



JSECOIN

Whitepaper






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JSEcoin is a cryptocurrency mined by webmasters and built for everyone

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-  Visit the live platform at <https://platform.jsecoin.com>
-  View public accounts at <https://jsecoin.com/category/accounts/>
-  Keep up-to-date with the latest from JSEcoin <https://jsecoin.com/blog/>
-  Blockchain explorer at <https://blockchain.jsecoin.com>
-  GitHub Source Code <https://github.com/jsecoin>

Disclaimer

This whitepaper does not provide any type of legally binding contract. JSEcoin Limited does not accept any legal liability arising from the material contained in this whitepaper. Anyone looking to invest in cryptocurrency should seek professional advice regarding tax regulations and legislations in their local area. The material provided here represents our current plans for the cryptocurrency platform. The details may change (including ICO distribution plans) and should not be considered finalised. JSEcoin co-founders and employees do not offer investment advice under any circumstances. No entity is legally bound or contractually obligated by the transferring of JSEcoin tokens or fiat currency. Contributions from investors should be seen as that, a contribution towards the project.

JSEcoin Limited and all persons associated with the company are in no way arranging, dealing or advising on regulated financial investments.

JSEcoin is protected by the official UK Intellectual Property Office, the government body responsible for intellectual property (IP) rights including patents, designs, trademarks and copyright.

Full terms can be viewed at <https://jsecoin.com/terms/>

Vision

Our ambition is to create an energy efficient cryptocurrency mined by webmasters which is adopted globally by mainstream users.

All major cryptocurrencies currently rely on miners to carry out the cryptography hashing. Hashing is a mathematical equation that is carried out at large scale to secure a blockchain which is the underlying transaction database of a cryptocurrency. This process consumes huge amounts of computing power, server farms and electricity. Miners are rewarded for their efforts by the distribution of the currency.

It is possible to carry out SHA256 and other encryption in a standard web browser or on a mobile device. By embedding a javascript snippet on a website all visitors to the website could carry out the hashing encryption process, which when combined at scale **could replace the role of the miners**. Website owners would then be rewarded by the distribution of the currency. We have estimated 1 in 15 people either own or have access to a website which provides a large distribution and potential client base.

By using surplus CPU power, huge energy and cost savings could be made over traditional cryptocurrency networks.

Problems we are trying to solve



Traditional cryptocurrencies such as Bitcoin use an unsustainable amount of electrical power



Webmasters want new ways to monetize their sites without intrusive advertising



Cryptocurrency should be accessible and easy to use for everyone

Environment

Do you know what Morocco, Ireland and Sri Lanka all have in common? They all consume less electrical power than the Bitcoin network (29.05 TW/hr as of November 2017 [*](#)).

The electrical resources used for mining are increasing at an uncontrollable and unsustainable rate.

The higher Bitcoin's price climbs, the more incentive there is for industrial mining corporations to open new server farms where their only variable cost is electricity.

JSEcoin is different, it is mined using background resources within a web browser tab. The additional power consumption when the device is in use is miniscule. The CPU usage for our hashing algorithm is **less resource demanding than the loading of a video advertisement**. By using surplus CPU availability within the browser we can efficiently hash data at scale to secure the JSE blockchain.

In the future, all industries will need to move towards energy efficient technologies, including cryptocurrencies and fin-tech.



Webmasters

JSE cryptography is providing a new way for website owners to **monetize their content** as an alternative to displaying ads. This may be preferable for sites where space is at a premium or banner advertising is not appropriate. It could also be used in conjunction with existing traditional advertising methods as an additional revenue stream.

The code snippet is copied and pasted from the platform on to a publishers website(s).

JSEcoin is a 100% opt-in only platform. No mining is carried out without the end users consent. **Our project never has and never will partake in hidden background mining.**

The javascript is loaded as a post-page-load async process so it will not disrupt website performance and the user experience is not affected.

