IHE Board Report: Quality, Research & Public Health (QRPH) Domain - 2025

Sponsors:

- Healthcare Information and Management Systems Society (HIMSS)
- Radiological Society of North America (RSNA)

Leadership: (qrph@ihe.net)

- Secretariat: TeRhonda McGee, RSNA; Sarah Bell, HIMSS
- Board Representative: Didi Davis, The Sequoia Project, Inc.
- Plan Cmte Co-chair: Lori Fourquet, e-HealthSign, LLC
- Tech Cmte Co-chair: John Stamm, Epic

Membership Rosters:

- QRPH Planning and Technical Committee

Activity:

- IHE Quality, Research and Public Health Domain (QRPH) addresses the infrastructure and content necessary to:
    - Share information relevant to quality improvement in digital patient care and health care records
    - Facilitate interoperability between the clinical care system and clinical research
    - Facilitate interoperability between the healthcare system and public health
- The Timeline/Milestones are available at:
    - Agendas
    - Profiles
- Background
    - QRPH was launched in 2007 by ACC, HIMSS and RSNA.
    - PCC and QRPH are meeting jointly, but still submitting separate board reports.

Most Significant Profiles

The use of the IHE Product Registry tool seems to be waning, at least for QRPH. It is not clear why this is happening, but QRPH has concerns that its stakeholders cannot easily discover which health IT systems support its Profiles in production settings and in some cases the link to an integration statement is no longer valid.

Title	# vendor (Cthon)	# product (Registry)	Description	Notes
Aggregate Data Exchange (ADX)	2	0	The Aggregate Data Exchange (ADX) Profile supports interoperable public health reporting of aggregate health data. These most typically take the form of routine reports (weekly,	Primary uptake has been by donor-funded open source projects in Low and Middle Income Countries (LMICs). One of the products (District Health Information Software DHIS2) is implemented in 124 countries by organizations that are not funded to

			monthly, quarterly etc.) from a health facility to some administrative jurisdiction and/or from a domestic Health Management Information System (HMIS) to a global repository (e.g. WHO, PEPFAR).	come to the IHE Connectathon. Two **content** specifications have been developed that leverage the ADX **grammar** specification: ADX for HIV, and ADX for COVID-19. These content specs define reportable indicators related to the respective disease. Data Analytics and Delivery for impact which references the DHIS2 platform has more information including impact and use in the world here: https://dhis2.org/in-action. This presentation highlights an ADX-supported workflow that fundamentally improved process performance. https://community.dhis2.org/t/revolutionizing-dhis2-integration-a-faster-more-efficient-approach-with-adx-and-django/57735 Other systems which are known to have developed ADX reporting capabilities include the OpenMRS medical record system and the OpenIMIS health financing and social protection administration system.
Computable Care Guidelines (CCG)	0	0	The CCG Profile describes evidence-based care practices in a format that can be ingested by and operationalized by a computer.	The CCG Profile is in the process of being published. Notwithstanding how early it is in its lifecycle, there is already interest from implementing jurisdictions in Europe, Canada and elsewhere. The World Bank Digital Health Blueprint Toolkit explicitly references the CCG spec and the foundational importance of broadly deployed clinical decision support (CDS) to the value proposition for national-scale eHealth infrastructure investments.
Retrieve Process for Execution (RPE)	8	0	Accesses a process definition, such as a research protocol, and executes automated activities without leaving an EMR session.	RPE is showing significant adoption for research process exchange; there are ~190 live sites using the profile.
Structured Data Capture (SDC)	12	1	Describes the use of Information Technology Infrastructure (ITI) Retrieve Form for Data Capture (RFD) for retrieving and submitting forms in a standardized and structured format. The	College of American Pathologists (CAP)'s electronic Cancer Protocols (eCP) utilize SDC. SDC is a new technology for representing technology-agnostic forms using SDC schema definition XML format. As of 2019, all electronic Cancer Protocols

