Project Development Phase
Sprint-2 Source code

Date	09 November 2022
Team ID	PNT2022TMID41614
Project Name	VirtualEye - Life Guard for Swimming Pools to Detect Active Drowning
Maximum Marks	8 Marks

Base.html

```
<!--DOCTYPE html-->
<html lang="en">

<head>
    <meta charset="UTF-8">
    <meta name="viewport" content="width=device-width, initial-
scale=1.0">
    <meta http-equiv="X-UA-Compatible" content="ie=edge">
    <title>High Quality Facial Recognition</title>
    <link
href="https://cdn.bootcss.com/bootstrap/4.0.0/css/bootstrap.min
.css" rel="stylesheet">
    <script
src="https://cdn.bootcss.com/popper.js/1.12.9/umd/popper.min.js
"></script>
    <script
src="https://cdn.bootcss.com/jquery/3.3.1/jquery.min.js"></scri
pt>
    <script
src="https://cdn.bootcss.com/bootstrap/4.0.0/js/bootstrap.min.j
s"></script>
    <link href="{{ url_for('static', filename='css/main.css')
}}" rel="stylesheet">
    <style>
    .bg-dark {
        background-color: #42678c!important;
    }
```

```html
    #result {
        color: #0a1c4ed1;
    }
    </style>
</head>

<body style="background-color:black";>
        <header id="head" class="header">
        <section  id="navbar">
                <h1 class="nav-heading"></i>Virtual Eye</h1>
            <div class="nav--items">
                <ul>
                    <li><a  href="{{
url_for('index')}}">Home</a></li>
                    <li><a href="{{
url_for('logout')}}">Logout</a></li>
                <!-- <li><a href="#about">About</a></li>
                <li><a href="#services">Services</a></li> -->

                </ul>
            </div>
        </section>
    </header>
    <div class="container">
        <div id="content" style="margin-top:2em">
        <div class="container">
          <div class="row">
            <div class="col-sm-6 bd" >
                <h2><em style="color:white;">High Quality Facial
Recognition</em></h2>
                <br>
                <p><h5><i style="color:white;">Emotion Detection
Through Facial Feature Recognition</i></h5></p>
                    <img src="https://sample-sabari.s3.au-
syd.cloud-object-
storage.appdomain.cloud/facial_recognition_system_identificatio
n_digital_id_security_scanning_thinkstock_858236252_3x3-
100740902-large.webp">
            </div>
            <div class="col-sm-6">
                <div>
                    <h4 style="color:white;">Upload Image
Here</h4>
```

```html
            <form action = "http://localhost:5000/" id="upload-
file" method="post" enctype="multipart/form-data">
                <label for="imageUpload" class="upload-label">
                    Choose Image
                </label>
                <input type="file" name="image"
id="imageUpload" accept=".png, .jpg, .jpeg,.pdf">
            </form>

            <div class="image-section" style="display:none;">
                <div class="img-preview">
                    <div id="imagePreview">
                    </div>
                </div>
                <div>
                    <button type="button" class="btn btn-info
btn-lg " id="btn-predict">Analyse</button>
                </div>
            </div>

            <div class="loader" style="display:none;"></div>

            <h3>
                <span id="result"> </span>
            </h3>

        </div>
            </div>

          </div>
        </div>
        </div>
    </div>
</body>

<footer>
    <script src="{{ url_for('static', filename='js/main.js')
}}" type="text/javascript"></script>
</footer>

</html>
```

Index.html

```html
<!DOCTYPE html>
<html lang="en">
<head>
    <meta charset="UTF-8">
    <meta http-equiv="X-UA-Compatible" content="IE=edge">
    <meta name="viewport" content="width=device-width, initial-scale=1.0">

    <!--Bootstrap -->
    <link rel="stylesheet"
href="https://maxcdn.bootstrapcdn.com/bootstrap/4.0.0/css/bootstrap.min.css" integrity="sha384-
Gn5384xqQ1aoWXA+058RXPxPg6fy4IWvTNh0E263XmFcJlSAwiGgFAW/dAiS6JX
m" crossorigin="anonymous">
    <script src="https://code.jquery.com/jquery-
3.2.1.slim.min.js" integrity="sha384-
KJ3o2DKtIkvYIK3UENzmM7KCkRr/rE9/Qpg6aAZGJwFDMVNA/GpGFF93hXpG5Kk
N" crossorigin="anonymous"></script>
    <script
src="https://cdnjs.cloudflare.com/ajax/libs/popper.js/1.12.9/um
d/popper.min.js" integrity="sha384-
ApNbgh9B+Y1QKtv3Rn7W3mgPxhU9K/ScQsAP7hUibX39j7fakFPskvXusvfa0b4
Q" crossorigin="anonymous"></script>
