Space Defense

System Requirements Document

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Game Overview

Game Concept

Ultimate Interplanetary Conflict is a turn-based tactical role-playing game that focuses on the battle between the forces of Earth and the Alien invaders which takes place in space. The game features a single player mode where the player may choose to conquer as either the aliens or the humans. Depending on how much time we have in our development, we may also make a two-player mode where one side controls Earth's forces and the other controls aliens. The overworld is a flow-chart map of the solar system where each node is either a level or some other event. The levels are a tile-based environment based on the different planets in the solar system. There are many types of units available on both the human and alien side. There are the main fighter ships, which serve as the main combatants with different weapons suited for different purposes. Then there are the drones, which serve the purpose of aiding other units. There are 3 categories of drones: attacker, defender, and support. The player's drones perform their actions automatically based on programming patterns that the player created for them before entering each level. The purpose of this idea is to teach players how to optimize their drone's programming to match a certain playstyle they plan on using in the game.

Genre

Ultimate Interplanetary Conflict is a turn-based tactical role-playing game which features a sci-fi space setting based on Earth's solar system.

Target Audience

The target audience of this game is individuals who like strategy games that are willing to choose ai patterns for their drones to optimize the effectiveness of their units in battle.

Game Flow Summary

The game begins at the overworld map screen, which is a flow chart where each node is a different planet or moon in the solar system. The player can move from one node to the next and check the node to see what type of node it is. If a player cannot move to a node yet, they may still view its details. Once they select a node that they can move to, they may either enter a shop or a level. A shop allows players to buy weapon upgrades and resources such as fuel for example. A level node will display the Main Mission of the level along with the challenges of the level and the reward for each challenge. When the player begins playing a level, the main mission will be displayed before the start of the first turn. The player's units each have movement points (MP) and action points (AP) that they may spend moving and attacking, respectively. When no more of the player's units have MP or AP left, they must end their turn. The player may also choose to end their turn earlier on if they wish. Battle rules are described in greater detail later on in the document.

Look and Feel

The game uses 2D pixel-based graphics to create a retro look while also maintaining a sci-fi appearance. The overworld flowchart map contains a space view of the solar system, showing different words on and around the nodes. The combat map is broken up into tiles.

Gameplay and Mechanics

Gameplay

Game Progression

The game's overworld map features takes the form of a flowchart, featuring nodes that represent levels, resource stations, random nodes and the goal which is the enemy base where the final confrontation will occur. As you progress from the starting point you take ownership of nodes you move on allowing you to use them again. In order for a player to gain ownership of a node featuring a level, they must win the battle. The game ends when the main enemy base node is captured, but you will achieve a better rank/achievements for capturing the whole map. When the player enters a level, they progress through it and complete it by completing the given objectives. Some levels will require eliminating all enemies, others will require guarding an objective or capturing an objective.

Mission/challenge Structure

Within a level, the missions include Main Missions and Challenges. Main Missions include goals that are required for the player to win as well as conditions that will result in the player's defeat. Challenges are secondary objectives that are not required to win a level but will provide bonus rewards if they are completed.

Main Missions that are required for winning include:
- Eliminate all enemies: the player must defeat every enemy unit in the level by reducing it's HP to zero in order to win.
- Defeat the Boss: requires the player to defeat a specific stronger enemy unit that is labeled as a "boss" to win.
- Capturing an objective: requires the player to take control of a specific tile on the map by moving a unit on top of it while they fight off enemy units that will be guarding that space.

The Main Missions that cause defeat include:
- having all of your units defeated, which will result in a defeat in every level

- Guard an objective: requires the player to keep enemy units from moving onto a specific tile to prevent defeat.
- Keep your boss alive: in the level you have a stronger unit labeled as a boss helping you however the player will lose the level if this boss unit is destroyed.

Challenges include:
- All enemies beaten: a challenge only given in levels that do not have the "Eliminate all enemies" main mission.
- Completed in x turns: a challenge that requires the player to complete the main mission in x amount of turns.
- No deaths: main mission is completed without any of the player's units being destroyed.

Puzzle Structure

The main form of puzzle structure in our game is choosing algorithms for the support drones to automatically follow in battle which will encourage players to optimize the drone AI. For example, healing drones could be programmed to always heal the party member who has lost the most health or they may be programmed to prioritize constantly healing the strongest member of the party to keep it from being destroyed, at the risk of losing some other support drones.