“Poor Quality” traffic which doesn’t earn ad revenue such as visitors from remote regions can also be monetized effectively for the first time. This provides a foot in the door opportunity to test the program with larger media companies.

1) Webmaster registers and copies a code snippet on to their website.



2) Website visitor carries out cryptography hashing in the background while browsing website.



3) Webmaster is awarded JSEcoin for helping secure the network.



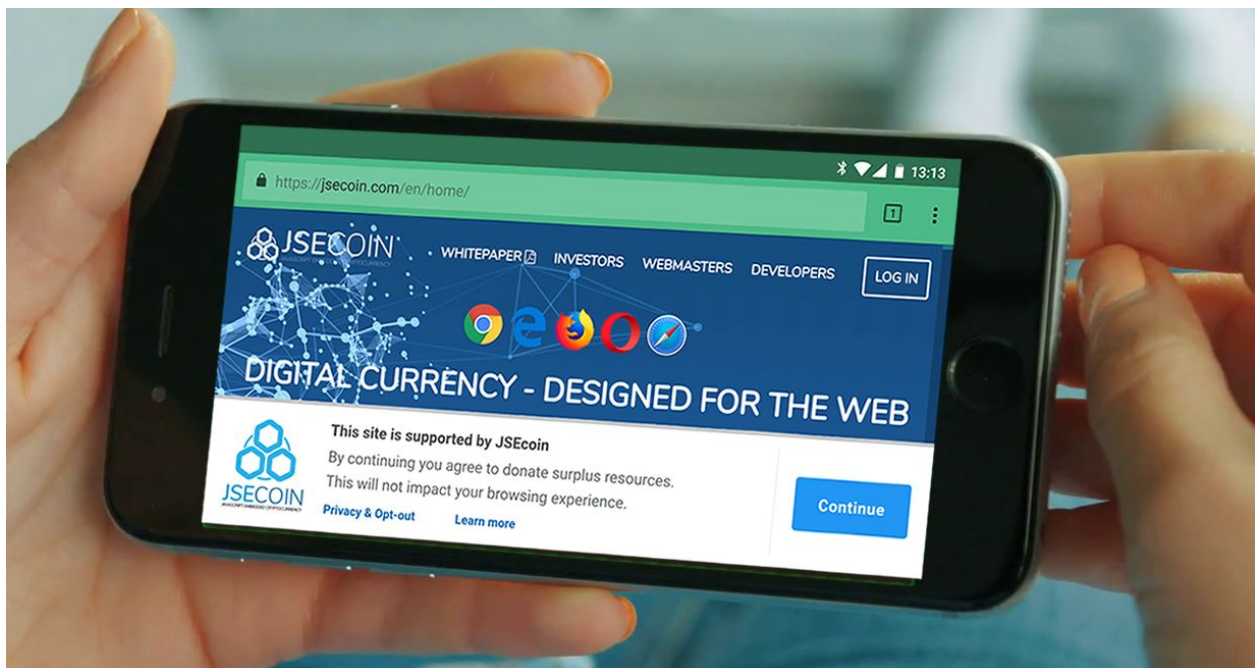
“As of June 2018 we have more than 18,000 websites setup with around 17 million opted-in miners”

Webmasters can earn additional revenue through the affiliate program and integrate cryptocurrency payments and subscriptions on their sites with the merchant tools.

Transparency

Transparency is paramount to our future success. JSEcoin has never carried out hidden background cryptocurrency mining. It is essential to inform users that the mathematical hashing process is running and the website is monetized via cryptography. For this reason we run an opt-in only mining system. A user must give consent before mining starts.

We do this much like the cookie declaration in Europe. A pop up message is displayed at the bottom of the web page before hashing starts.



We are the first and largest opt-in only browser mining platform

An additional benefit to displaying the privacy message is that it puts the JSEcoin logo in front of millions of unique visitors per day. This could help lead to exponential growth in the project.

