



Spawn points

Simple path system to speed up level design and creation.

Contact: utilsplugin@gmail.com



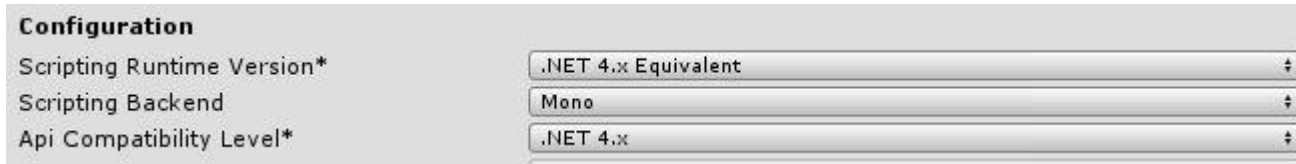
Features

- Simple click and drag controls
- 3D scene editing
- 2D graph editing
- Previewable mesh



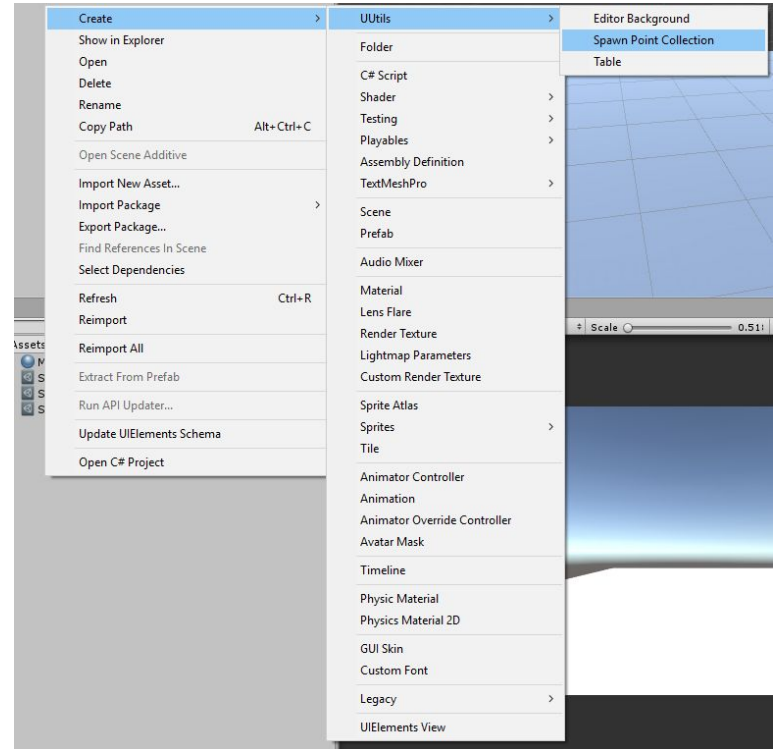
.NET version

- To be able to use this plugin, you need to change you project configuration
- Go to Edit->Project Settings->Player and scroll down to Configuration
- Change to the settings in the picture
- This is required as this plugin uses some features which are not included in lower versions



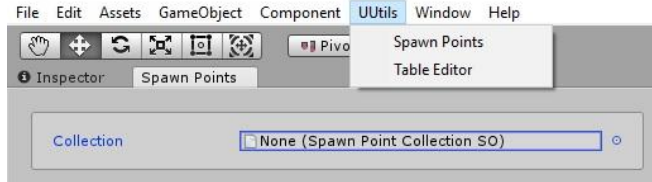
Create collection

- To start, you must create a spawn point collection
- You can create it anywhere in your project
- Right click somewhere in the project
 - Create -> UUtils -> Spawn Point Collection



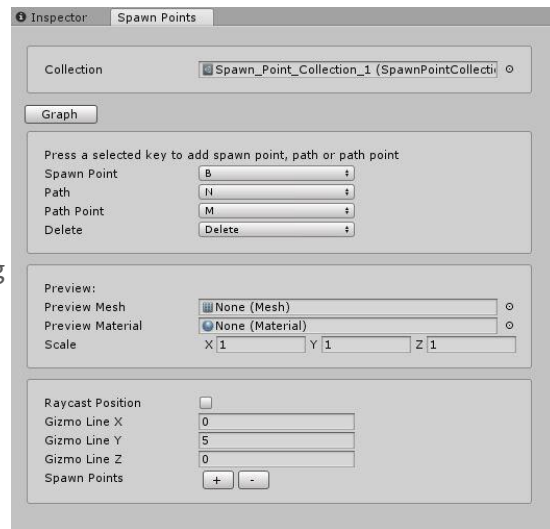
Open interface

- Open the editor window by selecting UUtils -> Spawn Points
- Place your previously created collection in the “Collection” field



