



**Asia-Pacific
Economic Cooperation**

2021/CTI/TF/WKSP1/004

Create the Future of Trade with Blockchain - Start from Japan and ASEAN

Submitted by: TradeWaltz



**Utilizing Digital Technology in the Field of
Trade Facilitation Under the Current
COVID-19 Pandemic and Beyond: Best-
Practices Sharing Workshop - Trade
Facilitation Through Trade Platforms
11 May 2021**



Asia-Pacific
Economic Cooperation



NEW ZEALAND
APEC 2021



Create the Future of Trade with Blockchain

~Start from Japan and ASEAN~

May 11, 2021



Agenda

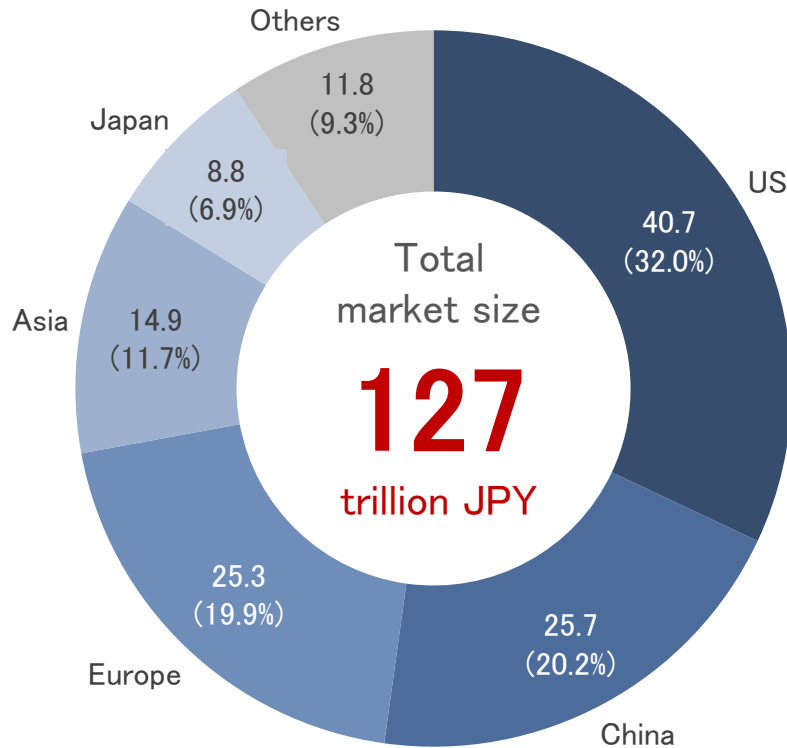
1. Trade platform from Japan: TradeWaltz
2. ASEAN expansion with ASEAN-BAC
3. We shall proceed further collaboration with other platformers

As you know... DX market is emerging

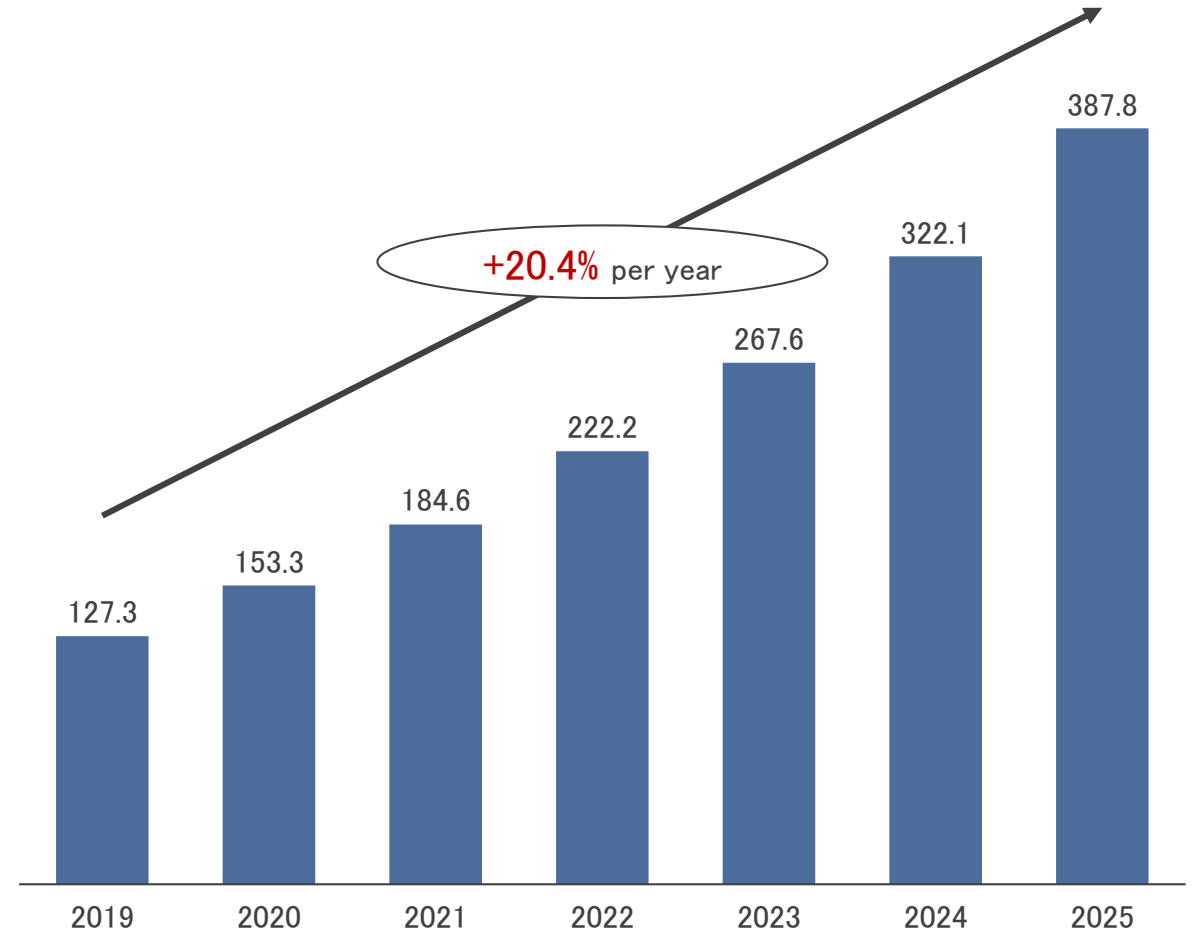
Global DX market size is reaching 127 trillion JPY in 2019.

Growing by 20% each year and may be accelerated by COVID-19.

Region-wise DX market size(2019 | trillion JPY*)



Expected market growth(Global | trillion JPY*)

