

HTML

(1) creating our first webpage:

```

<!DOCTYPE html>
<html>
  <head>
    <meta charset="utf-8" />
    <title>This is my first webpage</title>
  </head>
  <body>
    I'm in the <body> now! <i>
    </body>
  </html>

```

(2) Line breaks, paragraphs & headings:

```

<body>
  <p> This is paragraph 1 </p>
  <br>
  <h1> </h1>
  <h2> </h2>
  <h3> </h3>

```

(3) Bold, italics & comments:

<**strong**> bold </**strong**>

<*em*> italics too </*em*>

<hr/>

<comment> --- comment --- </comment>

(4) Lists:

 keyboard

 mouse

 CSE

 EEE

 CIS

(5) Linking to another webpage

<body>

<p> Would you like to go to the Second page ? </p>

<h1> Home page </h1>

<p> Here search on this great website

 google </p>

</body>

Want to "Open" = click "Open" = click open

(6) Images:

<img alt="ashe.jpg" alt="ashe" width="1920"

height = "1080" />

(7) Directory structures

<dt> at <dt>

<dt> and <dt>

<dt> nvidia <dt>

(8) Audio tag :

```
<body>
  <audio controls autoplay loop>
    <source>
      <source src="garage.mp3" type="audio/mpeg"/>
```

can you see this?

```
<audio> muz.sloooop.www.l:ffff = fied
```

(9) video tag :

```
<video width="690" height="360" controls
  autoplay loop>
```

```
<source src="lol-gameplay.mp4" type="video/mp4"/>
```

"oset" = if you can see this, you need to update

```
</video>
```

(10) HTML table:

```
<body>
```

```
<table border="1">
```

```
<tr>
```

```
  <th> ID </th>
```

```
  <th> Name </th>
```

```
  <th> Address </th>
```

<tr>

<td> 101 </td>

<td> Rakib </td>

<td> Mymensingh </td>

</tr>

<tr>

<td> 102 </td>

<td> Shihab </td>

<td> Rangpur </td>

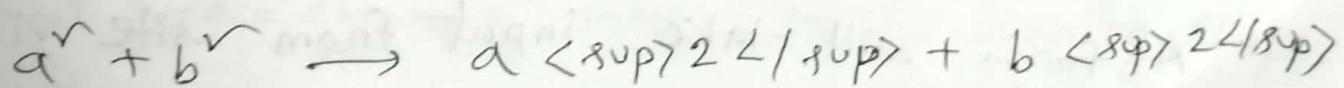
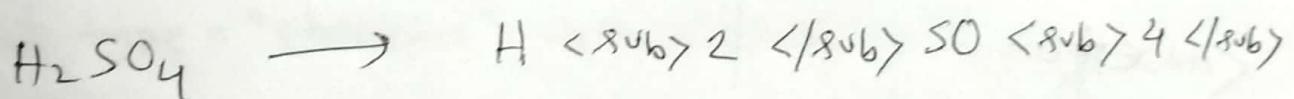
</tr>

</table>

</body>

ID	Name	Address
101	Rakib	Mymensingh
102	Shihab	Rangpur

Equation:



rowspan: 2 means row (or 2 rows) span

colspan: 3 means 3 columns (or 3 columns span)

Time table					
Hours	Mon	Tue	Wed	Thu	Fri
	Science	Math	Science	Math	Arts
Hours	Social	History	English	Social	Arts
	Lunch				
	Science	Math	English		
	Social	Math	English	Social	Project

<td rowspan="2" content>

<td colspan="3" content>

(11) HTML Forms:

<form> is a container for different types of input elements, such as: text fields, checkboxes, radio buttons, submit buttons etc.

A form will take input from site visitors and then will post it to a backend application such as CGI & PHP.

```
<!DOCTYPE html>
<html>
<body>
<h2> Registration form </h2>
<form action = "next.html">
Name : <input type = "text" size = "20" />
Email : <input type = "email" size = "20" />
Password: <input type = "password" size = "20" />
Gender:
<input type = "radio" name = "gender" /> Male
<input type = "radio" name = "gender" /> Female
<input type = "radio" name = "gender" /> Others
<br>
Hobby:
<input type = "checkbox" name = "hobby" /> Playing
<input type = "checkbox" name = "hobby" /> Singing
<input type = "checkbox" name = "hobby" /> Drawing
<input type = "checkbox" name = "hobby" /> Studying
```

Comments:

<textarea cols="50" rows="20" placeholder="Enter
your opinions"></textarea>

Degree :

<select>

<option> -- choose an option -- </option>

<option> M.Sc. </option>

<option> B.Sc. </option>

<option> HSC </option>

<option> SSC </option>

</select>

Upload file : <input type="file" value="uploaded file">

<input type="submit" value="Submit" >

<input type="reset" value="Reset" >

</form>

</body>

</html>

HTML Form :

An HTML form is a section of a document which contains controls such as text fields, password fields, checkboxes, radio buttons, submit button, menus etc.

