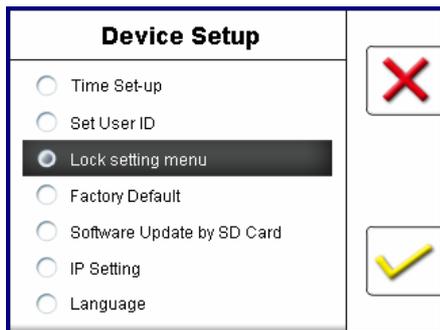
❸ Select the user's parameter you want to modify.

❹ Press / F3 to edit, and press to confirm.

❺ Press to return to previous menu and exit.

◆ Lock setting menu

Under this sub-menu, service personal is able to lock or unlock setting menu by setting password or no password.



❶ Highlight and select Lock setting menu using direction keys and press either key / F3 to confirm the selection.

❷ Set Password.

- ◆ Password : Enter Password (using Numeric 0-9)
- ◆ Off : No Password.

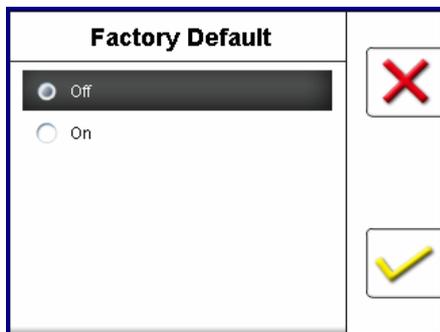
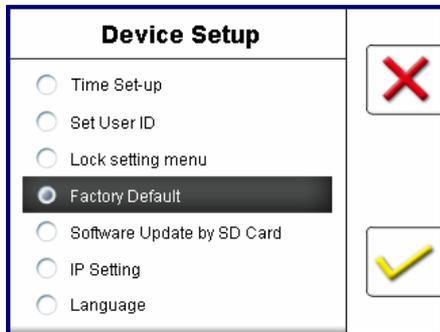
❸ Confirm setting.

Confirm your selection by Pressing either / F3 key and return to previous screen.

❹ Press to return to previous menu and exit.

◆ Factory Default

Using this Factory Default sub-menu, service personal is able to return to factory's default settings. **Caution!** All user's settings will be erased if factory default settings is selected at any time during the device operation.



① Highlight and select Factory Default setting using direction keys and press either key / F3 to confirm the selection.

⇒ Factory Default setting ON or OFF:

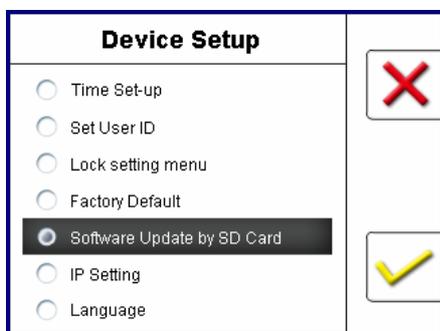
- ◆ **On:** The device always turns on with the factory default settings.
- ◆ **Off:** The device always turns on without the factory setting and keeps all users' settings.

③ Select your choice (On / Off) and confirm your setting by pressing F3 / key.

④ Press to return to previous menu and exit.

◆ Software Update by SD Card

Limited software upgrade to the X-1100 device can be performed by connecting a HCDC type SD card to the SD card slot. SD Card must be preloaded with new update software.



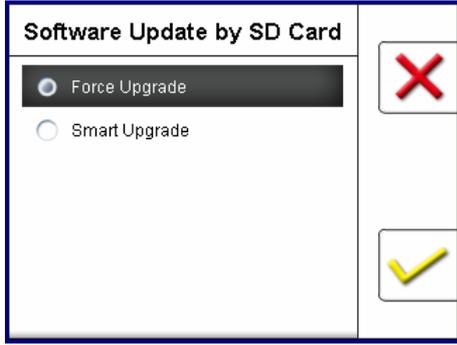
- ⑥ Suggested specification of SD Card:
 - Hardware Format: SDHC, Class 4 or 10.
 - Software Format: FAT32, 4096(4K)
 - Capacity: 4-8GB(recommended)

① Select "Software Update by SD Card" and press

/ F3 key.

