## GRADE 8: Career and Technical Education Wonderopolis Wonder of the Day #1718: How Do You Create a Website?

Source: https://wonderopolis.org/wonder/how-do-you-create-a-website

Have You Ever Wondered...

- How do you create a website?
- What does HTML stand for?
- Can anyone create a website?

Aren't websites great? Can you imagine what life was like before the Internet? Would you believe people had to wait until the news came on the television to learn about the latest news, weather, and sports? How did people find out what their friends were up to before social media? And what about funny cat videos? How did people share those?



Today, a whole world full of information is right there at the tips of our fingers. Instantly we have access to a vast treasure of knowledge today.

Have you ever stopped to WONDER who makes websites and how they do it? Many people work in technology fields where their jobs consist of building, maintaining, designing, or adding to the wide variety of websites that make up the Internet.

You might even want to create your own website one day. But exactly how does one go about designing, creating, and adding a website to the vast Internet? If you want to build a website from scratch, you're going to need to learn how to write computer code in a variety of languages.

When you use a web browser to view a web page, what you see is made up of a variety of different pieces, including text, images, sounds, colors, etc. Many websites allow you to interact in a variety of ways, from purchasing goods and services to using hyperlinks to explore other related websites.

The digital data that is sent from a web server to your web browser contains all the computer code that tells the web browser how to display information in a certain way, so that you view and experience the website as its designers intended.

For a number of years, the very simplest way to build a webpage was to create a new HTML document within a website builder software program. The basic language used by web programmers is known as Hyper Text Markup Language (HTML). HTML tells a web browser how text information should appear. On an HTML document, you would type HTML code that includes exactly what text and images go on the webpage and how they should look.

HTML isn't the only computer language you'll need to know to create a website. You'll also need to become familiar with CSS, or Cascading Style Sheets. CSS allows designers to create unique styles and layouts that give a website a consistent look and feel across all of its individual web pages, regardless of the changing text or images of those pages.

Finally, you'll also need to learn how to write code in JavaScript or a similar language that allows users to interact with a website, such as complete and submit online forms. Sound like a lot to learn? It is! But you don't actually need to learn all that to create a website, unless you want to become a professional web designer who works for a design company.

These days, there are many online tools that will allow users to create a website without knowing a bit of code. They use simple templates and interfaces that allow you to choose designs, layouts, colors, pictures, and text to create a custom website that looks just like you want it to!

Getting a website up and running involves many other tasks, such as reserving a domain name (such as www.wonderopolis.org) and finding a web server to host your site. Where can you find more information? Online, of course!

If you want to get a taste of what website computer code looks like, simply right-click anywhere on the page, and then click on "view source." The source code will appear in a new window. The web browser interprets all of that code to display the web page!

Take the Wonder Word Challenge – Match the term on the left to its definition on the right.

Server	facts and statistics collected together for reference or analysis
Data	a computer and storage device dedicated to storing and serving files
Information	a message received and understood
Instant	a very short time (as the time it takes the eye to blink or the heart to beat)
Query	an instance of questioning

## **Student Activity**

Complete the following activity with a friend or family member at home, on the phone, or electronically. Please write these questions and the responses on a separate sheet of paper.

- 1. Think about your favorite website. Are there any sites that you visit on a regular basis? If so, make a list of those sites and reasons why you like them. Now, find out what websites are favorites of a family member? Ask them to explain what they may like about one specific site.
- 2. Like any good product, website design often begins on paper. Designers often sketch out a picture of what they want their website to look like, as if they were creating a piece of art. Think about your interests and decide what type of website you would create, if you could build one today. Think of something you really like and design a website (on paper). Sketch how you want the home page of your website to look. Share your design with a friend or family member at home. What tips do they have to improve your design? After getting their input, redesign your website and compare the before and after version. Good luck with your design!

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