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# **BrahmaX 1.0**

The Creation of Tomorrow

**BrahmaX 1.0**

[www.codecrax.com](http://www.codecrax.com)



## Profile Overview

- **Theme** - Web3 & Blockchain
- **Problem Statement Title**- Decentralized Voting System
- **Team ID** - buisnesssayman@gmail.com
- **Team Name** - Team Vasiliades

# Decentralized Voting System Proposed Solution



## Decentralized & Secure

Eliminates fraud with tamper-proof voting on blockchain.

## Accessibility

Ensures voting anytime, anywhere, with easy access.

## Real-Time Results

Every vote is traceable and instantly verifiable.

## Trust Rebuilt

Automation fosters confidence in digital vote integrity.

## Voter Login/Verification

Authenticate using biometrics, OTP, or wallet connection for security.

## Candidate Selection

Browse candidates by region and party with detailed info.

## Cast Vote

Submit a one-time, blockchain-recorded vote ensuring auditability.

## Live Analytics

View dynamic results and graphs updated in real time.





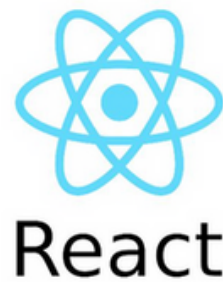
# Technical Approach

## Frontend & Backend

- React / Next.js for UI
- Node.js or Django handles API logic



NEXT.js



React

## Blockchain Layer

- Solidity smart contracts
- Ethereum or Polygon network
- Core functions:  
registerVoter(),  
castVote(), getResults()



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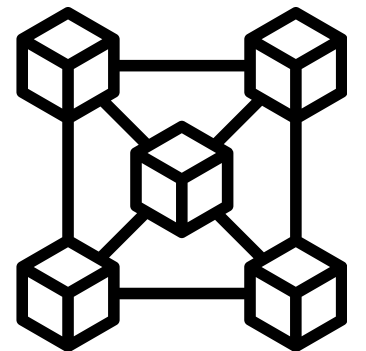


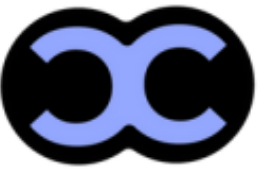
## Data & Security

- IPFS for decentralized storage
- MetaMask/Web3Auth wallet integration
- OTP/biometric fallback for security

## Visualization

- Chart.js and D3.js for real-time result display





# FEASIBILITY AND VIABILITY

## Technological Feasibility

Proven smart contract platforms and IPFS enable deployment.

## Economic Feasibility

Low-cost solutions with Polygon/private chains support large scale.

## Real-World Use Cases

Student councils, local governance, housing societies, and beyond.

## Modular & Adaptive

Easily integrates national ID systems like Aadhaar in future.



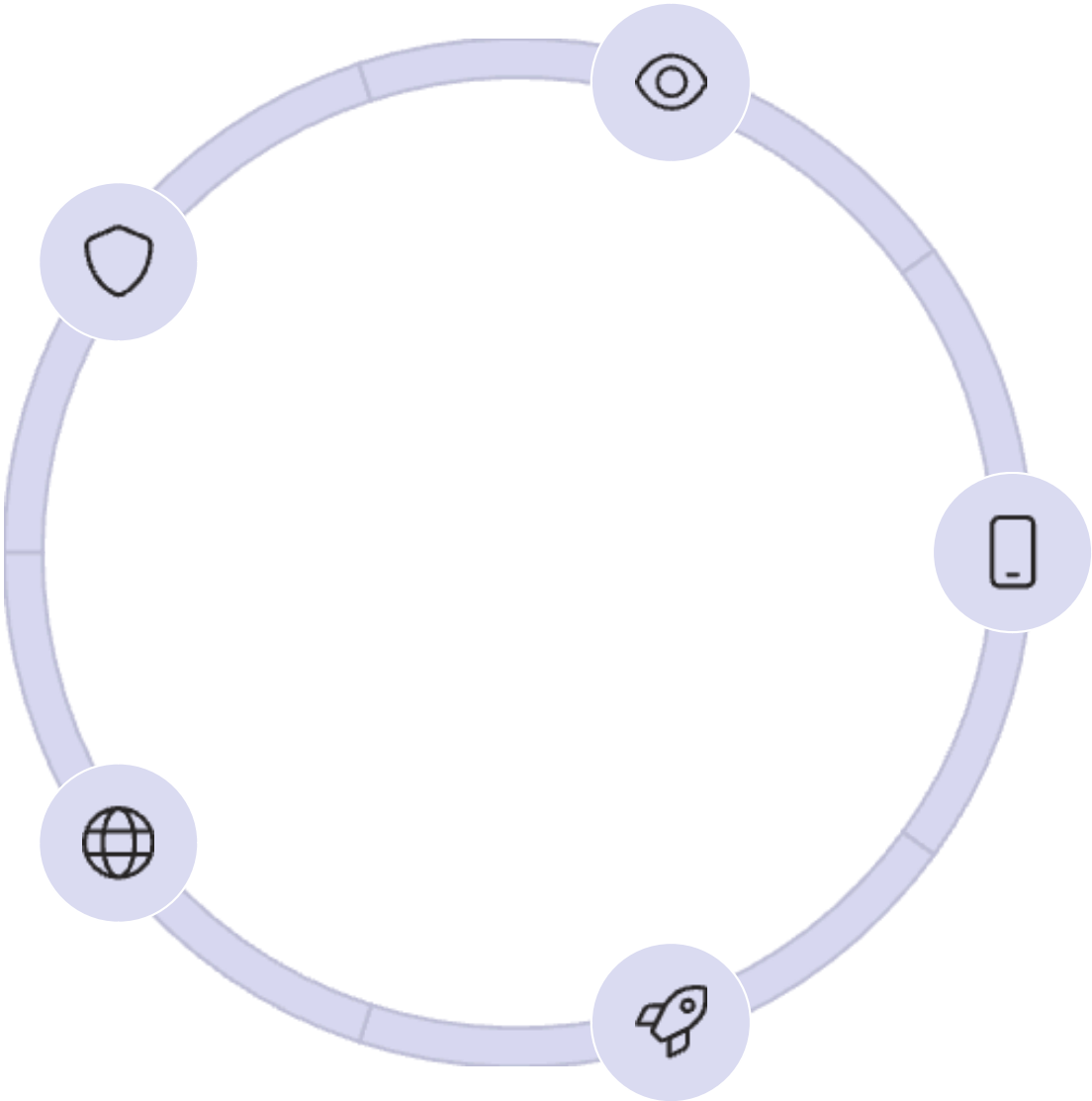
# IMPACT AND BENEFITS

## Security & Trust

End-to-end encryption and immutable vote records.

## Inclusivity

Language and locality adaptations for diverse populations.



## Transparency

Open smart contracts and instant results tracking.

## Accessibility

Remote voting with wallets, OTP, and mobile-first design.

## Efficiency

Instant vote tallying reduces manual processes.



# REFERENCES

- Ethereum Documentation
- IPFS Documentation
- [Chart.js Visualization](#)
- GitHub Sample Voting Contract
- Solidity Docs
- [Web3.js Library](#)
- [Polygon Official Site](#)