

Governance Participation at Compound DAO: Voter Discovery and Segmentation

Prepared by DeepDAO, November-December 2023

Introduction

The goal of this report is to look at voters, delegates and token holders of the <u>Compound DAO</u>, discover voting patterns, and voter interests, and provide insights for enhancing voter participation and overall governance activity.

Compound, one of the largest, most established DeFi protocols and DAOs, is ranked 28 on DeepDAO by treasury AUM, 20 by number of token holders, and 52 by number of lifetime participants. We looked at votes and voters over the past 4 years, mapped their voting patterns in Compound and their interests in DAOs outside of Compound, and developed several insights and targeted recommendations on how to incentivise them to become more involved in the protocol and its governance.

This research is leveraging DeepDAO's data on <u>Compound DAO</u> itself, and our comprehensive ecosystem data:

- Categorization of 1500 of the largest DAOs.
- Close to 10M governance token holders from across the DAO ecosystem.
- 3M voting wallets, and their full DAO experience: all the proposals they created, and all their votes in DAOs.
- DeepDAO's own governance labeling of 3M voters.
- Delegation data from both governor and snapshot governance systems.

The following sections detail our journey through the data and insights we developed within each step. Insights summary, and our recommendations are at the bottom.

DeepDAO will also provide CSV files with lists of targeted voter groups, so as to enable the DAO to approach, and incentivize their participation.



Raw numbers

- Number of token holders, Compound: 217.2k
- Compound voters: 4.4k lifetime
- DAO voters in the Compound token holders population (including COMP holders who voted only in other DAOs): 13,950
- DAO voters holding COMP but not voting on Compound: 10.6k

Voters

The total number of Compound voters to date has been relatively low. Only 4.4k wallets participated in voting so far. This is their yearly breakdown:

Year	Compound voters
2020	679
2021	691
2022	2917
2023	631

As we can see, the voter number in 2023 is similar to what we saw in 2020 and 2021, while 2022 had a significant spike up.

We also looked at how these voters voted in the entire ecosystem (including all DAOs, not just Compound's DAO):

Compound Voters in the entire Ecosystem	Num voters
DAO Voter	4397
DAO voter 2020	755
DAO voter 2021	1743
DAO voter 2022	3442
DAO voter 2023	3084
Onchain voter 2020	651
Onchain voter 2021	508



Onchain voter 2022	2913
Onchain voter 2023	1810
Offchain voter 2020	192
Offchain voter 2021	1553
Offchain voter 2022	3183
Offchain voter 2023	2965

As expected, the numbers are higher, since we included Compound voters' votes in other DAOs as well. The yearly trend though is a bit different, with this year being similar to last year. In other words these numbers seem to indicate ongoing voter participation in DAOs outside of Compound's DAO.

Let's look at some of the other labels we have for Compound voters:

Voter label	Num voters
Top 1% Voter	1677
Top 5% Voter	2676
Two DAOs voter	477
Five DAOs voter	292
Ten DAOs voter	229
Nonsensical voter	1149

About a third of the Compound DAO voters are experienced DAOists (Top %1 voters), and more than half of them are Top 5% voters. We are inclined to believe that this indicates a higher level of DAO voting, and DeFi expertise, which is required given the technical nature of many Compound DAO proposals.

About a quarter of the voters have the "Nonsensical" label, which means they also participated in one or more of the DAOs tagged by DeepDAO as a type of spam. This is an ecosystem wide issue, and does not mean they are bots, or have bad intentions. A list of these addresses can be provided upon request.



Voter Interests breakdown

DeepDAO categorizes over 1500 of the top DAOs into 13 different categories. This enables us to understand voter interests in DAOs outside of Compound itself.

First let's take a look at the numbers for the entire ecosystem. As a threshold we used 5 votes in a category to consider a wallet as a category voter:

DAO Category	Ecosystem min 5 votes to count	Percentage of entire voter population
DeFi	854.1K	29.64
Infrastructure	840.4K	29.17
Gaming	279.0K	9.68
Media & Communications	264.9K	9.19
Work & Funding	77.7K	2.70
NFTs	48.1K	1.67
Investments	23.0K	0.80
DAO Tool	16.5K	0.57
Art & Culture	13.0K	0.45
Greater Good / Political	5.6K	0.20
Physical Assets	5.1K	0.18
Decentralized Science	0.9K	0.03
Data & Analysis	0.4K	0.01

Now let's look at Compound, with the minimum 5 votes to count. In order to understand voter interests external to Compound itself, we excluded votes on Compound DAO:

	Voters, no token holders, min 5	Percentage of Compound voter
DAO Category	votes to count	population





DeFi	3012	65.46
Infrastructure	2587	56.23
Work & Funding	1856	40.34
DAO Tool	1132	24.60
NFTs	1009	21.93
Media & Communications	696	15.13
Investments	558	12.13
Gaming	535	11.63
Art & Culture	432	9.39
Greater Good / Political	280	6.09
Physical Assets	52	1.13
Decentralized Science	6	0.13
Data & Analysis	6	0.13

