



2CS702 - Big Data Analytics

Practical 3

Aim: Hadoop Installation and Run Commands

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Steps:

1. Prerequisites

1. Hardware Requirement

* RAM — Min. 8GB, if you have SSD in your system then 4GB RAM would also work.

* CPU — Min. Quad core, with at least 1.80GHz

2. [JRE 1.8](#) — Offline installer for JRE

3. [Java Development Kit — 1.8](#)

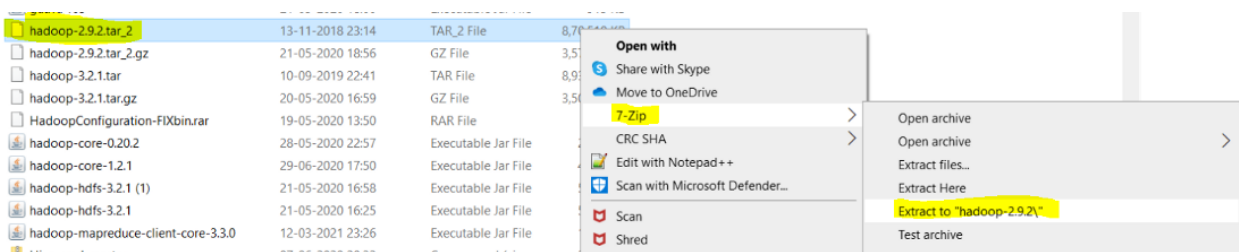
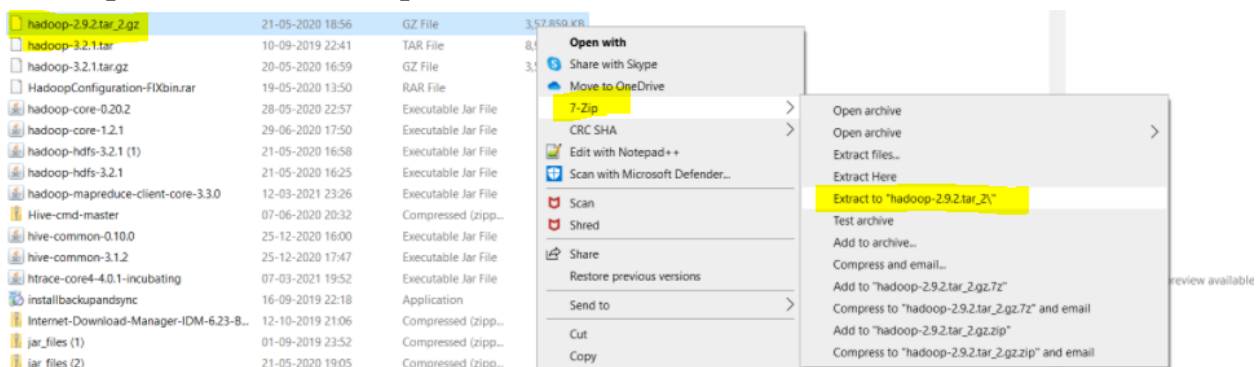
4. A Software for Un-Zipping like [7Zip](#) or [Win Rar](#)

* I will be using a 64-bit windows for the process, please check and download the version supported by your system x86 or x64 for all the software.

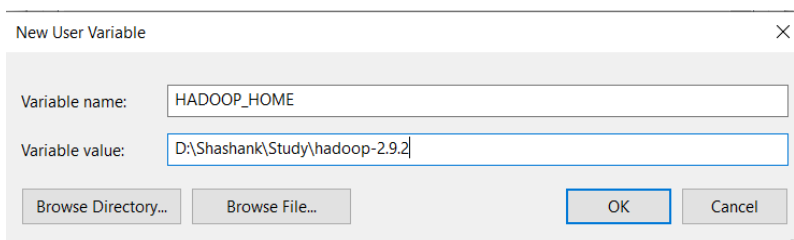
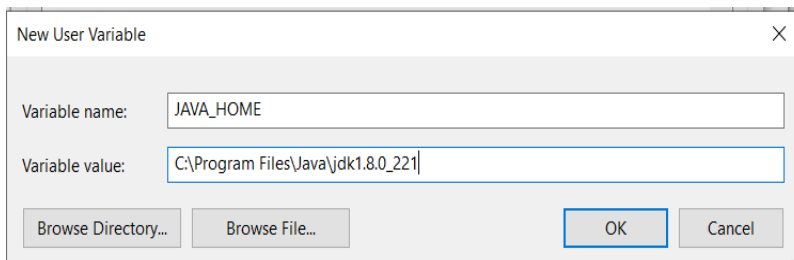
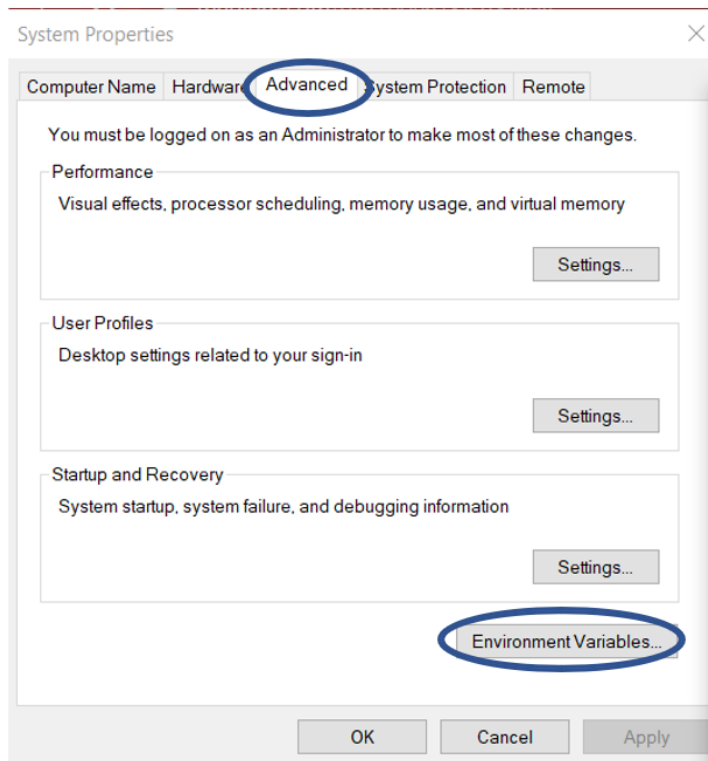
5. [Download Hadoop zip](#)

