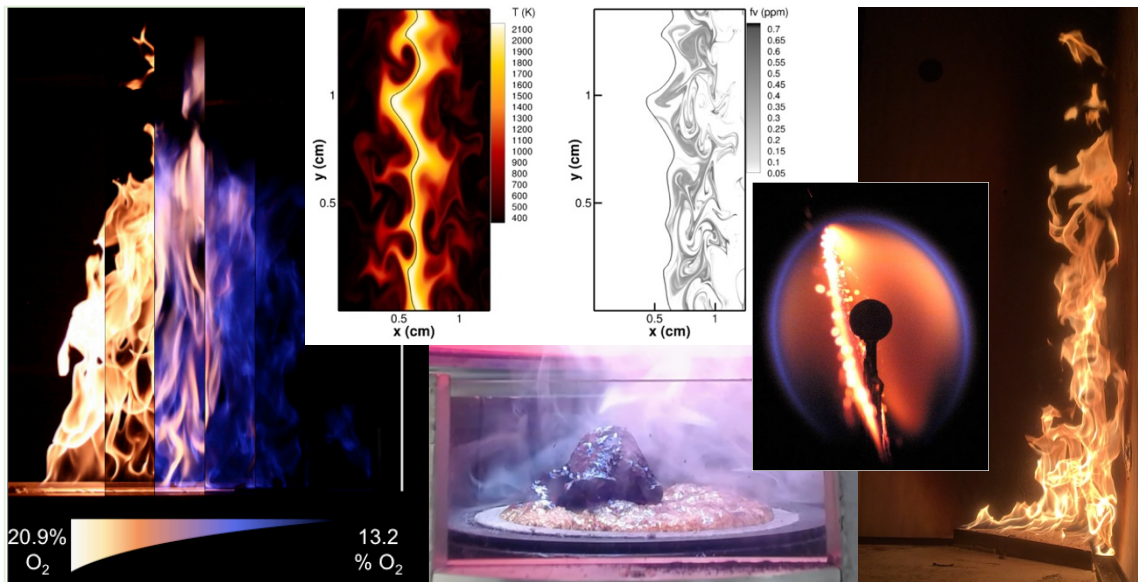


Combustion Institute Summer School on Fire Safety Science

University of Maryland, College Park, USA – June 8-12 2020

The **Combustion Institute Summer School on Fire Safety Science** will bring together graduate students, post-doctoral fellows and early-career researchers and engineers engaged in fire science as well as distinguished instructors from leading higher-education institutions and research programs in fire safety around the world. The summer school will take place on June 8-12 2020 on the campus of the University of Maryland in College Park. The objectives of the summer school are to expose participants to a broad range of advanced topics with a mix between fundamental courses that emphasize the theoretical foundations of the engineering problem and application courses that describe the engineering configurations and emphasize current challenges in the engineering practice. The objectives are also to build a strong international network of graduate students, post-doctoral fellows, early-career researchers, instructors and leading researchers.

	AM (8:30 am-12:00 pm)	PM (1:30-5:00 pm)	End-of-the-day Events
Sunday			<i>Welcome Reception</i>
Monday	<ul style="list-style-type: none"> - Introduction to Fire Safety Engineering (E. Weckman) - Combustion in Fires (B. Merci) 	<ul style="list-style-type: none"> - Ignition and Flame Spread (S. McAllister) - Pyrolysis (S. Stoliarov) 	
Tuesday	<ul style="list-style-type: none"> - Radiative Heat Transfer (X. Zhao) - Soot (P. Sunderland) 	<ul style="list-style-type: none"> - Flammability Tests (Y. Wang) - Façade Fires (M. McLaggan) 	
Wednesday	<ul style="list-style-type: none"> - Wildland Fires (N. Liu) - Smoldering Fires (G. Rein) 	<ul style="list-style-type: none"> - Wildland-Urban Interface Fires (M. Gollner) - Performance-Based Design (P. van Hees) 	- Poster Session
Thursday	<ul style="list-style-type: none"> - Computational Fire Modeling (A. Trouvé) 	<ul style="list-style-type: none"> - Workshop on Fire Modeling (S. Stoliarov, A. Trouvé) 	
	<ul style="list-style-type: none"> - Workshop on Fire Modeling (S. Stoliarov, A. Trouvé) 	<ul style="list-style-type: none"> - Laboratory Visit 	
Friday	<ul style="list-style-type: none"> - Fire Suppression and Industrial Fire Protection (Y. Xin) - Structural Fire Engineering (L. Bisby) 	<ul style="list-style-type: none"> - Panel Discussion on Current Challenges in Fire Safety Engineering (S. Dorofeev, A. Simeoni, P. van Hees) 	<i>Farewell Reception</i>



