Knowledge Assessment

Fill in the Blank

*Complete the following sentences by writing the correct word or words in the blanks provided.*

**1.** In the HTML anchor tag (<a>), the attribute specifies the target URL.

**2.** You can put CSS code in a separate file and link it to a Web page through use of the HTML

element.

**3.** The JavaScript code on a Web page is executed on the .

**4.** You can use a (n) element to display a specific message to users when their browser is not running JavaScript.

**5.** You can disable View State at the page level by setting the attribute of the Page directive to false in the ASP.NET page.

**6.** The state is used to store data that is used globally throughout an application, as opposed to the state, which stores data for a user session.

**7.** A Web application is accessed using a (n) name instead of a physical folder name.

**8.** You must mark classes with the attribute to expose them as a Web service.

**9.** Of all the methods in a Web service class, only those marked with attributes are exposed as Web service methods.

**10.** SOAP relies on as its message format and uses for message transmission.

Multiple Choice

*Circle the letter that corresponds to the best answer.*

**1.** You write the following code for your Web page:

<html>

<head>

<title>Sample Page</title>

<style type="text/css">

Div

{

font-family: Verdana;

font-size: 9pt;

}

</style>

</head>

<body>

<div style=

"font-weight: bold; font-size: 12pt;"> Sample Text</div>

</body>

</html>

What would be the style for text displayed as part of the <div> element?

**a.** Font family: Verdana; font weight: bold; font size: 12pt

**b.** Font family: Verdana; font weight: bold; font size: 9pt

**c.** Font family: Verdana; font size: 12pt

**d.** Font family: Verdana; font size: 9pt

**2**. You are developing a mapping Web site that allows users to interactively explore maps using actions such as panning and zooming. You want the Web site to be responsive and accessible in most modern Web browsers. However, you do not want users to need to install additional plug-ins in order to use your Web site. Which of the following technologies should you use to display maps?

a. HTML

b. Server-side programming technology such as ASP.NET

c. Adobe Flash

d. JavaScript

3. Your ASP.NET page contains a page-level variable of Customer type. You want to pre- serve the value of this variable across page post-backs, but you do not need this variable in any other page in the application. Which of the following state-management techniques is the best way to achieve this?

a. Query strings

b. Cookies

c. View State

d. Session

**4.** You are developing a Web application for an online bank. Your application enables users to access their account information and transactions from within a Web browser. When a user logs onto the Web application, you want to show the username and account balance on all pages of the application until the user logs off. You also want this application to be safe from malicious users. Which of the following state-management techniques should you use?

a. Cookies

b. View State

c. View State with encryption

d. Session

**5.** You are developing a Web form to display weather information. When a user requests the Web form, the form needs to perform some initialization to change its appearance and assign values to some controls. Where should you put the code?

a. In the Pre-Init event handler of the Page class

b. In the Init event handler of the Page class

c. In the Load event handler of the Page class

d. In the Pre-Render event handler of the Page class

**6.** You want to display values of the C# expressions in an ASP.NET page. Which of the following types of code blocks should you use to enclose the expression?

a. <script run at=“server”>…</script>

b. <script>…</script>

c. <%= … %>

d. <form>…</form>

**7**. You have developed a timesheet application that will be used by all employees in your company. You used ASP.NET to develop this application and have deployed it on the company’s Web server. What must all employees of the company install on their computers before they can access the timesheet application?

a. .NET Framework Redistributable

b. .NET Framework Software Development Kit

c. Visual Studio

d. A Web browser

**8**. Your client application calls for a Web service that performs complex, time-consuming calculations. A user complains that while results are being returned, the user interface freezes momentarily. Which approach should you take to solve this issue?

a. You should install a better processor on the Web server.

b. You should install a better processor on the client computer.

c. You should upgrade to a faster Internet connection.

d. You should use asynchronous calls to invoke the Web service.

**9.** You have created an ASP.NET Web service that converts one currency into another. One of the methods in your Web service is defined with the following code:

Public double Convert (double amount, string from, string to)

{

// code to perform currency conversion

}

The users of the Web service report that they can set a reference to the Web service but the Convert method is not available to them. What could be the problem?

a. The .asmx file for the Web service is not available on the Web server.

b. The Web service class is not marked with the Web Service attribute.

c. The Convert method is not marked with the Web Method attribute.

d. Web services can only expose methods that return text values.

**10.** You are working on two Visual Studio projects. The first project is a Web service that returns a Data Set object belonging to the System.Data namespace. The second project accesses the Web service created by the first project. Which project in this scenario requires a reference to the System.Data namespace?

**a.** The Web service project

**b.** The client project that accesses the Web service

**c.** Both the client project and the Web service project

**d.** Neither the client project nor the Web service project

Competency Assessment

Scenario 4-1: Using JavaScript and HTML

You are developing a Web page that provides a responsive user interface. You decide to display an image on the page. When the user moves his or her mouse over the image, the original image is replaced with a new image. Then, when the mouse moves out of the image area, the original image is displayed again. You hope to accomplish this using client-side JavaScript and HTML code. How would you create a Web page that works as described here?

Scenario 4-2: Using Query Strings

You are developing a portion of a Web site that allows users to enter their name and email address to subscribe to an email newsletter. Your solution consists of two Web pages. The first page collects the user name and email address and then transfers control to a second page.

The second page accepts the name and the email address as query-string parameters and displays a confirmation message to the user. You need to write code for these two pages. What code will you write to accomplish this requirement?

Proficiency Assessment

Scenario 4-3: Calling a Web Service Asynchronously

The proxy class generated by Visual Studio for a Web service includes methods for calling the Web service synchronously as well as asynchronously. By default, the application uses the synchronous method. If you prefer asynchronous invocation, you need to call the asynchronous version of the method. The asynchronous versions do not wait for the Web service to return a response and use a callback mechanism to get a response when it is ready. Asynchronous invocation of a Web service may help client applications be more responsive. If you want to call the To Lower method of the previously created Text Web Service in an asynchronous fashion. What code would you write for asynchronously invoking a Web service?

Scenario 4-4: Using Session State

You are developing a portion of a Web site that allows users to enter their name and email address to subscribe to an email newsletter. Your solution consists of two Web pages. The first page collects the user name and email address, adds them to the session state, and transfers control to a second page. The second page retrieves the name and the email address from the session state and displays a confirmation message. You need to write code for these two pages. What code will you write to accomplish this requirement?