

Overview

Standardized data capture supports eCQM and dQM requirements for patient-centered care, including functional & cognitive status as recent examples. ONC proposes new data classes annually with USCDI to enhance critical data capture and interoperability. HL7 US Core adds specificity to data requirements based on an annual roadmap schedule. QI-Core further aligns profiles for authoring. This standards development process enables data availability for eCQMs and dQMs.

Standards Version Approval Process

The SVAP allows developers to choose among versions of standards and implementation specifications listed in regulation or approved versions further encouraging adoption.



Figure 1: SVAP Dialogue¹

ISA Content

ISA activities gather community input regarding readiness for each standard and implementation specification listed for each interoperability need, evaluating six categories:

- Standards Process Maturity
- Implementation Maturity
- Adoption Level
- Federally Required
- Cost
- Test Tool Availability

FUNCTIONAL STATUS/DISABILITY							
Interoperability Need: Representing Patient Functional Status and/or Disability							
Type	Standard / Implementation Specification	Standards Process Maturity	Implementation Maturity	Adoption Level	Federally Required	Cost	Test Tool Availability
Standard for observations	LOINC®	Final	Production	● ○ ○ ○ ○	No	Free	N/A
Standard for observation values	SNOMED CT® U.S. Edition	Final	Production	● ○ ○ ○ ○	No	Free	N/A
Emerging Implementation Specification	HL7® FHIR® US Core R.4.0 – Functional Status	In Development	Feedback requested	Feedback Requested	No	Free	

Table 1: Example of ISA for Functional Status/Disability Maturity²

USCDI to SVAP to US Core/QI-Core Processes

Potential standards move through review and balloting processes to be determined in a “published” status:

- Draft standards are defined in USCDI, reviewed & released in each draft USCDI version.
- Updates in USCDI are reviewed and evaluated via SVAP.
- Concepts are modeled in US Core, QI-Core, and published after balloting for community review and comment.
- ISA measures the standard’s implementation and adoption maturity.