② Insert the SD card in the SD card upgrade socket.

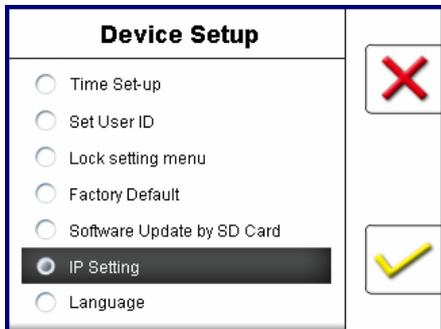
- ◆ **Force Upgrade:** Despite of software version installed in machine, Force Upgrade will upgrade the device to the version on the SD card.
- ◆ **Smart Upgrade:** It is not yet available. It compares the version on SD card and only upgrade the version which is outdated.



- ③ Press  to confirm your selection and upgrade.
 - ◆ If and when upgrade process is successful, please restart the machine.
 - ◆ If the upgrade process failed for any reasons, please press any key to restart upgrade.
 - ◆ Contact us for any trouble shooting or prior starting this process to your device (service provider only).

◆ IP Setting

Under this IP Setting sub-menu, your service provider is able to set the IP settings of the device to connect the device from external means.

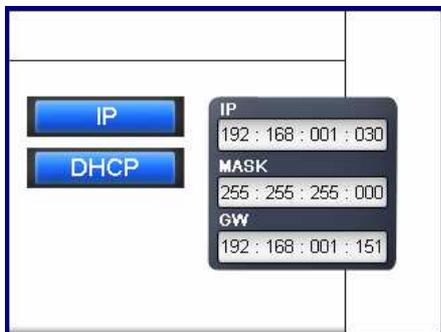


- ① Highlight and select IP Setting using direction keys and confirm the selection by pressing either  /  F3 key.

- ② Highlight and Select "IP" or DHCP, and press .

There are two options to select from:

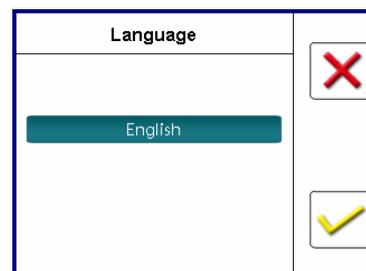
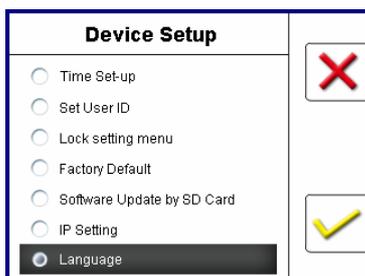
- ◆ IP : Manually enter the IP, MASK, GW.
- ◆ DHCP : Automatically obtain the IP.



- ③ Select the number you want to change, press .
 - ◆ The color from dark red to bright red.
- ④ Use the numeric number keys from control panel (0-9) to change the value, and press  to store the value.
- ⑤ Press  to return to previous screen / exit.

◆ Language (Not available with USA Model)

Under this language setting, your service provider is able to change the language of the User-Interface (UI) of the device operation. For USA model, English language is defaulted. If multi-language is available, select Language and confirm by either  /  F3 key.



