



Anti-Skim Card Reader Upgrade and Configuration



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Revision History

Revision	Date:	Description:	ECO
Original - Rev A	June 9, 2016	Install Anti-Skim instructions	1031018
Rev B	September 1, 2016	Added FT53XX	
Rev C	July 7, 2021	Updated ATM Images, Clarified the test instructions.	

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For detailed warranty information by unit, Software End-User Agreement, access to ADA compliance statement, PCI v3 EPP certifications, card reader TQM certifications, EMV certifications and more, please visit www.tritonatm.com.

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Required Parts and Tools

Kit 06200-00355Anti-Skim EMV Card Reader Upgrade Kit for RL16, RL23, RL53, and ARGO. Not for when upgrading from 330 card reader.		t for use	
Tools Required Phillips head screwdriver, side-cut pliers			
	Parts Supplied		
Item #	Description Quanti		Quantity
1	Card reader w/bezel EMV ICM33B Anti-Skim		1
2	Serial card reader comms ribbon cable X2		1
3	Screw 6-32 Phillips machine screw pan head 3/8" long zinc-plated with nylon patch		5
4 Mounting bracket angled 0.062" thick steel, tin plate one 6-32 threaded hole, one		1	
	0.165 open hole		
5	Screw 6-32 Phillips machine screw pan head 1/4" long with external tooth washer		1
6	Triton EMV kernel label		1
7	Screw 8-32 Phillips machine screw pan head 3/8" long with external tooth washer		1



CAUTION

After installing the new Anti-Skim card reader, use the screws provided in the kit. DO NOT reuse the screws from the old card reader; this will cause damage to the metal inserts on the new card reader.

The new Anti-Skim card reader will need to be calibrated after it is installed. Be sure to refer to the Configuration and Diagnostics Section 9.

NOTE

Not all parts required for the ARGO 7 installation.

- Before starting the installation process, remove power from the ATM by entering Management Functions > System Parameters > Shut Down the Terminal > Enter. When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.
- 2. Carefully remove the plastic cover from the main board, *Figure A*.



Figure A

3. Unplug the card reader's communication cable from the main board, *Figure B*. Remove the cable from the cable clips.



Figure B

4. If a ground wire is attached, remove the screw securing the ground wire. Remove the four screws shown below. Slide the card reader out the front of the control panel. **DISCARD THE SCREWS**.



Track 1-2





CAUTION

Use only the screws provided in the kit. DO NOT reuse the screws from step 3 as this will damage the metal inserts on the new card reader.

5. Obtain the Anti-Skim card reader (**Item #1**) from kit number 06200-00355. Insert the card reader through the front of the control panel. Ensure Triton logo on the bezel is in the position shown, *Figure C*. Secure the card reader with four 3/8" screws (**Item #3**) provided in the kit, *Figure D*.



Figure C

Figure D

6. Obtain the card reader's communication cable (**Item #2**) from the kit. Plug the cable into the card reader. Push the two tabs on the connector to secure the cable, *Figure E*. Connect the other end of the communication cable to the main board as shown in *Figure F*.



Figure E



7. Route the communication cable through the two cable clips, *Figure G*.



Figure G

8. Remove one 8-32 X 3/8" Phillips pan head screw with the external tooth washer (**Item #7**) from the kit. Secure the ground wire from the card reader to the display bracket using the screw and washer, *Figure H*.



Figure H

9. Obtain the main board cover (removed during Step 1) and secure it to the top of the main board, *Figure I*.



Figure I

10. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to Section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.**



Required Parts and Tools

K 06200	KitAnti-Skim EMV Card Reader Upgrade Kit for RL16, RL23, RL53, and ARGO. Not for when upgrading from 330 card reader.		
Tools Required Phillips head screwdriver, side-cut pliers			
	Parts Supplied		
Item #	Description Quantit		Quantity
1	Card reader w/bezel EMV ICM33B Anti-Skim		1
2	Serial card reader comms ribbon cable X2		1
3	Screw 6-32 Phillips machine screw pan head 3/8" long zinc-plated with nylon patch		5
4	4 Mounting bracket angled 0.062" thick steel, tin plate one 6-32 threaded hole, one		1
	0.165" open hole		
5	Screw 6-32 Phillips machine screw pan head 1/4" long with external tooth washer		1
6	Triton EMV kernel label		1
7	Screw 8-32 Phillips machine screw pan head 3/8" long with external tooth washer		1



CAUTION

After installing the new Anti-Skim card reader, use the screws provided in the kit. DO NOT reuse the screws from the old card reader; this will cause damage to the metal inserts on the new card reader.