			profile describes the structured form definition model that can be used to define forms/templates to access/collect data from Electronic Health Records (EHR), thereby reducing burden for data collection and promoting the use of common data elements and form templates across different domains.	templates are in SDC format. Learn more about SDC by reading the **SDC System manual** that explains SDC web tool navigation, features, and functionality. They are consumed by systems representing approximately half of American anatomic pathologists. Around half of cancer resection-based diagnoses are likely using SDC templates. JCO Clinical Cancer Informatics article "Structured Data Capture for Oncology"
Vital Records Death Reporting (VRDR)	15	1	Describes the content and format to be used when reporting death information from the point of care to the vital records jurisdiction.	Moving the FHIR components of the profile to standard FHIR online publication. Modeling it such that we can start with the HL7 US-centric volume and then internationalize. Also incorporating Occupational Data for Health (ODH). Pilot testing death reporting in Puerto Rico with ODH.

< # vendor (CThon) is a count of successful vendors from Connectathon-results.ihe.net >

< # product (Registry) is a count of registered Statements from Product-registry.ihe.net >

Significant Deployment Activity:

- CDC continues to focus on FHIR **IHE Vital Records Death Reporting (VRDR) profile** between jurisdictions and NCHS bi-directionally. NCHS has established their own certification process to onboard the US jurisdictions. There are 18 Vital Records Offices certified by NCHS to exchange VRDR, 15 of these are currently in production. 5 jurisdictions are in progress to be certified. There is a renewed focus on connections from the EHR to jurisdictional vital records, particularly in Wyoming and Washington.

- The **Aggregate Data Exchange (ADX) profile** is heavily leveraged by the US government's President's Emergency Plan for AIDS Relief (PEPFAR). PEPFAR's Data for Accountability, Transparency and Impact (DATIM) initiative is a global programme collecting reportable indicators from 55+ PEPFAR-supported countries regarding their HIV-related and health systems strengthening activities (information available, here: https://data.pepfar.gov/). PEPFAR works closely with partner countries toward achieving HIV/AIDS epidemic control while promoting the long-term sustainability of their responses. PEPFAR is managed and overseen by the U.S. Department of State's Bureau of Global Health Security and Diplomacy and implemented by seven U.S. government departments and agencies, leveraging the power of a whole-of-government approach to controlling the HIV/AIDS epidemic. On December 1, 2022, PEPFAR announced a five-year strategy: *Fulfilling America's Promise to End the HIV/AIDS Pandemic by 2030*. The Strategy centers on collaboration and partnership to confront the challenge of HIV/AIDS in the wake of other emerging health threats.

Demonstrations, Other Events and Implementations:

- **IHE International Educational Webinar Series** have been presented 2008 - 2020. The latest webinar recordings can be found on IHE International's YouTube channel.
- **HIMSS Interoperability Showcase**

BFDR-E (2011-2019, 2021-2023); mRFD (2021-2023) CRD (2013-2017), HW (2014-2019) with ODH (2017-2019, 2021); RPE (2015-2017, 2021), SDC (2015-2019, 2022-2025), VRDR (2014-2019, 2021-2023, with ODH 2024-2025).
- [Birth Demonstration](#)
- [Death Demonstration](#)
- **HL7 FHIR Connectathons 2023**
  - VRDR

Other Demonstrations, Pilots and publications where QRPH profiles have been highlighted include:
- IHE QRPH standards are referenced in the [HHS/ONC Standards advisory](#). They feature prominently in the public health and research domains. Established QRPH standards such as BFDR-E, CRD, CRPC, DSC, EHDI, FP V2, HW, NANI, RPE, SDC, and VRDR received categorization by their implementation maturity and adoption level.
- Lori Fourquet represented QRPH at the recent IHE Europe Connectathon events the week of 23-27 June 2025. During that week, she was on a secondary use of data panel (*IHE Europe Panel: How to make Primary use data available for EHDS Secondary use)* where using the IHE whitepaper for Healthcare - Secondary Data Access was discussed as relevant for purpose within the European Health Data Space (EHDS). In addition there was a subsequent interactive brainstorming workshop on secondary data use. [IHE_QRPH_WP_Healthcare_Secondary_Data_Access_Rev1.1_2016-11-09](#)

