```
Password:
hduser@saidileep-VirtualBox:/home/saidileep$ cd\
hduser@saidileep-VirtualBox:~$ cd /usr/local/hadoop/sbin
hduser@saidileep-VirtualBox:/usr/local/hadoop/sbin$ ./start-dfs.sh
20/11/26 19:47:52 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
Starting namenodes on [localhost]
hduser@localhost's password:
localhost: starting namenode, logging to /usr/local/hadoop/logs/hadoop-hduser-na
menode-saidileep-VirtualBox.out
hduser@localhost's password:
localhost: starting datanode, logging to /usr/local/hadoop/logs/hadoop-hduser-da
tanode-saidileep-VirtualBox.out
Starting secondary namenodes [0.0.0.0]
hduser@0.0.0.0's password:
0.0.0.0: starting secondarynamenode, logging to /usr/local/hadoop/logs/hadoop-hd
user-secondarynamenode-saidileep-VirtualBox.out
20/11/26 19:48:17 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
hduser@saidileep-VirtualBox:/usr/local/hadoop/sbin$ ./start-yarn.sh
starting yarn daemons
starting resourcemanager, logging to /usr/local/hadoop/logs/yarn-hduser-resource
manager-saidileep-VirtualBox.out
hduser@localhost's password:
localhost: starting nodemanager, logging to /usr/local/hadoop/logs/yarn-hduser-n
```

saidileep@saidileep-VirtualBox:~\$ su hduser

odemanager-saidileep-VirtualBox.out

```
hduser@saidileep-VirtualBox:~/hadoop-2.6.0$ ls
hduser@saidileep-VirtualBox:~/hadoop-2.6.0$ hadoop fs -ls /
20/11/26 19:55:11 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
Found 1 items
drwxr-xr-x - hduser supergroup 0 2020-11-26 19:51 /rgs1
```

leep/Desktop/file1 /rgs1/test.txt
20/11/26 19:58:08 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
hduser@saidileep-VirtualBox:~/hadoop-2.6.0\$ hadoop fs -ls /rgs1
20/11/26 19:59:01 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
Found 1 items
-rw-r--r-- 1 hduser supergroup 89 2020-11-26 19:58 /rgs1/test.txt

hduser@saidileep-VirtualBox:~/hadoop-2.6.0\$ hadoop fs -copyFromLocal /home/saidi

```
ordcount.jar WordCount /rgs1/test.txt /rgs1/output
20/11/26 20:02:34 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
20/11/26 20:02:34 INFO Configuration.deprecation: session.id is deprecated. Inst
ead, use dfs.metrics.session-id
20/11/26 20:02:34 INFO jvm.JvmMetrics: Initializing JVM Metrics with processName
=JobTracker, sessionId=
20/11/26 20:02:34 INFO input.FileInputFormat: Total input paths to process : 1
20/11/26 20:02:34 INFO mapreduce.JobSubmitter: number of splits:1
20/11/26 20:02:34 INFO mapreduce.JobSubmitter: Submitting tokens for job: job lo
cal874368934 0001
20/11/26 20:02:34 INFO mapreduce.Job: The url to track the job: http://localhost
:8080/
20/11/26 20:02:34 INFO mapreduce.Job: Running job: job local874368934 0001
20/11/26 20:02:34 INFO mapred.LocalJobRunner: OutputCommitter set in config null
20/11/26 20:02:34 INFO mapred.LocalJobRunner: OutputCommitter is org.apache.hado
op.mapreduce.lib.output.FileOutputCommitter
20/11/26 20:02:35 INFO mapred.LocalJobRunner: Waiting for map tasks
20/11/26 20:02:35 INFO mapred.LocalJobRunner: Starting task: attempt local874368
934_0001_m_000000_0
20/11/26 20:02:35 INFO mapred.Task: Using ResourceCalculatorProcessTree : [ ]
20/11/26 20:02:35 INFO mapred.MapTask: Processing split: hdfs://localhost:54310/
rgs1/test.txt:0+89
20/11/26 20:02:35 INFO mapred.MapTask: (EQUATOR) 0 kvi 26214396(104857584)
20/11/26 20:02:35 INFO mapred.MapTask: mapreduce.task.io.sort.mb: 100
20/11/26 20:02:35 INFO mapred.MapTask: soft limit at 83886080
20/11/26 20:02:35 INFO mapred.MapTask: bufstart = 0; bufvoid = 104857600
20/11/26 20:02:35 INFO mapred.MapTask: kvstart = 26214396; length = 6553600
20/11/26 20:02:35 INFO mapred.MapTask: Map output collector class = org.apache.h
adoop.mapred.MapTask$MapOutputBuffer
```

