

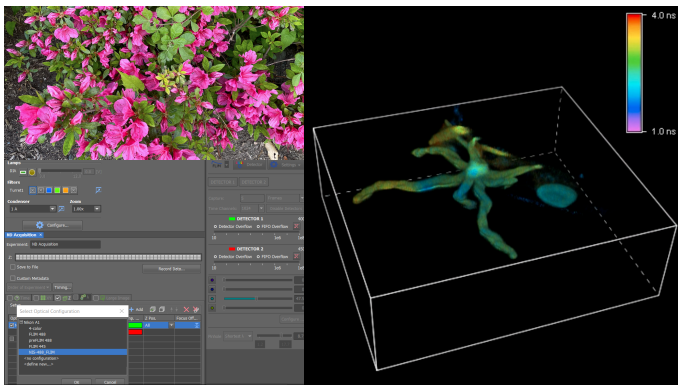


What do you call mouthwash for tiny scientists?

Microscope!

TECH HIGHLIGHT: FLIM NOW EASY ON NIS-ELEMENTS

With the addition of a new module inside of NIS-Elements on the A1SP, you can now make use of our awesome 4 laser, dual single-photon detector FLIM system right inside of NIS-Elements. Thus, doing time lapses, z-stacks, or other multiplexed FLIM experiments is as simple as running a green/red experiment now. This is available now and will be

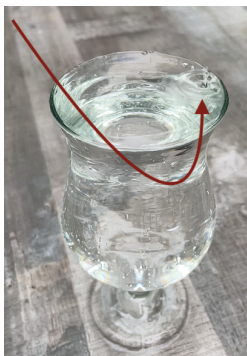


An azalea flower was plucked from outside LSL, then the anther imaged at the very tip using a pulsed 488 laser and 2 SPC detectors to measure intrinsic fluorescence in the sample. The 3D image is a z-stack reconstruction showing the fluorescence lifetime at different parts in the sample.

our first "Try-A-Microscope" day on June 16th from 10a-4p. No experience needed, but we will need you to sign up for a slot. In addition, we will live stream the session via [Twitch](#).

TECH TIP: AVOIDING SATURATED DATA

Much like the glass of water that I left out in the rain and managed to capture the last rain drop before overflow, digital detectors (PMTs on the scanning confocals, cameras on the other microscopes) can only hold so much signal; 0-4095 for 12-bit and 0-65535 for 16-bit. If the detector is full and you "pour" in more photons like this final rain drop from your sample, the detector will saturate (overflow) and you will not be able to quantify that data.



Welcome to new LMF staff

- **Maaya Ikeda, Ph.D.**, has joined the LMF.
- Together, we will be training new users and helping experienced users become advanced users.
- She can be contacted via [email](#) or (more easily) via MS-Teams chat.

Instrument status

- 13 scopes, no known major issues
- SD (undergoing upgrade - watch for announcements of training on Teams)
- A1SP now has FLIM module in NIS-Elements

IT status

- Ilastik, Fiji, and SPCImage are all installed on WS0 - WS5 now. All accessible via Splashtop remote so you can analyze data on your couch. NIS5.3 is on WS1-3.
- For all publications that include data or analysis from the LMF, you can now make use of this RRID: [SCR_021148](#) in your methods and/or acknowledgement section (along with acknowledging the MLSC as below).

Monthly pubs

- ✓ [Genetically identified neurons in avian auditory pallium mirror core principles of their mammalian counterparts](#)
- ★ [Quantitative and Multiplexed Fluorescence Lifetime Imaging of Intercellular Tensile Forces](#)

- ★ LMF staff author
- ✓ Papers that acknowledged the LMF and MLSC as [they are supposed to](#).
- Missing your paper? [Send a link to Jim](#).

LMF COVID policy update

Watch for details on the COVID protocol shared on MS-Teams starting early this month regarding cleaning, masking, etc.

Non-microscopy stuff

Big "**Congratulations graduates!**" to all of the undergraduates and graduate students! It was quite a year.



a

GET STARTED

New user orientation
Every Tu @10
[Zoom@4135774580](#)

b

GET HELP

Office hours
Every Mo @10, Th @10, & Fr @11
[Zoom@4135774580](#)

c

GET ANSWERS

Use [LMF MS-Teams channels](#), chat with staff and other users (and future chatbot).