

Applied Physics B

Lasers and Optics

Guest Editors: Klaus Peter Geigle Stefan Will

Topical Issue “*Laser-Induced Incandescence*”

Dear Colleague,

Laser-induced incandescence (LII) has developed to a versatile technique for particle measurements in combustion, atmospheric, aerosol and nanoparticle science. In its beginnings limited to the measurement of carbonaceous particles using short laser pulses, LII has proven to be also applicable to other materials or employing cw laser sources, opening new fields for researchers. The technique is also driven by other new experimental approaches, e.g. using advanced equipment such as high-speed laser and camera systems. Besides addressing experimental challenges, a major field of LII science is the interpretation of signals and the modelling of the complex heat- and mass-transfer mechanisms.

This topical issue is dedicated to covering the development of pulsed and cw laser-induced incandescence in all its aspects, including new experimental and data evaluation approaches and applications.

Topics of interest include, but are not limited to:

- Development of new experimental approaches
- Modelling and evaluation
- Determination of experimental key parameters for LII
- Applications to combustion processes, engineered nanoparticles, and aerosols
- Combination of LII with other (optical) techniques

We cordially invite you to contribute to this topical issue by submitting your manuscript containing new, high quality, and unpublished material until

January 31, 2019.

Only original research articles will be published. All manuscripts will be subject to a standard review procedure with respect to their degree of novelty, relevance, and quality of presentation. Immediate and speedy reviewing is supported by online submission at

<https://www.editorialmanager.com/aphb/>.

Manuscripts will be published within 2 weeks after acceptance.

Looking forward to receiving your contribution.

Sincerely,



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