

Installation of Apache OpenMeetings 4.0.7

on

Fedora 29 final

This tutorial it is bassed on a fresh installation of

Fedora-MATE_Compiz-Live-x86_64-29-1.2.iso

It is tested with positive result. We will use the Apache's binary version OpenMeetings 4.0.7 stable, that is to say we'll suppress his compilation. It is done step by step.

1-1-2019

Starting...

1)

At first place, modify Selinux level security, for the installation, and install nano editor:

dnf install nano

sudo nano /etc/selinux/config

...modify:

SELINUX=enforcing

...to

SELINUX=permissive

Press Ctrl+x and will ask to save, press Y, and Enter, to save and leave nano's editor.

2)

----- Update Operative System ------

Update operative system:

dnf update -y

...and reboot, for kernel changes if it is, and the new Selinux configuration:

reboot

3)

----- ADD Repos

RPM Fusion repo

(Only one line without space between them)

su -c 'dnf install --nogpgcheck http://download1.rpmfusion.org/free/fedora/rpmfusion-free-release-29.noarch.rpm http://download1.rpmfusion.org/nonfree/fedora/rpmfusion-nonfree-release-29.noarch.rpm'

Adobe repo 32 bit ### For Flash Player.

rpm -ivh http://linuxdownload.adobe.com/adobe-release/adobe-release-i386-1.0-1.noarch.rpm

rpm --import /etc/pki/rpm-gpg/RPM-GPG-KEY-adobe-linux

Adobe repo 64 bit ### For Flash Player.

rpm -ivh http://linuxdownload.adobe.com/adobe-release/adobe-release-x86_64-1.0-1.noarch.rpm

rpm --import /etc/pki/rpm-gpg/RPM-GPG-KEY-adobe-linux

Update again:

dnf update -y

------ Installation of packets and libraries ------

We install necessary packets and libraries:

(Only one line with a space between 2^a-3^a and 3^a-4^a)

dnf install -y libjpeg-turbo libjpeg-turbo-devel libjpeg-turbo-utils giflib-devel freetype-devel gccc++ zlib-devel libtool bison bison-devel file-roller ghostscript freetype unzip gcc ncurses make bzip2 wget ghostscript ncurses zlib git make automake nasm pavucontrol alsa-plugins-pulseaudio nmap tomcat-native 'dnf-command(versionlock)' h264enc

5)

----- Installation of OpenJava 8 -----

Java 8, minimum, is needeed to work OpenMeetings 4.0.7. Will install OpenJava 8.

-- Only for Fedora 32 bit --

dnf install java-1.8.0-openjdk.i686 java-1.8.0-openjdk-headless.i686

-- Only for Fedora 64 bit --

dnf install java-1.8.0-openjdk.x86_64 java-1.8.0-openjdk-headless.x86_64

-- Now for both, 32 bit and 64 bit --

dnf install icedtea-web ...to can record and share dektop from rooms.

Maybe you have installed different versions of Java. Please, select the just installed OpenJava 8:

update-alternatives --config java

And to see if the selected version is active:

java -version

6)

----- Installation of LibreOffice ------

LibreOffice it is installed already in the desktop-distro, but especially for server iso:

4)

dnf -y install libreoffice

Is needeed to convert uploaded office files to pdf.

7)

----- Installation of ImageMagick and Sox -----

ImageMagick, work with the images files jpg, png, gif, etc. Install it:

dnf -y install ImageMagick

Sox, work with the audio. Install it:

dnf -y install sox

8)

----- Installation of Adobe Flash Player -----

OpenMeetings even need Adobe Flash Player for cam and audio. We install it:

dnf install -y flash-plugin

9)

----- Compilation of FFmpeg -----

FFmpeg will work the video. Will install a paquets and libraries:

(Only one line with space between both)

dnf install -y glibc alsa-lib-devel gsm gsm-devel imlib2 imlib2-devel libogg libvorbis vorbis-tools theora-tools libvpx-devel mercurial cmake curl git gstreamer1-libav gstreamer1-plugins-ugly

This ffmpeg compilation is based on this url, and updated to 1-1-2019.

https://trac.ffmpeg.org/wiki/CompilationGuide/Centos

I made a script to download, compile and install ffmpeg on Fedora. It is tested and is ok. The result of any recording we do in OpenMeetings will be in mp4 format.

