

DragonRuby

Game Samples

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Abstract

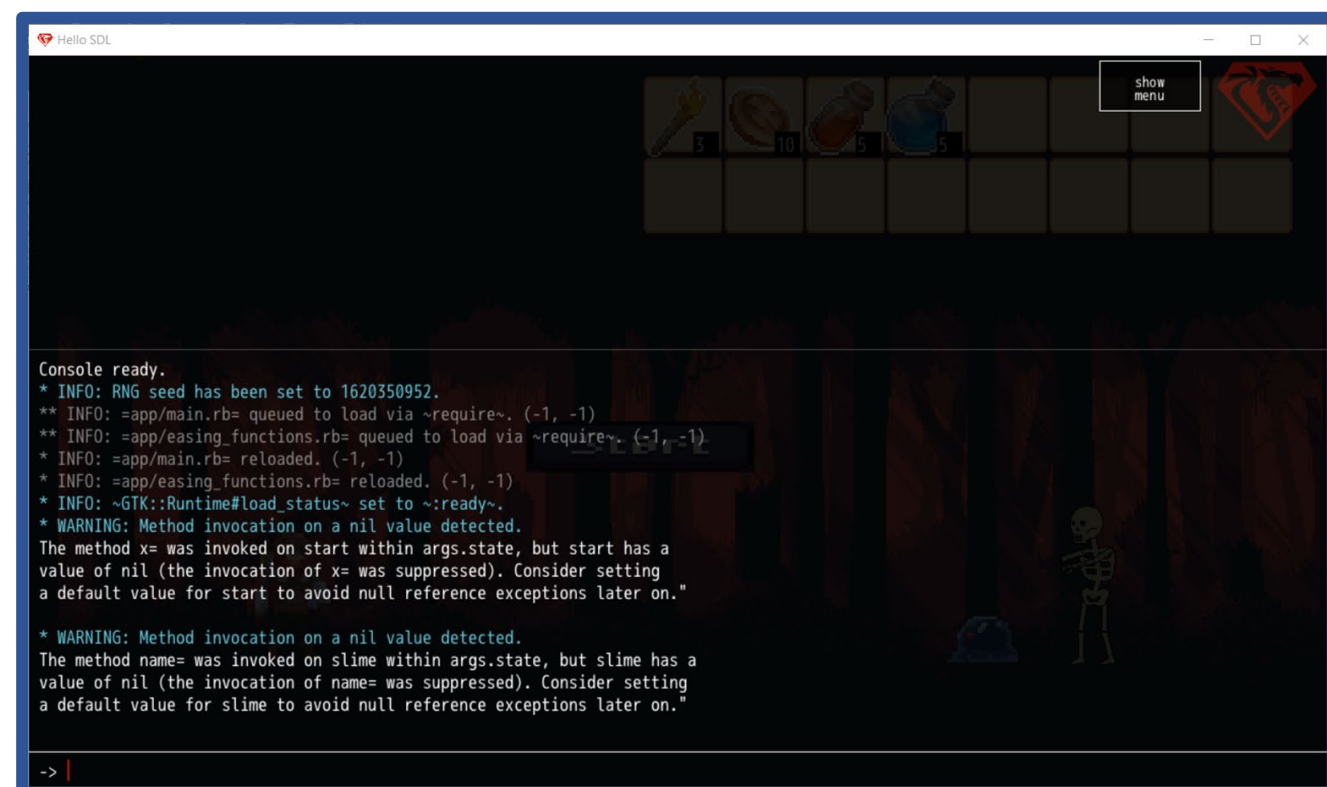
Creation of video game sample applications utilizing the DragonRuby Engine to display the functionality and features, as well as create new ones in the production of commercial video games made through the Engine. DragonRuby uses ruby as its native scripting language and acts as a display and console while in the process of editing. Our sample applications will be used to further the development of DragonRuby as an IDE and provide a backbone for future developers utilizing the platform.

Keywords: Applications, Game Engine, DragonRuby

Architecture

DragonRuby Engine

The DragonRuby Engine acts as a console or terminal overlay that is also a Ruby REPL. By saving a file as a .rb and running it using a batch file, the DragonRuby console displays the current results.



