

2020 Sept WGM Patient Care Agenda and Minutes

- Attendance
- Agenda
- Minutes
 - Monday (4pm Eastern) BRR/PC AdverseEvent
 - Thursday (4pm Eastern) PC + SDWG
 - Agenda
 - Friday (10am Eastern) PC + Vocab

Attendance

2020-09 Patient Care Virtual WGM Attendance

Agenda

Date	Quarter	Topic	Chair	Added to Doodle Poll https://www.doodle.com/poll/crgmir8dzh8x7f44
Mon, Sept 21	2pm-4pm Eastern 1pm-3pm Central	PA hosting PC to discuss encounter/condition with Floyd	PA Hosting	
	4pm Eastern 3pm Central	AdverseEvent - PC/BRR	Michelle Miller	Yes
Tues, Sept 22	10am Eastern 9am Central			
	2pm Eastern 1pm Central	Pharmacy FYI - medicationUsage - taken/not taken attribute and compliance attribute	Pharmacy	
	4pm Eastern 3pm Central	<ol style="list-style-type: none"> 1. CarePlan report out <ol style="list-style-type: none"> a. MCC b. Gravity c. PACIO d. CP DAM e. etc. <p>All HL7-Virtual-WGM-all-things-CarePlan_2020-09_final3.pdf slide deck</p> <ol style="list-style-type: none"> 1. LHS - CareTeam (LHS has agreed to this time-7/28) 	LHS Hosting Laura Heermann-Langford	Yes added to doodle poll-confirmed and reconfirmed...
Wed, Sept 23	10am Eastern 9am Central	CIC will host both CIMI and PC <ul style="list-style-type: none"> • cancer • mcode • pain assessment 		Yes need to cross reference this with CIC. They are also expecting CIMI on Weds at 10 ET. Combine them all?
	2-4pm Eastern	PA/PC Joint session		
	4-6 pm Eastern	General Session		
Thurs, Sept 24	10am Eastern 9am Central			
	4pm Eastern 3pm Central	PC/SD (SDWG has agreed to this time - 7 /30) (FHIR-I has agreed to send rep - 8/9) Please Scroll down to Mapping C-CDA Participations to FHIR US Core, C-CDA on FHIR and Provenance Mapping Author and Informant Information to FHIR US Core Profiles for FHIR Resources Derived from C-CDA Documents	Stephen Chu Emma Jones - Scribe	Yes

Fri, Sept 25	10am Eastern 9am Central	PC with Vocabulary - agenda below	Jay Lyle	Yes
	12 - 2pm Eastern	FM / Vocab / PC - Encounter/Claim Diagnosis rank/priority with Floyd	FM	

Minutes

Attendance: [2020-09 Patient Care Virtual WGM Attendance](#)

Monday (4pm Eastern) BRR/PC AdverseEvent

Virtual Guidance

- Attendance online/chat has link: [2020-09 Patient Care Virtual WGM Attendance](#)
- Mute unless speaking

