2019-2020 Honors Biology Syllabus

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He/Him/His

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Student Hours: 7:30 to 8:00am and after school until 4:15. Thursday after school until 5:00.

What this course is about...
Honors Biology is a beginning level introduction to the biological sciences. In this course we will study ecology, cells, genetics, evolution, and biological diversity. This course is also about developing skills that enable you to think logically about evidence you gather through asking questions. This course is about what makes living things function and relate to each other. This course is about every living thing, the rules they follow, and what allows them to live.

My goals for the course...
- To help you become comfortable with the idea that science is a verb. We do science, we are not casual observers.
- To encourage and practice being a scientifically literate and logical thinker that requires evidence to help accept ideas or formulate arguments.
- To help you navigate the complex wilderness of learning something new and help you understand that mistakes are expected, setbacks often happen, and we can work to close gaps in your learning.
- To build a connection between the science we are learning about and experimentation we will perform in the lab.
- To build a connection between the science we are learning about and your everyday life and biological future.

Textbook
- Pearson Realize Biology, Miller & Levine ($104.00).

Communication
You may always stop by my room during student hours or email me at either email address. I normally stop responding to emails at 7PM. Assignments will be posted to Google Classroom. Grades can be found on Infinite Campus. If you have outside of school concerns about access to the internet, please see me privately.

Food and Drink in Class
I do not mind students drinking water or non-sugary drinks in class as long as I do not see it as a problem. Small snacks are fine but please do not bring breakfast or a large lunch to class. If you have an issue I need to know about, please let me know. We have a traditional problem with ants in my classroom. They are most active in the fall and early winter. Please avoid leaving crumbs or pieces of snacks or the ants will literally arrive by the thousands. I mean, that’s cool to watch but...

My Classroom Rules
The rules are congruent with those laid out in your student handbook. Fundamentally, those rules boil down to four:
1. Respect everyone and everything in this school.
2. You are here to learn. Effort is required.
3. You are expected to do your own work.
4. You may not interfere with anyone else’s right to follow Rules 1, 2 and 3.
Behavior and Group Work Norms
The biggest learning modifier identified by education scientists is trust in the classroom. If you trust me and each other, more learning occurs. In our class we will allow individuals to have ideas and allow for ourselves and each other to be wrong. In groups we will think about and respect each other so that our objectives get completed through collaboration. To help, I am adding 5 norms that I would like us to follow this year.

1. Pausing
   a. Pausing before responding or asking a question allows time for thinking.
   b. Listening attentively to others’ ideas and allows time for thought after asking a question or making a response.
   c. Waiting until others have finished before entering the conversation.
2. Paraphrasing
   a. Paraphrasing assists members of the group to hear and understand each other as they formulate decisions. Try using a paraphrase starter that is comfortable for you: “So...” or “As you are...” or “You’re thinking...” and following the starter with a paraphrase.
3. Placing ideas on the table and pulling them off
   a. Ideas are the heart of a meaningful dialogue. Label the intention of your comments. For example, you might say, “Here is one idea...” or “One thought I have is...” or “Here is a possible approach...”.
4. Paying attention to self and others
   a. Meaningful dialogue is facilitated when each group member is conscious of self and of others and is aware of not only what she/he is saying, but also how it is said and how others are responding.
5. Presuming positive intentions
   a. Assuming that others’ intentions are positive promotes and facilitates meaningful dialogue and eliminates unintentional put-downs.

Late Work Policy
Late work is not a problem unless it is habitual. If you are turning in more than one late assignment in the semester we will have a talk about how to remedy this. I will accept late work during the week it is due because the work is important to your learning and I want it completed. However, for any late assignment there will be a 20% discount. Labs should not be late considering the revision policy.

Bathroom Biology Breaks
It is a basic human right to be able to get rid of bodily waste, or at least that is how I see it. It is not, however a right to leave class because of boredom, snacks, or meet-ups. When you go to take a biology break, I expect you to be in the appropriate location. If you are habitually taking biology breaks we will have a talk about your needs. No phones during biology breaks. Leave them on the tray near the pass. No biology breaks during first 10 or last 10 minutes of class.

Phones and Headphones
- Headphones and phones should not be visible during class. No phones on your desk. Turn off notifications.
- If you need your phone, I will let you know when you can access it.
- No phones leave the room during biology breaks.
Course Requirements

Home Learning
- The Home Learning document is a resource guide for studying for the week. It is a one-stop-shop for what you need to learn, sources of information, and practice questions.
- The Home Learning comes out each Saturday morning and should be completed by the following Friday.
- It is important to spend time on the Home Learning during the week outside of class.

