

DBMS Lab : N Batch – 25.02.2026

1. Consider the Relation Schema:
Accounts (account_id, customer_name, balance)
account_id → Primary Key
balance → NOT NULL
Write a transaction to Transfer ₹8000 from Account 101 to Account 102,
Ensure Account 101 maintains minimum balance ₹3000, If condition fails →
rollback.
2. Consider the Relation Schema:
Customers (customer_id, name, email)
Products (product_id, product_name, stock, price)
Orders (order_id, customer_id, order_date, status)
Order_Items (order_id, product_id, quantity)
order_id → Foreign Key references Orders
product_id → Foreign Key references Products
Write a transaction to Insert new order and Insert order item, then reduce
product stock, If stock < required quantity → rollback entire transaction.
3. Consider the Relation Schema:
Students (student_id, name, dept)
Enrollment (student_id, course_id, semester)
student_id → FK references Students
Write a transaction to Insert student record and Insert enrollment record, If
enrollment fails → undo student insertion.
4. Consider the Relation Schema:
Patients (patient_id, name, status)
Appointments (appointment_id, patient_id, doctor_id, slot_available)
Bills (bill_id, patient_id, amount)
Write a transaction to Update patient status to “Discharged”, and Insert bill
record, If bill insertion fails → rollback status update
5. Consider the Relation Schema:
Employees (emp_id, name, basic_salary, hra, bonus)
Write a transaction (Savepoint Based) to Increase basic salary by 10%,
Increase HRA by 5%, and Increase bonus by ₹5000, If bonus update fails →
rollback only bonus change.