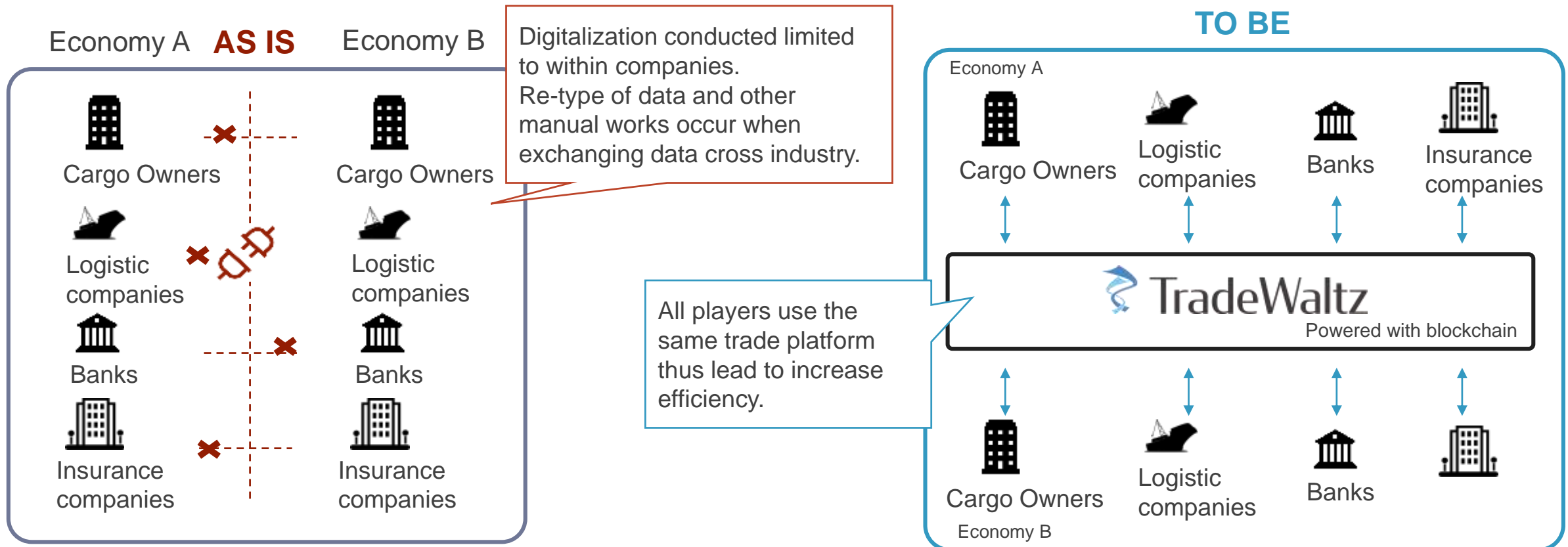


*Calculated as 107.9JPY/USD

Ref: IDC『Worldwide Semiannual Digital Transformation Spending Guide』

TradeWaltz is B2B communication DX platform in trade

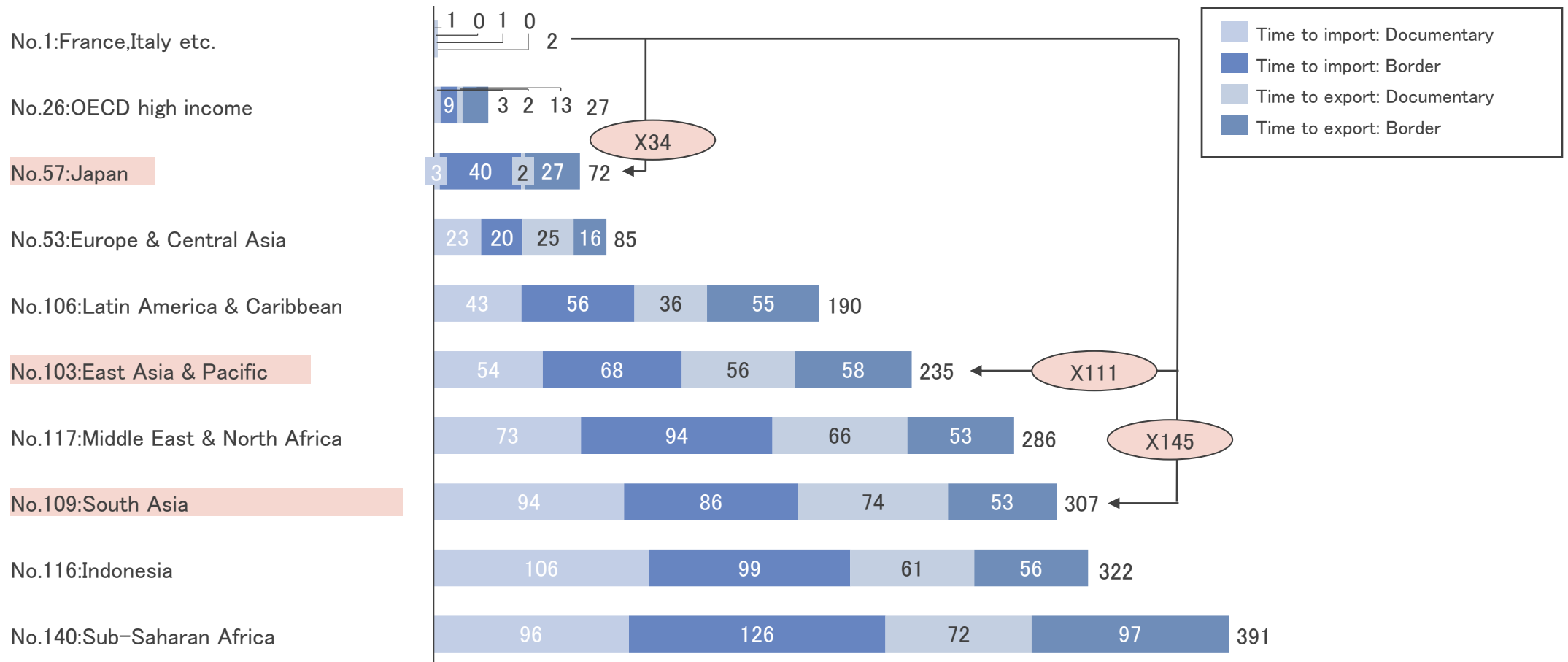
- TradeWaltz is a cross-industry business to business (B2B) trade platform built by utilizing the benefits of blockchain technology.
- TradeWaltz provides a one stop platform for all industry players to increase efficiency and optimize the utilization of EPA/FTA between economies.



Our targeting issue 1) Operation efficiency, speed

- Japan and ASIA respectively take 34 and 111 times more man-hours than EU to process trade transactions.
- EU is going forward at the point of regulation and digitalization.

Time Spent on Trade Transactions (unit: hour)

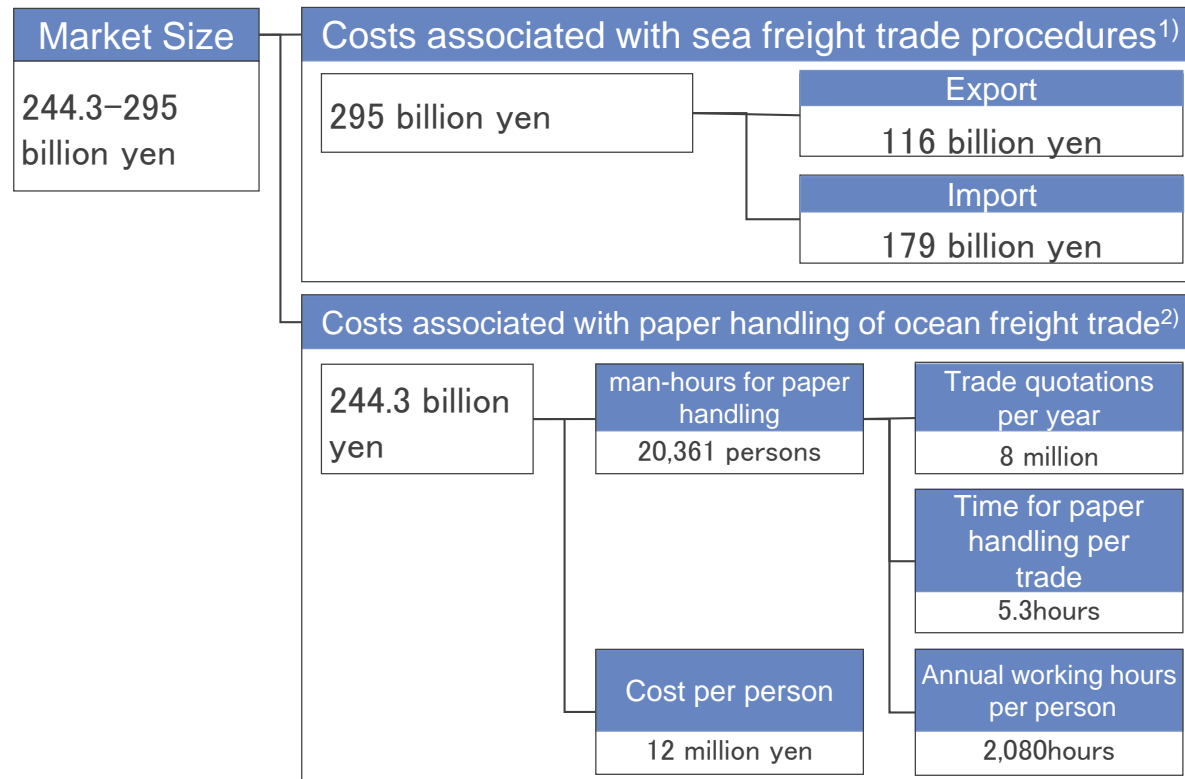


Our targeting issue 2) Paper-work cost

- The market size of the issue in Japan is about 244.3-295 billion JPY per year for the cost of maritime cargo trade procedures.

Market size of this business

The market size of this project is approximately 244.3–295 billion yen, which is the cost of ocean freight trade procedures and paper handling.



