

CELLULAR AND MOLECULAR BIOLOGY

Wyoming Science Content Standards: Grades 9 – 12

Lesson	Standard	Benchmark
3, 4	2.1	Students research scientific information and present findings through appropriate means.
3	2.2	Students use inquiry to conduct scientific investigations. <ul style="list-style-type: none"> • Pose problems and identify questions and concepts to design and conduct an investigation. • Collect, organize, analyze and appropriately represent data. • Give priority to evidence in drawing conclusions and making connections to scientific concepts. • Clearly and accurately communicate the result of the investigation.
3, 4	2.3	Students clearly and accurately communicate the result of their own work as well as information from other sources.
All lessons	2.4	Students investigate the relationships between science and technology and the role of technological design in meeting human needs.
1, 3, 4	3.2	Students examine how scientific information is used to make decisions. <ul style="list-style-type: none"> • Interdisciplinary connections of the sciences and connections to other subject areas and career opportunities. • The role of science in solving personal, local, national, and global problems.

Wyoming Mathematics Content Standards: Grades 9 – 12

Lesson	Standard	Benchmark
1, 2	1.1	Students represent and apply real numbers in a variety of forms.
1, 2	1.2	Students apply the structure and properties of the real number system.
1	1.3	Students explain their choice of estimation and problem solving strategies and justify results of solutions in problem-solving situations involving real numbers.
1	4.5	Students connect algebra with other mathematical topics.
1, 2	5.4	Students determine, collect, organize, and analyze relevant data needed to make conclusions.

Wyoming Language Arts Content Standards: Grades 9 – 11

Lesson	Standard	Benchmark
All lessons	1.I.A.1	Students demonstrate understanding in their reading of grade-appropriate texts based on a variety of text features, including: literal comprehension (main idea, summarizing, paraphrasing).
All lessons	1.I.A.2	Students demonstrate understanding in their reading of grade-appropriate texts based on a variety of text features, including: inferential comprehension (prediction, cause/effect, compare/contrast, drawing conclusions).
All lessons	1.I.B	Students use a range of strategies (using word origins; understanding multiple meanings; inferring meaning from

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		context; inferring literal, figurative, and technical meanings; understanding technical and subject-specific words) to develop vocabulary.
All lessons	1.III.A.3	Students read a variety of information genres (e.g., documentaries, speeches, public documents, print news media, Internet, websites, electronic databases, microfiche, almanacs, news) and can: make generalizations and inferences based on implicit and explicit information.
3, 4	1.III.B.1	Students conduct research using a variety of grade-appropriate sources and can: synthesize relevant data through note-taking and questioning.
3, 4	1.III.B.2	Students conduct research using a variety of grade-appropriate sources and can: analyze and interpret technical data, written directions, and technical manuals.
3, 4	2.I.C.1	Students arrange paragraphs into logical progressions.
3, 4	2.I.D.1	Students use suitable content, vocabulary, style, structure, tone, and voice.
3, 4	2.I.F	Students use meaningful word choice appropriate to purpose to achieve a specific tone.
3, 4	2.I.G	Students use grade level-appropriate language conventions for spelling, capitalization, punctuation, grammar, and usage.
3, 4	2.II.C	Students create technical writing for practical tasks (e.g., scientific procedures) using grade level-appropriate strategies.
3, 4	2.II.D	Students write and present persuasive essays, demonstrations, and reports (research, problem-solving) using grade level-appropriate strategies.
All lessons	3.8.a	Students use strategies to contribute to group discussions by: considering others' ideas and opinions before responding.
All lessons	3.8.b	Students use strategies to contribute to group discussions by: determining the purpose of discussions.
All lessons	3.9	Students synthesize relevant data from presentations and discussions using strategies such as note-taking and questioning.
Wyoming Health Education Content Standards: Grades 9 – 12		
Lesson	Standard	Benchmark
3	2.1	Students demonstrate the ability to locate and utilize various sources of health information, products, and services.