Introduction to the Web

Content

- The Web
- HTML
- URLs
- HTTP
- Web Applications

World Wide Web

HTML (Hypertext Markup Language)

لغة ترميز النصوص التشعبية

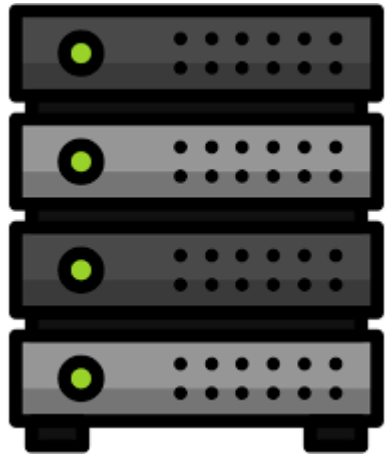
Hyper Links

Components of the Web

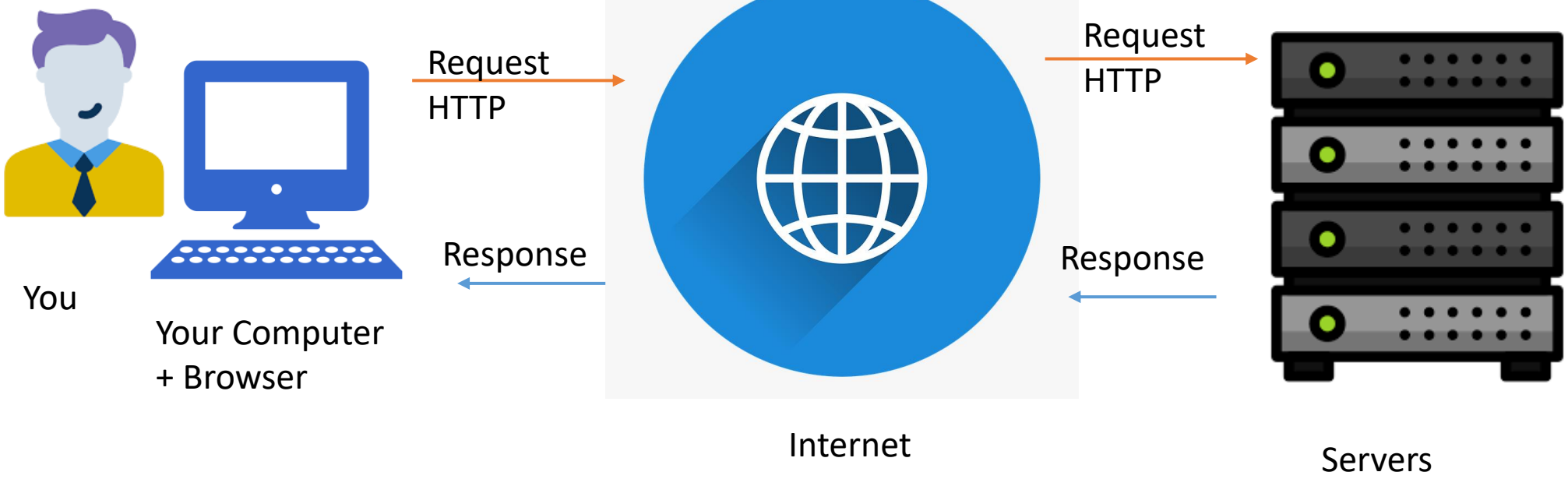
You

Your Computer
+ Browser

Internet



Servers


Request
HTTP
Response
Request
HTTP
Response
You
Your Computer
+ Browser
Internet
Servers

What is the Best Browser?

HTML

- Text Content: What you see
- Markup: What it looks like and arranged
- References to other documents: eg. Images, videos
- Links to other pages

HTML Basics

https://www.w3schools.com/html/tryit.asp?filename=tryhtml_default

HTML Markup

Tag Structure

<Name>Contents</Name>

<Name>: Opening Tag

</Name> Closing Tag

Full line called Element

Bold ...

Italic(Emphasis)

…

Missing End Tag

HTML Attributes

<Tag Attr=“value”>contents</Tag>

Links (Anchor Tags) <a>

<a href=“https://google.com”>Go to Google</a>

Images

<img src="url" alt="text">

Img is a void tag (has no content)

Try it yourself with below image directory

https://www.flaticon.com

Inline image inside text

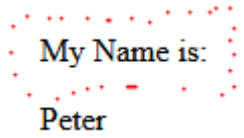
White spaces

- Inline text
-
 void tag
- contents paragraph tag

Inline vs Block

-
 is inline tag
- is block tag

- My Name is: Peter



Span and div

- text
- content

HTML Document Structure

```
<!DOCTYPE html>
<HTML> doc type
        <HEAD> meta data – JS - CSS
            <TITLE>My first HTML document</TITLE>
        </HEAD>

        <BODY>
            <p>Hello world!<p>
        </BODY>
</HTML>
```

URLs (*Uniform Resource Locator*)

محدد موقع المعلومات

URLs (*Uniform Resource Locator*)

Example: https://google.com/

https Protocol (Hypertext transfer Protocol)

google.com Host or Domain

/ Path

URLs Query Parameters (Get)

Example
https://example.com/about?f=1

Another Example
https://example.com/about?f=1&p=value

Real Example
https://www.dalel.6ocity.net/cat.php?id=4

URLs Fragments (قطعة) -named anchor

Example
https://example.com/about#fragment

Another Example
https://example.com/about?f=5#fragment

Real Example
https://datacadamia.com/web/html/template#slot

URLs Port (المنفذ)

Example

https://example.com:1080

Default port is 80

Quiz

https://example.com:80/toys?p=54#demo

Host: ??

Protocol: ??

Fragment: ??

Query: ??

Port: ??

HTTP Hypertext Transfer Protocol
بروتوكول نقل النص التشعبي

Get /foo HTTP /1.1 (Request Line)

Get: Method (another method is POST)

/foo: Path

HTTP/1.1: Version (another version is 1.0)

Quiz

http://example.com/about.php?p=4#instructor

What is the request line using HTTP/1.1

HTTP Response

Request

GET /foo HTTP/1.1

Request Line

Response

HTTP/1.1 200 OK

Status Line

200: Status Code

OK: Reason Phrase

Status Codes

- 200: OK
- 302: Found
- 404: Not Found
- 500: Server Error

Thank You