

# MARKER BASE EXERCISE: HANDS ON TOGETHER

Corso Realtà Virtuale 2023/2024

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Code on the laboratory repository Github in the folder  
Ex07-02

<https://github.com/aislabunimi/courses.vr2024>



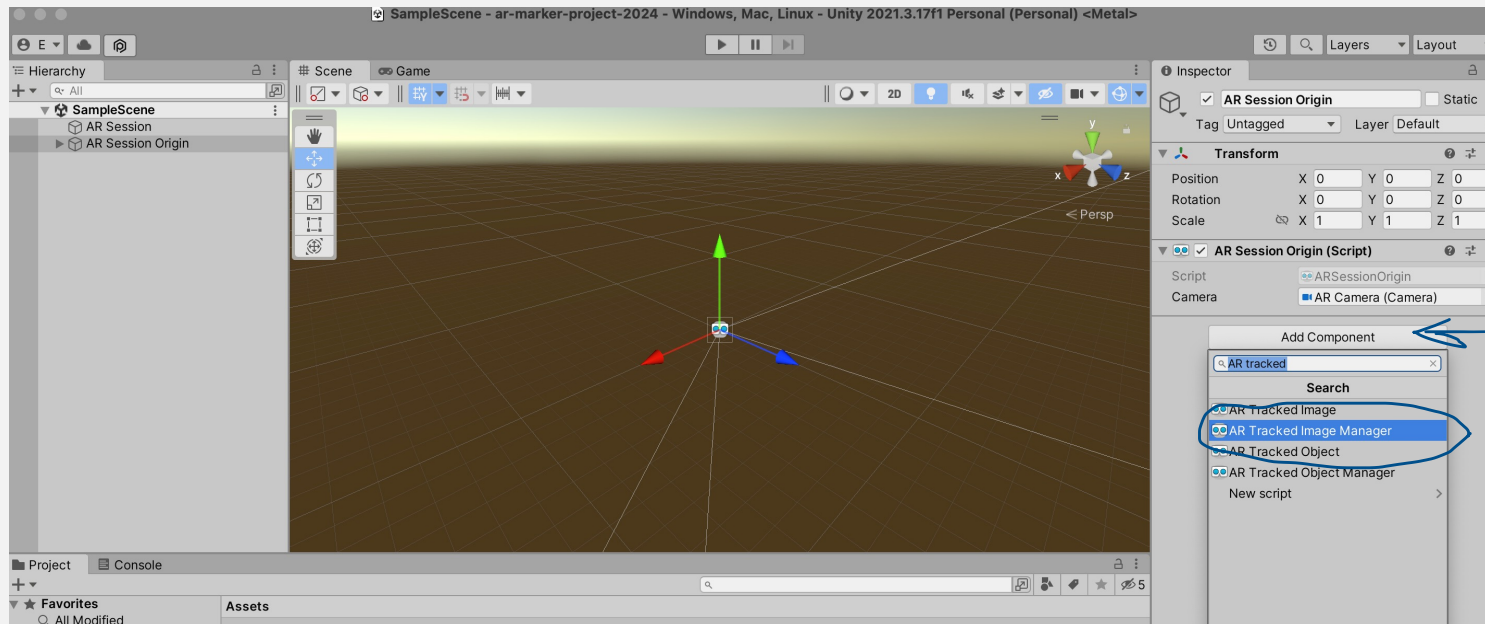
## SETUP THE SCENE

- Create empty scene
- Import from Package Manager the ARFoundation
- Now Remove the Main Camera and the Directional Light from the current open scene and add AR Session and AR Session origin to the scene
- Download the unitypackage from here
- To import the unitypackage go to the Assets > Import > Custom Package and select the ar-marker-project-material.unitypackage



