

Segregated Witness (SegWit)

(49)

Block: #500,112

Timestamp: 1519181244

Nonce: 323451

Transactions:

198D2F359AB1AC868A1CC8275AE96

D8C58A0FA9D706F68A2F0406FBB71

45AF4FAC8D9F6C7FEA7E86D1706DD

A8DB07FCDD07753644A3097F6A3A2

AEB62940FA07DC9E81ACD03DDA05C

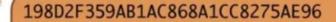
Prev.Hash: 0000DF2E57FB432A

Hash: 0000E9A61C1A43E1

1mb

60%

scriptSig



From: X To: Y

Amount: 0.3 BTC

Signature: < ... > Public Key: < ... >

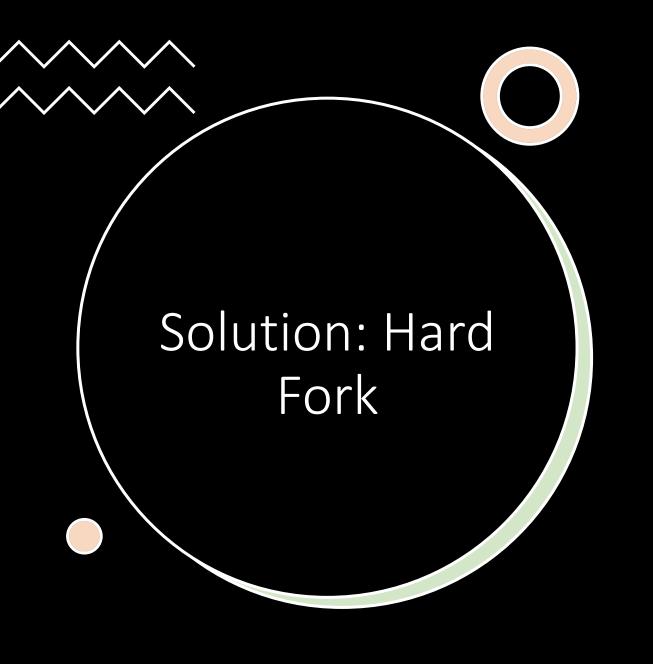
DAO Attack

On Ethereum
Investor-directed venture capital fund
Stateless
May 2016 Crowdfunded ~\$150,000,000
June 2016 Hacked for ~\$50,000,000
Dilemma: "Code Is Law?"





Solution: Hard Fork



- -> Ethereum split into 2 parts
- -> ETH and ETC

ETH(Ethereum): Money returned to owner/DAO

ETC(Ethereum Classic): Money remains on child account and will be transferred to hacker's account after decided time limit



Remember: Problem was in DAO code not in Ethereum

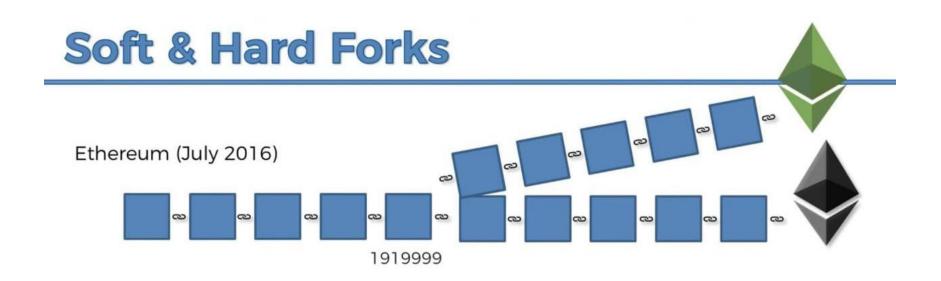
Must read Blog:

The Ether Thief

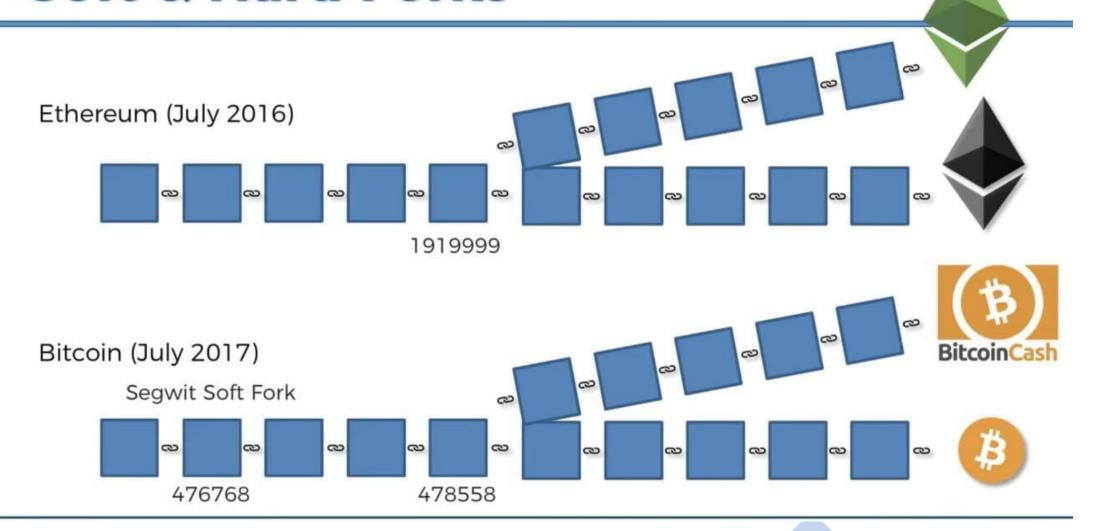
https://www.bloomberg.com/features/2017-the-ether-thief/

Soft & Hard Forks

Hard Fork produced ETH and ETC

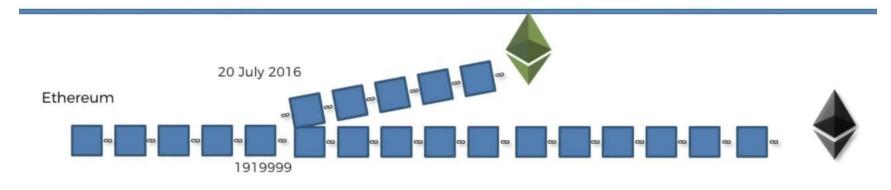


Soft & Hard Forks



20 July 2016 --- Hard Fork on Ethereum to change rules of smart contract due to DAO attack 20 July 2017 --- Soft Fork on Bitcoin to upgrade Bitcoin with Segwit Witness feature 1 August 2017 --- Hard Fork on Bitcoin to increase the Block size up-to 8MB from 1 MB 24 October 2017 --- Hard Fork on Bitcoin to make ASIC resistant network.

Soft & Hard Forks





Soft & Hard Forks

Hard Forks = Loosen Rules

Soft Forks = Tighten Rules

Lecture 20

ASM-002 Evaluations

Acknowledgement and Source:

https://www.udemy.com/course/build-your-blockchain-az/