Colors are specified using predefined color names, RGB, HEXAcode, HSL, RGBA, HSLA values.

CSS Color Names
In CSS, a color can be specified by using a predefined color name

EX-RED,BLUE,GREEN,BLACK,WHITE ETC

CSS Text Color
You can set the color of text

CSS Background Color
You can set the background color for HTML elements:

RGB Value
In CSS, a color can be specified as an RGB value, using this formula:

rgb(red, green, blue)

Each parameter (red, green, and blue) defines the intensity of the color between 0 and 255.

For example, rgb(255, 0, 0) is displayed as red, because red is set to its highest value (255) and the others are set to 0.

To display black, set all color parameters to 0, like this: rgb(0, 0, 0).

To display white, set all color parameters to 255, like this: rgb(255, 255, 255).

HEX Value
In CSS, a color can be specified using a hexadecimal value in the form:

#rrggbb

Where rr (red), gg (green) and bb (blue) are hexadecimal values between 00 and ff (same as decimal 0-255).

For example, #ff0000 is displayed as red, because red is set to its highest value (ff) and the others are set to the lowest value (00).

To display black, set all values to 00, like this: #000000.

To display white, set all values to ff, like this: #ffffff.

HSL Value
In CSS, a color can be specified using hue, saturation, and lightness (HSL) in the form:

hsl(hue, saturation, lightness)

Hue is a degree on the color wheel from 0 to 360. 0 is red, 120 is green, and 240 is blue.

Saturation is a percentage value. 0% means a shade of gray, and 100% is the full color.

Lightness is also a percentage. 0% is black, 50% is neither light or dark, 100% is white

HSLA Value
In CSS, a color can be specified using hue, saturation, and lightness (HSL) in the form:

hsl(hue, saturation, lightness,alpha)

Hue is a degree on the color wheel from 0 to 360. 0 is red, 120 is green, and 240 is blue.

Saturation is a percentage value. 0% means a shade of gray, and 100% is the full color.

Lightness is also a percentage. 0% is black, 50% is neither light or dark, 100% is white

Alfa value is nothing but the define the opacity to increase the transperancy of an object.
range(0.1 to 1)

CSS GRADIENTS
CSS gradients let you display smooth transitions between two or more specified colors.

CSS defines three types of gradients:

Linear Gradients (goes down/up/left/right/diagonally)
Radial Gradients (defined by their center)
Conic Gradients (rotated around a center point)

1.CSS Linear Gradients
To create a linear gradient you must define at least two color stops. Color stops are the colors you want to
render smooth transitions among. You can also set a starting point and a direction (or an angle)

along with the gradient effect.

Syntax
background-image: linear-gradient(direction, color-stop1, color-stop2, ...);
background-image: repeating-linear-gradient(direction, color-stop1, color-stop2, ...);
Direction - Top to Bottom (this is default)

Direction - Left to Right

The following example shows a linear gradient that starts from the left. It starts red, transitioning to yellow:
background-image: linear-gradient(to right, red , yellow);

Direction - Diagonal

You can make a gradient diagonally by specifying both the horizontal and vertical starting positions.

The following example shows a linear gradient that starts at top left (and goes to bottom right). It starts red, transitioning to yellow:
background-image: linear-gradient(to bottom right, red, yellow);

2.CSS Radial Gradients
A radial gradient is defined by its center.

To create a radial gradient you must also define at least two color stops.

Syntax
background-image: radial-gradient(shape size at position, start-color, ..., last-color);
background-image: repeating-radial-gradient(shape size at position, start-color, ..., last-color);

By default, shape is ellipse, size is farthest-corner, and position is center.

Radial Gradient - Evenly Spaced Color Stops (this is default)

The following example shows a radial gradient with evenly spaced color stops:

background-image: radial-gradient(red, yellow, green);

Radial Gradient - Differently Spaced Color Stops

The following example shows a radial gradient with differently spaced color stops:

background-image: radial-gradient(red 5%, yellow 15%, green 60%);

Set Shape
The shape parameter defines the shape. It can take the value circle or ellipse. The default value is ellipse.

The following example shows a radial gradient with the shape of a circle:

3.CSS Conic Gradients
A conic gradient is a gradient with color transitions rotated around a center point.

To create a conic gradient you must define at least two colors.

Syntax
background-image: conic-gradient([from angle] [at position,] color [degree], color [degree], ...);
background-image: repeating-conic-gradient([from angle] [at position,] color [degree], color [degree], ...);
By default, angle is 0deg and position is center.

The colors will be spread equally around the center point if no degree is specified.

Conic Gradient: Three Colors
The following example shows a conic gradient with three colors:

background-image: conic-gradient(red, yellow, green);

Conic Gradient: Three Colors and Degrees
The following example shows a conic gradient with three colors and a degree for each color:

Example
A conic gradient with three colors and a degree for each color:

```
background-image: conic-gradient(red 45deg, yellow 90deg, green 210deg);
```