Recap last BRR/PC joint discussion

- [2020-02-27 Patient Care FHIR Conference Call](#)
- Patient Care had found base resource changes
- Hugh Glover started a profile, but not finished or ready to share yet
- BRR moved off into ResearchStudy/Subject
- Rebecca Baker and Mike Hamidi are not present in this session, but were involved in CDISC mappings.
 - Stephen asked if the mappings are available for public review? Subscribe to BRR listserv. Reviews through HL7 are coming throughout 2020 (and then the actual ballot process)
- Christine Denney - gaps identified and captured in gap document (with Lloyd McKenzie) TBD which gaps would result in JIRAs for base spec vs extensions in IG. Need to balance guidance in R4 vs what's coming in R5
 - seriousness
 - action taken / follow-up
 - mitigating actions
 - questionnaires (did headache occur?) - expected adverse events with meds
 - understanding what part of body (body site/structure)
 - anything that happens after they sign consent is considered an AdverseEvent (then investigate causality) - no distinction between event vs reaction
- Jean Duteau - blood products and vaccination work
 - IBM to HL7 project
 - Would like to use R5 version of AdverseEvent (based on clean-up that has since been done)
 - Past work on BRR/PC work has really helped
- Mark Kramer - cancer drug trial
 - looking for light weight way to capture unexpected adverse events
 - Oncologists not interested in expected adverse events (nausea)
- BRR is very interested in going to R5 for AdverseEvent and a bunch of other resources
- Hugh inquired about Connectathon - Vulcan - not on the schedule for January (too soon?). Hugh asked if there was interest in a Connectathon and when?
 - Robinette Renner is interested, but January is too soon. She will know more in the coming weeks on timing.
 - Amit Popat - public health was looking at it in context of vaccination
 - Epic has support for AdverseEvent.
 - <https://fhir.epic.com/Specifications?api=981>
 - Stephen Chu asked if they were using AdverseEvent in context of reaction or event?
 - **TO DO:** [Amit Popat](#) send Hugh and Michelle an email
 - Will continue to poll for interest in **May 2021**

[Patient Care FHIR Backlog](#) - specific to AdverseEvent

- [FHIR-27784](#) - Make AdverseEvent.outcome repeating RESOLVED - CHANGE REQUIRED
- [FHIR-26436](#) - Explain the interaction between AdverseEvent.code and AdverseEvent.resultingCondition TRIAGED
- [FHIR-26435](#) - The definition of AdverseEvent.resultingCondition restricts it to results to exposures. RESOLVED - CHANGE REQUIRED
- [FHIR-26434](#) - Request to add attribute to capture latent medical harm WAITING FOR INPUT

Will reschedule monthly BRR/PC conference calls on Thurs at 5pm Eastern

Adjourned at 5:40pm Eastern

Thursday (4pm Eastern) PC + SDWG

Agenda

David Riddle (presenter)

- [Mapping Author and Informant Information to FHIR US Core Profiles for FHIR Resources Derived from C-CDA Documents](#)

- Assumptions
 - CCDAs docs can be used to exchange patient information
 - Can automating transformation of C-CDA data to FHIR resources
 - Must have consistent mapping between CCDAs data and FHIR resources
- Goals
 - Obtain comprehensive and consistent directions on how to map
 - provision of level of detail required
 - Focus is on CCDAs participations
 - authors
 - performers
 - ??
- Reality Encountered
 - Mappings not intuitive
 - different groups are proposing different mappings - e.g. FiveWs, SOA
 - There may not be a single one size fit pattern
- Intuitive mapping at the header level - CCDAs Header to the CCDAs-on-FHIR-US-Real-Header Composition Profile
- Mapping at the entry level for PAMPI Resources less intuitive

Mapping at the Entry Level for PAMPI Resources Less Intuitive

Problem Observation Participants to Condition

- Map the C-CDA author/time to the FHIR Condition.**recordedDate**
- **Do not** map author/**assignedAuthor** to the FHIR Condition
- Map a C-CDA Problem informant to the FHIR Condition.**asserter**
- Map a C-CDA Problem performer to **performer_extension**

CDA Problem Participations	US Core Condition Attributes
authorTime	Condition.recordedDate 0..1
author 0..*	Condition.recorder 0..1
	Provenance 0..*
informant 0..*	Condition.asserter 0..1
performer 0..*	Condition.extension:performer_extension

Potential Related Concerns

- SOA Cross Paradigm project **draft for comment** maps the C-CDA author to the FHIR Condition.**asserter** attribute

CDA Problem Participations	US Core Condition Attributes
author 0..*	Condition.asserter 0..1
authorTime	Condition.asserterDate? (not supported)
	Condition.recorder 0..1
	Condition.recordedDate 0..1

- Rules for **addressing cardinality differences** between C-CDA author (1..*) and informant (0..*) vs. the US Core Profile .recordedDate (0..1) and .asserter (0..1) attributes
- Rules for **assigning type** to asserter references (e.g., Practitioner, PractitionerRole, Patient or RelatedPerson?)
- Header mapping Spreadsheet associated with **CCDA on FHIR** that needs to be updated for the performer mapping. This should be noted for FHIR R4.



