

Let's Talk Crypto and Blockchain!

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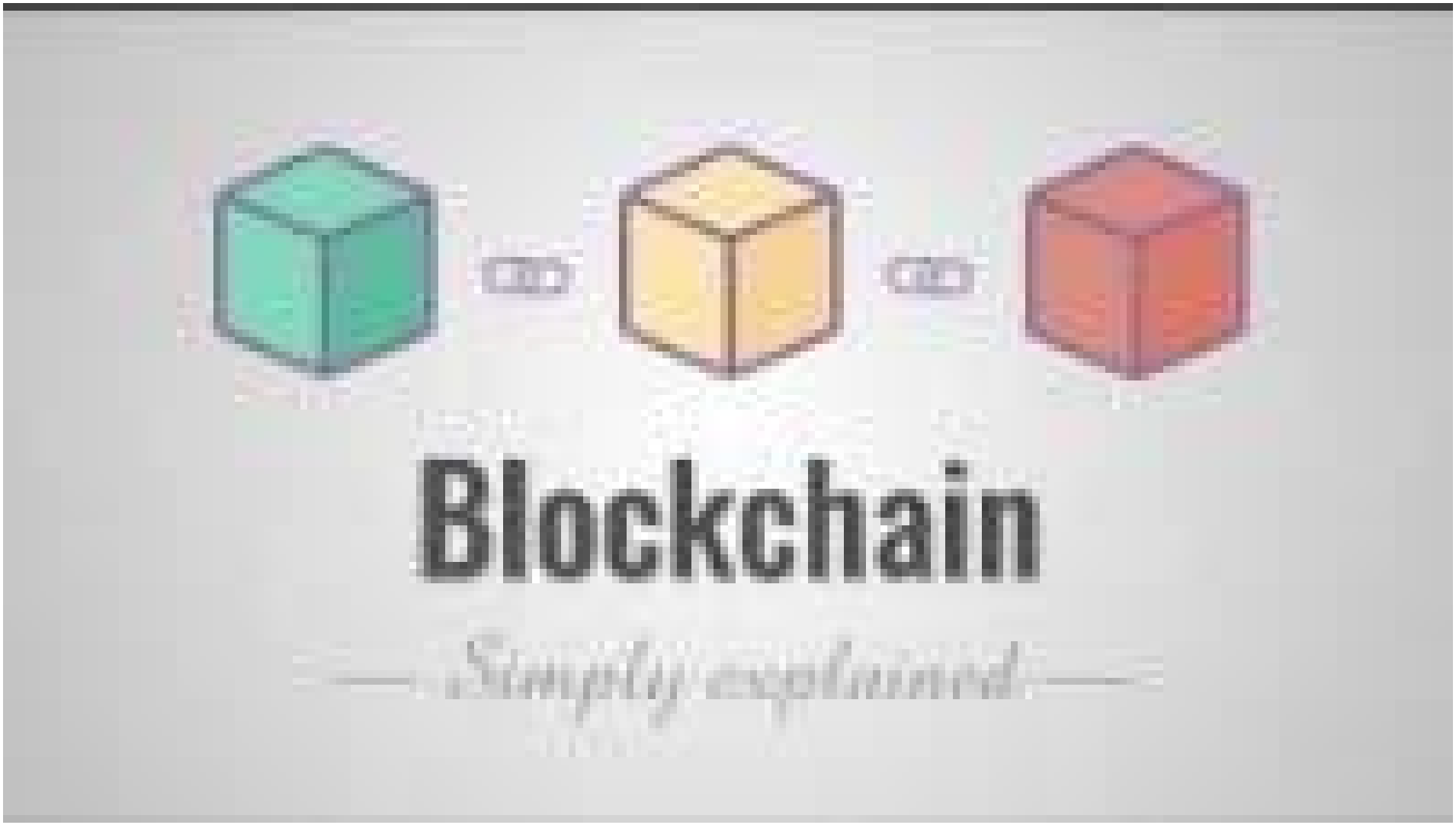
What is blockchain?



Blockchain vs. Crypto

Blockchain and Cryptocurrency are not interchangeable terms.



Blockchain vs. Crypto

Blockchain is....

a shared, immutable digital ledger.

Cryptocurrency

Virtual Currency or Cryptocurrency is a digital representation of value that functions as a medium of exchange, a unit of account, and a store of value other than a representation of the United States dollar or a foreign currency.