HTML forms are required if you want to collect some data from the visitor.

```
<form action="" method="get/post">
```

Input types:

Most commonly used input types is:

text field

```
<label> Fname </label>
```

```
<input type="text" name="fname">
```

Radio button:

checkbox

```
<select>
```

```
</select>
```

CSS Cascading Style Sheet

css is the language we used to make our website look pretty. css is used to change the color, background-color, text, elements, or to add background images, borders or all those kinds of things.

There are 3 different ways to add style sheets on our webpage.

(1) Inline css: style attribute and it is used in html tag.

Example!

```
<body>
```

```
<p style = "color: blue">I'm blue</p>
```

(2) Internal css: before <head>, we

used `<style>` tag for adding internal
style at base of page

css.

Example:

```
<head>
<style type="text/css">
p {
    color: blue;
}
h1 {
    background-color: yellow;
}
```

</style>

```
<body>
<h1> Intro to CSS </h1>
<p> I'm blue </p>
```

```
<p> I'm blue too </p>
```

</body>

</body>

Q. <body> used : 220 line no (1)

(ii) External css:

External css is the best way to add css.

We create a new file "main.css" to add external css.

main.css: → selector → corr element to change color
body {
 p {
 color: red;
 }
}

h1 {
 background-color: yellow;
}
h1 {
 color: blue;
}

index.html:

<head>

<link rel="stylesheet" href="main.css"/>

</head>

<body>

<p> I am blue </p>

<p> I am blue too </p>

</body>

* Font properties in CSS

<body> at row had set of 220 long
<p> The quick red fox jumped over
the lazy brown dogs back.

<fp> ~~of turns no - not size~~ : 220 long

<style>

p {
font-family: Tahoma; ^{german}
font-weight: bold; ^{a normal & 100-normal}
font-style: italic;
font-size: 24px; ^{introduction}
<body>

now, we write these in 1 line,

<body> font: bold italic 24px Tahoma; ^{bold}
</body>

times-new roman as & <q>

<q> ~~out~~ as & <q>

<body>

* css comments:

`/* ----- */` → comments

* box model & Padding: ① content

I'm a box

② padding

③ margin

④ border

`<body>`

`<h1>` I'm a box `</h1>`

`</body>`

main.css:

`h1 {`

`background-color: yellow;`

`}`

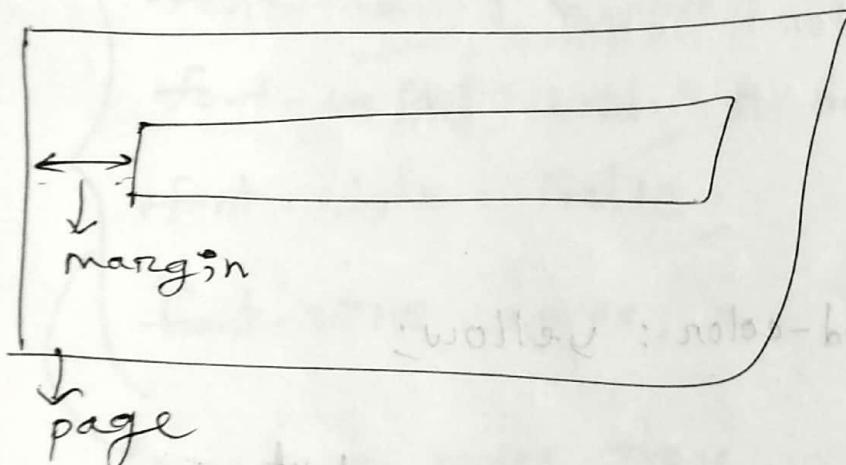
1st part is the content

I'm a box

2nd part: padding is the space outside the content of our box.

3rd part: border is basically a decorated pattern that we can put all the way around our element.

