

Practical No. 1

- ★ Title := Case Study
- ★ Date of Completion :=
- ★ Objective := To note down the evaluation results for different websites
- ★ Problem Statement := Before coding of the website, planning is important, students should visit different websites (Min. 5) for different client projects and note down the evaluation results for those websites, either good or bad website.
- ★ Conclusion := We learnt about different website design issues, which should be considered while developing a website.

Practical No. 1

Sr. No.	Website URL	Purpose of Website	Things liked in the website	Things disliked in the website	Overall evaluation of the website (Good/Bad)
1	https://www.wikipedia.org/	Online Encyclopedia	Simple UI design, User Friendly	N/A	Good
2	https://www.ebay.com/	Ecommerce	Interactive, Simple design, Easy Navigation	N/A	Good
3	https://www.apple.com/in/	Ecommerce	Interactive, User Friendly	N/A	Good
4	https://arngren.net/	Ecommerce	N/A	Cluttered	Bad
5	https://www.art.yale.edu/	Educational	User Friendly	Poor Presentation, Cluttered, Unattractive	Bad

Practical No. 2

- ★ Title := HTML & CSS
- ★ Date of Completion :=
- ★ Objective := To design web page for any client website
- ★ Problem statement := Implement a web page index.html for any client website (eg: restaurant website project) using following:-
 - 1) HTML syntax : heading tags, basic tags and attributes, frames, tables, images, lists, links for text and images, forms etc.
 - 2) Use of Internal CSS, Inline CSS, External CSS.
- ★ Software and Hardware Requirements := Notepad ++
- ★ Theory :=
 - A) HTML :- stands for Hyper Text Markup Language. HTML is markup language for creating web pages. It defines the way that images, multimedia and text are displayed in web browser.
 - B) CSS :- Cascading Style Sheet (CSS) is a simple mechanism for adding style to web documents.

style sheets are simple text files (.css) composed of lines of codes that tell browser how to display an HTML page.

There are 3 ways of inserting a style sheet.

- 1) Inline CSS
- 2) External CSS
- 3) Internal CSS

- 1) **Inline CSS:** It is written among rest of HTML code, similar to presentational tags.
Eg ⇒ `<p style="color:red; margin-right: 30px">`
This is web technology `</p>`
- 2) **External CSS:** It is ideal when style is applied to many pages. By creating an external CSS file that links to all the pages, we can update the appearance of our web pages by changing the values in just one file.
- 3) **Internal CSS:** It should be used when a single document has a unique style. We define Internal CSS in head section by using `<style>` tags.

★ Conclusion := We have implemented a web page using HTML and CSS.

Practical No. 2

Input :-

page1.html :

```
<!DOCTYPE html>
<html>
  <head>
    <title> WT Lab 2 </title>

    <meta name="description" content="Page Description Here"/>
    <meta http-equiv="Content-Type" content="text/html"; charset="utf-8"/>
    <meta name="viewport" content="width=device-width, initial-scale=1"/>

    <style>

      body {
        margin:0;
        padding:0;
        line-height: 1.5em;
      }

      /* ##### Navigation Bar ##### */

      ul {
        list-style-type: none;
        margin: 500;
        padding: 500;
        background-color: #000;
      }

      li {
        float: left;
        border-right: 1px solid #bbb;
      }

      li:last-child {
        border-right: none;
      }

      li a {
        display: block;
        color: white;
        text-align: left;
        padding: 14px 120px;
```

```

        text-decoration: none;
    }

    li a:hover:not(.active) {
        background-color:    #808080;
    }

    .active {
        background-color: #0099ff;
    }

</style>

</head>

<body>
    <a id="home"></a>
    <table width="100%" height="60" border="0" cellspacing="5"
cellpadding="5" bgcolor="#000000">
        <tr>
            <td align="left">
                <ul style="display: inline;font face="Verdana; text-
align="center";">
                    <li><a class="active"
href="#home">Home</a></li>
                    <li><a
href="C:\Users\OJUS\OneDrive\Desktop\ \WT\Lab\Practical 2\about Us.html"
target="blank_">About Us</a></li>
                    <li><a href="#services">Services</a></li>
                    <li><a href="#clients">Clients</a></li>
                    <li><a href="#contact">Contact</a></li>
                </ul>
            </td>
        </tr>
    </table>
    <a id="mail"></a>
    <table width="100%" height="150" border="0" cellspacing="5"
cellpadding="5" bgcolor="#F0F0F0">
        <tr>
            <td align="center">
                <table width="708" border="0" cellspacing="1"
cellpadding="1">
                    <tr>
                        <td width="400" align="left"><font

