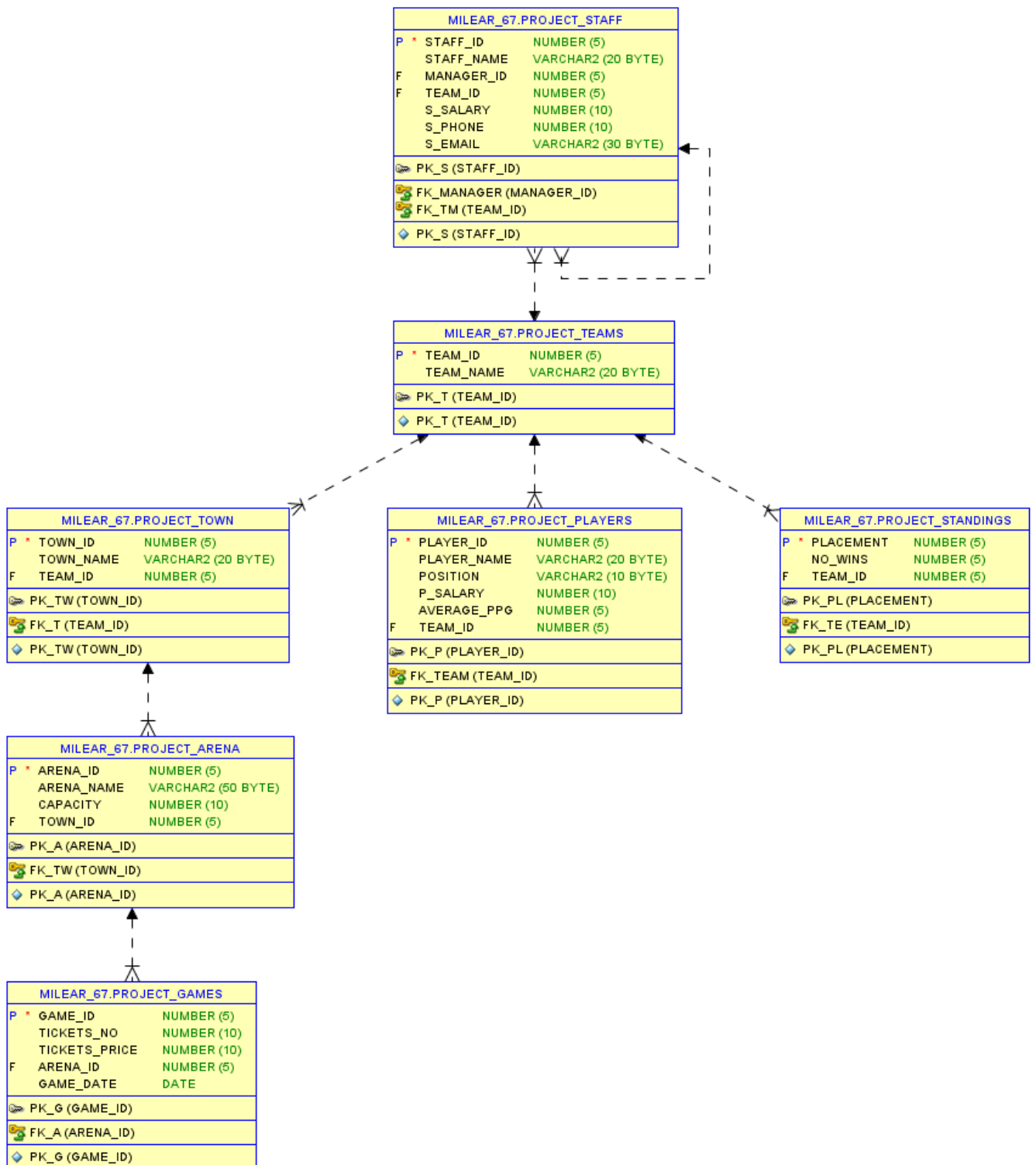


Database Project

(Basketball)

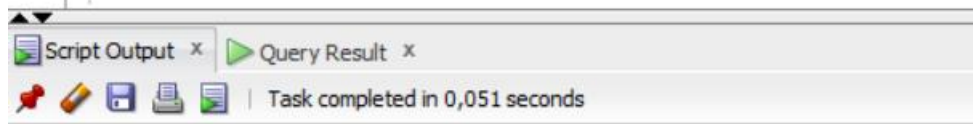
Milea Robert 1067



I. INTRODUCTION

```
ALTER TABLE PROJECT_ARENA MODIFY ( arena_name varchar2(50));

INSERT INTO PROJECT_ARENA values(1, 'Crypto.com Arena', 20000,
INSERT INTO PROJECT_ARENA values(2, 'Staples Center', 30000, 1)
INSERT INTO PROJECT_ARENA values(3, 'Footprint Center', 18000,
INSERT INTO PROJECT_ARENA values(4, 'The United Center', 22000,
INSERT INTO PROJECT_ARENA values(5, 'American Airlines Center',
INSERT INTO PROJECT_ARENA values(6, 'Madison Square Garden', 19
```



The screenshot shows a SQL script execution window with two tabs: 'Script Output' and 'Query Result'. The 'Script Output' tab is active, displaying the following text:

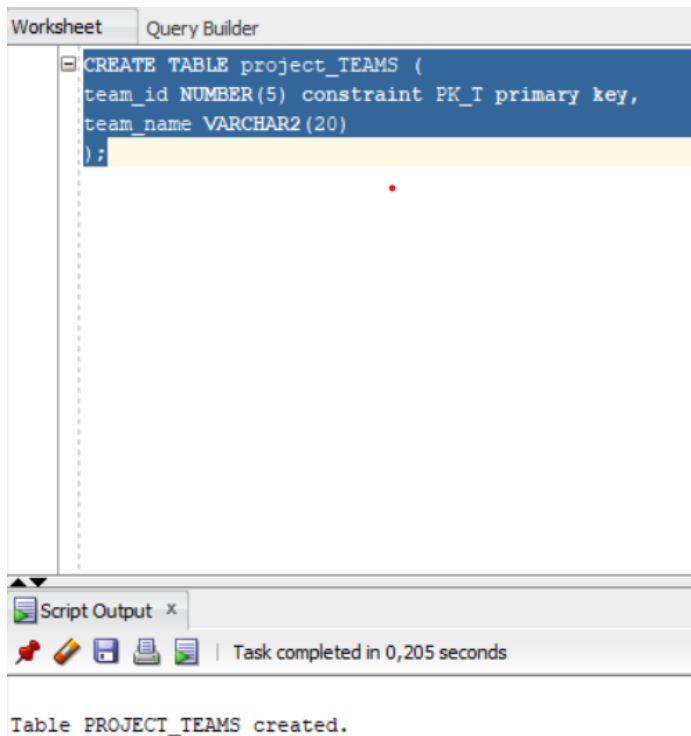
```
Task completed in 0,051 seconds
ORA-01735: invalid ALTER TABLE option
01735. 00000 - "invalid ALTER TABLE option"
*Cause:
*Action:

Error starting at line : 87 in command -
ALTER PROJECT_ARENA MODIFY ( arena_name varchar2(50))
Error report -
ORA-00940: invalid ALTER command
00940. 00000 - "invalid ALTER command"
*Cause:
*Action:

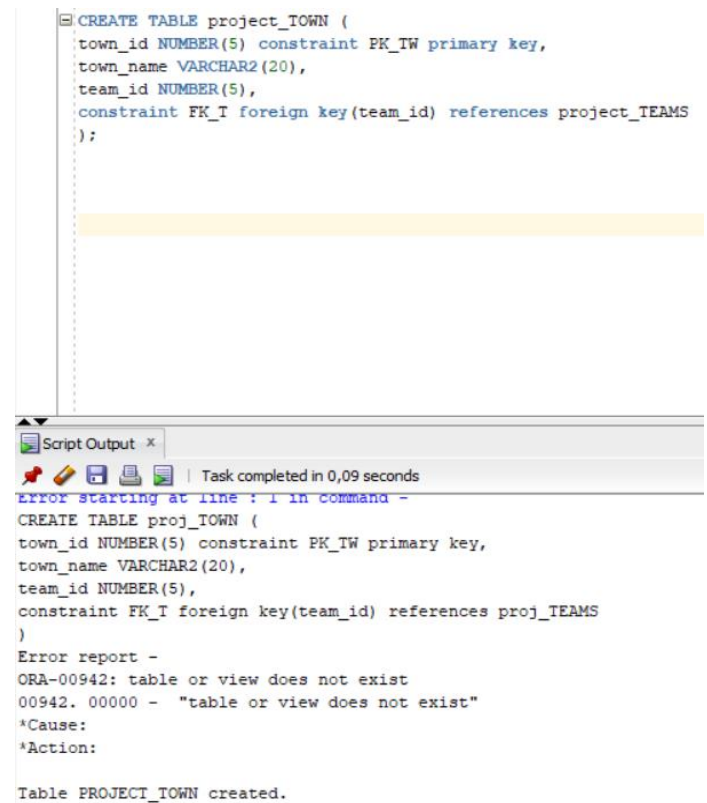
Table PROJECT_ARENA altered.
```

II. CREATE AND INSERT

```
CREATE TABLE project_TEAMS (  
    team_id NUMBER(5) constraint PK_T  
    primary key,  
    team_name VARCHAR2(20)  
);
```



```
CREATE TABLE project_TOWN (  
  town_id NUMBER(5) constraint PK_TW  
  primary key,  
  town_name VARCHAR2(20),  
  team_id NUMBER(5),  
  constraint FK_T foreign key(team_id)  
  references project_TEAMS  
);
```



```
CREATE TABLE project_ARENA (
  arena_id NUMBER(5) constraint PK_A primary key,
  arena_name VARCHAR2(20),
  capacity NUMBER(10),
  town_id NUMBER(5),
  constraint FK_TW foreign key(town_id) references project_TOWN
);
```

Script Output x

Task completed in 0,076 seconds

```
town_name VARCHAR2(20),
team_id NUMBER(5),
constraint FK_T foreign key(team_id) references proj_TEAMS
)
Error report -
ORA-00942: table or view does not exist
00942. 00000 - "table or view does not exist"
*Cause:
*Action:

Table PROJECT_TOWN created.

Table PROJECT_ARENA created.
```

```
CREATE TABLE project_ARENA (
  arena_id NUMBER(5) constraint
  PK_A primary key,
  arena_name VARCHAR2(20),
  capacity NUMBER(10),
  town_id NUMBER(5),
  constraint FK_TW foreign
  key(town_id) references
  project_TOWN
);
```

```
CREATE TABLE project_GAMES (
  game_id NUMBER(5) constraint
  PK_G primary key,
  tickets_no NUMBER(10),
  tickets_price NUMBER(10),
  arena_id NUMBER(5),
  constraint FK_A foreign
  key(arena_id) references
  project_ARENA
);
```

```
CREATE TABLE project_GAMES (
  game_id NUMBER(5) constraint PK_G primary key,
  tickets_no NUMBER(10),
  tickets_price NUMBER(10),
  arena_id NUMBER(5),
  constraint FK_A foreign key(arena_id) references project_ARENA
);
```

Script Output x

Task completed in 0,074 seconds

```
Error report -
ORA-00942: table or view does not exist
00942. 00000 - "table or view does not exist"
*Cause:
*Action:

Table PROJECT_TOWN created.

Table PROJECT_ARENA created.

Table PROJECT_GAMES created.
```

```

CREATE TABLE project_STAFF
(
  staff_id NUMBER(5) CONSTRAINT pk_S PRIMARY KEY,
  staff_name VARCHAR2(20),
  manager_id NUMBER(5),
  team_id NUMBER(5),
  CONSTRAINT fk_TM FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id),
  CONSTRAINT fk_manager FOREIGN KEY(manager_id) REFERENCES PROJECT_STAFF(staff_id)
);

```

Script Output x

Task completed in 0,099 seconds

```

staff_id NUMBER(5) CONSTRAINT pk_S PRIMARY KEY,
staff_name VARCHAR2(20) UNIQUE,
manager_id NUMBER(5),
team_id NUMBER(5),
CONSTRAINT fk_T FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id),
CONSTRAINT fk_manager FOREIGN KEY(manager_id) REFERENCES PROJECT_STAFF(staff_id)
)
Error report -
ORA-02264: name already used by an existing constraint
02264. 00000 - "name already used by an existing constraint"
*Cause:      The specified constraint name has to be unique.
*Action:     Specify a unique constraint name for the constraint.

Table PROJECT_STAFF created.

