

**Course name:** INTRODUCTION TO DATABASE

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**Section:** F

**Project name:** TEACHER MONITORING MANAGEMENT SYSTEM

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**Content List:**

|  |  |
| --- | --- |
| No.1 | Introduction |
| No.2 | Scenario |
| No.3 | ER Diagram |
| No.4 | Normalization |
| No.5 | Table Create |
| No.6 | Data Insertion |
| No.7 | Query Writing |
| No.8 | Conclusion |

**INTRODUCTION:** A database management system (DBMS) is a computer software application that interacts with ends-user, other application and the database itself to capture an analyze data. A general –purpose DBMS allows the definition, creation, querying, update and administration of database.

In our project (Teacher monitoring management system) was created by the concept of DBMS. So the main purpose of our project is to know about the basic concept of database management system.

**SCENARIO:** In a teacher monitoring management system a university contains an administration where university has code number, location and name. Administration has an id, name, phone (multivalued), email and designation (multivalued). Administration control departments where the department has id, name, and sector (multivalued). The department appoint teacher where a teacher can be also the head of the department. The teacher has different id, email, address, name, phone (multivalued) and join date. The department also monitor the teacher and distribute courses. Here is also a chance of faculty exchange which is done by the department where faculty can be change home or abroad university and this exchange has an exchange id. The courses have different code, credit and name. University gives salary which was taken by the teacher where the salary has salary no, amount and policy. The teachers judged by TPE. TPE has TPE no, TPE performance, TPE comment option. TPE also offer promotion which has a number and designation. Teachers give attendance which is observe by the registrar and the attendance has a date, on time and off time. Register has different id, name, phone, email. It was also noticed that teacher can spent vacation which is daily, semester wise which has also a date, application and this is also monitor by the registrar. A teacher can communicate with the foreign faculty. The foreign faculty has name, country, designation, social account, id and institute. Any teacher can research, also the research has research field, id and name. In exam result teacher can deliver grade with a grade system and number. The grade system gives two way one is average and one is break down. During leisure time a teacher present consulting hour which has fixed hour and room number.

**Normalization**

**UNIVERSITY ---1---CONTAINS ---1---ADMINISTRATION**

UNF:

contain (u\_code, u\_name, u\_location, a\_id, a\_name, a\_phone, a\_email, a\_dessignation)

1NF:

a\_phone, a\_designation is multivalued attribute

contain (u\_code, u\_name, u\_location, a\_id, a\_name, a\_phone, a\_email, a\_dessignation)

2NF:

(u\_code, u\_name, u\_location)

(a\_id, a\_name, a\_email, a\_dessignation)

3NF:

(u\_location)

(u\_code, u\_name)

(a\_id, a\_name, a\_phone, a\_email, a\_dessignation)

BCNF: already in BCNF

(u\_location)

(u\_code, u\_name)

(a\_id, a\_name, a\_phone, a\_email, a\_dessignation)

4NF: already in 4NF

(u\_location)

(u\_code, u\_name)

(a\_id, a\_name, a\_phone, a\_email, a\_dessignation)

Table:

|  |
| --- |
| l\_id, u\_location, **u\_code** |
| u\_code, u\_name, **a\_id** |
| a\_id, a\_name, a\_phone, a\_email, a\_dessignation |

**ADMINISTRATION---1---CONTROL---1---DEPARTMENT**

UNF:

control (a\_id, a-name, a\_phone, a\_email, a\_dessignation, d\_id, d\_name, d\_sector)

1NF:

a\_phone, a\_dessignation are multivalued attribute.

control (a\_id, a-name, a\_phone, a\_email, a\_dessignation, d\_id, d\_name, d\_sector)

2NF:

(d\_id, d\_name, d\_sector)

(a\_id, a-name, a\_phone, a\_email, a\_dessignation)

3NF:

(d\_id, d\_name, d\_sector)

(a\_id, a-name, a\_phone, a\_email, a\_dessignation)

BCNF:

already in BCNF

(d\_id, d\_name, d\_sector)

(a\_id, a-name, a\_phone, a\_email, a\_dessignation)

4NF:

already in 4NF

(d\_id, d\_name, d\_sector)

(a\_id, a-name, a\_phone, a\_email, a\_dessignation)

Table:

|  |
| --- |
| d\_id, d\_name, d\_sector, **a\_id** |
| a\_id, a-name, a\_phone, a\_email, a\_dessignation |

**DEPARTMENT---1---MONITOR---\*---TEACHER**

UNF:

monitor (d\_id, d\_name, d\_sector, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

1NF:

t\_phone is a multivalued attribute

monitor (d\_id, d\_name, d\_sector, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

2NF:

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

3NF:

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

BCNF:

already is BCNF

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

4NF:

already is 4NF

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

Table:

|  |
| --- |
| d\_id, d\_name, d\_sector |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, **d\_id** |

**DEPARTMENT---1---HEAD---\*---TEACHER**

UNF:

head (d\_id, d\_name, d\_sector, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

1NF:

t\_phone is a multivalued attribute

head (d\_id, d\_name, d\_sector, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

2NF:

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

3NF:

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

BCNF:

already is BCNF

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

4NF:

already is 4NF

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

Table:

|  |
| --- |
| d\_id, d\_name, d\_sector |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, **d\_id** |

**DEPARTMENT---1---APPOINT---\*---TEACHER**

UNF:

appoint (d\_id, d\_name, d\_sector, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

1NF:

t\_phone is a multivalued attribute

appoint (d\_id, d\_name, d\_sector, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

2NF:

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

3NF:

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

BCNF:

already is BCNF

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

4NF:

already is 4NF

(d\_id, d\_name, d\_sector)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

Table:

|  |
| --- |
| d\_id, d\_name, d\_sector |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, **d\_id** |

**DEPARTMENT---1---DO---1---TEACHER\_EXCHANGE**

UNF:

do (d\_id, d\_name, d\_sector, t\_exc\_id, t\_exc\_home, t\_exc\_abroad)

1NF:

do (d\_id, d\_name, d\_sector, t\_exc\_id, t\_exc\_home, t\_exc\_abroad)

2NF:

(d\_id, d\_name, d\_sector)

(t\_exc\_id, t\_exc\_home, t\_exc\_abroad)

3NF:

(d\_id, d\_name, d\_sector)

(t\_exc\_id, t\_exc\_home, t\_exc\_abroad)

BCNF:

already in BCNF

(d\_id, d\_name, d\_sector)

(t\_exc\_id, t\_exc\_home, t\_exc\_abroad)

4NF:

already in 4NF

(d\_id, d\_name, d\_sector)

(t\_exc\_id, t\_exc\_home, t\_exc\_abroad)

Table:

|  |
| --- |
| d\_id, d\_name, d\_sector |
| t\_exc\_id, t\_exc\_home, t\_exc\_abroad, **t\_id, d\_id** |

**DEPARTMENT---1---DISTRIBUTE---1---COURSE**

UNF:

distribute (c\_credit, c\_code, c\_name, d\_id, d\_name, d\_sector)

1NF:

distribute (c\_credit, c\_code, c\_name, d\_id, d\_name, d\_sector)

2NF:

(c\_credit, c\_code, c\_name)

(d\_id, d\_name, d\_sector)

3NF:

(c\_credit, c\_code, c\_name)

(d\_id, d\_name, d\_sector)

BCNF:

already in BCNF

(c\_credit, c\_code, c\_name)

(d\_id, d\_name, d\_sector)

4NF:

already in 4NF

(c\_credit, c\_code, c\_name)

(d\_id, d\_name, d\_sector)

Table:

|  |
| --- |
| c\_code, c\_credit, c\_name, **d\_id** |
| d\_id, d\_name, d\_sector |

**TEACHER---1---TAKE---\*---COURSE**

UNF:

take (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, c\_credit, c\_code, c\_name)

1NF:

t\_phone is a multivalued attribute

take (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, c\_credit, c\_code, c\_name)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(c\_credit, c\_code, c\_name)

3NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(c\_credit, c\_code, c\_name)

BCNF:

already in BCNF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(c\_credit, c\_code, c\_name)

4NF:

already in 4NF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(c\_credit, c\_code, c\_name)

Table:

|  |
| --- |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date |
| c\_code, c\_credit, c\_name, **t-id** |

**SALARY---1---TAKEN\_BY---1---TEACHER**

UNF:

taken\_by (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, s\_amount, s\_no, s\_policy)

1NF:

t\_phone is a multivalued attribute

taken\_by (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, s\_amount, s\_no, s\_policy)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(s\_amount, s\_no, s\_policy)

3NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(s\_amount, s\_no, s\_policy)

BCNF:

already in BCNF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(s\_amount, s\_no, s\_policy)

4NF:

already in 4NF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(s\_amount, s\_no, s\_policy)

Table:

|  |
| --- |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date |
| s\_no, s\_amount, s\_policy, **t\_id** |

**UNIVERSITY---1---GIVE---\*---SALARY**

UNF:

give (u\_code, u\_name, u\_location, s\_amount, s\_no, s\_policy)

1NF:

give (u\_code, u\_name, u\_location, s\_amount, s\_no, s\_policy)

2NF:

(u\_code, u\_name, u\_location)

(s\_amount, s\_no, s\_policy)

3NF:

(l\_id, u\_location)

(u\_code, u\_name, u\_location)

(s\_amount, s\_no, s\_policy)

BCNF:

already in BCNF

(l\_id, u\_location)

(u\_code, u\_name)

(s\_amount, s\_no, s\_policy)

4NF:

already in 4NF

(l\_id, u\_location)

(u\_code, u\_name)

(s\_amount, s\_no, s\_policy)

Table:

|  |
| --- |
| l\_id, u\_location, **u\_code** |
| u\_code, u\_name |
| s\_no, s\_amount, s\_policy, **u\_code** |

**TPE---1---JUDGE---1---TEACHER**

UNF:

judge (tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

1NF:

judge (tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance, t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

2NF:

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

3NF:

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

BCNF:

already in BCNF

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

4NF:

already in 4NF

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

Table:

|  |
| --- |
| tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, **tpe\_no** |

**TEACHER---1---GIVE---1---ATTENDANCE**

UNF:

give ( t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, a\_date, a\_ontime, a\_offtime)

1NF:

t\_phone number is multivalued attribute

give (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, a\_date, a\_ontime, a\_offtime)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(a\_date, a\_ontime, a\_offtime)

3NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(a\_date, a\_ontime, a\_offtime)

BCNF:

already in BCNF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(a\_date, a\_ontime, a\_offtime)

4NF:

already in 4NF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(a\_date, a\_ontime, a\_offtime)

Table:

|  |
| --- |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date |
| a\_date, a\_ontime, a\_offtime, **t\_id** |

**REGISTER---1---OBSERVE---\*---ATTENDANCE**

UNF:

observe (r\_id, r\_name, r\_phone, r\_email, a\_date, a\_ontime, a\_offtime)

1NF:

r\_phone number is multivalued attribute

observe (r\_id, r\_name, r\_phone, r\_email, a\_date, a\_ontime, a\_offtime)

2NF:

(r\_id, r\_name, r\_phone, r\_email)

(a\_date, a\_ontime, a\_offtime)

3NF:

(r\_id, r\_name, r\_phone, r\_email)

(a\_date, a\_ontime, a\_offtime)

BCNF:

already in BCNF

(r\_id, r\_name, r\_phone, r\_email)

(a\_date, a\_ontime, a\_offtime)

4NF:

already in 4NF

(r\_id, r\_name, r\_phone, r\_email)

(a\_date, a\_ontime, a\_offtime)

Table:

|  |
| --- |
| r\_id, r\_name, r\_phone, r\_email |
| a\_date, a\_ontime, a\_offtime, **r\_id** |

**TPE----\*--OFFER---1---PROMOTION**

UNF:

offers (tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance, pro\_no, prodesignation)

1NF:

offers (tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance, pro\_no, pro\_designation)

2NF:

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(pro\_no, pro\_designation)

3NF:

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(pro\_no, pro\_designation)

BCNF:

already in BCNF

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(pro\_no, pro\_designation)

4NF:

already in 4NF

(tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance)

(pro\_no, pro\_designation)

Table:

|  |
| --- |
| tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance, **pro\_no** |
| pro\_no, pro\_designation, **t\_id** |

**REGISTRAR---1---MONITOR---\*---VACATION**

UNF:

monitor (r\_id, r\_name, r\_phone, r\_email, v\_date, v\_day, v\_semester, v\_application)

1NF:

r\_phone number is multivalued attribute

monitor (r\_id, r\_name, r\_phone, r\_email, v\_date, v\_day, v\_semester, v\_application)

2NF:

(r\_id, r\_name, r\_phone, r\_email)

(v\_date, v\_day, v\_semester, v\_application)

3NF:

(r\_id, r\_name, r\_phone, r\_email)

(v\_date, v\_day, v\_semester, v\_application)

BCNF:

already in BCNF

(r\_id, r\_name, r\_phone, r\_email)

(v\_date, v\_day, v\_semester, v\_application)

4NF:

already in 4NF

(r\_id, r\_name, r\_phone, r\_email)

(v\_date, v\_day, v\_semester, v\_application)

Table:

|  |
| --- |
| r\_id, r\_name, r\_phone, r\_email |
| v\_date, v\_day, v\_semester, v\_application, **r\_id** |

**TEACHER---\*---SPEND---\*---VACATION**

UNF:

spend (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, v\_date, v\_day, v\_semester, v\_application)

1NF:

t\_phone number is multivalued attribute

spend (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, v\_date, v\_day, v\_semester, v\_application)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(v\_date, v\_day, v\_semester, v\_application)

3NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(v\_date, v\_day, v\_semester, v\_application)

BCNF:

already in BCNF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(v\_date, v\_day, v\_semester, v\_application)

4NF:

already in 4NF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(v\_date, v\_day, v\_semester, v\_application)

Table:

|  |
| --- |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date |
| v\_date, v\_day, v\_semester, v\_application |
| v\_count,**v\_date, t\_id** |

**TEACHER---1---COMMUNICATE---\*---F0REIGN\_FACULTY**

UNF:

communicate (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac, ff\_country)

1NF:

t\_phone number is multivalued attribute

communicate (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac, ff\_country)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac, ff\_country)

3NF:

(ff\_country)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac)

BCNF:

already in BCNF

(ff\_country)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac)

4NF:

already in 4NF

(ff\_country)

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac)

Table:

|  |
| --- |
| c\_code, ff\_country, **ff\_id** |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date |
| ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac, **t\_id** |

**TEACHER---\*---DO---1---RESEARCH**

UNF:

do (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, r\_id, r\_name, r\_field)

1NF:

t\_phone number is multivalued attribute

do (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, r\_id, r\_name, r\_field)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(r\_id, r\_name, r\_field)

3NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(r\_id, r\_name, r\_field)

BCNF:

already in BCNF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(r\_id, r\_name, r\_field)

4NF:

already in 4NF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(r\_id, r\_name, r\_field)

Table:

|  |
| --- |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date**, r-id** |
| re\_id, re\_name, re\_field |

**TEACHER---1---DELIVER---\*---GRADE**

UNF:

deliver (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, g\_no, g\_system)

1NF:

t\_phone number is multivalued attribute

deliver (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, g\_no, g\_system)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(g\_no, g\_system)

3NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(g\_no, g\_system)

BCNF:

already in BCNF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(g\_no, g\_system)

4NF:

already in 4NF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(g\_no, g\_system)

Table:

|  |
| --- |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date |
| g\_no, g\_system, **t\_id** |

**TEACHER---\*---PRESENT---1---CONSULTING\_HOUR**

UNF:

present (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, room\_no, hour)

1NF:

t\_phone number is multivalued attribute

present (t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, room\_no, hour)

2NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(room\_no, hour)

3NF:

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(room\_no, hour)

BCNF:

already in BCNF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(room\_no, hour)

4NF:

already in 4NF

(t\_id, t\_name, t\_phone, t\_email, t-address, join\_date)

(room\_no, hour)

Table:

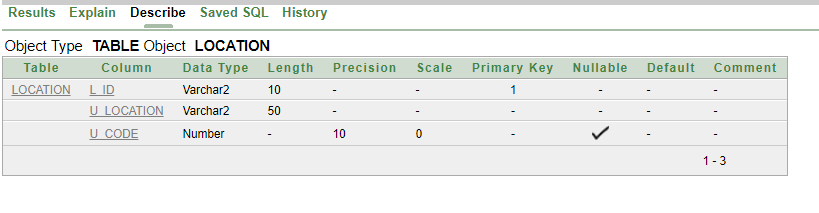
|  |
| --- |
| t\_id, t\_name, t\_phone, t\_email, t-address, join\_date |
| room\_no, hour, **t\_id** |

