

# Quality Data Model (QDM) User Group Meeting | AGENDA/MEETING MINUTES

Meeting date | 6/17/2015 2:30 PM EDT | Meeting location | Webinar video link: <https://www4.gotomeeting.com/register/303510935>

Attendees: Ken Allums, Lisa Anderson, Teresa Ansell, Balu Balasubramanyam, Cynthia Barton, Kimberly Bodine, Sasha Brellenthin, Zahid Butt, Susan Campbell, John Carroll, Anne Coultas, Michelle Dardis, Georgette Darnell, Frank Farach, Kim Frazier, Ben Hamlin, Sharon Hibay, Michelle Hinterberg, Yanyan Hu, Kay Jackson, Ping Jiang, Jamie Jouza, Tammy LaFavcr, Cindy Lamb, Kathy Lesh, Michael O'Keefe, Thinzar Min, Jana Malinowski, Rute Martins, Linda Martinson, Rob McClure, Patti McKay, Christopher Moesel, Lisa Nelson, Karen Nelson, David Nilasena, Ann Phillips, Stan Rankins, Amy Roberts, Juliet Rubini, Sharon Sebastian, Julia Skapik, Carolin Spice, Al Taylor, Dennis Tonneslan, Kavishwar Waghlikar, Sherry Wiedow, Patrick Yamaura

Time	Item	Discussion/Options/Decisions
2:30 PM	<a href="#">QDM-119</a> : <i>Enhance Support for Principal Procedure</i>	<p>MITRE began the discussion with a summary of the problem and a potential solution to be considered. Principal procedures are currently represented by an “ordinality” attribute on procedure. This representation is not ideal because the concept of “principal” only makes sense in the context of a specific encounter. This same problem was addressed for principal diagnoses by adding “principal diagnosis” and “diagnosis” attributes to “Encounter, Performed”. MITRE suggested the group start by considering a similar approach for principal procedures: adding a “principal procedure” attribute to “Encounter, Performed”.</p> <p>MITRE indicated that the concept of principal or primary procedure is used in six Eligible Hospital (EH) measures: CMS 53v4, CMS 108v4, CMS 171v5, CMS 172v5, CMS 178v5, and CMS 190v4. The use cases in these measures, however, are different than how principal diagnosis was typically used, so the same approach to a solution may not be viable and should be evaluated for each measure. MITRE also indicated that “Procedure, Performed” is used in 16 EH measures and 28 Eligible Professional (EP) measures. An initial view of these measures, however, seemed to indicate that adding a general “procedure” attribute to “Encounter, Performed” would not add much value.</p> <p>MITRE opened the floor for discussion and one participant noted that the SCIP measures (171, 172, 178) do not directly tie the procedure to an encounter. While there is, of course, an encounter in which the procedure was performed, the SCIP measures only tie to it indirectly. MITRE indicated that this was a good point and that it would be covered in more detail when the group reviewed these measures individually.</p>

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		<p>MITRE then began the process of reviewing each of the six affected measures individually, starting with CMS 53v4. MITRE noted that of the six measures, CMS 53 is the only one that refers to a “primary” procedure rather than a “principal” procedure. Sometimes these concepts are used interchangeably, but often “principal” is intended to indicate a billing context, while “primary” indicates a more clinical context. MITRE asked if this distinction was intentional for CMS 53. Participants responded that the difference <i>is</i> significant in CMS 53, in that a “primary PCI procedure” has a very specific clinical meaning; it is essentially the PCI that “stops the heart attack.” This led to further discussion, with the conclusion that CMS 53 is actually not a good use case for “principal procedure” anyway, so it should not be considered further for this particular topic.</p> <p>One participant familiar with HL7 CDA R2 then brought up the point that the current representation of “principal” in QRDA Cat 1 may not be correct. It uses the procedure’s “priorityCode”, but a review of the value set that is bound to this element indicates that it is intended for temporal priorities (e.g., “ASAP”) rather than concepts like “principal” or “secondary”. MITRE agreed that it had noticed the same thing, and added that the QRDA Cat 1 goes outside of the indicated value set to select a SNOMED-CT code for “principal”. The participant suggested that maybe the concept of “principal” is better expressed using an entry relationship. MITRE indicated that this topic would need to be further considered by HL7 when creating the templates for QDM.</p> <p>MITRE then began review of CMS 108, which has a denominator exclusion for patients who had specific procedures as the principal for the encounter being considered. MITRE showed how this measure might look using the considered approach for representing principal procedures. MITRE explained the new representation, including why an “intersection” had to be introduced into the logic. Several participants, including the measure author, indicated that they preferred the proposed representation over the current representation. As a side note, however, they also indicated that the concept of unions and intersections might be unfamiliar to some authors – and should be considered for a future training topic.</p>