* I am using Hadoop-2.9.2, you can use any other STABLE version for hadoop.

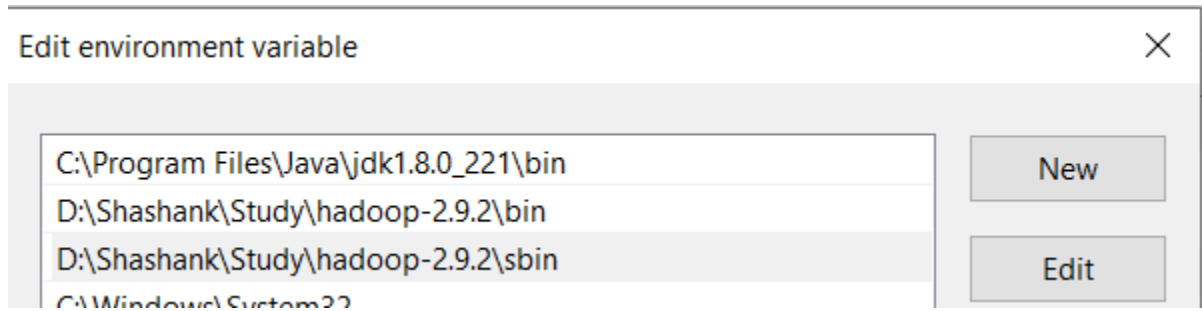
2. Unzip and Install Hadoop



3. Setting Up Environment Variables



Setting path variable:



- Now we need to add these paths to Path Variable one by one:-
 - * %JAVA_HOME%\bin
 - * %HADOOP_HOME%\bin
 - * %HADOOP_HOME%\sbin
- Click OK and OK. & we are done with Setting Environment Variables.

-----**Installation Complete**-----

To check version:

hadoop version

To Run:

Start-all.cmd

Commands:

Create New Directory:

```
C:\Users\Admin>hdfs dfs -ls /user/pg
'C:\Program' is not recognized as an internal or external command,
operable program or batch file.
Found 1 items
drwxr-xr-x    - Admin supergroup          0 2022-09-15 14:22 /user/pg/dir1
```

Upload:

```
C:\Users\Admin\Desktop>hdfs dfs -put C:\Users\Admin\Desktop\File.txt /user/pg/dir1
'C:\Program' is not recognized as an internal or external command,
operable program or batch file.
```

LS:

```
C:\Users\Admin\Desktop>hdfs dfs -ls /user/pg/dir1
'C:\Program' is not recognized as an internal or external command,
operable program or batch file.
Found 1 items
-rw-r--r--    1 Admin supergroup          0 2022-09-15 14:39 /user/pg/dir1/File.txt
```

Download:

```
C:\Users\Admin\Desktop>hdfs dfs -get /user/pg/dir1/File.txt C:\Users\Admin\Desktop\
'C:\Program' is not recognized as an internal or external command,
operable program or batch file.
```

Delete File:

```
C:\Users\Admin\Desktop>hdfs dfs -rm /user/pg/dir1/File.txt
'C:\Program' is not recognized as an internal or external command,
operable program or batch file.
Deleted /user/pg/dir1/File.txt
```

Display Content:

```
C:\Users\Admin\Desktop>hdfs dfs -cat /user/pg/dir1/File.txt
'C:\Program' is not recognized as an internal or external command,
operable program or batch file.
2022-09-15 14:53:50,987 INFO sasl.SaslDataTransferClient: SASL encryption trust check: localHostTrusted = false, remoteH
ostTrusted = false
Hello World!
C:\Users\Admin\Desktop>
```