```

```

CREATE TABLE project_STAFF (
  staff_id NUMBER(5) CONSTRAINT pk_S PRIMARY KEY,
  staff_name VARCHAR2(20),
  manager_id NUMBER(5),
  team_id NUMBER(5),
  CONSTRAINT fk_TM FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id),
  CONSTRAINT fk_manager FOREIGN KEY(manager_id) REFERENCES
PROJECT_STAFF(staff_id)
);

```

```
ALTER TABLE PROJECT_STAFF ADD (
  s_salary NUMBER(10),
  s_phone NUMBER(10),
  s_email VARCHAR2(30)
);
```

Script Output x

Task completed in 0,08 seconds

```
team_id NUMBER(5),
CONSTRAINT fk_T FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id)
CONSTRAINT fk_manager FOREIGN KEY(manager_id) REFERENCES PROJECT_STAFF(player_id)
)
Error report -
ORA-02264: name already used by an existing constraint
02264. 00000 - "name already used by an existing constraint"
*Cause: The specified constraint name has to be unique.
*Action: Specify a unique constraint name for the constraint.

Table PROJECT_STAFF created.

Table PROJECT_STAFF altered.
```

```
ALTER TABLE PROJECT_STAFF ADD (
  s_salary NUMBER(10),
  s_phone NUMBER(10),
  s_email VARCHAR2(30)
);
```

(ALTER TABLE)

```
CREATE TABLE project_PLAYERS (
  player_id NUMBER(5)
  CONSTRAINT PK_P PRIMARY KEY,
  player_name VARCHAR2(20),
  position VARCHAR2(10),
  p_salary NUMBER(10),
  average_ppg NUMBER(5),
  team_id NUMBER(5),
  CONSTRAINT fk_TEAM FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id)
);
```

```
CREATE TABLE project_PLAYERS (
  player_id NUMBER(5) CONSTRAINT PK_P PRIMARY KEY,
  player_name VARCHAR2(20),
  position VARCHAR2(10),
  p_salary NUMBER(10),
  average_ppg NUMBER(5),
  team_id NUMBER(5),
  CONSTRAINT fk_TEAM FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id)
);
```

Script Output x

Task completed in 0,084 seconds

```

Error report -
ORA-02264: name already used by an existing constraint
02264. 00000 - "name already used by an existing constraint"
*Cause: The specified constraint name has to be unique.
*Action: Specify a unique constraint name for the constraint.

Table PROJECT_STAFF created.

Table PROJECT_STAFF altered.

Table PROJECT_PLAYERS created.
```



```
CREATE TABLE project_STANDINGS (
  placement NUMBER(5) CONSTRAINT PK_PL PRIMARY KEY,
  no_wins NUMBER(5),
  team_id NUMBER(5),
  CONSTRAINT fk_TE FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id)
);
```

Script Output x

Task completed in 0,207 seconds

ERROR starting at line : 50 in command -

```
CREATE TABLE project_STANDINGS (
  placement NUMBER(5) CONSTRAINT PK_PL PRIMARY KEY,
  no_wins NUMBER(5),
  team_id NUMBER(5),
  CONSTRAINT fk_TEAM FOREIGN KEY(team_id) REFERENCES PROJECT_TEAMS(team_id)
)
Error report -
ORA-02264: name already used by an existing constraint
02264. 00000 - "name already used by an existing constraint"
*Cause: The specified constraint name has to be unique.
*Action: Specify a unique constraint name for the constraint.
```

Table PROJECT_STANDINGS created.

```
CREATE TABLE
project_STANDINGS (

placement NUMBER(5)
CONSTRAINT PK_PL PRIMARY
KEY,

no_wins NUMBER(5),

team_id NUMBER(5),

CONSTRAINT fk_TE FOREIGN
KEY(team_id) REFERENCES
PROJECT_TEAMS(team_id)

);
```

```
INSERT INTO
PROJECT_TEAMS values(1,
'Los Angeles Lakers');
```

```
INSERT INTO
PROJECT_TEAMS values(2,
'Phoenix Suns');
```

```
INSERT INTO
PROJECT_TEAMS values(3,
'Dallas Mavericks');
```

```
INSERT INTO
PROJECT_TEAMS values(4,
'Memphis Grizzlies');
```

```
INSERT INTO PROJECT_TEAMS values(1, 'Los Angeles Lakers');
INSERT INTO PROJECT_TEAMS values(2, 'Phoenix Suns');
INSERT INTO PROJECT_TEAMS values(3, 'Dallas Mavericks');
INSERT INTO PROJECT_TEAMS values(4, 'Memphis Grizzlies');
```

Script Output x

Task completed in 0,075 seconds

4 rows deleted.

1 row inserted.

1 row inserted.

1 row inserted.

1 row inserted.

(DELETE ONE TEAM)

```
DELETE FROM PROJECT_TEAMS  
where team_id = 4;
```

```
DELETE FROM PROJECT_TEAMS where team_id = 4;  
  
SELECT* FROM PROJECT_TEAMS;
```

Script Output x Query Result x
Task completed in 0,066 seconds

Error starting at line : 71 in command -
INSERT INTO PROJECT_TEAMS values(3, 'Dallas Mavericks')
Error report -
ORA-00001: unique constraint (MILEAR_67.PK_T) violated

Error starting at line : 72 in command -
INSERT INTO PROJECT_TEAMS values(4, 'Memphis Grizzlies')
Error report -
ORA-00001: unique constraint (MILEAR_67.PK_T) violated

1 row deleted.

```
INSERT INTO PROJECT_TOWN values(1, 'Los Angeles', 1);  
INSERT INTO PROJECT_TOWN values(2, 'Phoenix', 2);  
INSERT INTO PROJECT_TOWN values(3, 'Dallas', 3);
```

Script Output x Query Result x
Task completed in 0,443 seconds

Error at Command Line : 81 Column : 36
Error report -
SQL Error: ORA-00984: column not allowed here
00984. 00000 - "column not allowed here"
*Cause:
*Action:

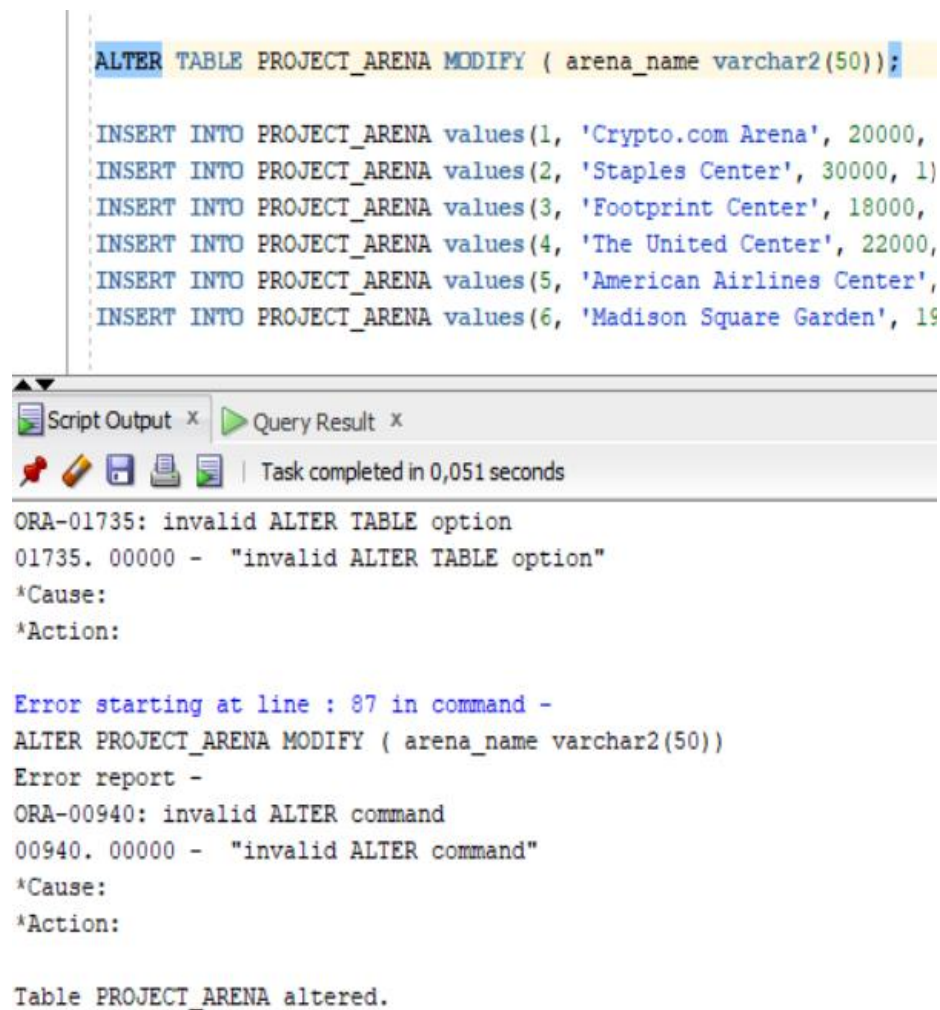
1 row inserted.

1 row inserted.

1 row inserted.

```
INSERT INTO PROJECT_TOWN values(1,  
'Los Angeles', 1);  
  
INSERT INTO PROJECT_TOWN values(2,  
'Phoenix', 2);  
  
INSERT INTO PROJECT_TOWN values(3,  
'Dallas', 3);
```


(ALTER TABLE FOR ARENA)



```
ALTER TABLE PROJECT_ARENA MODIFY ( arena_name varchar2(50));

INSERT INTO PROJECT_ARENA values(1, 'Crypto.com Arena', 20000,
INSERT INTO PROJECT_ARENA values(2, 'Staples Center', 30000, 1)
INSERT INTO PROJECT_ARENA values(3, 'Footprint Center', 18000,
INSERT INTO PROJECT_ARENA values(4, 'The United Center', 22000,
INSERT INTO PROJECT_ARENA values(5, 'American Airlines Center',
INSERT INTO PROJECT_ARENA values(6, 'Madison Square Garden', 19
```

Script Output x Query Result x

Task completed in 0,051 seconds

ORA-01735: invalid ALTER TABLE option
01735. 00000 - "invalid ALTER TABLE option"
*Cause:
*Action:

Error starting at line : 87 in command -
ALTER PROJECT_ARENA MODIFY (arena_name varchar2(50))
Error report -
ORA-00940: invalid ALTER command
00940. 00000 - "invalid ALTER command"
*Cause:
*Action:

Table PROJECT_ARENA altered.

```
ALTER TABLE PROJECT_ARENA MODIFY ( arena_name varchar2(50));

INSERT INTO PROJECT_ARENA values(1, 'Crypto.com Arena', 20000, 1);

INSERT INTO PROJECT_ARENA values(2, 'Staples Center', 30000, 1);

INSERT INTO PROJECT_ARENA values(3, 'Footprint Center', 18000, 2);

INSERT INTO PROJECT_ARENA values(4, 'The United Center', 22000, 2);

INSERT INTO PROJECT_ARENA values(5, 'American Airlines Center', 25000, 3);

INSERT INTO PROJECT_ARENA values(6, 'Madison Square Garden', 19000, 3);
```

```
INSERT INTO PROJECT_GAMES values(1, 18440, 200, 1);  
INSERT INTO PROJECT_GAMES values(2, 28900, 300, 2);  
INSERT INTO PROJECT_GAMES values(3, 29440, 300, 2);  
INSERT INTO PROJECT_GAMES values(4, 17200, 150, 3);  
INSERT INTO PROJECT_GAMES values(5, 20300, 200, 4);  
INSERT INTO PROJECT_GAMES values(6, 23500, 250, 5);
```

Script Output x Query Result x
Task completed in 0,449 seconds

1 row inserted.

1 row inserted.

1 row inserted.

1 row inserted.

1 row inserted.

1 row inserted.

```
INSERT INTO PROJECT_GAMES values(1, 18440, 200, 1);
```

```
INSERT INTO PROJECT_GAMES values(2, 28900, 300, 2);
```

```
INSERT INTO PROJECT_GAMES values(3, 29440, 300, 2);
```

```
INSERT INTO PROJECT_GAMES values(4, 17200, 150, 3);
```

```
INSERT INTO PROJECT_GAMES values(5, 20300, 200, 4);
```

```
INSERT INTO PROJECT_GAMES values(6, 23500, 250, 5);
```

```
INSERT INTO PROJECT_ARENA values(5, 'American Airlines Center', 25000, 3);
```

```
INSERT INTO PROJECT_ARENA values(6, 'Madison Square Garden', 19000, 3);
```

```

INSERT INTO PROJECT_STAFF values(1, 'Jack Black', NULL, 1, 5000, 075344313, 'jackblack@gmail.com');
INSERT INTO PROJECT_STAFF values(2, 'Dwayne Wade', NULL, 2, 6000, 0775349543, 'dwaynewade@gmail.com');
INSERT INTO PROJECT_STAFF values(3, 'Kevin Hart', NULL, 3, 5500, 0736894654, 'kevvv@gmail.com');
INSERT INTO PROJECT_STAFF values(4, 'Kevin Johnson', 2, 2, 2000, 0795346842, 'johnnykev@yahoo.com');
INSERT INTO PROJECT_STAFF values(5, 'John Wayne', 2, 2, 3000, 0758838431, 'wildwayne@gmail.com');
INSERT INTO PROJECT_STAFF values(6, 'Harry Wang', 1, 1, 2200, 0778325498, 'wanggang@gmail.com');
INSERT INTO PROJECT_STAFF values(7, 'Harry Kane', 1, 1, 2900, 0788653424, 'harryscholes@gmail.com');
INSERT INTO PROJECT_STAFF values(8, 'Bobby Johnson', 3, 3, 1900, 0767341895, 'bobbyj@gmail.com');
INSERT INTO PROJECT_STAFF values(9, 'Stan Lee', 3, 3, 3000, 0747853296, 'stanlee@gmail.com');

