

Hive Mini Project-1:--

=====

1. Create a schema based on the given dataset.

```
hive> create table if not exists Agent_Performance(  
  >   sl_no int,  
  >   Date date,  
  >   Agent_name string,  
  >   total_chats int,  
  >   average_response_time string,  
  >   average_resolution_time string,  
  >   average_rating float,  
  >   total_feedback int  
  > )  
  > row format delimited  
  > fields terminated by ','  
  > tblproperties("skip.header.line.count"="1");
```

OK

Time taken: 0.069 seconds

```
hive> create table if not exists Agent_Performance(  
  >   sl_no int,  
  >   Date date,  
  >   Agent_name string,  
  >   total_chats int,  
  >   average_response_time string,  
  >   average_resolution_time string,  
  >   average_rating float,  
  >   total_feedback int  
  > )  
  > row format delimited  
  > fields terminated by ','  
  > tblproperties("skip.header.line.count"="1");
```

OK

Time taken: 0.069 seconds

```
hive> create table if not exists AgentLoggingReport(  
  > sl_no int,  
  > Agent_name string,  
  > Date date,  
  > login_time string,  
  > logout_time string,  
  > duration string)  
  > row format delimited
```

```
> fields terminated by ','  
> tblproperties("skip.header.line.count"="1");
```

OK

Time taken: 0.081 seconds

```
hive> create table if not exists AgentLoggingReport(  
  > sl_no int,  
  > Agent_name string,  
  > Date date,  
  > login_time string,  
  > logout_time string,  
  > duration string)  
  > row format delimited  
  > fields terminated by ','  
  > tblproperties("skip.header.line.count"="1");
```

OK

Time taken: 0.081 seconds

2.Dump the data in side the HDFS in the given schema location

```
hive> load data local inpath 'file:///tmp/hive_class_1/AgentPerformance.csv' into table  
Agent_Performance;
```

Loading data to table mini_project_1.agent_performance

Table mini_project_1.agent_performance stats: [numFiles=1, totalSize=112661]

OK

Time taken: 0.516 seconds

```
hive> load data local inpath 'file:///tmp/hive_class_1/AgentPerformance.csv' into table Agent_Performance;  
Loading data to table mini_project_1.agent_performance  
Table mini_project_1.agent_performance stats: [numFiles=1, totalSize=112661]  
OK  
Time taken: 0.516 seconds
```

```
hive> load data local inpath 'file:///tmp/hive_class_1/AgentLoggingReport.csv' into table  
AgentLoggingReport;
```

Loading data to table mini_project_1.agentloggingreport

Table mini_project_1.agentloggingreport stats: [numFiles=1, totalSize=54911]

OK

Time taken: 0.293 seconds

```
hive> load data local inpath 'file:///tmp/hive_class_1/AgentLoggingReport.csv' into table AgentLoggingReport;  
Loading data to table mini_project_1.agentloggingreport  
Table mini_project_1.agentloggingreport stats: [numFiles=1, totalSize=54911]  
OK  
Time taken: 0.293 seconds
```

3.List out all the Agent Names.

hive> select distinct(Agent_name) from Agent_Performance;

```
hive> select distinct(Agent_name) from Agent_Performance;
Query ID = cloudera_20221006190606_c2bf6e85-3d5d-4cdd-b412-e7602ebafc12
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0133, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0133/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0133
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 19:06:47,470 Stage-1 map = 0%, reduce = 0%
2022-10-06 19:06:55,538 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.95 sec
2022-10-06 19:07:04,347 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.51 sec
MapReduce Total cumulative CPU time: 3 seconds 510 msec
Ended Job = job_1662892505239_0133
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.51 sec HDFS Read: 121117 HDFS Write: 867 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 510 msec
OK
agent_name
Abhishek
Aditya
Aditya Shinde
Aditya_iot
Amersh
Ameya Jain
Anirudh
Ankit Sharma
Ankitjha
Anurag Tiwari
Aravind
Ashad Nasim
Ashish
Ayushi Mishra
Bharath
Boktiar Ahmed Bappy
Chaitra K Hiremath
Deepranjan Gupta
Dibyanshu
Harikrishnan Shaji
Hitesh Choudhary
Hrisikesh Neogi
Hyder Abbas
Ineuron Intelligence
Ishawant Kumar
Jawala Prakash
Jayant Kumar
Jaydeep Dixit
```

hive> select count(distinct(Agent_name)) as agents_count from Agent_Performance;

```

hive> select count(distinct(Agent_name)) as agents_count from Agent_Performance;
Query ID = cloudera_20221006191111_f3e36fb0-3b94-4715-a85e-bb5caf773fe5
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks determined at compile time: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0135, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0135/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0135
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 19:11:27,762 Stage-1 map = 0%, reduce = 0%
2022-10-06 19:11:33,834 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.46 sec
2022-10-06 19:11:42,551 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.35 sec
MapReduce Total cumulative CPU time: 3 seconds 350 msec
Ended Job = job_1662892505239_0135
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.35 sec HDFS Read: 121800 HDFS Write: 3 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 350 msec
OK
agents_count
70
Time taken: 23.705 seconds, Fetched: 1 row(s)

```

4.Find out agent average rating.

hive> select agent_name,avg(average_rating) as average_ratings from Agent_Performance group by agent_name limit 5;

```

hive> select agent_name,avg(average_rating) as average_ratings from Agent_Performance group by agent_name limit 5;
Query ID = cloudera_20221006191818_8f5a622d-f1e6-4942-87f1-11c6f3b764b8
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0138, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0138/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0138
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 19:18:16,711 Stage-1 map = 0%, reduce = 0%
2022-10-06 19:18:22,295 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.89 sec
2022-10-06 19:18:30,104 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.32 sec
MapReduce Total cumulative CPU time: 3 seconds 320 msec
Ended Job = job_1662892505239_0138
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.32 sec HDFS Read: 122538 HDFS Write: 102 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 320 msec
OK
agent_name      average_ratings
Abhishek        0.0
Aditya          0.0
Aditya Shinde   1.80033333409627278
Aditya_iot      2.3453333377838135
Amersh          0.0
Time taken: 23.906 seconds, Fetched: 5 row(s)

```

5.Total Working days for each agent.

hive> select agent_name,count(distinct(date)) as Total_working_days from AgentLoggingReport group by agent_name limit 5;

```

hive> select agent_name,count(distinct(date)) as Total_working_days from AgentLoggingReport group by agent_name limit 5;
Query ID = cloudera_20221006192424_60357108-c3e7-4608-9a16-0f01c0a8f6fd
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0140, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0140/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0140
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 19:24:43,800 Stage-1 map = 0%, reduce = 0%
2022-10-06 19:24:50,469 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.59 sec
2022-10-06 19:24:55,858 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.1 sec
MapReduce Total cumulative CPU time: 3 seconds 100 msec
Ended Job = job_1662892505239_0140
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.1 sec HDFS Read: 63905 HDFS Write: 62 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 100 msec
OK
agent_name      total_working_days
Aditya Shinde   1
Aditya_iot      8
Amersh         2
Ameya Jain      7
Ankitjha        2
Time taken: 19.322 seconds, Fetched: 5 row(s)