The new Anti-Skim card reader will need to be calibrated after it is installed. Be sure to refer to the Configuration and Diagnostics Section 9.

NOTE

Not all parts required for the ARGO 12 installation

- Before starting the installation process, remove power from the ATM by entering Management Functions > System Parameters > Shut Down the Terminal > Enter. When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.
- 2. Unplug the card reader's communication cable from the docking board, *Figure A*. Remove the cable from the cable clips.



Figure A

3. If a ground wire is attached, remove the screw securing the ground wire. Remove the four screws shown below. Slide the card reader out the front of the control panel. DISCARD THE SCREWS.



Track 1-2





CAUTION

Use only the screws provided in the kit. DO NOT reuse the screws from step 3 as this will damage the metal inserts on the new card reader.

4. Obtain the Anti-Skim card reader (**Item #1**) from kit number 06200-00355. Insert the card reader through the front of the control panel. Ensure the Triton logo on the bezel is in the position shown, *Figure B*. Secure the card reader with the four 3/8" screws (**Item #3**) provided in the kit, *Figure C*.



Figure B



Figure C

ARGO 12

5. Obtain the card reader's communication cable (**Item #2**) from the kit. Plug the cable into the card reader. Push the two tabs on the connector to secure the cable, *Figure D*. Connect the other end of the communication cable to the docking board as shown in *Figure E*.



Figure D

Figure E

6. Route the communication cable through the cable clips, *Figure F*.



Figure F

7. Remove one 8-32 X 3/8" Phillips pan head screw with the external tooth washer (**Item #7**) from the kit. Secure the ground wire from the card reader to the display bracket using the screw and washer, *Figure G*.



Figure G

8. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to** section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.



Required Parts and Tools

Kit 06200-00355Anti-Skim EMV Card Reader Upgrade Kit for RL16, RL23, RL53, and ARGO. Not for when upgrading from 330 card reader.			t for use
Tools Required Phillips head screwdriver, side-cut pliers			
Parts Supplied			
Description			Quantity
1	1 Card reader w/bezel EMV ICM33B Anti-Skim		1
2	2 Serial card reader comms ribbon cable X2		1
3	Screw 6-32 Phillips machine screw pan head 3/8" long zinc-plated with nylon patch 5		5
4 Mounting bracket angled 0.062" thick steel, tin plate one 6-32 threaded hole, one		1	
5 Screw 6-32 Phillips machine screw pan head 1/4" long with external tooth washer		1	
6 Triton FMV kernel label		1	
7	7 Screw 8-32 Phillips machine screw pan head 3/8" long with external tooth washer		1



CAUTION

When the new Anti-Skim card reader is installed, be sure to use the screws provided in the kit. DO NOT reuse the screws from the old card reader; this will cause damage to the metal inserts on the new card reader.

The new Anti-Skim card reader will need to be calibrated after it is installed. Be sure to refer to the Configuration and Diagnostics section.

NOTE

For the ARGO 15 installation, not all parts included in the kit are required.

- Before starting the installation process, remove power from the ATM by entering Management Functions > System Parameters > Shut Down the Terminal > Enter. When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.
- 2. Carefully remove the plastic cover from the main board, *Figure A*.



Figure A

3. Unplug the card reader's communication cable from the main board. Remove the cable from the cable clips, *Figure B*.



Figure B

4. If a ground wire is attached, remove the screw securing the ground wire. Remove the four screws shown below. Slide the card reader out the front of the control panel. **DISCARD THE SCREWS**.



Track 1-2





CAUTION

Use only the screws provided in the kit. DO NOT reuse the screws from step 3 as this will damage the metal inserts on the new card reader.

5. Obtain the Anti-Skim card reader (**Item #1**) from kit number 06200-00355. Insert the card reader through the front of the control panel. Ensure Triton logo on the bezel is in the position shown, *Figure C*. Secure the card reader with four 3/8" screws (**Item #3**) provided in the kit, *Figure D*.



Figure C



Figure D

6. Obtain the card reader's communication cable (**Item #2**) from the kit. Plug the cable into the card reader. Push the two tabs on the connector to secure the cable, *Figure E*. Connect the other end of the communication cable to the main board as shown in *Figure F*.



