

# A Fair Decentralized Social Media Token Ecosystem for Sharing Content, Control, and Currency.

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<https://arro.io>

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## Abstract

Social media was meant to be a sharing platform where individuals could share their interests, goals, and desires to help form a community around their favorite activities, events, and pastimes. This would have been best accomplished by a decentralized network without any central points of failure or control. However, certain market forces of the traditional social media platform and advertising companies resulted in a dependency on centralized frameworks and infrastructure. Further, the economic incentives of today's social media resulted in an oligopoly, where a few large companies (Facebook, LinkedIn, Google, etc.) have ended up with the most end-user data in centralized data silos. These centralized data stores are enticing targets for attackers and have frequent data breaches, as was the case with the data gathering of Cambridge Analytica [1] and Facebook's own admittance to loss of data [2]. Arro.io is an open-source effort to give back the content to whom it naturally belongs, you the creators. We want to decentralize the ownership and control of the data, and re-distribute the cash that has been hoarded by the single-point control methods. Arro.io will create a micro economy around each user and incentivize miners to keep our platform safe and secure.

## 1 Introduction

The problem is that large social networks are taking our data, which is rightfully ours, and making huge amounts of money profiting from our efforts, but we have signed our rights away. We need a new way to share our thoughts and desires. It took less than 10 years for money to corrupt well intentioned companies, but they had us sign up to give our content away, for which we actually had protected rights under most world governments. Yet, we have given our rights away for nothing. They have violated our trust and made profits from our hard labor. Arro believes that Gary Vee [3] is right, that we should give away our content to promote our brands, but we should not give away our rights and our profit potential by doing so. Wozniak's [4] comments about Facebook taking our data and making money without selling a product are correct. Arro will give the power back to the content creator. Power to the people, Money to the people, Promotion to the people.

Where does the profit of the current "free" social networks come from? Simple Answer; Advertising. Advertising is a process that was developed during the era of radio. It evolved into the era of television. It's tentacles have extended into technical advancements of social media as well. Now we are not saying all advertising is bad, but if the only folks that are profiting from ads are the centralized control mongers, then they are just a version of the previous advertising methods. We need an evolution of advertising, not just a method to pay the controlling organization more money. They receive this money and just turn a blind eye to their customers reciting, "It's just business". Let's put the power of promotion to work for the

content creators and users. Companies should pay you for your time because they take time away from the things you love to do. They should pay you for your data that you have generated. The promotional process of Arro.io will reward you, the content creator and user. It takes a newly designed system, that operates smoothly around all the other parts to function in the best way to benefit its content creators and users.. It cannot be a tacked-on adaptive function that only serves to provide a one-way cash feed to manipulative companies. Arro.io will harness this influential energy and will funnel this money back to you where it belongs. From Arro.io, you, the content creator, will be compensated for your data creation, time spent on your experiences, and sharing content.

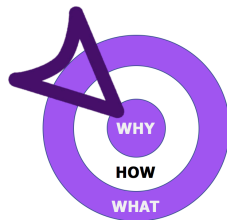
How will Arro solve this problem?

1. You will own your content and make any funds from that content.
2. You can earn tokens for sharing by watching advertisements that peek your interest. Or you can select to skip commercials. The choice is yours.
3. You are in control. You decide what you want to do, what you want to watch, and how you earn your tokens. We do not have a high-level bot optimizing your feed to sell you more stuff.

At Arro Social our main focus is the content creator: It's your time, It's your content, It's your money

We focus on: Building Community, then sharing, then earning crypto

Why Arro:



Why is Arro doing this and why do you want to be a part of it?

