**CIS 222 – Winter 2018**

**Midterm Examination**

**Testing Rules:**

* This examination is open book, open notes, and open Internet. You can use any resources at your disposal so long as any code you submit is your own. Do not download or copy code from others. This includes other sites, however, you can re-use and update your own code.
* As long as these rules are met, this is a take home midterm. However, you must attend class on Tuesday October 16th to get credit, and be prepared to explain any of your code if asked.
* I will stop accepting submissions promptly at 5:25pm on October 16th. No exceptions.
* Any instances of cheating (or any violation of the above rules) will result in a zero on this exam, and could result in removal from the course and/or disciplinary action on behalf of the school.
* This midterm has two sections that total 100 points. A SQL portion and a PHP portion. There is also an optional extra credit portion.

**Things to do:**

* Read the instructions
* Follow the instructions
* Before you leave class on Tuesday, verify with me that I can see your exam

**Things not to do:**

* Do not worry about security for this exam only (I will not SQL injection hack this exam, pinkie promise)
* Do not over-complicate your response (I want to see a simple implementations of the questions)

For this examination, please do the following:

* Upon completion, upload all files to git in a folder called *midterm* or *mid*
* Also, ensure that all work is available on your HFCC web presence (CIS Linux PHP web server.
* For instance, I need to be able to go to cislinux.hfcc.edu/~*username/mid* to see your work (so, mine would be at cislinux.hfcc.edu/~*crbanks1/mid*).
* Make sure a link to your midterm on the CIS Linux server is in your index file, this way I can go into git to find your midterm if I am unable to find it on the CIS server. Same as your project.
* IF YOU DO NOT UPLOAD YOUR WORK, YOU WILL NOT RECEIVE A GRADE.

**Part 1: Database (40 points)**

Use PHPMyAdmin, MySQL Workbench, PhpStorm, or the command line MySQL tool to create a new table in your database called *midterm*. You will need to keep this query! The table should have an index field, a field for the make of a car, a field for the model of a car, a field for the price of the car, and a field for the year of the car. Once you have your CREATE statement I need you to save it in a file called setup.sql which needs to be included in your final. You also need to include some compatible data below using an insert statement. Include the INSERT statement(s) in your setup file as well.

Insert into the database, the following data:

1,”Tesla”,”Model X”,79000.00,2018

2,”Tesla”,”Model 3”,49000.00,2018

3,”Ford”,”Escape”,25000.00,2018

**Part 2: Program (60 points)**

Next, create your midterm folder and in this folder, the following PHP files. These files are 15 points each. Feel free to create additional files if needed, for example if you wanted to have database or helper files included in each file below. Doing this can save you time.

**index.php**

This should list all cars in the database. The bottom the page should also show a count of the cars on the lot and the average car price. Somewhere on the page, also include links to the insert, update, and delete pages below.

**insertcar.php**

This should take input from the user in text boxes and put the input into the database. You should give a message if there is a successful insert of the item and an error message if there is not. This page should also have a back button that takes you back to the index page. This will be used to add additional cars to the database.

**updatecar.php**

In your list car file, make sure every time a car is listed it has a dynamic link to this update car file. This file should pull and display the current information for the car selected in text boxes. The user should then be able to change this data. This data should then be updated and you would show a successful message. Don’t forget a back button, so the user can go see all cars again.

**deletecar.php**

This should allow the user to select a car and “sell” it, which will delete it from the database. This page should also have a back button that takes you back to the index page.

**Bonus (20 points):**

Create a **findcar.php** file. This page should start by showing no cars, users should just get a text box asking for a price. This file should allow the user to enter a price and return all cars that he/she can afford for that price. Be sure to include links between this file and your index, otherwise I may be unable to find this file.