20/11/26 20:02:35 INFO mapred.LocalJobRunner:

hduser@saidileep-VirtualBox:~/hadoop-2.6.0\$ hadoop jar /home/saidileep/Desktop/w

```
20/11/26 20:02:35 INFO mapred.MapTask: Spilling map output
20/11/26 20:02:35 INFO mapred.MapTask: bufstart = 0; bufend = 169; bufvoid = 104
857600
20/11/26 20:02:35 INFO mapred.MapTask: kvstart = 26214396(104857584); kvend = 26
214320(104857280); length = 77/6553600
20/11/26 20:02:35 INFO mapred.MapTask: Finished spill 0
20/11/26 20:02:35 INFO mapred.Task: Task:attempt_local874368934_0001_m_000000_0
is done. And is in the process of committing
20/11/26 20:02:35 INFO mapred.LocalJobRunner: map
20/11/26 20:02:35 INFO mapred.Task: Task 'attempt local874368934 0001 m 000000 0
' done.
20/11/26 20:02:35 INFO mapred.LocalJobRunner: Finishing task: attempt_local87436
8934 0001 m 000000 0
20/11/26 20:02:35 INFO mapred.LocalJobRunner: map task executor complete.
20/11/26 20:02:35 INFO mapred.LocalJobRunner: Waiting for reduce tasks
20/11/26 20:02:35 INFO mapred.LocalJobRunner: Starting task: attempt_local874368
934 0001 r 000000 0
20/11/26 20:02:35 INFO mapred.Task: Using ResourceCalculatorProcessTree : [ ]
20/11/26 20:02:35 INFO mapred.ReduceTask: Using ShuffleConsumerPlugin: org.apach
e.hadoop.mapreduce.task.reduce.Shuffle@386f660a
20/11/26 20:02:35 INFO reduce.MergeManagerImpl: MergerManager: memoryLimit=33433
8464, maxSingleShuffleLimit=83584616, mergeThreshold=220663392, ioSortFactor=10,
memToMemMergeOutputsThreshold=10
20/11/26 20:02:35 INFO reduce.EventFetcher: attempt_local874368934_0001_r_000000
_O Thread started: EventFetcher for fetching Map Completion Events
20/11/26 20:02:35 INFO reduce.LocalFetcher: localfetcher#1 about to shuffle outp
ut of map attempt_local874368934_0001_m_0000000_0 decomp: 111 len: 115 to MEMORY
20/11/26 20:02:35 INFO reduce.InMemoryMapOutput: Read 111 bytes from map-output
for attempt_local874368934_0001_m_000000_0
```

20/11/26 20:02:35 INFO reduce.MergeManagerImpl: closeInMemoryFile -> map-output
of size: 111, inMemoryMapOutputs.size() -> 1, commitMemory -> 0, usedMemory ->11

