T.Y

CRADLES

"All Life Deserves Shelter"

Hereby, this project is a salute to:
All life and civilization that has ever existed on Earth,
the new era of light chasers pushing development and the growth
of blockchain,
film and television makers working hard behind the scenes,
the game industry forging new paths for gamers,
and to my team.

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Content

PREFACE

Time, the most important element in the universe, flows swiftly. No one can stop time. It creates value, tests value, and ruthlessly destroys value. Time grows trees and then carelessly burns them down. Time provides species space to live and die, and destroys anything that disobeys it.

Everything has a beginning and an end. We cannot defy time, create life nor species, nor can we replace time in order to recreate life lost. We can only conform and attempt to find a trace in the gap of time to build an eternal landscape for past lives to exist again forever. This is the way of the world, the way of time, and the way of humanity.

DRepublic's first game will disrupt the entire blockchain gaming world.

Cradles: Origin of Species

START OF CRADLES

"All Life Deserves Shelter"

Created by time, life grows, experiences hardships, shines, and sings in the river of time. Then life ages, the shining light in the river sways and dims, the glorious song fades, and life ends abandoned, entombed in history.

Earth's civilization is told only as an anecdotal footnote, tracing carelessly the tracks of the past and tracking indiscriminately the traces of the present. Is there no commemorative significance for those species lost to extinction and for the lives run their course? They have borne witness to the passage of time, midwifed every reproduction of Earth, ushered in and interned the rise and fall of civilizations. As latecomers, we are obliged to build an eternal home for Earth's previous masters, so that all life will be remembered. Even if time abandoned the departed, we will retrieve them, memorializing them in the digital world. Those forgotten by time are reborn again in Cradles: Origin of Species.

Blockchain

"Blockchain is the first-time mankind has launched a fierce attack on time."

Before blockchain, the Internet allowed people to connect thousands of miles away. Though constantly updated and iterated, the network technology was still unable to break the shackles of time. Obliterated by time, old technology is replaced with new technology, and the cycle continues. Bitcoin, invented by Satoshi Nakamoto in 2009, uses blockchain technology. This is a new type of peer-to-peer network that relies on encryption algorithms. Blockchain enables accounting collaboration between various nodes and jointly establishes a consensus mechanism. The most important innovation, blockchain relies on a technology that can persevere perpetually through cryptography and completely regulate its own security to this. Through this innovation, man is attempting to challenge time, creating an unprecedented opportunity for us to subvert the world.

Technological progress is the most important factor driving the momentum of gameplay and perception. In recent years, game engines have been continuously updated and iterated. Today's engines such as UE5 create life-like game scenes equal to movie effects. Advancements of rendering technology offer lifelike characters. Advancements in reinforcement learning provide game characters with intelligence and decision-making ability that can surpass human players, while also controlling large-scale units. This exciting technology can not only make AI more antagonistic to players but it also provides unpredictable gameplay increasing the

game's enjoyability. The combination of games and blockchain naturally leads to the question:

"Can we create an entirely decentralized game?"

In short, yes. DRepublic is not a giant game company at the moment. We have gathered from across the globe to create a completely decentralized world. Our servers run and data is stored in a decentralized network. On the server, our supporters come from all over the world and simultaneously participate in the construction of the game.

In Cradles: Origin of Species, the gamers are the ecological influencers, not the creator of the ecology. They are truly experiencing, governing, and maintaining the ecology of the entire world. Gamers are not only entertained in Cradles but they also need to survive and protect it.

Cradles: Origin of Species is a next-generation creative game completely built on a decentralized network. It has both the innovation of game content and token mechanism. It does not copy the traditional gameplay patterns but utilizes the power of AI and game engine advancement to provide fresh gameplay. Finally, Cradles: Origin of Species contains original titles to provide unique experiences for gamers. The following chapters will provide insight into the full picture.

This is the world's game.

WORLD OF CRADLES

Game Introduction

The world of Cradles attempts to provide an extreme degree of freedom. This world is divided into a main city and an adventure zone. In the adventure zone, all the creatures encountered are extinct creatures that once appeared on Earth. Cradles builds an eternal home for them in the game, allowing future generations to observe the unique characteristics of various species and the environment of the prehistoric world. Players can even inject themselves into the body of a prehistoric animal, to feel its life, to feel the pleasure of flying in the primitive sky as a pterodactyl, or to feel the tremors on the ground stomping about as a mammoth.