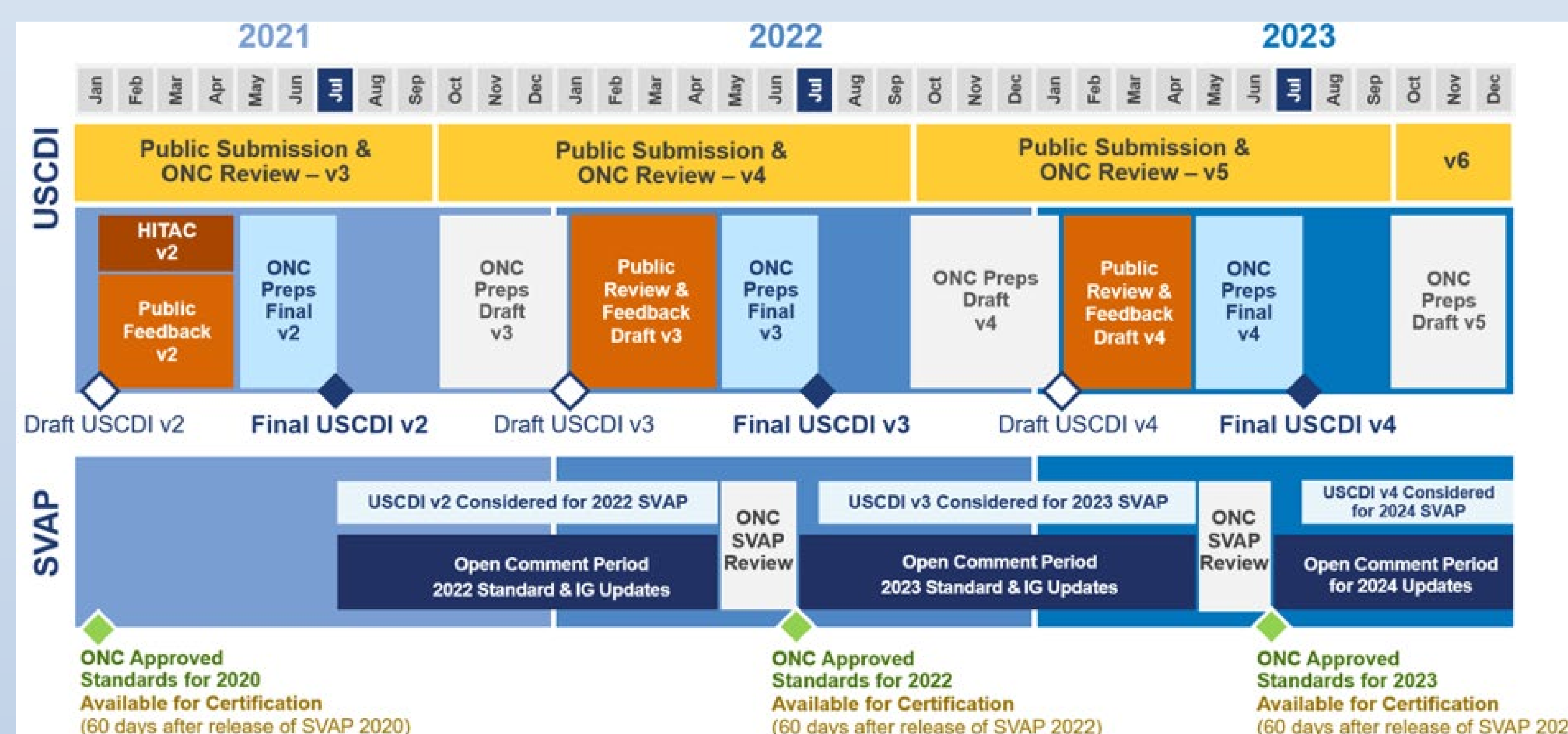


Figure 2: SVAP to USCDI Roadmap³

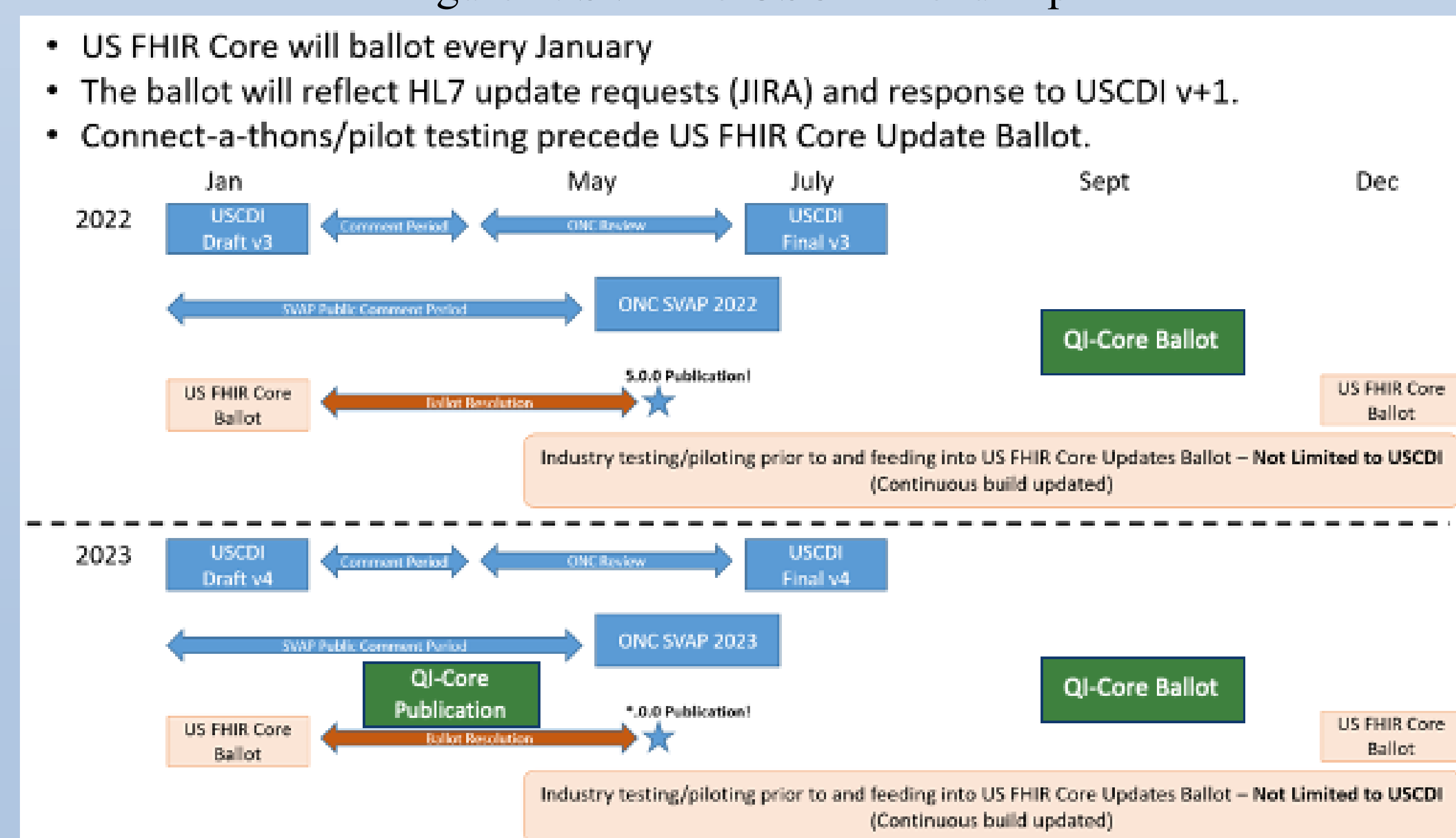


Figure 3: USCDI to US Core and QI-Core Roadmap⁴

Common Acronyms

- Digital Quality Measures (dQMs)
- Electronic Clinical Quality Measures (eCQMs)
- Fast Healthcare Interoperability Resources® (FHIR®)
- Health Level 7® International (HL7®)
- Quality Data Model (QDM)
- Quality Improvement-Core (QI-Core)
- Office of the National Coordinator for Health Information Technology (ONC)
- Social Determinants/Drivers of Health (SDOH)
- Standards Version Advancement Process (SVAP)
- United States Core Data for Interoperability (USCDI)

Data Transition

Table 2 shows how updates to USCDI lead to specific representation in US Core, followed by QI-Core. The table indicates changes that occur with each USCDI version.

USCDI	US Core	QI-Core
v2 (published 7/2021)	v5.0.1 (June 2022)	v5 (est. March 2023)
<ul style="list-style-type: none"> • SDOH Assessment • SDOH Goals • SDOH Interventions 	<ul style="list-style-type: none"> • US Core Observation SDOH Assessment Profile • US Core QuestionnaireResponse Profile 	<ul style="list-style-type: none"> • US Core Observation SDOH Assessment Profile • QI-Core QuestionnaireResponse Profile
<ul style="list-style-type: none"> • Health Concerns • Sexual Orientation • Gender Identity 	<ul style="list-style-type: none"> • US Core Condition Problems and Health Concerns Profile • US Core Observation Sexual Orientation Profile 	<ul style="list-style-type: none"> • QI-Core Condition Problems and Health Concerns Profile • US Core Observation Sexual Orientation Profile
v3 (published 7/2022)	STU 6 (Planned June 2023)	Pending (Planned February 2024)
