

SENECA WEB PROGRAMMING PROGRAM FALL 2020 SESSION

Module Number: WEB 306
Assignment #1

Instructor: Tim Lai
Title: PHP Written Answers
Assigned: Wednesday October 14
Due date: 11:59pm Wednesday October 28
Value: 10%

Submission details: This assignment MUST be submitted in at least one of 2 ways, as specified below. If the assignment does not follow the specified instructions, it will be considered incomplete. *Failure to upload this assignment will result in a grade of zero for this assignment.*

1. This assignment should be uploaded to a **GitHub repository** which I will invite you to.
2. If you have difficulty uploading to GitHub, then you may alternatively upload your assignment as a ZIP file to an online cloud storage site such as **Google Drive** or **WeTransfer** and send me a link at tim.lai@senecacollege.ca. *DO NOT EMAIL ME A ZIP FILE AS AN ATTACHMENT. I WILL NOT RECEIVE IT.*

Instructions: You will be writing an **explanatory document** in the form of a single **PHP file**, which answers the following questions:

1. What is PHP and what is it used for?
2. What are the `$_SERVER`, `$_GET` and `$_POST` superglobals and what are they used for?
3. What is a class and what is an object in PHP?
4. What are properties in PHP and in what way(s) do they differ from variables?
5. What are methods in PHP and in what way(s) do they differ from functions?
6. What are magic methods, what is the constructor method specifically, and how do they differ from normal methods?
7. Compare the differences between the public, private and protected keywords.
8. Identify and define the four principles of object-oriented programming and explain in what way(s), each is used in PHP.
9. What is SQL, what is MySQL/MariaDB and what are they used for?
10. What is PHPMyAdmin and what is it used for?

All content in this document should be written **in your own words** (aside from the questions themselves) and you should **cite your sources**. You may cite my lecture notes (please include day and page numbers), textbooks, or credible online sources such as the *PHP* documentation, *W3Schools* or *TechTarget*. It is not necessary to follow a citation style – just include the name of the

resource and a link if it is an online resource. *DO NOT SIMPLY COPY/PASTE FROM MY NOTES.* You must also run these definitions through a plagiarism checker.

Your answers should be stored in an **associative array** which holds at least **10 items** – 1 for each question and answer – with each item using appropriate **strings** as **keys** and **values**. The questions and answers from the associative array should be looped through, using an appropriate **loop**, of your choice, and **echoed** into the body of an **HTML page**.

You should demonstrate a basic competency with HTML. You *MUST* have valid HTML according to the W3C validator (<https://validator.w3.org/>) or there could be deductions. It would also be a good idea to make use of semantic markup where appropriate. You may make use of CSS and JavaScript, but it is not required, and the quality of any CSS/JavaScript code included will not be evaluated.

Please include your full name and Seneca email address somewhere on the page or in a comment.

Grading breakdown:

- Accuracy, clarity and completeness of written answers and comparisons **(70%)**
- Inclusion of and quality of sources used **(10%)**
- Use of PHP **(10%)**
- Use of HTML **(10%)**

Your files should contain only valid (as determined by the W3C validator) HTML code. You can use invalid code in the HTML but if you do, you must include a comment beside the invalid code explaining your decision. To properly validate your HTML in your PHP files, you *MUST* do a “view source” of the page in a web browser. The W3C validator does not understand PHP code. *You will lose 2% per type of uncommented HTML validation error.* You should not have any PHP errors. *You will lose 2% per PHP error which could have been fixed.*

Late Policy

All late assignments will be given a grade of zero.

Plagiarism

There are serious penalties for cheating and plagiarism offences and you are expected to be aware of our Academic Honesty Policy. Please refer to the Academic Policy at <http://www.senecacollege.ca/academic-policy/acpol-09.html> for more information.