4th part: margin goes outside the border. Margin is basically the amount of white space that we have outside of our box.



main.css:

h2 {

background-color: yellow;

padding: 5px; ↴

padding-top: 10px;

padding-bottom: 10px;
padding-left: 60px;
padding-right: 60px; }
} \rightarrow the line is off topic
size of the box is 10px + 60px + 60px + 10px = 140px

padding: 10px 80px 0px 30px;
arrow info for first.

padding: 10px 40px; \rightarrow 10px top + 40px right + 10px bottom + 40px left = 100px
right is 40px written on each side.

* box model \Rightarrow border property:

h1 {

background-color: yellow;

padding: 10px 40px;

{ border-style: solid; / dashed / dotted
border-width: 5px;

border-color: blue; \rightarrow ridge style
~~border: 2px ridge red;~~

2nd stage 20% of first borders 50000

ହେଲେ କିମ୍ବା କିମ୍ବା

border-top: 4px solid green;

border-bottom: 8px groove orange;

3

* Box model \Rightarrow Margin:

Margin is basically the white space outside of our element/box.

h1g

background-color: yellow;

padding : 10px 40px;

border-top: 4px solid green;

border-bottom: 8px groove orange;

margin: 50px; පහැර නා තුළුව හිඳුවා යුතු කිරීමේ

margin-top: 0px; margin-bottom: 0px;

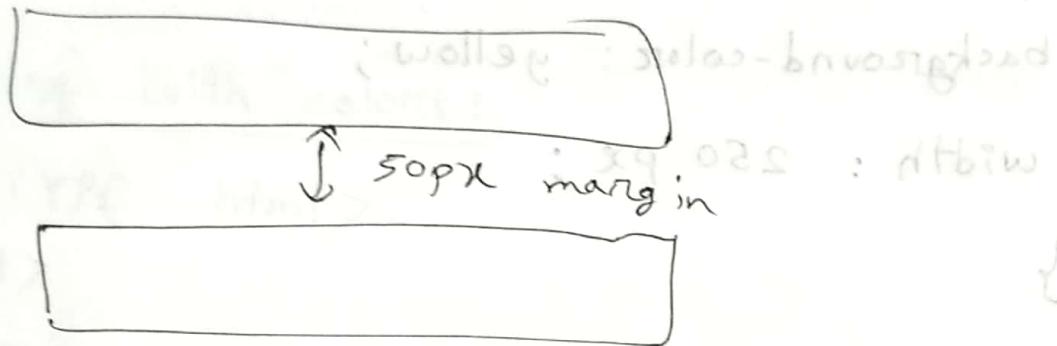
margin: 10px 30px 60px 100px; left

margin: 10px 30px 60px 100px;

`<body>`

`<h1> I am a box I am box </h1>`

`<h1> I am a box I am box </h1>`



main.css:

`body { margin: 0px; }`

`margin: 0px; }`

`padding: 0px; }`

* div and span:

`<body>`

`<div> or tag in <body>`

`<h2> Apples are good. </h2>`

`<p> An apple a day keeps the doctor away </p>`

`</div>`

`</body>`

```
main {  
    border: 1px solid red;  
    background-color: yellow;  
    width: 250px;  
}  
span {
```

```
    color: green;  
    text-decoration: underline;  
}
```

div tag is a block-level element.

whereas span tag is actually an inline element. This tag is not going to add a new line.

div tag - use করুন new line ফরো প্রয়োজন

span tag - use করুন new line ফরো না।

* Working with colors:

```
<!DOCTYPE html>
```

```
<html>
```

```
<body>
```

```
<div>
```

```
<p> Working with colors </p>
```

```
</div>
```

```
</body>
```

```
</html>
```

main.css :

```
div {
```

```
height : 250 px ;
```

```
width : 250 px ;
```

```
background-color : blue ;
```

dark blue
white
 $(0, 0, 0)$ or $(255, 255, 255)$

hexadecimal color → 6 digit

A-F on 1-9

HTML color picker

(GNU Image manipulation program)

software
for color

* Background images:

```
<html>
  <head>
    <link rel="stylesheet" href="main.css"/>
  </head>
  <body>
    <div> Some content here </div>
  </body>
</html>
```

main.css :

```
div {
  height: 350px;
  width: 100%;
```

```
background-image: url("youtube-play.png");  
background-repeat: no-repeat;  
background-position: center top; } and.  
background-color: orange; } yellow.  
}  
body {  
background-attachment: fixed; }  
}  
} yellow.
```

