

ISO 20022: An Introduction

What is ISO 20022? Why are there so many payment articles about ISO 20022? Does my credit union need to become an expert in ISO 20022 to be ready for faster payments? Fortunately, the answer to that last question is no. Today's legacy payments standards have less flexibility than newer standards to effectively adapt to the new digital economy and the growing demands of the information age. ISO 20022 is simply the messaging format being promoted as the standard framework to enable a common global "language" for messaging in payments and cash-management reporting.

Today there is a slow but certain convergence toward ISO 20022, which is why there are so many articles on the topic lately. We are observing different adoption scenarios worldwide by payments market infrastructures. For example, The Clearing House's RTP® network "uses ISO 20022 messages to enable a conversation between buyers and sellers over their secure bank channel. This core capability can be used in countless ways to improve efficiency and the end-to-end customer experience." *Source: The Clearing House.*

This educational article attempts to breakdown the basics of ISO 20022.

Definition of ISO 20022

ISO 20022 is a financial messaging methodology that creates standard, consistent payment messages across all business processes within the financial services industry.

- + ISO 20022 is a standard for standards—a "recipe" or a standard approach to building message standards across financial services." Source: Introduction to ISO 20022 for U.S. financial institutions (NACHA)
- + "ISO 20022 is the standard that provides the rules for how to develop the messages and the documentation of the messages." Source: Business Payments Coalition, 2017

What does ISO stand for?

ISO is the International Organization for Standardization. It has a membership of 161 national standards bodies (NSBs) from countries large and small, industrialized, developing and in transition, in all regions of the world. Source: ISO 20022 for Dummies



History and governance

- + The origins of ISO 20022 come from the securities messaging standard ISO 15022 developed in the 1990s.
- + In 2004, the scope was broadened to include all financial services to form what would become ISO 20022 Universal financial industry message scheme (also known as ISO 20022/UNIFI, now abbreviated to ISO 20022).
- + ISO 20022 is a multi-part International Standard prepared by ISO Technical Committee TC68 Financial Services.
- + Formal process for updates to the standard

Problems addressed

- + There are many different standards with their own messaging methodology that currently exist for financial messaging, depending on the participant, the geography and the business areas. The widespread use of varying standards poses a problem to automating processes and value chains in the financial services industry.
- + Current messaging standards are based on dated technology and are expensive and difficult to implement.
- + Legacy standards have less flexibility to effectively adapt to the new digital economy and the growing demands of the information age.

Components of the ISO 20022 standard

The standard itself describes the development methodology, the registration process and the organization of the central financial repository that contains the ISO 20022 messages and their components. The ISO 20022 standard consists of eight parts:

- + Part 1: Metamodel
- + Part 2: UML profile
- + Part 3: Modelling
- + Part 4: XML schema generation
- + Part 5: Reverse engineering
- + Part 6: Message transport characteristics
- + Part 7: Registration
- + Part 8: ASN.1 generation

Source: https://www.iso20022.org/fag

The output of ISO 20022 work is the message definitions and formats:

- + ISO 20022
 - Rules & Process Message Structure Governance (like the example below)



Defining the business model

"The ISO 20022 business model is an industry standard dictionary. More precisely, the business model defines the activities or business processes, the business roles and actors involved in those activities, and the business information needed for those activities to occur. The ISO 20022 data dictionary helps the financial community align the common business concepts." Source: Introduction to ISO 20022 for U.S. financial institutions

ISO 20022 is a "repository of standard financial messages." ISO Registration Authority administers the official repository, which includes the data dictionary, the business process model and usage guides. *Source: Business Payments Coalition 2017*

ISO20022 Dictionary helps the financial community do business by providing concise definitions for common business concepts used in the messaging.

Usage

ISO20022 is use for several kinds of financial transactions:

- + Card
- + Foreign Exchange
- + Securities
- + Trade
- + Payment
 - Initiation
 - Clearing & Settlement
 - Remittance Detail
 - Cash Management Reporting
 - Bank Account Management

Most common payment message types:

- + Customer payment initiation
- + Bank-to-bank settlement
- + Cash management reporting

Source: Business Payments Coalition, 2017

Benefits/opportunities

- + Improved regulatory reporting, compliance and auditing: The richer data and party structure also facilitate the task of extracting and sharing information with regulatory and compliance authorities more easily compared to traditional payments data and process models.
- + Expanded cross-border trade: The ability to communicate in a common language eliminates the risk of confusion, and thereby removes a lot of the friction, waste and cost associated with international payments.
- + Value of "actionable" big data: ISO 20022's structured data and business model, provides valuable insights and foresight that can be gleaned from it.
- + Lower costs and efficiency gains: Because the entire chain uses a uniform format for payments—from origination to settlement and acknowledgement—to satisfy operational and data requirements, processing time is shortened, and the likelihood of errors is minimized. In turn, all parties in the chain benefit.

- + Integrated payables, simplifying processes: ISO 20022 can accommodate different payment types such as low-value and high-value payments, as well as checks, and can work domestically or across borders.
- + Future proof technology: A growing trend in the industry is to future-proof internal bank infrastructure streamlining the different connections and different formats with the use of ISO 20022.
- + Revenue opportunities, and value-added products and services: There is an opportunity to leverage the ISO 20022 standard as a vehicle to help deliver innovative products and services for more opportunities and revenue. These include testing and validation services; enhanced remittance information, reporting, and analysis; electronic invoicing or e-invoicing and supply chain finance; electronic bank account management (eBAM); and other products and services.