

EXP NO: 4

CREATE UDF IN PIG

\$start-all.sh

```

(hadoop@kali)~$ start-all.sh
WARNING: Attempting to start all Apache Hadoop daemons as hadoop in 10 seconds.
WARNING: This is not a recommended production deployment configuration.
WARNING: Use CTRL-C to abort.
Starting namenodes on [localhost]
Starting datanodes
Starting secondary namenodes [kali]
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
2024-09-11 04:59:16,429 WARN util.NativeCodeLoader: Unable to load native-hadoop library for your platform... using builtin-java classes where applicable
Starting resourcemanager
Starting nodemanagers

```

\$ jps

```

(hadoop@kali)~$ jps
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
14436 NodeManager
16772 Jps
13830 SecondaryNameNode
14311 ResourceManager
13597 DataNode
13471 NameNode

```

\$wget <https://dlcdn.apache.org/pig/pig-0.16.0/pig-0.16.0.tar.gz>

\$ tar xvfz pig-0.16.0.tar.gz

```

kali-linux-2023.4-vmware-amd64 - VMware Workstation 17 Player (Non-commercial use only)
Player
(hadoop@kali)~$ wget https://dlcdn.apache.org/pig/pig-0.16.0/pig-0.16.0.tar.gz
--2024-08-29 10:55:35-- https://dlcdn.apache.org/pig/pig-0.16.0/pig-0.16.0.tar.gz
Resolving dlcdn.apache.org (dlcdn.apache.org) ... 206.144.2.244, 151.101.2.132
Connecting to dlcdn.apache.org (dlcdn.apache.org)|206.144.2.244|:443... Connected.
HTTP request sent, awaiting response... 200 OK
Length: 177279333 (169M) [application/x-gzip]
Saving to: 'pig-0.16.0.tar.gz'

pig-0.16.0.tar.gz 100%[====>] 169.07M 26.5MB/s in 6.5s

2024-08-29 10:55:41 (26.0 MB/s) - 'pig-0.16.0.tar.gz' saved [177279333/177279333]

(hadoop@kali)~$ tar xvfz pig-0.16.0.tar.gz
pig-0.16.0/
pig-0.16.0/bin/
pig-0.16.0/conf/
pig-0.16.0/contrib/
pig-0.16.0/contrib/piggybank/
pig-0.16.0/contrib/piggybank/java/
pig-0.16.0/contrib/piggybank/java/build/
pig-0.16.0/contrib/piggybank/java/build/classes/
pig-0.16.0/contrib/piggybank/java/build/classes/org/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/datetime/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/datetime/convert/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/datetime/diff/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/datetime/truncate/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/decode/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/math/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/stats/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/string/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/util/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/util/apachelogarser/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/evaluation/rank/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/storage/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/storage/allloader/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/storage/apache/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/storage/avro/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/storage/hive/
pig-0.16.0/contrib/piggybank/java/build/classes/org/apache/pig/piggybank/storage/partition/
pig-0.16.0/contrib/piggybank/java/build/docs/
pig-0.16.0/contrib/piggybank/java/build/docs/api/
pig-0.16.0/contrib/piggybank/java/build/test/
pig-0.16.0/contrib/piggybank/java/build/test/classes/
pig-0.16.0/contrib/piggybank/java/lib/
pig-0.16.0/contrib/piggybank/java/src/

```

\$nano ~/.bashrc

```

#PIG settings
export PIG_HOME=/home/hadoop/pig
export PATH=$PATH:$PIG_HOME/bin
export PIG_CLASSPATH=$PIG_HOME/conf:$HADOOP_HOME/etc/hadoop/
export PIG_CONF_DIR=$PIG_HOME/conf
#export JAVA_HOME=/usr/lib/jvm/java-8-openjdk-amd64
export PIG_CLASSPATH=$PIG_CONF_DIR:$PATH
#PIG setting ends