Fiat

- U.S. Dollar is fiat currency
  - Article I, Section 8 of the U.S. Constitution
  - 31 U.S.C. § 5103
- Requires the acceptance of U.S. Dollar for private debts



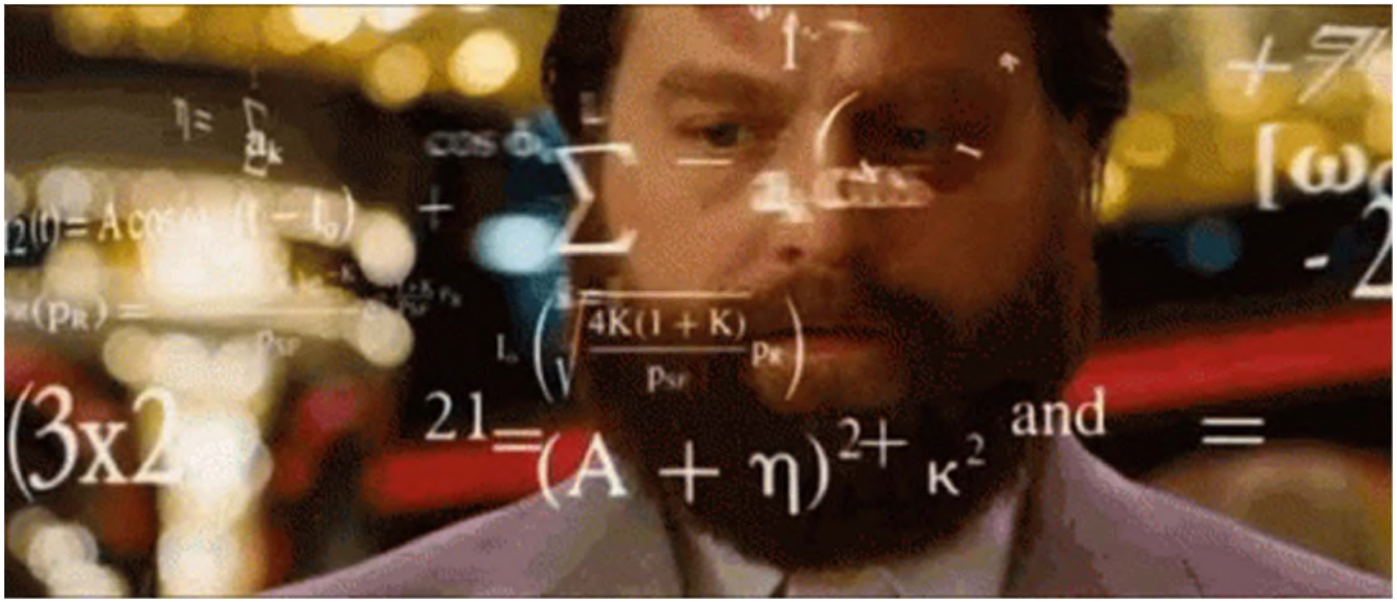
Cryptocurrency

- Decentralized
- Transparent
- Secure
- Immutable
- Auditable



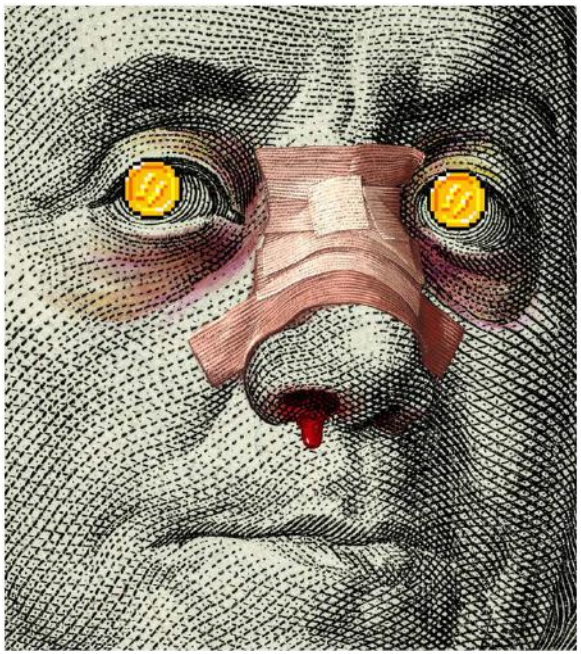
Proof of Work vs. Stake

What is the difference?



