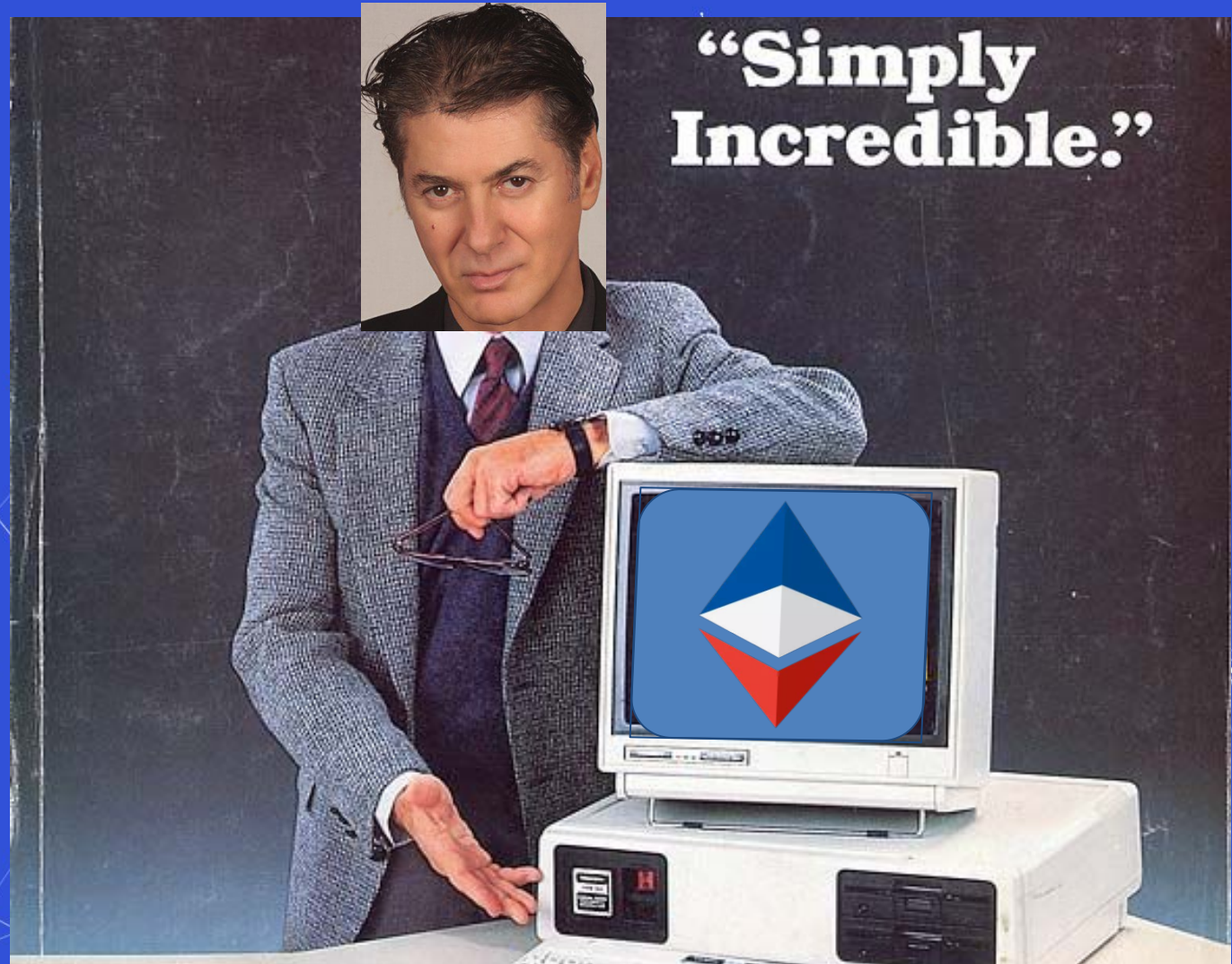




CONSENSYS

Let's
talk about DAOs



Who am I ?

