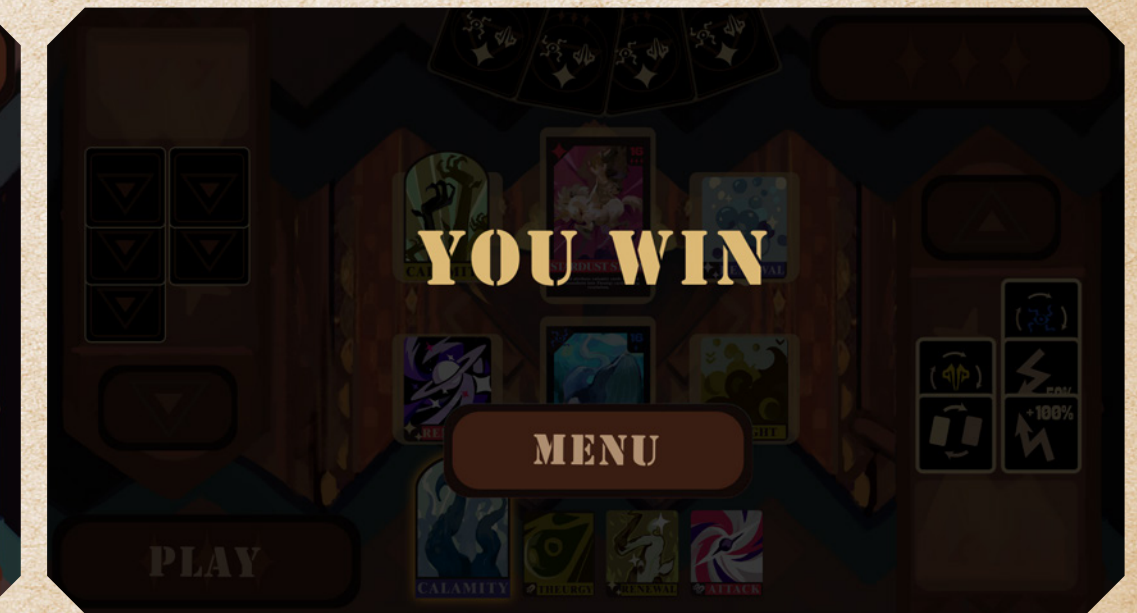
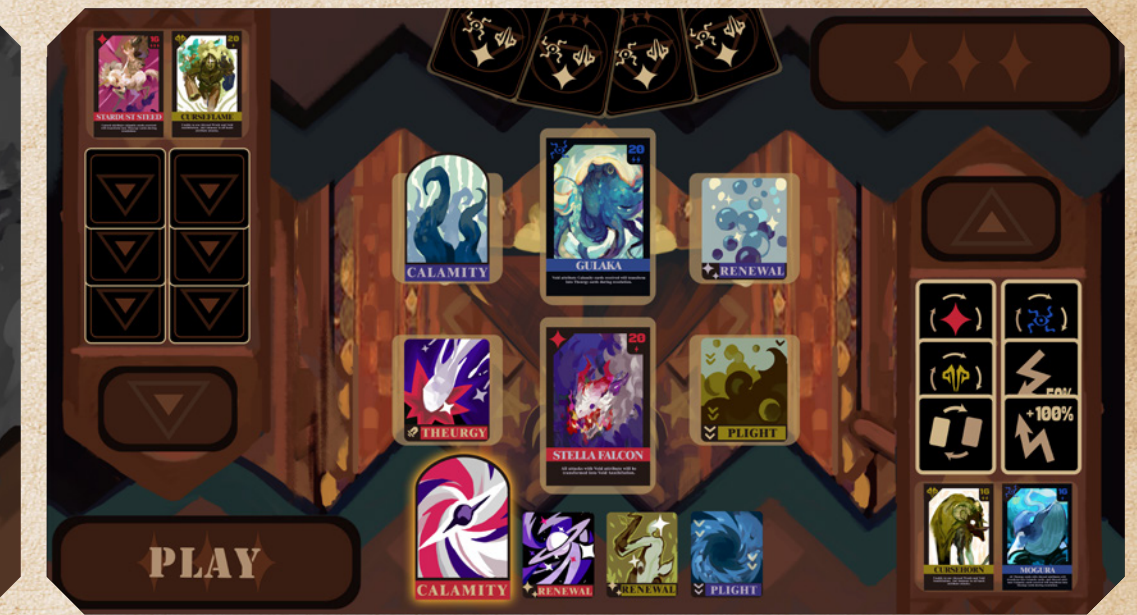


• ELDRITCH DUEL •



This is a dual-player online card-building game centered around the core gameplay of rock-paper-scissors and strategic decision-making. The theme revolves around fantastical creatures from a different world. Of course, during the design process, we have also integrated some of our inherent understandings from various domains, aiming to resonate with a broader audience. Within this project, I am responsible for all aspects of gameplay, mechanics, and design iterations. I have applied and put into practice the theoretical research on games that I had conducted prior to this project.

• SCREENSHOTS •



· **ATTRIBUTE SETTINGS** ·

<p>Void</p>	<p>Keywords: Cosmic mystery, interstellar void, nebulous realms. Inspired by unexplored space and sci-fi movies.</p> <p>Names of Monsters: Stellar Falcon, Stardust Steed, Wailing Wraith</p>	
<p>Abyss</p>	<p>Keywords: Lovecraftian horror, ocean depths, tentacles, vibrant and pale hues.</p> <p>Names of Monsters: Gulaka, Mogura, Velothrax</p>	
<p>Curse</p>	<p>Keywords: Wraiths, deathly aura, green flames, skeletal forms.</p> <p>Names of Monsters: Curseflame, Cursihorn, Cursetrail</p>	

· **GAME MECHANICS** ·



Monster Name Design

Void monsters draw from sci-fi, Abyss follows Lovecraftian themes, and Curse creatures use common gaming prefixes. This naming strategy accentuates attribute differences, promoting unity within each category. Reflects the game's core mechanics.

Rock-Paper-Scissors (First Resolution) & Strategic Wagering (Second Resolution)

In gameplay, after revealing cards simultaneously, counters seal the opponent's cards based on attribute match-up (rock-paper-scissors concept), yielding rewards and penalties.

Strategic Wagering involves predicting opponents' moves, relying on player-versus-player interactions. Therefore, an online multiplayer mode is essential for a genuine human-to-human strategic experience, avoiding limitations against AI opponents.

