

CSE3002-Internet Web Programming-Lab7

Date:-13-09-2022

20BCE1184

Santhoshkumar

1. Write a JavaScript to

(i) Create a dynamic table with two rows and two columns

(ii) Change the color of the Button from red to green color on Mouse Over.

(iii) Change the color of the Textbox from green to yellow color on Focus and display a greeting message on Change

Note: Both button and textbox should be created using CreateElement

Code:-

```
<html>
<head>
<title> 20BCE1184_7.1</title>
</head>
<body>
<!--<input type="button" value="Generate Table" id = "Button6"
onclick="GenerateTable()" />-->
<hr />
<div id="dvTable"></div>
<script type="text/javascript">
const btn = document.createElement("button");
btn.setAttribute("id", "Button6");
btn.setAttribute("onclick", "GenerateTable()");
btn.innerHTML = "Button";
document.body.appendChild(btn);
const input = document.createElement("input");
input.setAttribute("type", "text");
input.setAttribute("id", "input");
document.body.appendChild(input);
window.onload = function() {
document.getElementById("Button6").onmouseover = function()
{
this.style.backgroundColor = "#7CFC00";
}
```

```
document.getElementById("Button6").onmouseout = function()
{
this.style.backgroundColor = "#FF0000";
}
document.getElementById("input").onfocus = function()
{
this.style.backgroundColor = "#FFFF00";
}
document.getElementById("input").onmouseout = function()
{
this.style.backgroundColor = "#7CFC00";
}
}

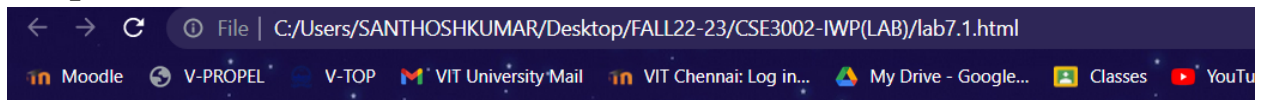
function GenerateTable() {
//Build an array containing Customer records.
var customers = new Array();
customers.push(["Customer Id", "Name"]);
customers.push([1, "Santhosh"]);
customers.push([2, "Kumar"]);
//Create a HTML Table element.
var table = document.createElement("TABLE");
table.border = "1";
//Get the count of columns.
var columnCount = customers[0].length;
//Add the header row.
var row = table.insertRow(-1);
for (var i = 0; i < columnCount; i++) {
var headerCell = document.createElement("TH");
headerCell.innerHTML = customers[0][i];
row.appendChild(headerCell);
}
//Add the data rows.
for (var i = 1; i < customers.length; i++) {
row = table.insertRow(-1);
for (var j = 0; j < columnCount; j++) {
var cell = row.insertCell(-1);
cell.innerHTML = customers[i][j];
}
}
var dvTable = document.getElementById("dvTable");
```

```

dvTable.innerHTML = "";
dvTable.appendChild(table);
}
GenerateTable();
</script>
</body>
</html>

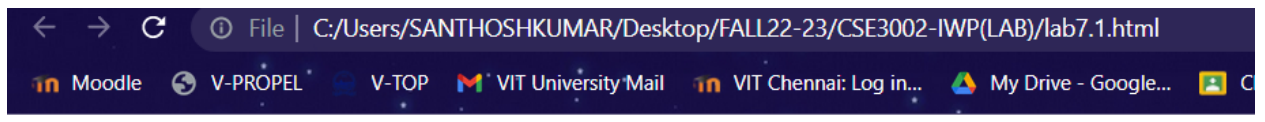
```