```

Script Output x Query Result x
 Task completed in 0,165 seconds

1 row inserted.

 1 row inserted.

 1 row inserted.

 1 row inserted.

 1 row inserted.

 1 row inserted.

```

INSERT INTO PROJECT_STAFF values(1, 'Jack Black', NULL, 1, 5000, 075344313,
'jackblack@gmail.com');

INSERT INTO PROJECT_STAFF values(2, 'Dwayne Wade', NULL, 2, 6000, 0775349543,
'dwaynewade@gmail.com');

INSERT INTO PROJECT_STAFF values(3, 'Kevin Hart', NULL, 3, 5500, 0736894654,
'kevvv@gmail.com');

INSERT INTO PROJECT_STAFF values(4, 'Kevin Johnson', 2, 2, 2000, 0795346842,
'johnnykev@yahoo.com');

INSERT INTO PROJECT_STAFF values(5, 'John Wayne', 2, 2, 3000, 0758838431,
'wildwayne@gmail.com');

INSERT INTO PROJECT_STAFF values(6, 'Harry Wang', 1, 1, 2200, 0778325498,
'wanggang@gmail.com');

INSERT INTO PROJECT_STAFF values(7, 'Harry Kane', 1, 1, 2900, 0788653424,
'harryscholes@gmail.com');

INSERT INTO PROJECT_STAFF values(8, 'Bobby Johnson', 3, 3, 1900, 0767341895,
'bobbyj@gmail.com');

INSERT INTO PROJECT_STAFF values(9, 'Stan Lee', 3, 3, 3000, 0747853296,
'stanlee@gmail.com');

```

```

INSERT INTO PROJECT_PLAYERS values(1, 'Milea Robert', 'PG', 34000000, 28, 1);
INSERT INTO PROJECT_PLAYERS values(2, 'Troy Brown', 'SG', 14000000, 12, 1);
INSERT INTO PROJECT_PLAYERS values(3, 'Max Christie', 'SF', 10000000, 4, 1);
INSERT INTO PROJECT_PLAYERS values(4, 'Lebron James', 'PF', 42000000, 29, 1);
INSERT INTO PROJECT_PLAYERS values(5, 'Anthony Davis', 'C', 41000000, 23, 1);
INSERT INTO PROJECT_PLAYERS values(6, 'Chris Paul', 'PG', 32000000, 16, 2);
INSERT INTO PROJECT_PLAYERS values(7, 'Devin Booker', 'SG', 39000000, 28, 2);
INSERT INTO PROJECT_PLAYERS values(8, 'Mikal Bridges', 'SF', 26000000, 15, 2);
INSERT INTO PROJECT_PLAYERS values(9, 'Torrey Craig', 'PF', 14000000, 8, 2);
INSERT INTO PROJECT_PLAYERS values(10, 'Deandre Ayton', 'C', 30000000, 17, 2);
INSERT INTO PROJECT_PLAYERS values(11, 'Luka Doncic', 'PG', 37000000, 33, 3);
INSERT INTO PROJECT_PLAYERS values(12, 'Spencer Dinwiddie', 'SG', 21000000, 13, 3);
INSERT INTO PROJECT_PLAYERS values(13, 'Tim Hardaway', 'SF', 18000000, 10, 3);
INSERT INTO PROJECT_PLAYERS values(14, 'Davis Bertans', 'PF', 15000000, 9, 3);
INSERT INTO PROJECT_PLAYERS values(15, 'Christian Wood', 'C', 26000000, 17, 3);

```

```
SELECT* FROM PROJECT_PLAYERS ORDER BY player_id;
```

Script Output x Query Result x

SQL | All Rows Fetched: 15 in 0,011 seconds

| | PLAYER_ID | PLAYER_NAME | POSITION | P_SALARY | AVERAGE_PPG | TEAM_ID |
|----|-----------|-------------------|----------|----------|-------------|---------|
| 1 | 1 | Milea Robert | PG | 34000000 | 28 | 1 |
| 2 | 2 | Troy Brown | SG | 14000000 | 12 | 1 |
| 3 | 3 | Max Christie | SF | 10000000 | 4 | 1 |
| 4 | 4 | Lebron James | PF | 42000000 | 29 | 1 |
| 5 | 5 | Anthony Davis | C | 41000000 | 23 | 1 |
| 6 | 6 | Chris Paul | PG | 32000000 | 16 | 2 |
| 7 | 7 | Devin Booker | SG | 39000000 | 28 | 2 |
| 8 | 8 | Mikal Bridges | SF | 26000000 | 15 | 2 |
| 9 | 9 | Torrey Craig | PF | 14000000 | 8 | 2 |
| 10 | 10 | Deandre Ayton | C | 30000000 | 17 | 2 |
| 11 | 11 | Luka Doncic | PG | 37000000 | 33 | 3 |
| 12 | 12 | Spencer Dinwiddie | SG | 21000000 | 13 | 3 |
| 13 | 13 | Tim Hardaway | SF | 18000000 | 10 | 3 |
| 14 | 14 | Davis Bertans | PF | 15000000 | 9 | 3 |
| 15 | 15 | Christian Wood | C | 26000000 | 17 | 3 |

```
INSERT INTO PROJECT_PLAYERS values(1, 'Milea Robert', 'PG', 34000000, 28, 1)
```

(ROW WITH MY NAME)

```
UPDATE PROJECT_STAFF
set staff_name= 'Kevin Lavine' where staff_id=3;
```

Script Output x Query Result x

Task completed in 0,033 seconds

1 row inserted.

1 row inserted.