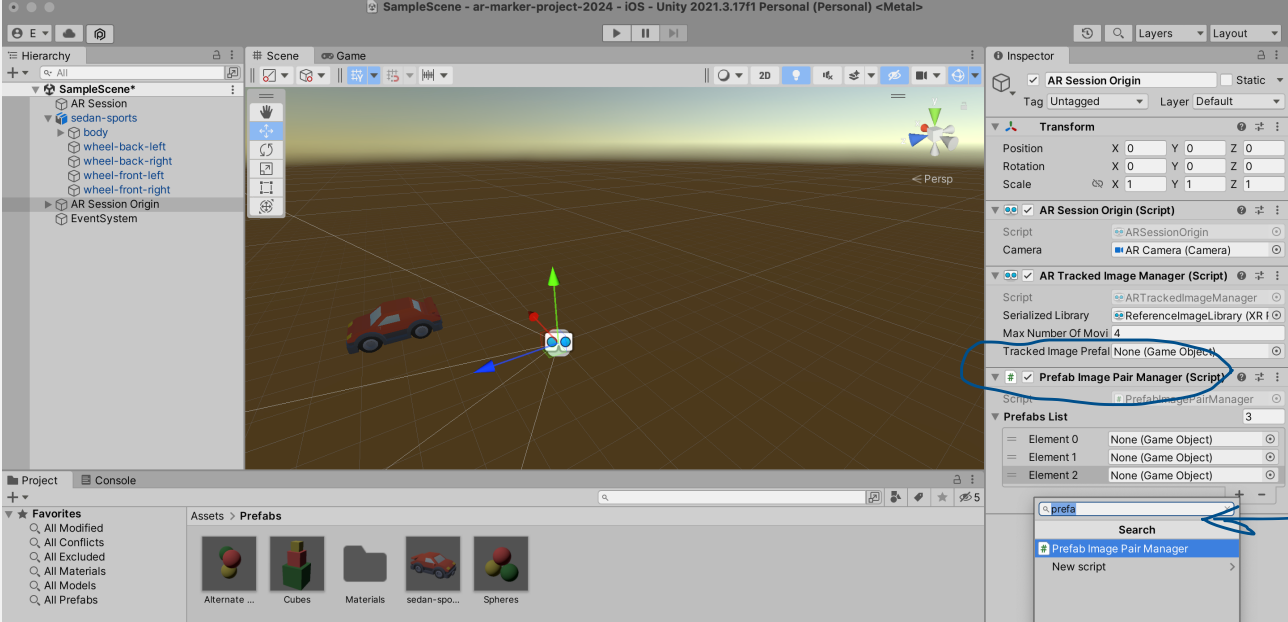
# ADD MARKER MANAGER SCRIPT

Click on the **AR Session Origin** and in the inspector click on Add Component and search for the AR Tracked Image Manager