20/11/26 20:02:35 INFO mapred.MapTask: Starting flush of map output

```
20/11/26 20:02:35 INFO reduce.EventFetcher: EventFetcher is interrupted.. Return
ing
20/11/26 20:02:35 INFO mapred.LocalJobRunner: 1 / 1 copied.
20/11/26 20:02:35 INFO reduce.MergeManagerImpl: finalMerge called with 1 in-memo
ry map-outputs and 0 on-disk map-outputs
20/11/26 20:02:35 INFO mapred.Merger: Merging 1 sorted segments
20/11/26 20:02:35 INFO mapred.Merger: Down to the last merge-pass, with 1 segmen
ts left of total size: 105 bytes
20/11/26 20:02:35 INFO reduce.MergeManagerImpl: Merged 1 segments, 111 bytes to
disk to satisfy reduce memory limit
20/11/26 20:02:35 INFO reduce.MergeManagerImpl: Merging 1 files, 115 bytes from
disk
20/11/26 20:02:35 INFO reduce.MergeManagerImpl: Merging 0 segments, 0 bytes from
memory into reduce
20/11/26 20:02:35 INFO mapred.Merger: Merging 1 sorted segments
20/11/26 20:02:35 INFO mapred.Merger: Down to the last merge-pass, with 1 segmen
ts left of total size: 105 bytes
20/11/26 20:02:35 INFO mapred.LocalJobRunner: 1 / 1 copied.
20/11/26 20:02:35 INFO Configuration.deprecation: mapred.skip.on is deprecated.
Instead, use mapreduce.job.skiprecords
20/11/26 20:02:35 INFO mapred.Task: Task:attempt local874368934 0001 r 000000 0
is done. And is in the process of committing
20/11/26 20:02:35 INFO mapred.LocalJobRunner: 1 / 1 copied.
20/11/26 20:02:35 INFO mapred.Task: Task attempt_local874368934_0001_r_000000_0
is allowed to commit now
20/11/26 20:02:35 INFO output.FileOutputCommitter: Saved output of task 'attempt
_local874368934_0001_r_000000_0' to hdfs://localhost:54310/rgs1/output/_temporar
y/0/task local874368934 0001 r 000000
20/11/26 20:02:35 INFO mapred.LocalJobRunner: reduce > reduce
20/11/26 20:02:35 INFO mapred.Task: Task 'attempt local874368934 0001 r 000000 0
```

' done.

```
8934 0001 r 000000 0
20/11/26 20:02:35 INFO mapred.LocalJobRunner: reduce task executor complete.
20/11/26 20:02:35 INFO mapreduce.Job: Job job local874368934 0001 running in ube
r mode : false
20/11/26 20:02:35 INFO mapreduce.Job: map 100% reduce 100%
20/11/26 20:02:35 INFO mapreduce.Job: Job job local874368934 0001 completed succ
essfully
20/11/26 20:02:35 INFO mapreduce.Job: Counters: 38
        File System Counters
                FILE: Number of bytes read=6990
                FILE: Number of bytes written=506019
                FILE: Number of read operations=0
                FILE: Number of large read operations=0
                FILE: Number of write operations=0
                HDFS: Number of bytes read=178
                HDFS: Number of bytes written=69
                HDFS: Number of read operations=13
               HDFS: Number of large read operations=0
                HDFS: Number of write operations=4
       Map-Reduce Framework
                Map input records=5
                Map output records=20
                Map output bytes=169
                Map output materialized bytes=115
                Input split bytes=101
                Combine input records=20
                Combine output records=10
                Reduce input groups=10
                Reduce shuffle bytes=115
                Reduce input records=10
```

Reduce output records=10

20/11/26 20:02:35 INFO mapred.LocalJobRunner: Finishing task: attempt\_local87436

```
Shuffled Maps =1
                Failed Shuffles=0
                Merged Map outputs=1
               GC time elapsed (ms)=0
                CPU time spent (ms)=0
               Physical memory (bytes) snapshot=0
               Virtual memory (bytes) snapshot=0
               Total committed heap usage (bytes)=546308096
        Shuffle Errors
               BAD_ID=0
                CONNECTION=0
                IO ERROR=0
                WRONG LENGTH=0
                WRONG_MAP=0
                WRONG_REDUCE=0
        File Input Format Counters
                Bytes Read=89
        File Output Format Counters
                Bytes Written=69
hduser@saidileep-VirtualBox:~/hadoop-2.6.0$ hadoop fs -ls /rgs1
20/11/26 20:03:02 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
Found 2 items
drwxr-xr-x - hduser supergroup
                                         0 2020-11-26 20:02 /rgs1/output
-rw-r--r-- 1 hduser supergroup
                                       89 2020-11-26 19:58 /rgs1/test.txt
```

Spilled Records=20

```
hduser@saidileep-VirtualBox:~/hadoop-2.6.0$ hadoop fs -cat /rgs1/output/part-r-0
0000
20/11/26 20:04:55 WARN util.NativeCodeLoader: Unable to load native-hadoop libra
ry for your platform... using builtin-java classes where applicable
are
brother 1
family
        1
hi
        1
how
        5
is
        4
job
        1
sister
        1
you
        1
your
        4
```