

## INNER JOIN

1. Create table student with attributes sid , sname , course , sem.

The screenshot shows the Paiza Online MySQL interface. The SQL editor contains the following code:

```
1 create table student (sid int Primary key, sname varchar(100),course varchar(100),sem int(10));
2 insert into student values(1,'Aswathy','M.com',3);
3 insert into student values(2,'Ammu','B.com',1);
4 insert into student values(3,'Reena','BSW',4);
5 insert into student values(4,'Akhila','Bca',3);
6 select * from student;
```

The output window displays the result of the SQL execution:

sid	sname	course	sem
1	Aswathy	M.com	3
2	Ammu	B.com	1
3	Reena	BSW	4
4	Akhila	Bca	3

2. Create another table book with attributes bid , bname , author.

The screenshot shows the Paiza Online MySQL interface. The SQL editor contains the following code:

```
1 create table student (sid int Primary key, sname varchar(100),course varchar(100),sem int(10));
2 insert into student values(1,'Aswathy','M.com',3);
3 insert into student values(2,'Ammu','B.com',1);
4 insert into student values(3,'Reena','BSW',4);
5 insert into student values(4,'Akhila','Bca',3);
6 select * from student;
7
8 create table book (bid int primary key,bname varchar(100),author varchar(50));
9 insert into book values(803,'Accounting','Peter');
10 insert into book values(802,'java','Priya James');
11 insert into book values(800,'Advanced DBMS','Sandra');
12 insert into book values(804,'Environment','Bindhu v Nair');
13 select * from book;
```

The output window displays the result of the SQL execution:

bid	bname	author
32	Accounting	Peter
821	java	Priya James
98	Advanced DBMS	Sandra
45	Environment	Bindhu v Nair

### 3. Create table issue bid , sid , issuedate.

The screenshot shows the MySQL Online interface with the following SQL code:

```
1 create table student (sid int Primary key, sname varchar(100),coursre varchar(100),sem int(10));
2 insert into student values(1,"Aswathy","R.com",1);
3 insert into student values(2,"Amu","B.com",1);
4 insert into student values(3,"Reema","BSc",4);
5 insert into student values(4,"Akhila","Bca",3);
6 select * from student;
7
8 create table book(bid int primary key,bname varchar(100),author varchar(50));
9 insert into book values(8032,"Accounting","Peter");
10 insert into book values(8021,"java","Priya James");
11 insert into book values(8098,"Advanced DBMS","Sandra");
12 insert into book values(8045,"Environment","Bindhu v Nair");
13 select * from book;
14
15 create table issue(bid int,sid int,issuedate date,primary key(bid,sid),foreign key(bid)references book(bid),foreign key(sid)references student(sid));
16 insert into issue values(8032,1,"2009-03-21");
17 insert into issue values(8021,2,"2015-10-31");
18 insert into issue values(8098,3,"2012-03-11");
19 insert into issue values(8045,4,"2009-03-22");
20 select * from issue;
```

The output shows the data inserted into the 'issue' table:

bid	sid	issuedate
32	1	2009-03-21
821	2	2015-10-31
98	3	2012-03-11
45	4	2009-03-22

### 4. Display the name of the books issued on 31-oct-15

The screenshot shows the MySQL Online interface with the following SQL code:

```
1 create table student (sid int Primary key, sname varchar(100),coursre varchar(100),sem int(10));
2 insert into student values(1,"Aswathy","R.com",1);
3 insert into student values(2,"Amu","B.com",1);
4 insert into student values(3,"Reema","BSc",4);
5 insert into student values(4,"Akhila","Bca",3);
6 select * from student;
7
8 create table book(bid int primary key,bname varchar(100),author varchar(50));
9 insert into book values(8032,"Accounting","Peter");
10 insert into book values(8021,"java","Priya James");
11 insert into book values(8098,"Advanced DBMS","Sandra");
12 insert into book values(8045,"Environment","Bindhu v Nair");
13 select * from book;
14
15 create table issue(bid int,sid int,issuedate date,primary key(bid,sid),foreign key(bid)references book(bid),foreign key(sid)references student(sid));
16 insert into issue values(8032,1,"2009-03-21");
17 insert into issue values(8021,2,"2015-10-31");
18 insert into issue values(8098,3,"2012-03-11");
19 insert into issue values(8045,4,"2009-03-22");
20 select bname from book join issue on book.bid=issue.bid where issuedate="2015-10-31";
```

The output shows the book name 'java'.

