

Duke / OSA/SPIE.

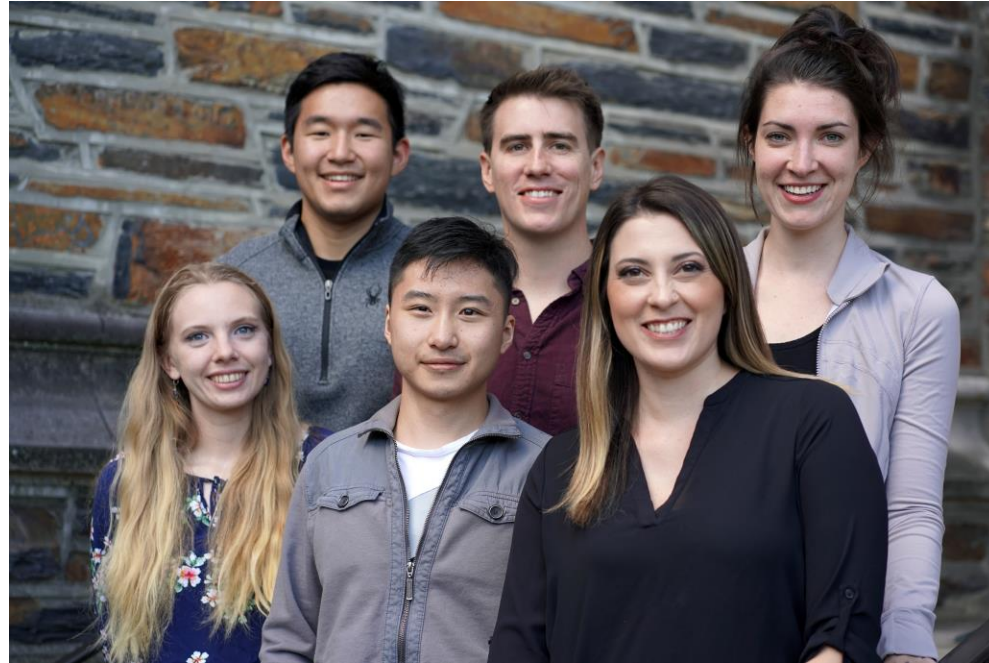
Optical Student Chapter

Fall Meeting
November 6, 2019



Duke Optical Student Chapter (DOSC)

**Duke student
organization interested
in research in
optics/photonics led by
graduate students.**



Kristen Hagan
President

Evan Jelly
Vice President

Jason Liu
Secretary

David Li
Treasurer

Kim Lennox + Latifah Maasarani
Outreach co-chairs



Why join DOSC??

- Influence optics/photonics courses at Duke
- Connect with professors + industry leaders
- Outreach opportunities
- Travel grant + professional org support
- Free food
- Too many reasons to list..

SPIE – Student Membership

Student Membership Price:

- 1- Year: \$20



Student Membership Benefits:

- Complimentary SPIE Journal of your choice
- Apply for scholarships worth \$2,000 to \$11,000
- Find a job through SPIE Career Center or job fairs at SPIE events
- Free online professional development courses
- 10 SPIE Digital Library downloads
- Receive up to 60% off SPIE courses at events
- Attend conferences specific to your technology area at a significant discount
- Publish fast with e-First Publishing
- Exclusive access to Member networking events
- SPIE Professional Magazine

Sign-Up Online at: <https://spie.org/Membership/logincreate>

SPIE – Student Member Funding Opportunities

By being a member of Duke's SPIE chapter, YOU get access to funding opportunities like...



Student Author Travel Grants to SPIE Meetings

- Range between \$250-\$500
- Reimbursement for travel expenses (airfare, ground, and/or hotel)
- MUST be a SPIE Student Member who is presenting at the meeting to apply
- Application is considered for MKS Instruments Research Excellence Award

SPIE Optics and Photonics Education Scholarships

- Range from \$3,000-\$11,000
- MUST be a SPIE Student Member enrolled in an optics, photonics, or related program (physics, E.E., etc) to apply
- Can apply per each degree you earn
- Become a member and apply this cycle! Applications due February 14, 2020!

...AND MORE!

SPIE – Chapter Grant Offerings

By being a member of Duke's SPIE chapter, YOU grant us access to funding opportunities like...



