Nez Perce Tribe
Water Resources Division
Planning for the Unique Impacts of Climate Change on the Tribe, and a Summary of 2021 Drought Impacts
OR-WA Water Year 2021 Recap and 2022 Outlook
November 16, 2021
Stefanie Krantz, Climate Change Coordinator
LESS SNOW, LESS FLOW, HOTTER, DRIER SOILS, MORE FIRE, MORE VARIABILITY, BIODIVERSITY IMPACTS
Many species of traditional plants were impacted by the drought

Idaho Fish and Game confirm hemorrhagic disease in multiple dead deer in Kamiah area
EXAMPLE OF ONGOING RESTORATION WORK AT TRIBE

**Threats**
- Reduced habitat, survival of fish
- Altered hydrology (spring storage & summer quantity)
- Increased temperature
- Reduced camas (footprint)

**Actions**
- Install BDA’s
- Planting of riparian areas
- Improve roads surrounding meadow
WHAT ARE THE TOP WAYS TO REDUCE OUR IMPACT TO THE CLIMATE?

1. Refrigerant Management
2. Wind Turbines (Onshore)
3. Reduced Food Waste
4. Plant-Rich Diet
5. Tropical Forests (stop cutting them down)
6. Educating Girls
7. Family Planning
8. Solar Farms
9. Silvopasture
10. Rooftop Solar
11. Regenerative Agriculture
12. Temperate Forests
13. Peatlands
14. Tropical Staple Trees
15. Afforestation
16. Conservation Agriculture
17. Tree Intercropping
18. Geothermal
19. Managed Grazing
20. Nuclear

http://www.drawdown.org/
“A mere 2 percent increase in the carbon content of the planet’s soils could offset 100 percent of all greenhouse gas emissions going into the atmosphere.”

— DR. RAATAN LAL, OHIO STATE SOIL SCIENTIST
Climate Smart Agriculture Project

Working with local farmers, extension agents, and Tribal staff to reduce barriers to adopting regenerative/conservation ag practices

- Soil quality
- Ecosystem biodiversity
- Farm productivity
- Minimize/eliminate non-natural inputs
- Economic resilience
Degenerative*  

In general this practice leads to degeneration of soil health.

Regenerative*  

In concert with other regenerative practices can help rebuild healthy soil.
Bare Soil Cover Crops

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Cover Crops

*In concert with other regenerative practices can help rebuild healthy soil.

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Water Resources Division at Tribe has already had great success reducing barriers to help farmers shift to No Till.
NOAA NWS Drought Statement
• Drought Information Statement
• National Weather Service Spokane WA
• 1120 PM PDT Thu Jul 22 2021

Washington Governor Jay Inslee has declared a statewide drought emergency.

SUMMARY OF IMPACTS:
  Agricultural impacts...
  In Nez Perce county, wheat is about 25-50% of normal. There is talk of not harvesting bluegrass. Spring crops are not doing well with below normal yields. There is no pasture for feed.

  In Lewis County, hay is 1/3 of normal. Some are trying to find pastures for livestock. There have been some animal deaths (sheep) due to the heat. Some farmers are taking their wheat as a complete loss and are having animals come graze the land instead of the harvest. People are estimating 20 bushels of wheat (60 is considered bad).
Hasselstrom got 23 bushels of garbanzos vs. 13 for his neighbor per acre this year, and his wheat grain protein was below 10.5 percent.
Qe'ci'yew'yew’
Thank you!

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