Figure E





7. Route the communication cable through the cable clips, *Figure G*.



Figure G

8. Remove one 8-32 X 3/8" Phillips pan head screw with the external tooth washer (**Item #7**) from the kit. Secure the ground wire from the card reader to the display bracket using the screw and washer, *Figure H*.



Figure H

9. Obtain the main board cover and secure it to the top of the main board, *Figure I*.



Figure I

10. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to Section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.**



Required Parts and Tools

KitAnti-Skim EMV Card Reader Upgrade Kit for RL16, RL23, RL53, and ARGO. Not for when upgrading from 330 card reader.		t for use	
Tools Required Phillips head screwdriver, side-cut pliers			
	Parts Supplied		
Description Quantity			Quantity
1	1 Card reader w/bezel EMV ICM33B Anti-Skim		1
2	Serial card reader comms ribbon cable X2		1
3	Screw 6-32 Phillips machine screw pan head 3/8" long zinc-plated with nylon patch		5
4 Mounting bracket angled 0.062" thick steel, tin plate one 6-32 threaded hole, one 0.165" open hole		1	
5	Screw 6-32 Phillips machine screw pan head 1/4" long with external tooth washer		1
6	Triton EMV kernel label		1
7	Screw 8-32 Phillips machine screw pan head 3/8" long with external tooth washer		1



CAUTION

After installing the new Anti-Skim card reader, use the screws provided in the kit. DO NOT reuse the screws from the old card reader; this will cause damage to the metal inserts on the new card reader.

The new Anti-Skim card reader will need to be calibrated after it is installed. Be sure to refer to the Configuration and Diagnostics section.

NOTE

Not all parts required for the RL16XX installation.

- Before starting the installation process, remove power from the ATM by entering Management Functions > System Parameters > Shut Down the Terminal > Enter. When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.
- 2. Unplug the card reader's communication cable from the main board. Remove the cable from the cable clips *Figure A*.



Figure A

3. If a ground wire is attached, remove the screw securing the ground wire. Remove the four screws shown below. Slide the card reader out the front of the control panel. DISCARD THE SCREWS.



Track 1-2



I-65

CAUTION

Use only the screws provided in the kit. DO NOT reuse the screws from step 3 as this will damage the metal inserts on the new card reader.

4. Obtain the Anti-Skim card reader (**Item #1**) from kit number 06200-00355. Insert the card reader through the front of the control panel. Ensure Triton logo on the bezel is in the position shown, *Figure B*. Secure the card reader with four 3/8" screws (**Item #3**) provided in the kit, *Figure C*.



Figure B

Figure C

5. Obtain the card reader's communication cable (**Item #2**) from the kit. Plug the cable into the card reader. Push the two tabs on the connector to secure the cable, *Figure D*. Connect the other end of the communication cable to the main board as shown in *Figure E*.



Figure D

Figure E

6. Route the communication cable through the cable clip, *Figure F*.



Figure F

7. Remove one 8-32 X 3/8" Phillips pan head screw with the external tooth washer (**Item #7**) from the kit. Secure the ground wire from the card reader to the display bracket using the screw and washer, *Figure G*.





8. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to Section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.**

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Required Parts and Tools

Kit 06200-00355Anti-Skim EMV Card Reader Upgrade Kit for RL16, RL23, RL53, and ARGO. Not for when upgrading from 330 card reader.			t for use
Tools Required Phillips head screwdriver, side-cut pliers			
		Parts Supplied	
Description Quantity			
1	Card reader w/bezel EMV ICM33B Anti-Skim		1
2	Serial card reader comms ribbon cable X2		1
3	Screw 6-32 Phillips machine screw pan head 3/8" long zinc-plated with nylon patch		5
4 Mounting bracket angled 0.062" thick steel, tin plate one 6-32 threaded hole, one 0.165" open hole		1	
5	Screw 6-32 Phillips machine screw pan head 1/4" long with external tooth washer		1
6	6 Triton EMV kernel label		1
7	Screw 8-32 Phillips machine screw pan head 3/8" long with external tooth washer		1



CAUTION

After installing the new Anti-Skim card reader, use the screws provided in the kit. DO NOT reuse the screws from the old card reader; this will cause damage to the metal inserts on the new card reader.

The new Anti-Skim card reader will need to be calibrated after it is installed. Be sure to refer to the Configuration and Diagnostics Section 9.

