

This week (Mon + wed)

- Security (Lesson 11 )
  - ⇒ \* Terminologies
- Security implementation in AFS

24 %

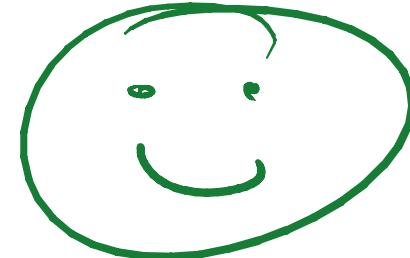


Exam week

24 %



100 %



## Lesson outline

### → Terminologies

Security and authentication using  
a Private Key infrastructure

## "Firsts" from Computing Pioneers

- First vision for a network of computers
  - Memorandum For Members and Affiliates of the Intergalactic Computer Network, by J. C. R. Licklider, April 23, 1963
- First computer-computer communication
  - The Day the Infant Internet Uttered its First Words, Oct 29, 1969
- First e-mail
  - Ray Tomlinson, BBN, 1971

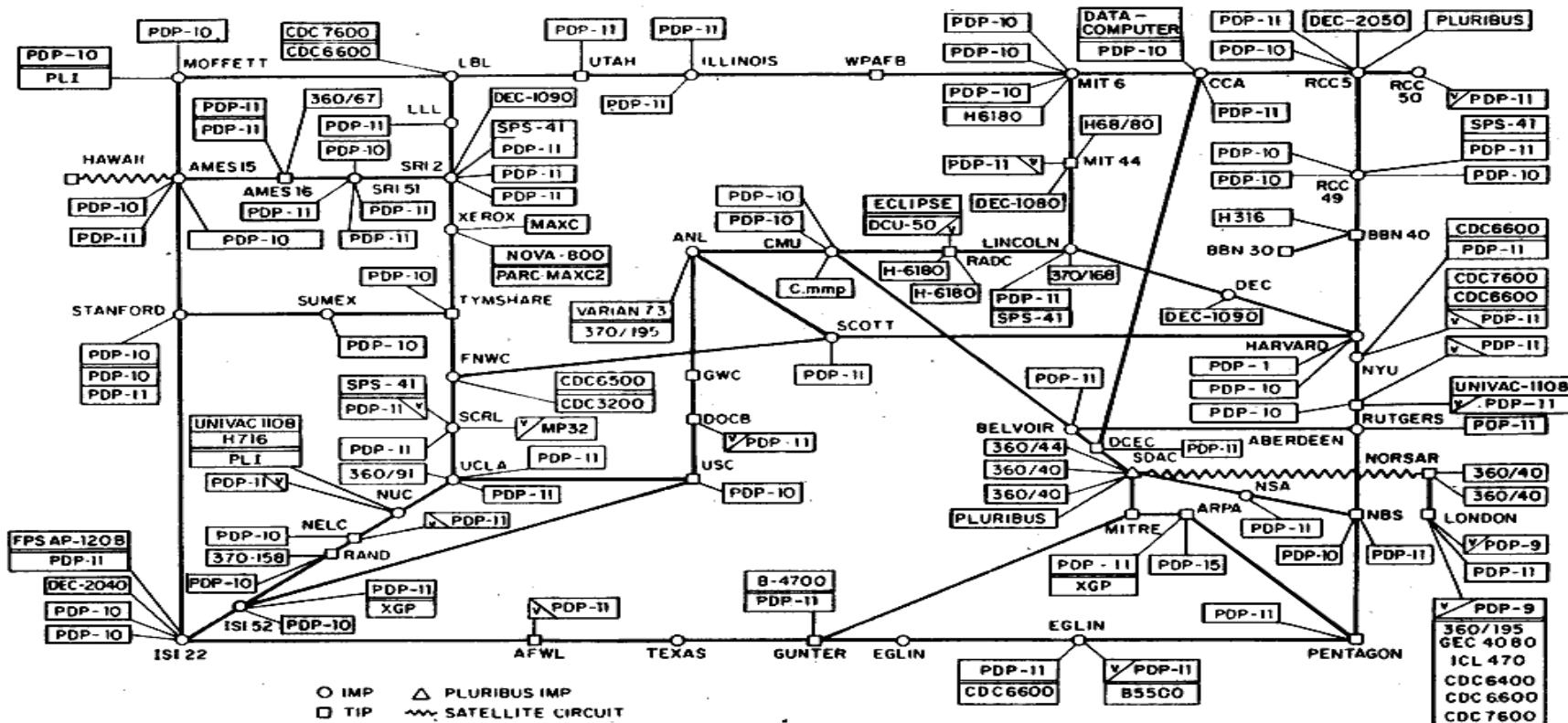
## "First" computer - computer communication

29 OCT 69 2100	LOADED FOR BEN BARKER BRN	OP. PROGRAM CSK
22:30	talked to SRF Host to Host	CSLE
	left op. up program running after sending a host dead message to imp.	CSLE

Log Book of Prof. Kleinrock, UCLA, Oct 29, 1969

All the Computers in the World in one chart!!