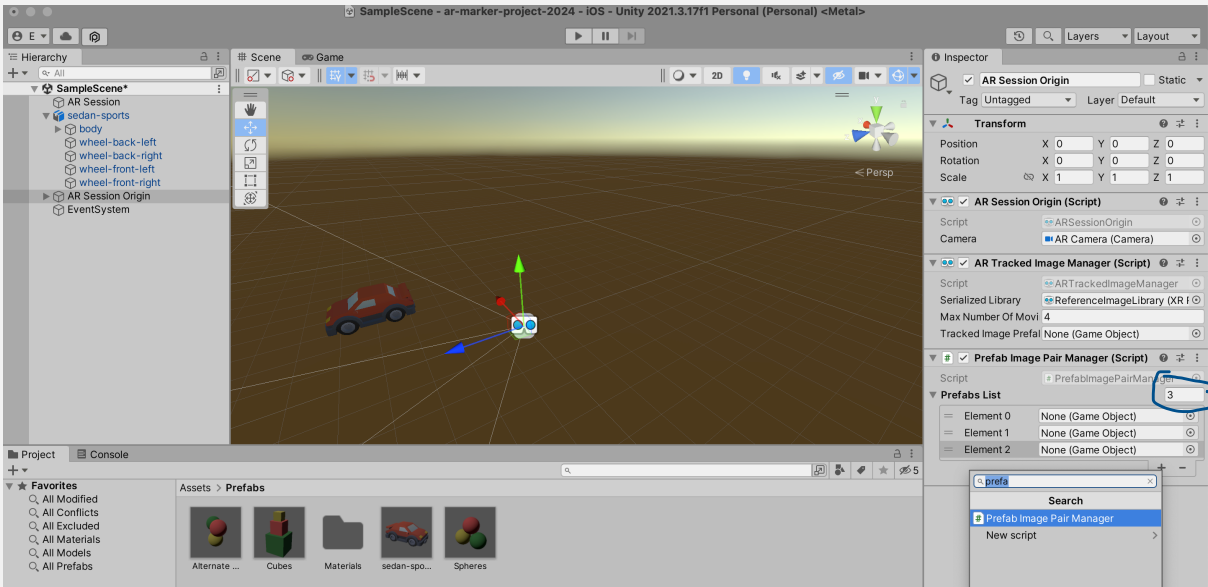
# ADD SCRIPT: PAIR PREFAB-IMAGE MARKER

Always on the AR Session Origin Add Component **Prefab Image Pair Manager**



# ADD SCRIPT: PAIR PREFAB-IMAGE MARKER

In **Prefab Image Pair Manager** set Prefab List = 3



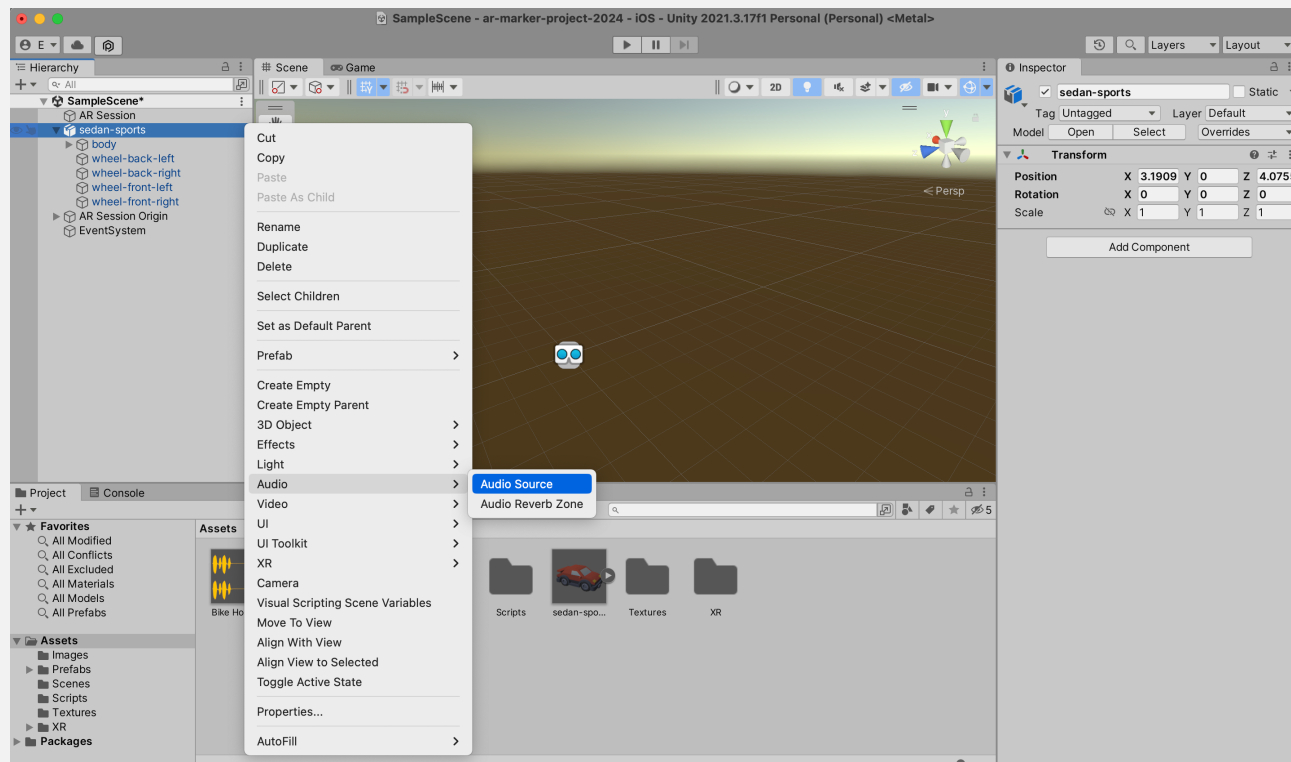
## (I) CAR PREFAB

- Add **sedan-sports** object in the SampleScene (just drag the object in the open scene)



## (2) CAR PREFAB

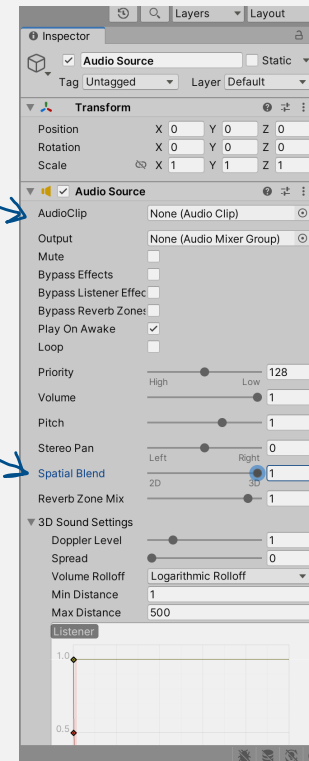
- Add to the **sedan-sports** object an Audio Source as children: right click on **sedan-sports** to add it



