SIP Submittal Fun!

CAA Section 110 (l) discussion: criteria pollutants and NAAQS considerations - in detail: how the SMP impacts these or not; is it a relaxation or more stringent?

Includes data, charts, citations to support the document and arguments

Addressing older rules is always a challenge
Other topics: Regional haze, visibility, the use of polyethylene on piles, fuel treatments / non-burning considerations, and so forth

Draft to EPA very shortly…. Then back and forth over the next 6 months!

OREGON SMOKE MANAGEMENT

Rule Updates

EXECUTIVE UPDATES

- SUMMARY OF CHANGES, Oregon Smoke Management Program Rules (OAR 629-048)
  - Implementation began March 1, 2019
  - “Smoke Intrusion” definitions changed from any Rx smoke at ground level in SSRA to:
    - PM 2.5 averages at or above 26 micrograms/cu meter over 24-hour period from midnight to midnight.
    - PM 2.5 averages at or above 70 micrograms/cu meter over any 1-hour period.

EXECUTIVE UPDATES

- SUMMARY OF CHANGES, Oregon Smoke Management Program Rules (OAR 629-048)
  - Intensity measure of intrusions eliminated.
    - no light, moderate, or heavy intensity intrusions
  - New thresholds remain within National Ambient Air Quality Standards (NAAQS).
    - 35 micrograms/cu meter averaged over 24-hour period from midnight to midnight.

EXECUTIVE UPDATES

- SUMMARY OF CHANGES, Oregon Smoke Management Program Rules (OAR 629-048)
  - Total particulate amount from all sources.
    - Previously based on prior 3-hour average above background level.
    - Areas with pre-existing high levels of particulate may see more smoke restrictions.
  - Ground level smoke into any sensitive area not meeting smoke intrusion criteria will be defined as a “smoke incident”.

EXECUTIVE UPDATES

- SUMMARY OF CHANGES, Oregon Smoke Management Program Rules (OAR 629-048)
  - Smoke Management Plan replaces “prevent smoke from entering into SSRA’s” with “minimize smoke emissions.”
  - Reporting requirements will vary depending on:
    - Smoke Incident
    - Smoke Intrusion
    - Smoke Intrusion that exceeds National Ambient Air Quality Standards.

EXECUTIVE UPDATES

- SUMMARY OF CHANGES, Oregon Smoke Management Program Rules (OAR 629-048)
  - Statewide communication plan to be developed by ODF.
  - Community Response Plans will be encouraged for smoke vulnerable SSRAs.
  - New rule added “vulnerable population” definition.
  - Exemption from hourly intrusion threshold can be requested by communities with Community Response Plans.

EXECUTIVE UPDATES

- SUMMARY OF CHANGES, Oregon Smoke Management Program Rules (OAR 629-048)
  - Use of polyethylene coverings as a emissions reduction technique (ERT) encouraged.
    - No restrictions on size, thickness, or coverage.
  - Additional example of alternatives to burning
  - Updated web links
  - Other minor edits

NEW SMOKE MANAGEMENT PLAN

INITIAL IMPLEMENTATION (March 1)

