

HQL script creating the data warehouse

```
CREATE TABLE route (  
    route_id INT,  
    route_name STRING,  
    metrics MAP<STRING, INT>  
)  
CLUSTERED BY (route_id) INTO 10 buckets  
STORED AS ORC;
```

```
CREATE TABLE date_dim (  
    date_id INT,  
    date_format DATE,  
    year INT,  
    month STRING  
)  
PARTITIONED BY (month_no INT, day_type STRING)  
CLUSTERED BY (date_id) INTO 30 BUCKETS  
STORED AS PARQUET;
```

```
CREATE TABLE time_dim (  
    time_id INT,  
    hour INT,  
    minutes INT  
)  
PARTITIONED BY (time_of_day STRING)  
STORED AS PARQUET;
```

```
CREATE TABLE travel (  
    bus_id INT,  
    route_id INT,  
    departure_time INT,  
    arrival_time INT,  
    tickets_validated INT,  
    bus_capacity INT,  
    avg_satisfaction_level_received INT,  
    satisfaction_surveys_number INT,  
    junk_id INT  
)  
PARTITIONED BY (travel_date INT)  
CLUSTERED BY (route_id, bus_id) INTO 50 BUCKETS  
STORED AS ORC;
```

```
CREATE TABLE junk (  
    junk_id INT,  
    satisfaction_level_category STRING,  
    occupation_level_category STRING  
)  
STORED AS PARQUET;
```

```
CREATE TABLE bus (  
    bus_id INT,  
    bus_registration STRING,  
    bus_office_id INT,  
    additional_equipment ARRAY<STRING>  
)  
PARTITIONED BY (bus_type STRING)  
CLUSTERED BY (bus_id) INTO 10 BUCKETS  
STORED AS ORC;
```

```
CREATE EXTERNAL TABLE bus_office (  
    bus_office_id INT,  
    bus_office_name STRING,  
    city STRING,  
    size_category STRING  
)  
ROW FORMAT DELIMITED  
FIELDS TERMINATED BY ','  
STORED AS TEXTFILE  
LOCATION 'hdfs:///user/mmajewska/database';
```