



CMS Quality Initiatives & ONC's USCDI+ Quality Domain



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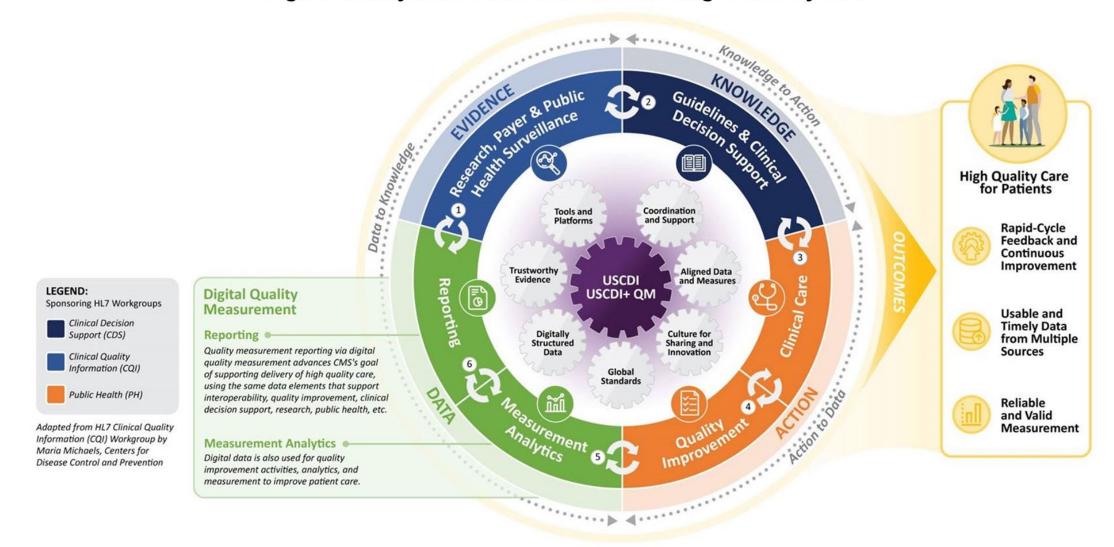
May 2022

Learning objectives

- Outline how CMS and ONC are coordinating to ensure data sets are harmonized across national standards
- Explain the importance of creating a complete data set of elements for CMS quality measurement
- Give example of the ONC's United States Core Data for Interoperability (USCDI) as a standardized data set for nationwide, interoperable health information exchange and USCDI+ program

Learning health systems use data to drive health care

Digital Quality Measurement in the Learning Health System



ONC and CMS are committed to data standardization

ONC

- Is developing and harmonizing health data standards to advance interoperability
- Developed a standardized set of health data classes and constituent data elements – the USCDI
- Recently launched the USCDI+ program and is committed to facilitating harmonization across federal use cases and data sets to reduce data silos

CMS

- Is transitioning to digital quality measurement
- Aims to enhance interoperability through use of high-quality standardized data for measurement, including through the use of FHIR®
- Is collaborating with ONC to support advancing data for digital quality measurement and other use cases through data standardization

Why data standardization?

- We are contributing to the establishment of a functional learning health system
- Data are the staple of a functioning learning health system
 - Learning health systems generate knowledge from data captured during routine care
- Data standardization
 - Transforms data into a common format
 - Ensures data quality
 - Allows for data flow
 - Supports program alignment
- Standardized data could be used for multiple use cases, such as
 - Patient health data access
 - Quality measurement
 - Big data analytics
 - Research

Why the FHIR® standard?

- Reduces burden
 - Align CMS eCQM reporting with industry clinical data exchange framework and clinical decision support (CDS)
 - Enable automated data retrieval from EHR and submissions of quality data through use of standards-based APIs
 - Provide near real-time feedback on quality measurement results to providers
- Simplifies data mapping
 - Single mapping to FHIR vs. mapping to HQMF and QRDA
- Improves alignment between eCQMs & CDS
 - Both use a common FHIR data model (FHIR QI Core)
- Promotes interoperability
 - Data exchange requirements for quality measurement are aligned with interoperability standards used in other healthcare exchange



Evolution of quality measures: the journey from paper to digital



Paper Quality Measures

Data from claims, manual chart extractions and patient experience surveys.



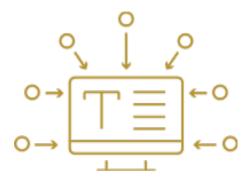
Electronic Clinical Quality Measures (eCQMs)

Data primarily from electronic health records (EHRs).



Digital Quality Measures (dQMs)

Data from EHRs, registries, HIEs, claims, patient experience surveys, etc.



CMS has set the ambitious and critical goal of transitioning to digital quality measurement

CMS has set a new course for quality measurement aimed at contributing to a learning health system (LHS) to optimize patient safety, outcomes, and experience



Enable a future in which care quality is only measured electronically, using standardized, interoperable data



Reduce the burden of electronic health record (EHR) data transfer by leveraging Fast Healthcare Interoperability Resources (FHIR®) application programming interface (API) technology that is already required for interoperability