[New Profiles and Whitepapers – Published for TI 2022 (A list of all TI Profiles can be found here)](#):

- Computable Care Guidelines (CCG) Published 25-07-17 – the Computable Care Guidelines (CCG) Profile leverages the FHIR standard to define a normative grammar and processing pattern that, together, give us a way to describe evidence-based care practices in a format that a computer can ingest and operationalize. The Profile introduces four new actors: Guideline Publisher, Guideline Repository, Guideline Engine and Guideline Performer. These actors support an end-to-end CCG ecosystem that can publish, disseminate, and "apply" computable guidelines at the point of care. As one of IHE's two "gherkin script" demonstrator participants, the CCG Profile's test plan section includes a full set of normative assertions that should greatly simplify test definition and expression in the Gazelle platform.

Trends

Organizations that benefit from the reuse of EHR data are motivated to develop the needed standards. However, implementers need to be incentivized to adopt the standards. Greater emphasis is needed within Standards Development Organizations to facilitate the uptake of new standards focused on reuse of EHR data. Some of this pressure has begun to come from the CDC, as they incentivize FHIR based vital records exchanges.

- There is renewed interest in overlap between death reporting from the EHR to vital records and other areas like medical-legal death reports and EMS. There are currently 7 FHIR-based vital records profiles published:https://wiki.ihe.net/index.php/Profiles

Care Planning is a "hot topic", at present. The European [xShare](#)project is defining a set of content and workflow patterns that will support Care Planning under the auspices of the new EHDS legislation and the FHIR-centric

European EHR Exchange Format (EEHRxF) that will soon become normative. Denmark is the "lighthouse" country for this; they will be evolving their existing clinical decision support (CDS) infrastructure to operate on a more modern EEHRxF-conformant foundation. In Ontario, Canada, efforts are underway to move the long-running Evidence-to-Practice (e2p) CDS initiative from pilot to at-scale rollout. The newly released World Bank Digital Health Blueprint Toolkit explicitly identifies national-scale CDS as a cornerstone of the digital health value proposition. All of these digital health initiatives leverage IPS (or nationalizations of it) as the underlying basis of the CDS workflows.

In the face of this strong interest in taking CDS to scale, the new IHE CCG Profile fills an important gap. It embraces an AI-based (expert system) approach – but (usefully) one that *never* hallucinates, is *transparent*, is *conformance testable* and meets *existing* regulatory requirements related to "software as a medical device" (SaMD). There are strong indications that IHE's CCG spec will play a keystone role in all of the initiatives listed above.

There is new interest in secondary use of the IPS to inform Public Health and Clinical Research. This approach was demonstrated at HIMSS 2025 Interoperability Showcase. There is also activity by public health agencies (e.g. WA DOH) to facilitate a patient's access to an IPS through a public health portal also demonstrated at HIMSS 2025.

Summary of Future Plans:

- PCC and QRPH are meeting jointly on a regular and ongoing basis to conserve administrative resources and increase efficiencies of cross-domain work collaboration. This is anticipated to continue into the foreseeable future.
- Moving IHE's FHIR based profiles to standard web-based representation assists with readability and adoption.
- The domain committees will continue to support educational outreach to drive adoption and deployment of the QRPH profiles among a greater number of vendors nationally and internationally.
- The state of Washington is working to allocate a fellow for development of a new profile for the Patient Mediated International Patient Summary.
- There is renewed interest in secondary use, so we hope to review and update the white paper, Using IHE profiles for Healthcare - Secondary Data Access possibly with a European-focused volume 4.
- A release of the IHE CCG Profile is underway.