* classes:

```
<head>
```

```
<link rel="stylesheet" href="main.css"/>
```

```
</head>
```

```
<body>
```

```
class="blue"
```

```
<p> I'm blue </p>
```

```
class="red"
```

```
<p> I wish I were red </p>
```

```
class="yellow"
```

```
<p> I'm feeling bright and yellow </p>
```

```
</body>
```

main.css:

class as per our ! for

blue {

color: blue;

}

red {

color: red;

}

yellow {

color: yellow;

}

* ID's:

যদি 10th element কে একটা style

দিব হোল্ড কর, তবে class কেও না

বিশ কর 1st element style দিব হোল্ড

কর, তবে ID কেও না। Because ID হবে
to be unique to each element.

for id 20'

```
<html>
<head>
<link rel="stylesheet" href="main.css"/>
</head>
<body>
<p id="blue"> I am blue </p>
<p id="red"> Oh boy, I wish I were red </p>
<p id="yellow"> If it's yellow, let it mellow </p>
</body>
</html>
```

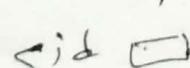
main.css :

```
# blue { color: blue; }
```

```
# red { color: red; }
```

```
# yellow { color: yellow; }
```

```
background-color: black; }
```



* child selector:

child selector mean element inside of other element.

```
<!DOCTYPE html>
```

```
<head>
```

```
<link rel="stylesheet" href="main.css"/>
```

```
</head>
```

```
<body>
```

```
<div>
```

 <p> I have a parent div </p>

```
</div>
```

 <p> I don't have a parent div </p>

```
</body>
```

main.css:

```
div p {
```

```
    color: red;
```

```
}
```

Page 285

P {

color: blue;

↳ Farther away normal

blue ~~20px 10px 20px 20px~~

~~margin-left: auto; margin-right: auto;~~
~~margin-top: 10px; margin-bottom: 10px;~~

paragraph \rightarrow <text color>

<p> blue </p>

<p> red </p>

<p> green </p>

<div>
 <p class="red"> I have a parent div </p>
</div>

<div>
 <p id="green"> I dont have a parent div </p>
</div>

css is

.red P {

color: red; border: 1px solid black;

}

#green P {

color: green; border: 1px solid black;

{

color: red; border: 1px solid black;

text-decoration: underline;

border: 1px solid black;

border: 1px solid black;

* Pseudo classes :

<body>

<p> You </p>

<p> Only </p>

<p> Live </p>

<p> Once </p>

infonce

<p> The quick red fox jumped
over the lazy brown dog h~~baby~~

copy paste

</body>

main.css :

p::first-letter {

color: blue;

font-weight: bold;

font-size: 20px;

} orfonce

p::first-line {

color: blue;

font-weight: bold;

font-size: 20px;

Pseudo class in CSS gives more control over styling. You can choose a bunch of pre-made pseudo class.

* More Pseudo classes:

<body>

<div id="parent">:first-child

<p> You </p>

<p> Only 4p>

<p> Live </p>

<p> Once </p>

</div>

main.css: #last-child

#parent p :first-child {

color: red;

text-decoration: underline;

}

parent p: before {

content: "I am before";

}

parent p: after {

content: "I am after";

}

* n child pseudo class:

<body>

<div>

<p> This is some & text </p>

</div>

<div>

<p> This is some text 2 </p>

</div>

```
<div>
  <p> This is some text </p>
</div>
```



wallpaper: brownish

border: 1px solid black

```
<ul>
  <li> First list item </li>
  <li> Second </li>
```

```
<li> - - -
<li> - - -
</ul>
```

main.css:

```
div : nth-child(2) { // select second
  background: red; // element of
} // select
: nth-child(2) { // select
  background: lightgreen; // the second
} // element
in a
```

```
:nth-child(3) {  
    background: yellow;  
}  
// selects every third  
// element among any  
// group of sibling
```

* Styling links:

```
<a href="farakhosens35.github.io">My website</a>
```

```
</body>
```

When we make styling a link, we use four different classes.

main.css :

a {

color: green; *underline* *text-decoration* *color*

text-decoration: none; *text-decoration* *color*

}

a:hover {

color: red; *color* *background-color*

text-decoration: underline; *text-decoration*

}

a:active {

color: orange; *color*

}

a:visited {

color: pink *color*

text-decoration: none; *text-decoration*

}

for

* Styling lists:

```
<body>
  <h2> Menü </h2>
  <ul>
    <li> Bangladesh </li>
    <li> India </li>
    <li> Pakistan </li>
    <li> Sri Lanka </li>
  </ul>
</body>
```

main.css:

```
ul {
  list-style-type: square;
  list-style-image: url(green-tick.png);
  line-height: 600%;
```