At the same time, players can earn a considerable amount of token revenue during a tour of the main city or exploring in the adventure zone. Players can use the materials obtained in the game world to create their own NFTs to trade with and sell to other players. Players can also stake NFTs to earn extra profit. In the Cradles world, players can truly immerse themselves in the game world and earn huge profits.

Cradles contains the following features:

Game Features

New Standard: ERC-3664

Motivation

ERC-3664 stems from a new RPG online game we were developed. We found that ERC1155 could not support all operations for game props, such as upgrading, adding attributes, and so on. It is almost impossible for the player to query all the attributes of the NFT on the smart contract, because ERC1155 cannot support the rich properties and functions of the props. For this reason, we propose a new ERC standard: ERC-3664, which is fully compatible with ERC-1155 and can help developers define massive operations on game NFTs.

ERC-3664 uses variants of ERC20 as part of the game attributes. An ERC-3664 contract may have multiple attribute tokens. By limiting the transfer logic of these tokens, we can complete all game-related attributes through a contract. All kinds of NFT defined by ERC-3664 are gNFTs. If developers want to implement a complete RPG game prop system through smart contracts, they can use multiple gNFT contract combined with game logic contracts to develop the entire game logic in a decentralized form. This is an epic upgrade to the current blockchain game. ERC-3664 allows the props, characters and operation modes of the blockchain game to be fully represented in the form of smart contracts, which can be extended to a wide variety of different gameplay. ERC-3664 can also expand game NFT types on the Ethereum ecosystem, to bring Ethereum a stronger game ecosystem and various gameplay build on ERC-3664.

Functions

ERC-3664 extends ERC-1155, divides game NFT attributes into four categories:

    1. General changeable attributes: usually refers to basic attributes such as NFT attack power and life value. Its functions include increase or decrease in attribute value.

    2. Transferable attributes: refers to the NFT's transferable attributes can be transferred to other NFTs in the event of destruction or other circumstances.

    3. Upgradeable attributes: refers to the NFT that can be upgraded according to the formula, the player pays the fee, and it is reflected in the increase of the level, usually accompanied by the increase of other attribute values.

    4. Evolvable attribute: refers to the attribute that NFT may evolve automatically over time (the height of the chain block), simulate the time attributes in the real world, so that NFT has the characteristics of time-varying

Based on the above four types of attributes, we designed four general attribute contracts, developers can design different supporting contracts according to the game logic.

For more details, keep an eye on DRepublic-io/gNFT we will update our progress here.

Time Mechanism

In traditional games, the definition of time is often included to offer a distinction between day and night during gameplay. Blockchain technology improves our time management and control by perfectly simulating the concept of time passing. Cradles utilizes the blockchain generation speed to simulate more stable time changes. In Cradles, each world develops at different speeds. In the game, players need to use platform coins, DRepublic Coins (DRPC), to buy crystals and other props. During gameplay, the energy of the purchased time crystals slowly dissipates with the passage of time in the block according to the rate of time passage in that world. The rate at which each world consumes time crystals is also different. So the expected benefits in each world are not the same. For example, in a more dangerous world, the crystal costs more but also offers more utility. The higher the rate of time-consuming crystals, the faster the flow of time.

In theory, a player has access to rarer NFTs and precious items in worlds where time passes faster. This also has huge risks. HADEAN, the geological era time horizon when Earth was just born, is almost impossible for ordinary players to survive. However, players can obtain extremely rare materials from the early birth of Earth and create unparalleled magical NFTs. Players can even create new creatures before human beings are born, such as silicon-based creatures, but the creation of such rare NFT substances may need to be discovered in a very distant corner of the world. This also leads to another characteristic of the Cradles' world in which players can play in the same timeline but exist in different worlds.