Output:-



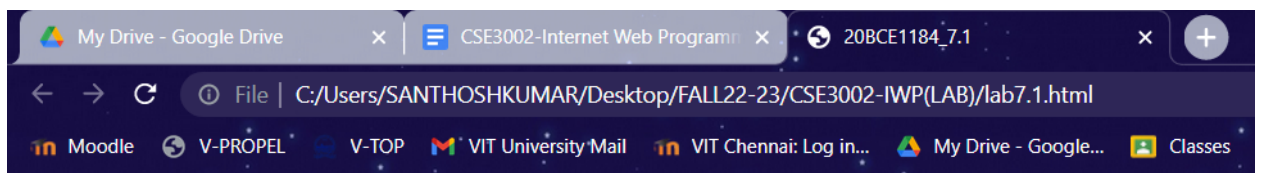
Customer Id	Name
1	Santhosh
2	Kumar

Button



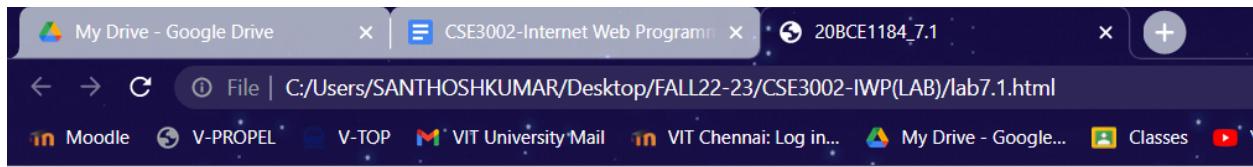
Customer Id	Name
1	Santhosh
2	Kumar

Button



Customer Id	Name
1	Santhosh
2	Kumar

Button



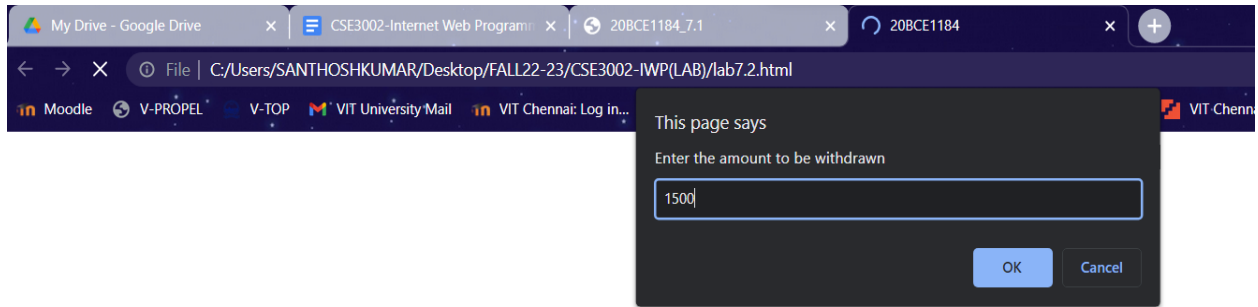
Customer Id	Name
1	Santhosh
2	Kumar
Button	

2. Devise a program to withdraw the amount from the bank account. While withdraw, the program should check the amount in the account. If the amount in the account is greater than the amount entered then raise the exception “Amount withdraw failure” else withdraw the amount.

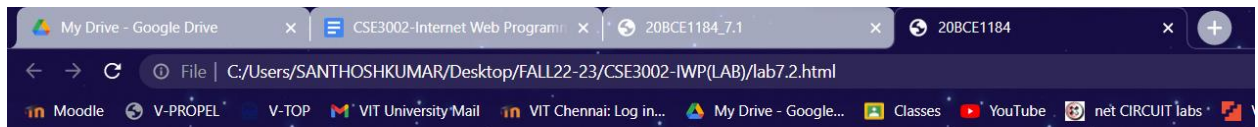
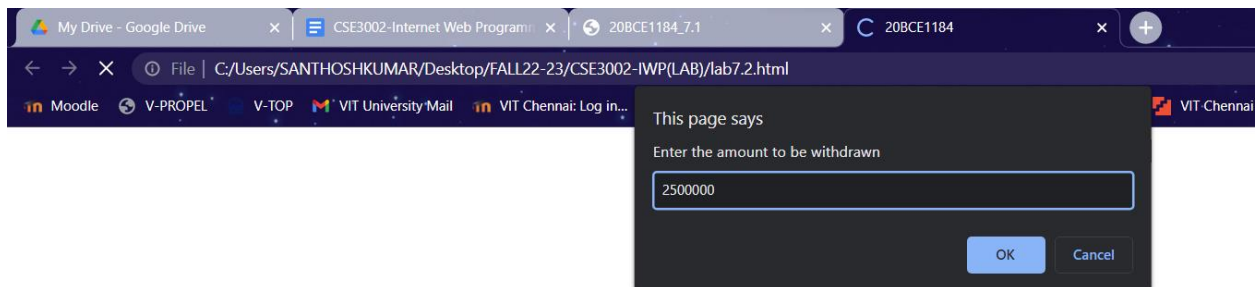
Code:-

```
<html>
<head>
<title>20BCE1184</title>
</head>
<body>
<script type="text/javascript">
var balance = 20000;
var x = prompt("Enter the amount to be withdrawn");
try{
if (x <= 20000){
balance -= x;
document.write("Cash of amount " + x + " withdrawn");
}else{
throw new Error("Error: Amount withdraw failure");
}
}catch(e){
document.write(e.message);
}
</script>
</body>
</html>
```

