





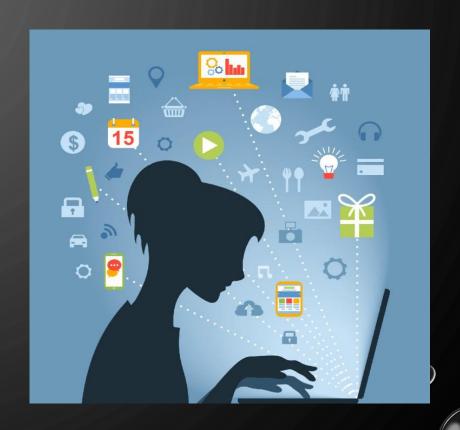
HISTORY OF INTERNET

The history of the Internet began in the 1960s with the creation of ARPANET, a U.S. Department of Defense project to share research resources across universities and institutions. Key developments included packet switching technology and the creation of the foundational TCP/IP protocol in the 1970s, which allowed different networks to communicate. A significant turning point came in 1991 with Tim Berners-Lee's introduction of the World Wide Web, making the Internet accessible and user-friendly for the general public and leading to its global expansion and commercialization in the following decades.

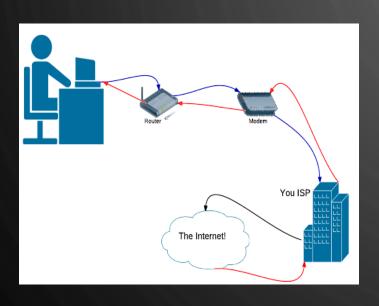
HOW TO CREATE INTERNET

"the" Internet, as it is a vast, global network of interconnected networks, but you can create a local area network (LAN) in your home or an intranet for a private group.

To set up a home LAN, you need a modem, a router, and a connection to an existing Internet Service Provider (ISP). You can also build a larger community network or an ISP business by securing a high-speed fiber connection and extending your network wirelessly to customers.







A problem statement about the internet can describe technical challenges such as performance issues like latency and bandwidth limitations, or user-facing problems like digital literacy barriers and misinformation spread.

It can also refer to broader societal impacts such as the <u>digital divide</u>, the need for <u>enhanced</u> <u>security measures</u>, or the environmental impact of internet infrastructure.

KEY COMPONENTS OF A INTERNET

- 1. End Systems (Hosts)
- •What they are: Devices that connect to the internet to send and receive data.
- •Examples: Personal computers, smartphones, tablets, smart TVs, and even smart home devices.
- 2. Routers and Switches
- •What they are: Network hardware that forwards data packets to their correct destinations.
- •How they work: Routers connect different networks, while switches manage traffic within a single network.
- •Examples: Devices that direct traffic on the internet backbone, as well as smaller routers in homes and businesses.



PROJECT OVERVIEW



A "project overview" for the "Internet" refers to a document or presentation that provides a high-level summary of the Internet's core functions, architecture, and applications.

This type of overview would explain the Internet as a global system of interconnected networks using standard protocols like TCP/IP to share information, highlight key components like <u>packet switching</u>, and discuss its diverse uses, from <u>email and web browsing</u> to <u>online commerce and communication</u>.



PURPOSE AND BENEFITS

Key Purposes of the Internet

•Communication:

•The internet connects people worldwide, allowing for instant communication through email, social media, and video calls.

•Information Access:

•It serves as a massive repository of information, providing access to news, research, and educational content on virtually any topic.

•Commerce:

•Users can shop, bank, and conduct financial transactions online, creating a convenient and accessible marketplace.

•Education & Learning:

•The internet offers numerous online courses, tutorials, and digital libraries, supporting continuous learning and skill development.

Key Benefits of the Internet

•Instant Access to Information:

•Find information and news quickly from a vast digital archive of knowledge.

•Global Communication:

•Connect with family, friends, and colleagues across the globe instantly, bridging geographical distances.

•Convenience:

•Perform tasks like online banking, shopping, and managing finances from anywhere, making daily life easier.

•Economic Growth:

•Supports new business models and opportunities, allowing for remote work and access to a global workforce.

WHO ARE THE END USERS?

End users are individuals & bots who ultimately use a product, service, or system, often for its intended purpose. In the context of technology, end users are the final consumers of software, hardware, or digital services.

