PHP Database Objects

In this lab, you will use PHP Database Objects to connect to a MySQL/ MariaDB database and create a simple search.

PowerSearch by MegaGame

Search by Name [ ]
Min Publication Year [1970 ▼]
Max Publication Year [2020 ▼]
Order By [name ▼]
Limit search to top [50 ▼]
[submit]

1. Most of the code has been provided, you will make minor changes to the starter code to finish creating a basic search. Download the files lab09powerSearchStarter.php and save it as powerSearch.php.
2. Please review all code before making changes. The validation code is very similar to past labs
3. First you will add a default value for the search as a variable called $searchName. Add the code right after setting $maximumYear.

```php
$minimumYear = MIN_YEAR;
$maximumYear = MAX_YEAR;
$searchName = "";
```

4. Next add some code to sanitize and validate the search term from the $_GET superglobal array.

```php
        $errorMessages .= " Maximum year must be greater than " . MAX_YEAR . ". ";
    }
}else{
    $validated = false;
    $errorMessages .= " Min and max year required. ";
}

//Sanitize and validate search term
if(!empty($_GET['game_name'])){
    $searchName = sanitize($_GET['game_name']);
}

}else{
    //no submit so first run, not an error state but the form is not validated yet either
    $validated = false;
}
```

5. Next you will need to update the query to use the LIKE keyword to compare it the user provided string. You will use the bindparam command to insert the value into the query string.

```php
$q = "SELECT * FROM video_game_sales WHERE year BETWEEN :beg AND :end AND name like :name ORDER BY $orderBy limit $limitTo";
```

6. After using bindparam to replace ":end" in the query string with $maximumYear, add the two new lines of code below to add % % to either side of the search term provided by the user and bind the new value to the query string. The % % represent wild car values on either side of your search string.

```php
$statement->bindparam(":end", $maximumYear);
$tempName = "%" . $searchName . "%";
$statement->bindparam(":name", $tempName);
//Execute the query
$statement->execute();
```

7. Lastly add a row to the table and your input element with php code to make it sticky.

```html
<table style="...">
    <tr>
        <td colspan="2" style="...">
            <h1 style="text-align:center;">PowerSearch by MegaGame</h1>
        </td>
    </tr>
    <tr>
        <td style='text-align:right;' width='50%'>
            Search by Name
        </td>
        <td style='text-align:left;' width='50%'>
            <input type="text" name="game_name"  value="<?php echo $searchName; ?>">
        </td>
    </tr>
    <tr>
        <td style="text-align:right;">
            Min Publication Year
        </td>
        <td style="...">
            <select name="minimumYear">
```

8. Test the search

PowerSearch by MegaGame

Search by Name [Mario]
Min Publication Year [1970 ▼]
Max Publication Year [2020 ▼]
Order By [name ▼]
Limit search to top [50 ▼]
[submit]

PowerSearch Results

ID	Name	Platform	Year	Genre	Publisher
3570	Classic NES Series: Dr. Mario	GBA	2004	Puzzle	Nintendo
1353	Classic NES Series: Super Mario Bros.	GBA	2004	Platform	Nintendo
4223	Dance Dance Revolution: Mario Mix	GC	2005	Misc	Nintendo
12772	Dance Dance Revolution: Mario Mix (JP sales)	GC	2005	Simulation	Nintendo
13275	Detective Conan: Marionette Symphony	3DS	2013	Adventure	Namco Bandai Games
171	Dr. Mario	GB	1989	Puzzle	Nintendo
216	Dr. Mario	NES	1990	Puzzle	Nintendo
5569	Dr. Mario / Puzzle League	GBA	2005	Puzzle	Nintendo
4625	Dr. Mario 64	N64	2001	Puzzle	Nintendo
11284	Famicom Mini: Mario Bros.	GBA	2004	Platform	Nintendo
4590	Famicom Mini: Super Mario Bros. 2	GBA	2004	Platform	Nintendo
320	Mario & Luigi: Bowser's Inside Story	DS	2009	Role-Playing	Nintendo
822	Mario & Luigi: Dream Team	3DS	2013	Role-Playing	Nintendo

Deliverables

1. Demonstrate the code and execution to the instructor during this lab, during office hours, or during the next lab period.
2. Upload the instructor approved .php file (source code only) to the Lab 9 D2L drop box.