## (3) CAR PREFAB

In the Audio Source

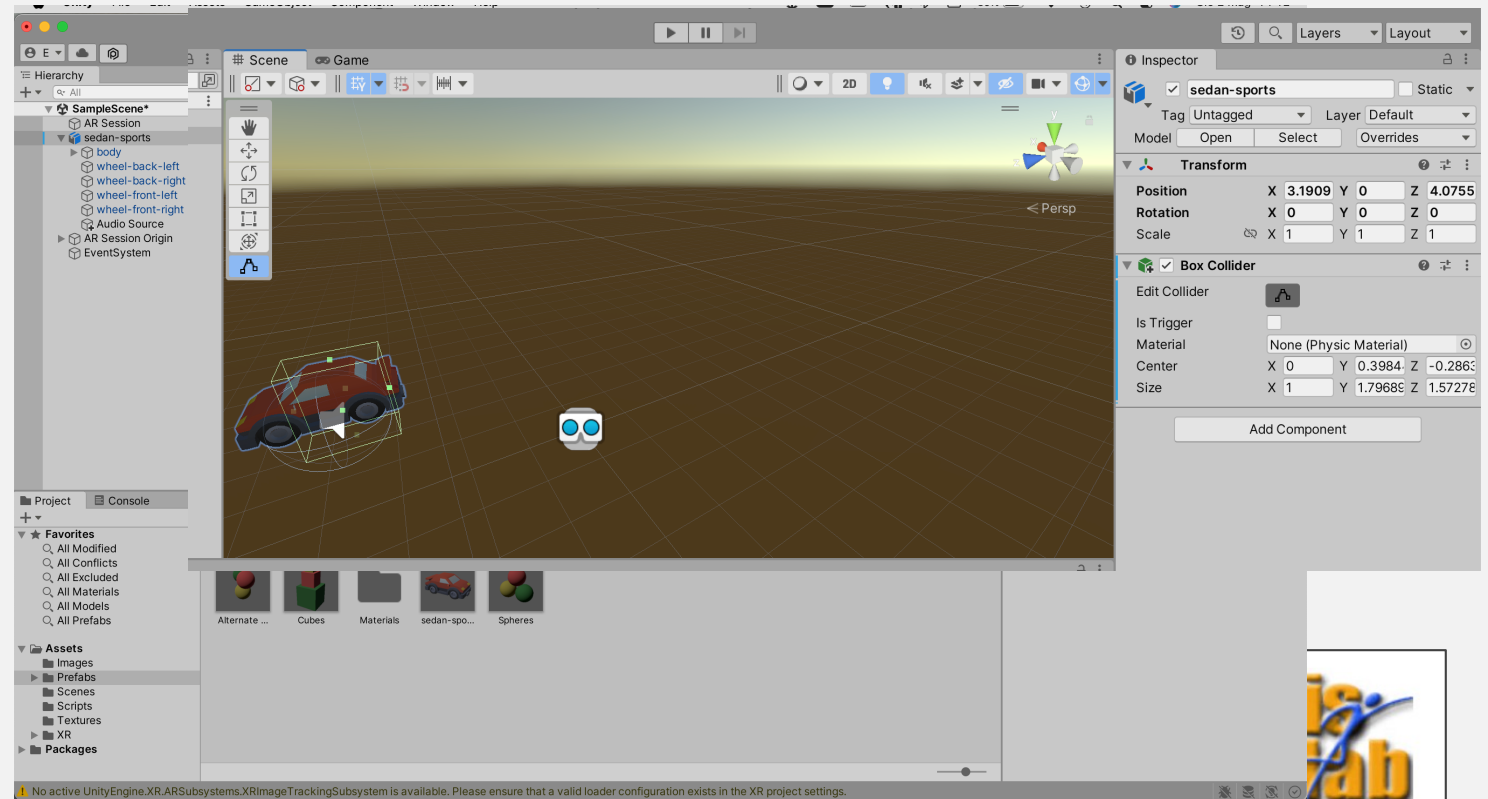
- select Bike Horn audio in AudioClip
- Set Spatial Blend to 3D





