**PL/SQL Control Structures Exercises**

**Scenario 1: Apply a 1% Discount to Loan Interest Rates for Customers Above 60**

Write a PL/SQL block that loops through all customers, checks their age, and if they are above 60, apply a 1% discount to their current loan interest rates.

DECLARE  
 CURSOR cust\_loan\_cursor IS  
 SELECT c.customer\_id, c.age, l.loan\_id, l.interest\_rate  
 FROM customers c  
 JOIN loans l ON c.customer\_id = l.customer\_id;  
BEGIN  
 FOR rec IN cust\_loan\_cursor LOOP  
 IF rec.age > 60 THEN  
 UPDATE loans  
 SET interest\_rate = interest\_rate - 1  
 WHERE loan\_id = rec.loan\_id;  
 END IF;  
 END LOOP;  
 COMMIT;  
END;

**Scenario 2: Promote Customers to VIP Based on Balance Over $10,000**

Write a PL/SQL block that iterates through all customers and sets a flag IsVIP to TRUE for those with a balance over $10,000.

BEGIN  
 FOR rec IN (SELECT customer\_id, balance FROM customers) LOOP  
 IF rec.balance > 10000 THEN  
 UPDATE customers  
 SET IsVIP = 'TRUE'  
 WHERE customer\_id = rec.customer\_id;  
 END IF;  
 END LOOP;  
 COMMIT;  
END;

**Scenario 3: Send Reminders for Loans Due Within Next 30 Days**

Write a PL/SQL block that fetches all loans due in the next 30 days and prints a reminder message for each customer.

DECLARE  
 CURSOR due\_loans\_cursor IS  
 SELECT l.loan\_id, l.customer\_id, l.due\_date, c.name  
 FROM loans l  
 JOIN customers c ON l.customer\_id = c.customer\_id  
 WHERE l.due\_date <= SYSDATE + 30;  
  
BEGIN  
 FOR rec IN due\_loans\_cursor LOOP  
 DBMS\_OUTPUT.PUT\_LINE('Reminder: Dear ' || rec.name ||  
 ', your loan (ID: ' || rec.loan\_id ||  
 ') is due on ' || TO\_CHAR(rec.due\_date, 'DD-MON-YYYY') || '.');  
 END LOOP;  
END;