They interact directly with the product or service, utilizing its features and functionalities to accomplish tasks or meet their needs.

End users can vary widely depending on the product or service. They might be consumers using an app on their smartphones, employees using <u>enterprise software</u> in their workplace, students utilizing educational software, or any other individuals engaging with technology in their daily lives.



In Technology:

- •A person who uses an iPhone to make calls, browse the internet, or use other apps is an end user.
- •An employee using MS Word or an internal company-purchased software is an end user.
- •A video content creator using a memory card to store their large video files is an end user.

•In Business:

- •A store manager using Gmail to reply to emails or MS Excel to track inventory is a casual end user.
- •A project manager proficient in using tools like MS Teams or Jira to manage projects is an intermediate end user.

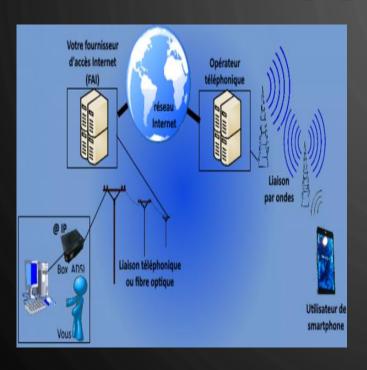
•In Everyday Life:

- •The cat that eats a new blend of cat food is the end user, even though its owner purchased it.
- •The kids who eat protein bars a parent bought for a road trip are the end users.
- •Grocery shoppers: who buy and eat produce are end users of the farm's output.

Key Takeaways

- •An end user interacts with a product or service.
- •End users are distinct from customers. Customers may purchase the product but not necessarily use it themselves.
- •Notable user types include casual users, intermediate users, power users, specialized users, and miscellaneous users.
- •User research methods like surveys, interviews, and user personas can help identify end user's needs and preferences.

TOOLS AND TECHNIQUES



Internet tools and techniques include methods of connection (such as broadband, Wi-Fi, fiber optics), applications for communication and information (like email, search engines, social media), and technologies that enable its use, such as networking protocols and cloud computing.

These technologies enable diverse activities, from online shopping and banking to <u>education</u> and <u>Internet of Things</u> (IoT) device interaction.

Categories of Internet Tools

Internet tools can be categorized by their function:

•Browsers:

Software to access and view websites on the World Wide Web (e.g., Chrome, Firefox, Safari).

Search Engines:

Tools to find information across the internet by indexing websites (e.g., Google).

• Communication Tools:

Applications for sending messages and conducting conversations (e.g., email clients, messengers, VoIP).

• File Transfer Tools:

Programs that allow for uploading and downloading files to and from remote computers (e.g., FTP clients like FileZilla).

Productivity & Design Tools:

Apps for creating visual content, managing projects, and organizing information (e.g., Canva, note-taking apps).

Network & Diagnostics Tools:

Utilities for checking network health and diagnosing issues, such as **DNS** lookups and ping tools.



Techniques for Using the Internet

•Browser Shortcuts:

•Key combinations like CTRL+F to find text on a page, CTRL+D to bookmark, or F5 to refresh a page.

Internet Searching Techniques:

- •To find information effectively, you can use techniques such as:**Keywords:** Identifying specific terms for your search.
- •Quotation Marks: Searching for an exact phrase by putting it in quotes.
- Minus Sign: Using a minus sign to exclude specific words from your search results.

•Cybersecurity Tools:

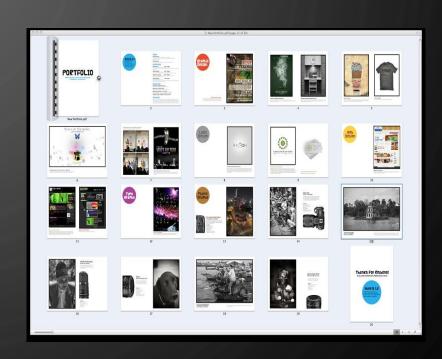
- •Protecting your online presence with tools such as:**Firewalls:** Creating barriers to prevent unauthorized access to your network.
- Anti-Malware / Anti-Virus Software: Detecting and removing malicious software.
- •Encryption Tools: Scrambling data to keep it private and secure during transmission.



POTFOLIO DESIGS AND LAYOUT

Portfolio design and layout involve curating your best projects into a cohesive, visually appealing collection to showcase your skills and talent to potential clients or employers.

