

7 To prepare your workstation for software development, power off the EVM, remove the SD card and insert it into your Ubuntu Linux workstation.



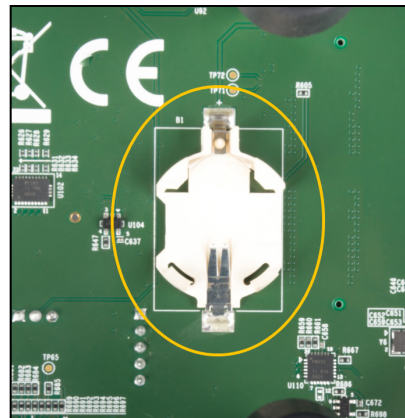
In addition to the software from www.ti.com/mysecuresoftware, you will also need to download and install the latest Processor SDK-Linux from <http://www.ti.com/tool/processor-sdk-am65x>. Connect the supplied USB debug cable as described in Step 2. Connect the supplied Ethernet cable to the RJ-45 jack labeled "MCU ETHERNET" on the board. Connect the other end of the cable to an Internet-enabled router or Ethernet switch. Follow Steps 3 through 6.

For more details on Linux, refer to www.ti.com/processor_sdk_linux.

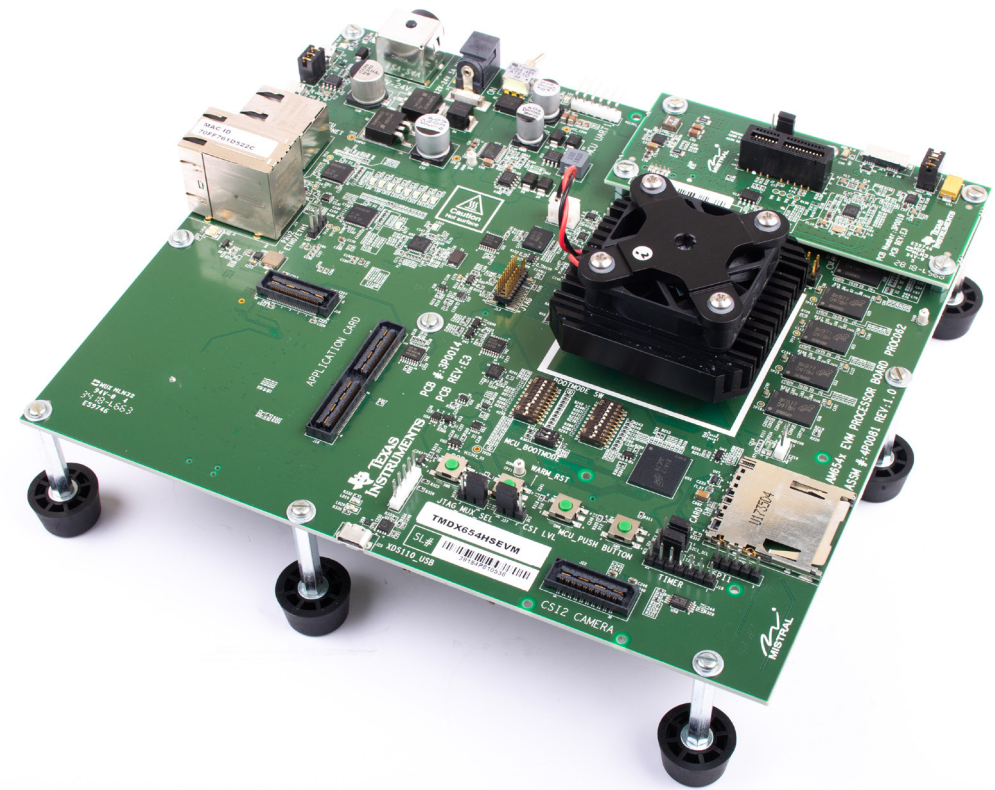
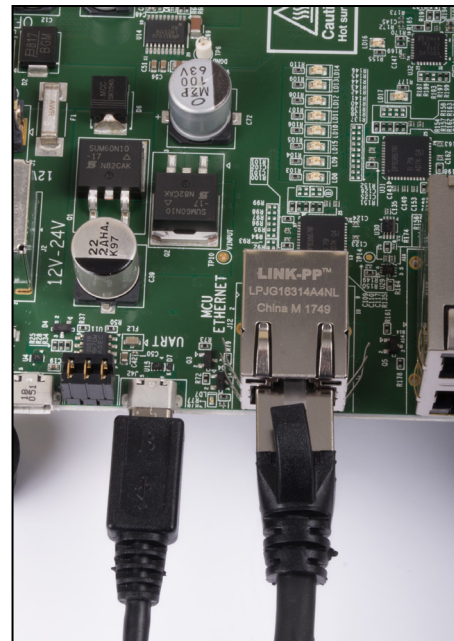
For TI-RTOS, refer to www.ti.com/processor_sdk_rtos.

For Android, refer to www.ti.com/processor_sdk_android.