PAMPI = Problems (Conditions), Allergies, Medications, Procedures and Immunizations

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19

Reasons why PC did not feel condition recorder

- cardinality mis-match
- recorded date set proxy for the onset date. Had an open question around if recorded date is when the data was first entered into the system.
- PCWG thought that author should not map
- **SOA cross-paradigm project** has different mappings
 - Ken Lord - built the SOA author mappings. Progress made on the cross-paradigm mappings was decided within SOA and Higher-ups and OO at HL7 that SOA may not have been the right place for this.
 - Recommendation that OO and PH wanted to come up with normative mapping between V2.x and FHIR
 - Hans has developed a bit of a methodology with very well founded FHIR concepts that can be used across CCDAs to FHIR. Recommend looking at that to see if there is a methodology that can be derived.
 - Lisa Nelson -
 - did SOA ballot comments get completed? Yes. didn't receive any comments on the mappings.
 - Can CDA Management group pull this out? The context and concepts of the mappings doesn't belong to SOA. It belongs somewhere else.
 - V2 mappings is further along. Is there the concept of Author in V2 mappings? Yes.
 - If the CDA Management group take ownership of this work and would like to take a look at what the V2 people did.
 - Ken Lord - is important to also understand the semantic
 - Stephen Chu - differences is in the different paradigm. For example, CCDAs effectiveTime can be overloaded.
 - Lloyd McKenzie -
 - FHIR mappings are maintained in a single place. Mapping to specs in multiple places are not helpful to implementers. Will take this back to FMG as a governance question.
 - Normative mapping is scary because we can't make a point-in-time assertion if people are populating the data as intended. Does not mean all the implementations are populating the data in the same way.
 - There is no expectation in FHIR to author FHIR model to make mapping in FHIR as easy as possible.
 - The objective is to keep the resources as tightly aligned as possible with the information in the implementer space and not to what is mapped.
 - Mapping exercise is appropriate but when it gets hard does not mean make changes to the FHIR model to fix the mapping.
 - There can be variations in how resources represent the same type of elements. But the variations should be driven by differences in implementer requirements and not by who is creating mapping and what their goal was at that time
 - Gay Dolin -
 - Use case - when multiple authors results from aggregated documents that comes from an HIE.
 - Lloyd - what story is being told in the CCDAs documents? If keeping recorder in Condition resources should be cleaned up. Means different people are authoring at the different times and may not best represent what provenance conveys.
 - David - this is where issues with differences in provenance is run into

Mapping Multiple Authors Problem Observation to FHIR Condition

```

<observation classCode="OBS" moodCode="EVN">
  <templateId root="2.16.840.1.113883.10.20.22.4.1" ...
  <author>
    <templateId root="2.16.840.1.113883.10.20.22.4.119" ...
    <time value="20160516" ...
    <assignedAuthor>
      <id root="2.16.840.1.113883.4.3.12" extension="33487" ...
      <code code="FTH" codeSystem="2.16.840.1.113883.5.111" displayName="father" ...
      <telecom value="tel:+12144970520" use="MC" ...
      <assignedPerson>
        <name><given>Roger</given> ...
      </author>
    </author>
    <templateId root="2.16.840.1.113883.10.20.22.4.119" ...
    <time value="20160607" ...
    <assignedAuthor>
      <id extension="66966" root="2.16.840.1.113883.4.6" ...
      <code code="207RC0000" codeSystem="2.16.840.1.113883.6.101" ...
      <telecom value="tel:+1(331)666-8966" use="WP" ...
      <assignedPerson>
        <name>
          <given>Hearily</given>
          <family>Sixe</family><suffix>MD</suffix>
          <name>
        </assignedPerson>
      </assignedAuthor>
    </author>
  </observation>