1 row inserted.

1 row inserted.

1 row inserted.

1 row updated.

(UPDATE NAME OF STAFF)

```
INSERT INTO PROJECT_STANDINGS values(1, 32, 1);
INSERT INTO PROJECT_STANDINGS values(2, 30, 3);
INSERT INTO PROJECT_STANDINGS values(3, 29, 2);
```

Script Output x Query Result x

Task completed in 0,039 seconds

*Action:

Error starting at line : 133 in command -
INSERT INTO PROJECT_PLAYERS values(12, 'Spencer Dinwiddie', 'SG'
Error at Command Line : 133 Column : 66
Error report -
SQL Error: ORA-00917: missing comma
00917. 00000 - "missing comma"
*Cause:
*Action:

1 row inserted.

1 row inserted.

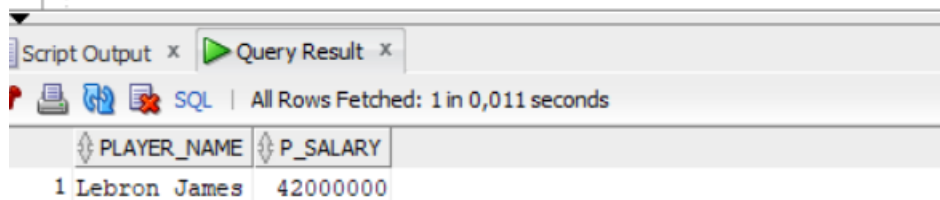
1 row inserted.


```
INSERT INTO PROJECT_STANDINGS values(1, 32, 1);  
INSERT INTO PROJECT_STANDINGS values(2, 30, 3);  
INSERT INTO PROJECT_STANDINGS values(3, 29, 2);
```

III. Exercises

1. A select that shows the player's salaries <20000000

```
SELECT player_name, p_salary from PROJECT_PLAYERS  
where player_name like '%James%';
```



Script Output x Query Result x

SQL | All Rows Fetched: 1 in 0,011 seconds

| | PLAYER_NAME | P_SALARY |
|---|--------------|----------|
| 1 | Lebron James | 42000000 |

2. Show the salary of employees with 'James' in their name

```
--a select that shows us the player's salaries < 20000000  
SELECT player_name, p_salary from PROJECT_PLAYERS  
where p_salary < 20000000 order by player_name;
```



Script Output x Query Result x

SQL | All Rows Fetched: 5 in 0,012 seconds

| | PLAYER_NAME | P_SALARY |
|---|---------------|----------|
| 1 | Davis Bertans | 15000000 |
| 2 | Max Christie | 10000000 |
| 3 | Tim Hardaway | 18000000 |
| 4 | Torrey Craig | 14000000 |
| 5 | Troy Brown | 14000000 |

3. Show Managers

```
SELECT staff_name AS Managers FROM PROJECT_STAFF
where manager_id IS NULL;
```

Script Output x Query Result x

SQL | All Rows Fetched: 3 in 0,01 seconds

| MANAGERS |
|----------------|
| 1 Jack Black |
| 2 Dwayne Wade |
| 3 Kevin Lavine |

4. Select players with points per game between 25 and 35

```
--display players who average BETWEEN 25 and 30 points per game (PPG)

SELECT player_name, average_ppg FROM PROJECT_PLAYERS
WHERE average_ppg BETWEEN 25 AND 35 ORDER BY average_ppg DESC;
```

Query Result x

SQL | All Rows Fetched: 4 in 0,008 seconds

| PLAYER_NAME | AVERAGE_PPG |
|----------------|-------------|
| 1 Luka Doncic | 33 |
| 2 LeBron James | 29 |
| 3 Devin Booker | 28 |
| 4 Milea Robert | 28 |

5. How many employees does the 2nd manager have

```
--How many employees does manager 2 have

SELECT Count(staff id) as number_of_emp, manager id
FROM PROJECT_STAFF
group by manager_id
having manager_id = 2;
```

Query Result x

SQL | All Rows Fetched: 1 in 0,01 seconds

| NUMBER_OF_EMP | MANAGER_ID |
|---------------|------------|
| 1 | 2 |

6. Find player with average points per game greater than ANY other players

```
--Find the player whose PPG is greater than any other ppg of a player in the players table

SELECT* FROM project_players
WHERE player_name IN(SELECT player_name FROM project_players WHERE average_ppg > ANY (SELECT average_ppg FROM project_players));
```

Query Result x

All Rows Fetched: 14 in 0,021 seconds

| PLAYER_ID | PLAYER_NAME | POSITION | P_SALARY | AVERAGE_PPG | TEAM_ID |
|-----------|----------------|----------|----------|-------------|---------|
| 1 | 11 Luka Doncic | PG | 37000000 | 33 | 3 |

7. Case to sort the type of salary

```
--we use case to see the type of salary our staff has

SELECT staff_name, s_salary,
CASE when s_salary > 4000 THEN 'Big salary'
      when s_salary < 4000 THEN 'Small salary'
      ELSE 'Average salary'
END AS Salary_type
FROM PROJECT_STAFF;
```

Query Result x

All Rows Fetched: 9 in 0,009 seconds

| | STAFF_NAME | S_SALARY | SALARY_TYPE |
|---|---------------|----------|--------------|
| 1 | Jack Black | 5000 | Big salary |
| 2 | Dwayne Wade | 6000 | Big salary |
| 3 | Kevin Lavine | 5500 | Big salary |
| 4 | Kevin Johnson | 2000 | Small salary |
| 5 | John Wayne | 3000 | Small salary |
| 6 | Harry Wang | 2200 | Small salary |
| 7 | Harry Kane | 2900 | Small salary |
| 8 | Bobby Johnson | 1900 | Small salary |
| 9 | Stan Lee | 3000 | Small salary |

8. Game night simulation

```
--This query will retrieve the team name, town name, arena name, arena capacity, tickets number, tickets price, standing placement, and standing number of wins
--It will retrieve the data by joining all the tables on their respective foreign key columns.

SELECT teams.team_name, towns.town_name, arenas.arena_name, arenas.capacity, games.tickets_no, games.tickets_price, standings.placements, standings.no_wins
FROM project_teams teams
JOIN project_town towns ON teams.team_id = towns.team_id
JOIN project_arena arenas ON towns.town_id = arenas.town_id
JOIN project_games games ON arenas.arena_id = games.arena_id
JOIN project_standings standings ON teams.team_id = standings.team_id
```

