



Responsible: Office of Academics; Department of Curriculum & Instruction

PURPOSE

This administrative procedure shall define the ways in which a student may earn the necessary science credits to graduate from high school in the Washoe County School District ("District").

PROCEDURE

1. In order to graduate from high school a student must earn a minimum of two credits of science. The District's Course of Study requires enrollment in three years of science in high school. Students wishing to earn an Advanced Diploma must earn three credits of science. Students wishing to earn an Honors Diploma must earn a minimum of three credits of science, including two credits in Biology, Chemistry, or Physics.
2. The sequence of science courses is as follows:
 - a. 9th grade: Biology 1-2 (or Biology Honors 1-2)
 - b. 10th grade: either Chemistry 1-2 (or Chemistry 1-2 Honors) or Physical Science (or equivalent).
 - c. Following the first two courses, a student may take a variety of other science courses that will meet the District's Course of Study requirement to take three years of science.
3. Every entering freshman will be enrolled in Biology 1-2 or Biology 1-2 Honors. Exceptions will be students who qualify for Chemistry 1-2 (through successful completion of Biology 1-2 in a middle school Gifted and Talented ("GATE") magnet program) or, he/she is an IEP (Individualized Educational Program) student whose IEP indicates that a different course of study is more appropriate for that student.
4. UNR entrance requirements include three credits of science; suggested courses include biology, chemistry, and physics. Chemistry lab is considered as part of the chemistry course and will not be counted as a separate honors course.
5. To qualify for the Millennium Scholarship three years of science are required; suggested courses include biology, chemistry, and physics. Chemistry lab is considered as part of the chemistry course and will not be counted as a separate honors course.
6. A student who withdraws from or fails a higher level class, may take the next lower level class to receive credit. For example, a student who fails Chemistry 1-2 Honors

may take Chemistry 1-2 for credit, or he/she may take Physical Science 1-2 for credit.

7. Students who have successfully completed Physical Science 1-2 may receive subsequent credit for Chemistry 1-2.
8. Students who have received credit for Chemistry 1-2 may not subsequently receive credit for Physical Science 1-2. Physical Science 1-2 repeats some of the content in Chemistry 1-2 at a slower pace and students should not be awarded additional credit.
9. Certain math knowledge is required for success in science (e.g. it is highly recommended that students enrolled in Chemistry 1-2 be concurrently enrolled in Geometry or higher). Please refer to the course descriptions or placement guidelines.
10. Students who repeat a science course to raise a grade for any reason (qualification for the next higher science or improved GPA) are expected to take the same class. Both courses appear on the transcript, but the lower grade is replaced with "RP." No credit will be earned for the repeated ("RP") class.
11. Students who fail a science course may take a different, but equivalent science course or may repeat the failed science course in order to receive credit. Both courses appear on the transcript, but the "F" grade is replaced with "RP." Please see attached chart for repeat courses.
12. Hands-On Science
 - a. Participation in hands-on science is important to learning science and dissections are a valuable learning experience in which all students are encouraged to participate. When dissection is used in the classroom:
 - i. Teachers will thoroughly explain the learning objectives of the lesson and use written and audio-visual materials as appropriate to maximize the educational benefits of the experience.
 - ii. All specimens will be treated with respect.
 - iii. All students will be informed, prior to the dissection, that they have the option of discussing individual concerns about dissection with the appropriate teacher.
 - b. Upon completion of the dissection, the remains will be appropriately disposed of as recommended by the Washoe County Health Department.
 - c. All science teachers that utilize dissection as a learning activity should, upon written request by a student's parent or guardian, permit a student who

chooses not to participate in dissection to demonstrate competency through an alternative method.

- d. The teacher should specify in writing what is expected of the student participating in an alternative activity. Alternative activities should allow students to gain the same content knowledge as a dissection activity and should allow for a comparable investment of time and effort by the student. Students participating in the alternative project should be subject to the same course standards and examinations as other students in the course.

IMPLEMENTATION GUIDELINES & ASSOCIATED DOCUMENTS

1. This Administrative Procedure reflects the goals of the District's Strategic Plan and aligns/complies with the governing documents of the District, to include:
 - a. Board Policy 6600, Course of Study
2. This Administrative Procedure aligns with Nevada Revised Statutes (NRS) and Nevada Administrative Code (NAC) to include:
 - a. Chapter 389, Examinations, Courses, Standards and Graduation, and specifically:
 - i. NRS 389.160, Credit toward graduation from high school for courses taken at community college or university.

REVIEW AND REPORTING

1. This procedure and any accompanying documents will be reviewed bi-annually in even numbered years.

REVISION HISTORY

Date	Revision	Modification
1/2010	1.0	Adopted as Accepted Practice
4/24/2015	2.0	Revised: converted to Administrative Procedure
3/02/2016	3.0	Revised: related to assessment
3/18/2016	4.0	Revised: added "Hands-On Science"
3/5/2018	5.0	Revised: "End of Course Exam" removed; course sequence updated

ADDENDUM

1. Course Sequence Guidelines



Administrative Procedure 6649A
HIGH SCHOOL SCIENCE COURSE SEQUENCE

Responsible: Office of Academics; Department of Curriculum & Instruction

Note: Not all science classes are offered at every school.

Course Title	Course #
9th Grade *	
Biology	3141/3142
Biology (H)	3143/3144
10th Grade	
Chemistry	3201/3202
Chemistry (H)	3203/3204
Physical Science	3101/3102
Earth Science	3131/3132
Earth Science (H)	3133/3134
Conceptual Physics	3235/3236
Engineer Your World (McQueen HS only)	3309/3310
11th Grade/12th Grade	
Environmental Science	3111/3112
Forensic Science	3231/3232
Human Anatomy & Physiology	3261/3262
Physics (H)	3241/3242
Microbiology (H)	3171/3172
Astronomy	3267/3268

Advanced Placement Science Classes: Curriculum for AP classes is regulated by College Board. AP courses can be taken after successfully meeting the prerequisite(s) as stated in the course catalog.

AP Biology	3149/3150
AP Chemistry	3211/3212
AP Environmental Science	3115/3116
AP Physics 1	3263/3264
AP Physics 2	3265/3266
AP Physics C: Mechanics	3247/3248
AP Physics C: Electricity & Magnetism	3259/3260

- * Students who have successfully completed HS Honors Biology as part of the GATE MS Magnet program may start high school in Chemistry or Chemistry (H) with teacher recommendation. In addition to Chemistry, with permission from the school, students may choose to enroll in an additional science course if their schedule permits and the school offers the course. Please note that HS Honors Biology taken in 8th grade will not count as one of the required science courses for graduation or the honors diploma.