Entropy Increasing World

Unlike traditional games that remain unchanged regardless of player status, Cradles is the first blockchain game that contains entropy-increasing worlds. Cradles' worlds are perishable. Players in entropy-increasing worlds have no rules or constraints. Yet, they must ensure the normal operation of the whole world ecosystem and urban area or they risk chaos and disorder. Once the chaos degree of a city or world reaches a limit, Cradles will force a closure for a certain period of time, and then open it after the world cools down. Cradles offers a financial system like cryptocurrency staking. Staked DRPC incentivize the players to govern the worlds. During world closures, all players lose access to world benefits and staked coins. On the contrary, if players cooperate to manage the system for tasks such as completing renovations, helping non-player characters (NPCs) live, or punishing perpetrators, Cradles will provide rich rewards for governance. If the banking system remains stable due to development, the rewards in the world server will gradually increase.

Income and a variety of parameters will attract more players and balance the servers gradually. This eases the pressure on the server as the income of players will be different in each world. The construction process of the world and the governance process of the server are also what flattens out the world benefit, so we call this unique game governance method Flatten And Income Rise Governance (FAIR-G). From the perspective of players, FAIR-G revenue can drive players to enter different worlds. When players choose to govern the most chaotic world they earn the highest income and experience, the draw of Cradles' worlds. In this way, the whole world arrives at a new beginning.

Cradles creates open worlds lacking in mainlines and background stories. Yet, a world lacking a story is not a complete world. Although free, in the real world, this game is now imperfect. Plots and backstories lead to a beginning and end. Many plots lead to the likelihood of the game or world ending. In an open world without a solid backstory, completeness is lacking but the game continues on. Movies, for example, are designed to take the viewer on an emotional ride. Movies are a way of emotional control. The Cradles solution is for players to experience different worlds in stages.

There are two game modes in traditional games. One is the instance in the online game which creates a strong connection to the game. The instance cannot exist independent of the game. The other is the Mod in the stand-alone game. The mod is an additional package for the Cradles' game world. After clearing the level, players can still get an extra game experience by adding a mod made by a player. DRepublic set out to discover if blockchain can maintain the weak connection of the game while allowing multiple participants? As a result, Cradles created a new game mechanism for the first time: Mod Slots.

In Cradles worlds, the player community or creative development team can develop their own mods. This instance can focus on gameplay (such as survival in the wilderness), plot experience (similar to Zelda) or even revenue (gambling instance). An excellent instance must be recognized by the entire community

before it can be added to the game. Therefore, we developed the Instance Slots function. Each Instance can be inserted into the game slot for a period of time. During this time, all players can enter and experience the instance to communicate with the NPC. After the Instance is over, the player can obtain the Instance exclusive equipment. After the instance is online, all players can buy into the instance to experience the adventure. After the expiration of the instance period, it will automatically fall off from the slot and the next Instance is introduced. In this way, players can experience a variety of fantasy world plots without destroying the overall gameplay of Cradles. At the same time, each Instance is a story chain. Community players can choose which Instance to continue playing after trying several. Even the plot is determined by the community. This is the way that Cradles' World guarantees freedom and storytelling.

After the Instance Slot's auction, the Instance will officially have the right to use the slot for a limited time. After obtaining the right of use, the player Instance development team will contact the Cradles' team to sell the Instance publicly. Due to the limited carrying capacity of the server, the Cradles World will divide the time when players enter the instance according to the time of purchase, so as to ensure the health of the server.

After entering the Instance, the player can get all the rewards and benefits contained in the Instance.

Game Acceleration

The Cradles' world provides an eternal home for all species that have passed away. The Cradles' world will gradually introduce all kinds of extinct species. Game materials related to the species, such as playing methods, interactions, and props, will be developed at a relatively constant speed and spawn into the game at a planned time point. At the same time, Cradles' world will record the metadata of this species on the blockchain so that the world remembers it. Some rare species often appear in the game. At this time, the community members and players will want to speed up the development progress or add new content. Community players can use platform coin crowdfunding development to accomplish this. Players put their tokens into the token pool to encourage creators to speed up creation. At the same time, players will not lose their assets in vain. After DRPC enters the token pool, players can get NFT tokens of corresponding species that arrive in the game. An opportunity to obtain limited editions of the species-related props will occur. When crowdfunding reaches the limit, other players will not be able to put DRPC into the token pool. This ends this round of game acceleration activities.