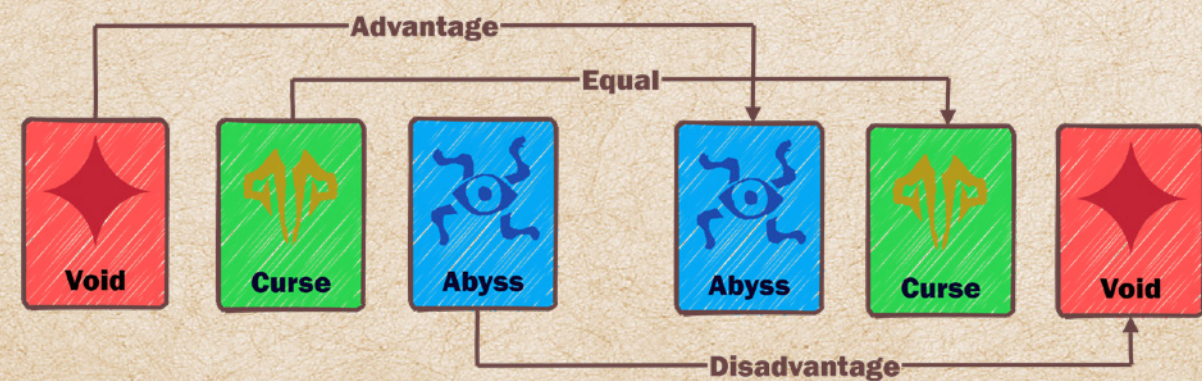
• Game Mechanics •

Design of Card Composition

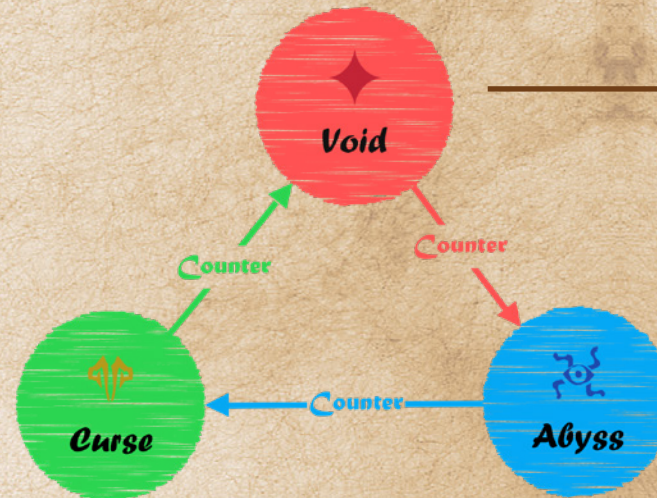
Types	Lifecycles	Functions
Monster Cards	Remain in play for a duration of the match until their health is depleted.	Long-term strategy building
Action Cards	Resolved and discarded after one turn, drawn again in the subsequent turn.	Swift strategic adaptation
Special Cards	Swiftly cast during the end phase of a turn, with the card disappearing after being used.	Rapid secondary strategic adjustments

Monster Card Selection and Arrangement Design

For each player, select one monster card from the three different attributes. Then, arrange the chosen monster cards in a specific order for their respective entrances, all while having the ability to observe the confirmed sequence of one of the opponent's monster cards. The content of the third monster card remains concealed during the arrangement phase.



• Monster Skill •



Monster Value Design

HP: Monster cards' health; when zero, progresses to the next card. If the last card's HP reaches zero, game ends.

Speed: Affects resolution order when the final matchup has same-attribute cards. Higher speed determines resolution.

Abilities: Passive skills tied to monster design and strength, constantly active during gameplay.

Attribute Amplification

Same-attribute secret cards transform into disaster cards → Does not disrupt the gameplay loop but significantly increases attribute bias

Players might favor playing action cards of a stronger attribute, getting a boost upon activation. However, in this game, a card's attribute outweighs its strength, allowing opponents to use this bias against you, creating a psychological battle.

Opponent Card Pool Sealing

Renders certain types of cards ineffective → Indirectly influences the gameplay loop to a certain extent by preventing specific cards from being played.

You may have a card countering your opponent's attribute, yet their monster might be immune to it. In some instances, your deck's composition demands playing a specific card to refresh certain attribute cards. If your opponent's monster is immune to that card, it's a wasted opportunity this turn, even if the card could be effective.

Reducing Opponent's Attack Strength

Some attributes' disaster cards, when activated, transform back into secret cards → Doesn't disrupt the gameplay loop, but weakens the opponent's strength, ensuring our side's longevity.

• Action Card •

Theurgy Cards (Minor Attack)

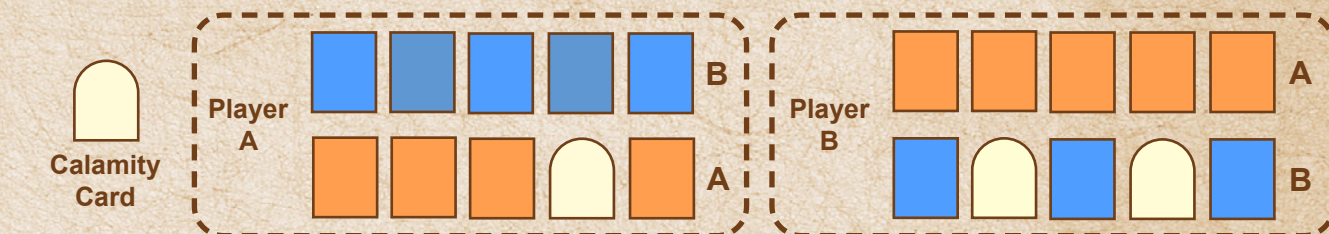
Upon activation, deal 2 points of basic damage of the corresponding attribute.

Calamity Cards (Major Attack)

Upon activation, deal 4 points of basic damage of the corresponding attribute.

Damage calculation adapts dynamically based on the attribute of the opponent's monster card.

Calamity cards are visually and functionally unique, but players cannot preview them before drawing. Also, players can't tell how many calamity cards opponents have by observing their hand. This feature is only revealed upon viewing personal decks or playing a card, exclusive to digital games.



Renewal Cards (Buff)

Renewal Cards restore 4 health points and remove abnormalities, tied to the player's monster attribute.

Plight Cards (Debuff)

Activating Plight Cards causes a 6-turn status effect, making the enemy lose an extra health point at each resolution.

• Dynamic Resolution System for Action Cards •

The resolution of all activated action cards is tied to the attributes of monsters.

Countering Relationships	Effects
Same attribute	Normal
Counters	Enhancement
Countered by	Debilitation

For instance, when an action card like Theurgy (Minor Attack) of the Void attribute activates, if the target is a Void-type monster, it inflicts 2 points of damage; if the target is an Abyss-type monster, it inflicts 4 points of damage; if the target is a Curse-type monster, it inflicts 1 point of damage.

• Card Drawing Mechanism Design •

The total cards available for drawing is 6		
Same Attribute x 3	Countering Attributes x 2	Countered by Attribute x 1

When different attribute monster cards are on the field, the composition of the card pool varies, creating attribute biases that influence long-term strategy building.

Dynamic Balance System in the Card Play Phase

Drawing cards is dynamically balanced based on the attributes of cards played. This ensures that the composition of the 6-card deck remains consistent with the attributes played.

• Special Card Function Design •

Card Swap

Swap the positions of two cards on your side of the field → Alter card placements, potentially leading to changes in attributes and strengths.