```

6.Total Query that each agent has taken.

hive> select agent_name,sum(total_chats) as total_query from Agent_performance group by agent_name limit 5;

```

hive> select agent_name,sum(total_chats) as total_query from Agent_performance group by agent_name limit 5;
Query ID = cloudera_20221006192828_c3474d7c-e84d-420f-bba3-2574e700f0c5
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0141, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0141/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0141
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 19:28:55,350 Stage-1 map = 0%, reduce = 0%
2022-10-06 19:29:00,750 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.61 sec
2022-10-06 19:29:06,972 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 2.85 sec
MapReduce Total cumulative CPU time: 2 seconds 850 msec
Ended Job = job_1662892505239_0141
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 2.85 sec HDFS Read: 122052 HDFS Write: 66 SUCCESS
Total MapReduce CPU Time Spent: 2 seconds 850 msec
OK
agent_name      total_query
Abhishek        0
Aditya          0
Aditya Shinde   277
Aditya_iot      231
Amersh          0
Time taken: 19.972 seconds, Fetched: 5 row(s)

```

7.Total feedback that each agent has received.

hive> select agent_name,sum(total_feedback) as total_feedback_received from Agent_Performance group by agent_name limit 5;

```

hive> select agent_name,sum(total_feedback) as total_feedback received from Agent_Performance group by agent_name limit 5;
Query ID = cloudera_20221006193232_67c8f2c0-0476-4d2d-9115-8756fdb61ab
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0142, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0142/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0142
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 19:33:02,617 Stage-1 map = 0%, reduce = 0%
2022-10-06 19:33:07,861 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.46 sec
2022-10-06 19:33:14,079 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 2.73 sec
MapReduce Total cumulative CPU time: 2 seconds 730 msec
Ended Job = job_1662892505239_0142
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 2.73 sec HDFS Read: 122070 HDFS Write: 66 SUCCESS
Total MapReduce CPU Time Spent: 2 seconds 730 msec
OK
agent_name      total_feedback_received
Abhishek        0
Aditya          0
Aditya Shinde   153
Aditya_iot      131
Amersh          0
Time taken: 18.705 seconds, Fetched: 5 row(s)

```

8. Agent name who have average rating between 3.5 to 4.

hive> select agent_name,average_rating from Agent_performance where average_rating between 3.5 and 4 limit 5;

```

hive> select agent_name,average_rating from Agent_performance where average_rating between 3.5 and 4 limit 5;
OK
agent_name      average_rating
Swati           3.67
Manjunatha A    3.6
Boktiar Ahmed Bappy  4.0
Prateek_iot     3.75
Nandani Gupta   3.79
Time taken: 0.059 seconds, Fetched: 5 row(s)
hive> 

```

9.Agent name who have average rating less than 3.5.

hive> select agent_name,average_rating from Agent_performance where average_rating<3.5 limit 5;

```

hive> select agent_name,average_rating from Agent_performance where average_rating<3.5 limit 5;
OK
agent_name      average_rating
Nandani Gupta   3.14
Hitesh Choudhary 0.0
Sanjeevan       0.0
Anirudh         0.0
Shiva Srivastava 0.0
Time taken: 0.075 seconds, Fetched: 5 row(s)
hive> 

```

10.Agent name who have average rating more than 4.5

hive> select agent_name,average_rating from Agent_performance where average_rating>4.5 limit 5;

```
hive> select agent_name,average_rating from Agent_performance where average_rating>4.5 limit 5;
OK
agent_name      average_rating
Ameya Jain      4.55
Mahesh Sarade   4.71
Mukesh          4.62
Saikumarreddy N 5.0
Sanjeev Kumar   5.0
Time taken: 0.05 seconds, Fetched: 5 row(s)
hive> █
```

11.How many feedback agents have received more than a 4.5 average rating.

hive> select agent_name, avg(Total_feedback) from Agent_performance group by agent_name having avg(Total_feedback)>4.5 limit 5;

```
hive> select agent_name, avg(Total_feedback) from Agent_performance group by agent_name having avg(Total_feedback)>4.5 limit 5;
Query ID = cloudera_20221006195252_6f69077f-b77c-4913-b66e-f0d606ba3307
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0147, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0147/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0147
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 19:52:32,323 Stage-1 map = 0%, reduce = 0%
2022-10-06 19:52:37,747 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.51 sec
2022-10-06 19:52:45,014 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.14 sec
MapReduce Total cumulative CPU time: 3 seconds 140 msec
Ended Job = job_1662892505239_0147
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.14 sec HDFS Read: 122940 HDFS Write: 120 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 140 msec
OK
agent_name      c1
Aditya Shinde   5.1
Ameya Jain      7.6
Aravind         7.766666666666667
Ayushi Mishra   10.966666666666667
Bharath         8.233333333333333
Time taken: 20.119 seconds, Fetched: 5 row(s)
hive> █
```

12.Average weekly response time for each agent.

hive> select s.agent_name,avg(total_time[0]*3600+total_time[1]*60+total_time[2])/3600 as Average_time from (select agent_name,split(average_response_time,':') as total_time from Agent_performance) s group by s.agent_name limit 5;

```
hive> select s.agent_name,avg((total_time[0]*3600+total_time[1]*60+total_time[2])/3600 as Average_time from (select agent_name,split(average_response_time,':') as total_time from Agent_perfo
rmance) s group by s.agent_name limit 5;
Query ID = cloudera_20221006201414_0a30eab8-99a5-4b06-8680-266a1ca50534
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0152, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0152/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0152
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 20:14:09,346 Stage-1 map = 0%, reduce = 0%
2022-10-06 20:14:15,640 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 2.51 sec
2022-10-06 20:14:22,909 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 4.31 sec
MapReduce Total cumulative CPU time: 4 seconds 310 msec
Ended Job = job_1662892505239_0152
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 4.31 sec HDFS Read: 125412 HDFS Write: 105 SUCCESS
Total MapReduce CPU Time Spent: 4 seconds 310 msec
OK
s.agent_name average_time
Abhishek 0.0
Aditya 0.0
Aditya Shinde 0.0082925925925925926
Aditya Iot 0.009435185185185185
Amersh 0.0
Time taken: 20.114 seconds, Fetched: 5 row(s)
hive> []
```

