

Problem Statements:

You are given a table, *Projects*, containing three columns: *Task_ID*, *Start_Date* and *End_Date*. It is guaranteed that the difference between the *End_Date* and the *Start_Date* is equal to 1 day for each row in the table.

<i>Column</i>	<i>Type</i>
<i>Task_ID</i>	<i>Integer</i>
<i>Start_Date</i>	<i>Date</i>
<i>End_Date</i>	<i>Date</i>

If the *End_Date* of the tasks are consecutive, then they are part of the same project. Samantha is interested in finding the total number of different projects completed.

Write a query to output the start and end dates of projects listed by the number of days it took to complete the project in ascending order. If there is more than one project that have the same number of completion days, then order by the start date of the project.

Sample Input

<i>Task_ID</i>	<i>Start_Date</i>	<i>End_Date</i>
1	2015-10-01	2015-10-02
2	2015-10-02	2015-10-03
3	2015-10-03	2015-10-04
4	2015-10-13	2015-10-14
5	2015-10-14	2015-10-15
6	2015-10-28	2015-10-29
7	2015-10-30	2015-10-31

Sample Output

```
2015-10-28 2015-10-29
2015-10-30 2015-10-31
2015-10-13 2015-10-15
2015-10-01 2015-10-04
```

Oracle Code:

```
SELECT start_date, MIN(end_date)
FROM
  (SELECT start_date FROM PROJECTS WHERE start_date NOT IN (SELECT end_date FROM
PROJECTS)) a,
  (SELECT end_date FROM PROJECTS WHERE end_date NOT IN (SELECT start_date FROM
PROJECTS)) b
where start_date < end_date
GROUP BY start_date
ORDER BY (MIN(end_date)-start_date), start_date;
```

SQL Server Code:

```
SELECT start_date, MIN(end_date) as end_date
FROM
  (SELECT start_date FROM PROJECTS WHERE start_date NOT IN (SELECT end_date FROM
PROJECTS)) a,
  (SELECT end_date FROM PROJECTS WHERE end_date NOT IN (SELECT start_date FROM
PROJECTS)) b
where start_date < end_date
GROUP BY start_date
ORDER BY datediff(day, start_date, MIN(end_date)), start_date
```