ThunderSoft TurboX®

Flash Programmer Tool User Guide

Rev. A

May 17, 2019
## Revision history

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<tr>
<td>A</td>
<td>May 17, 2019</td>
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1 Introduction

1.1 Purpose

This document describes how to use the ThunderSoft Flash Programmer Tool (TFlash) software.
2 Installation

To install TFlash software:

1. Download TFlash from: https://www.thundercomm.com

2. In Windows Explorer, find setup.exe in the directory where you downloaded and unzipped it. Double-click the file to launch the installer.

3. Follow instructions provided by the installer. This can include additional reboots depending on your operating system version and that of certain system files that QPST may need to update.

4. After rebooting the computer, double-click setup.exe to relaunch the setup program. When the Setup Complete dialog appears, the application has been installed successfully.

5. Click Close to complete installation
3 Target Device State

TFlash can flash a build image into a target in Emergency Download (EDL) modes.

3.1 Emergency Download mode

When the device is in EDL mode, port information displays on the TFlash main screen as Qualcomm HS-USB QDLoader.

![Image showing TFlash main screen and port information.]

The same port information enumerates in the Device Manager.

![Image showing Device Manager with Qualcomm HS-USB QDLoader port highlighted.]

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4 Operation Guide

4.1 Start TFlash

To launch TFlash, click **Start > Programs > TSFlashTool.**

Shows the TFlash main screen when no target device is attached to the computer.

![TFlash Main Screen]

4.2 Flash Programmer

1. In the **Select Programmer** field, click **Browse** and navigate to the flat build path.
   a. Select FireHose Programmer .mbn or .elf file, and click Open. e.g.,
      
      `prog_<type>_firehose_<msm>.mbn`, where:
      - `<type>` can be either emmc or ufs
      - `<msm>` corresponds to the platform name, e.g., 8953

![FireHose Programmer Selection]

When you click Open, the rawprogram_unsprise.xml selection explorer will pop up automatically.
b. Select **rawprogram_unsparse.xml** and click **Open**.

![Image of file selection]

When you click Open, the patch0.xml selection explorer will pop up automatically.

c. Select **patch0.xml** file and click **Open**.

![Image of file selection]

2. Plug in a target device in EDL mode to an available USB port, and click **UpdatePort**. The device is displayed at the top of the main screen.
3. Check Storage type:

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<tr>
<td>SOM</td>
</tr>
<tr>
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<tr>
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<tr>
<td>UFS</td>
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- Select EMMC

![Thundercom Flash Tools]

4. Click Download.

![Thundercom Flash Tools]

Upon successful completion, Download Succeed and Finish Download messages display in the Status field.