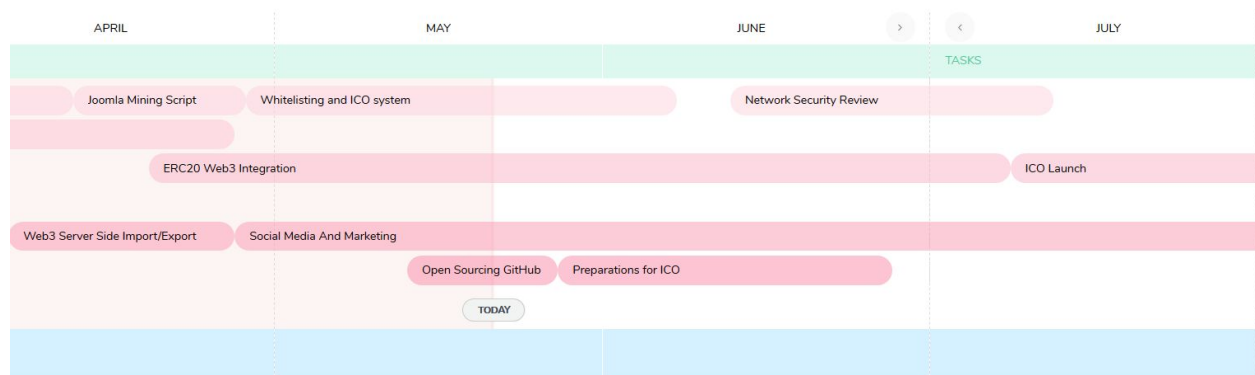
The code running on the users browser is not resource intensive in the same manner as traditional GPU and CPU mining programmes. The additional CPU usage and power consumption will be negligible because the code only consumes excess CPU power available to the browser.

The project is governed by a UK registered business and transparency is paramount to building trust with our users. This is why we publish monthly accounts on the website and uphold the highest ethical standards in everything we do.

Timeline

We are working towards an ICO and exchange listing in 2018. The ICO will open July 18th and we will assess which exchange to apply to immediately following the close.

For the latest detailed timeline please visit: <https://jsecoin.com/timeline>



* At this point JSE will have tangible value and should be able to take the majority share of website mining publishers due to the control and mining restrictions making it more profitable to web-mine JSE than Monero.

** Token price growth will be fueled mainly by investor speculation for the foreseeable future as is the case with all altcoins. We are counting on but not reliant on the crypto markets staying buoyant.

Coin Distribution & ICO

Current Distribution - 200 million as of April 2018

Current circulation can be found on the JSEcoin.com homepage.

Publisher Daily Distribution: 288,000 max / daily

Self-miner Daily Distribution: 144,000 max / daily

Max. Final Hard Cap: 10,000,000,000 (10 billion)

This is a hard cap, there will never be more than 10 billion JSE tokens created.

Max. ICO Distribution: 5,000,000,000 (5 billion)

The ICO will start at 12:00 UTC July 11th 2018. We will be using the industry standard ERC20 token smart contract. Whitelisting is now available at <https://jsecoin.com/whitelisting>

Founders/Advisors/Team Remuneration

500,000,000 max - 5% - (4% between shareholders, 1% advisors)

This is considerably lower than the vast majority of other ICO's and shows our team's commitment to the long-term success of the project.

Remaining tokens

Post ICO 10 Year Deflationary Distribution

Remaining tokens after the ICO will be made available to the distribution account on a declining ten year plan. These will be used to fund mining, referrals, bug bounties etc. This will provide us with a ten year runway to create a profitable governing organisation.

Year 1	50.05%
Year 2	25.03%
Year 3	12.51%
Year 4	6.26%
Year 5	3.13%
Year 6	1.56%
Year 7	0.78%
Year 8	0.39%
Year 9	0.20%
Year 10	0.10%
Year 11+	0%

A contractual agreement will be in place preventing the sale of tokens on exchange for a minimum of 6 months from the listing date for co-founders.

