Unity 2022 by Example GDD v3

Name of Game	*Outer World*
What is the theme, setting, or genre?	2D Sci-fi Platformer, 3D Sci-fi FPS (First Person Shooter)
Summary. What's the big picture?	An adventure game that takes the player on a journey from peaceful farming to battling robotic systems infected by an evil alien plant entity. The game takes place on an alien planet where the player's race has established a habitat on the planet's surface. The habitat is fully automated and maintained by robots managed by a central control system. An evil alien plant entity has infiltrated the control systems and taken over the robots individually and the central system. The goal of the alien entity is not known, but it must be stopped if the player's race is to survive on this planet.
What is the game's unique feature?	Multiple game modes provide a novel and exciting approach to gameplay: simulation, adventure, and shooting.
What games inspired you and why?	Metroid, Mega Man, Stardew Valley

2D Collection Game
(chapters 1, 2, 3)

Describe the gameplay, the core loop, and progression.	Collect energy shards to clean seedlings in a space station habitat as the timer ticks down!
What is the core game mechanic for the collection game?	The player will find and collect "water diamonds" throughout the environment by touching them until all are collected or the countdown timer expires.
What is a nerf mechanic for the player in the collection game?	The player's speed will be decreased when they touch a "toxic puddle" in the environment – increasing the challenge of collecting all "water diamonds" before the timer expires.

2D Adventure Game
Chapters 4 - 8

What is the secondary game mechanic for the adventure game?	The player will search the environment for hidden parts of a key. The pieces will need to be combined correctly as input to gain access to the entryway of the habitat station.
What systems need to be implemented to support the game mechanics?	The player movement, equip a weapon with ammo reloading and shooting capabilities, a pickup with inventory, puzzle solver, health and damage.
What is a buff mechanic for the player in the adventure game?	The player will be able to collect energy shards (water diamonds) scattered throughout the environment that, when a certain quantity has been collected, will give a power-up state to all of the weapons (increasing damage).

Character and enemy bios

Main Character: Describe the main character of the game and how they drive the story. Who is this player character?	**Type**: *Kryk'zylx* race of humanoids **Backstory**: The people of *Kryk'zylx* have outgrown their home planet and are searching the galaxy for suitable planets to colonize. Scouts are sent to establish habitat stations on planet surfaces with the potential to sustain life. **Goals**: Establish and maintain a habitat station with an automated crew of construction and maintenance robots. **Skills**: Power suit jumping, charging **Weaknesses**: Atmosphere not breathable
What is the main character's challenge structure?	Navigate platforms, make way past infected robots, and solve the critical puzzle.
Enemy A:	**Type**: Maintenance Robot Biped

Describe the first enemy in the game and how they drive the story. Who is this enemy?	**Backstory**: Robot deployed on pre-colonization missions for habitat station construction and maintenance. **Goals**: Construction, maintenance **Skills**: High mobility, including rough terrain **Weaknesses**: Long charging
Enemy B: Describe the second enemy in the game and how they drive the story. Who is this enemy?	**Type**: Maintenance Robot Wheeled **Backstory**: Robot deployed on pre-colonization missions for habitat maintenance and support. **Goals**: Maintenance, personnel support **Skills**: Quick charging **Weaknesses**: Limited mobility

Environment and level

Describe the environment the game takes place in. What does it look like, who inhabits it, and what are the points of interest?	The game takes place on the surface of a prospective planet to colonize, even though this particular planet does not have a breathable atmosphere. The planet comprises areas of purple-red rock and thick vegetation (that moves in such a way to suggest it may have the capacity to think).
Describe the game level(s).	The game level is a combination of static and moving platforms with obstacles needing to be overcome or avoided by the player as they make their way to the habitat station.

Input/control methods actions

Define the input/control methods actions.	**Keyboard**: W, A, S, D keys move, space key jumps, mouse to aim and left mouse button shoots the primary weapon, right mouse button hold/release launches the secondary weapon while aiming with the mouse (left mouse button cancels), E key interacts. **Game Controller**: left-stick/D-pad move, X jumps, right-stick to aim and right-trigger or Y to shoot, right-shoulder hole/release

	launches the secondary weapon while aiming with right-stick (right-trigger cancels), button A interacts.

3D Sci-fi FPS (First Person Shooter)
Chapters 10 - 12

Describe the gameplay, the core loop, and progression.	Make your way to the central control system and restore operations while dealing with a damaged power suit that must be recharged along the way. Beware of lingering infected maintenance robots!
What is the core game mechanic for the collection game?	The player will navigate the environment, recharge their power suit, and shoot the infected maintenance robots.
What systems need to be implemented to support the game mechanics?	The player movement, equip a weapon with ammo reloading and shooting capabilities, a pickup with inventory, health and damage, and recharging.

Character and enemy bios

What is the main character's challenge structure?	The habitat station's environmental controls are offline and the player character's power suit has lost the ability to sustain the player due to damage. The Player must seek "recharge stations" in the station in order to survive the journey to the central system while battling infected maintenance robots.
Enemy B: Describe the second enemy in the game and how they drive the story. Who is this enemy?	**Type**: Maintenance Robot Wheeled **Backstory**: Robot deployed on pre-colonization missions for habitat maintenance and support. **Goals**: Maintenance, personnel support **Skills**: Quick charging **Weaknesses**: Limited mobility

Environment and level	
Describe the environment the game takes place in. What does it look like, who inhabits it, and what are the points of interest?	The game takes place on the surface of a prospective planet to colonize, even though this particular planet does not have a breathable atmosphere. The planet comprises areas of purple-red rock and thick vegetation (that moves in such a way as to suggest it may have the capacity to think).
Describe the game level(s).	The game level is a modular constructed habitat station interior with many corridors, rooms serving different purposes, and a central control system room.
Input/control methods actions	
Define the input/control methods actions.	**Keyboard**: W, A, S, D keys move, mouse to aim and left mouse button shoots the primary weapon, E key interacts **Game Controller**: left-stick/D-pad move, right-stick to aim and right-trigger or Y to shoot, button A interacts.

How do all the pieces interact?	The player interacts with the environment through exploration, discovering what is required to reach and enter the habitat station using part of a puzzle key found throughout the level while fending off robots that have become infected by the strange plants that cover the planet's surface.