Module 4) CSS and CSS 3

1. What are the benefits of using CSS?

→ By using CSS, we can control the color of the text, style of fonts, spacing between paragraphs, size and layout of columns, background images as well as a variety of other effects.

→ Easier to maintain and update.

→ Provide advance control of presentation.

→ Develop consistent pattern across many web pages.

→ More formatting option.

→ Search engine optimization benefits

→ Develop web pages that are compatible with many devices like, smartphone, tablet, laptop, etc.

2. What are the disadvantages of CSS?

→ **Confusion due to many CSS levels** − since CSS has numerous levels, including CSS2, CSS3, and others, they could become confused while choosing to study it.

→ **Cross-Browser Issues** - In order to ensure that modifications made to the website using CSS codes are properly displayed across all browsers.

→ **Lack of security**.

→ **Unexpected behavior**.

3. What is the difference between CSS2 and CSS3?

→ **CSS2:**

→ CSS2 was comprised of a single document.

→ CSS2 designers could only use web-safe fonts for being 100% sure to use fonts that would always display the same on every machine.

→ CSS2 had simple selectors.

→ CSS2 developers had difficulty because of the standard was not equipped with automatically breaking the text so that it fits with in a box.

→ **CSS3:**
→ CSS3 has its specifications divided into many individual modules, which makes CSS3 whole lot easier to handle.
→ CSS3 designers can use special fonts, like those available on Google fonts and type cast.
→ CSS3 calls the components as a sequence of simple selectors.
→ CSS3 has a capability to split the text section into multiple columns so tha it can be read like the newspaper.

4. Name a few CSS style components.

→ **Selector:** class name, id name or element name that is target
→ **Attribute (property):** name of the attribute you want to style for example border, color, background, position etc.
→ **Value of Property**: value that will be assigned to attribute.

5. What do you understand by CSS opacity?

→ The CSS opacity property is used to specify the transparency of an element. In simple word, you can say that it specifies the clarity of the image.
→ Values for this property range from 0 to 1.
→ If you set the property to 0, the styled element will be completely transparent

6. How can the background color of an element be changed?

→ We can set background color by selecting the element by its class name of id name and then apply the background-color property on it to set the background color.
→ Ex.
h1{
 Background-color: green;
}

→ With CSS, a color is most often specified by:
   1. a valid color name - like "red"
   2. a HEX value - like "#ff0000"
   3. an RGB value - like "rgb(255,0,0)"

7. How can image repetition of the backup be controlled?

→ This task can be achieved by using the background-repeat property that will help us to control the repetition of the image.
→ The background-repeat property in CSS is used to repeat the background image both horizontally and vertically.
→ It also decides whether the background image will be repeated or not.
→ Ex,
```
background-repeat: repeat|repeat-x|repeat-y|no-repeat|initial|inherit;
```

8. What is the use of the background-position property?

→ The background-position property sets the starting position of a background image.
→ By default, a background-image is placed at the top-left corner of an element, and repeated both vertically and horizontally.
→ Ex.
   background-position: value;
   where value = left top, left center, left bottom, right top, right center, right bottom, center top, center center, center bottom.

9. Which property controls the image scroll in the background?

→ The background-attachment property sets whether a background image scrolls with the rest of the page, or is fixed.
→ Ex.

background-attachment: scroll|fixed|local|initial|inherit;
Where,

→ Scroll - The background image will scroll with the page. This is default
→ Fixed The background image will not scroll with the page
→ Local The background image will scroll with the element's contents

10. Why should background and color be used as separate properties?

→ It enhances the legibility of style sheets. The background property is a complex property in CSS, and if it is combined with color, the complexity will further increase.
→ Color is an inherited property while the background is not. So this can make confusion further.

11. How to center block elements using CSS1?

→ With css the way to center anything that's a block level element is with the margin property. One of the values of margin is auto and by setting auto on the left and right margin our block level element will center itself.

12. How to maintain the CSS specifications?

→ CSS is created and maintained through a group of people with in the W3C called the CSS working group.
→ The CSS working group creates documents called specification.
→ When the specification has been discussed and officially ratified by W3C members, it becomes a recommendation.

13. What are the ways to integrate CSS as a web page?

→ CSS can be integrate to HTML documents in 3 ways
→ 1) Inline: by using the style attribute inside HTML elements

→ 2) Internal: by placing the CSS code in <style> element in the <head> section.

→ 3) External: Place the CSS in an external CSS file and link it via a link element.

14. What is an embedded style sheet?

→ It allows you to define styles for a particular HTML document as a whole in one place.

→ This is done by embedding the <style></style> tags containing the CSS properties in the head of your document.

15. What are the external style sheets?

→ External CSS contains separate CSS files that contain only style properties with the help of tag.

→ CSS property is written in a separate file with a .css extension and should be linked to the HTML document using a link tag.

→ The link to an external style sheet is placed within the head section of the page.

→ It means that, for each element, style can be set only once and will be applied across web pages.

16. What are the advantages and disadvantages of using external style sheets?

→ **The advantages of External Style Sheets are:**

→ Using them, the styles of multiple documents can be controlled from one file.

→ Classes can be created for use on multiple HTML element types in many documents.

→ In complex situations, selector and grouping methods can be used to apply styles.

→ **The disadvantages of External Style Sheets are:**

→ In order to import style information for each document, an extra download is needed.

→ Until the external style sheet is loaded, it may not be possible to render the document.

→ While implementing style sheets, we need to test Web pages with multiple browsers in order to check compatibility issues.

17. What is the meaning of the CSS selector?

→ In CSS, selectors are used to target the HTML elements on our web pages that we want to style.

→ There are a wide variety of CSS selectors available, allowing for fine-grained precision when selecting elements to style.

18. What are the media types allowed by CSS?

→ There are four media types allowed by CSS:

→ 1) all - Used for all media type devices

→ 2) print - Used for printers

→ 3) Screen - Used for computer screens, tablets, smart-phones etc.

→ 4) speech - Used for screen readers that "reads" the page out loud

19. What is the rule set?

→ Each (valid) declaration block is preceded by one or more comma-separated selectors, which are conditions selecting some elements of the page.

→ A selector group and an associated declarations block, together, are called a rule set, or often a rule.