Impact

- DragonRuby has benefitted from project functions pushing the limits of the engine
- Users of the DragonRuby engine can examine new physics simulating functions through sample apps
- Users of the DragonRuby engine can examine visual effects in through sample apps

Performance

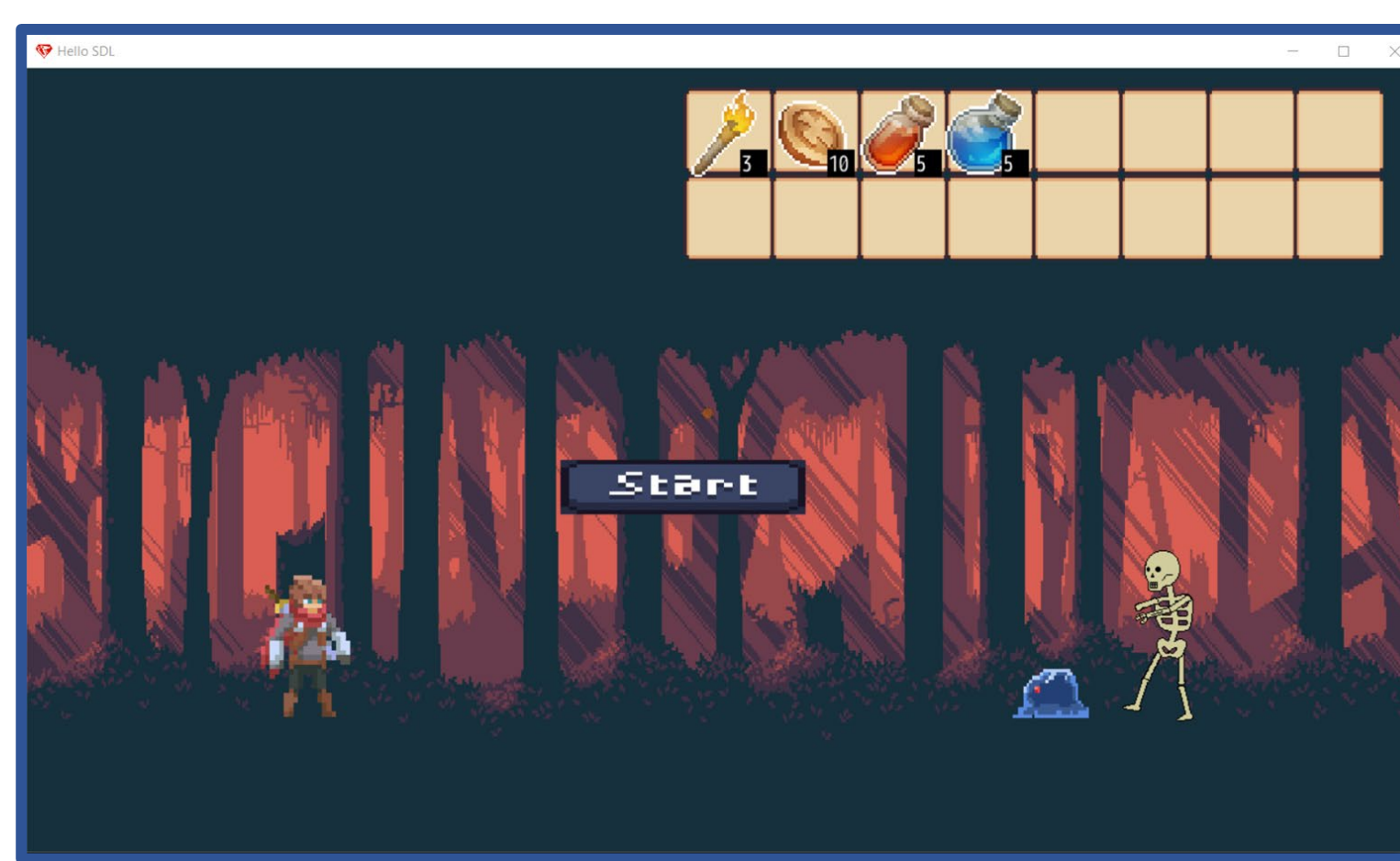
- Able to calculate physics for looping and wall jumping
- Able to create a map editor
- Able to implement background parallax, easing, screen shake, and zoom
- Able to implement ray casting to add shadow casting to the engine