13. Average weekly resolution time for each agent.

hive> select s.agent_name,avg((total_time[0]*3600+total_time[1]*60+total_time[2])/3600 as Average_time from (select agent_name,split(average_resolution_time,':') as total_time from Agent_performance) s group by s.agent_name limit 5;

```
hive> select s.agent_name,avg((total_time[0]*3600+total_time[1]*60+total_time[2])/3600 as Average_time from (select agent_name,split(average_resolution_time,':') as total_time from Agent_per
formance) s group by s.agent_name limit 5;
Query ID = cloudera_20221006201717_9efal2ef-c017-42db-8c6a-f795183a5f7f
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0153, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0153/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0153
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 20:17:26,930 Stage-1 map = 0%, reduce = 0%
2022-10-06 20:17:32,338 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.87 sec
2022-10-06 20:17:38,601 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.39 sec
MapReduce Total cumulative CPU time: 3 seconds 390 msec
Ended Job = job_1662892505239_0153
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.39 sec HDFS Read: 125412 HDFS Write: 104 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 390 msec
OK
s.agent_name average_time
Abhishek 0.0
Aditya 0.0
Aditya Shinde 0.17239814814814813
Aditya Iot 0.16369444444444442
Amersh 0.0
Time taken: 19.073 seconds, Fetched: 5 row(s)
hive> []
```

14. Find the number of chats on which they have received feedback.

hive> select agent_name,sum(total_chats) as sum_of_chats,total_feedback from Agent_Performance group by agent_name,total_feedback having total_feedback>0 limit 5;


```
hive> select agent_name,sum(total_chats) as sum_of_chats,total_feedback from Agent_Performance group by agent_name,total_feedback having total_feedback>0 limit 5;
Query ID = cloudera_20221006202626_cf4c3e15-f84a-4ee4-a5ed-9a3243339132
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0156, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0156/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0156
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 20:26:48,247 Stage-1 map = 0%, reduce = 0%
2022-10-06 20:26:53,483 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.57 sec
2022-10-06 20:26:59,742 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.25 sec
MapReduce Total cumulative CPU time: 3 seconds 250 msec
Ended Job = job_1662892505239_0156
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.25 sec HDFS Read: 122681 HDFS Write: 96 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 250 msec
OK
agent_name      sum_of_chats    total_feedback
Aditya Shinde   8               7
Aditya Shinde   17              8
Aditya Shinde   67              9
Aditya Shinde   18              11
Aditya Shinde   27              14
Time taken: 19.517 seconds, Fetched: 5 row(s)
```

15.Total Contribution hour for each and every agent's weekly basis.

hive> select agent_name,sum(total_time[0]*3600+total_time[1]*60+total_time[2])/3600
Hours_time,week from (select agent_name,split(duration,':') as total_time, weekofyear(Date) as
week from AgentLoggingReport) s group by agent_name,week limit 5;

```
hive> select agent_name,sum(total_time[0]*3600+total_time[1]*60+total_time[2])/3600 Hours_time,week from (select agent_name,split(duration,':') as total_time, weekofyear(Date) as week from
AgentLoggingReport) s group by agent_name,week limit 5;
Query ID = cloudera_20221006203636_belbc346-dbdb-431c-be20-4aa489e7ea41
Total jobs = 1
Launching Job 1 out of 1
Number of reduce tasks not specified. Estimated from input data size: 1
In order to change the average load for a reducer (in bytes):
  set hive.exec.reducers.bytes.per.reducer=<number>
In order to limit the maximum number of reducers:
  set hive.exec.reducers.max=<number>
In order to set a constant number of reducers:
  set mapreduce.job.reduces=<number>
Starting Job = job_1662892505239_0157, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0157/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0157
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 1
2022-10-06 20:36:17,651 Stage-1 map = 0%, reduce = 0%
2022-10-06 20:36:22,860 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 1.7 sec
2022-10-06 20:36:29,082 Stage-1 map = 100%, reduce = 100%, Cumulative CPU 3.53 sec
MapReduce Total cumulative CPU time: 3 seconds 530 msec
Ended Job = job_1662892505239_0157
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Reduce: 1 Cumulative CPU: 3.53 sec HDFS Read: 67293 HDFS Write: 162 SUCCESS
Total MapReduce CPU Time Spent: 3 seconds 530 msec
OK
agent_name      hours time      week
Aditya Shinde   0.036111111111111111  30
Aditya Iot      6.095277777777778    29
Aditya Iot      9.435833333333334    30
Amersah 3.063888888888889  30
Ameya Jain      24.083055555555557   29
Time taken: 19.204 seconds, Fetched: 5 row(s)
hive> []
```

16.Perform inner join, left join and right join based on agent_name column and after joining the tables export the data into your local system.

Inner Join:-

hive> select ap.Agent_name,ap.total_chats,ap.Date,ap.total_feedback,alp.duration from
Agent_Performance ap join AgentLoggingReport alp on ap.Agent_name = alp.Agent_name limit
10;

```

hive> select ap.Agent_name,ap.total_chats,ap.Date,ap.total_feedback,alp.duration from Agent_Performance ap join AgentLoggingReport alp on ap.Agent_name = alp.Agent_name limit 10;
Query ID = cloudera_20221006205151_4dbaf497-a76b-4979-acae-b74c90e1e9ef
Total jobs = 1
Execution log at: /tmp/cloudera/cloudera_20221006205151_4dbaf497-a76b-4979-acae-b74c90e1e9ef.log
2022-10-06 08:51:30 Starting to launch local task to process map join: maximum memory = 932184064
2022-10-06 08:51:31 Dump the side-table for tag: 1 with group count: 49 into file: file:/tmp/cloudera/94d9226c-74f4-4144-a552-4958546d2dbb/hive_2022-10-06_20-51-27_228_84313875048734511-16-1/-local-10003/HashTable-Stage-3/MapJoin-mapfile11--.hashtable
2022-10-06 08:51:31 Uploaded 1 File to: file:/tmp/cloudera/94d9226c-74f4-4144-a552-4958546d2dbb/hive_2022-10-06_20-51-27_228_8431387504873451116-1/-local-10003/HashTable-Stage-3/MapJoin-mapfile11--.hashtable (14607 bytes)
2022-10-06 08:51:31 End of local task: Time Taken: 0.955 sec.
Execution completed successfully
MapredLocal task succeeded
Launching Job 1 out of 1
Number of reduce tasks is set to 0 since there's no reduce operator
Starting Job = job_1662892505239_0159, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0159/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0159
Hadoop job information for Stage-3: number of mappers: 1; number of reducers: 0
2022-10-06 20:51:38,292 Stage-3 map = 0%, reduce = 0%
2022-10-06 20:51:43,462 Stage-3 map = 100%, reduce = 0%, Cumulative CPU 1.42 sec
MapReduce Total cumulative CPU time: 1 seconds 420 msec
Ended Job = job_1662892505239_0159
MapReduce Jobs Launched:
Stage-Stage-3: Map: 1 Cumulative CPU: 1.42 sec HDFS Read: 12115 HDFS Write: 370 SUCCESS
Total MapReduce CPU Time Spent: 1 seconds 420 msec
OK
ap.agent_name ap.total_chats ap.date ap.total_feedback alp.duration
Perna Singh 11 2022-07-30 9 1:37:40
Perna Singh 11 2022-07-30 9 3:16:37
Perna Singh 11 2022-07-30 9 2:12:27
Perna Singh 11 2022-07-30 9 0:03:11
Perna Singh 11 2022-07-30 9 7:47:29
Perna Singh 11 2022-07-30 9 0:02:00
Perna Singh 11 2022-07-30 9 0:07:29
Perna Singh 11 2022-07-30 9 0:08:30
Perna Singh 11 2022-07-30 9 0:01:56
Perna Singh 11 2022-07-30 9 5:56:38
Time taken: 18.344 seconds, Fetched: 10 row(s)
hive>

