

## Tables for Exercise

Que : 1 Create the following tables:

**Table Name :** EMP

**Description:** Use to store information about Employee of company

Column Name	Data Type	Size	Attributes
Empno	Numeric	4	Primary Key
Ename	Varchar	10	Not Null
Job	Varchar	9	
Mgr	Number	4	
Hiredate	Date		
Sal	Numeric	7,2	
Comm.	Numeric	7,2	
Deptno	Numeric	2	Not Null / / Foreign key references deptno of Dept Table

**Data :**

Empno	Ename	Job	Mgr	Hiredate	Sal	Comm..	Deptno
7369	SMITH	CLERK	7902	17-DEC-80	800		20
7499	ALLEN	SALESMAN	7698	20-FEB-81	1600	300	30
7521	WARD	SALESMAN	7698	22-FEB-81	1250	500	30
7566	JONES	MANAGER	7839	02-APR-81	2975		20
7654	MARTIN	SALESMAN	7698	28-SEP-81	1250	1400	30
7698	BLAKE	MANAGER	7839	01-MAY-81	2850		30
7782	CLARK	MANAGER	7839	09-JUN-81	2450		10
7788	SCOTT	ANALYST	7566	19-APR-87	3000		20
7839	KING	PRESIDENT		17-NOV-81	5000		10
7844	TURNER	SALESMAN	7698	08-SEP-81	1500		30
7876	ADAMS	CLERK	7788	23-MAY-87	1100		20
7900	JAMES	CLERK	7698	03-DEC-81	950		30
7902	FORD	ANALYST	7566	03-DEC-81	3000		20
7934	MILLER	CLERK	7782	23-JAN-82	1300		10

**Table Name :** DEPT

**Description:** Use to store information about departments of company

Column Name	Data Type	Size	Attributes
deptno	Numeric	2	Primary Key.
Dname	Varchar	14	Not Null
Loc	Varchar	13	

**Table Name :** SalGrade

Column Name	Data Type	Size	Attributes
Grade	Numeric		
Losal	Numeric		
Hisal	numeric		

**Data :**

Grade	Losal	Hisal
1	700	1200
2	1201	1400
3	1401	2000
4	2001	3000
5	3001	9999

**Que : 2 Perform the following Queries**

**SQL-ASSIGNMENT #1**  
**BASIC QUERIES**

**USE THE FOLLOWING TABLES:**

**EMP**

(EMPNO, ENAME, JOB, SAL, HIREDATE, COMM, MGR, DEPTNO)

**DEPT**

(DEPTNO, DNAME, LOC)

**SALGRADE**

(GRADE, LOSAL, HISAL)

**PERFORM THE FOLLOWING QUERIES:**

1. LIST ALL ROWS OF THE TABLE EMP.
2. DISPLAY THE STRUCTURE OF THE TABLE EMP.
3. LIST ALL TABLES.
4. LIST ALL EMPLOYEES NUMBER FROM EMP.
5. LIST ALL EMPLOYEES NAME AND DESIGNATION FROM EMP.
6. LIST ALL COMMISSION FROM EMP.
7. LIST ALL MGR FROM EMP.
8. LIST ALL DEPARTMENTS NUMBER FROM EMP.
9. LIST ALL EMPLOYEES NUMBER, EMPLOYEES NAME, JOBS, MGR FROM EMP.
10. LIST ALL EMPLOYEES NAME, MGR FROM EMP.

11. LIST ALL JOB, COMMISSION FROM EMP.
12. LIST ALL EMPLOYEES NAME, DEPARTMENTS NUMBER FROM EMP.
13. LIST ALL DEPARTMENTS NUMRER, EMPLOYEES NAME, SALARIES, JOBS FROM EMP.
14. LIST ALL DEPARTMENTS NO AND NAME FROM DEPARTMENT.
15. LIST ALL GRADES FROM SALGRADE.
16. LIST ALL LO-SAL , HI-SAL, GRADE FROM SALGRADE.

**SQL-ASSIGNMENT#2**  
**BASIC QUERIES**

**PERFORM THESE QUERIES:**

1. LIST ALL EMPLOYEES WHO ARE MANAGERS.
2. LIST ALL EMPLOYEES WHO ARE PRESIDENTS.
3. LIST ALL EMPLOYEES WHO ARE EITHER MANAGER OR CLERK.
4. LIST ALL EMPLOYEES WHO ARE MANAGERS OF DEPARTMENT NUMBER 10.
5. LIST ALL EMPLOYEES WHO ARE WORKING IN DEPARTMENT NUMBER 10.
6. LIST ALL EMPLOYEES WHO ARE NOT BELONGING TO DEPARTMENT NUMBER 20, 30, 40 AND ARE NOT MANAGER.
7. LIST ALL EMPLOYEES WHO ARE EITHER MANAGER OF DEPARTMENT NUMBER 10 OR ARE ANALYST.
8. LIST ALL EMPLOYEES WHO ARE NOT PRESIDENT, ANALYST OR SALESMAN.
9. LIST ALL EMPLOYEES WHO WORK IN DEPARTMENT NUMBER 10 AND THEIR JOB IS CLERK.