Summary

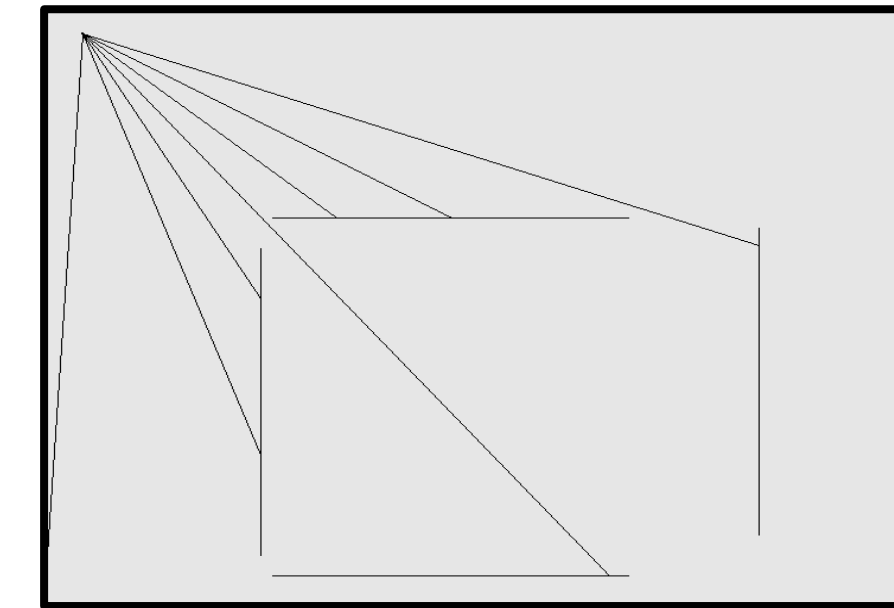
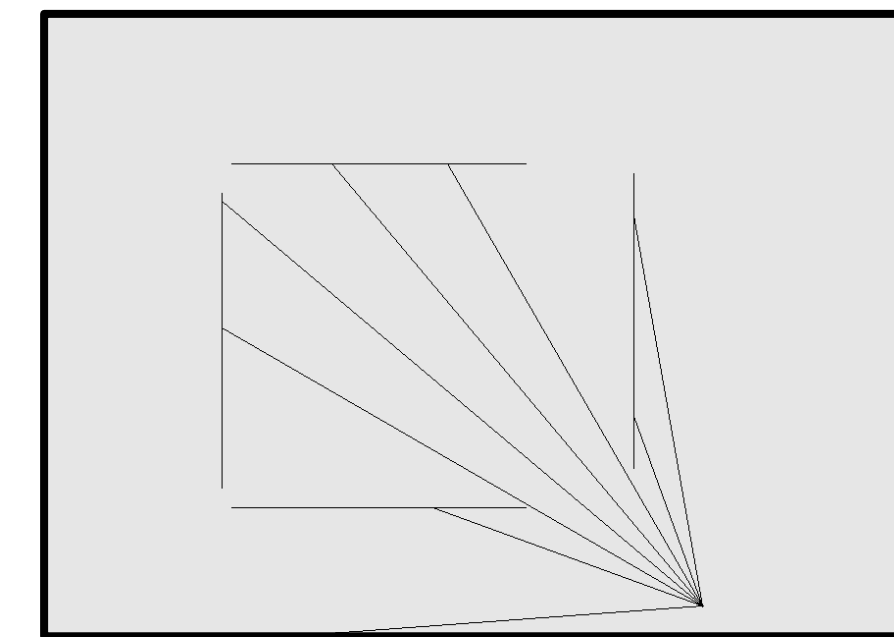
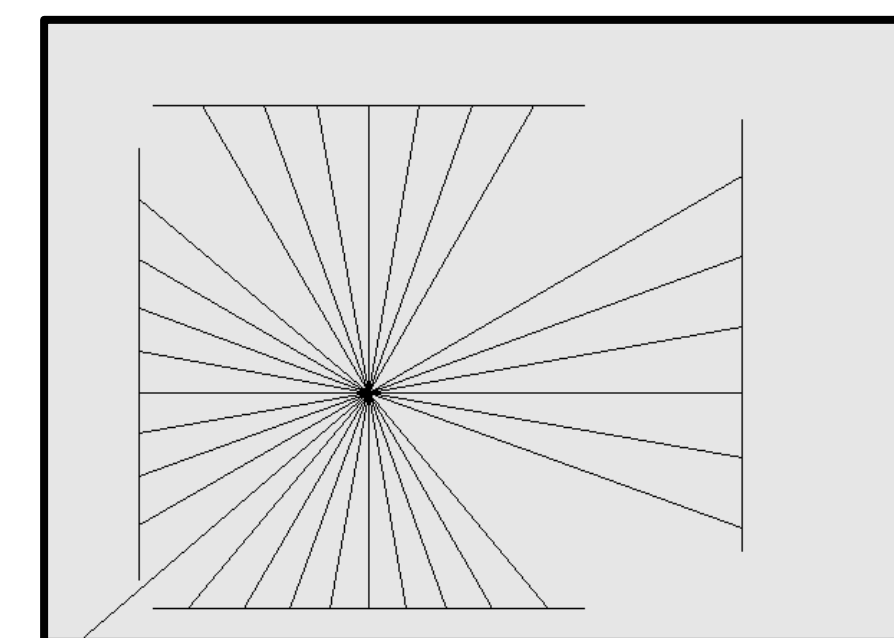
- These templates provide some features that DragonRuby didn't have before.
- Beginners will find it easier to make similar games by using these templates.
- DragonRuby provides easy access to beginner-friendly cross-platform 2D game development.

