

## SQL – Structured Query Language

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1 DROP TABLE DEPT CASCADE CONSTRAINTS;
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3 CREATE TABLE DEPT
4   (DEPTNO NUMBER(2),
5    DNAME VARCHAR2(14) NOT NULL,
6    LOC VARCHAR2(13),
7    CONSTRAINT PK_DEPT PRIMARY KEY (DEPTNO)
8    CONSTRAINT UK_DEPT UNIQUE (DNAME));
9
10 INSERT INTO DEPT VALUES (10, 'ACCOUNTING', 'NEW YORK');
11 INSERT INTO DEPT VALUES (20, 'RESEARCH', 'DALLAS');
12 INSERT INTO DEPT VALUES (30, 'SALES', 'CHICAGO');
13 INSERT INTO DEPT VALUES (40, 'OPERATIONS', 'BOSTON');
14
15 DROP TABLE EMP;
16
17 CREATE TABLE EMP
18   (EMPNO NUMBER(4),
19    ENAME VARCHAR2(10) NOT NULL,
20    JOB VARCHAR2(9) NOT NULL,
21    MGR NUMBER(4),
22    HIREDATE DATE NOT NULL,
23    SAL NUMBER(7, 2) NOT NULL,
24    COMM NUMBER(7, 2),
25    DEPTNO NUMBER(2),
26    CONSTRAINT PK_EMPNO PRIMARY KEY (EMPNO),
27    CONSTRAINT FK_DEPT FOREIGN KEY (DEPTNO) REFERENCES DEPT(DEPTNO),
28    CONSTRAINT CHK_EMP_SALESMAN CHECK ((JOB='SALESMAN' AND COMM IS NOT NULL) OR (JOB<>'SALESMAN' AND
29    COMM IS NULL)));
30
31 INSERT INTO EMP VALUES(7369, 'SMITH', 'CLERK', 7902,TO_DATE('17-DEC-1980', 'DD-MON-YYYY'), 800, NULL, 20);
32 INSERT INTO EMP VALUES(7499, 'ALLEN', 'SALESMAN', 7698,TO_DATE('20-FEB-1981', 'DD-MON-YYYY'), 1600, 300, 30);
33 INSERT INTO EMP VALUES(7521, 'WARD', 'SALESMAN', 7698,TO_DATE('22-FEB-1981', 'DD-MON-YYYY'), 1250, 500, 30);
34 INSERT INTO EMP VALUES(7566, 'JONES', 'MANAGER', 7839,TO_DATE('2-APR-1981', 'DD-MON-YYYY'), 2975, NULL, 20);
35 INSERT INTO EMP VALUES(7654, 'MARTIN', 'SALESMAN', 7698,TO_DATE('28-SEP-1981', 'DD-MON-YYYY'), 1250, 1400, 30);
36 INSERT INTO EMP VALUES(7698, 'BLAKE', 'MANAGER', 7839,TO_DATE('1-MAY-1981', 'DD-MON-YYYY'), 2850, NULL, 30);
37 INSERT INTO EMP VALUES(7782, 'CLARK', 'MANAGER', 7839,TO_DATE('9-JUN-1981', 'DD-MON-YYYY'), 2450, NULL, 10);
38 INSERT INTO EMP VALUES(7788, 'SCOTT', 'ANALYST', 7566, TO_DATE('09-DEC-1982', 'DD-MON-YYYY'), 3000, NULL, 20);
39 INSERT INTO EMP VALUES(7839, 'KING', 'PRESIDENT', NULL,TO_DATE('17-NOV-1981', 'DD-MON-YYYY'), 5000, NULL, 10);
40 INSERT INTO EMP VALUES(7844, 'TURNER', 'SALESMAN', 7698, TO_DATE('8-SEP-1981', 'DD-MON-YYYY'), 1500, 0, 30);
41 INSERT INTO EMP VALUES(7876, 'ADAMS', 'CLERK', 7788, TO_DATE('12-JAN-1983', 'DD-MON-YYYY'), 1100, NULL, 20);
42 INSERT INTO EMP VALUES(7900, 'JAMES', 'CLERK', 7698, TO_DATE('3-DEC-1981', 'DD-MON-YYYY'), 950, NULL, 30);
43 INSERT INTO EMP VALUES(7902, 'FORD', 'ANALYST', 7566,TO_DATE('3-DEC-1981', 'DD-MON-YYYY'), 3000, NULL, 20);
44 INSERT INTO EMP VALUES(7934, 'MILLER', 'CLERK', 7782,TO_DATE('23-JAN-1982', 'DD-MON-YYYY'), 1300, NULL, 10);
45
46 DROP TABLE SALGRADE;
47
48 CREATE TABLE SALGRADE
49   (GRADE NUMBER,
50    LOSAL NUMBER,
51    HISAL NUMBER,
52    CONSTRAINT PK_GRADE PRIMARY KEY (GRADE));
53
54 INSERT INTO SALGRADE VALUES (1, 700, 1200);
55 INSERT INTO SALGRADE VALUES (2, 1201, 1400);
56 INSERT INTO SALGRADE VALUES (3, 1401, 2000);
57 INSERT INTO SALGRADE VALUES (4, 2001, 3000);
58 INSERT INTO SALGRADE VALUES (5, 3001, 9999);
59
60 COMMIT;
61
62 SELECT COUNT(*), COUNT(1) FROM EMP;
63 UPDATE EMP SET SAL = SAL * 1.10;
64 DELETE FROM EMP WHERE EMPNO = 7566;

