Day 2 database Task

Question 1: INSERT INTO and VALUE Functions

Write an SQL query to insert a new employee into the employees table with the following details:

- emp_no: 500001

- birth_date: January 1, 1980

- first_name: 'Jane'

- last_name: 'Smith'

- gender: 'F'

- hire_date: Current date (use a value function like CURDATE()).

Then, insert a corresponding record into the dept_emp table to assign Jane to department 'd005' starting today with an end date of '9999-01-01'.

Question 2: ALTER, CASE, and Simple JOIN

Modify the employees table to add a new column full_name (VARCHAR(30)). Then, update the full_name column for all employees by concatenating first_name and last_name with a space in between. Use a CASE statement to set full_name to 'Unknown' if either first_name or last_name is NULL. Join the employees table with the current_dept_emp view to only update employees currently in department 'd005'.

Question 3: UPDATE, WHERE, and CAST

Update the salaries table to increase the salary by 10% for employees who are currently in department 'd009' (use the current_dept_emp view). Ensure the salary is stored as an integer by using CAST. Only update salaries where the to_date is '9999-01-01' (indicating current records).

Question 4: VIEW, GROUP BY, HAVING, and Set Functions

Create a view named dept_salary_stats that shows the average salary (use AVG) and the number of employees (use COUNT) per department for employees currently employed (based on to_date = '9999-01-01' in salaries). Use a simple join between salariesandcurrent_dept_emp. Filter the results to only show departments with an average salary greater than 60,000 using HAVING. Include the department name by joining with the departments` table.