Objectives

The player will be required to progress through various battles and challenges across various overworld maps. The players main objective on each map will be to defeat each boss or final battle, defeat all enemies, or guard/capture an objective. The player will also be given smaller objectives that they can choose to complete on each map.

Play Flow

The player will be placed on a start node on the map. The map will contain multiple other nodes for the player to travel between. Each node will be connected to different nodes, indicating where the player can travel. When a player reaches a battle node they will be brought into a battle consisting of tiles that they can move their battle units as well as enemy units which they will be required to defeat. At the start of a battle the Main Missions and Challenges for that level will be shown to the player, along with the bonus reward for completing each challenge, before the fight begins. Each unit has a limited amount of movement points and action points that they can use each turn. Movement points will decrease by one every time a unit moves one tile on the battlefield level, and action points will decrease by a set amount based on what actions the unit uses.

Mechanics

Physics

Real-time physics will not be applied as tile-based movement will be deterministic and most other actions will happen instantaneously. Acceleration will be applied during movement to imitate real objects with momentum. Moveable objects, such as ships, can move past each other over shared tiles, but cannot end a turn on the same tile. Immovable objects cannot be moved through nor can an object end its turn sharing a tile with an immovable object. Objects resting on a tile will not move unless some action was taken to move them.

Movement in the game

During the player's turn, their controlled ships can be moved by spending 'movement points' (abbreviated as MP), of which each ship has its own supply. Movement points will be replenished at the start of each turn, and can be spent at any point during the player's turn to move a distance of one tile per movement point.

A ship can be moved by left clicking on it to select it, then left clicking another tile within range to move the ship. If the tile is not obstructed, can be reached along some path, and the ship has enough movement points, it will move to the selected tile, otherwise no action will be taken.

When a ship has no movement points, it cannot move again until the player's next turn.

Automated ships for both sides will evaluate their appropriate action when it is their turn based on their AI behaviour as described toward the end of this document.

Objects

Map nodes:
- Battles: starts a battle level
- Shops: provides various upgrades
- Random events

In-game objects:
- Player flagship
- Player controlled ships:
    - Laser ship
    - Missile ship
    - EMP ship
    - Acid ship
    - Gas ship
- Player controlled drones:
    - Attack drone
    - Defense drone

