☑ 1. CREATE PROCEDURE: Add a new employee only if their department exists.

sql
CopyEdit
```sql
DELIMITER $$

CREATE PROCEDURE AddEmployee(
    IN emp_name VARCHAR(100),
    IN emp_salary DECIMAL(10, 2),
    IN dept_id INT
)
BEGIN
    DECLARE dept_exists INT;

    -- Check if the department exists
    SELECT COUNT(*) INTO dept_exists
    FROM departments
    WHERE id = dept_id;

    -- Conditional logic
    IF dept_exists = 1 THEN
        INSERT INTO employees (name, salary, department_id)
        VALUES (emp_name, emp_salary, dept_id);
    ELSE
        SIGNAL SQLSTATE '45000'
        SET MESSAGE_TEXT = 'Department does not exist.';
    END IF;
END$$

DELIMITER ;
```

☑ 2. CREATE FUNCTION: Calculate bonus based on salary.

sql
CopyEdit

```sql
DELIMITER $$

CREATE FUNCTION CalculateBonus(salary DECIMAL(10, 2))
RETURNS DECIMAL(10, 2)
DETERMINISTIC
BEGIN
    DECLARE bonus DECIMAL(10, 2);

    -- Conditional logic based on salary
    IF salary < 50000 THEN
        SET bonus = salary * 0.10;
    ELSEIF salary BETWEEN 50000 AND 100000 THEN
        SET bonus = salary * 0.07;
    ELSE
        SET bonus = salary * 0.05;
    END IF;

    RETURN bonus;
END$$

DELIMITER ;
```

💡 Example Usage:

```sql
sql
CopyEdit
-- Call the procedure
CALL AddEmployee('Alice Smith', 72000, 3);

-- Use the function
SELECT name, salary, CalculateBonus(salary) AS bonus
FROM employees;
```