Leveraging blockchain ecosystem for business
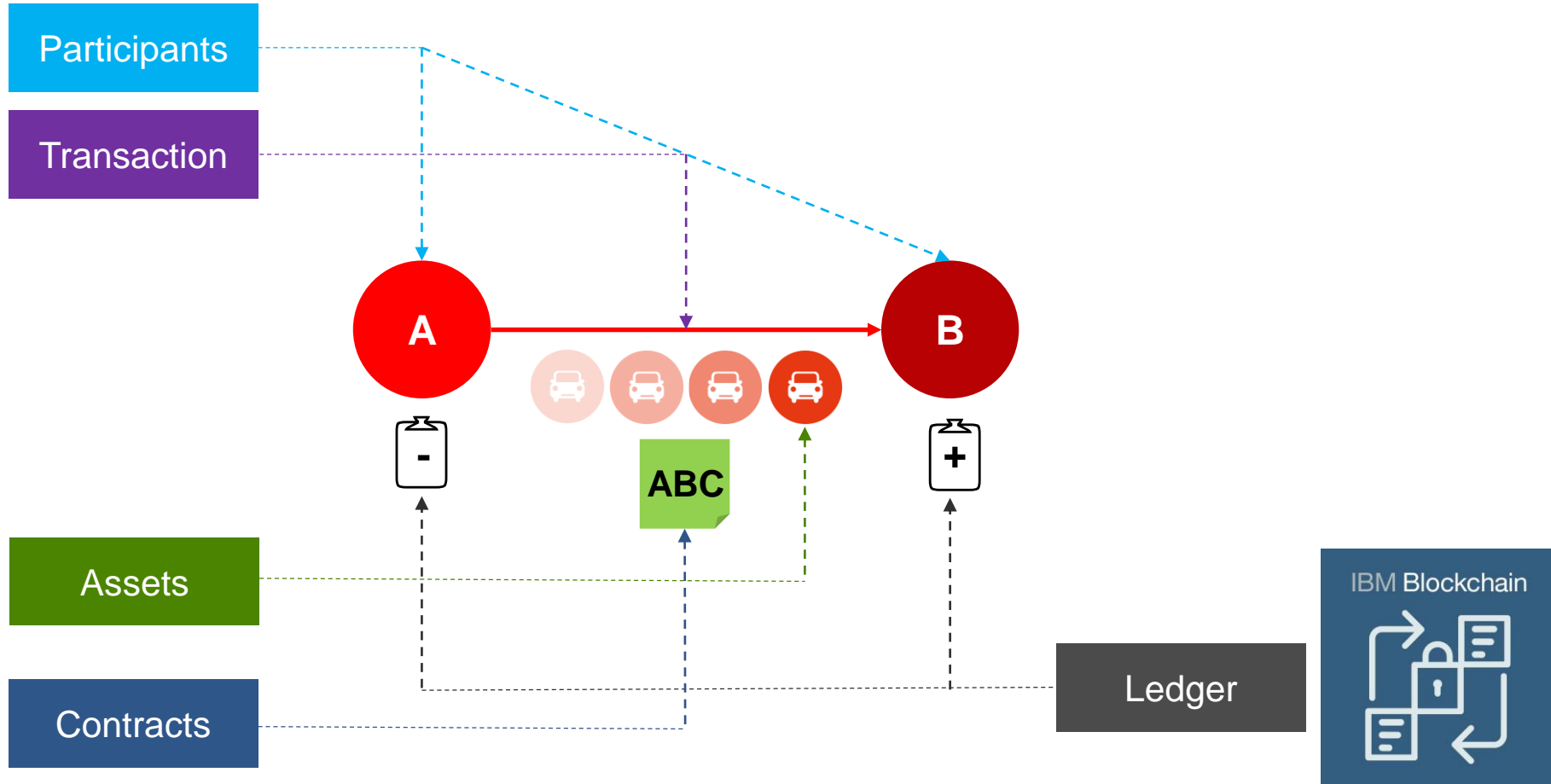## IoT in Supply Chain