IP and Influencers Gathering

Not all open-world games can gather a huge amount of IPs (Intellectual Properties) and influencers because there is no incentive for them to do that. Cradles will be different.

Cradles will build an influencer platform or plan. Any organization or individual can offer game content to the game. Once approved by the game team and community, the game content would be dropped into the game, and the game content profit would be distributed properly. The Cradles' creator team gains a small profit, while the majority is distributed to the content creator. The IPs cooperation will not simply authorize the game company to use their characters or their brand product, but rather sell the content and earn profits. This incentivizes IP creators to develop content for Cradles' world. This trade-off enables the growth of Cradles' world and a sustainable system for Cradles and content players who develop content.

Influencers are also included in this system. When the influencers stream the game, fans can purchase game props from their channel, and Cradles only charges a small portion of the handling fee in return. By this mechanism, Cradles' worlds will have the ability to gather a huge amount of IPs and influencers, leading to a new era of blockchain gaming.

Game Content Introduction

HOW TO PLAY

In an open world, Cradles' player rules are free, but guidelines still exist so that players understand how to play after entering the game world.

1. Novice missions

Initially, the game prepares novice tasks for the player. After the player chooses the birthplace, the village guides the player to complete the tasks step by step, such as hunting beasts and protecting the village from infringement. After completion, players receive rewards. For the duration of the game, the player experiences the game without consuming crystals. After completing the novice mission, all players will understand the basics of Cradles, and will be able to hunt alone and earn! Firstly, the player needs to consume crystals to buy suitable set of weapons or equipments in the in-game shop, and buy enough red and blue healing potion in the market, otherwise the wild will be too dangerous. Novice equipment can only hunt ordinary monsters and is not suitable for wild exploration. When players have sufficiently prepared, they can enter the wild world to explore. Cradles does not advocate exploring for the sole purpose of earning profits, but still provides several possible ways to earn. The vast wild world has hidden gems, equipment, or other randomly generated materials in every corner, under cliffs, seaside, beside rocks, and other hidden spots. Players can wander around the world and pick up these randomly-spawned revenue products.

2. City Governance

There may be different kinds of City Missions. Cats may need help to come down trees; lost dogs need to be found; NPC homes need to be repaired; thieves need to be caught; electric wires need to be repaired. All those missions are called City Missions. Some missions may be published by official agencies, such as police stations, some may be offered by NPCs or other players. By helping others, you will earn a huge amount of crystals in the city, and once all the main cities' governance index reaches a balance (nearly equal), all main cities' total rewards will increase to recognize the players' contribution to the city governance.

3. Ecosystem Governance

There is a biological chain relationship between wild creatures. After entering the wild world, players can turn on the Function button and click Ecosystem to observe the health of the area ecosystem. According to the health of the ecosystem, the system will recommend the player to hunt on particular species. Players can hunt

these species to improve the ecological balance of the game world, earning massive crystal income in return.

4. Player Vs. Player (PvP)

The wild world is always full of dangers. Players not only need to face attacks from hordes of wild animals but also threats from other players. In this unlawful wilderness, all players can attack each other. After successfully killing other players, a part of the crystals belonging to the annihilated player will randomly drop. These dropped crystals can be absorbed by the victor to increase wealth. The Wanted Index for successful players in the wild area will increase. The Wanted Index raises the bounty on successful players which increases the value and incentive for players to attempt to kill them. Players control the risks themselves.

5. Person Vs. Environment (PvE)

Players can experience the thrill of PvE in the wild world. The wild contains aggressive and dangerous species. To obtain crystals, players hunt down neutral species. Maintaining ecological balance is crucial. Once the player hunts too many endangered species, a bounty will be placed on the player. Cradles recommend players hunt a variety of species to maintain ecological balance and earn income from hunting activities.

5. Homeland Defense War

In Cradles' world, crises will arise. In normal times, the main city and adventure zone are completely separated. Wild animals and monsters will not invade the human living area. When called by dark forces, some animals and monsters will fall into a state of riot, invading the human living area and destroying their city. During this period, players need to protect the main city from harm. After a few waves of offensives, if the main city avoids damage, the players receive crystal rewards and Ultimate Prop rewards. The homeland defense war is a great opportunity to earn money and reputation!