**TABLE CREATION:**

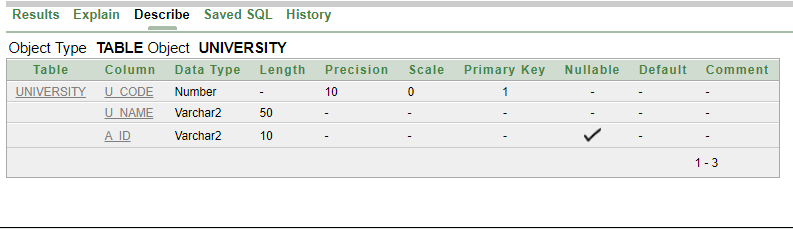
|  |  |
| --- | --- |
| 1 | l\_id, u\_location, **u\_code** |
| 2 | u\_code, u\_name, **a\_id** |
| 3 | a\_id, a\_name, a\_phone, a\_email, a\_dessignation |
| 4 | d\_id, d\_name, d\_sector, **a\_id** |
| 5 | t\_id, t\_name, t\_phone, t\_email, t-address, join\_date, **d\_id, tpe\_no, r\_id** |
| 6 | t\_exc\_id, t\_exc\_home, t\_exc\_abroad, **t\_id, d\_id** |
| 7 | c\_code, c\_credit, c\_name, **d\_id, t\_id** |
| 8 | s\_no, s\_amount, s\_policy, **t\_id, u\_code** |
| 9 | a\_date, a\_ontime, a\_offtime, **t\_id, r\_id** |
| 10 | tpe\_no, tpe\_comment, tpe\_tpe\_tpe\_performance, **pro\_no** |
| 11 | pro\_no, pro\_designation, **t\_id** |
| 12 | r\_id, r\_name, r\_phone, r\_email |
| 13 | v\_date, v\_day, v\_semester, v\_application, **r\_id** |
| 14 | v\_count,**v\_date, t\_id** |
| 15 | c\_code, ff\_country, **ff\_id** |
| 16 | ff\_id, ff\_name, ff\_institution, ff\_designation, ff\_social\_ac, **t\_id** |
| 17 | re\_id, re\_name, re\_field |
| 18 | g\_no, g\_system, **t\_id** |
| 19 | room\_no, hour, **t\_id** |

**QUERY WRITING:**

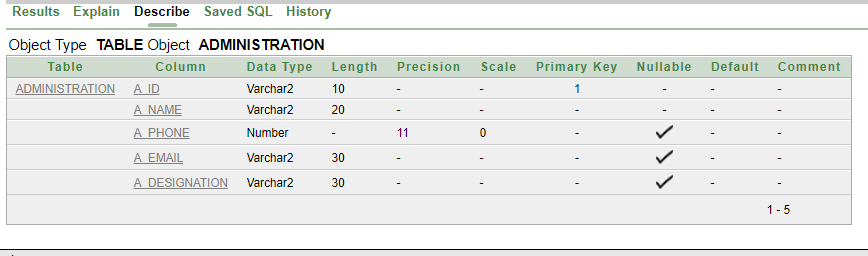
**1**. create table Location(l\_id varchar2(10) primary key,u\_location varchar2(50)not null,u\_code number(10));



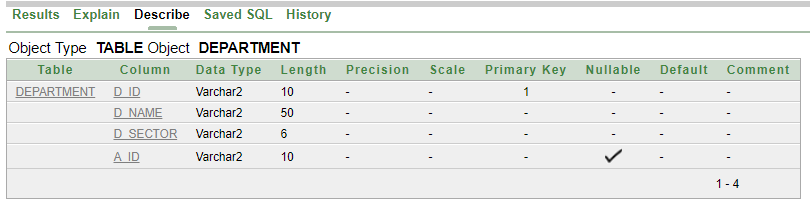
**2**. create table University(u\_code number(10) primary key,u\_name varchar2(50)not null, a\_id varchar2(10));



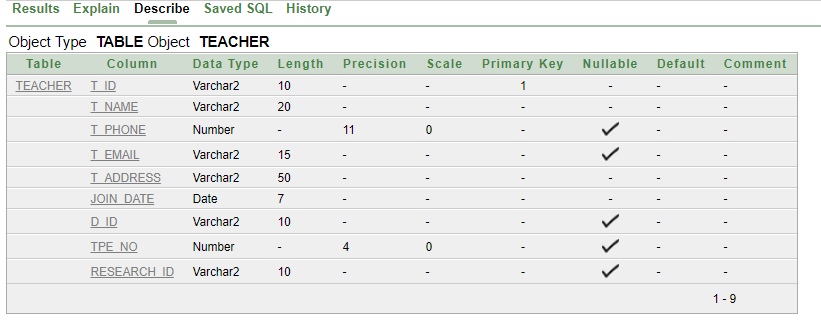
**3**. create table Administration(a\_id varchar2(10) primary key,a\_name varchar2(20)not null,a\_phone number(11)unique,a\_email varchar2(15)unique,a\_designation varchar2(15));



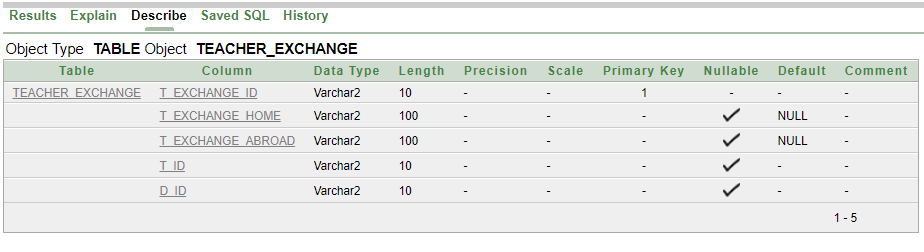
**4**. create table Department(d\_id varchar2(10) primary key,d\_name varchar2(50)not null,check(d\_name IN('FACULTY OF SCIENCE & INFORMATION TECHNOLOGY','FACULTY OF ENGINEERING','FACULTY OF BUSINESS ADMINISTRATION','FACULTY OF ART & SOCIAL SCIENCES')),d\_sector varchar2(6)not null,check (d\_sector in('CSE','EEE','BBA','ENG','ACH','CSSE','SE','CS')),a\_id varchar2(10));



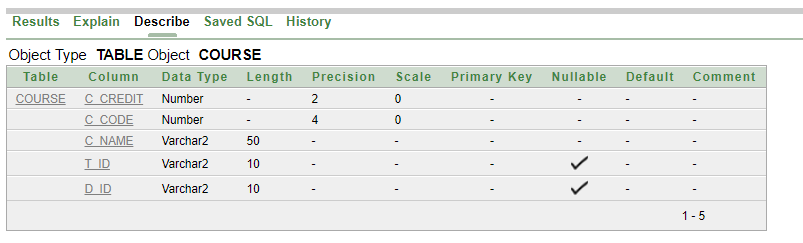
**5**. create table Teacher(t\_id varchar2(10) primary key,t\_name varchar2(20)not null,t\_phone number(11)unique,t\_email varchar2(15)unique,t\_address varchar2(50)not null,join\_date date not null,d\_id varchar2(10),tpe\_no number(4),research\_id varchar2(10));



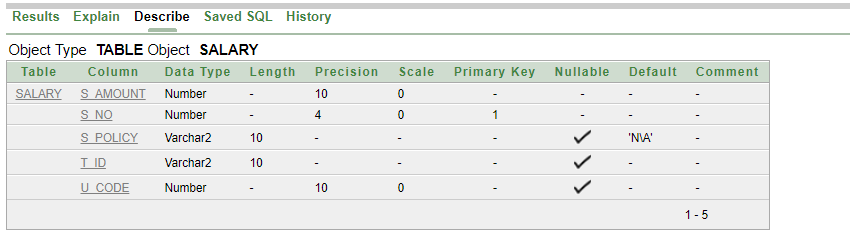
**6**. create table Teacher\_Exchange(t\_exchange\_id varchar2(10) primary key,t\_exchange\_home varchar2(100)default NULL,t\_exchange\_abroad varchar2(100) default NULL,t\_id varchar2(10),d\_id varchar2(10));



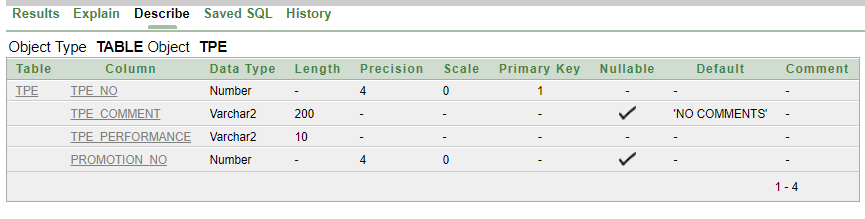
**7**. create table Course(c\_credit number(2)not null,c\_code number(4)not null,c\_name varchar2(50)not null,t\_id varchar2(10),d\_id varchar2(10));



