

# Directory Structure of Files & Folders AKA How Stuff is Stored on Your PC & How to Find it!

Dan Douglas  
Sept 2, 2023



# Directory Structure of Files & Folders - 1

Every PC has 1 or more storage devices

Usually these are called 'Hard Drives' or HDD for Hard Disk Drive

Solid State Drives (SSD) have become a cost effective replacement over mechanical HDD with much better performance – >3x

# Directory Structure of Files & Folders - 2

All of your 'permanent' data is stored on the SSD/HDD (drive from now on)

A drive can take various physical shapes – SD card, 2.5" SSD/HDD, 3.5" HDD, M.2 SSD (stick)

Formatting a drive prepares it for use by the selected Operating System – Windows, Mac, Linux, etc.

A Partition is a division of the physical drive into different logical areas - some are hidden, other visible i.e. 'C'

# Directory Structure of Files & Folders - 3

An Index or catalog of files is kept automatically on the drive when a file is created or deleted – Master File Table (MFT)

A file cabinet has drawers, folders and pages

A drive has Partitions, Directories and Files

Files are organized into Folders for ease of identification & management

# How Files are Stored - 1

Drive = empty library room, File = book

1<sup>st</sup> book needs a shelf

1st shelf needs a name/category– mystery, SF, biography, non-fiction, etc.

1st book gets catalogued/indexed by title, author, category, date, etc.

# How Files are Stored - 2

First thing installed on drive is the OS

OS creates folders for all standard uses – installation of programs/applications, personal files, OS system functions

MFT updated for each file

Within 'Library' folders, you can create sub-folders in a manner that is logical to you, **be consistent**; pictures by place/year

# How Files are Accessed

Search function in Win 10/11 easiest way to locate anything – each word in a document can be searched

**File Explorer is best tool for managing files**

Locate by file type – application, picture, document, configuration settings, etc.

**Locate by file size, date, etc**