```

210701117

\$mv pig-0.16.0 pig \$pig

```
kali-linux-2023.4-vmware-and64 - VMware Workstation 17 Player (Non-commercial use only)
Player | 1 2 3 4 | 10:59
File Actions Edit View Help
pig-0.16.0/tutorial/src/org/apache/pig/tutorial/TutorialUtil.java
pig-0.16.0/bin/pig
pig-0.16.0/bin/pig.cmd
pig-0.16.0/bin/pig.py

[hadoop@kali:~]$ mv pig-0.16.0 pig
Active JRE(s)
JRE
Name ~/.bashrc
Pickup up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
51824 ResourceManager
54516 SecondaryNode
53138 NodeManager
64993 DataNode
54267 NameNode

[hadoop@kali:~]$ pig
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
2024-08-29 18:58:45.222 [main] INFO org.apache.pig.ExecTypeProvider: Trying ExecType: LOCAL
2024-08-29 18:58:45.226 [main] INFO org.apache.pig.ExecTypeProvider: Trying ExecType: MAPREDUCE
2024-08-29 18:58:45.227 [main] INFO org.apache.pig.ExecTypeProvider: Picked MAPREDUCE as the ExecType
2024-08-29 18:58:45.477 [main] INFO org.apache.pig.Main - Apache Pig version 0.16.0 (r1746530) compiled Jun 01 2016, 23:18:49
2024-08-29 18:58:45.551 [main] INFO org.apache.pig.impl.util.Utils - Default bootstrap file /home/hadoop/pig/bootstrap not found
2024-08-29 18:58:45.687 [main] WARN org.apache.hadoop.util.NativeCodeLoader - Unable to load native-hadoop library for your platform... using builtin-java classes where applicable
2024-08-29 18:58:46.022 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - mappedjob.tracker is deprecated. Instead, use MapReduce.jobtracker.address
2024-08-29 18:58:46.721 [main] INFO org.apache.pig.backend.hadoop.executionengine.MXExecutionEngine - Connecting to hadoop file system at: hdfs://localhost:9000
2024-08-29 18:58:46.972 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-29 18:58:46.973 [main] INFO org.apache.pig.PigServer - Pig Script ID for the session: PIG-default-5c28e2d3-2350-475a-a30b-cdb2a2f4bfcc
2024-08-29 18:58:46.979 [main] WARN org.apache.pig.builtin.BuiltinService - AHS is disabled since yarn.timeline-service.enabled set to false
grunt> quit
2024-08-29 18:59:00.426 [main] INFO org.apache.pig.Main - Pig script completed in 15 seconds and 392 milliseconds (15392 ms)
```