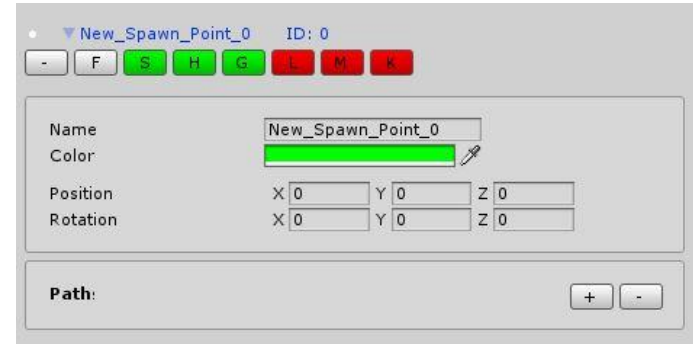
Interface introduction

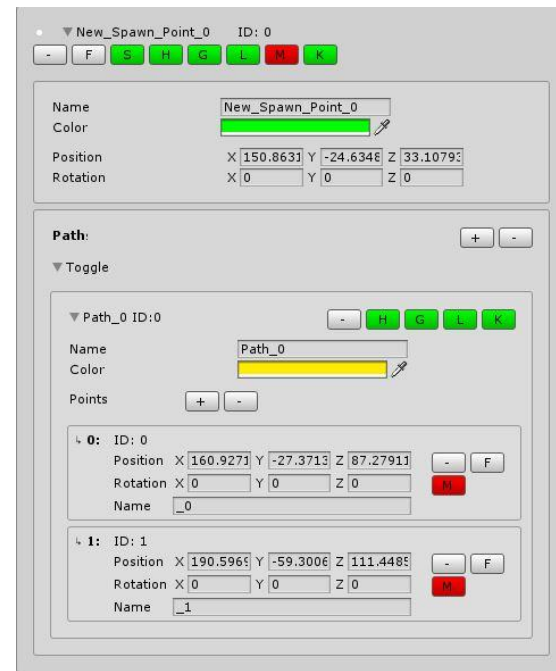
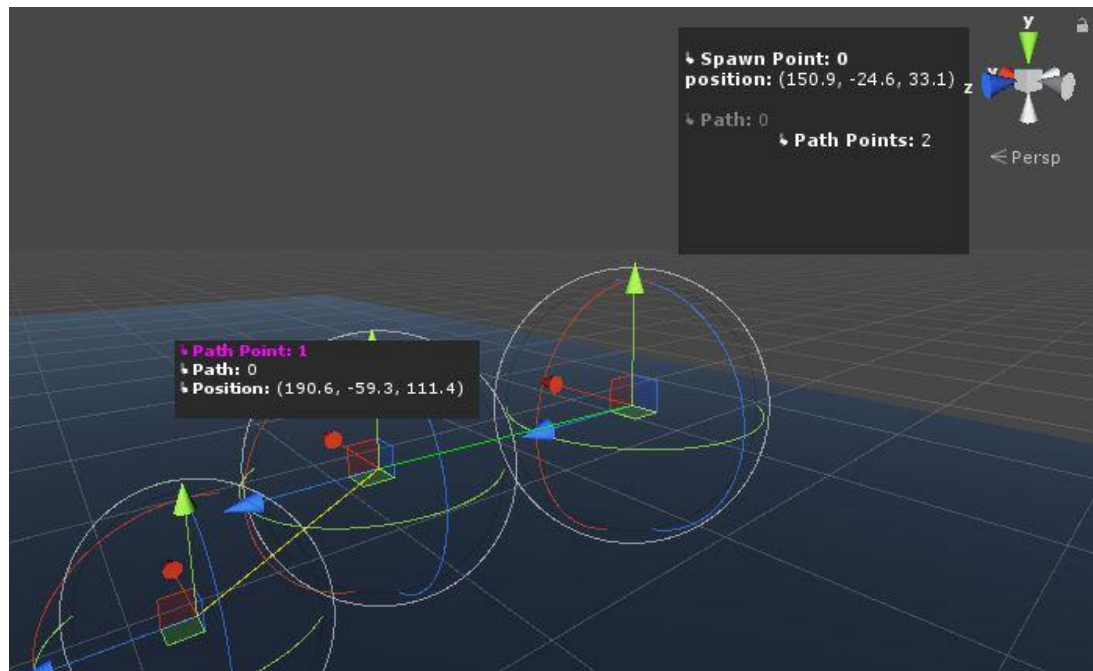
- Keyboard keys
 - Select which keys will be used to create new points
 - Keys are used in scene view and graph editor window
- Preview
 - Set preview mesh to see the object you will be instantiating at a point position
- Raycast position
 - To add points (scene view) using keyboard, scene must have an object with a collider
 - Enabling this option will place a point in the center of the object when creating a point, disabling creates it at the mouse position
- Gizmo lines - visual helpers to help you see created paths
- To create first spawn point, click the “+” button or hover over an object in scene and press the key for creating a “Spawn Point”



