COMPUTER SUBJECT:	BASIC NETWORK CONCEPTS
ТҮРЕ:	GROUP WORK EXERCISE/DISCUSSION
IDENTIFICATION:	HOMEWORK1/MC
COPYRIGHT:	Michael Claudius
LEVEL:	DIFFICULT
DURATION:	16 hours
SIZE:	100 lines!!
OBJECTIVE:	Introduction to network basic
REQUIREMENTS:	Computer Security
COMMANDS:	

IDENTIFICATION: INSTRUCTIONS/MC

Mandatory assignment

The Password Cracking project is described in another document. Here are given some outlines to how the group should consider decision taking , solutions etc

Assignment 0

For all computers in the group run Centralized version. Record the time together with the computerspeed, number of cpu's and other relevant parameters. Now you know who should be the server!

<u>Assignment 1</u> Discuss the Centralized version making sure everybody understands the program.

<u>Assignment 2</u> Decide your architecture of the Distributed architecture type 1, 2a or 2b.

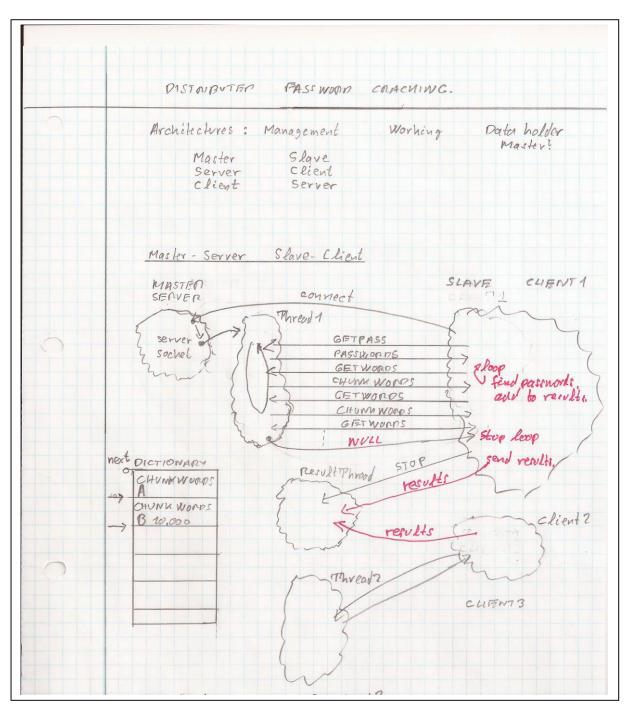
Make an overall sketch of the architecture, i.e. set up a protocol for communication between server and clients, that is how do you imagine:

the start command: getpasswords answer content of the passwords file command: getwordchunk answer e.g. the 5000 next words in a chunk the end: when no more words, what to do, collect all results

Be careful this is concurrent threads/clients working on the same list of words. A semafor i.e. a lock protecting the list will be needed so they don't interfere with each other. A semafor protecting the results (found passwords) will also be needed so they don't interfere with each other.

There might be other semafors.

At my homepage you will find System Architecture 1+2 and below you can find my old DesignSketch for solution 2b. Be inspired BUT I urge you to do your own design and also that only groups where all are strong programmers choose this architecture



Michaels original Design for Server is Master, Clients are Slaves