bname
java

### 5. Find the details of student who took the book 'java'.

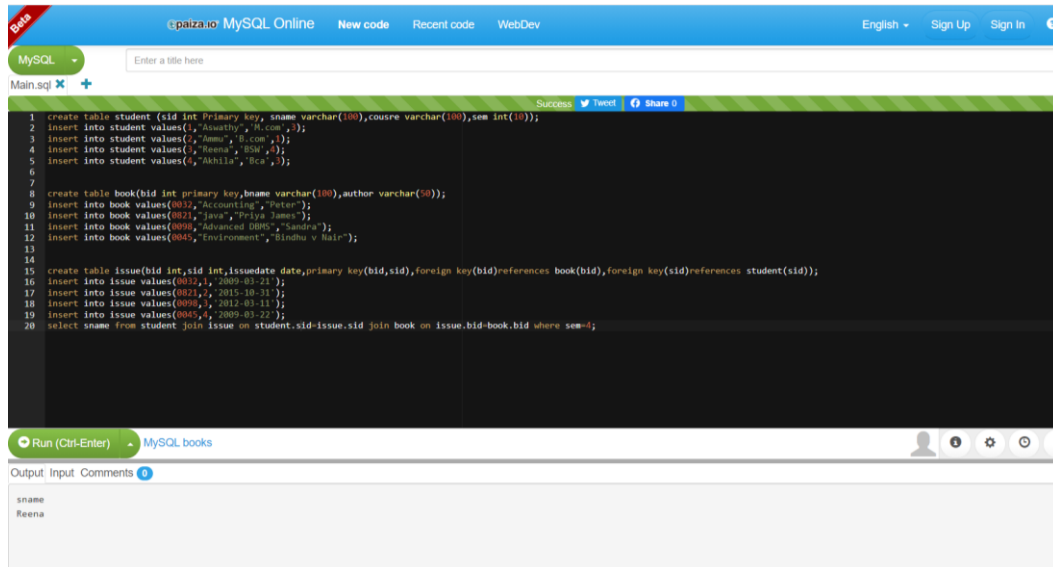
The screenshot shows the MySQL Online interface with the following SQL code:

```
1 create table student (sid int Primary key, sname varchar(100),coursre varchar(100),sem int(10));
2 insert into student values(1,"Aswathy","R.com",1);
3 insert into student values(2,"Amu","B.com",1);
4 insert into student values(3,"Reema","BSc",4);
5 insert into student values(4,"Akhila","Bca",3);
6 select * from student;
7
8 create table book(bid int primary key,bname varchar(100),author varchar(50));
9 insert into book values(8032,"Accounting","Peter");
10 insert into book values(8021,"java","Priya James");
11 insert into book values(8098,"Advanced DBMS","Sandra");
12 insert into book values(8045,"Environment","Bindhu v Nair");
13 select * from book;
14
15 create table issue(bid int,sid int,issuedate date,primary key(bid,sid),foreign key(bid)references book(bid),foreign key(sid)references student(sid));
16 insert into issue values(8032,1,"2009-03-21");
17 insert into issue values(8021,2,"2015-10-31");
18 insert into issue values(8098,3,"2012-03-11");
19 insert into issue values(8045,4,"2009-03-22");
20 select student.* from student join issue on student.sid=issue.sid join book on book.bid=issue.bid where bname="java";
```

The output shows the details of the student who took the book 'java':