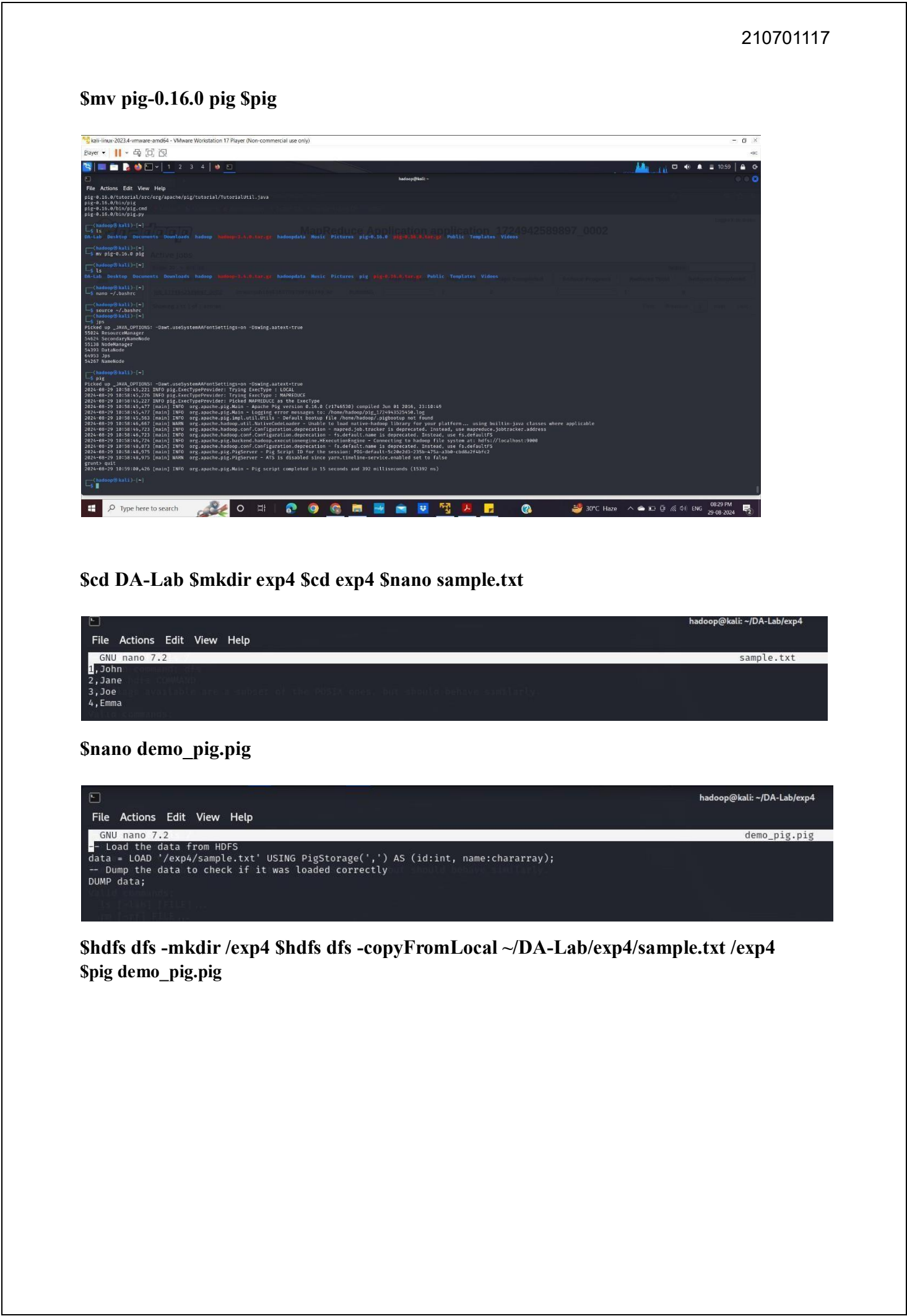
\$cd DA-Lab \$mkdir exp4 \$cd exp4 \$nano sample.txt

```
hadoop@kali: ~/DA-Lab/exp4
File Actions Edit View Help
GNU nano 7.2 sample.txt
1, John
2, Jane
3, Joe
4, Emma
```

\$nano demo_pig.pig

```
hadoop@kali: ~/DA-Lab/exp4
File Actions Edit View Help
GNU nano 7.2 demo_pig.pig
-- Load the data from HDFS
data = LOAD '/exp4/sample.txt' USING PigStorage(',') AS (id:int, name:chararray);
-- Dump the data to check if it was loaded correctly
DUMP data;
```

\$hdfs dfs -mkdir /exp4 \$hdfs dfs -copyFromLocal ~/DA-Lab/exp4/sample.txt /exp4 \$pig demo_pig.pig

[illegible]