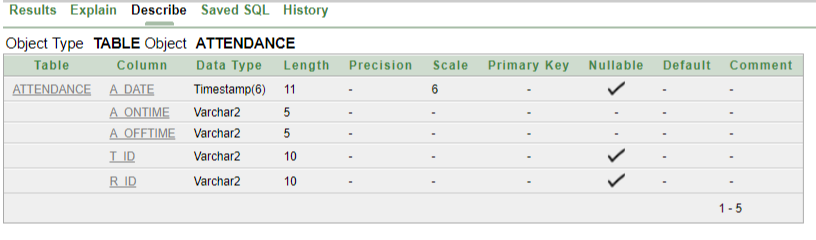
**8**. create table Salary(s\_amount number(10)not null,s\_no number(4) primary key,s\_policy varchar2(10)default 'N\A',check(s\_policy IN('Cash','Cheque')),t\_id varchar2(10),u\_code number(10));



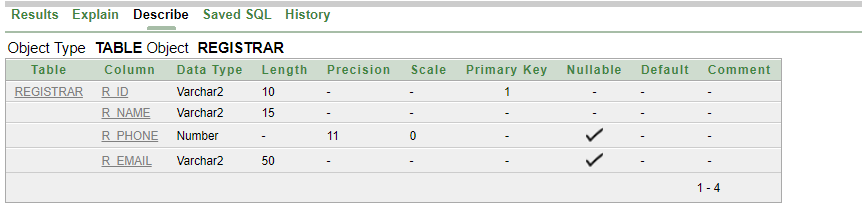
**9**. create table TPE(tpe\_no number(4) primary key,tpe\_comment varchar2(200)default 'NO COMMENTS',tpe\_performance varchar2(10)not null,promotion\_no number(4));



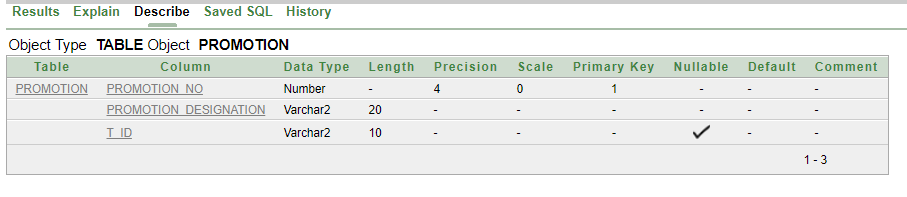
**10**. create table Attendance(a\_date TIMESTAMP,a\_ontime varchar2(5)not null,a\_offtime varchar2(5)not null,t\_id varchar2(10),r\_id varchar2(10));



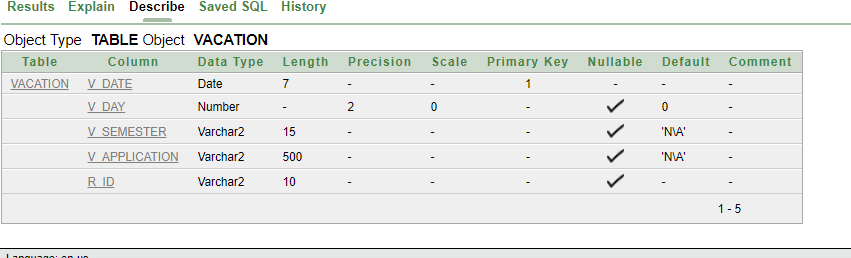
**11**. create table Registrar(r\_id varchar2(10) primary key,r\_name varchar2(15)not null,r\_phone number(11)unique,r\_email varchar2(50)unique);



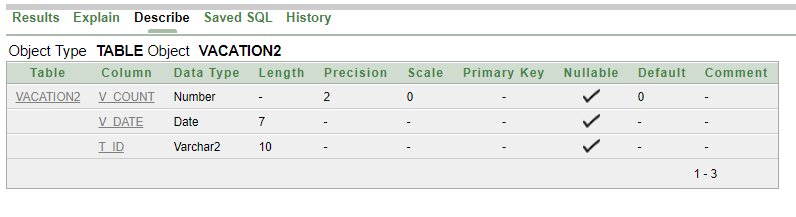
**12**. create table Promotion(promotion\_no number(4) primary key,promotion\_designation varchar2(20)not null,t\_id varchar2(10));



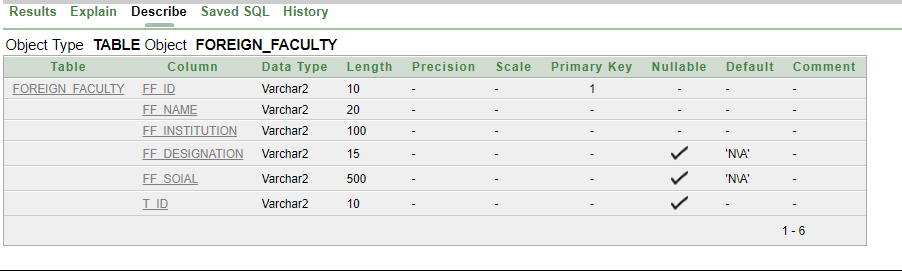
**13**. create table Vacation(v\_date date primary key,v\_day number(2) default 0,v\_semester varchar2(15)default 'N\A',v\_application varchar2(500)default 'N\A',r\_id varchar2(10));



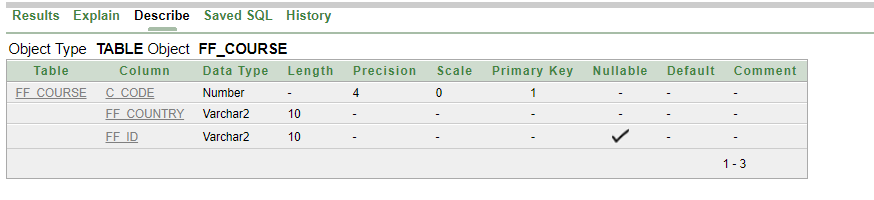
**14**. create table Vacation2(v\_count number(2)default 0,v\_date date,t\_id varchar2(10));



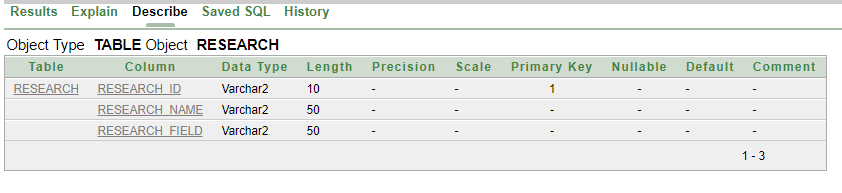
**15**. create table Foreign\_Faculty(ff\_id varchar2(10)primary key,ff\_name varchar2(20)not null,ff\_institution varchar2(100)not null,ff\_designation varchar2(15) default 'N\A',ff\_soial varchar2(500) default 'N\A',t\_id varchar2(10));



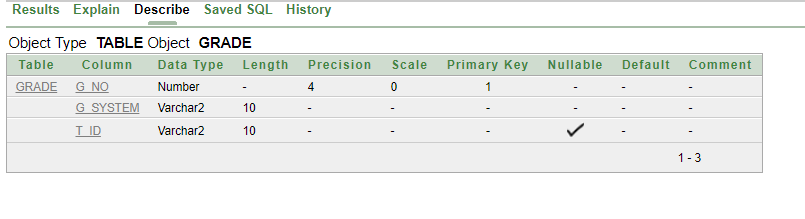
**16**. create table FF\_Course(c\_code number(4),ff\_country varchar2(10)not null,ff\_id varchar2(10));



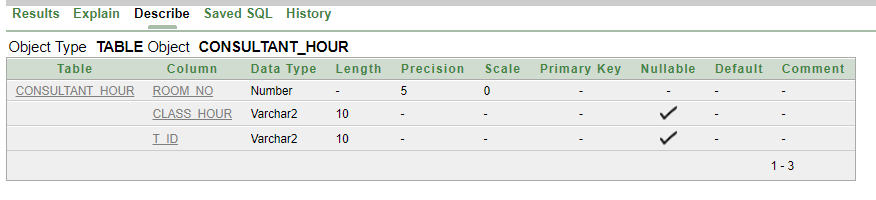
**17**. create table Research(research\_id varchar2(10) primary key,research\_name varchar2(50)not null,research\_field varchar2(50)not null);



