We, the members of the Crosby HIgh School Community are committed to providing a safe and welcoming environment that promotes a creative, innovative, and intellectually challenging learning experience to ensure that all students are prepared to become college and career ready in order to be productive members of a diverse society.

CROSBY HIGH SCHOOL COURSE SYLLABUS

Crosby Course Number & Title: **Biology 400, Biology 401**
Instructor's Name: **Stowe** Semester & Year: **Full Year 2018 - 2019**

COURSE DESCRIPTION

BIOLOGY 400K, 400, & 401: This course examines the basis for life including molecular and cellular biology, heredity, evolution, and ecology. There is an exploratory aspect to the course that focuses on laboratory investigations to promote skills in scientific inquiry, data collection and analysis, and formulation of conclusions based on available data. All students will develop problem-solving skills throughout the year.

COURSE GOALS/LEARNING OBJECTIVES

Unit 1: Matter and Energy in Living Systems → Students will be introduced to biology as a science including the use of the scientific method as a way to solve problems. They will explore chemistry and organic chemistry. The unit also explores the processes of photosynthesis and respiration, as well as the connection between the two.

- Standards: LS1.A (Structure and Function), LS1.B (Growth and Development), and LS1.C (Organization of Matter and Energy Flow in Organisms)

Unit 2: Heredity → This unit will explore the processes and purposes of cell division, including mitosis and meiosis. Students will explore the structure of DNA, chromosomes, and the process of protein synthesis in coding for genetic traits. They will also examine how these traits are passed to future generations in the field of genetics.

- Standards: LS1.A (Structure and Function), LS3.A (Inheritance of Traits), LS3.B (Variation of Traits)

Units 3 and 4: Ecology and Biological Evolution → This unit explores Charles Darwin's theory of evolution and the work of the science community that preceded his discoveries. The focus is on evolution in terms of genetic variation. It will explore how and why living things have changed over time. Students will explore the biotic and abiotic factors of an ecosystem. They will study the flow of energy through the ecosystem in food webs, food chains, … and though different interactions that organisms have with each other and with their environment.

- Standards: LS4.A (Evidence of Common Ancestry and Diversity), LS4.B (Natural Selection), LS4.C (Adaptation), LS4.D (Biodiversity and Humans) LS2.A (Interdependent Relationships in Ecosystem), LS2.B (Cycles of Matter and Energy Transfer in Ecosystems), LS2.C (Ecosystems Dynamics, Functioning, and Resilience), LS2.D (Social Interactions and Group Behavior)

Unit 5: Human Impact on the Environment → Students will explore how resources affect populations, how human activities have an impact on our environment, and the importance of biodiversity.

- Standards: LS4.D (Biodiversity and Humans)

REQUIRED TEXTBOOK AND MATERIALS

Biology - Miller & Levine

COURSE POLICIES

- Attendance and Tardy Policy

- Attendance Policy: Please refer to the district policy located on the Crosby website or in the student handbook (https://goo.gl/nSz4er)
- Students who are tardy to a class 3 times will serve a detention issued by the classroom teacher. Each subsequent tardy will be a referral to the office for disciplinary action.

- Late Work Policy
  - Refer to district grading policy or see the link at the bottom of the page.

- Academic Dishonesty - Academic dishonesty shall in general mean conduct which has as its intent or effect the false representation of a student's academic performance, including but not limited to:

  a. Cheating on an examination
  b. Collaborating with others in work to be presented, contrary to the stated rules of the course
  c. Plagiarizing, including the submission of
  others ideas or papers (whether purchased, borrowed or otherwise obtained) as one's own
  d. Stealing or having unauthorized access to examination or course materials
  e. Falsifying records, laboratory or other data
  f. Submitting, if contrary to the rules of a course, work previously presented in another course
  g. Knowingly and intentionally assisting another student in any of the above, including assistance in an arrangement whereby any work, classroom performance, examination or other activity is submitted or performed by a person other than the student under whose name the work is submitted or performed.

  Students should not give or receive aid during examinations, quizzes, tests or lab assignments. Students should not use answers to examinations, quizzes and tests written on cheat sheets, clothing or body parts, or obtained from others who have taken the same test prior to them. Students should not use in any written work, without proper acknowledgement, the wording of any sentence or part of a sentence of another author without acknowledgement of the original author. Students should not use calculating devices during tests where calculators are not permitted.

  Plagiarism according to The American Heritage Dictionary of the English Language, Fourth Edition, 2000, is "1. A piece of writing that has been copied from someone else and is presented as being your own. 2. The act of plagiarizing: taking someone's words or ideas as if they were your own." If you copy another's work in a paper, for instance, you must put the copied material in quotation marks and footnote or endnotes. If you restate the language or thoughts of another in your own words, you are paraphrasing. Omit the quotation marks, but footnote or endnote the original source. Not to attribute the idea to the original person is to plagiarize. In general, it is better to acknowledge too many sources than too few.

  Plagiarism, as defined above, is considered a serious academic offense. According to Connecticut statute, plagiarism is a criminal act and classified as a Class "B" misdemeanor. The teacher, in conference with an administrator, will exercise his/her professional judgment when determining an appropriate penalty for a project that has been plagiarized. The nature of the penalty should be relative to the magnitude of the offense. Examples of penalties that will be invoked are: a zero for the project, an "F" for the course, and/or referral to the proper authorities. The teacher and administrator will determine if the student may be permitted to complete the paper properly, or write an entire new paper properly. These and other penalties will not be imposed when the classroom teacher determines that the sources in a paper have been mis-cited. The teacher with the administration will determine the extent of grade reduction and possible suspension or referral to authorities. (Obtained from Tunxis Community College Handbook)

CODE OF CONDUCT

- Profanity
  - The use of profanity in school is unacceptable and can result in an office referral.

- Cell Phone Usage Policy
    - Cell phones **MUST BE** off and away other than when approved by the teacher for academic purposes
    - 1st offense: Confiscate, warning and notify parent, return to student at the end of the school day.
    - 2nd offense: Confiscate, in school suspension or after school detention, item to be returned to parent/legal guardian only at the end of the school day.
    - 3rd offense: Confiscate, out of school suspension, item to be returned to parent/legal guardian only at the end of the school day. (https://goo.gl/FMxNyt)

- Disposition Toward Learning

COURSE GRADING (Per District Policy)
60% Assessments
20% Classwork
10% Disposition Toward Learning
10% Homework

Student/Parent Handbook: *https://goo.gl/rsFr95*