```

```

face="Verdana, Geneva, sans-serif" color="black" size="5"><strong>My
Business</strong><br>Web Page</font></td>
                                <td width="291" align="right"><font
face="Verdana, Geneva, sans-serif" color="black" size="5"><strong>Contact Us
Today!</strong><br>webdev@webdev.com</font></td>
                                </tr>
                                </table>
                                </td>
                                </tr>
                                </table>
                                <table width="100%" height="150" border="0" cellspacing="5"
cellpadding="5" bgcolor="#F0F0F0">
                                <tr>
                                <td align="center">
                                <table width="600" border="0" cellspacing="1"
cellpadding="1">
                                <tr>
                                <td align="center"></td>
                                </tr>
                                </table>
                                </td>
                                </tr>
                                </table>
                                <table width="100%" height="80" border="0" cellspacing="5"
cellpadding="5" bgcolor="white">
                                <tr>
                                <td height="70" align="center" valign="top">
                                <table width="730" border="0" cellspacing="1"
cellpadding="1" bgcolor="#FF9900">
                                <tr>
                                <td width="800" align="center"
nowrap><font face="Verdana, Geneva, sans-serif" color="white" size="6"><a
href="C:\Users\OJUS\OneDrive\Desktop\ \WT\Lab\Practical 2\page2.html"
target="blank_"><strong>Demo Web Page</strong></a></font></td>
                                </tr>
                                </table>
                                </td>
                                </tr>
                                </table>
                                <table width="100%" height="80" border="0" cellspacing="5"
cellpadding="5" bgcolor="white">
                                <tr>
                                <td height="70" align="center" valign="top">

```



```

        <table width="730" border="0" cellspacing="1"
cellpadding="1">
            <tr>
                <td width="800" align="center"><font
face="Verdana, Geneva, sans-serif" color="black" size="6">My Company Web
Page<strong><br>Dream. Plan. Create.</strong></font></td>
            </tr>
        </table>
    </td>
</tr>
</table>
<a id="contact"></a>
<table width="100%" height="80" border="0" cellspacing="5"
cellpadding="5" bgcolor="white">
    <tr>
        <td height="70" align="center" valign="top">
            <table width="730" border="0" cellspacing="1"
cellpadding="1" bgcolor="#FF9900">
                <tr>
                    <td width="800" align="center"
nowrap><font face="Verdana, Geneva, sans-serif" color="white" size="6"><a
href="#mail"><strong>Contact Us Today!</strong></a></font></td>
                </tr>
            </table>
        </td>
    </tr>
</table>
<table width="100%" height="80" border="0" cellspacing="5"
cellpadding="5" bgcolor="white">
    <tr>
        <td width="800" align="center" nowrap valign="top"><font
face="Verdana, Geneva, sans-serif" color="black" size="5"><strong>Register for our
Newsletter:</strong></font><br>
        <form name="contact" method="post"
action="send.php">
            <input type="text" name="email" />
            <input type="submit" name="button"
value="Submit" />
        </form>
    </td>
</tr>
</table>
<a id="services"></a>
<table width="100%" height="236" border="0" cellspacing="5"
cellpadding="5" bgcolor="white">
    <tr>

