

# Kyle McArthur – Assignment 1, Procedural Generation

## GUI Documentation

### Hot Keys

W – forward in camera's z axis  
A – left in camera's x axis  
S – backwards in camera's z axis  
D – right in camera's x axis  
E – Up in camera's y axis  
Q – down in camera's y axis  
Space – Up in World Y Axis

R – reload shaders

T – reload perlin texture and meshes

### Perlin

“**Texture Size**” edits perlin texture size

“**Mesh Size**” edits perlin mesh size

“**Height**” amplitude of each octave

“**Octaves**” increases detail of the perlin texture

“**Persistence**” smoothness of each octave,  
higher value == less smoothness

### Lava

“**Direction**” edits lava uv scrolling direction

“**Speed**” edits lava uv texture scrolling speed

“**L\_Height**” edits lava height for fragment shader

### Dirt

“**D\_Height**” edits dirt height for fragment shader

### Rock

“**R\_Height**” edits rock height for fragment shader

### Lighting – direction light

“**Direction**” changes lights direction

“**Color**” edits light color

“**Intensity**” defaults to 1,  
doesn't currently change for directional light

