

Install Elastix_1.6.0_OpenVox_A400p

1 Log into Elastix webpage

Please open your browser and enter the PBX IP address, then input Username: admin; Password: palosanto, then click on Submit button in the following screen.



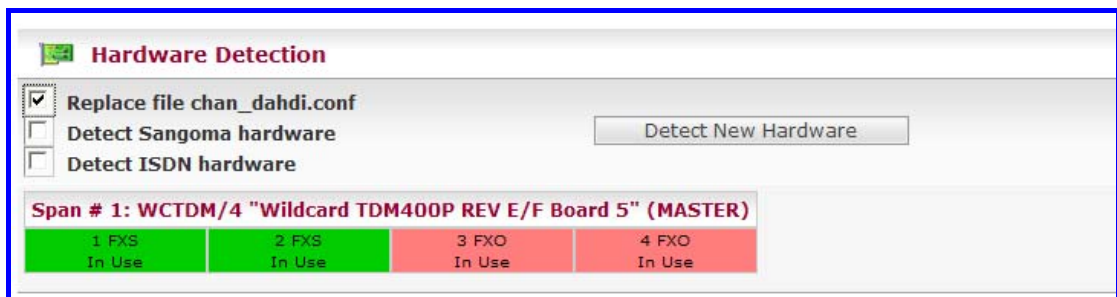
The image shows the Elastix login interface. At the top, there is a red header with the text "» Welcome to Elastix". Below this, a grey box contains the instruction "Please enter your username and password". There are two input fields: "Username:" with the text "admin" and "Password:" with a masked password of ten dots. A "Submit" button is located below the password field. At the bottom of the page, there is a copyright notice: "Copyright © 2006 by [PaloSanto Solutions](#)".

2 Hardware Detection

1) Click on Hardware Detection button in the following illustration.



- 2) Click on “Replace file chan_dahdi.conf” textbox, then click on Detect New Hardware button in the following illustration.



- 3) Please use the following commands:

```
[root@elastix ~]# dahdi_genconf
```

```
[root@elastix ~]# dahdi_cfg -vv
```

- 4) Reboot System.

3 Create Extensions

Add two extensions, then you can plug two phones to FXS, after that the two phones can call each other.

- 1) Click PBX button in the following illustration:

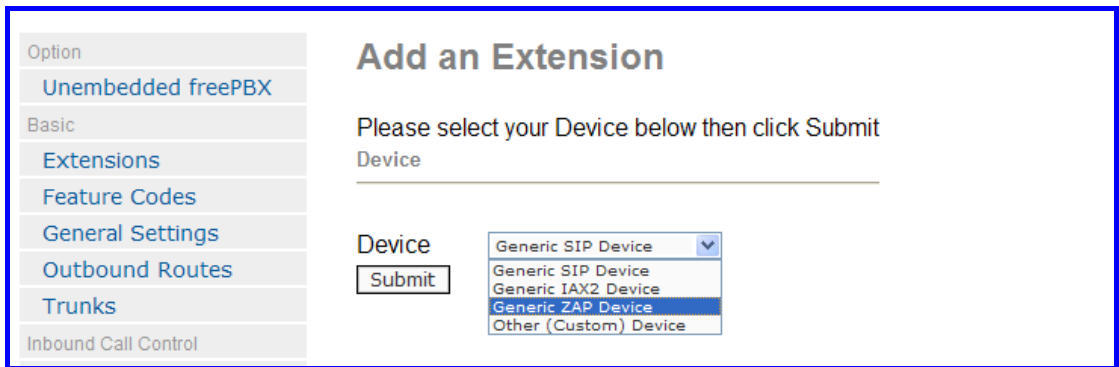


2) Click on Extensions bar in the following illustration:



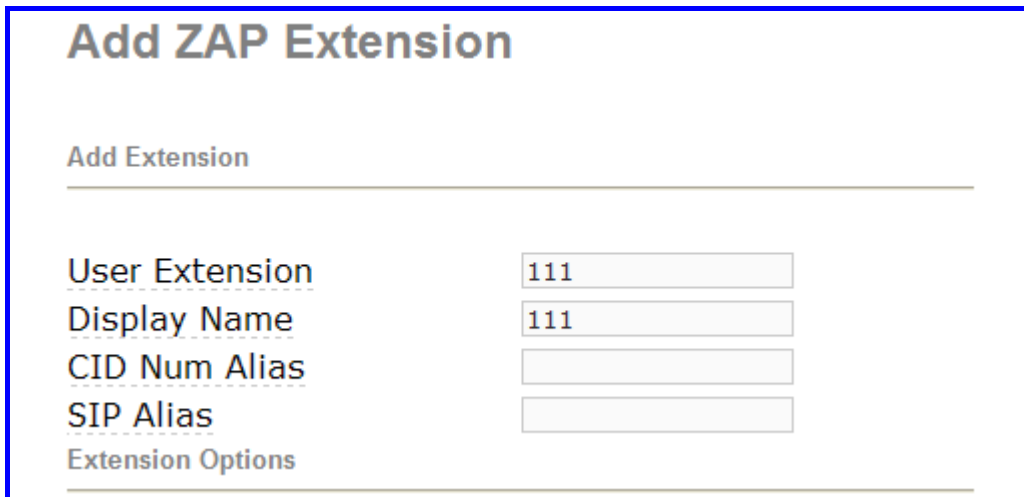
The screenshot shows a web interface titled "Add an Extension". On the left is a sidebar menu with the following items: "Option", "Unembedded freePBX", "Basic", "Extensions" (highlighted in blue), "Feature Codes", "General Settings", "Outbound Routes", and "Trunks". The main content area has the heading "Add an Extension" and the instruction "Please select your Device below then click Submit". Below this is a "Device" label and a dropdown menu currently showing "Generic SIP Device". A "Submit" button is located below the dropdown.

3) From the drop down selection box, select Generic Zap Device since we are going to create zap extension, then click on submit button. Please refer to the following illustration:



This screenshot is similar to the previous one, but the dropdown menu is open, showing a list of device options: "Generic SIP Device", "Generic SIP Device", "Generic IAX2 Device", "Generic ZAP Device" (highlighted in blue), and "Other (Custom) Device". The "Submit" button remains visible below the dropdown.

4) Set up User Extension: 111 (that's the extension number I gave for reception); Display Name: 111 in the following illustration:



The screenshot shows a form titled "Add ZAP Extension". Below the title is a sub-heading "Add Extension" followed by a horizontal line. The form contains several input fields: "User Extension" with the value "111", "Display Name" with the value "111", "CID Num Alias" (empty), and "SIP Alias" (empty). Below these fields is a section labeled "Extension Options" followed by another horizontal line.

- 5) Input a channel number for your extension, please refer to the following illustration.

Device Options

This device uses zap technology. (Via DAHDI compatibility mode)
channel

Dictation Services

- 6) Then click on submit button.

Press 0: Go To Operator

Press 1:

Press 2:

- 7) Click the “Apply Configuration Changes Here” bar in the top of the screen.

Apply Configuration Changes Here

- 8) Please add another extension. From the drop down selection box, select Generic Zap Device since we are going to create zap extension, then click on submit button. Please refer to the following illustration:

Add an Extension

Please select your Device below then click Submit

Device

Device Generic SIP Device ▼

Generic SIP Device

Generic IAX2 Device

Generic ZAP Device

Other (Custom) Device

- 9) set up User Extension: 222; Display Name: 222 in the following illustration:

Add Extension

User Extension

Display Name

CID Num Alias

SIP Alias

Extension Options

- 10) Input a channel number for your extension, please refer to the following illustration:

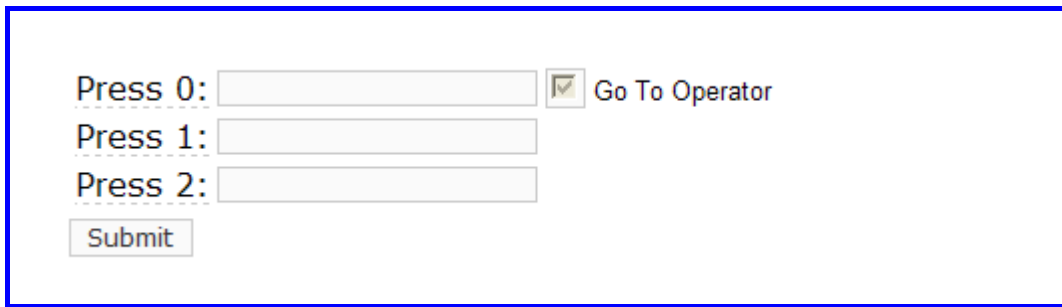
Device Options

This device uses zap technology. (Via DAHDI compatibility mode)

channel

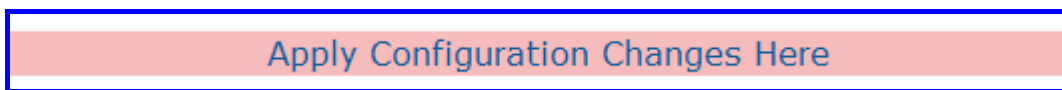
Dictation Services

11) Then click on submit button.