Jérôme de Tychey :-D

- **Director of ConsenSys Solutions in France**
 - **ERC1400, Decentralized Finance, Security tokens, blockchain enabled corporate governance...**
- **Find me on social media [@jdetychey](#)**
 - **email: jerome@consensys.net**
- **Background in economics (game theory and growth model)**
- **President of Asseth**



France has a huge and active community

Attend and present at EthCC next year, ring me whenever you are in France and wants to connect

<https://ethcc.io>

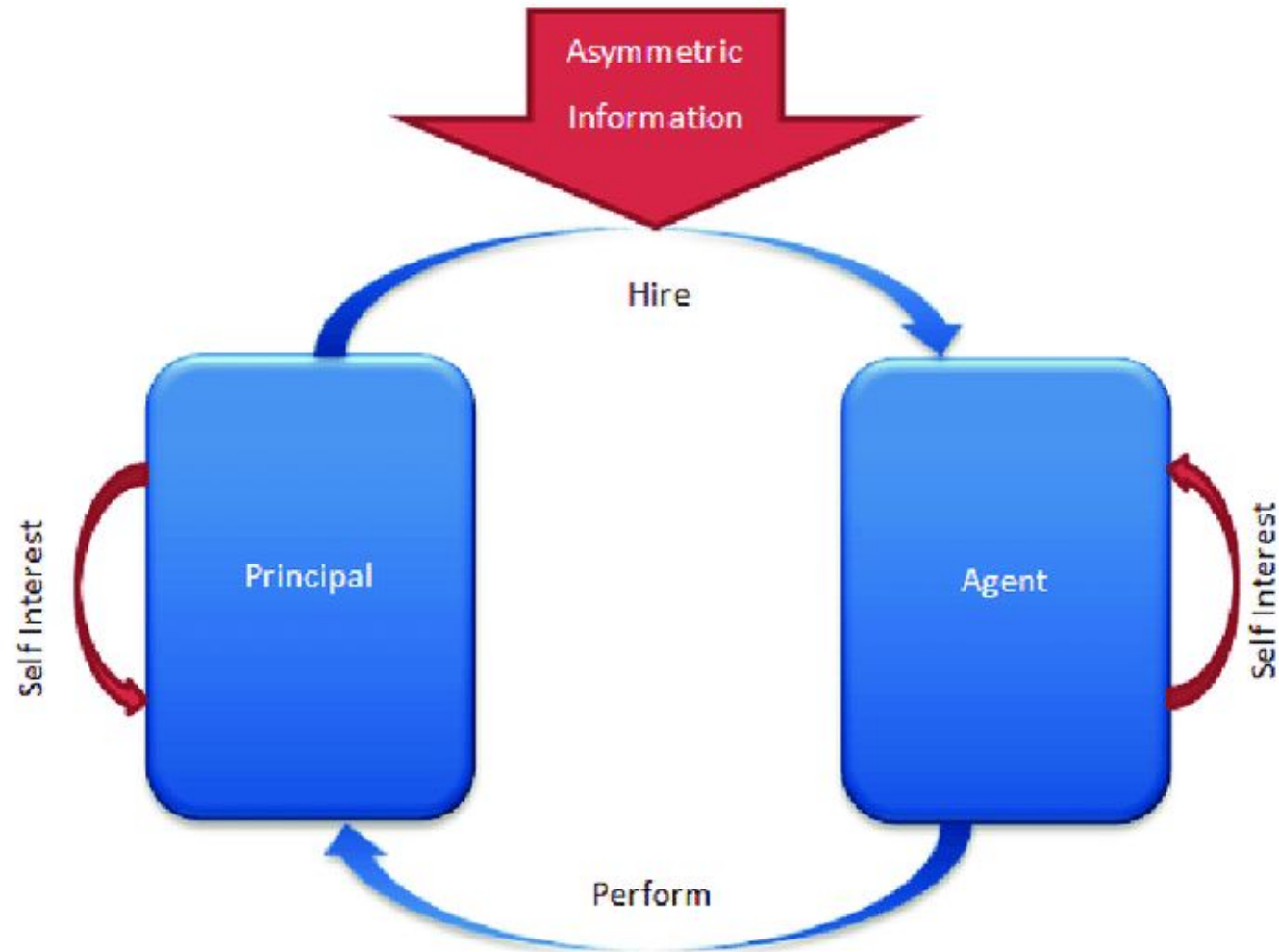




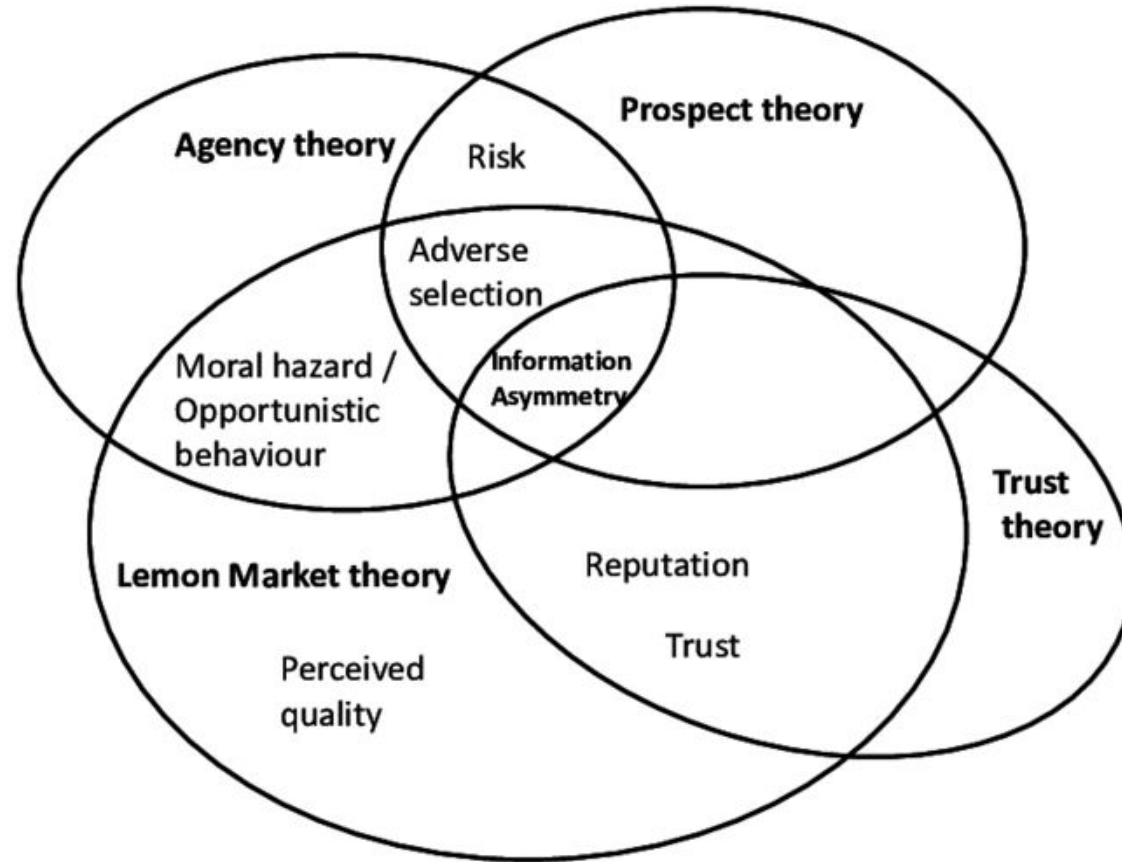
What do you Dao ?

