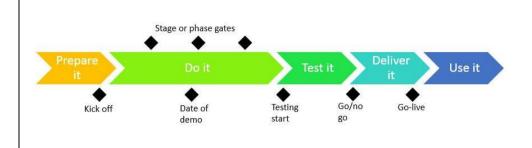


Phase three (3) you will design an interactive UX design for VR and AR with specific requirements. You are asked to create a VR /AR prototype which indicates important historically locations in a particular place in Malta.

<ul> <li>KU4 Identify various graphical elements and specify when and how they should be utilised. 5 Marks         To complete KU4 you require to search for appropriate UI elements for the VR/AR history locations prototype navigation structure.         <ul> <li>a) Select a sample of at least three (3) different icons for AR and give at least three (3) reasons why you decided you choose such Icon.</li> <li>2 Mark □</li> </ul> </li> <li>b) Select a sample of at least two (2) icons for VR and give at least two (2) reasons why you decided you choose such Icons.</li> <li>2 Mark □</li> <li>c) Provide a font sample for VR/AR legibility and give at least two (2) reasons why you choose such font.</li> <li>1 Mark □</li> <li>KU5 Present a project including a set of milestones, aims and objectives. 5 Marks</li> </ul>
<ul> <li>prototype navigation structure.</li> <li>a) Select a sample of at least three (3) different icons for AR and give at least three (3) reasons why you decided you choose such Icon.</li> <li>2 Mark □</li> <li>b) Select a sample of at least two (2) icons for VR and give at least two (2) reasons why you decided you choose such Icons.</li> <li>2 Mark □</li> <li>c) Provide a font sample for VR/AR legibility and give at least two (2) reasons why you choose such font.</li> <li>1 Mark □</li> </ul>
why you decided you choose such Icon.  2 Mark □  b) Select a sample of at least two (2) icons for VR and give at least two (2) reasons why you decided you choose such Icons.  2 Mark □  c) Provide a font sample for VR/AR legibility and give at least two (2) reasons why you choose such font.  1 Mark □
decided you choose such Icons.  2 Mark □  c) Provide a font sample for VR/AR legibility and give at least two (2) reasons why you choose such font.  1 Mark □
such font.  1 Mark □
KU5 Present a project including a set of milestones, aims and objectives. 5 Marks
You are required to present a project milestone that demonstrates time management organisation with target dates that show progression stages and deadlines.
a) Organised design and information 2 Mark □
b) Provide Clear information and realistic dates  1 Mark
c) Respecting target dates and deadlines  2 Mark
Example



### AA3 | Illustrate a interactive UX design for a specific audience and requirements. 4 Marks

Provide a layout design for both AR and VR prototype using a UX application including the following:

- a) Fonts and Colour scheme
  - 2 Mark  $\square$
- b) Template and UI elements such as Icons
  - 2 Mark  $\square$

## AA4 | Illustrate the work flow setup and the selected application/s for design and development. 4 Marks

Provide an infographic interactive work flow set up using a UX application.

- a) Illustrate two Pages that represent a graphic layout design one (1) for VR and one (1) for AR. Include fonts and colour scheme illustrated in section AA3.
  - 2 Mark  $\square$
- b) Create links to the UI elements illustrated in section AA3 that navigate to VR/AR pages according work flow setup.
  - 2 Mark  $\square$

# SE1 | Produce a UX design with specific requirements targeting a specific audience. 5 Marks

To complete SE1 criteria you are required to create a static layout design in relation to the prototype (Important historically locations in a particular place in Malta). Provide two (2) different static designs one (1) for VR and one (1) for AR. Keep in mind that the prototype is targeted for young to adult tourist interested in visiting history locations. The design will include:

- a) Sample of colour scheme and fonts features at least give two (2) reasons why you have selected such fonts features.
  - 2 Marks
- b) At least three (4) Samples of Icons and UI elements
  - 2 Mark  $\square$
- c) Resolution applied and at least 2 reasons why?
  - 1 Mark  $\square$

Note to create the static prototype design you can use an application of your choice, suggested UX application.