Output:-



Cash of amount 1500 withdrawn



Error: Amount withdraw failure

3. Design the below form and do the following

- (i) Set the timer to display the current time
- (ii) Print the form content
- (iii) Use `getElementByName` to display Gender, Country and Preferences
- (iv) Validate
 - (a) All Mandatory Fields (represented by *)
 - (b) Name should not exceed 15 characters
 - (c) Address – to be specified in Text Area
 - (d) Zip code should be numeric and validated the maximum digits
 - (e) Phone numbers should be numeric and validated the maximum digits 10
 - (f) e-mail syntax should be validated
 - (g) Password should contain a number, character & a special character and length should not exceed 15 and recede 8
 - (h) PAN card number – Textbox (validate such that the PAN number is 10 digits and follows the pattern)

Test JavaScript Form Validataion

Time:11:30:55

Name*

Please enter your name!

Address

Zip Code*

Country*

Please select... ▼

Gender*

☐ Male ☐ Female

Preferences*

☐ Red ☐ Green ☐ Blue

Phone*

Email*

password (6-8 characters)*

Verify password*

SEND

CLEAR

Pan No:

Code:-

Html code:-

```
<html>
<head>
<title>20BCE1446</title>
<link rel="stylesheet" href="styles.css">
<script src="script.js"></script>
</head>
<body>
<div>
<p id = "time" name="time"></p>
<h2>Test JavaScript Form Validation</h2>
<span id = "span"></span>
<form id="formTest" method="get" action="processData">
<table>
<tr>
<td><label for="txtName">Name<span
class="required">*</span></label></td>
<td><input type="text" id="txtName" name="name"></td>
<td id="elmNameError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td><label for="txtAddress">Address</label></td>
<td><input type="text" id="txtAddress" name="address"></td>
<td id="elmAddressError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td><label for="txtZipcode">Zip Code<span
class="required">*</span></label></td>
<td><input type="text" id="txtZipcode" name="zipcode"></td>
<td id="elmZipcodeError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td>Country<span class="required">*</span></td>
<td><select id="selCountry" name="country">
<option value="" selected>Please select...</option>
<option value="AA">India</option>
<option value="BB">Bangladesh</option>
<option value="CC">Germany</option>
</select></td>
<td id="elmCountryError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td>Gender<span class="required">*</span></td>
<td><label><input type="radio" name="gender" value="m">Male</label>
<label><input type="radio" name="gender"
```

```

value="f">Female</label></td>
<td>PAN No:<span class = "required"></span></td>
<td><label><input type = text></td>
<td id="elmGenderError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td>Preferences<span class="required">*</span></td>
<td><label><input type="checkbox" name="color" value="r">Red</label>
<label><input type="checkbox" name="color" value="g">Green</label>
<label><input type="checkbox" name="color"
value="b">Blue</label></td>
<td id="elmColorError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td><label for="txtPhone">Phone<span
class="required">*</span></label></td>
<td><input type="text" id="txtPhone" name="phone"></td>
<td id="elmPhoneError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td><label for="txtEmail">Email<span
class="required">*</span></label></td>
<td><input type="text" id="txtEmail" name="email"></td>
<td id="elmEmailError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td><label for="txtPassword">Password (6-8 characters)<span
class="required">*</span></label></td>
<td><input type="password" id="txtPassword" name="password"></td>
<td id="elmPasswordError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td><label for="txtPWVerified">Verify Password<span
class="required">*</span></label></td>
<td><input type="password" id="txtPWVerified" name="pwVerified"></td>
<td id="elmPWVerifiedError" class="errorMsg">&nbsp;</td></tr>
<tr>
<td>&nbsp;</td>
<td><input type="submit" value="SEND" id="btnSubmit">&nbsp;</td>
<td><input type="reset" value="CLEAR" id="btnReset"></td>
<td>&nbsp;</td></tr>
</table>
</form>
</div>
</body>

```



```
</html>
```

Css code:-

```
.required {
color: red;
}
.errorMsg {
color: red;
}
.errorBox {
border: 2px solid red;
}
table {
border: 0;
}
td {
margin: 0;
padding: 3px 10px;
}
#time{
text-align: center;
font-size: larger;
width: 150px;
height: 30px;
border: 2px solid black;
float: right;
margin-right: 15px;
}
div{
width: 800px;
border: 2px solid black;
}
```