The list of courses is organized into two main categories: (1) Fundamental courses that emphasize the theoretical foundations of the engineering problem (combustion science, material science, structural mechanics); and (2) Application courses that describe the engineering configurations and emphasize current challenges in the engineering practice (wildland fires, façade fires, performance-based design, suppression systems).

- **Introduction:** Introduction to Fire Safety Engineering (E. Weckman, University of Waterloo)
- **Fundamentals:** Combustion in Fires (B. Merci, Ghent University)
- **Fundamentals:** Ignition and Flame Spread (S. McAllister, US Forest Service)
- **Fundamentals:** Pyrolysis (S. Stoliarov, University of Maryland)
- **Fundamentals:** Radiative Heat Transfer (X. Zhao, University of Connecticut)
- **Fundamentals:** Soot (P. Sunderland, University of Maryland)
- **Applications:** Flammability Tests (Y. Wang, FM Global)
- **Applications:** Façade Fires (M. McLaggan, University of Queensland)
- **Applications:** Wildland Fires (N. Liu, University of Science and Technology)
- **Fundamentals:** Smoldering Fires (G. Rein, Imperial College)
- **Applications:** Wildland-Urban Interface Fires (M. Gollner, University of California at Berkeley)
- **Applications:** Performance-Based Design (P. van Hees, Lund University)
- **Fundamentals:** Computational Fire Modeling (A. Trouvé, University of Maryland)
- **Workshop on Fire Modeling:** ThermaKin (S. Stoliarov, University of Maryland); FDS (A. Trouvé, University of Maryland)
- **Applications:** Fire Suppression and Industrial Fire Protection (Y. Xin, FM Global)
- **Fundamentals:** Structural Fire Engineering (L. Bisby, University of Edinburgh)

- **Panel Discussion:** Current Challenges in Fire Safety Engineering (S. Dorofeev, FM Global; A. Simeoni, Worcester Polytechnic Institute; P. van Hees, Lund University)

Registration

Thanks to the financial support by the Combustion Institute and by the Burgers Program at the University of Maryland, the **Combustion Institute Summer School on Fire Safety Science** is offered without any registration fee for students from academia and public organizations; students from private organizations are also welcome but depending on final budget numbers, a small fee – approximately \$500 – may be requested for their registration. The available budget will cover costs for lodging (shared double rooms), breaks and lunches, and handout material. Participating students are expected to cover the cost of travelling to the University of Maryland; depending on final budget numbers, partial support for travel of participating students from academia may also become available.

Application and important dates

Application material: the application package should be a single file (Microsoft® Word or PDF) that contains:

- A cover letter (up to 2 pages) explaining the applicant's interest in fire research and his/her motivation for the Combustion Institute Summer School on Fire Safety Science;
- A curriculum vitae (up to 2 pages);
- And for students enrolled in a graduate academic program, a letter of recommendation from the applicant's academic advisor (up to 2 pages).

Applicants should submit their application package to Professor Arnaud Trouvé: atrouve@umd.edu, with the subject line "Application to the Combustion Institute Summer School on Fire Safety Science".

Application deadline: **February 28, 2020**

Final decision: March 7, 2020

Note that for logistic reasons, student participation will be restricted to a maximum group size of 50 students.

Point of contact

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