

August 4, 2015

Expiring Security Certificates and System Software

Several product lines including the T42XX and M42XX were designed by Hypercom using a cryptographic certificate structure to manage the device and associated system software authenticity. This structure provides secure payment architecture necessary to comply with PCI requirements.

Each of the cryptographic certificates and system software signers has an expiry date that was set by Hypercom when the certificate or software signer was created. From our analysis, it appears that Hypercom initially set the lifetime of some system software components to ten years.

In addition to the software expirations, each device is loaded with a PED certificate during the manufacturing process with an expiration date. From 2007 through April 2012, this expiration was ten years from the date of manufacture or repair. Beginning April 2012, the PED certificate expiration is fifteen years.

Note: If a terminal has gone through a repair, the PED certificate is reloaded and the PED certificate expiration would be ten or fifteen years from the date of repair depending on when the repair occurred.

Below are the four separate elements that should be noted:

- | | |
|---------------------------------|---|
| 1. Boot Software | Next expiry date, October 19, 2015 |
| 2. Application Manager Software | Next expiry date, October 19, 2015 |
| 3. Standard Terminal ACL | October 19, 2015 (<u>All</u> Models and Revisions) |
| 4. PED Certificate | 10 years, 2007-March 2012, thereafter 15 years |

Note: Customers that have implemented Term-Lock or App-Lock have a custom Terminal ACL that will have a later expiration date. If you have implemented Term-Lock or App-Lock and do not know the expiration of your ACL, please email HypercomCertExpiry@equinoxpayments.com to request the expiration date of your custom ACL.

OCTOBER 19, 2015 is the next date some revisions of the T42XX and M42XX terminals will expire.

Please refer to the tables on following pages for a list of hardware and software versions and their corresponding expiration dates. The Terminal ACL for all models will expire on October 19, 2015.

Note: The T4100 does NOT have the capability to perform a boot update. The T4100 is a pre-PCI device and has reached its End-of-Service date as of April 30, 2013. The boot and ACL for the T4100 will expire on October 19, 2015. It is recommended that these terminals be removed from service prior to October 19, 2015.

Resolution

Equinox has re-signed the Terminal ACL, a single version of the Boot software for the T/M4200, and multiple versions of the Application Manager software with an extended expiration date. This re-signed software must then be loaded into all devices to prevent a failure due to software expiration. The Terminal ACL will be packaged with Application Manager and your application.

There are no App Manager dependencies on a boot version so only one version is signed and available for field updates. There are older versions of Application Manager currently listed on the tables below that are not re-signed. If you require one of these versions to address terminals in the field, please contact your Equinox representative to request a re-signed version.

Access Equinox FTP Site

Use the following FTP login credentials to download the file listed below to your local hard-drive:

URL address: <https://ftp1.equinoxpayments.com/>

Username: Eqxftp

Password: CSS2015\$ftp1

NOTE: Click on the above URL address for direct access to the folder.

On the FTP site, locate the specific folder: **T4200** and then download the **T4200 Boot Signature Upgrade.zip** file. This file contains documentation on how to perform the updates.

Options for Addressing a PED Certificate

1. You may add an Apollo CFD to the T42XX creating a two-piece solution that eliminates the approaching expiry of both the PED and Application Manager Certificate. The Apollo CFD becomes the secure device with a new PED Certificate and Application Manager with new expiration dates of **2029**, rendering the T42XX as a non-secure merchant facing device.

Note: The Boot software and Terminal ACL on the T/M4200 must be updated prior to adding the Apollo CFD.

2. Update the PED Certificate for an additional 15 years. This can be done either at Equinox Payments or at an Authorized Repair Facility (ARF). Updating the PED Certificate is a non-warranty repair and regular fees will apply.

Equinox Support

Equinox can provide direct ship customers with a list of serial numbers and the corresponding Boot and PED certificate expiration dates. If you are not a direct ship customer and you have a list of serial numbers but do not know what revision they are, you can provide us with a serial number list and we will provide the hardware revision.