sid	sname	coursre	sem
2	Amu	B.com	1

6. Find out the name of 4<sup>th</sup> sem student who took atleast one book.



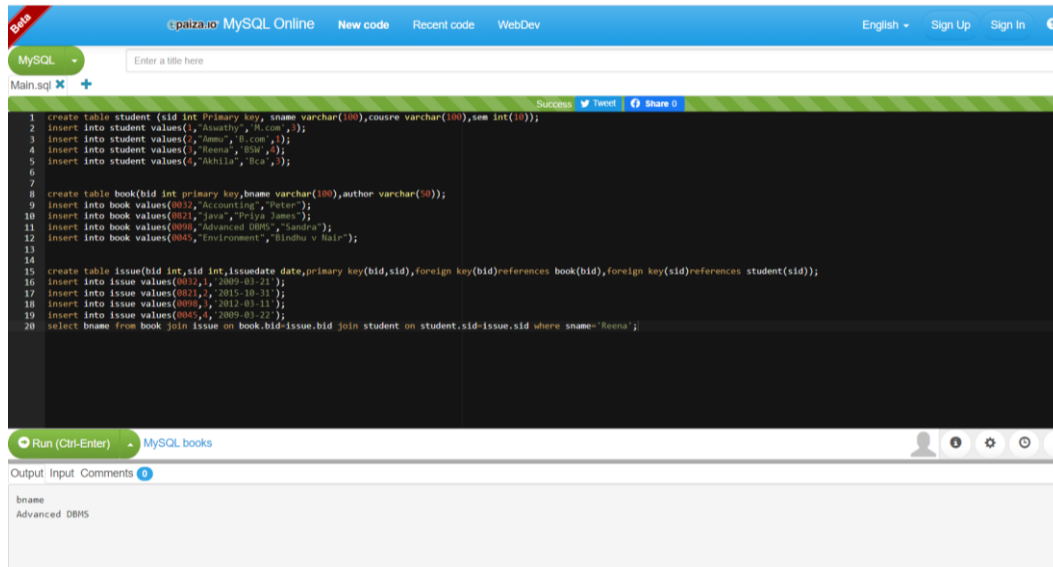
The screenshot shows the MySQL Online interface with a SQL query and its output. The query is as follows:

```
1 create table student (sid int Primary key, sname varchar(100),course varchar(100),sem int(10));
2 insert into student values(1,"Ashwthy","R.com",3);
3 insert into student values(2,"Ammu","B.com",1);
4 insert into student values(3,"Reena","BSM",4);
5 insert into student values(4,"Akhila","Bca",3);
6
7
8 create table book(bid int primary key,bname varchar(100),author varchar(50));
9 insert into book values(0012,"Accounting","Peter");
10 insert into book values(0021,"Java","Priya Jambet");
11 insert into book values(0090,"Advanced DBMS","Sandra");
12 insert into book values(0045,"Environment","Bindhu v hair");
13
14
15 create table issue(bid int,sid int,issuodate date,primary key(bid,sid),foreign key(bid)references book(bid),foreign key(sid)references student(sid));
16 insert into issue values(0012,1,"2009-03-21");
17 insert into issue values(0021,2,"2015-10-31");
18 insert into issue values(0090,3,"2012-03-11");
19 insert into issue values(0045,4,"2009-03-22");
20 select sname from student join issue on student.sid=issue.sid join book on issue.bid=book.bid where sem=4;
```

The output of the query is:

sname
Reena

7. Display the name of book issued to 'Reena'.



The screenshot shows the MySQL Online interface with a SQL query and its output. The query is as follows:

```
1 create table student (sid int Primary key, sname varchar(100),course varchar(100),sem int(10));
2 insert into student values(1,"Ashwthy","R.com",3);
3 insert into student values(2,"Ammu","B.com",1);
4 insert into student values(3,"Reena","BSM",4);
5 insert into student values(4,"Akhila","Bca",3);
6
7
8 create table book(bid int primary key,bname varchar(100),author varchar(50));
9 insert into book values(0012,"Accounting","Peter");
10 insert into book values(0021,"Java","Priya Jambet");
11 insert into book values(0090,"Advanced DBMS","Sandra");
12 insert into book values(0045,"Environment","Bindhu v hair");
13
14
15 create table issue(bid int,sid int,issuodate date,primary key(bid,sid),foreign key(bid)references book(bid),foreign key(sid)references student(sid));
16 insert into issue values(0012,1,"2009-03-21");
17 insert into issue values(0021,2,"2015-10-31");
18 insert into issue values(0090,3,"2012-03-11");
19 insert into issue values(0045,4,"2009-03-22");
20 select bname from book join issue on book.bid=issue.bid join student on student.sid=issue.sid where sname="Reena";
```

The output of the query is:

bname
Advanced DBMS

8. Display the name of student who took the book written by 'Peter'.

MySQL Online interface showing SQL queries and results.

MySQL Online interface showing SQL queries and results.

SQL Queries:

```
1 create table student (sid int Primary key, sname varchar(100), course varchar(100), sem int(10));
2 insert into student values(1, "Aswathy", "R.com", 1);
3 insert into student values(2, "Ammu", "B.com", 1);
4 insert into student values(3, "Teena", "BSc", 2);
5 insert into student values(4, "Akhila", "Bca", 2);
6
7
8 create table book (bid int primary key, bname varchar(100), author varchar(50));
9 insert into book values(8032, "Accounting", "Peter");
10 insert into book values(8021, "Java", "P.Piya James");
11 insert into book values(8098, "Advanced DBMS", "Sandra");
12 insert into book values(8045, "Environment", "Sindhu v Ravi");
13
14
15 create table issue (bid int, sid int, issuedate date, primary key (bid, sid), foreign key (bid) references book (bid), foreign key (sid) references student (sid));
16 insert into issue values(8032, 1, "2009-03-21");
17 insert into issue values(8021, 3, "2015-10-11");
18 insert into issue values(8098, 1, "2012-03-11");
19 insert into issue values(8045, 1, "2009-03-22");
20 select sname from student join issue on student.sid=issue.sid join book on issue.bid=book.bid where author="Peter";
```

Output:

sname
Aswathy