**18**. create table Grade(g\_no number(4) primary key,g\_system varchar2(10)not null, t\_id varchar2(10));



**19.** create table Consultant\_Hour(room\_no number(5)not null, class\_hour varchar2(10), t\_id varchar2(10));



**CONSTRAINTS:**

**1.** alter table Location add constraint L1 foreign key(u\_code) references University(u\_code);

**2.** alter table University add constraint U1 foreign key(a\_id) references Administration(a\_id);

**3**. alter table Department add constraint D1 foreign key(a\_id) references Administration(a\_id);

**4**. alter table Teacher add constraint T1 foreign key(d\_id) references Department(d\_id);

**5**. alter table Teacher add constraint T2 foreign key(research\_id) references Research(research\_id);

**6**. alter table Teacher add constraint T3 foreign key(tpe\_no) references TPE(tpe\_no);

**7**. alter table Teacher\_Exchange add constraint TE1 foreign key(t\_id) references Teacher(t\_id);

**8**. alter table Teacher\_Exchange add constraint TE2 foreign key(d\_id) references Department(d\_id);

**9**. alter table Course add constraint C1 foreign key(d\_id) references Department(d\_id);

**10**. alter table Course add constraint C2 foreign key(t\_id) references Teacher(t\_id);

**11**. alter table Salary add constraint S1 foreign key(t\_id) references Teacher(t\_id);

**12**. alter table Salary add constraint S2 foreign key(u\_code) references University(u\_code);

**13**. alter table Attendance add constraint A1 foreign key(t\_id) references Teacher(t\_id);

**14**. alter table Attendance add constraint A2 foreign key(r\_id) references Registrar(r\_id);

**15**. alter table Vacation add constraint V1 foreign key(r\_id) references Registrar(r\_id);

**16**. alter table Vacation2 add constraint V21 foreign key(v\_date) references Vacation(v\_date);

**17**. alter table Vacation2 add constraint V22 foreign key(t\_id) references Teacher(t\_id);

**18**. alter table Foreign\_Faculty add constraint FF1 foreign key(t\_id) references Teacher(t\_id);

**19**. alter table FF\_Course add constraint FFC1 foreign key(ff\_id) references Foreign\_Faculty(ff\_id);

**20**. alter table Grade add constraint G1 foreign key(t\_id) references Teacher(t\_id);

**21**. alter table Consultant\_Hour add constraint CT1 foreign key(t\_id) references Teacher(t\_id);

**DATA INSERTION:**

1. Location:

insert into Location(l\_id,u\_location,u\_code) values('78431','Kuratoli Road,Kuril,Khilkhet,Dhaka,Bangladesh','1229');

insert into Location(l\_id,u\_location,u\_code) values('77450','Road No-10,Block-B,Banani,Dhaka,Bangladesh','1212');

insert into Location(l\_id,u\_location,u\_code) values('78435','Road No-4,Block-A,Bashundhara,Dhaka,Bangladesh','1208');

insert into Location(l\_id,u\_location,u\_code) values('78455','Aftabnagar,Rampura,Dhaka,Bangladesh','1215');

insert into Location(l\_id,u\_location,u\_code) values('78433','Mohakhali,66 Bir Uttam Road,Dhaka,Bangladesh','1205');

2. University:

insert into University (u\_code,u\_name,a\_id) values('1229','American International University Bangladesh','13-77334-1');

insert into University (u\_code,u\_name,a\_id) values('1212','South East University','Road No-10,Block-B,Banani,Dhaka,Bangladesh','12-55434-1');

insert into University (u\_code,u\_name,a\_id) values('1208','North South University','Road No-4,Block-A,Bashundhara,Dhaka,Bangladesh','14-31471-2');

insert into University (u\_code,u\_name,a\_id) values('1215','East West University','Aftabnagar,Rampura,Dhaka,Bangladesh','11-55431-3');

insert into University (u\_code,u\_name,a\_id) values('1205','Brac University','Mohakhali,66 Bir Uttam AK Khandakar Road,Dhaka,Bangladesh','10-13545-1');

3. Administration:

insert into Administration(a\_id,a\_name,a\_phone,a\_email,a\_designation) values ('13-77334-1','Md Marufuzzaman','01815414282','marufuzzaman@aiub.edu','Administrative Assistant');

insert into Administration(a\_id,a\_name,a\_phone,a\_email,a\_designation) values ('14-31471-2','Mukit Islam','01741404605','mukit@nsu.edu','Administrative Director');

insert into Administration(a\_id,a\_name,a\_phone,a\_email,a\_designation) values ('12-55434-1','Md Asif Rahman','01711532652','asifrahman@seu.edu','Administrative Coordinator');

insert into Administration(a\_id,a\_name,a\_phone,a\_email,a\_designation) values ('11-55431-3','Khorshed Alam','01613414282','khorshed@ewu.edu','Administrative Manager');

insert into Administration(a\_id,a\_name,a\_phone,a\_email,a\_designation) values ('10-13545-1','Khairul Bhuiyan','01971749730','khairul@brac.edu','Administrator');

4. Department:

insert into Department(d\_id,d\_name,d\_sector,a\_id) values('FSIT-105','FACULTY OF SCIENCE & INFORMATION TECHNOLOGY','CSE','13-77334-1');

insert into Department(d\_id,d\_name,d\_sector,a\_id) values('FSIT-107','FACULTY OF SCIENCE & INFORMATION TECHNOLOGY','CSSE','14-31471-2');

insert into Department(d\_id,d\_name,d\_sector,a\_id) values('ENGG-113','FACULTY OF ENGINEERING','EEE','12-55434-1');

insert into Department(d\_id,d\_name,d\_sector,a\_id) values('ENGG-115','FACULTY OF ENGINEERING','ACH','11-55431-3');

insert into Department(d\_id,d\_name,d\_sector,a\_id) values('FBA-109','FACULTY OF BUSINESS ADMINISTRATION','BBA','10-13545-1');

5. Teacher:

insert into Teacher(t\_id,t\_name,t\_phone,t\_email,t\_address,join\_date,d\_id,tpe\_no,research\_id) values ('11-33451-1','Rumana Afrin','01711721452','rafrin@aiub.edu','911/4,Rajarbag,Dhaka,Bangladesh','11-FEB-13','FSIT-105','211','7809');

insert into Teacher(t\_id,t\_name,t\_phone,t\_email,t\_address,join\_date,d\_id,tpe\_no,research\_id) values ('02-33435-1','Juena Nowshin','01785412580','juena@aiub.edu','Road NO-8,Sector-6,Uttara,Dhaka,Bangladesh','02-MAY-31','FSIT-107','231','7812');

insert into Teacher(t\_id,t\_name,t\_phone,t\_email,t\_address,join\_date,d\_id,tpe\_no,research\_id) values ('07-55132-2','Salma Nur','01535471489','salma@aiub.edu','Road N0-3,House No-3/B,Banasree,Dhaka,Bangladesh','07-MAR-10','ENGG-113','233','7810');

insert into Teacher(t\_id,t\_name,t\_phone,t\_email,t\_address,join\_date,d\_id,tpe\_no,research\_id) values ('13-35250-3','Sumaiya Islam','01711285723','sislam@aiub.edu','Road No-1,Jorpukur Par,Khilgaon,Dhaka,Bangladesh','13-OCT-17','ENGG-115','215','7815');

insert into Teacher(t\_id,t\_name,t\_phone,t\_email,t\_address,join\_date,d\_id,tpe\_no,research\_id) values ('15-33225-1','Muniba Bari','01686974686','mbari@aiub.edu','Road No-7,House No-313,Banani,Dhaka,Bangladesh','15-DEC-23','FBA-109','218','7820');

6. Teacher\_Exchange:

insert into Teacher\_Exchange(t\_exchange\_id,t\_exchange\_home,t\_exchange\_abroad,t\_id,d\_id) values ('13','United International Universitty','','11-33451-1','FSIT-105')

insert into Teacher\_Exchange(t\_exchange\_id,t\_exchange\_home,t\_exchange\_abroad,t\_id,d\_id) values ('23','','Melbourne University','02-33435-1','FSIT-107');

insert into Teacher\_Exchange(t\_exchange\_id,t\_exchange\_home,t\_exchange\_abroad,t\_id,d\_id) values ('27','North South University','','07-55132-2','ENGG-113');

insert into Teacher\_Exchange(t\_exchange\_id,t\_exchange\_home,t\_exchange\_abroad,t\_id,d\_id) values ('33','Brac Universitty','','13-35250-3','ENGG-115');

insert into Teacher\_Exchange(t\_exchange\_id,t\_exchange\_home,t\_exchange\_abroad,t\_id,d\_id) values ('39','','Hokkaido University','15-33225-1','FBA-109');