Attribute Alteration Cards (3 cards)

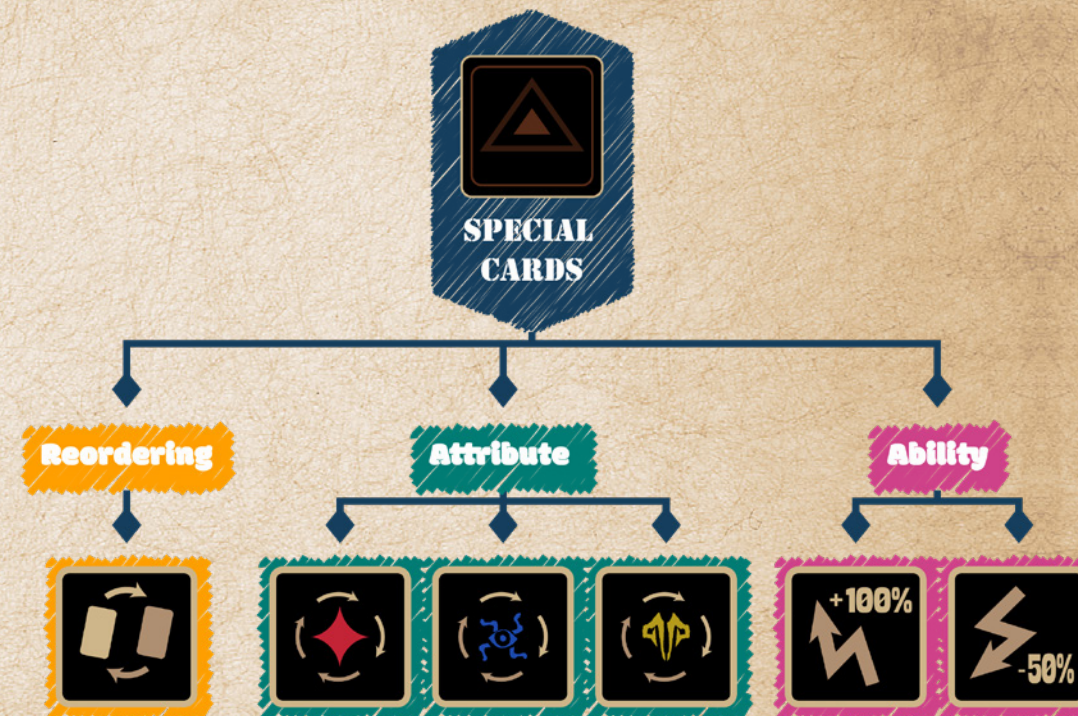
Modify a card's attribute while retaining its strength.

Ability Enhancement Card

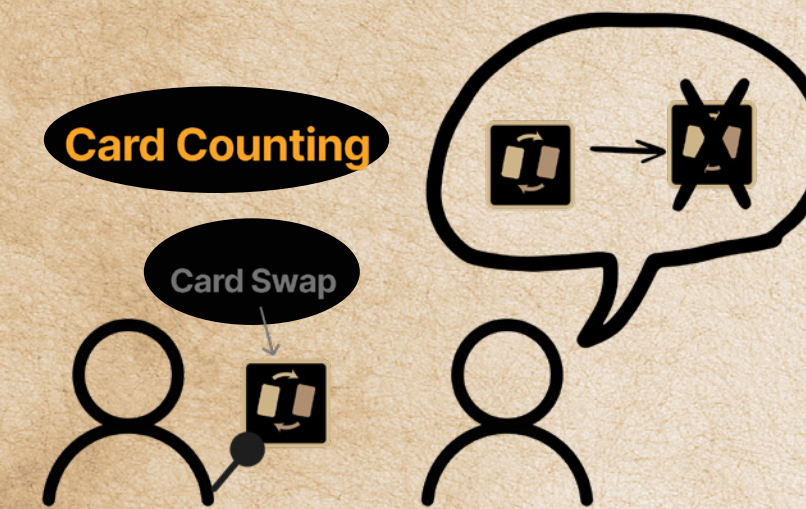
Enhance a card's strength while keeping its attribute unchanged.

Ability Diminishment Card

Reduce a card's strength while keeping its attribute unchanged.



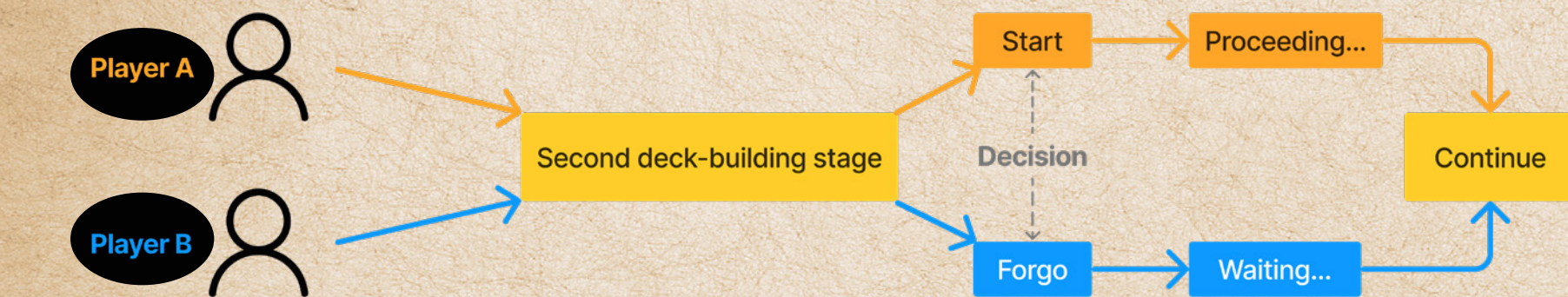
• Strict Quantity & Usage Limitations of Special Cards •



Players start with all the special cards in their possession. During each secondary deck-building round, players have the option to decide whether to use special cards for personal benefit. Each special card can be used only once, persisting until the end of the match. Players can deduce the composition of their opponent's special card pool by observing their opponent's usage of special cards. This insight aids in formulating future gameplay strategies. For example, if the opponent has already used the "Card Swap," it is guaranteed they won't use it again, alleviating concerns about card swapping in subsequent deck-building rounds.

Two-Stage Card Deck-Building Game Design

It's worth noting that the game's two-stage deck-building process is not compulsory; players have the choice to opt in based on the circumstances. This choice is closely related to the strict limitations on the usage of special cards.



This design, while limiting the use of special deck-building cards, enhances the competitive aspect of the game. Players must also consider the possibility of their opponent or themselves opting out of the second deck-building stage, adding an additional layer of strategic depth and anticipation to the gameplay.

