

# The Evolution of Modern Banking

---

## **Mainframe in Banking:**

- Mainframes: Large, powerful, centralized computing systems.
- Usage: Transaction processing, database management, security, batch processing.
- Technologies: COBOL, z/OS.

## **ATMs and Electronic Payments:**

- ATMs: Cash withdrawals, deposits, transfers, card technology.
- Electronic Payments: Card payments, online transfers, contactless payments.
- Technologies: Secure card readers, encryption, payment gateways.

## **Internet Banking:**

- Features: Account management, bill payments, fund transfers, online statements, customer support.
- Security: MFA, encryption, SSL.
- Technologies: HTML, CSS, JavaScript, HTTPS, SSL/TLS.

## **Mobile Banking and Apps:**

- Mobile Features: Account monitoring, mobile deposits, biometric authentication, mobile payments.
- Mobile Apps: User-friendly interfaces, push notifications, personal financial management.
- Security Measures: Biometric security, tokenization, app permissions.
- Technologies: Mobile app development (iOS, Android), API integration, security frameworks.

## **Blockchain and Cryptocurrencies:**

- Blockchain Overview: Decentralized, distributed ledger technology.
- Key Components: Blocks, decentralized network, cryptographic hashing, consensus mechanisms.
- Mining in Cryptocurrencies: Definition, miners, reward system, security mechanism.
- Technologies: Ethereum, Hyperledger, Binance Smart Chain, Bitcoin, Ethereum, Ripple, Litecoin, smart contracts.