Project Development Phase

Sprint 2

Team ID	PNT2022TMID03363
Project Name	Predicting the energy output of wind turbine based on weather condition

Predict.html

```
<html>
<head>
<meta charset="UTF-8" />
<meta name="viewport" content="width=device-width, initial-scale=1.0"</pre>
/> <meta http-equiv="X-UA-Compatible" content="ie=edge" />
k rel="stylesheet"
href="https://use.fontawesome.com/releases/v5.7.2/css/all.css"
integrity="sha384-
fnmOCqbTlWIlj8LyTjo7mOUStjsKC4pOpQbqyi7RrhN7udi9RwhKkMHpvLbH
G 9Sr" crossorigin="anonymous" />
<link href="https://fonts.googleapis.com/css?family=Dosis" rel="stylesheet"</pre>
/> k rel="stylesheet" href="{{ url_for('static', filename='css/style.css')}
}}"> <title>Wind Energy Prediction</title>
<style>
table {
    width: 100%;
    border-collapse: collapse;
}
```

```
.card {
       margin-right: auto;
       margin-left: 12%;
       width: 350px;
       box-shadow: 0 15px 25px rgba(129, 124, 124,
       0.2); border-radius: 10px;
       backdrop-filter: blur(14px);
       background-color: rgba(255, 255, 255,
       0.5); padding: 15px;
       text-align: center;
     }
     .second{
       top:80px;
       bottom:0px;
       margin:0px;
       left: 0px;
       right: 0px;
       position: fixed;
       padding: 0px;
       width: 100%;
       font-family:Georgia, serif;
       color:black;
       font-size:20px;
     }
     .inside{
       top:80px;
```

```
bottom:0px;
 margin:0px;
 left: 60%;
 right: 0%;
 position: fixed;
  padding-left: 40px;
 padding-top:8%;
 padding-right:40px;
 font-family:Georgia, serif;
 color:#96f400;
 font-size:20px;
 text-align:justify;
.myButton{
   border: none;
   text-align: center;
   cursor: pointer;
   text-transform: uppercase;
   outline: none;
   overflow: hidden;
   color: #fff;
   font-weight: 700;
   font-size: 12px;
   background-color: #183a1d;
   padding: 10px 15px;
   margin: 0 auto;
```

```
box-shadow: 0 5px 15px rgba(0,0,0,0.20);
        margin-left:17%;
  input {
  width:50%;
  margin-bottom: 10px;
  background: #e1eedd;
  border: none;
  outline: none;
  padding: 10px;
  font-size: 13px;
  color: #6c493a;
  text-shadow:
  white; border:
  #6c493a;
  border-radius: 4px;
box-shadow: white; }
::placeholder {
color: black;
opacity: 1;
.navbar
{
  display: flex;
  align-items:
  center; padding:
```

```
20px;
  padding-left: 50px;
  padding-right:
  30px; padding-top:
  25px; line-height:
  1.3;
}
.left{
    top:80px;
      bottom:0px;
      margin:0px;
      left: 0%;
      right: 45.5%;
      position: fixed;
      padding-left: 10%;
      padding-top:5%;
      padding-right:40px;
      font-family:bold,Georgia, serif;
      color:rgb(255 204 0);;
      font-size:25px;
       align:center;
}
  select {
  width:50%;
  margin-bottom: 10px;
  background: white;
```

```
border: none;
  outline: none;
  padding: 10px;
  font-size: 13px;
  color: #183a1d;
  text-shadow: white;
  border: #6c493a;
  border-radius: 40px;
  box-shadow: white;
}
input:focus { box-shadow: inset 0 -5px 45px rgba(100,100,100,0.4), 0 1px 1px
rgba(255,255,255,0.2); }
table, th, td {
border: 1px solid rgb(86, 72, 128);
border-collapse: collapse;
color: #000ff0;
}
@media screen and (max-width: 500px) {
.left,
.second,
.third {
width: 70%;
}
</style>
</head>
```

```
<body>
<div class="full-page">
<div class="navbar">
<div>
<a href="{{url_for('home')}}}">Wind
Energy<br/><abel>&nbsp;&nbsp;Renewable Energy is Our Fate!</label></a>
</div>
<nav>
<a href="{{url_for('predict')}}">Predict</a>
<a href="{{url_for('about')}}">About</a>
<a href={{url_for('services')}}>Services</a>
<a href={{url_for('contact')}}>Contact</a>
</nav>
</div>
</div>
<div class="second">
<div class="left">
Give
your city name to know the weather conditions
<div style="margin-left:25%">
<form action="{{ url_for('windapi')}}"method="post" >
<select name="city" required >
<option value="" selected>select City</option>
<option value ="Agartala" > Agartala </option>
<option value ="Aizawl" > Aizawl </option>
```

```
<option value ="Bengaluru" > Bengaluru </option>
<option value ="Bhopal" > Bhopal 
<option value ="Bhubaneswar" > Bhubaneswar 
<option value ="Chandigarh" > Chandigarh 
<option value ="Chennai" > Chennai 
<option value ="Daman" > Daman 
<option value ="Dehradun" > Dehradun </option>
<option value ="Delhi" > Delhi 
<option value ="Dispur" > Dispur </option>
<option value ="Gandhinagar" > Gandhinagar 
<option value ="Gangtok" > Gangtok </option>
<option value ="Hyderabad" > Hyderabad </option>
<option value ="Imphal" > Imphal </option>
<option value ="Itanagar" > Itanagar </option>
<option value ="Jaipur" > Jaipur 
<option value ="Kavaratti" > Kavaratti 
<option value ="Kohima" > Kohima </option>
<option value ="Kolkata" > Kolkata 
<option value ="Lucknow" > Lucknow </option>
<option value ="Mumbai" > Mumbai 
<option value ="Panaji" > Panaji 
<option value ="Patna" > Patna </option>
<option value ="Pondicherry" > Pondicherry </option>
<option value ="Port Blair" > Port Blair 
<option value ="Raipur" > Raipur </option>
<option value ="Ranchi" > Ranchi </option>
```

```
<option value ="Shillong" > Shillong </option>
<option value ="Shimla" > Shimla </option>
<option value ="Silvassa" > Silvassa </option>
<option value ="Srinagar" > Srinagar </option>
<option value ="Thiruvananthapuram"> Thiruvananthapuram 
<option value ="Tirupati" > Tirupati </option>
</select><br><br>
<div style="margin-left:-20%"><button type="submit" class="myButton" >Check
the Weather Conditions</br/>/button></div>
</form>
</div>
 <hr>
<div class="card">
border-spacing:25px;"> 
The weather conditions of the city
are
>
Temperature{{temp}}
>
Humidity{{humid}}}
>
Pressure{{pressure}}
```

```
>
Wind Speed<{d>{speed}}
</div>
</div>
<div class="inside">
<div style="font-size:23px;font-weight:bold;">Predict the Wind
Energy!!</div> <br><br>
<form action="{{ url_for('y_predict')}}"method="post">
<input type="text" name="theo" placeholder="Theoretical Power in KWh"</pre>
required="required" />
<input type="text" name="wind" placeholder="Wind Speed in m/s"</pre>
required="required" /><br><br>
<button type="submit" class="myButton"</pre>
>Predict</button> </form>
<br>
<br>
{{ prediction_text }}
</div>
</div>
</body>
</html>
```