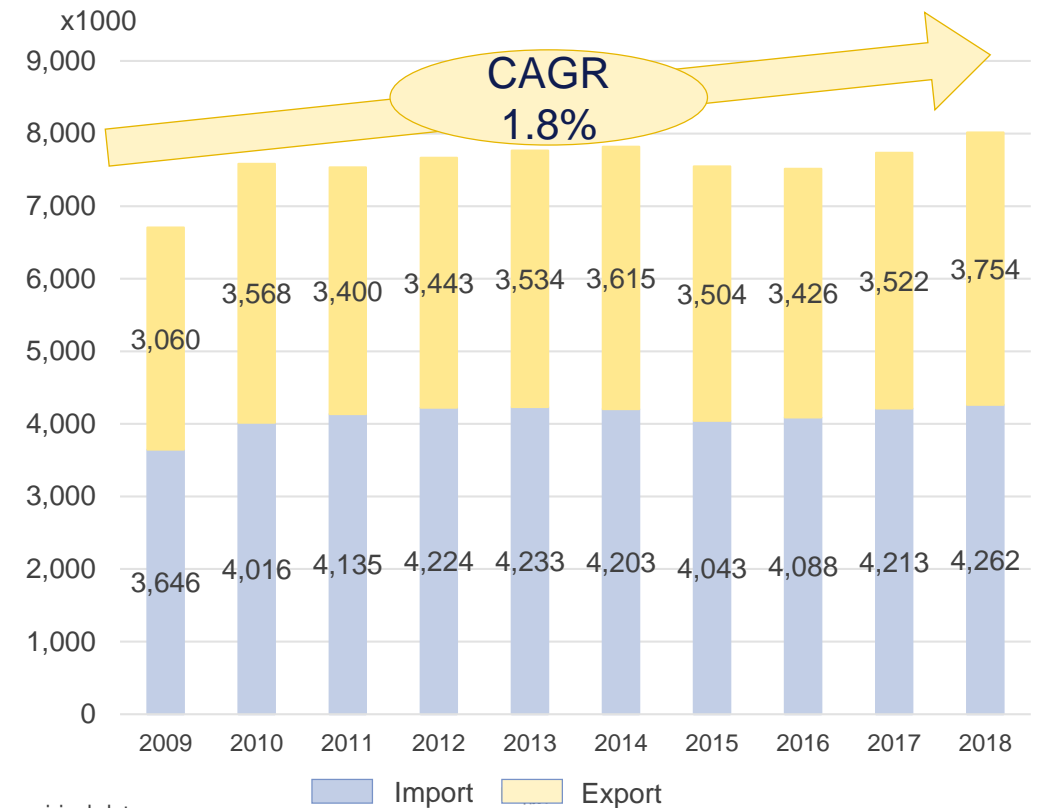
1) Calculated based on the World Bank Group's "Doing Business–Trading Across Borders".

2) Calculated based on empirical data.

3) Based on the number of import/export licenses provided by NACCS. 97% or more of all trade transactions since 2009 have been conducted through NACCS.

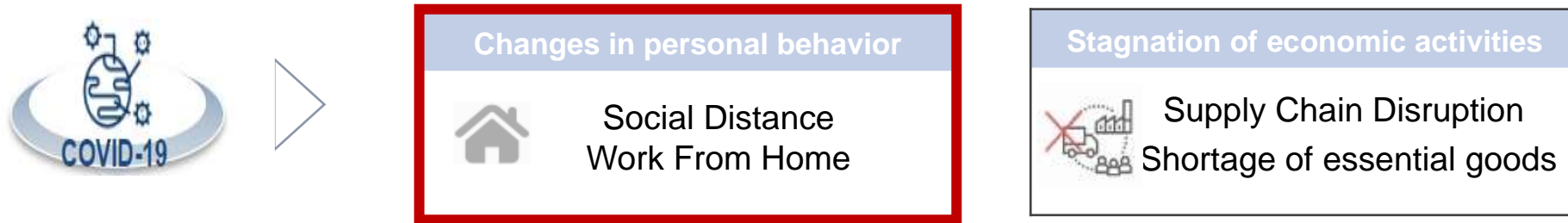
Quotations for seaborne trade in goods ³⁾

The number of sea freight trade transactions has been steadily increasing at a CAGR of 1.8%.

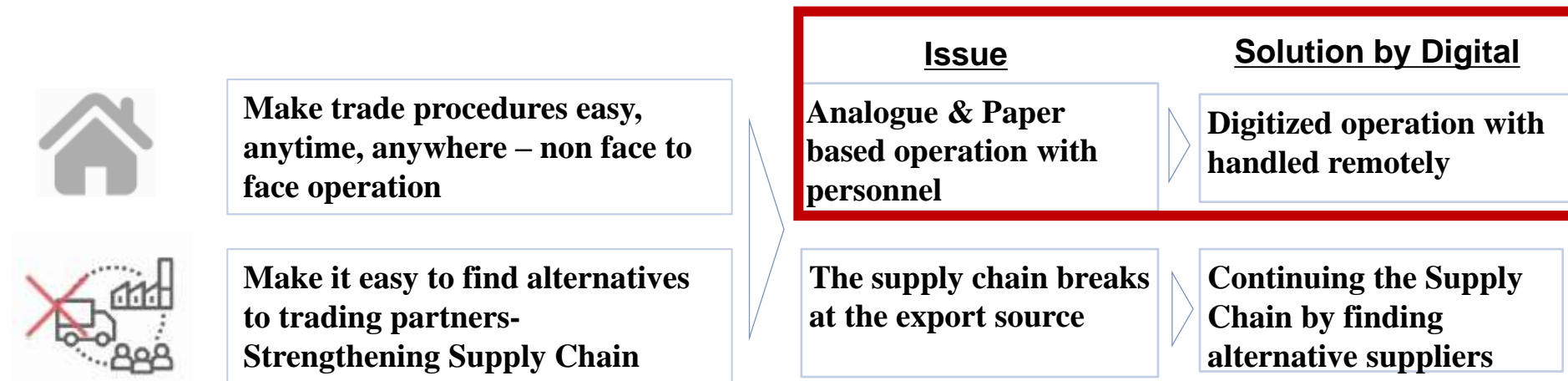


Our targeting issue 3) Needs of remote work in COVID-19

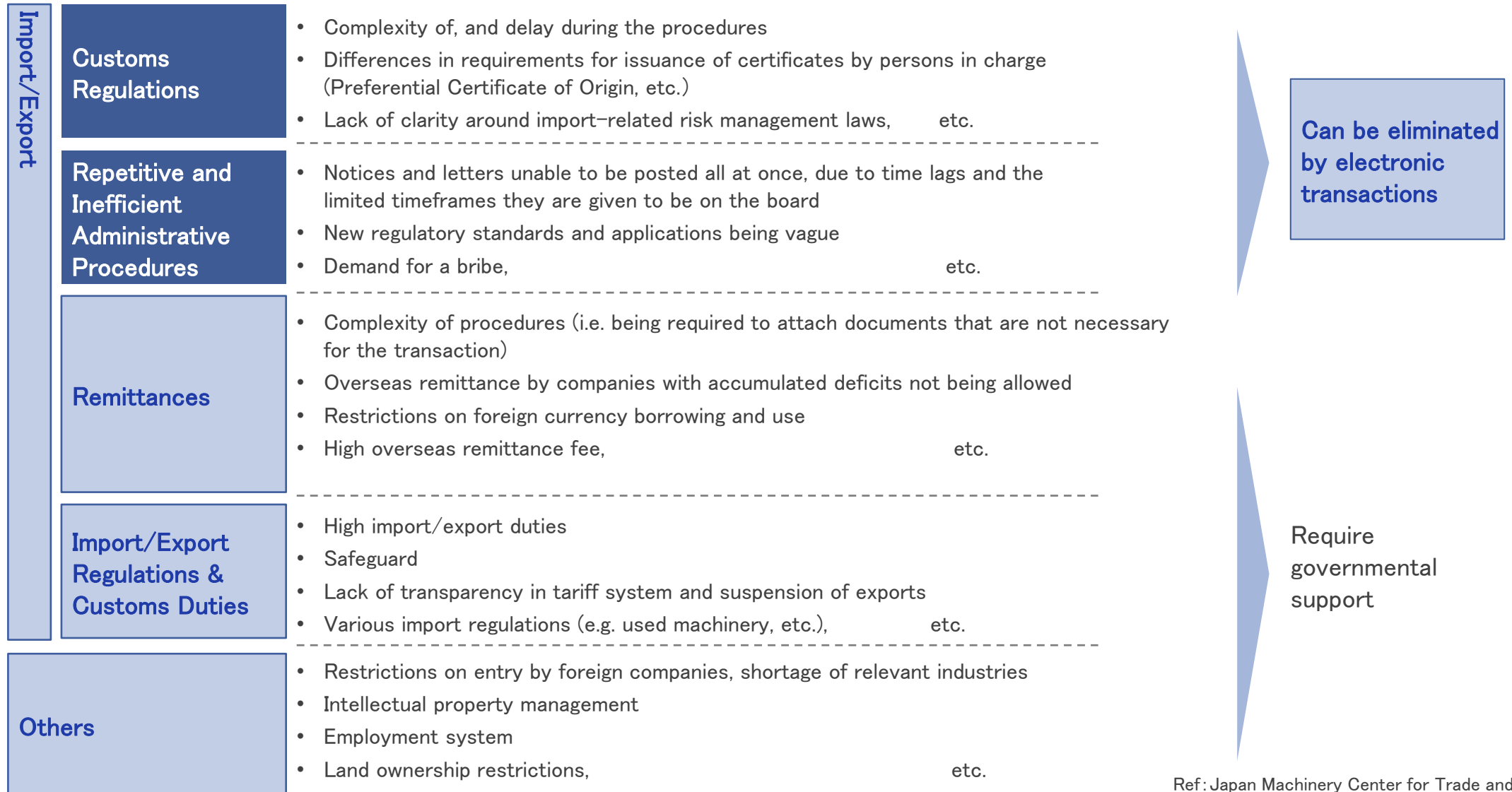
- Due to many tasks that still require paperwork, trade employees in Japan need to come to the office 1-2 times a week even during the spread of COVID-19.
- EU is going forward at the point of rules and digitalization.



