

WHITEPAPER

v.3.0

CRYPTUM.CO

Contributors: Nikolai Tsekov, Anton Belev, Grigor Stoichkov info@cryptum.co

TABLE OF CONTENTS

DISCLAIMER	3
1. SUMMARY	4
1.1. Cryptum Board Games	4
1.2. Cryptum Mining	5
1.3. Cryptumcoin	5
1.4. The Cryptum tokens [CRTM]	5
1.5. Cryptum Token Sale	6
1.6. Allocation of CRTM	6
2. Projects details & Profitability	6
2.1. Board games publishing project	7
2.1.1 Understanding the Tabletop Game Industry	7
2.1.2. Market explained	8
2.1.3. Kickstarter basics	9
2.1.4. Cryptum Board Games and Kickstarter	10
2.1.5 Board games base cost-optimization explained	10
2.1.6. Basic expenses in game development	11
2.1.7. Cryptum games, Estimated profitability	12
Blockchain: The Cryptocurrency Board Game	12
Primewarp: Genesis	14
Godforge: The First War	15
C22: A World Without Borders	16
Other Cryptum games	16
2.2. Mining project	17
2.3. Cryptumcoin development	17
2.3.1. Cryptumcoin Goals and Features	18
2.3.2. Cryptumcoin Vision and Specifics	19
3. Concept of Proof-of-ownership claims	21
3.1. Proof-of-ownership vs. direct distribution	22
3.2. Tier-based access to free games	22
3.3. Shared profits claims	22
3.4. Cryptumcoin claims	23
4. Team and partners	24
5. Allocation, Marketing and other expenses	26
6. Roadmap	27
7. Company and legal status	27

DISCLAIMER

THE PURPOSE OF THIS WHITE PAPER IS TO PRESENT THE CRYPTUM PROJECT TO POTENTIAL TOKEN HOLDERS IN CONNECTION WITH THE TOKEN LAUNCH.

THE INFORMATION CONTAINED IN THIS DOCUMENT MAY NOT BE EXHAUSTIVE AND DOES NOT IMPLY ANY ELEMENTS OF A CONTRACTUAL RELATIONSHIP. ITS SOLE PURPOSE IS TO PROVIDE RELEVANT AND REASONABLE INFORMATION TO POTENTIAL TOKEN HOLDERS IN ORDER FOR THEM TO DETERMINE WHETHER TO UNDERTAKE A THOROUGH ANALYSIS OF THE OFFER WITH THE INTENT OF ACQUIRING CRYPTUM TOKENS. NOTHING IN THIS WHITE PAPER SHALL BE DEEMED TO CONSTITUTE A PROSPECTUS OF ANY SORT OR A SOLICITATION FOR INVESTMENT, NOR DOES IT IN ANY WAY PERTAIN TO AN OFFERING OR A SOLICITATION OF AN OFFER TO BUY ANY SECURITIES IN ANY JURISDICTION.

THIS DOCUMENT IS NOT COMPOSED IN ACCORDANCE WITH, AND IS NOT SUBJECT TO, LAWS OR REGULATIONS OF ANY JURISDICTION WHICH ARE DESIGNED TO PROTECT INVESTORS. CERTAIN STATEMENTS, ESTIMATES, AND FINANCIAL INFORMATION CONTAINED IN THIS WHITEPAPER CONSTITUTE FORWARD-LOOKING STATEMENTS OR INFORMATION. SUCH STATEMENTS OR INFORMATION INVOLVE KNOWN AND UNKNOWN RISKS AND UNCERTAINTIES WHICH MAY CAUSE ACTUAL EVENTS OR RESULTS TO DIFFER MATERIALLY FROM THE ESTIMATES OR THE RESULTS IMPLIED OR EXPRESSED IN SUCH FORWARD-LOOKING STATEMENTS.

THIS ENGLISH LANGUAGE WHITEPAPER IS THE PRIMARY OFFICIAL SOURCE OF INFORMATION ABOUT THE CRYPTUM TOKEN LAUNCH. THE INFORMATION CONTAINED IN THE DOCUMENT MAY BE USED IN THE COURSE OF WRITTEN OR VERBAL COMMUNICATIONS WITH EXISTING AND PROSPECTIVE CUSTOMERS, PARTNERS, ETC. IN THE COURSE OF SUCH COMMUNICATION SOME OF THE INFORMATION CONTAINED HEREIN MAY BE LOST, CORRUPTED, OR MISREPRESENTED. THE ACCURACY OF SUCH ALTERNATIVE COMMUNICATIONS CANNOT BE GUARANTEED. IN THE EVENT OF ANY CONFLICTS OR INCONSISTENCIES, THE PROVISIONS OF THIS ENGLISH LANGUAGE ORIGINAL DOCUMENT SHALL PREVAIL.

CRYPTUM TOKEN DOES NOT ALLOW USERS TO AVOID CAPITAL CONTROLS OF ANY KIND AND DOES NOT ALLOW THEM TO INVEST IN ANY FOREIGN ASSETS.

IF YOU ARE A GREEN CARD HOLDER OF THE UNITED STATES OR A UNITED STATES CITIZEN OR PERMANENT RESIDENT OF THE UNITED STATES (TAX OR OTHERWISE), OR YOU HAVE A PRIMARY RESIDENCE OR DOMICILE IN THE UNITED STATES (TAX OR OTHERWISE), OR PERMANENT RESIDENT OF THE REPUBLIC OF SINGAPORE (TAX OR OTHERWISE) , OR YOU HAVE A PRIMARY RESIDENCE OR DOMICILE IN SINGAPORE OR YOU ARE A CITIZEN OR PERMANENT RESIDENT OF CANADA (TAX OR OTHERWISE) , OR YOU HAVE A PRIMARY RESIDENCE OR DOMICILE IN CANADA, OR YOU ARE A CITIZEN OR PERMANENT RESIDENT OF HONG KONG (TAX OR OTHERWISE), OR YOU HAVE A PRIMARY RESIDENCE OR DOMICILE IN HONG KONG, OR IF YOU ARE EITHER A CITIZEN OR PERMANENT RESIDENT OF THE PEOPLE'S REPUBLIC OF CHINA (TAX OR OTHERWISE) , OR YOU HAVE A PRIMARY RESIDENCE OR DOMICILE IN THE PEOPLE'S REPUBLIC OF CHINA (TAX OR OTHERWISE), VOU ARE A ELIGIBLE TO PURCHASE CRYPTUM TOKENS ONLY IF YOU INTEND TO USE THEM FOR THE PURPOSE OF SUBSCRIPTION-LIKE ACCESS TO THE BOARD GAMES WE ARE PUBLISHING AS A LEGAL FORM OF PRE-SALE. THE SAME APPLIES IF YOU ARE ONE OF THE OWNERS OR BENEFICIARIES OF THE COMPANY ON BEHALF OF WHICH YOU ARE AUTHORIZED TO ACT, OR IF YOU ARE ONE OF THE OWNERS OR BENEFICIARIES OF THE COMPANY ON BEHALF OF WHICH YOU ARE AUTHORIZED TO ACT.

IF YOU ARE EITHER A CITIZEN OR PERMANENT RESIDENT OF THE PEOPLE'S REPUBLIC OF CHINA (TAX OR OTHERWISE), OR YOU HAVE A PRIMARY RESIDENCE OR DOMICILE IN THE PEOPLE'S REPUBLIC OF CHINA (TAX OR OTHERWISE), YOU MAY NOT BE ELIGIBLE TO BUY TOKENS IN ANY FORM AND/OR BY ANY MEANS IN ACCORDANCE TO LOCAL LAWS AND REGULATIONS.

MISSION

Cryptum ICO is a multi-layer investment project with the paramount goal of funding a high-end board game design, development and publishing studio, starting with our first announced title: the strategy crypto mining board game Blockchain: The Cryptocurrency Board Game. We are using Ethereum-based tokens to offer proof-of-ownership access to free games, shared profits from all projects and initial amounts of our future cryptocurrency named Cryptumcoin.

While the Cryptum project doesn't rely on any from on decentralization (quite the opposite, in fact), we are using the Ethereum blockchain to confirm the number of tokens owned, and distribute games, profits (in ETH) or coins to the respective addresses, or to physical or another blockchain addresses, submitted by the address owners. More about this concept can be found in **section 3** of this Whitepaper.