Product

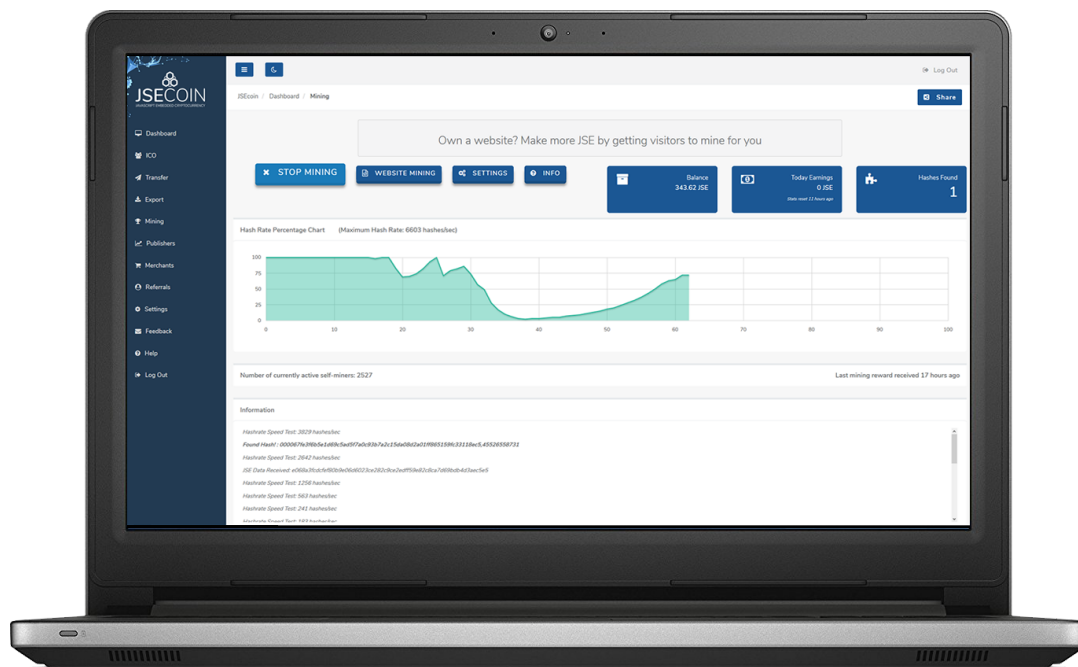
Consumer Focus

The cryptocurrencies that achieve long-term success will be ones focused around the users.

Fee free fast transfers - utilizing ECDSA signatures, fixed block cycles and a summarized account ledger we have been able to get the transaction block time down to 30 seconds.

Self-Mining - To make cryptocurrency fun, any user can log into their control panel and click the start mining button. Their browser will then be left to mine tokens in the background. A dedicated mining pool means anyone with a web connection can go online and earn their fair share of the digital currency. This pushes the platform past just being for webmasters and app developers.

Mainstream Focused - The user interface for the platform and apps are intuitively designed for non-technical users. Someone with no previous experience of cryptocurrency should be able to setup an account and purchase, send, mine JSEcoin.



Setup an account at <https://platform.jsecoin.com>

Future Use Cases

Our primary ambition and end goal is to create a cryptocurrency that is adopted globally by a mainstream audience. Our best chance of getting to that stage is to produce a platform that is focused on the needs of webmasters and use that leverage to reach a wider audience.

Alongside the mining we have released merchant tools that allow webmasters to use JSEcoin for taking digital payments via their websites.

- Shopping carts
- Pay buttons
- SaaS subscriptions
- Digital downloads
- Digital marketing
- Software sales
- Website membership subscriptions

Anything purchased through a website should be available to pay with cryptocurrency - JSEcoin could lead the way in making this possible and simple for webmasters.

To **create demand on exchanges** we plan to offer an advertising service where JSEcoin is the currency used to trade digital ad space. This was our original idea for the platform before we realized how much mainstream demand there was for a cryptocurrency platform.

We currently have a large publisher base that has already opted-in to display advertising if it were to become available. The code snippet is in place on sites so nothing further would be required from the webmasters.

The advertising space could be sold to digital media buyers in JSE creating additional demand for JSE tokens on the exchanges.

Enterprise solutions leveraging subchains will enable us to build partnerships and long-term revenue streams: <https://jsecoin.com/downloads/JSEcoinEnterpriseSolutions.pdf>

After we list on exchange we will be the only browser based mining platform available to publishers that operates their own blockchain. This will enable us to dominate this industry sector as every current competitor is reliant on hidden background Monero mining.

JSEcoin has the unique opportunity to gain a first mover advantage in the most exciting spaces in blockchain technology.

Technology

The code snippet that website owners can install is an embedded external javascript file similar to common codes used for website analytics and advertising. Wordpress and Joomla plugins are also now available, which makes it really easy to install JSEcoin on a website.

The javascript code loads at a set time after the page has finished loading preventing any performance delay and SEO page speed penalties. The public block data is sent to the website users browser and will be processed while they are reading the page, the most accurate hashes sent back to the server. The server will collect all the hashes, compare, check, select the best and use this to secure the blockchain.

As soon as a website visitor leaves a publisher's site, the code stops immediately. Nothing is downloaded onto the visitors PC or run after the visit to the website.

In our speed tests the crypto.subtle browser API performed very well. Hash rates exceeded 30,000 hp/s in a single browser, while this is not comparable to ASIC hardware it is more than sufficient for what we need. Further increases could be made possible using custom WASM modules in the future. SHA256 is used as the main hashing algorithm. Elliptical curve secp256k1 cryptography is used for signing and verification.

A transaction via the platform is signed in the browser and then sent to the servers for verification. It is also possible to carry out transactions and other functions via the API.

API documentation is available on our developer portal at <https://developer.jsecoin.com>

Server-side code is written in Node.js meaning all code for the entire system is javascript.

The system is currently centralized with all nodes being operated by JSEcoin Limited and hosted on the Google Cloud Network. It is possible to download and compile a node from the source at github but we are currently using ECDSA signatures to check for authorized nodes when reaching consensus.

We have a unique opportunity in the project that already there are more than 10,000 active mining connections at any one time. As awareness and volumes grow to a point where a 51% attack becomes infeasible we could potentially leverage browsers to create a consensus based decentralized network with one voter per IP subnet.