Results

Inventory Interact RPG with Screen Shake and Zoom



Shadow Casting Presentation Using Ray Casting



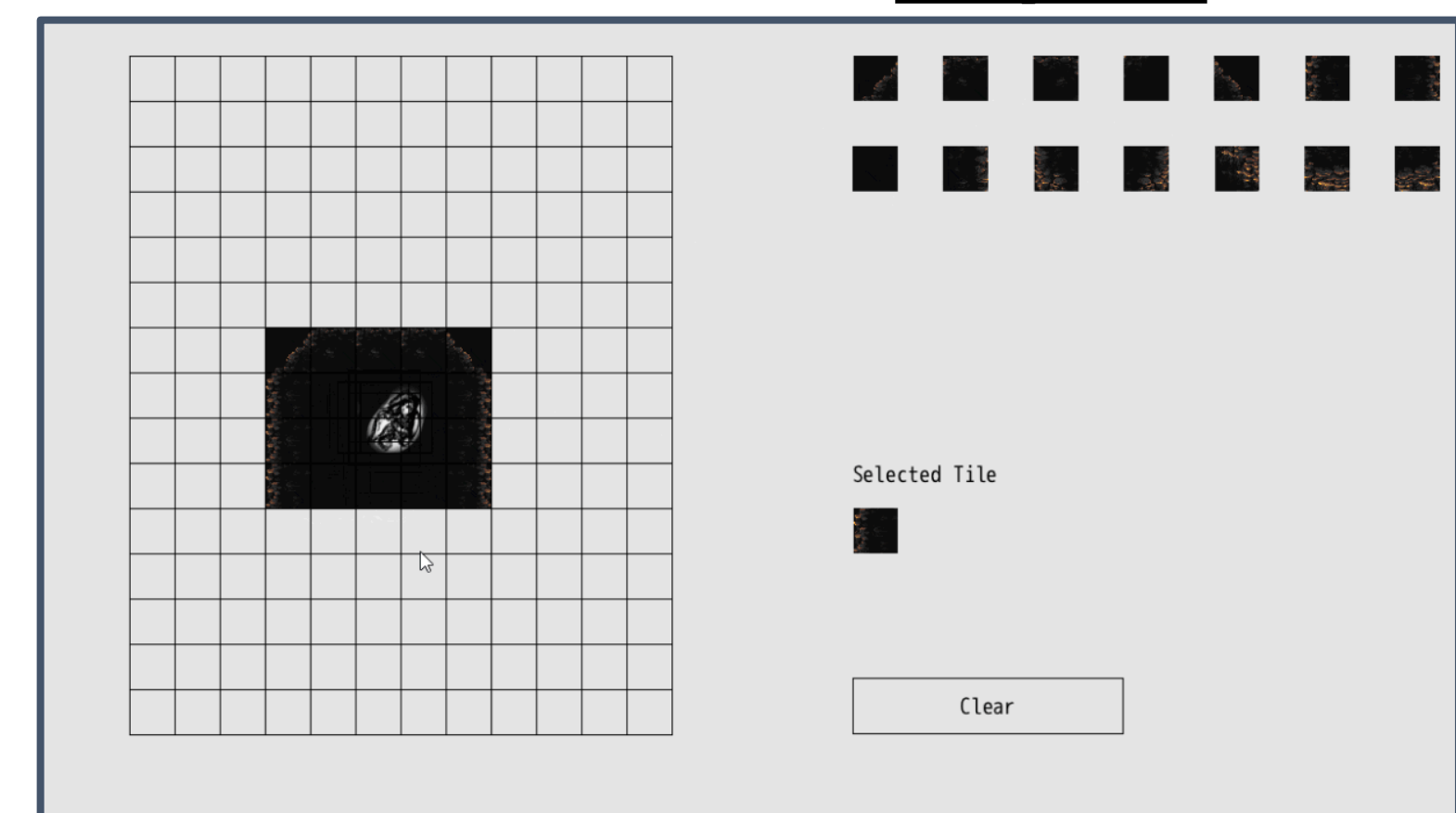
1. A Pokemon-like Battle Scene