```

```

<td height="70" align="center">
    <table width="900" border="1"
bordercolor="#CCCCCC" cellspacing="1" cellpadding="1" align="center">
        <tr>
            <td width="300"><font
face="Verdana, Geneva, sans-serif" color="black"><strong><u>ABOUT
US</u></strong></font></td>
            <td width="300"><font
face="Verdana, Geneva, sans-serif" color="black"><strong><u>OUR
VISION</u></strong></font></td>
            <td width="300"><font
face="Verdana, Geneva, sans-serif"
color="black"><strong><u>SERVICES</u></strong></font></td>
        </tr>
        <tr>
            <td width="300"><font
face="Verdana, Geneva, sans-serif" color="black" size="2" >Web development
company</font></td>
            <td width="300"><font
face="Verdana, Geneva, sans-serif" color="black" size="2" >Web development for
profit</font></td>
            <td width="300">
                <font face="Verdana, Geneva,
sans-serif" color="black" size="2" >
                    <ul>
                        <li>IT
Management <br> Globalization</li>
                    </ul>
                </font>
            </td>
        </tr>
    </table>
</td>
</tr>
</table>
<table width="100%" height="60" border="0" cellspacing="5"
cellpadding="5" bgcolor="#000000">
    <tr>
        <td align="center"><font face="Verdana, Geneva, sans-
serif" color="white">Home - About - Services - Clients - Contact<br><br>Made By :-
<br>MyBusinessWebDev</font></td>
    </tr>
</table>
</body>
</html>

```

page2.html :

```
<!DOCTYPE html>
<html>
<head>
<meta charset="utf-8" />
<meta name="viewport" content="width=device-width, initial-scale=1">
<title>Demo Web Page</title>

<style>

    body {
        background: #222;
        margin-top: 20px;
        font-family: arial;
        color: white;
    }

    .thumbnails img {
        height: 80px;
        border: 4px solid #555;
        padding: 1px;
        margin: 0 10px 10px 0;
    }

    .thumbnails img:hover {
        border: 4px solid #00ccff;
    }

    .preview img {
        border: 4px solid #444;
        padding: 1px;
        width: 800px;
    }

</style>

</head>
<body>

<div id="container" align="center">

    <h1>My Web Page Gallery</h1>

    <br />
```

```
    <div class="thumbnails">
        
        
        
        
        
    </div>
```

```
<br/>
```

```
<div class="preview" align="center">
    
</div>
```

```
</div>
```

```
</body>
```

```
</html>
```


About Us.html :

```
<!DOCTYPE html>
<html>
<head>
<meta charset="utf-8" />
<meta name="viewport" content="width=device-width, initial-scale=1">
<title>About Us</title>

<style>

    body {
        margin:0;
        padding:0;
        line-height: 1.5em;
    }

    #header {
        background: black;
        font-family: Arial;
        height: 50px;
    }

    #contentwrapper {
        float: left;
        width: 100%;
    }

    #contentcolumn {
        margin: 0 230px 0 230px;
    }

    #leftcolumn {
        float: left;
        width: 230px;
        margin-left: -100%;
        background: #24C8FF;
    }

    #rightcolumn {
        float: left;
        width: 230px;
        margin-left: -230px;
        background: #FFFB00;
    }
```

```
.innertext {
    margin: 20px;
    font-family: Arial;
    color: #5E5E5E;
}

#footer {
    clear: left; /* Cannot float on Left */
    width: 100%;
    background: black;
    color: #FFF;
    font-family: Arial;
    text-align: center;
    padding: 4px;
}

/* ##### Responsive layout CSS ##### */

@media (max-width: 840px){ /* Drop Right Column Down */

#leftcolumn {
    margin-left: -100%;
}

#rightcolumn {
    float: none;
    width: 100%;
    margin-left: 0;
    clear: both;
}

#contentcolumn {
    margin-right: 0; /*Set margin to LeftColumnWidth*/
}

}

@media (max-width: 600px){ /* Drop Left Column Down */

#leftcolumn {
    float: none;
    width: 100%;
    clear: both;
    margin-left: 0;
}

}
```

```

        #contentcolumn {
            margin-left: 0;
        }
    }

</style>

</head>
<body>

<div id="container">

    <div id="header">

        <p style="color:white;text-align:center;font-size:40px;padding:10px">About Us</p>

    </div>

    <div id="contentwrapper">

        <div id="contentcolumn">

            <div class="innertext">

                <b>Welcome!</b> <br /> Contrary to popular belief, Lorem
                Ipsum is not simply random text. It has roots in a piece of classical Latin literature from 45
                BC, making it over 2000 years old. Richard McClintock, a Latin professor at Hampden-
                Sydney College in Virginia, looked up one of the more obscure Latin words, consectetur,
                from a Lorem Ipsum passage, and going through the cites of the word in classical
                literature, discovered the undoubtable source. Lorem Ipsum comes from sections 1.10.32
                and 1.10.33 of "de Finibus Bonorum et Malorum" (The Extremes of Good and Evil) by
                Cicero, written in 45 BC. This book is a treatise on the theory of ethics, very popular
                during the Renaissance. The first line of Lorem Ipsum, "Lorem ipsum dolor sit amet..",
                comes from a line in section 1.10.32.

                The standard chunk of Lorem Ipsum used since the 1500s is
                reproduced below for those interested. Sections 1.10.32 and 1.10.33 from "de Finibus
                Bonorum et Malorum" by Cicero are also reproduced in their exact original form,
                accompanied by English versions from the 1914 translation by H. Rackham.

            </div>

        </div>

    </div>

</div>