7. Course:

insert into Course(c\_credit,c\_code,c\_name,d\_id,t\_id) values ('3','2211','Intoduction To Database','FSIT-105','11-33451-1');

insert into Course(c\_credit,c\_code,c\_name,d\_id,t\_id) values ('3','2213','Algorithm','FSIT-107','02-33435-1');

insert into Course(c\_credit,c\_code,c\_name,d\_id,t\_id) values ('3','1115','Physics-1','ENGG-113','07-55132-2');

insert into Course(c\_credit,c\_code,c\_name,d\_id,t\_id) values ('3','1117','Electrical Circuits-1','ENGG-115','13-35250-3');

insert into Course(c\_credit,c\_code,c\_name,d\_id,t\_id) values ('3','3122','Principle Of Accounting','FBA-109','15-33225-1');

8. Salary:

insert into Salary(s\_amount,s\_no,s\_policy,t\_id,u\_code) values ('60000','103','Cash','11-33451-1','1229');

insert into Salary(s\_amount,s\_no,s\_policy,t\_id,u\_code) values ('100000','104','Cheque','02-33435-1','1212');

insert into Salary(s\_amount,s\_no,s\_policy,t\_id,u\_code) values ('50000','105','Cash','07-55132-2','1208');

insert into Salary(s\_amount,s\_no,s\_policy,t\_id,u\_code) values ('80000','109','Cheque','13-35250-3','1215');

insert into Salary(s\_amount,s\_no,s\_policy,t\_id,u\_code) values ('150000','107','','15-33225-1','1205');

9. TPE:

insert into TPE(tpe\_no,tpe\_comment,tpe\_performance,promotion\_no) values ('211','Praises,elicits and responds to student questions','Good','103');

insert into TPE(tpe\_no,tpe\_comment,tpe\_performance,promotion\_no) values ('231','Teaches accurate and up-to-date information','Best','105');

insert into TPE(tpe\_no,tpe\_comment,tpe\_performance,promotion\_no) values ('233','Coordinates learning content with instructional objectives','Average','109');

insert into TPE(tpe\_no,tpe\_comment,tpe\_performance,promotion\_no) values ('215','Presents learning content in a logical sequential order','Good','107');

insert into TPE(tpe\_no,tpe\_comment,tpe\_performance,promotion\_no) values ('218','Encourages participation from all students','Worst','111');

10. Attendance:

insert into Attendance(a\_date,a\_ontime,a\_offtime,t\_id,r\_id) values ('13-MAY-05 07:15:31','Yes','No','11-33451-1','15-22471-1');

insert into Attendance(a\_date,a\_ontime,a\_offtime,t\_id,r\_id) values ('14-JAN-07 07:58:26','No','Yes','15-33225-1','14-33225-1');

insert into Attendance(a\_date,a\_ontime,a\_offtime,t\_id,r\_id) values ('25-MAY-05 07:48:11','Yes','No','02-33435-1','10-22391-3');

insert into Attendance(a\_date,a\_ontime,a\_offtime,t\_id,r\_id) values ('27-MAR-05 07:30:51','Yes','No','07-55132-2','12-44557-1');

insert into Attendance(a\_date,a\_ontime,a\_offtime,t\_id,r\_id) values ('19-NOV-05 08:03:13','Yes','No','13-35250-3','05-22471-3');

11. Registrar:

insert into Registrar(r\_id,r\_name,r\_phone,r\_email) values ('15-22471-1','Mijan Alam','01625812345','mijan@gmail.com');

insert into Registrar(r\_id,r\_name,r\_phone,r\_email) values ('14-33225-1','Tanvir Alam','01512398758','talam@gmail.com');

insert into Registrar(r\_id,r\_name,r\_phone,r\_email) values ('10-22391-3','Polash Bhuiyan','01974749730','polash@yahoo.com');

insert into Registrar(r\_id,r\_name,r\_phone,r\_email) values ('12-44557-1','Shibli Mahmud','01815414282','shibli@outlook.com');

insert into Registrar(r\_id,r\_name,r\_phone,r\_email) values ('05-22471-3','Nasir Uddin','01532652159','nasir@gmail.com');

12. Promotion:

insert into Promotion(promotion\_no,promotion\_designation,t\_id) values ('103','Associate Professor','11-33451-1');

insert into Promotion(promotion\_no,promotion\_designation,t\_id) values ('105','Dean','02-33435-1');

insert into Promotion(promotion\_no,promotion\_designation,t\_id) values ('109','Assistant Professor ','07-55132-2');

insert into Promotion(promotion\_no,promotion\_designation,t\_id) values ('107','Senior Lecturer ','13-35250-3');

insert into Promotion(promotion\_no,promotion\_designation,t\_id) values ('111','Lecturer','15-33225-1');

13. Vacation:

insert into Vacation(v\_date,v\_day,v\_semester,v\_application,r\_id) values ('11-FEB-13','10','Spring,17-18','With Application','15-22471-1');

insert into Vacation(v\_date,v\_day,v\_semester,v\_application,r\_id) values ('02-MAY-31','5','Summer,12-13','Without Application','14-33225-1');

insert into Vacation(v\_date,v\_day,v\_semester,v\_application,r\_id) values ('07-MAR-10','1','Spring,17-18','With Application','10-22391-3');

insert into Vacation(v\_date,v\_day,v\_semester,v\_application,r\_id) values ('13-OCT-17','2','Summer,15-16','Without Application','12-44557-1');

insert into Vacation(v\_date,v\_day,v\_semester,v\_application,r\_id) values ('17-AUG-22','6','Fall,17-18','Without Application','05-22471-3');

14. Vacation2:

insert into Vacation2(v\_count,v\_date,t\_id) values ('1','17-AUG-22','11-33451-1');

insert into Vacation2(v\_count,v\_date,t\_id) values ('2','13-OCT-17','02-33435-1');

insert into Vacation2(v\_count,v\_date,t\_id) values ('1','07-MAR-10','07-55132-2');

insert into Vacation2(v\_count,v\_date,t\_id) values ('1','02-MAY-31','13-35250-3');

insert into Vacation2(v\_count,v\_date,t\_id) values ('1','11-FEB-13','15-33225-1');

15. Foreign\_Faculty:

insert into Foreign\_Faculty(ff\_id,ff\_name,ff\_institution,ff\_designation,ff\_soial,t\_id) values ('03-47584-1','Prof.Kashinath Roy','University of Delhi','Dean','','11-33451-1');

insert into Foreign\_Faculty(ff\_id,ff\_name,ff\_institution,ff\_designation,ff\_soial,t\_id) values ('07-47584-3','Jacob Jones','University of Auckland','Professor','','02-33435-1');

insert into Foreign\_Faculty(ff\_id,ff\_name,ff\_institution,ff\_designation,ff\_soial,t\_id) values ('12-45784-2','kane Willamson','Monash University','Senior Lecturer','','07-55132-2');

insert into Foreign\_Faculty(ff\_id,ff\_name,ff\_institution,ff\_designation,ff\_soial,t\_id) values ('15-47584-3','Wriddiman Shaha','University of Mumbai','Lecturer','','13-35250-3');

insert into Foreign\_Faculty(ff\_id,ff\_name,ff\_institution,ff\_designation,ff\_soial,t\_id) values ('13-47584-2','Dr.Steven Scott','University of Adelaide','Professor','','15-33225-1');

16. FF\_Course:

insert into FF\_Course(c\_code,ff\_country,ff\_id) values ('2311','India','03-47584-1');

insert into FF\_Course(c\_code,ff\_country,ff\_id) values ('1122','NewZealand','07-47584-3');

insert into FF\_Course(c\_code,ff\_country,ff\_id) values ('3112','Australia','12-45784-2');

insert into FF\_Course(c\_code,ff\_country,ff\_id) values ('2142','India','15-47584-3');

insert into FF\_Course(c\_code,ff\_country,ff\_id) values ('2411','Australia','13-47584-2');

17. Research:

insert into Research(research\_id,research\_name,research\_field) values ('7809','Developing Computer Security','Algorithmics,Programming,Software');

insert into Research(research\_id,research\_name,research\_field) values ('7812','Measuring X-Ray Wave Using Laplace','Applied Mathematics, Computation and Simulation');

insert into Research(research\_id,research\_name,research\_field) values ('7810','The Internet Of Things','Networks,Systems,Distributed Computing');

insert into Research(research\_id,research\_name,research\_field) values ('7815','Parallel Architecture Computing','Architecture');

insert into Research(research\_id,research\_name,research\_field) values ('7820','Fuel Cells,Solar Energy','Energy Engineering');

