

Programming Manual

Programming General Semester 2

Movement Package:

1. Open a Unity project
2. Install and import the Movement Package
3. Create a capsule or 3D object that you wish to move - I will refer to this as 'Player'
4. On this player attach the '*ThirdPersonCharacterController*' C# Script
5. Create an empty Game Object and attach this as a child object to the Player
6. Rename this empty object 'Target' and reposition it inside the head of the 'Player' (or where you would like the camera to focus primarily).
7. Next, add the '*ThirdPersonCameraController*' script to your main camera and child that to your 'Target' as well and position it however you wish
8. Select the camera object and go to the inspector in the script attach the 'Target' and 'Player' to their respective sections
9. Hit play!
10. Note: In the inspector, you can adjust the player movement speed and camera sensitivity under their scripts

Radar Package:

1. Open a Unity project
2. Install and import the Radar Package
3. Go to the 'Items' folder in the package and select '*RadarPoint*'
4. Go to the inspector and select layers, and add a new layer
5. On Layer 6 add '*Invisible*' and on Layer 7 '*Radar*' (These must be spelt properly)
6. Go back to the 'Items' folder and select the layer again for the '*RadarPoint*' this should automatically gain the '*Invisible*' layer, same with '*RadarPoint1*' if they do not assign these layers to them
7. Go to the game view and at the top change from Free to Full HD 1920x1080
8. The scene supplied has 5 enemies but to add additional enemies go to the radar script and open the '*Tracked Objects*' and simply drag in objects you wish to be tracked as enemies

Raycast Interaction System:

1. Open a Unity project
2. Install and import the Raycast Interaction Package
3. On your main camera attach the '*CameraRaycasting*' script and adjust the range to 100 (just to make sure it works, you can change this however you wish later)
4. Create some enemies on the level and attach the '*DestroyOnInteract*' script
5. Press play and approach one of the objects
6. Press E while aiming at the object to destroy/interact
7. Tip: Try adding a crosshair/ reticle in the centre of the camera/screen to assist with aiming (make sure you disable Raycast Target in the extra settings)

Notes: This interaction system can be used for anything, however for simplification and time destroy on interaction is a lot easier to get the function across

Camera Shake Package:

1. Open a Unity project
2. Install and import the Camera Shake package
3. On your main camera attach the '*Camera Shake*' script
4. Create a new script called '*Shake*' this script is going to be the thing to cause the shake. This can be anything but we will use an input system just to show it works
5. In this new script type: `public CameraShake cameraShake;`
6. In void update, make an if statement with the following: `(Input.GetKey(KeyCode.Space))`
7. Then inside the if statement we want to run the code from the other script we have with the `StartCoroutine(cameraShake.Shake(.15f,.4f));`
8. Save the script and attach the '*Shake*' script we made to your player/camera and drag it into the '*public Camera Shake*' section drag in your main camera into this spot as well to reference what we actually want to shake
9. Press play and press and or hold space to shake