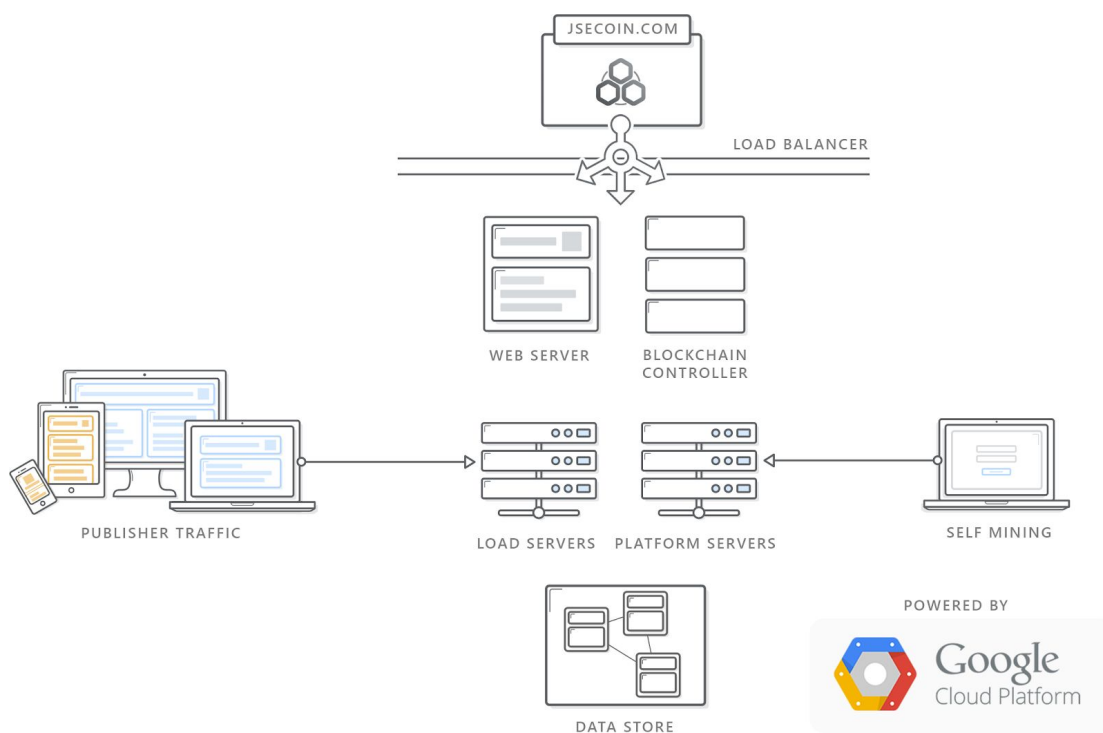
High volume load servers on the publisher side have been separated from the platform behind a load balancer.

The user platform integrates with the JSE network as a client providing a simple point of entry for everyday users.

A blockchain controller is installed to carry out maintenance and do essential tasks to the blockchain, such as carrying out backups, selecting hashes and completing data and verification checks. This is only accessible from the internal network and does not have a web interface.

The web server runs the website at jsecoin.com and also a blockchain explorer which is available at <https://blockchain.jsecoin.com>

Network Diagram



The current system introduced in April 2018 has been tested at high volumes and we expect it to scale well in the future as the user base grows.

For the ICO we will be integrating an ERC20 Ethereum smart contract. This will enable deposits and withdrawals between the JSE platform and the ERC20 token. The benefit of this is it opens up an entire industry of 3rd party applications and developments. You will be able to hold tokens in 3rd party wallets such as MyEtherWallet and Metamask. Exchange integration will be smoother and more efficient as the majority of listings will already be with ERC20 based tokens. ERC20 compatible hardware wallets make offline storage possible.

The code base is open-sourced and available via GitHub at: <https://github.com/jsecoin>

Investors

ICO will open on July 11th 2018

5 billion tokens will be made available and released via an ERC20 smart contract. The ICO will close as soon as the tokens are allocated or after 92 days if the cap is not reached.

Investors should get whitelisted as early as possible if they are considering investing in the ICO:

<https://jsecoin.com/whitelisting>

Exchange listing will take place once the ICO is closed, at this time investors will be able to trade their JSE tokens at open market value on 3rd party exchanges.

Information from the FCA on Cryptocurrency Investments and ICO's
<https://www.fca.org.uk/news/statements/initial-coin-offerings>

What are the investment risks?

- **Unregulated space:** Most ICOs are not regulated by the FCA and many are based overseas.
- **No investor protection:** You are extremely unlikely to have access to UK regulatory protections like the Financial Services Compensation Scheme or the Financial Ombudsman Service.
- **Price volatility:** Like cryptocurrencies in general, the value of a token may be extremely volatile – vulnerable to dramatic changes.
- **Potential for fraud:** Some issuers might not have the intention to use the funds raised in the way set out when the project was marketed.
- **Inadequate documentation:** Instead of a regulated prospectus, ICOs usually only provide a 'white paper'. An ICO white paper might be unbalanced, incomplete or misleading. A sophisticated technical understanding is needed to fully understand the tokens' characteristics and risks.
- **Early stage projects:** Typically ICO projects are in a very early stage of development and their business models are experimental. There is a good chance of losing your whole stake.

