**JDBC**

There are 4 types of JDBC drivers:

1. JDBC-ODBC bridge driver
2. Native-API driver (partially java driver)
3. Network Protocol driver (fully java driver)
4. Thin driver (fully java driver)

Mysql : usn & password – root, port – 3306

PostGreSql : password – root, Port – 5432

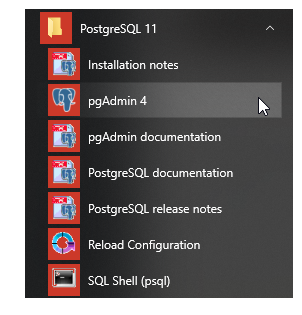
=>> To install MySql server on the machine, download mysql installer from

<https://dev.mysql.com/downloads/installer/>

and install all the elements present in it.

=>> To install PostGreMysql follow the link <http://www.postgresqltutorial.com/>

<http://www.postgresqltutorial.com/connect-to-postgresql-database/>



[http://127.0.0.1:56587/browser/#](http://127.0.0.1:56587/browser/) =>> To launch the pgAdmin UI on browser

* DBeaver – App to work with the database,
* Search for Dbeaver in the serach window which is already installed

Write the java program to execute the mysql query

**import** java.sql.\*;

**import** java.util.\*;

**public** **class** JDBC\_Class1 {

**public** **static** **void** main(String[] args) {

**try** {

// Step 1:

Class.*forName*("com.mysql.jdbc.Driver");

// Step 2: establish connection

Connection con = DriverManager.*getConnection*("", "", "");

// Create a statement for writing quaries

Statement st = con.createStatement();

ResultSet res = st.executeQuery("select \* from employee");

// Getting the result

List lis = **new** ArrayList();

**while**(res.next()){

lis.add(res.getInt(1) + " : : " + res.getString(2));

}

System.***out***.println(lis);

} **catch** (Exception e) {

e.printStackTrace();

}

}

}

**How to create a table in mySql in MySql command line Client,**

1. To see the databases 🡺 show databases;
2. To create databases 🡺 create database **DBname**;
3. To go to the specific database 🡺 use **DBname**;
4. To create table with column name in the database, go to the database and enter 🡺 create table **TableName**(firstname **varchar**(20),email **varchar**(20),MobNo **varchar** (20));
5. To enter data into the table 🡺 insert into **TableName** values('Siraj Parveez', 'siraj@1123', '9980808080');
6. To see the table content 🡺 select \* from seleniumuser;
7. To delete any entry from the table 🡺 DELETE FROM **TableName** WHERE **Colname** ='Siraj';
8. To find the total number of tables in any DB 🡺 show tables;
9. To get the specific column 🡺 select **ColumnName** from seleniumuser1;
10. To get entry in descending order 🡺 select \* from **TableName** ORDER BY **ColumnName** DESC;
11. To get entry in Ascending order 🡺 select \* from **TableName** ORDER BY **ColumnName** ASC;
12. To enter in ascending order with the multiple column names 🡺 select \* from **TableName** ORDER BY **ColumnName**,**ColumnName** ASC;
13. To limit the entries of the search to 5 🡺 SELECT \* FROM **TableName** ORDER BY **ColumnName** LIMIT 0, 5;
14. To add a new column to an existing table 🡺 ALTER TABLE **TableName** ADD age varchar(50);

**PostGreSQL (PSQL) commands**

1. To create database 🡺 create database **DBName**;
2. To view help for *psql* commands, type \?
3. To get the list of databases 🡺 \l
4. To connect to a Database  🡺 \c **DBName**
5. To delete any database 🡺 DROP DATABASE **DBName**;
6. To create table 🡺 CREATE TABLE role( role\_id serial PRIMARY KEY,   role\_name VARCHAR (255) UNIQUE NOT NULL);
7. To delete particular table 🡺 drop table **TableName**;
8. To delete table with ‘if exist’ statement 🡺 DROP TABLE IF EXISTS **TableName**;
9. To shows all tables in the current schema 🡺 \dt
10. To see sequence 🡺 \ds
11. To see the table as well as sequence 🡺 \d
12. To find all the elements from the table 🡺 select \* from account;
13. To quit Shell 🡺 \q
14. To delete a specific row from a table 🡺 DELETE FROM **TableName** where **ColumnName**=’Value';
15. To delete all rows 🡺
16. To arrange the table in ascending order 🡺 select \* from **TableName** ORDER BY **ColumnName** ASC;
17. To arrange the table in ascending order 🡺 select \* from **TableName** ORDER BY **ColumnName** DESC;
18. To select more than one element 🡺 select id, name from tenants where building\_id = 421;
19. To remove all data from multiple tables at once, you separate each table by a comma (,) => TRUNCATE TABLE table\_name1, table\_name2,
20. To remove data from the main table and all tables that have foreign key references to the main table, => TRUNCATE TABLE table\_name CASCADE;

Convert list to set which will not contain duplicates