```

```
<div id="leftcolumn">
  <div class="innertext">
    <b>Left Column: <em>230px</em></b><br /> It is a long
established fact that a reader will be distracted by the readable content of a page when
looking at its layout. The point of using Lorem Ipsum is that it has a more-or-less normal
distribution of letters, as opposed to using 'Content here, content here', making it look like
readable English. Many desktop publishing packages and web page editors now use Lorem
Ipsum as their default model text, and a search for 'lorem ipsum' will uncover many web
sites still in their infancy. Various versions have evolved over the years, sometimes by
accident, sometimes on purpose (injected humour and the like).
  </div>
</div>

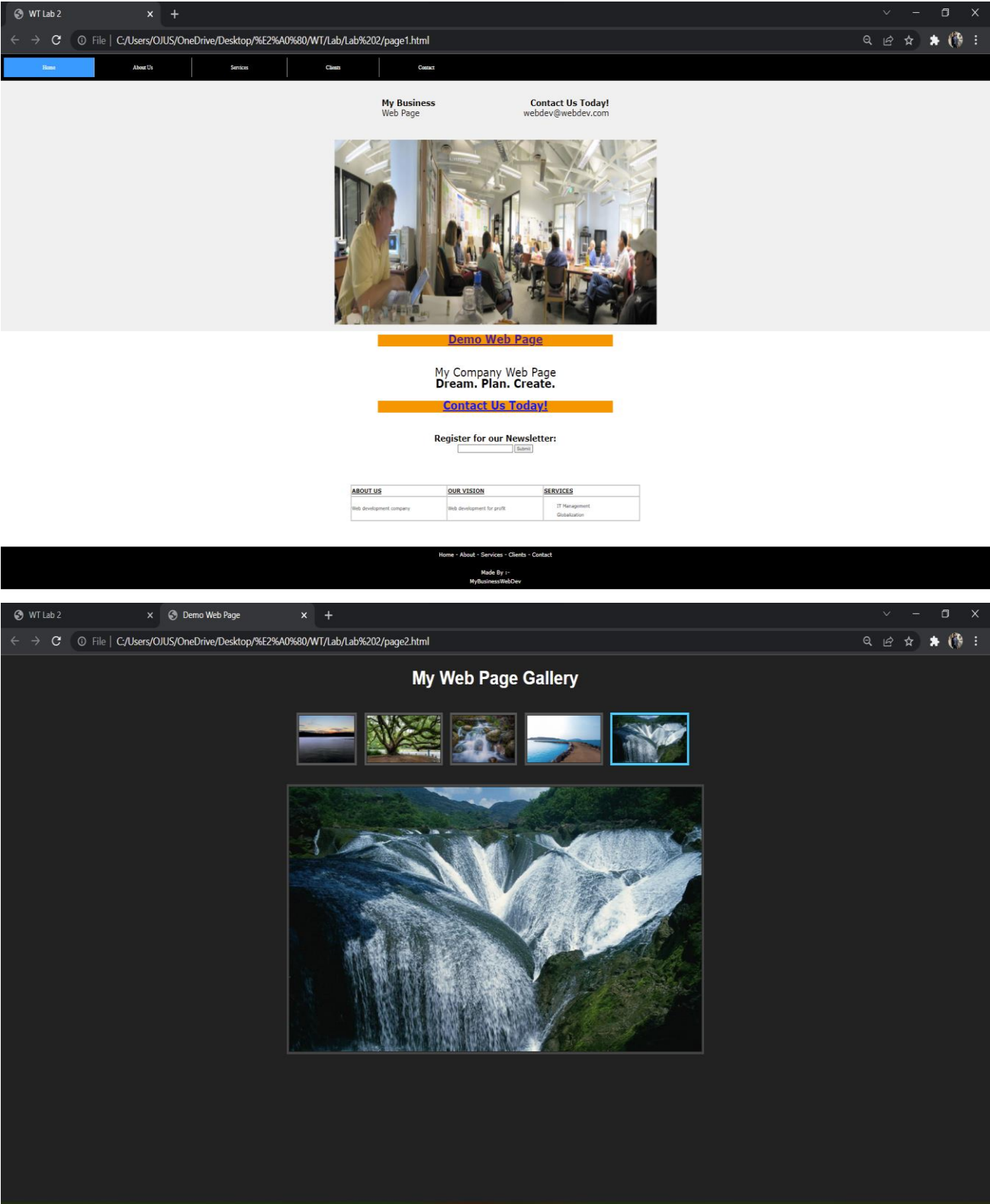
<div id="rightcolumn">
