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Using the Value Stories Framework to study Professional Learning Communities (PLCs) for Chemistry Teachers.

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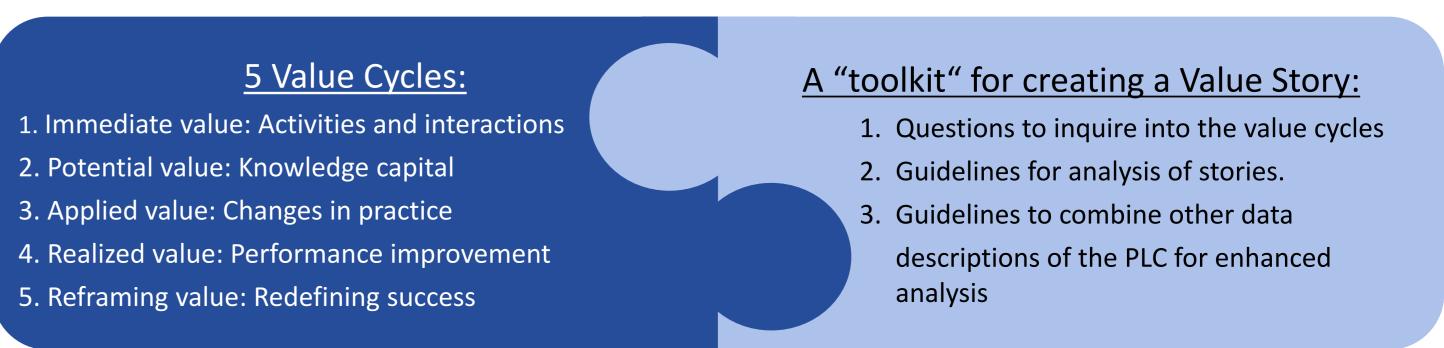
BACKGROUND

PLCs are an uprising format for the professional development of teachers. Therefore, evaluation is key to getting support, improving, and expanding (Blonder, 2018, Nir et al., 2016).

The Value Creation Framework (Wenger et al. 2011), is employed to examine the value gained from the perspective of the participants.

Five value cycles are defined along with a "toolkit" for using the framework. To analyze the value of communities and networks, the framework combines "value-creation stories" and other data sources. Stories in the value-creation genre follow a particular format that reflects value cycles.

Value Creation Framework



RESEARCH QUESTION

How can the Value Creation Framework be used to explain the value of participating in a chemistry teachers' PLC network?