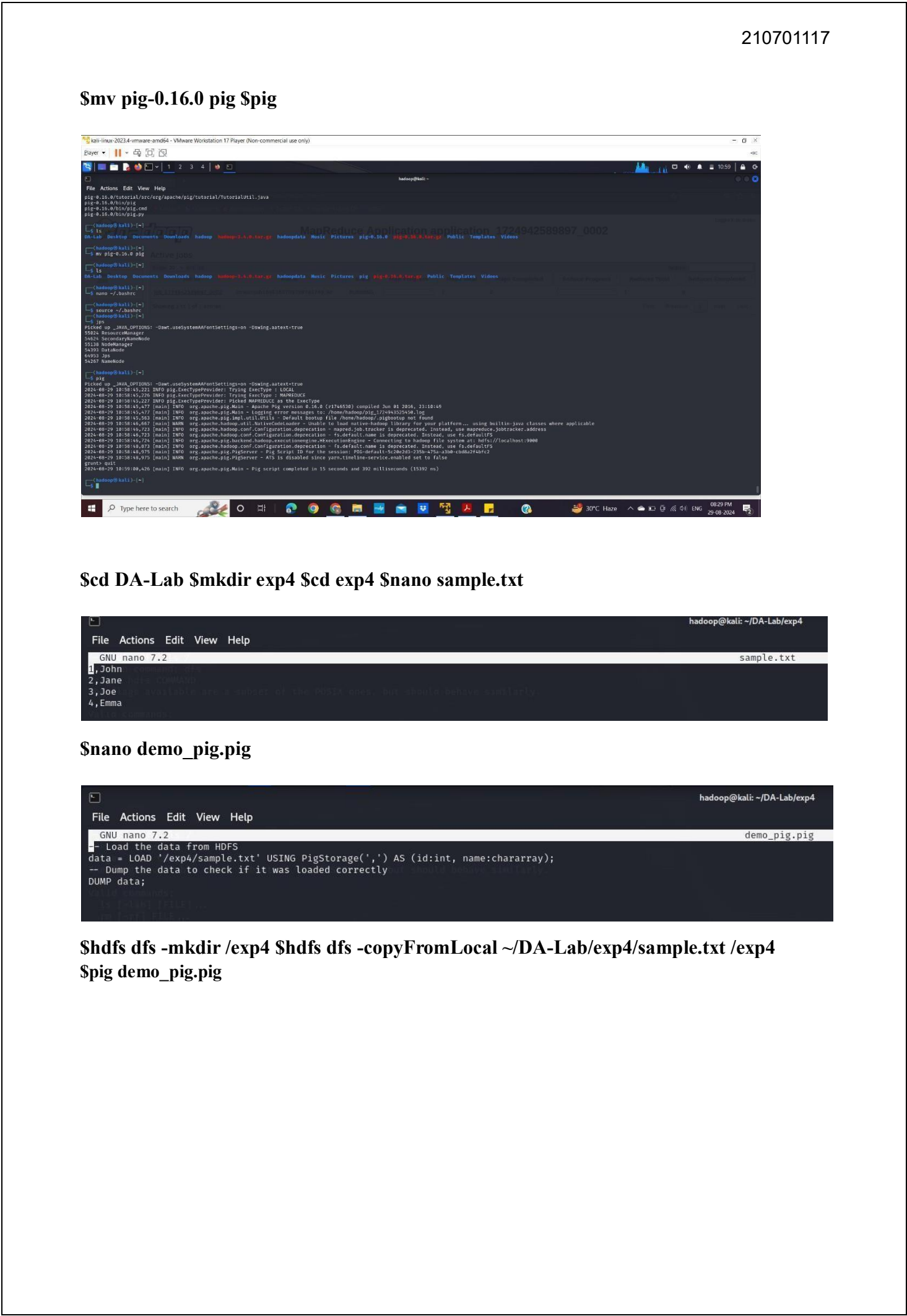
210701117

\$mv pig-0.16.0 pig \$pig

\$cd DA-Lab \$mkdir exp4 \$cd exp4 \$nano sample.txt

\$nano demo_pig.pig

\$hdfs dfs -mkdir /exp4 \$hdfs dfs -copyFromLocal ~/DA-Lab/exp4/sample.txt /exp4 \$pig demo_pig.pig



