

## Module 2: Creating and Styling HTML Pages

### Lab: Creating and Styling HTML5 Pages

#### Exercise 1: Creating HTML5 Pages

##### Task 1: Create a new ASP.NET web application

1. Open **Visual Studio 2012**.
2. In Visual Studio, on the **File** menu, point to **New**, and then click **Project**.
3. In the **New Project** dialog box, in the left pane, under **Templates** expand the **Visual Basic**, and then click the **Web** node.
4. In the middle pane, click **ASP.NET Empty Web Application**.
5. In the Name box, type **ContosoConf**.
6. In the Location box, type **C:\\_HTML5Training\Mod02\Labfiles\Starter\Exercise 1**, and then click **OK**.

##### Task 2: Add the Home page

1. In Visual Studio, on the Project menu, click **Add New Item**.
2. In the **Add New Item – ContosoConf** dialog box, click **HTML Page**.
3. In the **Name** box, type **index.htm**.
4. Click **Add**.
5. Using Notepad, open **index.txt** file located in the **C:\\_HTML5Training\Mod02\Labfiles\Starter\Exercise 1\Resources** folder.
6. In Visual Studio, return to the Design View window displaying the Source view for the index.htm file.
7. Inside the <title> element, add the following text from the header section of the index.txt file:

```
ContosoConf
```

8. Inside the <body> element, add the following HTML markup, with the text also from the header section of the index.txt file:

```
<header>
  <h1>ContosoConf</h1>
  <p>A two-track conference on the latest HTML5 developments</p>
</header>
```

9. After the </header> element and before the </body> element, add the following HTML markup with the text taken from the content section of the index.txt file:

```
<section>
  <p>
    The web keeps evolving. There's a wealth of new technologies to keep up with! ContosoConf is
    an in-depth exploration of HTML5, CSS3 and JavaScript, in the heart of Seattle, WA.
  </p>
  <p>
    Don't miss the best speakers in the business, talking about the future of the web.
  </p>
</section>
```

10. After the body text that you have just added but before the </body> element, add the following HTML markup with the text also taken from the content section of the index.txt file:

```
<section>
  <h2>Featuring these excellent speakers</h2>
  <ul>
    <li>Melissa Kerr</li>
    <li>David Alexander</li>
    <li>Mark Hanson</li>
    <li>April Meyer</li>
  </ul>
</section>
```

11. After the body text that you have just added but before the </body> element, add the following HTML markup with the text also taken from the content section of the index.txt file:

```
<section>
  <h2>Thanks to our sponsors</h2>
  <ul>
    <li>Trey Research</li>
    <li>Litware, Inc</li>
    <li>Fourth Coffee</li>
    <li>Graphic Design Institute</li>
    <li>Southridge Video</li>
  </ul>
</section>
```

12. After the body text that you have just added but before the </body> element, add the following HTML markup with the text taken from the footer section of the index.txt file:

```
<footer>
  <p>
    Hosted by Contoso
  </p>
  <address>
    Conference Center<br />
    3 Somewhere Street<br />
    Seattle<br />
    WA 98999
  </address>
  <p>
    © 2012 Contoso
  </p>
</footer>
```

**Note:** Be sure to replace the © symbol with the value &#169;

13. Close Notepad.

### Task 3: Add images to the Home Page

1. On the Windows Taskbar, click **File Explorer**.
2. In Internet Explorer, browse to the **C:\\_HTML5Training\Mod02\Labfiles\Starter\Exercise 1\Resources** folder.
3. Drag and drop the **images** folder onto the **ContosoConf** project in the Visual Studio Solution Explorer window.
4. In the Design View window displaying the Source view for the index.htm file, replace the text **Melissa Kerr** with the following HTML markup:

```
  
Melissa Kerr
```

