Urgent Call for Abstracts: Special Session on Wildfire Environmental Remediation & Resiliency

Conference: AEHS Foundation's West Coast Conference, March 17-20, 2025

Working Session Title: Developing Guidelines for Environmental Practices & Resiliency in Response to Wildfires

The AEHS Foundation invites submissions for a special session dedicated to advancing environmental remediation and resiliency strategies in the face of increasing wildfire risks. **If you are already presenting at our conference, you are still welcome to submit for this special session.** This session aims to foster scientific discussion and develop guidelines to enhance preparedness, mitigation, and long-term recovery efforts. We seek contributions that explore innovative strategies and scientific insights across the following key topics:

1. Causes of Wildfires & Risk Reduction Strategies

- Climate change impacts: Rising temperatures, droughts, and their influence on fire behavior.
- Human activities: Balancing vegetation management with soil conservation to mitigate wildfire risks while maintaining ecosystem resilience.

2. Post-Fire Public Health and Environmental Risks

- Assessment of smoke impacts on human health, especially vulnerable populations, considering PM2.5, carbon dioxide, methane, and black carbon particulates.
- Analysis of storm runoff from burned areas and its implications for surface and groundwater quality.

3. Post-Fire Restoration, Remediation & Recovery Measures

- Monitoring air and water quality in the aftermath of wildfires.
- Strategies for promoting ecosystem resilience and plant regeneration.
- Techniques for preventing soil erosion, nutrient loss, flooding, and landslides.
- Management of water quality challenges arising from debris, ash, and chemicals (e.g., asbestos, microplastics, heavy metals) in surface and groundwater.

4. Carbon Dynamics & Climate Adaptation

- Quantification of carbon release from vegetation, soil, and organic matter during wildfires.
- Role of regrowth, reforestation, and soil restoration in post-fire carbon sequestration and climate adaptation.

5. Fire, Watershed Health & Sustainable Water Management

- Impact assessment of wildfires on critical watersheds and drinking water supplies.
- Strategies to safeguard reservoirs, water infrastructure, and watershed areas from wildfire impacts.
- Long-term implications for water resource management and resilience in fire-prone regions.

Submit an abstract <u>here</u>.

Submission deadline: February 10, 2025