IMAGE INSTALLATION GUIDE

AMOS-825

Linux EVK v3.0.2

1.00-01172017-151200

Revision History

Version	Date	Remarks
1.00	1/12/2017	Initial release

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1. Introduction

This Image Installation Guide explains how to boot the Linux EVK system image on the AMOS-825 system in order to begin evaluating the platform.

The AMOS-825 Linux EVK v3.0.2 is developed based on the NXP fsl-yocto-3.14.28_1.0.0 (Yocto 1.7 Dizzy) and enables the hardware features of the AMOS-825 system.

1.1. Package Contents

The **via-image-gui-imx6qamos825.sdcard** is the SD card image containing a precompiled Open Embedded file system.

1.2. Version Information and Supported Features

- U-Boot version: 2014.04
- Kernel version: 3.14.28
- Evaluation image: OpenEmbedded-core built with Yocto 1.7 Dizzy
- Development based on NXP fsl-yocto-3.14.28_1.0.0 (Yocto 1.7 Dizzy)
- Supports SPI ROM with eMMC or Micro SD boot (default)
- Supports 7" Projective capacitive touch monitor (800 x 480) (through I^2C interface)
- Supports COM as debug port
- Supports 2 FlexCAN TX/RX
- Supports Gigabit Ethernet
- Supports Line-out and Mic-in
- Supports IEEE 802.11b/g/n Wi-Fi Support
- Supports Bluetooth 4.0
    - A2DP and SPP profile
- Supports MAX-7 u-blox 7 GPS/GNSS module
- Supports EMIO-2550 miniPCIe Mobile Broadband module
- Supports Watchdog timer and RTC

2. Image Development

This section explains the setup requirements for booting from a Micro SD card.

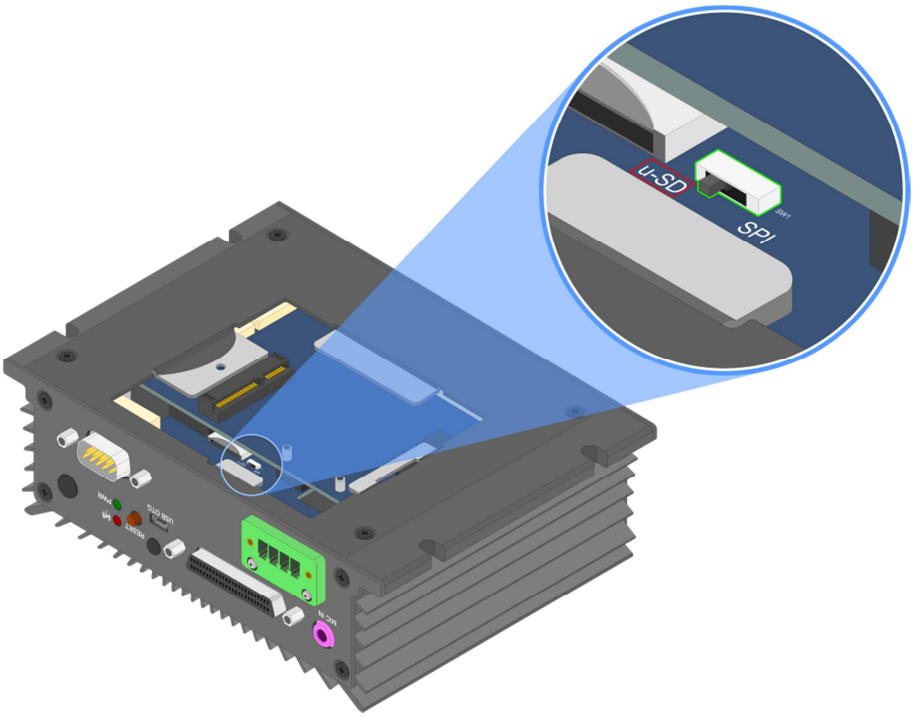
2.1. Booting from a Micro SD Card

The **via-image-gui-imx6qamos825.sdcard** image allows the system to run entirely from the Micro SD card.

The first step is to copy this image onto a Micro SD card. Insert a Micro SD card into your Linux host machine and make sure it is not mounted. Copy the **via-image-gui-imx6qamos825.sdcard** file onto the Micro SD card with the command below, replacing<device name> with the correct value for the card, for example "sdb"**Important:** Make sure you are writing to the correct device or the host system environment could be damaged.

```
$ sudo dd if=via-image-gui-imx6qamos825.sdcard of=/dev/<device name> bs=1M conv=fsync
```

Next, on the AMOS-825, set the boot select switch to the Micro SD position as shown below.



Micro SD / SPI Boot select switch diagram

Insert the prepared Micro SD card into the AMOS-825, connect the touch monitor, and power on the AMOS-825 to initiate the boot process.

When the boot process is completed, you will see the OpenEmbedded desktop.

Taiwan Headquarters

1F, 531 Zhong-zheng Road,
Xindian Dist., New Taipei City 231
Taiwan

Tel: 886-2-2218-5452
Fax: 886-2-2218-9860
Email: embedded@via.com.tw

USA

940 Mission Court
Fremont, CA 94539,
USA

Tel: 1-510-687-4688
Fax: 1-510-687-4654
Email: embedded@viatech.com

Japan

3-15-7 Ebisu MT Bldg. 6F,
Higashi, Shibuya-ku
Tokyo 150-0011
Japan

Tel: 81-3-5466-1637
Fax: 81-3-5466-1638
Email: embedded@viatech.co.jp

China

Tsinghua Science Park Bldg. 7
No. 1 Zongguancun East Road,
Haidian Dist., Beijing, 100084
China

Tel: 86-10-59852288
Fax: 86-10-59852299
Email: embedded@viatech.com.cn

Europe

Email: embedded@via-tech.eu