As an additional step we looked at the categories data while including the entire population of COMP token holders:

	Voters and token holders, min 5 votes to	
DAO Category	count	Percentage
DeFi	8,683	4.00
Infrastructure	6,776	3.12
Work & Funding	3,714	1.71
NFTs	2,369	1.09
DAO Tool	2,084	0.96
Gaming	1,370	0.63
Media & Communicatio	1,288	0.59
Investments	1,155	0.53



Art & Culture	882	0.41
Greater Good / Political	533	0.25
Physical Assets	137	0.06
Data & Analysis	22	0.01
Decentralized Science	17	0.01

We also looked at the delegates' DAO interests. The population includes all delegates, regardless of number of delegators, or voting power:

DAO Category	Number of voters	Percentage
DeFi	2808	82.54
Infrastructure	2142	62.96
Work & Funding	1512	44.44
DAO Tool	1139	33.48
NFTs	962	28.28
Media & Communication s	811	23.84
Gaming	541	15.90
Investments	523	15.37
Art & Culture	389	11.43
Greater Good / Political	303	8.91
Physical Assets	49	1.44
Data & Analysis	12	0.35
Decentralized Science	8	0.24

Several interesting insights arise from our DAO categories mapping:



Even when excluding Compound DAO, DeFi DAOs are obviously the most attractive for Compound's voters and delegates. The 2nd most attractive category is Infrastructure, which is hot throughout the ecosystem.

While the 1st and 2nd DAO categories are the same in Compound as they are in the entire ecosystem, the 3rd most important category for Compound participants is Work & funding. This result is consistent across voters and delegates, but not with COMP token holders. It may be a byproduct of the bear market, that has more people looking for extra income, and it may also point at the sophistication of Compound voters, who understand Web3 and the opportunities it provides through grants and community contributions.

The 4th most important category for Compound DAO participants is DAO Tools, which is only the 8th most attractive for the entire ecosystem voters. One reason for this result could be that DAO tools are becoming more and more specialized, and it takes sophistication to understand them, just as much as it does for Compound DAO's decision making.

NFTs are down as a sector, both in the ecosystem and for Compound participants. Gaming is up, with roughly the same number of voters as NFT DAOs, in only about a third of the DAOs.

Delegates

The extent of significantly involved delegation in the Compound DAO is as follows:

Minimum votes	Minimum delegators other than self	Minimum voting power	Number delegates	Delegates with vote this year
1	1	1	50	26
10	1	20	33	23
10	10	20	16	11
20	10	20	14	10

As we can see, the number of committed, involved delegates is not huge. Only 14 delegates with at least 10 delegators and enough voting power to have an effect had voted at least 20 times, and only 10 of them voted at least once this year. The numbers



we looked at are arbitrary, and do not necessarily reflect the full picture, but when we looked at some of Compound's competitor DAOs we saw a somewhat similar picture.

It should also be noted that some of these delegates are in themselves representatives of an institution, and therefore may have a wide array of expertise and viewpoints.

We addressed the question of increasing the number of delegates at our recommendations section below.

Competing DAOs / Interest DAOs

Next we looked at DAOs similar to Compound, potentially competitor DAOs. Which specific DAOs do **Compound voters** participate in?

Competitors breakdown for voters with a minimum of 3 votes on Compound (Top 20):

	Competitor	Voters
1	Compound	801
2	Aave	588
3	Uniswap	503
4	Optimism	456
5	Stargate Finance	433
6	Arbitrum	427
7	Lido	322
8	Shell Protocol	249
9	GMX	238
10	Gitcoin	218
11	ENS	198
12	Sushiswap	195
13	Mail3	194
14	dYdX	167
15	ApeCoin DAO	161
16	Sismo	161



17	Gnosis	159
18	Reunit	122
19	Balancer	121
20	PancakeSwap	117

A couple of notes on this, and the following tables:

- 1) Although counterintuitive, it is not obvious that Compound will be the DAO most attractive for Compound voters. But in fact it is.
- 2) The number of voters on Compound is 801, and not the entire 4.4k voters population, because we only counted wallets with 3 votes or more.

More competitor data is discovered when looking at the **voters among COMP token holders**:

	Competitor	Voters among COMP token holders
1	Aave	1846
2	Uniswap	1705
3	Stargate Finance	1610
4	Optimism	1413
5	Arbitrum	1242
6	Compound	1223
7	Lido	724
8	GMX	711
9	Shell Protocol	700
10	Gitcoin	642
11	ENS	561
12	Sushiswap	536
13	Mail3	467
14	Balancer	421
15	Sismo	371



16	ApeCoin DAO	369
17	Gnosis	365
18	Badger DAO	327
19	Treasure	294
20	Reunit	290

While Compound is the most voted-on DAO among Compound voters (again, it's not a given), it is only the 6th most voted-on DAO among the entire COMP token holders population.