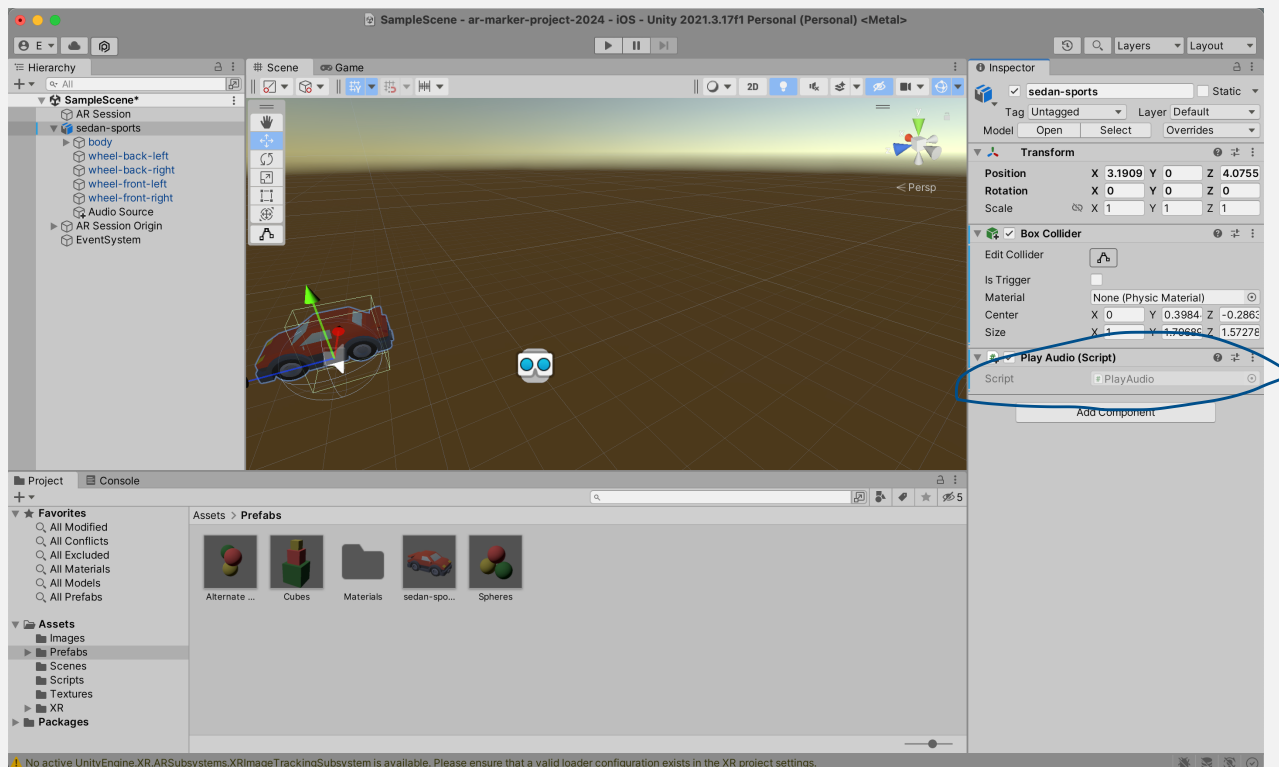
## (4) CAR PREFAB

- To the sedan-sports add a Box Collider and adjust it to the right size



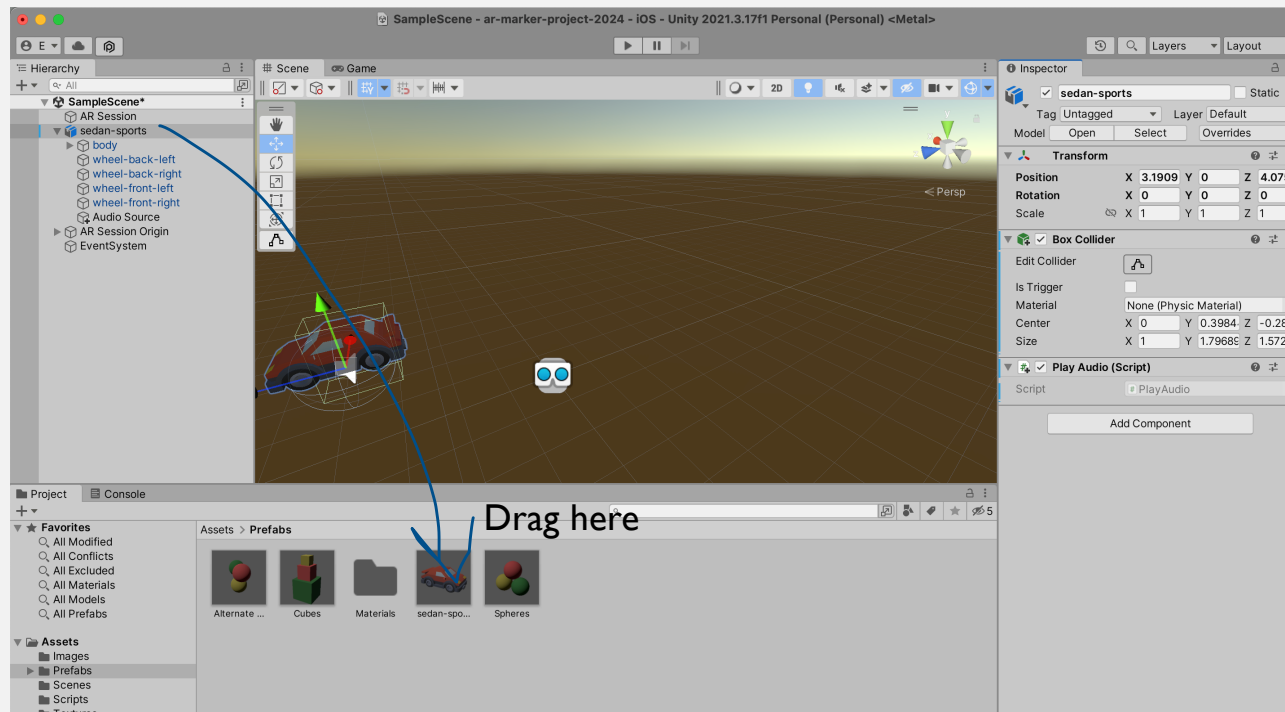
## (5) CAR PREFAB

- Add to the **sedan-sports** object the PlayAudio script



