1.

a. CHECK weight <= 5;

b. CREATE TRIGGER WeightReq

AFTER INSERT ON Laptop

REFERENCING NEW ROW AS New Row

FOR EACH ROW

WHEN (New Row.weight > 5)

UPDATE Laptop SET weight = NULL WHERE model = New\_Row.model;

2. (1, 4), (100, 0)

3.

a. CREATE VIEW EmployeeNames AS

SELECT ename

FROM Employees:

CREATE VIEW DeptInfo AS

SELECT dept, AVG (salary) AS avgsalary

FROM Employees

GROUP BY dept;

b. GRANT SELECT, DELETE ON EmployeeNames TO 'Mike';

GRANT SELECT ON DeptInfo TO 'Mike';

- c. The answer to the previous question already ensures this. He is only granted SELECT privileges on the DeptInfo table, which only shows the average salary of each department and not of individuals. He also has no privileges to the Employees base table. However, if he somehow knows that there is only person working in a certain department, he will be able to know the salary of that person because the average salary of that department is equal to that person's salary.
- d. UPDATE DeptInfo

SET dept = 'Marketing'

WHERE dept = 'Manufacturing';

e. GRANT ALL PRIVILEGES ON Employees

TO 'Joe' WITH GRANT OPTION;

GRANT ALL PRIVILEGES ON EmployeeNames

TO 'Joe' WITH GRANT OPTION;

Joe cannot read the DeptInfo view.

f. REVOKE ALL PRIVILEGES ON EmployeeNames FROM 'Joe' CASCAEDE; The EmployeeNames and StaffNames views will remain. However, because Joe used EmployeeNames to create AllNames and his privileges for EmployeeNames were removed, the AllNames view will be removed.