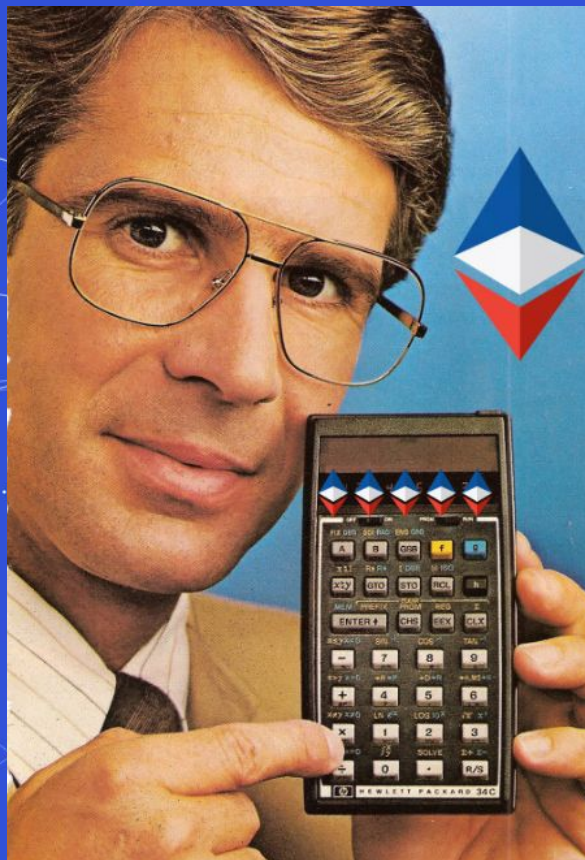
What do you DAO?

Jensen & Meckling, 1976 : Theory of the Firm: Managerial Behavior, Agency Costs and Ownership Structure



What do you DAO?





The DAOs

Smart Contracts - Softwares deployed in the Ethereum Blockchain

Neither smart nor contracts but immutable tamper-proof self executing software

Smart contracts

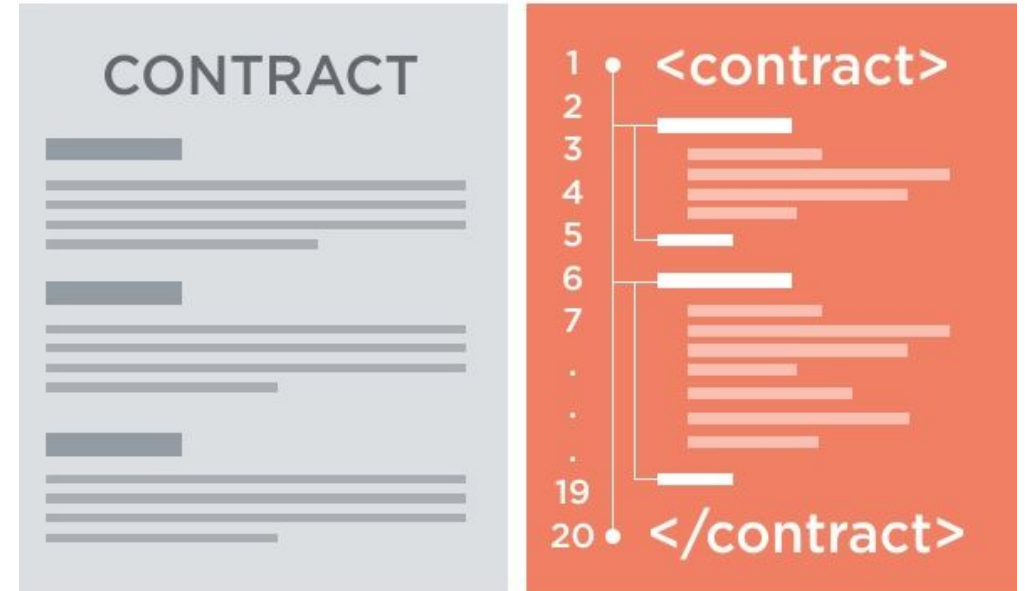
Smart contracts are code stored on the blockchain and self-executed, using the trust and security of the blockchain network.

