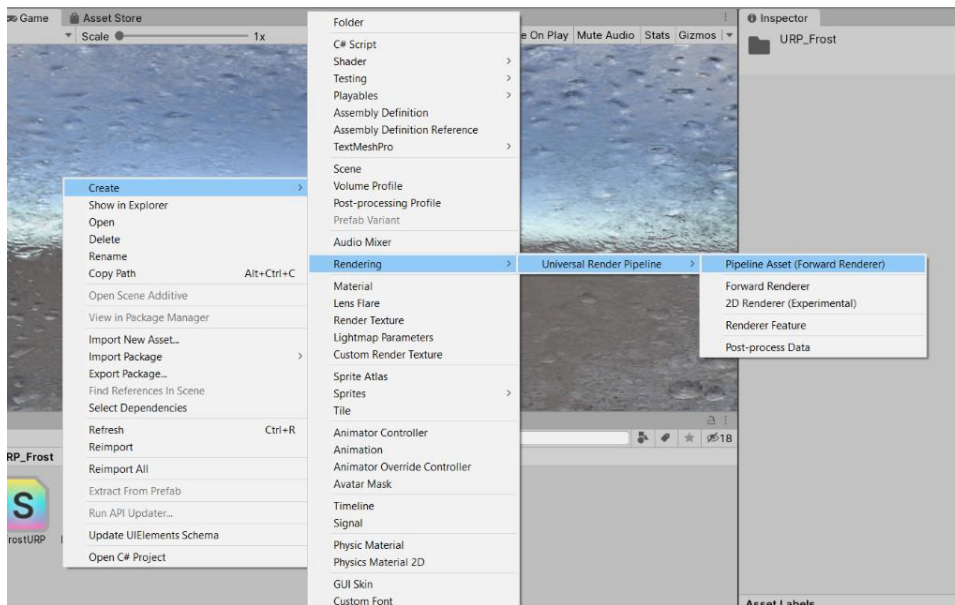


# FAST BLOOM URP

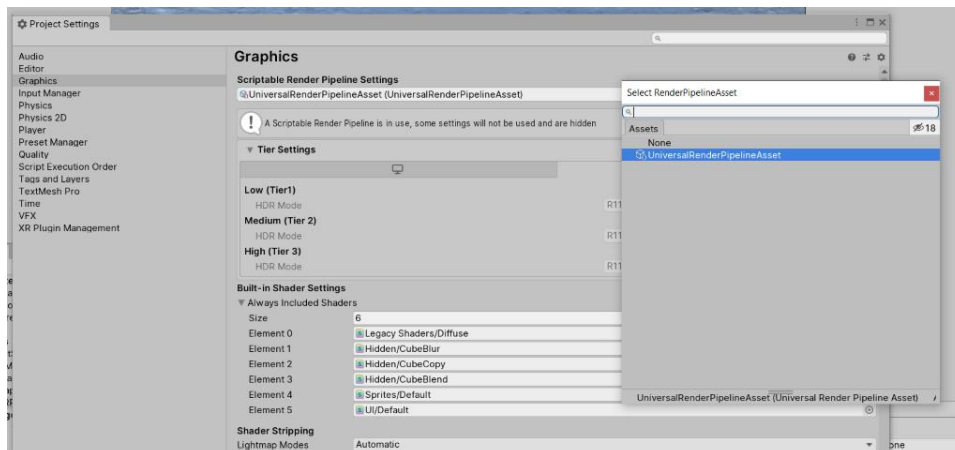
## How to setup URP

*\*if you have already configured urp for your scene skip this part*

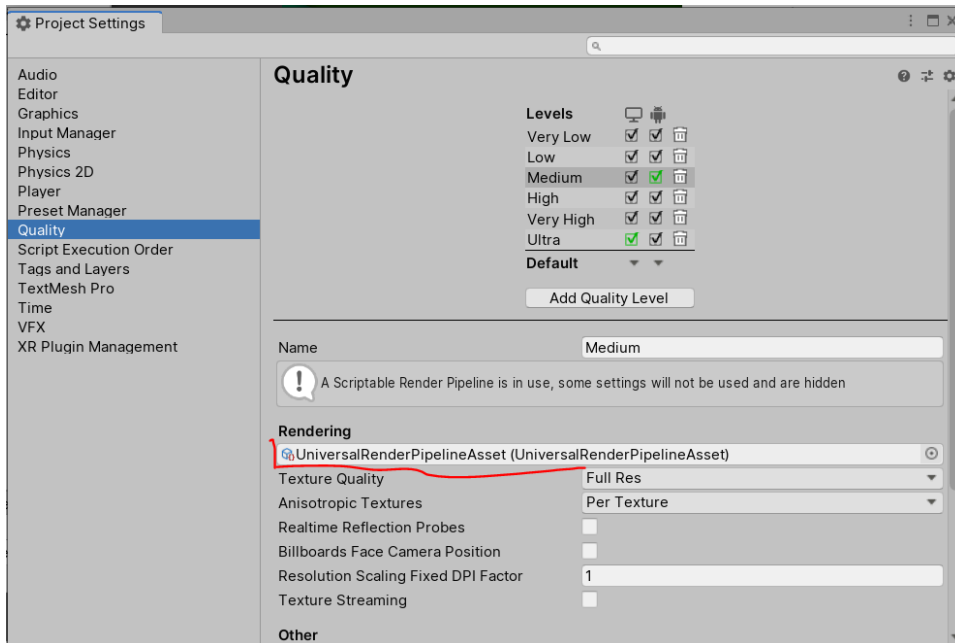
1. Firstly install the URP package to your project. Go to **Windows->Package Manager**. In the list find the LightweightRP and install it.
2. Firstly we need to create the Pipeline Asset. For that press **RightClick->Create->Rendering->UniversalRenderPipeline->PipelineAsset**