Quizzes
- You will have short check for understanding using a Google form or piece of paper at least 4 days a week. These are not graded but help me determine how much you are learning as we are exposed to new concepts. These are completed during the first 5 minutes of class. I will review the quiz shortly afterwards.
- You will have 5 content quizzes on Fridays throughout the semester. These are graded quizzes and are cumulative within the current unit of instruction. These 5 quizzes can be retaken once each after you have reviewed your initial quiz and determined your learning gaps.
- Lab Quizzes - Some lab experiments will be assessed through a quiz. You will be given collected data and asked specific questions about your findings.

Summative Tests
- You will have 3 tests each semester on the last school day of each month. All tests are cumulative back to the beginning of the year. Effort will be made to construct tests based on 60% new/ 40% old material breakdown.
- Summative Test Recovery Policy
  - All missing assignments must be completed before a student is eligible for recovery.
  - If your cumulative average at the time of the test is below a 79, you are eligible for recovery up to 100% on the test.
  - Go to your teacher during help times and find out your missed questions. Have a conversation with your teacher about your areas of concern.
  - Complete test corrections for your missed questions exactly as specified in the Test Correction Guidelines.
  - You have the following periods of time to complete BOTH test corrections and the make up test.
    - Test 1: September 30, Recovery Period Ends: November 5
    - Test 2: October 31, Recovery Period Ends: December 6
    - Test 3: December 6, Recovery Period Ends: December 16
  - All test make ups will be completed through Illuminate. You MUST have your device in order to make up the test.
    - Dr. Blotner: Monday after school 3:40 to 4:40 in room I-53
    - Ms. Perling: Wednesday before school 7:10 to 8:10 in room J-108
    - Mr. Kuhn: Thursday after school from 3:40 to 4:40 in room J-106
  - You MUST sign up for your test make up using the form on Google Classroom. Sign ups must be entered the FRIDAY before your make up week. For example, you are taking the make up with Ms. Perling on Wednesday morning. You complete the Google form the Friday before that Wednesday.
Quiz Retakes
- Student who scores below what they expected can retake the quiz if...
  - Student comes in for help prior to retake
  - Student completes the reservation Google form located in the About section of Google Classroom
- Quiz retakes are on Thursdays from 3:40 to 4:40
- The retake score will stand as the final score for the quiz. Please close those learning gaps before retaking a quiz.
- Any quiz can be retaken during the active 6 weeks. After six weeks, original quiz grades stand.
- Only 1 retake possible. Lab quizzes cannot be retaken.
- Retake opportunities end 2 weeks before the end of the semester.

Labs and Experimentation
We will perform 10 lab experiments this year. Four of these labs will require formal CERA reporting (WU). All others will require you to pass a lab quiz (Q). During the lab quiz you will work alone to answer specific questions using collected class lab data (provided). Each CERA report will have an initial deadline, revision and final deadline. Written feedback will be given after the initial deadline and students will have a week to revise. Here is the tentative list.

FWU - Formal write up (counts as a test grade)  Q - Lab Quiz
GR - Group mini-poster  WU - Claim, Evidence, Reasoning, Argumentation (CERA)
PA - Performance Assessment (counts as a test grade)

<table>
<thead>
<tr>
<th>#</th>
<th>Lab Topic</th>
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<th>Lab Topic</th>
<th>Type</th>
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</thead>
<tbody>
<tr>
<td>1</td>
<td>Soybean Rhizobium</td>
<td>FWU</td>
<td>6</td>
<td>Photosynthesis</td>
<td>Q</td>
</tr>
<tr>
<td>2</td>
<td>Population Density of Plants</td>
<td>Q</td>
<td>7</td>
<td>Cell Respiration</td>
<td>GR/PA</td>
</tr>
<tr>
<td>3</td>
<td>Owl Pellet Lab</td>
<td>PA</td>
<td>8</td>
<td>Genetics of Brassica rapa Plants</td>
<td>FWU</td>
</tr>
<tr>
<td>4</td>
<td>Carbohydrates in Bananas</td>
<td>Q</td>
<td>9</td>
<td>Bacterial Evolution</td>
<td>Q</td>
</tr>
<tr>
<td>5</td>
<td>Red Blood Cell Argumentation</td>
<td>GR</td>
<td>10</td>
<td>Rat Dissections</td>
<td>WU</td>
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<tr>
<td>6</td>
<td>Enzyme Reaction Rate</td>
<td>WU</td>
<td>11</td>
<td>Cyanide Concentration in Clover Plants</td>
<td>WU</td>
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Performance Assessments
Performance assessments are alternatives to paper/pencil tests that demonstrate learning.
- Ecology - Owl Pellet Lab
- Cells - Cell Respiration
- Genetics - Lego Lab Mutations
- Evolution - Candy Bar Phylogeny
- Diversity - Rat Dissection
Course Weights

- **Summative (40%)**
  - Cumulative monthly tests (3 per semester)
  - Performance Assessments (1 per unit)
  - Formal Lab Write Ups (1 per semester)

- **Formative (40%)**
  - Classwork
  - Quizzes
  - Homework

- **Final Exam (20%)**

- **Progress Reporting**
  - Non-graded markers such as safety contract, test corrections, etc.