Query Result x

All Rows Fetched: 6 in 0,03 seconds

| TEAM_NAME | TOWN_NAME | ARENA_NAME | CAPACITY | TICKETS_NO | TICKETS_PRICE | PLACEMENT | NO_WINS |
|----------------------|-------------|--------------------------|----------|------------|---------------|-----------|---------|
| 1 Los Angeles Lakers | Los Angeles | Crypto.com Arena | 20000 | 18440 | 200 | 1 | 32 |
| 2 Los Angeles Lakers | Los Angeles | Staples Center | 30000 | 28900 | 300 | 1 | 32 |
| 3 Los Angeles Lakers | Los Angeles | Staples Center | 30000 | 29440 | 300 | 1 | 32 |
| 4 Phoenix Suns | Phoenix | Footprint Center | 18000 | 17200 | 150 | 3 | 29 |
| 5 Phoenix Suns | Phoenix | The United Center | 22000 | 20300 | 200 | 3 | 29 |
| 6 Dallas Mavericks | Dallas | American Airlines Center | 25000 | 23500 | 250 | 2 | 30 |

9. Compute total number of tickets and average ticket price (take into consideration only teams who have sold more than 30000 tickets)

[illegible]

10. Add game dates to PROJECT_GAMES table

```
--adding game_dates to my games table
```

```
ALTER TABLE project_games  
ADD game_date DATE;
```

```
UPDATE project_games  
SET game_date = '05-jan-2022'  
WHERE game_id = 1;
```

```
UPDATE project_games  
SET game_date = '09-jan-2022'
```

```
WHERE game_id = 2;
```

```
UPDATE project_games  
SET game_date = '24-jun-2022'  
WHERE game_id = 3;
```

```
UPDATE project_games
```

Query Result x Script Output x | Task completed in 0,951 seconds

1 row updated.

1 row updated.

1 row updated.

1 row updated.

11. Show the team name, arena name and the newly formatted dates

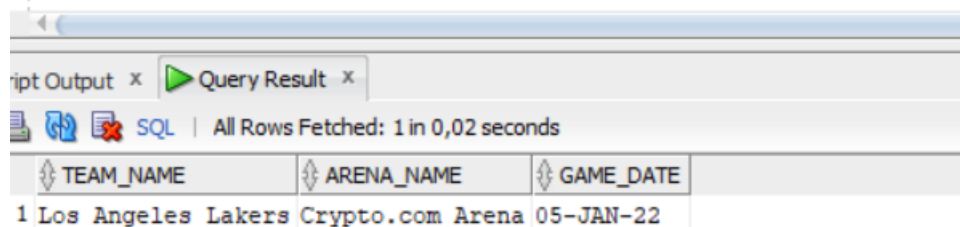
```
--using TO_CHAR to change the format of our dates and show the team name, arena name and new game date

SELECT teams.team_name, arenas.arena_name, TO_CHAR(games.game_date, 'yyyy-mon-dd') as game_date
FROM project_teams teams
JOIN project_town towns ON teams.team_id = towns.team_id
JOIN project_arena arenas ON towns.town_id = arenas.town_id
JOIN project_games games ON arenas.arena_id = games.arena_id
```

12. Show the data from games played on 05-jan-2022

```
--shows data for games that have a date of 05-jan-2022

SELECT teams.team_name, arenas.arena_name, games.game_date
FROM project_teams teams
JOIN project_town towns ON teams.team_id = towns.team_id
JOIN project_arena arenas ON towns.town_id = arenas.town_id
JOIN project_games games ON arenas.arena_id = games.arena_id
WHERE games.game_date = TO_DATE('05-JAN-2022', 'DD-MON-YYYY');
```



Script Output x Query Result x

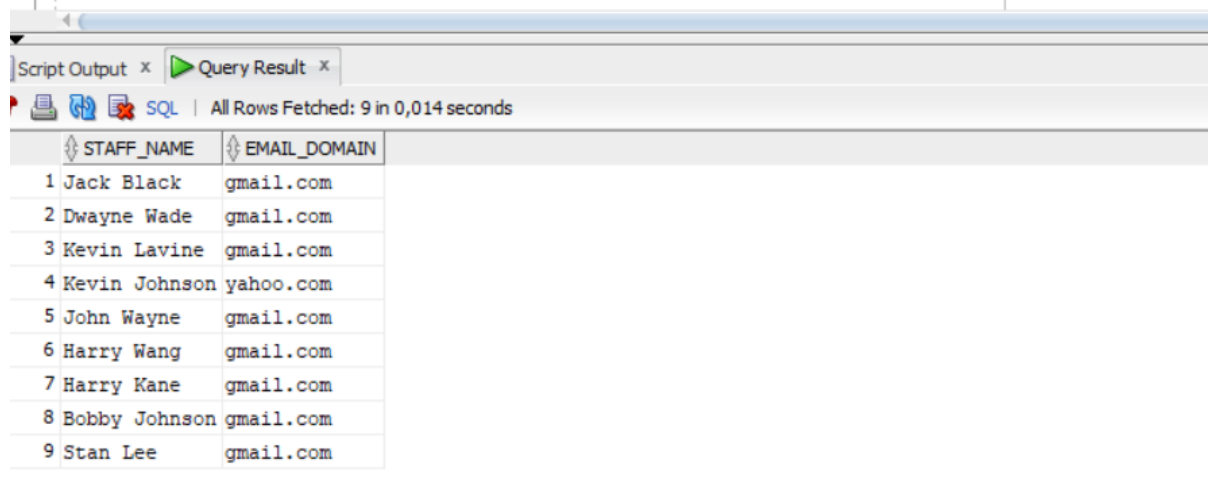
SQL | All Rows Fetched: 1 in 0,02 seconds

| | TEAM_NAME | ARENA_NAME | GAME_DATE |
|---|--------------------|------------------|-----------|
| 1 | Los Angeles Lakers | Crypto.com Arena | 05-JAN-22 |

13. Show domain and staff e-mail

```
-- shows the domain of staff emailsS

SELECT staff.staff_name, SUBSTR(staff.s_email, INSTR(staff.s_email, '@')+1) as email_domain
FROM project_staff staff
```