→ 40x40 pixels

```
list-style-position: outside;
}
```

in circle → around empty

in disc;

in decimal

in lower-greek

```
list-style-image: url(green-tick.png);
```

line-height: 600%;

list-style-position: outside;

* rounded corners:

```
<body>
```

```
  <div class = "rounded-box">
```

Apples

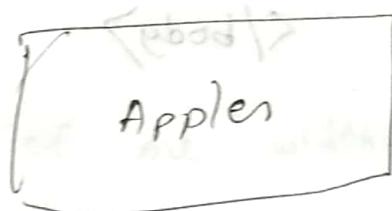
```
  </div>
```

```
  <"rounded-box" = class> ○ Apple
```

```
</body>
```

Output

```
<div>
```



main.css :

```
.rounded-box {
```

```
background-color: orange;
```

```
width : 200px;
```

```
text-align: center;
```

```
padding : 50px 0px;
```

↑
top
right

↑
right & left

```
border-radius: 5px 50px
```

```
border-top-left-radius: 50px; top left
```

corner rounded 50%

* linear gradient: gradient color background w.

<https://www.w3schools.com/colors/color-mixer.asp>

color mixer (color → color) → code for,

```
<body>
  <div class = "rounded-box">
    Apples
  </div>
```

```
</body>
```

main.css:

```
.rounded-box {
  background-color: #0299ef;
  width: 200px;
  text-align: center;
  padding: 50px 0px;
  border-radius: 30px;
  background-image: linear-gradient(to top, #045d4c, #00a2ff);}
```

multiple colon min are my : 220. min. top 20% flex

background-image: linear-gradient (to top, bottom 50% 50% color from dark blue #04507b 50%, #0072b4 20%, #018ad9 40%, #00a2ff 100%);

middle

* float and clear:

<body>

<p class="pic">

Lonem (Sipham) -- starts bno boot

-- -- -- </p>

<p class="para2">

It's cool = cool vib

</p>

<div>

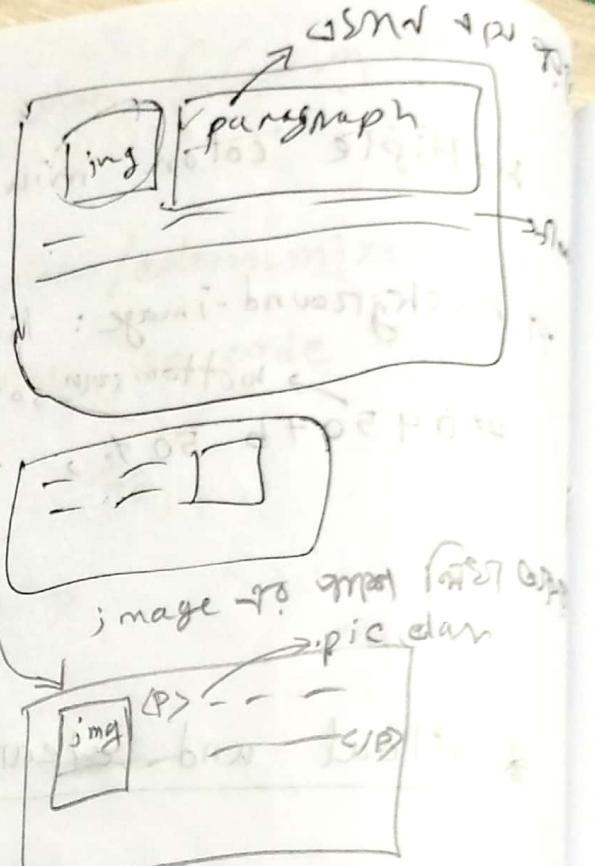
cool vib

cool vib

<div>

main.css :

```
.pic {
    float: left;
}
```



```
.para2 {
```

```
    clear: left;
```

float and clear (Part - 2) :

```
<body>
```

```
<div class = "left-column">
```