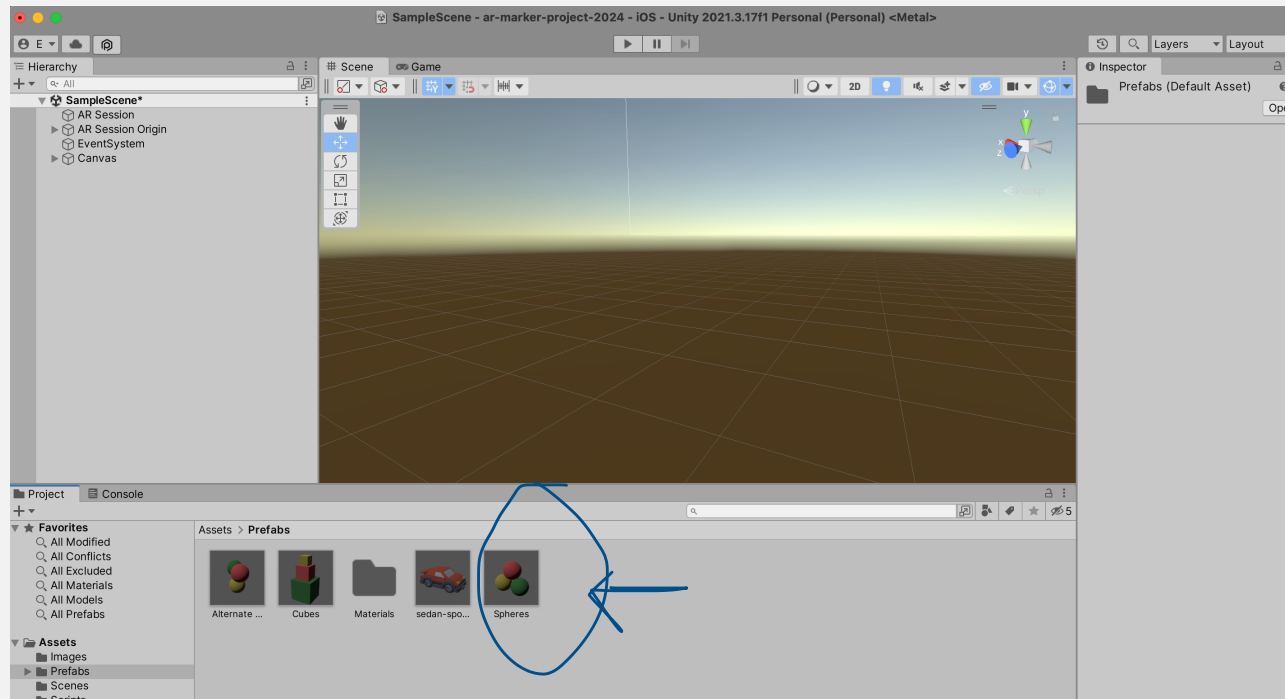
# GENERATE CAR PREFAB

- To generate the prefab Drag&drop the **sedan-sports** object in the Prefabs folder
- Once you have done, delete the **sedan-sports** from the Sample Scene