Js code:-

```
window.onload = init;
setInterval(currentTime, 1000);
function currentTime() {
let date = new Date();
let hh = date.getHours();
```

```

let mm = date.getMinutes();
let ss = date.getSeconds();
let session = "AM";
if(hh == 0){
hh = 12;
}
if(hh > 12){
hh = hh - 12;
session = "PM";
}
hh = (hh < 10) ? "0" + hh : hh;
mm = (mm < 10) ? "0" + mm : mm;
ss = (ss < 10) ? "0" + ss : ss;
let time = "Time:" + hh + ":" + mm + ":" + ss + " " + session;
document.getElementById("time").innerText = time;
}
function init() {
document.getElementById("formTest").onsubmit = validateForm;
document.getElementById("btnReset").onclick = clearForm;
document.getElementById("txtName").focus();
}
function validateForm(theForm) {
with(theForm) {
return (isEmpty(txtName, "Please enter your name!",
elmNameError)
&& isNumeric(txtZipcode, "Please enter a 6-digit zip code!",
elmZipcodeError)
&& isLengthMinMax(txtZipcode, 6, 6, "Please enter a 6-digit zip
code!", elmZipcodeError)
&& isSelected(selCountry, "Please make a selection!",
elmCountryError)
&& isChecked("gender", "Please check a gender!", elmGenderError)
&& isChecked("color", "Please check a color!", elmColorError)
&& isNumeric(txtPhone, "Please enter a valid phone number!",
elmPhoneError)
&& isValidEmail(txtEmail, "Enter a valid email!", elmEmailError)
&& isValidPassword(txtPassword, "Password shall be 6-8
characters!", elmPasswordError)
&& verifyPassword(txtPassword, txtPWVerified, "Different from new
password!",

```

```

elmPWVerifiedError)
);
}
}

function postValidate(isValid, errMsg, errElm, inputElm) {
if (!isValid) {
if (errElm !== undefined && errElm !== null
&& errMsg !== undefined && errMsg !== null) {
errElm.innerHTML = errMsg;
}
if (inputElm !== undefined && inputElm !== null) {
inputElm.classList.add("errorBox");
inputElm.focus();
}
} else {
if (errElm !== undefined && errElm !== null) {
errElm.innerHTML = "";
}
if (inputElm !== undefined && inputElm !== null) {
inputElm.classList.remove("errorBox");
}
}
}

function isEmpty(inputElm, errMsg, errElm) {
var isValid = (inputElm.value.trim() !== "");
postValidate(isValid, errMsg, errElm, inputElm);
return isValid;
}

function isNumeric(inputElm, errMsg, errElm) {
var isValid = (inputElm.value.trim().match(/^\d+$/) !== null);
postValidate(isValid, errMsg, errElm, inputElm);
return isValid;
}

function isAlphabetic(inputElm, errMsg, errElm) {
var isValid = (inputElm.value.trim().match(/^[a-zA-Z]+$/) !== null) ;
postValidate(isValid, errMsg, errElm, inputElm);
return isValid;
}

function isAlphanumeric(inputElm, errMsg, errElm) {
var isValid = (inputElm.value.trim().match(/^[0-9a-zA-Z]+$/) !== null);

```

```

postValidate(isValid, errMsg, errElm, inputElm);
return isValid;
}

function isLengthMinMax(inputElm, minLength, maxLength, errMsg, errElm) {
var inputValue = inputElm.value.trim();
var isValid = (inputValue.length >= minLength) && (inputValue.length <=
maxLength);
postValidate(isValid, errMsg, errElm, inputElm);
return isValid;
}

function isValidEmail(inputElm, errMsg, errElm) {
var isValid = (inputElm.value.trim().match(
/^\w+([\.-]?\w+)*@\w+([\.-]?\w+)*(\.\w{2,3})+$/) !== null);
postValidate(isValid, errMsg, errElm, inputElm);
return isValid;
}

function isSelected(selectElm, errMsg, errElm) {
var isValid = (selectElm.value !== "");
postValidate(isValid, errMsg, errElm, selectElm);
return isValid;
}

function isChecked(inputName, errMsg, errElm) {
var elms = document.getElementsByName(inputName);
var isChecked = false;
for (var i = 0; i < elms.length; ++i) {
if (elms[i].checked) {
isChecked = true;
break;
}
}
postValidate(isChecked, errMsg, errElm, null);
return isChecked;
}

function isValidPassword(inputElm, errMsg, errElm) {
var isValid = (inputElm.value.trim().match(/^\w{6,8}$/) !== null);
postValidate(isValid, errMsg, errElm, inputElm);
return isValid;
}

function verifyPassword(pwElm, pwVerifiedElm, errMsg, errElm) {
var isTheSame = (pwElm.value === pwVerifiedElm.value);

