Purpose
In addition to the US edition of the conference (Raleigh, North Carolina), the Russian edition of the 4th Fire Behavior and Fuels Conference will provide government and non-government professionals and researchers a valuable opportunity to share information globally about wildland fire behavior and fuels, especially as it pertains to mathematical, engineering, physical, biological, economic and social sciences.

Every year the threat from wildland fires increases and becomes a national issue in many countries as it happened recently in Greece (2009), Russia (2010, 2012), the USA (2012) etc. The constant perfection of monitoring and fighting technologies did not modify this tendency. Wildland fire science and management is at a crossroads facing choices that can lead to vastly different outcomes: One will promote continuation of what has taken place over recent decades and incorporate incremental changes to improve existing models, program function and efficiency; another will embark on a more innovative path to expand models, programs that better respond to changing complexities in fire environments, societal focus, population growth, and science and technological capabilities. We need to accelerate our focused research as well as the integration of science into decision-making to assure that future fire management is based on the best available information and knowledge and is thus, more effective.

The 4th Fire Behavior and Fuels Conference offers a forum where past experience and lessons learned are documented, current work showcased, and emerging ideas/technology presented to provide a strong foundation that will facilitate setting a course for the future that addresses and responds to developing challenges locally, regionally and globally.

Both editions of the conference (Russian and US) will have a common proceedings and will be sharing the same web platform for the Virtual Conference.

Conference objectives
- To create a forum where presenters and participants can integrate across disciplines.
- To better understand the essence of wildland fires on the basis of experimental research and simulation and offer new techniques and devices to forecast and fight with them;
- To describe lessons learned and discuss development of innovative and contemporary fuels management programs that reduce risks to communities and improve/ maintain ecosystem health.
- To document fire environment trends as benchmarks for future challenges and program planning and implementation.
- To raise awareness of the diversity of approaches, issues and ideas nationally and globally in wildland fire management.
- To showcase and promote development of innovative management and research ideas.
- To foster new collaborations among managers, researchers, firefighters, residents, communities, businesses, educational institutions and others in different regions and countries.

Target Audience
- Researchers and Scientists
- Firefighters
- Fire and Land Managers
- Resource Professionals and Specialists
- Emergency Management Professionals
- Biomass Professionals
- Fire Management Consultants

- Agency Fire Administrators
- Public Officials
- Academic Professors and Instructors
- University and College Students
- Members of the General Public
- Members of the Media
- Anyone who has a vested interest in dealing with wildland fire in the future
Submission of Abstracts

Submit your abstract in English at the IAWF 4th Fire Behavior and Fuels Conference website: http://www.iawfonline.org/2013FuelsConference/

We encourage submissions for oral presentations, poster presentations and special sessions. The deadline for submitting an abstract is March 1, 2013. All abstracts will be reviewed and notification of acceptance made by April 15, 2013.

Contributed oral, poster and special session papers may cover, but are not limited to, the following topics:

- Remote sensing
- Physical, chemical and mechanical properties of aerosols and smoke
- Fuel burning dynamics
- Risk analysis techniques
- Strategy, tactics and methods of fire fighting
- WUI fires
- Fire protection
- Firebrands, embers and smoldering combustion
- Transitions in fire spread
- Modeling and simulation of fire behavior
- Wildfire chemistry
- Coupled atmosphere-wildland fire modelling
- Fire safety
- Fire behavior research including emerging instrumentation/technology
- Wildland fire and fire behavior case studies
- Significant fire behavior events and lessons learned
- Correlations between fire behavior and fire effects
- Fuel treatment types and efficacy
- Fire behavior in treated fuels
- Biomass utilization as a fuel treatment
- Fuel treatment research including emerging instrumentation/technology
- Research needs
- Decision support systems and tools
- Risk assessment processes and tools
- Risk management
- Fire history & regimes
- Fire environment changes
- Fire along the WUI and FIREWISE: Examples of successful and unsuccessful use

- Fuel dynamics & measurement
- Fire weather/meteorology
- Operational perspectives & applications of fire behavior knowledge
- Post fire plant succession pathways
- Fuel modeling, mapping & simulations
- Scientific investment & approaches to understanding fire behavior
- Fire emissions and air quality
- Smoke management
- Disaster assessment of wildland fires
- Ways of improving the decision-making process for prescribed fire and wildfire management
- Fire and carbon sequestration
- Fire and invasives
- Fire in mountainous terrain
- Fire consortia including National Coalition of fire councils
- Fire in the tropics and sub-tropics
- Fire in hardwoods
- Education/training for tomorrow’s fire managers
- Continuing education for burners
- Educating and engaging the public including use in schools, demonstration areas, signage, State-wide Rx fire day, news media
- Fire, the ecological imperative: examples of problems solved
- Liability issues including right to burn ordinances and insurance
- Spot fire / ember transport
- Dealing with and planning for catastrophe - Wildfire blowups, major escapes, unintended outcomes
- Uncommon fuel / vegetation types
- Fire as a Landscape Tool
- Fire and Wildlife
- Ignition Agents