Assignment

Sept23/ DBT/ 009

Database Technologies

Diploma in Advance Computing

September 2023

**Joins**

USE ***student\_phone, student\_address, faculty\_phone, faculty\_address, batch\_students, course\_batches, student\_qualifications, faculty\_qualifications, course\_modules, modules, faculty, student, course, student\_cards, and student\_order*** relation to solve the following queries.

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| 1. Display all *student and with their address* from *student* and *student\_address tables*. |
| **select namefirst,address from student s join student\_address sa where s.id=sa.studentid;** |
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| 1. Display *(namefirst, namelast, emailID, and student\_qualification details)* from *student* and student\_*qualification* relations. |
| **select namefirst,namelast,emailid,sq.\* from student s join student\_qualifications sq where s.id=sq.studentid;** |
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| 1. Display *(namefirst, namelast, emailID, college, and university)* who have studied in 'Yale University'. *(Use student, and student\_qualification relation)* |
| **select namefirst,namelast,emailid,college,university from student s join student\_qualifications sq where s.id=sq.studentid and university='Yale University' ;** |
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| 1. Display all student details his phone details and his qualification details. *(Use student, student\_phone and student\_qualification relation)* |
| **select namefirst,namelast,emailid,college,university,number from student s join student\_qualifications sq join student\_phone sp where s.id=sq.studentid and s.id=sp.studentid ;** |
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| 1. Display *(studentID, namefirst, namelast, name, college, university, and marks)* whose name is ‘BE’.*(Use student, and student\_qualification relation)* |
| **select namefirst,name from student s join student\_qualifications sq where sq.name="Be" ;** |
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| 1. Display the module name and the duration of the module for the batch “Batch1”. |
| **select \* from modules m join course\_batches cb where cb.name="batch1" ;** |
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| 1. Display student information along with his batch details who have joined in “Batch1”. |
| **select namefirst,name from student s join course\_batches cb where cb.name="batch1" ;** |
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| 1. Display module names for “PG-DAC” course. |
| **select \* from course c join course\_batches cb where c.id=cb.courseid and c.name="PG-DAC" ;** |
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| 1. Display *namefirst, namelast, and batch name for all students*. |
| **select namefirst,name from student s join course\_batches cb where s.id=cb.courseid ;** |
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| 1. Display *(namefirst, namelast, phone number, and emailid)* whose student ID is 13. |
| **select namefirst,namelast,number from student s join student\_phone sp where s.id=sp.studentid and sp.studentid=13 ;** |
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| 1. Display *(namefirst and count the total number of phones a student is having)* for all student. |
| **select namefirst,count(sp.number) from student s join student\_phone sp where s.id=sp.studentid group by namefirst;** |
|  |
| 1. Get student’s *(namefirst, namelast, DOB, address, name, college, university, marks, and year)*. |
| **select s.\*,sq.\*,sp.\* from student s join student\_qualifications sq join student\_phone sp where s.id=sq.studentid and s.id=sp.studentid;** |
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| 1. Get *(namefirst, namelast, emailID, phone number, and address)* whose faculty name is ‘ketan’. |
| **select s.\* ,f.\* ,sp.\* from student s join student\_phone sp join faculty f where s.id=sp.studentid and sp.id=f.id and f.namefirst="ketan";** |
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| 1. Get*(course name and batch name)*for all courses. |
| **select c.\*,cb.\* from course c join course\_batches cb where c.id=cb.courseid;** |
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| 1. Get all student details who have taken admission in ‘PG-DAC’ course. |
| **select s.\*,c.name from student s join batch\_students bs join course\_batches cb join course c where s.id=bs.studentid and cb.id=bs.batchid and c.id=cb.courseid and c.name="PG-DAC" order by id;** |
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| 1. Get all course details which had started on ‘2016-02-01’. |
| **select namefirst,namelast,starton from student s join course\_batches c where starton= '2016-02-01'and s.id=c.courseid ;** |
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| 1. Get all course name and module names which are taught in ‘PG-DAC’ course. |
| **select c.name "course name",group\_concat(m.name) 'Module\_Names' from course c join modules m join course\_modules cm where c.id=cm.courseid and c.id=moduleid and c.name="PG-DAC" group by c.name;**  **you have to use group by clause if you are using group\_concat** |
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| 1. Display how many modules are taught in each course. |
| **select c.name,group\_concat(m.name),count(m.name) from course c join modules m join course\_modules cm where c.id=cm.courseid and m.id=moduleid group by c.name;** |
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| 1. Display the student detail who are ‘BE’ graduate. |
| **select \* from student s join student\_qualifications sq where s.id=sq.studentid and name="be";** |
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| 1. Display all distinct course detail, where module for every course is designed. |
| **select c.name,group\_concat(m.name),c.summery from course c join modules m join course\_modules cm where c.id=cm.courseid and m.id=moduleid group by c.name,c.summery;** |
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| 1. Display studentID who have more than 2 phone numbers. |
| **select s.id,count(number),group\_concat(number) from student s join student\_phone pn where s.id=pn.studentid group by s.id having count(number)>2;** |
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| 1. Display the courses where ‘JAVA1’ is taught. |
| **select group\_concat(c.name),m.name from course c join modules m join course\_modules cm where c.id=cm.courseid and m.id=cm.moduleid and m.name="java1" group by m.name;** |
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| 1. Display all student who have taken admission in 6 months course. |
| **select distinct s.\*, c.name, c.duration from student s join batch\_students bs on s.id=bs.studentID**  **join course\_batches cb on cb.id = bs.batchID join course c on c.id = cb.courseID where c.duration = 6 order by s.id** |
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| 1. Write a query to display the output in the following manner.   **'saleel', 'Aadhaar, Driving Licence, PAN, Voter ID, Passport, Debit, Credit'**  Arrange the data is ascending order of *nameFirst.* |
| **select namefirst,group\_concat(name) from student s join student\_cards sc where s.id=sc.studentid group by namefirst order by group\_concat(name) ;** |
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| 1. Write a query to display the output in the following manner.   **'ruhan', 'DBDA, PG-DAC, Pre-DAC'** |
| **select s.namefirst, group\_concat(c.name) from student s join batch\_students bs on**  **s.id=bs.studentID join course\_batches cb on cb.id=bs.batchID join course c on c.id=cb.courseID**  **group by s.namefirst** |
| 18)  select c.name,group\_concat(m.name) from course c join modules m join course\_modules cm where c.id=cm.courseid and c.id=moduleid group by c.name,m.name;select c.name,group\_concat(m.name) from course c join modules m join course\_modules cm where c.id=cm.courseid and c.id=cm.moduleid group by c.name,m.name; |