5. Replace the text David Alexander with the following HTML markup:

```
  
David Alexander
```

6. Replace the text **Mark Hanson** with the following HTML markup:

```
  
Mark Hanson
```

7. Replace the text **April Meyer** with the following HTML markup:

```
  
April Meyer
```

8. Replace the text **Trey Research** with the following HTML markup:

```

```

9. Replace the text **Litware, Inc** with the following HTML markup:

```

```

10. Replace the text **Fourth Coffee** with the following HTML markup:

```

```

11. Replace the text **Graphic Design Institute** with the following HTML markup:

```

```

12. Replace the text **Southridge Video** with the following HTML markup:

```

```

#### Task 4: Add the About page

1. In Visual Studio, on the **Project** menu, click **Add New Item**.
2. In the **Add New Item – ContosoConf** dialog box, click **HTML Page**.
3. In the **Name** box, type **about.htm**.
4. Click **Add**.
5. Using Notepad, open **about.txt** file located in the **C:\\_HTML5Training\Mod02\Labfiles\Starter\Exercise1\Resources** folder.
6. In Visual Studio, return to the Design View window displaying the **Source** view for the about.htm file.
7. Inside the **<title>** element, add the following text from the header section of the about.txt file:

```
About ContosoConf
```

8. Inside the **<body>** element, add the following HTML markup copied from the index.htm page:

```
<header>
<h1>ContosoConf</h1>
<p>A two-track conference on the latest HTML5 developments</p>
</header>
```

9. After the **</header>** element and before the **</body>** element, add the following HTML markup with the text taken from the **about.txt** file:

```
<article>
  <h1>ContosoConf brings web designers and developers together</h1>
  <section>
    <p>
      Since the very first Contoso Conf back in 2009, we've been guided by three principles:
    </p>
    <ol>
      <li>Community Matters</li>
      <li>Never Stop Learning</li>
      <li>Have fun!</li>
    </ol>
    <p>
      Lorem ipsum dolor sit amet, consectetur adipiscing elit. Sed vitae enim arcu, vitae
      aliquet purus.
      Aenean rhoncus diam et orci porttitor fringilla. In porta lacus a turpis pretium placerat.
      Cras viverra
      enim eu nibh pretium ornare. Praesent et adipiscing turpis. Duis mi risus, ornare at
      bibendum a,
      ullamcorper vel tellus. Nulla in egestas velit. Aenean consequat mi sed tellus iaculis
      laoreet. Donec et
      odio vel felis commodo porttitor.
    </p>
  <p>
```

```

Aenean id ligula est. Pellentesque ut magna ligula. Donec nunc eros,tincidunt sit amet
sollicitudin
in, semper id mauris. Phasellus odio nulla, molestie ac gravida sed, dignissim in nisl.
Nunc luctus
lobortis massa at dapibus. Aenean turpis nibh, hendrerit nec congue et, elementum a
justo. Aenean sit amet nulla odio. Cras feugiat porta risus nec pretium.
</p>
<h2>What's It All About?</h2>
<p>
Donec vel sem ut dui vulputate porta. Phasellus imperdiet sapien a arcu adipiscing
vitae adipiscing
elit pharetra. Donec sed ante ut eros mattis bibendum non in erat. Donec sagittis,
massa eu accumsan
eleifend, eros justo cursus justo, id consequat mauris diam id magna. Vivamus quis
tortor massa. Nam ipsum metus,
dapibus ac facilisis sit amet, ullamcorper quis risus. Integer aliquot eleifend accumsan.
</p>
<blockquote>I had a fantastic time and learnt so much!</blockquote>
<p>
Pellentesque facilisis blandit augue id rhoncus. Sed facilisis varius lectus, eget
commodo purus dapibus
nec. In hac habitasse platea dictumst. Etiam imperdiet facilisis malesuada. Nunc
semper venenatis elit ac
lobortis. Duis lorem lorem, pharetra ut scelerisque nec, consequat sed risus. Morbi
rutrum nisl ut ipsum
consectetur porttitor. Phasellus sed nunc id diam tempus congue in a leo.
</p>
<p>
Proin feugiat, turpis id tempor tempor, lorem libero malesuada.
</p>
</section>
</article>

```

10. Inside the **<body>** element, add the following HTML markup copied from the index.htm page:

```

<footer>
  <p>
    Hosted by Contoso
  </p>
  <address>
    Conference Center<br />
    3 Somewhere Street<br />
    Seattle<br />
    WA 98343
  </address>
  <p>
    © 2012 Contoso
  </p>