• Iteration •

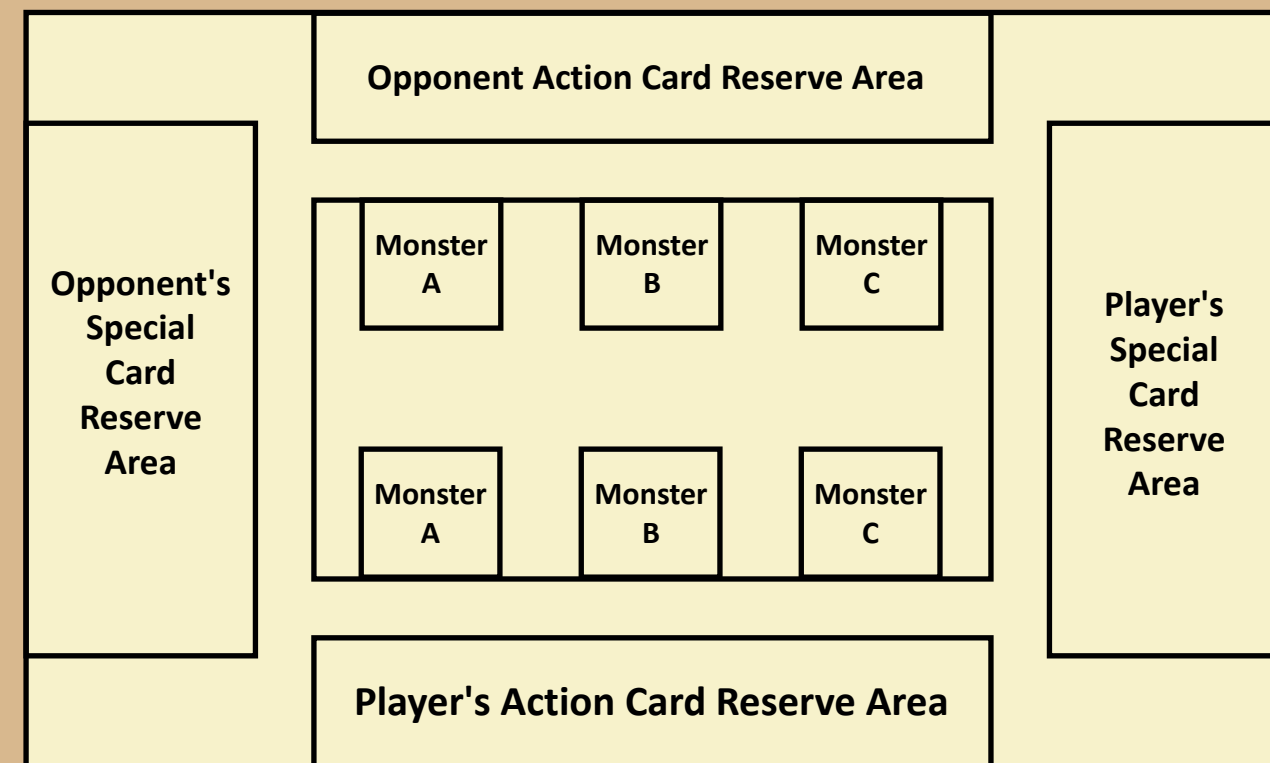
Core Gameplay & Layout Iteration

Initially, the game didn't have action cards or involve the sequence or content of monsters. Both players had health bars, aiming to deplete their opponent's for victory.

Players built three monster cards simultaneously, flipped during resolution, and entered a second phase for swaps, attribute alterations, or strength adjustments. Monsters served as action cards: some for attacks, others for buffs or debuffs.

Refinements were made in iterations to deepen the game's strategy and gameplay.

Version 1

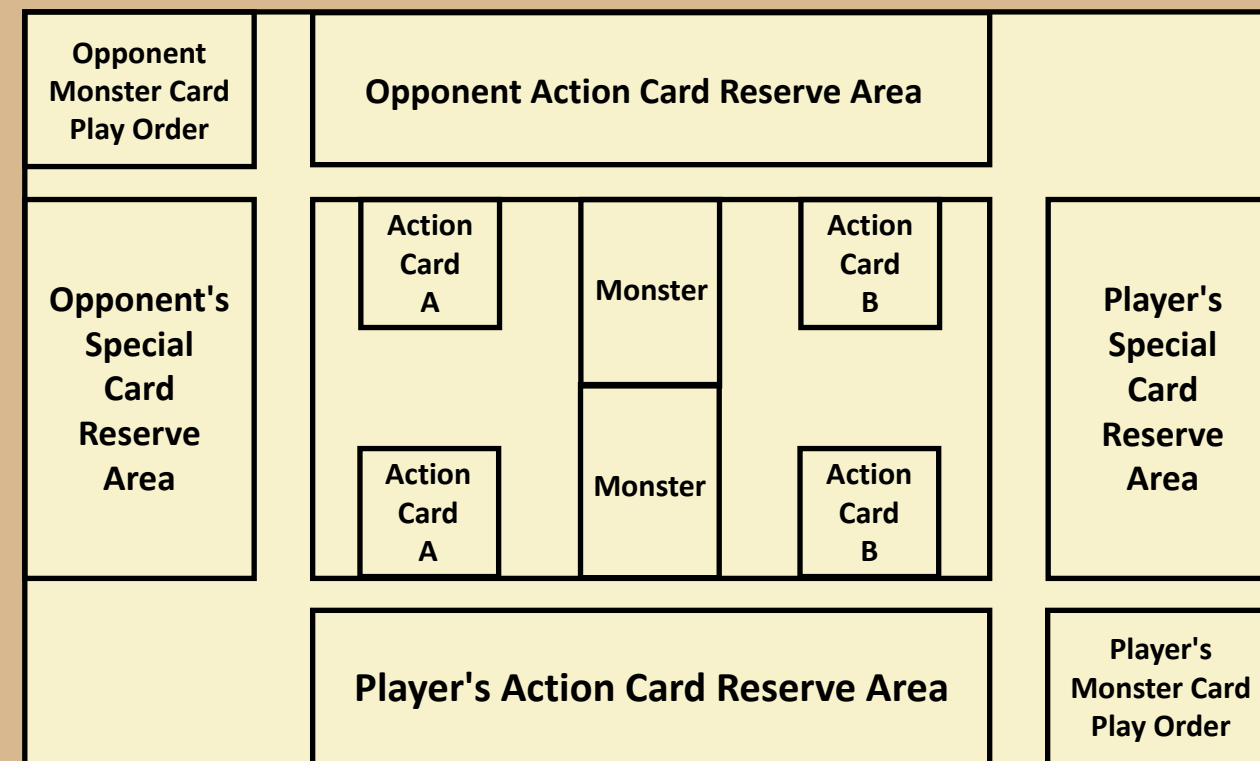


Issues in Version 1

Problem 1: Monster cards, acting as action cards, are quickly consumed, creating short-term strategies and inefficient art resource utilization.

Problem 2: The three-card selection for the second deck-building stage leads to excessive variability, especially with swap cards. This randomness complicates decisions and burdens players cognitively.