What is the Current Regulatory Scheme?

Executive Order on Ensuring Responsible Development of Digital Assets
issued March 29, 2022



Characteristics of Cryptocurrency

- Government paper currency
- Commodities
- Securities



Securities

"Of the nearly 10,000 tokens in the crypto market, I believe the vast majority are securities. Offers and sales of these thousands of crypto security tokens are covered under the securities laws.

Some tokens may not meet the definition of a security — what I'll call crypto non-security tokens. These likely represent only a small number of tokens, even though they may represent a significant portion of the crypto market's aggregate value."

-SEC Chair Gary Gensler
Sept. 8, 2022, Prepared Remarks
Kennedy and Crypto

Securities

SEC v. W.J. Howey Co. 328 U.S. 293 (1946)

Investment Contract

(1) An investment of money or other consideration;
(2) in a common enterprise;
(3) with an expectation of profit;
(4) to be derived “solely” from the efforts of others.

Commodities

The term “commodity” means . . . all services, rights, and interests . . . in which contracts for future delivery are presently or in the future dealt in.

CFTC
COMMODITY FUTURES TRADING COMMISSION

Commodities

Does the CFTC oversee Bitcoin?

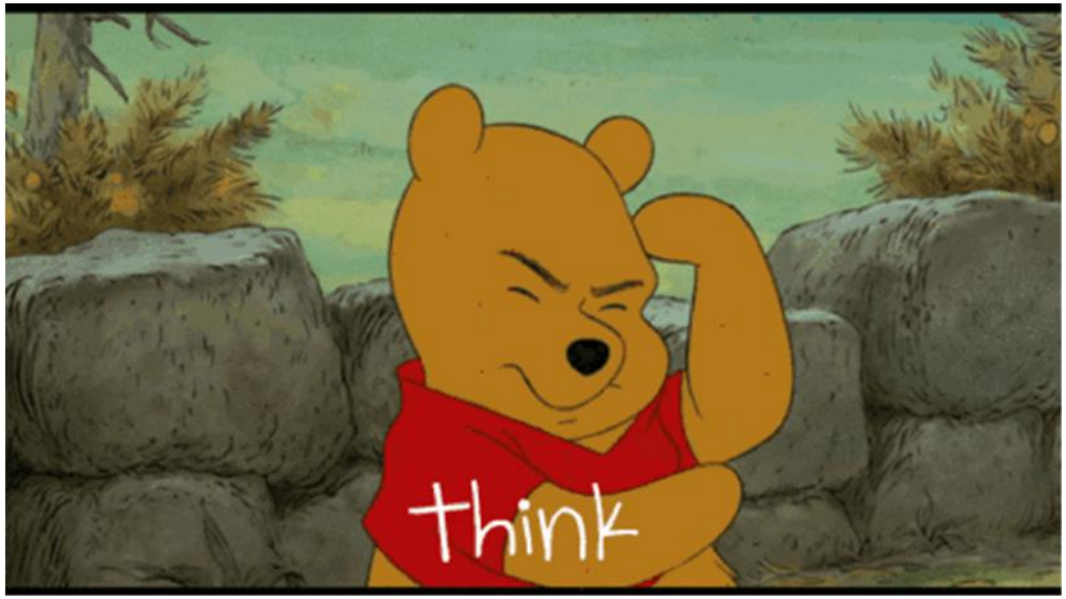
The U.S. Commodity Futures Trading Commission's (CFTC) jurisdiction is implicated when a virtual currency is used in a derivatives contract, or if there is fraud or manipulation involving a virtual currency traded in interstate commerce.

What's the difference?

Decentralization

Crypto & Government

What if my local government wants to participate in the Crypto/Blockchain space?



What should I worry about?

What do your State Constitution and Statutes say? Can your government or agency accept or hold cryptocurrency?

Investment Policies

Do the State Statutes or Investment Policies that regulate government investments prohibit it?