    <script
src="https://maxcdn.bootstrapcdn.com/bootstrap/4.0.0/js/bootstr
ap.min.js" integrity="sha384-
JZR6Spejh4U02d8jOt6vLEHfe/JQGiRRSQQxSfFWpi1MquVdAyjUar5+76PVCmY
l" crossorigin="anonymous"></script>


    <script src="https://kit.fontawesome.com/8b9cdc2059.js"
crossorigin="anonymous"></script>
    <link
href="https://fonts.googleapis.com/css2?family=Akronim&family=R
oboto&display=swap" rel="stylesheet">
    <link rel="stylesheet" href="../static/style.css">
    <!-- <script defer src="../static/js/main.js"></script> -->
    <title>Virtual Eye</title>
</head>
<body>
```

```html
<header id="head" class="header">
<section  id="navbar">
        <h1 class="nav-heading"></i>Virtual Eye</h1>
    <div class="nav--items">
        <ul>
            <li><a  href="{{
url_for('index')}}">Home</a></li>
            <li><a href="{{
url_for('login')}}">Login</a></li>
            <li><a href="{{
url_for('register')}}">Register</a></li>
            <li><a href="{{
url_for('login')}}">Demo</a></li>
        </ul>
    </div>
</section>
<section id="slider">
 <div id="carouselExampleIndicators" class="carousel" data-
ride="carousel">
    <ol class="carousel-indicators ">
        <li data-target="#carouselExampleIndicators" data-
slide-to="0" class="active "></li>
        <li data-target="#carouselExampleIndicators" data-
slide-to="1"></li>
        <li data-target="#carouselExampleIndicators" data-
slide-to="2"></li>
    </ol>
    <div class="carousel-inner">

        <div class="carousel-item active">
            <img class="d-block w-100" src="https://sample-
sabari.s3.au-syd.cloud-object-storage.appdomain.cloud/fares-
underwater.png" alt="First slide">
        </div>
        <div class="carousel-item">
            <img class="d-block w-100" src="https://sample-
sabari.s3.au-syd.cloud-object-
storage.appdomain.cloud/Banefits%20of%20swimming.webp"
alt="Second slide">
        </div>
        <div class="carousel-item">
```

```html
                <img class="d-block w-100" src="https://sample-sabari.s3.au-syd.cloud-object-storage.appdomain.cloud/blog_main.jpg" alt="Third slide">
            </div>
        </div>
        <a class="carousel-control-prev" href="#carouselExampleIndicators" role="button" data-slide="prev">
            <span class="carousel-control-prev-icon" aria-hidden="true"></span>
            <span class="sr-only">Previous</span>
        </a>
        <a class="carousel-control-next" href="#carouselExampleIndicators" role="button" data-slide="next">
            <span class="carousel-control-next-icon" aria-hidden="true"></span>
            <span class="sr-only">Next</span>
        </a>
    </div>

    </section>
</header>
<section id="about">
    <div class="top">
        <h3 class="title text-muted">
            ABOUT PROJECT
        </h3>
        <div class="line"></div>
    </div>
<div class="body">
<div class="left">
    <h2>Problem:</h2>
    <p>
        Swimming is one of the best exercises that helps people
to reduce stress in this urban lifestyle. Swimming pools are
found larger in number in the hotels, weekend tourist spots and
barely people have in their house backyard. Beginners,
especially often feel it difficult to breathe under water and
causes breathing trouble which in turn cause a drowning
accident. Worldwide, drowning produces a higher rate of
mortality without causing injury to children. Children under
```

six of their age are found to be suffering the highest drowning mortality rates worldwide..Such kinds of deaths account for the third cause of unplanned death globally, with about 1.2 million cases yearly.

```
        </p>
</div>
<div class="left">
    <h2>Solution:</h2>
    <p>
```
To overcome the conflict, a meticulous system is to be implemented along the swimming pools to save the human life. By studying body movement patterns and connecting cameras to an artificial intelligence (AI)system we can devise an underwater pool safety system that reduces the risk of drowning. Usually such systems can be developed by installing more than 16 cameras underwater and ceiling and analysing the video feeds to detect any anomalies . but AS a POC we make use of one camera that streams the video underwater and analyses the position of swimmers to assess the probability of drowning ,if it is higher than an alert will be generated to attract lifeguards attention.