```

Left Join:-

hive> select ap.Agent_name,ap.total_chats,ap.Date,ap.total_feedback,alp.duration from Agent_Performance ap left join AgentLoggingReport alp on ap.Agent_name = alp.Agent_name limit 10;

```

hive> select ap.Agent_name,ap.total_chats,ap.Date,ap.total_feedback,alp.duration from Agent_Performance ap left join AgentLoggingReport alp on ap.Agent_name = alp.Agent_name limit 10;
Query ID = cloudera_20221007200606_756106c7-d77f-432a-94cc-68585d5fc541b
Total jobs = 1
Execution log at: /tmp/cloudera/cloudera_20221007200606_756106c7-d77f-432a-94cc-68585d5fc541b.log
2022-10-07 08:06:06 Starting to launch local task to process map join: maximum memory = 932184064
2022-10-07 08:06:07 Dump the side-table for tag: 1 with group count: 49 into file: file:/tmp/cloudera/94d9226c-74f4-4144-a552-4958546d2dbb/hive_2022-10-07_20-06-01_318_64924320408535953-89-1/-local-10003/HashTable-Stage-3/MapJoin-mapfile41--.hashtable
2022-10-07 08:06:07 Uploaded 1 File to: file:/tmp/cloudera/94d9226c-74f4-4144-a552-4958546d2dbb/hive_2022-10-07_20-06-01_318_6492432040853595389-1/-local-10003/HashTable-Stage-3/MapJoin-mapfile41--.hashtable (14607 bytes)
2022-10-07 08:06:07 End of local task: Time Taken: 1.164 sec.
Execution completed successfully
MapredLocal task succeeded
Launching Job 1 out of 1
Number of reduce tasks is set to 0 since there's no reduce operator
Starting Job = job_1662892505239_0163, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0163/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0163
Hadoop job information for Stage-3: number of mappers: 1; number of reducers: 0
2022-10-07 20:06:14,418 Stage-3 map = 0%, reduce = 0%
2022-10-07 20:06:18,608 Stage-3 map = 100%, reduce = 0%, Cumulative CPU 1.1 sec
MapReduce Total cumulative CPU time: 1 seconds 100 msec
Ended Job = job_1662892505239_0163
MapReduce Jobs Launched:
Stage-Stage-3: Map: 1 Cumulative CPU: 1.1 sec HDFS Read: 12040 HDFS Write: 370 SUCCESS
Total MapReduce CPU Time Spent: 1 seconds 100 msec
OK
ap.agent_name ap.total_chats ap.date ap.total_feedback alp.duration
Perna Singh 11 2022-07-30 9 1:37:40
Perna Singh 11 2022-07-30 9 3:16:37
Perna Singh 11 2022-07-30 9 2:12:27
Perna Singh 11 2022-07-30 9 0:03:11
Perna Singh 11 2022-07-30 9 7:47:29
Perna Singh 11 2022-07-30 9 0:02:00
Perna Singh 11 2022-07-30 9 0:07:29
Perna Singh 11 2022-07-30 9 0:08:30
Perna Singh 11 2022-07-30 9 0:01:56
Perna Singh 11 2022-07-30 9 5:56:38
Time taken: 19.379 seconds, Fetched: 10 row(s)
hive>

```

Right Join:-

hive> select ap.Agent_name,ap.total_chats,ap.Date,ap.total_feedback,alp.duration from Agent_Performance ap right join AgentLoggingReport alp on ap.Agent_name = alp.Agent_name limit 10;

```
hive>
```

```
→ hive -f left_join.hql >> left_join.csv
```

```

[cloudera@quickstart ~]$ vi left_join.hql
[cloudera@quickstart ~]$ hive -f left_join.hql >> left_join.csv

Logging initialized using configuration in file:/etc/hive/conf.dist/hive-log4j.properties
Query ID = cloudera_20221007201717_f01df82c-2756-4818-81fe-864da022334f
Total jobs = 1
Execution log at: /tmp/cloudera/cloudera_20221007201717_f01df82c-2756-4818-81fe-864da022334f.log
2022-10-07 08:18:03 Starting to launch local task to process map join; maximum memory = 932184064
2022-10-07 08:18:03 Dump the side-table for tag: 1 with group count: 49 into file: file:/tmp/cloudera/29b4fb38-6dd8-4d94-b134-2edab7328464/hive_2022-10-07_20-17-59_410_81980932070348770
10-17-local-10003/HashTable-Stage-3/MapJoin-mapfile001--.hashtable
2022-10-07 08:18:03 Uploaded 1 file to: file:/tmp/cloudera/29b4fb38-6dd8-4d94-b134-2edab7328464/hive_2022-10-07_20-17-59_410_8198093207034877018-1/-local-10003/HashTable-Stage-3/MapJoin
-mapfile01--.hashtable (14607 bytes)
2022-10-07 08:18:03 End of local task; Time Taken: 0.739 sec.
Execution completed successfully
MapredLocal task succeeded
Launching Job 1 out of 1
Number of reduce tasks is set to 0 since there's no reduce operator
Starting Job = job_1662892505239_0165, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0165/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0165
Hadoop job information for Stage-3: number of mappers: 1; number of reducers: 0
2022-10-07 20:18:09,975 Stage-3 map = 0%, reduce = 0%
2022-10-07 20:18:18,357 Stage-3 map = 100%, reduce = 0%, Cumulative CPU 2.45 sec
MapReduce Total cumulative CPU time: 2 seconds 450 msec
Ended Job = job_1662892505239_0165
MapReduce Jobs Launched:
Stage-Stage-3: Map: 1 Cumulative CPU: 2.45 sec HDFS Read: 120275 HDFS Write: 854177 SUCCESS
Total MapReduce CPU Time Spent: 2 seconds 450 msec
OK
Time taken: 20.087 seconds, Fetched: 22260 row(s)
[cloudera@quickstart ~]$ ls
bucket_data.txt cloudera-manager Documents employees.csv inner_join.csv kerberos lib many_udfs.py parcels sales_data.csv Videos
bucket_location.txt cm_api.py Downloads enterprise-deployment.json inner_join.hql left_join.csv locations.csv multiply_udf.py Pictures Templates workspace
china Desktop eclipse express-deployment.json json_file.json left_join.hql many_udf.py Music Public two.txt
[cloudera@quickstart ~]$ wc -l left_join.csv
22264 left_join.csv
[cloudera@quickstart ~]$

