

WSD Curriculum Map Template

[Example](#)

Course Title <i>Clarification: This is the name of the course as it would appear in the program of studies.</i>	Biology				
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Statement of Outcome <i>Clarification: This is a general statement of what a student would get out of taking this class. It is what would appear as the description of your course in the program of studies.</i>	In this course, students will develop student learning and competencies in Biological Sciences. Specifically, students will answer this essential question: “How do cellular processes affect an organism’s health?” - What is life? (Structure - Cells/Biomolecules) - How does life work? (Functions - Cellular Metabolism/Signaling) - What controls life processes (Genetics/Meiosis/Inheritance) - What makes us sick? (Disease/Germ theory/Pathogens/Immunity)				
Unit Name & Timeframe <i>Clarification: What is the name of your unit? Approximately how long will it last?</i>	Structure & Function - Prokaryotes	Structure & Function - Eukaryotes	Energy & Matter - Metabolic Pathways	Genetics - Proteins, Inheritance, & Evolution	Final Project
Topic(s) and driving question. <i>Clarification: This is stuff or “content” you will use to teach the GP indicators and GX and the questions you use to frame the big ideas.</i>	How do the structures of organisms enable life's functions?	How do the structures of organisms enable life's functions?	How do organisms obtain and use the energy they need to live and grow?	How do genes affect the traits and health of organisms?	
GX Focus <i>Clarification: This is the GX's you plan to pay particular attention to.</i>	Critical Thinking	Critical Thinking	Critical Thinking	Critical Thinking	Critical Thinking
GP- Content Indicators Clarification: These are the performance indicators you will teach, assess and report on. <i>Here are some rubric resources from Patterns Biology</i>  WHS - Patterns Biolo...	 HS4: Develop and/or us...  HS14: Summative expla... - DUM 9-10.1 - CEA 9-10.4	 HS4: Develop and/or u...  HS14: Summative expl... - DUM 9-10.1 - CEA 9-10.4	 HS1: Ask testable questions t...  HS9: Analyze relationships in ...  HS14: Summative explanation - DUM 9-10.1 - CEA 9-10.4 - PCO 9-10.2	 HS4: Develop and/or use a model  HS14: Summative explanation  HS7: Engage in the engineerin... - DUM 9-10.1 - CEA 9-10.4 - DUM 9-10.4	 WHS Science Critical thin...
Summative Assessment <i>Clarification: This is a brief description of the task and or product you will use to</i>	Students have multiple assessment opportunities - they build a bacteria model and use it along with academic	Students complete microscopy work and learn to identify structures in cells and then build up to hierarchical	Students learn about metabolic pathways, basic concepts on matter and bonds, and then design their own experiment on cellular	 BIO Lab - Cell Cycle & Mitosis  BIO - Critical Thinking Lab Report  BIO - Natural Selection Simulat...  2021 BIO Quiz#4A - GENETICS	 23-24 BIO - FINAL PROJECT  Final Bio Project Exemplars

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<i>assess student proficiency on the performance indicators you identified above.</i>	vocabulary on their first test. Students complete their first lab investigation and write up a Critical Thinking Lab Report. 1.1 Bacteria - The Earlie... BIO TEST 1A - Bacteria ... BIO Lab - Membranes a... BIO - Critical Thinking L...	scale in organs and systems. BIO Cell to Organ Project 2021-22 BIO TEST 2A - ...	respiration in yeast. BIO - What are electrolytes? BIO PreLab - Carbohydrates BIO - Critical Thinking Lab Rep... 22-23 BIO TESTA - Biomolecules		
Link to Unit <i>Clarification:</i> <i>This is the link to your unit plan.</i>	BIO Unit 1 WHS BIOLOGY Ubd	BIO Unit 2	BIO Unit 3	BIO Unit 4	
NGSS standards	HS-LS1-3 Plan and conduct an investigation to provide evidence that feedback mechanisms maintain homeostasis (osmosis).	HS-LS1-2 Develop and use a model to illustrate the hierarchical organization of interacting systems that provide specific functions within multicellular organisms (cell to organ).	HS-LS1-6 Construct and revise an explanation based on evidence for how carbon, hydrogen, and oxygen from sugar molecules may combine with other elements to form amino acids and/or other large carbon-based molecules. HS-LS1-7 Use a model to illustrate that cellular respiration is a chemical process whereby the bonds of food molecules and oxygen molecules are broken and the bonds in new compounds are formed, resulting in a net transfer of energy.	HS-LS3-1 Ask questions to clarify relationships about the role of DNA and chromosomes in coding the instructions for characteristic traits passed from parents to offspring. HS-LS1-1.Construct an explanation based on evidence for how the structure of DNA determines the structure of proteins, which carry out the essential functions of life through systems of specialized cells. HS-LS1-4. Use a model to illustrate the role of cellular division (mitosis) and differentiation in producing and maintaining complex organisms. HS-LS3-2 Make and defend a claim based on evidence that inheritable genetic variations may result from: (1) new genetic combinations through meiosis, (2) viable errors occurring during replication, and/or (3) mutations caused by environmental factors. HS-LS4-4 Construct an explanation based on evidence for how natural selection leads to adaptation of populations.	