### **These are the Core Values we live by:**

F-reedom  
A-uthenticity  
I-ntegrity  
R-obinhood Like

**(FAIR™)**

**(FAIR SHARE™)**

### **The Code of Honor we stand by:**

S-implicity  
H-umility  
A-ccountability  
R-eliability  
E-mpowerment

**(SHARE™)**

**Our Passion:** “fairness and equal opportunity”

**Why is Arro doing this:** “to right the wrongs of current social media platforms”

**Our Purpose:** “empowering others through valuable human interactions”

At Arro.io we believe:

1. Your time is valuable because time is money
2. You own your content
3. Everyone has the same opportunity
4. It’s a new way of advertising. You share in the money by viewing advertisements
5. You control where your money goes, not someone else or an algorithm.
6. We have solid and secure blockchain technology

For advertisers we promise,

1. You know who views your video.
2. You have coded protection against spamming by your competition
3. You can even set 1 view fee per day per viewer.

Here are a few scenarios that might help explain how you can control Arro, for your best interest,

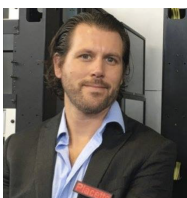
**Potential user scenarios:**

This is Sarah:



Sarah, has been on Arro for months, she is 45, has a husband, and works as a programmer. She has been sharing posts of lunch, swim meets with the family, and basketball of her son. She is going to the coffee shop and has enough Arro to pay for the Grande Carmel Latte.

This is George,



George is 50 years old and has been bragging about the Chiefs game coming up and taunting his friends on Arro Social all week. When the Chiefs win, he has enough Arro to celebrate by buying a round for his friends and him.

This is Sam,



Sam is a college student working a part-time job to help with the bills. He has been connecting with his friends and has built up enough Arro to take his girlfriend out on a date.

With other Social Networks:

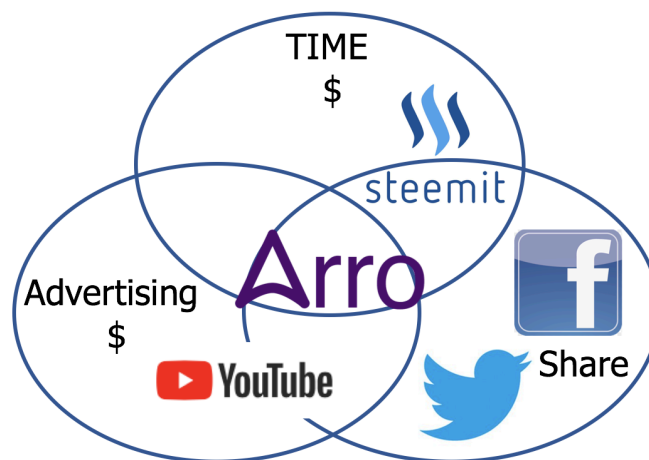
1. They own your content
2. They collect and sell your data
3. Their service is not secure
4. They steer you where they want you to go

With Arro:

1. Users own their content
2. Users control their data
3. Our service is secure
4. Users steer themselves

## 2 Product Description

Let's talk about "HOW" we are going to do this and "WHAT" are the development goals of the project. Arro Social wants to create a social media platform where for the user, Time = Money, Share = Growth, and Advertising = Profits. The goal is to make money for the users of the platform. As far as the competition, Arro Social wants to be in the sweet spot represented by this diagram of paying users for their time, sharing, and promotional interruption.



Arro Social will have to charge fees, but we will form a micro economy around each content creator so that content creators can earn money from several sources. The most important part of the equation is that the network has to have a revenue model.

These concepts are discussed in "Who Owns the Future," by Jaron Lanier [5]. In his book, he explains that the control of data should be owned by the creator of the data and they should be paid for their content. As we'll see below, blockchain is the best way to track this and determine who should make the money from that data; of course, the creator of that data. We will follow the principles in this book to guide us in the fairest and best way to evolve this project.



We will have a similar look and feel to other standard social network sites, but have the advantage of focusing on the ownership and profits of the users.