1. SUMMARY

There are currently two main projects under the Cryptum brand, but we are constantly looking for new opportunities and we will expand the portfolio in the future:

1.1. CRYPTUM BOARD GAMES is our games design and publishing project, with currently announced 4 own games and 5 expansions for them. Our aim is to design and develop as many high quality in-house games as we can, but also to publish games from other designers from the region or from emerging markets around the world, helping them reach the ever-expanding board games market without giving up their games to corporate business. The Cryptum ICO is funding this project with 65% of the raised funds, and we will distribute 20 to 40% of the profits generated back to token owners.

By funding directly a new studio project instead of using the established per-game funding, we are avoiding the risks of unsuccessful game ruining the line of production. Our plan is to use the existing crowdfunding sources as they are used by the big companies - as a marketing tool and a pre-order system, instead of initial source of the funds needed to manufacture the games, thus generating revenue from the initial amount of pre-sales through Kickctarter, Indiegogo and other platforms, and then any wholesale and direct sales. As participants in many campaigns both as end users and retailers, we have intrinsic knowledge of specifics that contribute to games pre-sales, and, on top of that, we can work well within the boundaries of the established distribution system, as we have been part of it for many years now.

The board games project does not scale proportionally to the amount of funds invested, as any single game could raise a nearly fixed (within expected borders) amount that barely scales with the funds invested. This might not be entirely true for *every* game, but this is a common pattern. But the games development cost and manufacturing specifics allow us to operate with funds as low as \$20 000 (requiring additional investments by our company and just a trickle of games, each new one funding another in the line) to over \$1 million, funding simultaneously not only the games we are already developing (which would speed the process, but not expand the profits by much for the number of titles), but also new titles from external authors, all contributing to the grand project.

This concept is explained further in the Cyptum Whitepaper (see section 2.1).

1.2. (CANCELLED) CRYPTUM MINING - with Stage II Sale we moved to much lower token supply and we cancelled the Mining project.

1.3. CRYPTUMCOIN (CRYC) is a secondary project, funded by 5% of the Cryptum ICO. We are developing a new mineable cryptocurrency to use in loyalty and payment system of our future games store and services offered by additional projects we start under the Cryptum brand (for example, it would make a great currency for paid advertisements on a website).

We will distribute between 10 and 14.96 CRYC for each CRTM token sold (the rate is based on the number of tokens sold) plus additional bonus to top contributors (see CRYC Calculations below) of the theoretical maximum supply of 98.57 million coins, or up to2.65% of the max supply.

The development of Cryptumcoin normally raises the question why we didn't add this functionality to the Cryptum tokens instead of releasing another digital currency. We realize that Cryptum Tokens (CRTM) would not be widely accepted at all exchanges, especially the US-based, and their specific features revolve around their sale cost and are tailored to the prospect of keeping them as a long term investment; turning them to a mere form of currency would allow us to simply remove them from the market and make them non-accessible (except by buying them from exchange), and their number is already low to begin with.

In addition, we need a currency with much higher spread and capitalization, one that would be accessible to everyone not only by means of trade, and this is something we couldn't bestow on the limited number of tokens we are using for the crowdsale. Last, but not least, the Cryptum Tokens are already expensive, and have a great number of features, adding one more that we only have in a distant planning stage wouldn't make them much more attractive. At the same time, creating a new cryptocurrency that would be marketed through the Blockchain board game, accessible and attractive to miners, and used in our ecosystem or even our partners' systems, gives us the chance to create a lasting currency that have use outside the typical exchanges trade, and promote services that actually anyone miner (or anyone buying the coins off exchange) could buy, while initial amounts from it are still available to all Cryptum Token owners.

Detailed specification and various Cryptumcoin information can be found on page. XX of this Whitepaper

1.4. THE CRYPTUM TOKENS [CRTM] are ERC-20 tokens based on the Ethereum blockchain. CRTM will serve as a proof-of-ownership pass to everything we do, based on the amount owned, so they work both ways – while the funds we raise through their sale are helping the companies behind the project to develop their long-term business, the token owners gain some unique perks, like completely free tier-based access to one or more games (even all of them) published by Cryptum, shared profits from all our projects and initial amounts from the upcoming mineable Cryptumcoin.

While in essence the Cryptum Tokens may be regarded as a direct sale of our future board games, they are also backed by the profits the same games are generating, and, despite the tiers for free access to games, access to the profits is not limited to a single or a series of games - in fact even only the backup mining project has every chance of offering returns the volume of our initial sales, and any game we ever publish would be subject to the same profitability terms outlined in this document.

1.5. Cryptum Token Sale will be completed in two stages:

Stage I Sale: from 00:00 UTC on September 16, 2017, to 00:00 UTC on October 16, 2017, which raised \$136000 by selling 19 442 CRTM.

Stage II Sale from 00:00 UTC on October 17, 2017, to 00:00 UTC on November 17, 2017, offering additional 129520 CRTM at a base price of 0.00135 BTC, payable in BTC, ETH, ETC, ZEC, DASH, LTC, BCH, with a minimum amount of 25 CRTM.

1.6. Allocation of CRTM:

Cryptum Token allocation:

- 19776 CRTM sold dring Stage I Sale
- 340 CRTM paid for bounties
- 129520 CRTM to be sold in Stage II Sale
- O Allocation for other needs (marketing, bounties and more are handled with Cryptumcoin)

2. PROJECTS DETAILS & PROFITABILITY

UPDATED to V.3 with mining project cancelled: While we could have started an ICO just for the board games business project, and offer pretty much the same conditions with even better funding for it, our goal with the multi-project approach was to reduce the risks as much as possible, and offer steady flow of shared profits where a games-only solution would only contribute profits at times of new game release or when major wholesale deals happen.

We had to consider another problem: on "per game" basis - the board games publishing does not scale proportionally to the amount of funds invested. Instead, with more funds, we would include more games to the portfolio and speed up the process, but it's a business that can operate pretty much on any scale.

In order to add steadier beat of shared profits, initially we decided to use 30% of the funds for a mining investment. It sounded great until we realized that with sales well under the average, we will not open a big farm, but instead we will hurt the board games funding. With 150 000 CRTM limit to open the mining project, we were plain wrong to expect it to work. This art of the project also became an object of sound criticism from ICO Rating during their Audit and IN-Depth Review, and while we still believe that spreading the early "funding cash" on another investment in order to develop constant and steady profits was no a bad idea, we realized that:

- First of all it was not going to happen with the level of sales and marketing we had. Too early in the Cryptumcoin development to rely on it to advertise the ICO, and too late to add big budget, it was going nowhere, despite the fact we actually secured the funding of our first game and, since we have already developed one other game, this part of the project was already rolling (and it didn't need much to start).
- Second, people though that it was just opportunism, despite our strong belief otherwise. Jumping on the mining hype train happened with few ICOs.
- Third, if we managed to sell 150 000 CRTM during Stage I Sale, but not much more, we would cut from he board games funding whole 30%. Our calculations show that at this level of sales we would need the funds if we are to develop the games project well and not leave it dependent on additional funding in case we want to work on the games at an accelerated rate.

This is why we had to address our issues another way, and we decided to elevate the importance of the Cryptumcoin, distributing more of it and developing it in a way that

protected the ICO participants for the initial interest pick-up time.

Together with early listing at exchanges, we would give the Cryptum ICO participants the opportunity to establish the base trade of the Cryptumcoin and sell them or act as early investors on the exchange market. Having early trade would also give us the opportunity to add the Cryptumcoin on information aggregation websites such as WhatToMine and CoinMarketCap, which serve as marketing platforms for coins in addition to their obvious features.

Cryptumcoin is explained in details in its respective section/ We also have to explain why we decided to develop a new crypto currency. It has a lot to do with partnering with Crypto Mining Blog. As miners we often saw the rise and fall of different coins, and we always found shortcomings in the specifications, or the development ideas, or just a revulsion of coin launches being nothing but trade speculation scams. We've always wanted "a miner's coin", and we wanted to put it in use. And offering a new coin to the token owners is also partial offering of returns, albeit at a volatile price, so the idea fell neatly in line with our desire for flexibility.

Below we explained each of our offerings in detail, including profitability estimations.

2.1. BOARD GAMES PUBLISHING PROJECT

Our goal is to create a studio able to publish not only our already planned games (see below), but also games from external designers. There are few basic principles about the board games industry and the publishing process that have to be clearly explained in order to give you broader view of our intention.

2.1.1 UNDERSTANDING THE TABLETOP GAME INDUSTRY

Design - most tabletop game companies don't have a staff of inventors creating new games. It's usually more cost effective for them to buy or license game designs from independent inventors. Inventors drive the whole creative process. They take the germ of an idea and play around with it until it's a working game. That means adding a set of mechanics, which work for the specific purpose. After cleaning the mechanics of the game, they create a basic prototype, and test it out with players, collect feedback, and make numerous revisions until it's ready to pitch.

Pitching - the designer's next step is to convince a publisher to risk his money getting the game manufactured. Just like with movies, books, and music, the game industry is full of people who overestimate their own talent, even including people that have no experience with any type of board game, yet claiming some original or interesting design. For that reason publishers have to screen out numerous projects that are not worth the effort.

Here is when things changed with the emergence of the crowdfunding platforms. Instead of submitting a game to a studio, designers can now proceed to fund their idea by pre-selling it through one of the platforms. But that also created another paradigm - the game has to be in nearly ready to be published state in order to attract backers in Kickstarter, and this is often expensive process, especially if you aim at creating high-quality game: hiring in-house top artists (\$700-\$1500 for a piece of art, or a single 3D model, if your game has miniatures) is almost out of the question, as such people are usually working independently as freelancers. Then, you also need a 2D designer to create layouts, icons, and convert the freelancer's work to final files, ready to be sent to the printer. More often, games are often created by unknown or at least not so popular artists, which lowers the prices significantly. But in any case, self publishing games is a huge problem.

Manufacturing - when a publisher gives the go-ahead to publish a new game, he hands it off to his art department. When the art and graphic design are finished, the rules are edited, and all the final touch-ups are complete, the game goes to production. The production people select what kind of paper and plastic are going to be used for each component and convert the artwork from computer files to films, which are fed into the printing machines at the factory. The presses churn out boxes, boards, and cards, the molds spit out the pieces, and a workers put them all together and shrink-wrap each game. When the entire print run is complete, it goes into a shipping container. Most publishers have their manufacturing done in China these days.

Self publishing a game is a similar process (apart from having different departments working on the game), but requires much more involvement from the creator, and is usually a bit more cost effective.

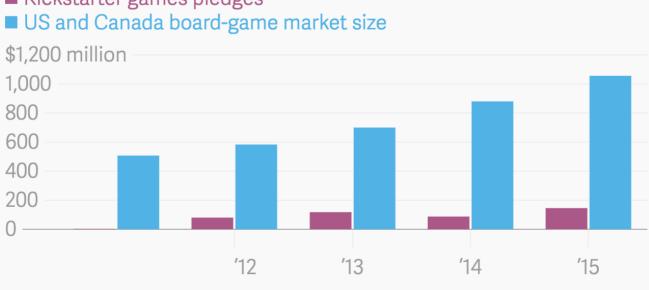
Distribution - when the game is on a truck, it needs to get to stores. The very largest publishers can call up the large chain retailers and ask how many copies they want, but what about all the small publishers and small retailers? There are over over 7 500 hobby shops in the world that aren't part of any chain. This is where the distributors come in. Distributors buy games from publishers, store them in a warehouse, mark them up about 50%, and send the retailers a catalog from which to order.

Retailing - tabletop game retailers fall into two major categories: mass market retailers and specialty/hobby shops. Mass market retailers are mostly composed of big department stores like Amazon, Wal-Mart, Toys "R" Us. Hobby shops, on the other hand, are usually small stores privately owned and run by dedicated people who love games (and/or comic books). Online stores emerged as a third category of game retailers, especially with hobby games, and their volume exploded in the last few years.

2.1.2. MARKET EXPLAINED

Up until recently the tabletop market was a niche market that didn't saw much growth. Then, just a few years ago, it simply exploded. One of the reasons for this expansion was the crowdfunding - not by simply allowing more funding, but by making the games more and more popular, and allowing the creators a way to fund their manufacturing, which in turn leads to

Kickstarter is booming along with the board games market





more and more games released on the market.

Currently it's a high profit margin market, where:

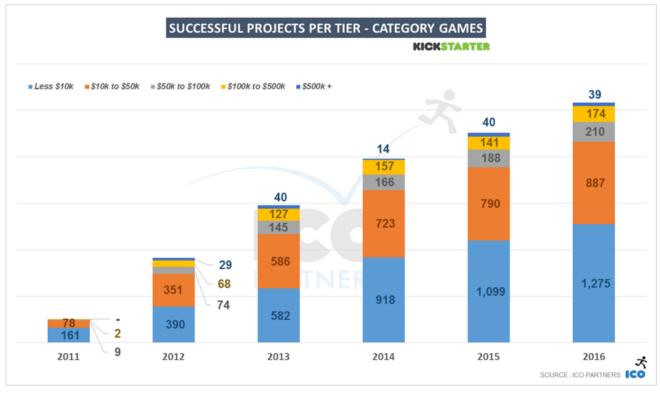
- Average printing cost is around 25-35% MSRP shipped. Some games are more expensive (especially those with plastic miniatures), other are very cheap to manufacture, selling at 500+ % their cost.
- Average wholesale price is 50-65% of the retail price, offered by well established distribution network.
- Kickstarter prices are 90-95% of the retail prices, but there is also the Kickstarter fee. Still, selling directly to customers in this way is much more profitable than selling games to distributors around the globe.

In 2015, the US & Canada market was at \$1.2 billion, with a steady growth rate over 20% year-to-year, and these were the most advanced markets (so far).

But games are also popular in Europe, especially UK and Germany, and they gradually spread around the world, raising the global market cap to nearly \$5 billion in 2016. According to a recent research, the global market is heading to capitalization of **\$8.12 billion in 2021**.

And then - there is the Kickstarter expansion. Looking at the figures - in 2015 and 2016 Kickstarter funding amounted for over \$134 million and over \$123 million respectively, which was amazing growth compared to \$75 million back in 2014.

What is more important, the amount of projects raising over \$500 000 continues to grow each year, following the trend for consolidating larger funding for a smaller number of high quality projects:



2.1.3. KICKSTARTER BASICS

Kickstarter became a dominant funding platform for independent games, with tabletop category selling nearly triple the amount of video games in 2016, with a clear trend to create even bigger disparity in favor of the tabletop games in the future. Furthermore, it is the dominant marketing platform, together with BoardGamesGeek database, and campaigns are now even used as a pre-order system for small retailers. Marketing of new games mostly

related to making Facebook campaigns, notifying major board gaming groups, adding a game to the BoardGameGeek database, and running some advertisement there or releasing items that are sold only in the BGG store.

It allows any individual to fund his creation by pre-selling it, and while it also created an initial rush of lower quality games (similar to the current ICO market state), eventually people started recognizing and funding only high quality games. And often this is also the expensive ones. The amount of money to be raised there by 2020 is staggering, considering we are still talking about products with fairly low popularity and very low penetration, and it's only limited by the number of people using the platform, But this number grows daily, because it's in everyone interest to make it more popular. The more people pledge in a game development, the more stretch goals are unlocked, and the game receives a chance for better quality of the print, which helps promote the game easily in the social networks and the few websites starving for more games news.

2.1.4. CRYPTUM BOARD GAMES AND KICKSTARTER

The idea of creating an ICO for a board games studio is a step over another basic idea, used by one of the big game publishers of our time - Cool Mini or Not. The said publisher has a game released in Kickcstarter every few months, and while rumors tell that they pay the manufacturing of each new game with the funds from the next campaign, the company started to run campaigns that raise no less than \$1 million per game, often rasing more than \$2 million for some of their games.

Sadly, the emergence of such corporate interests in Kickstarter also led to a form of inflation of the expectations towards quality of the game components (mostly plastic miniatures, but also cardstock quality, etc.), and art direction, and this alone made it harder for the smaller studios - unless they offered very good, high quality games, their funding campaigns remained on the low side.

People also started recognizing the quality work even from small teams. The famous game Gloomhaven first Kickstarter campaign was under-costed (less than \$70 for the biggest game ever made) and while it was backed by 4900 people, it raised only \$386 000. At the same time, just for few months, retailer pre-orders amounted 25 000 orders, and, since the author didn't have enough funds to manufacture enough games, only 2000 were served. The Second Printing of the game had 40 642 backers at a higher price, rising just shy of \$4 million. And the retail pre-orders became even more, with demand again exceeding the printing numbers and reservation queue.

This is where we came with the idea of pitching higher-quality games able to collect more funds in Kickstarter, which in turn leads to more people knowing about them, and higher sales in the retail channels. For that to happen, we need to step up from the usual process of releasing the game and then funding another one with the collected funds. As we have been in the crypto world for years, we came up with the idea of funding the studio with ICO, offering share of the profits back to the token owners AND, because this allows us much better cost optimization, we would also offer free games to the token owners.

We also have many great ideas regarding the cost optimization, as this is integral part of the game creation business, but please don't expect us to share all the know-how in detail.

2.1.5 BOARD GAMES BASE COST-OPTIMIZATION EXPLAINED

If you go back through the text explaining the board game industry and imagine there is a shortcut between Manufacturing and your customers, you will find that this way you clearly cut out the distribution channel and the retail businesses, which alone boosts the profit by nearly 50%. Games are usually pre-sold on Kickstarter at a price that is slightly reduced in comparison to the SRP (Suggested Retail Price), and the platform has a fee (currently 5%), yet the difference is not even partially closing the huge gap to distribution prices.

Back on the manufacturing: most games require a print run for at least 1500 boxes, with games with miniatures being prone to higher requirements if the goal is to optimize the price due to the process of manufacturing plastic pieces. Independent publishers usually don't have pre-orders from distribution channels, and they rarely sell to small retailers (less than 5% or all games have a "retail pledge"). This means they have to cover the development expenses and the manufacturing from Kickstarter revenues, and often underprint the game, not satisfying the distribution channel or completely ignoring it.

As we intend to use the Kickstarter platform (and any smaller platforms as well) to generate initial amount of pre-sales to customers, we would also offer the so called "retail pledges" that allow small stores from all over the world to get the game at the time of the campaign fulfillment instead of waiting for it in the distribution channel, at a reduced price, which would also limit some of the distribution sales at highly reduced price. This is a trend that already worked well for few major campaigns, and it allows the retailers to anticipate games much earlier and generate pre-orders by the time the pledge managers (the part of the campaign when you confirm the number of games, expansions and add-ons you want, usually 3-4 months after a campaign) are open, which leads to even more sales.

As we are already part of the current distribution chain, we will also generate pre-orders from it, and, in addition, some manufacturers also offer their own channels for sales. This will allow us to generate prints well over the basic mark required by the manufacturer, and maximize the profits as much as possible. The basic reason to be able to do it is the fact we will have the funds to pay the manufacturer because we are not funding on "per-game" basis, waiting for the Kickstarter funds to be release (60 days after closing a campaign) - instead we are using the Cryptum Sale to start the process.

2.1.6. BASIC EXPENSES IN GAME DEVELOPMENT

Our goal is **not** to create a studio with in-house designers and artists. Outsourcing the work to freelancers has some risks attached (see below), but it is much more cost-effective solution, and it also allows greater variety in the art direction, while it transfers part of te project management to contracted artists, lowering the requirement for in-house staff. Using contacts we already have, as well as seeking new artists that would want to take part in larger projects is what we would do.

This turns our work into a a project management (with subcontracts when needed, we are not omnipotent), and this is very inexpensive solution - there is not a single person hired or a regular salary paid in our board games project. Instead, all of the work would be done at industry standard or lower rates, basically making us "undercosted" compared to normal studio expenses. for in-house staff. In fact - nearly all of the sale funds will be invested in direct payments to contractors and freelancers.

Working with freelancers bears some risks. For example, while working on the game Primewarp: Genesis, the main 2D artist decided to stop any work until further notice. At nearly 90% of the work done, this created quite a turmoil, as finding another artist with the same personal style is nearly impossible. Luckily for us, he agreed to finish the job, and now all of the

required art for the game is ready.

2.1.7. CRYPTUM GAMES, ESTIMATED PROFITABILITY

We are approaching a profitable market with a sound business plan. Even looking at only the 4 games we announced and their expansions, it is possible to generate over \$2 million of revenues, and with that it is easy to get the train rolling faster, developing more games, and that's not even considering the growing retail market. There are plenty of games selling over 30 000 copies, and this is where we want to go, instead of climbing the market tree slowly by printing small quantities.

We have 4 games in development, and a total of 5 expansions planned for them. If you are not familiar with the games design process, please refer to **Section 2.1.1** - this will give you better understanding of the process. The board games creation doesn't follow the same formula as video game creation, and adding graphics, or even creating a pre-production copy, is something that happens nearly at the end of the development stages. Further details for all of the games are below.

BLOCKCHAIN: THE CRYPTOCURRENCY BOARD GAME is

our top priority game. We are trying to create a game that is not only offering great gameplay, but also some educational and even historical value, explaining the world of digital currencies to people in the hobby and capturing the current market state "on paper".

Official description:

Blockchain: The Cryptocurrency Board Game is a highly educational board game about cryptocurrencies, mining and investment.

Blockchain is an advanced engine-building, worker placement game where 1-5 players try to use their processing power to "mine" digital currencies and exchange them for Bitcoins and Ethereum, competing for the highest profit at the end of the last game round.

Players can upgrade their hardware with more powerful GPUs or even ASICs, install advanced software and updates, and invest in token crowdsales while they are collecting, selling and even dumping their altcoins in favor of Bitcoin or Ethereum at the end of each round, or speculating that they will have a higher cost in the future.

Player interaction is achieved through card drafting each round and event manipulation during the game turns.

The game features:

- 85 cryptocurrencies for mining
- 15 ICOs
- 25 algorithms
- Hardware ranging from a single CPU to mining rigs and ASICS
- Small share of exchange mechanisms

Blockchain board game has been planned together with 4 expansions, bringing updated market state, new rules, new hardware and upgrades, creating an accurate historical representation of the mineable digital currency market.

Development stage: Blockchain is in early alpha stage of development. We have the idea already dressed with working mechanics, and a nearly full list of features^{*}, and we are in the



CRYPTUM WHITEPAPER v.3.0



process of creating a paper version for internal testing. After internal tests, we will draft a rulebook for blind testing, and hand the paper version to groups of players that have to play it without our help. We will do this in order to perfect the rulebook and check for any rules we didn't explain well enough, and catch any bugs that escaped the regular testing. After we make any changes that might come up, the book will go for editing, and the design of the components will begin.

Blockchain is fairly simple game in terms of components, the most complex component design was creating Bitcoin and Ethereum 3D models, as we intend to include metal coins in the Kickstarter edition of the game as part of the marketing process (also available to Cryptum Token owners), and we already ordered and received the design for the coins. Of course, we already paid for the box initial design, and while it is not a final image of the box, we will keep the overall color scheme.

Because of the process of manufacturing games, we do not have a pre-production copy of the game. Such games will come at high cost before launching the campaign for the game, and they will be sent to reviewers as part of the marketing the games.

Expected revenue and profit: We expect this game would be able to raise \$250-350 000 though a Kickstarter campaign, and average wholesale and retail sales



(1000-2000 boxes). As the first game in the line it will suffer from being much less known until our studio gathers fans, but we also planned 4 expansions for the game that will be release through one or two campaigns, and they will inevitably lead to further sales of the base Informal summary, including some expanded information

The game allows up to five players to compete by building mining rigs or investing in ASICs, buying and upgrading high-end mining hardware with the goal of owning most Bitcoins and Ethereum at the end of the game. Bitcoin and Ethereum have a "floating" cost and it is set throughout the game as an optional rule, which adds another strategy layer (exchanging for BTC or ETH will raise their prices).

Blockchain simulates both the competition and cooperation between miners by using solo and pooled mining: each new coin starts at a low difficulty, but adding more miners raises it, opening pool slots and lowering the solo mining profitability, difficulty changes (as explained) and market development (heavily investing in a coin may rise its price), while player interaction is achieved by event manipulation (the algorithm deck has double-sided cards with events on the back) and a limited set of exchange practices (holding or dumping, more will be added in the Exchanges expansion). There are limited set of ICO offerings add some risk-taking elements for the endgame.

The mechanics are pretty self explanatory for most gamers, but here are few more pieces of information you start by building a rig (actually 4 slots for each player, all comes through cards from drafting and the market), mine on it by assigning hardware (workers), sell, dump or hold at the end of a round. The little trick we used with the workers is that you actually assign a whole rig worth of them at once for each action point (4). Coins are populated with each new algorithm, and events are on the same cards, so whenever a new coin is out, conditional events trigger.

The game will feature metal Bitcoin and Ethereum coins, and during the Kickcstarter campaign we will unlock new currencies. game. In addition, there is a distant possibility for us to make a second edition few years later if there is such demand.

Because of the game simple graphics and components, we expect that the manufacturing process would cost us less than 25% of the total funds raised, and the development would only cost us less than \$15 000. Game marketing would cost us about the same.

The game expansions are expected to raise as much as the base game together with additional sales of the base game, but at a higher cost. 80% of the funds raised by the base game will be reinvested in the expansions (or in another of the games if it follows first), while with the expansions the amount would be lowered o 60% (20% shared profits for the base game, 40% shared profits for the expansions).

Our lowest expected shared from the Blockchain base game campaigns and its expansions is \$75 000 - \$125 000, not featuring and wholesale sales, which can amount even more in the long term.

*As part of the marketing process, we proposed to major crypto exchanges to be presented in the game with a set of additional mechanics. We already have two exchanges expressing interest, and we are waiting for others to reply, but adding the mechanics for them would require some changes.

PRIMEWARP: GENESIS is a post-cyberpunk game with some unique mechanics that don't allow us to define a clear type for it. It's part skirmish for up to 5 players (with expansion), but it also features solo, cooperative and team mechanics, with PvE elements that make the game challenging no matter the number of players.



The game is set about 200 years in the future, when a scientific experiment ends badly because of a terrorist attack and opens a way to another universe. This quickly

escalates to a black ops war between mighty corporations, the

Church and some independent parties, fighting for a new resource known as Majarinthe.

The game features two enormous modular boards (24x24'' each, 8x8" tiles), plenty of miniature models and hundreds of skills, weapons, equipment and upgrades cards, but our pride is that we managed to create a game that offers something truly unique that is much different than the trendy 1 vs. Many or coop games, yet also features such elements.

Primewarp is in the most advanced stage of development of any of our games. 100% of the art



Some of the Primewarp: Genesis models. Render by 3D designer Francesco Orrù

pieces, 100% of the game tiles layouts, 45% of game tiles artistic touches, and 10 of the 18 possible models are ready for printer. We don't have approved card layout, and there are around 500 cards in the game. We also prepared some Kickstarter stretch goals in advance, like additional rules. additional 3D models (plastic miniatures), cards enhancing the game, and

CRYPTUM WHITEPAPER v.3.0

One of the sci-fi tiles:



custom dice (including add-on with different dice for every player).

In addition, we made the decision to split the game content into a base game and expansion (Primewarp: Blades and Fire), which would help us add even more content in the paid add-on, and raise more funds during the KS campaign while lowering the base game price in order to make it more accessible.

Expected revenue and profit: Primewarp: Genesis is a very big game, and we expect to see a lot of hype around it once we have a pre-production copy and show the gameplay (which we are hesitant to show at this stage, as anything unique will be quickly copied by other studios).

We expect the game to raise between \$450 and \$700 000 in Kickstarter, but we have hopes for

hitting a million with this game. Of course, it costs much more to manufacture it - about \$35-40 per box, and the development is much more expensive - so far for the 2D art (characters, card art, tiles basic layouts and tiles additional art) cost is just over \$17 000 (already paid), and the 3D models total is \$9000 (paid so far \$5000). We will need another \$15 000 to finish with the graphics and to spent as much on marketing before and during the Kickstarter campaign.

Primewarp and its expansion shared profits are set at 40%, and we estimate they would amount to \$80 000 to \$130 000 at the lowest expected campaign funding, not including wholesale and retail sales.



Some of the game characters early work. Author: Nicolas Nexz

GODFORGE: THE FIRST WAR is a game that we simply always wanted to create. It's a dream come true for many designers and gamers, but the sheer size of the project, requiring over \$250 000 to \$300 000 invested in art alone, and the volume of the data that has to be processed in order to make it happen, is staggering for a card game.

Godforge is a game of the "Magic-in-a-box" type, following the 30 years of success of Magic: The Gathering, but also other famous



Trading Card Games. Through the years, many designers made attempts to create a game that reassembled the quality of the trading card games in a single board game, often adding expansions later, but there has never been an attempt of such scale, and there is clearly a huge market for it, as there are plenty of players that don't like the continuous investment that comes attached with the collectible card games.

Instead of using the Fantasy Flight Games model of releasing a constant supply of expansions after starting with a very limited set (also known as "Living Card Game") which works rather well in the early life of the games, but has some problems attracting new players in the long run, we want to create a game that has nearly eternal value, modeled on the base of some well known card games, but set in its own world and offering unique mechanics.

The game draws heavy inspiration from the worlds and the games of Magic: The Gathering, WoW TCG, Dune, and many other smaller games. After some brainstorming and trusting our own guts we are aiming at 750-800 unique cards, basically offering a game with over 2000 cards total.

Godforge: The First War is in very early design stage, we are still through the data collection. This is the last game we would attempt to release if the Cryptum project is not properly funded, as it requires much higher initial funding.

Expected revenue and profit: Godforge is clearly a \$1 million + game, but it would require tremendous effort to create and manufacture it. In fact, this is one of the biggest game ever published, and we have high hopes turning it into one of the most funded games in the Kickstarter history. Still, we cannot allow ourselves to expect too much at this stage, so with a 40% shared profits we can estimate \$140-\$240 000 in shared profits.

C22: A WORLD WITHOUT BORDERS was initially named differently, but we had to rename the project due to copyright issues. This game is basically "an idea on paper", and we haven't done any work on it.

C22 is a cyberpunk game set at the beginning of the next century, and will offer the players a cyberpunk noir adventure with deep and engaging story. It will offer cooperative mode that somehow strays from the typical implementation, instead trying to create a separate, unique experience for each of the players, with game goals appearing on the road to

the end game, similarly to how multi-ending computer games work.

Example image

Expected revenue and profit: Because of the somehow high-style and specific setting, we do not expect this to be mass market game, Raising \$250-\$350 000 in Kickstarter is possible depending on the game components and art, so we will consider carefully marketing the game as part of the Primewarp universe and try to pull out as much profit as from the Blockchain board game, even with higher initial investment.

OTHER CRYPTUM GAMES

Our goal is to publish a lot more games than the initial 4 we are developing. We already have few authors offering their creations, and we will act as investment fund and publishing partner, which is quite different than the way the publishers do it today. We realize that two hardest parts of creating a game are having an unique idea that would sell the game, and the investment in art and components, which most independent authors just cannot afford. By helping them publish the games we will act as a window to established customer base, distribution channels and a main retail store, filling the roles of a publishing platform and investor.

We will start looking for new games from external authors (in addition to the few we have in mind) and work on other game ideas we have if we pass \$500 000 sold during the ICO stage, or when we have developed at least the Blockchain and Primewarp: Genesis games in case of a lower funding.

2.2. MINING PROJECT

The mining project was a secondary project we would have developed with 30% of the ICO funding only if we sell 150 000 or more CRTM (outside bonuses). The project was cancelled at the conclusion of the Stage I Sale in favor of concentrating our efforts in the gaming business and the Cryptumcoin project.

2.3. CRYPTUMCOIN DEVELOPMENT

(Note that all information dependent on the amount of CRTM sold during Stage I is non-final. We will keep the ratios and final amounts as close as possible to the information below, but some calculations use the CRTM sold during Stage I and we are compiling it before its end).



In order to promote the change, we will be distributing much higher amounts of Cryptumcoins during their launch in December. Launching a currency that has both a fair launch targeted at miners *and* a large pre-mine, which are somehow mutually exclusive, is not easy, but we found a way to balance between the ICO supply and the coin effective supply (the supply in the most active mining and trade periods we call "ages", see the table below) and the max supply. We are keeping the total pre-mine to between 0.42% and 2.64% of the max supply of Cryptumcoins (depending on final ICO sales) and between 2.22% and 12.70% of the ages of peak interest supply.

The pre-mine volume is based on the CRTM tokens sold during the ICO stage plus any bonuses, and varies between 397823 and 2.6 million CRYC. It is distributed on the following conditions (formulas are explained in the notes):

CRTM _{sold} ¹	CRYC per CRTM ²	TOP _x Bonus ³	Marketing⁴
19.8-50.5k	10.00-11.11	11.8k-33.6k	=(200k-Bonus)
50.5K-100.5k	11.11-12.93	33.6k-77.9k	=(200k-Bonus)
100.5k-156.1k	12.93-14.95	77.9k-140.1k	=(200k-Bonus)

Not in the table - we will have a bounty campaigns, distributing an amount equal to 50% of the post-sale bonus, but these will be announced after the Cryptumcoin pre-announcement.

¹Example categories starting from the current distribution of 19 782 CRTM and up to theoretical maximum of 156 118 CRTM incl. bonuses.

²Current CRYC/CRTM Rate (CRYCrate)= 10+(CRTMsold- CRTMstage1) / 27500). After the coin launch, token owners will have 30 to 45 days to claim their Cryptumcoins on our website. Please follow our social accounts on top of the page to avoid missing the deadline. Distribution will be done in waves on a first come, first served basis.

³After launching the Cryptumcoin, and after the claims period is over, we will distribute an additional bonus amount of CRYC (Bonustotal= CRTMsold* CRYCrate* 0.06) to the top contributors based on the following formula: Bonustop= BonusTotal/ TOPxwhere the number of TOP contributors is TOPx= (CRTMsold-CRTMstage1) / 250 if < of the total number of contributors, or else the number of contributors.

⁴As we would try to list the Cryptumcoin on as many quality exchanges as possible instead of relying on voted

listing, and considering the prices for listing a coin lately (3-5 BTC on some exchanges), we'll need an extended marketing support. The formula here is: Marketing Budget = 200 000 - CRYCbonus.

In any case that doesn't allow us to use anything but integers, we will be rounding in a way that leaves the difference in our wallet. Unclaimed amounts of Cryptumcoin will be considered forfeit.

2.3.1. CRYPTUMCOIN FEATURES AND OUR GOALS

Creating a currency that can be equally attractive to miners and ICO investors is hard. There are number of other goals we had in mind, as well as solutions for them:

- **To create a highly popular currency**. Being based on popular tech would hardly make it one of the TOP10 by itself (although it has better chances than some of the top coins in WhatToMine), but considering how many poorly developed and meaningless cryptocurrencies make it to the TOP100 coins, we consider it paramount goal.
- **Protecting the ICO investments** basically making it popular is enough, but we also implemented low initial start and we will invest in early exchange listing so the ICO participants would be able to trade it early, almost everywhere.
- Listed at the top exchanges which requires mostly high volume. And the pre-mine will help with creating trade volume on smaller exchanges as a gateway to high volume trade on the big ones.
- **Friendly to the miners** with an early access to exchanges, pools and tools, and power efficient and well known algorithm, and meaningful block rewards that ae meant to expand it fast, there is no doubt Cryptumcoin is going to be widesperad and friendly to miners that hate to see 0.x in their daily earnings or 0.000000x cost at the exchanges.

Cryptumcoin is developed together with one of the leading mining blogs - <u>Crypto Mining Blog</u>, meaning it is primarily a miners', trade-centric currency, but we developed in a way that promotes long-term investment value and that fights some common failures of other currencies launched in the past.

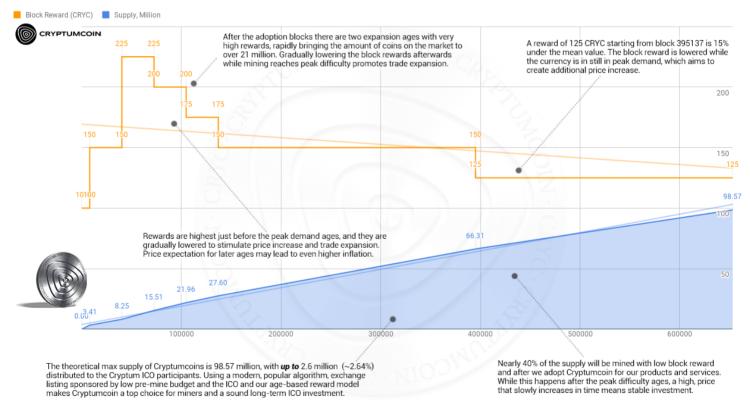
- **Power efficient algorithm** we are using one of the most power efficient and ASIC-proof algorithms today. Equihash is still by far less power-hungry than *almost* every other popular algorithm. There are some examples of even more power-efficient algorithms, but they are either farm-friendly, non-user-friendly or simply unpopular.
- Less farm-friendly with Equihash being clearly favorable to NVIDIA GPUs and NVIDIA being late to the mining, there are much less mining farms using NVIDIA GPUs, and there are many more small miners using them. NVIDIA videocards are easier to find on the market right now.
- Extremely popular algorithm this is a bit of a double-edged sword, but in essence it allows exchanges and pools an easy integration, there are far less problems expected on software level, and there is a better chance to make the currency known to more people. Last, but not least, everyone knows how to mine it. Of course, we will still explain it in details on our website.
- Listed early at exchanges we want to make Cryptumcoin popular. It will not happen only by holding Cryptumcoins in wallets, there has to be trade volume to allow it to enter the top traded currencies. With a fractional pre-mine (distributed as a small part of our Cryptum ICO) available to make it ready for exchanges since day one, and block rewards that quickly expand its presence, we hope to have it on every major exchange in less than 2 months.
- **Developed together with Crypto Mining Blog** and advertised by such a leading mining media means the coin will receive plenty of attention. Higher initial volumes also allow us to promote trade and add it to CoinMarketCap and WhatToMine faster.
- Announced early with Pre-Announcement being part of the <u>Cryptum ICO</u> and starting well before the actual launch, we want to give equal chances to the ICO contributors to get involved and establish the trade market, and send a clear message to the miners

what and when to expect.

- All the tools available it's not a rare case to see a "day 1 fair launch" that only offers a Linux wallet and a CPU miner this is usually done to allow the developers to mine early with impunity. We will provide all the tools and their sources together with the launch. Being an Equihash-based currency also helps, as the miners are already quite popular.
- **Pools contacted ahead of the official launch date** we will contact some popular pools ahead of the launch so they can prepare for a zero day mining. Together with early listing at the exchanges, we want to create a finished ecosystem for the coin and give everyone immediate access to it.
- Innovative block reward scheme that addresses almost most weaknesses of coin launches launches and targets some specific problems with distribution, inflation and availability.

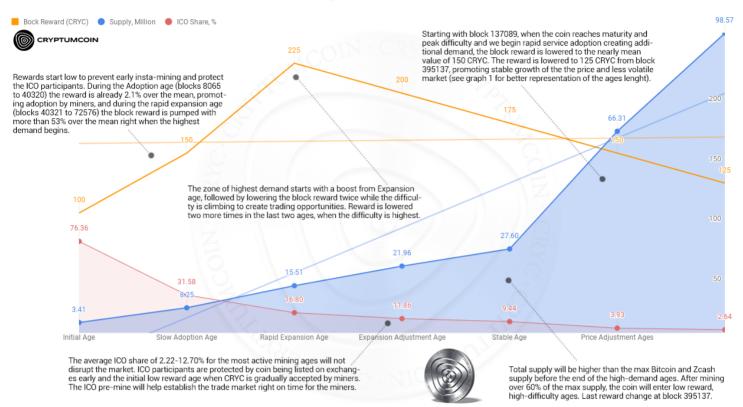
2.3.2 Vision and Specifics

The theoretical maximum supply of Cryptumcoins is over 98.5 million coins, which is not unusually high. Still, we had to consider that it has some influence over the market price, and that we have a pre-mine for highly-mineable cryptocurrency. We have developed changes in the block rewards according to the block height, which we call Ages. These ages address the most common issues of newly launched digital currencies and are aimed at creating a lasting currency with slowly inflating price that can be considered stable.



At the same time, the ages also help us establish the Cryptumcoin as a coin dedicated to miners, and protect the initial investors that participate in the Cryptum ICO. For example, we will start with low block reward for the initial 8064 blocks. As this is the time when most ICO contributors are claiming their rewards (practically proving they own certain amount of CRTM tokens and confirming their address with a minimal ETH transfer from it), and we are listing the Cryptumcoin on as many exchanges it is possible, it is the ICO participants job to establish the

trade with the early investors. Yet we will not start with completely useless rewards, and early miners will be able to take some advantage of the low difficulty.



