

IDEA / MSA Console Game Mini Proj. DATE / Oct 17, 2024

DESCRIPTION

A simple, roguelike game developed in a console application.

DEFINITE FEATURES

- Searching Algorithms
- 4 classes
- Party System
- Small puzzles in 3 unique maps
- Battle System - At least 2 battles
- Menu
- ASCII Art

POSSIBLE FEATURES

- Coins
- Items
- Loading Screen
- Trailer
- Quests
- Moving enemies
- Music

Credit Scene

MARKET / AUDIENCE / DEMAND

Project for class; no demand, no market, audience is my 2 instructors and 13 other students.

HOW WILL IT ADD VALUE TO PEOPLE'S LIVES?

Hopefully display concepts learnt in the past 8 weeks in a way the other students can identify and use/improve in their future projects.

DOES IT ALREADY EXIST? IF SO, HOW CAN I MAKE IT BETTER?

Plenty. The goal isn't to make it better, but instead group as many concepts I've learned into a single project.

HOW WILL IT BE MADE?

Visual Studio 2022, console application

POSSIBLE CHALLENGES

- Time constraints
- Not knowing the code/concept
- Too ambitious
- Loss of interest

WHAT RESOURCES WILL YOU NEED? (\$, PEOPLE)

- Visual Studio 2022
- NuGet? - Maybe
- ASCII Art .em
- ASCII Flow .com

POSSIBLE SPIN-OFFS OR EXTENSIONS

- Expand the game further
- Transfer to a game engine
- Continue upgrading it with concepts learned

WHY DO YOU WANT TO MAKE THIS? HOW WOULD YOU DEFINE SUCCESS?

It is a fun project I'm excited to do and allows me to utilize everything I've learned thus far into a single product.

FURTHER RESEARCH / SKETCH

- Master Mini RPG Elements in console app using Michael Hedley tutorials
- Master creating maps via ASCII flow
- Create the small story.

This might be a good time to share your idea to gauge response & get feedback.

EVALUATE

1 EXCITEMENT 5 1 DIFFICULTY 5

Record these numbers on your list of ideas.

DECIDE

- ☒ HATCH IT / # 3
- ☐ BACK BURNER
- ☐ ABANDON

PROJECT / Roguelike MSA

SPECIFICATIONS / SCOPE

DATE / Oct 20th, 2024

- 3 unique maps w/ player movement ☒ • Audio ✓
 - Simple story with art ☒ • Music ✓
 - Battle system - 2 Battles min. ☒ • Character Art ✓
 - Credit Scene, Intro Scene ☒ • Dialogue ✓
- If time permits

ACTION STEPS

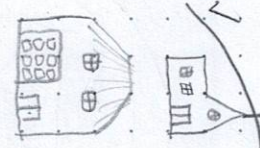
task	who	due date
Map prototypes on computer	Me	Oct 22
Story + Art Ideas complete	Me	Oct 24
Battlespace/Arena design Idea	Me	Oct 25
Master C# Micro RPG Logics	Me	Oct 31
Game Logic Complete (Idea)	Me	Oct 31
Maps created, implemented, Finalized	Me	Nov 2
Player movement implemented	Me	Nov 3
Transfer between scenes - Concept Draw	Me	Nov 3
1st Battle complete	Me	Nov 4
2nd Battle complete + Dialog complete	Me	Nov 4
Credit + Intro scene implemented	Me	Nov 5
Final Debug + Test	Me	Nov 5
Launch		
Video (can be trailer too) of project		Nov 6 th
Powerpoint? of project (presentation)		Nov 6 th
Presentation Key Points		Nov 6 th

TARGET LAUNCH DATE

Nov 7th 2024

3. Locations. Brainstorm.

- Spooky church ✓
- Graveyard ✓
- House
- Mall
- Corn maze ✓
- Random encounter
- Sewers
- Farm house ✓
- Mines
- Open field