1. The team will create a blockchain technology that tracks, shares, and allocates tokens. We call the blockchain “Arro”. It will start with the value of video views that has been established by YouTube at \$2 per 1000 views.
2. The team wants to decentralize the control of the content and data for each user. Everyone should own their own content they create. Our blockchain will define who the influencer is that put the content on the Arro network first. If there is a dispute, we can go back to the blockchain (and also the internet) and establish the original creator. Of course, the users/influencers will get paid for their content that they developed.
3. The team is focusing on sharing. Each user/creator will have an account that they can utilize as their own. Users can view their favorite content and share it directly with friends. Users will earn tokens from an advertiser pool, for the promotional videos that are presented in their personal feed and earn tokens from that pool which is divided fairly among all active users that day. This is the revenue model for the user that sets Arro apart from other blockchains. In the future, users could also receive shared tokens from the validating miners that are mandated to share half of the coins they receive.
4. The team has a goal to turn advertising and promotions in the favor of the users/influencers. It is your time on the network and you should be paid for the interruption of the videos and content you want to view. The decentralized nature of the platform pays for some of the expense of the platform and the savings will be passed on to users and influencers. Advertisers have been influencing us since the creation of radio. Transitioning to television and also to social media. Advertising has been a copy-cat, bolt on function to a product that we want. It’s time to focus on the desires of the user, influencers, and consumers. We want great content and we want to spend time doing the things we love. Since time is money, any interruption to the time that we enjoy, should be compensated for our inconvenience. This is where we differ from other social platforms. This is the revenue side of the equation. We cannot ignore advertising. It creeps into most of the messages we read. We should harness ads for the benefit of the users and influencers. That being said, if you don’t want to see advertisements, we respect that, and we will allow you to block them, if you so choose.

### 3. Blockchain Development

Our blockchain's architecture will be used as a secure base layer to provide consensus on the token allocation. This gives global consensus on the state of digital assets like social media views. Our crypto called Arro, is currently an ERC 20 token on the Ethereum Blockchain. We will use this technology along with infura.io until we can develop our own blockchain that can support the transaction speeds we need to track social interactions. In the future, Arro will follow the Delegated Proof of Stake (DPOS) principals for blockchain development. We expect to have 101 miners. Like the knights of the round table (or Jedi Council) our blockchain will have a council to validate the blocks, and our miners will be called "councilors".

#### **Why DPOS:**

Because of the nature of social networks requiring millions of posts and comments, each post requires a transaction on the Blockchain. Transactions directly on Blockchains like Ethereum would cost a fortune. Arro needs a separate blockchain to save on the staggering cost. The other function of financing that Arro needs is the ability to make revenue for users. To make a revenue in blockchain, the crypto needs a smart contract. That narrows down the field of available blockchain technologies. Mobius is an option, but smart contracts can be complicated. Because of the complexity, you need a tech team that can navigate through the complications of the code. Our team is working with a development group of experienced coders using the DPOS technology and we are working directly with DPOS delegates who are familiar with the intricacies of the code. With the new developments in DPOS expected this fall and the timing of our needed code development and speed of transactions, DPOS will be the best option for inexpensive transactions and understanding of complex code. We will start with an ERC 20, but migrate to the DPOS platform, when the blockchain is proven and available.

- **Blocks:** Blocks will be formed to exchange groups of tokens. The goal of the crypto blockchain is to provide similar and affordable mining without spending thousands for a rig. We plan to use DPOS or similar approach to how Lisk works [6]. DPOS works by establishing a consensus among the nodes that store the encoded data in the blocks. The validated consensus is used to track the user's crypto assets. As a term, 'consensus' means that the nodes on the network agree on the same state of a blockchain, in a sense making it a self-auditing ecosystem. This is an absolutely crucial aspect of the technology, carrying out two key functions. Firstly, consensus protocols allow a blockchain to be updated, while ensuring that every block in the chain is true as well as keeping participants incentivized. Secondly, it prevents any single entity from controlling or derailing the whole blockchain system. The aim of consensus rules is to guarantee a single chain is used and followed. The reason we are considering DPOS is because it is conceptually simpler and more energy efficient than other models, such as Bitcoin.