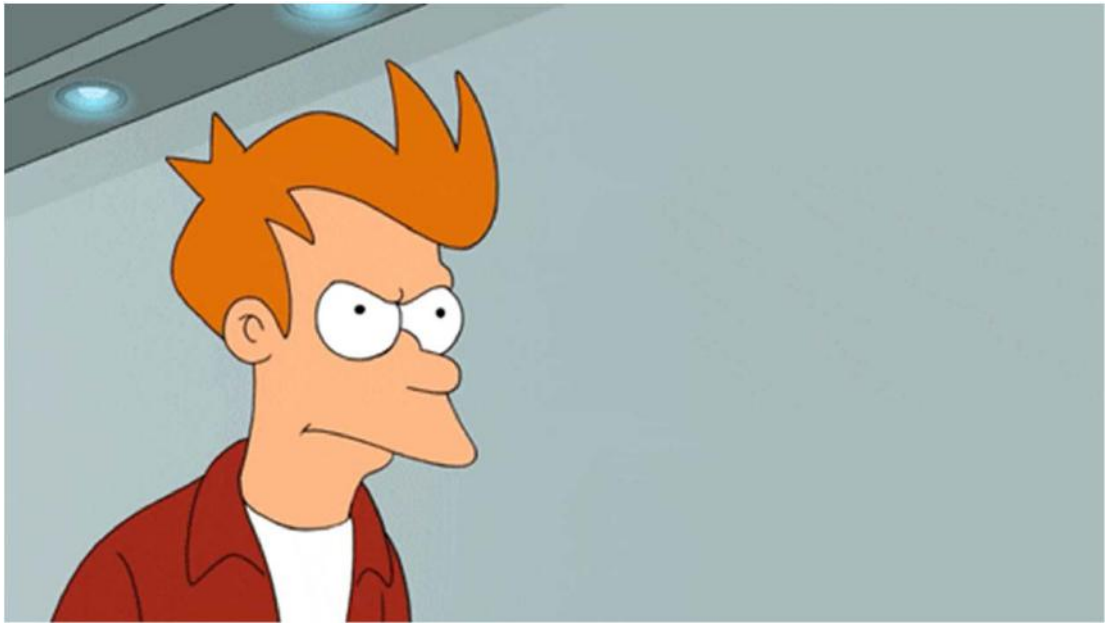
Bond Covenants

What do my Bond covenants say?



Payment of Taxes

Can taxes, fees, assessments, and fines be paid in crypto?



Payment of Taxes

Things to consider:

- Third-party virtual currency exchange licensed by FinCEN as a money transmitter
- Volatility/Conversion Rates
- Cybersecurity

Cryptocurrency Wages

"[W]hat we view as money has changed over time. Cowrie shells once were such a medium but no longer are . . . our currency originally included gold coins and bullion, but, after 1934, gold could not be used as a medium of exchange . . . **perhaps one day employees will be paid in Bitcoin or some other type of cryptocurrency. . . . Nothing in the [law] suggests the meaning of [a statutory] provision should be trapped in a monetary time warp, forever limited to those forms of money commonly used in the 1930's**." - Breyer, J., (dissenting) *Wis. Cent. Ltd. v. United States*, 138 S. Ct. 2067, 2075-76 (2018).



Cryptocurrency Wages

Things to consider:

- Do you need a third-party virtual currency exchange licensed by FinCEN as a money transmitter
- IRS Notice 2014-21 (Tax Withholdings for employees and independent contractors)
- Require employees to affirmatively and voluntarily choose to receive wages in cryptocurrency
- Cybersecurity

“Smart” Contracts

```
pragma solidity ^0.4.16;

contract AxonToken {

    /* This creates an array with all balances */
    mapping (address => uint256) public balanceOf;
    string public name = "AxonToken";
    string public symbol = "AXTK";
    uint8 public decimals = 5;

    event Transfer(address indexed from, address indexed to, uint256 value);

    /* Initializes contract with initial supply tokens to the creator of the contract */
    function AxonToken(uint256 initialSupply) {
        balanceOf[msg.sender] = initialSupply;
    }

    /* Send coins */
    function transfer(address _to, uint256 _value) {

        /* Check if sender has balance and for overflows */
        require(balanceOf[msg.sender] >= _value && balanceOf[_to] + _value >= balanceOf[_to]);

        /* Add and subtract new balances */
        balanceOf[msg.sender] -= _value;
        balanceOf[_to] += _value;

        /* Notify anyone listening that this transfer took place */
        Transfer(msg.sender, _to, _value);
    }
}
```

“Smart” Contracts



Is this how we will write contracts in the future?

Decentralized Autonomous Organization (“DAO”)

What are DAOs?

DAOs are an effective and safe way to work with like-minded folks around the globe.

