

SQL CREATE TABLE

```
CREATE TABLE Employee2 (EID char(9), Name varchar2(20), Salary number(7,2), MID char(9),  
PRIMARY KEY (EID), FOREIGN KEY (MID) REFERENCES Employee2 (EID))  
/  
CREATE TABLE Service2 (SID char(3), Operation varchar2(30), PRIMARY KEY (SID))  
/  
CREATE TABLE Cottage2 (Cnum char(3), Rent number(5,2), Nbed number(1), Category  
number(1), PRIMARY KEY (Cnum))  
/  
CREATE TABLE Assignment2 (AID char(3), Adate date, Hours number(2), PRIMARY KEY (AID))  
/  
CREATE TABLE Implements2 (EID char(9), Cnum char(3), SID char(3), AID char(3), PRIMARY KEY  
(AID,SID), FOREIGN KEY (EID) REFERENCES Employee2, FOREIGN KEY (SID) REFERENCES  
Service2, FOREIGN KEY (Cnum) REFERENCES Cottage2, FOREIGN KEY (AID) REFERENCES  
Assignment2)  
/
```

SQL INSERT DATA IN TABLE

LOAD DATA

```
INFILE Employee2.dat  
REPLACE INTO TABLE Employee2  
FIELDS TERMINATED BY ','  
OPTIONALLY ENCLOSED BY ''''  
(EID,Name,Salary,MID)
```

```
'e01', 'Wilson', '53000', ''  
'e02', 'Smith', '48000', 'e01'  
'e03', 'Jones', '38000', 'e01'  
'e04', 'Loftus', '41000', ''  
'e05', 'Wang', '54000', 'e04'  
'e06', 'Smith', '45000', 'e04'  
'e07', 'Green', '48000', ''  
'e08', 'Fox', '49000', 'e04'  
'e09', 'Wang', '41000', 'e04'  
'e10', 'Fox', '32000', 'e01'  
'e11', 'Phillips', '33000', 'e07'  
'e12', 'Liu', '27000', 'e07'
```

```
INSERT into Service2 (SID, Operation) VALUES ('s01', 'Maid_in')  
/  
INSERT into Service2 (SID, Operation) VALUES ('s02', 'Kitchen_maid')  
/
```

```

INSERT into Service2 (SID, Operation) VALUES ('s03', 'Cleaning')
/
INSERT into Service2 (SID, Operation) VALUES ('s04', 'Cooking')
/
INSERT into Service2 (SID, Operation) VALUES ('s05', 'Babysitting')
/
INSERT into Service2 (SID, Operation) VALUES ('s06', 'Laundry')
/
INSERT into Service2 (SID, Operation) VALUES ('s07', 'Delivery')
/

```

LOAD DATA

```

INFILE Cottage2.dat
REPLACE INTO TABLE Cottage2
FIELDS TERMINATED BY ","
OPTIONALLY ENCLOSED BY """"
(Cnum,Rent,Nbed,Category)

```

```

'101', '200', '2', '3'
'102', '220', '3', '3'
'103', '180', '2', '2'
'104', '120', '1', '1'
'105', '300', '3', '4'
'106', '350', '3', '4'
'107', '360', '3', '4'
'108', '400', '4', '4'
'109', '500', '3', '5'
'110', '600', '4', '5'

```

LOAD DATA

```

INFILE Assignment2.dat
REPLACE INTO TABLE Assignment2
FIELDS TERMINATED BY ","
OPTIONALLY ENCLOSED BY """"
(AID,Adate,Hours)

```

```

'a01', '15-MAY-19', '3'
'a02', '16-MAY-19', '4'
'a03', '17-MAY-19', '2'
'a04', '14-MAY-19', '3'
'a05', '18-MAY-19', '5'
'a06', '15-MAY-19', '3'
'a07', '18-MAY-19', '4'
'a08', '20-MAY-19', '5'

```

'a09', '15-MAY-19', '3'
'a10', '15-MAY-19', '2'

LOAD DATA

INFILE Implements2.dat
REPLACE INTO TABLE Implements2
FIELDS TERMINATED BY ","
OPTIONALLY ENCLOSED BY ""
(EID,Cnum,SID,AID)

'e08', '101', 's02', 'a01'
'e03', '101', 's03', 'a01'
'e02', '102', 's02', 'a03'
'e05', '103', 's01', 'a04'
'e06', '105', 's05', 'a05'
'e06', '107', 's04', 'a06'
'e03', '108', 's04', 'a07'
'e09', '109', 's01', 'a08'
'e08', '106', 's06', 'a09'
'e10', '102', 's04', 'a03'
'e02', '110', 's04', 'a10'
'e10', '103', 's05', 'a04'
'e05', '105', 's04', 'a02'
'e10', '105', 's04', 'a05'
'e06', '107', 's06', 'a06'

SQL QUERY'S

select s.operation from service2 s where s.sid in (select i.sid from implements2 i where i.cnum
in (select c.cnum from cottage2 c where c.nbed = 3));

OPERATION

Maid_in
Kitchen_maid
Cooking
Babysitting
Laundry

select c.cnum, c.category from cottage2 c where c.cnum in (select i1.cnum from implements2 i1
join implements2 i2 on i1.cnum =i2.cnum and i1.sid <> i2.sid);

CNU CATEGORY

101 3
102 3
103 2
105 4
107 4

```
select c.cnum,c.rent from cottage2 c where not exists (select * from implements2 i where i.cnum = c.cnum and i.sid = (select s.sid from service2 s where s.operation = 'Babysitting'));
```

CNU RENT

--- -----

101 200
102 220
104 120
106 350
107 360
108 400
109 500
110 600

```
select e.eid,e.name, count(distinct i.sid) from employee2 e left outer join implements2 i on e.eid = i.eid group by e.eid,e.name;
```

EID NAME COUNT(DISTINCTI.SID)

e05 Wang 2
e04 Loftus 0
e02 Smith 2
e12 Liu 0
e03 Jones 2
e07 Green 0
e01 Wilson 0
e11 Phillips 0
e06 Smith 3
e10 Fox 2
e08 Fox 2

EID NAME COUNT(DISTINCTI.SID)

e09 Wang 1

```
select e.eid,e.name from employee2 e where e.eid in (select i.eid from implements2 i group by i.eid having count(distinct i.sid)>= all (select count(distinct i1.sid) from implements2 i1 group by i1.eid));
```

EID NAME

e06 Smith

```
select m.name from employee2 m where m.eid in (select e.mid from employee2 e where e.eid
in (select i.eid from implements2 I where i.sid in (select s.sid from service2 s where s.operation
='Cooking')));
```

NAME

Wilson

Loftus

```
select e.name from employee2 e where e.salary > any (select m.salary from employee2 where
m.mid is null);
```

NAME

Wang

Wilson

Fox

Smith

Green

Smith

```
select e.eid,e.name from employee2 e where e.eid in (select i.eid from implements2 i where
i.sid in (select s.sid from service2 s where s.operation = 'Cooking')) intersect select e.eid,e.name
from employee2 e where e.eid in (select i.eid from implements2 i where i.sid in (select s.sid
from service2 s where s.operation = 'Babysitting'));
```

EID NAME

e06 Smith

e10 Fox