Investments totalling more than \$10,000 need to be verified in order to comply with the KYC regulations:

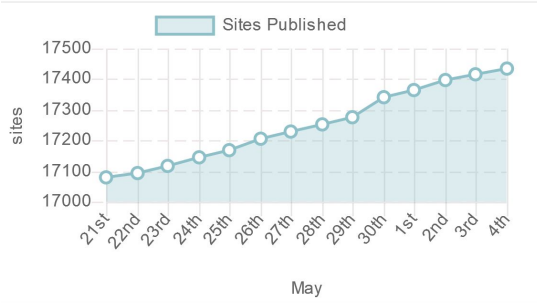
<https://jsecoin.com/kyc-policy/>

Traction

Since we opened the platform up to the public on the 15th August 2017 the adoption and feedback from the community has been incredible.

Stats From May 2018 - Live stats available at: <https://blockchain.jsecoin.com>

Registered Sites



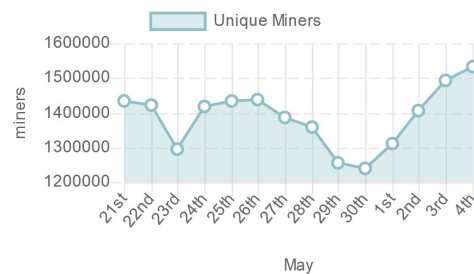
The JSEcoin mining code is being set up on new sites every day.

This is while the token has no exchangeable value and no marketing spend since 2017.

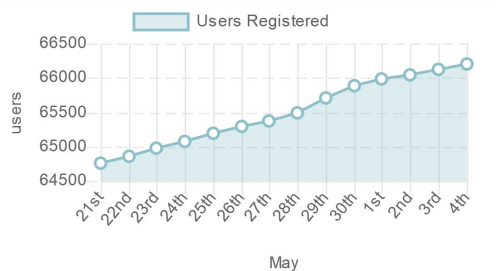
This creates organic growth in the number of unique impressions per day.

Uniques now exceed 1.5 million views a day to our opt-in banner, providing brand awareness and familiarity.

Daily Uniques



Registered Users



Registered platform miners are also growing organically at a current rate of around 100 new users a day.

From word of mouth and referrals

Market Overview

Cryptocurrencies are at a turning point in 2018 with popular consumer based trading platforms such as Coinbase making it easier for investors to purchase cryptocurrency.

The two largest cryptocurrencies Bitcoin and Ethereum have gone up 895% and 2896% respectively in the last 12 months. The appetite for an alternative to government backed currency is increasing and investors are speculating.

With national debt spiralling out of control our belief is that hyper-inflation is now a possibility. The stock-markets are at all time highs and due a crash by historical statistics. If these two factors happen together a lot of funds are going to be moved in to the cryptocurrency space. Bitcoin has the first mover advantage and Ethereum has a superb smart contract platform which has become the standard for altcoin ICO's.

There is still a dark shadow hanging over cryptocurrency though. Most consumers still associate Bitcoin with the news and press releases related to the closure of the silk road darkweb site and illegal trading of goods. The US government has taken somewhat of a stance against cryptocurrencies on the grounds that it could be used for money laundering and to fund terrorism. The Chinese government have recently set out to restrict exchanges. Legislation, regulation and taxation are still all lagging behind the development and adoption of digital currency which makes governments nervous along with the negative threat to their own currencies.

Investment in the cryptocurrency markets are now in excess of 100 billion USD. This is money that hasn't been invested in Wall Street & The LSE. It seems unlikely that governments and banks will stand by as money is drained from the stocks and bonds markets and placed into cryptocurrency.

In our opinion no one has successfully made a cryptocurrency system that is built around consumers. Most of the current developments are built on top of an existing blockchain technology and compromises are made when it comes to ease of use.