```

```

postValidate(isTheSame, errMsg, errElm, pwVerifiedElm);
return isTheSame;
}

function clearForm() {
var elms = document.querySelectorAll('.errorBox');
for (var i = 0; i < elms.length; i++) {
elms[i].classList.remove("errorBox");
}

elms = document.querySelectorAll('[id$="Error"]');
for (var i = 0; i < elms.length; i++) {
elms[i].innerHTML = "";
}

document.getElementById("txtName").focus();
}

currentTime();

```

Output:-

20BCE1184_7.3

×

+

←

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🏠

🔒 127.0.0.1:5500/index.html

Test JavaScript Form Validation

Time:08:08:15 PM

Name*

Santhoshkumar

Address

uthangarai

Zip Code*

6352074

Please enter a 6-digit zip code!

Country*

India ▼

Gender*

☒ Male
☐ Female

PAN No:

Preferences*

☐ Red
☐ Green
☐ Blue

Phone*

09600210910

Email*

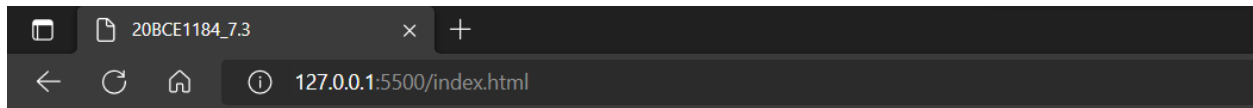
santhoshkumarrgs18@gma

Password (6-8 characters)*

Verify Password*

SEND

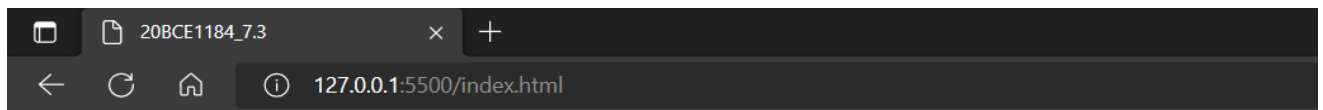
CLEAR



Test JavaScript Form Validation

Time:08:08:49 PM

Name*	<input type="text" value="Santhoshkumar"/>	
Address	<input type="text" value="uthangarai"/>	
Zip Code*	<input type="text" value="635207"/>	
Country*	<input type="text" value="India"/>	
Gender*	<input checked="" type="radio"/> Male <input type="radio"/> Female	PAN No: <input type="text"/>
Preferences*	<input type="checkbox"/> Red <input type="checkbox"/> Green <input type="checkbox"/> Blue	Please check a color!
Phone*	<input type="text" value="09600210910"/>	
Email*	<input type="text" value="santhoshkumarrgs18@gma"/>	
Password (6-8 characters)*	<input type="text"/>	
Verify Password*	<input type="text"/>	
<input type="button" value="SEND"/> <input type="button" value="CLEAR"/>		



Test JavaScript Form Validation

Time:08:18:37 PM

Name*

Address

Zip Code*

Country*

Gender* ☒ Male ☐ Female

PAN No:

Preferences* ☒ Red ☐ Green ☐ Blue

Phone*

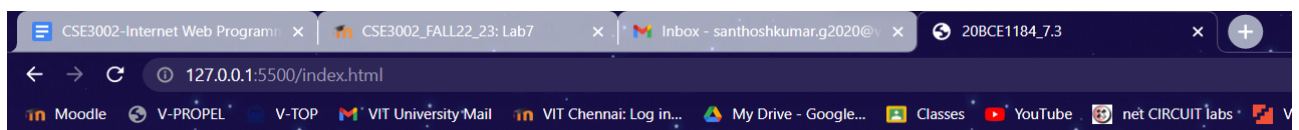
Email*

Password (6-8 characters)*

Verify Password*

Please enter a valid phone number!

Password shall be 6-8 characters!



Test JavaScript Form Validation

Time:08:25:07 PM

Name*

Address

Zip Code*

Country*

Gender* ☒ Male ☐ Female

PAN No:

Preferences* ☒ Red ☐ Green ☐ Blue

Phone*

Email*

Password (6-8 characters)*

Verify Password*