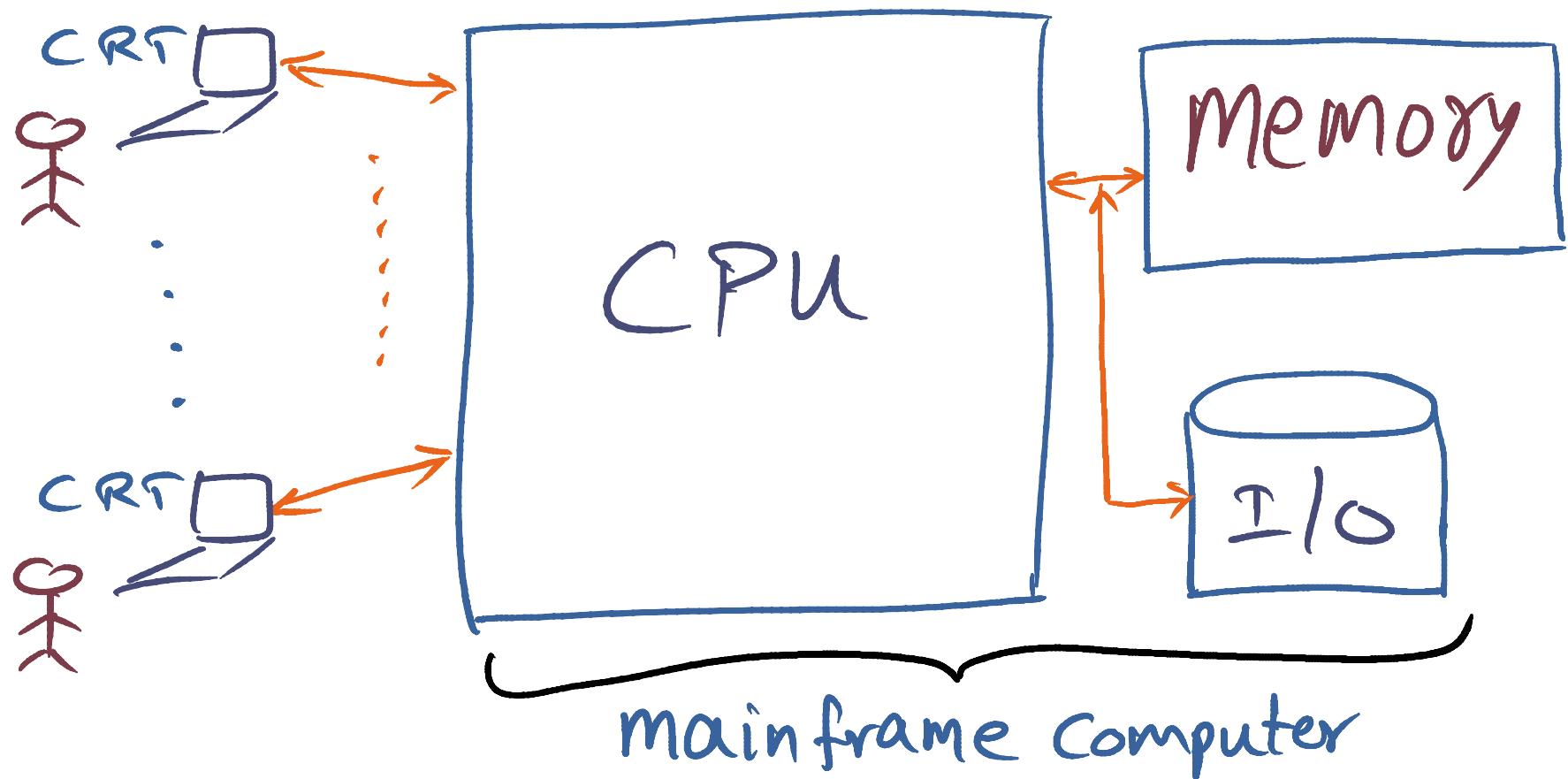
ARPANET LOGICAL MAP, MARCH 1977



(PLEASE NOTE THAT WHILE THIS MAP SHOWS THE HOST POPULATION OF THE NETWORK ACCORDING TO THE BEST INFORMATION OBTAINABLE, NO CLAIM CAN BE MADE FOR ITS ACCURACY)

NAMES SHOWN ARE IMP NAMES, NOT (NECESSARILY) HOST NAMES

## Computer system model, 1975



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Protection

authentication

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  - \* false sense of security

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Strings on into

e.g. "TOP SECRET"

Need to deal with dynamics of use

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Difficult to crack protection boundary} Takeaways

Detection rather than prevention

# Key takeaways

- classic information security issues relevant to this day.
- visionary work by computer pioneers