  <div class="innertext">
    <b>Right Column: <em>230px</em></b><br /> Lorem Ipsum is
simply dummy text of the printing and typesetting industry. Lorem Ipsum has been the
industry's standard dummy text ever since the 1500s, when an unknown printer took a
galley of type and scrambled it to make a type specimen book. It has survived not only five
centuries, but also the leap into electronic typesetting, remaining essentially unchanged. It
was popularised in the 1960s with the release of Letraset sheets containing Lorem Ipsum
passages, and more recently with desktop publishing software like Aldus PageMaker
including versions of Lorem Ipsum.
  </div>
</div>

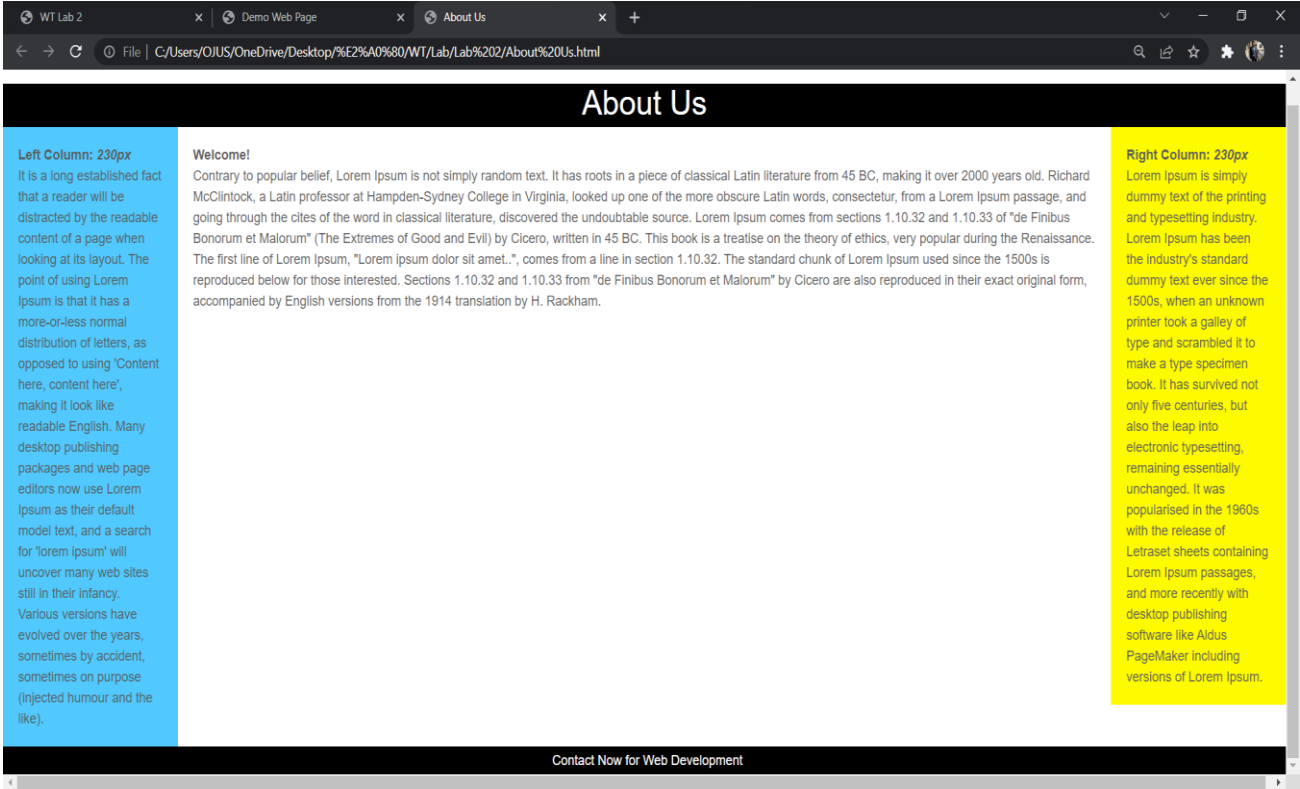
<div id="footer">Contact Now for Web Development</div>

</div>

</body>
</html>
```