JSEcoin was built, first and foremost, as a consumer platform. We developed a system that we believe is how cryptocurrencies should operate in the future. The result is an intuitive, simple and user friendly system for transferring and storing digital funds.

If executed well, the JSEcoin project has a chance to become the world's first mainstream cryptocurrency.

Marketing

Marketing and PR are key to generating enough interest in the cryptocurrency to create market liquidity and create a real store of value.

Initially there would be four key demographics

Demographic	Description	Start Period
Webmasters	Required to carry out hashing and generate referrals to create a strong initial user base.	September 2017
Cryptocurrency Investors	Required to trade and invest in the currency raising funding at ICO and	November 2017
Strategic Partners	Cryptocurrency exchanges, press partners, tech bloggers	Pre-ICO 2018
General Public	Required to create buzz and eventually become a leading mainstream cryptocurrency	Post-ICO 2019

Our **team specializes in ad-tech** and online marketing can be carried out in-house.

Marketing before and during the ICO will be targeted and designed to draw attention to the project from investors. Post-ICO we will shift focus towards larger publishers and partnerships as well as having a dedicated marketing budget for bringing on new individual users.

The affiliate/referral program we have as part of the platform has proved a huge success and incentivises users to spread the word about JSEcoin.

Social sites to stay in touch:

- <https://twitter.com/jsecoin>
- <https://facebook.com/officialjsecoin/>
- <https://www.youtube.com/channel/UCHtlF9KggJn9TDzr8pRYsYA>
- https://www.reddit.com/r/JSEcoin_Official/
- <https://jsecoin.com/forums/>
- <https://t.me/jsetelegram>
- <https://discord.gg/3gBZsA4>

The Company

JSEcoin Ltd is a UK registered business, company number: 10940920

We publish monthly accounts on our websites at <https://jsecoin.com/category/accounts/>

Our accounts will be audited annually by an accredited independent UK accountancy company.

Core Team Members



James Bachini
CEO

Previously started two successful ad-tech startups, building them to multi-million pound businesses.



John Sim
CTO

Presents regularly on development, innovation, UX and cloud architectures at key global tech conferences.



David Mallett
COO

Technical support and social channels where he provides technical knowledge, patience and assistance to our users.



Tracey Howard
CFO

MAAT accredited accountant. 20 years experience in the financial management and accountancy.



Amr Gawish
Blockchain Developer

Lead developer on the ERC20 contract and web3 integration for the ICO and exchange integration



Matthew Vallis
CSO

CAIA charter holder with 10 years experience across the finance industry.



SWOT Analysis

<p>Strengths</p> <ul style="list-style-type: none"> • Live platform ready to scale • First opt-in web based mining platform • Never partaken in hidden browser mining • Structured UK Business • Teams ad-tech, data management and financial experience 	<p>Weaknesses</p> <ul style="list-style-type: none"> • UK business environment difficult for cryptocurrency startups • Hybrid network and governing company not truly decentralized • Negative preconceptions about cryptocurrency mining
<p>Opportunities</p> <ul style="list-style-type: none"> • Energy efficient mining will become increasingly important as markets rise • Cryptocurrency on verge of mainstream adoption • Strong demand for the technology from webmasters • Sub Chain Enterprise Solutions • Advertising Exchange 	<p>Threats</p> <ul style="list-style-type: none"> • Antivirus and ad blocking companies targeting browser based mining • Competitors unethical hidden mining hurting JSEcoin reputation and public relations • Cryptocurrency legislation and regulation • Hackers targeting cryptocurrency networks • Tackling fraud is a constant challenge

Next Steps

Potential investors should get whitelisted as early as possible at <https://jsecoin.com/whitelisting>

The platform is live and open to the public. While we still consider it to be in beta the ledger will be carried forwards on all future updates.

If you have taken the time to read this entire whitepaper then please spend the next five minutes trying out the platform. You can test the mining inside your own web browser, try making a transfer and see for yourself what we are building.

Setup your account at

<https://platform.jsecoin.com>

