

## REPORT 5

**Introduction to the database:** NUMusic is an application used for music management. We can use the NUMusic database to manage the users who are using the app, navigate songs, subscribe to an available subscription plan to get access to perks like downloading songs, managing playlists, managing the payment details to get the subscription. Students, staff members and other employees associated can use this application.

**Objective:** To provide information on the playlists created by users within the music streaming service including the number of songs on each playlist, no. of playlist for each user and most popular playlist for each user.

**Query used:**

```
SELECT
  u.user_id,
  u.user_name,
  COUNT(DISTINCT p.playlist_id) AS number_of_playlists,
  COUNT(sp.song_id) AS number_of_songs,
  (
    SELECT
      playlist_name
    FROM
      (
        SELECT
          p2.playlist_id,
          p2.playlist_name,
```

```

        COUNT(sp2.song_id) AS num_songs
FROM
    Playlist p2
    LEFT JOIN Songs_Playlist sp2 ON p2.playlist_id = sp2.playlist_id
WHERE
    p2.user_id = u.user_id
GROUP BY
    p2.playlist_id,
    p2.playlist_name
    ORDER BY
        COUNT(sp2.song_id) DESC,
    p2.playlist_name ASC
    )
WHERE
    ROWNUM = 1
) AS most_popular_playlist
FROM
    User_Details u
    JOIN Playlist p ON u.user_id = p.user_id
    LEFT JOIN Songs_Playlist sp ON p.playlist_id = sp.playlist_id
GROUP BY
    u.user_id,
    u.user_name
ORDER BY
    COUNT(sp.song_id) DESC,
    number_of_playlists DESC,
    u.user_name ASC;

```

## Result screen shots:

```
22      p2.playlist_id,  
23      p2.playlist_name  
24  ORDER BY  
25      COUNT(sp2.song_id) DESC,  
26      p2.playlist_name ASC  
27  )  
28  WHERE  
29      ROWNUM = 1  
30  ) AS most_popular_playlist  
31  FROM  
32      User_Details u  
33      JOIN Playlist p ON u.user_id = p.user_id  
34      LEFT JOIN Songs_Playlist sp ON p.playlist_id = sp.playlist_id  
35  GROUP BY  
36      u.user_id,  
37      u.user_name  
38  ORDER BY  
39      COUNT(sp.song_id) DESC,  
40      number_of_playlists DESC,  
41      u.user_name ASC;  
42  
43
```

Script Output x Query Result x

SQL All Rows Fetched: 2 in 0.083 seconds

USER_ID	USER_NAME	NUMBER_OF_PLAYLISTS	NUMBER_OF_SONGS	MOST_POPULAR_PLAYLIST
1	101 Sampada	2	3	Gym Music
2	102 Shubhda	1	2	Calming music