They provide an **application logic** that runs in a distributed fashion on the Ethereum blockchain and operates **using the power of the Turing-complete Ethereum Virtual Machine** (see *next slide*). It allows users to program anything (*sky is the limit!*) and therefore **enhance or completely redesign business processes and services**.

Dapps and DAOs

Collections of integrated smart contracts and traditional web technologies realize a new breed of **decentralized applications (dapps)** and create a vision for **decentralized autonomous organizations (DAOs)**

Ethereum pioneered **token standards allowing businesses to create their own** tokens representing assets or utilities **and still interact with the Ethereum blockchain via smart contracts** (e.g., ERC20, ERC223, ERC777, ERC721, ERC1400)



Let there be tokens, the ERC20 Standard

The killer app so far: 197,918 Token Contracts found on Etherscan

- A smart contract running on top of the ethereum blockchain, i.e. a set of code (functions) with an associated database
 - The code describes the behavior of the token
 - The database is basically a table with rows and columns tracking who owns how many tokens.

```
1 // https://github.com/ethereum/EIPs/issues/20
2 contract ERC20 {
3     function totalSupply() constant returns (uint totalSupply);
4     function balanceOf(address _owner) constant returns (uint balance);
5     function transfer(address _to, uint _value) returns (bool success);
6     function transferFrom(address _from, address _to, uint _value) returns (bool
success);
7     function approve(address _spender, uint _value) returns (bool success);
8     function allowance(address _owner, address _spender) constant returns (uint
remaining);
9     event Transfer(address indexed _from, address indexed _to, uint _value);
10    event Approval(address indexed _owner, address indexed _spender, uint _value);
11 }
```



- Facilitate integration and interoperability of dapps in the Ethereum ecosystem
- The ERC20 Token Standard as a common set of rules for ethereum-based tokens to adhere to.
- As a result, almost all of the major tokens on the ethereum blockchain today, including those sold in initial coin offerings (ICOs), are ERC-20 compliant.



Flashback from 2016: the DAO D  b  cle

Bringing Securities to the Blockchain



- The **DAO** (**D**ecentralized **A**utonomous **O**rganization) one smart contract to be the mother of all DAO
- The smartcontract acted as a stake based (the DAO Token) investment funds emitting reward tokens on project it funded
- Huge enthusiasm in the community, ICO in May 2016 raised 11.5 M Eth (150M\$)
- A bug in the smartcontract led to a hack that was canceled by an act of governance from the community in June 2016
- Lots and lots and lots of ICO followed **as well as a huge effort on security issues and coding best practices (even formal proofs)**



A S S E T H



Flashback from 2016: the DAO D  b  cle

Bringing Securities to the Blockchain

SECURITIES AND EXCHANGE COMMISSION
SECURITIES EXCHANGE ACT OF 1934

Release No. 81207 / July 25, 2017

Report of Investigation Pursuant to Section 21(a) of the Securities Exchange Act of 1934:
The DAO

SEC gave warning that
TheDAO was a Security!

- The smartcontract led to a loss of governance from the community
- Lots and lots and lots of ICO followed, with many issues and coding best practices (even formal pre-

