```
CREATE TABLE student1(

snum INT,

sname VARCHAR(10),

major VARCHAR(10),

lvl VARCHAR(2),

age INT, primary key(snum));

SELECT * from student1;


INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('1', 'anish', 'cs', 'jr',
'20');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('2', 'arun', 'cs', 'jr',
'20');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('3', 'aditya', 'cs', 'jr',
'23');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('4', 'shreyas', 'cs', 'jr',
'20');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('5', 'tanisha', 'cs', 'jr',
'.20');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('6', 'sanvi', 'ec', 'jr',
'20');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('7', 'saikumar', 'ec',
'jr', '20');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('8', 'sowmya', 'cs', 'jr',
'23');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('9', 'radha', 'ec', 'sr',
'20');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('10', 'chaithu', 'ec',
'sr', '23');

INSERT INTO `movie`.`student1` (`snum`, `sname`, `major`, `lvl`, `age`) VALUES ('11', 'lakshmi', 'ec',
'sr', '23');


CREATE TABLE faculty(

fid INT,fname VARCHAR(20),

deptid INT,

PRIMARY KEY(fid));
```

```
select * from faculty;

INSERT INTO `movie`.`faculty` (`fid`, `fname`, `deptid`) VALUES ('10', 'prof.Murthy', '10');

INSERT INTO `movie`.`faculty` (`fid`, `fname`, `deptid`) VALUES ('20', 'prof.sudha', '10');

INSERT INTO `movie`.`faculty` (`fid`, `fname`, `deptid`) VALUES ('30', 'prof.latha', '20');


CREATE TABLE class(

cname VARCHAR(20),

metts_at TIMESTAMP,

room VARCHAR(10),

fid INT,

PRIMARY KEY(cname),

FOREIGN KEY(fid) REFERENCES faculty(fid));

select * from class;

INSERT INTO `movie`.`class` (`cname`, `metts_at`, `room`, `fid`) VALUES ('4A', '11/10/20 09:50:00',
'R128', '10');

INSERT INTO `movie`.`class` (`cname`, `metts_at`, `room`, `fid`) VALUES ('4B', '2011-10-23  09:50:00',
'R129', '20');

INSERT INTO `movie`.`class` (`cname`, `metts_at`, `room`, `fid`) VALUES ('4C', '2015-11-20 10:00:00',
'R200', '10');

INSERT INTO `movie`.`class` (`cname`, `metts_at`, `room`, `fid`) VALUES ('3A', '2016-10-08 12:10:00',
'R201', '10');

INSERT INTO `movie`.`class` (`cname`, `metts_at`, `room`, `fid`) VALUES ('3B', '2019-10-20 01:30:00',
'R129', '10');


CREATE TABLE enrolled(

snum INT,

cname VARCHAR(20),

PRIMARY KEY(snum,cname),

FOREIGN KEY(snum) REFERENCES student1(snum),

FOREIGN KEY(cname) REFERENCES class(cname));

select *from enrolled;

INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('1', '4B');

INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('2', '4B');
```

```
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('3', '4C');
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('4', '4B');
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('5', '4A');
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('6', '4B');
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('7', '3B');
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('8', '3B');
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('9', '3B');
INSERT INTO `movie`.`enrolled` (`snum`, `cname`) VALUES ('10', '3A');
```

```
SELECT DISTINCT sname
FROM Student1 S, Class C, Enrolled E, Faculty F
WHERE S.snum = E.snum AND E.cname = C.cname AND C.fid = F.fid AND
F.fname ='prof.Murthy' AND S.lvl ='JR';
```

| sname |
|---|
| saikumar |
| sowmya |
| tanisha |
| aditya |

```
SELECT C.cname
FROM Class C
WHERE C.room = 'R128'
OR C.cname IN (SELECT E.cname
FROM Enrolled E
GROUP BY E.cname
HAVING COUNT (*) >= 5);
```

```
SELECT DISTINCT sname
FROM Student1 S
WHERE S.snum IN (SELECT E1.snum
FROM Enrolled E1, Enrolled E2, Class C1, Class C2
WHERE E1.snum = E2.snum
AND E1.cname = C1.cname
AND E2.cname = C2.cname AND C1.metts_at ='12:10:00');
```

| sname |
| --- |
| chaithu |

```
SELECT DISTINCT F.fname
FROM Faculty F
WHERE NOT EXISTS ((SELECT C.room FROM Class C )
MINUS
(SELECT C1.room
FROM Class C1
WHERE C1.fid = F.fid ));
```

```
SELECT DISTINCT fname
FROM Faculty F WHERE 5>(SELECT COUNT (E.snum)
FROM Class C,Enrolled E WHERE C.cname=E.cname
AND C.fid=F.fid);
```

```
SELECT DISTINCT sname
FROM student1 s WHERE s.snum NOT IN(SELECT e.snum from enrolled e);
```

| sname |
| --- |
| lakshmi |

```
SELECT S.age,S.lvl
FROM student1 S
GROUP BY S.age,S.lvl
HAVING S.lvl IN(SELECT S1.lvl FROM student1 S1 WHERE S1.age=S.age
```

```
GROUP BY S1.lvl,S1.age

HAVING COUNT(*)>=ALL(SELECT COUNT(*)

FROM student1 S2 WHERE S1.age=S2.age GROUP BY S2.lvl,S2.age));
```

| age | lvl |
|---|---|
| 20 | jr |
| 23 | jr |
| 0 | jr |
| 23 | sr |