NOTE

Not all parts required for the RL23XX installation.

- Before starting the installation process, remove power from the ATM by entering Management Functions > System Parameters > Shut Down the Terminal > Enter. When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.
- 2. Unplug card reader's communication cable from the docking board shown below. Remove the cable from the cable clips, *Figure A*.



Figure A

3. If a ground wire is attached, remove the screw securing the ground wire. Remove the four screws shown below. Slide the card reader out the front of the control panel. DISCARD THE SCREWS.



Track 1-2



I-65

CAUTION

Use only the screws provided in the kit. DO NOT reuse the screws from step 3 as this will damage the metal inserts on the new card reader.

4. Obtain the Anti-Skim card reader (**Item #1**) from kit number 06200-00355. Insert the card reader through the front of the control panel. Ensure Triton logo on the bezel is in the position shown, *Figure B*. Secure the card reader with the four 3/8" screws (**Item #3**) provided in the kit, *Figure C*.



Figure B

Figure C

5. Obtain the card reader communication cable (**Item #2**) from the kit and plug cable into the card reader. Push the two tabs on the connector to secure the cable, *Figure D*. Route the communication cable under the other cables and through the cable clips, *Figure E*.



Figure D



6. Connect the other end of the communication cable to the docking board, *Figure F*.



Figure F

7. Remove one 8-32 X 3/8" Phillips pan head screw with the external tooth washer (**Item #7**) from kit. Secure the ground wire from the card reader to the display bracket using the screw and washer *Figure G*.



Figure G

8. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to Section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.**

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Required Parts and Tools

Kit 06200-00355Anti-Skim EMV Card Reader Upgrade Kit for RL16, RL23, RL53, and ARGO. Not for when upgrading from 330 card reader.			t for use
Tools Required Phillips head screwdriver, side-cut pliers			
	Parts Supplied		
Description Quan			Quantity
1	Card reader w/bezel EMV ICM33B Anti-Skim		1
2	Serial card reader comms ribbon cable X2		1
3	Screw 6-32 Phillips machine screw pan head 3/8" long zinc-plated with nylon patch		5
4 Mounting bracket angled 0.062" thick steel, tin plate one 6-32 threaded hole, one 0.165" open hole		1	
5	5 Screw 6-32 Phillips machine screw pan head 1/4" long with external tooth washer		1
6	6 Triton EMV kernel label		1
7	Screw 8-32 Phillips machine screw pan head 3/8" long with external tooth washer		1



CAUTION

After installing the new Anti-Skim card reader, use the screws provided in the kit. DO NOT reuse the screws from the old card reader; this will cause damage to the metal inserts on the new card reader.

The new Anti-Skim card reader will need to be calibrated after it is installed. Be sure to refer to the Configuration and Diagnostics Section 9.

NOTE

Not all parts required for the RL53XX installation.

Before starting the installation process, remove power from the ATM by entering **Management Functions** > **System Parameters** > **Shut Down the Terminal** > **Enter.** When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.

1. Unplug card reader's communication cable from the docking board. Remove the cable from the cable clips, *Figure A*.



Figure A

2. If a ground wire is attached, remove the screw securing the ground wire. Remove the four screws shown below. Slide the card reader out the front of the control panel. DISCARD THE SCREWS.



Track 1-2





CAUTION

Use only the screws provided in the kit. DO NOT reuse the screws from step 3 as this will damage the metal inserts on the new card reader.

3. Obtain the Anti-Skim card reader (**Item #1**) from kit number 06200-00355. Insert the card reader through the front of the control panel. Ensure Triton logo on the bezel is in the position shown, *Figure B*. Secure the card reader with four 3/8" screws (**Item #3**) provided in the kit, *Figure C*.



Figure B

Figure C

4. Obtain the card reader's communication cable (**Item #2**) from the kit. Plug the cable into the card reader. Push the two tabs on the connector to secure the cable, *Figure D*. Connect the other end of the communication cable to the main board, *Figure E*.



Figure D

Figure E

5. If there was no ground wire from the old card reader, remove the screw holding the unit's ground wire as shown.



Figure F

6. Obtain the L-bracket (Item #4) from the kit. Install the L-bracket with the cable clip. Make sure the side with the threaded hole is facing as shown in *Figure G*.



Figure G



7. Install the card reader ground wire and the existing ground wire to the L-Bracket with the 1/4" screw (Item #5) from the kit as shown in *Figure H*.