Press 0: Go To Operator
Press 1:
Press 2:

12) Click the “Apply Configuration Changes Here” bar in the top of the screen.

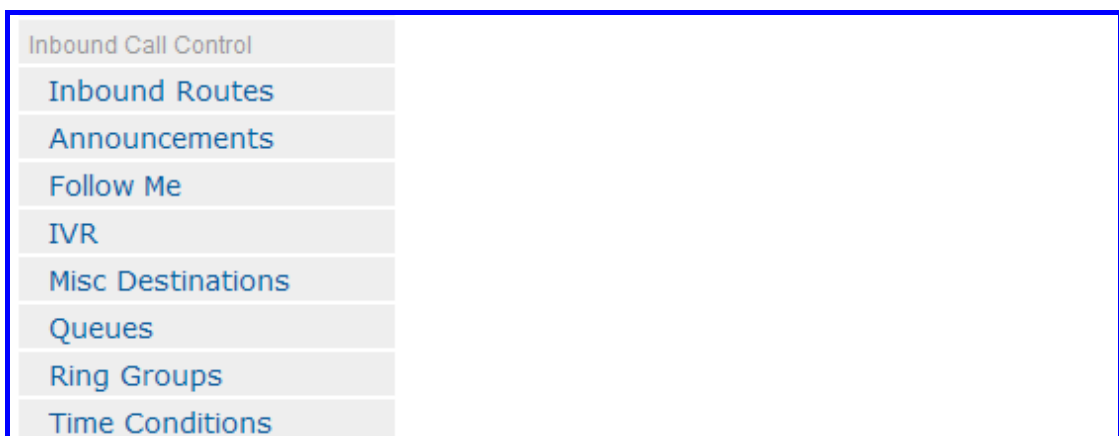


After these, we can dial each other between 111 and 222.

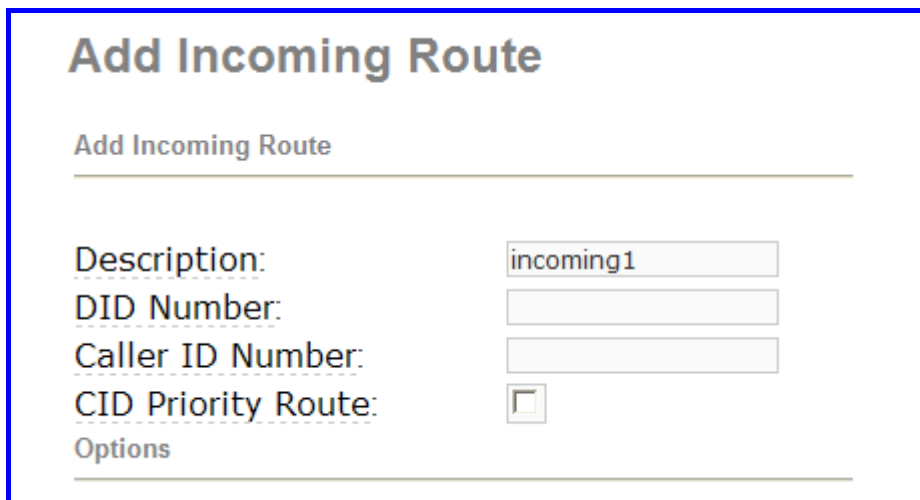
4 Add incoming route

Add an incoming route, it will help you get incoming calls.

1) Click on “Inbound Routes” bar.