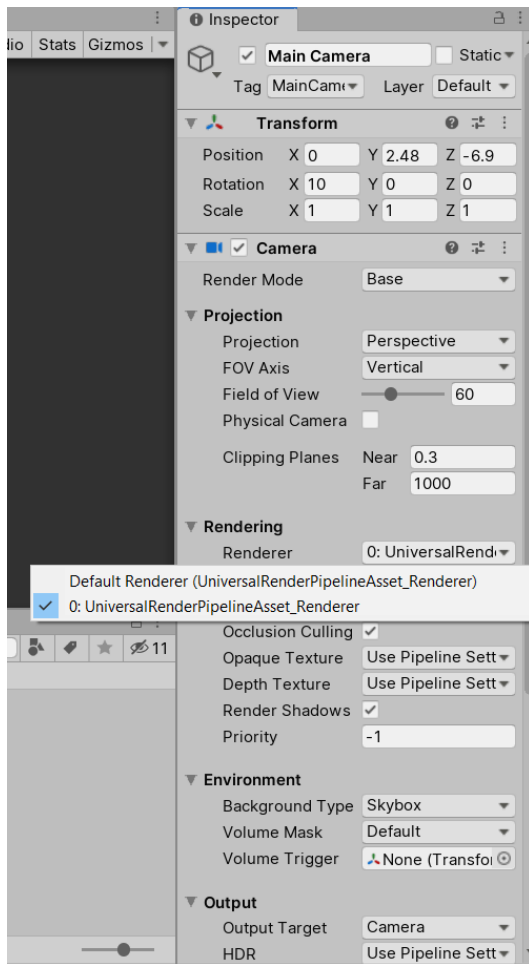
3. Go to **Edit->ProjectSettings->Graphics**. In the Scriptable Render Pipeline Settings, drag and drop the pipeline asset that we created in previous section



4. Go to **Edit->Project Settings->Quality**. In rendering section drag and drop the pipeline asset you created

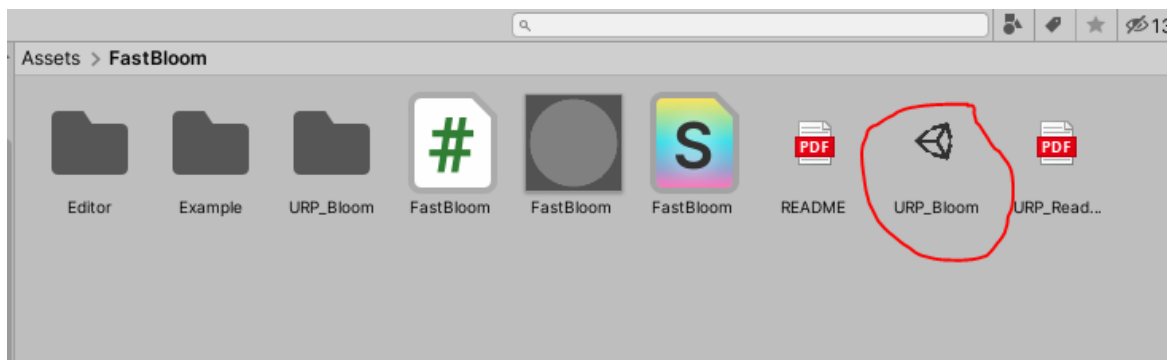


- 5Go to your camera object and in **Rendering** settings pick for **Renderer** the pipeline asset you created