```
    </p>
</div>
</div>
<div class="bottom">
        <p ><b>
```
Note : The system is not designed to replace a lifeguard or other human monitor, but to act as an additional tool. "It helps the lifeguard to detect the underwater situation where they can't easily observe.
```
        </b></p>

    </div>
</section>

<section id="footer">

    <!-- <div class="social">
        <a href="#" target="_blank"><i class="fab fa-2x fa-twitter-square"></i></a>
```

```
      <a href="#" target="_blank">
       <i class="fab fa-2x  fa-linkedin"></i></a>
       <a href="#">
           <i class="#"></i>
       </a>
    </div>-->
</section>
</body>
</html>
```

Logout.html

```
<!DOCTYPE html>
<html >

<head>
  <meta charset="UTF-8">
  <meta name="viewport" content="width=device-width, initial-scale=1">
  <title>Virtual Eye</title>
  <link href='https://fonts.googleapis.com/css?family=Pacifico' rel='stylesheet' type='text/css'>
<link href='https://fonts.googleapis.com/css?family=Arimo' rel='stylesheet' type='text/css'>
<link href='https://fonts.googleapis.com/css?family=Hind:300' rel='stylesheet' type='text/css'>
<link href='https://fonts.googleapis.com/css?family=Open+Sans+Condensed:300' rel='stylesheet' type='text/css'>

<link href='https://fonts.googleapis.com/css?family=Merriweather' rel='stylesheet'>
<link href='https://fonts.googleapis.com/css?family=Josefin Sans' rel='stylesheet'>
<link href='https://fonts.googleapis.com/css?family=Montserrat' rel='stylesheet'>

<style>
.header {
     top:0;
```

```css
      margin:0px;
      left: 0px;
      right: 0px;
      position: fixed;
      background-color: #28272c;
      color: white;
      box-shadow: 0px 8px 4px grey;
      overflow: hidden;
      padding-left:20px;
      font-family: 'Josefin Sans';
      font-size: 2vw;
      width: 100%;
      height:8%;
      text-align: center;
    }
    .topnav {
  overflow: hidden;
  background-color: #333;
}

.topnav-right a {
  float: left;
  color: #f2f2f2;
  text-align: center;
  padding: 14px 16px;
  text-decoration: none;
  font-size: 18px;
}

.topnav-right a:hover {
  background-color: #ddd;
  color: black;
}

.topnav-right a.active {
  background-color: #565961;
  color: white;
}

.topnav-right {
  float: right;
  padding-right:100px;
```

```css
    }

    .login{
    margin-top:-70px;
    }
    body {

      background-color:#ffffff;
      background-repeat: no-repeat;
      background-size:cover;
      background-position: 0px 0px;
      }
    .main{
      margin-top:100px;
      text-align:center;
    }
    form { margin-left:400px;margin-right:400px;}

    input[type=text],
    input[type=email],input[type=number],input[type=password] {
      width: 100%;
      padding: 12px 20px;
      display: inline-block;
      margin-bottom:18px;
      border: 1px solid #ccc;
      box-sizing: border-box;
    }

    button {
      background-color: #07a2f5;
      color: white;
      padding: 14px 20px;
      margin-bottom:8px;
      border: none;
      cursor: pointer;
      width: 20%;
    }

    button:hover {
      opacity: 0.8;
    }
```

```css
.cancelbtn {
  width: auto;
  padding: 10px 18px;
  background-color: #f44336;
}

.imgcontainer {
  text-align: center;
  margin: 24px 0 12px 0;
}

img.avatar {
  width: 30%;
  border-radius: 50%;
}

.container {
  padding: 16px;
}

span.psw {
  float: right;
  padding-top: 16px;

}

/* Change styles for span and cancel button on extra small
screens */
@media screen and (max-width: 300px) {
  span.psw {
     display: block;
     float: none;
  }
  .cancelbtn {
     width: 100%;
  }
}

</style>
</head>

<body style="font-family:Montserrat;">
```

```html
<div class="header">
 <div style="width:50%;float:left;font-size:2vw;text-
align:left;color:white; padding-top:1%">Virtual eye</div>
   <div class="topnav-right" style="padding-top:0.5%;">

    <a  href="{{ url_for('home')}}">Home</a>
    <a href="{{ url_for('login')}}">Login</a>