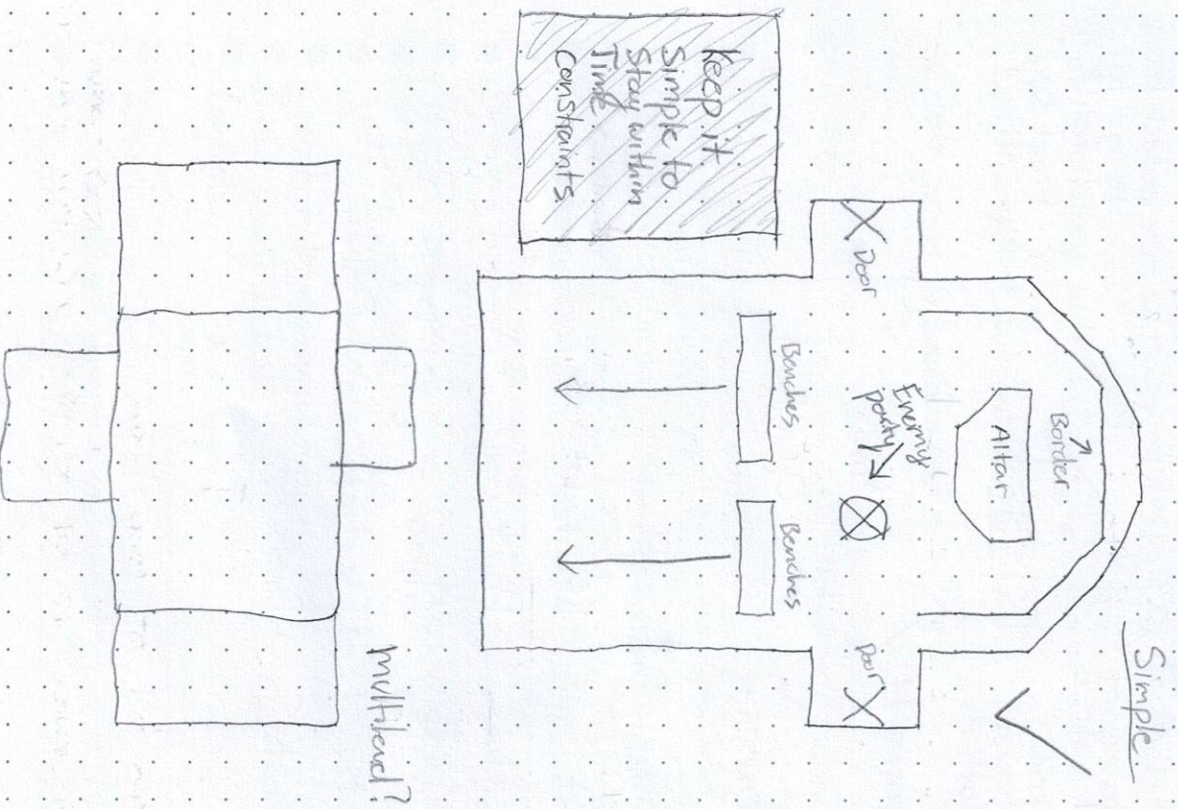


connected? Grave is locked, has to go to church to find key.

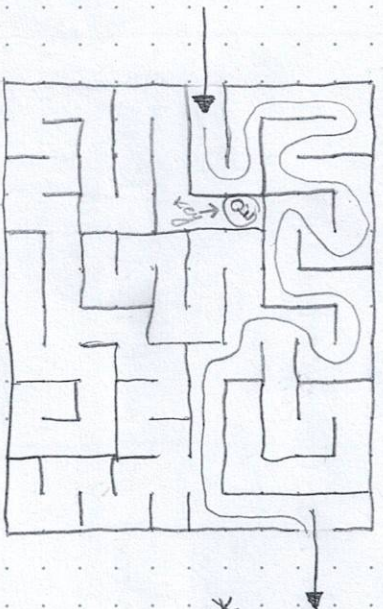
Enemies. Brainstorm

- Bat
- Zombies
- Bandits
- Rats
- Ghosts
- Wraiths
- Drunk Guy
- Slime
- Skeletons
- Birds
- Radiactive enemies
- Armored enemies
- Mages
- Witches

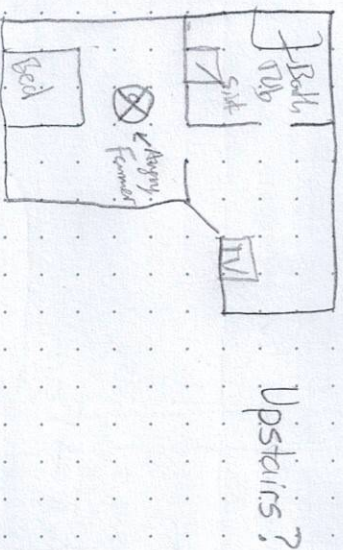
Spooky Church Maps (interior)



Corridor Map (interior)



Farm House (interior)



Size? 120 x 60? [console]

Extension Art for choice screen

Small Chapel - Hayley Watersham / Church coming

Barn - No Artist

Enemies in church

- Group of Zombies (3-5)

→ Broke in from the Graveyard

Enemies in Maze

- No enemies. Instead you must find a key to then exit

Enemies in Farm/Barn

- Angry farmer (Boss)?