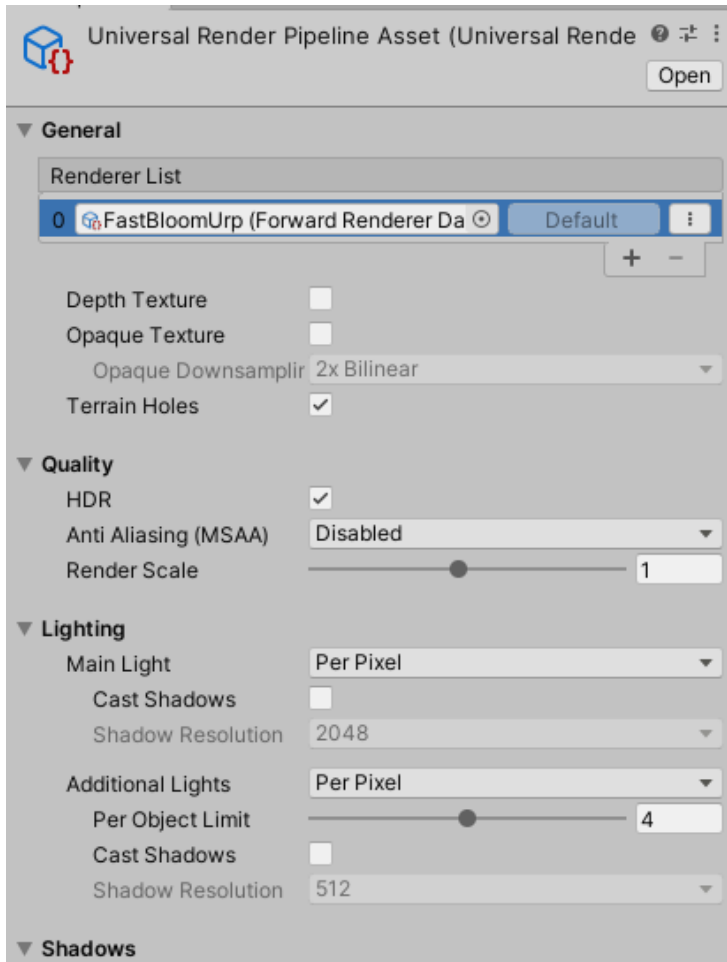


## How to apply URP Fast Bloom:

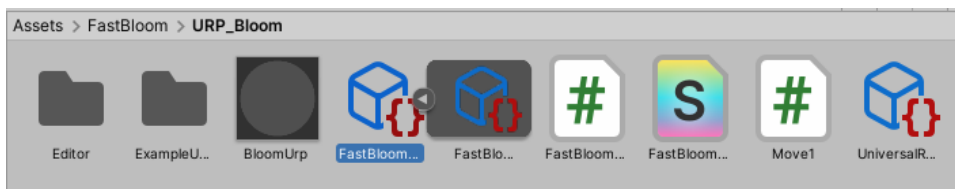
1. Firstly import the package URP\_Bloom which is included in the asset

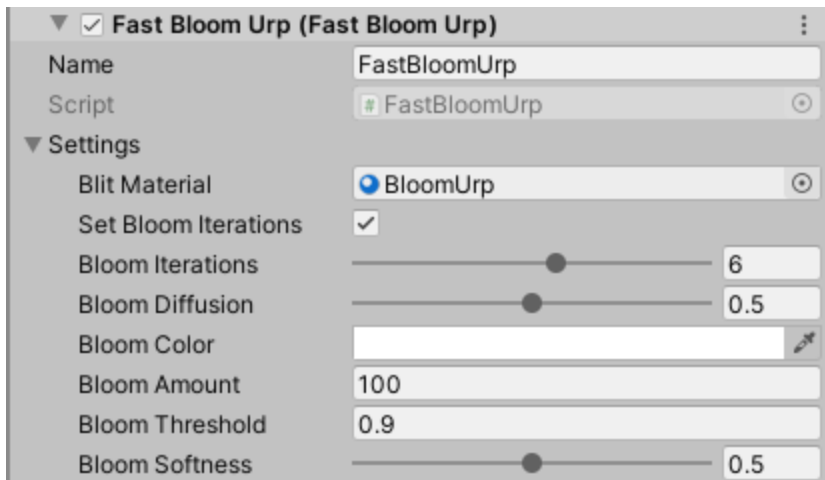


2. Open the settings of the URP pipeline asset. In the General tab in RenderList pick the FastBloomUrp



3. That is pretty much it. To change the parameters go to the URP\_Bloom folder. Find FastBloomUrp and click it. You will see in the inspector the parameters of it.





## PARAMETERS

- **SET BLOOM ITERATIONS** – Tick to set manual number of bloom iterations. If disabled bloom iterations set automatically based on the screen resolution.
- **BLOOM ITERATIONS** – how many iterations are used to draw bloom. **Less iterations, less quality, more performance.** In most cases 6 is the most desired value between quality and performance. In some scenes the reduction of bloom iterations will not affect the quality. Use wisely.
- **BLOOM DIFFUSION** – level of diffusion of the blur
- **BLOOM COLOR** – color of the bloom effect
- **BLOOM AMOUNT** – amount of bloom applied to final image
- **BLOOM THRESHOLD** – threshold, which reduces the brightness of not bloomed part of the scene.
- **BLOOM SOFTNESS** – the smoothness of the threshold

## SHADERS

- **BLOOM- The fastest bloom in the Asset Store.** Completely optimized bloom. Runs at **42-53 FPS** on lowend mobile device(with proper settings)..

All the testing was made on low-end mobile device Meizu M2 Note in the scene containing:

- 101 different gameObjects,
- 101 different Materials,
- 51 different Textures,
- 1 Directional Light(realtime),
- approximately 45k polygons