

Oregon Agriculture in the Classroom



Food, Agricultural Landscapes and the Development Conundrum



Mission

To help students grow in their knowledge of agriculture, the environment and natural resources for the benefit of Oregonians today and in the future.

Overview

- Agriculture is used as a context to teach core subject standards
- Cross-curricular hands on materials and lessons geared towards core standards for all educators
- K-12, public, private, homeschool, afterschool, extracurricular, in all 36 counties of Oregon
- Supported by agricultural community



Curriculum Exploration

- Earth as an Apple
- Geography and Climate of Agriculture Landscapes
- Where Should Development Go?

How much of the Earth's surface is ideal for GROWING CROPS?

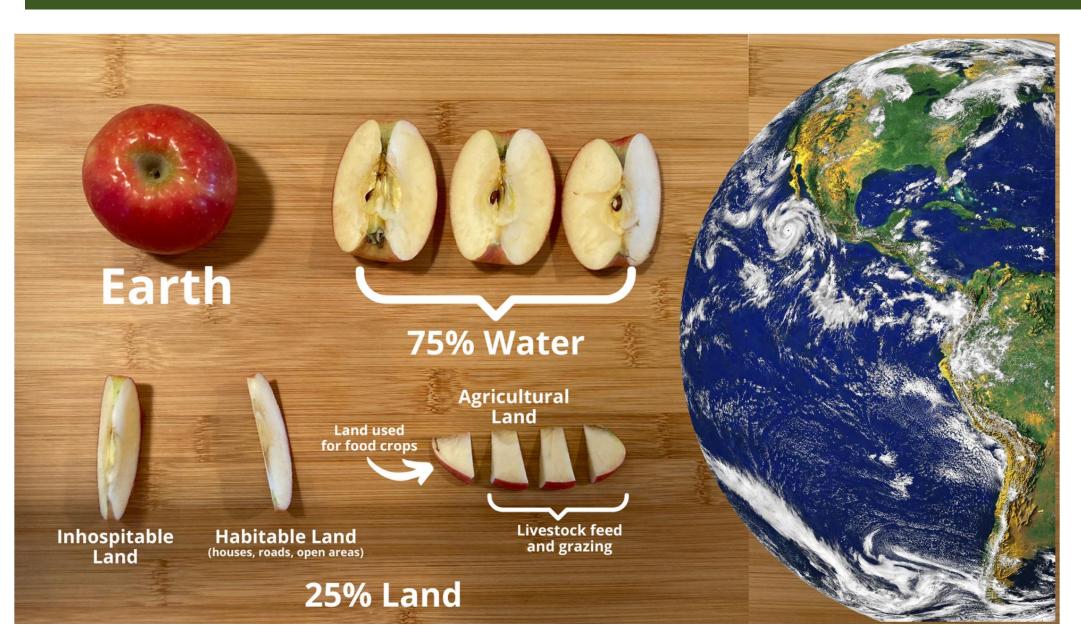




Earth as an Apple

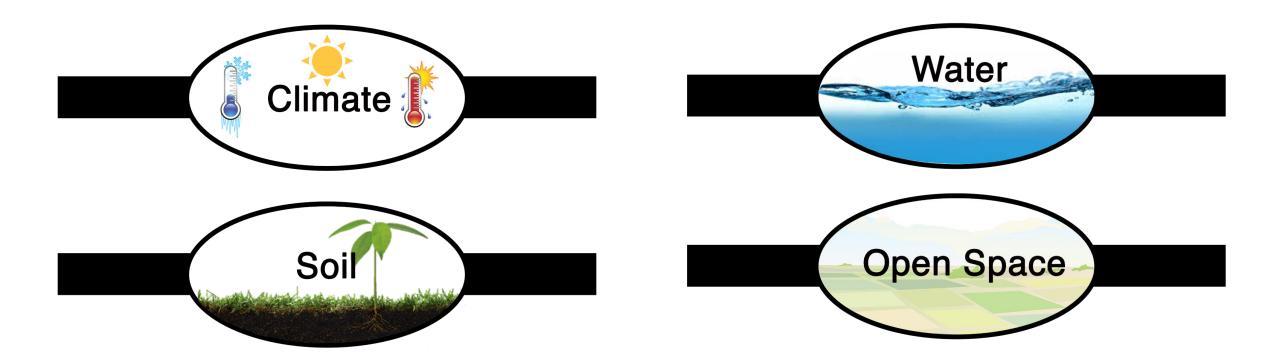






What factors influence production of crops?





