Advance Database Management Systems Lab

Lab Test

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Batch- 2

```
create database LabTest;
use LabTest;

create table Library(BookID varchar(4) not null, BookName varchar(55) not
null, Author varchar(45), DatePurchased Date, Publisher varchar(25), Price int);

insert into Library values('B101', 'Cost Accounting', 'Jain Narang', '11-Feb-13',
'Kalyani', 80);
insert into Library values('B102', 'Business Statistics', 'OP Aggarwal', '22-Dec-
11', 'Himalaya', 750);
insert into Library values('B103', 'Rdbms', 'C J Date', '2-Mar-15', 'TMH', 900);
insert into Library values('B104', 'Mgmt Accounting', 'RK Sharma', '19-Apr-16',
'Kalyani', 450);
insert into Library values('B105', 'Operating Systems', 'Galvin', '25-Nov-13',
'PHI', 750);
insert into Library values('B106', 'Advanced Accounting', 'SC Gupta', '16-Apr-
18', 'Himalaya', 600);


--Write sql query to display the list of authors from Himalaya publications.
select Author from Library where Publisher='Himalaya';
```

Output:

	Author
1	OP Aggarwal
2	SC Gupta

```
--Write sql query to display the total cost of books purchased Publisher wise.
select sum(Price) from Library group by Publisher;
```

Output:

	(No column name)
1	1350
2	530
3	750
4	900

--Write sql query to count the total number of books under Kalyani publications.

```
select count(BookName) from Library where Publisher='Kalyani';
```

Output:

	(No column name)
1	2

--Write sql query to rename the column Publisher as Publications.

```
exec sp_rename 'Library.Publisher', 'Publications', 'COLUMN';
select * from Library;
```

Output:

	BookID	BookName	Author	DatePurchased	Publications	Price
1	B101	Cost Accounting	Jain Narang	2013-02-11	Kalyani	80
2	B102	Business Statistics	OP Aggarwal	2011-12-22	Himalaya	750
3	B103	Rdbms	C J Date	2015-03-02	TMH	900
4	B104	Mgmt Accounting	RK Sharma	2016-04-19	Kalyani	450
5	B105	Operating Systems	Galvin	2013-11-25	PHI	750
6	B106	Advanced Accounting	SC Gupta	2018-04-16	Himalaya	600

--Write a sql query to display the books in the ascending order of DatePurchased.

```
select BookName from Library order by DatePurchased;
```

Output:

	BookName
1	Business Statistics
2	Cost Accounting
3	Operating Systems
4	Rdbms
5	Mgmt Accounting
6	Advanced Accounting

--Write sql query to create an index on the fields BookName and Author.

```
create index INDEX1 on Library (BookName, Author);
```

Output:

```
Commands completed successfully.

Completion time: 2023-04-06T14:51:39.7715166+05:30
```

--Write sql query to display the books whose price is between 500 and 700
```
select BookName from Library where Price>=500 and Price<=700;
```

Output:

	BookName
1	Advanced Accounting

--Write sql query to increase the price of all the books by 200 for publishers other thanHimalaya or Kalyani.
```
update Library set Price = Price + 200 where Publications NOT IN ('Himalaya', 'Kalyani');
select * from Library;
```

Output:

	BookID	BookName	Author	DatePurchased	Publications	Price
1	B101	Cost Accounting	Jain Narang	2013-02-11	Kalyani	80
2	B102	Business Statistics	OP Aggarwal	2011-12-22	Himalaya	750
3	B103	Rdbms	C J Date	2015-03-02	TMH	1100
4	B104	Mgmt Accounting	RK Sharma	2016-04-19	Kalyani	450
5	B105	Operating Systems	Galvin	2013-11-25	PHI	950
6	B106	Advanced Accounting	SC Gupta	2018-04-16	Himalaya	600

--Write sql query to display the book details where author name contains the name Sharma.
```
select * from Library where Author like '%Sharma';
```

Output:

	BookID	BookName	Author	DatePurchased	Publications	Price
1	B104	Mgmt Accounting	RK Sharma	2016-04-19	Kalyani	450

--Create a view to display the fields BookId and BookName where the Publisher isHimalaya.
```
CREATE VIEW HimalayaBooks AS SELECT BookID, BookName FROM Library WHERE Publications = 'Himalaya';

SELECT * FROM HimalayaBooks;
```

Output:

	BookID	BookName
1	B102	Business Statistics
2	B106	Advanced Accounting