- **Tokens:** The protocol token will be upgraded from mere currency. The token will be for the standard earning capability. The earning function will operate like other crypto currencies for trade and earning profits on your created content. With the token, users can create and promote their advertisements.

Miners and users will receive the token. This introduces a new incentive mechanism for the growth of the ecosystem as well as establishes and maintains the economic stakeholders of the network.

- **Mining:** The protocol introduces a DPOS mining system. The miners will be called councilors. The mining system has three components: (a) a proof-of-sharing mining mechanism to incentivize people to participate in building the most shared blockchain, (b) an award mining mechanism to incentivize developers to build apps during the initial years, and (c) a web-of-trust sharing mechanism to incentivize users to participate in an ecosystem of decentralized social media networks.

The councilors will receive rewards for validating the exchange of the crypto. They will receive 5X rewards the first year with a declining incentive from 5X first year, 4X second year, 3X third year, 2X fourth year and continued validation reward (1X) for the life of the mining balance.

Allocations within the Arro.io platform will be minimal, (.001%) since many allocations will be small. Outside transactions will have a small fee based on the cost incurred to Arro.io expected around 5% or whatever the selected coin exchange. Details will follow in a separate tokenomics paper.

Arro.io's tech team is planning to establish its own internal crypto since the cost of exchanging small amounts of crypto are high. The initial base crypto will be planned for an ERC 20 smart contract and will migrate to a DPOS protocol when DPOS meets the required transaction speed and global regulations. We will release an extended paper on the explanation of the crypto algorithm at the end of May 2019.

## 3.1 Mining Incentives

Councilors (miners) are needed for the success of Arro.io, they are necessary members of our community. We will start as an ERC 20 token, but migrate to a separate new DPOS protocol. There are 3 ways that our councilors can make money. The third way also is a way for all users to make money.

### 3.1.1 Proof-of-Sharing Mining

Sharing is vital to Arro.io's development design. Miners will receive a portion of their reward as a crypto that must be shared. Sharing is not a natural born response in humans; it has to be learned. Since this is the case, we at Arro.io want to enforce this behavior in our project. Miners will receive other direct awards, but this part of the coin must be given to others or used for promotion within the Arro.io platform.

### 3.1.2 Award Mining

Miners are the future intricate part of Arro.io. They will validate the crypto and provide development input and product direction. Since they are the key to the success of Arro.io, they should be compensated for their efforts. Miners will receive a portion of their reward as a crypto for their efforts and continued support.

### 3.1.3 Web-of-Sharing Mining

Every user receives a portion of Arro. This signifies how important the user's time is. There will be a percentage of miners defined to share crypto with all users. We have

initially set the value at 5% of the ICO (initial coin offering), which is 10% of the miners or 10 of them. You, as the user, are the most important part of Arro.io and we want to show you that.

## 3.2 Decentralized Governance

Governance of this crypto and the projects that will be completed in the future will be by a 101 user council. 101 users will be selected to vote on the direction of Arro.

Point of Reference:

From discussions with a member of the Ethereum Foundation and based on a pre-meeting of the governance talk at the 2018 Ethereum Conference, there is concern how to govern the direction of crypto currencies similar to Ethereum. The Ethereum blockchain is proposing to go to a Proof of Stake method. This will be similar to Lisk and DPOS crypto protocols. Lisk is a fast network and can handle many transactions but does not have a sidechain software developers kit (SKD) available yet.