Think of them like an internet-native business that's collectively owned and managed by its members. They have built-in treasuries that no one has the authority to access without the approval of the group. Decisions are governed by proposals and voting to ensure everyone in the organization has a voice.

There's no CEO who can authorize spending based on their own whims and no chance of a dodgy CFO manipulating the books. Everything is out in the open and the rules around spending are baked into the DAO via its code.

Examples


CITY HALL
EMERGENCY
BUDGET MEETING
HOSPITALS OR FIREMEN:
YOU DECIDE
PEOPLE OF SPRINGFIELD,



Gift Agreement

Crypto & Government

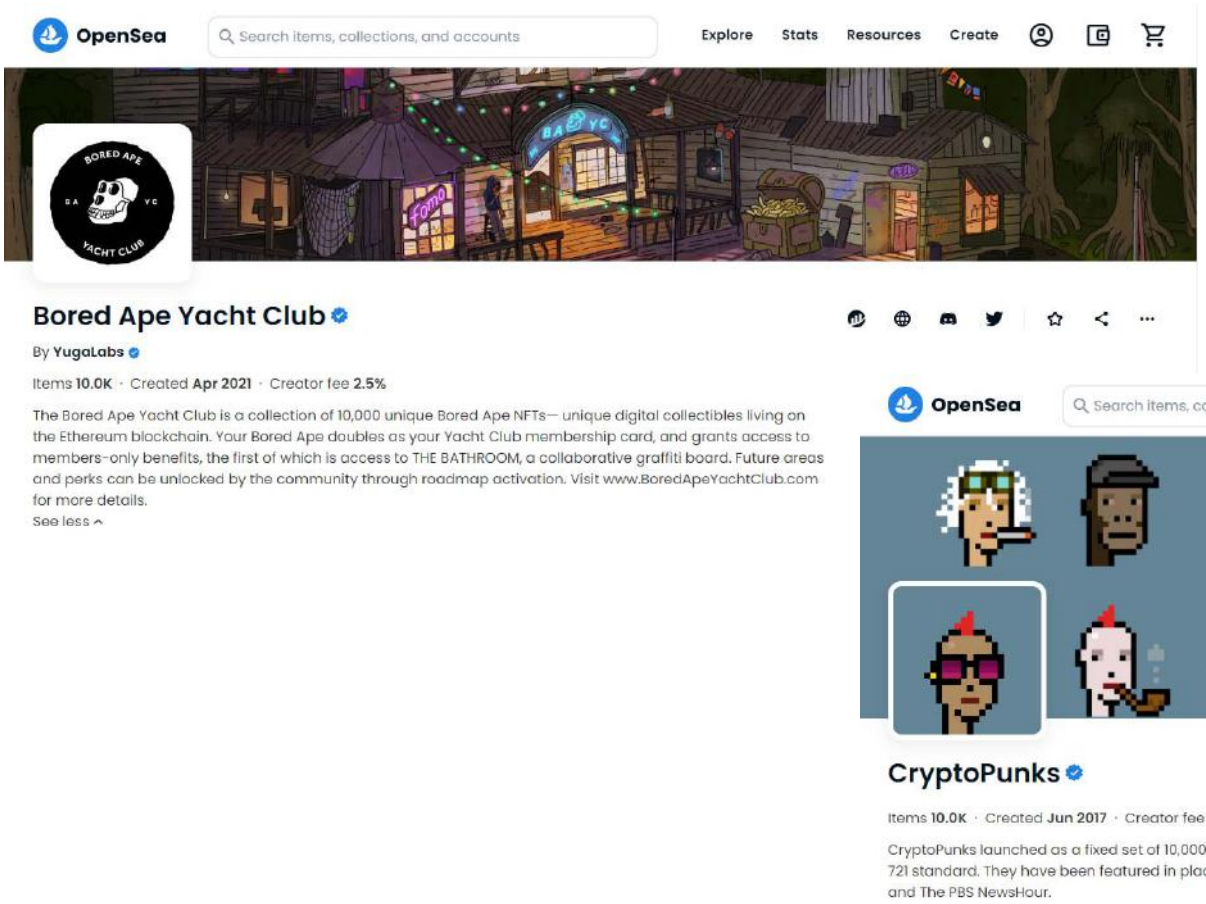
Has the city of Miami partnered with CityCoins?

