**Q3. What are the benefits of using meta tags.**

Meta tags provide information about the webpage or a HTML document. They are put inside the head tag, we can specify keywords, characters, description set, author and document viewport settings.

Benefits:

1. \*\*Search Engine Optimization (SEO):\*\* Meta tags can help improve a webpage's search engine ranking. For example, the `<title>` tag provides a brief description of the page's content, which is often displayed as the title in search engine results. The `<meta name="description">` tag can provide a concise summary of the page, and the `<meta name="keywords">` tag can list relevant keywords.

2. \*\*Improved User Experience:\*\* Meta tags can enhance the user experience by providing information about the page. For instance, the `<meta name="viewport">` tag allows web designers to control how a page is displayed on different devices, helping ensure it is responsive and looks good on various screens.

3. \*\*Social Media Sharing:\*\* Meta tags like `<meta property="og:title">`, `<meta property="og:description">`, and `<meta property="og:image">` are used to control how a page appears when shared on social media platforms like Facebook and Twitter. This helps ensure that shared links display the correct title, description, and image.

4. \*\*Charset Declaration:\*\* The `<meta charset="UTF-8">` tag specifies the character encoding for the webpage. This ensures that text is displayed correctly, especially for non-English languages or special characters.

5. \*\*Security:\*\* Meta tags can help enhance security. For example, the `<meta http-equiv="Content-Security-Policy">` tag allows you to define a content security policy for your webpage, helping prevent malicious content from being loaded.

6. \*\*Browser Compatibility:\*\* Some meta tags, like `<meta http-equiv="X-UA-Compatible">`, can be used to specify how web browsers should handle the rendering of the page, helping ensure compatibility with older browsers.

7. \*\*Mobile App Integration:\*\* The `<meta name="apple-mobile-web-app-capable">` and related tags enable web pages to behave like native mobile apps when saved to a user's home screen on iOS devices.

8. \*\*Analytics and Tracking:\*\* Meta tags can be used to integrate with analytics tools like Google Analytics or to include tracking scripts, allowing website owners to gather data about user interactions and behavior.

9. \*\*Favicon:\*\* While not technically a meta tag, the `<link rel="icon">` tag is often used in the `<head>` section to specify the favicon (the small icon that appears in the browser tab), improving brand recognition and user experience.

10. \*\*Customization:\*\* You can use custom meta tags to store additional information about your webpage that may be relevant to your specific needs or applications.

In summary, meta tags in HTML provide a way to communicate important information about a web page to search engines, social media platforms, browsers, and users. They play a crucial role in SEO, user experience, and overall website functionality.