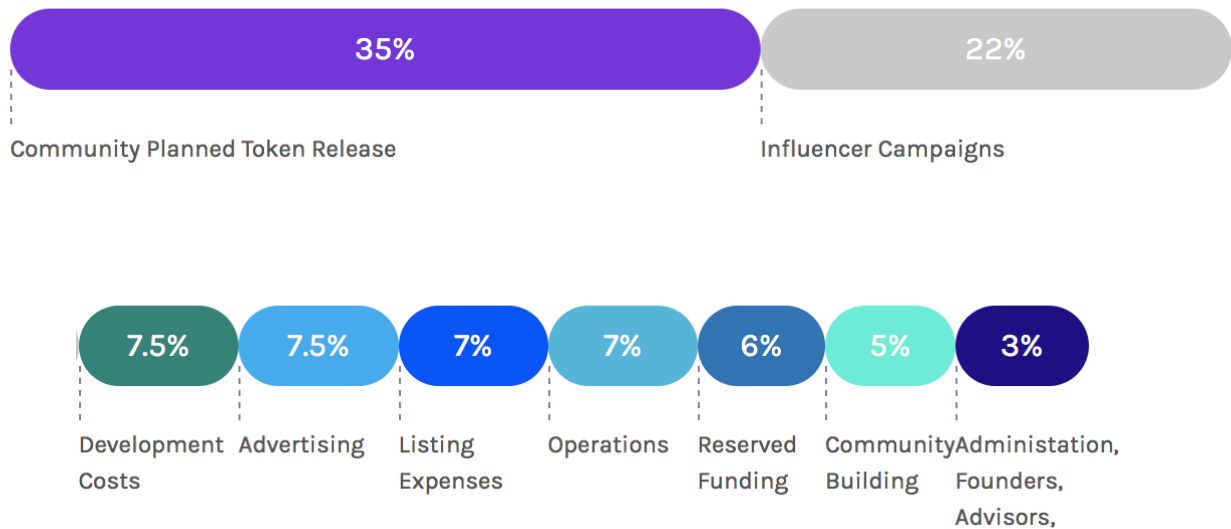
Our council will follow rules that are defined by the code that our developers will write. These Rules include:

1. No council member should be the same person or entity.
2. For major blockchain changes or forking would be 60% or higher vote.
3. Decisions for budget and future project selection will be a 51% or higher vote.

## 3.3 Tokenization

Arro.io will establish a token for defining the value of ARRO. Arro will create 60,000,000,000 tokens. That is all the tokens that will be created as an ERC 20 token. The crypto will be distributed in the following amounts.

35% to pre-sale and community planned release and 65% to company expenses as defined in the graph below.



\*3% of the total crypto is estimated to be allocated to investors/officers based on evaluation of company value upon the possible release of coins in the officer or community approved exchange release.

Earned crypto is yours to keep. In the future miners will receive their reward when they validate a block estimated at around every 30 seconds

For Token Holders Arro Promises that:

- 1 Arro will lock the management tokens in for a year and not sell.
- 2 Our liquidation sales plan will be no greater than 20% a year for management tokens.
- 3 Our Pledging System will have a Soft-cap goal of \$500k and Hard-cap of \$21 Million.
- 4 Tokens will be frozen for 5 years if the hard cap is not reached or not sold in the IEO or ICO.
- 5 We will use a DPOS - Delegated Proof of Stake protocol in the future
- 6 101 delegates voted by users to validate the Arro blockchain in the future
- 7 Arro delegates have coded mandates to share 50% of their blockchain fees.
- 8 Arro.io will not own any delegate nodes.
- 9 There will be a diminishing vote over 6 months (therefore the delegates must earn vote)
- 10 Delegates cannot vote for each other.
- 11 There will be dynamic fees based upon the event transactions.

## 4 The Team



### **Phil Simpkins**

CEO - Co-Founder

<https://www.linkedin.com/in/psimpkins1/>

Serial entrepreneur with a project management and operations background.



### **Chris Brown**

CTO <https://www.linkedin.com/in/cibolo-brown/>

Technologist with coding expertise working at Rackspace and a founder at FloatMe.



### **Jeffery Gardner**

Chief Financial Analyst

<https://www.linkedin.com/in/jeffrey-gardner-81b38029/>

Securities and investment advisory for 10 years



### **Bob Anglin**

Chief Production Officer

<https://www.linkedin.com/in/robert-anglin-04200a44/>

Bob is a Professional Multi Media Artist, Speaker, and Coach. He has 30 years experience in the dramatic and visual arts, and over 23 years as a professional educator.