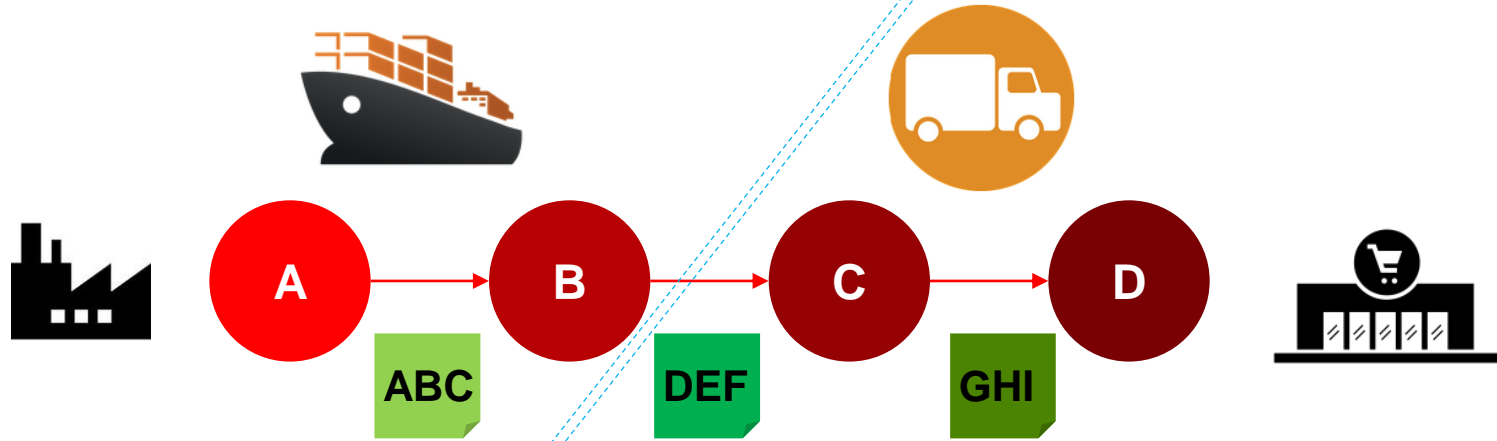
Maciej Jedrzejczyk
IT Architect | CEE Blockchain Team
@mjedrze

