

Introduction to PHP

Part 1 of 2

References

- PHP 5.6.1 Released Oct. 2, 2014, <http://php.net/>
- PPH Documentation, <http://php.net/urlhowto.php>
- PHP Language Reference, <http://php.net/manual/en/langref.php>
 - Basic Syntax
 - Types
 - Variables
 - Constants
 - Expressions
 - Operators
 - Control Structures
 - Functions
 - Classes and Objects
 - Namespaces
 - Exceptions
 - Predefined Variables
 - \$Superglobals // Bulit-in variables that are always available in all scopes
 - \$GLOBALS // All variables available in global scope
 - \$_SERVER // Server and execution environment info
 - \$_GET // HTTP GET variables
 - \$_POST // HTTP POST variables
 - \$_FILES // HTTP file upload variables
 - \$_REQUEST // HTTP request variables
 - \$_SESSION // Session variables
 - \$_ENV // Environment variables
 - \$_COOKIE // HTTP cookies
 - \$php_errormsg
 - \$HTTP_RAW_POST_DATA // Raw POST data
 - \$http_response_header // HTTP response headers
 - \$argc // The number of arguments passed to script
 - \$argv // Array arguments passed to script

PHP (HyperText Processor)

PHP Scripts

Basic Syntax

```
<? .... ?>      shorthand version of <?php ....?>
<script language = "php">
....
</script>
```

Comments:

```
/*  */
//
```

#

Variables:

- Always start with the \$ symbol
- Examples
\$php5 = 'version';
\$os = "Microsoft Windows Prof 7";
\$this_int = 50; // Standard decimal notation
\$that_int = 062; // Octal number
\$my_int = 0x32; //Hexadecimal

Escape Characters in PHP

Escape String	Meaning
\n	New line
\r	Carriage return
\t	Horizontal tab
\\"	Back slash character
\\$	\$ character
\'	Single quote
\"	Double quote
\###	ASCII character (octal)
\x##	ASCII character (hexadecimal)

Variable Manipulation

```
<?php
    $sum = 10 + 2;          //12
    $sum = $sum + 5;        //17
    $sum = %sum % 2;        //1
    $answer = 5;
    $answer += 2;
    $answer *= 2;
    $answer++;
    $answer--;
?>
```

PHP Functions/User Defined Functions

- echo
- unset()
- func_get_args() // get function arguments
- func_num_args() // get function argument count

String Manipulation Functions

- strcmp() // string comparison, case sensitive
- strcasecmp() // string comparison, non case sensitive
- substr() // the sub string
- strlen() // The number of chars in the string
- strpos() // The character position
- chop() // Remove all white spaces from its ends

- **trim()** // remove all white spaces from both ends
- **strtolower()** // covert to lower case characters
- **strtoupper()** // convert to upper case characters

Arithmetic Functions

- **floor(), ceil(), round(), srand(), rand(), abs(), min(), max()**

Ouput Functions

- **print()**
- **printf() // formatted output**

```
<? php
    $answer = 10;
    echo(++$answer)." ";
    echo "$answer<BR>";
    $answer += 10;
    echo ($answer++)." ";
    echo $answer; ?
    unset($answer);      //destroy the variable
?>
<?php
    %thankyou_string = "Thank you ";
    %thankyou_string = thankyou_string . "for your comments!";
    // String concatenation operator period .
?>
```

PHP Functions

- **func_get_args() // <http://us3.php.net/manual/en/function.func-get-args.php>**
- **func_num_args()**

```
<!DOCTYPE html>
<!--funct_arguments.php - A trivial example to illustrate a php document -->
<html lang = "en">
<head>
    <title> funct_arguments.php </title>
<meta charset = "utf-8" />
</head>
<body>
<?php
    function func_dynamic() {
        echo "ITC 250/CPET 499 Web Systems: ".func_num_args()." Number of arguments.<br>";
        $args = func_get_args();
        for($i = 0; $i < count($args); $i++){
            echo "Passed arguments: {$args[$i]} <br>";
        }
    }
    func_dynamic(5, 4, 3, 2, 1 );
?>
```

```
</body>  
</html>
```

Multiple File PHP Scripts

```
include "files.php";  
include_once "file.php";  
require ('library.inc');
```

// <http://php.net/manual/en/function.include.php>
// <http://php.net/manual/en/function.include-once.php>
// <http://php.net/manual/en/function.require.php>