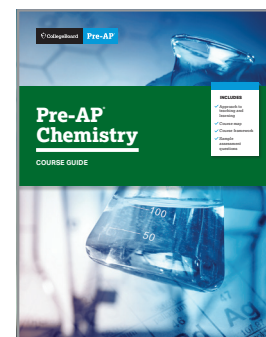




Pre-AP Chemistry and Tennessee Academic Standards for Science: Physical Sciences: Alignment Summary

Pre-AP courses focus deeply on a limited number of concepts and skills with the broadest relevance for high school coursework and college and career success. The course framework serves as the foundation of the course and defines these prioritized concepts and skills.

When teaching a Pre-AP course, teachers have purposeful time and space to bring their own voice and lessons into each unit to best meet the needs of their students and address the full range of state standards. This alignment summary demonstrates the deep connections between the Pre-AP Chemistry Course Framework and the Tennessee Academic Standards for Science: Physical Sciences to support teachers and schools in their planning. Along with the corresponding standards crosswalk, teachers and schools can use this alignment summary when planning and preparing to implement Pre-AP Chemistry.



Alignment at a Glance: Very Strong

Tennessee Academic Standards for Science: Physical Sciences:



- Energy

- Forces and Interactions

Discipline Highlights



Overall, the alignment between the Pre-AP Chemistry Course Framework and the Tennessee Academic Standards for Science: Physical Sciences is very strong.



Across all three strands of the Tennessee Academic Standards for Science: Physical Sciences, the majority of the standards are addressed in full or in part by the Pre-AP Chemistry Course Framework.



The Pre-AP Chemistry Course Framework addresses additional topics beyond the requirements of the Tennessee Academic Standards for Science: Physical Sciences such as measurements, precision, density, and rate of reaction.



= **Very strong alignment**



= **Partial alignment**

Alignment between the Pre-AP Chemistry Course Framework and the Tennessee Academic Standards for Science: Physical Sciences is described as *very strong* or *partial*. A *very strong* alignment is one in which the majority of standards are fully addressed by the mapped Pre-AP Learning Objectives (LOs). A *partial* alignment is one in which the standards are partially addressed by the corresponding Pre-AP Learning Objectives. Partial alignment can occur when one framework includes greater specificity or extends beyond the scope of the other framework. Given the focused nature of the Pre-AP course framework, some partial alignments are to be expected.

Alignment at a Glance: Partial

Tennessee Academic Standards for Science: Physical Sciences:



- Matter and Its Interactions

Discipline Highlights



While the overall alignment between the Tennessee Academic Standards for Science: Physical Sciences and the Pre-AP Chemistry Course Framework is very strong, there are a few areas of partial alignment due to the more granular nature of some of the Tennessee Academic Standards for Science: Physical Sciences.



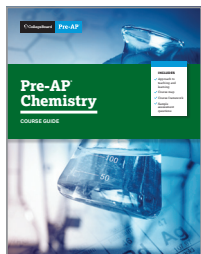
The Tennessee Academic Standards for Science: Physical Sciences include more detailed language than the Pre-AP learning objectives. For example, standard CHEM1.PS1.1 addresses the mole, molar mass, molarity, and percent composition. Although the learning objectives address several of these values, they do not specifically address percent composition. As a result, the standard is considered partially aligned.



The Pre-AP Chemistry Course Framework has a more intentionally narrow focus on a prioritized set of concepts, so certain topics are considered outside the scope of the Pre-AP course. For example, the Waves and Their Applications in Technologies for Information Transfer content strand is beyond the stated purview of the Pre-AP framework.

Summary

Beyond alignments to the course framework, it is also important for educators to turn to the Pre-AP Shared Principles and Pre-AP Science Areas of Focus to understand the full picture of alignment between Pre-AP Chemistry and the Tennessee Academic Standards for Science: Physical Sciences. The shared principles and areas of focus represent the Pre-AP approach to teaching and learning, and these principles deeply address skill development and disciplinary practices that cannot be easily captured within a standards crosswalk. **In summary, there are ample opportunities for teachers to address the Tennessee Academic Standards for Science: Physical Sciences with confidence throughout this course.**



Learn more about Pre-AP Chemistry at preap.org