To design and lay out an effective portfolio, select your strongest work, choose a platform or format (like an online website or printed book), and structure your content logically using high-quality visuals and clear typography.





Steps to Design and Layout Your Portfolio

1. Gather Inspiration:

1.Look at other portfolios for ideas on layouts, formats, and content that resonate with you and fit your field.

2. Select Your Best Work:

1. Choose only your strongest, most relevant projects that demonstrate your skills and potential.

3. Choose a Platform:

1.Decide whether to create an online digital portfolio using a website builder or a specific portfolio maker, or a physical printed portfolio.

4. Use a Template (Optional):

1.If using a digital platform, select a template that aligns with your professional brand and offers a good starting point for your layout.

5. Arrange Your Content:

1.Cover Letter: Include a brief cover letter to introduce yourself and your work.

2.Project Showcase: Present each project with high-quality images, clear descriptions, and context about your role and process.

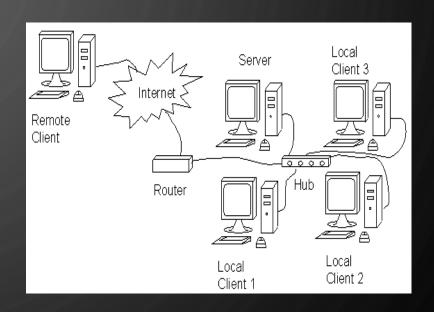


FEATURES AND FUNCTIONALITY

The Internet's primary features are global connectivity, a decentralized and collaborative network, and its role as a platform for diverse services and information.

Functionalities include communication (email, video calls), information retrieval (web browsing), e-commerce, online entertainment, education, remote work, and cloud-based file sharing.

This is all enabled by a universal set of standardized protocols, like TCP/IP, and the World Wide Web.





•Global Connectivity:

•The Internet connects billions of devices and networks worldwide, acting as a massive, interconnected system.

Decentralization:

•It is a decentralized network with no single point of control, allowing for universal access and collaboration.

•Interconnected Networks:

•The Internet is a network of networks, linking private, public, academic, business, and government networks.

Standard Protocols:

•It relies on standardized protocols, like the TCP/IP suite, to enable communication and data exchange between different networks and devices.

Collaborative & Public:

•The Internet is inherently collaborative, allowing for widespread sharing of information, and is public in nature.

Key Functionalities

•Communication:

•Users can communicate instantly through email, instant messaging, and video calls, connecting with others globally.

•Information Retrieval:

•It provides access to an enormous repository of information, allowing users to search for and obtain data on any subject.

•World Wide Web (WWW):

•The Web, a major service of the Internet, allows for the sharing and access of interlinked, multimedia documents (web pages) using HTTP, and URLs.

•E-commerce:

•Businesses and individuals can sell goods and services online, and consumers can shop and conduct financial transactions remotely.

RESULTS AND SCRENSHOTS

```
<!DOCTYPE html>
<html lang="en">
<head>
<meta charset="UTF-8">
<meta name="viewport"
content="width=device-width,
initial-scale=1.0">
<title>History of the Internet</title>
<style>
  margin: 0;
   padding: 0;
  box-sizing: border-box;
   font-family: Arial, sans-serif;
  body {
  line-height: 1.6;
  background: #f9f9f9;
  color: #333;
  header {
  background: #2c3e50;
  color: #fff:
   padding: 15px 40px;
   text-align: center;
  header h1 {
  margin-bottom: 10px;
  nav a {
  color: #fff;
  margin: 0 15px;
  text-decoration: none;
  font-weight: bold;
```

```
nav a:hover {
   color: #f39c12;
  .hero {
   background:
url("https://source.unsplash.com
/1600x500/?internet,technology")
no-repeat center/cover;
   color: white;
   text-align: center;
   padding: 100px 20px;
  .hero h2 {
   font-size: 42px;
   margin-bottom: 15px;
  .hero p {
   font-size: 18px;
   background: rgba(0,0,0,0.6);
   display: inline-block;
   padding: 10px 20px;
   border-radius: 5px;
  .section {
   padding: 60px 40px;
   text-align: center;
  .section h2 {
   font-size: 28px;
   margin-bottom: 20px;
   color: #2c3e50;
  .timeline {
   max-width: 900px;
```