Student Chapter Annual Report & Activity Grant

- Range between \$500-\$1,500
- To cover chapter activities from April 1, 2020 – March 31, 2021
- Funds: Management, Career Preparation, Industry Connection, Outreach, & EDI Activities
- Due December 1 each year, paid out in March 2020

Chapter Officer Travel Grant

- Includes free registration to Photonics West/Optics & Photonics, meals (\$50 per day for up to 7 days), Airfare, & Lodging

Others:

Outreach Grant

Visiting Lecturer Grant

International Day of Light Activity Grant



Official Student Chapter

Travel

Networking

Career Resources

Grants



OSA– Student Membership



Student Membership Benefits:

- **Career Services** - career training - [OSA Career Calibrator](#),
post resumes on [WORKinOPTICS.com](#)
OSA career centers
- **Prizes:** Identify exceptional papers, presentations, and research by OSA members
- **Grants:** Up to seven unique grants values up to **\$2000** awarded for attending meetings.
- **Scholarships:** The OSA Foundation awards over **\$24,000** through scholarships every year.
- **Early Career Fellowships:**
 - Milton and Rosalind Chang Pivoting Fellowship:**
\$50,000 Prize towards the betterment of the field and society outside of the traditional career paths
 - Thomas F. Deutsch Fellowship:**
One-year supported fellowship at the Massachusetts General Hospital Wellman Center for Photomedicine.
 - OSA Sponsored AAAS Science & Technology Policy Fellowship:**
One-year government fellowship working with members of congress/executive to develop S&T policy.

OSA– Chapter Benefits



Student Leadership Conference:

- Annual meeting for student chapters
- **350 student chapters** from over **60 countries**
- Includes travel, lodging, and meals
- Lodging and free registration to attend Frontiers in Optics

International OSA Network of Students:

- Student chapter members organize regional meetings focused on technical and professional development content as well as networking with peers and luminaries.

Others:

OSA Ambassadors: early-career position, travel the world for OSA

Additional Funding: Chapter Prizes, Outreach Events, Visiting Lecturers, Int. Day of Light Grants

Free food and more!

Monthly breakfast on 1st Friday

- Volunteer to present a research poster
- Catering, coffee, snacks



Wednesday post-seminar lunches

- Look out for signups from Jason
- Make connections with distinguished professors

WED, NOV 13

FIP Seminar Co-hosted
with Department of
Chemistry: Modern
Alchemy-Making Copper
Look Like Iridium and
Platinum



Dr. Mark Thompson, Professor, Ray R. Irani Chair
of Chemistry, Departments of Chemistry,
Chemical Engineering and Materials Science,
University of Southern California

Community Outreach

Upcoming Events: Need volunteers!

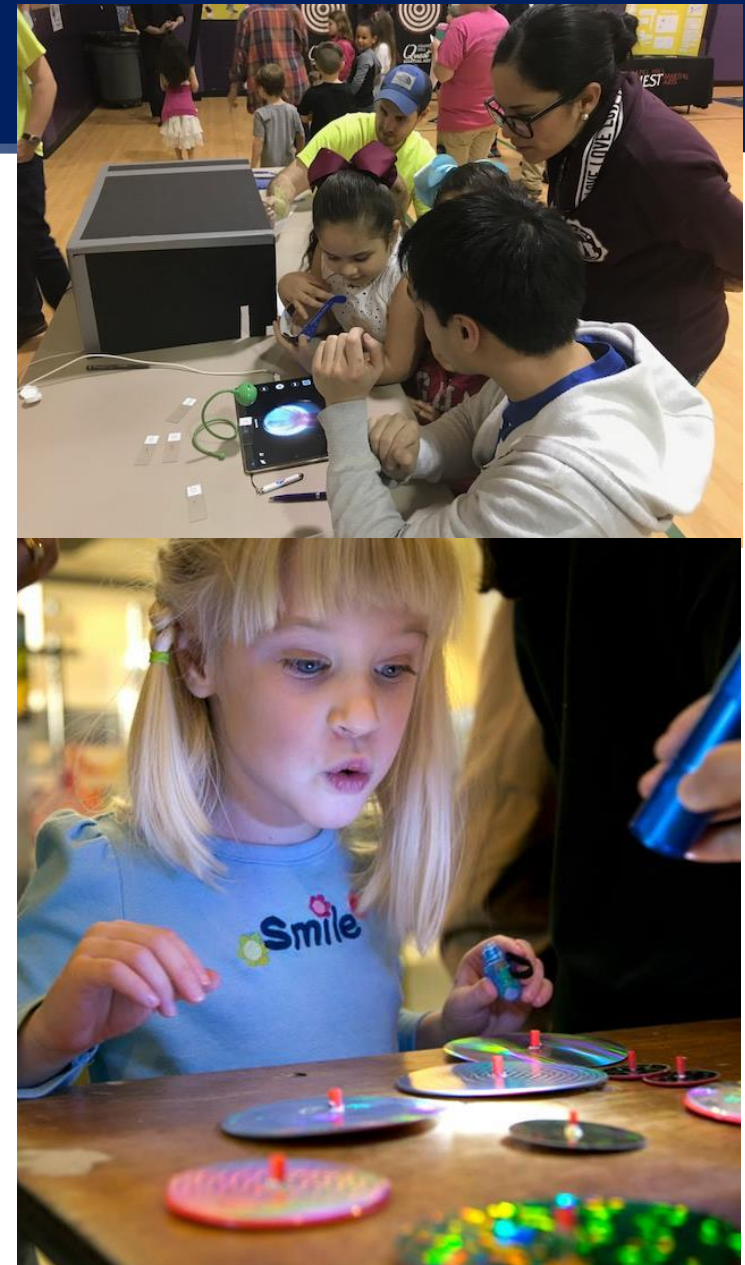
- Chapel Hill Elementary Outreach Event
 - Spring 2020
- SMIF – Summer Camp Volunteers
- Photonics Field Day - May 16, 2020
 - “An interactive day of light-based games, demonstrations, and tours held on the International Day of Light.” “Prizes, giveaways, photobooth, and snacks included!”

