# Hertentamen HCI – Human-Computer Interaction
## (MMI, MCI or Cognitive Ergonomics)
### vakcode 400312

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*Please fill in:*

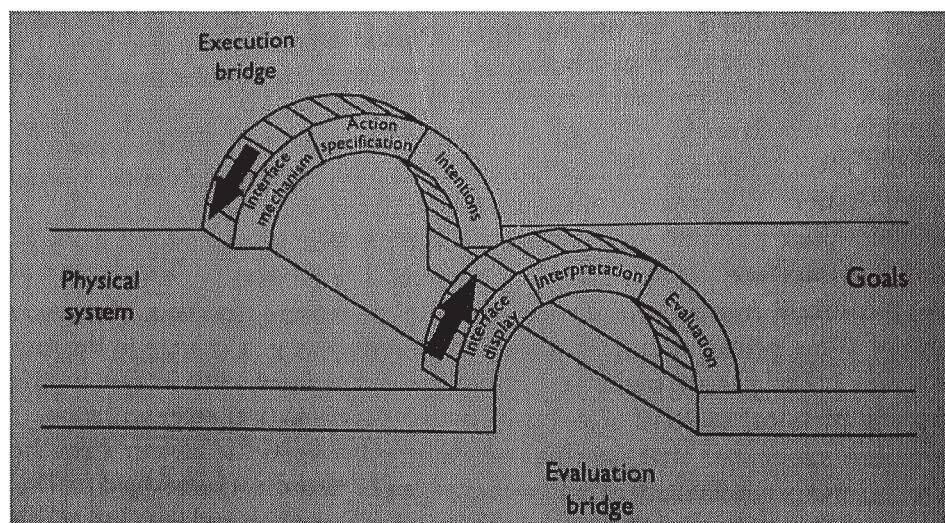Naam:                        Studentnummer:          Studierichting / jaar:

Please write clearly, in English or Dutch, in the space provided on the exam paper. In the case of Multiple Choice questions, choose **one** answer which you think is most correct, by placing a circle around the a), b), c) or d).

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**1.**     What are *affordances*? Give three examples of things and their affordances (bonus point for the most original example!).

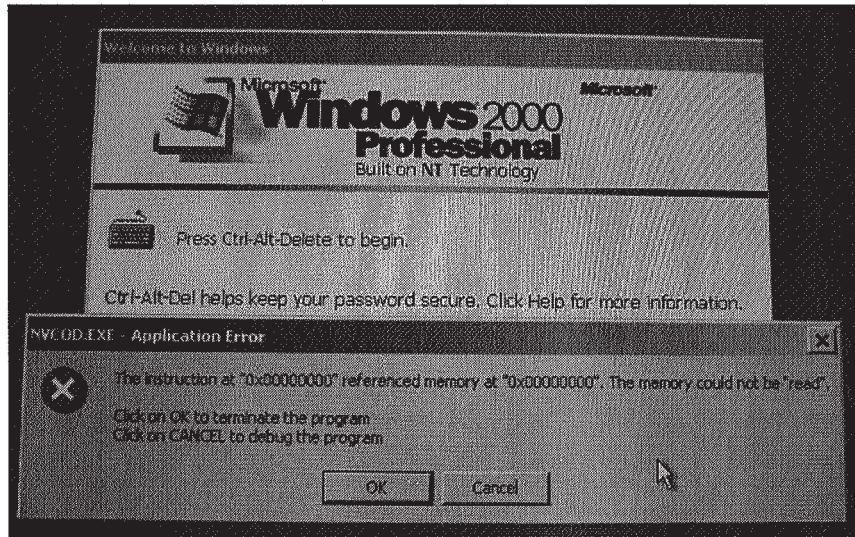**2.** What is the diagram below about? Who developed it?



**3.** What does *CSCW* stand for?

**4.** A 'Wizard' is particularly useful for:
   a) outlining a complex navigational structure for the user
   b) guiding a user step by step through a process
   c) defending users from being attacked by Gollum
   d) offering the user an overview

8. What is the main function of "Load Model 2 (TM2) in the UFA dialogue method?

a) to revitalize the filters
b) to disturb a controlled dialogue style
c) to describe the current situation
d) to create a "To-Do list", an overview of tasks to performed so far

9. In the picture below an interesting dialog box displayed by a computer is shown. What do you make of this?

**7.** From a usability point of view the error message in the picture below isn't very elegant. Identify at least three problems with it.



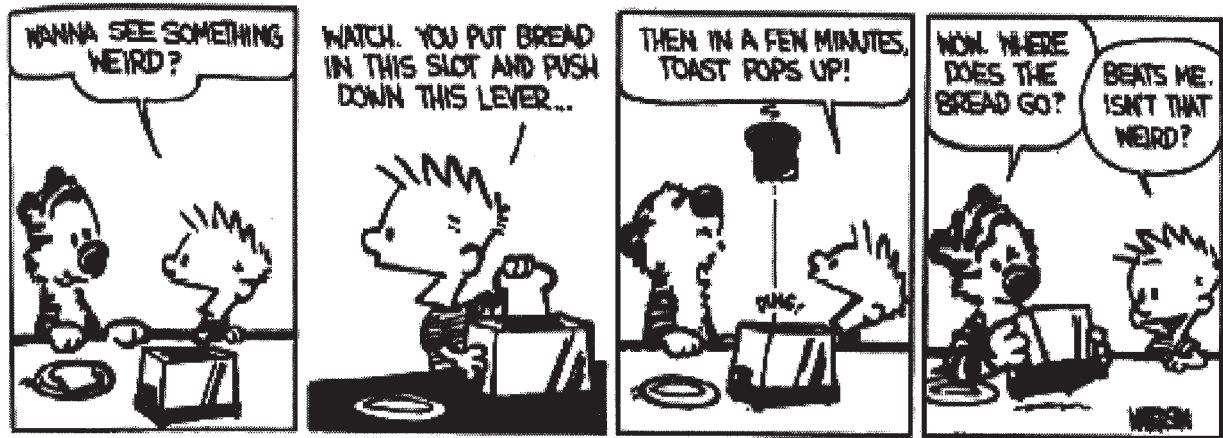**8.** How many Degrees of Freedom (DoF's) can a Joystick have? Describe them.

**9.** Which one of the following statements is true?

    a) An input device is used for presenting information and consists of actuators
    b) An example of a sensor is an LED (Light Emitting Diode)
    c) A display consists of actuators and enables the computer to present output
    d) An example of an actuator is the right mouse button

**10.** Why do we describe *roles* rather than *persons* in Task Model 1 (TM1) of GTA?

31. Make a hierarchical task analysis of an activity (choose an activity). Describe one level, and work out its subtasks to a second level.

**12.** What is a good definition of a mental model? Give an example.



**13.** A structured user interface design method consist of a number of elements. Name four of them, and describe two of these in more detail.

**14.** What are the potential disadvantages of using metaphors in the user interface?

15. The interaction between human and computer are often be identified the system level (up to seven), the measure to do with the game, or the actual actions carried out. Give the names and short plays of at least two of each layers.

16. What sort of things can our sensors quantitatively reduce than qualitatively in a usability test? And how would you approach that?