

# Summer School On Lasers and Laser Applications

SSOLLA 2019

Organized by APRI, GIST

- Date: July 08(Monday) ~ July 12(Friday), 2019
- Place: APRI, GIST, Gwangju, South Korea
- Participants: Students and young scientists
- Number of participants: Around 30

APRI(Advanced Photonics Research Institute) is a government supported research institute established in 2001 to develop researches in the area of photonics and to promote international cooperation. We are planning to hold the 10th Summer School at GIST (Gwangju Institute of Science and Technology) in Gwangju, Korea. The summer school, SSOLLA 2019, offers educational programs on lasers and laser applications to help understand the basics and applications of laser technology. The main goal of the SSOLLA program is to provide an opportunity to interact with the APRI scientists and the participants who are interested in this field. Lectures and experiments will be conducted in English by the APRI research scientists and the GIST faculty members. New innovations in photonic research are being widely applied to various fields including biology, nano-material and communications. The curriculum covers laser safety, fundamental of applied optics, biophotonics, nanophotonics and optics experiments.

## ○ Program overview

### Lectures

- Laser Safety Training
- Laser and Laser Applications
- Fiber Laser, Principles and Applications
- Fundamentals of Photovoltaics and Solar Power Generations
- Material Analysis Using Laser Spectroscopic Techniques
- Introduction to Nonlinear Optics and Application
- Fundamentals and Applications of Nanophotonics
- Biology + Medicine + Light = Biophotonics
- Bio-interface Spectroscopy Using the Surface-specific Nonlinear Optical Techniques

### Experiments (Choose 2 Subjects)

- Laser Interferometer
- Gas Laser(He/Ne Laser)
- Solid State Laser(Nd:YAG Laser)
- Solid Dye Laser
- Optical Coherence Tomography

## ○ Application

- Submission Deadline: **April 30, 2019**
- **Required documents to apply**
  1. **Resume** (Fill out the attached file)
  2. **Letter of Recommendation** by your supervisor (1 page)
  3. **Academic Transcripts**
- All documents should be e-mailed to [SSOLLA@gist.ac.kr](mailto:SSOLLA@gist.ac.kr),  
the selected participants will be informed no later than **May 7, 2019**.

## ○ Financial support for participants

- Round-trip airfare in economy class and domestic transportation fees in Korea  
(After completing the program, the airfare and fees will be wired to your account)  
There are limits of airfares depending on where you depart from.
  - \*Asia - MAX USD800
  - \*Europe, Africa, North America - MAX USD1,200
- Meals and accommodations on GIST campus

## ○ Other information

- Address: Advanced Photonics Research Institute, GIST  
123 Cheomdan-gwagiro, Buk-gu, Gwangju 61005, Korea
- Tel: +82-62-715-3415, 3416
- Fax: +82-62-715-3419
- <http://apri.gist.ac.kr/en/>

- For more information, please contact **Irene**: +82-62-715-3416 (SSOLLA@gist.ac.kr)

**Please share the information with members of your organization and academic societies.**