METHODS

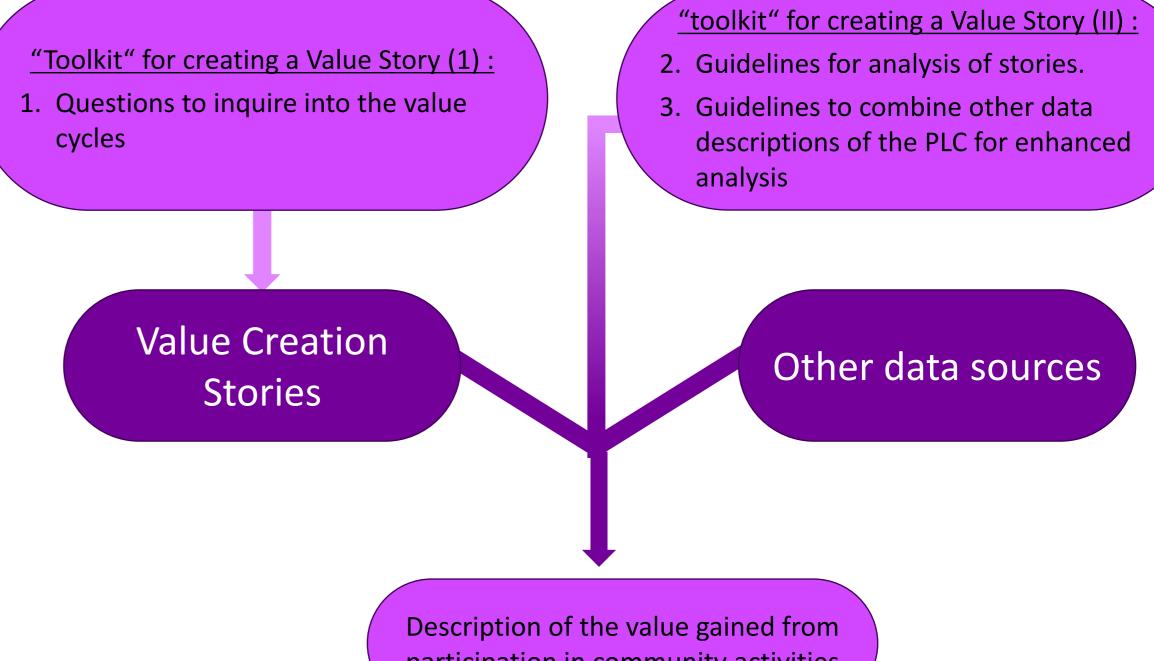
Value Creation Stories

DATA: End-of-year reflections written by PLC members. Guidelines for writing were based on the "toolkit". ANALYSIS: Qualitative thematic analysis Two-level coding system:

- I Preconceived: five value cycles
- II Emerged codes: value aspects (e.g., personal feelings, PLC description)
- Additional Themes emerged while coding.

Other data sources

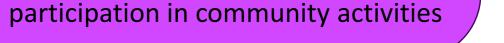
DATA: WhatsApp conversations among PLC membersduring the school year.ANALYSIS: Qualitative thematic analysis.Codes were defined while coding.Codes grouped into themes



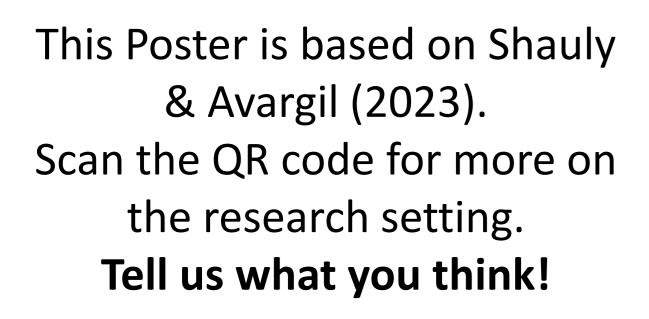
Combining Value stories and proxy

Codes defined in WhatsApp conversations were related to value cycles.

Coded segments compared to deepen the understanding of participants' experience in the PLCs



RESULTS





diate value	Potential value	Realized value
onships with lleagues. discussions on ng pedagogy.	Ideas and class activities for further development.	Sense of accomplishment, satisfaction, and professional progress.

Three value cycles were richly described

Highlighted characteristics of PLCs

In all value cycles, two processes were salient: reflection and relationships with colleagues.

Differences were found between PLCs with different goals.

DISCUSSION

Using the Value Creation Framework, we identified the following value gains for PLC members:

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- The relationships formed among PLC members, both social and professional, reduced loneliness and were a source of support for facing workplace challenges.
- Materials for teaching and assessment were valued in various forms, both developed activities, and ideas for further development.
- PLC membership was related to professional development and enrichment of classroom practices.

This adaptation of the Value Creation Framework showed the possibility of characterizing different PLCs.

Answers to general questions, not referencing specific value cycles, can yield insights into the value gained from PLC participation.

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- Nir, A., Ben-david, A., Boger, R., Inbar, D., & Zohar, A. (2016). Century skills in the Israeli educational system and operational levels. International Journal of Educational Management, 30(7), 1231–1246.
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- 4. Wenger, E., Trayner, B., & de Laat, M. (2011). Promoting and assessing value creation in communities and networks: a conceptual framework. Ruud de Moor Centrum, 18, 1–60.