

Skyrim – Scripting with the Creation Kit

Chapter 1: Location based spells

While starting out to learn scripting with the new papyrus language one usually begins with the normal fire and forget, aimed spells (e.g. a fireball). This can produce decent results in itself, but as we get more experienced we strive to achieve different effects. Did you ever feel the need to hurl a meteor toward your foes by just aiming on the floor in front of them? Or let them go up in flames by placing a gigantic wall of fire in their path? Or... well, I think you get it.

Like me you probably thought: Hey, there's a category of spells labeled "target location". This should be easy! Sadly it's not that simple, as the standard procedure only allows you to aim at a location in the world and fire a spell at it. This will place a preset magic effect (one you can choose in the creation kit), however it does NOT return you the position hit. This poses a number of problems. How can we place fire, rocks or anything else (all objects) somewhere (using a script), if we have no idea where to place them? This limits our ability to create amazing spell designs severely.

Bear with me, you're in luck as there's a workaround we can use to create exactly the effect described:

- Create the spell
- Create a magic effect attached to it (this will do nothing but fire an empty explosion)
- Explosions CAN place objects (which is why we create one to place an xMarkerActivator)
- This xMarkerActivator will have a script added in order to do anything we want in its OnInit event
- We can read the position of an xMarkerActivator (or any object for that matter)
- After that we destruct it again

What will YOU need?

- Basic understanding of spell creation
- Basic understanding of effect creation
- Rudimentary scripting skills
- Navigation capabilities in the creation kit

Check for all of those? Sounds simple enough?

Let's get to it...

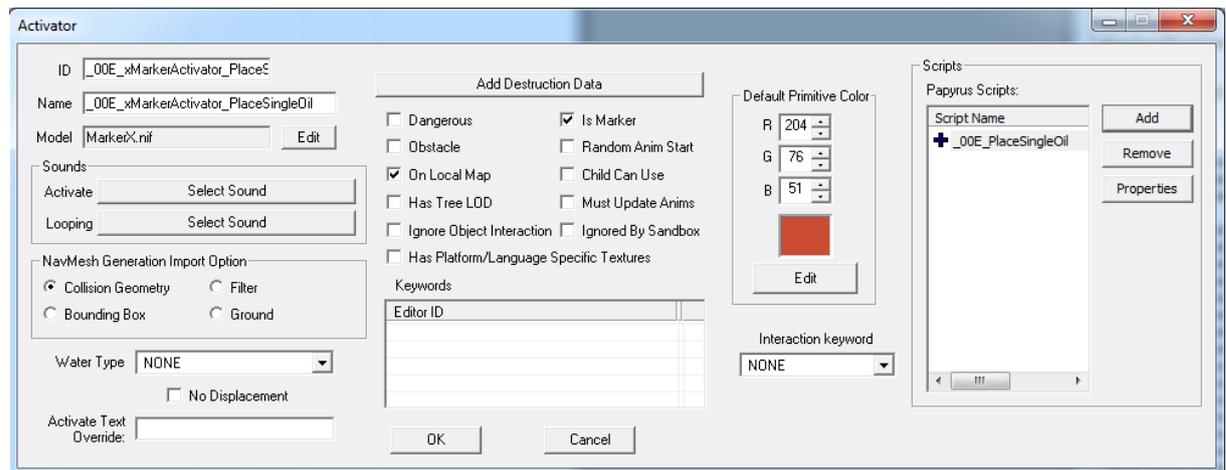
Step 1:

- Create the script (you can find it attached to this tutorial)

```
_00E_PlaceSingleOil.psc - Notepad
File Edit Format View Help
Scriptname _00E_PlaceSingleoil extends ObjectReference
ObjectReference refBurningoil
Event OnInit()
    refBurningoil = SELF.PlaceAtMe(Game.GetForm(0x000862CC)) ;xMarker position, 0x000862CC = oil
    RegisterForSingleupdate(0.5) ;0.5s delay
EndEvent
Event onUpdate()
    refBurningoil.Enable()
    refBurningoil.damageObject(5.0) ;Makes oil start to burn
    SELF.Delete() ;Destruct xMarker
EndEvent
```