We download this script:

cd /opt

wget https://cwiki.apache.org/confluence/download/attachments/27838216/ffmpeg_fedora29.sh

...concede execution permission:

chmod +x ffmpeg_fedora29.sh

...and run it:

./ffmpeg_fedora29.sh

The compilation will spend about 20-30 minutes.

At the end, a text will apear: FFmpeg Compilation is Finished!

Then, please go to step 10).

All the compiled files will be installed in: /usr/local/bin

10)

----- Installation of MariaDB data server -----

MariaDB is the data server fork of MySQL.

We install it:

dnf install -y mariadb mariadb-server

...and run MariaDB (be connected to Internet, to run it quickly):

systemctl start mariadb.service

Give a password to MariaDB root. Please, replace new-password by your own whish:

mysqladmin -u root password new-password

Make a database for OpenMeetings:

mysql -u root -p

...will ask for the root password you choose just now:

MariaDB [(none)]> CREATE DATABASE open407 DEFAULT CHARACTER SET 'utf8';

Now we create a user with all permision on this open407 database. User password must be of 8 digits minimum:

(Only one line with space between both)

MariaDB [(none)]> GRANT ALL PRIVILEGES ON open407.* TO 'hola'@'localhost' IDENTIFIED BY 'la2B3c4D' WITH GRANT OPTION;

- * open407 name of the database
- * hola user for that database
- * 1a2B3c4D password of that user

You can change the data...but remember it! Later we'll need it.

Now we leave MariaDB:

MariaDB [(none)]> quit

11)

----- Installation of Apache OpenMeetings ------

Make a folder called **red5407** where download the Apache OpenMeetings file, and where we'll do the installation:

mkdir /opt/red5407

cd /opt/red5407

...download and uncompress the file:

wget http://archive.apache.org/dist/openmeetings/4.0.7/bin/apache-openmeetings-4.0.7.zip

unzip apache-openmeetings-4.0.7.zip

...save the original file to /opt:

mv apache-openmeetings-4.0.7.zip /opt

12)

----- Installation connector OpenMeetings with MariaDB ------

This file-driver is need it to connect OpenMeetings with MariaDB. Download and install it:

cd /opt

(Only one line without space between both)

wget http://repo1.maven.org/maven2/mysql/mysql-connector-java/5.1.47/mysql-connector-java-5.1.47.jar

cp mysql-connector-java-5.1.47.jar /opt/red5407/webapps/openmeetings/WEB-INF/lib

13)

----- Script to launch red5-OpenMeetings ------

We'll download the script to run Red5-OpenMeetings:

cd /opt

wget https://cwiki.apache.org/confluence/download/attachments/27838216/red5-2

...copy it to where must be:

cp red5-2 /etc/init.d/

...and concede execution permission:

chmod +x /etc/init.d/red5-2

If you made the installation in any other different path to /opt/red5407, please edit the script and modify the line:

RED5_HOME=/opt/red5407

...to

RED5_HOME=/your-path-installation

14)

----- Run red5-OpenMeetings ------

Run MariaDB:

systemctl start mariadb.service

...and red5-OpenMeetings:

/etc/init.d/red5-2 start

...wait about 40 seconds in order red5 run completly. Then, go with the browser to:

http://localhost:5080/openmeetings/install

...there will show a page similar to this one:

OpenMeetings
 1. Enabling import of PDFs into whiteboard Install GhostScript on the server, you can get more information on <u>http://pages.cs.wisc.edu/~ghost/</u> regarding installation. The instructions for installation can be found there, however on most linux systems you can get it via your favorite package managers (apt-get it).
If you have further questions or need support in installation or hosting:
Community-Support:
Mailing lists
Commercial-Support:
Commercial-Support
< > >> Finish

...press on [>] (bottom), and will show the default database configuration with Derby, but we

employ MySQL (MariaDB):