Read Less

The city of Miami has not partnered with CityCoins. CityCoins are grassroots initiatives. As communities grow around CityCoins, they can encourage their mayor to claim the reserved city treasury wallet and begin putting its funds to use.

30% of the STX that miners forward in order to compete in the earning of MiamiCoin will go directly to the wallet reserved for the city. The city of Miami may decide at any time to claim the wallet's funds.

Non-Fungible Tokens (NFTs)





Non-Fungible Tokens (NFTs)

- City of Miami and TIME, Inc.
- Japanese Government gives NFTs to local officials
- The sale of real property as NFTs

Mining

Fort Worth, Texas becomes the first U.S. City to mine Bitcoin

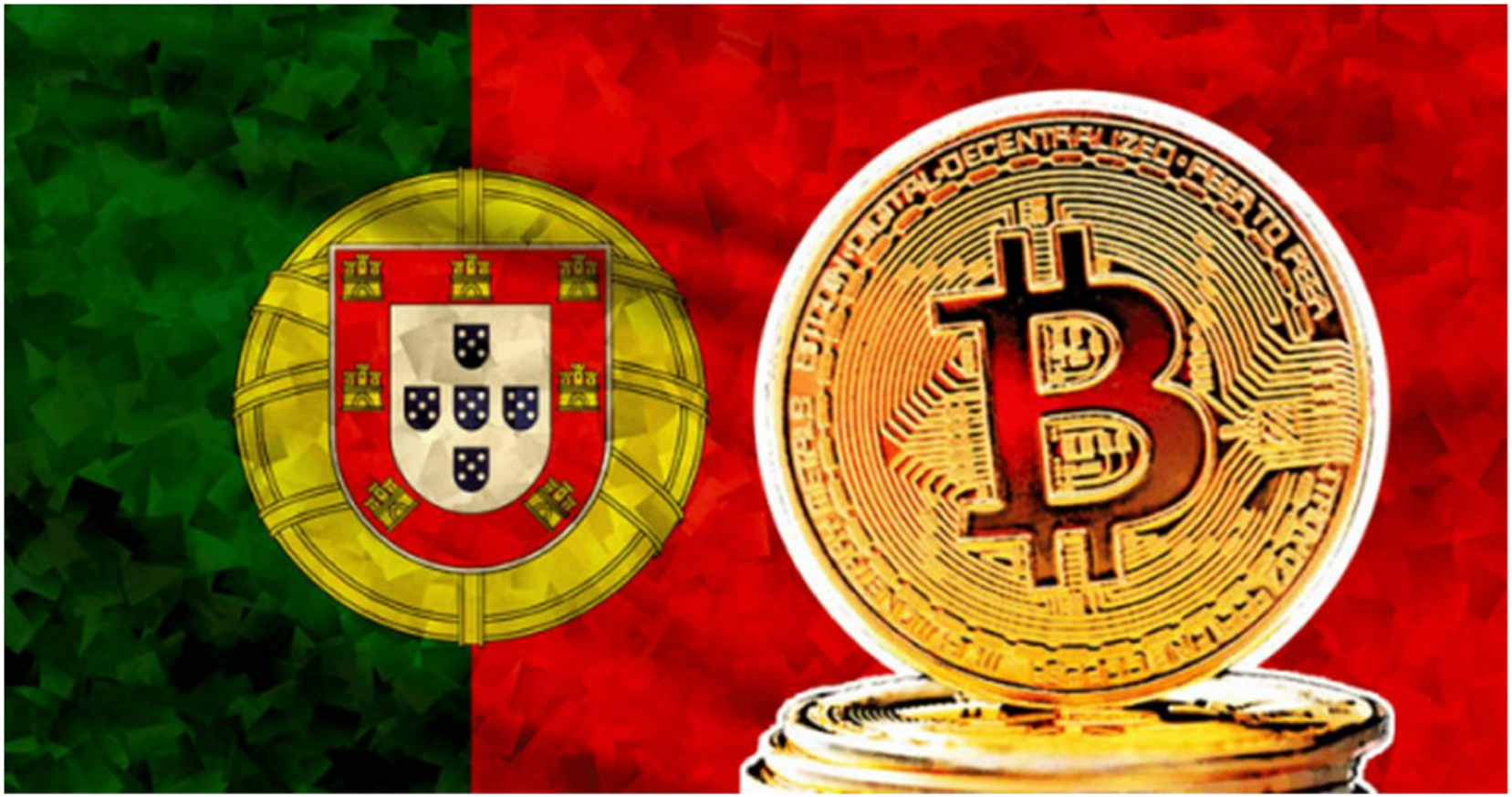
- Pilot program of 3 mining rigs running 24/7 (upgraded to one, more efficient mining rig)
- Hosted on a private network to address cybersecurity