Version 2



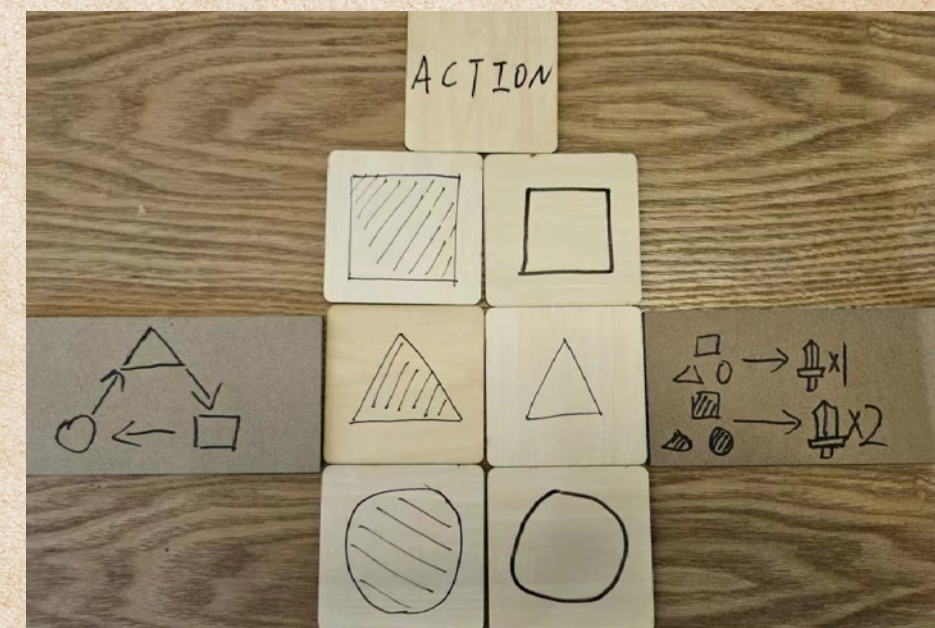
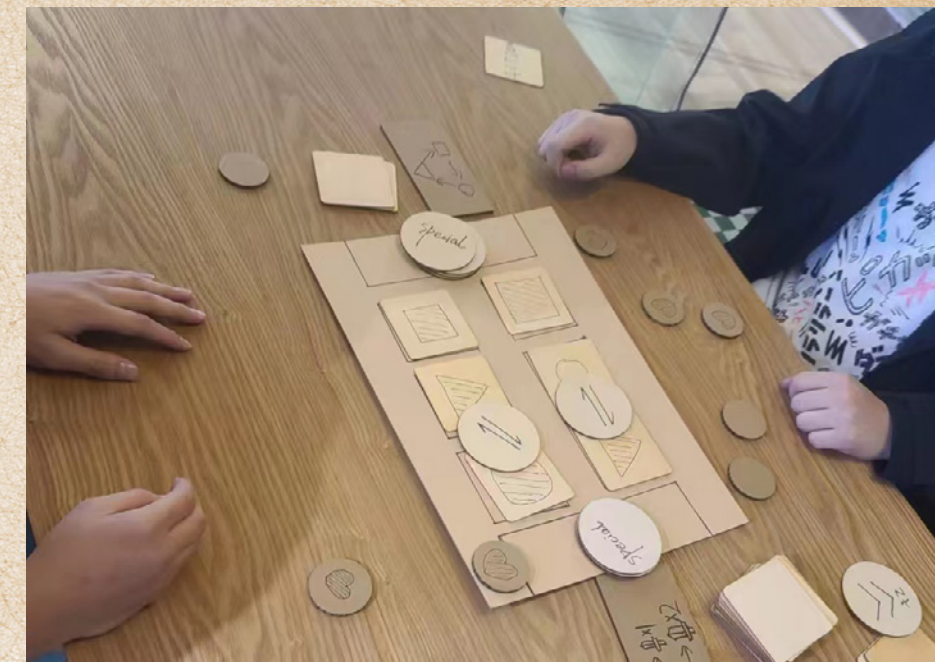
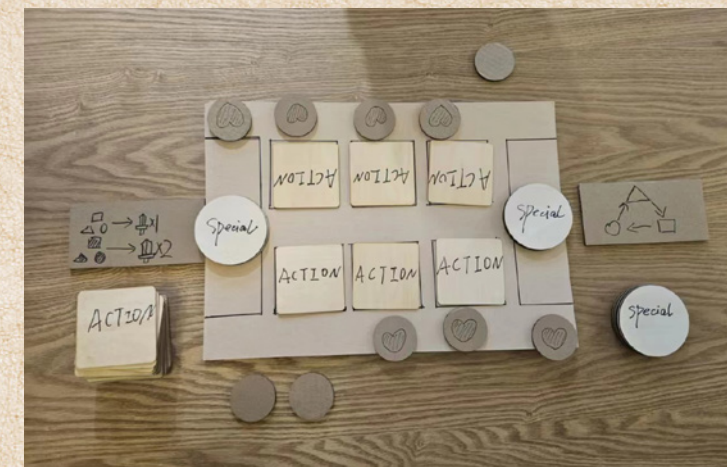
Solutions Post Iteration

Solution 1: Introduce action cards for immediate use and transition monster cards into a long-term strategy by replacing the player's health bar. Adjust health values, speed factors, and inherent skills for balanced card strengths.

Solution 2: Revamp the layout from three monster cards to one monster card and two action cards. The monster card becomes the long-term strategy component, while the second stage affects only the resolution of the action cards.

• Prototype •

Introduce action cards for quick construction while shifting monster cards to replace the player's health bar as a component of long-term strategy. Additionally, design corresponding health values, speed factors, and inherent skills to balance the card strengths.



• Iterations on Mechanisms & Card Changes •

Removal of Defense Cards from Action Cards Before iteration

The player's basic action cards included Theurgy, Calamity, Renewal, and Plight, along with a defense card named "Ward." The Ward card essentially acted as a dynamic health buffer independent of the player's health pool. When activated, it provided the player with a certain number of armor layers, and the consumption mechanics were the same as for health points—each layer of armor was equivalent to one health point, but armor layers were consumed before health.

Problem

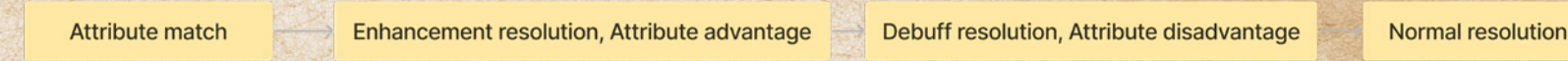
The Ward card introduced a new attribute (armor points) into the game's mechanics, which deepened the strategic depth of the game and increased its complexity. However, this design introduced an extra layer of decision-making for players, and since not all cards might be able to resolve due to attribute checks (commonly known as "Rock-Paper-Scissors"), it led to a less enjoyable player experience. Even though the design added complexity and strategy, it didn't balance the game's randomness and strategy proportionally. Therefore, for the sake of optimizing the player's experience and conserving artistic resources, the Ward card had to be removed.

Removal of Special Resolution Rules for Renewal Cards Before iteration

Because Theurgy, Calamity, and Plight cards affected the opponent's monster cards, their dynamic resolution rules were based on the opponent's monster card attributes, as follows:

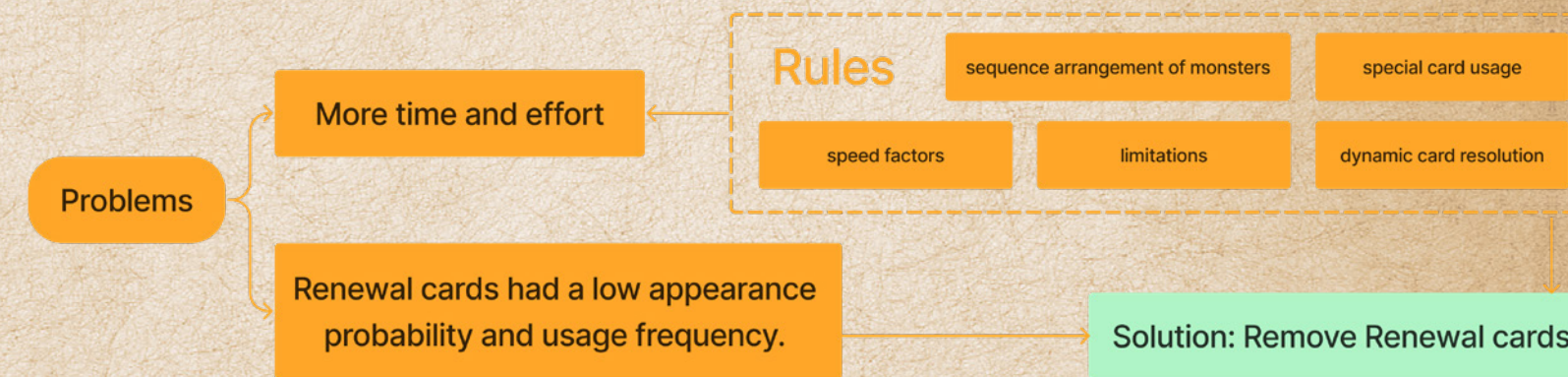


However, the Renewal card in the game affected the player's own monster cards. Logically, it should have been resolved based on the player's monster attributes, which would have led to a rule like this:



This rule made sense from an attribute advantage perspective.

Problem: This meticulous design, while theoretically sound, presented challenges when considered from the player's perspective and their level of acceptance.