2) Input incoming1 in the textbox of Description as the following screen:



Add Incoming Route

Add Incoming Route

Description: incoming1

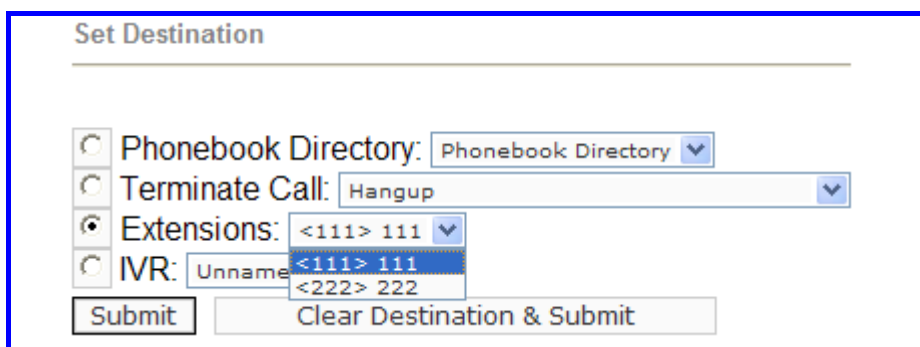
DID Number:

Caller ID Number:

CID Priority Route:

Options

3) Click the Extensions textbox, choose an extension number from the drop down selection box. Then click submit. Please refer to the following illustration:



Set Destination

Phonebook Directory: Phonebook Directory

Terminate Call: Hangup

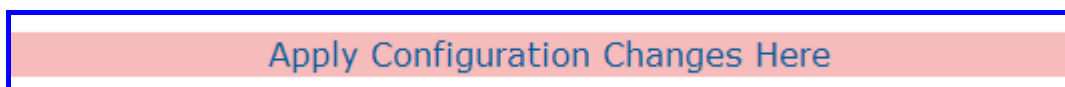
Extensions: <111> 111

IVR: Unname <111> 111

<222> 222

Submit Clear Destination & Submit

4) Click the “Apply Configuration Changes Here” bar in the top of the screen.



Apply Configuration Changes Here

5 Create trunk

To dial out, you have to create trunk.

1) Click on Trunks bar as the following illustration:

Option	<h2>Add a Trunk</h2> <ul style="list-style-type: none">+ Add Zap Trunk (DAHDI compatibility mode)+ Add IAX2 Trunk+ Add SIP Trunk+ Add ENUM Trunk
Unembedded freePBX	
Basic	
Extensions	
Feature Codes	
General Settings	
Outbound Routes	
Trunks	

2) Click on Trunk ZAP/g0 button on the up right corner of the page, please refer to the following illustration:

[Add Trunk](#)
[Trunk ZAP/g0](#)

3) Input trunk1 in the textbox of Outbound Caller ID, please refer to the following illustration:

General Settings

Outbound Caller ID:

Never Override CallerID:

Maximum Channels:

Disable Trunk: Disable

Monitor Trunk Failures: Enable

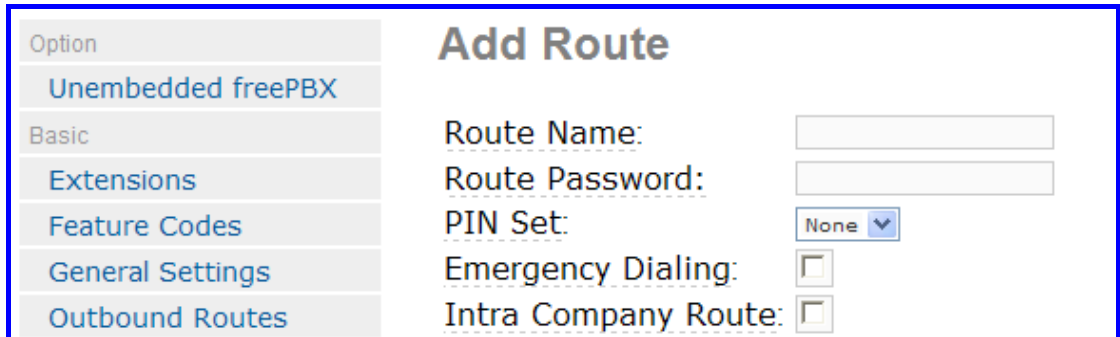
4) Click on Submit Changes button in the following screen:

Zap Identifier (trunk name):

6 set up outbound routes

Through outbound routes, you can dial out.