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\$mv pig-0.16.0 pig \$pig

```

hadoop@kali: ~
File Actions Edit View Help
pig 0.16.0/tutorial/src/org/apache/pig/tutorial/TutorialUtil.java
pig 0.16.0/bin/pig
pig 0.16.0/bin/pig.cmd
pig 0.16.0/bin/pig.py

hadoop@kali: ~
$ mv pig-0.16.0 pig
Active JRE:
$ java -version
java version "1.8.0_202"
Java(TM) SE Runtime Environment (build 1.8.0_202-b08)
Java HotSpot(TM) 64-Bit Server VM (build 25.202-b08, mixed mode)

hadoop@kali: ~
$ pig
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
5824 ResourceManager
5824 SecondaryNode
5824 NodeManager
5824 DataNode
5824 JMX
5824 NameNode

hadoop@kali: ~
$ pig
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
2024-08-29 18:58:45.222 INFO pig.ExecTypeProvider: Trying ExecType: LOCAL
2024-08-29 18:58:45.226 INFO pig.ExecTypeProvider: Trying ExecType: MAPREDUCE
2024-08-29 18:58:45.227 INFO pig.ExecTypeProvider: Picked MAPREDUCE as the ExecType
2024-08-29 18:58:45.477 [main] INFO org.apache.pig.Main - Apache Pig version 0.16.0 (r1746530) compiled Jun 01 2016, 23:18:49
2024-08-29 18:58:45.561 [main] INFO org.apache.pig.impl.util - Default bootstrap file /home/hadoop/pig/bootstrap not found
2024-08-29 18:58:45.667 [main] WARN org.apache.hadoop.util.NativeCodeLoader - Unable to load native-hadoop library for your platform... using builtin-java classes where applicable
2024-08-29 18:58:46.722 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-29 18:58:46.726 [main] INFO org.apache.pig.backend.hadoop.executionengine.MExecutionEngine - Connecting to hadoop file system at: hdfs://localhost:9000
2024-08-29 18:58:46.872 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-29 18:58:46.975 [main] INFO org.apache.pig.PigServer - Pig Script ID for the session: PIG-default-5c28e2d3-2350-475a-a30b-cdb2a274bfc2
2024-08-29 18:58:46.975 [main] WARN org.apache.pig.PigServer - ATS is disabled since yarn.timeline-service.enabled set to false
gruntp> quit
2024-08-29 18:59:00.426 [main] INFO org.apache.pig.Main - Pig script completed in 15 seconds and 392 milliseconds (15392 ms)

hadoop@kali: ~

```

\$cd DA-Lab \$mkdir exp4 \$cd exp4 \$nano sample.txt

```

hadoop@kali: ~/DA-Lab/exp4
File Actions Edit View Help
GNU nano 7.2 sample.txt
1, John
2, Jane
3, Joe
4, Emma

```

\$nano demo_pig.pig

```

hadoop@kali: ~/DA-Lab/exp4
File Actions Edit View Help
GNU nano 7.2 demo_pig.pig
-- Load the data from HDFS
data = LOAD '/exp4/sample.txt' USING PigStorage(',') AS (id:int, name:chararray);
-- Dump the data to check if it was loaded correctly
DUMP data;

```

\$hdfs dfs -mkdir /exp4 \$hdfs dfs -copyFromLocal ~/DA-Lab/exp4/sample.txt /exp4 \$pig demo_pig.pig

\$hdfs dfs -copyFromLocal ~/DA-Lab/exp4/uppercase_udf.py /exp4

```
(hadoop@kali)-[~/hadoop/bin]
$ ./hdfs dfs -ls /exp4
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
2024-09-21 00:26:01,736 WARN util.NativeCodeLoader: Unable to load native-hadoop library for your platform...
Found 3 items
drwxr-xr-x   - hadoop supergroup          0 2024-08-30 05:07 /exp4/output
-rw-r--r--   1 hadoop supergroup        27 2024-08-30 04:43 /exp4/sample.txt
-rw-r--r--   1 hadoop supergroup       172 2024-08-30 05:02 /exp4/uppercase_udf.py
```

\$nano udf_example.pig

```
GNU nano 7.2 udf_example.pig
-- Register the Python UDF script
REGISTER 'hdfs:///exp4/uppercase_udf.py' USING jython AS udf;
-- Load some data
data = LOAD 'hdfs:///exp4/sample.txt' AS (text:chararray);
-- Use the Python UDF
uppercased_data = FOREACH data GENERATE udf.uppercase(text) AS uppercase_text;
-- Store the result
STORE uppercased_data INTO 'hdfs:///exp4/output';
```

