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Victor F. Tarasenko
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Introduction

The XIV International Conference on Atomic and Molecular Pulsed Lasers (AMPL) traditionally has been devoted to subjects such as physical and chemical processes in laser active media, new active media and pumping methods including discharges for lasers and non-coherent radiation sources, new lasers development technologies, fundamental issues of laser physics, applications of lasers in science, technology, medicine, the development of laser-based devices, and new optical technologies. One of the principal goals of the conference has been contiguity of fundamental and applied sciences. Therefore, much attention was paid to the application of new light sources in science, engineering, medicine, etc. Moreover, one of the important issues of the AMPL is to provide an opportunity for young scientists to present their work and to get feedback from scientists and specialists in the photonics area.

In 2019, the AMPL was dedicated to the 50th anniversary of Institute of Atmospheric Optics and Academic Science in Tomsk. The scientific program of the conference included the following sessions:

- Gas and Plasma Lasers, Metal Vapor Lasers;
- Photonics of Optical Materials, Optoelectronics;
- Biophotonics;
- Femtosecond Laser Systems;
- Laser Systems and New Laser and Optical Technologies, Laser Applications;
- Non-coherent UV and VUV-Radiation Sources;
- Conversion of Laser Radiation, Optoelectronic Devices, Nonlinear Optics;
- Gas Discharges for Lasers and Non-coherent Radiation Sources;
- Carbon Materials in Quantum Electronics.

**Victor F. Tarasenko
Anton V. Klimkin
Maxim V. Trigub**