The Conundrum

Production of food will have to increase by 70% to feed an additional 2.3 billion people by 2050.



Where should development go?



Growing population \rightarrow more need for development

More development \rightarrow less land for agriculture uses

Where will the growing population live, work and do business?



Types of Development



SHOPS



INDUSTRY



PUBLIC USES



HOUSING





Considerations

Where do we **NOT** want to develop?



FLOODPLAIN





STEEP SLOPES



FOREST LAND

FARM LAND

WILDLIFE HABITAT





The Challenge

Plan for development while still protecting important farm land, forest land and wildlife habitat.







- **Clue #1:** They try to find land that is close to the edge of the city and near roads.
- Clue #2: They try to find land that isn't very good for growing farm crops, livestock or timber.
- Clue #3: They try to find land that isn't very important for fish and wildlife.
- Clue #4: They try to find land that isn't hazardous to develop.
- Clue #5: They avoid state and federal parks and forest lands, local parks, Indian reservations, scenic areas and forest lands.

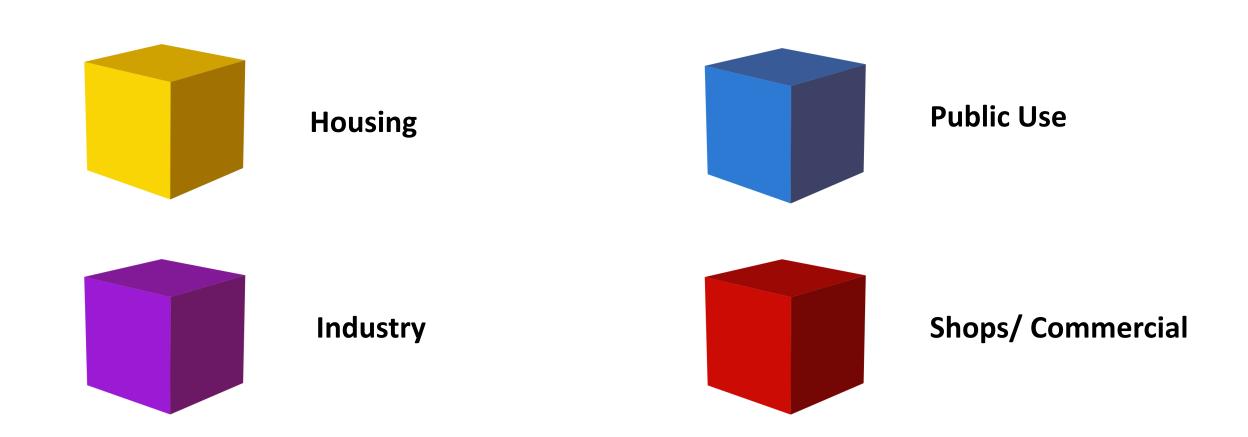


City of Pendleton In 2018 population 16,677 By 2040 another **1,977** people are estimated to be living in the city.

Planning calculations!



Give it a try! Planning Codes





Fruit & Vegetable Research

Climate:

Orange trees need temperatures between 55 and 100 degrees and winter temperatures above freezing. It's too cold to grow oranges in Illinois..

Water:

Chicago gets an average of 38 inches of rain per year which would be adequate for an orange orchard.

Chicago, Illinois

Orange

Where is it grown?

California



Soil:

Orange trees don't do well with heavy clay soils. They need well-drained soil.

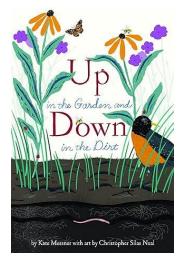
Open Space:

Open space right in Chicago would be difficult or impossible to find.



Oregon AITC Resources

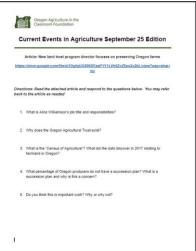
Literacy Project



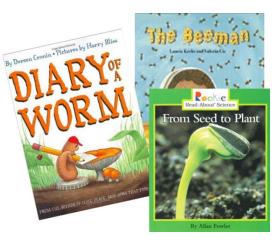
Curriculum



Current Events



Lending Library



Agricultural Advocacy Award



Kits



Thank You!

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