The large DeFi DAOs, Aave, Uniswap, Stargete and Lido are the most voted-on DAOs for Compound voters. The two huge infrastructure DAOs, Optimism and Arbitrum, are also in the top 6 competitors.

Other large infrastructure DAOs like Gitcoin, ENS, and Gnosis are also attractive for Compound voters. Mail3, a tool for communication between wallets, is also present relatively high in this competitors list.

Competing DAOs voting

We now looked for voters who vote on any of the main competitors, and hold COMP, but do not vote on Compound. We included all COMP token holders, including those with a small amount of tokens. This is the data:

Competitor DAO	Lifetime voters	Not on Compound	% not on Compound
Aave	71,700	3,189	4.45
Uniswap	32,400	2,251	6.95
Stargate	1,000,000	3,860	0.39
Optimism	142,300	2,237	1.57
Arbitrum	235,200	2,389	1.02
Lido	6,300	754	11.97
GMX	88,500	1,830	2.07
Shell Protocol	32,200	1,108	3.44
Gitcoin	14,900	986	6.62



ENS 88,500 2,439 2.76

The largest DAOs with COMP holders who did not vote on Compound are in Aave, Stargate, ENS, Arbitrum and Optimism. But in terms of percentage, which may indicate similarity in purpose, the largest DAOs to look at are Lido, Uniswap, and Gitcoin.

Several Insights

- Overall DAO participation, at 4.4k voters, is only about 2% of the number of token holders.
- The overall number of voters in Compound DAO in 2023 is lower than it was in 2022, and similar to what we saw in 2020 and 2021.
- As it is in the entire ecosystem, DeFi and Infrastructure DAOs are the most voted-on category within the Compound DAO's voters, token holders, and delegates.
- However, Compound DAO voters, token holders and delegates differ from the ecosystem in voting more frequently on Work & Funding, and DAO Tool DAOs.
- The large DeFi, and Infrastructure DAOs such as Aave, Uniswap, Stargete, Optimism and Arbitrum compete with the Compound DAO for attention among its own voters and token holders. There is a large contingency of COMP token holders that vote on these DAOs, while not voting on Compound.
- The number of delegates voting frequently on the DAO's proposal is not very large. This
 is probably a result of the sophisticated nature of the DAO's decisions, which requires a
 high level of expertise.

Recommendations

Given the sophisticated, financial nature of the Compound protocol there is a great responsibility in the hands of the DAO's delegates and voters. The number of voters on a proposal aiming to change the protocol parameters, for example, should not be expected to be in the thousands or even in the hundreds, as an informed vote requires a high level of expertise in DeFi, the protocol itself, and the ecosystem and current market conditions.



That said, there is still a place for increasing participation and perhaps diversifying the type of decisions the DAO governance is responsible for.

Based on our exploration of the data, and the general understanding that a strong governance community requires a concentrated effort to cultivate, we have a few ideas on how to increase participation.

Target the missing voters

Craft a marketing message to the "missing" voters, those who hold the COMP token, vote in DAOs, but did not vote in Compound yet. Specifically address the more experienced ones, as their expertise may bring more insights into the Compound ecosystem.

Take into account voter and token holder interest categories, as we highlighted above: DeFi, Infrastructure, Work & Funding, and DAO Tools. Highlighting the multi-chain deployments of the protocol on various L2s can be attractive to prospective voters.

Also highlight similarities, and differences of the Compound protocol, and Compound DAO, as compared to the other large DeFi DAOs (see the Competitors section above).

Target voters from previous years

There are several thousand voters who already voted at least once on Compound DAO but did not do so this year.

Using direct messages, existing community channels and designated interviews, the DAO may survey these missing voters and find out more about them and how to bring them back.

Incentivize committed voters

There are several hundred voters who voted consistently year by year in the past four years. Rewarding them for their loyalty could show the DAO's appreciation and serve as a positive signal for the entire community.

Moreover, loyal savvies are a rare asset when it comes to community building, education and training. Making opportunities for such types of loyalist involvement serves the other recommendations here as well and supports organic community growth upon available resources, while endowing loyalists with much deserved status and returns.



Education grants

It is not an easy task to become a DAO delegate, or voter for a protocol like Compound. Expertise and commitment are required. Investing more resources into education programs may be a good way to achieve the goal of increasing quality participation.

Compound already has a grant program. For future rounds it may want to consider an education track.

For the target audience of these education resources, we would look at the voter contingencies outlined above.

Delegate training program

The DAO may consider a formal training program for delegates, by specifically targeting delegates with just a few votes and delegators. While this program is akin to other leadership training programs, it should be focused on the protocol, ecosystem and governance. Having these educated, trained participants may prove important for the protocol's long term resilience.

More general participation

Most of Compound DAO's proposals are technical and require expertise. It may be beneficial to increase the DAO's responsibilities to other needed areas, which will allow more and possibly more diverse token holders to become involved. Other examples include retro funding, or incentivising participation in various ways to earn a small income. For this we would target all token holders, and in fact all DeFi token holders.