→ Must explore church to find clues about why there are zombies? He's the reason.

Story Progression

Maze → Church → Barn

~~Graveyard?~~ if time permits

You and your buddy are tasked to find out what happened to your neighboring town and why. It's been so quiet the past couple weeks.

Class Hierarchy of Enemies

Enemy : Base Class

Attributes

- Health : int
- Damage : int
- Art : Artwork class
- Color : ConsoleColor

Methods

- + Basic Attack ()
- + Special 1 () } can override
- + Special 2 () }

Public

Artwork

Class

Zombies : Enemy

Attributes

- Group size : int (3-5)

Methods

- + Slash
- + Ferocious Bite

Skeletons : Enemy

Attributes

- Group size : (1-3)
- Ranged : Bool

Methods

- + Attack

Evil With Enemy
Angry Farmer : Enemy

Attributes

- Anger level : Float (1-1)

Methods

- + punch
- + Chop w/ Axe
- + Punch Combo

Change
w/ new
coding.

Backup

in maze?

Too much?

Battlespace Design

Enemy Name

Art

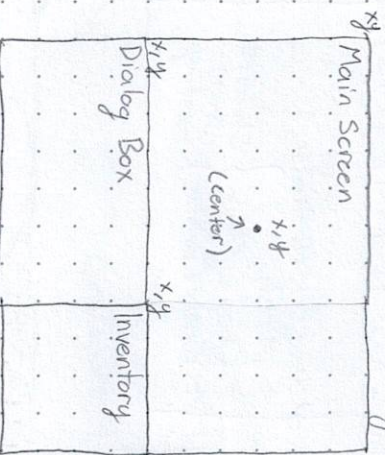
Your Health Bar

Enemy Health Bar

Dialog/Menu

If something
to center it?

Normal Screen Design



Border Design

Size: $\frac{\text{width}}{\text{height}}$ Fullscreen

Story Line

Start / Beginning

A group of adventures stumble across a odd town that gives them the creeps. Against their intuition they proceed to the small town. They arrive at a town square and are presented with options.

1. Abandoned church (Find dead priests) + Enemies
 2. Graveyard (locked) → Strange crystal Alter
 3. Spooky Barn (want to explore ~~church~~ ^{all options} first)
 4. Corn maze (Find key here) → Graveyard
- Evil witch has been spawning all these monsters.

Choices: Flagrant Quick n' Dirty story

1. Abandoned Church

- Find dead priests w/ partial note.
- Small Group of zombies. have to fight
- Find other note piece to explore maze to find key to graveyard.

2. Cornmaze

- > Find key to graveyard
- > Potential enemies
- > Finding key unlocks graveyard

3. Graveyard

- > Fight off zombies
- > Find strange crystal after where you then hear a noise to investigate

4. Spook Barn

- > Boss fight with evil witch
- > Party member ~~die~~ wounded
- > Beat the witch, grab party member and run

End Story

End Screen would happen
Here w/ credits

The Classes

World Class

- Hold 2D array for the various maps
- Drawing the maps/levels

Game Class / Level Class (individual)

- Game loop

Player / Party class

- Draw player location
- Get x, y

Enemy Class

Artwork class

Menu class

Stack class for cool display functions?

Abandoned church story

- > Player enters the church - comments on the musty smell then hears something move... [Dialog]
- the "O" represent things to find, "X" are enemies, ">", "<" are both denotations for exits, "#" is a key
- > 4 "O"s total: Dead priest, blood, partial note, note that completes partial note.
- The note will read about how someone dropped the graveyard key in the maze
- > 1 "X" total: A group of Ghosts the player must fight to leave
- > If the player visits the church again, different dialog.
- Once enemy is defeated, it will disappear until game is reset or program is closed.

Maze story

- > Player enters maze and if has found note, comments on their is something to find the key; otherwise just a generic comment.
- > Player can leave even if they don't grab the key.

- > Once player grabs key, player will see a glimpse of a long pointy black hood. [Dialog]
- > Getting key unlocks Graveyard.

Graveyard Story

- > Player walks into graveyard and spots movement which is a skeleton.
- > Once skeleton is defeated they notice a strange crystal: alter with a lot of blood.
- > When the player inspects it, they will get a dialog that they hear something ~~from the~~ coming from the Barn. The player can then leave the graveyard.

Barn Story

- > When player enters, notice a large hooded figure. (Boss-Grim Reaper)
- > Once player wins, dialog to exit. Once player exits the Barn, and Boss Defeated is true -- cue credit + Tbd screen.

End

Development Notes

- > World: DrawGrid() may want coordinates as parameters.
- > ~~Console Renders very fast.~~
- > ~~CHECK CONSOLE RESOLUTION.~~
- > Check to measure (x,y) are not reversed
- > Level creation Steps:
 - > 3 classes → Game/level, world, Player ^{as many as needed}
 - > World holds instructions to Draw everything
 - > Game/level holds specific things related to the level
 - > 1. Grid/Image, 2. Player input 3. Draw Frame
 - > 4. Game loop (draw frame, player input, events, ^{render})
- > ☒ [TASK] Master level parser logic
- > Confirm Grid Coordinates constantly
- > ~~Find a way to get console's last input to avoid loop of rendering~~
- > Map Fonts = BlutVisian.ASCII
- > Dialog Font =
- > Want to color: X=Red 0=Blue Z=yellow

- > Use Linked List to write Display instructions
- > Instruction Font = Mini
- > Loading symbol. Method → Sleep use
- > Once Scene transitions are complete,
- > "RunGameLoop's Completed next Events
- > Organize Solution Exporter
- > ~~[20241028] implement the rest of scenes and transitions.~~
- > Add conditions to places: ☒
 - > Can't enter graveyard until has key
 - > Can't enter barn until in graveyard
- > Enemy Class creation with all enemies ☒ Just need "Reaper"
- > Battles → Battlegrid class ^(Enemy's class)
- > Check inventory Display (Weapon + key)
- > Appropriate Damages after Battle implementation is complete
- > Beginning story dialog needed
- > Readkey() → Readkey(True);
 - ↳ Causes the attack methods to not run on occasion

- > KNOWN BUG - Player fight method doesn't always call and skip his turn.
- > Check menu method (0 + 15).
- > ~~check how to add items globally~~
- > Neatify
- > IntroOutro handle all Death scenarios (1) ✓
- > Add musics (5) ↳ Add intros to fights
- > Add timer to Mages? (2) ↳ Push to a potential polish
- > ~~Sword option that's poisoned at barn and gives -10HP every turn (3)~~
- > "Don't make a Deal with Death"
- > Dialog after Battle? (4) ✓
- > Install Nugget for Sound Player (5) ✓

See Final Touch ups
pg. 107

Intro Screen

Quick Doodle

Title?

Instructions

Separate
Screen

Menu Selection

> Start Game

> Exit

↳ Separate

Outro - credits?

Battle Logic

Player Attacks → Enemy Attacks

If enemy dies → check if there are more (group).

↳ repeat attack sequence → go back to screen

If player dies → Death Screen → ~~go to main title~~ Exit Game

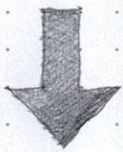
Display enemy name

Act

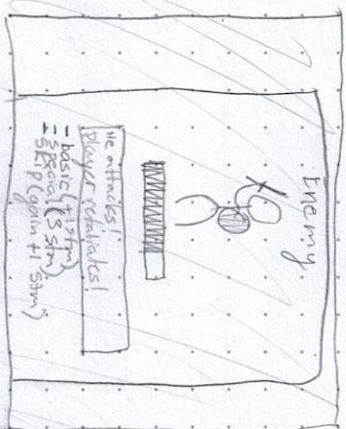
Health Bar

Dialog box

Player attack options



[If time make border]



"Enemy Defeated" Screen?

"Enemy Attacks" Screen?

Polish + Final Touch-ups

Final Potential Additions

Added!

- Option for player to receive +10 damage potential at the cost of 10HP per turn - the catch is the 10HP cost is not said.

"Don't make a Deal with Death"

- Add a timer to the maze, you get woken up outside the maze to try again if you exceed the timer

- Add an enemy to chase player in maze, if it catches you, you die ^{fog, mist etc.}

- Dialogs when exiting places ✓

Bug Fixes

- ☑ Menu Battle bug - Need longer render time
- ☑ Menu selection Disappears - fixed list length
- ☑ Trycatch window sizing in beginning
- ☑ Clearer Game Controls Description code
- ☑ Center all Dialogs as best as possible