<ul style="list-style-type: none"> • Functional Status • Disability Status • Mental Cognitive Status • Occupation • Occupation History 	<ul style="list-style-type: none"> • US Core Observation Screening Assessment Profile • US Core Simple Observation Profile • US Core QuestionnaireResponse Profile (tentative) • US Core Observation Occupation Profile 	<ul style="list-style-type: none"> Pending Pending Pending Pending Pending
v4 (draft – for final publication 7/2023)	Pending (Planned June 2024)	Pending (Planned February 2025)
<ul style="list-style-type: none"> • Substance Use • Alcohol Use • Physical Activity • Treatment Intervention Preference • Care Experience Preference • Medication Adherence 	Pending Spring 2023 evaluation in HL7 Cross-Group Project Workgroup	Pending Spring/Summer 2023 evaluation in HL7 Clinical Quality Information Workgroup

Table 2: Data Transfer from USCDI to US Core and QI-Core

Conclusion

The eCQMs and dQMs require new sources of data to be available in the real world to evaluate outcomes. ONC uses USCDI to identify the need for such data classes from the community, based on priority. US Core subsequently provides specifications for interoperability, QI-Core enables measure authoring, and SVAP determines readiness for government regulation. Ultimately, real-world data available to manage and evaluate care improves over time.

References

1. Andriesen, B. (N.D.) “Interoperability Standards Advisory (ISA) & Standards Version Advancement Process (SVAP) Overview.” [PowerPoint Presentation].
2. Office of the National Coordinator for Health Information Technology. (2023). 2023 Interoperability Standards Advisory Reference Edition. Available at: https://www.healthit.gov/sites/isa/files/inline-files/2023%20Reference%20Edition_ISA_508.pdf. Accessed 8 February 2023.
3. Andriesen, B. (N.D.) “Interoperability Standards Advisory (ISA) & Standards Version Advancement Process (SVAP) Overview.” [PowerPoint Presentation].
4. HL7 US Core Road Map 2022. Available at: <https://confluence.hl7.org/display/CGP/US+Core+Road+Map+2022>. Accessed 31 January 2023.