Div One

```
</div>
```

```
<div class = "middle-column">
```

Div Two

```
</div>
```

```
<div class = "right-column">
```

Div Three

```
</div>
```

3rd

```
</body>
```



; float: left

; clear: both

; hide: none

; margin: 0 auto; width: 60px

; width: 100px

width: 100px

width: 100px

main.css :

```
.left-column {
```

float: left;

background-color: blue;

height: 200px;

(margin)

width: 200px;

color: white;

(margin)

text-align: center;

(margin)

margin: 10px

}

```
.middle-column {
```

float: left;

background-color: red;

height: 200px;

(margin)

width: 200px;

color: white;

(margin)

text-align: center;

margin: 10px

}

```
.right-column {  
    float: left;  
    background-color: green;  
    height: 200px;  
    width: 200px;  
    color: white;  
    text-align: center;  
    margin: 10px;  
}
```



* New tags for the layout:

<body> : solid: 1px - black

<header> : none: fixed

</header> : none: absolute

<nav>

</nav>

<section>

</section>

<aside>

</aside>

<footer>

</footer>

* Creating a web website layout (Part -1):

<body>

<header>

<nav>

 Home

 About

 Tutorials

 Contact

</nav>

</header>

* Creating website layout (Part - 3) :

```
<body>
  <div class = "container">
    <header>
      </header>

    <section>
      <article><h2>This is an article</h2>
        <h3>This is a sub header</h3>
      </article> <p>This is para 1</p>
      <p>This is para 2</p>
    </section>

    <footer> - written by parulk </footer>
    <div>
      <h2>Social links </h2>
      <ul>
        <li><a href="#">facebook</a></li>
        <li><a href="#">Twitter</a></li>
      <ul>
    </div>
```

```
<div>
  <h2> Related articles </h2>
  <article>
    <header>
      <h3> This can be a heading & other stuff </h3>
    </header>
    <p> Get interested & click below </p>
    <footen>
      <a href="#"> See more </a>
    </footen>
  </article>
</div>
<aside>
  <footen class="page-footen">
    & copy; Copywrite abc.com </footen>
</aside>
```

main.css :

all element {
 margin: 0px;
 padding: 0px;
 list-style-type: none;
}

```
headin, nav, article, section, footer {  
    display: block;  
}
```

```
<div> container {
```

```
    width: 100px;
```

```
    margin: 0px auto;
```

```
    border: 2px solid black;
```

```
}
```

```
.logo {
```

```
    height: 10px;
```

```
    width: 23.2px;
```

```
    float: left;
```

```
}
```

```
.top-nav {
```

```
    float: left;
```

```
    width: 768px;
```

```
}
```

• top nav ul {
float: left;
padding: 15px 20px;

~~left-side~~

• left-side {

float: left;

width: 700px; or 686px
border: 2px solid red;

• right-side { margin-right: 20px;

float: left;

}

• page-footer {

clear: both;

width: 300px; or 286px;

border: 2px solid blue;

margin-top: 10px;

* Knowing "ol" = knowing = set begin: know

<"ol"> = 3512 & "ol" = step/num

</body>

</html>

</root>

</body>

</html>

* Introduction to forms:

A form is basically an area that is used to gain value from user.

```
<!DOCTYPE html>
```

```
<head>
```

```
    <meta charset = "utf-8"/>
```

```
    <link rel = "stylesheet" href = "main.css"/>
```

```
</head>
```

```
<body>
```

```
    <form action = " " method = " " >
```

Username: <input type = "text" name = "username"

maxlength = "10" value = "name" size = "10" />
default name among GET

Password: <input type = "password" name = "password" />

maxlength = "10" size = "10" />

```
</form>
```

```
</body>
```

```
</html>
```

Select list:

<form action="" method="get">

pick a food:

<select name="food" multiple size="5">

<optgroup label="salty food">

<option value="potato-chips">Potato chips </option>

<option value="popcorn">popcorn </option>

<option value="peanuts" selected="selected">peanuts
</option>

</optgroup>

<optgroup label="hot food">

<option value="nachos">nachos </option>

<option value="pizza">pizza </option>

</optgroup>

</select>

</form>

</body>

</html>

checkbox & radio buttons:

<body>

<form action="" method="get">

What do you do in your spare time?

Play sport <input type="checkbox" name="spare time" value="sport" checked="checked"/>

Play games <input type="checkbox" name="spare time" value="games"/>

Shopping <input type="checkbox" name="spare time" value="shopping"/>

Do you play league of legends?