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## SQL – Sturctured Query Language

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SELECT \* FROM EMP;

EMPNO	ENAME	JOB	MGR	HIREDATE	SAL	COMM	DEPTNO
7369	SMITH	CLERK	7902	17-Dec-80	800	NULL	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	NULL	20
7654	MARTIN	SALESMAN	7698	28-Sep-81	1250	1400	30
7698	BLAKE	MANAGER	7839	01-May-81	2850	NULL	30
7782	CLARK	MANAGER	7839	09-Jun-81	2450	NULL	10
7788	SCOTT	ANALYST	7566	09-Dec-82	3000	NULL	20
7839	KING	PRESIDENT	NULL	17-Nov-81	5000	NULL	10
7844	TURNER	SALESMAN	7698	08-Sep-81	1500	0	30
7876	ADAMS	CLERK	7788	12-Jan-83	1100	NULL	20
7900	JAMES	CLERK	7698	03-Dec-81	950	NULL	30
7902	FORD	ANALYST	7566	03-Dec-81	3000	NULL	20
7934	MILLER	CLERK	7782	23-Jan-82	1300	NULL	10

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SELECT * FROM DEPT;	SELECT * FROM SALGRADE;

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SELECT e.EMPNO as 'EMPLOYEE_ID', e.ENAME as 'EMPLOYEE_NAME', e.JOB as 'JOB', D.DEPTNO, D.DNAME as DEPT
FROM EMP e, DEPT d
WHERE _____
AND _____;

```

```

SELECT e1.EMPNO as 'Employee_Id', e1.ENAME as 'Employee', e2.EMPNO as 'Manager_Id', e2.ENAME as 'Manager'
FROM EMP e1, EMP e2
WHERE _____
AND _____;

```

```

CREATE VIEW EMP_V
AS
SELECT EMPNO, ENAME, JOB, DEPTNO FROM EMP
WHERE JOB NOT IN ('PRESIDENT', 'MANAGER');

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```
SELECT * FROM EMP_V;
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```
SELECT TO_DATE('26-Jan-12','DD-Mon-YY'), TO_DATE('26-Jan-12','DD-Mon-RR') from DUAL;
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COMMENT ON COLUMN EMP.COMM is 'Commission given to SALESMAN';
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COMMENT ON TABLE DEPT is 'Master Table of Departments';
```