

# EXPLORING OPPORTUNITIES TO INTEGRATE SYSTEMS THINKING INTO CHEMISTRY EDUCATION

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There have been recent calls for changes in the way chemistry is taught, moving away from current reductionist strategies, in which topics are taught in isolation, to a more holistic approach in which different aspects of chemistry are taught within their relevant contexts (Mahaffy, Krief, Hopf, Mehta, & Matlin, 2018; Mahaffy, Matlin, Holme, & MacKellar, 2019). It has been argued that Systems Thinking is a way to equip students to address increasingly complex problems (York, Lavi, Dori, & Orgill, 2019). However, secondary chemistry has traditionally been taught in a reductionist manner, and it may be difficult for students and teachers to embrace a Systems Thinking approach. In this project, we conducted workshops with secondary and tertiary chemistry teachers and chemistry researchers, to explore their perspectives on Systems Thinking. This presentation will present preliminary results to explore how Systems Thinking can be used to infuse interdisciplinarity into chemistry learning and teaching.

## REFERENCES

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