

# IEEE P1752.2 CardioRespiratory Measures Subgroup

*Minutes of conference call held on December 15, 2022*

Conference call started at 17:00 UTC (9:00 AM Pacific Time) on IEEE Webex

Attendance: 8 Attendees

Carole	Carey	IEEE EMB
Kevin	Clark	Biomedicine domain champion, NSF
Koichiro	Matsumoto	Nihon Kohden
Paul	Petronelli	PALM Associates
Sakshi	Sardar	Critical Path Institute
Josh	Schilling	Vibrent Health
Paul	Steiner	Dartmouth College
Michael	Tsai	Kura Care

## Agenda:

- Attendance and introductions
- Prior minutes
- Discussion “Utility of Multivariate and Multiscale Cardiorespiratory Data/Metadata Schemas”
- Reminder: Cardiorespiratory (and Open mHealth) schema vision statement – value proposition
- Other business:
  - Collaborations
  - Reconsider regular monthly meeting time

Today’s discussion centered on the multidimensionality of data, and its associated context. Different approaches to data analytics ranged from “2M” to “5-6M”; the considerations enabling analytic approaches ideally should be able to accommodate discrete variable sets, scales, organs, systems (such as organ systems), modalities, and sources. This in particular is relevant to facilitating the relevance of cardiorespiratory data, and suggests the need for a particular focus on emphasizing the standardization of elemental cardiorespiratory data from which other derived higher level data relevant to key user cases (spanning fitness & performance, health & wellness, and disease management paradigms), which also then can be contextualized within the broader Open mHealth schema set.

Time constraints led to a postponement of the review of the value proposition and vision statement during this meeting, apart from a reminder asking member to review the existing initial draft proposal (posted at the iMeet site) and suggest edits and additions.

Instead, time today was devoted to suggesting a timeline for 2023, with a proposal made for the goal of having a cardiorespiratory draft proposal ready in advance of the next HRX conference scheduled for September in Seattle, which then also would fit an aspiration for engagement with a very broad range of key stakeholders (medical device industry, wearables industry, information technology industry, professional organizations, digital health leaders, governmental agencies, and motivated professionals). Behind the scenes, people responsible for this meeting are being approached about support for this aspect of cardiorespiratory digital health, as this also is a matter presently receiving increasing attention within the Heart Rhythm Society; this effort also has been shared for consideration by Open mHealth’s leadership, who have provided encouragement for further consideration and exploration. Numerous additional “target” professional conferences also were shared (see meeting slides).

In summary, important relevant groundwork for the cardiorespiratory schema has been explored during 2022, and in 2023 there will need to be a shift to the “nuts and bolts” of a cardiorespiratory schema draft that takes into account what has been understood from having done this work to characterize and better understand the schema use target, some of which also may spill over into future recommendations regarding the IEEE 1752.1 metadata schemas.

The group decided to resume meeting on the 4<sup>th</sup> Thursday of each month again going forward, with the meeting time adjusted to 8:30 AM Pacific.

Action Items:

- Manuscript postings (background more expansive reading relevant to meetings from the past 2 months)
- Revisit draft of Cardiorespiratory Schema value statement, with request for input and edits.
- Listing of use case proposals fitting the Health Care paradigm to be prioritized.
- Listing of the most basic schema elements
- Schema development timeline discussion

---

Next meeting: January 26, 2023 at 16:30 UTC (8:30 AM Pacific Time)

Minutes taken by Paul Steiner (Dartmouth)