



## ACESSE Resource E: Selecting Anchoring Phenomena for Equitable 3D Teaching

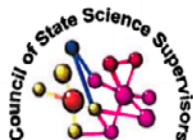
This pair of workshops is designed to introduce you to the process of selecting phenomena that can anchor an entire unit that supports students' 3D science learning or that can serve as a basis for a multi-component assessment task. This resource can also be used by individuals wanting to refine their teaching practice around phenomena based instruction. You may have heard a lot about phenomena, but you may also be wondering what exactly they are, and whether using phenomena is any different from how teachers teach today already.

This learning experience will help you:

- Explain to a peer the role of phenomena and design challenges in science teaching, with a particular focus on equity and justice.
- Generate working definitions of phenomena, design challenges, and disciplinary core ideas.
- Identify phenomena related to a bundle of three-dimensional standards.
- Experience how phenomena can be introduced at the start of a unit, in order to launch a student-driven series of questions.

With respect to the assessment process, this resource supports the task of clarifying learning goals and eliciting evidence of student learning. Specifically, analyzing standards helps to clarify learning goals. In assessment, scenarios present phenomena to students, and then specific prompts are designed to elicit student understanding of core ideas, practices and crosscutting concepts. Once written as a scenario for an assessment, teachers can use the resources introduced in [ACESSE Resource B](#) to design specific prompts for their assessments ([SEP Task Formats Tool](#), [CCC Prompts Tool](#)). This resource complements [Resource C](#), in that it provides some ways to integrate tools to connect science instruction meaningfully to students' everyday lives and cultural practices. This workshop has multiple segments, and it is broken into two sessions that last roughly three hours each, which can be organized as a full-day session or across multiple days.

[STEMteachingtools.org/pd/SessionE](https://STEMteachingtools.org/pd/SessionE)



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