Figure H

8. Route the communications cable through the cable clips, *Figure I*.



Figure I

9. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to Section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.**

SECTION 7 - Upgrade from EMV ICM 330

ANTI-SKIM CARD READER UPGRADING FROM EMV ICM 330 Card Reader for RL16, RL23, RL53 and ARGO Kit 06200-00358

Required Parts and Tools

K 06200	KitAnti-Skim EMV Card Reader Upgrade Kit for ARGO, RL16, RL23, RL53. For use when upgrading from 330 card reader only.		when	
Tools R	Tools Required Phillips head screwdriver			
	Parts Supplied			
	Description Quantity			
1	1 Card reader w/bezel EMV ICM33B Anti-Skim 1			
2	2 Screw 6-32 Phillips machine screw pan head 3/8" long zinc-plated with nylon patch 5			



CAUTION:

After installing the new Anti-Skim card reader, use the screws provided in the kit. DO NOT reuse the screws from the old card reader; this will cause damage to the metal inserts on the new card reader.

The new Anti-Skim card reader will need to be calibrated after it is installed. Be sure to refer to the Configuration and Diagnostics Section 9.

NOTE

Use this kit for units that are being upgraded from an EMV 330 card reader. The images show ARGO 15, but the instructions are similar for all models.

Before starting the installation process, remove power from the ATM by entering **Management Functions** > **System Parameters** > **Shut Down the Terminal** > **Enter.** When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.

1. Pull the two tabs out and disconnect the card reader's communication cable from the top of the card reader, *Figure A*.



Figure A

2. Remove the screw securing the ground wire to the control panel, *Figure B*. Retain the screw for ARGO and RL53. **DISCARD THE SCREW FOR RL16 and RL23**.



Figure B

3. Remove the four screws. Slide the card reader out the front of the control panel, *Figure C.* DISCARD THE SCREWS.



Figure C

CAUTION

Use only the screws provided in the kit. DO NOT reuse the screws from step 3 as this will damage the metal inserts on the new card reader.

4. Obtain the Anti-Skim card reader from kit number 06200-00358. Insert the card reader through the front of the control panel. Ensure Triton logo on the bezel is in the position shown, *Figure D*. Secure the card reader with four 3/8" screws provided in the kit, *Figure E*.



Figure D

Figure E

5. Connect the communication cable to the top of the card reader. Push the two tabs on the connector to secure the cable, *Figure F*.



Figure F

6. Secure the ground wire from the card reader to the display bracket (or where previously attached).



ARGO Modules Use existing screw from step 2.

Caution

Be sure to use the screws provided in the kit for RL16 and RL23. DO NOT reuse the screw from step 2; this will cause damage to the metal inserts on the new card reader.



RL53XX Use Existing screw from step 2.



RL16XX and RL23XX Use screw provided in the kit.

7. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to Section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.**

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	TOOLS REQUIRED	No. 2 Phillips screwdriver with a 6" shank (magnetic recommended) ESD wrist strap with grounding cord	
	KIT P/N: 06200-00402	Sankyo ICM330 Anti-Skim EMV Card with Bezel Upgrade	Reader
PARTS SUPPLIED			
		DESCRIPTION	QUAN- TITY
1	ICM33B-3R1571 anti-skim card reader		1
2	Card reader communications ribbon cable, X2 1		
3	3 Screw 6-32 1/4" Phillips pan head w/external tooth washer		1
4	Triton EMV kernel label		1

EMV 330 CARD READER UPGRADE PROCEDURES

Note

The card reader includes an attached ground wire. Ensure the card reader and cabinet ground wires are joined. Windows CE6 needed for operation. Calibration necessary after installation; See Calibration and Diagnostics Section 9 in this manual.







- Before starting the installation process, remove power from the ATM by entering Management Functions > System Parameters > Shut Down the Terminal > Enter. Put the ESD wrist strap on and attach the cord to the ground. When prompted, open the control panel and turn power switch to off (O) position. Disconnect main power cable from the power supply.
- 2. Use a No. 2 Phillips screwdriver to remove the screw and two ground wires on the side of the card reader cover, *Figure A*. Set the screw aside for reinstallation. Rotate the card reader cover open and remove the top portion, *Figure B*. Set cover aside.



Figure A

Figure B

3. Pop the bushing out of the bracket to release the card reader's cable, *Figure C*. Set the bushing aside for reinstallation, *Figure D*.