By moving from a paper-based trade document to one that is digitalized, ASEAN enjoy major benefits such as reduced face-to-face operation, avoid supply chain disruption.



Our targeting issue 4) Other trade issues



Our challenge to these issues

- Cross-Industry consortium (established 2017) for paperless international trade

	Participating Companies (as of March. 2020)
Banks	MUFG Bank, Ltd.
	Sumitomo Mitsui Banking Corporation
	Mizuho Financial Group, Inc./Mizuho Bank, Ltd.
Insurance Companies	Tokio Marine & Nichido Fire Insurance Co., Ltd.
	Sompo Japan Nipponkoa Insurance Inc.
	Mitsui Sumitomo Insurance Company, Ltd.
Cargo Owners	Sumitomo Corporation
	Mitsubishi Corporation
	Sojitz Corporation
	Toyota Tsusho Corporation
	Marubeni Corporation
	Itochu Corporation
	Kanematsu Corporation
Mitsui & Co., Ltd.	
Carriers / Logistics Companies	Kawasaki Kisen Kaisha, Ltd.
	Nippon Express Co., Ltd.
	Nippon Yusen Kabushiki Kaisha
	Ocean Network Express Pte. Ltd.
Secretariat	NTT DATA (Blockchain Expert)

Activities (2017)

- Identification and sharing of cross industrial business issues
- 55 features, 83 API builds
- Proof of concept with NTP Singapore

Activities (2018)

- Research on AI and semantic technology for L/C document check
- Proof of concept in Japan and Thailand
- Research on relevant laws (MLETR) and submission of written request to government agencies

Activities (2019)

- Release of pilot version
- Trial deployment in Thailand involving 24 companies

Activities (2020)

- Exposure at World Economic Forum 2020 sideline event
- Start commercialization

 Co-invested partners

Built TradeWaltz platform prototype

- We created the TradeWaltz platform prototype using blockchain (https://www.youtube.com/watch?v=y_-d9DBM0CQ)



Built TradeWaltz platform prototype: Features

1 Cross Industry Platform

Players:



Exporter



Negotiation Bank



Issuing Bank



Importer



Insurance Company



Forwarder



Carrier



C/O provider

2 Wide coverage of documents

Structured documents **(NOT PDF)** on the platform



Letter of Credit



Invoice



Sea Way Bill



Packing list



Shipping Instruction



Export Permit



Certificate of Origin



Bill of Exchange



Insurance Policy

And attachment files (PDF etc.)

3 Creation of ecosystem

Utilize the accumulated data in the trade platform to create new business ecosystem.

Built TradeWaltz platform prototype: Business variation

- TradeWaltz will expand its business by providing new value-added services and involving 3rd parties to create an ecosystem which will continuously deliver profitable, attractive and innovative services.



Efficiency of trade operations

New business ecosystems

Option Services

Collaboration with 3rd Party Services



Open API connectivity

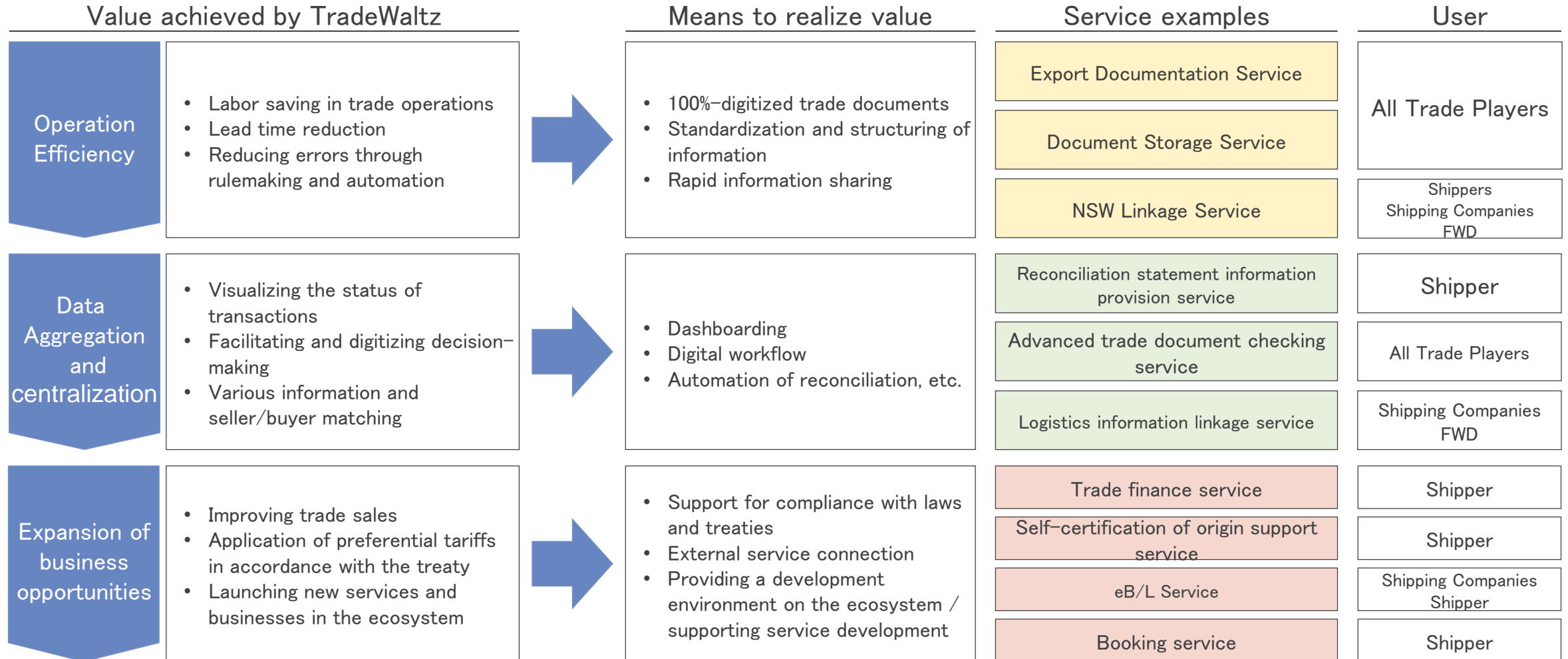
Basic Services



Accumulated trade data

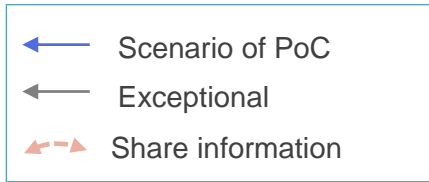
Built TradeWaltz platform prototype: Business variation

- TradeWaltz will provide a series of services to improve operational efficiency, aggregate the related data, and expand business opportunities in trade.