IBM Blockchain

A business network defined

Supply Chain – A distributed business network

Complexities in distributed business networks

Technical

- Management of disparate data

- Uncertainty: provenance, finality

Non-technical

- Jurisdiction-specific legal order

- Regulatory oversight

IBM Blockchain

Solution : Blockchain + IoT ecosystem

Analysts project by 2025, data from connected devices will yield insights driving potential economic value of as much as USD 11 trillion

IoT Data → **Blockchain** → **Business Network**

Blockchain-based business network in IoT

Problem

- How a collected data can be trusted by business participants?

IBM Blockchain

Blockchain-based business network in IoT

Solution

- **Single view:** shared transactions ledger with tamper-resistant records.

- **Distributed consensus:** access and supply IoT data without the need for central control and management.

- **Transparency, accountability and trust:** All business partners can verify each transaction.

IBM Blockchain

Use Cases

Industries

- Automotive, Electronics, Insurance, Manufacturing, Retail

Applications

- Supply Chain : freight transportation, component tracking and compliance

- Operational data log for maintenance : fleet and facilities management, infrastructure safety, product development
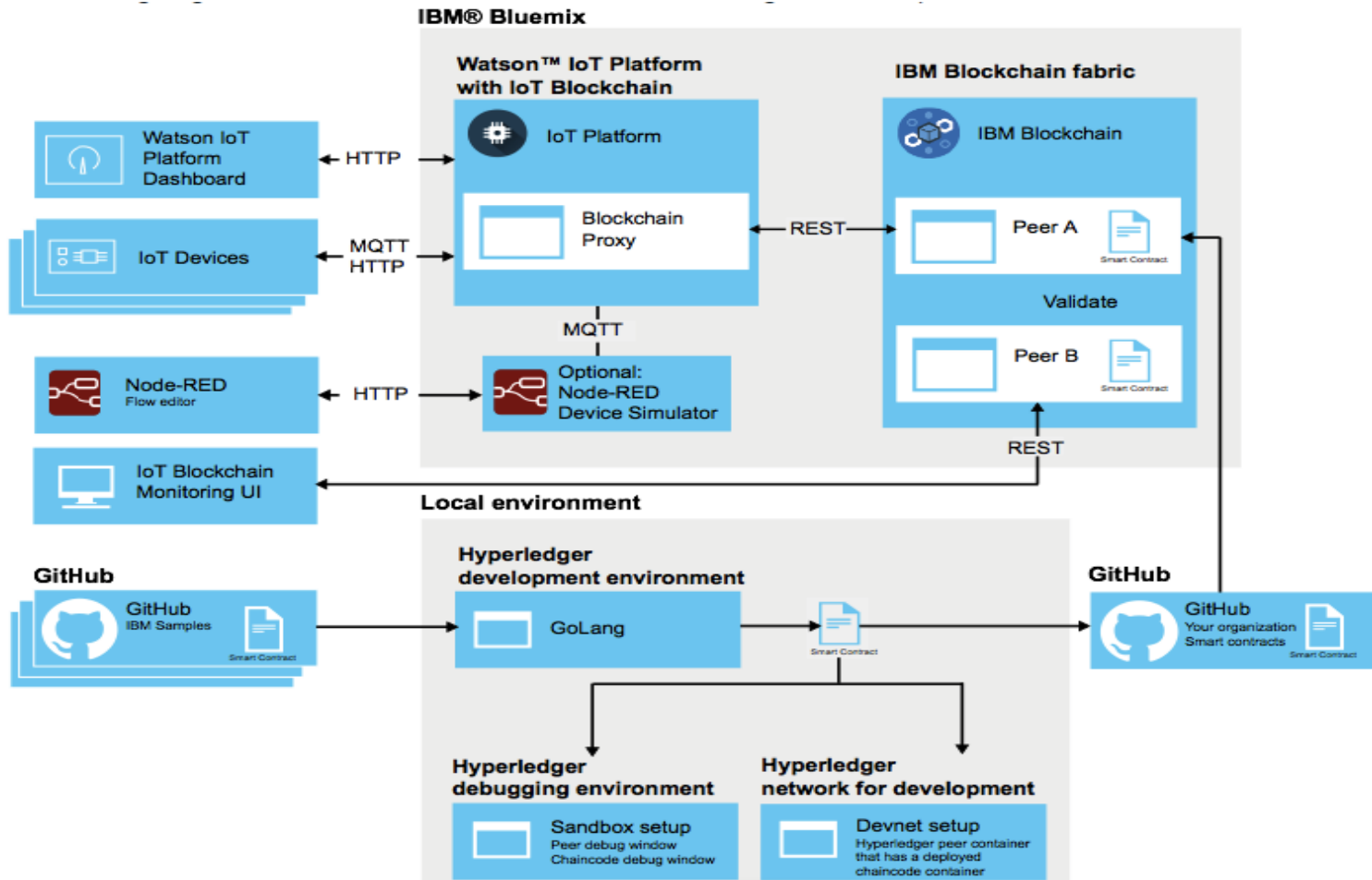
IBM Blockchain

Demo

Demo Architecture

Conclusion

Blockchain + IoT ecosystem are enablers for:

- Building more efficient business networks based on robust, reliable data

- Faster resolution of disputes (breached contract terms, automated contract clause enforcement)

- New business developments in a variety of industries and applications

Q&A

Maciej Jedrzejczyk
IT Architect | CEE Blockchain Team
@mjedrze

IBM Blockchain