

Space Rocks

"A long time ago in a galaxy far, far away...."

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Contents

1	Player Types	3
1.1	Bartle taxonomy of player types	3
1.1.1	Achiever	3
1.1.2	Explorer	4
1.1.3	Socializer	4
1.1.4	Killers	4
1.2	Conclusion	5
1.3	Overview	5
1.4	Genre	5
1.5	Working title	5
2	Game Design	6
2.1	Concept	6
2.2	Game Structure	6
2.3	The Front End	7
2.4	In-Game Menus	8
2.5	Control Mechanisms	9
3	Technology	10
3.0.1	Development Systems/Tools	10
3.1	References	10

1 Player Types

1.1 Bartle taxonomy of player types

The Bartle taxonomy of player types is a classification of video game players (gamers) based on a 1996 paper by Richard Bartle according to their preferred actions within the game. The classification originally described players of multiplayer online games (including MUDs and MMORPGs), though now it also refers to players of single-player video games. The taxonomy is based on a character theory. This character theory consists of four characters:

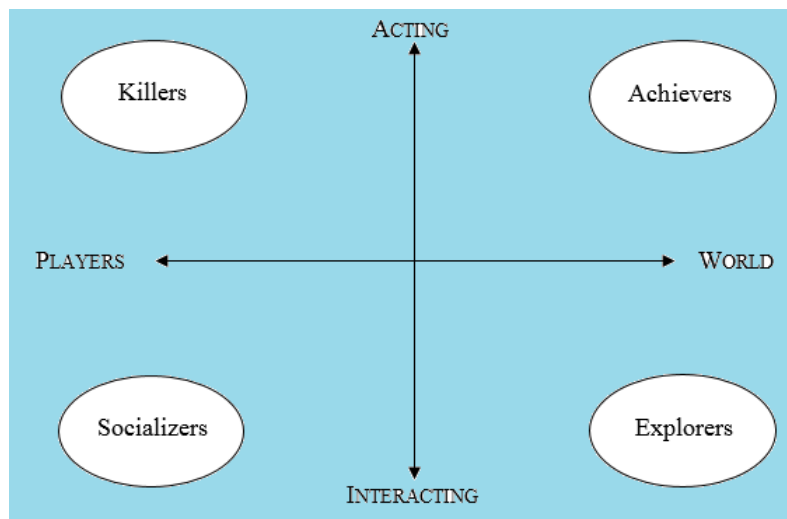


Figure 1.1: Games types

Achievers, Explorers, Socializers, and Killers. These are imagined according to a quadrant model where the X axis represents preference for interacting with other players vs. exploring the world and the Y axis represents preference for interaction vs. unilateral action. A test known as Bartle Test of Gamer Psychology based on Bartle's taxonomy was created in 1999–2000 by Erwin Andreasen and Brandon Downey, containing a series of questions and an accompanying scoring formula. Although the test has met with some criticism for the dichotomous nature of its question-asking method, as of October 2011, it had been taken over 800,000 times. As at February 2018, the Bartle Test of Gamer Psychology hosted by GamerDNA is no longer available. Alternative online implementations of the test exist, However the result of the Bartle Test is the "Bartle Quotient", which is calculated based on the answers to a series of 30 random questions in the test, and totals 200% across all categories, with no single category exceeding 100%.

1.1.1 Achiever

Also known as "Diamonds", these are players who prefer to gain "points", levels, equipment and other concrete measurements of succeeding in a game. They will go to great lengths to achieve rewards that confer them little or no gameplay benefit simply for the prestige of having it. Every game that can be "beaten" in some way caters to the Achiever play style by giving them something to accomplish. Games that offer special movies, extra endings, or other bonuses for beating it with a 100% completion rating appeal to Achievers.