Current Demos

- Mini-microscope
- Hologram glasses
- Peppergram

Need More K-12 Demo Ideas for Outreach Events!

- Talk to Kim Lennox or Latifah Maasarani



Community Outreach within FIP

Social Events: Information coming soon!

- Trivia night at Devil's Krafthouse
- Monthly FIP/DOSC Evening Social
 - 1st Event: DOSC/FIP Holiday Potluck
- Coffee/Tea Socials
 - 1st Event: During Reading/Finals
- **Need more ideas! Tell us what you want to do!**

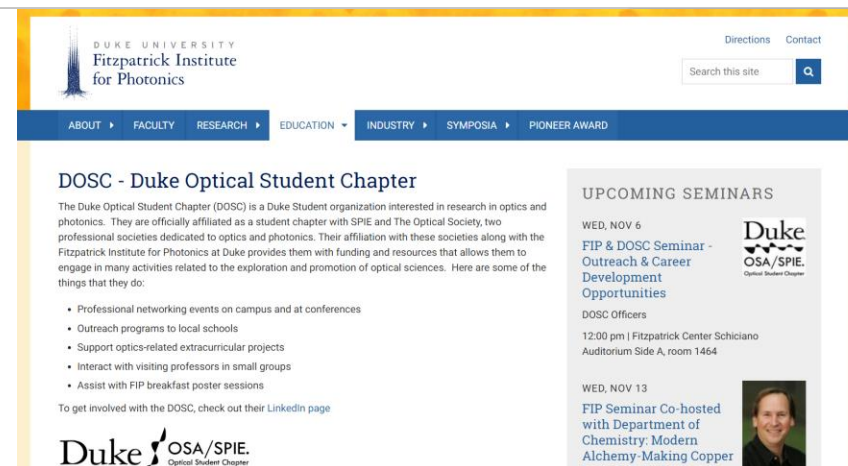
Social Media

Websites

- <https://fitzpatrick.duke.edu/dosc-duke-optical-student-chapter>
- Events calendar on website!

LinkedIn

- <https://www.linkedin.com/company/duke-students-in-optics/>



DOSC + academics

Photonics certificate

Requirements

- **For all certificate candidates:**
 - Complete four photonics courses from the approved course listing, of which one course must be a qualified "Introductory Survey Course." (See Certificate Course List)
 - Present research at a Fitzpatrick Institute Student Group meeting (includes FIP Friday Breakfast Poster Presentation).
 - Attend 1 semester of Optics and Photonics Seminar Series
BME 609/ ECE 549/ PHY 549
- **For Ph.D. candidates:** Ensure at least one member of the FIP is on the student's Ph.D. dissertation committee.

Offered course survey

- Feedback to faculty on desired courses



Certificate Program and
DOSC Faculty Contact:
Dr. Adam Wax



Thanks for coming!

Get involved by filling out the 2-minute survey:

https://duke.qualtrics.com/jfe/form/SV_57Trgfdv4BsOCd7

See you Friday at
DOSC/FIP breakfast!

FCIEMAS 3rd floor atrium at 10 am



Find us on LinkedIn!
Check out DOSC page on FIP website.