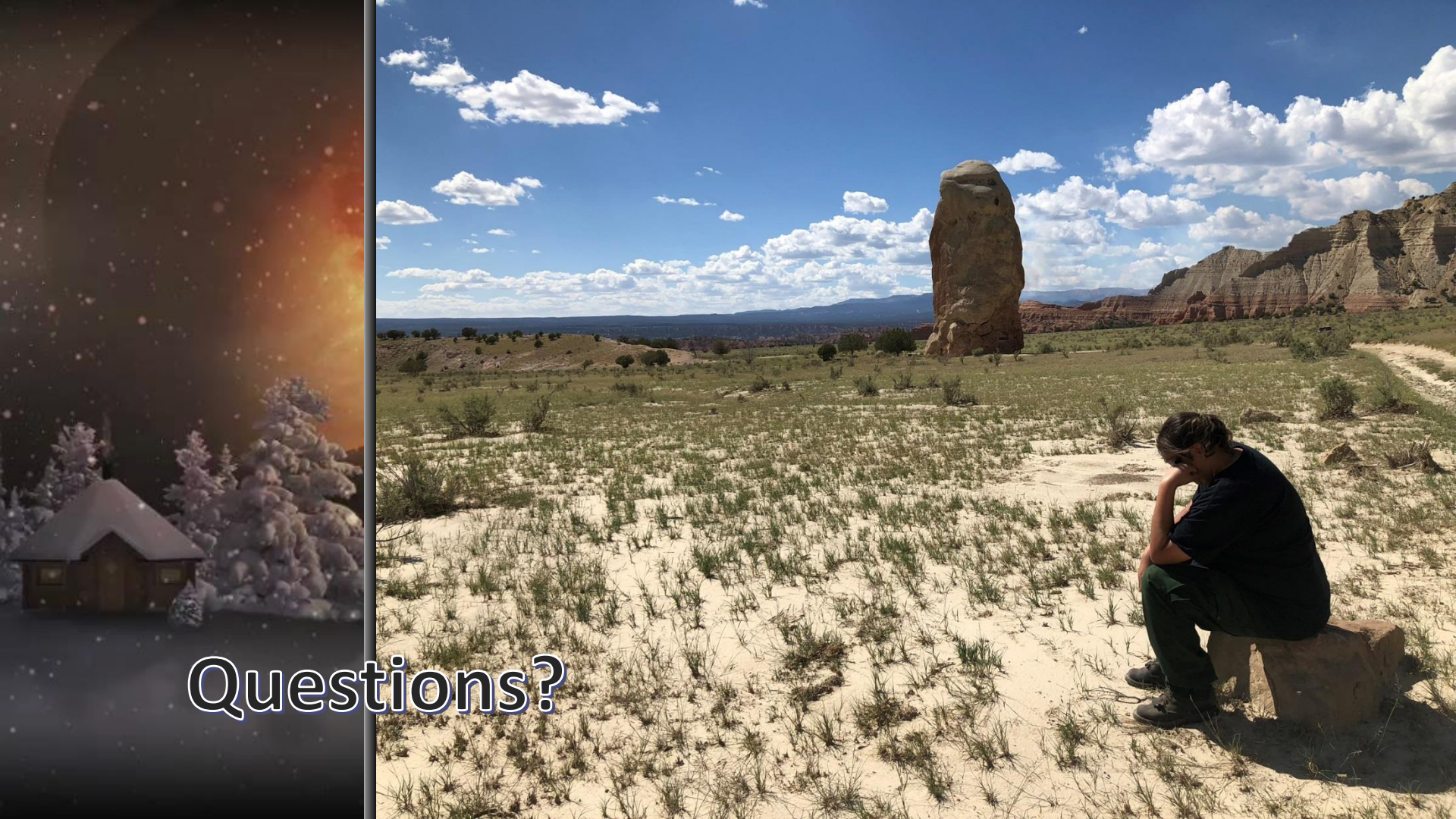
- No polyethylene size or thickness requirements
- Smoke Incidents will be recorded on internal log with no further action necessary.
- Smoke Intrusions will be investigated and reported as before.
- NAAQS exceedances will be reported to DEQ to determine adaptive management actions.
- CAUTIOUS implementation of new intrusion definition.

NEW SMOKE MANAGEMENT PLAN

FUTURE IMPLEMENTATION

- Prescribed burn instructions will be updated to consider polyethylene use and change in intrusion definition.

- Communication Plan / Community Response Plan / Exemption Requests


Questions?

NEW SMOKE MANAGEMENT PLAN

POTENTIAL CHALLENGES

- Poor air quality may lead to increased burn restrictions.
- NAAQS exceedances will have management actions to prevent future occurrences.
- Smoke incidents that reach intrusion levels could lead to additional SSRAs.

