# IT S290F Human Computer Interaction & User Experience Design

# **Take-home Assignment**

#### Introduction

- The purpose of this take-home assignment is to replace the written examination due to the measures of COVID pandemic.
- The OES of this assignment is 50% of the course score.
- Total mark of this assignment is 100.
- This is an <u>individual</u> case study assignment.
- OUHK views plagiarism as a serious disciplinary offence. Students found guilty of offences related to academic integrity will be subject to the penalty of having their subject result disqualified.

In this assignment, you will investigate the user interfaces (UIs) of websites, applications, or systems on your own exploration, where some of which may provide you a good user experience while some of which may be poor. Critically analyze the UIs with various design guidelines and principles that you have learned in this course. Select one UI that gives you worst user experience for a further study. Based on the analysis results, suggest improvements to the selected UI and justify your suggestions. Implement your suggestions on a dummy UI prototype with the technologies you have learned in the course. Justify how your improvements could solve or relieve the poor user experience. Although graphical elements are crucial in pursuing a good user experience, we do not count them as assessable items in your UI prototype. In other words, a fancy UI will not give you an advantage of getting higher marks while a UI with a justifiable design will. This assignment should be written in reporting style, which includes a cover page, table of contents, proper indexed tables and figures, citations and references, and appendices, if any. Your report should contain the following sections:

#### 1. Introduction

- a. A brief introduction of your study
- b. Describe <u>two selected UIs</u> with screenshots where one of which gives you a **good** user experience while another gives you **bad**. Include hyperlinks if they are accessible online.

#### 2. Analysis

- a. Identify two user roles that would interact with the selected UIs. They can be <u>common</u> or <u>uncommon</u> to the two selected UIs, i.e., if the roles are uncommon, pick one role for <u>each of</u> the UIs. Compose a user persona and a user journey for each of the roles.
- b. Critically analyze to what extent the UIs (both good and bad) are satisfied with the UI design

guidelines and principles, such as those from Shneiderman, Nielsen and Molich. Include <u>five</u> of them that are the most significant in your study and use them as a basis for comparing the two UIs. You may include <u>at most ten</u> screenshots to help illustrating the concerned UI components or interactions on the UIs to support your analysis.

#### 3. Suggestion

- a. Based on the analysis result, suggest improvements to address the issues identified on the bad
   UI.
- b. Implement a dummy UI prototype with your suggested improvements. You should use the technologies that you have learned in the course, such as HTML DOM, Bootstrap, JavaScript, ES6, React and more. Again, the prototype does not need to be fancy and glorious. We assess only on the suitability of the design and correctness in the application.
- c. Describe and justify how your new design addresses the issues with respect to the guidelines, principles, and laws, etc., that you have learned in the course. You should illustrate your new design with at most <u>five</u> screenshots.

#### 4. Conclusion

a. That is the closing part of your report. Conclude the work you have carried and reflect what you learned in this study.

#### **Deliverable**

- 1. A 1500 words report (±20%, count only on the main text)
- 2. A dummy UI in HTML and the accompanied files, such as images, if any.
- 3. A video clip (at most 2 minutes) that demonstrates the key features of the UI prototype.

#### **Submission Guideline**

The submission deadline of this assignment is <u>4 June 2021 (Friday) at 23:59 (HKT)</u>. According to the information from the Exam Office, extra time arrangement is not applicable to take-home assignments for students with special needs.

Unless otherwise specified, <u>all deliverable items should be submitted via OLE</u>. If you found difficulty in uploading a large video file, you may share it over a cloud drive but make sure the file is publicly accessible. You are advised to submit your work earlier as the submission system may become inaccessible while approaching the deadlines. In case of submission system failure, please send <u>a copy of your report</u> to me immediately (<u>cmtang@ouhk.edu.hk</u>) for time recording.

### Late submission penalty:

- Within 1 hour after the deadline, i.e. 0.00 0.59 (HKT) on 5 June 2021, no mark deduction.
- Late 1 hour to 12 hours, i.e. 1:00 11:59 (HKT) on 5 June 2021, deduct 25% of marks awarded.
- Late 12 hours to 1 day, i.e. 12:00 23:59 (HKT) on 5 June 2021, deduct 50% of marks awarded.
- Late more than 1 day, i.e. submit after 5 June 2021, receive no mark (0 mark).

## **Assessment Rubrics**

Grade Indication	Insufficient 3-4	Sufficient 5-6	Good 7-8	Excellent 9-10	Score
Report	3-4	3-0	7-0	9-10	l
Introduction	Introductory paragraph is not apparent	Introductory paragraph is vague	Introductory paragraph is clearly stated with a focus	Introductory paragraph is clearly stated, has a sharp, distinct focus and enhances the impact of the report	
Analysis	Incomplete or incorrect display of literature Improper user subjects are chosen Inadequate analysis Results are unclear and insignificant	Imprecise selection of literature     Insignificant user subjects are chosen and explained     Adequate analysis     Results reveal some problems	Good selection of literature     Proper user subjects are chosen and explained     Well analysis     Results reveal majority of problems	Excellent selection of literature     User subjects are well chosen and well explained     Excellent analysis     Results reveal all problems	
Suggestion	Suggestion is irrelevant to the problems     Suggestion is not implemented in the artifact	Suggestion is somehow relevant to the problems     Suggestion is partially implemented in the artifact	Suggestion is relevant to the problems     Most suggestion is implemented in the artifact	Suggestion is strongly coherent with the problems     Suggestion is well implemented in the artifact	
Conclusion	Concluding paragraph is not apparent	Concluding paragraph is only remotely related to the report topic	Concluding paragraph follows and summarizes the report discussion and draws a conclusion	Concluding paragraph summarizes and draws a clear, effective conclusion and enhances the impact of the report	
Organization	Details and examples are not organized, are hard to follow and understand     Poor layout and formatting, and not satisfied the content requirements	Information is scattered and needs further development     Decent layout and formatting and satisfied some of the content requirements	Information is logically ordered with paragraphs and transitions     Good layout and formatting, and satisfied most of the content requirements	Information is presented in effective order. Excellent structure of paragraphs and transitions enhances readability and comprehension     Excellent layout and formatting, and satisfied all content requirements	
Grammar & Spelling	Numerous grammatical and/or spelling errors	Some grammatical or spelling errors	A few grammatical or spelling errors	Very few grammatical or spelling errors	
Reference and citation	Resources not cited in paper or proper format not used	Some resources are cited but not all. Not formatted correctly	All resources are cited, but formatting isn't correct	All resources are cited and appear with correct formatting	
Artifacts	•				
Prototype	Unable to demonstrate the suggested improvements	Partly demonstrate the suggested improvements	Well demonstrate the suggested improvements	Well demonstrate the suggested improvements and showcase a model of good UI/UX design	
Video clip	The purpose and objective of the video is unclear  The purpose and objective of the video is unclear.  The purpose and objective of the video is unclear.	The video showcases the improvement in an unclear way	The video showcases the improvements	The video clearly showcases the improvement	

<sup>\*</sup> Items in the assessment rubrics contribute different ratios in the grading according to their significance.