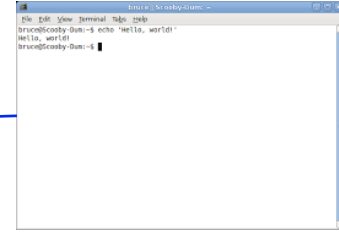


# Quick Intro to Unix

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# Mainframes (1950s – 1970s)



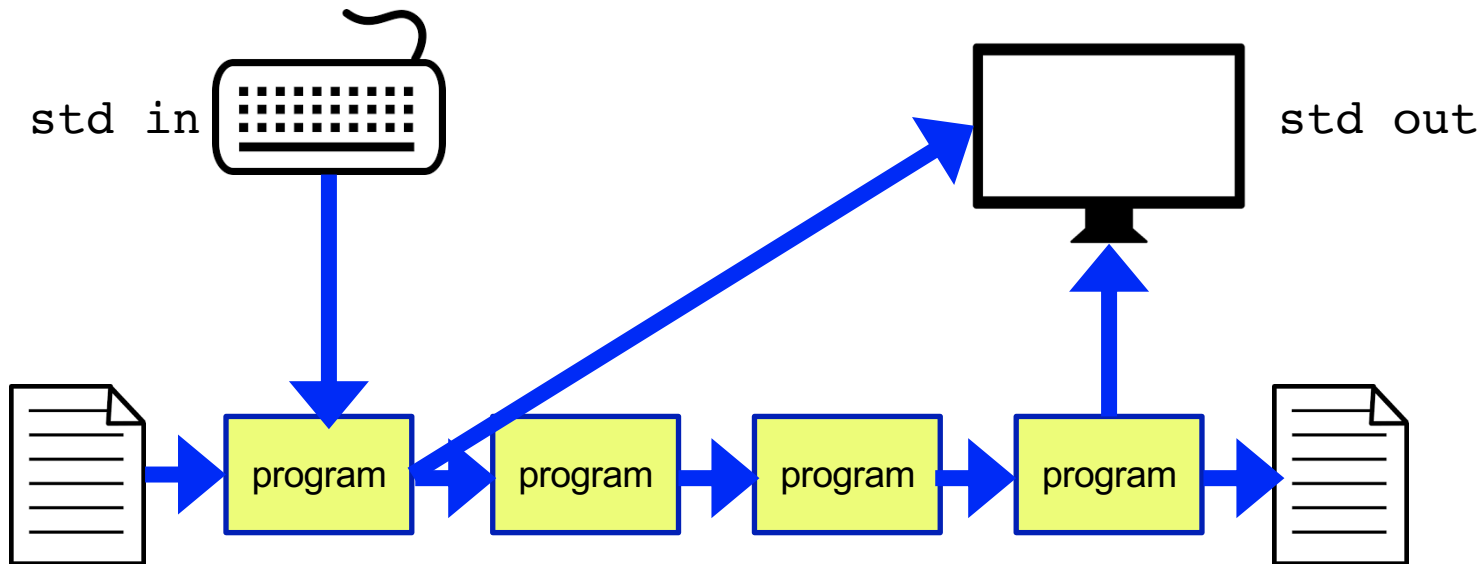
- Much like clusters today (high performance and capacity)
- Users connected from *terminal* computers (glorified keyboard + screen/paper output)
- Behaviour and terminology originates from back then

# Unix systems 1970s - present

- Many versions across the years: Bell Labs, Berkeley, IBM, hobbyists
- “Unix” is actually a trademark but became commonplace
- Sometimes people use *\*nix*
- Official documentation uses the term **POSIX** = the behavioural standard that anything calling itself a Unix system has to conform to
- Examples: macOS, Linux, Android, iOS
- the vast majority of commands work the same way, but some versions have additional functionality (e.g. BSD grep vs GNU grep)

# Philosophy

A collection of **specialized** programs (or “commands”) that are inter-**connectable** through **text**



# Some terms

- command line = terminal = shell  $\approx$  bash
- prompt = text after which you may enter commands (usually ends with \$)
- ssh = secure shell : creates an encrypted connection to another computer
- command = program
- directory = folder
- (compressed) archive = (compressed) files joined into single file (e.g. zip, tar.gz, tar.bz2)
- pipe = data redirector that takes output from one command and inputs it to another command

**Course material:** <https://mpbio-bbt015.github.io/>

## Appendix: Clipart Licences

- AlisonW ([https://commons.wikimedia.org/wiki/File:Teletype\\_with\\_papertape\\_punch\\_and\\_reader.jpg](https://commons.wikimedia.org/wiki/File:Teletype_with_papertape_punch_and_reader.jpg)), „Teletype with papertape punch and reader“, crop, <https://creativecommons.org/licenses/by-sa/3.0/legalcode>
- Jason Scott ([https://commons.wikimedia.org/wiki/File:DEC\\_VT100\\_terminal.jpg](https://commons.wikimedia.org/wiki/File:DEC_VT100_terminal.jpg)), „DEC VT100 terminal“, <https://creativecommons.org/licenses/by/2.0/legalcode>
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