### **SQL-ASSIONMENT # 3**

#### **PERFORM THE FOLLOWING QUERIES**

1. CHANGE THE COLUMN HEADING ENAME INTO YOUR NAME AND DISPLAY IT.
2. CHANGE THE COLUMN HEADING SAL INTO SALARIES.
3. CHANGE THE COLUMN HEADING ENAME INTO 'EMPLOYEE NAME' AND JOB INTO DESIGNATION.
4. LIST ALL 'MANAGER' AND ADD 100 RUPEES IN EACH SALARY.
5. LIST ALL EMPLOYEE AND ADD 1000 RUPEES AND SUBTRACT 4500 RUPEES IN EACH SALARY.
6. IF EMPLOYEE NAME IS SCOTT THEN ADD 100 RUPEES IN HIS SALARY.
7. LIST ALL EMPLOYEE AFTER ADDING 500 RUPEES, SUBTRACT 300 RUPEES AND DIVIDED BY 100 RUPEES FROM EACH SALARY.
8. LIST ALL EMPLOYEES AND FIND FIVE PERCENT FROM EACH SALARY.
9. FIND EIGHT PERCENT OF SALESMEN SALARY.
10. FIND THE TWO MONTH SALARY OF EACH MANAGER.
11. FIND THE DAILY WAGES OF EACH EMPLOYEE.
12. DISPLAY THE COLUMN HEADING ANNSAL INSTEAD OF SAL\*12.
13. COMBINE EMPNO AND ENAME. THEN CHANGE THE COLUMN HEADING AS EMPLOYEE.
14. JOIN ENAME AND JOB. THEN CHANGE THE COLUMN HEADING AS COMP\_NAME.
15. LIST ALL RECORDS AS FOLLOWS. SMITH IS CLERK AND HE IS WORKING IN DEPT NO 20 SINCE 12-MAR-1981.
16. FIND ANNUAL SALARY AND ADD COMM OF ALL EMPLOYEES.
17. LIST ALL DISTINCT DEPARTMENT NUMBER FROM EMP TABLE.
18. DISPLAY DISTINCT VALUE OF DEPARTMENT NUMBER AND JOBS.
19. LIST ALL EMPLOYEES WHO ARE NOT ELIGIBLE FOR RECEIVING COMMISSION AND ARE 'MANAGER'.
20. LIST ALL EMPLOYEES WHO ARE ELIGIBLE OF RECEIVING COMMISSION.
21. LIST ALL DISTINCT JOBS FROM THE TABLE EMP.
22. HOW MANY JOBS DO WE HAVE.

## **SQL-ASSIGNMENT #4**

### **PERFORM THE FOLLOWING QUERIES:**

1. LIST HIREDATE IN DESCENDING ORDER.
2. LIST HIREDATE IN ASCENDING ORDER.
3. FIND ALL DEPARTMENT NAMES WITH THEIR DEPARTMENT NUMBERS WHILE NUMBERS GREATER THEN 20.
4. FIND THOSE EMPLOYEES WHOSE COMMISSION IS GREATER THEN THEIR SALARIES.
5. FIND THOSE EMPLOYEES WHOSE COMMISSION IS LESS THEN THEIR SALARIES.
6. FIND ALL EMPLOYEES THOSE SALARIES ARE BETWEEN 500 AND 1500.
7. FIND THOSE EMPLOYEES WHOSE MGR IS 7902, 7566, 7788.
8. TO FIND THOSE EMPLOYEES WHOSE MGR IS BETWEEN 7788 AND 7092.
9. LIST ALL EMPLOYEES WHOSE NAME START WITH 'S'.
10. LIST ALL EMPLOYEES HAVING FIRST NAME AS 'SCOTT'.
11. LIST OF THOSE EMPLOYEES HAVING ONLY 5 CHARACTERS LONG NAME AND JOB AS A MANAGER.
12. LIST ALL EMPLOYEES WHO DOES NOT HAVE A MANAGER (WHOSE MANAGER IS NULL).
13. FIND THOSE EMPLOYEES WHOSE JOB DO NOT START WITH A'.
14. LIST OF THOSE EMPLOYEES WHOSE MGR IS NOT NULL.
15. LIST OF THOSE EMPLOYEES WHOSE JOBS ARE 'MANAGER OR CLERK' OF DEPARTMENT NUMBER 10.
16. FIND ALL MANAGERS AND SALESMEN THEIR SALARIES OVER 1500.
17. FIND THE AVERAGE SALARIES OF DIFFERENT JOBS.
18. FIND THE AVERAGE SALARIES OF ALL JOBS EXCLUDING MANAGER.
19. FIND THE AVERAGE SALARY OF EACH JOB WITHIN DEPARTMENT.
20. FIND THE AVERAGE SALARIES OF EACH DEPARTMENT.
21. FIND AVERAGE AND SUM OF THE SALARIES OF EACH JOB EXCLUDING SALESMEN', CLERK' AND 'MANAGER'.