1.1.2 Explorer

Explorers, dubbed "Spades" for their tendency to dig around, are players who prefer discovering areas, creating maps and learning about hidden places. They often feel restricted when a game expects them to move on within a certain time, as that does not allow them to look around at their own pace. They find great joy in discovering an unknown glitch or a hidden Easter egg. Single-player appeal to the Explorer Combat and gaining levels or points is secondary to the Explorer, so they traditionally flock to games such as *Myst* and its four sequels. In these games, you find yourself in a strange place, and the objective is to find your way out by paying close attention to detail and solving puzzles. The Explorer will often enrich themselves in any back story or lore they can find about the people and places in-game. Whereas an Achiever may forget about previous games as soon as they've conquered them, the Explorer will retain rich memories about what they experienced about their adventures. Contrary to what some may expect, Explorers can enjoy restrictive games as well as permissive ones. The challenge in such a game is to get it to do something its programmers probably didn't intend for it to do; gamers who share a high Explorer percentage with a high Achiever one will often be the ones who set unusual objectives for themselves (like completing the game within a certain amount of time, under certain restrictions, or in a certain order) to put the tricks they've gathered to use. They also are known for their perseverance.

1.1.3 Socializer

There are a multitude of gamers who choose to play games for the social aspect, rather than the actual game itself. These players are known as Socializers or "Hearts". They gain the most enjoyment from a game by interacting with other players, and on some occasions, computer-controlled characters with personality. The game is merely a tool they use to meet others in-game or outside of it. Single-player appeal to the Socializer Since their objective is not so much to win or explore as it is to be social, there are few games that the Socializer enjoy based on their merits. Instead, they play some of the more popular games so that they can use their experience to socialize with others who have played them or use the multi-player features. However, there are some games designed with their play style in mind. (The increasing number of games that offer significant relationships includes the *Fable*, *Mass Effect*, and *Knights of the Old Republic* titles.) Additionally, some single-player games have a strong community around them. Examples of single-player games where players use the forums to post pictures of what they've created and share experiences include *Cities: Skylines*, *SimCity 4*, and *Dwarf Fortress*. This is taken a step further with games offering heavy modding as communities begin to form around those concepts. Examples of single-player games offering large modding communities include *The Elder Scrolls V: Skyrim*, and *Fallout 4*

1.1.4 Killers

"Clubs" is a very accurate moniker for what the Killer likes to do. They thrive on competition with other players and prefer fighting them to scripted computer-controlled opponents. Single-player appeal to the Killer These gamers love to sow destruction, so games that are high in carnage, action, and destructible environments are definitely a plus. Many of these gamers also enjoy the opportunity to depart from the norm of being "the good guy" who comes to save the day. Instead, they will play on the side of evil or conquest. On the flip side, Killers also represent the archetype which is most interested in affecting their environment, so sandbox games in which they can take a direct hand in building (or destroying) a virtual society will appeal to them as well. While they may love to kill, they also love to create item/things that they can use to kill.

In addition to helping players define their game-playing preferences, the Bartle taxonomy has also been used by game designers to help define the requirements of games that are

intended to appeal to a particular audience.

1.2 Conclusion

I have chosen this particular game, because i would consider myself as a killer type of players, i used to play a lot such games as "Call of Duty", "GTA", "Battle Tank". Particularly top-down perspective was a prominent camera view used in the Grand Theft Auto series, where the player and their surroundings are viewed from overhead, rather than being able to look in any direction. In the manuals of the first two games, it is called 'OJ Cam'. Making this game will teach me in developing more games with elements of AI, objects collision, movement controls.

1.3 Overview

Space Rocks is based on classic "Asteroids" game. Asteroids is a space-themed multidirectional shooter arcade game designed by Lyle Rains, Ed Logg, and Dominic Walsh and released in November 1979 by Atari, Inc.[1]

[\[1\]Asteroids.](#)

1.4 Genre

Top-down shooter.

1.5 Working title

"Space Rocks".

2 Game Design

2.1 Concept

- The player controls a single spaceship in an asteroid field which is periodically traversed by flying saucers.

2.2 Game Structure

The game starts with pressing on start button ,taking you to first level ,there will be around 20 asteroids flying towards the ship,our mission is to destroy them,if the ship gets collided with an asteroid a player's life is reduced by one till there is any life left otherwise the player would be taken to the start new game menu,every destroyed asteroids counts as 10 points,