Output :-





Practical No. 3

★ Title := XML and DTD

★ Date of Completion :=

★ Objective := To design the XML document.

★ Problem Statement := Design the XML document to store the information of the employees of an organization and demonstrate the use of

a) DTD

b) XML schema

And display the content in (eg: tabular format) by using CSS/XSL.

★ Software and Hardware Requirements := Notepad ++, Browser.

★ Theory :=

A) XML :- Stands for Extensible Markup Language. It is text based markup language that enables us to store data in a structured format by using meaningful tags. XML was designed to carry data not to display data.

- B) DTD :- Document Type Definition. The purpose of DTD is to define the structure of an XML document. It displays structure with a list of legal elements.
- C) XSL :- An XSL file is a style sheet that can be used to transform XML document types and to format the output. Since XML language does not use predefined tags, it is necessary to provide the web browser with information on how to interpret the XML document.
- * Conclusion :- We have designed the XML document and have used DTD and XML schema.

Practical No. 3

Input :-

Employee.xml :

```
<?xml version="1.0" encoding="UTF-8"?>
<?xml-stylesheet type="text/xsl" href="C:\Users\Acer\Downloads\style.xsl"?>
<!DOCTYPE catalog [
<!ELEMENT catalog (cd)>
<!ELEMENT cd (Emp_Name,Address,Age,company,Experience)>
<!ELEMENT Emp_Name (#PCDATA)>
<!ELEMENT Address (#PCDATA)>
<!ELEMENT Age (#PCDATA)>
<!ELEMENT company (#PCDATA)>
<!ELEMENT Experience (#PCDATA)>
]>
<catalog>
  <cd>
    <Emp_Name>Rohan</Emp_Name>
    <Address>Ravet</Address>
    <Age>26</Age>
    <company>Infosys</company>
    <Experience>10 years</Experience>
  </cd>
  <cd>
    <Emp_Name>Riya</Emp_Name>
    <Address>Akurdi</Address>
    <Age>25</Age>
    <company>TCS</company>
    <Experience>9 year</Experience>

  </cd>
  <cd>
    <Emp_Name>Meena</Emp_Name>
    <Address>Chinchwad</Address>
    <Age>30</Age>
    <company>RCA</company>
    <Experience>11 year</Experience>

  </cd>
  <cd>
    <Emp_Name>Meena</Emp_Name>
    <Address>Chinchwad</Address>
    <Age>30</Age>
```

```

    <company>RCA</company>
    <Experience>11 year</Experience>

</cd>
<cd>
</catalog>

```

Style.xsl :

```

<?xml version="1.0" encoding="UTF-8"?>
<xsl:stylesheet version="1.0" xmlns:xsl="http://www.w3.org/1999/XSL/Transform">
<xsl:template match="/">
<html>
<body>
<h2>Employee Details</h2>
<table border="1">
  <tr bgcolor="Red">
    <th style="text-align:left">Emp_Name</th>
    <th style="text-align:left">Address</th>

