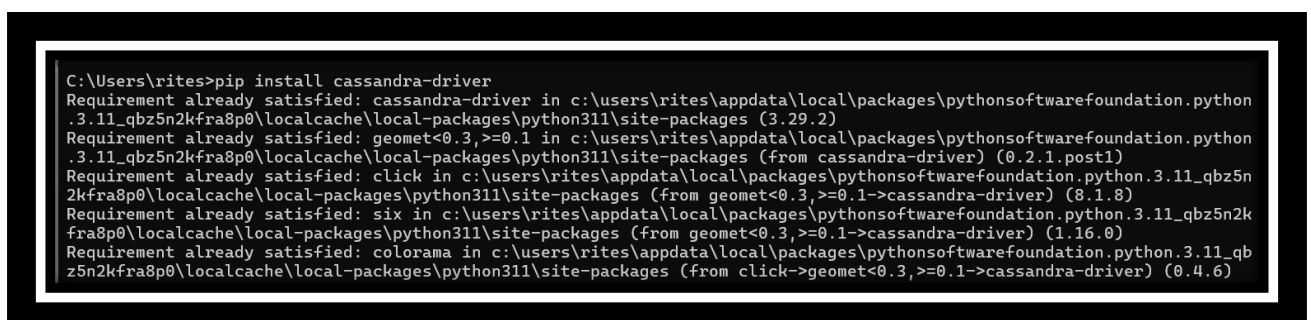
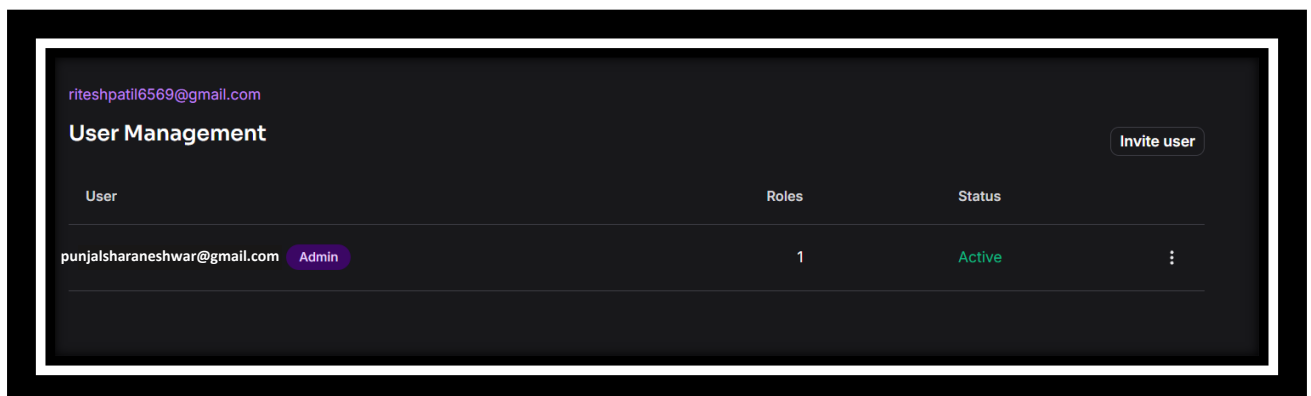
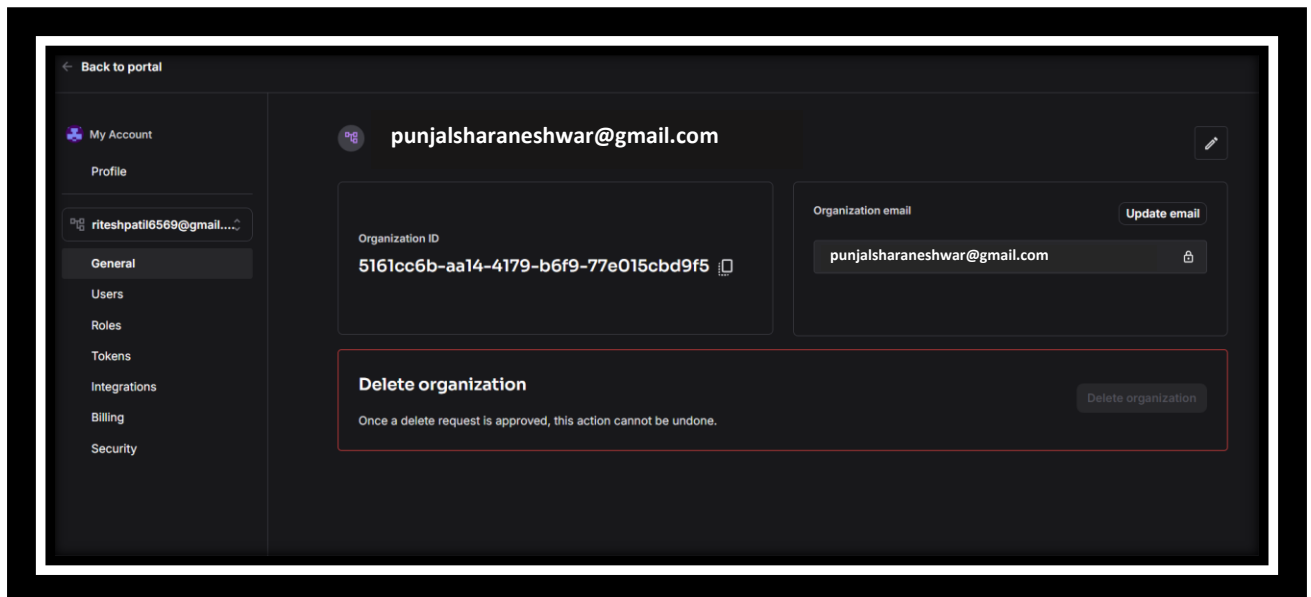


