# **PRACTICAL 11**

**AIM** - **To create a PL/SQL block that deletes records from a table with age 21.**

**Additionally, it generates a trigger that stores the original record in another table**

**before deletion.**

**Constraints**

**1.** Deletion Condition: Delete records from the main table where the age is 21.

2. Trigger: Before deleting a record, store the original record in another table.

**SQL Query**

CREATE TABLE Persons (

person\_id NUMBER PRIMARY KEY,

name VARCHAR2(50),

age NUMBER

);

CREATE TABLE DeletedRecords (

person\_id NUMBER,

name VARCHAR2(50),

age NUMBER,

deletion\_date DATE

);

CREATE OR REPLACE TRIGGER trg\_store\_deleted

BEFORE DELETE ON Persons

FOR EACH ROW

BEGIN

INSERT INTO DeletedRecords (person\_id, name, age, deletion\_date)

VALUES (:OLD.person\_id, :OLD.name, :OLD.age, SYSDATE);

END;

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INSERT INTO Persons VALUES (1, 'Alice', 21);

INSERT INTO Persons VALUES (2, 'Bob', 25);

INSERT INTO Persons VALUES (3, 'Charlie', 21);

INSERT INTO Persons VALUES (4, 'David', 30);

COMMIT;

DECLARE

v\_deleted\_count NUMBER;

BEGIN

DELETE FROM Persons

WHERE age = 21;

v\_deleted\_count := SQL%ROWCOUNT;

DBMS\_OUTPUT.PUT\_LINE('Number of records deleted: ' || v\_deleted\_count);

COMMIT;

EXCEPTION

WHEN OTHERS THEN

DBMS\_OUTPUT.PUT\_LINE('Error occurred: ' || SQLERRM);

ROLLBACK;

END;

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SELECT \* FROM Persons;

SELECT \* FROM DeletedRecords;

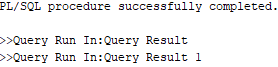
**Tasks -**

Test Case 1: Delete records where the age is 21

Objective: Verify that records with an age of 21 are successfully deleted.

Expected Result: Records with an age of 21 ('Alice' and 'Charlie') should be deleted.

Output:





Test Case 2: Verify Trigger Functionality

Objective: Verify that the trigger successfully stores original records in the DeletedRecords table before deletion

Expected Result: The DeletedRecords table should contain the original records of 'Alice' and 'Charlie' before they were deleted.

Output