  </tr>
  <xsl:for-each select="catalog/cd">
    <tr>
      <td><xsl:value-of select="Emp_Name"/></td>
      <td><xsl:value-of select="Address"/></td>

    </tr>
  </xsl:for-each>
</table>
</body>
</html>
</xsl:template>
</xsl:stylesheet>

```

Output :-

Employee Details

Emp_Name	Address
Rohan	Ravet
Riya	Akurdi
Meena	Chinchwad
Geeta	Ravet
Salman	Pimpri
Reena	Sector
Seema	Akurdi
Raman	Ratangiri
Kavita	Pune
Heena	Pimpri
Ankit	Delhi road
Mamta	Pune

Practical No. 4

★ Title := Java Script

★ Date of Completion :=

★ Objective := To implement an application in Java Script

★ Problem Statement := Implement an application in JavaScript using following :-

- a) Design UI of application using HTML, CSS etc.
- b) Include JavaScript validation.
- c) Use of prompt and alert window using JavaScript.

★ Software and Hardware Requirements := Notepad++, Browser.

★ Theory := JavaScript is a lightweight, interpreted programming language with object oriented capability that allows us to build infrastructure of interaction into other static HTML pages.

The JavaScript code is executed when the user submits the form, and only if all the entries are valid, they would be submitted to the web server. It can be used to trap user-initiated events such as button clicks, links, navigation and other actions that the user explicitly initiates.

Advantages of JavaScript :-

- 1) Less server interaction
- 2) Immediate feedback to the visitors.

★ Conclusion :- We have implemented an application using JavaScript by providing proper validation.

Practical No. 4

Input :-

```
<!DOCTYPE html>
<html>
<head>
<title>
Calculator Program in JavaScript
</title>

<script>

function insert(num)
{
document.form1.textview.value = document.form1.textview.value + num;
}

function equal()
{
var exp = document.form1.textview.value;
if(exp)
{
document.form1.textview.value = eval(exp)
}
}

function backspace()
{
var exp = document.form1.textview.value;
document.form1.textview.value = exp.substring(0, exp.length - 1); /* remove the element
from total length ? 1 */
}

</script>

<style>

.formstyle
{
width: 300px;
height: 330px;
margin: 20px auto;
border: 3px solid skyblue;
border-radius: 5px;
padding: 20px;
text-align: center;
background-color: grey;
}
```

```

h1 {
    text-align: center;
    padding: 23px;
    background-color: skyblue;
    color: white;
}

```

```

input:hover
{
background-color: green;
}

```

```

*{
margin: 0;
padding: 0;
}

```

```

.btn{
width: 50px;
height: 50px;
font-size: 25px;
margin: 2px;
cursor: pointer;
background-color: red;
color: white;
}