- Support drone
- Enemy controlled ships: Same types as player controlled
- Enemy controlled drones: Same types as player controlled
- Immovable obstacles such as meteoroids
- Tiles that represent an objective to be captured. The team that is defending the objective cannot place their units directly on top of this tile, and the team trying to capture the tile will be able to place their unit on top of it.
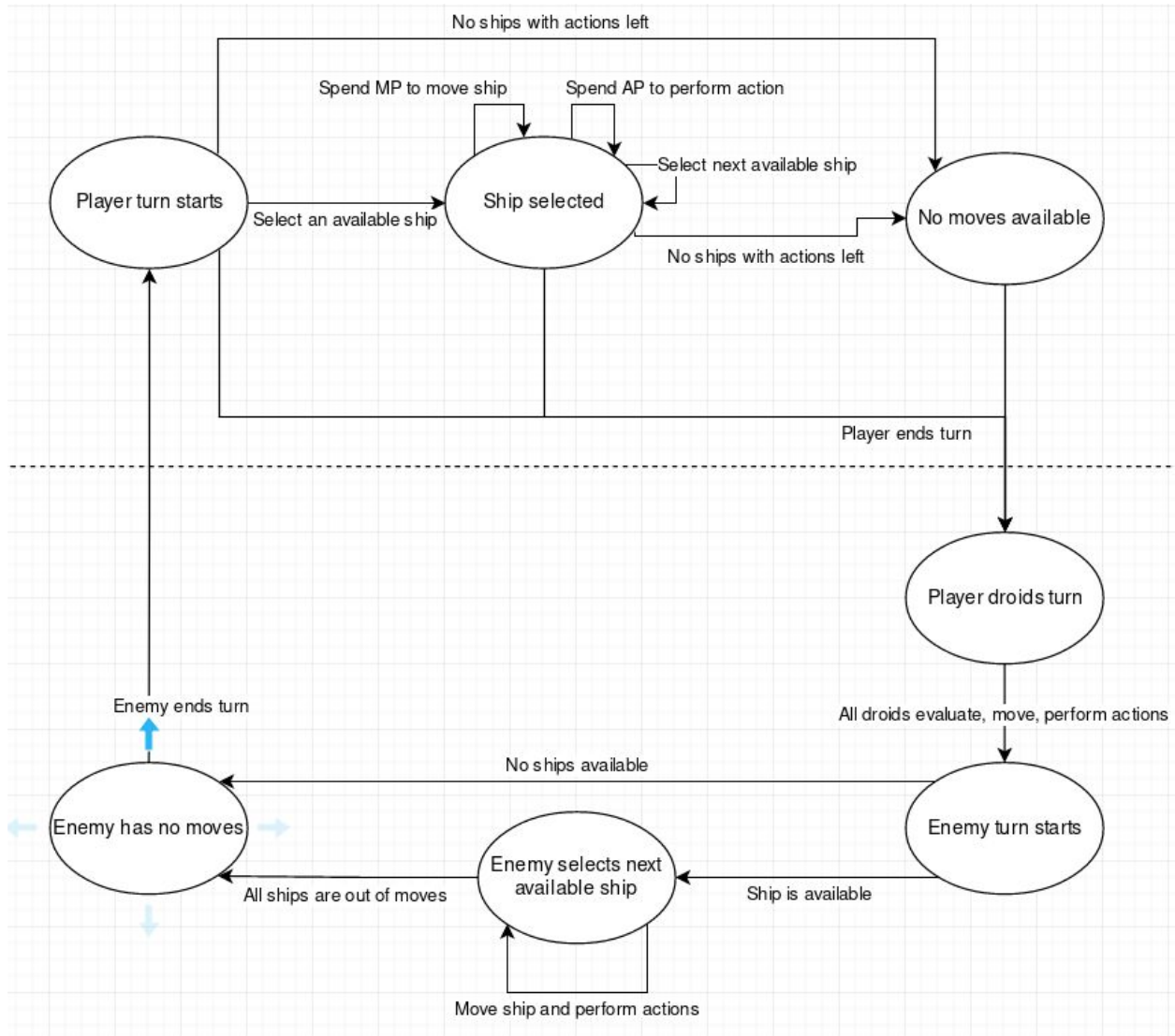
Actions

In the overview map, the player is able to select a nearby node to move to.

The player will be able to customize their friendly drone AI using a built-in context menu to specify what actions they want their drones to take depending on the given circumstances. The level of customization is intended to be open-ended to encourage creativity and problem-solving.

During battles between the player and the enemy, actions take place in turn order. During the players turn, while they have ships with enough MP or AP available to perform actions, they are able to select these ships. Selected ships with MP can be moved at the cost of 1 MP per tile. When the player moves the mouse over tiles, they should see whether they are able to move the ship to that tile, and if so, show the path the ship would take. A selected ship with AP available can perform actions according to its ship type and whether or not actions have been unlocked. Each action has an associated AP cost which is deducted from the ship's total AP, and can only be performed if the ship has enough AP available. When a ship has no more AP or MP, the player must select another available ship. When no more ships are available, the player must end their turn. The player can also end their turn at any time, even if some ships have actions available. When the player chooses to end their turn while some ships have actions available, they will receive a confirmation message letting them know.

In the following diagram, all actions above the dotted line are completed by the player, and all actions below the line are completed automatically after the player ends their turn.

No ships with actions left

Spend MP to move ship | Spend AP to perform action

Select next available ship

Player turn starts → Select an available ship → **Ship selected** → **No moves available**

No ships with actions left

Player ends turn

Player droids turn

Enemy ends turn

All droids evaluate, move, perform actions

No ships available

Enemy has no moves | **Enemy selects next available ship** | **Enemy turn starts**

All ships are out of moves | Ship is available

Move ship and perform actions

Combat

Combat levels take place on grids making up boards of varying size, with a small board being about 10x10 spaces and a large board being about 64x64 spaces, and most boards being somewhere in between. A sample combat scenario might look like the following:
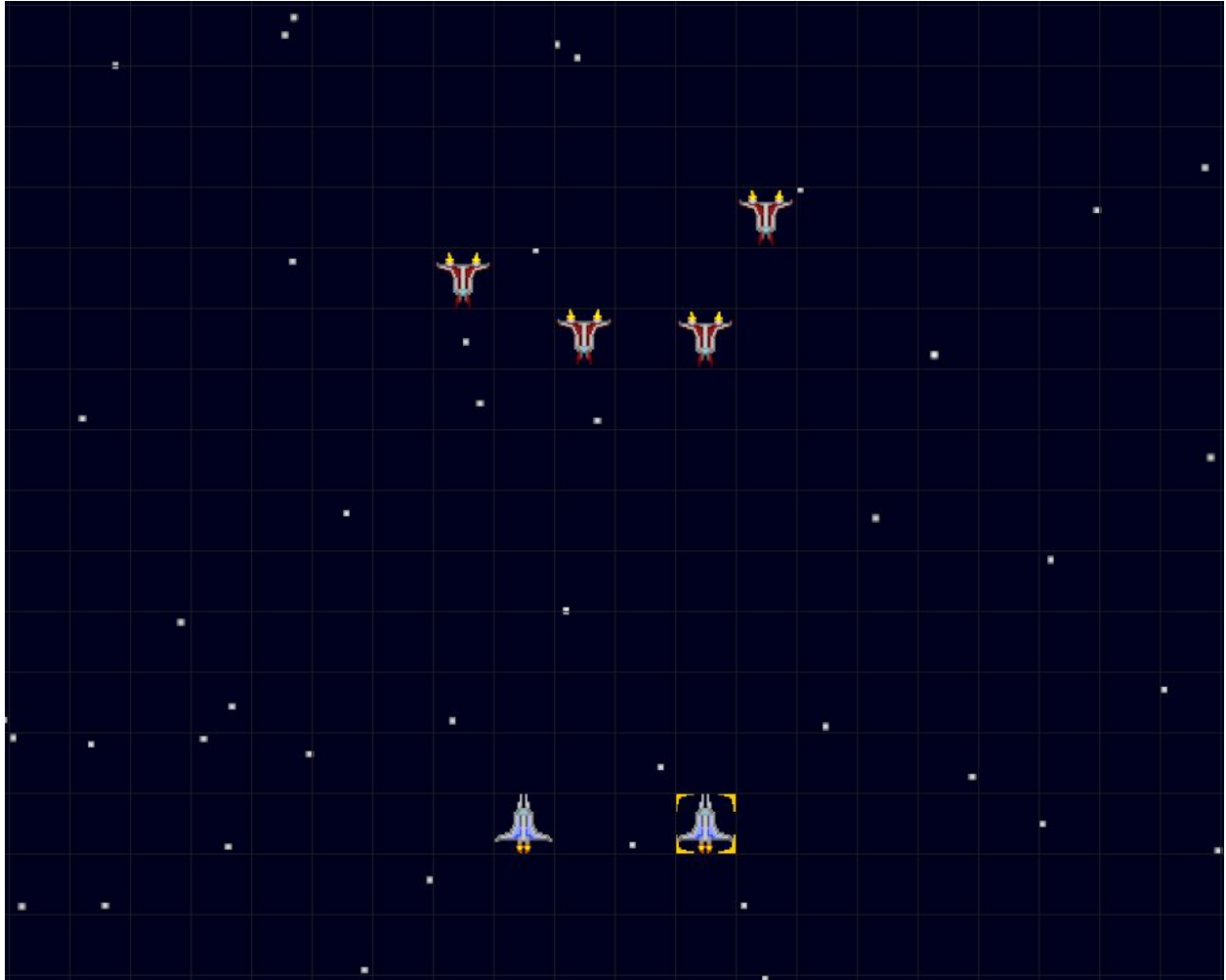
Here, the player and the enemy will take turns commanding their ships to move and attack until one side defeats the other's ships. Ships will be able to move different numbers of spaces and perform different actions based on their type and upgrades.

Economy

After completing a level, players will earn rewards for completing the Main Mission as well as any of the level's Challenges. The player will be able to collect currency to exchange for upgrades and other purchases between levels and in shops.

Screen Flow

The overview map and the battle screens will each take place on a single static board. The user will be able to zoom their view in and out when the board is larger than the screen. Transitions take place while moving between the overview map and another board.

Game Options

Video options:
- windowed/fullscreen display
- Resolution options matching most common resolutions

Sound options
- Volume levels

Help
- Provides a readable form of instructions and concepts the player needs to know

Replaying and Saving

There will be an option to save the player's progress after each level so that the player may resume from a saved state at a later time.

There will not be any replay function built into the game.

The player will be able to start a new game.

Cheats and Easter Eggs

There will not be any cheats, easter eggs, or other specially hidden content in the game.

Story, Setting and Character

Story and Narrative

Humans have lived there life on earth and other planets for hundreds of years and when recent activity has shown aliens have been trying to invade, the humans become defensive. General X is the alien invasion specialist leader who controls leadership over the human fleet. General X has fed information to the humans about the alien attack and gives strategies and tips on how they can defend their planets. The humans are en route to defend their sanctioned planets while also seeking out to destroy alien life on the alien outpost planets that pose a threat to them. In return, the leader of the alien force, Drakkisath, has been assembling his alien force to take over the earth and some of the other planets humans have taken over. Little do the humans know, Drakkisath controls information of past times that may infer the aliens originally controlled the entire galaxy hundreds of years ago. With this information Drakkisath's command is to fight to the death in order to reclaim the worlds they once inhabited. Humans were unaware of the conflict hundreds of years ago as the only papers containing what has happened has been stored in a safe under General X's control. These documents have been passed down for generations but has been hidden from the human population as they were afraid the truth would tear human society apart. General X and his ancestors had to do something in order to reclaim their lands without risking the human fleets emotions getting in the way of that. Prior to the conflict humans lived peacefully on earth while aliens inhabited other planets in the galaxy. Balance was in place and order controlled a well maintained galaxy. Legend states humans felt surrounded and controlled, and therefore set out to claim more land and establish a better lifestyle. Drakkisath's ancestors were forced out their planets when the humans decided to explore and control the galaxy. Because of this, the aliens were forced backed and over the hundreds of years lived in fear of the humans. Now in the present Drakkisath and developed a fleet that will do whatever it takes to reclaim its ancestors lands.

As the game progresses as either human or alien force, the planets will be reclaimed one by one, as either side will be progressing their fleet and weapons in order to maintain power over the galaxy. Each side has outposts, ships or utility planets that will aid either side in obtaining resources, weapons, and items beneficial to their fleet. Either side may run into outsiders which exclude themselves from the war at large, and may offer a risk for reward scenario. Users will be able to choose if they want to take a gamble which may outcome in the outpost providing supplies or possibly stealing supplies from anyone who decides to stop by.

Cutscenes include the opening scene explaining the story of how life was lived hundreds of years ago. Furthermore it should show why the humans initially ventured to other planets them over from the aliens because they were limited on resources and space. It should also show how the aliens lived in fear as there population was killed off by humans at the time. It should also display how the humans were blinded about the fact the aliens originally controlled these planets and elaborate in depth that General X and his ancestors had to hide that information as it is the only way to maintain control of these planets so humans can still live with the resources they require. General X and their ancestors did not want the human fleet to

learn that this was not their land to begin with and General X will go on to hide the document in order to save the human population. These cutscenes allow for character development on both sides and allow the user to develop a connection with either side. Actors in these cutscenes would include the ancestors of General X and Drakkisath and the overall human population struggling to survive on their resources. It should also contain the population of alien forces that have died off in the invasions.

Game World

The overall game world will be split into 2 categories. The first being the overview of the solar system and the second being the battleground. For the overview game world, the player will be starting on earth. After character selection and ship development the player will have the option of choosing which path/planet they want to travel to next. Certain planetary paths will offer different rewards while certain paths may offer a larger reward when taking a larger risk. The overview game world will have areas to path to such as other planets where the player will engage in combat, shops or camps set up in space where the player can visit to repair the ship or purchase useful items, and random outposts which offer either a good or bad reward depending on an rng factor. Now in terms of the battleground game world, when a player decides to path to a planet and engage in combat, the playing field will highly resemble that of the planet they are fighting on. The enemies will look like they belong from that planet and the armour and weapons used will resemble from the resources available on that planet. It will be a tile based overview map that requires strategic movements and calculations to optimize each turn depending on the scenario. Once the fight has completed and the player has won they will then gain the option again to path to another stop in the overview game world.

Areas

- Human space outposts
    - Consists of spaceships created by outsiders which has been flushed out of their homes due to the alien invasion. These will be small ships stocked with resources designed to be stealthy to avoid any interplanetary conflict. The weapons and items offered could be used to counter some of the elemental forces of the planets they will be visiting. They have created a fortitude of ships mainly for the reason of aiding and assisting the friendly travellers which are on a mission to defend the galaxy.
- Alien space outposts
    - Consists of spaceships created by aliens which are there to help aliens arm themselves and prepare for human invasion. These will be small alien like ships consisting of many materials designed to counter the human forces weapons. The aliens have created these ships for the same reason as the humans, to aid travelling aliens to help reclaim their territory.
- Dry planets

- These will consist of planets similar to Mars where there will be little to no resources in terms of liquid substances but minerals within the planet will aid in the aliens and humans weapon choices. These planets will extend out through the galaxy and will offer rare minerals useful for certain weapons that can only be obtained on these dry planets.
- Wet planets
    - These will consist of planets similar to Gliese 1214 b where there will be little to no resources in terms of mineral substances but other forms of substances heavily related to water or acid will be readily available for the aliens or humans to gather and form in order to create weapons relating to these materials. Similar to dry planets, the resources available on these wet planets will be exclusive to only planets with these resources.
- Gas planets
    - These will consist of planets similar to Jupiter where there will be little to no mineral or liquid resources but it will be flooded with gas resources. This could include choking gas, toxic gas and other forms of gas that can be incorporated into the aliens and humans weapon force. Once again similar to wet and dry planets, these resources will be exclusive to the gas planet and only aliens or humans on these planets that have gathered the resources will be able to use weapons related to that substance.
- Other planets
    - Other possible forms of planets could include special planets such as ice planets, rocky planets, toxic planets, which would all be related to either dry, wet or gas planets, with possibly some other features.

Characters

Human characters
- Dervish (M)
    - Dervish is the son of General X and will do anything to help his father in his line of work. Dervish has been trained all his life to learn the ways of defending the galaxy. Dervish is a quicker thinker and has general experience in weapons and ships. Dervish sets out to be a kind hearted individual always ready to help others but when the time comes can quickly become a warrior in battle. Dervish has black hair, and green eyes which match that of his father.
- Jed (M)
    - Jed is a professional space defender working for General X where his skills and abilities have truly been put to the test in training. His brute force strength and strong skills in mechanical weapons in ships aids him on his adventures. Jed is hot headed and not easily persuaded. He sticks to the rules of battle and does a very good job at doing so. Jed has brown hair, green eyes and a scar across his face from his training.
- Emerald (F)

- Emerald is the daughter of William (Husband) and Denice (Wife) Stargate, where her parents were killed in the battle for the planets. Emerald is not necessarily the strongest but is the most intelligent and handles high tense situations with ease. Emerald is self taught and knows a decent way around ships and weapons. Emerald does extremely well in fights when she is alone and is able to fend for herself quite well. Emerald has blonde hair with green eyes.

Alien characters (mirrored versions of the humans to allow balance on both sides)

- Omokk (F)
    - Omokk is the daughter of Drakkisath and will do anything to help her father in his line of work. Omokk has been trained all his life to learn the ways of defending the galaxy. Omokk is a quicker thinker and has general experience in weapons and ships. Omokk sets out to be a kind hearted individual always ready to help others but when the time comes can quickly become a warrior in battle. Omokk has no hair, and red eyes which match that of his father.
- Voone (M)
    - Voone is a professional space defender working for Drakkisath where his skills and abilities have truly been put to the test in training. His brute force strength and strong skills in mechanical weapons in ships aids him on his adventures. Voone is hot headed and not easily persuaded. He sticks to the rules of battle and does a very good job at doing so. Voone has black hair, black eyes and a scar across his eye from his training.
    -
- Lapis (M)
    - Lapis is the son of Dungar (Husband) and Jahova (Wife) Lazuli, where his parents were killed in the battle for the planets. Lapis is not necessarily the strongest but is the most intelligent and handles high tense situations with ease. Lapis is self taught and knows a decent way around ships and weapons. Lapis does extremely well in fights when he is alone and is able to fend for himself quite well. Lapis has blue hair with blue eyes.

Levels

Overworld

The overworld map for each section will consist of a group of nodes. Nodes will be connected with paths. The player can travel from node to node using these paths. The player will start on a start node and have their goal be shown as a boss node. Players will be tasked to travel from the start node to the boss node. The player will travel through other nodes which can contain a random encounter, also known as a normal level, a shop where players can purchase resources and repair or upgrade their ships. If the player travels directly to the boss node they will find normal battles and shops that are scaled to their current player level and have regular prices and items/resources. Nodes may also take a path away from the boss node, where players will be required to go out of their way in order to interact with these nodes. The normal battles these nodes contain will be a challenge for the player if they choose to encounter it. This will give better loot if the player succeeds in the battle. If a shop is contained in one of these nodes, the player could find rare items or resources, or better prices for more common items/resources.

Training Level

The training level will be a simple fight used to introduce the player to the various mechanics of the game. The player will be instructed on how to make moves, as well as how their drones work, Attack Points, and Move points. After each turn in the fight, the player will be introduced to a new mechanic and then instructed to focus on that mechanic for the next turn. For example, the mechanic being taught will be about the opponents damage numbers. These are shown to the player before they move so they can plan how they wish to move. The player will be shown these numbers and then instructed to move within range of an attack. The player will take the shown damage, showing them how that mechanic works. This will happen throughout the level to prepare the player for the rest of the game.

Normal Levels (Eliminate all enemies)

A normal level will consist of the player and their current team in a battle against an enemy and their team. A battle takes place on an ten by ten grid. The player and enemy will have a set number of move points and attack points that they can use each turn. In a battle the player will be shown how much base damage the opponent will be able to do to them before other calculations are taken into consideration. The player will then be given the option to move their units and attack the enemy, heal another unit, or defend against an incoming attack. Each unit on both the players team and enemy team will drone units to assist them in battle. The drones are not controlled by the player and are given specific instructions before the battle on how to act. For example, the player may want the drones to help attack if they have more than

fifty percent health, but defend when they are below 50% health. The battle is over when one team has zero units left to fight.

Normal Levels (Capture/Defend an objective)

In these levels, one team or even both teams will have a tile on the map labeled "Objective". The team defending an objective will lose if an enemy unit moves onto that space. The team that is defending an objective may not move one of their own units on top of their objective space, forcing them to try harder to defend it. These missions may also end when all enemies on the opposite side are defeated, as the other team would then win by default.

Boss Level

When the player reaches the boss node they will be taken to the boss fight. In this fight the boss will be a stronger enemy, possibly with more units than normal, more health than normal, or does more damage than normal. The boss may also be a unique enemy that is part of the story of the game. These bosses will appear throughout the game when the player has reached a certain point. A non unique boss will appear if the player is playing a map to get levels, resources, or if there is no unique boss in that part of the game. Unique bosses will be harder to defeat than normal bosses, due to many stat increases, requiring players to make sure they have reached an appropriate level and equipped their team correctly. Upon completing a boss fight players will be given resources for they area, currency, and possible other loot for their ship. Upon completing a unique boss fight, the story will be progresses, possibly unlocking a new area to explore.

Shops

Shops are nodes that do not require players to fight. Players can use shops to buy resources, instead of doing battles for them, repair their units, and buy new weapons and parts for their ships. Shops will have random stock of items and parts taken from a pool of possible items. These items update over time. The prices and rarity of items will depend on a shops position on the overworld map. If the shop is on a direct path to the boss node, then the prices will be higher, the items will be more common and the restock time will be shorter. If a shop is on a branching path, requiring the player to fight harder battles to reach then it may have rare items, lower prices for common items and a longer restock time. Shops will also purchase items from players in exchange for currency. The shop will have a limited budget for purchasing between each restock cycle.

Interface

Visual System

- Overhead 2D view
- Camera zoom
- Map panning
- HUD shows tactical information, selected unit information, minimap
- Menus for saving, help, options

The game will have a 2D aerial view of both the overworld map and the battle map. The player will be able to zoom in on certain sections if they wish.

When in battle the HUD will show the players health for each unit in their team, as well as their remaining move points. The player will also be able to see the enemy's health and damage they will deal on the next turn

In the overworld the player will be shown the map of nodes. The nodes that the player can travel between will be highlighted. The player will also be able to see what each node contains, as well as their current inventory space, and currency available.

Control System

The overworld map will contain various nodes that the player can use the mouse to click on and get information about the node. If the node can be travelled to then the player will be given an option to travel to it.

In a battle the player will be able to use the mouse to select the unit they want to use and then select the place they wish to move the unit to. The player can also use the 'W', 'A', 'S', 'D' keys to move the selector around the eight by eight grid. The enter key will be used as a selector in this case.

The escape key will be used to pause the game and allow the player to access a variety of options about the game, including sound options and the option to save their game, if the time is appropriate. For example, the player will not be able to save in the middle of a battle.

The player will be able to use the 'I' key to open their inventory during the game. They can then use the 'W', 'A', 'S','D' keys or the mouse to navigate and interact with their items.

The player can use the 'E' key to open a menu to view the current status of their team. This includes current upgrades, health, and other information about the ship.

Audio, music, sound effects

The audio for the game will include:
- Science-fiction based sounds for sound effects (Beeps, sweeps, pews, booms), mainly to be used during combat

- Clicks, mechanical whirrs, beeps, and similar sounds to provide audio feedback for player interaction with systems like menus
- Ambient background music for the overworld map
- Title theme for the main menu
- Level based combat themes with motifs
- Victory/defeat ditties
- Boss music based on combat themes

Help System

      Instructions and controls will be accessible from a pause menu in game. The training level should give an introduction to concepts the player needs to know.

Artificial Intelligence

Opponent and Enemy AI

The opponent/enemy AI will consist of algorithms leading the computer to make movement decisions based on the range of the players abilities and positioning of the player. The enemy AI will try to avoid ending turns in range of the players damage abilities and will aim towards moving in range to the player, attacking and moving back out of range to either a safe spot or somewhere that an ability will not be able to hit them. This AI will be distributed to the other enemy AI and will work together to focus damage on priority targets. Priority targets can be described as player entities and support AI that could accumulate a large amount of damage on their next turn. The enemy AI will take this into consideration and adjust the priority of which target to attack accordingly.

Non-combat and Friendly Characters

Non-combat and friendly characters will be distributed at outposts, ships and planets. These characters will interact with the player in a menu select manor giving options depending on which non-combat entity the player approached. Options offered could be buy/sell, risk for reward, repair and so on. The AI takes place in the item shops where certain items can be catered towards the players needs, while certain items could also be offered as a "buy cheap now for use later" giving players the option to use extra resources early to save resources later on if possible.

Support AI -- Player and Collision Detection, Pathfinding

Support AI will consist of algorithms leading the support characters to make movement decisions based on the players movement and ability decisions. The support AI should take into consideration where the player is, and where the most optimal map coverage spots would be. The support AI will also be similar to the enemy AI as it will move into range of enemies, use abilities and end its turn in a safe spot or out of range spot on the board. The support AI can also be guided to which targets it should be focussing as high priority and will work the the users actions in order to maximize damage and utility output with the player. In terms of its collision detection it will avoid occupying spaces near the main player as to avoid line of sighting abilities and to maintain more control over the map and for pathfinding, it will introduce algorithms to find the shortest path to an in range target while trying to reserve its movement points to move to a safe zone after an ability has been executed.

Technical

Target Hardware

Personal computers with minimum:
- 1gb of storage space
- 2gb of RAM
- 2 GHz, Dual Core processor
- A display of at least 1280x720 resolution
- Windows 8 or later
- Dedicated graphics card with at least 1gb of VRAM

Development hardware and software

The game will be developed using:

- Game Engine: Godot
- Godot editor
- C# code editor
- Git version control
- Github repository
- Audio/Visual software for asset generation
- Hardware: Personal computers with dedicated graphics cards and other suitable hardware

Network requirements

Stable internet connection required for download. Connection of more than 1mb/s recommended for timely download. No internet connection required to play the game after downloading.

Game Art

The art, style, and assets for the game:
- 2d non-isometric (the graphics will not be designed to appear to have 3 dimensions) pixel based graphics
- The style will be retro-sci fi, with non-smoothed pixels, space based backgrounds, and mechanical objects generally based on a chrome/grey/silver base layer colour scheme
- There will be organic space objects, such as planets, stars, asteroids in fitting colours
- The map will be divided into clear tiles, each tile (and sprites that occupy one tile) will be 32px by 32px
- Graphics will be using a "top down" view, like viewing a chessboard from directly above
- Key assets include ship sprites, projectiles, background images, stationary mechanical space objects, celestial bodies, interfaces, and menus
- Some assets may be sourced from 3rd parties, others will be developed by the team using audio and visual tools
- Placeholder assets will be used to facilitate fast prototyping, and be converted to final assets using feedback from playtesting