Top 50 HTML Interview Questions & Brief Answers

Basics

1. What is HTML?  
   HyperText Markup Language, used to structure web pages.
2. What are tags in HTML?  
   Tags define elements, e.g., <p>, <h1>, <a>.
3. Difference between HTML and XHTML?  
   XHTML is XML-based, stricter syntax; HTML is flexible.
4. What is the difference between block-level and inline elements?  
   Block: starts on new line (<div>, <p>); Inline: same line (<span>, <a>).
5. What are semantic elements?  
   Elements that describe content meaning, e.g., <header>, <footer>.
6. Difference between <div> and semantic tags?  
   <div> has no meaning; semantic tags convey content purpose.

HTML Structure & Meta

1. What is doctype?  
   Defines HTML version. HTML5: <!DOCTYPE html>.
2. What is <head> for?  
   Contains metadata, links, scripts, styles, title.
3. Purpose of meta tags?  
   Provide metadata for SEO, viewport, charset, description.
4. What is viewport meta tag?  
   Controls mobile scaling:

<meta name="viewport" content="width=device-width, initial-scale=1.0">

1. What is the difference between <link> and <a>?  
   <link> links resources (CSS, icons); <a> creates hyperlinks.
2. What is charset in HTML?  
   Character encoding, usually UTF-8.

Forms & Inputs

1. What are HTML forms?  
   Collect user input via inputs, textarea, select, buttons.
2. What is the correct way to use <label>?  
   Clicking label focuses input:

<label for="email">Email:</label>

<input id="email" type="email">

1. Difference between id and class?  
   id: unique; class: can be reused.
2. Name some input types in HTML5.  
   Text, email, password, number, date, file, checkbox, radio.
3. What is required attribute?  
   Forces user to fill input before form submission.
4. What is placeholder attribute?  
   Shows hint inside input field.
5. What is autocomplete?  
   Suggests previous input values for users.

Links & Security

1. Difference between relative and absolute URLs?

| Aspect | Relative URL | Absolute URL |
| --- | --- | --- |
| Definition | Specifies the path relative to the current page | Specifies the full path including protocol, domain, and path |
| Format | folder/page.html or ../page.html | https://www.example.com/folder/page.html |
| Dependence | Depends on the location of the current file | Independent of the current file location |
| Use Case | Linking pages within the same website | Linking external websites or resources |
| Example | <a href="about.html">About</a> | <a href="https://www.example.com/about.html">About</a> |

Relative: relative to current page. Absolute: full URL.

1. What is anchor link?  
   Link to page section: <a href="#section1">.
2. What is target="\_blank"?  
   Opens link in new tab.
3. Why use rel="noopener noreferrer"?  
   Prevents security/tabnabbing issues.

Images & Media

1. What is alt attribute?  
   Text description for images, improves accessibility and SEO.
2. Difference between <b> and <strong>?  
   <b>: bold, no meaning; <strong>: bold + semantic importance.
3. Difference between <i> and <em>?  
   <i>: italic, no meaning; <em>: semantic emphasis.
4. How to add captions to images?  
   Use <figure> and <figcaption>.
5. What are new media tags in HTML5?  
   <audio>, <video> for native media playback.
6. How to embed video from YouTube?  
   Using <iframe> tag with src link.

HTML5 Features

1. New input types in HTML5?  
   Email, date, time, number, color, url, range.
2. New semantic elements in HTML5?  
   <header>, <footer>, <section>, <article>, <aside>, <main>.
3. What is <canvas>?  
   Used to draw graphics with JS.
4. What is <svg>?  
   Vector graphics for shapes, icons, animations.
5. *What are data- attributes?*\*  
   Custom data storage: <div data-id="123"></div>.
6. What is localStorage/sessionStorage?  
   Stores data in browser; localStorage persists, sessionStorage clears on tab close.

Accessibility & SEO

1. How to make HTML accessible?  
   Use semantic tags, labels, alt text, ARIA roles, keyboard navigation.
2. How to optimize HTML for SEO?  
   Use semantic tags, meta description, heading hierarchy, alt attributes.
3. What is ARIA?  
   Accessible Rich Internet Applications: roles, states, properties for assistive tech.
4. Why avoid inline styles?  
   Reduces caching, violates CSP, harder maintenance.
5. Why avoid inline scripts?  
   Security risk, blocks rendering, harder caching.

Miscellaneous

1. What is <noscript>?  
   Content shown if JS is disabled.
2. Difference between <section> and <article>?

| Aspect | <section> | <article> |
| --- | --- | --- |
| Purpose | Defines a thematic grouping of content, usually with a heading. It’s a general container for related content. | Defines self-contained content that could stand alone and be independently distributed or reused. |
| Content | Usually part of a page’s structure; may contain articles, subsections, or other elements. | Represents a complete, independent piece like a blog post, news story, comment, or forum post. |
| Use Case Example | Chapters of a document, sections of a webpage, tabbed content, feature blocks. | A blog post, a news article, a forum post, a comment, or a user-submitted story. |
| Stand-Alone | Not necessarily stand-alone; depends on the context. | Must make sense independently from the rest of the page. |
| Heading | Typically has a heading (<h1>–<h6>). | Usually has a heading (<h1>–<h6>) and may include byline, metadata, or footer. |

Section: thematic grouping; Article: independent content (e.g., blog post).

1. Difference between <main> and <body>?  
   Main: primary page content; Body: contains all page content.
2. Difference between <ul> and <ol>?  
   <ul>: unordered list; <ol>: ordered list.
3. Difference between <span> and <div>?

| Aspect | <div> | <span> |
| --- | --- | --- |
| Type | Block-level element | Inline element |
| Purpose | Used to group large sections of content or elements | Used to group small portions of text or elements within a line |
| Layout Effect | Starts on a new line and takes full width | Stays within the same line and only takes as much width as its content |
| Use Case Example | Wrapping a whole section, container for layout, sidebar, footer | Styling a word, changing color of part of a sentence, highlighting text |
| Attributes | Can have class, id, style like any element | Can have class, id, style like any element |

<span>: inline, no meaning; <div>: block, no meaning.

1. What is semantic SEO advantage?  
   Search engines understand content structure better.
2. What is progressive enhancement?  
   Build core functionality first, then enhance with JS/CSS.
3. What is tabindex?  
   Controls element focus order.
4. What is the difference between inline, internal, external CSS?  
   Inline: style attribute; Internal: <style> in head; External: separate file.
5. What is DOCTYPE HTML5?  
   <!DOCTYPE html> – declares HTML5 document type.