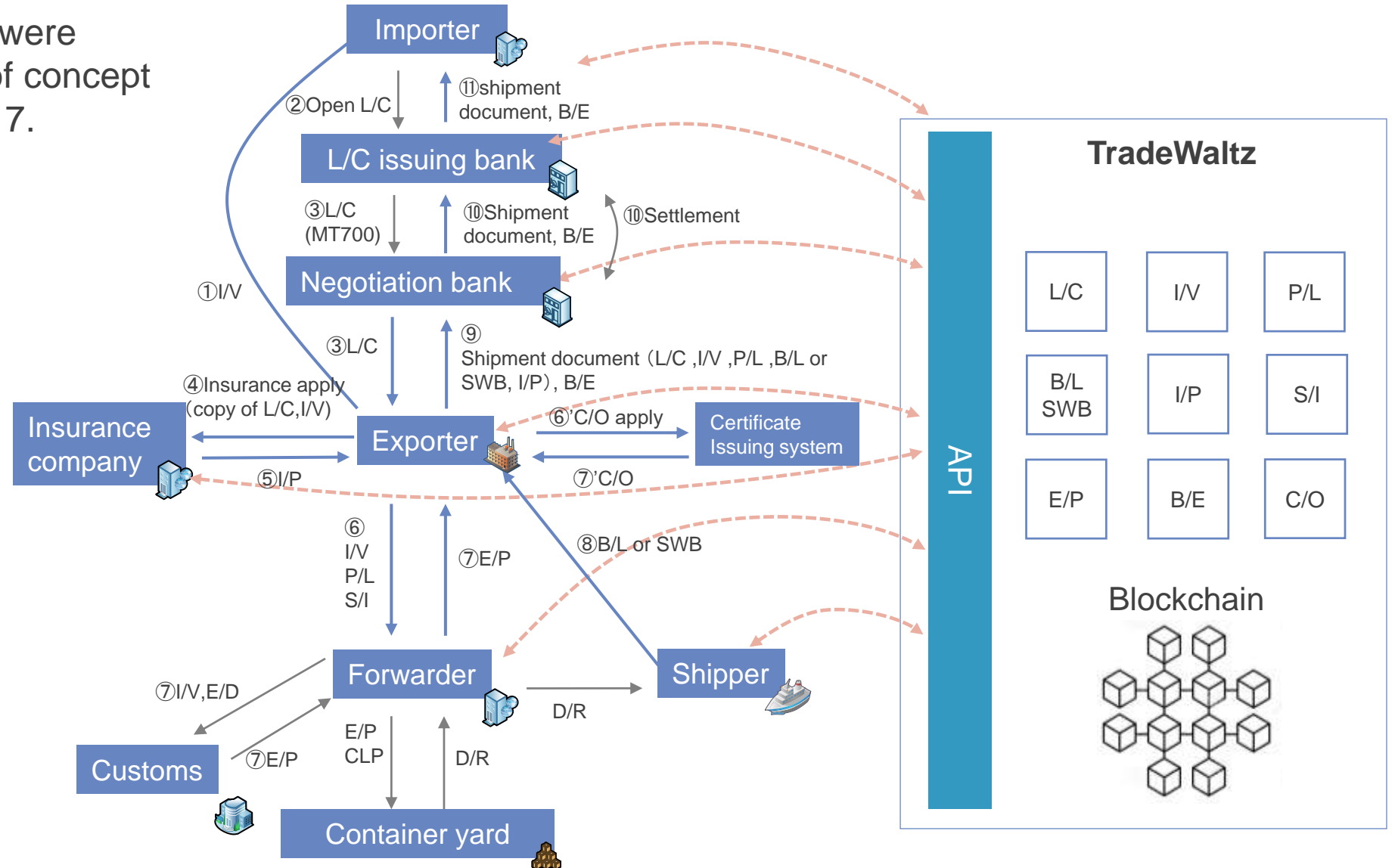


Proved benefits in Japan

Benefits of TradeWaltz were examined in the proof of concept (PoC) conducted in 2017.



L/C: Letter of Credit
 I/V: Invoice
 P/L: Packing list
 S/I: Shipping Instructions
 I/P: Insurance Policy
 C/O: Certificate of Origin
 E/D: Export Declaration
 E/P: Export Permission
 CLP: Container Load Plan
 D/R: Dock Receipt
 B/L: Bill of Lading
 SWB: Sea Waybill
 B/E: Bill of Exchange



Proved benefits in Japan

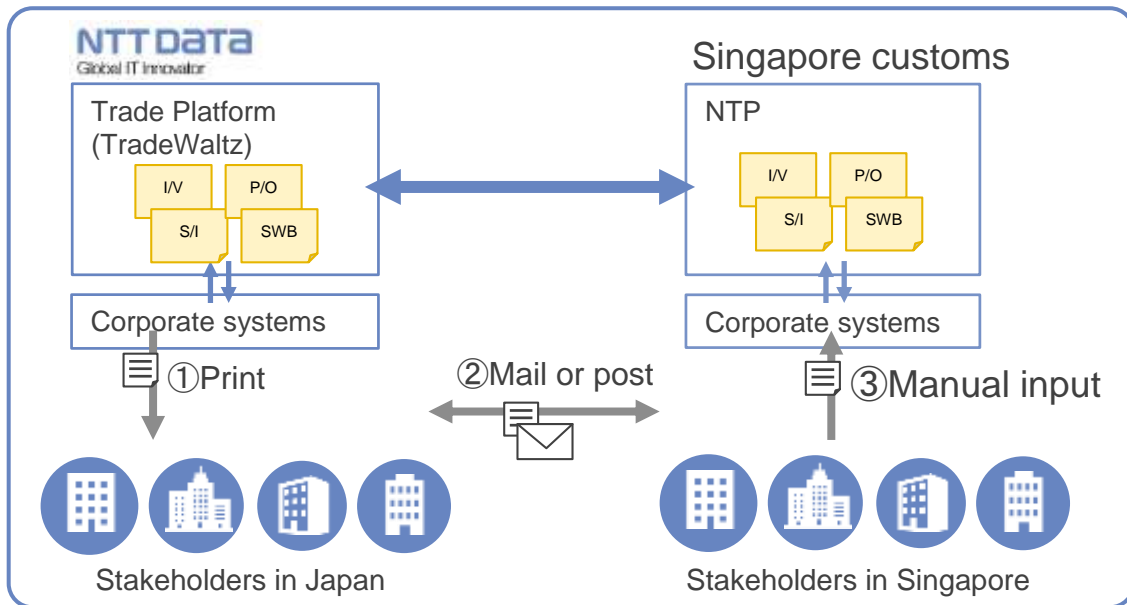
Based on the result of the cross-industrial PoC, TradeWaltz was confirmed that it contributes to the improvement of operational efficiency and the cost reduction effect.

Industries	Procedures	Operational Efficiency/ Cost Saving
Cargo owners	C/O application	60+% Time saving for creating document by pulling data of I/V
Banks	Apply for negotiation of documentary bill	60+% Time saving for confirming the integrity of documents by check function
Banks	Negotiate documentary bill	60+% Time saving for confirming the integrity of documents by check function
Banks	Deliver documentary bill	30 to 60% Time saving for delivering documents to customers
Banks		30 to 60% Cost saving for managing original documents
Insurance Companies	Issue insurance policy	60+% Time saving for creating I/P by pulling data of L/C
Insurance Companies		60+% Cost saving for delivering・managing documents by paperless and collection cost when revising I/P
Carriers/ Logistic Companies	Issue SWB (B/L)	60+% Reduction of B/L operation by paperless of SWB(B/L)

