

A Puzzle Game by Gina Fabio, Lean Mateos, John Lockard, and Yukun Liu.

Aster is a puzzle game about two things: one, rescuing innocents caught in the middle of a civil war; and two, building a peaceful and functional community with those rescued. This community will blossom as the game progresses, if the player makes good choices, hence the title: Aster. Unlike many games popular in the market, the game has no combat, despite its setting.

Concept and Narrative

The story begins when the player character escapes their city, only to discover their friends are still trapped inside. The "tutorial level" is therefore set in a known city with a known objective,

allowing the player to learn the mechanics easily. The puzzle itself consists of two phases: a "day" phase wherein the player explores the city and uses paint visible only under blacklight (like "invisible ink") to mark a path out of the city, and a "night" phase wherein the player uses a blacklight to follow the path to objectives and to freedom.

The middle of the game would consist of about six cities, each with multiple puzzles available. The initial puzzle in each city would be simple, and further puzzles would have the same basic layout, but would include different obstacles and objectives and therefore different paths. The cities would also be aligned with either the "rebellion" or the "government", and solving more puzzles



in one faction or the other could lead to the player allying themself with that faction. A player

could only solve a certain amount of puzzles in a city before the city becomes "unsafe", and a certain amount of puzzles total, to facilitate possible allegiance with either faction and trigger endgame.

Once the endgame conditions have been reached, the player character will be captured by either the government or rebellion, depending on the city they enter. They will then have to escape the city, and return to the city of Aster, which is under attack by one of the factions. They will have to solve a final series of puzzles helping the residents of the city escape, and lead them to a new safe city.

Features and Mechanics



The mechanics of Aster are inspired by a game called Star Wars: Pit Droids, in which the player uses various kinds of arrows on a grid to direct mindless droids towards a goal. The morality element of the game is similar to Undertale, which, while allowing fighting, greatly discourages it. Visually it takes inspiration from the early Fallout games, which have a top-down perspective and a post-apocalyptic aesthetic. The game will be built with the Unreal engine for Windows systems.

The basic mechanical premise of the game is marking a path through a maze-like map with arrows. As the player progresses through the game, the difficulty would increase by introducing new obstacles—some of which may be mobile—and other objectives to complete along the way. These extra objectives may be optional but beneficial, or necessary for puzzle completion.

NPCs include:

- Police: might be friendly; unfriendly encounters have bad results
- Tattletales: always unfriendly; will attempt to summon police
- Informants: always friendly; will offer tips and bonus or extra objectives

Non-NPC obstacles include:

- Buildings: the player must avoid large physical barriers to reach their goal
- Roads: traversable; too conspicuous to leave markers
- Roadblocks: same as buildings, except that there are more likely to be NPCs nearby
- No Man's Land: actually an area of abandoned buildings and roads; boundaries are patrolled by NPCs and afford only one exit out of the city

Other objectives include:

• UV Arrows: The player will be able to place arrows during the day that will only be visible at night under a UV flashlight to help guide them through the city.

- Wanted Posters: tearing enough down may offset the danger of doing too many puzzles in a row
- Supplies: required for story reasons, or optional for bonus points
- Fake Papers: a "Get Out of Jail Free" card in case unfriendly NPCs are unavoidable
- Other Rescues: helping two people or families at once is more efficient but may slow the PC down, making them more likely to get caught by NPCs

Besides these things, the faction each rescue belongs to may affect which puzzles are available later. Furthermore, "special" missions would advance the plot and/or unlock new cities or obstacles. The player would be scored with a point system. Rescues and extra objectives will add points while getting caught by an NPC will subtract them.

Interface

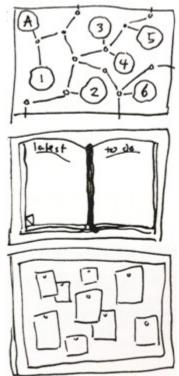
The game would include multiple different screens for different purposes:

- City maps for each city with puzzles (including Aster)
- World map for navigating between cities
- Journal and inventory to keep track of objectives and items collected
- Mission screen to accept or decline missions
- Prison/holding cell for when the PC is caught
- Aster, which would function as a hub for a number of other areas:
 - Headquarters/Home: advice, special missions, and game statistics, with journal access
 - Post Office: special missions, plot advancement and flavor, mission rewards
 - Message board: advice, regular missions, flavor

The game would be navigated primarily the arrow keys. Placing arrows would be done by hitting an interaction key and selecting the appropriate arrow direction. The UI would be minimal. City and world maps would display the player's current score. Hitting the escape key would bring up a menu, which allows the player to save their game and view their journal. On the city map, the menu would also include an option to restart the mission or exit to the world map. The UI of the city map would also include the number of attempts at solving the current puzzle, and a minimap.







Our individual skills are as follows:

Gina: Art/graphics, some 3D modeling (Maya, Blender), programming (Python; Java; some Ruby, Javascript, and C#), level design, rigging and animation (2D and 3D), some mocap, Unity engine.

Lean: Unreal and Unity engines, videogame creation. video editing (Final Cut Pro), 3D Modeling (Blender), programming (some Python), Photoshop.

Yukun: Programming (Java, Python, HTML), 3D modeling, game design, video editing. **John:** Sound, 3D modeling and animation (Blender), video editing, Photoshop, level design, programming (Python), Unreal engine, scripting.

Gina is in charge of concept art, level design, and 3D models (people). John is in charge of sound and the story. Yukun is in charge of 3D models (buildings) and textures. Lean is in charge of compiling everything into Unreal Engine and making sure the game works.

We are starting to build our presence on social media already. We currently have a Twitter, Facebook, and YouTube page created that will keep up with the development of the game. Unfortunately custom URL's for Facebook and YouTube can only be established after our following has reach a certain size. We all plan on sharing these sites on our own personal social sites to help spread the word.

Twitter: https://twitter.com/AsterVideoGame

Facebook: https://www.facebook.com/Aster-409842679226300/

YouTube: https://www.youtube.com/channel/UCnLTK 4Q57ugnB0rJgvo8rA

SCHEDULE

By December 12th:

- <u>Lean</u>: Prototype with mechanics.
- <u>John</u>: Library of sound effects 10% recorded, coherent story, Three proposed score, decision on voice recording.
- Gina: Concept art (characters and maps), art style.
- Yukun: Model at least 5 different and sizes types of buildings.

By January 31st:

- Gina: Main character modeled, at least one NPC.
- Lean: Cities 1-2 layout/build completed.
- Yukun: 5 building models that match art style.
- <u>John</u>: Complete story, at least 30% of sound effects completed, two decided score, 5 proposed, if voice- 25% recorded.

By February 29th:

• <u>Gina</u>: All characters modeled, starting on textures/cutscenes.

- Yukun: At least one unique building per city; more as needed.
- <u>Lean</u>: Cities 3-4 layout/build completed.
- <u>John</u>: Sound Library 80% complete. All scores established, 80% decided. If voice acting, voice files 90% complete.

By March 31st:

- Gina: Textures, cutscenes, and other visual assets.
- <u>John</u>: Voice files 100% complete and implemented. Scores complete.
- Yukun: Finishing models; textures.
- <u>Lean</u>: City 5 layout/build completed (Aster City): Working on replacing placeholders with finished models to previous cities. Have a trailer for the game completed (collaboratively).

By April 30th:

• All: Assembling, testing, and making the video. Spreading the word via social media (Facebook, Twitter, Youtube).