Assignment –5 **Relational and Logical Operators.**

1) Write a query that will give you all orders for more than Rs. 1,000.

```
mysql> SELECT *
    -> FROM orders
    -> WHERE amt>1000;
+-------+---------+------------+------+------+
| Onum  | Amt     | Odate      | Cnum | Snum |
+-------+---------+------------+------+------+
| 3002  | 1900.10 | 1990-10-03 | 2007 | 1004 |
| 3005  | 5160.45 | 1990-10-03 | 2003 | 1002 |
| 3006  | 1098.16 | 1990-10-03 | 2008 | 1007 |
| 3009  | 1713.23 | 1990-10-04 | 2002 | 1003 |
| 3008  | 4723.00 | 1990-10-05 | 2006 | 1001 |
| 3010  | 1309.95 | 1990-10-06 | 2004 | 1002 |
| 3011  | 9891.88 | 1990-10-06 | 2006 | 1001 |
+-------+---------+------------+------+------+
7 rows in set (0.00 sec)
```

2) Write a query that will give you the names and cities of all salespeople in London with a commission above .10.

```
mysql> SELECT Sname, City
    -> FROM Salespeople
    -> WHERE City='London'AND Comm>0.10;
+--------+--------+
| Sname  | City   |
+--------+--------+
| Peel   | London |
| Motika | London |
+--------+--------+
2 rows in set (0.00 sec)
```

3) Write a query on the Customers table whose output will exclude all customers with a rating <= 100, unless they are located in Rome.

```
mysql> SELECT *
    -> FROM customers
    -> WHERE rating>100 OR City='Rome';
+------+----------+----------+--------+------+
| Cnum | Cname    | City     | Rating | Snum |
+------+----------+----------+--------+------+
| 2002 | Giovanni | Rome     |    200 | 1003 |
| 2003 | Liu      | San Jose |    200 | 1002 |
| 2004 | Grass    | Berlin   |    300 | 1002 |
| 2008 | Cisneros | San Jose |    300 | 1007 |
| 2007 | Pereira  | Rome     |    100 | 1004 |
+------+----------+----------+--------+------+
5 rows in set (0.00 sec)
```

4) What will be the output from the following query?

Select * from Orders
   where (amt < 1000 OR
          NOT (odate = '1990-10-03'
               AND cnum > 2003));

```
mysql> SELECT *
    -> FROM orders
    -> WHERE (amt<1000 OR NOT(odate='1990-10-03' AND Cnum>2003));
+------+---------+------------+------+------+
| Onum | Amt     | Odate      | Cnum | Snum |
+------+---------+------------+------+------+
| 3001 |   18.69 | 1990-10-03 | 2008 | 1007 |
| 3003 |  767.19 | 1990-10-03 | 2001 | 1001 |
| 3005 | 5160.45 | 1990-10-03 | 2003 | 1002 |
| 3009 | 1713.23 | 1990-10-04 | 2002 | 1003 |
| 3007 |   75.75 | 1990-10-04 | 2004 | 1002 |
| 3008 | 4723.00 | 1990-10-05 | 2006 | 1001 |
| 3010 | 1309.95 | 1990-10-06 | 2004 | 1002 |
| 3011 | 9891.88 | 1990-10-06 | 2006 | 1001 |
+------+---------+------------+------+------+
8 rows in set (0.00 sec)
```

5) What will be the output of the following query?

Select * from Orders
        where NOT ((odate = '1990-10-03' OR snum
                >1006) AND amt >= 1500);

```
mysql> SELECT *
    -> FROM orders
    -> WHERE NOT ((Odate='1990-10-30' OR Snum>1006) AND amt>=1500);
+------+---------+------------+------+------+
| Onum | Amt     | Odate      | Cnum | Snum |
+------+---------+------------+------+------+
| 3001 |   18.69 | 1990-10-03 | 2008 | 1007 |
| 3003 |  767.19 | 1990-10-03 | 2001 | 1001 |
| 3002 | 1900.10 | 1990-10-03 | 2007 | 1004 |
| 3005 | 5160.45 | 1990-10-03 | 2003 | 1002 |
| 3006 | 1098.16 | 1990-10-03 | 2008 | 1007 |
| 3009 | 1713.23 | 1990-10-04 | 2002 | 1003 |
| 3007 |   75.75 | 1990-10-04 | 2004 | 1002 |
| 3008 | 4723.00 | 1990-10-05 | 2006 | 1001 |
| 3010 | 1309.95 | 1990-10-06 | 2004 | 1002 |
| 3011 | 9891.88 | 1990-10-06 | 2006 | 1001 |
+------+---------+------------+------+------+
10 rows in set (0.00 sec)
```

6) What is a simpler way to write this query?

Select snum, sname, city, comm From Salespeople
where (comm > .12 OR comm <.14);

```
mysql> SELECT *
    -> FROM salespeople;
+------+---------+-----------+------+
| Snum | Sname   | City      | Comm |
+------+---------+-----------+------+
| 1001 | Peel    | London    | 0.12 |
| 1002 | Serres  | San Jose  | 0.13 |
| 1004 | Motika  | London    | 0.11 |
| 1007 | Rifkin  | Barcelona | 0.15 |
| 1003 | Axelrod | New York  | 0.10 |
+------+---------+-----------+------+
5 rows in set (0.00 sec)
```