# CSC349. User Experience

## Attempt 2 out of 3 questions.

### Question 1

A. Explain what is meant by the term User Experience.

[2 marks]

B. Describe **two** challenges that we face when attempting to measure UX.

[2 marks]

- C. You have been asked to develop a design for another company. The person in the other company that manages your work and has final say on whether or not it is accepted has not got a formal UX background.
  - i. Give a reason why you should strongly consider avoiding presenting specific designs to this person.

[2 marks]

ii. Describe and justify a better approach to presenting your choices to this person.

[2 marks]

- D. You are working as part of a UX design team to create a set of Smart Home tools that people can use to care for their home-grown plants. You have a range of sensors available to you such as temperature sensors, sunlight sensors, moisture sensors, and any others you can imagine within reason.
  - i. Create **three** sketches that illustrate some UX focused concepts for what you could do with this system. You may annotate the sketches to improve clarity if you wish.

[6 marks]

ii. Future scenarios are one type of scenario that can be used to illustrate the intended UX of a design. Name **two** other types of scenarios you could use to illustrate how these devices might be beneficial, and give one strength of each.

[4 marks]

iii. As the design process progresses, you need to present some examples of your proposed designs to end users to get their feedback. You are at a stage where you are ready to show the broad concepts but not the interfaces to your designs. Name **one** prototyping approach that you could use to do this and justify why it would be the most appropriate approach in this case.

[4 marks]

iv. Assuming the final system has some sort of digital interface on a phone or computer, name and describe **one** usability study approach that would be suitable for measuring the usability of the final interface.

[3 marks]

### Question 2

A. Give one reason why User Experience is an important concept in design?

[2 marks]

B. Explain the relationship between User Experience Design and User Experience Research?

[2 marks]

C. Describe **three** techniques that are validated in psychological research that can be employed to allow someone to be more creative.

[3 marks]

D. Apart from Satisfaction and Memorability, list **three** usability heuristics discussed in class and give their definitions.

[3 marks]

- E. You are working as part of a UX design team to develop a new product that will be used by bicyclists to plan their routes for rides, track their rides, and buy and sell their bicycles and other cycling equipment.
  - You have been asked to develop three persona that can be shared with everyone in the company in order to help keep the design process focused on end users.
    Present them and explain how the persona relate to each other.

[6 marks]

ii. Using the persona that you just created, develop **two** storyboards that illustrate a positive User Experience with the cycling app and **one** storyboard that illustrates an unpleasant experience.

[9 marks]

#### Question 3

A. Explain the difference between a Greenlighting process and a Scoping process.

[2 marks]

- B. Sketching is a vital part of the User Experience design process.
  - i. Explain what is meant by the term sketching in this context with **one** example of sketching that does not involve drawing.

[2 marks]

ii. Describe **three** key qualities that sketches should exhibit.

[3 marks]

- C. Your UX team have been asked to design an application to support people living with physical disabilities sharing their experiences travelling on various different transport services around the country. The core benefit of this would be that less disabled-friendly services could be identified and avoided by other users in the future.
  - i. List **two** scoping techniques that you can use to gather information from the intended end users of the application during the design process.

[2 marks]

ii. For each of the scoping techniques you listed, briefly describe how you would apply it in this specific context and, with regards to talking about transport and disability, what difficulties you could encounter applying each technique.

[4marks]

iii. Thinking carefully about the UX of such a system, create **one** storyboard that illustrates positive scenarios with the system and **one** storyboard illustrating a negative experience you would need to make sure to design around.

[6 marks]

After some further work and refinement your team has arrived at two different versions of the system. One version relies on an interface that emphasises the issues that surround travelling with a disability while the other one subtly emphasises the ability to report or get revenge on unpleasant transport service providers. There is a lot of debate in your design team about which of these two approaches is better.

iv. Give **two** reasons why A/B testing would be useful to resolve this specific conflict in your team

[4 marks]

A/B testing relies on intelligently created measures. One example of a measure of the success of this system might be to look at the total number of complaints people log on the system, with more complaints demonstrating people are more invested in the system.

v. Look at your storyboards and, based on the UX you hoped to achieve in them, describe **two** other measures suitable for use in A/B testing.

[2 marks]