Proved benefits in Japan and ASEAN

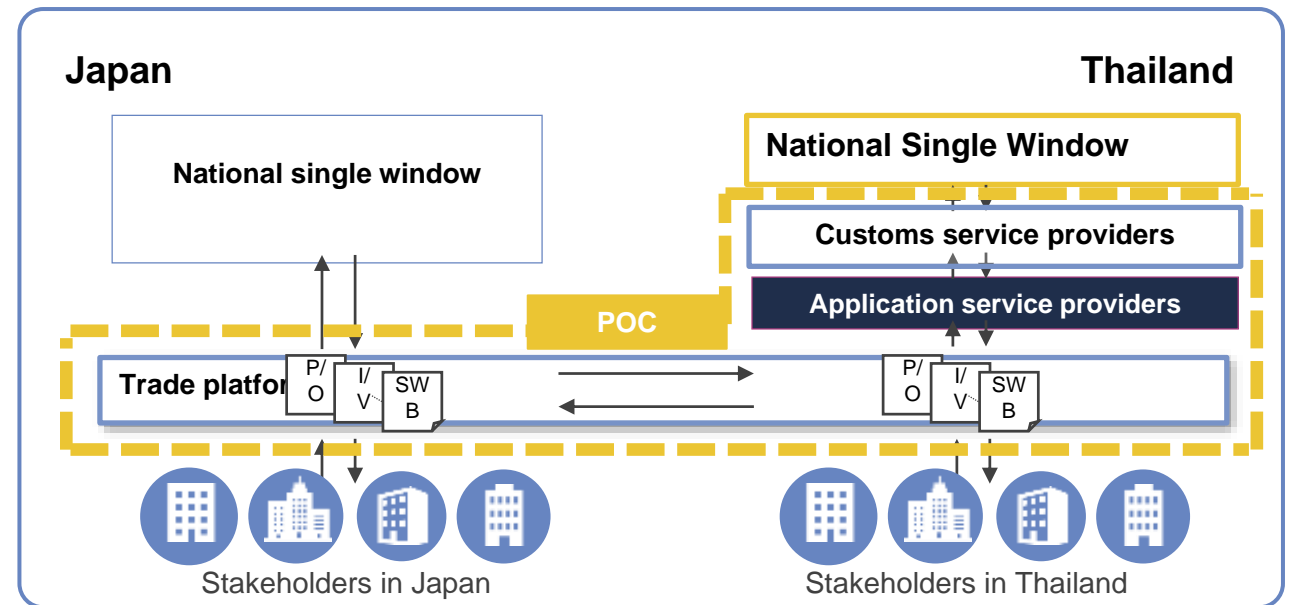
Other Proof of Concepts have also been conducted with Singapore and Thailand. With Singapore, it was confirmed that NTTData has interoperability with Singapore platform. With Thailand, the introduction of TradeWaltz proved over 50% of operational efficiency improvement and accelerate remote work.

Proof of concept with Singapore NTP (2017-2019)



Proved **Interoperability** Between Platforms

Proof of concept with Thailand (2019-2019)

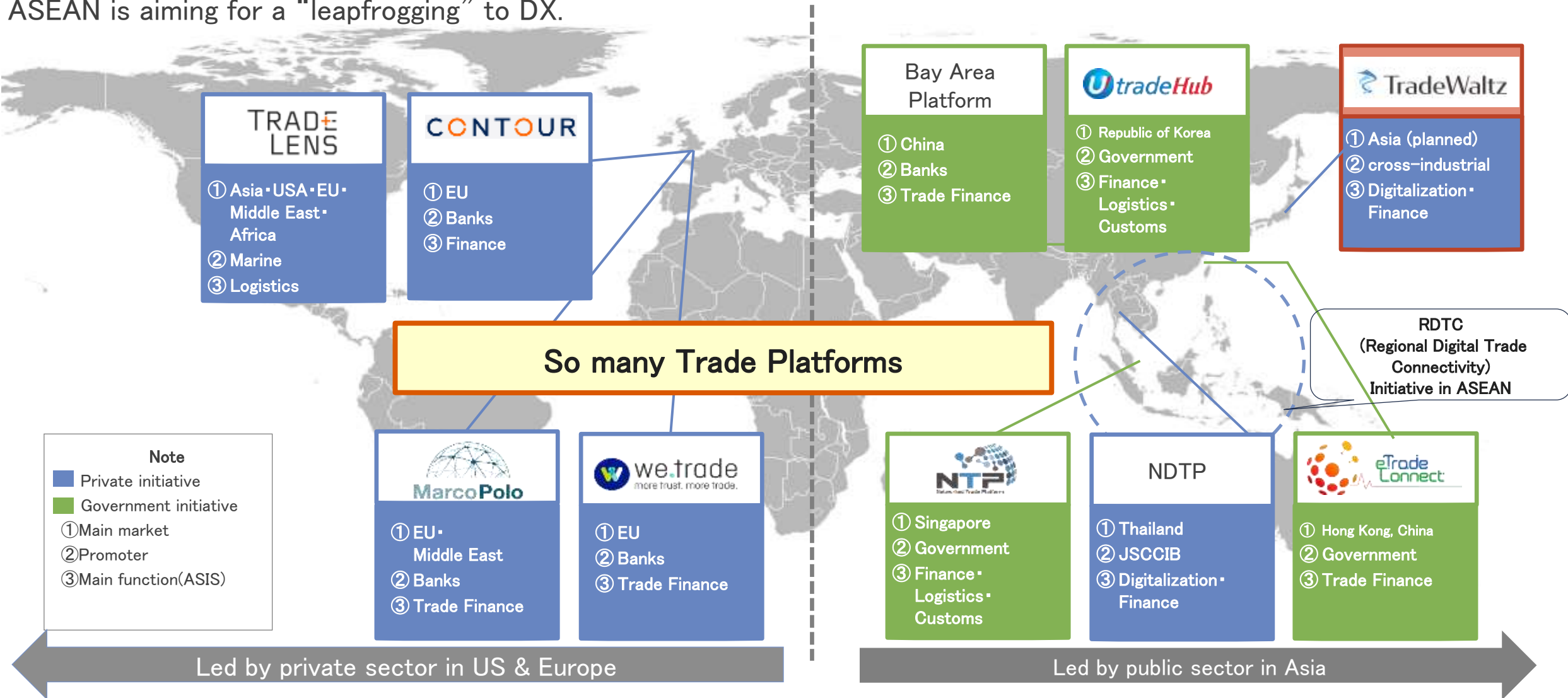


Proved **over 50%** Operational Efficiency improvement in Stakeholders and accelerate remote work

The number of digital trade PFs is increasing

Same as in Europe & US, Trade PF initiatives are gaining momentum in Asia.

ASEAN is aiming for a “leapfrogging” to DX.



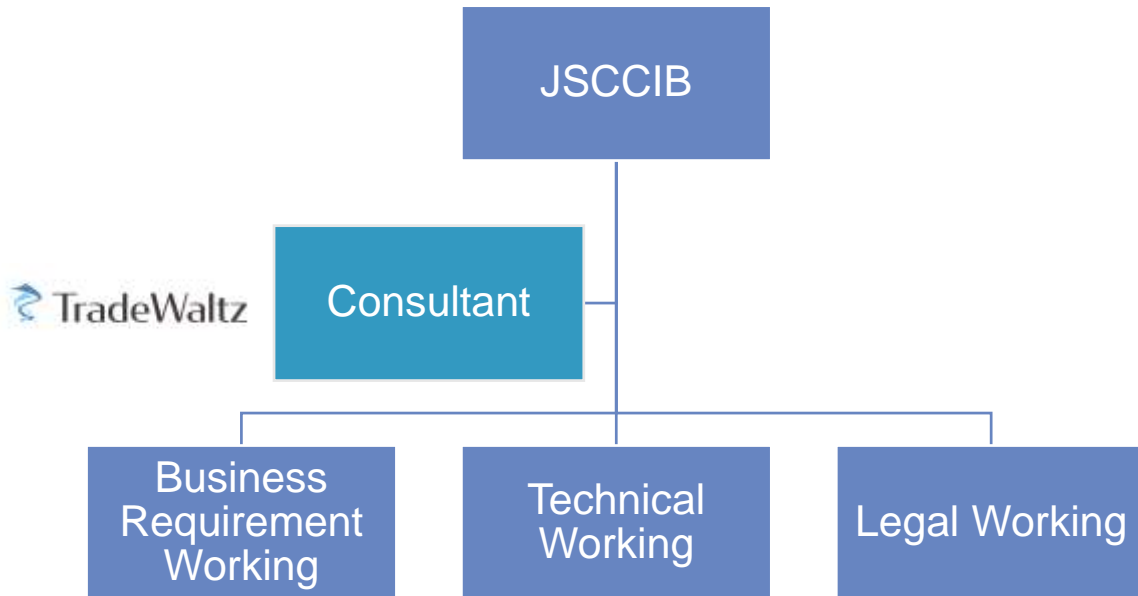
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Thailand, 2019 Chair of ASEAN, started considering with TradeWaltz support

- JSCCIB Thailand takes the lead to drive forward the NDTP.
- (JSCCIB: Joint Standing Committee of Commerce, Industry and Banking.)