```

Right Join:-

Query in Right_join

```

cloudera@quickstart:
select ap.Agent_name,ap.total_chats,ap.Date,ap.total_feedback,alp.duration from mini_project_1.Agent_Performance ap right join mini_project_1.AgentLoggingReport alp on ap.Agent_name = alp.Agent_name;

```

→ hive -f right_join.hql >> right_join.csv

```

[cloudera@quickstart ~]$ vi right_join.hql
[cloudera@quickstart ~]$ hive -f right_join.hql >> right_join.csv

Logging initialized using configuration in file:/etc/hive/conf.dist/hive-log4j.properties
Query ID = cloudera_20221007202424_04d3a3af-8b54-4f9a-a3ed-10da81165e8b
Total jobs = 1
Execution log at: /tmp/cloudera/cloudera_20221007202424_04d3a3af-8b54-4f9a-a3ed-10da81165e8b.log
2022-10-07 08:24:29 Starting to launch local task to process map join; maximum memory = 932184064
2022-10-07 08:24:30 Dump the side-table for tag: 0 with group count: 70 into file: file:/tmp/cloudera/fb4f3de4-40be-4a28-948c-9dff6a24fdaf/hive_2022-10-07_20-24-25_253_10825394767160184
47-17-local-10003/HashTable-Stage-3/MapJoin-mapfile000--.hashtable
2022-10-07 08:24:30 Uploaded 1 file to: file:/tmp/cloudera/fb4f3de4-40be-4a28-948c-9dff6a24fdaf/hive_2022-10-07_20-24-25_253_1082539476716018447-1/-local-10003/HashTable-Stage-3/MapJoin
-mapfile00--.hashtable (23750 bytes)
2022-10-07 08:24:30 End of local task; Time Taken: 0.844 sec.
Execution completed successfully
MapredLocal task succeeded
Launching Job 1 out of 1
Number of reduce tasks is set to 0 since there's no reduce operator
Starting Job = job_1662892505239_0166, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0166/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0166
Hadoop job information for Stage-3: number of mappers: 1; number of reducers: 0
2022-10-07 20:24:37,645 Stage-3 map = 0%, reduce = 0%
2022-10-07 20:24:44,109 Stage-3 map = 100%, reduce = 0%, Cumulative CPU 2.66 sec
MapReduce Total cumulative CPU time: 2 seconds 660 msec
Ended Job = job_1662892505239_0166
MapReduce Jobs Launched:
Stage-Stage-3: Map: 1 Cumulative CPU: 2.66 sec HDFS Read: 62376 HDFS Write: 829699 SUCCESS
Total MapReduce CPU Time Spent: 2 seconds 660 msec
OK
Time taken: 21.056 seconds, Fetched: 21486 row(s)
[cloudera@quickstart ~]$ ls
bucket_data.txt cloudera-manager Documents employees.csv inner_join.csv kerberos lib many_udfs.py parcels right_join.csv Templates workspace
bucket_location.txt cm_api.py Downloads enterprise-deployment.json inner_join.hql left_join.csv locations.csv multiply_udf.py Pictures right_join.hql two.txt
china Desktop eclipse express-deployment.json json_file.json left_join.hql many_udf.py Music Public sales_data.csv Videos
[cloudera@quickstart ~]$ wc -l right_join.csv
21488 right_join.csv
[cloudera@quickstart ~]$

```

17. Perform partitioning on top of the agent column and then on top of that perform bucketing for each partitioning.

For agent_performance table:-

hive> create table if not exists agent_performance_part

```

> (
> sl_no int,
> Date date,
> total_chats int,
> average_response_time string,

```

- > average_resolution_time string,
- > average_rating float,
- > total_feedback int
- >)
- > partitioned by (Agent_name string)
- > clustered by (Date) sorted by (Date) into 6 buckets
- > row format delimited
- > fields terminated by ',';

OK

Time taken: 0.158 seconds

hive> set hive.exec.dynamic.partition=true;

hive> set hive.exec.dynamic.partition.mode=nonstrict;

hive> insert into table agent_performance_part partition(Agent_name) select * from agent_performance;

```

cloudera@quickstart-
hive> create table if not exists agent_performance_part
> (
>   sl_no int,
>   Date date,
>   total_chats int,
>   average_response_time string,
>   average_resolution_time string,
>   average_rating float,
>   total_feedback int
> )
> partitioned by (Agent_name string)
> clustered by (Date) sorted by (Date) into 6 buckets
> row format delimited
> fields terminated by ',';

OK
Time taken: 0.158 seconds
hive> set hive.exec.dynamic.partition=true;
hive> set hive.exec.dynamic.partition.mode=nonstrict;
hive> insert into table agent_performance_part partition(Agent_name) select * from agent_performance;
Query ID = cloudera_20221007210505_579f48c8-2fed-471c-b561-bce4fa7ff7f3
Total jobs = 3
Launching Job 1 out of 3
Number of reduce tasks is set to 0 since there's no reduce operator
Starting Job = job_1662892505239_0168, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0168/
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0168
Hadoop job information for Stage-1: number of mappers: 17; number of reducers: 0
2022-10-07 21:05:45,238 Stage-1 map = 0%, reduce = 0%
2022-10-07 21:05:53,474 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 2.91 sec
MapReduce Total cumulative CPU time: 2 seconds 910 msec
Ended Job = job_1662892505239_0168
Stage-4 is selected by condition resolver.
Stage-3 is filtered out by condition resolver.
Stage-5 is filtered out by condition resolver.
Moving data to: hdfs://quickstart.cloudera:8020/user/hive/warehouse/mini_project_1.db/agent_performance_part/.hive-staging_hive_2022-10-07_21-05-36_926_3216442547863745960-1/-ext-10000
Loading data to table mini_project_1.agent_performance_part partition (agent_name=null)
Time taken for load dynamic partitions : 5474
Loading partition (agent_name=29)
Loading partition (agent_name=32)
Loading partition (agent_name=14)
Loading partition (agent_name=5)
Loading partition (agent_name=13)
Loading partition (agent_name=30)
Loading partition (agent_name=15)
Loading partition (agent_name=23)
Loading partition (agent_name=2)
Loading partition (agent_name=12)
Loading partition (agent_name=37)
Loading partition (agent_name=39)
Loading partition (agent_name=52)
Loading partition (agent_name=3)
Loading partition (agent_name=25)
Loading partition (agent_name=21)