ADSL Assignment 10

Name: Sharaneshwar Punjal

PRN: 23520011

Batch: T7



```
C:\Users\rites>cd cassandra
```

```
C:\Users\rites\cassandra>python3 bin/cqlsh.py
WARNING: cqlsh was built against UNKNOWN, but this server is 5.0.3. All features may not work!
Connected to Test Cluster at 127.0.0.1:9042
[cqlsh 6.3.0 | Cassandra 5.0.3 | CQL spec 3.4.7 | Native protocol v5]
Use HELP for help.
cqlsh> |
```

```
cqlsh> CREATE KEYSPACE weather_data
... WITH replication = {
...   'class': 'SimpleStrategy',
...   'replication_factor': 3
... };
```

```
Warnings :
Your replication factor 3 for keyspace weather_data is higher than the number of nodes 1
cqlsh> |
```

```
cqlsh> USE weather_data;
cqlsh:weather_data> CREATE TABLE temperature_by_station (
...     weatherStationID text,
...     record_time timestamp,
...     temperature float,
...     PRIMARY KEY (weatherStationID, record_time)
... ) WITH CLUSTERING ORDER BY (record_time DESC);
cqlsh:weather_data>
```

```
cqlsh:weather_data> INSERT INTO temperature_by_station (weatherStationID, record_time, temperature)
... VALUES ('WS001', toTimestamp(now()), 28.5);
cqlsh:weather_data> |
```

weatherstationid	record_time	temperature
WS001	2025-04-09 03:20:34.786000+0000	28.5

```

cqlsh:weather_data> INSERT INTO temperature_by_station (weatherStationID, record_time, temperature)
... VALUES ('WS001', toTimestamp(now()), 28.5);
cqlsh:weather_data> INSERT INTO temperature_by_station (weatherStationID, record_time, temperature)
... VALUES ('WS001', toTimestamp(now()), 29.1);
cqlsh:weather_data> INSERT INTO temperature_by_station (weatherStationID, record_time, temperature)
... VALUES ('WS002', toTimestamp(now()), 30.2);
cqlsh:weather_data> INSERT INTO temperature_by_station (weatherStationID, record_time, temperature)
... VALUES ('WS003', toTimestamp(now()), 27.9);
cqlsh:weather_data> INSERT INTO temperature_by_station (weatherStationID, record_time, temperature)
... VALUES ('WS004', toTimestamp(now()), 31.4);
cqlsh:weather_data> SELECT * FROM temperature_by_station;

```

weatherstationid	record_time	temperature
WS004	2025-04-09 03:21:38.077000+0000	31.4
WS001	2025-04-09 03:21:36.668000+0000	29.1
WS001	2025-04-09 03:21:36.655000+0000	28.5
WS001	2025-04-09 03:20:34.786000+0000	28.5
WS002	2025-04-09 03:21:36.684000+0000	30.2
WS003	2025-04-09 03:21:36.700000+0000	27.9

Configure Node1 (127.0.0.2)

cluster_name: '2025GRP44'

listen_address: 127.0.0.2

rpc_address: 127.0.0.2

seed_provider:

- class_name: org.apache.cassandra.locator.SimpleSeedProvider

parameters:

- seeds: "127.0.0.2"

data_file_directories:

- C:/Cassandra/Node1/data

commitlog_directory: C:/Cassandra/Node1/commitlog

saved_caches_directory: C:/Cassandra/Node1/saved_caches

Configure Node2 (127.0.0.3)

cluster_name: '2025GRP44'

listen_address: 127.0.0.3

rpc_address: 127.0.0.3

seed_provider:

- class_name: org.apache.cassandra.locator.SimpleSeedProvider

parameters:

- seeds: "127.0.0.2"

data_file_directories:

- C:/Cassandra/Node2/data

commitlog_directory: C:/Cassandra/Node2/commitlog

saved_caches_directory: C:/Cassandra/Node2/saved_caches

Configure Node3 (127.0.0.4)

cluster_name: '2025GRP44'

listen_address: 127.0.0.4

rpc_address: 127.0.0.4

seed_provider:

- class_name: org.apache.cassandra.locator.SimpleSeedProvider

parameters:

- seeds: "127.0.0.2"

data_file_directories:

- C:/Cassandra/Node3/data

commitlog_directory: C:/Cassandra/Node3/commitlog

saved_caches_directory: C:/Cassandra/Node3/saved_caches

