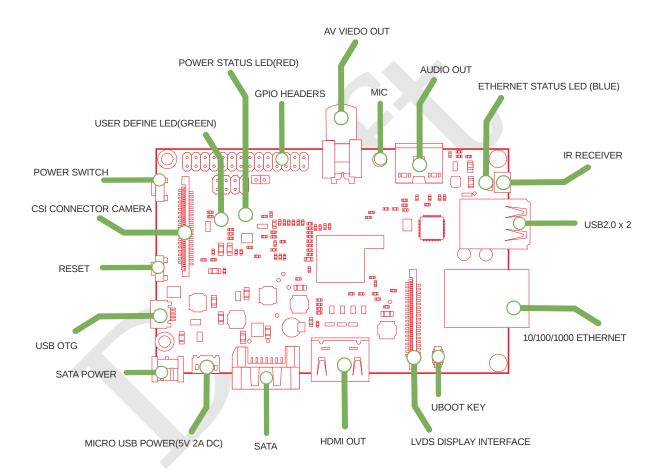
# BPi 123 Using Banana Pi



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Thanks to: Rasperry Pi Community



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# **1** Getting Started



# Getting Started with BPi

Inspired and encouraged by success of Raspberry Pi, Banana Pi is another attemtp to create a small yet powerful computer board. TBC.

Software Build Process

source tar ball
unpack

vi/emacs

Figure 1.1. SoC Computer board

Using Unix dd command to flash Lbunutu image

1. As shown in following log, Lubuntu 14.04 version 3.0 got written into /de-v/sdc.

\_\_\_\_\_ Start of code \_\_\_\_

```
root@bpi01:/pub# dd bs=4M if=/pub/Lubuntu_1404_For_BananaPi_v3_0.img of=/dev/sdc
120+0 records in
120+0 records out
503316480 bytes (503 MB) copied, 45.0463 s, 11.2 MB/s
875+0 records in
875+0 records out
3670016000 bytes (3.7 GB) copied, 373.487 s, 9.8 MB/s
root@bpi01:/pub#
                             End of code
```

2. Use sb tool to test build hello-2.7

```
TJYANG-MBA:~ tjyang\$ sb -
TJYANG-MBA:~ tjyang\$ tail -1 ~/.bashrc
```

3. sbutils -version

tjyang@tj1210:~/gcep\$ which sbutils tjyang@tj1210:~/gcep\$





This work was created with  $X_{\overline{1}}$  Let  $X_{\overline{1}}$  The main text is set in the Google Droid fonts. All typewriter text is typeset in DejaVu Mono. 1.click dash home, search for "language support" 2.click "install/remove language" and add Chinese 3.click dash home, search for "keyboard input method" 4.under "input method", add Chinese input method

#### Software used in creating this book

Pictorial materials are created using like Gimp, Gimp and InkScape. Publishing sofware is and CJK,  $\dot{\mp}$   $\dot{\chi}$  LaTex. The prgamming languages used in this are Go,Bash,Python.

- GNU make http://www.gnu.org/software/make/ GNU Make is used to automate the dependency and sequence of different tools when making this LATEXbook.
- Dia http://dia-installer.de Dia is used to create the network digram used in this book.

```
• Gimp http://www.mikespook.com/learning-go/>
```

- InkScape http://www.mikespook.com/learning-go/>
- xelatex http://www.mikespook.com/learning-go/>
- Go http://www.mikespook.com/learning-go/>
- Bash http://www.mikespook.com/learning-go/>
- Python http://www.mikespook.com/learning-go/>
- Perl http://www.mikespook.com/learning-go/>

## Install T<sub>F</sub>XLive Environment in Ubuntu 12.04

```
for i in \
dia graphiz gimp inkscape gnumeric \
ttf-droid ttf-dejavu ttf-sazanami-gothic \
ttf-arphic-ukai texlive-full \
latex-cjk-xcjk git-core make \
;do
sudo apt-get install $i -y;
done
```

### Install TEXLive Environment in Lbuntu 14.04

texlive-2013 is used in Lbuntu-14.04.

Start of code
for i in \
dia graphiz gimp \
inkscape gnumeric \
ttf-droid ttf-dejavu ttf-sazanami-gothic ttf-arphic-ukai \
texlive-lang-cjk \
texlive-fonts-recommended texlive-extra-utils texlive-xetex
texlive-latex-extra texlive-latex-recommended \
texlive-metapost-doc texlive-metapost latex-cjk-all git-core make lmodern pgf
do
sudo apt-get install -y \$i
done
End of code

# Ubuntu: find Perl package

tjyang@640m:~\\$ apt-cache search perl XML::Simple libxml-simple-perl — Perl module for reading and writing XML libdns-zoneparse-perl — Perl extension for parsing and manipulating DNS Zone Files libgtk2-gladexml-simple-perl — clean object-oriented perl interface to Gk2::GladeXML libtemplate-plugin-xml-perl — XML plugins for the Template Toolkit libtest-xml-simple-perl — Perl testing framework for XML data libxml-libxml-simple-perl — Perl module that uses the XML::LibXML parser for XML structures libxml-simpleobject-enhanced-perl — Perl module which enhances libxml-simpleobject-perl | Objectoriented Perl interface to a parsed XML::Parser tree ruby-xml-simple — Simple Ruby API for reading and writing XML tjyang@640m:~\\$

#### Book creation flowchart

The following people have helped to make this book what it is today.

Prework for graphics materials and TeX files dia/\*.dot dia/\*.dia dot -Tsvg -o \$@ \$ \$< dia -t eps \$< vi/emacs \*.svg \*.eps eps2pdf inkscape -D -e \$@ \$< /gcep/\*.tex \*.png book.bib \*.pdf Make book xelatex /gcep/\*.tex bibtex makeindex book.idx xelatex xelatex book.pdf Legend: graphic Materials Programs Generated files Chapter TeX files

Figure A.1. Book creation flow chart

### Checking out book source

This book is hosted on github.com. Following is the procedure to check out and request a pull request for merging modification from you local git repository.

- · Get github account if not already done so.
- · Initiate a fork from github.com/tjyang/bananapi.

```
tjyang@640m:~$ cat .netrc machine code.google.com login gname@gmail.com password XXXXXXX tjyang@640m:~$
```

· check out your forked bananapi src.

```
______Start of code ______

tjyang@640m:~$ git clone git@github.com:tjyang/bananapi.git

tjyang@640m:~$

End of code _____
```

- · Commit your local changes and push to your github .
- · Send out a pull request.

#### Contributors

The following people have helped to make this book what it is today.

• T.J. Yang <tjyang2001@gmail.com>.

Help with proof reading, checking exercises and text improvements (no particular order and either real name or an alias): *T.J. Yang* 

The following people provided smaller improvements, like nits, typos and other tweaks: *Daniele Pala*.

T.J. Yang

T.J. Yang is interested about small computer like RPi and BPi.

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