Figure C



Figure D

4. Unplug the cable from the card reader, then from the docking board. Discard the cable.













Docking Board

5. While holding the card reader and bracket, remove the four screws securing the assembly to the control panel, *Figure E*. Set the bracket and screws aside for reinstallation.



Figure E

- 6. Place the ESD wrist strap on wrist and attach the cord to the ground.
- 7. Obtain the Anti-Skim card reader (**Item 1**) from kit number 06200-00402. **Second user will be help-ful.** Insert the card reader through the front of the control panel. Ensure Triton logo on the bezel is in the position shown, *Figure F.*
- 8. From inside the ATM, set the cover in place over the reader. Secure the parts to the control panel with the four screws previously removed, *Figure G*.



Figure F

Figure G

9. Plug the new card reader cable (Item #2) into the top of the card reader, *Figure H*.



Figure H

10. Attach the grommet previously removed to both the card reader ground wire and the card reader cable. Insert the grommet into the bracket hole, *Figure I*.



Figure I

11. Reinstall the card reader cover by inserting the two tabs into the two notches and rotating io the closed position, *Figure J*.





12. Plug the card reader cable (Item#2) into the docking board, *Figure K*.



Figure K

13. Secure the card reader ground wire, audio ground wire and the main ground wire to the side of the card reader cover with the screw previously removed. Ensure the wires are in the correct order: Card reader bracket > Card reader ground > Audio ground > Control panel ground > Screw, *Figure L*.



Figure L

14. Unclip the cable clip closest to the card reader bracket. Route the card reader cable through the clip, loop and route it back. Snap the cable clip closed, *Figure M*.



Figure M

15. Connect the main power cable to the power supply and power on the ATM. Close the control panel. **Refer to Section 9 for instructions on Calibration and Diagnostics of the Anti-Skim Card Reader.**

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Section 9 - Calibration and Diagnostics

Anti-Skim Card Reader Upgrade RL16, RL23, RL53, ARGO, FT53

Anti-Skim Card Reader Calibration

To configure and calibrate the new EMV Anti-Skim card reader, download the software from www.triton.com. Load the file onto the unit, then perform the following steps:

Note

Before starting the calibration process, make sure there is no metal near the card reader.

- On the Management Functions screen, select Terminal Configuration (6) > More Options (0) > More Options (0) > Anti-Skim Config (3).
- 2. This *Anti-Skim* screen displays the Default Settings.
- 3. To change a value, press the keypad number of the desired option or use the (F5) UP or (F6) Down button to highlight options. Press the (F7) Select button.



4. An on-screen numeric keypad will open. Enter the new value via the front panel keypad.

ATM Management Functions 🛛 💣 Triton results at TBA						
Terminal Configuration/More Options/More Options 2/Anti-Skim/Temperature Corrected Metal Press 7/1/2021 01:17 PM						
	emperature C	orrected Met	al Present Time			
ter inter office	Enter a value between 0 and 9999					
NO TO TO TO TO	180					
1010101010 1010101000		0:110.H				
601010101010	1	2	3			
	4	5	6	Clear		
	7	8	9			
Enter and Return	. <	0	,>	Cancel		

- 5. Press **Enter** on the front panel keypad or press the on-screen (**F4**) **Enter and Return** button to save the new value. Press (**F7**) **Clear** to delete the value in the text box. Press (**F8**) **Cancel** to return to the Anti-Skim screen without saving the new value.
- 6. If no other changes required, apply the current settings by pressing the **(F4) Save and Return** button on the Anti-Skim screen or press **ENTER** on the keypad to apply current settings. A 'Please Wait' screen opens as the card reader restarts.

 The Card Reader's LED may turn off and back on during this process. When calibration completes, press (F1) Enter on the Success screen. The screen displays the *More Options* menu.

Note

The default settings in the Anti-Skim parameters dialog should be sufficient in most cases. However, the user can change both the temperature corrected method and the differential voltage method:

- Metal Present Time to trigger skimmer detection, either 0 or within range 60 to 9999 seconds.
- Metal Absent Time to clear skimmer detection, range is 1 to 9999 seconds.
- Sensed voltage differential to trigger metal detection, range is 1 to 999 mV for temperature corrected, 0 to 999 mV for differential voltage.
- Sensed voltage differential to trigger metal detection warning, range is 1 to 999 mV for temperature corrected, 0 to 999 mV for differential voltage. (Cannot be greater than detection voltage.)
- 8. After the ATM completes the calibration, perform the following steps to shut down the ATM:
- 9. Enter Management Functions > System Parameters (5) > Shut Down (4). The screen will request verification to shut-down, press Enter. Wait until the screen displays safe to shut-down terminal.