### **Lev Burov**

Co-Founder - Director of Technology

<https://www.linkedin.com/in/levburov/>

Technologist with a track record developing scalable mobile and web apps.



### **Derrick Brown**

Co-Founder - Head of Sales

<https://www.linkedin.com/in/derrickbrownoppeos/>

Marketing and Sales professional with influencer and social media experience.

## Advisors



### **Evan Gray**

Director of Crypto Tech  
Principle Solutions Engineer at Elevate Systems  
and Rackspace Developer



### **Oliver Garcia**

Principle Solutions Engineer at Elevate Systems  
and Past IT Director of Software Development at  
Pressable

## 5 Timeline and Project Evolution

Due to previous work developed by this team on [www.carcalmly.com](http://www.carcalmly.com) we are projecting the following timeline.

2024 Q1 Inclusion of Marketplace in the Social Media app

2024 Q3 Inclusion of Live Steaming in the Social Medial app

The development of the technology will initiate when the software partners receive funding. Arro Technologies is in negotiations with investors at this time. Technology is expected to be integrated within the social network by the end of Q4 2023 but there are no guarantees.



## 6 Conclusion

Social media has been around for over 16 years. It took a short time for it to adopt the standard operating practices of big business and form ivory towers of advertising and control mechanisms from older technology. It is time for us to own our content. Arro Social shares the money received from advertisers with the content creators and users. We are harnessing the influence of promotion to focus on the users, and establish the sharing process to bring money to the users; where it should have been in the first place. Arro.io has developed a token that tracks your content and pays you for your time and gives you money which is rightfully yours. Join the community that is bringing Robin Hood's spirit of giving to life.

## Acknowledgements

The people acknowledged in this section do not endorse the Arro token or the token sale, and do not recommend any purchase of the tokens or any related instruments, such as a simple agreement for future tokens or an interest in a fund sponsored by Arro Social and its affiliates.

We'd like to thank Nick Longo for being mentors and maybe telling us not to proceed, thus grounding us in the right reasons to proceed; Marie Guajardo for her boundless energy and market validation; Drue Placette and Dale Bracey for helpful entrepreneurial advice; Matt Guiver – [www.jumpstoneinternational.com](http://www.jumpstoneinternational.com) for his innovative ideas and product creation; Javier Guerra and Christian Dibrelli for their feedback on early drafts, helpful suggestions, or contributions to ideas presented in this paper.

## References

- [1] Cambridge Analytica, *"Facebook and Cambridge Analytica: What You Need to Know as Fallout Widens,"* March 18 2018, NY Times:  
<https://www.nytimes.com/2018/03/19/technology/facebook-cambridge-analytica-explained.html>.
- [2] Facebook Breachs, "Facebook: 'Malicious actors' used its tools to discover identities and collect data on a massive global scale," April 4 2018. The Washington Post,  
[https://www.washingtonpost.com/news/the-switch/wp/2018/04/04/facebook-said-the-personal-data-of-most-its-2-billion-users-has-been-collected-and-shared-with-outsiders/?noredirect=on&utm\\_term=.93a0697ec030](https://www.washingtonpost.com/news/the-switch/wp/2018/04/04/facebook-said-the-personal-data-of-most-its-2-billion-users-has-been-collected-and-shared-with-outsiders/?noredirect=on&utm_term=.93a0697ec030)
- [3] Vaynerchuk, Gary. "28 Inspirational Gary Vaynerchuk Quotes To Live By" , Jun 28, 2014, addicted to Success  
<https://addicted2success.com/quotes/28-inspirational-gary-vaynerchuk-quotes-to-live-by/>
- [4] Wozniak, Steve, "Apple co-founder Steve Wozniak 'disgusted' with Facebook, deactivates account", April 9, 2018 <http://money.cnn.com/2018/04/09/technology/steve-wozniak-facebook/index.html>
- [5] Lanier, Jaron, "Who Owns the Future," 2013, ISBN 978-1-4536-5896-7
- [6] Lisk, <https://lisk.io>