Renewal cards had low usage and added complexity due to differing resolution algorithms between player and opponent monsters. To improve the gaming experience and simplify the learning curve, their unique dynamic resolution was removed.

• Theoretical Validation •

Exploring the Impact of Strategy and Randomness Balance on Player Experience in Games:

Design Perspective: How to balance the experience of strategy and randomness in the game design to immerse players?

Conclusion: Relationship diagram between strategy, randomness, and player experience (Comparison: Flow experience in game design - Skill & Difficulty).

Tips: After extensive research on similar games and this game, the conclusion was drawn that the player's immersive experience does not lie in the range around the slope = 1 but rather in the range around slopes of 0.4-0.6.

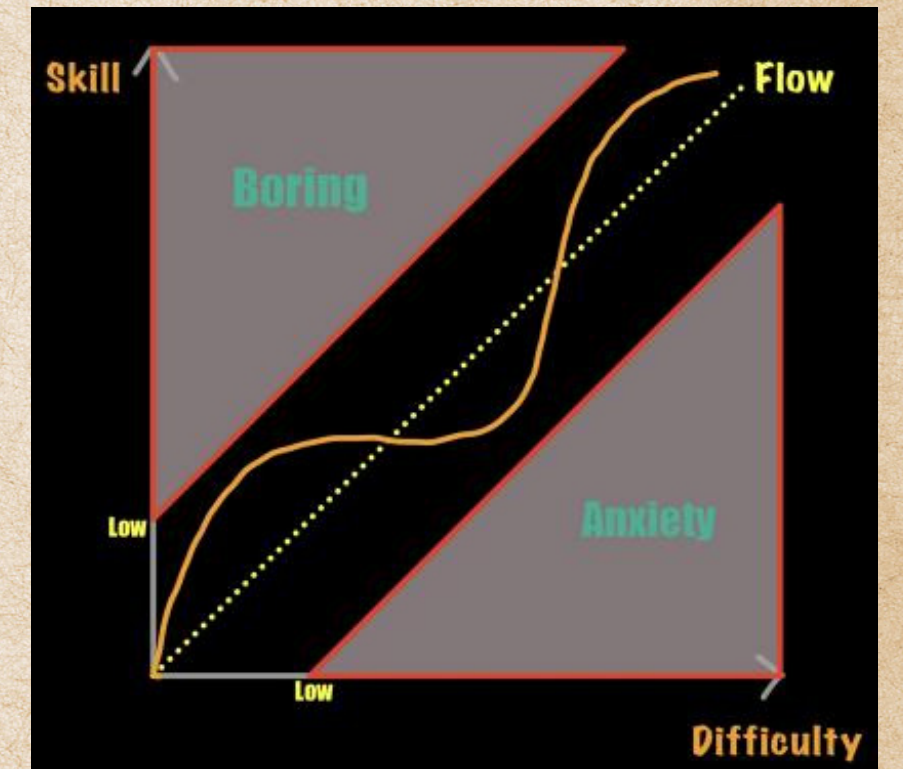
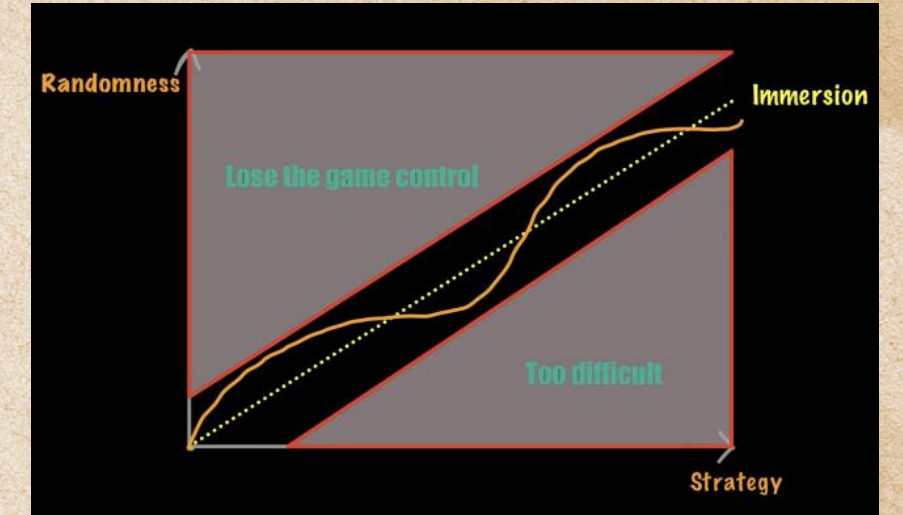
Discussion on Randomness in Game Design

- What are the different forms in which randomness manifests in games?
- How is high randomness introduced into our game design?
- How does randomness impact the player's gaming experience?

Balancing Strategy and Randomness in Game Design: How can we strike a balance between strategy and randomness in the game to ensure that players are deeply engaged?

Discussion on Strategy in Game Design

- What are the various forms in which strategy manifests in games?
- How is strategy content introduced into our game?
- How does strategy impact the player's gaming experience?



• Monster Card - Void •



20
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STELLA FALCON

All attacks with Void attribute will be transformed into Void Annihilation.

STELLAR FALCON

Introduction

Stellar Falcon, an ominous dragon from the abyssal darkness. Its sable body emanates an aura of abysmal frost, devoid of vital warmth. As the silhouette of Stellar Falcon manifests from the void, the cosmic tranquility is disrupted by its baleful shriek. This abhorrent being is the incarnation of the primeval oblivion, and nothing can impede its ravage upon life. At its wake, nebulae combust, and vitality evanesces. Scholars dreadfully deem it the "Voidstalker", and all living things cower before the stygian eclipse it heralds across the stellar sea.

Health: 20

Speed: 1 (slow)

Skill: All Void attribute Theurgy cards will transform into Calamity cards.



16
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STARDUST STEED

Cursed attribute calamity cards received will transform into Theurgy cards during resolution.

STARDUST STEED

Introduction

Stardust Steed, a celestial horse originating from stardust, imbued with mysterious powers of the void. Its figure is as serene as the night, with legs flowing like a glittering galaxy. Riding on its back feels like traversing the cosmic currents, listening to murmurs from the ancient past. The emergence of this horse heralds the coming of a mystical era.

Health: 16

Speed: 3 (Fast)

Skill: Cursed attribute calamity cards received will transform into Theurgy cards during resolution.



12
⚡⚡

WAILING WRAITH

Calamity cards of the Abyss attribute have no effect on it.

WAILING WRAITH

Introduction

Wailing Wraith is a spectral being from the void realm, its entire body shrouded in dark, misty fumes. It is capable of emitting mournful screeches, echoing with craving for life and fear of death. Wailing Wraith floats in oblivion without physical form. When a living being draws near, it condenses into a vague figure, using woeful whispers to confide its unfulfilled wishes. If rejected or attacked, it morphs into a swirling darkness, bringing madness and death.

Health: 12

Speed: 2 (medium)

Skill: Calamity cards of the Abyss attribute have no effect on it.

• *Monster Card - Abyss* •



GULAKA

Void attribute Calamity cards received will transform into Theurgy cards during resolution.

