

# Installation

## Install Asterisk

### Installation from Sources

The Asterisk source code can be obtained either through FTP/HTTP or SVN.

The Vxi VoiceXML browser was tested with an Asterisk 1.6/1.8/11/12 standard open source code go to:

<http://www.asterisk.org/downloads>

The file downloaded will need to be extracted before compiling. Use the GNU tar application to extract the source code from compressed archive.

This is a simple process that can be achieved through the use of the following commands:

```
# cd /root/src
# tar zxvf asterisk-*.tar.gz
```

Subversion is the best way to keep on the bleeding edge of source releases. If you are wanting to help develop for the Asterisk project, you will want to use SVN to get the most up-to-date source code.

Commands to check out code from our SVN repository:

```
# cd /root/src
# svn checkout http://svn.digium.com/svn/asterisk/trunk asterisk
```

Commands to get the current snapshot from the release branch of SVN:

```
# svn checkout http://svn.digium.com/svn/asterisk/branches/1.8 asterisk-1.8
```

You can check out the source at any level of the file system. This includes something like `svn checkout http://svn.digium.com/svn/asterisk`. However, it would be a bad idea to do so, because you will end up checking out the code for every branch and tag that exists in the asterisk repository. Make sure you are careful when checking out the code!

Asterisk is compiled with gcc through the use of GNU make program. To get started compiling Asterisk, simply run the following commands (replace version with your version of Asterisk).

```
# cd /root/src/asterisk-version
# make clean
# make
# make install
# make samples
```

Run the “make samples” command to install the default configurations files. Installing these files (instead of configuring each manually) will allow you to get your Asterisk system up and running

much faster.

If you are using a system that makes use of /etc/init.d directories, you may wish to run the “make config” command as well.

This will install the startup scripts and configure the system to execute Asterisk automatically at startup.

## Installation from Packages (recommended)

I6NET provides a free and compiled Asterisk installation package. The install package contains a minimal amount of default configuration files to get started, and provides an efficient way to get your Asterisk system up and running.

First, unzip/untar the Asterisk package by using the command:

```
# tar xvzf asterisk_Vx.x.x_date.tar.gz
```

Next, go to the directory of the Asterisk package generated and type the following command:

```
host:~# cd asterisk_Vx.x.x_date
host:~/asterisk_Vx.x.x_date# ./install.sh
--- Asterisk IP/PABX Vx-x-x Installation ---
Creating directories...
Installing asterisk binary...
Installing configuration files...
Installing sounds...
Installing modules...
--- Asterisk IP/PABX Vx-x-x installation has finished ---
host:~/asterisk_Vx.x.x_date#
```

NOTE:

If your Asterisk is already installed or you are installing from sources please check you are using:

- Asterisk 1.6 Vxi 8.X packages
- Asterisk 1.8 Vxi 8.X,10.X packages (stable)
- Asterisk 1.8 Vxi 8.X,10.X packages (stable)
- Asterisk 1.8 Vxi 8.X,10.X packages (stable)

## Install Dahdi (only for TDM boards)

The last Asterisk releases now support Dahdi driver.

If your system use a TDM card, you must install first Dahdi drivers to manage T1/E1 interface. □The Dahdi drivers and tools should be compiled in the server. You need to install a building environment (compiler, binutils and kernel headers). For the Debian distribution, install the packages : linux-headers-`uname -r` , make, gcc.

Example:

```
apt-get install linux-headers-`uname -r`
```

(Packages to be able to compile : binutils, make, gcc)

This Dahdi packages associated to the i6net Asterisk package or in the Asterisk installation directory. You can download the latest Dadhi sources files (from [www.asterisk.org](http://www.asterisk.org) ) (take care with the compatibility with the Asterisk binaries build by i6net):

- dahdi-linux-x.x.x.x.tar.gz
- dahdi-tools-x.x.x.x.tar.gz

Install the Dahdi driver:

```
# tar xvfz dahdi-linux-x.x.x.x.tar.gz
# cd dahdi-linux-x.x.x.x
# make
# make install
```

Results:

```
[...]
#####
###
### DAHDI installed successfully.
### If you have not done so before, install the package
### dahdi-tools.
###
#####
```

Install the Dahdi tools:

```
# tar xvfz dahdi-tools-x.x.x.x.tar.gz
# cd dahdi-tools-x.x.x.x
# ./configure
# make
# make install
# make config
```

Results:

```
[...]
DAHDI has been configured.
```

If you have any Dadhi hardware it is now recommended you edit `/etc/dahdi/modules` in order to load support for only the Dadhi hardware installed in this system. By default, support for all Dadhi hardware is loaded at Dadhi start.

```
I think that the DAHDI hardware you have on your system is:
pci:0000:0b:08.0 wct4xxp- d161:0220 Wildcard TE220 (4th Gen)
```

Configure the Dahdi driver:

Configuration files are not stored in /etc/dahdi:

```
# cd /etc/dahdi
# ls
init.conf modules system.conf
```

Example of system.conf (dual E1 board):

```
#
# Dahdi Configuration File
#

span=1,1,0,ccs,hdb3,crc4
bchan=1-15
dchan=16
bchan=17-31

span=2,1,0,ccs,hdb3,crc4
bchan=32-46
dchan=47
bchan=48-62

#span=3,1,0,ccs,hdb3,crc4
#bchan=63-77
#dchan=78
#bchan=79-93

#span=4,1,0,ccs,hdb3,crc4
#bchan=94-108
#dchan=109
#bchan=110-124

loadzone=es
defaultzone=es
```

You can disable the unused modules by editing the /etc/dahdi/modules and removing or commenting them.

Example of modules (dual E1/T1 board wct4xxp):

```
#
# Dahdi modules
#
wct4xxp
```

Start / Stop Dahdi driver:

The Dahdi tools install a startup script, /etc/init.d/dahdi. You may also use this script to control Dahdi from the Linux command line:

```
# /etc/init.d/dahdi start
# /etc/init.d/dahdi restart
# /etc/init.d/dahdi stop
```

NOTE:

Remember that, the Dahdi module loading is disabled in the I6NET packaged Asterisk version. Disable the noload in the `/etc/asterisk/modules.conf`.

## Install Vxi (Mandatory)

Use root to install Vxi VoiceXML browser for Asterik.

Unzip and untar the openvxi package by using the command:

```
# tar xvzf vxml_VX.X_date.tar.gz
```

Go to the directory of the openvxi and type the following command.

```
# cd vxml_VX.X_date
# ./install.sh
```

NOTE:

To upgrade, you can install over the previous installation. The installation script will keep you configuration, the new configuration file templates will be in the `/etc/asterisk` path with the `.sample` extension.

NOTE:

Vxi is now using new libraries and compiler version, before installing the VoiceXML browser please check your Operating Systems has the a GCC3 o GCC4 libraries environment :

```
Vxi 1.4 is build with GCC3.3 / libstdc++5
Vxi 1.5, 2.X, 3.X, 4.X, 5.X, 6.X are build with GCC4 / libstdc++6
```

From:  
<https://wiki.voximal.com/> - **Voximal documentation**

Permanent link:  
[https://wiki.voximal.com/doku.php?id=vxi\\_installation\\_guide:installation:start](https://wiki.voximal.com/doku.php?id=vxi_installation_guide:installation:start)

Last update: **2017/07/31 16:17**

