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Release Notes for Android release 4.03.00.01

Introduction

This release includes the Android graphics drivers for the OMAP35x|AM35x|AM/DM37x|AM389x family of chipsets. The Graphics SDK contains documentation, demo programs and tools.

Important Note:

AM/DM37x has been tested with 2.6.32 kernel. AM389x has been tested with 2.6.37 kernel

Requirements, Pre-requisites and demo instructions

For software setup and pre-requisites and other instructions, refer to the main pages at,

OMAP35x_Graphics_SDK_Getting_Started_Guide

Features in this release

- Support for SGX core revisions 1.2.5 (3730 ES5.0), 1.2.1 (3530 ES3.0), and 1.0.3 (3530 ES2.0)
- Updated IMG DDK version 1.5, that has improved Vector Graphics performance
- Support for AM389x with 2.6.37 Kernel on Gingerbread.

Kernel, Toolchain used for validation

AM35x/37x:

- Tested with Android 2.6.32 kernel Froyo
- · Android toolchain Froyo
- · Android filesystem Froyo

AM389x:

- Tested with Android 2.6.37 kernel Gingerbread
- Android toolchain Gingerbread
- · Android filesystem Gingerbread

What is supported

Khronos API support

- OpenGL ES 1.1
- OpenGL ES 2.0
- OpenVG 1.1 (Using CPU for tessellation)
- EGL
- · Limited 2D acceleration via PVR2D API

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Window Systems

Android Window system is supported.

Extensions

• Refer to eglinfo output (run eglinfo on Android terminal prompt to see the list of extensions supported).

What is not supported

- Power Management features are not fully validated.
- DVI output is not fully validated
- · Rotation features are not validated
- Automatic SGX core version detection, and target side install are not supported due to the limited command set available on Android.

Additional Packages

Benchmarking packages for SGX functionalities and APIs are available at,

• https://gforge.ti.com/gf/project/gleslayer/

Fixed in this Release

• Build system to support different platforms viz. AM35x/37x/389x

Limitations/ Known Issues

• Active Power Management feature is not supported completely.

Installation and Usage

Please look for detailed installation and usage instructions in the Getting Started Guide (Main page), as most of the instructions are similar.

Contents

The folders in the installed package contain binaries for several family of devices containing the SGX530 core. Brief description of these folders is below.

Graphics SDK folder contents

	Folder Name	Description	Used by
-	gfx_rel_es2.x_android	Release binaries for platforms having SGX core revision 1.0.3	(OMAP35x ES version 2.0) How to check?
2	gfx_rel_es3.x_android	Release binaries for platforms having SGX core revision 1.2.1	(OMAP35x ES version 3.1) How to check?
•	gfx_rel_es5.x_android	Release binaries for platforms having SGX core revision 1.2.5	(AM37xx/DM37xx) How to check?
•	gfx_rel_es6.x_android	Release binaries for platforms having SGX core revision 1.2.5	(AM389xx) How to check?
4	GFX_Linux_KM	Source for Graphics Kernel Modules	Contains kernel dependent code, changes depending on Linux kernel used

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5 G	 · ·	Used for building new applications (Available only in the SDK package, not in the BIN package)
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