```

```
</footer>
```

11. Close Notepad.

#### Task 5: Add navigation links

1. In Solution Explorer, double-click **index.htm**.
2. In the **<body>** element, before the **<header>** element, insert the following HTML markup:

```
<nav>  
<a href="/index.htm">Home</a>  
<a href="/about.htm">About</a>  
</nav>
```

3. In Solution Explorer, double-click **about.htm**.
4. In the **<body>** element, before the **<header>** element, insert the following HTML markup:

```
<nav>  
<a href="/index.htm">Home</a>  
<a href="/about.htm">About</a>  
</nav>
```

#### Task 6: Run the web application

1. In Solution Explorer, double-click **index.htm**.
2. On the **Debug** menu, click **Start Debugging**.
3. In Internet Explorer, if the message **Intranet settings are turned off by default** appears, click **Don't show this message again**.
4. Verify that the Home page is displayed.
5. Click the **About** link.
6. Verify that the About page is displayed.
7. Click the **Home** link.
8. Verify that the Home page is displayed.
9. Close Internet Explorer and return to Visual Studio.

**Results:** After completing this exercise, you will have built a simple HTML5 web application with a Home page and an About page.

## Exercise 2: Styling HTML pages

### Task 1: Create a new style sheet

1. In the Solution Explorer, click the **ContosoConf** project node.
2. On the **Project** menu, click **New Folder**.
3. In Solution Explorer, change the name of the folder to **styles**.
4. On the **Project** menu, click **Add New Item**.
5. In the **Add New Item – ContosoConf** dialog box, click **Style Sheet**.
6. In the **Name** box, type **site.css**.
7. Click **Add**.
8. In Solution Explorer, double-click **index.htm**.
9. After the title but before the **</head>** element, insert the following HTML markup:

```
<link href="/styles/site.css" rel="stylesheet" type="text/css" />
```

10. In Solution Explorer, double-click **about.htm**.
11. After the title but before the **</head>** element, insert the following HTML markup:

```
<link href="/styles/site.css" rel="stylesheet" type="text/css" />
```

### Task 2: Add CSS rules to style the pages

1. In the Visual Studio Solution Explorer, double-click **site.css**.
2. Delete all existing CSS content.
3. Insert the following CSS code:

```
html {  
    /* font-size 62.5% makes 1rem equal 10px for easy size calculations. */  
    font-size: 62.5%;  
    font-family: Calibri, Arial, sans-serif;  
    background-color: #EAEFEFA;  
}  
body {  
    margin: 0;  
    /* Default font-size to about 18px */  
    font-size: 1.8rem;  
}  
.container {  
    padding: 0 1rem;  
    max-width: 94rem;  
    /* Horizontally center containers */  
    margin: 0 auto;  
}  
nav {  
    background-color: #1d1d1d;  
    line-height: 6rem;
```

```

    font-size: 1.7rem;
}
nav a {
    color: #fff;
    padding: 1rem;
}
h1 {
    font-size: 4rem;
    letter-spacing: -1px;
    margin: 1em 0 .25em 0;
}

```

4. In Solution Explorer, double-click **index.htm**.

5. Replace the contents of the **<nav>** element with the following HTML markup:

```

<div class="container">
    <a href="/index.htm">Home</a>
    <a href="/about.htm">About</a>
</div>

```

6. After the **</nav>** element and before the **<header>** element, insert the following HTML markup:

```

<div class="container">

```

7. Before the **</body>** element, insert the following HTML markup to close the **<div>** element:

```

</div>

```

8. In Solution Explorer, double-click **about.htm**.

9. Replace the contents of the **<nav>** element with the following HTML markup:

```

<div class="container">
    <a href="/index.htm">Home</a>
    <a href="/about.htm">About</a>
</div>

```

10. After the **</nav>** element and before the **<header>** element, insert the following HTML markup:

```

<div class="container">

```

11. Before the **</body>** element, insert the following HTML markup to close the **<div>** element:

```

</div>

```



**Task 3: Run the web application**

1. On the **Debug** menu, click **Start Without Debugging**.
2. In Internet Explorer, verify that the About page matches the styling shown by the image in the previous task.
3. Move to the Home page, and verify that the styling is consistent with the About page.
4. Close Internet Explorer.

**Results:** After completing this exercise, you will have used CSS rules to style the Home and About pages.