The scheme is shown in on the image above and explained in detail below:

- The Initial Age has a much smaller block reward that doesn't promote early over-mining. Together with the fair launch and pre-announcement it will create equal possibilities to all miners. It also protects the ICO contributors investment early in the currency life while still allowing newcomers to mine and sell their coins to early investors.
 - The Slow Adoption Age is the time when most people learn about new coins; the block reward becomes 50% higher (but just a bit over mean value) while the difficulty increases with new miners joining in, meaning more people will get Cryptumcoins. It also raises the max supply to 3.25-20+ times the ICO premine (depending on the ICO sales).
- The Rapid Expansion Age raises the block reward further with another 50%, right at the time of peak popularity growth, allowing great expansion of the coin presence and trade opportunities. This welcomes latecomers and doesn't punish the people that started early, even after the difficulty increases by a lot. At the end of this age there will be over 15.4 million CRYC on the market.
 - The Expansion Adjustment Age lowers the block reward slightly (11.1%) to help fight deflation and even promote slight increase of the price. We expect that this will be a time of high difficulty mining, so we kept the reward about 35% higher than the mean value. At the end of this stage the Cryptumcoin will be hard to mine, yet there will be over 21 million coins on the market, allowing great spread and trade volume.
- The Stable Age is basically an age of peak popularity and difficulty. At its start, the ICO pre-mine will contribute to only between 2 to 11% of the total coins on the market (depending on the ICO sales), and this is when we plan to start using the Cryptumcoin for our services. The block reward is lowered with 12.5% over the Expansion

Adjustment Age for the next 64512 blocks to stimulate trade and price growth.

• The Price Adjustment and the Final Price Adjustment Ages lower the block reward further to promote a stable price inflation over time without delving into the typical halving of the reward that risks alienating the miners. With over 40% of the currency life ahead of it and stable, gradually inflating price, the Cryptumcoin will have a chance to become one of the top end cryptocurrencies and keep its place for a long time.

Age **Block height** Blocks **Block Reward** Supply after Initial Age 1 8064 100 3411900 Slow Adoption Age 8065 32 2 56 150 8 250 300 **Rapid Expansion** 40 321 32 2 56 225 15 507 900 Expansion Adj. 72 577 32 2 56 200 21 959 100 Stable Age 104 833 32 2 56 175 27 603 900 **Price Adjustment** 137 089 258 048 150 66 311 100 **Final Adjustment** 395 137 258 048 125 98 567 100

Additional information can be found at the Cryptumcoin website: <u>cryptumcoin.com</u>. Below you can find a basic Cryptumcoin Age and Block reward table:

Together with the long list of features and specific ideas we introduced in the development of Cryptumcoin, we hope to establish it as one of the most popular crypto currencies on the market. You can participate early buying Cryptum Tokens - the Cryptumcoin is only a bonus feature of the tokens as they are helping us fund board games publishing, featuring shared profits and free access to our games, but each CRTM token owner will receive initial amounts of CRYC to use as he sees fit.

3. CONCEPT OF PROOF-OF-OWNERSHIP CLAIMS

All Cryptum projects that offer something to the owners will use a system we call "proof-of-ownership", requiring the token owners to actively submit information about their ETH address(es) holding Cryptum Tokens on our website in order to gain access to the respective features. This is a simple process of filling a form with the required information that we call "claim". All checks are then executed on our side before the given deadline.

The process is similar for every "claim" aspect of the Cryptum Tokens, with some small differences explained further in this Whitepaper. The basic process consists of the following steps:

Following an announcement of specific deadline, users have time (usually a month or more) to take the following steps:

• Make a 0.01 ETH transaction to the announced ETH address from the ETH address

holding their CRTM tokens;

• Open the announced form on our website and submit their ETH address, holding their CRTM tokens, an email (used only in case we absolutely must contact the submitter) and, if needed, any additional information (see below).

3.1. PROOF-OF-OWNERSHIP VS. DIRECT DISTRIBUTION

For us it would be much easier to check the token holders and just distribute the amount of shared profits we are paying for the round in ETH, but that raises some legal questions if the holder is a resident of a country with specific regulation regarding ICOs. Essentially we will be sending funds that are not explicitly wanted.

Using the claim process also means the CRTM owners agree to our rules of profit distribution. Whether it is for profits, shipping of games or distributing Cryptumcoins, an active claim means the owner agrees to receive these without us being concerned with his legal status.

3.2. TIER-BASED ACCESS TO FREE GAMES

With the main goal of Cryptum ICO being games publishing, we decided that investments in our tokens should be rewarded with free copies of the games we are publishing. This is not the strongest selling point of the project but, considering it only requires little involvement like following us for announcements and filling in the claim, this aspect of the Cryptum Tokens is a form of game subscription.

It is based on so called "tiers", giving the token owners access to one or more games, mostly based on our release schedule (see **Roadmap**). Note that there are some games that might be released to token owners despite the fact they are not included in the initial plans. This would be a result of lower manufacturing cost, or earlier release. Such games would have specific requirement in addition to the initially announced (marked with "?" in the table below).

Number of CRTM owned (rounded down):	25-34 (Tier 1)	35-64 (Tier 2)	65-99 (Tier 3)	100+ (Tier 4)
Blockchain	\checkmark	\checkmark	\checkmark	\checkmark
Blockchain Expansions (4)		\checkmark	\checkmark	\checkmark
Primewarp: Genesis		?	\checkmark	\checkmark
Primewarp: Genesis Expansion		?	\checkmark	\checkmark
Godforge: The First War			\checkmark	\checkmark
C22: A World Without Borders			\checkmark	\checkmark
Other Cryptum games			?	\checkmark
Free shipping for all games*	\checkmark	\checkmark	\checkmark	\checkmark

All Tiers include free shipping of the games anywhere in the world. Shipping may be subject of restrictions, such as no shipping to warzones, countries with civic unrest, or countries with proven track of non-reliable post services, or countries in the restricted list of our shipping agents **and** Bulgarian posts services (used as a backup service), or P.O boxes. We will not accept any non-delivery claims for tracked shipments.

Additional notes:

- Tier 2 owners that have above the required minimum may be subject of additional free game allowance, in case we release the game Primewarp and its expansion for free access at 50 CRTM mark. This is part of the marketing plan of the Cryptum Tokens, but it's still a subject of game or shipping costs that we cannot predict at this stage of the development.
- Tier 3 owners may be subject to additional free games allowances in case we release games that are not part of the initial plan explained in this Whitepaper before we release the last of the currently announced games. Such cases would be games from external authors or our own games that seem to fit better a specific release date.
- Tier 5 owners will receive for free every game we ever publish. This includes our own games, and games from external authors.

The claim process for free games includes the steps explained in **Section 3** above. and additional steps and required information. Token owners would be required to submit a shipping address, names and a contact phone number. This information will not be kept after the shipping fulfillment. We will not be responsible for mistakes in the submitted shipping addresses, or change of addresses (you may contact us in a timely manner if there is such case).

If you are interested in further details regarding the board games project, see section 2.1.

3.3. SHARED PROFITS CLAIMS

Following the collecting of funds and their clearance for the board games project, or collection and clearance of funds from the mining project (every two months), we will announce the so called "shared profits deadlines". Token owners will have a 2 weeks to a month (depending on the type of the deadline: mining or game profits) time to submit the required information on our website. We will only require the steps from **section 3** above: an ETH address (where the tokens are held) and an email address.

Profits calculations are explained in the respective project sections of this Whitepaper (see **section 2**). Profits are paid in ETH, from a new ETH address for each round, and are based on the total number of CRTM tokens in circulation (e.g. on a "ETH per token" basis), with the pool available for inspection, and all unclaimed profits are redistributed during the next claim round.

As there will be amounts under a certain threshold, which are not viable for distribution because of the comparable size of the transaction fees, such amounts will be accumulated for the address that claims them, and distributed either with explicit requirement from the token owners, or, if there are no specific requirements, when the amount accumulated is over the next threshold. Any amount that has not been claimed through our website before the respective deadline is considered forfeit and will be redistributed during the next round.

3.4. CRYPTUMCOIN CLAIMS

The process is similar to the other claims but in addition to the steps described in **section 3**, after the official release of Cryptumcoin (CRYC) in December 2017, the Cryptum Token owners will have to download a wallet for Cryptumcoin for their preferred OS and fill in their CRYC address where we can send them the respective amount of coins.

4. TEAM AND PARTNERS

Cryptum Network project is funding indirectly 3 private companies connected to our main company, numerous freelance developers, designers and artists, and, in order to be able to produce the best possible quality and deliver anywhere in the world, we will have contracts with some of the top board game manufacturers (preferably Panda GM or Ludofact) and shipping agents.