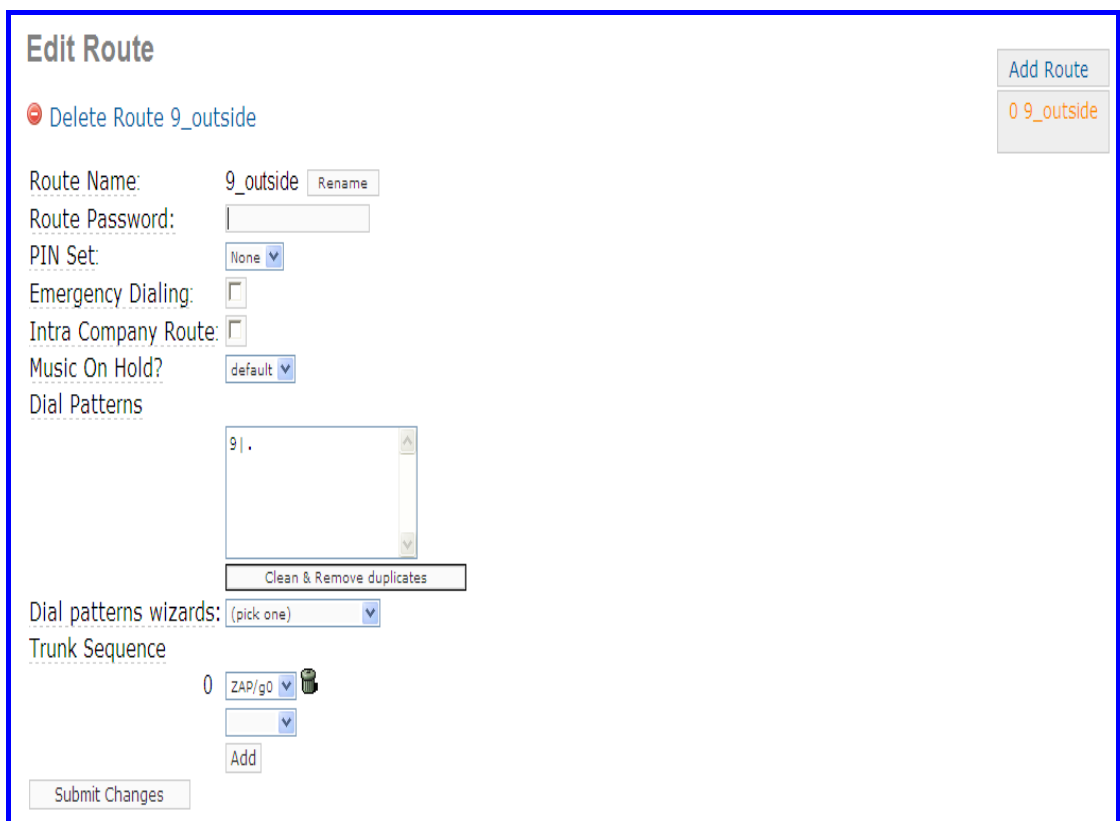
- 1) Please click on the Outbound Routes as the following illustration:



The screenshot shows the 'Add Route' configuration page. On the left is a sidebar menu with options: Option, Unembedded freePBX, Basic, Extensions, Feature Codes, General Settings, and Outbound Routes. The main area contains the following fields:

- Route Name:
- Route Password:
- PIN Set:
- Emergency Dialing:
- Intra Company Route:

- 2) Please click "09_outside button", keep the default parameters in the following screen. Please refer to the following illustration:

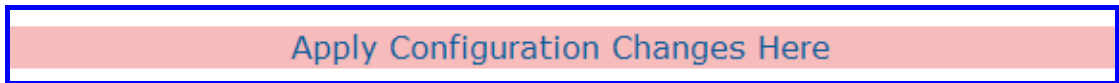


The screenshot shows the 'Edit Route' configuration page for a route named '9_outside'. The page includes a 'Delete Route 9_outside' link and an 'Add Route' button. The configuration fields are:

- Route Name: 9_outside (with a 'Rename' button)
- Route Password:
- PIN Set:
- Emergency Dialing:
- Intra Company Route:
- Music On Hold?:
- Dial Patterns:
- Clean & Remove duplicates:
- Dial patterns wizards: (pick one)
- Trunk Sequence: 0 ZAP/g0
- Add:
- Submit Changes:

Here we use the default Dial Pattern 9|., so we have to add prefix 9, when we dial out.

- 3) Click the “Apply Configuration Changes Here” bar in the top of the screen.



7 Test Environment:

- 1) Elastix 1.6.0
- 2) OpenVox A400p + 2FXS+2FXO

8 References

- 1) [http://www.elastixconnection.com/downloads/elastix without tears.pdf](http://www.elastixconnection.com/downloads/elastix_without_tears.pdf)
- 2) <http://www.voiceip.com.ua/lit/easyAsterisk-manual-eng-v22rc4.pdf>