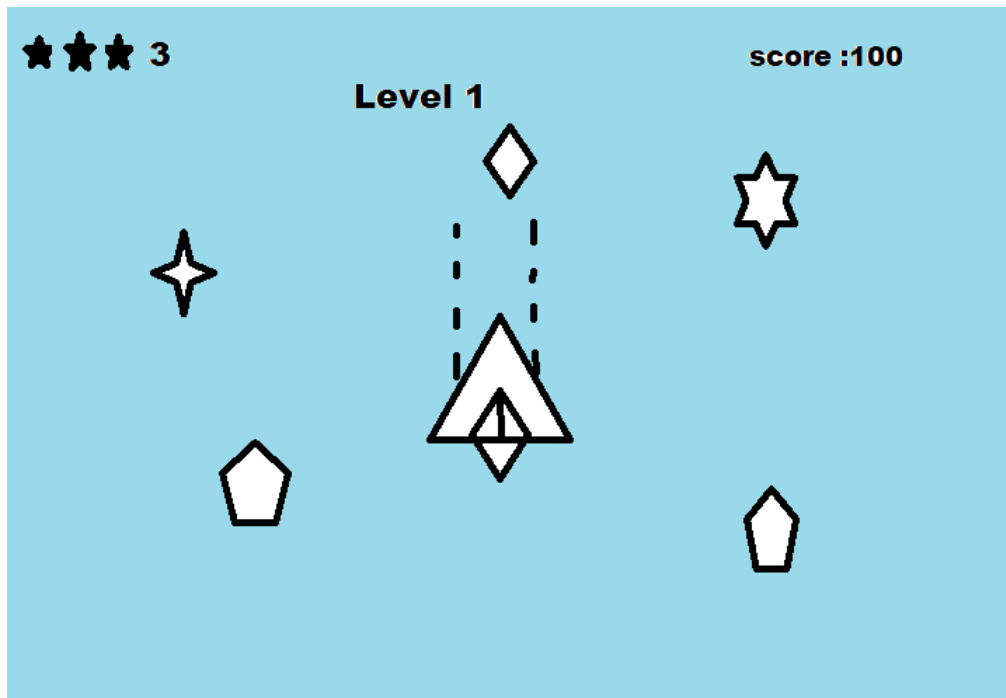


Figure 2.1: Level 1

after getting all asteroids destroyed the player starts next level increasing difficulty by introducing an alien ship with firing ability,there would be only 1 ship in level 2 plus asteroids as well,in order to destroy the alien ship the player must shoot the target down three times.

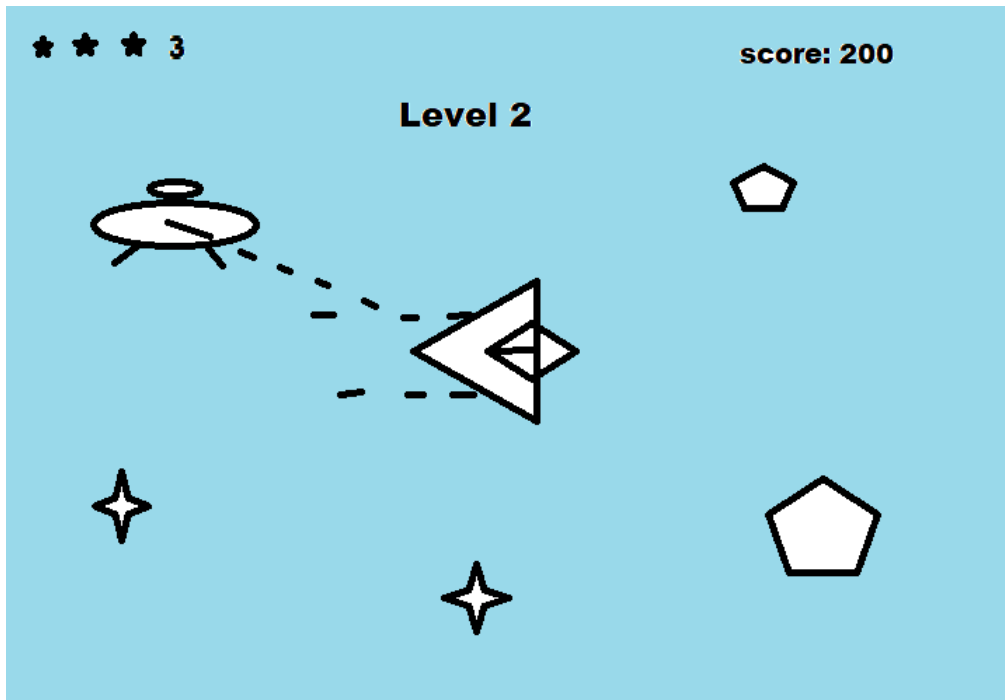


Figure 2.2: Level 2

Next level will introduce more alien's ships around 3 to 5 ,every time the player's ship gets hit a life is reduced.