Chapter 5. Maintaining X-1100

Maintenance	48
Cleaning X-1100	49

Maintenance

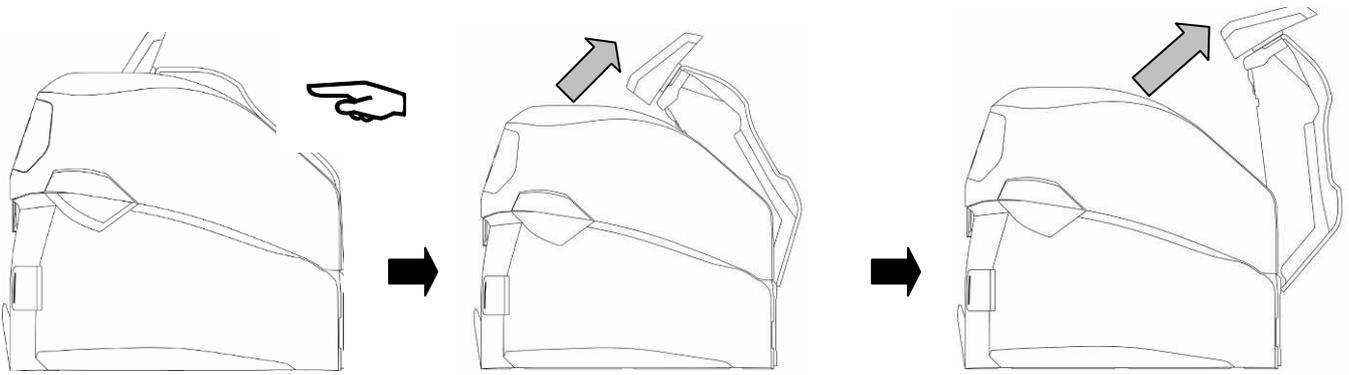
● Bill Path Access:

◆ Opening Top / Upper Bill path

Cautions! Do not attempt to open the upper bill path while device is still in operation

- Open the upper bill path only when banknotes are jammed in this area as prompted by the error message displayed on the LCD screen during a counting operation and only when device is halted.
- Open the upper bill path during cleaning and maintaining of the X-series device while power is Off.

Make sure to close the Top Bill path securely after jammed banknotes are removed or after cleaning and maintenance task is completed.

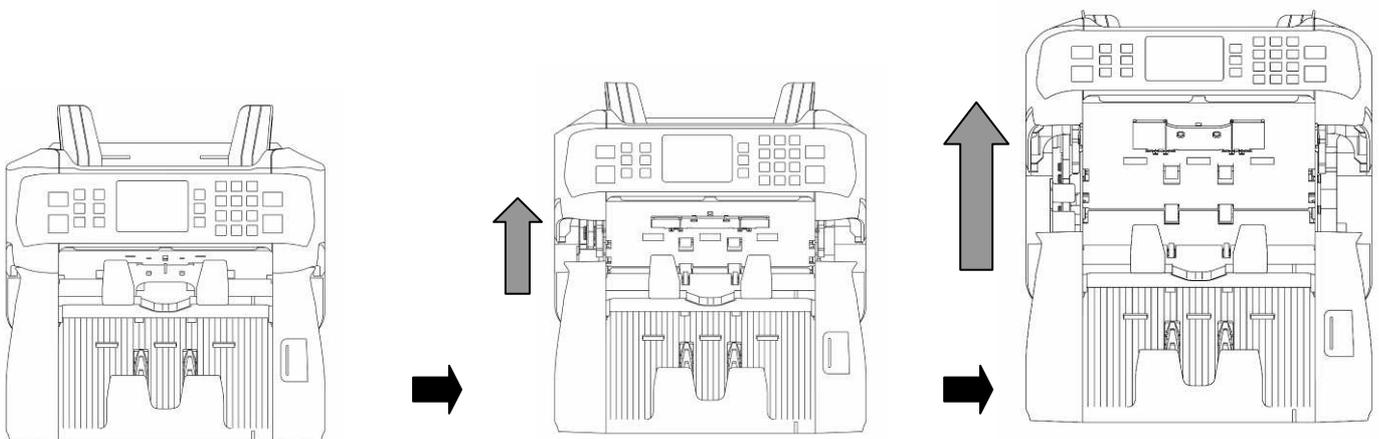


◆ Open bottom bill path

Cautions! Do not attempt to open the bottom bill path while device is still in operation

- Open the bottom bill path only when banknotes are jammed in this area as prompted by the error message displayed on the LCD screen during a counting operation and only when device is halted.
- Open the bottom bill path during cleaning and maintaining of the X-series device while power is off.

