Spell Creator

Concept

A visual spell creator made up of events and actions. This tool is meant for more complex spells like 'A burst of fireballs that explode into small bouncing orbs dealing damage over time'

Targeted at game designers, the tool should include many pre-made nodes and ways to add custom particles, models, etc. But with programming knowledge, the tool should be easily expandable.

(I will use the word 'spell' although this tool should be capable of creating standard guns)

Features

Each spell consists of events that trigger actions. Actions should contain modifiers to customize.

Necessary events are:

- When the spell is used/fired
- When a projectile hits something
- When an action or script deals damage and calls this event
- At regular intervals

Necessary actions are:

- Create a projectile
- Create particle
- Deal direct damage
- Deal damage in an area

An example of a modifier is a 'spread' modifier for creating projectiles. This could be used for shotguns-like behavior.

Important thoughts for the design

What makes the tool function?

- a. The tool creates a script on the spell
- b. One script uses the settings set in the tool

When new projectiles are created by the weapon, should their behavior be edited in the same window?

- Preferably yes, this way all behavior is visible in one screen.

There should be no limit in actions.

It should be possible to trigger other scripts (through Unity Events) as an action

There should be a lot of customizability. Preferably in the form of modifiers that can be added when needed.

Easily add custom Events, Actions, and Modifiers

How to save the data?

There should be some sort of interface to make sure the tool can access the user's scripts (When a user has their own player script, there should be a defined way to make it work with the tool so that it can trigger damage for example)

Repertoire Research

There are surprisingly few similar tools I could find. Most 'tools' I found were very limited and used inspector fields. I will need to search for more.

- weapon system
 Very Limited, Paid
- 2. <u>easy weapons</u>

Somewhat flexible for standard guns

3. https://github.com/bevren/Unity-Spell-Maker
Very Limited, looks to be only for 3rd person RPG

Code Help

- 1. How to build a modular spell ability system
- 2. How I implemented spells in my RPG (LONG)