## **SQL-ASSIGNMENT #5**

### **PERFORM THE FOLLOWING QUERIES**

1. FIND THE ABSOLUTE VALUE OF -18.
2. FIND THE ABSOLUTE VALUE OF 30.
3. FIND THE CELING VALUE OF 22.5.
4. FIND THE CEILING VALUE OF 31.2.
5. FIND THE FLOOR VALUE OF 37.2.
6. DISPLAY YOUR NAME IN LOWERCASE.
7. FIND THE SQUARE OF 6.
8. FIND THE FIRST AND SECOND CHARACTERS OF ENAMS.
9. DISPLAY THE YEAR ONLY FROM THE HIREDATE.
10. FIND THE SOUNDEX OF ALL ENAME.
11. FIND THE SOUNDEX OF THOSE EMPLOYEE WHOSE ENAME IS ALLEN.
12. FIND THE MINIMUM SALARY FROM THE TABLE EMP.
13. FIND THE MAXIMUM SALARY SROM THE TABLE EMP.
14. FIND THE LENGTH OF ALL ENAME.
15. FIND THE LENGTH OF JOB.
16. FIND THE VSIZE OF ENAME.
17. FIND THE VALUE OF 2 THROUGH ASCII VALUE.
18. FIND THE ROWID OF ALL EMPLOYEES.
19. FIND THE USER ID, WHICH ASSIGNED BY ORACLE.
20. FIND THE USER NAME, IN WHICH YOU ARE WORKING.
21. FIND THE VSIZE OF ALL EMPLOYEES WHO ARE WORKING N DEPARTMENT NUMBER 10.
22. FIND THE SUM OF ALL SALARIES.
23. FIND THE GRADE OF ALL EMPLOYEES.
24. FIND THOSE EMPLOYEES WHOSE DEPARTMENT LOCATION IS NEWYORK.
25. FIND THOSE EMPLOYEES WHO ARE WORKING IN ACCOUNTING DEPARTMENT.
26. DEFINE THE VALUL AS ANNUAL SALARY  $SAL*12+NVL(COMM,0)$  AND DISPLAY THE RESULT.
27. DEFINE THE VALUE AS ANNUAL  $SAL*12$  AND DISPLAY THE RESULT.

28. LIST ALL EMPLOYEES WHO ARE WORKING IN 'SALES' DEPARTMENT.
29. LIST ALL EMPLOYEES WHOSE LOCATION IS 'NEW YORK' AND DEPARTMENT NAME IS ACCOUNTING'.
30. LIST ALL EMPLOYEES WHOSE LOCATION IS 'CHICAGO'.
31. FIND THE MANAGER OF 'SCOTT'.
32. FIND THE MANAGER OF 'BLAKE'.
33. FIND THE SALARIES OF THOSE EMPLOYEES WHO EARN MORE THEN JONES'.
34. LIST THOSE DEPARTMENT WHO DOSE NOT HAVE ANY EMPLOYEES.
35. FIND THE UNION OF DEPARTMENT NUMFER 10 AND DEPARTMENT NUMBER 30.
36. FIND THE INTERSECT OF DEPARTMENT NUMBER 10 AND DEPARTMENT NUMBER 30.
37. FIND THE MINUS OF DEPARTMENT NUMBER 10 AND DEPARTMENT NUM8ER 30.
38. FIND THE MINIMUM SALARIES WITH EMPLOYEE NAME.
39. FIND ALL EMPLOYEES WHO HAVE THE SAME JOB AS BLAKE.
40. FIND THE MINIMUM THREE SALARIES N EACH DEPARTMENT.
41. FIND ALL THE DEPARTMENTS, WHICH HAVE AN-AVERAGE SALARY IS GREATER THEN DEPARTMENT NUMBER 30.
42. FIND ALL EMPLOYEES IN DEPARTMENT NUMBER 10 WHOSE JOB S THE SAM AS THE EMPLOYEES JOB IN THE SALES DEPARTMENT.
43. FIND ALL EMPLOYEES WHO EARN MORE THAN THE AVERAGE SALARY OF EMPLOYEES IN THEIR OWN DEPARTMENT AND SORT BY DEPARTMENT NO.
44. FIND ALL EMPLOYEES WHO EARN MORE THAN ANY EMPLOYEE IN DEPARTMENT 30.
45. FIND THE JOB WHICH HAS THE HIGHEST AVERAGE SALARY.
46. FIND ALL JOBS WITH EITHER THE SAME OR AS 'JONES' OR SALARY GREATER THAN OR EQUAL TO FORD, ORDER BY JOB AND SALARY.
47. LIST ALL EMPLOYEES AND THEIR MANAGER IN TREE FORMAT.
48. LIST ALL EMPLOYEES AND THEIR MANAGER IN TREE FORMAT WITH LEVEL.
49. FIND THE AVERAGE SALARY AT EACH LEVEL OF THE EMPLOYEE TREE.



**SQL-ASSIGNMENT #6**  
**MIXED QUERIES FOR SUBMIT.**

**PERFORM THE FOLLOWING QUERIES**

1. DISPLAY THE STRUCTURE OF THE TABLE EMP.
2. DISPLAY SYSTEM DATE (USING SQL STATEMENT ONLY).
3. COUNT ALL EMPLOYEES.
4. DISPLAY THE SUM OF ALL EMPLOYEES SALARIES.
5. HOW MANY MANAGERS DO WE HAVE.
6. HOW MANY DEPARTMENTS DO WE HAVE.
7. LIST AVERAGE SALARY OF EACH DEPARTMENT.
8. LIST AVERAGE SALARY OF EACH JOB.
9. FIND THE MAXIMUM. MINIMUM SAL OF ALL EMPLOYEES.
10. FIND THE DAY OF ALL EMPLOYEES WHEN THEY WERE HIRED.
11. FIND THE NEXT FRIDAY AFTER THE '12-MAR-98'.
12. FIND THE LAST DAY OF EACH HIREDATE.
13. LIST ALL EMPLOYEES WITH THEIR SALGRADE.
14. LIST ALL EMPLOYEES WHO WERE HIRED IN YEAR 1983.
15. LIST ALL EMPLOYEES WHO WERE HIRED BETWEEN 30-MAR-81 TO 01-JUN-82.
16. FIND THE INCOME TAX OF ALL EMPLOYEES @5% OF ITS ANNUAL SALARY.
17. DISPLAY ALL RECORDS IN FOLLOWING FORMAT (FOR ALL RECORDS) ON EMPLOYEE  
<NAME>WORKS IN DEPARTMENT<NAME> AND APPOINTED ON <DATE>.
18. FIND THE DURATION OF SERVICE OF ALL EMPLOYEES.
19. COUNT ALL EMPLOYEES WHO WERE HIRED AFTER 22-MAR-81.
20. LIST THE MOST EXPERIENCED EMPLOYEE.
21. DISPLAY THE DEPARTMENTS NUMBER AND THEIR GIVEN NAMES USING DECODE() FUNCTION.  
10 ACCOUNTING.  
20 RESEARCH..  
30 SALES.
22. IN WHICH YEAR DID MOST PEOPLE JOIN THE COMPANY, DISPLAY THE YEAR AND NUMBER OF  
EMPLOYEE.
23. FIND THE FIRST OCCURRENCE OF THE LETTER 'L' IN EMPLOYEE NAME AND CHANGE 'L' WITH 'X'.
24. FIND THE EMPLOYEE WHO HAS AT LEAST ONE PERSON FOR REPORTING.

25. FIND ALL EMPLOYEES WHO'S DEPARTMENT IS NOT IN THE DEPT TABLE.
26. LIST EMPLOYEE IN ORDER (OF MANAGER EMPLOYEE TREE FORMAT).
27. DISPLAY THE DATE COLUMN AT THE LEFT SIDE OF THE EMP TABLE.
28. DISPLAY THE TITLE IN CENTER' REPORT OF THE EMPLOYEE TABLE' ON TABLE EMP.
29. DISPLAY 'PAGES AT THE RIGHT SIDE OF THE EMP TABLE.
30. DISPLAY AT THE END ON LEFT SIDE CONFIDENTIAL REPORT.