18. Grade:

insert into Grade(g\_no,g\_system,t\_id) values ('145','Average','11-33451-1');

insert into Grade(g\_no,g\_system,t\_id) values ('155','Break Down','02-33435-1');

insert into Grade(g\_no,g\_system,t\_id) values ('115','Partial','07-55132-2');

insert into Grade(g\_no,g\_system,t\_id) values ('135','Average','13-35250-3');

insert into Grade(g\_no,g\_system,t\_id) values ('116','Average','15-33225-1');

19. Consultant:

insert into Consultant\_Hour(room\_no,class\_hour,t\_id) values ('43112','10-2','11-33451-1');

insert into Consultant\_Hour(room\_no,class\_hour,t\_id) values ('43114','8-12','02-33435-1');

insert into Consultant\_Hour(room\_no,class\_hour,t\_id) values ('43222','12-5','07-55132-2');

insert into Consultant\_Hour(room\_no,class\_hour,t\_id) values ('43102','11-3','13-35250-3');

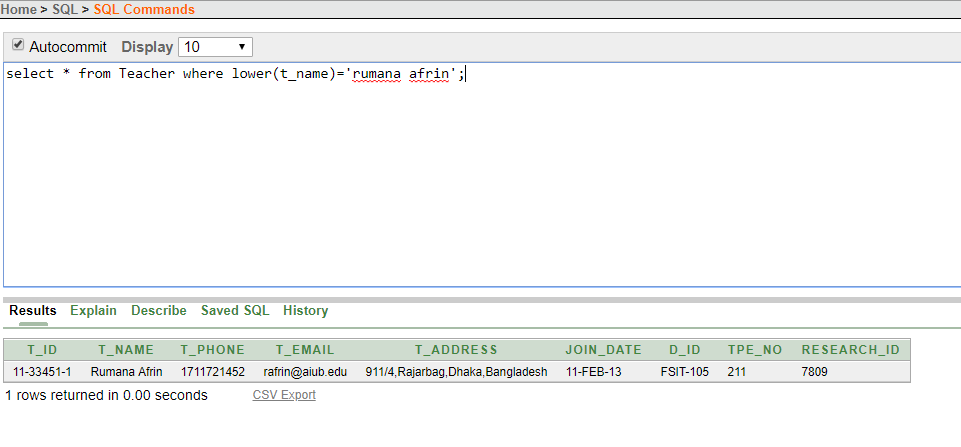
insert into Consultant\_Hour(room\_no,class\_hour,t\_id) values ('43212','10-4','15-33225-1');

**QUERY WRITING:**

Single Row Functions:

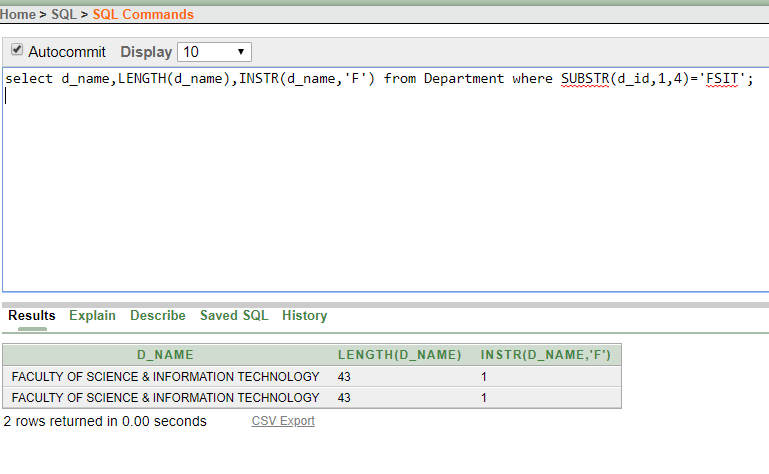
Que: Display all data of teacher rumana afrin.

Ans: select \* from Teacher where lower(t\_name)='rumana afrin';



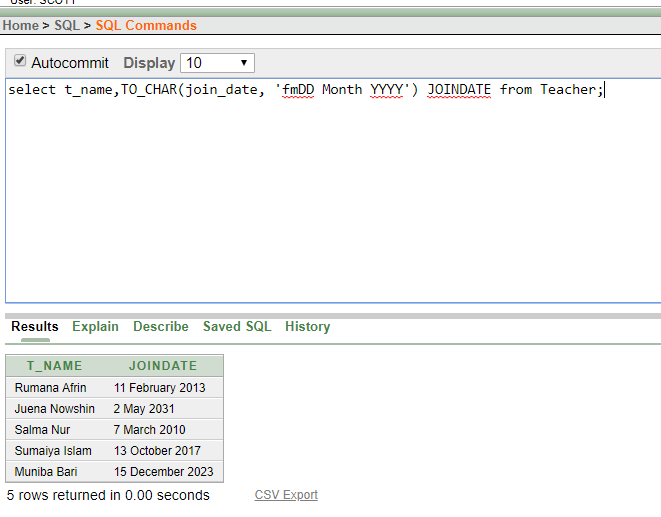
Ques: Display department name,length of department name,the first position of Alphabet F in department name of FSIT id holder.

Ans: select d\_name,LENGTH(d\_name),INSTR(d\_name,'F') from Department where SUBSTR(d\_id,1,4)='FSIT';



Ques: Display the joindate of all teachers in the format DD-MONTH-YYYY(e.g 17 December 1980).

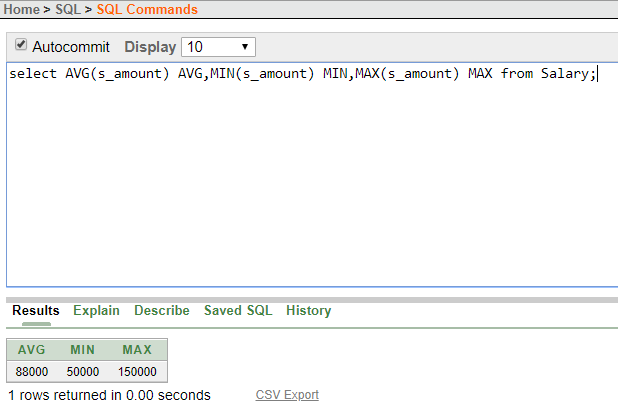
Ans: select t\_name,TO\_CHAR(join\_date, 'fmDD Month YYYY') JOINDATE from Teacher;

****

Group Functions:

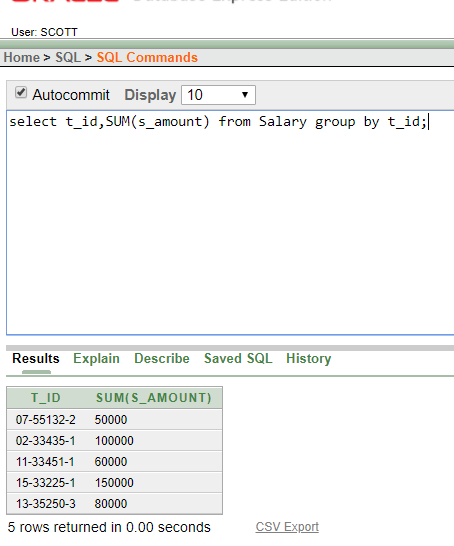
Ques: Find the average, minimum and maximum salary of the teachers.Label the columns AVG, MIN and MAX respectively.

Ans: select AVG(s\_amount) AVG,MIN(s\_amount) MIN,MAX(s\_amount) MAX from Salary;



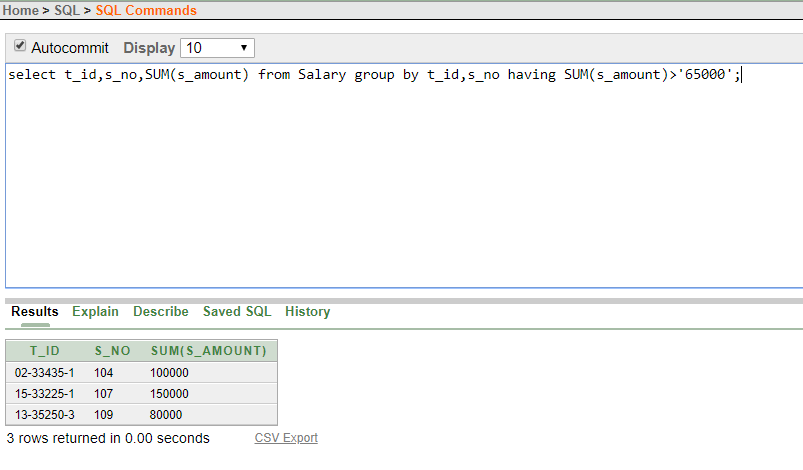
Ques: Display the sum of salaries grouped by the teahers id.