OpenMeetings
DB configuration
Recommendation for production environment
By default OpenMeetings uses the integrated <u>Apache Derby</u> database. For production environment you should consider using <u>MySQL</u> , <u>PostgreSql</u> , <u>IBM DB2</u> , <u>MSSQL</u> or <u>Oracle</u>
NOTE Please use unpredictable DB login and 'strong' password with length 8 characters or more.
Choose DB type Apache Derby Specify the name of the database openmeetings
Check
< > >> Finish

...then, scroll and Choose DB type to MySQL:

OpenMeetings	
DB configuration	
Recommendation for production environment	
By default OpenMeetings uses the integrated <u>Apache Derby</u> databas using <u>MySQL</u> , <u>PostgreSql</u> , <u>IBM DB2</u> , <u>MSSQL</u> or <u>Oracle</u>	e. For production environment you should consider
NOTE Please use unpredictable DB login and 'strong' password with ler	igth 8 characters or more.
Choose DB type MySQL	
Specify DB host localhost]
Specify DB port 3306	
Specify the name of the database ppenmeetings	j
Specify DB user	
Specify DB password	
	Check
	< >> Finish

Now we must introduce the database name, the user name and his password we did at the step 10:

Specify the	name of the database	= open407
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Specify DB user = hola

Specify DB password = 1a2B3c4D

... if you choose any other data please type it here.

Press **button**, and will go to:

OpenMeetings		
Userdata		
Username		
Userpass		
EMail		
User Time Zone	Europe/Madrid	
Group(Domains)		
Name		
		< > >> Finish

Here, we must introduce a user name for OpenMeetings, and his password. This must have 8 digits minimum, and at least 1 special symbol like: $+(\% \# ! \dots etc.)$

Username	=	a-nameThis user name will have administrator rights.		
Userpass	=	a-passwordfor the previous user		
EMail	=	email-adress of the previous user.		
User Time Zone = country where is this server				
Name	=	example-openmeetingsgroup name to choose		

Press the button and will lead us to a new page (below) where you can select the language for your OpenMeetings server, as well as other options such as the configuration of the mail server being used to send invitations or meetings from OpenMeetings:

OpenMeetings	
Configuration	
Allow self-registering	
Send Email to new registered Users	
New Users need to verify their EMail Default DB objects of all types will be created	
(including Rooms, OAuth2 servers etc.)	
Mail-Referer SMTP-Server	noreply@openmeetings.apache.org
SMTP-Server Port(default Smtp-Server Port is 25)	25
SMTP-Username	
SMTP-Userpass	
Enable TLS in Mail Server Auth	
Set inviter's email address as ReplyTo in email invitations	
Default Language	inglés 🗸
	< >> Finish

A valid example to configure the mail server with Gmail, is as follows: (replace **john@gmail.com** with your real Gmail account)

Mail-Refer	==	john@gmail.com
SMTP-Server	==	smtp.gmail.com
SMTP-Server Port (default Smtp-Server Port is 25)	==	587
SMTP-Username	==	john@gmail.com
SMTP-Userpass	==	password of john@gmail.com
Enable TLS in MailServer Auth	==	turn green the button to activate

To select the language of your OpenMeetings server, please scroll on the line:

Default Language	==	select your language
------------------	----	----------------------

...the rest you can change it as you like.

Now press the button [>] and a new page will appear:

OpenMeetings		
Converters		
Document conversion DPI 0	150	
Document conversion JPEG Quality 0	90	
ImageMagick Path 🚳		Check
FFMPEG Path (1)		Check
SoX Path 🐠		Check
OpenOffice/LibreOffice Path for jodconverter (9)		Check
see also Installation		
		< > >> Finish

Here we'll introduce the respective paths for the image, video, audio and conversion of uploaded files (LibreOffice):

ImageMagick Path	==	/usr/bin	
FFMPEG Path	==	/usr/local/bin	
SOX Path	==	/usr/bin	
OpenOffice/LibreOffice Path for jodconverter		/usr/lib/libreoffice /usr/lib64/libreoffice	(32bits) (64bits)

As you go introducing paths, you can check if they are correct by pressing the button labeled **Check**. If it does not display any error message, that is OK.