```

Derived FHIR Condition

Condition
 • recordedDate = 2014-04-07

Lloyd

- a single author can be associated
- two authors with the identical timestamp is not supported in FHIR. Are there systems that does this? CCDAs allows it but FHIR does not know what it means. Options would be to pick the first, or do extensions. The real question is what is the expectations of the behavior.
- David - have established there are CCDAs docs with multiple authors.
- Lloyd - expectation that CCDAs on FHIR team would provide guidance. If multiple could map the earliest one or do other things but need to consider the ramifications of doing these different things. There is always a scope bandwidth timeframe.
- Gay - The context is that CCDAs on FHIR is still a document. Is this still the context when mapping from document to data?
- David - not mapping document to document. Mapping from a CCDAs document
- Lloyd - mapping from CCDAs document to FHIR document should allow the resources to stand alone.
- Ken - to understand the general principal that the source is CCDAs and the target is FHIR.
- Lloyd - This part of the implementation is 'iffy' because the standard is not super stable.
- Ken - agree but having at least some baseline adds value
- Lloyd - CCDAs on FHIR and V2 on FHIR IGs provide this baseline.
- David - [CCDAs on FHIR IG](#) does not go to that level of detail.
- Ken - Agree with Lloyd and there is a lot of work that has been done that is reusable
- Lloyd - the initial CCDAs on FHIR shows some depth and that's okay. You can take this work and make it go deeper rather than put that detail of work somewhere else. Reality is what we have right now is not sufficient. We may never get to a point of just push a button and transform perfectly. But this does not mean we can't go further. Making a conscious choice to consolidate all our guidance is the best way to go.
- David - what Lloyd is saying make a lot of sense. Concern is less for a push button transformation but the more it's left up to implementers the more hindrance to interoperability
- Gay - maybe the next step would be for SDWG to do an update to CCDAs on FHIR. Agreement from Vassil and Lisa.
- Vassil - look at the entries in CCDAs and see how they map to Resources.
- Stephen - the few months of discussion, the concept of participation can be decomposed into a number of FHIR categories. Neither CCDAs nor FHIR have decomposed these concepts adequately. Is the objective of your exercise is to do the mapping consistently and the endpoint is for a transform push button or is this to look a little deeper and see what changes in FHIR need to be done so there is not semantic loss when transformation occurs.
- David - can't make a separation between mapping and semantics. Would it make sense to narrow the focus and establish authoritative mapping for PAMPI.
- Stephen - agreement to scope. Patient Care owns PAP. Patient care would like to work with David on doing the mapping.
- David - it's logical for SDWG to allow the owners for the FHIR resource to provide feedback.
- Gay - the home will be SDWG and would be a collaborative effort or cross work group
- Stephen - in the past there have been disconnect between SD and the clinical domain.
- Gay - agreement that we have to figure this out. The main thing is there would definitely have to be collaboration. The work would inform a ballot that would be associated with CCDAs on FHIR.
- Lisa - we could be building consensus on how this is done while it's being worked on. May need to do a project and propose some stuff. Could start with a confluence page under CCDAs on FHIR.
- Gay - will need to bring this project to SDWG and see what they say.
- Stephen - Lisa has been the bridge between SD and PC and has done good work in keeping the 2 groups aligned.
- Lisa - this could be included in the PSS. Would also be the liaison for PCWG with other work groups. Suggest adding results to PAMPI (MAPPIR)
- Stephen - Emma is also involved with representing PC at SDWG. What type of assistance does David need from PCWG
- David - interested in asking implementers what they are doing. Have received some guidance from PC about recorder. May be forced from a timeline perspective to do my own thing for now.
- Stephen - what do you need from PC for now?
- David - may need to do more review with PC after re-grouping. Will align with Michelle. Have to thing thru other aspects of mapping that would need patient care input.
- Stephen - a good approach to is to put forth some JIRA tickets
- Gay - will need discussion with SDWG before putting together a PSS
- Meeting adjourned at 1733 EST.

