CSE462/562 – Augmented Reality (Fall 2024) Homework #1

In this assignment, you will build a complete AR application using Unity + Vuforia/ArKit/ArCore/... and demonstrate it in class. Your AR application should have the following features:

- Display at least one stationary virtual 3D object.
- Display at least one animated virtual 3D object.
- Display at least one moving 3D/2D object.
- Display at least one virtual object mapping a single picture (your own picture).
- Display at least one textual virtual object (text shown towards the viewer of the app).
- Display at least one virtual object mapping and playing a video (your own video).
- Display at least a three-step scenario where the user is interacting with the virtual objects.
- Display at least three steps involving the (user) selection of a virtual object.
- Display at least two steps involving the (user) selection of a button to change scenarios.
- Unless otherwise noted, all virtual objects need to be registered with the actual 3D environment.

Grading:

• 100 points for the correctly working app (should be shown to the instructor) with all the above features.

Submission:

- Submit a short video showing your application in use with all the above features demonstrated (note that you should show both your app on screen as well as the user and their environment). Handin the link to your video (make sure that the link identifies that it is your work including your name and student number.
- Submit the link to the code (preferably GitHub) with proper access (you can add the instructor to your project using the GitHub handle yakup.genc@gtu.edu.tr)
- Show a demo of your app to the instructor in person.