**SQL Queries with Nested Queries**

**1.Retrieve the names of all students who have borrowed books published before 2000.**

SELECT Name

FROM Student\_Details

WHERE Student\_ID IN (SELECT Borrower\_ID FROM Borrower\_Details WHERE Book\_ID IN (SELECT ISBN FROM Book\_Details WHERE Publication\_Year < 2000));

**2.Find the titles of all books borrowed by students in the 'Physics' department.**

SELECT Title

FROM Book\_Details

WHERE ISBN IN (SELECT Book\_ID FROM Borrower\_Details WHERE Borrower\_ID IN (SELECT Student\_ID FROM Student\_Details WHERE Department = 'Physics'));

**3.List the names of all authors who have written books published in the 'Fantasy' category.**

SELECT Name

FROM Author\_Details

WHERE Author\_ID IN (SELECT Author\_ID FROM Book\_Details WHERE Category\_ID IN (SELECT Category\_ID FROM Category\_Details WHERE Category\_Name = 'Fantasy'));

**4.Retrieve the names of all students who have borrowed more than 3 books.**

SELECT Name

FROM Student\_Details

WHERE Student\_ID IN (SELECT Borrower\_ID FROM Borrower\_Details GROUP BY Borrower\_ID HAVING COUNT(Book\_ID) > 3);

**5.Find the titles of all books with a publication year not between 2005 and 2015.**

SELECT Title

FROM Book\_Details

WHERE ISBN NOT IN (SELECT ISBN FROM Book\_Details WHERE Publication\_Year BETWEEN 2005 AND 2015);

**6.Retrieve the names of all authors who have written books borrowed by students in the 'Chemistry' department.**

SELECT Name

FROM Author\_Details

WHERE Author\_ID IN (SELECT Author\_ID FROM Book\_Details WHERE ISBN IN (SELECT Book\_ID FROM Borrower\_Details WHERE Borrower\_ID IN (SELECT Student\_ID FROM Student\_Details WHERE Department = 'Chemistry')));

**7.List the titles of all books borrowed by students who have borrowed books published by 'Penguin Publishers'.**

**8. List Authors of Books Reserved but Not Yet Fulfilled**

SELECT Name

FROM Author\_Details

WHERE Author\_ID IN (

SELECT Author\_ID

FROM Book\_Details

WHERE ISBN IN (

SELECT Book\_ID

FROM Reservation\_Details

WHERE Status = 'pending'

)

);

**9. Find Books Borrowed by Students in the Literature Department**

SELECT Title

FROM Book\_Details

WHERE Publication\_Year = (SELECT MAX(Publication\_Year) FROM Book\_Details);

**10.List the names of all authors who have not written books in the 'Mystery' category.**

SELECT Name

FROM Author\_Details

WHERE Author\_ID NOT IN (SELECT Author\_ID FROM Book\_Details WHERE Category\_ID IN (SELECT Category\_ID FROM Category\_Details WHERE Category\_Name = 'Mystery'));