- **Homework**
  - Non-graded tracking of homework (if needed)

Course Pacing (Tentative)

Unit 0 - Science Practices: August 12 to August 23
Unit 1 - Ecology: August 26 to October 11
  - Test 1: September 30
Unit 2 - Cells: October 14 to November 20
  - Test 2: October 31
Unit 3 - Genetics: November 1 to January 10
  - Test 3: December 6
Unit 4 - Evolution: January 13 to February 21
  - Test 4: January 31
Unit 5 - Diversity: February 24 to March 12
  - Test 5: February 28
Exam Review: May 1 to May 8

Student Initiated Recovery - School Policy

If you have a 79% or below in the course, the recovery policy is as follows:

- Step 1: Student initiates a conversation with the teacher.
- Step 2: Student turns in ALL missing assignments. Late work will be penalized 10 points.
- Step 3: If average remains below an 80%, student will meet with the teacher to choose which assessment(s) they would like to retake. Students MUST attend the teacher’s office hours prior to the assessment retake.
- All work must be completed at least 10 days before the end of the semester. Late work will NOT be accepted after this deadline.

Honor Code and Surface Device Etiquette - Fulton County Honor Code Policy

As a community that values academic honesty and seeks to provide the highest levels of learning for students, the Centennial administration, faculty, parents, and students do not tolerate cheating.

As stated in Fulton County Board of Education Policy, cheating includes:

- Copying or borrowing from another source and submitting it as one’s own work – including plagiarizing sources from the internet
- Seeking or accepting unauthorized assistance from anyone on tests, projects, or other assignments
- Providing or receiving test questions in advance without permission
- Working collaboratively with other students when individual work is expected – including homework
- Other offenses as determined by administration
Consequences for copying or providing answers on an assignment which should have been completed by an individual student:

- First offense – zero on the assignment; teacher requires assignment completion for 70%; assignments not redone will remain a zero
- Second offense – zero on the assignment; parent notification; teacher requires assignment completion for 50%; assignments not redone will remain a zero
- Third and further offenses – zero on the assignment; parent notification; disciplinary referral to administrator; teacher requires assignment completion for 50%; assignments not redone will remain a zero

Consequences for plagiarism on a research paper or project; receiving or giving answers during a test or quiz:

- First offense – zero on the paper, project, or test; parent notification; teacher requires the original or an alternate assignment to be completed for 50%; time allowed will be half the original time assigned; assignments not redone will remain a zero
- Second and further offenses – zero on the paper, project, or test; parent notification; disciplinary referral to administrator; dismissal from leadership positions; exclusion or dismissal from honor societies; teacher requires the original or an alternate assignment to be completed for 50%; time allowed will be half the original time allowed; assignments not redone will remain a zero

The following violations shall result in immediate administrative referral and exclusion or expulsion from all honor societies: cheating on a final exam; altering or forging grades, gradebooks, progress reports, report cards, or academic records; fabricating data or signatures; theft of a test or other school resources. Students who commit an honor code violation could also lose leadership positions in clubs or organizations.

Consequences will be applied if cheating occurs on any work submitted by a Centennial student in an event, competition, or contest in which he represents the school system. Additional possible consequences may include exclusion from interscholastic activities and extracurricular activities, as determined by the administrator.

Surface Device Etiquette:

Students must:

- Come to class with their surfaces fully charged, with the charger and stylus.
- Only use Surface for class work/notes.
- Teacher can monitor the surface randomly.
- You CANNOT record or take pictures of anyone or anything in the classroom without expressed permission.

Student Code of Conduct & Discipline Handbook P. 36 Technology Offenses 18 A,B,C,D,E

- Technology/computer misuse (inappropriate internet use, disabling, etc.)/computer/tampering/trespass/hacking/altering hard drives.
- Refusal to comply with school rules or reasonable directions or commands of school staff regarding use of technology and/or visual recording devices without permission.
- Consequence Range: Local interventions up to 10 days OSS.

STUDENT AND PARENT DIGITAL SIGNATURE FORM