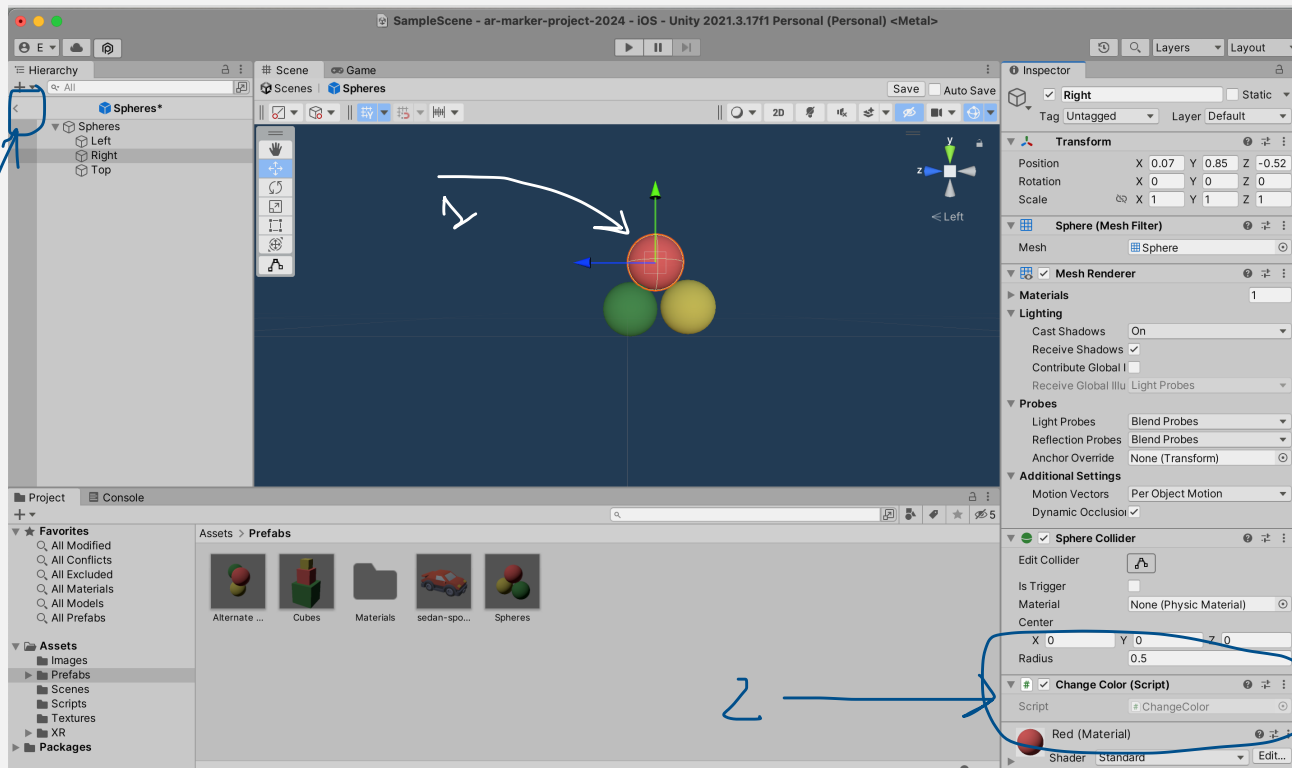
# ADD COLOR SCRIPT TO SPHERE PREFAB

- Double click on Spheres Prefab to open it



# GENERATE CAR PREFAB

1. Click on the Red Sphere
2. add the ChangeColor script
3. then Save with cntrl + S and then exit from Prefab view



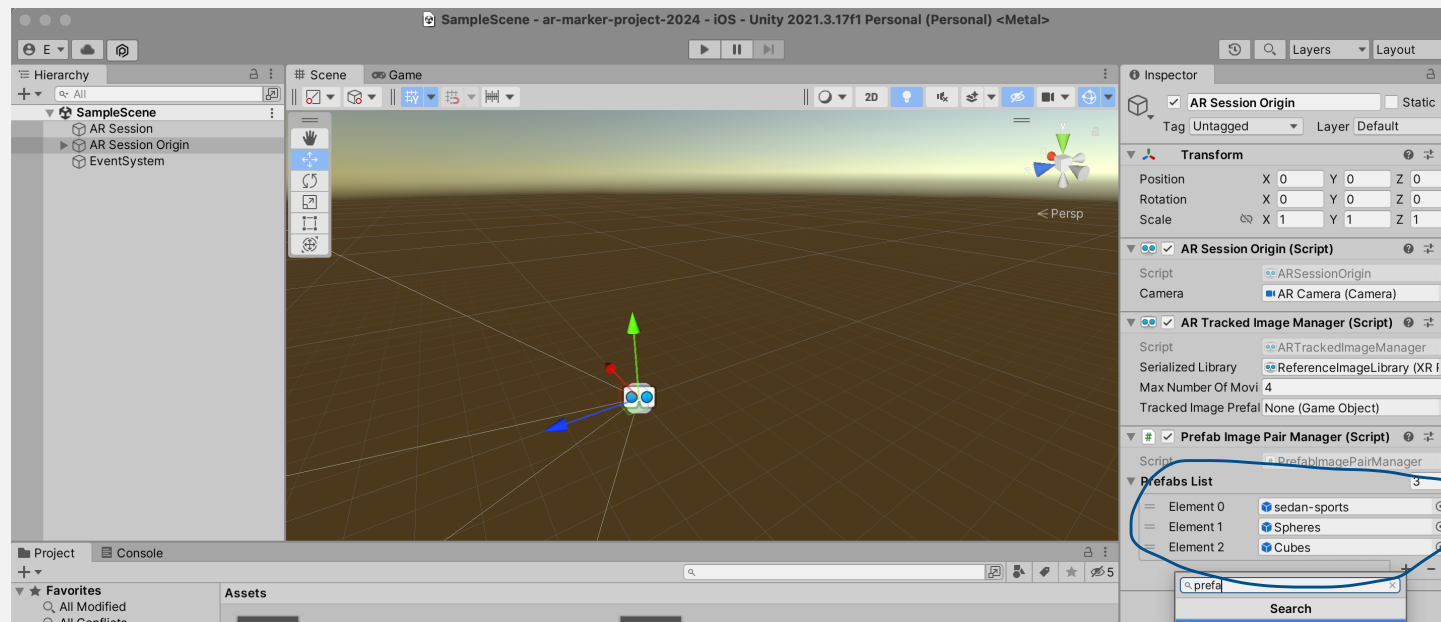
# ADD PREFABS FOR IMAGE TRACKING

- Go to the AR Session Origin