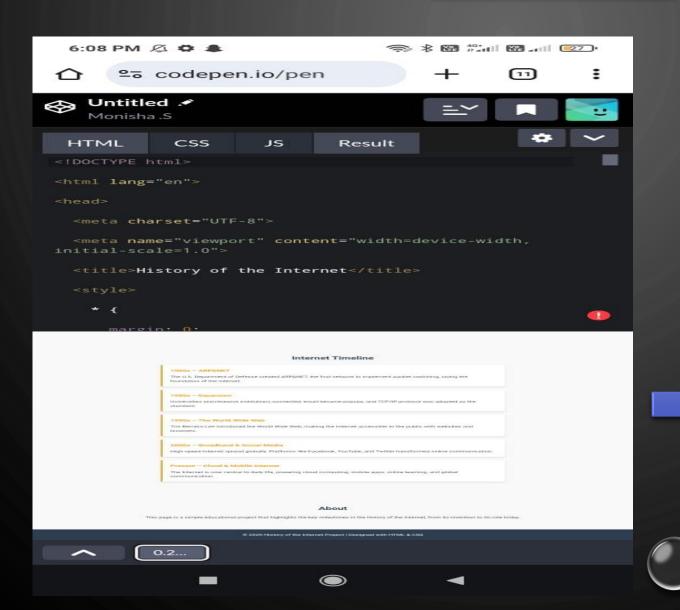
```
margin: auto;
   text-align: left;
  .event {
   background: #fff;
   padding: 20px;
   margin: 20px 0;
   border-left: 5px solid #f39c12;
   border-radius: 5px;
   box-shadow: 0 4px 6px rgba(0,0,0,0.1);
  .event h3 {
   margin-bottom: 10px;
   color: #f39c12:
  footer {
   background: #2c3e50;
   color: white:
   text-align: center;
   padding: 20px;
</style>
</head>
<body>
 <!-- Header -->
 <header>
  <h1>History of the Internet</h1>
  <nav>
   <a href="#">Home</a>
   <a href="#timeline">Timeline</a>
   <a href="#about">About</a>
  </nav>
 </header>
 <!-- Hero Section -->
```



```
<section class="hero">
  <h2>From ARPANET to the Modern
  Discover the journey of the Internet
through decades of innovation.
 <!-- Timeline Section -->
 <section class="section" id="timeline">
 <h2>Internet Timeline</h2>
  <div class="timeline">
   <div class="event">
    <h3>1960s - ARPANET</h3>
    The U.S. Department of Defense
created ARPANET, the first network to
implement packet switching, laying the
foundation of the Internet.
   <div class="event">
    <h3>1980s - Expansion</h3>
    Universities and research
institutions connected, email became
popular, and TCP/IP protocol was
adopted as the standard.
   <div class="event">
    <h3>1990s - The World Wide Web</
    Tim Berners-Lee introduced the
World Wide Web, making the Internet
accessible to the public with websites
and browsers.
   <div class="event">
    <h3>2000s - Broadband & Social
```

```
<div class="event">
    <h3>2000s - Broadband & Social
Media</h3>
    High-speed Internet spread
globally. Platforms like Facebook,
YouTube, and Twitter transformed online
communication.
   </div>
   <div class="event">
    <h3>Present - Cloud & Mobile
Internet</h3>
    The Internet is now central to
daily life, powering cloud computing,
mobile apps, online learning, and global
communication.
   </div>
  </div>
 </section>
 <!-- About Section -->
 <section class="section" id="about">
  <h2>About</h2>
  This page is a simple educational
project that highlights the key milestones
in the history of the Internet, from its
invention to its role today.
 </section>
 <!-- Footer -->
 <footer>
  © 2025 History of the Internet
Project | Designed with HTML & CSS
 </footer>
</body>
</html>
                                  2:55 pm
```

OUTPUT



AFTER

CONCLUSION

its evolution from a niche research tool to a ubiquitous, transformative global network essential for communication, commerce, education, and entertainment, profoundly impacting modern life and continuing to evolve with technologies like mobile connectivity and cloud computing. This conclusion highlights the internet's role in integrating diverse technologies and fostering unprecedented levels of global connection and interaction, while also acknowledging the ongoing challenges of cybersecurity and the need for responsible use.

hanklow