



# Mawlana Bhashani Science and Technology University

## Lab-Report

Report No: 05

Course code: ICT-3110

Course title: Operating System Lab

Date of Performance:

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### Submitted To

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## Experiment no : 05

### Experiment Name: Connecting to Database in Linux.

**Objective:-** The objective is to install MySQL client or MySQL server on Ubuntu 18.04 Bionic Beaver Linux.

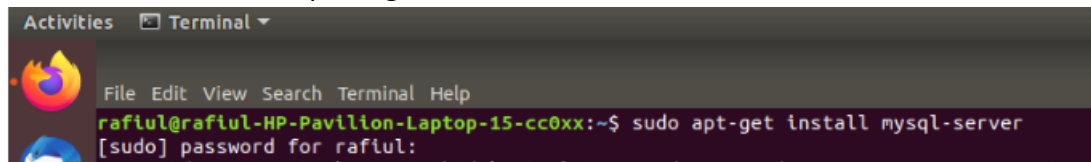
Commands: MySQL is an open-source database management system, commonly installed as part of the popular LAMP(Linux, Apache, MySQL, PHP/Python/Perl) stack. It uses a relational databases and SQL (Structured Query Language) to manage its data. The short version of the installation is simple: update your package index, install the mysql- server package, and then run the included security script.

On Ubuntu 18.04, only the latest version of MySQL is included in the APT package repository by default. At the time of writing, that's MySQL 5.7

To install it, update the package index on your server with apt:

```
$ sudo apt update
```

Then install the default package:



```
rafiul@rafiul-HP-Pavilion-Laptop-15-cc0xx:~$ sudo apt-get install mysql-server
[sudo] password for rafiul:
```

The secure installer goes through the process of setting up MySQL including creating a root user password. It will prompt us for some security options, including removing remote access to the root user and setting the root password.

Now that we are done with setups we can start out experimenting with database system by logging in.

To get the list of data Databases type show Databases;

```
mysql> show databases;
+-----+
| Database |
+-----+
| information_schema |
| mysql |
| performance_schema |
| sys |
| test |
+-----+
5 rows in set (0.00 sec)
```

We need to select a database first to do so we use the keyword select 'DatabaseName',

```
mysql> create database student_information;
Query OK, 1 row affected (0.00 sec)

mysql> use student_information;
Database changed
```

Now to create a table we use the syntax create table 'TableName' Values(val1\_name <data\_type> , val2\_name <data\_type>.....);

```
mysql> create table student (id varchar(10) , name varchar(20) , dept varchar(10));
Query OK, 0 rows affected (0.24 sec)
```

Now to insert values to the table we use the keyword

Insert into 'TableName' Values( val1 , val2...);

```
mysql> insert into student values('IT18014','Miran','ICT');
Query OK, 1 row affected (0.04 sec)

mysql> insert into student values('IT18015','Tuhin','ICT');
Query OK, 1 row affected (0.04 sec)

mysql> insert into student values('IT18016','Rafiul','ICT');
Query OK, 1 row affected (0.03 sec)
```

Now to see whats in the table we use select \* from 'TableName'.

```
mysql> select * from student;
+-----+-----+-----+
| id      | name  | dept |
+-----+-----+-----+
| IT18014 | Miran | ICT  |
| IT18015 | Tuhin | ICT  |
| IT18016 | Rafiul | ICT  |
+-----+-----+-----+
3 rows in set (0.00 sec)
```

## Conclusion :

In this lab we learnt how to install database in Linux bases operating systems . Using database is a convenient way of saving data in both research and technical fields , so it will be of great help in near future .