Most of our team consists of the people that are behind the largest Bulgarian IT community, started in 1999 – <u>hardwareBG.com</u>, with other members helping us with particular aspects of the project, or being part of the main company that will work on the games.

4.1. CORE TEAM MEMBERS



Nikolai Tsekov

Core Project Manager

Nikolai is Cryptum project manager and a lead designer of many of the board games we develop, as well as main contact person for any freelance and company contracts. He's still administrating over the hardwareBG.com IT forums, but after over a decade of work as an IT journalist, editor and a PR specialist, in 2013 he started his own retail company, now owning one of the top Bulgarian tabletop hobby stores -BoardGames.BG.



Anton Belev

Core Lead Developer

Anton is a huge tech enthusiast and the leading figure behind so many online projects that even we stopped following all of them. Hardware, 3D/VR, 3D printing, software, actually anything IT-related, and a whole lot of hobbies to complement his already impressive skills. He's responsible for most of the software development for the Cryprum projects, and we greatly value his knowledge and experience.



Kiril Venev

Core CTO

Kiril is our chief technology expert. One of the co-founders of the leading Bulgarian IT community at hardwareBG.com and the company with the same name, a skilled technician with plenty of experience dealing with almost every possible hardware or software-related problem, and even more knowledge when it comes to cryptocurrency mining. We trust him to develop and support the mining project to the best of his abilities.



Grigor Stoichkov

Core Technical Advisor & Procurement

Another of the hardwareBG.com founders, Grigor is lead technical advisor of the Cryptum Mining project. He has been into mining ever since it became a thing, and, after years of working on different mining ventures, he has an extensive knowledge of the supply chain and demand, management and scalability, and possible issues and solutions for any scale of cryptocurrency mining operations.

4.2. PARTNERS

BoardGames.BG, one of the top Bulgarian brick&mortar and online shops and gathering place for many of the players in the country. BoardGames.BG members will work on the Cryptum board games project and they are the core designers of our games;

HardwareBG.com, the company named after the oldest Bulgarian IT community was founded by the community core team, and they still manage the same forum board even today. HardwareBG LTD is the most experienced mining hardware supply and management company in Bulgaria, and has already developed few large projects. Because of the company extensive

4.3. ADDITIONAL TEAM MEMBERS AND CONTRIBUTORS



Tihomir is probably one of the most experienced board gamers in Bulgaria, and his work in BoardGames.BG contributed to his experience with a deep understanding of the players' needs. He's been the voice of reason and calmness in many heated discussions, and he often offers unexpected solutions. Being an avid gamer also helps him with beta testing and rules writing, and makes him integral part of the team.



Zachary is a gifted freelance designer, photographer and artist, but more importantly - he's a board gamer too, which makes him understand well the necessities in the layout design and the practical decision-making in the art direction. He has been a great support for us in times of need and now we are working with him on the board games general design and layout styling so we can bring you better-looking games with a top-notch design.



Alexandra has an unique position in the Cryptum Board Games project, as she still manages better to put herself in the shoes of players with less experience and her games preferences sometimes are very different than those of the the rest of us. With her years of experience in playing and selling games, she is able offer an advice to any level of player and cut through any knot of complicated ideas with a precision the rest of us somehow lack. experience in the field, the company will be responsible for the mining project management; Imperia Online Game Production Company

CRYPTO MINING BLOG AL MONTER: US. ENHANCE A MULLA D'OMERA LEMANTE OMPTO OMERICAE BOARDGAMES.BC hardwareBG:com Ho Bulgarian Darchware Sile

Crypto Mining Blog, one of the leading mining

news websites. We are partnering with CMB for the Blockchain board game and the Cryptumcoin development. Considering their extensive experience, and that we needed a helping hand that would lead both the Blockchain board game and the new cryptocurrency to greatness, the CMB was a great choice for us.

Imperia Online, one of the top game development companies in Bulgaria (and Central Europe as a whole) and a bearer of multiple prestigious awards, including from Forbes and European Business Awards. Imperia Online is a 160+ employees top-rated company serving 35 millions of players, and the company pledged support for our project with their software development staff and their artists.

5. ALLOCATION, MARKETING AND OTHER EXPENSES

Games marketing: As it was explained in section 2, board games marketing is fairly simple, and we are already familliar with the process, so any of the games releases will follow some basic steps in this direction:

- Kicstarter as a marketing tool
- Paid and free video reviews
- BoardGameGeek banners
- Facebook ads
- Manual press release distribution

ICO Marketing: Cryptum ICO marketing is not included as an additional budget in the allocation. We understand that marketing initiatives are crucial for the success of any ICO, but at the same time the huge marketing budgets needed for massive advertisement campaigns led to a form of contradiction, where some ICOs are judged as part of the so called "ICO Gold Rush", this also created a similar rush of creating paid marketing services for ICOs, mostly consisting of clearly overprices services com(considering the results).

In essence, this leads to a Paragraph 22 catch - an ICO has to raise much more funds in order to pay more for advertisement, in order to raise more funds. Where this would work for any ICO that has an overblown budget and manages to hide well the real cost of the service being funded, with board games and mining we cannot hide the expenses and they are clearly close what we are asking for.

The media madness went as far as requiring payment to even list the upcoming and ongoing ICOs in databases claiming to be the most extensive on the web; obviously any ICO project that didn't pay for listing wouldn't appear on such websites.

In addition, we were terrified to find that nearly all authors that promote ICOs do this only as part of marketing campaigns. This basically means that the authorities that people trust, and often give advices or ratings about ICOs have a clear tendency to favor campaigns including budget for paying such authorities.

We decided that we will not take part of this Gold Rush and we will not list or will limit the listing of Cryptum as much as possible on websites offering only paid services. We realize this leads to lower visibility of the project, but for a project that can start with literally few thousand USD, it's exceptionally hard to actually justify huge spendings on advertisement, and we already had a company investment of \$20 000.

At the other end of the spectrum, there are clearly promotional services that we left for later stages, after we secure investor interest, such as paid PR distribution services.

Allocation - we are allocating all but 2000 CRTM to the sale. There are no hidden, team, investor, pre-ICO or other CRTM allocated. We have 2000 CRTM split in 500 CRTM meant for bounties and 1500 CRTM for post-sale bonuses, both of wich are announced on our website.

6. ROADMAP

Because of the size of the extended roadmap and the problems achieving a meaningful representation of it on a regular document page, please refer to the graphical representation of the roadmap on our website: https://cryptum.co/cryptum-extended-roadmap/

7. COMPANY AND LEGAL STATUS

Cryptum ICO is not a subject of regulation in the country of operation. While parts of it, namely the promise of profits, may not be legal everywhere in the world, especially considering the appearance of regulatory practices, we are under Bulgarian jurisdiction and there are no specific regulation regarding ICOs. There are regulations about company operation and capitalization, and we are following the current practices in the country, so we will declare any profits and pay the respective corporate taxes, but we will not follow the ICO with full release of the funds in a fiat currency.

Cryptum board games project will be operated under the management of Inistrad Ltd, Sofia, Bulgaria, a company founded back in 2013. Additional background checks can be made at https://tr.bivol.bg/. Cryptum mining project would be under the management of one of our partners.

This clearly leaves Cryptum ICO in the gray area regarding the funds not exchanged for fiat currencies, essentially leaving all funds raised "in the limbo" until there is a transfer to a company bank account. It's our belief and understanding that this helps us lower the possibility of funds seizure, losses (especially unexpected losses due to currency conversion rates), excessive taxation, and offers us the protection of anonymity, extending the same protection to anyone taking part in the ICO.

Cryptucurrencies have no legal status of "currencies" and they are still regarded as a form of commodities. The current system of obsolete governmental forms aimed at regulatory-based taxation even prior of the appearance of profit is not sufficient for businesses operating with digital currencies as currencies and, at the same time, any step that would protect the funds we raise from excessive taxation and does not breach specific law, is legal, and by the EU laws it cannot be deemed illegal with a past date.

Such as this works, we will create Ethereum and Bitcoin wallets with funds that lie outside any jurisdiction until they are needed for company operations. Any payments of profits will be always made by new addresses without previous history, with funds generated by either mining or exchange of digital currencies. Any funds collection in a fiat currency will be made to our bank account in the form of legal result of trade.

CRYPTUM.CO