NATIONAL QUALITY FORUM
Driving measurable health improvements together

Leveraging Electronic Health Record (EHR) Sourced Measures to Improve Care Communication and Coordination Option Year

Below are brief descriptions for various background resources with links to additional information. These resources have been included based on feedback from Web Meeting 1 to provide additional context and background information only; full comprehension of these materials is not required. Please review at least the brief descriptions before Web Meeting 2 but note our discussions during the meeting will focus on less technical topics. Please email NQF Staff with any questions.

Interoperability

Interoperability enables the secure exchange of health information electronically from one user to another. This project will consider three interoperability stages: **early** (e.g., improving interoperability of existing health IT networks, scaling existing approaches to exchanging information across platforms, standardizing vocabulary), **intermediate** (e.g., expanding the information exchanged and number of participating providers, integrating multi-payer claims data and registries, aggregating data across entities to manage quality and equity, refining standard vocabulary), and **advanced** (e.g., continuously learning and improving functionality, using aggregated data with local data to create targeted clinical decision support).

- Connecting Health and Care for the Nation: A 10-Year Vision to Achieve an Interoperable Health IT Infrastructure

Office of the National Coordinator for Health Information Technology

The Office of the National Coordinator for Health Information Technology (ONC) is organizationally located within the Office of the Secretary for the U.S. Department of Health and Human Services (HHS). ONC is at the forefront of the administration's health information technology (IT) efforts and is a resource to the entire health system to support the adoption of health IT and the promotion of nationwide, standards-based health information exchange to improve health care.

21st Century Cures Act

The 21st Century Cures Act (Cures Act) Final Rule implements interoperability requirements that promote innovation in the health care technology ecosystem to deliver better information, more conveniently, to patients and healthcare providers. It also promotes transparency by using modern computers, smartphones, and software to provide opportunities for the American public to regain visibility in the services, quality, and costs of health care. For patients, the Cures Act provides ease of access to healthcare records, protects patient privacy and security, and promotes the ability to shop for care and manage costs. For doctors and hospitals, it makes patient data requests easy and inexpensive, allows for choice of secure access to application programming interfaces (APIs), prohibits information blocking, and helps improve patient safety. For health IT developers, the Cures Act establishes API Conditions of Certification requirements.

Health Interoperability Outcomes 2030

Health Interoperability Outcomes 2030 is a prioritized set of interoperability outcomes that align with the 2020-2025 Federal Health IT Strategic Plan. It is aimed at building on current interoperability efforts and working toward longer-term strategies.

United States Core Data for Interoperability

United States Core Data for Interoperability (USCDI) is an ONC initiative that establishes a standard set of health data classes and data elements for nationwide, interoperable health information exchange through new public health application programming interfaces. It sets a foundation for broader sharing of electronic health information to support patient care. The first version of the USCDI was adopted as a standard in the ONC Cures Act Final Rule.

Health Level Seven Fast Healthcare Interoperability Resources

Fast Healthcare Interoperability Resources (FHIR) are a set of international standards for transfer of clinical and administrative data between software applications used by healthcare providers. This includes flexible standards, guidelines, and methodologies allowing healthcare systems to communicate. These data standards are guidelines are a set of rules that allow information to be shared and processed in a uniform and consistent manner to share clinical information.

These standards were created by Health Level Seven International (HL7), a non-profit organization dedicated to providing a comprehensive framework and related standards for the exchange, integration, sharing, and retrieval of electronic health information. The adoption of these standards supports clinical practice and the management, delivery, and evaluation of health services.

- Informational video (17 minutes): FHIR: A Healthcare Data Standard Designed for the Future
- Websites: FHIR Overview and FHIR CarePlan Resource

Gravity Project

The Gravity Project a HL7 FHIR Accelerator project that addresses the needs for both semantic and structural level interoperability of social determinants of health (SDOH) electronic data. It is a multi-stakeholder public collaborative with the goal to develop, test, and validate standardized SDOH data documented in EHRs across four clinical activities: screening, diagnosis, planning, and interventions.

Electronic Health Record-Related Tools

Health Information Exchanges

Health information exchanges (HIEs) are centralized databases or portals that combine EHR data from multiple sources to assist in data standardization and information sharing across settings. There are three key forms of health information exchange:

- Directed exchange: ability to send and receive secure information electronically between care providers to support coordinated care
- Query-based exchange: ability for providers to find and/or request information on a patient from other providers, often used for unplanned care
- Consumer mediated exchange: ability for patients to aggregate and control the use of their health information among providers

Application Programming Interfaces

Application programming interfaces (APIs) are a set of defined rules that explain how computers or applications communicate with one another. APIs sit between an application and the web server, acting as an intermediary layer that processes data transfer between systems. They enable entities to open their applications' data and have functionality to external third-party developers, business partners, and internal departments. APIs allow services and products to communicate with each other and leverage each other's data and functionality through a documented interface.