

Environmental Science Pacing Guide Semester 1

Week	Standards	Essential Skills/Objectives	Teaching Activities and Labs	Assessment
1.	HS-ETS1-1 HS-ETS1-3 HS-ESS 3-1 HS-ESS 3-4	How are common resources managed? Fisheries methods and mgt	Tragedy of the Commons Fishing Activity Commercial Fishing Methods jigsaw Sustainable Seafood Research	Tragedy of the Commons Quiz
2.	HS-LS2-7 HS-LS2-6 HS-ESS2-4	Ecosystems, Trophic Levels, biogeochemical cycles: <i>How can you design and build a self-sustaining ecosystem?</i>	Biosphere Building Planning C, N, P cycles reading and diagrams Food Webs-terrestrial and aquatic requirements	Biosphere Plan
3.	HS-ESS2-4 HS-LS2-7 HS-ETS1-2	Water Cycle Water Chemistry and Pollution	Biosphere Modifications-ED Dissolved Oxygen questions Practice field trip testing stations Local Watershed notes	Biosphere Check (weekly)
4.	HS-ESS 3-2 HS-ESS 2-5	Erosion impacts Eutrophication Limnology and Lake Tahoe	Water Testing Field Trip Data compilation Biological Oxygen Demand questions	Field Trip Data Packet Biosphere Check
5.	HS-ESS 3-2 HS-ESS 3-1	Our Local Watershed pollution impacts, testing, and solutions	Local water pollution sources and solutions discussion and notes Write Water Quality Report-peer and teacher review Complete Truckee River Watershed Map	Truckee River Watershed Map Watershed Quality Report Biosphere Check
6.	HS-ESS3-4 HS-ESS3-3 HS-ETS1-3	Minimize human impact on natural system Non-renewable resource pollution ED-cost to clean up oil spills	Worst Oil Spill Fact Card-share out Oil Spill Cleanup Lab	Oil Spill Lab Biosphere Check
7.	HS-ESS3-1 HS-LS4-D	Biodiversity Endangered Species	Last Tepui Video Guide Biodiversity hot spot activity	Endangered Species article

	HS-ESS3-2		Endangered Species Article	Biosphere Check
8.	HS-ESS2-7	Biomes distribution Climatographs Human impacts on biomes over time	Biomes Map coloring Biointeractive Biomes Viewer	Biointeractive Packet Biosphere Check
9.	HS-ESS2-7 HS-ESS3-1 HS-ESS3-2	Aquatic and Terrestrial Biomes Adaptations of organisms to environments	Biomes Factsheet Symbiotic relationships video	Biomes Presentations Biomes summary Biosphere Check

Semester 2:

Week	Standards	Essential Skills/Objectives	Teaching Activities and Labs	Assessment
10	HS-ESS3-2 HS-LSS2-7	Human Populations Survivorship	Cemetery Field Trip World-o-meters activity Class Discussion on Longevity influences	Lab Data Analysis and compilation Biosphere Check
11	HS-ESS3-2 HS-LSS2-7	Survivorship Curves R and K Selected Species Population Pyramids	Bubble Lab Survivorship Power of the Pyramids	Biosphere Check Survivorship Quiz
12	HS-ESS3-5 HS-ESS2-4 HS-ESS3-5 HS-ESS3-6	Air Pollution Climate Change and Human Health	Climate Change and Human Health	Biosphere Check
13	HS-ETS1-2 HS-ETS1-3 HS-ESS3-6	Acid Rain causes and solutions Bioaccumulation and Biomagnification	Acid Rain Lab Unit Chemical Card Jigsaw	Acid Rain Lab Booklet Biosphere Check

14	HS-ESS3-1 HS-ESS3-2 HS-ESS3-3	Non-renewable Resources Mining in Nevada and the US Mining reclamation and cost-benefits	Cookie Mining Activity Minerals in our lives Minerals through Geography_NV mining	Mining Impacts Essay Biosphere Check
15	HS-ESS3-2 HS-ESS3-6 HS-ESS3-5	Renewable Resources	Renewable Resources jigsaw Pros and Cons of renewables	FINAL Biosphere Check Resources Quiz
16	HS-ETS1-1 HS-ETS1-2 HS-ETS1-3 HS-ETS1-4	Environmental Policies and Laws	Evaluate Environmental Laws Case Studies Compile Biosphere Project Observations	Biosphere Project Presentations
17	HS-LS 2-7 HS-ESS3-4 HS-ETS1-3	Sustainability	Story of Stuff PBS Nature Lab Sustainable Cities Urban Heat Island Arcade Lab Sustainable Cities	Story Map Anthropocene ?'s
18	HS-ESS3-4 HS-LSS 4-6 HS-ETS1-4 HS-ETS1-3	Sustainability	Design a Green Neighborhood Project Evaluate Projects for "greenest" design	Project Presentations