Pre-AP Biology and Arkansas K-12 Science Standards: 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 Biology Course Framework and the Arkansas K-12 Science Standards 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 Biology.

Alignment at a Glance: Very Strong

AR Biology - Integrated:

- Topic 1: Cycling of Matter and Energy
- Topic 2: Structure and Function
- Topic 3: Biodiversity and Population Dynamics
- Topic 4: Genetic Variations in Organisms
- Topic 5: Evolution by Natural Selection

Overall, the alignment between the Pre-AP Biology Course Framework and the AR K-12 Science Standards is very strong.

- All seven of the AR Biology - Integrated topics are addressed in full or in part by the Pre-AP course framework.
- All standards in Topics 1, 2, and 4 are fully addressed by the Pre-AP course framework and model lessons.
- The majority of standards in Topics 3 and 5 are addressed in full or in part.

= Very strong alignment

= Partial alignment

Alignment between the Pre-AP Biology Course Framework and the Arkansas K-12 Science Standards 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

AR Biology - Integrated:
• Topic 6: Life and Earth’s Systems
• Topic 7: Human Impact on Earth’s Systems

Discipline Highlights

✔️ While the overall alignment between the Arkansas K-12 Science Standards and the Pre-AP Biology framework is strong, there are a few areas of partial alignment due to the more granular nature of some of the Arkansas K-12 Science Standards.

✔️ There are some gaps in the alignment with AR Biology – Integrated Topics 6 and 7. Although not all Earth’s Systems standards have direct matches, it is valuable to see where the Pre-AP Biology Course Framework extends beyond what is listed in the Arkansas K-12 Science Standards.

Summary

Beyond alignments to the course framework, it is also important for educators to turn to the Pre-AP Shared Principles and Pre-AP Biology Areas of Focus to understand the full picture of alignment between Pre-AP Biology and Arkansas K-12 Science Standards. 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 Arkansas K-12 Science Standards with confidence throughout this course.

Learn more about Pre-AP Biology at preap.org