\$pig -f udf_example.pig

```
kali-linux-2023.4-vmware-amd64 - VMware Workstation 17 Player (Non-commercial use only)
hadoop@kali: ~/DA-Lab/exp4
File Actions Edit View Help
GNU nano 7.2 udf_example.pig
-- Register the Python UDF script
REGISTER 'hdfs:///exp4/uppercase_udf.py' USING jython AS udf;
-- Load some data
data = LOAD 'hdfs:///exp4/sample.txt' AS (text:chararray);
-- Use the Python UDF
uppercased_data = FOREACH data GENERATE udf.uppercase(text) AS uppercase_text;
-- Store the result
STORE uppercased_data INTO 'hdfs:///exp4/output';

$ pig -f udf_example.pig
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
2024-08-30 05:06:18,591 INFO pig.ExecTypeProvider: Trying ExecType : LOCAL
2024-08-30 05:06:18,601 INFO pig.ExecTypeProvider: Trying ExecType : MAPREDUCE
2024-08-30 05:06:18,601 INFO pig.ExecTypeProvider: Picked MAPREDUCE as the ExecType
2024-08-30 05:06:18,636 [main] INFO org.apache.pig.Main - Apache Pig version 0.16.0 (r174538) compiled Jun 01 2016, 23:10:49
2024-08-30 05:06:18,636 [main] INFO org.apache.pig.Main - Logging error messages to: /home/hadoop/.hadoop/pig/37360877818.log
2024-08-30 05:06:19,685 [main] WARN org.apache.hadoop.util.NativeCodeLoader - Unable to load native-hadoop library for your platform... using builtin-java classes where applicable
2024-08-30 05:06:19,727 [main] INFO org.apache.pig.impl.util.Utils - default bootstrap file /home/hadoop/.pigbootstrap not found
2024-08-30 05:06:20,382 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - mapred.job.tracker is deprecated. Instead, use mapreduce.jobtracker.address
2024-08-30 05:06:20,383 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-30 05:06:20,383 [main] INFO org.apache.pig.backend.hadoop.executionengine.HExecutionEngine - Connecting to hadoop file system at: hdfs://localhost:9000
2024-08-30 05:06:22,438 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-30 05:06:22,513 [main] INFO org.apache.pig.PigServer - Pig Script ID for the session: PIG-UDF-example.pig-1606c3c3-47d3-a9e0-5010308038a1
2024-08-30 05:06:22,513 [main] WARN org.apache.pig.PigServer - ATS is disabled since yarn.timeline-service.enabled set to false
2024-08-30 05:06:22,725 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-30 05:06:24,008 [main] INFO org.apache.pig.scripting.jython.JythonScriptEngine - created tmp python.cachedir/tmp/pig_jython.378182603894475167
2024-08-30 05:06:37,044 [main] INFO org.apache.pig.scripting.jython.JythonScriptEngine - Register scripting UDF: udf_uppercase
2024-08-30 05:06:37,786 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-30 05:06:37,867 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-30 05:06:38,447 [main] INFO org.apache.pig.scripting.jython.JythonFunction - No schema defined for function uppercase - in /tmp/pig378182603894475167/uppercase_udf.py
2024-08-30 05:06:38,583 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-30 05:06:38,743 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - mapred.textoutputformat.separator is deprecated. Instead, use mapreduce.output.textoutputformat.separator
2024-08-30 05:06:38,830 [main] INFO org.apache.pig.tools.pigstats.PigFeatures - Pig features used in the script: UNKNOWN
2024-08-30 05:06:38,958 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
2024-08-30 05:06:39,902 [main] INFO org.apache.pig.data.SchemaTupleBackend - Key [pig.cdmastuple] was not set... will not generate code.
2024-08-30 05:06:39,132 [main] INFO org.apache.pig.mapplan.logical.optimizer.LogicalPlanOptimizer - [RULES_ENABLED:AndForEach, ColumnMapKeyPrune, ConstantCalculator, GroupByConstParallelSetter, LimitOptimizer, LoadTypeCastInserter, M
orgOptimizer, MergeOptimizer, PartitionOptimizer, ProductPushdownOptimizer, PushdownForEachFilter, PushdownFilter, SplitFilter, StreamTypeCastInserter]]
2024-08-30 05:06:39,463 [main] INFO org.apache.pig.impl.util.SpillableMemoryManager - Selected heap (PS Old Gen) of size 69913840 to monitor. collectionAgeThreshold = 489396640, usageThreshold = 489396640