Yes <input type="radio" name="play-lol" value="yes" checked="checked"/>

No <input type="radio" name="play-lol" value="no"/>

</form>

</body>

textarea: : <form> has Node

<form action="#" method="get">

Tell me a story:
 </body>

<textarea name="story" rows="15" cols="60">

</textarea>

</form>

</body>

</html>

buttons:

<form>

<input type="file"/>
 </form>

<input type="submit" value="submit"/>

<input type="reset" value="reset"/>

<form>

<button id="button" type="button"> </button>

<input>

Labels and fieldsets:

fieldset → ~~multiple~~ group ~~to~~ ^{points}

<body>

<form action="" method="get">

<fieldset>

<legend> Personal Info: </legend>

<label for="fname"> first name: </label> <input type="text" name="fname" id="fname" />

<input type="text" name="lname" /> last name: </input type="text" name="lname" id="lname" />

</fieldset>

<fieldset>

<legend> Hobbies: </legend>

<label for="sport"> Sport </label> <input type="checkbox" value="sport" name="sport" />

<input type="checkbox" value="gaming" name="gaming" /> Gaming & <input type="checkbox" value="gaming" name="gaming" />

</fieldset>

<input type="submit" value="Submit" />

</form>

Styling forms :

style.css:

```
fieldset {
```

```
    width: 400px;
```

```
    background-color: #81d4fa;
```

```
}
```

```
fieldset legend {
```

```
    font-weight: bold;
```

```
}
```

```
.pinfo label {
```

```
    float: left;
```

```
    width: 100px;
```

```
    text-align: left;
```

```
    margin-left: 15px;
```

```
    text-align: left;
```

```
}
```

Bootstrap

Bootstrap: It's one of the frontend framework.
It includes HTML and CSS based design
for buttons, navigation, carousels and
so on and JavaScript plugin.

* Why do we need Bootstrap?

→ Faster web development

→ Easier a

→ Create responsive design

* Adding bootstrap

→ CSS file $\langle \text{head} \rangle \rightarrow \text{link}$

→ JS file $\langle \text{body} \rangle \rightarrow \text{script}$

```
<link rel="stylesheet" href="bootstrap.css">
<script src="bootstrap.js">
```

Container and grid :

Bootstrap 2 types container :

① container class

② container-fluid class

container এর কাজ contain করি।

যদি container class ব্যবহৃত হলে margin auto

left right দুটিকাম মার্গিন ০ auto

মাত্র ফিল্টে।

container-fluid ব্যবহৃত হলে

মাত্র ফিল্টে।

Grid

row ও <div>

row এর উপরে column এ এম্ব মো

<div class="container">

<div class="row">

<div class="col-lg-4 col-md-4 col-sm-4 col-xs-4">

</div></div></div>

color :

<div class="div1 bg-primary p-3">

< h5 class=" "tcf - white " > gam div
bg - secondary

border, padding, margin: (0-5) 08/07/

background - oval padding

11 "Garden

$\langle h_1 \text{ clan} = " \text{border bonden-primary} " \rangle$

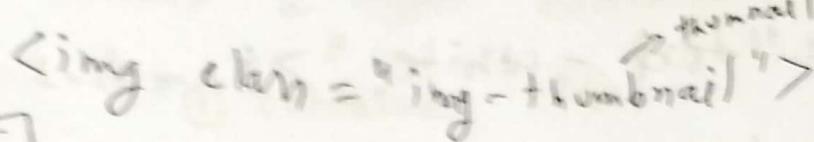
- — (1 h 1)