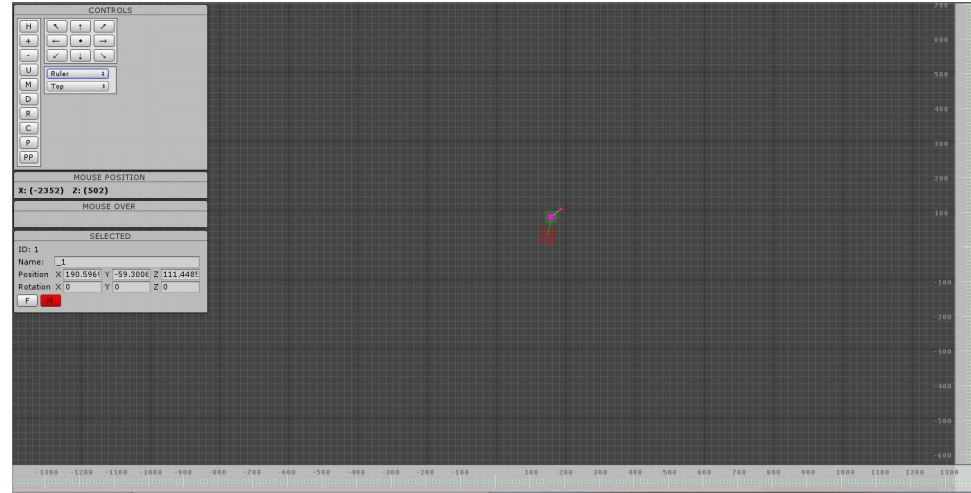
Spawn point

- Top of the bar displays point name and its ID
- Each spawn point, path, and path point has an ID, they're used to get those points from code
- Position and rotation are used to set values manually
- If you want to remove the spawn point use "-" below its name in its title bar
- If you want to focus on the point in the scene view, press "F" button
- Press "H" to hide/show point handles in scene view which allow you to move/rotate a point
- "G" will hide/show gizmo lines between a spawn point and its paths
- "L" hides/shows labels in the scene view
- "M" hides/shows preview mesh at this point in scene view
- "K" enables/disables keyboard controls
- To add a path, click "+", or add it the same way you added a spawn point by pressing the path keyboard key somewhere in the scene with mouse over a collider





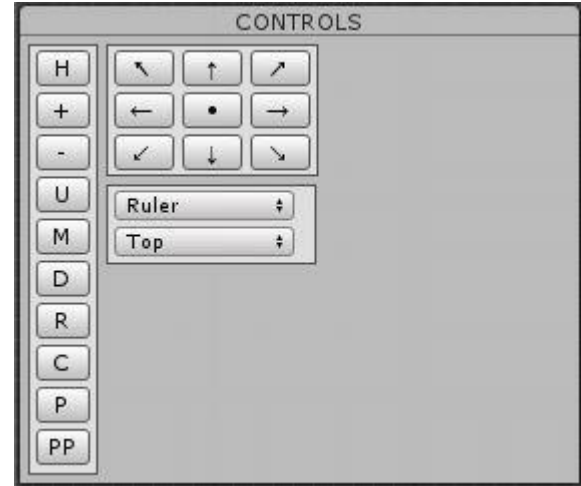
Graph



- Click “Graph” button to open the graph
- Any number of graphs can be opened
- Click and drag with middle mouse button to move around
- Left click an object to select it
- You can select multiple objects by clicking and dragging with left mouse button
- Display rects - spawn points (red), paths (green), path points (magenta)
- Left click and drag a point to move it around
- You can use arrow keys to move around if you don’t have a mouse
- You can also use arrows in the “Controls” UI to move around
- Press the “●” to center the graph

Controls

- You can change view between “Ruler” and “Intersection”
- Change view side between “Top” and “Right”
 - Top - x (horizontal), z (vertical)
 - Right - z (horizontal), y (vertical)
- “H” - show mouse helper which displays current mouse position
- “+” and “-” zoom in/out
- “U” - unhide all hidden handles for moving points
- “M” - measures real scene distance between two points
 - Use right click to select points
- “D” - deletes all points selected with the selection box
- “R” - remove a single point, right click a point to delete it after selecting this option
- “C” - allows creating a spawn point with right click
- “P” - allows creating a path with right click, must select a spawn point before (with left click)
- “PP” - allows creating a path point with right click, must select a path before (with left click)
 - Select a previously created path point to insert a new one right after it





Graph: Selection box

- To select multiple points, left click and drag over multiple points to select them
- If you want to drag all those points at once, hold shift key, place a mouse over any of those selected points, left click and drag (while holding shift) to move all points
- You can delete all selected points by pressing the “Delete” key set in the collection editor window



Graph: Points

- You can use keyboard controls to add points
- Place mouse anywhere in the graph and press previously set key to add a spawn point (red)
- Created spawn point is selected and you can immediately add paths using the “Paths” key
- Each path automatically has a path point (magenta) added to it
- Path (green) is always centered around the first point
- Created path is selected and you can immediately add path points using the “Path Point” key
- To select a any of previously created points, place mouse over them and left click
- Drag them by performing a left click and drag
- To drag all points in a path at once, place your mouse over the green part of the path and drag
- If you want to drag every path and path point with their spawn point, select a spawn point and make sure the “S” button is disabled (red), then left click and drag the spawn point