POTENTIAL BENEFITS

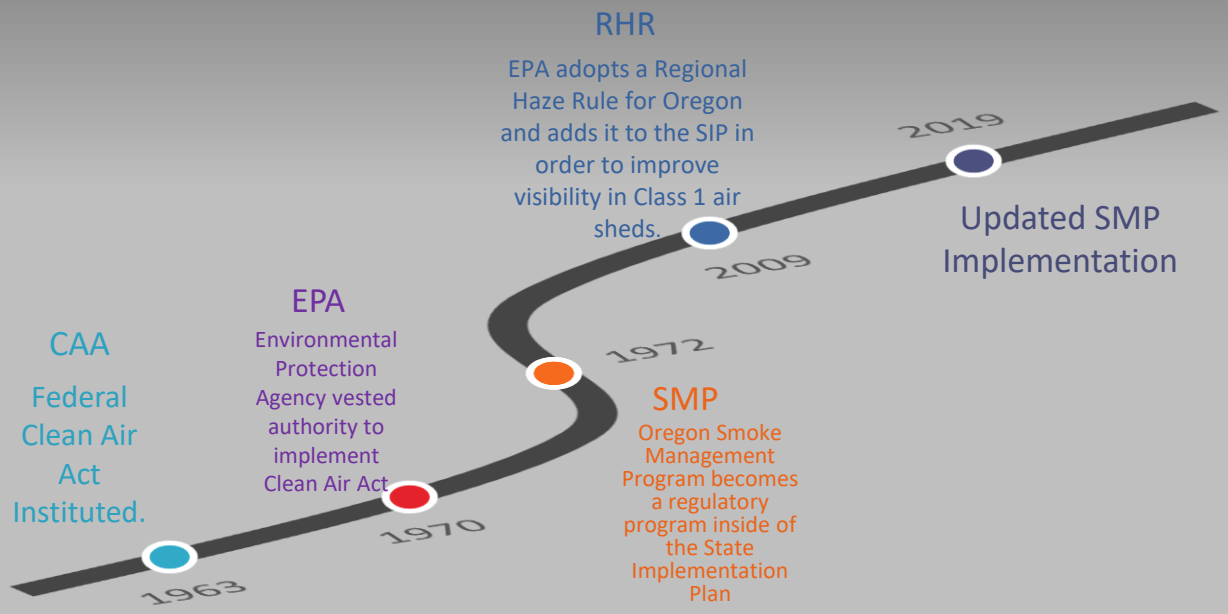
- Covered piles will allow for more burning near SSRAs.
- Increased burn opportunities based on less restrictive intrusion definition.
- Communication Plan and Response Plan should provide improved social license to burn.

EXECUTIVE UPDATES

- SUMMARY OF CHANGES, Oregon Smoke Management Program Rules (OAR 629-048)
  - Moved Special Protection Zone (SPZ) requirements from directive to rule. Updated SPZ maps for Oakridge, Klamath Falls, and Lakeview based on topography.
    - New rule added contingency plan requirements for SPZ's that have or currently exceed the NAAQS.

Overview of Federal & State Regulations

Timeline



NEW SMOKE FORECASTING

MAXIMIZING BURN OPPORTUNITIES

- Localized burn strategies for units near SSRAs.
- Increase burning on better air quality days.
- Continue close coordination with Smoke Management Staff.
- Coordinate experimental burning with Smoke Management.
  - Creating prescriptions that target priority fuels.
  - Use emission reduction techniques that burn in stages.
  - Research more efficient ways to burn.
  - Opportunities to calibrate models on emissions/fuel loading and downwind impact.
- Send audits to the Smoke Management Field Coordinator to assist in finding trends & possible burning opportunities.

All Air Quality Monitors Are Not Equal

- Federal Reference Monitors
  - Most accurate
  - Used to determine attainment with NAAQS
- DEQ Smoke monitors
  - Less accurate than FRMs
  - Better than most inexpensive monitors
  - Can’t be used to determine non-attainment
  - Used widely around the state
  - Good for comparing with the AQI
- Personal Air Monitors (e.g., Purple Air Monitors)
  - Not very accurate, but not expensive
  - Good to determine relative amount of smoke