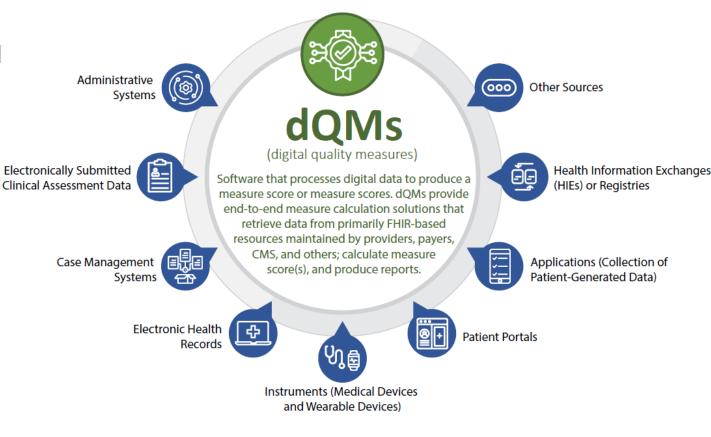
Provide usable, timely data from multiple sources to support delivery of high quality of care and quality improvement



Produce reliable and valid measurement results common across multiple programs and payers

Digital quality measures (dQMs) defined

- dQMs are quality measures, organized as self-contained measure specifications and code packages, that use one or more sources of health information that are captured and can be transmitted electronically via interoperable systems
- Potential data sources for dQMs include EHR data, patient-generated health data, registry data, among others
- dQMs will leverage advances in technology (e.g., FHIR APIs) to access and electronically transmit interoperable data for dQMs



Advancing Digital Quality Measurement

STRATEGIC ROADMAP



Data Quality

Data Aggregation

Reduce collection burden with structured, standardized data

CURRENT STATE



FUTURE STATE

Providers' struggle to implement current eCQMs

- Limitations and slow adoption of current standards
- Lack of provider data mapping and quality assurance (QA) of required data
- Required changes to clinical workflows

dQM implementation is seamless and at the push of a button

- Focus on standardized data FHIR, USCDI, and supplemental standards (i.e., USCDI+) that enable automated extraction
- Standardized and automated data collection facilitates valid and reliable data mapping and streamlined auditing processes
- Eliminate workflow changes required only for measurement and focus on measures that also align with quality improvement priorities



USCDI: core principles



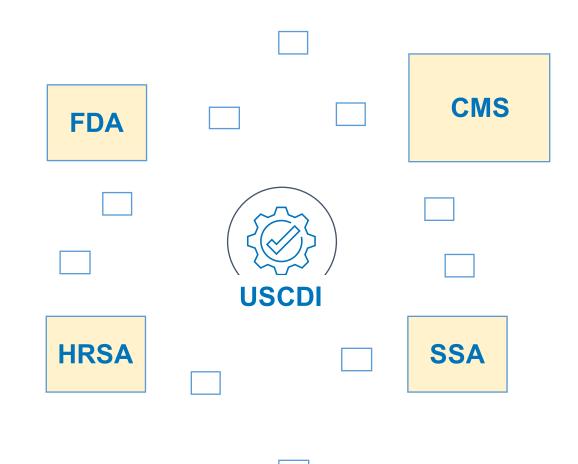
Comprises a core set of data needed to support patient care and facilitate patient access using health IT.

Establishes a consistent baseline of harmonized data elements that can be broadly reused across use cases, including those outside of patient care and patient access.

Expands incrementally over time via a transparent, established, and collaborative process, weighing both anticipated benefits and industry-wide impacts.

Current state: data sets needed beyond USCDI

- Unique agency or program-specific data systems and requirements not fully met by USCDI
- Agencies pursue ad hoc approaches to additional data needs
- Creates increasing drift from USCDI, which presents lifecycle maintenance issues, industry resistance, fewer opportunities for synergies across agencies



ONC has launched a new initiative call USCDI+

 Announced October 2021 in the Health IT Buzz Blog: <u>https://www.healthit.gov/buzz-blog/health-it/thinking-outside-the-box-the-uscdi-initiative</u>



- USCDI+ is a service that ONC provides to federal partners who have a need to establish, harmonize, and advance the use of interoperable datasets that extend beyond the core data in the USCDI in order to meet agency-specific programmatic requirements
- USCDI+ allows ONC to better serve federal partners, assure that extensions build from the same core USCDI foundation, and create the opportunity for aligning similar data needs across agency programs
- USCDI+ for Quality Measurement and Public Health are beginning with CMS and CDC partners

USCDI+ external engagement & partnership



Requirements

- Determine federal agency/stakeholder commitment
- Identify clear use case and need
- Develop robust implementation plans for agency stakeholders
- Assess regulatory, programmatic, or other requirements for use
- Define resources to support development/stewardship and sustainability of work



Outcomes & Benefits

- Nationally-recognized data set that advances program goals via interoperability
- Ongoing maintenance and stewardship of data set that can evolve with program requirements/technology landscape
- Repeatable process for creating robust data sets beyond the USCDI but still leveraging the USCDI core and process
- Harmonization across programs/use cases to reduce fragmentation and data-silos
- Harmonization across federal data sets to optimize investments in interoperability

Key takeaways

LESSONS

- True alignment of quality measures cannot be fully successful until we ensure the underlying data are consistent
- Much of the data needed for quality measurement exist in EHRs, so advancing USCDI+ QM will aid in the progress through alignment
- Driving consensus on and prioritizing interoperability of the digital data is necessary and incremental
- The standardized data could be other use cases beyond quality measurement

CHALLENGES

- Providers in different care settings vary in their readiness to collect data, standardize it in FHIR, and make it available for exchange through FHIR APIs
- A complete data set of elements for Federal quality measurement is one piece of the puzzle
 - Alignment of measure concepts and specifications is another priority
 - Alignment must also consider state and private sector needs

Questions

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