Make sure to close the Bottom Bill path securely after jammed banknotes are removed or after cleaning and maintenance task is completed.



● Cleaning X-Series Devices

WARNING



Turn Power OFF and unplug power cord from the X-1100 machine before performing any cleaning to the machine.

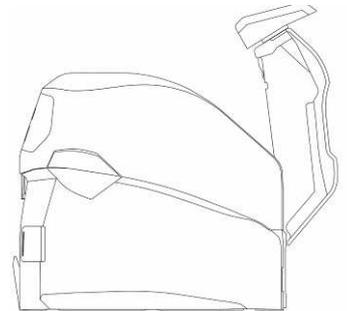
The below describes how to clean the exterior cover (surface) of X-series device.

Periodically clean the exterior of X-Series surface as follows:

- ❶ Prepare Simple Green concentrate or a mixture of a gentle kitchen-use detergent (one that does not contain abrasive powder or strong chemicals such as acid or alkaline). Mix with 5 cup water with 1 cup detergent.
- ❷ Soak the sponge with the mixture of diluted detergent for couple of minutes.
- ❸ Squeeze excess liquid out from the sponge.
- ❹ Wipe the cover with the sponge in a circular motion and make sure not to let any excess liquid drips into the interior of the device.
- ❺ Wipe the exterior surface of the device to remove the detergent.
- ❻ Rinse the sponge with clean running water.
- ❼ Wipe the cover with the clean sponge.
- ❽ Wipe the surface again with a dry, soft lint-free cloth.
- ❾ Wait for the surface to dry completely and remove any fibers.

Cleaning the bill path of X-Series device

- ❶ Open the upper bill path.
- ❷ Gently wipe it or dust the bill path with a brush, compressed air can or a dry, soft lint-free cloth.
- ❸ If stain or debris remains, moisten a soft lint-free cloth with water or a 50-50 mixture of isopropyl alcohol and water that does not contain impurities.
- ❹ Squeeze out as much of the liquid as you can.
- ❺ Wipe the bill path and the sensor surface again; do not let any liquid drip into the device.
- ❻ Repeat 1-5 to clean the lower bill path.



***NOTE: Avoid spraying cleaner directly on the device, and be sure to dry the bill path before closing it.**

✦ Appendix. Specifications

Feed System	Roller friction system	
Counterfeit Detection	IR, CIS, MR, MT, UV	
Counting Speed	Piece Count	1,500 notes/min.
	Denomination Count	Less 800 notes/min.
	Serial number Count	Less 700 notes/min.
Available Currencies	USD (Standard), EUR and LOCAL (OPTION)	
Denomination & barcode Detection	Dual Contact Image Sensors (CIS).	
Fitness & Tape Detection	Fitness Rollers and Software mechanism	
Hopper Capacity	500 notes (circulated notes)	
Pocket Capacity	Main Pocket Capacity	250 notes (circulated notes)
	Reject Pocket Capacity	Max. 100 notes (circulated notes)
Countable Note Size	60 X 85 X 0.08mm ~ 100 X 190 X 0.12mm	
Display	3.5 Inch color TFT	
Power supply	100 ~ 240V AC, 50/60Hz	
Power and Humidity	Maximum Power Consumption: Max. 150W. Temperature: 60° F(15°-29°C); Humidity: 30% ~70% (non-condensing)	
Dimensions(mm / Inch)	330(W) X 330 (D) X 350 (H) 13"(W) x 13" (D) x 13.8" (H)	
Weight	Approx. 15Kg / 33lbs	
Options	Remote Display Dot Matrix & Thermal Printer (SNBC, Bixolon, Citizen etc)	

❖ Specifications and features of this device are subject to Change without further notice.

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