Style.css

```
{
  margin: 0;
  padding: 0;
  box-sizing: border-box;
}
.full-page
{
  height: 100%;
  width: 100%;
  background-image: linear
  gradient(rgba(0,0,0,0.1), rgba(0,0,0,0.2)), url("/static/images/windmill.jpg")
  ; background-position: center;
  background-size: cover;
  position: absolute;
.navbar
{
  display: flex;
  align-items: center;
  padding: 20px;
  padding-left: 50px;
  padding-right: 30px;
  padding-top: 30px;
```

```
line-height: 0.8;
}
nav
{
  flex: 1;
  text-align: right;
}
nav ul
{
  display: inline-block;
  list-style: none;
}
nav ul li
{
  display:
  inline-block;
  margin-right: 50px;
}
nav ul li a
{
  text-decoration:
  none; font-size:
  20px;
  color: white;
  font-family:
sans-serif; }
```

```
nav ul li button
{
  font-size: 20px;
  color: white;
  outline: none;
  border: none;
  background:
  transparent; cursor:
  pointer;
  font-family:
sans-serif; }
nav ul li button:hover
{
  color: aqua;
}
nav ul li a:hover
  color: aqua;
}
.navbar a:hover
{
  color: aqua;
}
.navbar a
label:hover {
  color: aqua;
```

```
}
a
{
  text-decoration:
  none; color: white;
  font-size: 30px;
}
label
{
  text-decoration:
  none; color: white;
  font-size: 15px;
}
```

Prediction Page:

