

Alžběta Hradecká - Počítačová hra - roguelite dungeon crawler

Cílem práce je v programovacím jazyce C# v engine Unity 2D vytvořit hru. Hra se odehrává na fiktivním vesmírném výskumném středisku. Dungeon - podzemní jeskyně - bude náhodně generovaný. Hráč sbírá itemy, které může zkoumat a následně využít na upgrady. Ve hře bude možnost mluvit s jinými nehratelnými postavami (např. vynálezce, obchodník...). Hra končí, až hráč získá určitý počet materiálu. Roguelite - když hráč zemře, neztratí určitá vylepšení získaná v předchozí hře.

Teoretická část: Historie herních zařízení

1. *tutorial

- a. a bunch of easy quests in the lab
 - i. talk to people
 - ii. fetch quest
 - iii. *bio lab - be careful of plants
 - iv. /*microwave

2. main loop

- a. enter the dungeon
 - i. short animation
- b. get orders
 - i. order comm interface
- c. scavenge
 - i. randomly arranged rooms
 - 1. each room has a set layout
 - a. item spawn location pool
 - b. item pool
 - c. *enemy spawn location pool
 - d. *enemy pool
 - i. *enemy pool depends on biome/region
- ii. *biomes/regions
- iii. inventory
 - 1. order list
 - a. show progress percentage/a out of b
 - b. cross out completed tasks
 - 2. item slots
 - a. set amount
//can be increased with backpack
 - 3. equipment slots
 - a. tool
 - b. helmet
 - c. suit

// every thing has a name, sprite and short description

iv. ***trader npc**

//entity that appears at random spawnpoints in the cavern. will trade you rare items in exchange for other materials

d. return

- i. after a (random) timer runs out, the cave starts shaking and rocks falling, first expedition + when you take too long ==> evac warning, otherwise get caved in (another random timer) and die (and lose all items)
- ii. lab
 - 1. material stashes
 - 2. gear upgrade stations
 - a. talk to npcs - random scientists
 - b. spend material to upgrade
 - i. pickaxe - faster
 - ii. sledgehammer - can break stronger walls
 - iii. ***vial durability**
 - iv. flashlight - fortune effect (stronger) on said material
 - v. hazmat suit - higher defense, allow/faster climbing/wjs
- iii. story progression/ending - when you gather enough material, something happens

3. items and equipment

- a. items
 - i. kind (mineral, biomaterial, scrap material)
 - ii. subkind (amethyst, diamond, soil sample...)
- b. gear
 - i. tools
 - 1. pickaxe (faster mining)
 - 2. sledgehammer (break some walls)
 - 3. vials (collect bio samples)
 - a. ***vials can break when you get attacked**
 - ii. armor
 - 1. helmet - flashlight
 - //basically fortune - allows you to see more clearly and get more stuff

//(just lore. nothing else except drops changes lol)

- 2. hazmat suit
 - a. defense, climbing/walljump
- iii. backpack
 - 1. more inventory slots
 - a. **you can lose it (along with the items in it)*

1) **tutorial*

2) **main loop**

- a) enter the dungeon - animation
- b) get orders - order comm interface
- c) scavenge
 - i) randomly arranged rooms
 - (1) item & *enemy* pools
 - ii) **biomes/regions*
- d) inventory
 - i) order list
 - ii) item slots
 - iii) equipment slots
- e) **trader npc*
- f) return
 - i) timer runs out, get caved in
 - ii) lab
 - (1) material stashes
 - (2) gear upgrade stations
 - (a) talk to npcs
 - (b) upgrade
 - iii) story progression/ending

3) **items and equipment**

- a) items - kind, subkind
- b) gear - tools, armor, backpack

MS1 - 12. 2.

- ☐ 2.d - inventory
- ☐ 3 - items and equipment
- ☐ theoretic part

MS2 - 2. 3.

- ☐ 2.c - scavenge
- ☐ 2.f.ii - lab
 - ☐ 1 - stashes
 - ☐ 2.a - npcs
 - ☐ 2.b - upgrade

MS3 - 20. 3.

- ☐ graphics
- ☐ tutorial