

Concordia University
Department of Computer Science & Software Engineering
COMP 353 – Databases
Summer 2018
Assignment # 3

Due: August 16, 2018

For the contract Management system you developed, answer the following questions:

Write each of the following queries in SQL:

1. Give a list of clients(s) with the highest number of contracts in each Line of Business(LOB).
2. Give the details of the contracts started within the last 10 days with ACV between \$10,000 to \$20,000. This should be a generic query providing details for last 10 days from current date.
3. Find the information of the clients who signed contract from “Quebec”.
4. Find all the clients whose contracts, in each category, has the highest productivity of employees working on the project and based in Montreal.
5. Considering an attrition rate of 8.7% annually, find the number of employees available to work after June-2018 on all the contracts.

Comprehension questions:

Please explain/justify your solutions for the following questions only using relational algebra, without using any SQL statement/keyword:

1. Find the number of the clients who signed the contracts providing “Cloud services”.
2. Get the list of clients who have signed multiple contracts.
3. Find all the clients who have signed up for the premium contract delivery and the employees working on that contract have a “Normal employee plan”.
4. For the last 30-days find the employees who have resigned.
5. Find the employees who have worked on all contracts.

What you should hand in: You should submit an individual report that include:

- a) reasonable assumption(s) you made;
- b) SQL queries for questions 1-5;
- c) Appropriate answers to comprehension questions 1-5.

You should submit your report on Moodle.