in Sample Scene and in the **Prefab Image Pair Manager** add in the **Prefabs List** in order:

0: sedan-sports

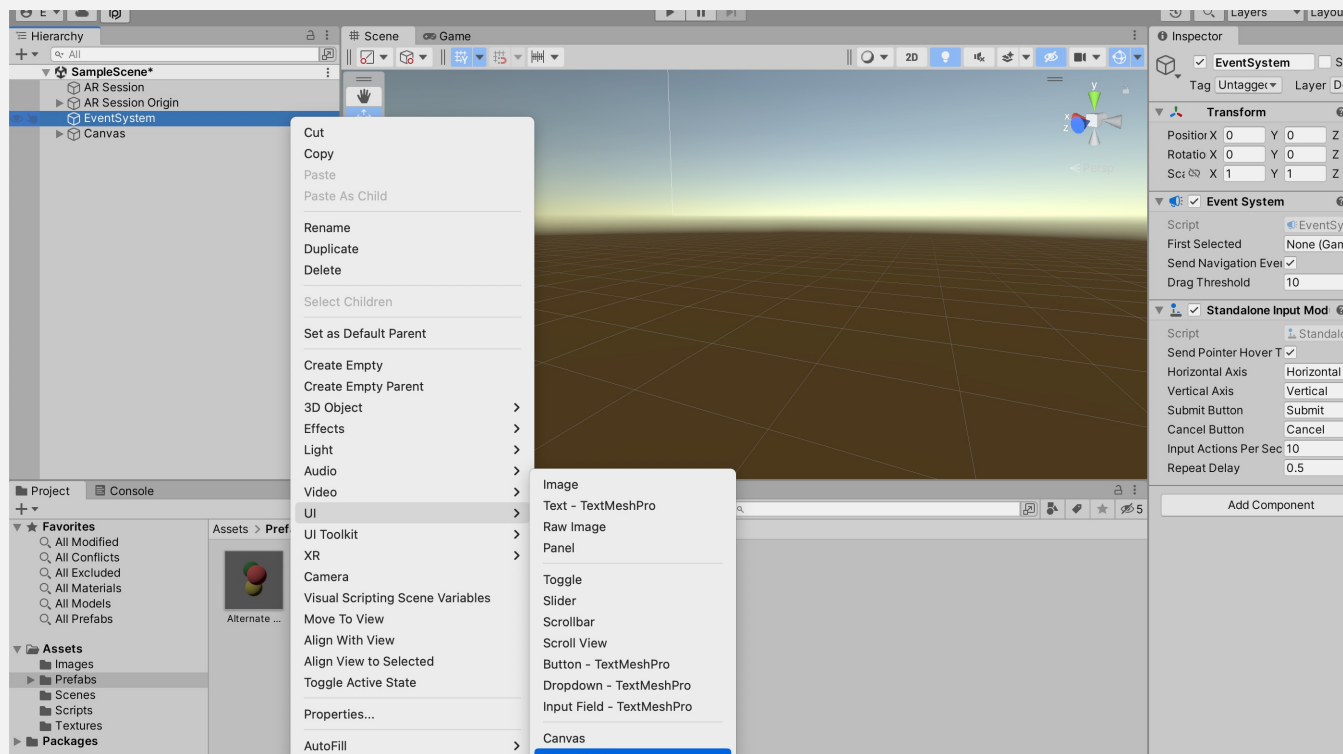
1: Spheres

2: Cubes



# ADD EVENT SYSTEM

- Add the Event system: right click on Sample Scene -> UI -> Event System



# NOW BUILD

- Build for Android or iOS as you have seen in the previous exercise of Solar System