sh1 class = "rounded-circle border" >-->

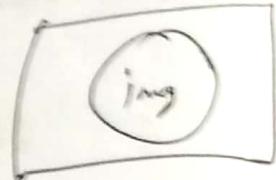
image screen to MVR
adjust 20%

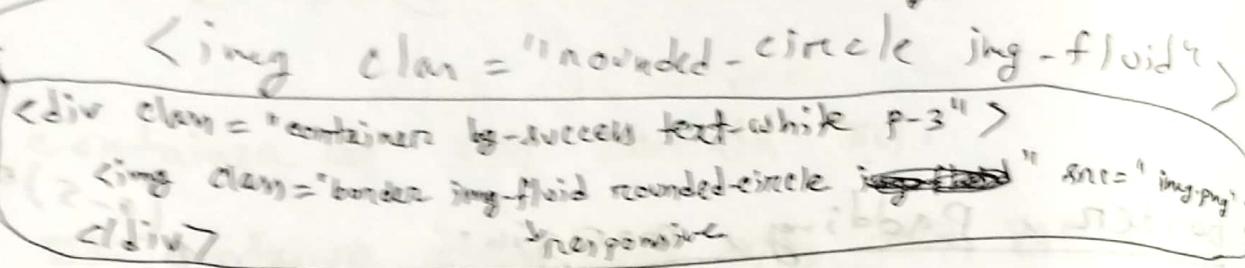
```

```

 thumbnail after image MVR

```
<img class="img-thumbnail"/>
```



 responsive

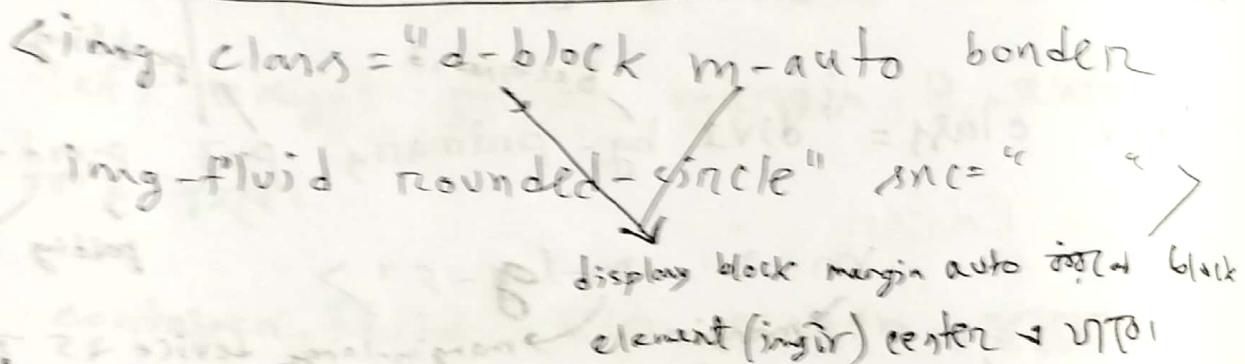
```
<img class="rounded-circle img-fluid">
```

```
<div class="container bg-success text-white p-3">
```

```

```

```
</div>
```

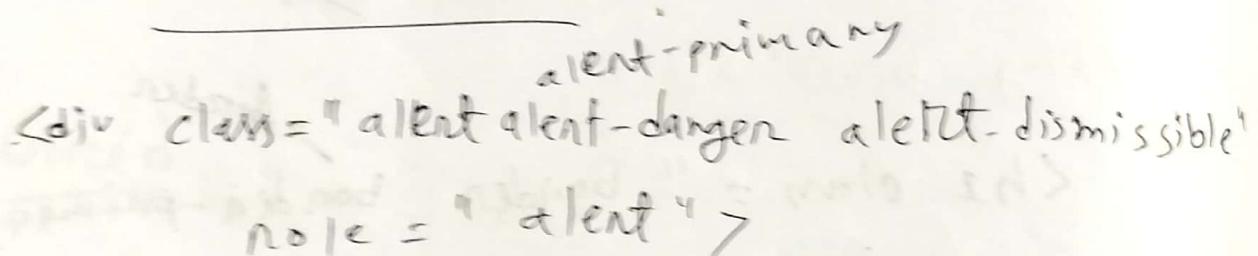
 display block margin auto text-align center & VTFI

```
<img class="d-block m-auto border">
```

```

```

* Alert button

 alert-primary

```
<div class="alert alert-danger alert-dismissible" role="alert">
```

```
<button class="btn-close">
```

```
data-bs-dismiss="alert">
```

```
aria-label="Close"></button>
```

Learn Bootstrap

```
</div>
```

Pagination :

text bounding

standard

< footer class="bg-dark">

<ul class="pagination py-3 justify-content-center">

 1

 2

> 3

> 9

</footer>

</if>

<"multi-page"=no>

</body>

</if>

navbar :

<body>

<nav class="navbar navbar-expand-lg"

<ul class="nav nav-bar"

<li class="nav-item"

contact

or contact

~~start~~

~~share~~

<li class="nav-item">

 Pricing

<li class="nav-item">

 Download

navbar-dark
navbar-light

-md
background
bg-light
bg-darken

bg-transparent

Bootstrap topic :

- (1) container
- (2) Grid
- (3) Margin, padding, background color
- (4) table
- (5) Image
- (6) carousel
- (7) Alert
- (8) Buttons
- (9) forms
- (10) navbar