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College of Computer and Information Sciences
Information Technology Department
Lab Worksheet 4

Course Title:	Human Computer Interaction
Course Code:	IT 300
Week number:	Week 7
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Title:

Simplicity.

Background:

System component and build up it.

Purpose:

In this practical you will put into practice ideas you met in Simplicity.

Specifically, the objective is to enable you to discuss the user's mental models and understanding of an interactive product in terms of how to use it and how it works.

Software / Tools:

No software, papers and pens.

Procedure:

First elicit your own mental model. Write down how you think a cash machine (ATM) works. Then answer the following questions.

Implementation:

Task 1

- How much money are you allowed to take out?
For me, the limit for my bank starts from 20,000 riyals to 50,000 riyals. I have chosen the least limit of 20,000.
- If you took this out and then went to another machine and tried to withdraw the same amount, what would happen?
It will refuse the transaction until tomorrow, or I can enter the branch and ask them for help.
- What is on your card?
There is my full name, card number, expiration date, bank name, and PIN.
- How is the information used?
I can use it to buy in online stores, retail stores, ATMs and more.
- What happens if you enter the wrong PIN number?
It will ask me to enter it again,
- Why are there pauses between the steps of a transaction?
To access information from the bank and verify it.



- How long are they?
It is a couple of seconds.
- What happens if you type ahead during the pauses?
I haven't tried this, but I guess nothing will happen since it checks the information. If it ends the action, I can type what I want.
- What happens to the card in the machine?
The machine will read the information on the card then access my data to do what I want.
- Why does it stay inside the machine?
To access my data to do another action.
- Do you count the money? Why?
I don't count it most of the time. But sometimes I do because this is a machine and it can make mistakes.

Task 2

Next, ask two other people the same set of questions.

- My father
- How much money are you allowed to take out?
the limit that I choose.
- If you took this out and then went to another machine and tried to withdraw the same amount, what would happen?
The machine will deny the action.
- What is on your card?
There is my full name, card number, expiration date, bank name, and PIN.
- How is the information used?
I can use it to buy in online stores, retail stores, ATMs and more.
- What happens if you enter the wrong PIN number?
It will ask me to enter it again,
- Why are there pauses between the steps of a transaction?
To access information from the bank and verify it.
- How long are they?
It is a couple of seconds.
- What happens if you type ahead during the pauses?
Nothing will happen.
- What happens to the card in the machine?
The machine will read the information on the card then access my data to do what I want.
- Why does it stay inside the machine?
It stays in the machine until you get your money.
- Do you count the money? Why?
No.



- My sister
- How much money are you allowed to take out?
the limit that I choose.
- If you took this out and then went to another machine and tried to withdraw the same amount, what would happen?
The machine will deny the action.
- What is on your card?
There is my full name, card number, expiration date, bank name, and PIN.
- How is the information used?
I can use it to buy in online stores, retail stores, ATMs and more.
- What happens if you enter the wrong PIN number?
It will ask me to enter it again,
- Why are there pauses between the steps of a transaction?
To access information from the bank and verify it.
- How long are they?
It is a couple of seconds.
- What happens if you type ahead during the pauses?
Nothing will happen.
- What happens to the card in the machine?
The machine will read the information on the card then access my data to do what I want.
- Why does it stay inside the machine?
It stays in the machine until you get your money.
- Do you count the money? Why?
Not usually, I don't have the time.

Task 3

Now, analyse your answers. Do you get the same or different explanations? What do the findings indicate? How accurate are people's mental models of the way ATMs work? How transparent are the ATM systems they are talking about?

Most of the explanations are the same. It indicates that most people think simply about ATM. People's mental models are almost the same. They believe that ATM is communicating with another computer to verify this information. It is clear enough to understand what is going on.



Task 4

Next, try to interpret your findings with respect to the design of the system. Are any interface features revealed as being particularly problematic? What design recommendations do these suggest?

The way the buttons arranged with the screen makes it hard to know which button to choose. I would like to see the buttons on the screen instead of pressing them outside.