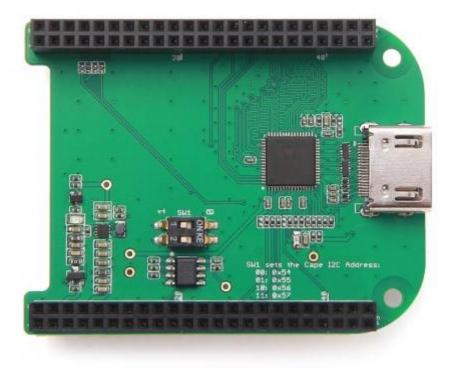
# **BeagleBone Green HDMI Cape**



**BeagleBone Green HDMI Cape** is a general integrated HDMI connector for expanding your BeagleBone to a rich variety of peripherals such as computer monitor, video projector, digital television, or digital audio device. This board features a standard HDMI receptacle that can be connected to a monitor with a standard HDMI-to-HDMI cable. All HD signals are supported, and the output resolution is 1280×720. It also can be used to transmit audio information. This product will make your applications based on BeagleBone board more versatile for different circumstances.

## **Features**

- Plug and play.
- Adapter to different input signal.
- 720P(1280×720) output resolution.

# **Specification**

### specifications

Input voltage	5V/3.3V
Maxium operating current	80 mA

HDMI version	Version 1.2
Maxium Output resolution	1280x720 @60Hz
Audio transmission	Available
Chip	IT66121 HDMI Framer( <u>Datasheet</u> )

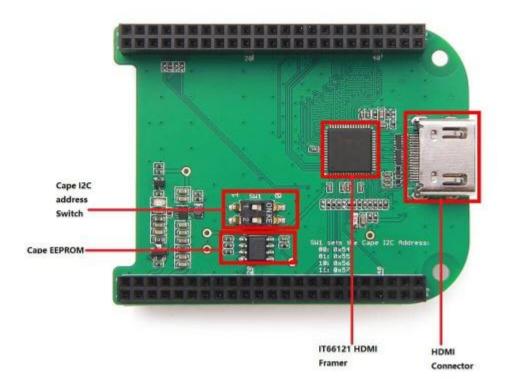
### **Platform supported**

Platform	Supported status
BeagleBone	Supported

# **Application ideas**

You can expand your BeagleBone to more multimedia peripherals such computer monitor, video projector, digital television, or digital audio device.

## **Hardware Overview**



IT66121 HDMI Framer

**HDMI Transmitter** 

Cape I2C address Switch

To switch between different cape address identifier.

Cape EEPROM

EEPROM memory for this cape.

**HDMI** Connector

#### **Parts list**

# Parts name Quantity BeagleBone Green HDMI Cape 1

## **Get started**

### This part will show you how to start with this product with with few steps.

### **Preparations**

- BeagleBone Green board(with OS Installed first) × 1.
- USB cable (type A to micro type B) × 1.
- Standard HDMI cable(type A to type A) × 1.

### **Hardware Connection**



**Note** that we use Windows 7 in this case. After connection work done, plug a computer mouse into USB interface on BeagleBone Green board.

Plug USB cable(type C end) to your PC, you will find that a BeagleBone desktop is shown on your computer monitor.

Then you can use BeagleBone like a PC or a Mac.



### Trouble shooting

1.No BeagleBone desktop operation system is shown on the computer monitor? Try one of following steps:

- Power down the monitor and restart it.
- Press RESET button on BeagleBone Green board.
- Press POWER button on BeagleBone Green board and then press it again.



- 2. The computer mouse does not work(not powered)?
  - Press RESET button on BeagleBone Green board and wait it to launch.
- 3. How disassemble BeagleBone Green HDMI Cape quickly?
  - Pull(with your hand) the end with HDMI receptacle out first, then pull the other end out. Repeat previous two steps again if it is necessary.

## Demo

This video shows how to use BeagleBone Green HDMI Cape to surfing Internet and play audio.

## **Resources**

Schematic files

Note: Please update firmware if your current one doesn't support this BeagleBone Green HDMI Cape.

Download fireware: https://www.dropbox.com/s/v5hsb2my4y4pjrl/hdmi-cape-test-2015-10-26.img.7z?dl=0