Friday (10am Eastern) PC + Vocab

Agenda

- CIMI: Pain model project & ballot plans
- Are CDA status issues closed?
- Extension to support pertainsToGoal
- Allergy code
- Model bindings? Goals, status, expectations.
- Status codes: seeing a similar pattern in Meds. Need codeableConcept, or code + extension.
- Publication of Representing Negatives ([Representing Negatives](#))
- Review select re-writes; especially table
 - 25, 87, 101: category alignment
 - 75: outline
 - 76, 101, 126, 128: pattern, method
 - 90: next steps
 - V2 coverage: anyone have examples?
 - ANF: no actual examples to use
 - Any more examples to add?
 - Include ANF in appendix
 - Remove dependency on Logica Covid-10 IG ballot

Minutes

Pain project

Nathan presented the [Pain deck](#).

Pain is the most commonly documented symptom. The Nursing Knowledge Big Data conference has been a key driver to standardizing this data element. The project (sponsored by CIC, co-sponsored by CIMI & PC) has produced a mature LOINC panel to represent the state of the art information model for pain.

Lisa: Gravity has followed a similar trajectory: 1. assemble the experts, 2. review existing documentation and practice; 3. engage Regenstrief to help harmonize and iron out issues with putting the model into a Questionnaire context.

Next step: putting the Questionnaire into a FHIR IG, with guidance on inferring other resources (Observation, etc.) from the QuestionnaireResponse. Looking for connectathon partners, since they must conduct a connectathon prior to ballot.

Discussion:

a. we need to clarify connectathon requirement. It clearly should not apply to informative specifications. And can it be fulfilled outside of HL7-sponsored connectathons? Question for Clinical Steering Division.

b. Once this is clear, the project team will need to decide whether to ballot an informative specification sooner or a FHIR STU later, and how much later.

c. MaxMD offered to assist with testing & possible "connectathon."

CIC as the sponsoring WG will lead these efforts. Russ suggested Anesthesia should be involved. Others: PACIO, Patient Empowerment.

Absence of Allergy

Russ points out that an allergy is a clinical entity in the world that is expected to persist. "No known allergies" is not. AllergyIntolerance should not be where we record "NKA."

Is this a patient safety issue? If an application were to assess a patient record and found "no allergy to X," it might misread "X" as a risk and cause the provider to choose another, less appropriate medication.

Michelle will check to see if this issue has been voted on in the past. If so, there may be a process to resurrect it.

Michelle further points out that NKA is in the US Core, so there is some momentum. Change is unlikely for purely semantic reasons.

Lisa has an idea for how to profile this.

CDA & FHIR condition/allergy status

Condition clinical status seems to align.

Action item: post list somewhere. Jay to put on confluence; if there's a better place, we'll discuss.

Action item: We need a concept map. Jay or Rob H

CDA has changed their binding to dynamic, so if the selected SNOMED codes are deemed incorrect, they can be updated. Rob thinks this is unlikely.

Verification status

This is not in CCD, but Giorgio Cangioli has proposed a problem template that consolidates CCD and IPS which does incorporate a verification observation using the FHIR values.

Action item: STU comments in support of this

Action item: IAT topic on the element for implementers (no takers yet)

Action item: We need a concept map. Jay or Rob H

Verification may be condition-specific. Entered-in-error may result from an administrative rather than clinical process. It's not clear that either issue affects the element.

Concern status

Lisa suggests a new template for Problems that elides the Concern act might be taken up enthusiastically by implementers. If so, the mapping problem goes away, for future data anyway.

Negatives

We will re-start meetings to finalize edits for publication. Watch for announcements. (Jay)

Status of Term Info

Expired DSTU. Team debating whether to publish or retire. CDA quality criteria require conformance, but it's not clear that it's followed.

Action item: request removal of quality criterion (Lisa)

FHIR publication includes "maps," which include SNOMED maps. These seem immature. We'd like to understand expectations around these maps.