Hive installation

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Main steps

- There are many post on the Web indication step to follow in order to install Hive
- For instance this recent and rather complete one:

http://www.bogotobogo.com/Hadoop/BigData_hadoop_Hive_Install_On_Ubuntu_16_04.php

- It is for Linux but works for MacOS too (tested on my MacBook)
- Attention: incomplete indication for configuring hivesite.xml

hive-site.xml

- The crucial steps concern local and HDFS paths
- Here is a snapshot of my configuration that should be clear enough (sometimes you see 'dario' but there you should put you user-name instead)

```
cproperty>
   <name>hive.exec.stagingdir</name>
   <value>.hive-staging</value>
   <description>Directory name that will be created inside table locations in order to support HDFS encryption. This is replaces ${hive$}
  </property>
  cproperty>
   <name>hive.exec.scratchdir</name>
   <value>/tmp/hive/${hive.session.id} resources</value>
   <description>HDFS root scratch dir for Hive jobs which gets created with write all (733) permission. For each connecting user, an HD$
  </property>
  cproperty>
   <name>hive.exec.local.scratchdir</name>
   <value>/tmp/dario</value>
   <description>Local scratch space for Hive jobs</description>
  </property>
  cproperty>
   <name>hive.downloaded.resources.dir
   <value>/tmp/dario_resources</value>
   <description>Temporary local directory for added resources in the remote file system.</description>
  </property>
  cproperty>
```

Of course I had to create directories /tmp/dario and /tmp/dario_resources

Metastore

- In case first attempts to launch Hive you may need to erase the 'metastore_db' directory
- In my installation it is here

/usr/local/apache-hive-2.1.1-bin/bin

- Go inside the 'metastore_db' directory, erase everything (by means of 'sudo rm -rf *')
- Than go back to the /bin directory and erase the metastore ('rmdir metastore_db')
- Attention: do this only in the installation/first launching phase, otherwise you will loose access to your databases!

First test

- Download the u.data file for MovieLens data from the Moodle.
- Execute the following commands, and then you can start execution queries on the u_data table.

```
hive> CREATE TABLE u_data (
    userid INT,
    movieid INT,
    rating INT,
    unixtime STRING)
    ROW FORMAT DELIMITED
    FIELDS TERMINATED BY '\t'
    STORED AS TEXTFILE;

hive>OAD DATA LOCAL INPATH '...your path to u.data.../u.data' OVERWRITE INTO TABLE u data;
```