### AA5 Develop a prototype for virtual, and mixed reality technologies (XR). 7 Marks.

Develop a full interactive VR/AR prototype that can be suitable for tourists visiting historical locations in Malta. Chose a location for example Valletta, The Three Cities or any other location and provide a visual map that indicates historical interesting places to visit. Adapt the Map for AR interaction use. For VR use a place that relates to a historical period and adapt for VR visual interaction. To complete AA5 you are required to:

- a) Use a location map as a background. Apply appropriate Icons, UI elements fonts and colour scheme. Apply animation and interaction that simulates the AR prototype.
  - 3 Marks □
- b) Search for a photo/s that relate to a historical Maltese location, adapt for VR visualization and provide at least two interactions that display info about the locations.
  - 4 Marks

See images below as guidelines:

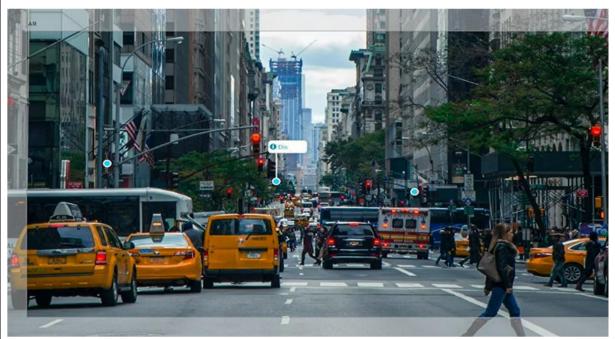


Figure 1 - AR EXAMPLE

Note preferably use your own photos.



#### **KU7** | Give examples of UX/UI future directions. 5 marks

To complete KU7 answer the following questions:

a) How has UX/UI evolved with the rise of technology?
 Name at least four (4) different emerging technologies that affected UX/UI designers and how.

2.5 Marks □

b) What are the challenges that UI/UX designers are facing? Name at least four (4) different challenges that UX/UI designers can or will face.

2.5 Marks □

Note both questions need to count not less than 500 words (250 words each), answers need to be expressed in your own words and where necessary include appropriate references.

#### SE2 | Evaluate the techniques used for developing specific functionalities within a given project 5 Marks

To complete SE2 you are required to provide a tutorial on how you have created the AR simulation mentioning at least 2 animation functionalities and how they have been applied as well as two interactive functionalities explaining how and why they have been applied and mention if any which plugins where used and why.

Note make use of screen shots

#### SE3 Appraise critically the project presented. 10 Marks

Create a document and critically outline issues, solutions and improvements of the three (3) prototypes including the HTML, CSS and JS prototype. The document must include:

- a) Solution how to deliver HTML, CSS and JS prototype to developers for implementation.
  - 3 Marks
- b) Recommendations to convert VR/AR prototype into a fully functional product.
  - 3 Marks
- c) Improvements for any design changes, if no changes were required give a credible reason why.
  - 2 Marks
- d) Improvements for usability if no changes were required give a credible reason why.
   2 Marks □

Note word count not less than 800 words, need to be expressed in your own words and where necessary include appropriate references.

**Total Marks 50** 



# **Assignment submission details**

Assignment must be attempted by **each student** and all tasks should be **completed individually**.

- All answers, descriptions and explanations should be properly organised and presented in a professional layout.
- Copying and plagiarism are strictly prohibited and will be penalised in line with the College's disciplinary procedures.
- You are to provide references for any findings during your research, including online findings.
- A copy must be submitted on "Unicheck" (MOODLE) and presented online, graphics content and any other resources are to be uploaded on the link provided. Your submission must include the following:
- Cover Sheet
- Your Supporting Documentation
- References
- The URL link of your online published work
- All graphic Resources

#### Notes:

Submit the assignment research and reports on a word document via MOODLE (unicheck). You are to present your online work providing your URL.