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A S S E T H

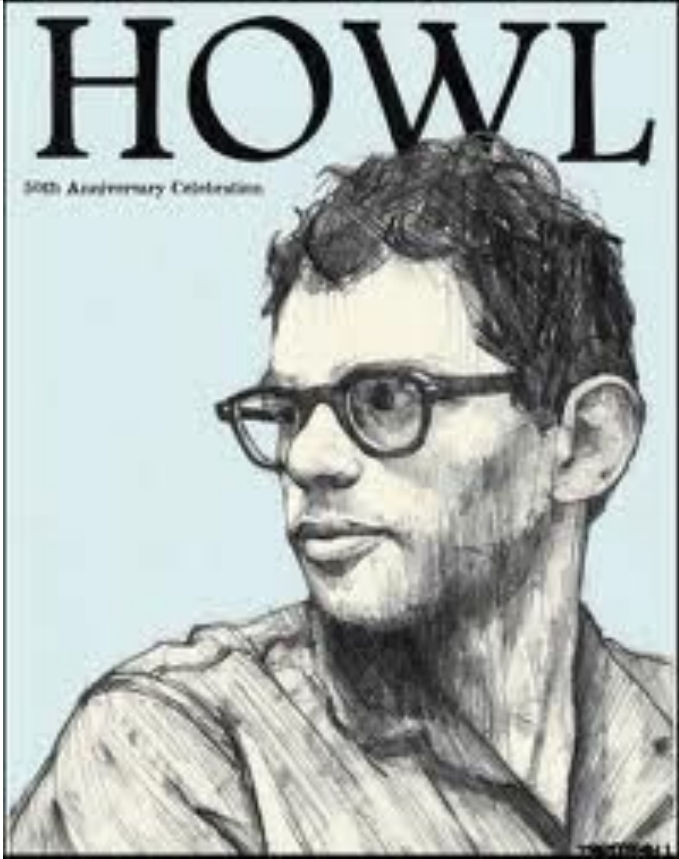




Never mind the Moloch(s)

Moloch ! (in the US)

“I have seen the best minds of my generation destroyed by madness”, Howl, 1956



Slate Star Codex

SELF-RECOMMENDING!

MEDITATIONS ON MOLOCH

Moloch whose mind is pure machinery! Moloch whose blood is running money! Moloch whose fingers are ten armies! Moloch whose breast is a cannibal dynamo! Moloch whose ear is a smoking tomb!