GULAKA

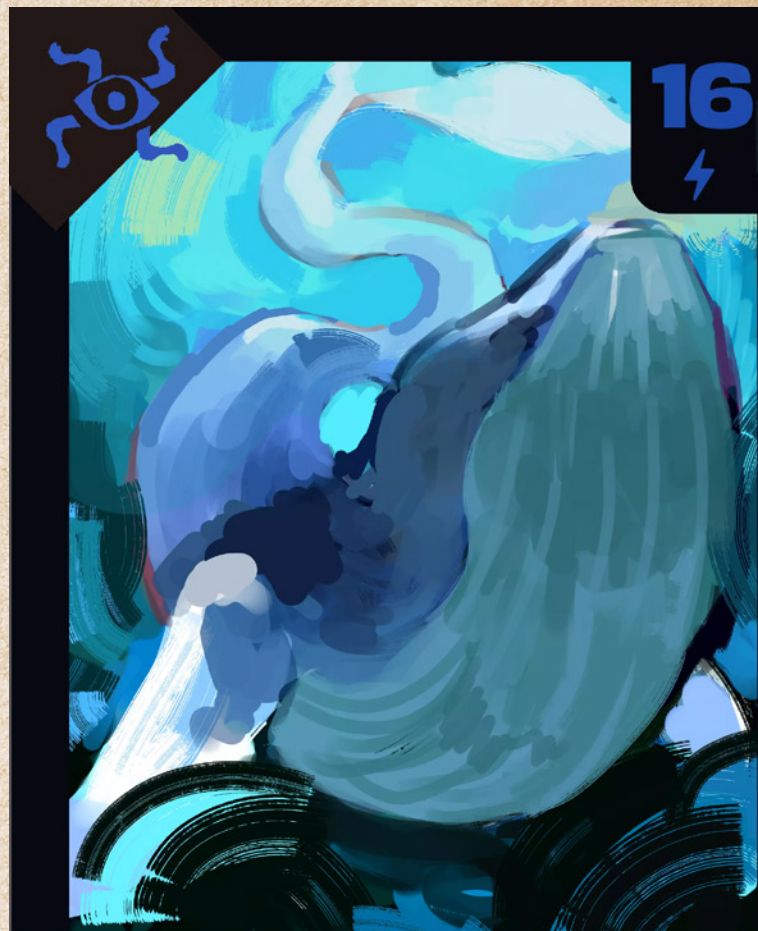
Introduction

Gulaka dwells in the lightless abyssal depths of the ocean trench, possessing the power to harness unknown forces. Its tendrils can silently extend in the deathly stillness to drag prey into endless darkness. Gulaka's exterior is covered by a slimy black cotton-like substance, emanating a faint glow. When the tendrils move, the glow shifts and changes, warning any deep sea creature to stay away. The origins of Gulaka cannot be verified, seemingly belonging to no known species.

Health: 20

Speed: 2 (medium)

Skill: Void attribute Calamity cards received will transform into Theurgy cards during resolution.



MOGURA

All Theurgy cards with Abyssal attributes will transform into Calamity cards, and Abyssal attribute Calamity cards received will transform into Theurgy cards during resolution.

MOGURA

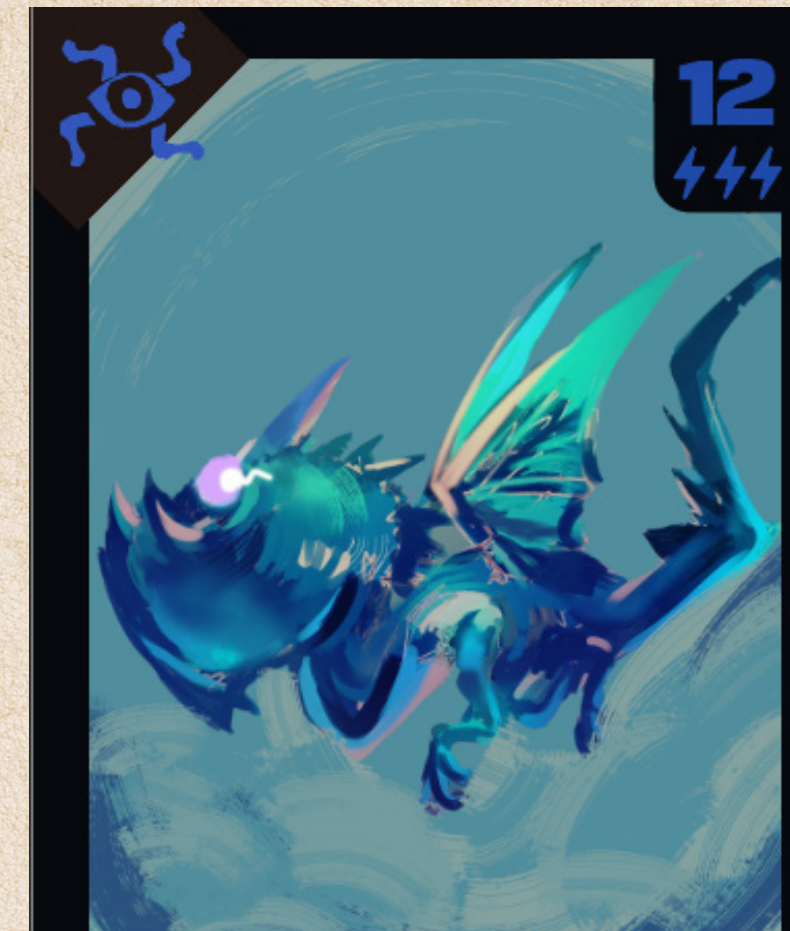
Introduction

Mogura dwells in the lightless ocean depths, an ancient whale of the abyss. It possesses a gigantic mouth capable of opening to half of its body length. With skin pitch black, and razor-sharp teeth lining its gaping jaws, Mogura can easily penetrate any defense. Its vitality is tenacious, able to survive even with major skeletal damage. Mogura only silently patrols the sunless void, awaiting chances to unfurl its bloody maw to devour any passing creature whole. Its boundless hunger is beyond imagination.

Health: 16

Speed: 1 (slow)

Skill: All Theurgy cards with Abyssal attributes will transform into Calamity cards, and Abyssal attribute Calamity cards received will transform into Theurgy cards during resolution.



VELOTHRAX

Cursed and Abyss attribute Theurgy cards have no effect on it.

VELOTHRAX

Introduction

Velothrax, a phantom fish residing in the abyss, boasts scales of profound black that emit a faint glow, this luminescence shining brightly in the darkness akin to the light of stars. Renowned for its astonishing speed of movement and enigmatic presence, Velothrax often glides through the obsidian depths of the night, its flickering ethereal silhouette elusive and mystifying. It appears to possess the ability to manipulate the abyssal shadows, allowing it to traverse vast distances in an instant. Its eyes are pure white, nearly devoid of pupils, giving them an otherworldly appearance as if under the weight of an invisible pressure.

Health: 16

Speed: 3 (fast)

Skill: Cursed and Abyss attribute Theurgy cards have no effect on it.

• *Monster Card - Curse* •



CURSEFLAME

Unable to use Abyssal Wrath and Void Annihilation, but immune to all basic attribute attacks.

CURSEFLAME

Introduction

Lord of Curseflame, the ruler of the curse domain, courses with unparalleled power within, surrounded by a burning emerald blaze. Its existence serves as an insurmountable barrier, akin to a fortress safeguarding boundless energy. It commands the energy of the cursed emerald blaze, converting it into potent defense and strength. It can render enemy attacks futile, while unleashing devastating impacts. Its form resembles an enormous, unassailable citadel, capable of withstanding all erosion.

Health: 20

Speed: 1 (slow)

Skill: Unable to use Calamity cards of Abyss and Void attributes, but immune to all attribute Theurgy cards.