"Play to Experience" and "Experience to Earn" are unique concepts that the player will understand once immersed in the Cradles world.

Game Areas

The main city and the adventure area of Cradles world are separated. Each expansion launch equips the world with one or more main cities. Players enter the corresponding adventure world through the main city entrance. Wild creatures do not attack in the main city, but once players enter the adventure world, trouble starts. Players only obtain supplies in the adventure world by exchanging prey with NPCs, hunting monsters, and rescuing creatures. At the same time, players experience the feeling of being surrounded by wildlife or besieged by other players.

Players in the main city can enter any adventure zone through the anti-magnetic pole orbit. In the first expansion, the main world introduced is the world of extinct species. In this world, there is a

time zone for players to explore. The first open time zone is the Protoarchaean, which geologist Claude calls "HADEAN.' It refers to the geological era before the Archaean. The time is approximately from the formation of the earth (about 4.5-4.6 billion years ago) to the beginning of Archean (3.8 billion years ago). Humans have almost no data on this period and thus little research. It is generally accepted that life matters have not yet formed. Therefore, this world is extremely dangerous. After most players enter, they will die quickly due to a lack of oxygen and food shortages. HADEAN is not recommended for ordinary players to enter.

Due to the dangers of HADEAN, Cradles also opened the first medium-dangerous area for player exploration: the CAMBRIAN. The CAMBRIAN, a mysterious geological period, contained a mysterious explosion of life unexplained in history. During this period, many different creatures appeared explosively, and Darwin thought this might be anti-evolutionary. This world provides opportunities to experience all kinds of weird marine and terrestrial creatures, brachiopods, and more.

In the Cradles world, we hope that every player can reap the rewards corresponding to the risks. The chance to obtain rare NFTs and game items increases along with the danger level of an area. Players can even try to create silicon-based creatures in ancient times. Extremely dangerous locations correspond to high crystal consumption.

Game Roles

Cradles does not define user groups, but rather allows all players to enjoy the Cradles world and benefits. The traditional game

industry pays closer attention to male users because they are perceived as aggressive, willing to buy props, and challenge new levels. The world of Cradles does not impose potential restrictions on users. All players can enjoy playing in the Cradles world. Players not proficient in game operation can still act as a tourist and visit the worlds and the main city without threat or disturbance. The game is interesting even just as a viewer. If the player later desires some competitive existence, then the player can choose to become an ordinary player. There is space for all types of players to value existence in Cradles' world. Players can act as a firefighter, a policeman, a bank clerk, or even a priest in the main city. After mastering survival and hunting skills, players enter the adventure world to complete the tasks of the client, hunt and kill the species that threaten the ecological balance, and earn crystals paid by NPCs and players as rewards for their services.

Special role: Visitors
Visitors only trade and tour non-combat equipment and cannot cause damage to any creatures or characters. Conversely, no creatures or characters cause damage to visitors. Regardless of game skill, all players can join and enjoy the beautiful landscape.

Due to the uniqueness of each worlds, Cradles set several time periods so that players are not limited to a single world or gameplay.

1. **Tour Opening Period**

During the tour opening period, all players can only enter the world as a tourist and interact with NPCs and living entities. No fighting, hunting, or aggression is allowed during tour opening periods. Characters from all camps can sell non-combat good type NFT products on the street. Blockchain completes the NFT commodity transaction module recording the transaction on the chain. After the tour opening period is over, the world enters a two-day Governance preparation period.

2. **Governance Preparation Period**

During the governance preparation period, in addition to the tour opening period function, players can buy and sell combat-related type NFTs (weapons, equipment, armor, skill books, scrolls). Related transactions will be recorded on blockchain for easy traceability.

3. **Ecosystem Governance Period**

The Ecosystem Governance Period is opened after the Governance Preparation Period. This period removes Neutral Creature Protection and Chaos Creatures randomly spawn. Chaos Creatures are naturally restrained against Neutral Creatures, but in this period they form groups spontaneously and attack the surrounding Neutral Creatures. Players need to maintain ecological balance throughout the entire process to

maintain ecosystem balance. Balance must be intact and in good shape at the end of this period in order for players to enter the adventure world.

Game Events

Creation

At the moment of species spawning in the Cradles world, a corresponding creature statue will also spawn in the Valley of Life Monuments and Pilgrimage locations emerge. A certain number of NFTs and crystals of the species will be harvested, and a brief introduction to the life of the species will be pushed into the host. After the introductory video completes, the creature statue will exist forever in the Valley of Life Monuments. Visitors have priority for all neutral events. The first monument is the statue of the guardian of the Cradles' world. The guardian statue spawns upon the Cradles' world opening.

Pilgrimage

Life is the most precious commodity in the world and the statue is the Cradles' salute to that species. The statue will come to the world of adventure for a certain period of time. During this time, everything is in the statue. Players who sit around on the pilgrimage will have the opportunity to receive crystal rewards and the rare NFT of the species in return. The pilgrimage space is limited and offers first come first serve availability. After the pilgrimage seats are full, the sculpture will emit light, and the birth of the species in the world

of Cradles slowly begins. After the sculpture emits light, the information of the species will be imprinted in the world of Cradles forever and become a part of the world of Cradles.

If an extinct creature becomes extinct again in the world of Cradles, the information on the blockchain will not be erased. Yet, when a creature disappears in the world of Cradles, it will take 6-12 months for the species to spawn again. During this period of time, all weapons, equipment, and props based on the NFT items dropped by this species will be marked in gray and cannot be used. When the species is reborn, the mark is automatically erased.

Chaos Time

Cradles' world opens Chaos Time events randomly. When Chaos Time occurs, Primitive Creatures and Chaos Creatures enter the main city invading the streets and attacking pedestrians. The city falls into chaos, all attack types are open, and all players and creatures can attack each other. Enjoy the anarchy! Players who die during Chaos Time are not punished, and the destruction of the city buildings does not increase the chaos of the world. After Chaos Time, all buildings and states are restored, so fight without fear.

Game Properties

Cradles offers a wide variety of world props, including weapons, armors, decorations, skill books, scrolls, potions, and other elements.

Weapons and Armor：These item have a combat attribute. Once equipped with a weapon the player can use it to fight against wild creatures or other players. During battles, weapons and armor will be lost. If the item is worn out and not repaired in time, the item will disappear forever. To repair weapons and armor the player spends crystal in town using NPCs.

Accessories: This type of item only has bonus attributes and does not have a wear mechanism.

Skill Book: A one-time use NFT, once used, skill books disappear and the NFT burns. At the same time, the player learns the skills imprinted on the skill book. This type of skill can be used by the player permanently and only needs to be acquired once. Useful skills will greatly help players explore the adventure world. Once used the skill book burns.

Scroll: A multiple use NFT, scrolls provide a temporary skill that cools down and needs to wait for a certain period of time before the player uses it again. Scrolls can be transferred between players.

Potions: A one-time use and disposable item, potions provide the player with an increase or special effect, such as healing, magic recovery, or magic powers like the ability to walk in lava fields.

Epic Game Equipment: Occasionally spawning in different corners of the game, Epic game equipment is typically earned following completion of NPC missions, the Cradles Together activity in the community, or by protecting some animals or hunting others. These valuable game props appear alongside a changing sky and storm surge. Once equipped on the player, Epic game equipment

has the attribute of identification. The player will automatically obtain the prop ability and the item can no longer be traded.

Use caution when equipped with these props.

CHAPTER TWO

BASIS OF CRADLES

The foundation of the entire Cradles' world rests on the tokenomics model.

TOKEN DESIGN

The common currency of the Cradles' world is the DRepublic Coin (DRPC). The initial public offering circulation is 3 million, and the total supply of DRPC in the entire Cradles world is 5 billion. The game team will control the DRPC through additional issuance or destruction. The circulation of tokens and the exchange rate permit DRPC circulation on a large scale while ensuring that every player in the Cradles world can participate. Whether governance, voting, CradlesTogether activities, or game development, the game team will always work to ensure the health of the token ecology.
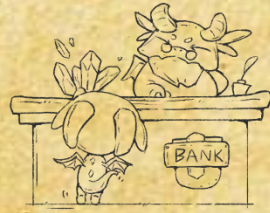
Token Distribution

Founders' group 20% (gradually unlocked over 3 years)
Investors 20% (gradually unlocked over 3 years)
IDO 10%,
Player community incentives 30%
Mining rewards 20%

Community incentives are issued in batches in the form of activities while developer and creator incentives will be issued based on workload and milestones.

Token Economics Design

1. DRepublic Coin

DRepublic Coin (DRPC) is the platform currency of DRepublic. The platform currency can be used to purchase tickets for Cradles' games and other game launches. Only players with the admission ticket NFT can log into the game; the platform currency will be crowdfunded using auctions and build pools to distribute to users. Users holding platform coins can choose to stake or provide liquidity to obtain more platform coins. The DeFi mechanism of platform coins can bring huge profits to players enhancing game enjoyment. Platform tokens can also be used to purchase physical souvenir NFTs on the DRepublic platform, such as prehistoric creature models and legendary weapons. Each physical souvenir will be gifted with additional virtual NFTs to provide in-game entertainment.

2. **Energy Crystal**

Crystals are the universal currency in the game world and are minted with platform coins. Within Cradles, crystals can be used to purchase any props, including pre-enchanted ones, or the crystals can be stored in the crystal bank for staking. Crystals can also purchase in game NFTs, rent high-end game items from other players, pay transaction fees, or be cast into high-end crystals.

3. **Hyper Crystal**

Hyper crystals are used to strengthen the items after the first-level enchantment. During the enchantment process of hyper crystals, the magic crystal power is consumed proportionally. After the consumption of magic power the crystal returns to its governance pool and is available to be used again. The Hyper crystal then becomes a platform currency, gives back to the community, and allows the community to create game value. Hyper crystals can also be provided to NPCs in exchange for unique game NFTs (non-tradable props). Lastly, Hyper crystals can also be cast into the highest-level Legendary crystal.

4. **Legendary Crystal**

The Legendary crystal is the strongest magical power in the world of Cradles. Owning it indicates possession of the highest level of nobility and rights in the game. A Legendary crystal owner receives a personalized name color visible to other players. This

marks the player as a player with the ultimate magical power in the world of Cradles. The Legendary crystal can enchant higher-level props such as armor and weapons. The enchanting process is similar to Hyper crystals, except the ratio of crystal consumption is lower. In different scenarios, Legendary crystals can also be exchanged with NPCs for unique game NFTs (non-tradable items), while at the same time acquiring off-chain NFTs (Cradles around the game and the collection of prehistoric biological models). Legendary crystals can also be cast into crystal clusters, which produce crystals at a constant rate.

COMMUNITY GOVERNANCE

Founded on the community concept. Cradles hopes all players, developers, and designers join Cradles and add a unique touch to the game. To assist the process Cradles launched two exciting community governance proposals.

Cradles Together

Cradles Together allows community supporters to select the top five developers, seven designers, and 14 game testers from the community's technology developers. The chosen developers can participate in developing, branding with community elements, and stamping their imagination and creativity in the world.

Cradles reserves a total of 25% token rights for the developers participating in Cradles Together activities. Each round of Cradles together activities is proportionally distributed. Relevant opportunities include:

Design: NPC original design, NPC story design, animal design, regional design, etc.

Modeling: Animal modeling, scene modeling, character modeling, world region modeling, etc.

CG: Animation, VFX, postproduction, sound production, music production, etc.

Game Category: Modeler, Unity 5 game development, game front end, game testing, game operation, etc.

According to game development progress, Cradles selects excellent community partners to contribute to the decentralized Cradles' world. All the creators who participate in the development of the game have a chance to leave Easter Eggs in the game. These Easter Eggs are excavated slowly along with game progress leaving entertainment for future generations.
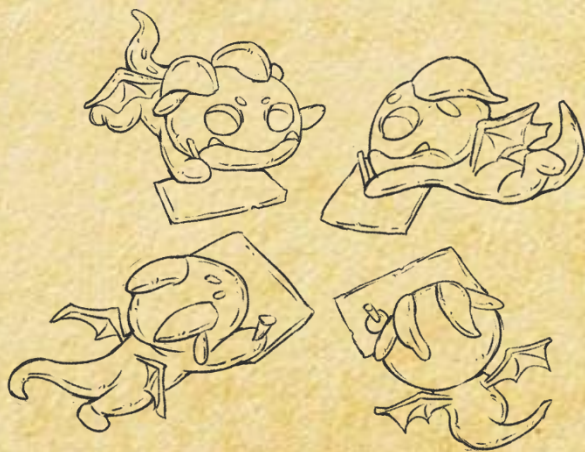
Flatten And Income Rise Governance (FAIR-G)

Cradles' world not only allows members of the community to participate in the construction of the game world, but also allows community players to master the rules and playing methods which increases profits.

The revenue of the whole game world and different servers will be unequal. The civilization of the main city and the species diversity of the corresponding world of the main city are the crucial factors that affect players' income in the game. For example, a new world may have a huge gap in income benefits.

From the perspective of players, FAIR-G can be experienced by joining different server worlds. FAIR-G incentivizes players to help the server governance and bring new materials and props adding interest to game play.
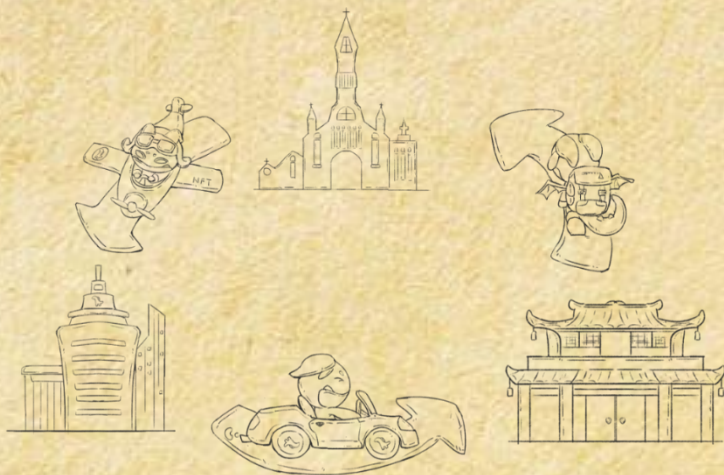
Crystal Governance

There will be a variety of crystals in the game. Players in the game can use crystals to participate in governance. The higher the level of crystals, the more votes they represent. If players are willing to burn all the crystal energy, they receive more votes to participate in governance. The players holding DRPC also have the right to govern the world but ideally, Cradles uses the crystal level to grade the players and hopes to provide higher-level holders more opportunities to govern the world.

TECHNICAL ADVANTAGES

Visual Effect

We have a global team of professionals, film and television producers who are able to provide uniform designs, film and television performances, sound effects, and other works for the game. Also with the growth of our community, film and television enthusiasts will continue to join our creative process, which will cause positive effect for the entire game and will improve it to a different level.

Community

Unlike traditional game projects, blockchain game communities are established before the birth of the game. This provides the community users with a voice in the entire game process. The Cradles' world has game development, game design, and voting rights. When important powers are integrated, our Cradles community will grow stronger than any existing game community. A strong community backs the game and provides Cradles' with a key advantage.

AI Technology Usage

Multiple attacks and interactions between characters occur in game. Reinforcement learning and artificial intelligence are included into the overall framework. Reinforcement learning plays an important role in the process because Cradles' creatures attack each other and grab resources. Creatures need constant training to learn the safest way to live in Cradles' world. Reinforcement learning empowers the entire game and provides a vivid and interesting platform.

While providing computing power for the AI model, acting as a game data node, and game communication node, the community and miners receive corresponding rewards. Cradles not only uses AI to empower games, but AI technology also empowers the entire community and allows the receipt of additional rewards.

POSTSCRIPT

Cradles is not built to start as a Metaverse. If Cradles chose to flaunt a Metaverse as a point of game creation, the development of the game would be bumpy and lose direction. Rather, Cradles desires to involve players to create a world that gradually moves towards the ideal of a Metaverse. Once all community members, gamers, developers, and creators believe that we can build a better world for Cradles, Metaverse will not be far away.