Purchase and Sale Real Property





Portugal

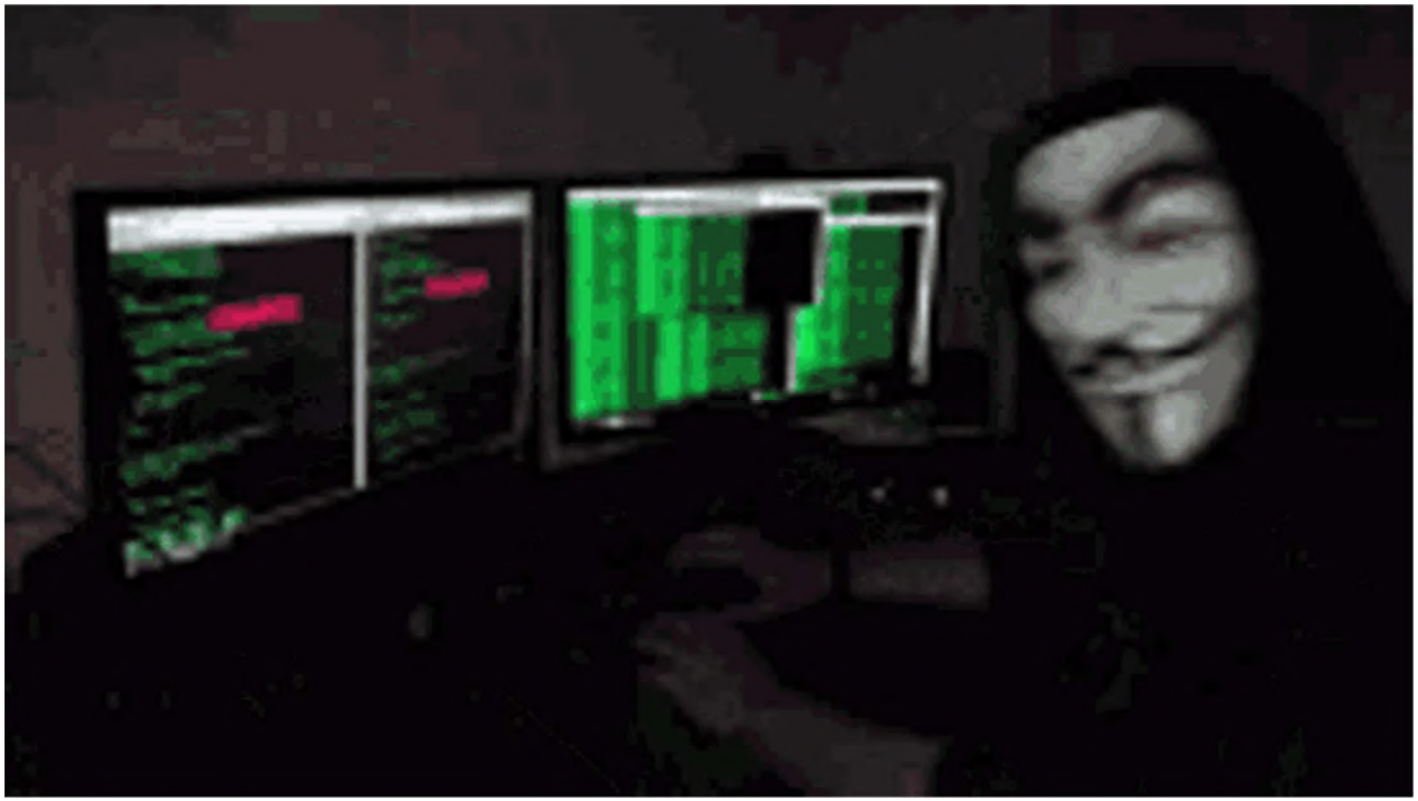


El Salvador



Mythbusters

Myth #1: Crypto is untraceable



Myth #2: Crypto harms the environment



What to expect?

How will crypto and blockchain continue to impact local government?



Let's Talk Crypto and Blockchain!

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