import java.util.ArrayList;

import java.io.IOException;

import java.sql.Connection;

import java.sql.DriverManager;

import java.sql.ResultSet;

import java.sql.SQLException;

import java.sql.Statement;

import java.util.ArrayList;

import java.util.Scanner;

public class Tester {

public static void main(String[] args) throws SQLException {

Member mem1 = new Member("Chloe", "A", "Kimble", "1500 N Patterson St Valdosta GA", "123456789", "cakimble", "password");

Associate ass1 = new Associate ("Arron", "T", "Croft", "123 Croft Rd Valdosta GA", "9998885555", "atcroft" , "somepassword" );

ArrayList<BookDetail> bookDetails = Search.searchBooksByTitle("The");

for(BookDetail bd : bookDetails) {

System.out.println(bd.getTitle());

}

}

}

**import** java.io.IOException;

**import** java.sql.Connection;

**import** java.sql.DriverManager;

**import** java.sql.PreparedStatement;

**import** java.sql.SQLException;

**import** java.sql.Statement;

**public** **class** Member {

String firstName, lastName, middleInitial;

String memberID;

String phoneNumber;

String userName, password;

Book[] checkedOut;

String address;

**public** Member(String firstName, String middleInitial, String lastName,

String address, String phoneNumber, String userName, String password) **throws** SQLException{

**this**.firstName = firstName;

**this**.lastName = lastName;

**this**.middleInitial = middleInitial;

**this**.address = address;

**this**.phoneNumber = phoneNumber;

**this**.userName = userName;

**this**.password = password;

//JDBC URL, username and password of MySQL server

**final** String url = "jdbc:mysql://localhost:3306/library?useSSL=false";

**final** String user = "root";

**final** String password1 = "root";

// JDBC variables for opening and managing connection

Connection con;

// opening database connection to MySQL server

con = DriverManager.*getConnection*(url, user, password1);

System.***out***.println("Database connected successfully");

String query = "insert into members (Fname, Minit, Lname, Address, PhoneNumber, Username, Password, Is\_active)"

+ " values (?, ?, ?, ?, ?, ? ,?, ?)";

PreparedStatement ps2 = con.prepareStatement(query);

ps2.setString(1, firstName);

ps2.setString(2, middleInitial);

ps2.setString(3, lastName);

ps2.setString(4, address);

ps2.setString(5, phoneNumber);

ps2.setString(6, userName);

ps2.setString(7, password);

ps2.setInt(8, 1);

ps2.execute();

con.close();

}

**public** **void** checkOut (Book[] books){

}

**public** **void** returnBooks (Book[] books){

}

**public** **void** renewBooks (Book[] books){

}

**public** **void** placeHold (BookDetail[] bookDetails){

}

**public** **void** reportLost (Book[] book){

}

}

**import** java.sql.Connection;

**import** java.sql.DriverManager;

**import** java.sql.PreparedStatement;

**import** java.sql.SQLException;

**import** java.sql.Statement;

**public** **class** Associate **extends** Member {

**public** Associate(String firstName, String lastName, String middleInitial, String address,

String phoneNumber, String userName, String password) **throws** SQLException {

**super**(firstName, lastName, middleInitial, address, phoneNumber, userName, password);

// **TODO** Auto-generated constructor stub

//JDBC URL, username and password of MySQL server

**final** String url = "jdbc:mysql://localhost:3306/library?useSSL=false";

**final** String user = "root";

**final** String password1 = "root";

// JDBC variables for opening and managing connection

Connection con;

// opening database connection to MySQL server

con = DriverManager.*getConnection*(url, user, password1);

System.***out***.println("Database connected successfully");

String query = "insert into associates (MemberID, Manager)"

+ " values (?, ?)";

PreparedStatement ps2 = con.prepareStatement(query);

ps2.setInt(1, 2);

ps2.setInt(2, 0);

ps2.execute();

con.close();

}

/\*public void createMember(String firstName, String lastName, String middleInitial,

String memberID, String phoneNumber, String userName, String password) throws SQLException{

Connection con = Database.getConnection();

Statement stmt = con.createStatement();

String query = "INSERT INTO members VALUES(";

query += firstName;

query += middleInitial;

query += lastName;

query += memberID;

query += address;

query += phoneNumber;

query += userName;

query += password;

query += ");";

System.out.println(query);

stmt.execute(query);

}\*/

}

create schema library;

create table MEMBERS (

MemberID INT(4) UNSIGNED NOT NULL AUTO\_INCREMENT,

Fname VARCHAR(20),

Minit CHAR(1),

Lname VARCHAR(20),

Address VARCHAR(100),

PhoneNumber VARCHAR(10),

Username VARCHAR(15),

Password VARCHAR(15),

Is\_active BINARY NOT NULL, #0 for inactive, 1 for active

PRIMARY KEY (MemberID)

);

create table ASSOCIATES (

MemberID INT(4) UNSIGNED NOT NULL,

Manager BINARY NOT NULL, #0 for Ass., 1 for Manager

PRIMARY KEY (MemberID),

FOREIGN KEY (MemberID) REFERENCES MEMBERS (MemberID)

);

create table BOOK\_DETAILS (

ISBN VARCHAR(13) NOT NULL,

Title VARCHAR(100),

Year VARCHAR(4),

PRIMARY KEY (ISBN)

);

create table BOOKS (

ID INT(10) UNSIGNED NOT NULL AUTO\_INCREMENT,

ISBN VARCHAR(13) NOT NULL,

checkedout BINARY,

PRIMARY KEY (ID),

FOREIGN KEY (ISBN) REFERENCES BOOK\_DETAILS (ISBN)

);

create table AUTHORS (

ISBN VARCHAR(13) NOT NULL,

AName VARCHAR(50) NOT NULL,

FOREIGN KEY (ISBN) REFERENCES BOOK\_DETAILS (ISBN),

PRIMARY KEY (ISBN, AName)

);

create table CHECKOUT\_LOG (

BookID INT(10) UNSIGNED NOT NULL,

MemberID INT(4) UNSIGNED NOT NULL,

Date\_out DATE NOT NULL,

Date\_in DATE,

FOREIGN KEY (BookID) REFERENCES BOOKS (ID),

FOREIGN KEY (MemberID) REFERENCES MEMBERS (MemberID),

PRIMARY KEY (BookID, MemberID, Date\_out)

);

create table KEYWORDS (

ISBN VARCHAR(13) NOT NULL,

keyword VARCHAR(200),

FOREIGN KEY (ISBN) REFERENCES BOOK\_DETAILS (ISBN),

PRIMARY KEY (ISBN, keyword)

);