Shutdown	ОК
It is now safe to shu	tdown
your computer	

- 10. Open the control panel and turn the power switch to off (O) position. Count to five. Turn the power switch to the on (I) position.
- 11. When the welcome screen appears, wait at least three minutes (or the largest configured metal present time) to confirm the ATM does not detect a skimmer.

Note

If the card reader detects a skimmer at the welcome screen, the ATM will treat it as an error condition. In this case, the ATM will do the following:

- Go out of service.
- Log the event in the ATM's journal
- Advise Triton Connect of the error (if configured to do so).

The ATM will automatically recover after the skimmer is no longer detected. The ATM will

- Go back into service
- Log the event in the journal
- Advises Triton Connect that the error has cleared (if configured to do so).

CARD READER DIAGNOSTICS

The card reader status report in Management Functions and in the Configuration Summary will show the following information: Card Reader Type: Sankyo ICM33B Anti-Skim Device ID: NIDEC SANKYO CORPORATION Firmware Ver: 4974-01B 4975-01K 4924-01B 4962-01A 4963-01B 4977-01C 4978-01G 1C8DFD Serial Num: A6030217 Metal Detector: Present Jamming Coil: Present Temperature Corrected Metal Present Time: 180 sec Metal Absent Time: 10 sec Detection Voltage: 150 mV Warning Voltage: 110 mV Differential Voltage Metal Present Time: 180 sec Metal Absent Time: 10 sec Detection Voltage: 50 mV Warning Voltage: 20 mV

TESTING

- 1. Navigate to Management Functions > Diagnostics (2) > Card Reader (5) > Test Anti-Skim (6).
- 2. Place a small metal object across the reader's opening, NOT IN IT, paper clip, screwdriver, or a coin will do. The reader detects the metal, and the screen displays the text "Metal detected", left image. Remove the metal object. The reader does not detect the metal, and the screen displays the text "Metal not detected", right image.

ATM Management Functions		ATM Management Functions	
Terminal Diagnostics/Card Reader Diagnostics/Test Anti-Skim	7/1/2021_02:15_PM	Terminal Diagnostics/Card Reader Diagnostics/Test Anti-Skim	7/1/2021 02:14 PM
Test Anti-Skim		Test Anti-Skim	
Metal detected	Marca and and and	Metal not detected	Marcane and
Voltage: 3299 mV	11010101	Voltage: 1475 mV	1/10/10/10/1
Temperature: +25.0 °C	0/010-00+0	Temperature: +25.1 °C	0/01-01-010
1010101000	1/0/0010-10	1010101000	0/0/01010
1110101010	000000000000000000000000000000000000000	1110101010	0 10 10 2020
10101010	1/10/10/10/2020	10101010	Y/11011/0/Y/2019
101010101		101010101	
101010101	89711411141272	101010101	29/11911/P/2/2/2
101010100	22/3//IRH((44/2)	101010100	Z/////RH/17/22
11/07/07/071	2 ////////////////////////////////////	7///0201011	2777719WW1772
1/1/1/1/10/001	2 <u>////////////////////////////////////</u>	111111111111111	<u> 222//////////////////////////////////</u>
	Back		Back

The screen displays voltage X as "Voltage: X mV". X is up to 4 digits, leading zeros not shown. The screen displays temperature X as "Temperature: X °C". X is a plus/minus sign, 2 digits, a decimal point, and 1 digit.

- 3. Press (F8) Back, (F8) Back, (F4) Exit Management Functions, and (F1) Enter buttons to reach customer screen.
- 4. Test the reader again.
- 5. Place a metal object across the reader's opening, NOT IN IT, paper clip, screwdriver, or a coin will do. Depending on the value set for *Metal Present Time*, hold the metal object across the reader's opening until the screen displays "This machine is temporarily out of service. Please wait. Error code: 196".



6. To clear the error, remove the metal from the reader. Wait until the ATM clears itself, approximate time of the "Metal Absent Time" value or wait until the screen displays "Card Reader Error. Error code: 196".



7. Log into Management Functions screen. Press (F3) Reset Error button.

Return the ATM to normal operations.

End of Procedure