```

```

.textview{
width: 223px;
margin: 5px;
font-size: 25px;
padding: 5px;
background-color: lightgreen;
}

```

```

</style>

```

```

</head>

```

```

<body>

```

```

<h1> Calculator Program in JavaScript </h1>

```

```

<div class= "formstyle">

```

```

<form name = "form1">

```

```

<input class= "textview" name = "textview">

```

```

</form>

```

```

<center>

```

```

<table >

```

```

<tr>

```

```

    <td> <input class = "btn" type = "button" value = "C" onclick =
"form1.textview.value = ' ' " > </td>

```

```

    <td> <input class = "btn" type = "button" value = "B" onclick = "backspace()" >

```

```

</td>
<td> <input class = "btn" type = "button" value = "/" onclick = "insert('/')" > </td>
<td> <input class = "btn" type = "button" value = "x" onclick = "insert('*')" > </td>
</tr>

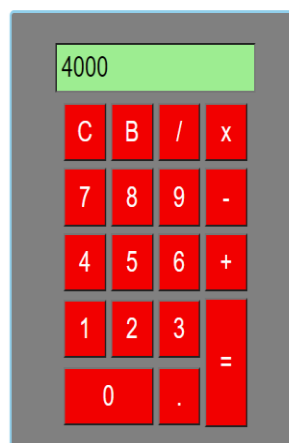
<tr>
<td> <input class = "btn" type = "button" value = "7" onclick = "insert(7)" > </td>
<td> <input class = "btn" type = "button" value = "8" onclick = "insert(8)" > </td>
<td> <input class = "btn" type = "button" value = "9" onclick = "insert(9)" > </td>
<td> <input class = "btn" type = "button" value = "-" onclick = "insert('-')" > </td>
</tr>

<tr>
<td> <input class = "btn" type = "button" value = "4" onclick = "insert(4)" > </td>
<td> <input class = "btn" type = "button" value = "5" onclick = "insert(5)" > </td>
<td> <input class = "btn" type = "button" value = "6" onclick = "insert(6)" > </td>
<td> <input class = "btn" type = "button" value = "+" onclick = "insert('+')" > </td>
</tr>

<tr>
<td> <input class = "btn" type = "button" value = "1" onclick = "insert(1)" > </td>
<td> <input class = "btn" type = "button" value = "2" onclick = "insert(2)" > </td>
<td> <input class = "btn" type = "button" value = "3" onclick = "insert(3)" > </td>
<td rowspan = 5> <input class = "btn" style = "height: 110px" type = "button"
value = "=" onclick = "equal()"> </td>
</tr>
<tr>
<td colspan = 2> <input class = "btn" style = "width: 106px" type = "button" value
= "0" onclick = "insert(0)" > </td>
<td> <input class = "btn" type = "button" value = "." onclick = "insert('.')"> </td>
</tr>
</table>
</center>
</div>
</body>
</html>

```

Output :-



Page No.
 Date

--	--	--	--

Practical No. 5

★ Title := Servlet

★ Date of Completion :=

★ Objective := To design sample program by using servlet.

★ Problem Statement := Implement sample program demonstrating the use of JSP.

Eg:- Create a database table ebookshop (book-id, book-title, book-author, book-price, quantity) using database like Oracle/MySQL etc. and display (use SQL select query), the table content using servlet.

★ Software and Hardware Requirements := Notepad ++, Browser.

★ Theory := A servlet is a Java programming language class that is used to extend the capabilities of servers that host applications accessed by means of a request-response programming model. Although servlets can respond to any type of request, they are commonly used to extend the applications hosted by web servers. For such applications, Java servlets technology defines HTTP specific servlet classes.

Teacher's Signature

The javax servlet and javax-servlet-http package provides interface and classes for writing servlets. The HttpServlet class provides methods such as doGet and doPost, for handling HTTP specific servlets.

★ Conclusion := We have designed a sample program by using servlet.