Equinox offers a variety of alternative cost effective solutions to either replace or enhance the value of legacy terminals. Please contact an Equinox representative to discuss what products will best fit your needs.

Expiration Dates

T4200 and M4200 Boot Software		
The Terminal ACL for all revisions will expire on October 19, 2015		
Boot Version	Expiration Date	New Expiration Date
20070627	10/19/2015	Not re-signed
20071210	10/19/2015	Not re-signed
20090423	10/19/2015	Not re-signed
20090709	07/20/2019	Not re-signed
20150227	N/A	10/11/2029

T4200 and M4200 Application Manager Software The Terminal ACL for all revisions will expire on October 19, 2015			
Application Manager Revision	Packaged with these SPOS32 versions	Expiration Date	New Expiration Date
20080228	2.0.68, 2.0.69, 2.1.22, 2.2.18	10/19/2015	Not re-signed
20080904	2.0.86, 2.0.87, 2.1.28, 2.3.17, 2.3.20	10/19/2015	Not re-signed
20090210	2.0.94, 2.0.100, 2.0.103	10/19/2015	Not re-signed
20090417	2.2.23, 2.3.23, 2.3.25, 3.0.61,	10/19/2015	Not re-signed
20090420	2.0.42, 2.0.87, 2.0.94, 2.0.110, 2.0.111, 2.0.112, 2.1.28, 2.2.23, 2.3.25, 2.3.30, 3.0.88, 3.0.92, 3.0.93, 3.1.31	10/19/2015	10/11/2029
20090923	3.0.90, 3.0.92, 3.0.92.1, 3.0.93,	7/20/2019	10/11/2029
20100121	3.0.101, 3.0.105, 3.1.31, 3.1.64, 3.1.67, 3.1.81, 3.1.81.2, 3.1.84	7/20/2019	10/11/2029
20100129	3.0.107, 3.1.89, 3.3.49	7/20/2019	10/11/2029
20101203	2.0.111, 2.1.19, 3.0.93, 3.0.107, 3.0.108, 3.0.110, 3.1.64.3, 3.1.64.4, 3.1.64.5, 3.1.64.6, 3.1.64.8, 3.1.64.12, 3.1.81.2, 3.1.89, 3.1.122, 3.1.125, 3.1.129, 3.1.144, 3.1.162, 3.1.167, 3.1.203, 3.3.60, 3.3.86, 3.3.97, 3.3.99, 3.3.128, 3.3.144, 3.3.159, 3.3.163, 3.3.171	7/20/2019	10/11/2029
20101222	3.2.23	7/20/2019	Not re-signed
20110615	3.0.110, 3.1.129, 3.2.26, 3.3.86, 3.3.128, 3.3.144, 3.3.159, 3.3.163, 3.3.171, 3.3.175, 3.3.179	7/20/2019	10/11/2029
20121212	4.1, 4.0, 3.4,	12/4/2022	10/11/2029

