

Education for Sustainability Understanding by Design (UbD) Unit Template v2.0

Example

UNIT TITLE: Land and Community (Geological forces->Soils->Food justice)

STAGE 1: Desired Results

<p>Established Goals</p> <ol style="list-style-type: none"> 3.9 Sustainability 4.6 Understanding Place 5.13 Responding to Text 1.3 Reading comprehension 1.5 Writing dimensions 6.7 Geographical knowledge 7.15b, e Theories, Systems & Forces b- patterns & forces that shape earth, natural resource management <p>Big Ideas of Sustainability</p> <ol style="list-style-type: none"> Change over time Systems Equity 	<p>TRANSFER</p> <p><i>Students will be able to independently use their learning to...</i></p> <ul style="list-style-type: none"> identify and draw conclusions about evidence of landscape change understand connections between land and people make informed choices about food critically think about cause and effect, combined with prior knowledge = the ability to hypothesize 	<p>Lens of Sustainability</p> <p>Choose the most relevant</p> <ol style="list-style-type: none"> <i>Collaboration will happen through... Language Arts, Science and Social Studies classes will work together on this project. Service-learning projects with the/in the community</i> <i>Students will make a difference by... Developing a service-learning project, for example working with school food service to improve quality (local, fresh, nutrition) or helping restore bike paths damaged in flooding</i> <i>Students will address real-world issues through... Examining landscape change in our community, assessing food availability in their neighborhood</i> <i>Students will use campus and community-based learning sites when they... interview cafeteria staff visit community gardens and interview local farmer experts Local (area) food stores visit Farmers' Market</i>
	<p>MEANING</p> <p>Enduring Understandings</p> <p><i>Students will understand that...</i></p> <ul style="list-style-type: none"> Our earth is a system changing over time as a result of human and natural forces Soil is a natural resource that needs to be conserved (cared for and protected) because without soil there would be no life on earth Food systems rely on a healthy environment Where we live impacts how we live Healthy communities require access to healthy food choices 	<p>Essential Questions</p> <p><i>Students will keep considering...</i></p> <ul style="list-style-type: none"> What forces cause the shape of the land to change over time? How do we shape the land and how does the land shape us? (over time and today, flood damage, bridge closed, new route, etc.)
	<p>ACQUISITION</p> <p><i>Students will know...</i></p> <ul style="list-style-type: none"> Soil is a mix of different kinds of rock, water, air, plant remains, and tiny living organisms Rock types, geological and human forces that shape land Some food systems are more sustainable than other food systems 	<p><i>Students will be skilled at...</i></p> <ul style="list-style-type: none"> using inquiry process data collection and analysis writing constructed response paragraphs comprehending non-fiction text

Adapted from the *Understanding by Design Guide to Creating High-Quality Units* by Grant Wiggins and Jay McTighe, 2011

STAGE 2: Evidence

Example

CODE (link to Goals, Big Ideas & Lenses)	EVALUATIVE CRITERIA	ASSESSMENTS
<p>Collaboration, Making a Difference, Real World Issues, Standards 1.5, 3.9, 4.6, 6.7</p>	<ul style="list-style-type: none"> Habits of Mind (teacher & self assessment – see rubric) Final products (rubrics) Presentations (rubrics) 	<p>Performance Task(s)</p> <p>Students will show that they really understand by evidence of...</p> <ul style="list-style-type: none"> Learning Wall: participation & contributions Soil Analysis & Report (7.15b,e, 1.5) Geological Feature Map (7.15) Healthy Neighborhoods/Healthy Kids mapping, report card, findings & recommendations (6.7) Service-learning Project & Presentation (either food or landscape focused, derived from HN/HK) (Equity, Systems, Lens of Sustainability, 3.9, 4.6)
<p>Standards 1.3, 1.5, 5.13</p>	<p>Standards-based Writing Rubric</p> <p>District Test Scoring Guides</p>	<p>Other Evidence</p> <p>Students will show they have achieved Stage 1 goals by...</p> <ul style="list-style-type: none"> Response to Text (fiction & non-fiction) Formative and summative constructed response – answering essential questions District Science Kit Tests (Soils, Geology) (7.15 b, e, Change Over Time)

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STAGE 3: Learning Plan

Pre-Assessment

of driving knowledge, skill, understandings and attitudes using surveys and simulations

Constructed response to Essential Question:

How do we shape that land and how does the land shape us?

District Science Kits pre-assessments

Progress Monitoring

Learning Events

Student success at transfer, meaning, and acquisition depends on...

Contributions to learning wall (as exit tickets, check for understanding, quick response to essential questions)

Science:

Inquiry Notebook lessons

Soils:

- School District Science Kit: Super Soils (selected lessons)
- Trip to community garden to explore soil

Geology:

- School District Science Kit: Rocks & Landforms (selected lessons)
- Community Farming Center field trip to learn geologic history (Farming Center Historian guides tour)

Language Arts:

- Reader's Workshop with Non-fiction texts on geologic processes, soils, local events (flooding, etc).
- Omnivore's Dilemma Young Reader's Edition selections, poetry on these themes
- Inquiry Notebook lessons

Social Studies:

Healthy Neighborhoods/Healthy Kids lessons from Guide Service-learning project

Food Justice:

- interviews with cafeteria staff
- Trip to Farmers' Market
- Survey of food available in neighborhood

CODE

(link to Goals, Big Ideas & Lenses)

3.9, 4.6, 1.5, 7.15,
Change over time,
systems

3.9, 4.6
1.3
1.5
Systems
Equity

3.9, 4.6, 6.7
Service-learning,