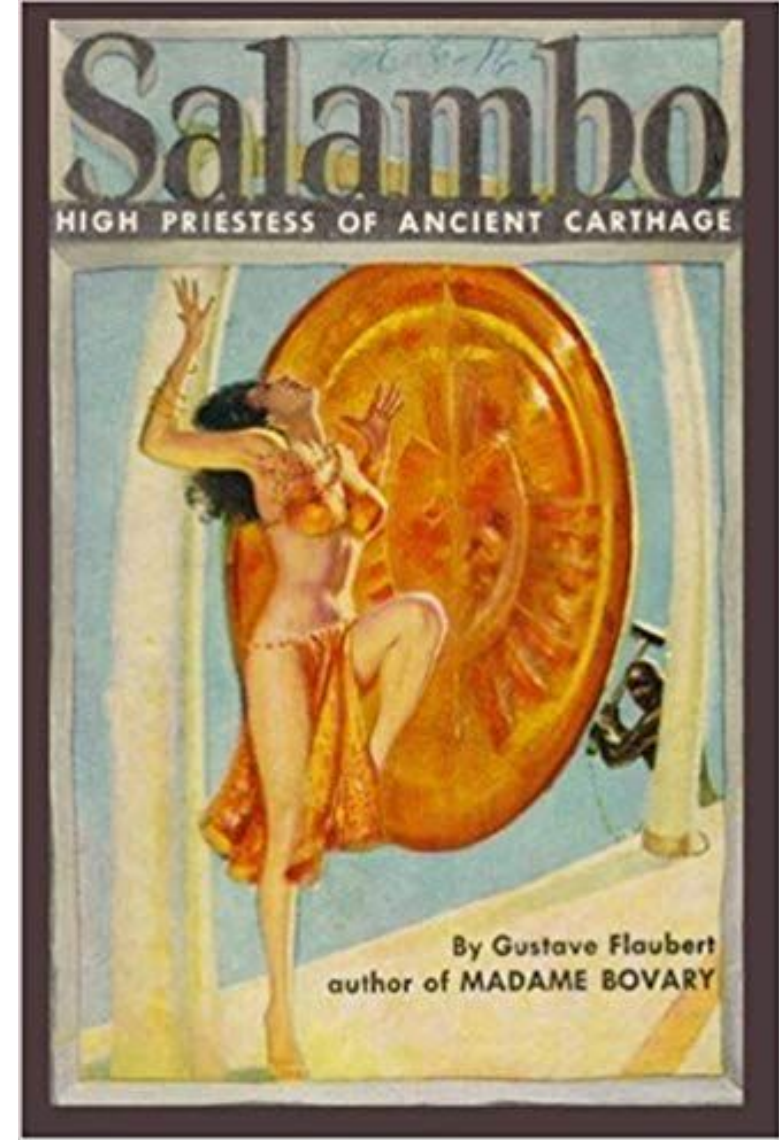


A S S E T H



Moloch ! (in France)

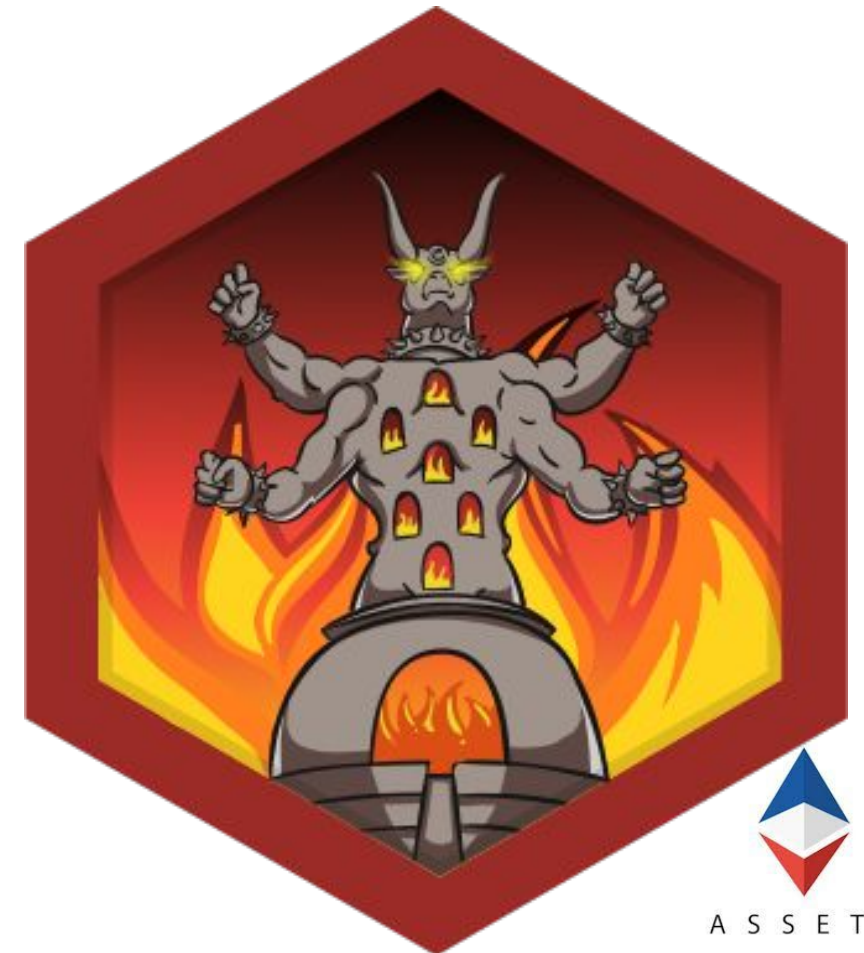
“«Moloch, tu me brûles ! » et les baisers du soldat, plus dévorateurs que des flammes, la parcouraient ; elle était comme enlevée dans un ouragan, prise dans la force du soleil.” Salammbô, 1862



DAO example: MolochDAO

<https://molochdao.com>

- A grant giving DAO to fund ethereum 2.0 additional features and future developments
- So far
 - 7313.54 Ether
 - 72 proposals completed (64 members)
- How does it work ?
 - Become a member by giving to Moloch and send a proposal
 - Ask a member to send a proposal for you



A S S E T H



Merci!

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