

Assignment – 12
Using the operators IN, ANY, and ALL.

- 1) Write a query that selects all customers whose ratings are equal to or greater than ANY of Serres'.

```
KD3_86927_Vivek@>SELECT * FROM CUSTOMERS WHERE RATING >= ANY
-> (SELECT RATING FROM CUSTOMERS WHERE SNUM =
-> (SELECT SNUM FROM SALESPeOPLE WHERE SNAME = 'Serres'));
+-----+-----+-----+-----+-----+
| 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 |
+-----+-----+-----+-----+-----+
4 rows in set (0.00 sec)

KD3_86927_Vivek@>
```

- 2) Write a query using ANY or ALL that will find all salespeople who have no customers located in their city.

```
KD3_86927_Vivek@>SELECT * FROM SALESPeOPLE WHERE SNUM =
-> ANY (SELECT SNUM
-> FROM CUSTOMERS
-> WHERE
-> CITY != ALL (SELECT CITY FROM SALESPeOPLE));
+-----+-----+-----+-----+
| Snum | Sname   | City    | Comm |
+-----+-----+-----+-----+
| 1002 | Serres  | San Jose | 0.13 |
| 1004 | Motika  | London  | 0.11 |
| 1003 | Axelrod | New York | 0.10 |
+-----+-----+-----+-----+
3 rows in set (0.00 sec)

KD3_86927_Vivek@>
```

- 3) Write a query that selects all orders for amounts greater than any for the customers in London.

```
KD3_86927_Vivek@>Select * from orders where amt > Any
-> (Select amt from orders where cnum = Any
-> (Select cnum from customers where city = 'London'));
```

| 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)

```
KD3_86927_Vivek@>
```

- 4) Write the above query using MIN or MAX.

```
KD3_86927_Vivek@>SELECT * FROM orders
-> WHERE amt > (SELECT MIN(amt) FROM orders
-> WHERE cnum = ANY (SELECT cnum FROM customers WHERE city = 'London'));
```

| 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 |
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| 3011 | 9891.88 | 1990-10-06 | 2006 | 1001 |

7 rows in set (0.00 sec)

```
KD3_86927_Vivek@>
```