Script Output x Query Result x

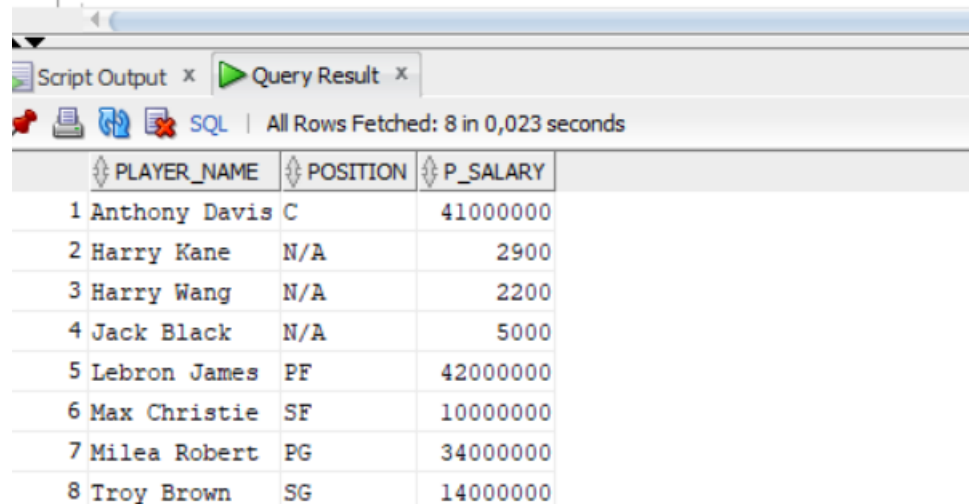
SQL | All Rows Fetched: 9 in 0,014 seconds

| | STAFF_NAME | EMAIL_DOMAIN |
|---|---------------|--------------|
| 1 | Jack Black | gmail.com |
| 2 | Dwayne Wade | gmail.com |
| 3 | Kevin Lavine | gmail.com |
| 4 | Kevin Johnson | yahoo.com |
| 5 | John Wayne | gmail.com |
| 6 | Harry Wang | gmail.com |
| 7 | Harry Kane | gmail.com |
| 8 | Bobby Johnson | gmail.com |
| 9 | Stan Lee | gmail.com |

14. Show team 1 staff and players simultaneously

```
--using union to show both staff and players on team 1

SELECT player_name, position, p_salary
FROM project_players
WHERE team_id = 1
UNION
SELECT staff_name, 'N/A' as position, s_salary
FROM project_staff
WHERE team_id = 1;
```



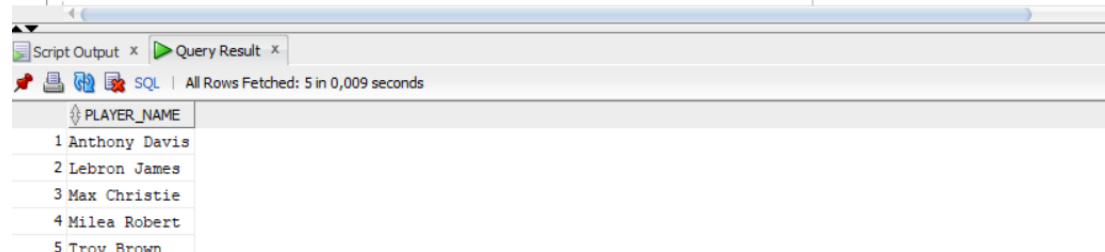
The screenshot shows a SQL query result in a table with 8 rows. The table has columns: PLAYER_NAME, POSITION, and P_SALARY. The rows are numbered 1 to 8. Rows 1-4 are players, and rows 5-8 are staff. The staff positions are listed as 'N/A'.

| | PLAYER_NAME | POSITION | P_SALARY |
|---|---------------|----------|----------|
| 1 | Anthony Davis | C | 41000000 |
| 2 | Harry Kane | N/A | 2900 |
| 3 | Harry Wang | N/A | 2200 |
| 4 | Jack Black | N/A | 5000 |
| 5 | Lebron James | PF | 42000000 |
| 6 | Max Christie | SF | 10000000 |
| 7 | Milea Robert | PG | 34000000 |
| 8 | Troy Brown | SG | 14000000 |

15. Show players in team 1 that are not in team 2

```
--this statement will retrieve the player name for all players of team 1 that are not also in team 2

SELECT player_name
FROM project_players
WHERE team_id = 1
MINUS
SELECT player_name
FROM project_players
WHERE team_id = 2;
```



The screenshot shows a SQL query result in a table with 5 rows. The table has a column: PLAYER_NAME. The rows are numbered 1 to 5. These are the players from team 1 who are not in team 2.

| | PLAYER_NAME |
|---|---------------|
| 1 | Anthony Davis |
| 2 | Lebron James |
| 3 | Max Christie |
| 4 | Milea Robert |
| 5 | Troy Brown |

16. Intersect team 1 player names with team 2 player names

```
--intersecting team 1 player names with team 2 player names

SELECT player_name
FROM project_players
WHERE team_id = 1
INTERSECT
SELECT player_name
FROM project_players
WHERE team_id = 2;
```

Script Output x Query Result x

SQL | All Rows Fetched: 0 in 0,008 seconds

PLAYER_...

17. Order Staff by authority

```
--order staff by the level of their authority

SELECT staff_name, CONNECT_BY_ROOT staff_name ManagerName,
level -1 Number_of_Superiors, SYS_CONNECT_BY_PATH(staff_name, '->') ManagerName
FROM project_staff
CONNECT BY PRIOR staff_id=manager_id
Start with NVL(manager_id,0) =0;
```

Script Output x Query Result x

SQL | All Rows Fetched: 9 in 0,01 seconds

| | STAFF_NAME | MANAGERNAME | NUMBER_OF_SUPERIORS | MANAGERNAME_1 |
|---|---------------|--------------|---------------------|-------------------------------|
| 1 | Jack Black | Jack Black | 0 | ->Jack Black |
| 2 | Harry Wang | Jack Black | 1 | ->Jack Black->Harry Wang |
| 3 | Harry Kane | Jack Black | 1 | ->Jack Black->Harry Kane |
| 4 | Dwayne Wade | Dwayne Wade | 0 | ->Dwayne Wade |
| 5 | Kevin Johnson | Dwayne Wade | 1 | ->Dwayne Wade->Kevin Johnson |
| 6 | John Wayne | Dwayne Wade | 1 | ->Dwayne Wade->John Wayne |
| 7 | Kevin Lavine | Kevin Lavine | 0 | ->Kevin Lavine |
| 8 | Bobby Johnson | Kevin Lavine | 1 | ->Kevin Lavine->Bobby Johnson |
| 9 | Stan Lee | Kevin Lavine | 1 | ->Kevin Lavine->Stan Lee |