    <a href="{{ url_for('register')}}">Register</a>
   </div>
</div>
<div class="main">
<h1>Successfully Logged Out!</h1>
<h3 style="color:#4CAF50">Login for more information<h3>

  <a href="{{ url_for('login') }}"><button
type="submit">Login</button></a>
</form>
</div>

</body>
</html>
```

Prediction.html

```html
<!DOCTYPE html>
<html lang="en">
<head>
    <meta charset="UTF-8">
    <meta http-equiv="X-UA-Compatible" content="IE=edge">
    <meta name="viewport" content="width=device-width, initial-
scale=1.0">
    <!--Bootstrap -->
    <link rel="stylesheet"
href="https://maxcdn.bootstrapcdn.com/bootstrap/4.0.0/css/boots
trap.min.css" integrity="sha384-
Gn5384xqQ1aoWXA+058RXPxPg6fy4IWvTNh0E263XmFcJlSAwiGgFAW/dAiS6JX
m" crossorigin="anonymous">
    <script src="https://code.jquery.com/jquery-
3.2.1.slim.min.js" integrity="sha384-
```

```html
KJ3o2DKtIkvYIK3UENzmM7KCkRr/rE9/Qpg6aAZGJwFDMVNA/GpGFF93hXpG5Kk
N" crossorigin="anonymous"></script>
    <script
src="https://cdnjs.cloudflare.com/ajax/libs/popper.js/1.12.9/um
d/popper.min.js" integrity="sha384-
ApNbgh9B+Y1QKtv3Rn7W3mgPxhU9K/ScQsAP7hUibX39j7fakFPskvXusvfa0b4
Q" crossorigin="anonymous"></script>
    <script
src="https://maxcdn.bootstrapcdn.com/bootstrap/4.0.0/js/bootstr
ap.min.js" integrity="sha384-
JZR6Spejh4U02d8jOt6vLEHfe/JQGiRRSQQxSfFWpi1MquVdAyjUar5+76PVCmY
l" crossorigin="anonymous"></script>


    <script src="https://kit.fontawesome.com/8b9cdc2059.js"
crossorigin="anonymous"></script>
    <link
href="https://fonts.googleapis.com/css2?family=Akronim&family=R
oboto&display=swap" rel="stylesheet">
    <link rel="stylesheet" href="../static/style.css">


    <script defer src="../static/js/JScript.js"></script>
    <title>Prediction</title>
</head>
<body>
    <header id="head" class="header">
        <section  id="navbar">
                <h1 class="nav-heading">Virtual Eye</h1>
            <div class="nav--items">
                <ul>
                    <li><a  href="{{
url_for('index')}}">Home</a></li>
                    <li><a href="{{
url_for('logout')}}">Logout</a></li>
                <!-- <li><a href="#about">About</a></li>
                <li><a href="#services">Services</a></li> -->

                </ul>
            </div>
        </section>
    </header>
    <!-- dataset/Training/metal/metal326.jpg -->
```

```html
</br>
<section id="prediction">
<h2 class="title text-muted">Virtual Eye- Life Guard for
Swimming Pools to Detect Active Drowning</h1>
<div class="line" style="width: 900px;"></div>
    </section>
    </br>
<section id="about">

<div class="body">
<div class="left">
<p>
    Swimming is one of the best exercises that helps people
to reduce stress in this urban lifestyle. Swimming pools are
found larger in number in the hotels, weekend tourist spots and
barely people have in their house backyard. Beginners,
especially often feel it difficult to breathe under water and
causes breathing trouble which in turn cause a drowning
accident. Worldwide, drowning produces a higher rate of
mortality without causing injury to children. Children under
six of their age are found to be suffering the highest drowning
mortality rates worldwide..Such kinds of deaths account for the
third  cause of unplanned death  globally, with about
1.2  million cases yearly.

    </p>
</div>
<div class="left">

    <div class="prediction-input">
        <img class="d-block w-100" src="https://sample-
sabari.s3.au-syd.cloud-object-storage.appdomain.cloud/ii.jpg"
alt="Second slide">
        </br>
                <form id="form" action="/result"
method="post"  enctype="multipart/form-data">

                    <input type="submit" class="submitbtn"
value="Click Me! For a Demo">
                </form>
        </div>
        <h5 style="text-color:yellow">
```

```html
                <b style="text-color:yellow"><b>
            </h5>
</div>
</div>

</section>

        </br></br>


    <section id="footer">


    </section>
</body>

</html>
```