Ans: select t\_id,SUM(s\_amount) from Salary group by t\_id;



Ques: Display the sum of salaries grouped by the salary number and teachers id but the sum of salary must be greater than 65000.

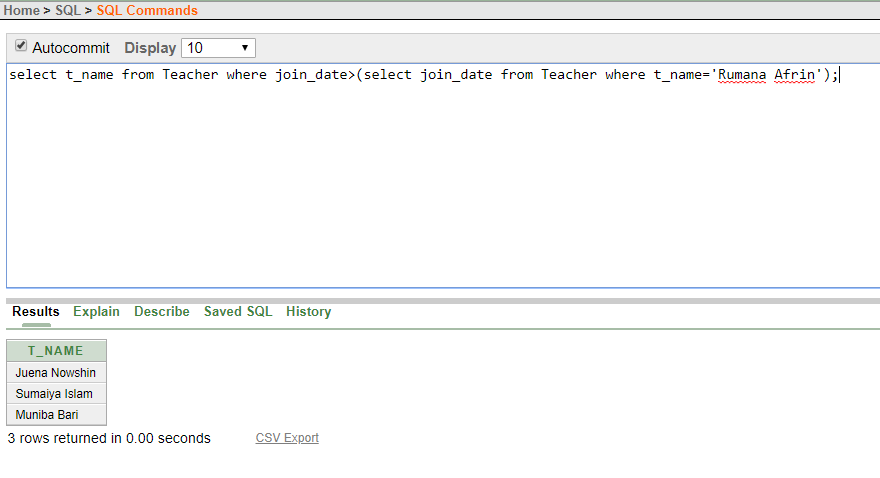
Ans: select t\_id,s\_no,SUM(s\_amount) from Salary group by t\_id,s\_no having SUM(s\_amount)>'65000';

****

Subquery:

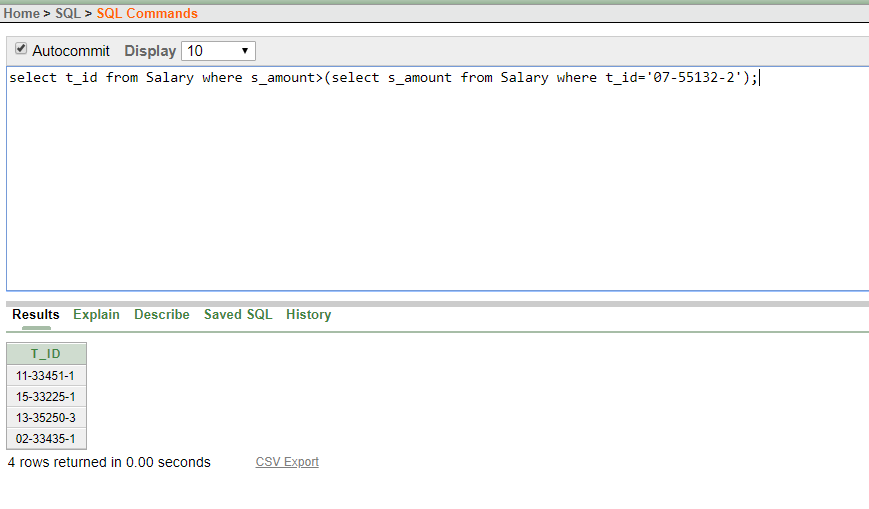
Ques: Display the teachers names who joined after Rumana Afrin.

Ans: select t\_name from Teacher where join\_date>(select join\_date from Teacher where t\_name='Rumana Afrin');



Ques: Display the id of the teacher who earn more than 07-55132-2 id.

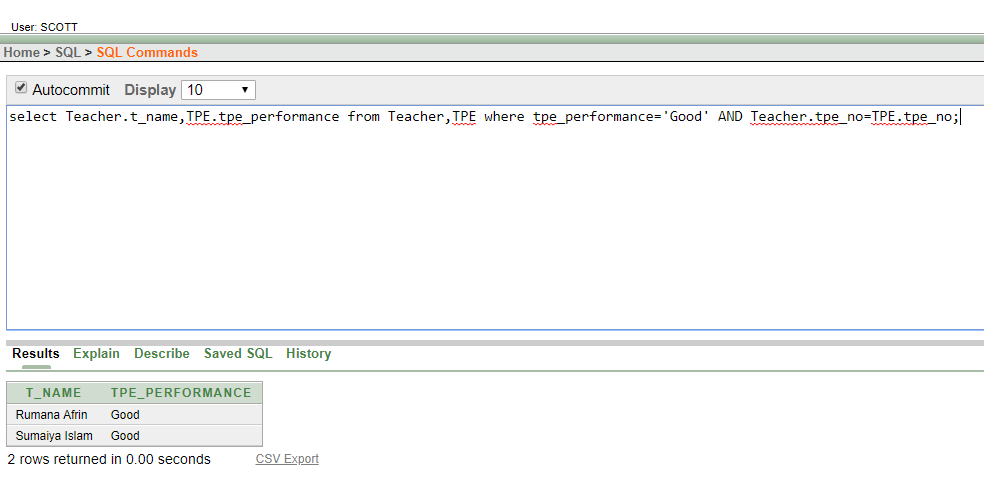
Ans: select t\_id from Salary where s\_amount>(select s\_amount from Salary where t\_id='07-55132-2');

****

Joining:

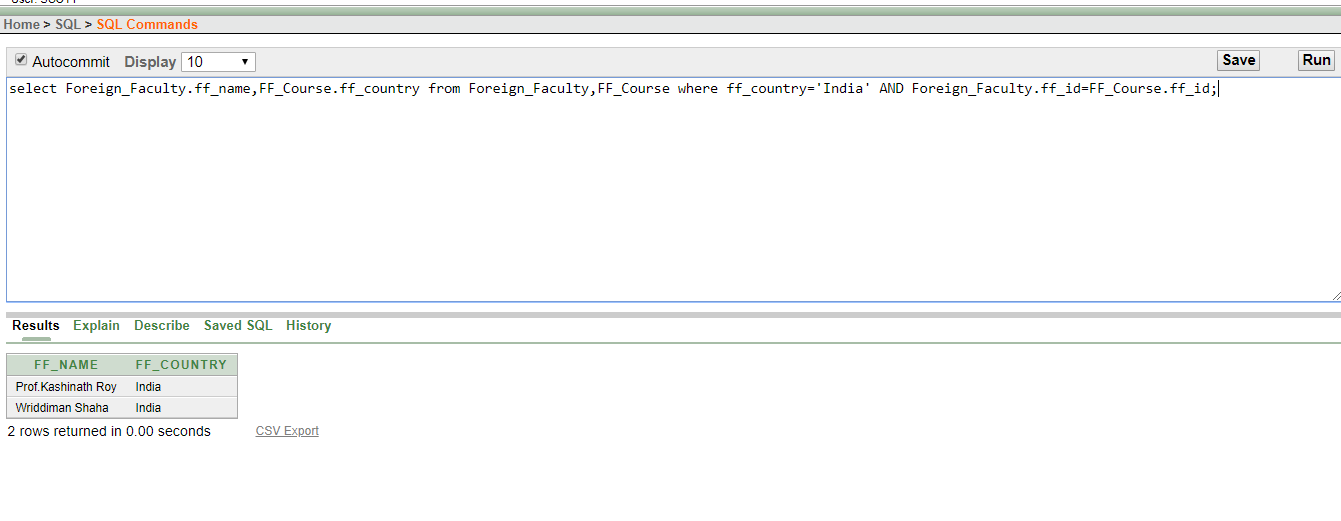
Ques: Display the name of the teachers whose tpe performance is good.

Ans: select Teacher.t\_name,TPE.tpe\_performance from Teacher,TPE where tpe\_performance='Good' AND Teacher.tpe\_no=TPE.tpe\_no;



Ques: Display the name of foreign faculty who are from India.

Ans: select Foreign\_Faculty.ff\_name,FF\_Course.ff\_country from Foreign\_Faculty,FF\_Course where ff\_country='India' AND Foreign\_Faculty.ff\_id=FF\_Course.ff\_id;

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**CONCLUSION:** After finished this project we have learned many things like how we can make database, making scenario, normalization, query and lot of this. We all have enjoyed.

Thank You