8 Note that this EVM comes with a coin battery holder. A coin battery is not necessary for normal operation of the EVM.



Note: This EVM is designed for optional use with a removable CR2032 UL recognized lithium battery (not supplied). Always use the CR2032VP Energizer 3V Lithium coin cell battery or similar CR2032 UL recognized battery with Nominal Voltage 3.0 Volts, Capacity 235mAh



 TEXAS INSTRUMENTS

AM65x/DRA80xM HS Evaluation Module

Manufactured by Mistral Solutions Pvt. LTD. • www.mistralsolutions.com

For more information on AM65x processors, including:

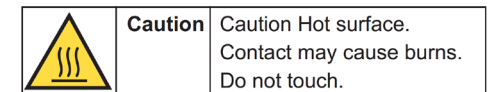
- User Guide
- Software
- How To
- Design Files

Please visit www.ti.com/am65x

For support questions, please contact: support@ti.com or www.ti.com/e2e

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Welcome to the AM65x/DRA80xM High Security (HS) Evaluation Module (EVM) Quick Start Guide. This guide is designed to help you through the initial setup of the board. This EVM allows you to experience secure boot with Linux®, TI-RTOS or other operating systems (OS's) that showcase the AM65x/DRA80xM Quad-Core Cortex®-A53, Dual-Core Cortex-R5F, gigabit PRU-ICSS (real-time industrial communications subsystem), and more. Please note that no software is included with this EVM. You must download the software and User Guide from www.ti.com/mysecuresoftware (access must be given by TI representative). The EVM contains the following:

Hardware

- AM6548/DRA804M Quad Core Cortex®-A53 function equivalent processor
- 1-lane PCIe / USB 3.0 SerDes card
- 4GB DDR4 with ECC
- On board 16 GB eMMC
- On board 512Mb OSPI Flash

Printed Documents

- AM65x/DRA80xM HS EVM Quick Start Guide (this document)

Miscellaneous

- 1 SD card
- 1 USB 2.0 cable
- 1 Ethernet cable

Not included in box

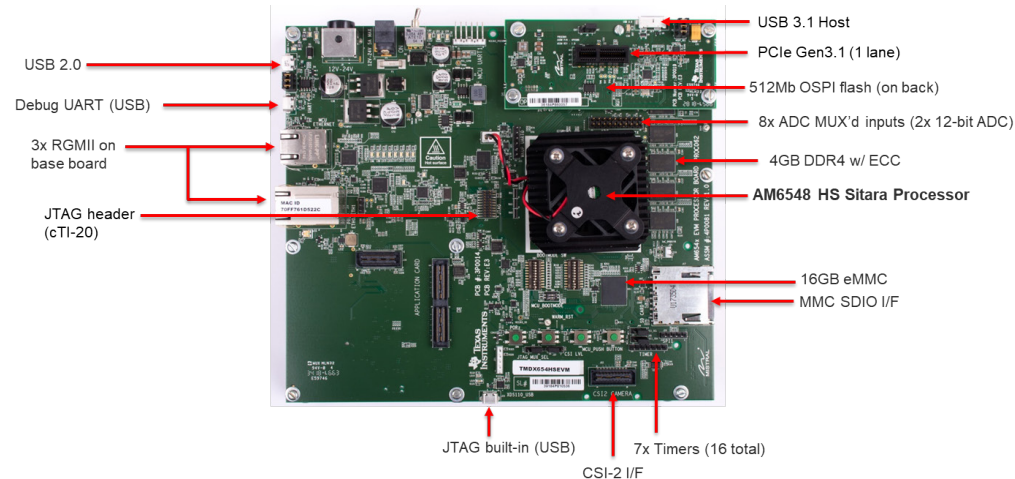
The following hardware is not included in the box and must be procured separately:

1. Power supply. Use one of the following power supply options for powering up the IDK. Pick a power supply with all the applicable regional product regulatory/safety certification requirements such as UL, CSA, VDE, CCC, PSE, etc.

Connector	Specifications	Examples
Power DIN, 4 Pin	+24VDC, 5A Output (Max)	CUI Inc. SDI120-24-U-P51
Barrel Plug, 2.5mm I.D. x 5.5mm O.D. x 9.5mm	+24VDC, positive center, 2.71A Output (Max)	CUI Inc. SDI65-24-UD-P6

The DIN connector power supply is recommended to provide enough power for applications that make use of the PCIe interface.

2. 1280 x 800 LCD Display Accessory Kit. The LCD Kit ships in a separate box (TI part number TMDSLCD1EVM).



Default setup (Linux boot from SD card)

- 1 Optional: If you have purchased the LCD Accessory Kit, assemble the LCD onto the IDK following the instructions included with the LCD Accessory Kit.



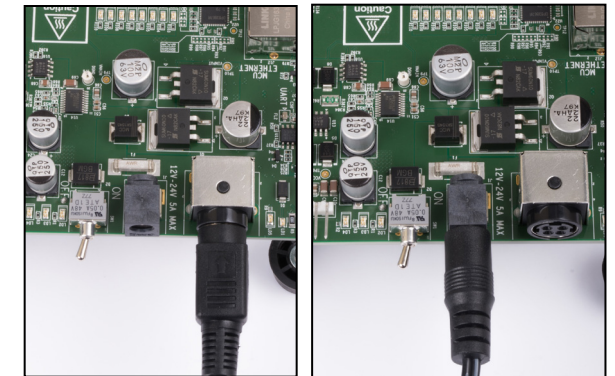
- 2 Connect the supplied USB debug cable to the USB connector labeled "UART" on the board. Connect the other end to your Linux PC.



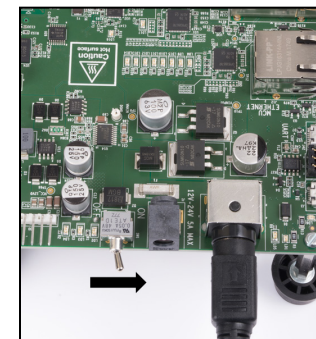
- 3 Prepare a bootable SD card after downloading the software from www.ti.com/mysecuresoftware. Then insert the SD card into the EVM.



- 4 Connect a power supply (not included) to the DIN connector or power jack on the EVM and plug it in to an AC power source. Do not connect both, only one power supply must be connected.



- 5 Turn on the EVM by sliding the toggle switch to the right. To turn off, slide the toggle switch left.



- 6 You are now ready to explore the Linux demos which include various example applications. Click on any icon to start the demo.



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Mailing Address: Texas Instruments, Post Office Box 655303, Dallas, Texas 75265
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