



A large, abstract graphic element occupies the right side of the page. It consists of several thick, rounded, organic shapes in shades of white, light gray, and dark gray, resembling stylized leaves or petals. The shapes overlap and curve across the page, creating a sense of motion and depth.

2nd Edition

Code Hero

COURSE SYLLABUS



CodeHero - 2nd Edition

1) Introduction of Computational Sciences online course (8 hours)

a) How Computer Work

- i. Binary Data
- ii. Circuits and Logic
- iii. Central Processing Unit
- iv. Memory
- v. Input and Output

b) Computer Networks

- i. Local Area Networks
- ii. Circuit Switching
- iii. Message Switching
- iv. The Internet
- v. Packet Switching
- vi. Packet Routing
- vii. The World Wide Web



2) Introduction to programming using Javascript (1 mês)

a) Introduction

- i. Development environment
- ii. Console
- iii. Statements
- iv. Commons
- v. Numbers
- vi. Values and Expressions
- vii. Arithmetic operators
- viii. Variables
- ix. Assignment operators
- x. Math methods
- xi. Strings
- xii. String methods

b) Conditionals

- i. Booleans
- ii. Comparison operators
- iii. Logical operators
- iv. Ternary operator
- v. If statements
- vi. If-Else statements
- vii. Else-if statements
- viii. Switch statements

c) Loops

- i. While Loops
- ii. Break statement
- iii. For loop

d) Data Types and Arrays

- i. Arrays
- ii. Array methods
- iii. Data Types

e) Functions

- i. Functions
- ii. Function parameters
- iii. Return values
- iv. Function scope
- v. Functions as arguments

f) Objects

- i. Objects
- ii. Methods
- iii. Combining Objects and Arrays