

# SQL Exercise 1

Cole Miller

9/3/2025

Estimated Time: 2 Hrs

## Question 1:

### Analysis:

Display the ORDDATE, ORDNO, and ORDNAME values from records in table ORDERTBL that have an ORDCITY value of 'Monroe' and ORDSTATE value of 'WA', or an ORDCITY value of 'Denver' and ORDSTATE value of 'CO', sorted in ascending order by ORDDATE.

### Query:

```
select
    orddate,
    ordno,
    ordname
from
    ordertbl
where
    ordcity = 'Monroe'
    and ordstate = 'WA'
    or ordcity = 'Denver'
    and ordstate = 'CO'
ORDER BY
    orddate
```

### Result:

| orddate    | ordno    | ordname      |
|------------|----------|--------------|
| 2015-01-13 | O3331222 | Jim Glussman |
| 2015-01-15 | O3377543 | Jerry Wyatt  |
| 2015-01-16 | O7989497 | Bob Mann     |

## Question 2:

### Analysis:

Display emplastname and BonusAmount values from employee table that supempno is not null sorted by ascending last name. The BonusAmount is calculated by taking the empcommrate and multiplying by 1000.

### Query:

```
SELECT
    emplastname,
    empcommrate * 1000 AS BonusAmount
FROM
    employee
WHERE
    supempno IS NOT NULL
Order BY
    emplastname
```

### Result:

| <b>emplastname</b> | <b>BonusAmount</b> |
|--------------------|--------------------|
| Beck               | (null)             |
| Hill               | 20                 |
| Jenkins            | 20                 |
| Santos             | 20                 |
| Tang               | 40                 |
| White              | 40                 |

## Question 3:

### Analysis:

Display all columns from ordertbl that were delivered to an address with the words Main Street in the ordstreet string and the substring '2015-02' in orddate. Sort the output by ascending orddate.

### Query:

```
SELECT
*
FROM
ordertbl
WHERE
ordstreet LIKE '%Main St.%'
AND orddate LIKE '2015-02%'
ORDER BY
orddate
```

### Result:

| ordno    | orddate    | custno   | empno    | ordname     | ordstreet     | ordcity  | ordstate | ordzip     |
|----------|------------|----------|----------|-------------|---------------|----------|----------|------------|
| O1241518 | 2015-02-10 | C9549302 | (null)   | Todd Hayes  | 1400 Main St. | Lynnwood | WA       | 98036-2244 |
| O9919699 | 2015-02-11 | C9857432 | E9954302 | Homer Wells | 123 Main St.  | Seattle  | WA       | 98105-4322 |

## Question 4:

### Analysis:

Display maxbalance and custcity for each unique custcity in Washington State. Maxbalance is the greatest custbal for that custcity. Finally it should be sorted first by maxbalance descending then by ascending city name.

### Query:

```
SELECT
    custcity,
    MAX(custbal) AS MAXBALANCE
FROM
    customer
WHERE
    custstate = 'WA'
GROUP BY
    custcity
ORDER BY
    MAXBALANCE DESC,
    custcity
```

### Result:

| <b>custcity</b> | <b>MAXBALANCE</b> |
|-----------------|-------------------|
| Seattle         | 1500              |
| Fife            | 1000              |
| Bellevue        | 250               |
| Renton          | 85                |
| Lynnwood        | 0                 |

|        |   |
|--------|---|
| Monroe | 0 |
|--------|---|

## Question 5:

### Analysis:

Display prodmfg, ProductCount, and InventoryPrice where ProductCount is the number of product that are offered by each manufacturer and the InventoryPrice is the sum of all of the prodqoh and prodprice for all products from a manufacturer. This also should be sorted by ascending prodmfg.

### Query:

```
SELECT
    DISTINCT prodmfg,
    COUNT(prodqoh) AS ProductCount,
    SUM(prodqoh * prodprice) AS InventoryPrice
FROM
    product
GROUP BY
    prodmfg
ORDER BY
    prodmfg
```

### Result:

| prodmfg        | ProductCount | InventoryPrice |
|----------------|--------------|----------------|
| ColorMeg, Inc. | 2            | 5218           |
| Connex         | 4            | 6329.36        |
| Cybercx        | 1            | 1068           |
| Ethlite        | 1            | 1200           |

|               |   |         |
|---------------|---|---------|
| Intersafe     | 1 | 494.67  |
| UV Components | 1 | 3199.84 |

“By affixing my signature below, I certify that the accompanying work represents my own intellectual effort. Furthermore, I have received no outside help other than what is documented below.”

Signed: Cole Miller

| Date     | Person Helping | Nature of Help                               | Time Spent |
|----------|----------------|--|------------|
| 9/3/2025 | Naomi Floyd    | Helped me understand the instructions better | 2 minutes  |