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		<p>MITRE then went on to review the SCIP measures, (CMS 171, CMS 172, and CMS 178). MITRE explained the measures' general layout (with 8 populations), and showed how they would utilize the considered approach.</p> <p>One participant then raised a concern about being able to identify the instance of "Procedure, Performed" that was the principal for the encounter. Since the considered solution only identifies the encounter by a procedure code, there is not an explicit link in the logic to the principal procedure details. MITRE confirmed this, indicating that the only way it could be identified was by timing, and that even this was not guaranteed to be precise. MITRE asked if this limitation was acceptable, or if measures needed to unambiguously identify an exact instance of a principal procedure. Several participants indicated that they were concerned about this limitation—enough so, that other approaches should be considered. QDM makes representation difficult because of its "flat" data types, but perhaps a relationship clause could be considered (e.g., "Encounter Performed: ABC" has principal "Procedure, Performed: XYZ"). MITRE indicated that it would look further into this.</p> <p>Given that the currently considered approach was deemed lacking, the group saw no value in applying it to the remaining measures. This topic will be revisited in the next meeting.</p>
3:30 PM	<p><a href="#">QDM-116</a>: <i>Encounter end not well defined</i></p>	<p>MITRE introduced the topic by reading the summary from the JIRA issue: "Issue <a href="#">CCDEESPC-1</a> highlights the problem that the end of an encounter is not well defined. I don't think anyone really knows what it means. The average person would think that it means that the patient has left the setting of care, but of course in many cases that event is not even recorded. So if it is not that, it is some ill-defined event that happens after that point." MITRE then asked if this was truly a limitation in the data model, or if it was a limitation in the data collection process. MITRE then reviewed the current definitions of encounter start and end datetimes from the QDM and HQMF R2.1.</p> <p>One participant agreed that this is an issue with the current model. The exact meaning of admission datetime and discharge datetime are not clear—as there are several timestamps that could be considered. There is ambiguity because admission and discharge are <i>processes</i>, not <i>timestamps</i>. The participant suggested that QDM should provide more precise definition.</p>

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		<p>Another participant added that an encounter is really an <i>administrative</i> concept, and not necessarily a clinically meaningful term. In an ambulatory setting, encounters are often not closed until the end of the day. In an inpatient setting, an encounter might not be closed until up to three days after the patient leaves. These are not likely the timestamps that measures are looking for.</p> <p>A third participant then confirmed that her experience with pilots of other health standards has also shown that these timestamps do not line up well with the real world. In many cases, events are recorded <i>after the fact</i> rather than in real time.</p> <p>MITRE asked if perhaps we needed to find a compromise somewhere between the ideal world and the real world. Perhaps measure authors need to find a way to accommodate less accurate timestamps, while at the same time, health care settings need to find workflows that provide more accurate timestamps. Is there somewhere we can meet in the middle?</p> <p>Participants suggested a more intentional process to identify the time-related data needed by measures, and to discuss those needs with vendors and clinicians to determine what is possible and/or reasonable. Defining what QDM datetime attributes really mean should be a community process, with everyone involved.</p> <p>Participants also noted that the intended definitions of dates and times likely differs from measure to measure. In chart-abstracted measures, some of this ambiguity was resolved by humans in the loop and intentional discussions about how data would be mapped for each measure. Electronic CQMs will require a “crowd-sourcing” approach to find common definitions that work best for all. The user group agreed that this would be the best way forward.</p> <p>As a starting point, the Kaizen Clinical Workflow group will look at this topic in an upcoming meeting.</p>

Action item	Assignee
Consider other solutions for representing principal procedure, and bring them to the July UG meeting.	
Bring the topic of “crowd-sourcing” datetime definitions to the Kaizen Clinical Workflow group.	MITRE