2024-08-30 05:06:39,684 [main] INFO org.apache.pig.backend.hadoop.executionengine.mapreduceLayer.MRCompiler - File concatenation threshold: 188 optimistict? false
2024-08-30 05:06:39,858 [main] INFO org.apache.pig.backend.hadoop.executionengine.mapreduceLayer.MultiQueryOptimizer - MR plan size before optimization: 1
2024-08-30 05:06:39,859 [main] INFO org.apache.pig.backend.hadoop.executionengine.mapreduceLayer.MultiQueryOptimizer - MR plan size after optimization: 1
2024-08-30 05:06:39,994 [main] INFO org.apache.hadoop.conf.Configuration.deprecation - fs.default.name is deprecated. Instead, use fs.defaultFS
```

```

kali: linux-2023.4-vmware-amd64 - VMware Workstation 17 Player (Non-commercial use only)
Player
File Actions Edit View Help
2024-09-20 05:18:12,720 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 4 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:13,731 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 5 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:14,733 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 6 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:15,735 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 7 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:16,738 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 8 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:17,740 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 9 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:17,859 [main] INFO org.apache.hadoop.mapred.ClientServiceDelegate - Application state is completed. FinalApplicationStatus=SUCCEEDED. Redirecting to job history server
2024-09-20 05:18:18,862 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 0 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:19,864 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 1 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:20,866 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 2 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:21,868 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 3 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:22,871 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 4 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:23,874 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 5 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:24,876 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 6 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:25,879 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 7 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:26,881 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 8 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:27,883 [main] INFO org.apache.hadoop.ipc.Client - Retrying connect to server: 0.0.0.0/0.0.0.0:10020. Already tried 9 time(s); retry policy is RetryUpToMaximumCountWithFixedSleep(maxRetries=10, sleepTime=1000 MILLISECO
NDS)
2024-09-20 05:18:27,987 [main] WARN org.apache.pig.backend.hadoop.executionengine.mapReduceLayer.MapReduceLauncher - Unable to retrieve job to compute warning aggregation.
2024-09-20 05:18:27,988 [main] INFO org.apache.pig.backend.hadoop.executionengine.mapReduceLayer.MapReduceLauncher - Success!
2024-09-20 05:18:28,180 [main] INFO org.apache.pig.Main - Pig script completed in 4 minutes, 9 seconds and 747 milliseconds (249747 ms)

hadoop@kali: ~/DA-Lab/exp4
$ cd ./../hadoop/bin
hadoop@kali: ~/hadoop/bin
$ ./hdfs dfs -cat /exp4/output/part-r-00000
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
2024-09-20 05:12:25,900 WARN util.NativeCodeLoader: Unable to load native-hadoop library for your platform... using builtin-java classes where applicable
1,JOHN
2,JANE
3,JOE
4,EMMA
hadoop@kali: ~/hadoop/bin

```

\$hdfs dfs -cat /exp4/output/*

```

hadoop@kali: [~/hadoop/bin]
$ ./hdfs dfs -cat /exp4/output/*
Picked up _JAVA_OPTIONS: -Dawt.useSystemAAFontSettings=on -Dswing.aatext=true
2024-09-21 00:33:32,731 WARN util.NativeCodeLoader: Unable to load native-hadoop library for your platform...
1,JOHN
2,JANE
3,JOE
4,EMMA

```