COMPUTER SKILLS

What is Computer Skills ?

COURSE TOPICS

01

Computer Hardware and Software

Define Computers – Components of Mother Board – Input and Output Devices – Storage Devices – Size and performance of Storage Devices – Operating Systems – Software Applications – Software Utilities – Computer Safety.

02

Use of Operating System

Use Windows – Mouse procedures – Desktop Components and Customize – Start Menu – Taskbar – Shortcuts – Installing and Uninstalling Applications – Operating System Utilities – Installing and Updating Anti-virus Applications – Manage Files and Folders (Create, Delete, Copy, Paste, Rename, Arrange, Compress, etc.) – Mange Storage Devices)Partitioning, Formatting, Maintaining)

COURSE TOPICS

03

Document Processing

Interface: Opening MS Word, The file menu, Ribbon Tabs and Groups, Customize Ribbon, Quick Access toolbar

Edit and Format: Arabic and English documents, Font, paragraph, Styles, Cut, Copy, Paste, Format Painter, Find and Replace, Spelling checker, Correcting errors, Grammar checker, Alignment, Bulleted and Numbered Lists

Page Layout: Header and Footer, Page Numbering, Page Size, Page Orientation.

Printing:preview, Printer Setting, Selecting Printer, Print documents

Inserting: Tables, Pictures, Shapes, Smart Art, Word Art

COURSE TOPICS

04 **Spreadsheet Processing**

Interface: Opening MS Excel, Ribbon, Work Sheets.

Tables: Rows and Columns, Cells, Cell Data Types, Format Cells, Computations in Cells, Format table, Sorting, Filtering

Formulas: Inserting Functions (e.g.: statistical and data time)

Charts: Chart types, Visualize data using Charts, Format Charts

Printing: Preview work sheet, print selected area of work sheet, and print charts.

COURSE TOPICS

05 **Presentations**

Interface: Opening MS Power Point, Ribbon, Slides.

Slides: Design Theme, Transition

Insert and Format: Text Box, Table, WordArt, Audio, Video, Smart Art and Shapes

Animations : of the elements inside Slide

View Slides: Normal, Outline, Slide Sorter

Printing:preview Slide, print selected slides, print multi-slides in a single page.

COURSE TOPICS

06 **Internet Services**

Internet: Internet Browser, Sites, Search engines (e.g.: Google), search for information (using text and images), Download files

Email: Create new email account in Google Mail System (Gmail), Send electronic messages, send attachments, Inbox, Sent mail, Drafts, Replay, forward, Carbon copy (Cc), Blind carbon copy (Bcc)

TOPIC 1 : COMPUTER HARDWARE AND SOFTWARE

WHAT IS A COMPUTER ?

Computer is a device can be instructed to carry out a sequences of arithmetic or logical operations automatically in seconds via a computer programming.

In general, a computer is a machine which accepts data, processes it and returns new information as output.

Processing

Data ⟶ ⟶ **Information**

Stage of Develop the computer

- Increase the speed of the computer
- Decrease the size of computer
- Reduce the cost.
- Increase the result's accuracy.
- Ability to store huge amounts of data and information
- Facilitate to use by users.

Generations of Computers

First computer

- Big size
- Consumes energy
- Small memory
- Used machine language
- One Operation at a time.
- Slow
- Easy to break.

RCA
12AX7
(1947)

Second Generation (1956-1963) Transistors
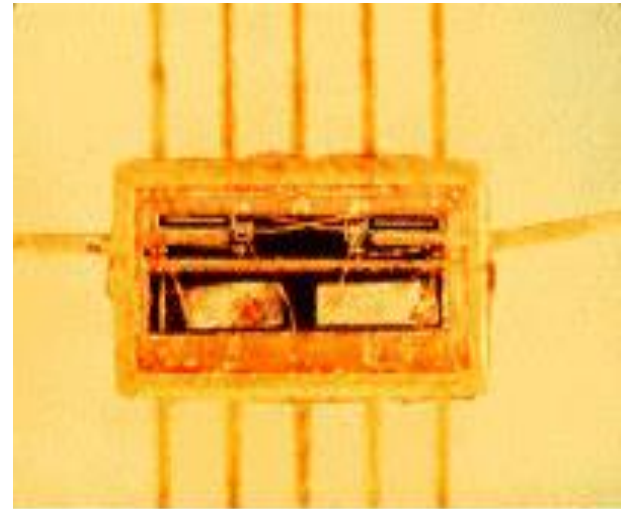

- Small size than *Vacuum Tubes*
- more energy-efficient
- faster
- Cheaper.
- Smaller.
- more reliable than their first-generation predecessors.
- Use of memory and hard drives.
- Used assembly languages
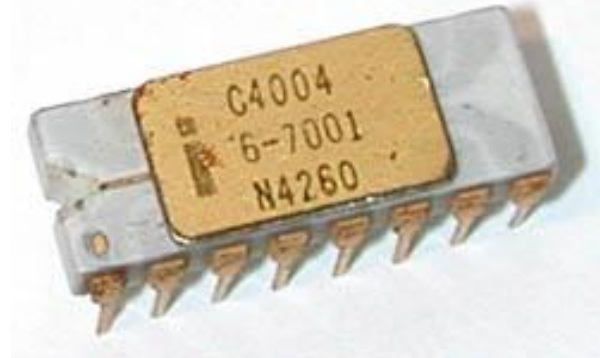
- Lightweight
- increased the speed and efficiency of computers
- Small size .
- Low cost
- Minicomputer .
- Multiprocessors
- Many tasks at a time.
- Input & output Device

Fourth Generation (1971-Present) Microprocessors

‣ High speed
‣ Pc in 1981(IBM 1981 and Apple Macintosh)
‣ Developed an program, Operating System and real time Systems
‣ Used Floppy disks
‣ GUI (Graphic User Interface)
‣ Networks & internet 1992.

▸ based on artificial intelligence

▸ human operators, learn from its own experiences

▸ Some application was developed such as voice recognition

▸ Parallel processing

▸ Quantum computation and nanotechnology

Data and Information

  DATA : is described as some raw facts, figures and symbols, such as numbers, words, images, video and sound, given to the computer during the input phase.

  INFORMATION : is a manipulate data to create information,
. Information is data that is organized, meaningful, and useful.
During the output Phase, the information that has been created is put into some form, such as a printed report.
The information can also be put in computer storage for future use.

How does a computer work?

INPUT DATA : consists of DATA & INSTRUCTION

PROCESSING : is a set of instructions stored in the computer to carry out the instructions given by the user.

OUTPUT INFORMATION : is the set of results generated after processing the Input.

Processing

Input Data → → **Output Information**

Classifications of Computer

Divided to 3 kinds base on:

1) Work Method:

- Digital Computer.
- Analog Computer.
- Hybrid Computer.

2) Storage and accuracy in performs the tasks

- Mainframe
- Control Computer
- Micro Computer
- Server Computer
- Workstation

Classifications of Computer

3) Purpose Use :

- General purpose computers
- Special purpose computers

Computer Applications

The computer uses in several areas and works :

- Government departments
- Banks and businesses (companies)
- Education
- Home use
- Medical uses

Thank you

Good Luck