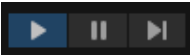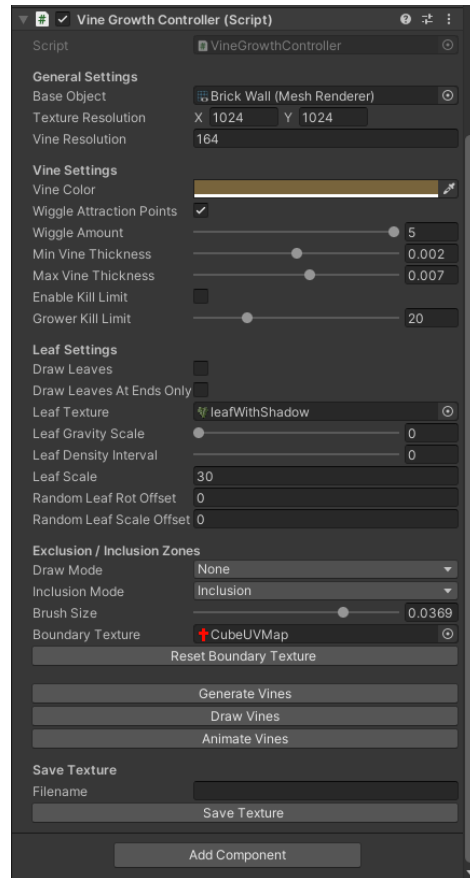**Instructions:**
- Go to the Unity Hub → Click Add → Select the Procedural-Vine-Growth-Project folder
  - Note: Unity 2022.3.20f1 must be installed
- In the **Project** window → Click on the "scenes" folder → Double-click on the "Demo" scene to open it
- In the **Game** window a quad with a brick texture should be rendering
- In the **Hierarchy** window, click on the game object **VineGrowthManager**
- In the **Inspector** window with the **VineGrowthManager** game object selected, you should be able to see a window with the parameters for generating the vines
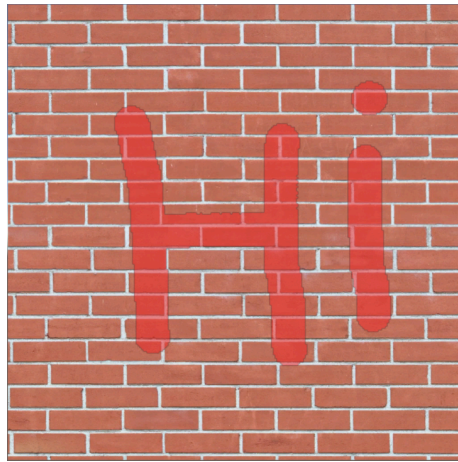 -
- Click on the Play button
  -
- Click on the **Generate Vines** button in the tool's interface to generate the vines
  - Note: the vines won't render at this point, they are just generated
- Click on the **Draw Vines** button to render the vines as texture on the brick wall
  - Alternatively, you can click the **Animate Vines** button to animate the growth of the vines

Painting Inclusion/Exclusion Zones:
- You can use the drawing tool within the Vine Growth Controller to paint inclusion/exclusion zones directly on the mesh
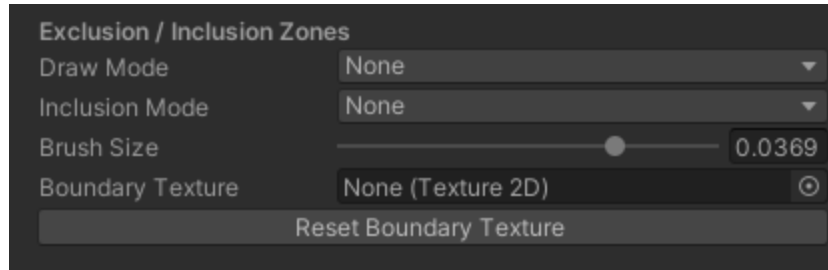
- o
- Making sure Boundary Texture is set to None, while playing, set Draw Mode to "Draw Zones"
  - Holding Left-Click and dragging the mouse over the mesh will allow you to paint on it.
    -
- Afterwards, setting Draw Mode to "Place Growth Nodes" will allow you to Left-Click on the mesh to place a growth node which should be a green point
- Then set the Inclusion Mode and click Generate Vines
  - **Inclusion Mode = Inclusion**:
    - There should be a red zone with a green dot inside it, otherwise no vines will be generated
  - **Inclusion Mode = Exclusion:**
    - There should be a green dot outside the red zones, otherwise no vines will be generated

Saving Texture:
- To save a texture simply enter the file name and click **Save Texture**
  - You will need to have generated and drawn the vines before saving

Changing Object To Generate Vines On:
- To change the object you are drawing the vines on update the Base Object in the Vine Growth Controller script with the new object's mesh component.
- The object should have a material that uses the TwoDiffuseTextures shader
  - To do this go to the materials folder in the **Project** tab and drag and drop the TwoDiffuseMat material onto the mesh
- The object should also have a mesh collider for the painting tool to work on it