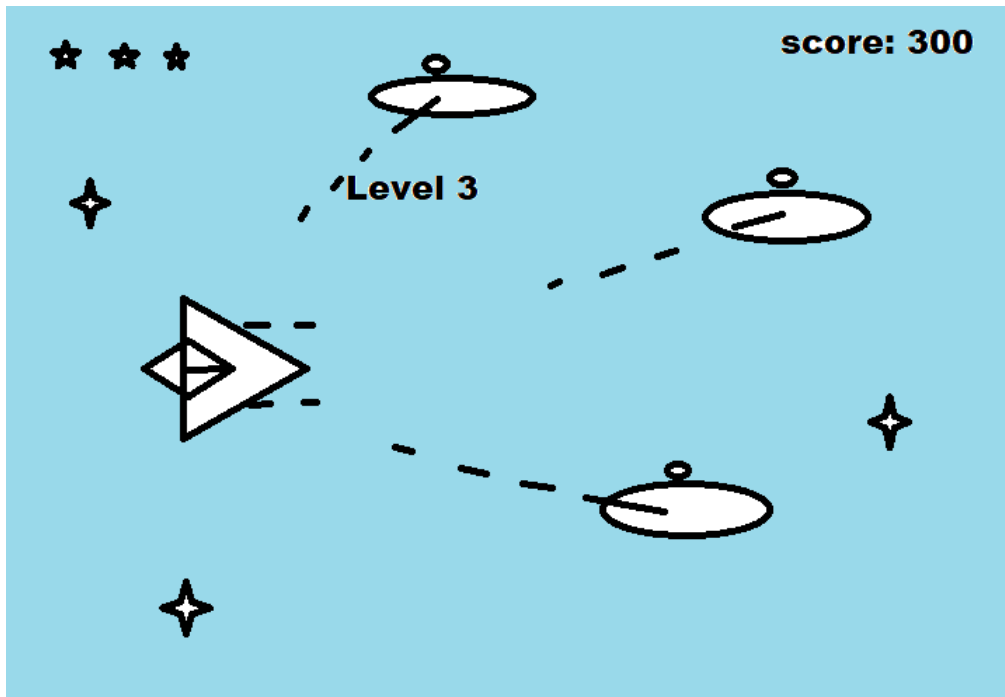


Figure 2.3: Level 3

2.3 The Front End

Splash screen with a simple start button takes a player to the first level. About button describes the game in a few words with pop up window. The background is a dark sky with stars.