Once completed the paths, please click the button \geq and move on to another page that would be to activate the SIP. We will leave it as is, unless you want to activate it knowing what it does:

OpenMeetings		
Crypt Type		
Crypt Class 🔘	org.apache.openmeetings.util.crypt.SCr	
red5SIP Configuration		
Enable SIP 🐠	400	
SIP rooms prefix SIP extensions context	rooms	
		< > >> Finish

Now push the button **Solution** Will show this window:

OpenMeetings	
Please click "Finish" button to start installation!	
	< > >> Finish

Press **Finish** button ...wait a seconds untill the tables are fill in the database. When has concluded, this another page will appear. **Don't** clic on **Enter the Application**. First is need it to restart the server (be connected to Internet):

/etc/init.d/red5-2 restart

OpenMeetings		
Enter the Application		
Database was changed, please restart application to avoid possible issues		
If your Red5-Server runs on a different Port or on a different domain alter the config values of the client		
Mailing list		
http://openmeetings.apache.org/mail-lists.html		
There are some companies that also offer commercial support for Apache OpenMeetings:		
http://openmeetings.apache.org/commercial-support.html		
< > >> Finish		

Now yes, you can clic on **Enter the Application**, or go with your browser to:

http://localhost:5080/openmeetings

...and will take us to the entry of OpenMeetings:

Login	
Username or mail address Password <u>Forgotten your password?</u>	Remember login
	Not a member? Sign in

Introduce the user's name and the password that you have chosen during the installation, push **Sign in** button and...

...Congratulations!

The next time that you like accede to OpenMeetings, would be:

http://localhost:5080/openmeetings

Remember to open in the server, the two following ports:

1935 5080

... in order that it could accede to OpenMeetings from other machines in Lan or from Internet.

15) ------ Configuration of OpenMeetings ------

Once you acced to OpenMeetings, if you would like to do any modification in the configuration, please go to:

Administration \rightarrow Configuration

Home 🗸	Rooms -	Recordings 🗸	Administration -
▽ Welcome			•
2	Hello firstname Timezone Europe/M Unread messages <u>Q</u> Edit your profile	adrid	
Upload new image			
Help and support			

...and following the order of the red arrows:

	ne 👻	Rooms 👻	Recordings - Administra	tion -
50	_ 14 <	≈ 1 2 ↦ ⊧	Search	🗎 🌣 🕂 💥
\$	ID	≎ Key	⇒ Value	Configuration
1		crypt.class.name	org.apache.openmeetings.util.crypt.S CryptImplementation	Type string
2		allow.frontend.register	true	Key path.ffmpeg
3		allow.soap.register	true	Value
4		allow.oauth.register	true	Last update Oct 17, 2017 5:54:57 PM
5		default.group.id	1	Updated by toro
6		mail.smtp.server	localhost	Comment Path To FFMPEG
7		mail.smtp.port	25	
8		mail.smtp.system.email	noreply@openmeetings.apache.org	
9		mail.smtp.user		
10		mail.smtp.pass		
11		mail.smtp.starttls.enabl e	false	
12		mail.smtp.connection.ti meout	30000	
13		mail.smtp.timeout	30000	
14		application.name	OpenMeetings	
15		default.lang.id	8	3
16		document.dpi	150	
17		document.quality	90	-
18		path.imagemagick		
19		path.sox		
20		path.ffmpeg	•	1 2
21		path.office		
22		dashboard.rss.feed1	http://mail-archives.apache.org /mod_mbox/openmeetings- user/?format=atom	
23		dashboard.rss.feed2	http://mail-archives.apache.org /mod_mbox/openmeetings- dev/?format=atom	
24		send.email.at.register	false	
		send.email.with.verficat	false	

And this is all.

If you have some doubt or question, please expose it in Apache OpenMeetings forums:

http://openmeetings.apache.org/mail-lists.html



Thank you.

Alvaro Bustos