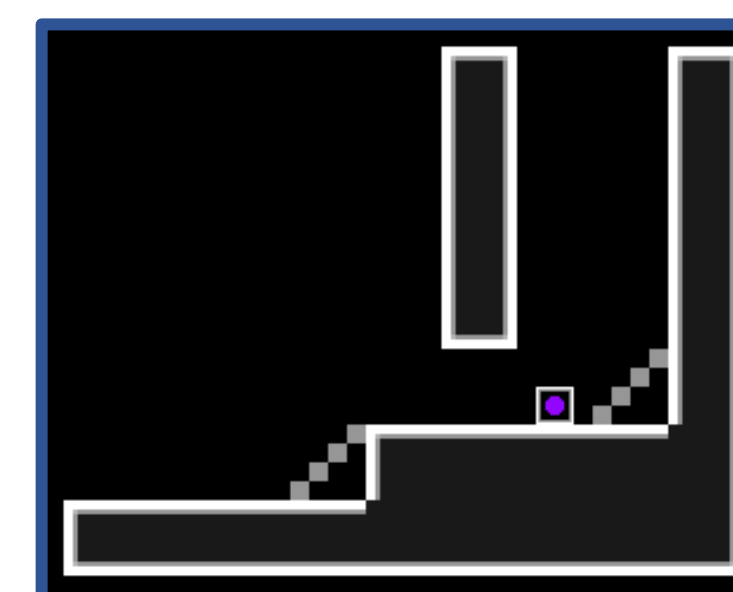
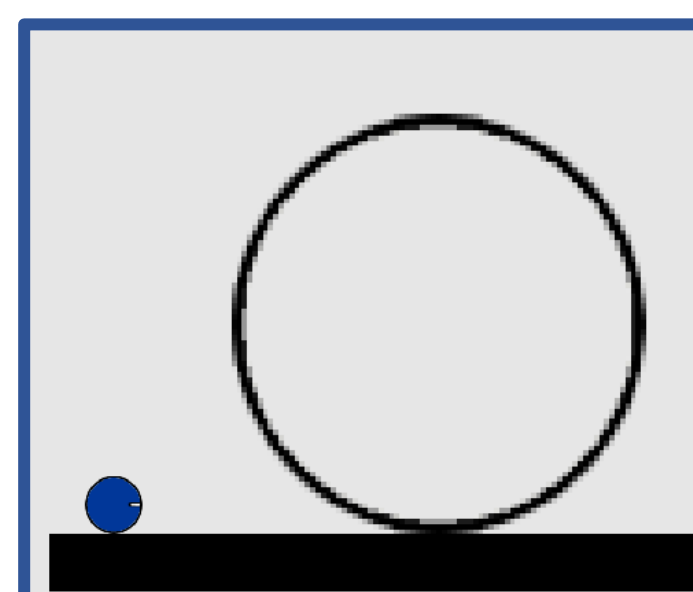
2. A Pokemon-like Battle Scene



A Map Editor



Sonic-like Loop



Simple Platformer with Walljumping