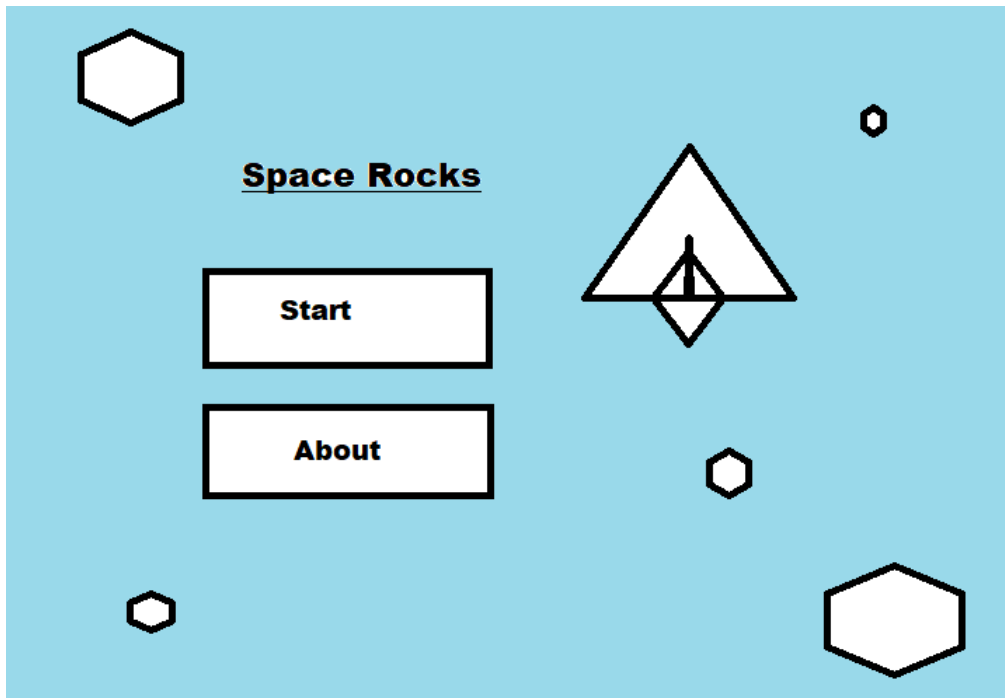


Figure 2.4: Splash screen

2.4 In-Game Menus

In game menu consists of two buttons ,concretely 'continue' and 'quit' ones,first instance takes you back to play the game , 'quit' takes back to the screen menu with pop up confirmation window.

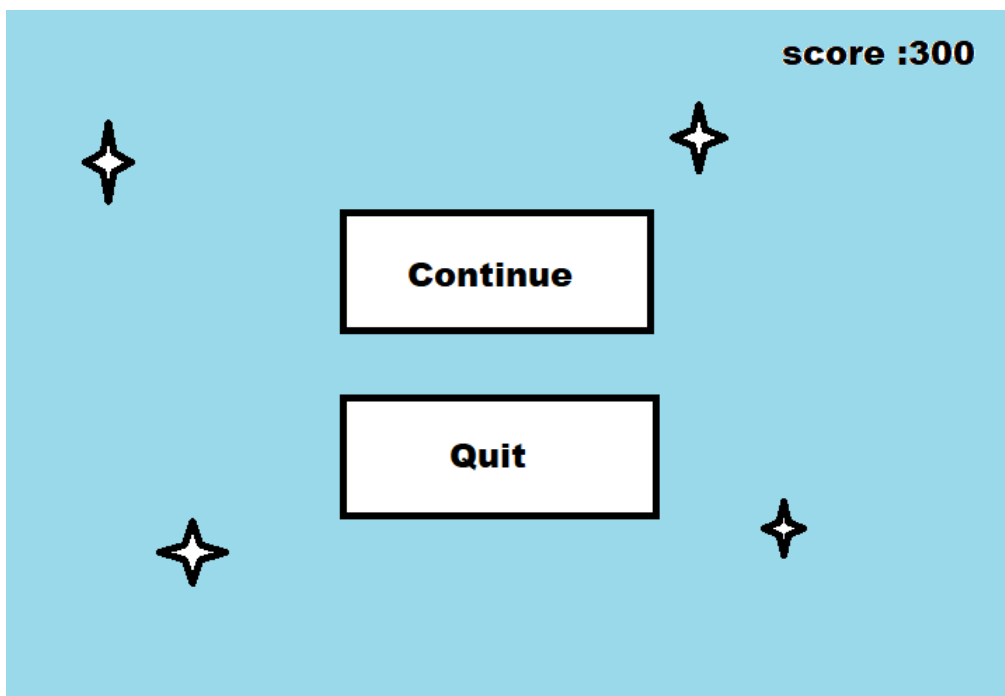


Figure 2.5: In game menu

2.5 Control Mechanisms

PC controls

- Space button to control shooting
- Top arrow button to accelerate
- Down arrow button to slow down
- Left arrow button to turn around axis to the left
- Right arrow button to turn around axis to the right

Mobile device

- The player will control by using touchscreen on a mobile device

3 Technology

3.0.1 Development Systems/Tools

- Unity 2019.2.***
- Visual Studio 2017/2015
- Adobe Photoshop
- Laptop or Desktop computer

3.1 References

- https://en.wikipedia.org/wiki/Bartle_taxonomy_of_player_types
- [https://en.wikipedia.org/wiki/Asteroids_\(video_game\)](https://en.wikipedia.org/wiki/Asteroids_(video_game))
- <https://www.stuff.tv/my/features/best-2d-fps-shooters-we-used-love>
- <https://www.lynda.com/search?q=top+down+2d+unity+game>
- <http://kidscancode.org/>