```

```

coudera@quickstart-
Loading partition (agent_name=0)
Loading partition (agent_name=10)
Loading partition (agent_name=22)
Loading partition (agent_name=16)
Loading partition (agent_name=4)
Loading partition (agent_name=19)
Loading partition (agent_name=31)
Loading partition (agent_name=27)
Loading partition (agent_name=24)
Loading partition (agent_name=8)
Loading partition (agent_name=9)
Loading partition (agent_name=33)
Loading partition (agent_name=1)
Loading partition (agent_name=35)
Loading partition (agent_name=26)
Loading partition (agent_name=9)
Loading partition (agent_name=20)
Loading partition (agent_name=11)
Loading partition (agent_name=18)
Loading partition (agent_name=56)
Loading partition (agent_name=17)
Loading partition (agent_name=28)
Loading partition (agent_name=6)
Loading partition (agent_name=40)
Time taken for adding to write entity : 5
Partition mini_project_1.agent_performance_part(agent_name=0) stats: [numFiles=1, numRows=1429, totalSize=47890, rawDataSize=46461]
Partition mini_project_1.agent_performance_part(agent_name=1) stats: [numFiles=1, numRows=23, totalSize=779, rawDataSize=756]
Partition mini_project_1.agent_performance_part(agent_name=10) stats: [numFiles=1, numRows=37, totalSize=1277, rawDataSize=1240]
Partition mini_project_1.agent_performance_part(agent_name=11) stats: [numFiles=1, numRows=41, totalSize=1413, rawDataSize=1372]
Partition mini_project_1.agent_performance_part(agent_name=12) stats: [numFiles=1, numRows=40, totalSize=1382, rawDataSize=1342]
Partition mini_project_1.agent_performance_part(agent_name=13) stats: [numFiles=1, numRows=47, totalSize=1622, rawDataSize=1575]
Partition mini_project_1.agent_performance_part(agent_name=14) stats: [numFiles=1, numRows=42, totalSize=1441, rawDataSize=1399]
Partition mini_project_1.agent_performance_part(agent_name=15) stats: [numFiles=1, numRows=47, totalSize=1617, rawDataSize=1570]
Partition mini_project_1.agent_performance_part(agent_name=16) stats: [numFiles=1, numRows=25, totalSize=854, rawDataSize=829]
Partition mini_project_1.agent_performance_part(agent_name=17) stats: [numFiles=1, numRows=33, totalSize=1137, rawDataSize=1104]
Partition mini_project_1.agent_performance_part(agent_name=18) stats: [numFiles=1, numRows=29, totalSize=994, rawDataSize=965]
Partition mini_project_1.agent_performance_part(agent_name=19) stats: [numFiles=1, numRows=22, totalSize=753, rawDataSize=731]
Partition mini_project_1.agent_performance_part(agent_name=2) stats: [numFiles=1, numRows=30, totalSize=1012, rawDataSize=982]
Partition mini_project_1.agent_performance_part(agent_name=20) stats: [numFiles=1, numRows=21, totalSize=719, rawDataSize=698]
Partition mini_project_1.agent_performance_part(agent_name=21) stats: [numFiles=1, numRows=12, totalSize=415, rawDataSize=403]
Partition mini_project_1.agent_performance_part(agent_name=22) stats: [numFiles=1, numRows=12, totalSize=411, rawDataSize=399]
Partition mini_project_1.agent_performance_part(agent_name=23) stats: [numFiles=1, numRows=4, totalSize=137, rawDataSize=133]
Partition mini_project_1.agent_performance_part(agent_name=24) stats: [numFiles=1, numRows=17, totalSize=585, rawDataSize=568]
Partition mini_project_1.agent_performance_part(agent_name=25) stats: [numFiles=1, numRows=7, totalSize=239, rawDataSize=222]
Partition mini_project_1.agent_performance_part(agent_name=26) stats: [numFiles=1, numRows=9, totalSize=309, rawDataSize=300]
Partition mini_project_1.agent_performance_part(agent_name=27) stats: [numFiles=1, numRows=5, totalSize=172, rawDataSize=167]
Partition mini_project_1.agent_performance_part(agent_name=28) stats: [numFiles=1, numRows=8, totalSize=275, rawDataSize=267]
Partition mini_project_1.agent_performance_part(agent_name=29) stats: [numFiles=1, numRows=1, totalSize=34, rawDataSize=33]
Partition mini_project_1.agent_performance_part(agent_name=3) stats: [numFiles=1, numRows=26, totalSize=944, rawDataSize=916]
Partition mini_project_1.agent_performance_part(agent_name=30) stats: [numFiles=1, numRows=2, totalSize=68, rawDataSize=66]
Partition mini_project_1.agent_performance_part(agent_name=31) stats: [numFiles=1, numRows=1, totalSize=34, rawDataSize=33]
Partition mini_project_1.agent_performance_part(agent_name=32) stats: [numFiles=1, numRows=1, totalSize=34, rawDataSize=33]

Partition mini_project_1.agent_performance_part(agent_name=31) stats: [numFiles=1, numRows=1, totalSize=34, rawDataSize=33]
Partition mini_project_1.agent_performance_part(agent_name=32) stats: [numFiles=1, numRows=1, totalSize=34, rawDataSize=33]
Partition mini_project_1.agent_performance_part(agent_name=33) stats: [numFiles=1, numRows=3, totalSize=103, rawDataSize=100]
Partition mini_project_1.agent_performance_part(agent_name=35) stats: [numFiles=1, numRows=2, totalSize=69, rawDataSize=67]
Partition mini_project_1.agent_performance_part(agent_name=37) stats: [numFiles=1, numRows=3, totalSize=104, rawDataSize=101]
Partition mini_project_1.agent_performance_part(agent_name=39) stats: [numFiles=1, numRows=1, totalSize=35, rawDataSize=34]
Partition mini_project_1.agent_performance_part(agent_name=4) stats: [numFiles=1, numRows=29, totalSize=975, rawDataSize=946]
Partition mini_project_1.agent_performance_part(agent_name=40) stats: [numFiles=1, numRows=1, totalSize=34, rawDataSize=33]
Partition mini_project_1.agent_performance_part(agent_name=5) stats: [numFiles=1, numRows=24, totalSize=816, rawDataSize=792]
Partition mini_project_1.agent_performance_part(agent_name=52) stats: [numFiles=1, numRows=1, totalSize=35, rawDataSize=34]
Partition mini_project_1.agent_performance_part(agent_name=56) stats: [numFiles=1, numRows=1, totalSize=34, rawDataSize=33]
Partition mini_project_1.agent_performance_part(agent_name=6) stats: [numFiles=1, numRows=32, totalSize=1090, rawDataSize=1058]
Partition mini_project_1.agent_performance_part(agent_name=7) stats: [numFiles=1, numRows=26, totalSize=888, rawDataSize=862]
Partition mini_project_1.agent_performance_part(agent_name=8) stats: [numFiles=1, numRows=23, totalSize=787, rawDataSize=764]
Partition mini_project_1.agent_performance_part(agent_name=9) stats: [numFiles=1, numRows=41, totalSize=1411, rawDataSize=1370]
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Cumulative CPU: 2.91 sec HDFS Read: 118830 HDFS Write: 75799 SUCCESS
Total MapReduce CPU Time Spent: 2 seconds 910 msec
OK
_col0 _col1 _col2 _col3 _col4 _col5 _col6 _col7
Time taken: 24.795 seconds

```

For AgentLoggingReport:-

hive> create table if not exists agentloggingreport_part (

- > sr_no int,
- > Date date,
- > login_time string,
- > logout_time string,
- > Duration string
- >)
- > partitioned by (Agent_name string)
- > clustered by (Date) sorted by (Date) into 6 buckets

- > row format delimited
- > fields terminated by ',';

OK

Time taken: 0.056 seconds

hive> set hive.exec.dynamic.partition=true;

hive> set hive.exec.dynamic.partition.mode=nonstrict;

hive> insert into table agentloggingreport_part partition (Agent_name) select

sl_no,Date,login_time,logout_time,Duration,Agent_name from agentloggingreport;

```
hive> create table if not exists agentloggingreport_part (  
    > sr_no int,  
    > Date date,  
    > login_time string,  
    > logout_time string,  
    > Duration string  
    > )  
    > partitioned by (Agent_name string)  
    > clustered by (Date) sorted by (Date) into 6 buckets  
    > row format delimited  
    > fields terminated by ',';
```

OK

Time taken: 0.056 seconds

```
cloudera@quickstart-  
hive> insert into table agentloggingreport_part partition (Agent_name) select sl_no,Date,login_time,logout_time,Duration,Agent_name from agentloggingreport;  
Query ID = cloudera_20221007212525_1b26d379-ac5d-48b2-b19f-37a8c3513ba4  
Total jobs = 3  
Launching Job 1 out of 3  
Number of reduce tasks is set to 0 since there's no reduce operator  
Starting Job = job_1662892505239_0170, Tracking URL = http://quickstart.cloudera:8088/proxy/application_1662892505239_0170/  
Kill Command = /usr/lib/hadoop/bin/hadoop job -kill job_1662892505239_0170  
Hadoop job information for Stage-1: number of mappers: 1; number of reducers: 0  
2022-10-07 21:25:34,008 Stage-1 map = 0%, reduce = 0%  
2022-10-07 21:25:40,241 Stage-1 map = 100%, reduce = 0%, Cumulative CPU 2.25 sec  
MapReduce Total cumulative CPU time: 2 seconds 250 msec  
Ended Job = job_1662892505239_0170  
Stage-4 is selected by condition resolver.  
Stage-3 is filtered out by condition resolver.  
Stage-5 is filtered out by condition resolver.  
Moving data to: hdfs://quickstart.cloudera:8020/user/hive/warehouse/mini_project_1.db/agentloggingreport_part/.hive-staging_hive_2022-10-07_21-25-29_379_2479994672481259478-1/-ext-10000  
Loading data to table mini_project_1.agentloggingreport_part partition (agent_name=null)  
Time taken for load dynamic partitions : 6780  
Loading partition (agent_name=Aravind)  
Loading partition (agent_name=Shivan K)  
Loading partition (agent_name=Swati)  
Loading partition (agent_name=Sudhanshu Kumar)  
Loading partition (agent_name=Harikrishnan Shaji)  
Loading partition (agent_name=Shivananda Sonwane)  
Loading partition (agent_name=Mahesh Sarade)  
Loading partition (agent_name=Ishawant Kumar)  
Loading partition (agent_name=Manjunatha A)  
Loading partition (agent_name=Rishav Dash)  
Loading partition (agent_name=Bharath)  
Loading partition (agent_name=Mukesh)  
Loading partition (agent_name=Deepranjan Gupta)  
Loading partition (agent_name=Shiva Srivastava)  
Loading partition (agent_name=Aditya Iot)  
Loading partition (agent_name=Nitin M)  
Loading partition (agent_name=Sanjeev Kumar)  
Loading partition (agent_name=Dibyanshu)  
Loading partition (agent_name=Rishika Jain)  
Loading partition (agent_name=Ameya Jain)  
Loading partition (agent_name=Boktiar Ahmed Bappy)  
Loading partition (agent_name=Chaitra K Hiremath)  
Loading partition (agent_name=Khushboo Priya)  
Loading partition (agent_name=Prabir Kumar Satapathy)  
Loading partition (agent_name=Mandani Gupta)  
Loading partition (agent_name=Prateek Iot)  
Loading partition (agent_name=Mithun S)  
Loading partition (agent_name=Aditya Shinde)  
Loading partition (agent_name=Saikumarreddy N)  
Loading partition (agent_name=Paydesp Dixit)  
Loading partition (agent_name=Wasim)  
Loading partition (agent_name=Zeeshan)  
Loading partition (agent_name=Ineuron Intelligence)  
Loading partition (agent_name=Madhulika G)
```

```
cloudera@quickstart-
Loading partition (agent_name=Muskan Garg)
Loading partition (agent_name=Saurabh Shukla)
Loading partition (agent_name=Shubham Sharma)
Loading partition (agent_name=Prerna Singh)
Loading partition (agent_name=Suraj S Bilgi)
Loading partition (agent_name=Maistry)
Loading partition (agent_name=Hrisikesh Neogi)
Loading partition (agent_name=Anurag Tiwari)
Loading partition (agent_name=Tarun)
Loading partition (agent_name=Somviya Sivakumar)
Loading partition (agent_name=Ayushi Mishra)
Loading partition (agent_name=Hyder Abbas)
Loading partition (agent_name=Jawala Prakash)
Loading partition (agent_name=Amersh)
Loading partition (agent_name=Ankitjha)
Time taken for adding to write entity : 5
Partition mini_project_1.agentloggingreport_part(agent_name=Aditya Shinde) stats: [numFiles=1, numRows=1, totalSize=41, rawDataSize=40]
Partition mini_project_1.agentloggingreport_part(agent_name=Aditya Iot) stats: [numFiles=1, numRows=9, totalSize=368, rawDataSize=359]
Partition mini_project_1.agentloggingreport_part(agent_name=Amersh) stats: [numFiles=1, numRows=4, totalSize=164, rawDataSize=160]
Partition mini_project_1.agentloggingreport_part(agent_name=Ameya Jain) stats: [numFiles=1, numRows=10, totalSize=409, rawDataSize=399]
Partition mini_project_1.agentloggingreport_part(agent_name=Ankitjha) stats: [numFiles=1, numRows=4, totalSize=164, rawDataSize=160]
Partition mini_project_1.agentloggingreport_part(agent_name=Bhaurag Tiwari) stats: [numFiles=1, numRows=37, totalSize=1500, rawDataSize=1463]
Partition mini_project_1.agentloggingreport_part(agent_name=Aravind) stats: [numFiles=1, numRows=10, totalSize=409, rawDataSize=399]
Partition mini_project_1.agentloggingreport_part(agent_name=Ayushi Mishra) stats: [numFiles=1, numRows=18, totalSize=729, rawDataSize=711]
Partition mini_project_1.agentloggingreport_part(agent_name=Bharath) stats: [numFiles=1, numRows=9, totalSize=359, rawDataSize=350]
Partition mini_project_1.agentloggingreport_part(agent_name=Boktiar Ahmed Bappy) stats: [numFiles=1, numRows=17, totalSize=680, rawDataSize=663]
Partition mini_project_1.agentloggingreport_part(agent_name=Chaitra K Hiremath) stats: [numFiles=1, numRows=13, totalSize=530, rawDataSize=517]
Partition mini_project_1.agentloggingreport_part(agent_name=Deepanjan Gupta) stats: [numFiles=1, numRows=59, totalSize=2359, rawDataSize=2301]
Partition mini_project_1.agentloggingreport_part(agent_name=Dibyanshu) stats: [numFiles=1, numRows=208, totalSize=8361, rawDataSize=8153]
Partition mini_project_1.agentloggingreport_part(agent_name=Harikrishnan Shaji) stats: [numFiles=1, numRows=23, totalSize=931, rawDataSize=908]
Partition mini_project_1.agentloggingreport_part(agent_name=Hrisikesh Neogi) stats: [numFiles=1, numRows=37, totalSize=1493, rawDataSize=1456]
Partition mini_project_1.agentloggingreport_part(agent_name=Hyder Abbas) stats: [numFiles=1, numRows=2, totalSize=82, rawDataSize=80]
Partition mini_project_1.agentloggingreport_part(agent_name=Ineuron Intelligence) stats: [numFiles=1, numRows=1, totalSize=41, rawDataSize=40]
Partition mini_project_1.agentloggingreport_part(agent_name=Isahant Kumar) stats: [numFiles=1, numRows=49, totalSize=1980, rawDataSize=1931]
Partition mini_project_1.agentloggingreport_part(agent_name=Jawala Prakash) stats: [numFiles=1, numRows=16, totalSize=636, rawDataSize=620]
Partition mini_project_1.agentloggingreport_part(agent_name=Jaydeep Dixit) stats: [numFiles=1, numRows=11, totalSize=449, rawDataSize=438]
Partition mini_project_1.agentloggingreport_part(agent_name=Khushboo Priya) stats: [numFiles=1, numRows=18, totalSize=726, rawDataSize=708]
Partition mini_project_1.agentloggingreport_part(agent_name=Madhulika G) stats: [numFiles=1, numRows=17, totalSize=687, rawDataSize=670]
Partition mini_project_1.agentloggingreport_part(agent_name=Mahesh Sarade) stats: [numFiles=1, numRows=36, totalSize=1469, rawDataSize=1432]
Partition mini_project_1.agentloggingreport_part(agent_name=Maistry) stats: [numFiles=1, numRows=5, totalSize=200, rawDataSize=195]
Partition mini_project_1.agentloggingreport_part(agent_name=Manjunatha A) stats: [numFiles=1, numRows=8, totalSize=318, rawDataSize=310]
Partition mini_project_1.agentloggingreport_part(agent_name=Mithun S) stats: [numFiles=1, numRows=14, totalSize=564, rawDataSize=550]
Partition mini_project_1.agentloggingreport_part(agent_name=Mukesh) stats: [numFiles=1, numRows=3, totalSize=121, rawDataSize=118]
Partition mini_project_1.agentloggingreport_part(agent_name=Nandani Gupta) stats: [numFiles=1, numRows=12, totalSize=491, rawDataSize=479]
Partition mini_project_1.agentloggingreport_part(agent_name=Nandani Gupta) stats: [numFiles=1, numRows=11, totalSize=447, rawDataSize=436]
Partition mini_project_1.agentloggingreport_part(agent_name=Nishtha Jain) stats: [numFiles=1, numRows=18, totalSize=728, rawDataSize=710]
Partition mini_project_1.agentloggingreport_part(agent_name=Nitin M) stats: [numFiles=1, numRows=1, totalSize=41, rawDataSize=40]
Partition mini_project_1.agentloggingreport_part(agent_name=Prabir Kumar Satapathy) stats: [numFiles=1, numRows=26, totalSize=1054, rawDataSize=1028]
Partition mini_project_1.agentloggingreport_part(agent_name=Prateek Iot) stats: [numFiles=1, numRows=17, totalSize=690, rawDataSize=673]
Partition mini_project_1.agentloggingreport_part(agent_name=Prerna Singh) stats: [numFiles=1, numRows=18, totalSize=735, rawDataSize=717]
Partition mini_project_1.agentloggingreport_part(agent_name=Rishav Dash) stats: [numFiles=1, numRows=12, totalSize=481, rawDataSize=469]
Partition mini_project_1.agentloggingreport_part(agent_name=Saikumarreddy N) stats: [numFiles=1, numRows=10, totalSize=410, rawDataSize=400]

Partition mini_project_1.agentloggingreport_part(agent_name=Sanjeev Kumar) stats: [numFiles=1, numRows=20, totalSize=815, rawDataSize=795]
Partition mini_project_1.agentloggingreport_part(agent_name=Saurabh Shukla) stats: [numFiles=1, numRows=40, totalSize=1608, rawDataSize=1568]
Partition mini_project_1.agentloggingreport_part(agent_name=Shiva Srivastava) stats: [numFiles=1, numRows=15, totalSize=612, rawDataSize=597]
Partition mini_project_1.agentloggingreport_part(agent_name=Shivan K) stats: [numFiles=1, numRows=36, totalSize=1458, rawDataSize=1422]
Partition mini_project_1.agentloggingreport_part(agent_name=Shivnanda Sonwane) stats: [numFiles=1, numRows=15, totalSize=600, rawDataSize=585]
Partition mini_project_1.agentloggingreport_part(agent_name=Shubham Sharma) stats: [numFiles=1, numRows=35, totalSize=1425, rawDataSize=1390]
Partition mini_project_1.agentloggingreport_part(agent_name=Somviya Sivakumar) stats: [numFiles=1, numRows=24, totalSize=972, rawDataSize=948]
Partition mini_project_1.agentloggingreport_part(agent_name=Sudhanshu Kumar) stats: [numFiles=1, numRows=11, totalSize=446, rawDataSize=435]
Partition mini_project_1.agentloggingreport_part(agent_name=Suraj S Bilgi) stats: [numFiles=1, numRows=5, totalSize=200, rawDataSize=195]
Partition mini_project_1.agentloggingreport_part(agent_name=Swati) stats: [numFiles=1, numRows=5, totalSize=205, rawDataSize=200]
Partition mini_project_1.agentloggingreport_part(agent_name=Tarun) stats: [numFiles=1, numRows=1, totalSize=43, rawDataSize=42]
Partition mini_project_1.agentloggingreport_part(agent_name=Wasim) stats: [numFiles=1, numRows=20, totalSize=813, rawDataSize=793]
Partition mini_project_1.agentloggingreport_part(agent_name=Zeeshan) stats: [numFiles=1, numRows=10, totalSize=409, rawDataSize=399]
MapReduce Jobs Launched:
Stage-Stage-1: Map: 1 Cumulative CPU: 2.25 sec HDFS Read: 60069 HDFS Write: 44499 SUCCESS
Total MapReduce CPU Time Spent: 2 seconds 250 msec
OK
sl_no date login_time logout_time duration agent_name
Time taken: 21.402 seconds
hive> ]]
```