JSCCIB's hierarchy in NDTP consideration



JSCCIB organization Structure



Thai Bank Association



Thai Chamber of Commerce



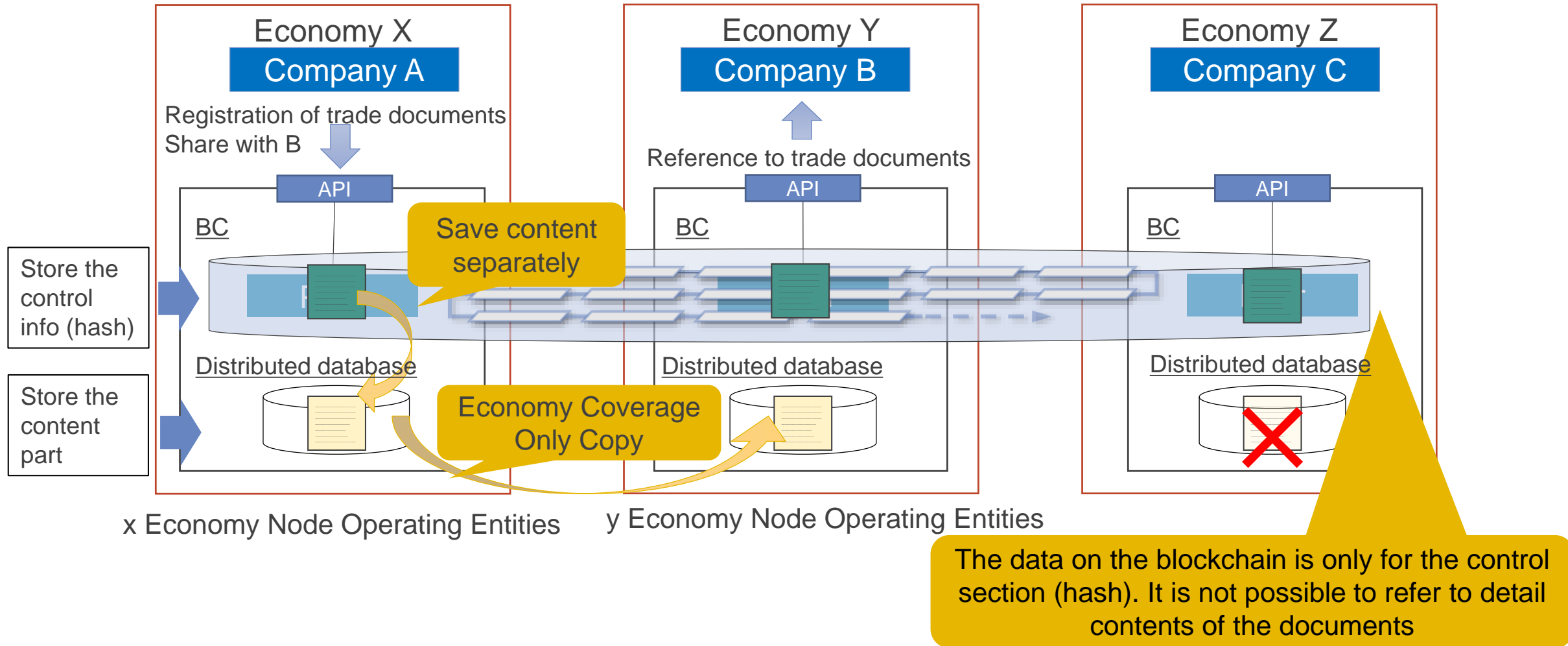
The Federation of Thai Industries

The project started around 2018.

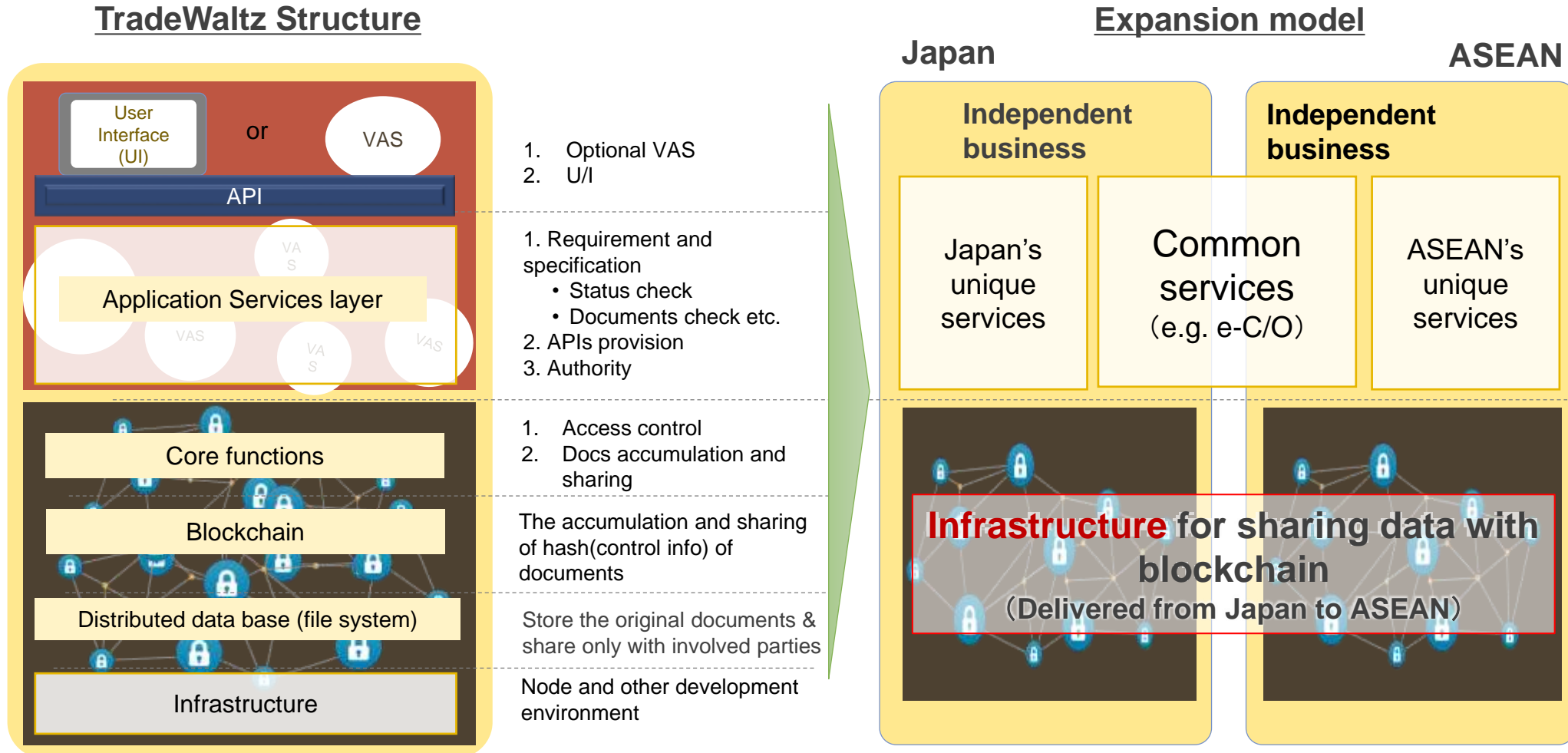
Domestic agenda by the Thai government in 2019.

NTT DATA(TradeWaltz) cooperates with JSCCIB to test the effectiveness of having a B2B trade platform in 2019.

Considered Hybrid data model for security



Ex) suggesting blockchain-sharing model of TradeWaltz



Thailand set digital trade as ASEAN agenda

Bangkok Post

THAILAND WORLD BUSINESS OPINION AUTO LIFE LEARNING VIDEO MORE



Hironari Tomioka, President and CEO of NTT DATA Thailand, said the benefits of using electronic documents for international trade were examined by 47 trial participants including Thai banks, forwarders, and Japanese origin providers and Japanese

Trade documents such as purchase orders, bills of lading, sea waybills, certificates of origin, and trade finance documents were discussed.

"Production costs will be reduced through digital document processing and other

information sharing via trade platforms to prevent the illegal practice of double financing from multiple financial institutions.

The company plans to introduce the platform in cooperation with local government agencies.

In 2017, NTT DATA developed the platform in Japan in collaboration with a cross-industry consortium including representatives from banks, insurance companies, cargo owners and carrier/logistics companies which shared a mutual interest in paperless international trade.

Business forum maps out digital future

New trading platform roll-out set to make bloc's businesses more efficient



NTT DATA, which develops digital trade solutions in Japan, collaborated with the JSCCIB in studying the feasibility and benefits of a cross-industry trade platform.

