

Factsheet: Benefits of Electronic Transferable Records

MCI/IMDA is amending the Electronic Transactions Act (**ETA**) to adopt with modifications the UNCITRAL Model Law on Electronic Transferable Records (**MLETR**), which will enable the creation and use of electronic transferable records (**ETRs**) under the law. As a result, transferable documents or instruments¹ such as Bills of Lading will be removed from the Exclusion List² of the Electronic Transactions Act (**ETA**).

Benefits of Electronic Transferable Records

There are clear benefits to using electronic forms of such transferable documents or instruments, or otherwise known as ETRs. A bill of lading (**BL**) is a key legal document in maritime trade and can be used to prove ownership of goods in transit. Electronic Bills of Lading (**eBL**) can enable faster transactions, lower cost and greater trust amongst businesses. Citizens can potentially benefit from lower prices of the imported goods as a result of the lowered transaction costs in legal documentation, and the transportation and trade financing processes. Fraud risks and forgeries will also be mitigated through the use of technologies such as digital signatures, centralised ledgers or blockchain.

IMDA, in collaboration with various domestic and international agencies and industry partners, is spearheading the implementation of TradeTrust, a digital utility that comprises a set of globally-accepted standards and frameworks, which also provides proof of authenticity of documents and offers title transfer through open-source software. TradeTrust enables the trusted interoperability of digital trade documents, including that for different eBL solutions, which will accelerate the digitalisation of global trade and enable wider adoption of eBLs. Please refer to **Annex A** for case studies in which Singapore has conducted trials for paperless cross-border trade.

Benefits to the continued minimisation of the Exclusion List

The Government will continue to study the feasibility of extending the applicability of the ETA to more types of matters which are currently excluded. This will bring about clear benefits to citizens and businesses.

The Ministry of Social and Family Development will soon be tabling the Mental Capacity (Amendment) Bill in Parliament, which will allow Lasting Powers of Attorney (**LPA**) to be made and registered electronically. The digitalisation of LPAs will enable more effective processing of LPA registrations and subsequent related matters, as well as more convenient updates, reviews and verification, to ensure that the online copy will be the latest and most updated version. Once the necessary safeguards are

¹ Transferable documents or instruments entitle the rightful holder of a document or instrument to claim the performance of the obligation indicated, such as demanding delivery of goods or payment of money, and to transfer the right to performance by transferring the document or instrument.

² Part II of the ETA contains provisions supporting the legal enforceability of electronic records and signatures. Certain kinds of documents and transactions are excluded from Part II of the ETA, such as negotiable instruments, bills of lading or any transferable documents or instruments.

in place, including those covered by the Mental Capacity (Amendment) Bill, LPAs will also be consequentially removed from the Exclusion List.

Annex A: Case Studies in which Singapore has conducted trials for paperless cross-border trade

First Transaction Conducted via TradeTrust

DBS Bank and Trafigura, in collaboration with IMDA, the International Chamber of Commerce (**ICC**), Enterprise Singapore and technology provider Perlin have developed an open-sourced blockchain trade platform (ICC TradeFlow platform) to connect trade partners across border. Built on IMDA's TradeTrust utility, the partners conducted a successful pilot trade of US\$20 million worth of iron ore shipped from South Africa to China in November 2019. All parties on the blockchain platform are able to communicate trade instructions in real-time, reducing the end-to-end trade document transit time by more than half, from 45 to 20 days.

eBLs for Cross-border Trade Transactions

IMDA has collaborated with the Maritime and Port Authority of Singapore (**MPA**) to conduct technical trials with local and overseas partners, including a trial with Port of Rotterdam Authority, the Netherlands.

IMDA, MPA and Port of Rotterdam Authority have successfully conducted a technical Proof of Concept, simulating the transfer of title for eBLs from a shipper to a consignee between Rotterdam and Singapore. The trial was carried out by representatives from IMDA, MPA, Port of Rotterdam Authority and industry, based on the TradeTrust digital utility.

There are also ongoing trials with the Commerce Bureau Shenzhen Municipality under the Singapore-Shenzhen Smart City Initiative. IMDA and MPA welcome future partnerships with local and overseas supply chain and tech partners.

Trade Digitalisation in General

Many processes for transporting and trading goods are costly due to manual and paper-based systems.

A blockchain-enabled digital shipping platform called "TradeLens", developed by Maersk (the world's largest container carrier) and IBM, will enable participants to digitally connect and share information across the shipping supply chain ecosystem efficiently. They were joined by MSC, CMA CGM, Hapag-Lloyd and Singapore-based Ocean Network Express, the world's top-ranking container carriers and more than 20 port operators including PSA Singapore. The cost of processing the trade documents

could be as much as 20%³ of the physical transportation cost, according to the Maersk and IBM paper trail research in 2014. Hence, by digitalising trade processes, up to 20% cost-saving could be achieved.

³ <https://www.ibm.com/blogs/blockchain/2018/04/enterprise-ready-blockchain-brings-transparency-to-supply-chains/>