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Mizuho Financial Group, Inc.
Mizuho Bank, Ltd.
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[FinTech] Mizuho Embarks on Project with IBM Japan to Conduct Actual Trade Transactions Using Blockchain

Mizuho Financial Group, Inc. (President & Group CEO: Yasuhiro Sato), Mizuho Bank, Ltd. (President & CEO: Koji Fujiwara) (collectively "Mizuho"), and IBM Japan, Ltd. (General Manager: Elly Keinan) are pleased to announce a joint project to analyze the results of actual trade transactions conducted using blockchain¹ technology starting from around June 2017 with the aim of providing increased efficiency in the field of trade finance.

One of the key features of blockchain is the ability to quickly and securely share data among participants. Trade transactions involve a large number of parties including the exporter, importer, insurance company, shipping company or other logistics providers, port operators and port authorities, and financial institutions. Currently, these transactions require paper-based exchanges. We anticipate that the application of blockchain technology to these kinds of transactions will enable the digitalization of the documents involved in trade finance as well as the fast and secure exchange of information.

In this project, Mizuho and IBM Japan will work together to apply blockchain technology to the actual trade transactions of Mizuho's clients and analyze the results. Specifically, Mizuho and IBM Japan will use Hyperledger Fabric², a blockchain framework implementation and one of the Hyperledger³ projects hosted by The Linux Foundation⁴, an open source⁵ community which promotes the sharing of technology resources. The focus of this project is using blockchain for the exchange of digital letters of credit in connection with trade transactions between clients in Japan and international locations. Documents will be shared in digital form with the importer, exporter, financial institutions, and other involved parties using distributed ledger technology. We anticipate that this system will reduce the time and operational costs associated with trade transactions by simplifying the process of creating and exchanging documents, in addition to enabling all involved parties to share and view the most recent status of the transaction.

We believe that this project will bring us one step closer to the actual commercial use of this technology. Mizuho will continue to incorporate the latest technologies into innovative service offerings, with the aim of providing our clients with consistently better financial services.

- 1: Blockchain is a form of distributed ledger technology. It utilizes a system of consensus formation among participants to enable transactions to take place even in the absence of a trusted central authority. Because it is easy to audit, has built-in protection against double entries, and is virtually impossible to falsify transactions, the technology has a number of potential applications in a wide range of fields across financial services including payments/settlements and securities; as well as other forms of asset transfer, such as land registration.
- 2: Hyperledger Fabric is a blockchain framework implementation and one of the Hyperledger projects hosted by The Linux Foundation. Intended as a foundation for developing applications or solutions with a modular architecture, Hyperledger Fabric allows components, such as consensus and membership services, to be plug-and-play.
- 3: Hyperledger is an open source collaborative effort created to advance cross-industry blockchain technologies. It is a global collaboration including leaders in finance, banking, Internet of Things, supply chains, manufacturing and Technology.
- 4: Founded in 2000, The Linux Foundation is the organization of choice for the world's top developers and companies to build ecosystems that accelerate open technology development and commercial adoption, providing tools, training and events to scale any open source project.
- 5: Open source refers to software whose source code, or programming, is publicly available for free study, use, modification, or redistribution by anyone, within the specifications of the software's license.