T4200 and M4200 Part Number Revisions and Boot Versions The Terminal ACL for all revisions will expire on October 19, 2015							
Part Number	Model	Revs with Boot Expiration of 10/19/2015	Revs with Boot Expiration of 07/20/2019	Part Number	Model	Revs with Boot Expiration of 10/19/2015	Revs with Boot Expiration of 07/20/2019
010332-016R	T4230	A - ZPD	ZPE-ZYR	010332-389E	T4220	N/A	A - D
010332-025R	T4230	A - ZSD	ZSE-ZYR	010332-407R	T4210	A - Y	Z - Z1
010332-306R	T4210	A - ZVD	ZVE-ZYS	010332-412R	T4220	A - Y	Z - Z1
010332-307R	T4210	A - ZR1	N/A	010341-001R	M4230	A - ZAB	ZAC - ZHS
010332-311R	T4220	A - ZUD	ZUE-ZYS	010341-005R	M4240	A - ZKD	ZKE - ZZL
010332-312R	T4220	A - ZQ1	N/A	010341-007R	M4230	A - ZFF	ZFG - ZHS
010332-348R	T4210	A - ZKE	N/A	010341-012R	M4240	A - Y	Z - ZHM
010332-349R	T4220	A - ZKE	N/A	010341-019R	M4230	A - S	T - ZHJ
010332-350R	T4210	A - ZJB	N/A	010341-024R	M4230	A - Q	R - ZHS
010332-351R	T4210	A - ZHD	ZHE-ZYS	010341-038E	M4230	N/A	A - ZHS
010332-352R	T4220	A - ZHD	ZHE-ZYS	010341-039E	M4240	N/A	A - G
010332-353R	T4220	A - ZME	N/A	010344-001R	T4205	A - Z	ZAA-ZBJ
010332-358R	T4210	A - ZFD	ZFE-ZYS	010344-003R	T4205	A - ZBA	ZBB-ZBV
010332-359R	T4220	A - ZFD	ZFE-ZYS	010344-006R	T4205	A - Z	ZAA-ZAE
010332-363R	T4210	A - S	T - ZYE	010344-007R	T4205	A - ZAA	ZAB-ZBV
010332-371R	T4210	A - T	U - ZYK	010344-008R	T4205	A - ZAA	ZAB-ZBV
010332-372R	T4220	A - T	U - ZYS	010344-017R	T4205	A - C	D-ZBV
010332-373E	T4210	N/A	A - ZYR	010344-018E	T4205	N/A	A - L
010332-374E	T4220	N/A	A - ZYR				

Frequently Asked Questions

This section provides answers to commonly asked questions.

Q.	Is it required to perform the boot update & reloading of Application Manager & ACL in two separate steps?
A.	Yes, the process described in this guide is the recommended and most reliable way to perform the updates.
Q.	Is the Terminal pad in a non-functional state after applying the boot update?
A.	No, the terminal will be fully functional after the boot update is complete.
Q.	How do I know if the boot update was successful?
A.	At the end of the update, the new boot version is displayed. You can also perform a version check to verify the boot version.
Q.	Is there anything that tells us the ACL update actually applied?
A.	There is no version number for the ACL and no way to check the validity date. The only indicator is the confirmation of a successful download.
Q.	What is the terminal behavior when the Boot expires?
A.	When the terminal is rebooted after the expiry of the boot, the terminal will be non-functional. The screen will be blank and it will emit three beeps. In this condition, the terminal can only be restored to normal operation by the Equinox repair facility.
Q.	What is the terminal behavior when the ACL expires?
A.	When the terminal is rebooted after the expiry of the ACL, the terminal will be unable to launch applications. When attempting to launch an application, the terminal will display Err Sec: Sign App Required and return to the desktop . The terminal can still perform a download so once the updated ACL is loaded, the terminal will return to normal operation.
Q.	Will I have to reload my encryption keys after these updates are complete?
A.	No, these updates have no impact on keys that are in the terminal.
Q.	What is the expiry date of the boot that is being loaded during this process?
A.	The 20150227 boot version for the T4200 and M4200 terminals has an expiry date of October 11, 2029.
Q.	Can the PED certificate be updated remotely with a download?
A.	No, the only option for a PED certificate update is sending the terminal for repair.
Q.	Can the T4100 be updated with boot app manager and ACL?
A.	No. The T4100 does NOT have the capability to perform a boot update. The T4100 is a pre-PCI device and has reached its End-of-Service date as of April 30, 2013. The boot and ACL for the T4100 will expire on October 19, 2015.
Q.	Can the PED certificate be updated remotely with a download?
A.	No, the only option for a PED certificate update is sending the terminal for repair.
Q.	Do these expirations affect the Apollo product line?
A.	No, there are no imminent software or certificate expirations for the Apollo product line. All of the software and certificates for the Apollo product line have an expiry date in 2037.

Contact Us

If you have any questions, please contact your Equinox Payments Customer Support Specialist directly or use any of the methods below:

Email HypercomCertExpiry@equinoxpayments.com

Phone: 1.877.497.3726

Note: For any communication method used, please leave your **Name**, **Phone Number**, **Email Address** and specific **Reason** for contacting us.