

# Lab 08.01 Databases

Using databases

## Overview

You will be doing a database module next semester, that will go into this in more detail.

This lab does not use python at all.

## Before the lab

Install a mysql database on your machine, if you do not already have one.

## Windows

I recommend installing WAMP, go to

<http://www.wampserver.com/en/download-wampserver-64bits/>

You may need to install the Microsoft C++ dll to get it to work, link is on the download page. Make sure that you get the same version (32bit or 64 bit) as your wampserver. (I can not confirm this, because my machine is locked down 🙄 )

## mac/linux

Download MySQL from mysql.com

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

you may want the MySQLworkbench as well to make connections and run the sql.

Note: This lab is only to get you started with MYSQL, you do not need to download these to use SQLite3

## Mysql

1. Create a table in mysql called *student* that has three columns (id, firstname, age).
  - a. Open a mysql console
  - b. When you login to mysql you are not in any particular database to see the databases use the command

```
show databases;
```

- c. To create a database

```
create database pfda;
```

- d. To use a database

```
use pfda
```

- e. Create the table in the database with the command

```
create table student (  
    id int,  
    firstname varchar(100),  
    age int(3)  
);
```

insert data

```
insert into student (id, firstname, age) values (1 , 'joe', 56);
```

view data

```
select * from student;
```

Updata data

```
update student set firstname='mary' where id = 1;
```

Delete

```
Delete from student where id = 1;
```

Make sure you do not forget the semi colon (;) if you are stuck in the middle of a command use ctrl-c

2. Make a table called book that has 4 columns (id, title, author, price) and insert some data into it.

3. Look at the tables in phpmyadmin.