

DEVELOPING FOR THE WEB

A **network** is where devices are connected together usually by cable or WiFi. This could be a few computers in a room, many computers in a building or lots of computers across the world.

Wired and Wireless data transmission

A computer network can be either wired or wireless.

- Wired networks send data along cables.
- Wireless networks send data through the air using radio waves.

Wired Networks

Advantages

- Faster connection (little or no interference)
- Higher bandwidth
- Better security

Disadvantages

- Cables can be a trip hazard and look messy
 - More expensive and time consuming to add devices
- Devices are in a fixed position, not portable

Wireless Networks

Advantages

- No trailing wires/no trip hazards
- Quick and easy to connect devices
- Allows portability

Disadvantages

- Lower bandwidth
- Wireless connections can be weakened by walls, ceilings etc
- Less secure

Key Words

bandwidth	Amount of data that can be moved from one point to another in a given time.
buffering	Data arriving slower than it is being processed
internet	A worldwide network of computers
Internet of Things (IoT)	Takes everyday 'things' and connects them to the Internet eg smart light bulb, fridge, heating etc
IP address	A unique address for every device on the internet
packet	Networks send/receive messages in units called packets
protocol	All methods of communication need rules in place in order to pass on the message successfully. These sets of rules are called 'protocols'
Search engine	A website that allows user to look up information on WWW e.g. Bing, Google etc
Web browser	Piece of software(code) used to view information on the Internet
WWW	Part of the Internet that contains websites and webpages. NOT the same as the Internet.

'URL' stands for 'Uniform Resource Locator'.

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t is the address of a World Wide Web page and is sometimes called the 'web address'. For example, the URL for the home page of Google is www.google.co.uk.

The "www" part tells us that it is a website.

The "google" part is known as the **domain name**. No two websites can have the same domain name.