CURSEHORN

Unable to use Abyssal Wrath and Void Annihilation, but immune to all basic attribute attacks.

CURSEHORN

Introduction

Demon of Cursihorn, a goat-headed creature, emanates a potent curse aura, its gaze piercing into souls. Adorned with ancient sigils, its footsteps awaken arcane forces. In battle, it embodies a hellish demon, striking boundless terror and representing irresistible misfortune.

Health: 16

Speed: 2 (medium)

Skill: All Theurgy cards of the Curse attribute will transform into Calamity cards, while Theurgy cards of the Void attribute have no effect on it.



CURSETRAIL

Curse and Void attribute Calamity cards received will transform into corresponding attribute Theurgy cards during resolution.

CURSETRAIL

Introduction

Hound of Cursetrail, a curse-afflicted canine, emanates a thick aura of curses. Its skin appears corroded by the touch of curses, with exposed flesh and bones that send shivers down one's spine. Its body serves as an ancient vessel of curses, harboring unpredictable threats. The gaze of the Cursetrail Hound is sharp and piercing, brimming with wildness and ferocity. Its sensitivity and quick reflexes are exceptional, almost able to detect the fear within enemies' bodies. Like a tempest from the underworld, it hunts down the lives of its foes.

Health: 12

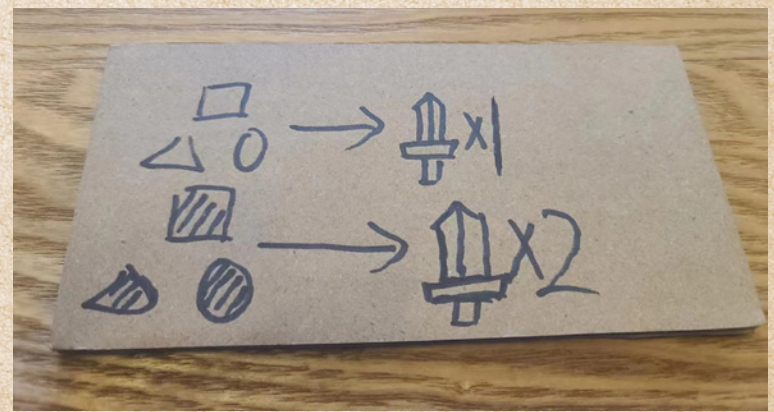
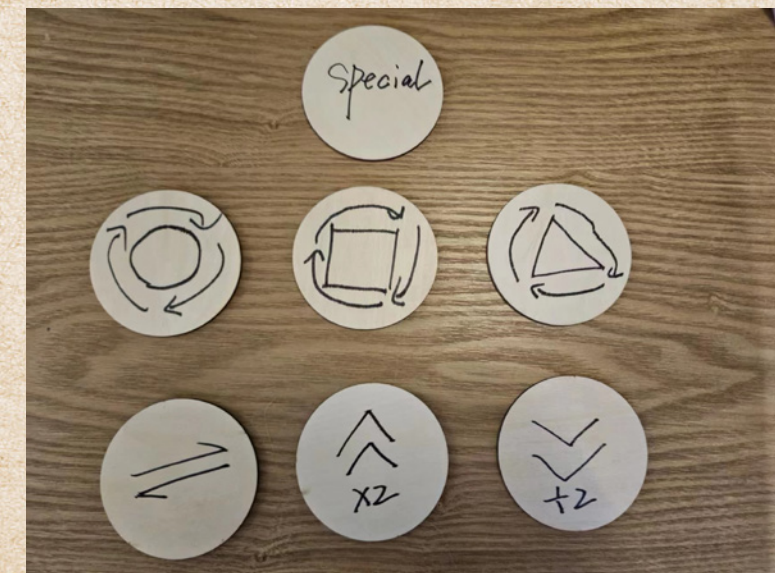
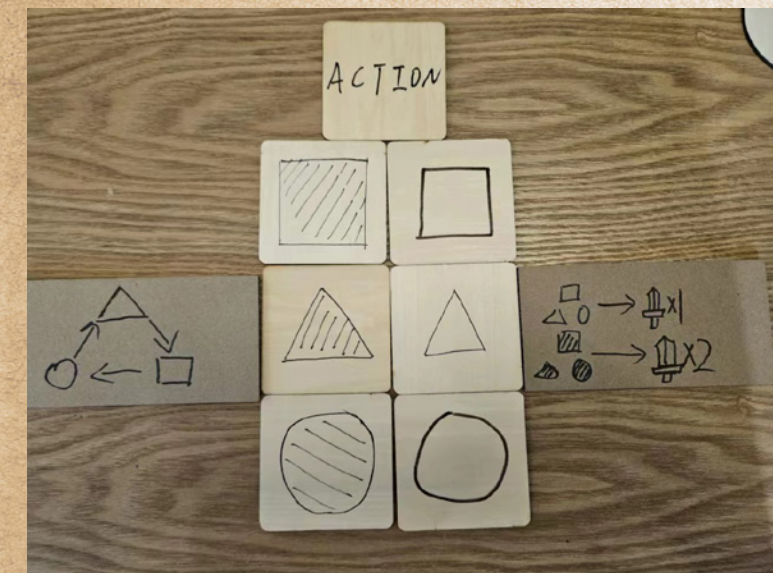
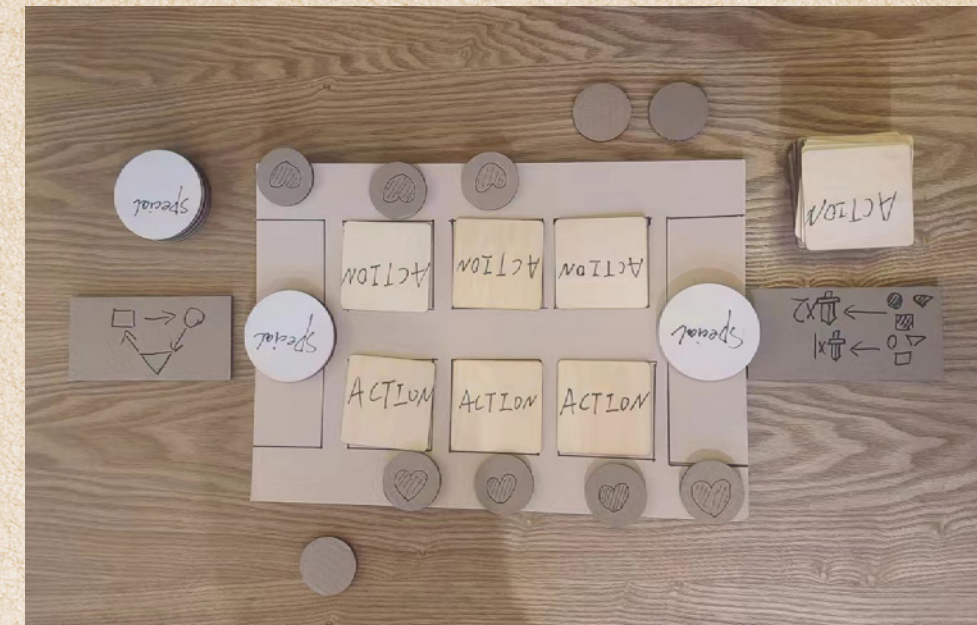
Speed: 3 (fast)

Skill: Curse and Void attribute Calamity cards received will transform into corresponding attribute Theurgy cards during resolution.

• Actions Cards •



• Special Cards •



• Prototype •