PF's interoperability (hybrid model) was mentioned at the World Economic Forum 2020 sideline event

International partners ink pact with IMDA to collaborate on digital trade

THE International Chamber of Commerce (ICC) and 17 major multinational firms have signed a cooperation agreement with Singapore's Infocomm Media Development Authority (IMDA) to boost digital trade, which could result in wider adoption of Singapore's TradeTrust framework for connecting digital trade platforms.

Signed at Davos on Wednesday alongside the annual World Economic Forum meeting, the agreement is part of efforts to move from the existing paper-based system for world trade to digitally-enabled trade. The parties agreed to advocate and adopt open and neutral networks, u interoperability.

Moving towards digitalised trade rec trading system, and interoperability noted Minister for Communications Digitalisation Forum. The TradeTrust

TradeTrust aims to ensure interoper allowing digital trade documentation

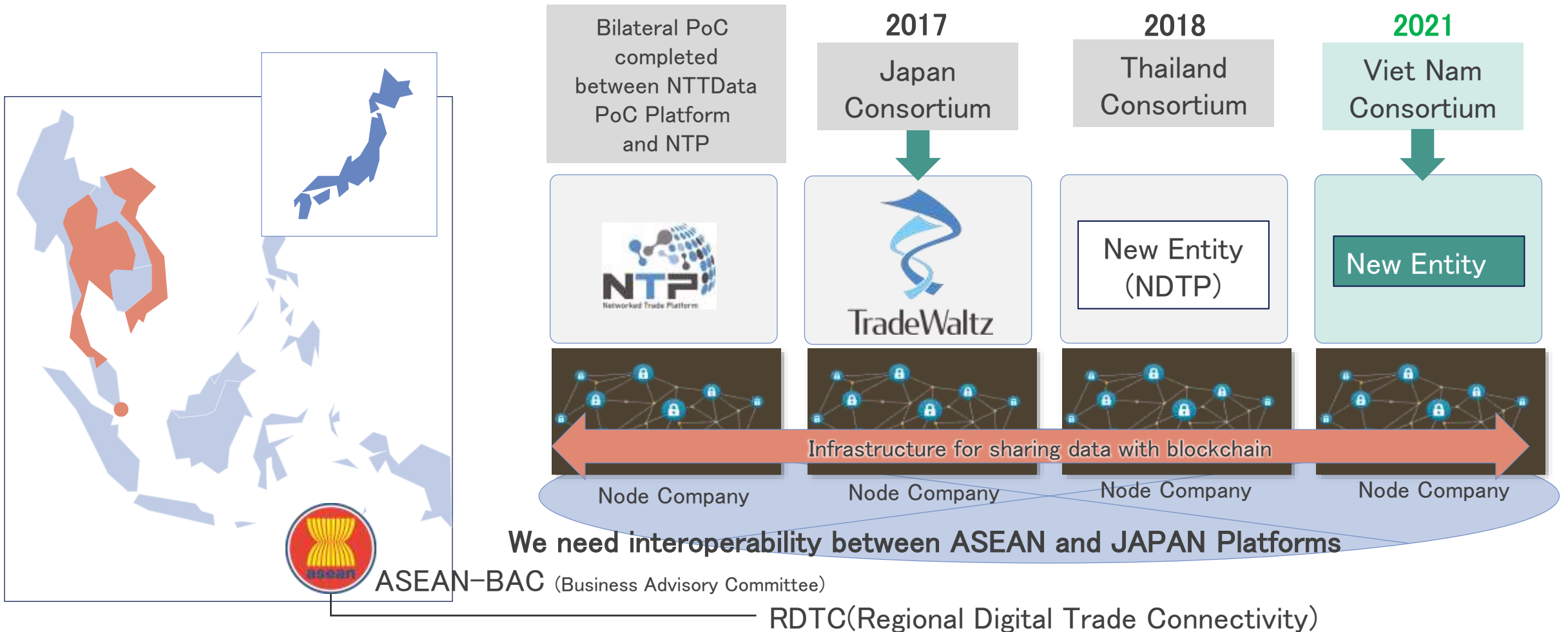


SINGAPORE and ICC collaborate with seventeen key industry partners to enable further digitalisation in international trade



TradeWaltz is now consulting new partner Viet Nam to develop Viet Nam Consortium and to have interoperability with other platforms

- Minister of Economy, Trade and Industry of Japan suggested trade digitalization to Viet Nam in 2020 and started consortium development activity in Viet Nam.



TradeWaltz's Vision for 2022

- Not only constructing new trade platform but we're now planning and having conversation with live-link with the trade platforms of 5 economies, Japan, New Zealand, Australia, Singapore and Thailand.
- We will move forward this future collaboration and announce the result by 2022 APEC.


Illustrative

**National Digital
Trade Platform("NDTP")**
from Thailand



from Singapore

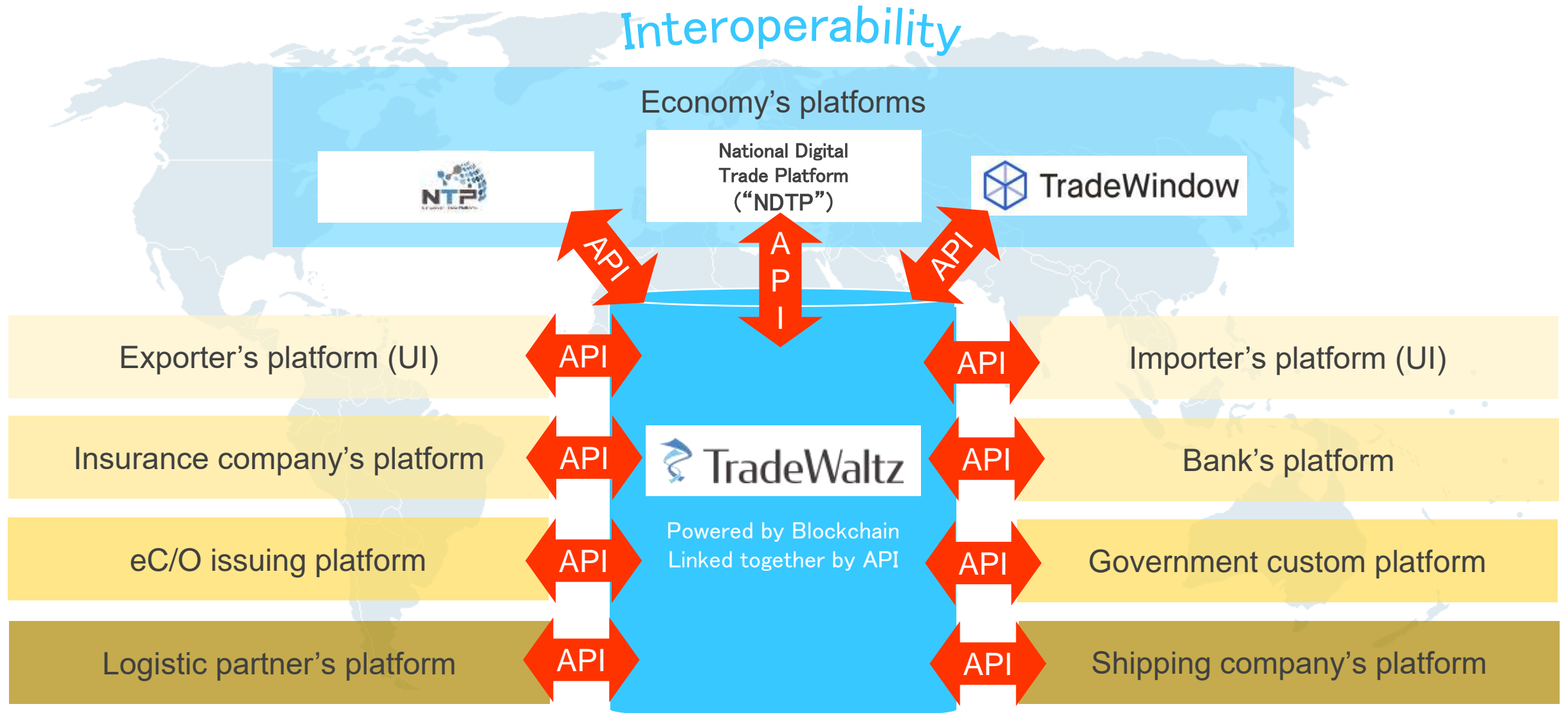
 **TradeWaltz** from Japan

 **TradeWindow** from New Zealand
and Australia

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We shall proceed further collaboration (like API linkage) with 20 other platformers (Exporter's, Importer's, etc.) to build digital trade ecosystem in the world





TradeWaltz