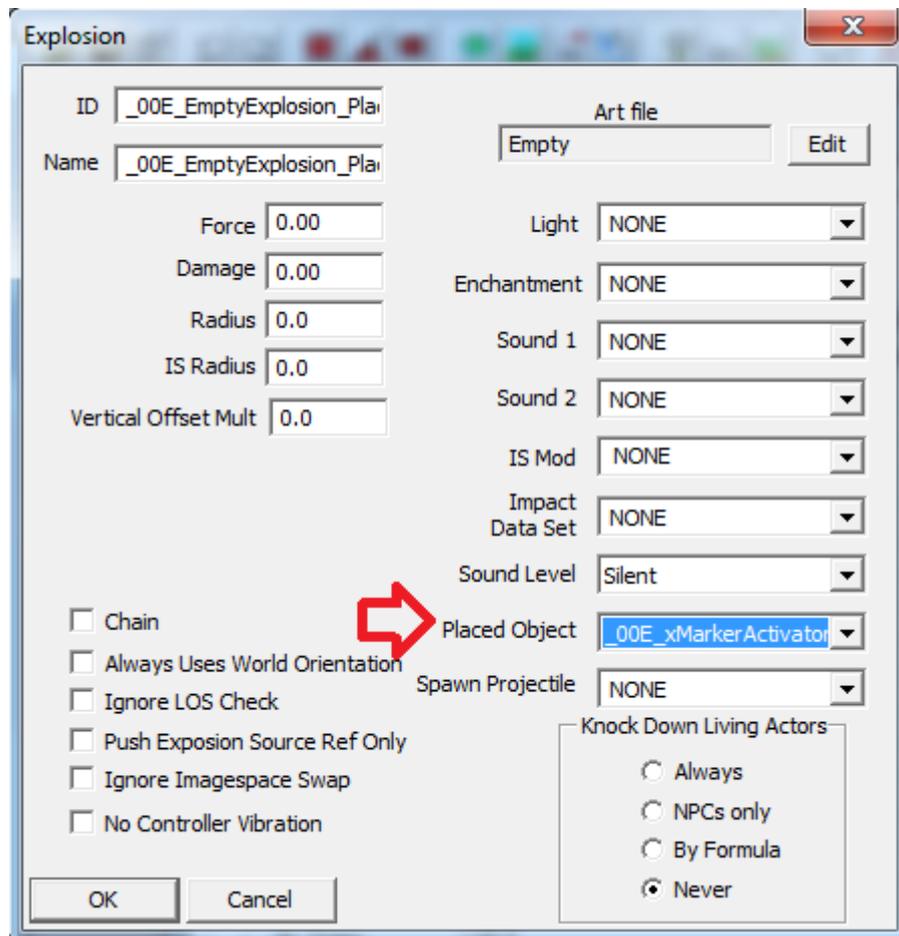
Step 2:

- Create the xMarkerActivator to run the script
- Be sure to add _00E_PlaceSingleOil



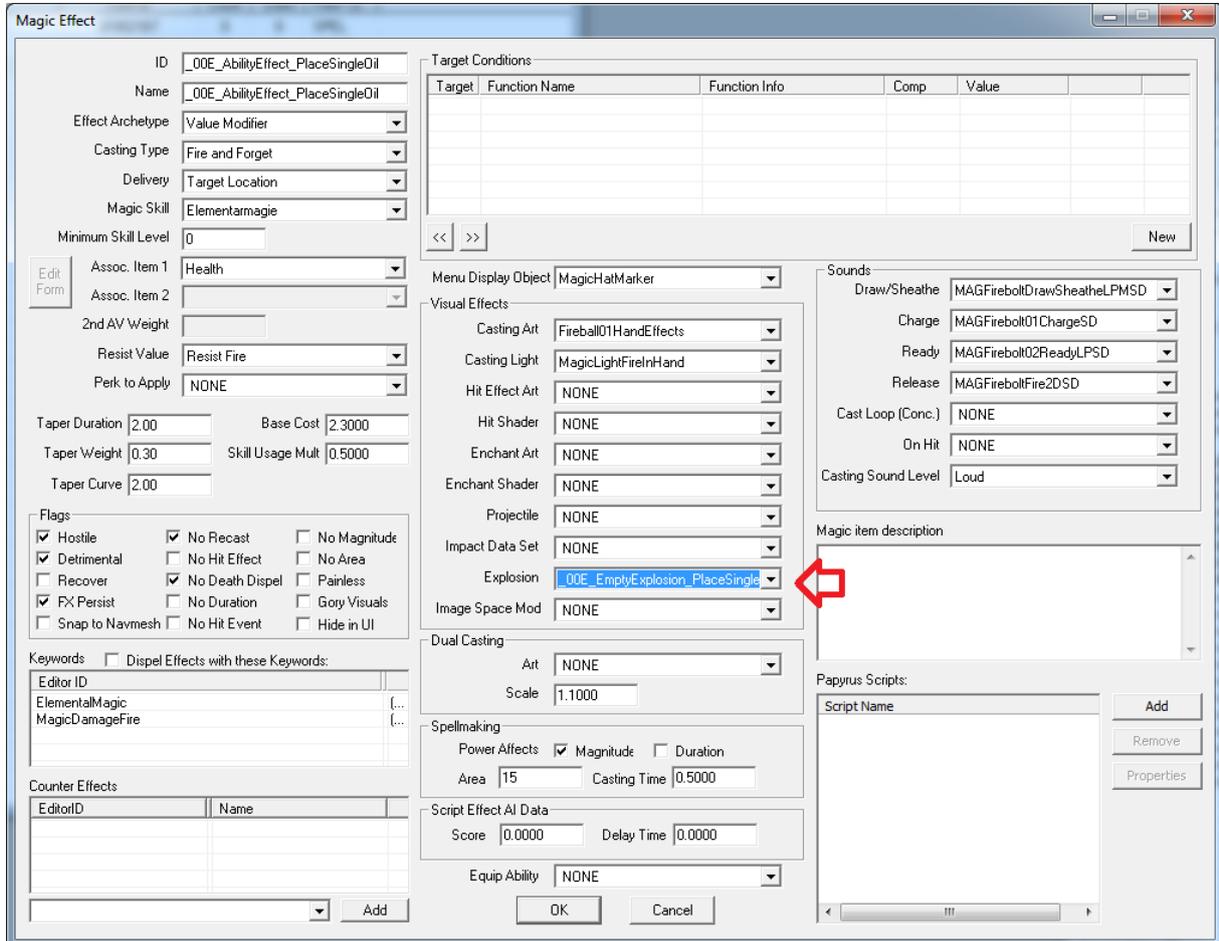
Step 3:

- Create the explosion to place our xMarkerActivator
- Make sure to set "placed object" correctly



Step 4:

- Create the magic effect
- Make sure it's "fire and forget" and "target location"
- Make sure our custom explosion is attached correctly



Result should look like this:

