AUPO 2021

EDUCATING THE EDUCATORS

SYLLABUS

Educating the Educators 2021

The Association of University Professors of Ophthalmology's Program Directors Council welcomes you to the 18th annual Educating the Educators (EE) conference. Our first ever virtual meeting will enhance your personal and professional development, engage with the latest bright ideas, and catalyze action on the recruitment disruptor on our doorstep.

EE kicks off with engaging small group discussions of the book, *Big Potential*, by Shawn Achor. The opening session, "Surviving to Thriving: Personal and Professional Development for Educators," builds on Achor's concepts and features a keynote address by renowned educator Jennifer Cummings, PhD. The session concludes with a discussion with our own OG PDs, Tara Uhler and Tom Oetting.

Engagement continues with three "Guru Guidance" sessions where learners may join small group discussions on a myriad of topics with knowledgeable peers. A generous break then precedes "2020's Best: Research, QI and COVID Innovations" session where this year's best ideas will be presented. The day concludes with "Ophthalmology's Future: Recruitment Moonshot" a dynamic session on how we can shape our own future with the USMLE Step 1's transition to Pass/Fail.

Please take advantage of breaks to check out the On Demand posters and papers; poster authors have been given the option of recording short presentations of their posters, all of which will be available On Demand throughout the day. Important updates from Organizations are also available to review On Demand at your leisure. And, don't miss our submissions for "Meet My Work-at-Home Colleagues," "Epic Virtual Office Spaces," and "Workspaces Gone Bad." Your 'likes' will help determine our winners!

We look forward to seeing you at your annual EE meeting!

Jeff Pettey, MD, MBA
Chair, Educating the Educators
Member-at-Large
AUPO Program Directors Council

Misha Syed, MD, MEHP
Chair, Book Club Session
Member-at-Large
AUPO Program Directors Council

Stacy Pineles, MD
Chair, 2020's Best Session
Member-at-Large
AUPO Program Directors Council

Jules Winokur, MD
Chair, Guidance with Gurus Session
Member-at-Large
AUPO Program Directors Council

2

Table of Contents

Table of Contents

Educating the Educators Program

10:00 AM – 11:00 AM	**Book Club**	
	In his hugely popular book, *The Happiness Advantage*, Harvard happiness researcher Shawn Achor argued, "the greatest competitive advantage in the modern economy is a positive and engaged brain." In this compelling follow-up, *Big Potential* examines the other side of the happiness coin – the power of social support and connection as the greatest predictor of long-term happiness. Our likelihood of success improves in every meaningful dimension of life when we help others improve. In Achor's words, "We need to stop trying to be faster alone, and start working to be stronger together."	
	10:00 AM – 10:01 AM	Introduction – *Misha F. Syed, MD, MEHP*
	10:01 AM – 10:10 AM	Book Club: A Conversation about *Big Potential* by Shawn Achor – *Jennifer Cummings, PhD*
	10:10 AM – 10:15 AM	Joining Book Club Discussion Groups Review – *Misha F. Syed, MD, MEHP*
	10:15 AM – 11:00 AM	Book Club Discussion Groups
11:00 AM – 11:05 AM	Break	
11:05 AM – 11:12 AM	**Welcome and Announcements**	
	11:05 AM – 11:06 AM	Welcome – *Laura K. Green, MD*
	11:06 AM – 11:12 AM	Overview and Introduction – *Jeff H. Pettey, MD, MBA*
11:12 AM – 12:05 PM	**Surviving to Thriving: Personal and Professional Development for Educators**	
	Charting our academic path as an educator is stressful in the best of times, much less during the unrest and fluidity of 2020. As leaders and educators, we strongly advocate for our patients, trainees and loved ones, often at the cost of our own wellbeing. Your professional success is directly tied to your own personal wellbeing and opportunities for self-investment.	
	11:12 AM – 11:50 AM	Building Resilience in Tough Times by Fortifying Yourself and Connecting with Others – *Jennifer Cummings, PhD*
	11:50 AM – 12:05 PM	Panel Discussion moderated by *Jeff H. Pettey, MD, MBA*; Panelists: *Jennifer Cummings, PhD; Thomas Oetting, MD;* and *Tara Uhler, MD*
12:05 PM – 12:10 PM	**Overview of Guidance with Gurus Breakout Groups** – *Jules Winokur, MD*	
	Are you looking for guidance from a guru? Would you like to have an exchange with an expert? Join these small group discussion opportunities with knowledgeable facilitators and varied topics chosen by attendees. Given the difficulty in having online discussions with large groups, these breakout sessions will be limited to small groups of people at a time. Multiple sessions will run concurrently, and the opportunity to explore three different topics will be offered. The sessions are designed to be intimate, allowing live, small group discussions with topic specialists.	
12:15 PM – 12:40 PM	**Guidance with Gurus Session 1** (see p. 5)	
12:45 PM – 1:10 PM	**Guidance with Gurus Session 2** (see p. 5)	
1:15 PM – 1:40 PM	**Guidance with Gurus Session 3** (see p. 6)	
1:40 PM – 2:40 PM	Break – Things to do: · View posters and organization reports · Rate the 'Meet My Home Office Mates,' 'Epic Virtual Offices,' or 'Dubious Work Spaces' submissions · Hang out in an Attendee Lounge or enjoy the wellness activity of your choice!	
2:40 PM – 3:45 PM	**2020's Best: Research, QI and COVID Innovation**	
	2:40 PM – 2:41 PM	Introduction – *Stacy Pineles, MD*
	2:41 PM – 2:47 PM	AI for Video-based Assessment of Intraoperative Surgical Skill – *Shameema Sikder, MD*
	2:47 PM – 2:53 PM	Predictors of a Successful Ophthalmology Resident Using Medical Student Application Materials – *Andrea Tooley, MD*
	2:53 PM – 2:59 PM	A Novel, Video-based, Ophthalmology Skills Curriculum for Incoming Ophthalmology Residents – *Shravan Savant, MD*
	2:59 PM – 3:05 PM	Effectiveness of a Formal Business of Ophthalmology Course for Trainees – *Jonathan Siktberg, BBA*
	3:05 PM – 3:13 PM	Q & A
	3:13 PM – 3:19 PM	Uprooting the Didactic Tradition: Implementing a Flipped Classroom Model for Residency Education – *Katherine Hu, MD* **RESIDENT QI WINNER**
	3:19 PM – 3:25 PM	Use of a Mannequin-Based Surgical Simulator for Teaching Margin-Involving Eyelid Laceration Repair – *Meleha Ahmad, MD* **RESIDENT QI WINNER**
	3:25 PM – 3:31 PM	A Novel Interactive Virtual Medical Student Clinical Rotation for Ophthalmology – *Moran Roni Levin, MD*
	3:31 PM – 3:37 PM	Maintaining Hands-On Surgical Training Virtually During COVID-19 – *Sarah Griffin, MD*
	3:37 PM – 3:45 PM	Q & A
3:45 PM – 3:50 PM	Break	

Educating the Educators Program

3:50 PM – 4:50 PM	**Ophthalmology's Future: Recruitment Moonshot** – Moderated by *Jeff H. Pettey, MD, MBA*	
	USMLE Step 1's transition to Pass/Fail brings change to our doorstep. Whether we are victims of imposed circumstances or architects of our own destiny depends on our actions now. More than any other specialty, ophthalmology can blaze a unique trail toward holistic recruitment and a richly diverse future. Hyperbole? Ophthalmology's marriage to the potentially agile SFMatch provides the opportunity to chart our own unique course forward. Our choice: Carpe Diem or Come What May.	
	3:50 PM – 3:55 PM	USMLE Step 1 Consequences and Opportunity – *Jeff H. Pettey, MD, MBA*
	3:55 PM – 4:02 PM	SF Match Recent Wins and Innovations…Our Crisis of Application Overload – *Misha F. Syed, MD, MEHP*
	4:02 PM – 4:09 PM	Leading Innovations in Medical School Admissions – Situational Judgment Testing – *Jeffrey Soohoo, MD*
	4:09 PM – 4:16 PM	How Over-Reliance on USMLE Scores Inhibits Diversification of Ophthalmology – *O'Rese Knight, MD*
	4:16 PM – 4:46 PM	Holistic Review of Applicants – *Sunny Nakae, MSW, PhD*
	4:46 PM – 4:50 PM	Conclusion – *Jeff H. Pettey, MD, MBA*
4:50 PM – 5:00 PM	**Closing Remarks** – *Jeff H. Pettey, MD, MBA*	
5:00 PM – 5:30 PM	**EE Social Lounges Open**	
	Social Lounges will be open for 30 minutes after the close of the meeting for those who would like to to stay and mingle longer. This is a great way to catch up with friends that you have not seen for awhile and to make new acquaintances. Hop into one of the rooms and hang out!	

Guidance with Gurus Schedule

Session 1	12:15 PM – 12:40 PM EASTERN STANDARD TIME

Burnout for Coordinators – *Sheri L. Samp*

Counseling Struggling Medical Students Interested in Ophthalmology – *Richard E. Braunstein, MD*

Counseling Struggling Medical Students Interested in Ophthalmology – *Lora Glass, MD*

How to Deal with a Troubled Resident – *Karl C. Golnik, MD*

How to Deal with a Troubled Resident – *Shlomit Sandler, MD* and *Isha Mehta, DO*

How to Deal with USMLE Pass/Fail – *Jane C. Edmond, MD*

How to Deal with USMLE Pass/Fail – *Tara Uhler, MD*

How to Increase Resident Surgical Numbers – *Azin Abazari, MD*

Improve Tracking of Resident Cases with the Log-O-Matic! *Evan (Jake) Waxman, MD, PhD*

PGY1 Integration – *Adam H. Kaufman, MD*

PGY1 Integration – *Jamie B. Rosenberg, MD*

Program Director Longevity (from a 24 year survivor) – *Timothy J. Martin, MD*

SF Match – *R. Michael Siatkowski, MD*

Surgical Wet Lab – *Anurag Shrivastava, MD*

Trainee Wellness/Burnout – *Seenu M. Hariprasad, MD*

Under-Represented in Medicine – *Fasika Woreta, MD, MPH*

Using a Hospitalist Model for Inpatient Consults – *Maggie Hymowitz, MA, MD* and *Donna Kim, MD*

Working with the ACGME – *Andreas K. Lauer, MD*

Session 2	12:45 PM – 1:10 PM EASTERN STANDARD TIME

Counseling Struggling Medical Students Interested in Ophthalmology – *Aruoriwo M. Oboh-Weilke, MD*

How to Deal with USMLE Pass/Fail – *Ilana B. Friedman, MD*

How to Deal with USMLE Pass/Fail – *Jules A. Winokur, MD*

How to Deal with a Troubled Resident – *Ashley H. Caradonna, BA*

How to Manage a Resident Crisis – *Kathy Whitney*

Improve Tracking of Resident Cases with the Log-O-Matic! *Evan (Jake) Waxman, MD, PhD*

Milestones / Evaluations – *Stacy L. Pineles, MD*

Negotiations – *Jeff Pettey, MD, MBA*

PGY1 Integration – *Jennifer L. Lindsey, MD* and *R.V. Paul Chan, MD*

PGY1 Integration – *Saras Ramanathan, MD*

Resilience and Wellbeing – *Jennifer Cummings, PhD*

Retention/Promotion/Tenure for Educators – *George (Jack) A. Cioffi, MD*

Role of the Private Office in Resident Education – *Robert L. Slavens, MD*

Running an Effective Clinical Competency Committee – *Eleanore Kim, MD*

SF Match – *Rukhsana G. Mirza, MD*

Surgical Wet Lab – *Anuradha Khanna, MD*

Trainee Wellness/Burnout – *Jullia Rosdahl, MD, PhD*

Under-Represented in Medicine – *Suzann Pershing, MD*

Under-Represented in Medicine – *Ankoor S. Shah, MD, PhD*

Working with the ACGME – *Andreas K. Lauer, MD*

Guidance with Gurus Schedule

Session 3	1:15 PM – 1:40 PM EASTERN STANDARD TIME

Career Pathways for Ophthalmic Educators – *Douglas R. Fredrick, MD*

Counseling Struggling Medical Students Interested in Ophthalmology – *Shannon Lynch, MD*

Global Ophthalmology/Public Health Rotations – *Charles S. Bouchard, MD*

How to Deal with a Troubled Resident – *Robert Swan, MD*

How to Deal with a Troubled Resident – *Marco A. Zarbin, MD, PhD*

How to Deal with USMLE Pass/Fail – *Suzann Pershing, MD*

How to Deal with USMLE Pass/Fail – *Nicholas J. Volpe, MD* and *Dmitry Pyatetsky, MD*

How to Leverage the AAO & ONE Network for Resident Education – *Laura K. Green, MD*

Improving Quality Improvement – *R. Michael Siatkowski, MD*

Resilience and Wellbeing – *Jennifer Cummings, PhD*

Retention/Promotion/Tenure for Educators – *Richard E. Braunstein, MD*

PGY1 Integration – *Maria Reinoso, MD*

PGY1 Integration – *Anjali Tannan, MD*

Program Coordinator Advocacy – *Olivia Turner*

SF Match – *Misha Syed, MD, MEHP*

Surgical Wet Lab – *Robert Fechtner, FACS, MD*

Trainee Wellness/Burnout – *Royce Chen, MD*

Trainee Wellness/Burnout – *Janice C. Law, MD*

Trainee Wellness/Burnout – *Thomas A. Oetting, MD*

Under-Represented in Medicine – *O'Rese Knight, MD*

Working with the ACGME – *Andreas K. Lauer, MD*

2020's Best: Research, QI and COVID Innovation Paper Session Abstracts

AI for Video-based Assessment of Intraoperative Surgical Skill

SHAMEEMA SIKDER, MD*; SANCHIT HIRA, MS; DIGVIJAY SINGH, MS; TAE SOO KIM, MS; GREGORY HAGER, PHD; S. SWAROOP VEDULA, MBBS, PHD

Background:

Videos of the surgical field are a rich source of information for skill assessment. Currently, use of videos for skill assessment is limited to review by expert peers or crowd raters. We hypothesize artificial intelligence (AI) methods can be developed to provide objective, unbiased video-based assessments.

Purpose:

To develop and validate AI methods for video-based surgical skill assessment.

Methods:

We developed two AI Methods: first, we predict instrument tips as keypoints (KP), which we then analyze using a temporal convolutional network. Second, we directly analyze videos with a neural network equipped with dependent attention modules (ATT). These modules localize parts of the input that are relevant for skill assessment. We analyzed 99 videos of capsulorhexis to estimate area under the receiver operating characteristic curve (AUC), sensitivity, and specificity using expert ratings as groundtruth and 5-fold cross-validation.

Results:

AUC, sensitivity, and specificity were 0.79 (0.70 to 0.79), 0.80 (0.68 to 0.89), and 0.69 (0.55 to 0.80), respectively for KP, and 0.78 (0.69 to 0.78), 0.84 (0.72 to 0.92), and 0.75 (0.61 to 0.85), respectively for ATT.

Conclusions:

Our findings show internal validity of AI methods for video-based intraoperative surgical skill assessment.

Predictors of a Successful Ophthalmology Resident Using Medical Student Application Materials

ANDREA TOOLEY, MD*; JOHN J. CHEN, MD, PHD; JANICE LAW, MD; GARY J. LELLI, MD; GRACE SUN, MD; KYLE J. GODFREY, MD; ANN Q. TRAN, MD; ELEANORE KIM, MD; JOEL SOLOMON, MD; LAURA WAYMAN, MD; JOSHUA OLSON, MD; GABRIELA M. ESPINOZA, MD; BRADLEY DAVITT, MD; JEREMIAH TAO, MD; ANDREW J. BARKMEIER, MD

Background:

Ophthalmology is one of the most competitive residency specialties in the United States and applicants apply to an increasing number of programs each year. Both objective and subjective factors contribute to the overall strength of a residency application during interview selection and the ranking process. It is unclear which of these factors translate to an applicant's ultimate success during residency training.

Purpose:

To identify factors within the San Francisco (SF) Match Ophthalmology Residency application that are most predictive of future resident success.

Methods:

An Institutional Review Board-approved retrospective multi-institutional study was performed to review San Francisco Match applications from ophthalmology residents in order to identify factors predictive of future resident success. Resident success was assessed in four areas: clinical performance (CP), academic performance (AP), surgical performance (SP), and global performance (GP). Residents were scored in each category on a 1-5 scale by two faculty members at each institution. If inter-faculty assessments differed by more than 1 point in any category, a third faculty evaluator was recruited and all 3 scores were averaged. The following data were recorded: sex, Step 1 and 2 scores, undergraduate institution, major, and grade-point average, advanced degrees, medical school, Alpha Omega Alpha (AOA) and Gold Humanism Honor Society (GHHS) status, research publications, core clerkship grades, VISA status, and whether the applicant rotated at their eventual residency program as a medical student.

Results:

259 residents (58% male) from 7 institutions were included in the study. Mean performance scores ranged from 3.26-3.73. There was excellent agreement between scorers in all categories (95%). The majority of residents were scored as "excellent" (score of 4-5) in CP (%), SP (%), and GP (%), while 31% achieved an excellent AP score. Only 5-17% of residents received poor scores (1-2) in each category. Step 1, Step 2, AOA, and GHHS membership were both significantly associated with higher scores across all categories. A PhD degree was significantly associated with lower scores across all categories. Visa status, completing a same-institution medical school clerkship, and research publications were not significantly associated with high or low performance in any category.

Conclusions:

This multi-institutional study identified factors from within the SF match application which predict for future resident success in multiple categories. As emphasis shifts away from objective standardized exam scores, identifying other aspects of the application with associated with resident performance may offer guidance for residency selection committees.

A Novel, Video-based, Ophthalmology Skills Curriculum for Incoming Ophthalmology Residents

SHRAVAN SAVANT, MD*; NISHA CHADHA, MD; DOUGLAS FREDRICK, MD; HARSHA REDDY, MD

Background:

Given variable pre-residency ophthalmology exposure, skill training for PGY-2 ophthalmology residents (POR) is essential. However, orientation experiences vary, and skills acquisition is often not measured.

Purpose:

A novel video-based orientation curriculum was developed and implemented to standardize and effectively teach exam skills to POR.

Methods:

An instructional video library (VL) on ophthalmic exam skills was created. Prior to any instruction, PGY2s were recorded performing basic ophthalmic exams (BOE) using slit lamp-recording smartphone adapters. After a 2-week orientation involving live teaching, practice, and self-directed VL review, BOEs were again recorded. A 36-point ophthalmic exam skills checklist expanding upon the Ophthalmic Clinical Evaluation Exercise (OCEX) was developed for scoring videos. Residents also completed pre- and post- surveys assessing their comfort with the BOE.

Results:

11 POR participated. Video exam scores improved from 55.3% +/- 15.9% to 77.9% +/- 12% (p<0.0058). Surveyed resident comfort with the exam increased from 2.5 +/- 0.57 to 4.1 +/- 0.45 on a 5-point Likert scale (p<0.0001).

Conclusions:

Our VL curriculum was effective in rapidly increasing resident comfort and BOE skills. With the launch of the integrated internship model, the VL curriculum may be effective for training ophthalmology PGY1s, medical students and non-ophthalmology providers.

Effectiveness of a Formal Business of Ophthalmology Course for Trainees

JONATHAN SIKTBERG, BBA*; ALEXANDER DE CASTRO-ABEGER, MD, MBA; SEAN T. BERKOWITZ, BS; JANICE C. LAW, MD

Background:

In medical school and residency training, there is little emphasis on the administrative and business aspects of running a clinical practice either as an employee or a business owner. However, by the first day of practice, young ophthalmologists must understand risk management, liabilities, lawsuits, marketing, coding, and professionalism.

Purpose:

We aimed to increase exposure and knowledge surrounding the business aspects of ophthalmology including personal financial health, finding a practice, coding, and negotiating a contract.

Methods:

Ophthalmology trainees engaged in eleven 1-hour sessions over 3 weeks during a practice management course covering ten of the most relevant business topics for early career ophthalmologists. A needs assessment was performed and a post-course survey was administered.

Results:

Previous training in medical school on contract negotiation, billing, and coding were each reported by less than 10% of participants. 100% of respondents felt the course improved their understanding of business of ophthalmology, contract negotiations, and lawsuits. 85.7% of participants reported that the course improved their ability to code.

Conclusions:

A formal business of ophthalmology course improved the knowledge of trainees on essential business concepts. This course can serve as a model for other programs looking to meet this educational need.

RESIDENT QI WINNER

Uprooting the Didactic Tradition: Implementing a Flipped Classroom Model for Residency Education

KATHERINE HU, MD*; RACHEL PATEL, MD; SRAVANTHI VEGUNTA, MD; RACHEL SIMPSON, MD

Background:

In 2019, a focus group of residents and faculty found a shared dissatisfaction with the traditional lecture model for resident education.

Purpose:

To improve the learner experience, lecture attendance, faculty development resources, and content quality of lectures via resident-driven initiatives.

Methods:

Residents and faculty were surveyed to identify preferred learning/teaching methods, satisfaction with current didactics, and barriers to restructuring lectures. In response, we designed a "moonshot" curriculum emphasizing residents' preferences for applied learning over traditional didactics. Residents introduced faculty to interactive learning methods at Grand Rounds and division meetings. Resident and faculty champions were recruited from each subspecialty to facilitate curriculum changes.

Results:

Each subspecialty created a division roadmap of core lecture topics, learning objectives, and pre-work assignments. To minimize lecture fatigue, daily lectures were replaced by a protected 2-hour block on Fridays. We created a faculty development hub containing teaching resources on interactive learning. The new curriculum rolled out in July 2020. Post-implementation survey results suggest improved attendance and increased resident and faculty satisfaction.

Conclusions:

Successful curriculum overhaul requires a tailored approach with resident initiative and faculty buy-in. Our reimagined flipped classroom curriculum may improve the learner/teacher experience.

RESIDENT QI WINNER

Use of a Mannequin-Based Surgical Simulator for Teaching Margin-Involving Eyelid Laceration Repair

MELEHA AHMAD, MD, MS*; JIAWEI ZHAO, MD; ANDREW FISCHER, MD; EMILY W. GOWER, PHD; ROXANA FU, MD; FASIKA A. WORETA, MD, MPH; SHANNATH L. MERBS, MD, PHD

Background:

Repair of margin-involving eyelid lacerations is a challenge for beginning residents, yet no commercially-available simulation models exist for learning this skill.

Purpose:

We modified a mannequin-based training system originally developed for trachomatous trichiasis surgery training to teach margin-involving eyelid laceration repair and evaluated its success within a residency wet-lab environment.

Methods:

A mannequin-based training system with a replaceable eyelid cartridge that mimics the primary layers of the eyelid was developed. Between 9/2019 and 3/2020, five PGY2 and one PGY4 resident from one institution performed one or more video-recorded margin-involving eyelid laceration repair using the surgical simulator. Two attending Oculoplastic surgeons reviewed the videos in a blinded fashion to assess surgical proficiency using a standardized grading system. Participants were surveyed on their comfort level with margin-involving eyelid laceration repair before and after practice with this simulator.

Results:

Eleven videos were evaluated. Amongst three residents completing more than one session, there was an increase in their skills assessment score and a decrease in operative time over consecutive simulation sessions. Self-reported comfort level with margin-involving eyelid laceration repairs was significantly higher post-simulation compared to pre-simulation (p=0.02).

Conclusions:

We developed a high-fidelity surgical simulator for teaching margin-involving eyelid laceration repair with early results suggesting utility in developing resident surgical skills.

A Novel Interactive Virtual Medical Student Clinical Rotation for Ophthalmology

MORAN RONI LEVIN, MD*; JAMES FRISBIE; RAMYA SWAMY, MD; JANET ALEXANDER, MD; COLLEEN DRISCOLL, MD; REBEKAH FRIEDRICH, MS; PAVLINA KEMP, MD

Background:

Virtual medical education has become critical in providing ophthalmology education in a safe and effective way during the COVID-19 pandemic.

Purpose:

Our objective was to develop a novel clinical rotation utilizing technology to enhance remote ophthalmology learning.

Methods:

Our unique curriculum incorporates mobile mounted tablets, allowing students to virtually participate in inpatient consults, clinic, and ophthalmic surgery. An adaptable mounting device attached to the slit lamp allows students to observe examinations in real-time, enhancing recognition of ocular pathologies. Students participate in a robust curriculum that includes independent learning modules, video lectures, interactive modules, podcasts, and surgical video rounds. Students engage with residents and faculty in interactive guided lectures and case-based discussions that focus on the AAO white paper teaching objectives. Students are mailed surgical instruments and participate in surgical modules and faculty-led virtual wet-labs.

Results:

Our unique virtual curriculum combines didactic learning, interactive content, and novel technology applications, including mobile tablets, slit lamp mounting devices, and faculty-led virtual wet-labs.

Conclusions:

Virtual technologies can be utilized to enhance ophthalmology medical student education in a safe and effective way during the COVID-19 pandemic, and to improve educational access in the future.

Maintaining Hands-On Surgical Training Virtually During COVID-19

SARAH GRIFFIN, MD*; ALEXIS STEFANIAK, BS; ROSHNI VASAIWALA, MD; MEENAKSHI CHAKU, MD; ANURADHA KHANNA, MD

Background:

COVID-19 created challenges to resident surgical training. During COVID-19, our annual citywide surgical wet lab for 6 Chicago residencies was held virtually, preserving hands-on surgical training.

Purpose:

Our goal was to evaluate the virtual, hands-on wet lab, comparing this to an in-person event. We saw an attendance increase while noting specific features that led to this outcome.

Methods:

32 residents of 6 Chicago programs were surveyed pre and post wet lab. They received model eyes and instruments to perform lens folding, Yamane technique, and minimally invasive and advanced glaucoma surgeries. Through an online video platform, residents were given small group instruction by PGY level.

Results:

Residents reported improvements in knowledge and perceived ability to perform procedures. The preferred aspects of a virtual format most cited were length of time with materials and ability to learn remotely compared to 1-on-1 instruction and access to microscopes of an in-person format. A majority would attend a virtual wet lab, even if physical distancing measures were lifted.

Conclusions:

A virtual surgical wet lab can provide necessary training while still adhering to physical distancing constraints and even in their absence, may add value to the curriculum.

On Demand Paper Presentation Abstracts

The Hero's Journey in Resident Narratives of COVID-19 Redeployment

HARSHA REDDY, MD*

Background:

Joseph Campbell's 1949 landmark book of comparative mythology, The Hero with a Thousand Faces, describes the hero's journey, a narrative structure common to many of the world's religious and folk stories: a young woman or man is separated from the familiar world, faces and overcomes trials in a new realm, and returns to society as an empowered adult.

Purpose:

While we think of medical education as incremental skills-based training, the arc of personal growth may be a dimension of training that is less often discussed. While such growth can be approached via psychology, sociology, organizational science, or other disciplines, narrative can also be a profound means of guiding and understanding personal development. Here, we examine Campbell's hero's journey - the cycle of separation/trial/return - in resident self-conceptualizations during their redeployment during the COVID-19 pandemic in New York City.

Methods:

In April 2020, the New York City Program Directors' group sought narratives from residents in all NYC ophthalmology residency programs. These were compiled and edited, and the resulting 10 narratives (8 programs) were published as an editorial in Curr Opin Ophthalmology. The present study qualitatively examines those published narratives for the thematic elements of the hero's cycle (separation, initiation, return), compares them with illustrative examples from world mythology, and speculates on implications for residency training during the ongoing pandemic and beyond.

Results:

Separation. The deployment to the COVID wards was an abrupt departure from the realm of ophthalmology. Residents expressed anxiety about their capability as internists and fear of physical danger but also awareness of a "calling" and an internal motivation to face the unknown and to help.

Trial. Residents narrate in vivid detail both physical trials (lack of oxygen, long hours, fatigue) and psychological ones (impostor syndrome, witnessing of suffering) as they confronted death around them, literally and metaphorically. Though the patients did not always survive, the hero prevailed in facing trials with courage, dedication, and compassion.

Return. As the COVID census decreased, our residents returned to the familiar landscape of ophthalmology, but they return transformed. The narratives describe memories that will endure (e.g. the deceased 'pop-up box', teams coming together), hard-won insights (e.g. the disproportionate toll on minority communities, how to comfort family members), and personal growth. They express that their journey, while difficult, will make them more complete physicians and human beings.

Conclusions:

The hero's journey in mythology often describes an adventure in supernatural realms; however, it is a metaphor for an internal journey of challenge, transformation, and growth. As such, there may be a parallel in medical training - the condensed time frame of COVID deployment, the dramatic intensity of the pandemic, and resident narratives we collected allow us to characterize the elements of the hero's journey in the redeployment context.

Despite technological advance and rationalism, narratives anchor meaning for humans in society as they have for millennia. This may have implications for medical education, a rite of passage where an initiate is transformed to a practitioner by guides and through their own efforts and willpower. Both educators and trainees may benefit in practical and meaningful ways by being conscious of near-universal myths regarding rites of passage such as the hero's journey.

The State of Diversity and Diversity Training in Residency Programs

UGOCHI AGUWA, BA*; FASIKA WORETA, MD, MPH; JEFF PETTEY, MD, MBA; GRACE SUN, MD; STACY PINELES, MD, MS; DIVYA SRIKUMARAN, MD

Background:

To prepare residents to serve the racially and ethnically diverse U.S. population, residency programs must strive to train a diverse, culturally competent, and unbiased workforce.

Purpose:

Examine the state of diversity of residency programs across all specialties and their implementation of diversity training initiatives (i.e. unconscious bias training, cultural competency training, and education about health disparities).

Methods:

Anonymous survey of residency program leadership regarding program demographics, underrepresented minority (URM) recruitment initiatives, and attitudes toward diversity training.

Results:

Data collection is ongoing and the survey is pending distribution by the AUPO. Preliminary results, from 31 responses, show that 74% of programs employ strategies to attract diverse residents-most commonly information sessions for URM students and recruitment at URM conferences. Although 90% of program leadership believe it is important for health professionals to receive formal diversity training, only 42% lead programs with curricula for trainees and faculty. Reported barriers to curriculum implementation include lack of faculty expertise, funding, and curricular time.

Conclusions:

Residency programs frequently utilize strategies to recruit diverse classes. Though program leadership realize the importance of diversity training, a majority express barriers to implementation. The creation of shared central resources and diversity training toolkits may support programs as they work to implement formal curricula.

Teaching Ophthalmology with 2020SIM.com: A Pilot Study with Internal Medicine Residents

NISHA CHADHA, MD*; MARK EDOUARD, MD; SAMIRA FAROUK, MD

Background:

Ophthalmology education (OE) has declined, and consequently, non-ophthalmology healthcare providers (HCP) express discomfort with ophthalmic presentations.

Purpose:

Our aim was to develop a novel, online, case-based ophthalmology learning tool (CBOLT) and pilot it with internal medicine residents (IMR).

Methods:

A needs assessment (NA) querying IMR on comfort with common ophthalmic presentations was administered to 64 PGY-2 or PGY-3s. An interactive, CBOLT (20/20 SIM, www.2020SIM.com), including 6 HIPAA compliant cases was developed in WordPress. IMR participated in a one-hour workshop facilitated by an ophthalmologist, during which they worked through cases on 2020SIM.com in small groups. An exit survey was used to evaluate the session.

Results:

33 IMR completed the NA, 25 participated in the workshop, and 23 completed the survey. Of the 33 NA respondents only 57.6% indicated having prior primary care OE. 63.6% and 36.4% were uncomfortable generating a differential for vision loss and red eye, respectively. Following the workshop, 91.3% rated 2020SIM.com as a useful OLT. In terms of case difficulty level, 34.8% selected "challenging," while 60.9% felt they were "just right."

Conclusions:

Use of 2020SIM.com to teach ophthalmology in workshops is feasible, and was well received by participants. This novel CBOLT may be used for OE with other trainees and HCP either in workshops or via self-directed approach.

Social Media Use Among U.S. Ophthalmology Residency Programs during COVID-19 Pandemic

LOGAN WOLFEL*; RUSHI MANKAD*; ROBERT MELENDEZ, MD; ANDREA TOOLEY, MD; NICOLE BAJIC, MD; JANICE LAW, MD; GABRIELA ACOSTA; JULIANA RUNNELS; SAHI PODILA; OSHIN RAI; ELISABETH SLEDZ, MD

Background:

We have been tracking usage rates amongst ophthalmologists and ophthalmology residency programs on social media sites since 2017 across three social media platforms (Facebook, Twitter and Instagram). During the COVID-19 pandemic, we have observed an increase in the number of younger ophthalmologists joining Twitter and Instagram as well as ophthalmology residency programs creating social media pages to educate and inform their potential applicants.

Purpose:

The purpose of this project is determine the number of ophthalmology residency programs using social media (Facebook, Twitter, and Instagram) and to identify the type of posts and the ones with the the highest levels of engagement.

Methods:

A cross-sectional analysis was conducted to evaluate the social media presence and activity of all accredited ophthalmology residency programs in the United States. The presence of social media profiles and relative activity of each program was assessed with online searches of three social media platforms: Facebook, Instagram, and Twitter. Data were collected twice over a 2 year period. Once in September 2017 and once in September 2019. The content of each post was analyzed over a 6 month period between April 2019-September 2019. Data was also collected for the same information in October 2020.

Results:

A total of 118 programs were evaluated. At the time of analysis in September of 2019, 34 percent (40 programs) of academic ophthalmology programs had a Facebook page. Four percent (5 programs) were present on Instagram and 23 percent (27 programs) were present on Twitter. The average growth in the number of likes on Facebook was 208.06 between 2017 and 2019. The average growth in number of followers on Instagram and Twitter was 55.07 and 68.67 respectively. The content of the Facebook posts that were shared in the highest volume included faculty and staff posts (469), patient education (448), and current events (350). The most liked type of posts were residency category with 33.1 likes per post followed by the staff/faculty category with 23.6 likes per post. Data from 2020 will be presented at the AUPO annual meeting in 2021 to determine whether these numbers have increased given the COVID-19 pandemic.

Conclusions:

Social media can be an effective tool for communication, education, and program advertisement within ACGME accredited ophthalmology programs. However, in 2019, only 34 percent of all academic ophthalmology departments were present on Facebook, 4 percent on instagram, and 23 percent on twitter. We will be comparing data collected in October 2020, which we hypothesize to be significantly higher given the lack of in person interviews and the need for residency programs to interact with their current and future residents. We will also review the content of posts that are most widely used among programs, and how social media may be a useful tool for communication in academic ophthalmology.

Implications of a Cataract Surgery Categorization System at a Safety-Net Hospital

ANH NGUYEN, MS*; MURTAZA SAIFEE, MD; SARAS RAMANATHAN, MD

Background:

A safety-net hospital implemented a cataract surgery categorization system aimed at improving operating room (OR) utilization while maintaining resident education time. Routine cases were scheduled for "fast-track" days while complex cases were performed on less frequent, "slow-track" days.

Purpose:

This retrospective chart review study compared OR utilization, wait times, and visual outcomes between pre-intervention (A) and post-intervention (B) cohorts.

Methods:

Surgery length, complications, visual acuity at pre-operative and 1-month post-operative (POM1) visits, and time between surgery approval and surgery date were recorded in both cohorts. Cohort A was retrospectively categorized based on the risk factors currently used to categorize cohort B.

Results:

Cohort A had 309 cases while cohort B had 446 cases. Wait times between slow and fast-track cases did not differ significantly within either cohort (cohort A $p=0.14$, cohort B $p=0.24$). Stratifying by fast- and slow-track category, there was no difference between cohorts in complication rate, POM1 visual acuity, or change in visual acuity from approval to pre-operative visit.

Conclusions:

Batching cases by complexity increased surgery volume by 44% while maintaining a similar complication rate. Patients with more complex cases did not experience disproportionately longer wait times and their visual outcomes did not differ from their pre-intervention counterparts.

Poster Abstracts

Piloting a Virtual Ophthalmology Rotation for Visiting Senior Medical Students Applying for Ophthalmology Residency

RAMSEY YUSUF, MD*; CHRIS ALABIAD, MD

Background:

In accordance with recommendations from the Coalition for Physician Accountability and in the setting of the coronavirus disease 2019 (Covid-19) pandemic, traditional away rotations have become limited at medical institutions in the United States. These in-person rotations are important for prospective residency applicants to learn about programs, meet current residents and faculty, and advance their clinical knowledge and skills. Virtual medical rotations have increased across the country to address these needs, however more research is needed to understand benefits and weaknesses of these rotations compared to their traditional counterparts.

Purpose:

To evaluate the effectiveness, benefits, and weaknesses of a novel virtual ophthalmology rotation targeted toward visiting senior medical students applying for ophthalmology residency.

Methods:

Fifteen visiting senior medical students completed a novel, two-week virtual rotation at Bascom Palmer Eye Institute in October of 2020. This rotation incorporated flipped-classroom style small group case based sessions; livestream shadowing in the clinic, emergency room and ocular pathology lab (using phones attached to slit lamp adaptors); livestream observation in the operating room; virtual attendance of resident lectures, subspecialty journal clubs, and grand rounds; and one on one mentorship with weekly faculty meetings. Content was distributed via the Zoom platform in clinics and labs and through StreamConnect in the operating rooms. At the end of the rotation, students completed a multiple-choice question knowledge assessment exam and an anonymous, 18-question survey using a Likert scale and free response.

Results:

Rotation ongoing, results to be collected shortly after abstract deadline.

Conclusions:

See above.

Experiential Learning During COVID-19: a Trainee's Guide to Developing a Virtual Presentation

DANIEL OLIVIERI, BS*; PAUL B. GREENBERG, MD, MPH

Background:

N/A

Purpose:

To develop a guide for trainees to present a successful pre-recorded virtual oral paper presentation.

Methods:

Four specific strategies used to deliver a virtual presentation at the American Society of Cataract and Refractive Surgery's Annual Meeting are outlined: learning the meeting's guidelines, selecting telecommunication software, scheduling recurring meeting times with a faculty mentor, and refining the presentation for pacing and intonation.

Results:

Learning the meeting's guidelines were necessary to determine the slide count (e.g., 5 - 10 slides), slide formatting requirements (e.g., width:height slide ratio), location of the disclosure statement (i.e. bottom corner of the first slide), file format (i.e. .ppx, .mov, or .mp4), time/length requirements (i.e. recommended < 5 min), submission software (e.g., Orchestrate), and upload deadline. Next, it was important to choose the telecommunication software (i.e. Zoom) to communicate with mentors. Weekly meeting times with mentors were established to review practice recordings. Finally, the presentation was refined to build rapport with listeners: a script was developed to read aloud for improved intonation, shooting to spend ~15 - 40 seconds per slide and finish the presentation in ~80% of allotted time.

Conclusions:

Trainees can develop a successful virtual oral paper presentation by analyzing presentation requirements and developing a comprehensive plan with their faculty mentor(s).

Oculoplastics Education in the Coronavirus 2019 Pandemic with a Virtual Suturing Curriculum

ELEANORE KIM, MD*; LAUREN DEMARIA, MD; ANN VAN TRAN, MD; ANDREA TOOLEY, MD; IRINA BELINSKY, MD; RICHARD LISMAN, MD

Background:

The COVID-19 pandemic has significantly altered the approach to residency education, with virtual-based platforms being used for surgical training in many specialties such as ophthalmology.

Purpose:

To describe a virtual suturing curriculum as an effective method of ophthalmology surgical training for residency education.

Methods:

A flipped classroom methodology was utilized. The residents underwent two virtual sessions of both group discussion and wet lab breakout rooms with oculoplastic attendings using the Zoom video platform. Residents were graded on suturing technique prior to suturing instruction and at the final performance evaluation. The difference between the average pre and post final performance scores was analyzed using a paired t-test. Residents were given a survey regarding the effectiveness of the virtual training structure.

Results:

At the final recital, the average general technique, artistic interpretation and surgical confidence score was 7.0/9, 3.5/5, 3.6/5, respectively (range 2-9, 2-5, 2-5). Significant differences were seen between untimed categories ($p = 0.27$) but not with timed performance ($p = 0.47$). All six residents agreed that their surgical confidence improved following the course.

Conclusions:

Our study validates the effectiveness of suture training through a synchronous and interactive virtual curriculum which can be used as a future platform for surgical education.

A Virtual Curriculum in Artificial Intelligence for Ophthalmology Residents

ELEANORE KIM, MD*; DYLAN STEVENS, MD; LAMA AL-ASWAD, MD

Background:

Our residency program developed an expert-led virtual curriculum in artificial intelligence to formally introduce ophthalmology residents to the field of machine learning to enhance didactic opportunities during the COVID-19 pandemic.

Purpose:

To assess the utility of a virtual introductory curriculum in artificial intelligence for ophthalmology residents in a virtual setting.

Methods:

A lecture series on artificial intelligence (AI) and its specific applications within the field of ophthalmology was developed. The curriculum was designed for the virtual setting during the COVID-19 pandemic. A pre- and post-curriculum survey was distributed to all ophthalmology residents, with focus on understanding and comfort level with AI principles.

Results:

The majority of the pre-survey respondents agreed that AI will play an important role in healthcare. Results indicated discomfort with AI nomenclature. 58% of respondents agreed that formal AI education would help in their future career. The majority of post-survey respondents indicated that they felt comfortable with AI nomenclature after the curriculum. 80% of respondents agreed that they understood the limitations of AI.

Conclusions:

AI curricula for ophthalmology residents is a novel area. Formal didactics can be created and are amenable to a virtual format. Survey results suggest utility in involving residents in education about this emerging field.

Evaluation of Urgent Visits Through a Tele-Triage System During the COVID-19 Pandemic

**NITA VALIKODATH, MD, MS*; ARTHUR CHANG, MS; EMILY COLE, MD, MPH; TALA AL-KHALED, MD;
ROBISON VERNON PAUL CHAN, MD, MSC, MBA, FACS; ANGELICA SCANZERA, OD**

Background:

During the COVID-19 pandemic, a tele-triage system utilizing patient responses collected from web-based surveys and remote provider triage was developed.

Purpose:

To describe symptoms, diagnoses, and referral patterns for urgent visits.

Methods:

Retrospective study from April to June 2020. Descriptive statistics and bivariate logistic regression were performed.

Results:

229 of 358 submitted surveys (64%) were triaged as urgent and a total of 192 patients presented for in-person urgent evaluation. The most common symptoms were eye pain (31.3%), photophobia (29.2%), and vision loss (26.0%). Most patients were self-referred but patients with neuro-ophthalmology or oculoplastics related diagnosis were 2.8 times more likely to be referred by a provider versus self-referral (OR 2.8, 95% CI 1.1-7.3, p=0.03). The most common final diagnoses included diseases of the 1) anterior segment (39.6%) [23.7% blepharitis/dry eyes, 13.2% viral/bacterial conjunctivitis, or 6.6% corneal abrasion], 2) retina (20.8%) [20.0% proliferative diabetic retinopathy, 15.0% uveitis, and 10.0% vitreous hemorrhage] or 3) trauma (14.6%).

Conclusions:

Most urgent visits were self-referred, but providers were more likely to refer patients with a final diagnosis related to neuro-ophthalmology or oculoplastics. A broad range of pathology from blepharitis/dry eye to trauma was seen at urgent visits through the triage system.

Evaluation of an Early Departmental Response to the COVID-19 Pandemic at an Academic Medical Center

EMILY COLE, MD, MPH*; ANGELICA C. SCANZERA, OD; NITA VALIKODATH, MD, MS; CHAU PHAM, MD; THASARAT SUTABUTR VAJARANANT, MD; DEEPAK P. EDWARD, MD; JOELLE A. HALLAK, MS, PHD; YANNEK I. LEIDERMAN, MD, PHD; LAUREN KALINOSKI, MS; PETER MACINTOSH, MD; AHMAD A. AREF, MD, MBA; DEEPAK SHUKLA, PHD; POOJA BHAT, MD; ELMER TU, MD; ROBISON VERNON PAUL CHAN, MD, MSC, MBA

Background:

The onset of the COVID-19 pandemic necessitated changes to departmental protocols in order to ensure patient and provider safety while continuing to provide needed ophthalmic care.

Purpose:

To describe and retrospectively assess department protocols implemented in the first three months of the COVID-19 pandemic in four key areas: clinical care, medical education, telemedicine/tele-triage, and research activities.

Methods:

A brief summary of implemented protocols are described below.

a) Clinical care: Clinical activities were consolidated, healthcare providers were divided into rotating teams, and screening and social distancing practices were implemented.

b) Tele-triage & Telemedicine: Patients requesting an urgent visit were screened by residents working remotely using a web-based survey. A task force was created to educate and support providers utilizing telemedicine.

c) Medical education: In-person didactics were replaced with virtual lectures. Small group wet labs were led by faculty to supplement reduced surgical volume.

Results:

The initial departmental response led to reduced patient volumes and an increase in tele-education and tele-triage. Results from a survey administered to participating staff and providers will be further described.

Conclusions:

With a sustained COVID-19 response extending over many months, the initial protocols will require modifications to effectively provide long-term ophthalmic care and to ensure that trainees achieve necessary milestones in training.

COVID-19 Through Art

MAREZ MEGALLA, MD*

Background:

COVID19 is without a doubt the defining feature of 2020, the year of my residency graduation and fellowship start. A significant number of changes in the professional and humanistic life structures ensued.

Purpose:

Art (photos, essays, poetry, etc) has a role in understanding the plethora of changes and emotions that occurred over COVID19. Social media also plays a distinct role in disseminating information and art forms. I wanted to examine how those outlets helped trainees cope and the role social media played, if any.

Methods:

Survey inquiries to trainees preferably in ophthalmology but also in other subspecialties to share art forms expressing their COVID experiences. In addition, investigation through social media platforms was undertaken to determine how and what information for coping was used during the pandemic.

Results:

Various forms of art were employed, whether by uplifting commentary, pictures or the like. Social media certainly played a role in expanding the reach of these art forms.

Conclusions:

Emotional expression through the various art forms was effective in relieving stress as was the use of social media during the COVD-19 Pandemic.

Virtual Clinical Encounters in Ophthalmology for Medical Students in the COVID Era

RICKY CUI, MD*; PETER MACINTOSH, MD; DEEPAK P. EDWARD, MD; ROBISON VERNON PAUL CHAN, MD, MSC, MBA, FACS; POOJA BHAT, MD

Background:

Due to COVID-19 and institutional guidelines on in-person learning, our Ophthalmology Department revamped the medical student away rotation to accommodate learners from other institutions through a virtual curriculum. Clinical encounters were adapted for the virtual curriculum.

Purpose:

To describe and garner medical student feedback on three different approaches to the virtual patient encounter.

Methods:

Technique 1: Through Zoom, students gathered history from a patient. Using the Imaging Module 900 (Haag-Streit USA), the slit lamp examination was projected onto a monitor with Zoom screen-share to live stream the examination for students.

Technique 2: Through Zoom, students gathered history from a patient, observed the physical examination, and discussed the clinical findings and the case.

Technique 3: Using Microsoft PowerPoint and Zoom, the attending presented a case with clinical exam photos followed by discussion.

Data was collected from 6 out of 9 students who responded to a post-rotation survey.

Results:

Students preferred Technique 1. They appreciated seeing the pathology in real time. Students recommended more of these sessions for future learners.

Conclusions:

Patient encounters that involve visualization of ocular pathology in real-time is a preferred technique by student learners in a virtual setting.

Applicants Don't Know What They Don't Know When it Comes to Interviewing Virtually

BENJAMIN STEREN, BA*; WENDY LINDERMAN, MD; CHRISTOPHER TENG, MD; JESSICA CHOW, MD; NINANI KOMBO, MD

Background:

Virtual interviews have not been widely implemented in medical education recruitment. Due to the COVID-19 pandemic, the AMA and ACGME have recommended that all interviews for this application cycle be conducted virtually.

Purpose:

The purpose of this study is to assess the efficacy of mock virtual interviews for those applying to ophthalmology residency and fellowship during the 2020-2021 application cycle.

Methods:

Five medical students and two residents participated in a recorded virtual interview practice session with ophthalmology faculty. These participants completed surveys after their mock interview to self-assess their performance. They then reviewed the video recording and completed the same survey. The survey assessed factors unique to virtual interviews such as camera set up, lighting, sound, etc.

Results:

Participants felt significantly worse about their overall interview performance after completing and reviewing a single mock interview.

Conclusions:

Applicants this cycle are unaware of their virtual interviewing deficiencies until they practice and receive feedback. These results are a confirmation of the known Dunn-Kruger phenomenon, that is that "people tend to hold overly favorable views of their abilities." Increased practice and feedback during this interview cycle may offset unknown or unperceived weaknesses.

Impact of Provider Biases Towards SLT for Open-Angle Glaucoma Patients in a Resident Clinic

MICHAEL IZZO, MD*; REENA GARG, MD

Background:

Regardless of the proven benefits of selective laser trabeculoplasty (SLT) for open-angle glaucoma (OAG), it is estimated that only 5% of eligible patients have been treated with SLT. These treatment patterns may be explained by provider misconceptions.

Purpose:

To determine what provider biases limit SLT referral in a resident clinic.

Methods:

SLT referral rates were determined by retrospective chart review on all OAG patients treated in 2019. Residents and attendings were then given an anonymous 12-point electronic survey to determine attitudes towards SLT, quantified by numerically rating level of agreement with provided statements. Survey results were compared by T-test.

Results:

SLT was performed on 3.06% (50 eyes, 38 patients) of all eyes with OAG. Most frequently, SLT was performed for severe stage OAG (76.0%). 22 providers (10 attendings, 12 residents) responded to the survey. Attendings more frequently discussed SLT with candidates (p=0.012) and had a lower threshold to refer patients on less drops (p=0.024). Attendings may perceive that SLT performed by residents is not as effective (not statistically significant, p=0.187).

Conclusions:

SLT was performed primarily for severe stage OAG at a lower rate than the national average, potentially due to resident and attending misconceptions which may be representative of ophthalmology training programs nationwide.

Characteristics of Ophthalmology Residency Applicants Who Have Personal Recommendation Correspondences Sent on Their Behalf

MILES GREENWALD, MD*; JOHN L. CLEMENTS, MD; THOMAS S. HWANG, MD

Background:

Our residency program underwent a review of our applicant evaluation process in order to identify potential sources of bias.

Purpose:

To assess the characteristics of ophthalmology resident applicants at one institution who had personal recommendations sent on their behalf outside of the SF Match.

Methods:

Review of all residency program applications received at Oregon Health and Science University (OHSU) for the 2019 application cycle.

Results:

524 applications were received during the 2019 cycle, of which 46 were from self-reported underrepresented minority (URM) groups (8.8%). 39 applicants (6.5%) had communications written to the application committee on their behalf that were separate from their required letters of recommendation. Of these, 37 letters were sent on behalf of a non-URM applicants (7.7%), 2 letters were sent for URM applicants (4.4%).

Conclusions:

Communications on behalf of applicants occurred at a lower rate for URM applicants compared with non-URM applicants. Attention should be paid by program directors to the potential for introduced bias against URM applicants with these types of communications.

"Got Faculty Lounge?"- A four-year Experience with a Departmental Faculty Development Program

LEAH REZNICK, MD*; AIYIN CHEN, MD; DANIEL KARR, MD; JANICE VRANKA, PHD; THOMAS HWANG, MD

Background:

The call to be a clinician, educator, and researcher while modeling joy of medicine is challenging. A faculty development program can potentially enhance learning and prevent burnout. The Casey Eye Institute has offered an open-access, community-based faculty development program called "faculty lounge," with a focus on wellness, the promotion and tenure process, and key education-related content.

Purpose:

To evaluate the effectiveness of the faculty lounge.

Methods:

Five ophthalmology faculty led bi-monthly one-hour sessions open to the 88 faculty members. Participation was voluntary. The study assessed the 1) fulfillment of the ACGME faculty development requirements; 2) program's impact on faculty promotion; and 3) level of voluntary participation.

Results:

The faculty lounge met ACGME requirements by providing faculty training on contemporary teaching techniques, quality improvement projects, and stress management. Between 2011-2015, 4.6 faculty/year successfully applied for promotion, which increased to 5.5 faculty/year per after the program started (2016-2019). 20/23 promoted faculty between 2016-2019 participated in the program. Attendance averaged 30 faculty a month (34%), demonstrating significant voluntary participation by the faculty.

Conclusions:

A community-based faculty development program can fulfill ACGME requirements, support faculty promotion, and provide an enriching community valued by the faculty.

The Ophthalmic Hospitalist: An Emerging Model for Inpatient and Emergency Room Consultation

DONNA KIM, MD*; MAGGIE HYMOWITZ, MD

Background:

The ophthalmic hospitalist is an emerging model for addressing challenges related to hospital-based consultation at academic institutions, including timely, high-quality coverage and resident supervision. Until recently, little collaboration has been available among these ophthalmic hospitalists. A new organization called Ophthalmic Hospitalist Interest Group (OHIG) has sought to provide a forum for collaboration and awareness of the model.

Purpose:

To assess the effectiveness of the Ophthalmic Hospitalist Interest Group.

Methods:

The organization was founded on January 2020 and introduced to the wider community through the program directors' listserv. The group provided a website, monthly newsletters, virtual webinars, as well as an e-mail listserv. We assessed the participation and affiliation types of the members as well as the core content of educational material.

Results:

As of October 2020 there are 61 ophthalmologists in OHIG, representing 3 countries. 54% have academic affiliation and 46% are community-based. The content of the newsletters include contemporary issues in ophthalmic consultations including response to the COVID-19 crisis, review of consult based literature, resident education, and cases of interest that are unique to hospital-based settings. There is a high level of engagement and growing membership.

Conclusions:

OHIG is effective in engaging ophthalmologists interested in hospital-based care by providing key contents of interest and community, while expanding the awareness for this new model of consultation.

Oculoplastic Fellow Education during the COVID-19 Crisis

NATALIE A. HOMER, MD*; ELIZA EPSTEIN, MD; MARIE SOMOGYI, MD; JOHN W. SHORE, MD

Background:

In March 2020, the American Society of Ophthalmic Plastic and Reconstructive Surgery (ASOPRS) recommended suspension of all elective oculofacial patient care, imparting unprecedented interruptions in fellowship training.

Purpose:

We surveyed ASOPRS fellows and program directors to assess the impact of COVID-19 on fellowship education.

Methods:

An electronic anonymous survey was circulated via email.

Results:

Forty ASOPRS fellows (70.2%) participated. During COVID restrictions, all fellows participated in surgeries, including orbital biopsy (77.5%), eyelid lesion excision (70.0%) and temporal artery biopsy (57.5%). ASOPRS fellows wore surgical (85.0%) or N-95 (40.0%) masks, gloves (80.0%) and eye protection (62.5%) during patient evaluations. Most ASOPRS fellows (87.5%) participated in virtual interinstitutional education sessions and wished to continue these long-term.

ASOPRS fellows felt restrictions to have a mild (72.5%)-to-moderate (27.5%) impact on their overall training, and most (75.0%) felt their surgical confidence to decline. Fellowship program directors also asserted a mild (72.2%), moderate (19.4%) or significant (5.6%) impact on subspecialty training, and 94.4% predict adverse effects on graduation case logs.

Conclusions:

During the COVID-19 restrictions most ASOPRS fellows participated in emergent clinical activities and novel telemedicine curriculum. Most fellows and preceptors expressed concern regarding a negative impact on overall subspecialty education and surgical confidence.

Evaluation of a Neuro-Ophthalmology Curriculum for Ophthalmology Residents

AMANDA HENDERSON, MD*; JING TIAN, MS; PRADEEP Y. RAMULU, MD, PHD

Background:

Resident curricula use a combination of methods (eg, reading materials, clinical rotations, asynchronous and synchronous didactics) to present information, some of which may be more effective for resident learning.

Purpose:

To evaluate educational methods and other factors (PGY rank, OKAP score- neuro subsection, didactic attendance) affecting ophthalmology resident knowledge and to measure mastery of neuro-ophthalmic topics.

Methods:

Assessment quizzes were developed and administered to residents over 3 academic years at a single center. 1,375 responses from 24 residents were evaluated.

Results:

Residents performed better on assessments after their neuro-ophthalmology clinical rotation than before (mean 72% vs 79% correct, p=0.018). There was a trend toward improved performance from PGY2 to PGY3 year (mean 72% vs 77% correct, p=0.099) but no difference thereafter. Resident performance was better when information was presented with live than pre-recorded teaching (p=0.0007) and recommended reading (p=0.049), and with pre-recorded lecture than recommended reading (p=0.0013). Improved quiz performance correlated with higher OKAP score (p=0.027). There was a trend toward improved OKAP performance with more didactic session attendance. Residents demonstrated significantly higher-level mastery of some topics than others.

Conclusions:

Residency curricula may benefit from more synchronous instruction, as well as emphasis of certain topics.

Cadaveric Simulation Improves Ophthalmology Resident Confidence and Preparedness for Emergent Ophthalmic Procedures

ANDREA TOOLEY, MD*; MIN JUN HUR, MD; NIRUSHA LACHMAN, PHD; ANDREW J. BARKMEIER, MD

Background:

Procedural simulation improves trainee preparedness and confidence in performing emergency procedures. We developed a cadaver-based program to teach six essential surgical procedures for ophthalmology residents.

Purpose:

The aim of this study is to describe the program and to assess self-reported trainee confidence and preparedness for performing common emergent ophthalmic procedures before and after participation, over a 3-year period.

Methods:

A surgical simulation course consisting of didactics, procedural demonstration, and a skills check-off for six common emergent ophthalmic procedures: lateral canthotomy/cantholysis, margin-involving eyelid laceration repair, lateral tarsorrhaphy, anterior chamber paracentesis, vitreous tap and inject, and retrobulbar injection, was conducted annually for ophthalmology residents and medical students at a single institution. Data were collected over a three year period and included a pre- and post-course survey. Primary outcomes were self-reported comfort levels in performing the procedures before and after the course on a scale from "1=not at all comfortable" to "4=very comfortable."

Results:

A total of n=36 and n=34 participants completed the pre-survey and the post-survey, respectively. Medical students, PGY1, and PGY2 residents reported minimal prior experiences observing, assisting, or performing the procedures. For all levels of training, post-intervention confidence and self-assessment of preparedness was significantly increased, with the largest improvement observed in lower level trainees. The majority of participants (62%) reported that skills acquired from formal cadaveric simulation were "extremely useful," while 32% found these skills "very useful."

Conclusions:

Cadaver-based surgical simulation significantly enhanced resident confidence related to performing procedures. Early exposure may improve confidence while on call and surgical readiness. Additionally, simulation can be used to identify residents requiring greater intervention for improving surgical skills earlier in training.

Information-gathering in the U.S. Ophthalmology Residency Application Process

JOY JIN, AB*; SARAS RAMANATHAN, MD

Background:

The impact, importance, and use of digital media by applicants to U.S. ophthalmology residency programs is not well-examined.

Purpose:

This study evaluates the relative importance of digital platforms on information gathering and decision making during the ophthalmology residency application process.

Methods:

In this cross-sectional survey, all 422 applicants to the UCSF ophthalmology program during the 2019 SFMatch for ophthalmology were invited to participate in a 19-item electronic questionnaire.

Results:

67 of 422 applicants' responses revealed that away rotations were the most important mechanism to learn about programs. A majority of applicants (69.7%) report program websites, Doximity, and residency program emails as important sources of information. The most sought-after points include numbers of residents accepted per year (51.5%), resident alumni placement (41.2%), and current resident listing (32.4%). Applicants use digital platforms mostly (89.6%) to read content, rather than commenting or asking questions.

Conclusions:

Away rotations are the most important information source to ophthalmology residency applicants and influence the programs to which they apply, interview, and rank. Residency program websites, Doximity, and program emails are influential in applicants' decision-making and offer an important tool for outreach. Other social media resources are a less important source of information to applicants.

Effects of COVID-19 on Patient Characteristics at a Resident-Run Ophthalmic Clinic in New York City

DUAA SHARFI, MD*; MARY LABOWSKY, MD; DOUGLAS FREDRICK, MD; PAUL SIDOTI, MD; JAMES TSAI, MD; HARSHA S. REDDY, MD

Background:

NYEE-MS is the largest volume clinic in New York city and one of the largest resident-run clinics in the country.

Purpose:

Here we share our experience, interventions and outcomes observed in during the height of pandemic at our clinic.

Methods:

This was an observational study of outpatients seen between March 2nd and April 12th and patients scheduled for surgery between March 1st and March 31st. Patient demographics, chief complaints and indications for surgery were abstracted by electronic chart review.

Results:

Patient volume decreased from 114 to 23 patients/day after triage implementation. Prior to the intervention, 31% of patients were over the age 65. As the pandemic progressed, 20% of patients seen were over age 60, and less than 1% over age 80. The most common chief complaint and diagnosis were ocular pain (35%), and acute corneal pathology (32.6%) respectively. Prior to policy implementation, 648 procedures were scheduled, This decreased by 90.6% to 61 total cases scheduled after triage protocols. The most commonly scheduled procedures were retinal repair surgeries (55.7%).

Conclusions:

Our paper illustrates our efforts to protect patients and providers; and their implications on daily clinical and surgical practice.

Teleophthalmology in Resident Education: a Pilot Study in the Emergency Department (ED)

MICHAEL FLIOTSOS, BS*; ABDULAZIZ ALAQUEEL, BS; SIDRA ZAFAR, MBBS; MICHAEL V. BOLAND, MD, PHD; DIVYA SRIKUMARAN, MD; FASIKA A. WORETA, MD, MPH

Background:

Telemedicine has the potential to assist with delivery of ophthalmology services in the Emergency Department (ED). However, the utility of teleophthalmology in resident education has not been explored.

Purpose:

To describe the implementation of a teleophthalmology tool in resident education at our institution.

Methods:

Five first-year ophthalmology residents were trained on the use of a TopCon 3D OCT-1 Maestro System device in capturing fundus photos and optical coherence tomography (OCT). The device was utilized to evaluate patients presenting to the ED and communicating findings to the on-call fellow or attending.

Results:

From December 1st, 2019 to May 25th, 2020, the device was used to assess 56 unique patients, capturing 453 fundus photos and OCT images. The device was utilized most commonly for pathology of the optic nerve, such as papilledema (22%) and acute optic neuropathy (9.8%); this was followed by assessment of new-onset visual acuity/visual field defects (18%), visual changes relating to diabetic retinopathy with or without hemorrhage (13%), and retinal tear/detachment (n=5, 9%).

Conclusions:

Teleophthalmology tools hold promise for use by residents in triaging patients presenting with ocular concerns in the ED.

Prevalence of Incivility Between Ophthalmology and Emergency Medicine Residents

MICHAEL FLIOTSOS, BS*; SIDRA ZAFAR, MBBS; DIVYA SRIKUMARAN, MD; LINDA REGAN, MD, MED; FASIKA A. WORETA, MD, MPH

Background:

The prevalence of incivility in the formative years of residency is not known.

Purpose:

To assess the prevalence of incivility between emergency medicine (EM) and ophthalmology residents during Emergency Department (ED) consultations.

Methods:

We administered validated surveys measuring civility and respect (CREW Civility Scale) and incivility (Workplace Incivility Scale) to ophthalmology and EM residents at a single institution.

Results:

Equal percentages of ophthalmology (13/15, 86.7%) and EM (42/48, 87.5%) residents participated (overall response rate 55/63). Most residents (47/55, 85.5%) reported some degree of incivility in the ED setting. All ophthalmology residents reported incivility, compared to 80.9% of EM residents (p=0.03). Residents most often reported incivility during routine (non-urgent) consults (68.1%) or requests for arrangement of inpatient admissions (11.6%). Residents most often attributed incivility in the ED to stress (30.9%), loss of empathy/burnout (25.2%), or attempts to shift responsibility to another party (23.7%). The proportion of women overall reporting some degree of incivility (100%) was statistically higher than the proportion of men reporting some degree of incivility (77.4%, p=0.03).

Conclusions:

Incivility is prevalent among physicians-in-training in the ED setting. Given its associations with adverse outcomes and burnout, early interventions to decrease incivility are warranted.

Resident and Patient Experiences in an Ambulatory Ophthalmology Urgent Care Clinic

SALLY PARK, BS*; JEFF WU; BRYAN ZARRIN, MD; ROHIN VIJ, MD; JEE-YOUNG MOON, PHD; JEFF SCHULTZ, MD; ANURAG SHRIVASTAVA, MD

Background:

The Henkind Eye Institute at Montefiore Medical Center developed a resident-staffed ambulatory urgent care center ("clinic") to improve patient access and offer residents a unique supervised learning experience.

Purpose:

To evaluate patient volumes, logistics, and the clinical scope of same-day ophthalmology ambulatory clinic patients compared to those accessing care via the emergency department ("ED").

Methods:

This retrospective quality improvement study systematically reviewed electronic medical records between February 2019 and January 2020. Patients with new eye complaints presenting directly to the clinic were compared to those referred from the ED on various metrics including presenting diagnosis, visit duration, and ancillary test orders.

Results:

A total of 3,700 visits were analyzed, which equated to approximately 15 unique new patients daily. Common presenting diagnoses were trauma (n=343, most commonly surface abrasion n=196), infectious conjunctivitis (n=308), and dry eyes (n=306). Intuitively, most trauma patients (58.3%) were referred to the clinic from the ED, whereas 76.8% atraumatic patients presented directly to the clinic. Patients spent an average of 160.3+/-84 minutes (range 5-973) in clinic, while patients referred from ED spent extra 290.7+/-226.4 minutes (range 4-1414) in the ED.

Conclusions:

A same-day ambulatory ophthalmic clinic provides convenient and efficient care, while providing a broad and effective learning environment for residents.

Ophthalmology Educator Attitudes Towards Gender-specific Mentorship

MEGAN PAUL*; MONICA DWECK; NISHA CHADHA, MD

Background:

While medical students entering surgical subspecialties report positive experiences with mentors, in particular one of the same gender, this trend has not been explored in ophthalmology.

Purpose:

To explore AUPO member attitudes towards gender-specific mentorship as a group frequently involved in mentorship.

Methods:

A 22-question survey was sent to AUPO Chairs, PDs and MSEs. Responses were analyzed using Student's T-tests and chi square tests.

Results:

74 members responded, including 17 of 135 Chairs (12.6%), 34 of 106 PDs (32.1%), and 30 of 75 MSEs (40%). 55.4% respondents identified as female and 44.6% as male.

Male and female members had approximately 47.9% and 47.6% female mentees, respectively (p=0.451). 21.2% of male and 56.1% of female members agreed that a mentee of the same gender was important (p<0.01). Furthermore, 13 of 40 female members (32.5%) reported having a significant female mentor.

Conclusions:

Male and female AUPO members reported no difference in the ratio of female mentees. However, female members were more likely to feel gender-specific mentorship was important, with one-third also reporting having a significant female mentor themself. These trends suggest that gender-specific mentorship occurs within ophthalmology, which may contribute to recruitment of a diverse group of future ophthalmologists.

Racial/Ethnic and Gender Diversity in Ophthalmology: Trends from 2011 to 2019

UGOCHI AGUWA, BA*; CHIBUZO J. AGUWA, MPH, MHS; GABRIEL I. ONOR; JOSEPH CANNER, MHS; DIVYA SRIKUMARAN, MD; FASIKA WORETA, MD, MPH

Background:

The proportions of underrepresented minorities (URMs) and women in ophthalmology lag behind those of the U.S. population. While diversity trends have been studied in other specialties, there is a dearth of literature examining trends in ophthalmology.

Purpose:

Investigate trends in the demographics of URMs and women residents in ophthalmology and other surgical specialties from 2011-2019.

Methods:

Data from the Accreditation Council for Graduate Medical Education (ACGME) yearly reports was extracted, and linear trends were examined by chi-square test for trend.

Results:

For ophthalmology, the percentage of URMs increased from 4.7% to 5.8% (% change 0.255; 95% CI 0.078 to 0.433) while that of surgical specialties decreased (% change -0.149; 95% CI -0.206 to -0.091). Additionally, the percentage of women in ophthalmology decreased from 41.5% to 39% (% change -0.451; 95% CI -0.844 to -0.059) while that of surgical specialties increased (% change 0.337; 95% CI 0.240 to 0.433).

Conclusions:

Although the percentage of URMs in ophthalmology is lower than that of the general population, ophthalmology has shown positive improvements relative to other surgical specialties. However, there has been a downward trend in the percentage of women. These findings can inform initiatives to improve diversity in ophthalmology and address entry barriers for diverse applicants.

Applicant Selection Process for Residency Interviews: a Pilot Survey

ALEX PHAM, BS*; MICHAEL J. FLIOTSOS, BS; JOSEPH COFRANCESCO JR.; FASIKA A. WORETA, MD, MPH

Background:

Though the resident selection process has been well described, the methods by which programs determine which applicants are granted interviews are not clear.

Purpose:

To identify methods residency programs use to determine who receives an interview invitation.

Methods:

A validated survey was distributed to all residency program directors at the Johns Hopkins University School of Medicine.

Results:

The response rate was 79% (19/24). 63% of residency programs received up to 600 total applications. 58% of programs have a separate screening committee, distinct from the interviewing committee. 53% divide applications among multiple committee members and 63% utilize a standardized rubric. Most programs (79%) have multiple independent reviewers for each application (mean number of reviewers 2.4 ± SD 1.1; range 1-5). The most important factors, considered on a 5-point Likert-scale, were grades in rotations of the application field (4.32 ± 1.03) and the Medical Student Performance Evaluation (4.05 ± 0.83). Following initial screening, the program director most frequently makes the final decision (45%).

Conclusions:

Given the increasing number of applications that residency programs must review, exploring best-practices for interview selection across different specialties may be beneficial for program directors.

Implementation of a Virtual Medical Student Curriculum in Ophthalmology

RICKY CUI, MD*; POOJA BHAT, MD

Background:

The institutional restrictions on in-person learning due to the COVID-19 pandemic resulted in revamping of the medical student away rotation into a virtually delivered curriculum to accommodate learners from other institutions.

Purpose:

To present a virtual away rotation curriculum encompassing patient encounters, for medical students interested in pursuing ophthalmology residency.

Methods:

The four week virtual away rotation covered two subspecialties each week with focused e-reading assignments for each subspecialty, assigned clinical vignettes and live teaching rounds with subspecialty faculty each week via Zoom. Clinical patient encounters were held using a slit lamp camera and Zoom. Students participated in departmental activities such as chief resident teaching rounds, resident lectures, and Grand Rounds. At the conclusion of the rotation, students underwent assessments based on an oral presentation, oral and written exam. Students participated in pre- and post-rotation surveys.

Results:

Eight surveys were completed between July and September 2020. Results from these surveys with a focus on perceived competency in the subspecialty areas covered within the virtual curriculum will be further described.

Conclusions:

With the COVID-19 pandemic anticipated to extend over several months, medical students can continue to gain exposure to ophthalmology through a structured virtual curriculum.

US News Ophthalmology Hospital Rankings and Research Productivity

JOHN C. LIN*; ALLISON J. CHEN, MD, MPH; INGRID U. SCOTT, MD, MPH; PAUL B. GREENBERG, MD, MPH

Background:

Although US News & World Report (US News) rankings are widely used by the public, residency applicants, and ophthalmologists, the role of quality of care, research productivity, and other factors in the ranking system is unclear.

Purpose:

The aim of this study was to identify the relationship between US News ophthalmology ranking and objective measures of research productivity.

Methods:

Faculty size, total faculty publications, and average faculty publications were obtained for all ophthalmology hospitals listed by US News from a previous study in 2016. We retrospectively searched public records for total clinical trials of any phase, total National Institutes of Health (NIH) funding, and total National Eye Institute (NEI) funding. Based on US News' numerical rankings, top 12 hospitals were classified as Group A. The remaining 26 were not numerically ranked by US News and were categorized as Group B. Odds ratios were calculated for associations of Group A status with measures of research productivity through univariate and multivariate logistic regressions.

Results:

Two objective measures of research productivity were independently associated with Group A status after multivariate logistic regression analysis: average faculty publications [OR: 6.13, 95% CI: (1.14-32.94)] and total clinical trials [OR: 8.77, 95% CI: (1.39-55.16)].

Conclusions:

Objective measures of research productivity were associated with higher US News ophthalmology ranking, indicating that US News ranking may be a good proxy for a department's contribution to research.

Patterns in Ophthalmology Referrals Before and After the Institution of a Regional Call Center

ISABELLE DORTONNE, MD*; HALEY D'SOUZA, MS; ERIC YANG, MPH; SHANNON MCCOLE, MD

Background:

Ophthalmic visits to the emergency department (ED) cost the healthcare system an estimated $2 billion dollars yearly.

Purpose:

The Regional Call Center (RCC) at our tertiary hospital was implemented in June of 2017. It allows providers from outside facilities to speak directly with an ophthalmology attending and to arrange for prompt outpatient follow-up or immediate ED transfer. This study aims to identify changes in patterns of ophthalmology referrals after the institution of the RCC.

Methods:

A retrospective chart review of a 10-month period was conducted, with over 5000 ED ophthalmic encounters included in analysis.

Results:

Among facilities formally contracted with the RCC, there was an 11% reduction in ED transfers. Half of all transfers were from facilities that are not contracted with the RCC. A third of patients were uninsured, and there was no significant difference in insurance status for patients who were transferred. 69% of all ophthalmic encounters occurred on a weekday and the majority of encounters were for non-urgent conditions.

Conclusions:

There is a need for expansion of the RCC to incorporate other area hospitals with high utilization of our hospital's ophthalmology services, to ultimately minimize healthcare expenditure.

Optimizing Surgical Skills Training for Ophthalmology Residents Using a Novel Evidence-based Curriculum

GEOFFREY NGUYEN, BA*; JAMIE PALMER, BS; EMILIE LUDEMAN, MSLIS; MORAN R. LEVIN, MD; RAMYA SWAMY, MD; JANET ALEXANDER, MD

Background:

Ophthalmology is a surgical subspecialty that requires trainees to master a diverse set of surgical skills. With the complexity of newer surgical techniques in this field, there is a need for more efficient and flexible educational methods.

Purpose:

The goal of this study was to evaluate evidence-based program adjustments to be included into a microsurgery training curriculum by conducting a systematic review and meta-analysis of the literature.

Methods:

Electronic databases including Ovid MEDLINE, Cochrane CENTRAL, and EMBASE were searched for articles involving teaching techniques in microsurgical curriculums. A random-effects analysis was performed to evaluate the effects of various teaching interventions on surgical performance.

Results:

439 studies were reviewed, and 13 studies met the inclusion criteria. All pooled results demonstrated a positive association with surgical outcomes; however, video-based education (standardized mean difference, 2.49 [95% confidence interval, 0.36 to 4.63] and stepwise teaching method (odds ratio, 3.84 [95% confidence interval, 2.66 to 5.55] interventions were the most favorable.

Conclusions:

The overall effects of video-based education and stepwise teaching interventions may be the most favorable for a microsurgical ophthalmology training curriculum. However, all interventions analyzed in this study were associated with improved outcomes and should be considered when implementing and adjusting ophthalmic surgical skills curriculums.

Medicare Reimbursement Trends for Facility Performed Ophthalmology Procedures: 2007-2020

JOSE OMAR GARCIA, MS, BS*; PATRICIA BAI, BS; JOHANNY LOPEZ-DOMINGUEZ, BS; JACK HAGLIN, BS; JOANNE SHEN, MD

Background:

There is a paucity of data regarding financial trends for reimbursement in Ophthalmology.

Purpose:

The purpose of this study was to evaluate monetary trends in Medicare reimbursement for 20 commonly billed ophthalmological procedures from 2007-2020.

Methods:

The Centers for Medicare & Medicaid Services (CMS) was queried to find 20 most commonly billed

ophthalmological procedures. Next, the Physician Fee Schedule Look-Up Tool from CMS was used to extract

reimbursement data. Monetary data was adjusted for inflation to 2020 US dollars utilizing changes to consumer price index. Average annual and total percentage change in reimbursement were calculated based on adjusted values.

Results:

The adjusted average reimbursement for all procedures decreased by 25.36% from 2007 to 2020. The greatest mean decrease was observed in photocoagulation of progressive retinopathy (-69.9%). The only procedure with an increase throughout the study period was probing of lacrimal canaliculi (+2.5%). From 2007 to 2020, the adjusted reimbursement rate for the combined procedures decreased by an average of 2.2% each year.

Conclusions:

Medicare reimbursement for included procedures has decreased from 2007-2020. Increased awareness

and consideration of these trends will be important for policy-makers, hospitals and surgeons in order to assure continued access to meaningful ophthalmological care in the United States.

Virtual Ophthalmology Elective Experience at the Duke Eye Center

JULLIA ROSDAHL, MD, PHD*

Background:

Medical students applying for competitive specialties like Ophthalmology often use visiting rotations as opportunities to increase their knowledge and experience in the specialty and explore potential residency program placements. The Duke Eye Center hosted 13 visiting medical students from July to October 2019; 74 students applied for the Ophthalmology elective at Duke via the Visiting Student Application Service (VSAS) in 2020. Due to safety restrictions related to the COVID-19 pandemic, visiting medical students could not come to the Duke Eye Center in 2020. A not-for-credit Virtual Ophthalmology Elective (VOE) was created for visiting medical students interested in Ophthalmology at Duke in 2020. The VOE was designed to accommodate 4 visiting students each during August, September, and October, for a total of 12 visiting students. These sessions ran concurrent with in-person clinical ophthalmology rotations for Duke medical students.

Purpose:

The purpose of the project is to assess the effects of a virtual ophthalmology elective on ophthalmology knowledge and interest, and to share the experiences of our department with this education program, as virtual offerings are likely here to stay.

Methods:

Anonymous survey instruments were developed to assess demographic information, course expectations, and effects of the elective experience on ophthalmology knowledge and interest for the students participating in the VOE. Qualitative feedback is also collected.

Results:

Invitation to apply for the VOE was sent to the 74 students who had applied for the in-person elective, as well as any other medical student who reached out with interest in ophthalmology at Duke. A total of 34 students applied, by emailing their CV to our course administrator. Preference was given to students without a home ophthalmology program and to under-represented minorities (9 students). Remaining spots were distributed by lottery. All 12 students who were offered spots in the VOE accepted. The VOE consists of a combination of 1-on-1 meetings with faculty and resident mentors, group meetings with faculty, virtual conferences and presentations, and access to Duke Ophthalmology virtual education offerings. Demographics will be shown using descriptive statistics and outcomes comparing pre- and post-course metrics will be shown.

Conclusions:

Medical students desire virtual elective experiences when in-person rotations are not possible. Interim feedback (August students finishing and September students starting soon) has been overwhelmingly positive from the visiting students and the Duke faculty participating in the elective. Final outcomes will be available for presentation in Jan/Feb 2021.

Ophthalmology Residency Virtual Surgical Curriculum in the COVID Era

MARGUERITE WEINERT, MD*; GRAYSON ARMSTRONG, MD, MPH; ALICE LORCH, MD, MPH

Background:

COVID-19 disrupted surgical training of ophthalmology residents in unprecedented ways.

Purpose:

To describe a novel virtual surgical curriculum for ophthalmology residents in the setting of an international pandemic.

Methods:

From March-June 2020, our program developed a virtual surgical curriculum designed to encourage in-depth cognitive understanding of cataract surgery as part of a larger virtual curriculum initiative. This was shared across all Boston-area residency programs and through the AUPO to programs nationally. Local residents were surveyed with long-term survey data pending.

Results:

We implemented a weekly two-part curriculum focused on a cataract-specific topic. First, preparatory work was disseminated with open-access online readings and video review. Second, a two-hour case-based virtual didactic was led and moderated by Boston-area cataract surgery educators. Our virtual curriculum survey (n=7/24) found most surveyed residents attended the didactic >50% of the time (86%) and found the sessions moderately to very useful (71%). All residents completed at least some of the pre-work with 57% finding it somewhat, moderately, or very useful.

Conclusions:

Innovative curricular design can allow for continued surgical training during times of clinical disruption, like COVID-19. Our novel virtual surgical curriculum successfully prepared residents to continue learning surgical skills.

Current State of MIGS and Traditional Glaucoma Surgery in Ophthalmology Residency Education

MARY QIU, MD*; MICHAEL BOLAND, MD, PHD; FASIKA WORETA, MD, MPH

Background:

The ACGME requires residents to perform ≥5 "glaucoma filtering/shunting procedures." Some MIGS count toward this requirement even in the absence traditional glaucoma surgery.

Purpose:

Describe the current state of glaucoma surgical education among residency programs in the United States.

Methods:

ACGME case log data were received for 152/488 (31%) 2018 residents from 36/115 (31%) programs.

Results:

Each procedure's mean and STDEV are listed: trabeculectomy 3.4+/-3.9, tube 5.6+/-4.1, iStent 2.8+/-5.1, Cypass 0.5+/-1.5, XEN 0.8+/-1.8, goniotomy 0.8+/-3.8, ECP 0.2+/-1.1, CPC 3.3+/-4.0. Mean traditional glaucoma surgery was 9.0 +/- 6.0, and mean MIGS was 5.2 +/- 8.9. For traditional glaucoma surgeries, 28/152 residents logged <5, and 3/152 residents logged zero. For MIGS, 98/152 residents logged <5, and 48/152 residents logged zero. Each MIGS was associated with 20 additional cataracts (p<0.001), and each traditional glaucoma surgery was associated with 46 additional cataracts (p=0.16). There was no association with VA, and no association between number of trabeculectomies, tube shunts, or total traditional glaucoma surgeries with MIGS (p>0.05 for all).

Conclusions:

The breadth and depth of MIGS experience for ophthalmology residents varies widely. Inclusion of MIGS as a distinct category in the ACGME case log system would reflect the growing role of MIGS in clinical practice and help ophthalmic educators more accurately track resident MIGS training.

Use of the Flipped Classroom for Medical Student Education in Ophthalmology During the COVID-19 Pandemic

KELLY YOM, BA*; RYAN J. DIEL, MD; PAVLINA S. KEMP, MD

Background:

The COVID-19 pandemic has necessitated a shift of medical education to online learning in lieu of traditional clinic-based rotations. The flipped classroom model shows promise as a method of learning that can be shared virtually.

Purpose:

To investigate the effectiveness of a flipped classroom approach to the primary care-focused ophthalmology clerkship delivered entirely online.

Methods:

Students who completed the two-week introductory ophthalmology clerkship from July 2019-July 2020 were surveyed. The curriculum centers on a flipped classroom model and was delivered in person prior to March 2020, after which it transitioned to an online format. The survey assessed interest in the field of ophthalmology, perceptions of the flipped classroom, and confidence in evaluating ophthalmic complaints.

Results:

Students who participated in the online clerkship were equally likely to feel comfortable with evaluating eye complaints than those who participated in the in-person clerkship, and more likely to report that the course enhanced their interest in ophthalmology. Online students were less likely to feel comfortable using the direct ophthalmoscope.

Conclusions:

Regardless of its mode of delivery, the flipped classroom model is able to impart confidence in evaluating ophthalmic complaints and interest in the field of ophthalmology to medical students.

Evaluation of Primary Ophthalmic Hospitalizations and Patient Outcomes in a Large Tertiary Hospital System

ZESEMAYAT MEKONNEN, MS*; MURTAZA SAIFEE, MD; SARAS RAMANATHAN, MD; JULIE SCHALLHORN, MD, MS

Background:

Hospitalization for primary ophthalmic diagnoses is uncommon; investigation of factors surrounding admission may help guide hospital resource allocation and improve patient care.

Purpose:

To evaluate patient characteristics and outcomes of primary ophthalmic hospitalizations.

Methods:

Retrospective study of all admissions for primary ophthalmic conditions between 2013-2019 at a university hospital system.

Results:

A total of 296 admissions were included. The mean age of the adult and pediatric admissions were 53.3±19.5 and 6.3±5.9 years, respectively. A total of 68 (23.0%) hospitalizations included ICU stay; 38 (55.9%) were due to ophthalmic specific management and 30 (44.1%) due to medical comorbidities. Active malignancy was the leading inpatient comorbidity (12.5%). The most common diagnoses were orbital (42.2%) and cornea/anterior segment (16.2%); 7.8% were due to trauma. 52.0% of patients admitted underwent an intervention; 122 (41.2%) surgical, 23 (7.8%) bedside, and 9 (3%) both. Overall, the 30-day readmission rate was 18.6%; 5.1% (n=15) of patients died within 3 months.

Conclusions:

Primary ophthalmic hospital admissions are predominately due to orbital and anterior segment pathology, and have a high rate of requiring ICU admission and surgical intervention. Admission for a primary ophthalmic condition carries a significant risk of death within 90 days.

Pearls and Pitfalls of Learning Management Systems: Lessons Learned from Two Ophthalmology Residency Programs

SEAN BERKOWITZ, BS*; NATHAN ARBOLEDA, BS; ROBERT SWAN, MD; JENNIFER LINDSEY, MD

Background:

The COVID-19 pandemic has demonstrated the importance of e-learning for which a learning management system (LMS) is optimal. Comparison of LMS use across ophthalmology residency programs has not previously been reported.

Purpose:

This project aims to compare and evaluate LMS from two ophthalmology residency programs.

Methods:

The authors have used a Moodle platform LMS for 3 years at Vanderbilt Eye Institute (VEI) and 1.5 years at Upstate Medical University (with mobile). LMS utilization was evaluated with data from activity logs, and a needs-assessment survey at VEI.

Results:

At Upstate and VEI, PGY-2 use accounted for 74.97% and 48.39% of the total usage, with 83.96% and 42.84% in the first two academic months, respectively. Across both programs, resources for call/consults and orientation/introductory ophthalmology were used most. In the VEI online survey, barriers to use included difficulty of access and navigation: 86% would be more likely to use the LMS if they could access it from their phone.

Conclusions:

Ophthalmology residents prefer an LMS that is easy to navigate. Mobile access appears to be particularly important. Though more likely to use the LMS early in training, residents at all levels utilize the system for call/consults.

Ophthalmic Knowledge Assessment Program Examination Scores Correlate With Weekly Ophthalmology Residency Quiz Scores

AUSTEN KNAPP, MD*; CAREEN LOWDER, MD, PHD; LEANNE LITTLE, MD; TANNER FERGUSON, MD; KEVIN WANG, MD, MS; ELIAS TRABOULSI, MD, MED; JEFFREY GOSHE, MD

Background:

The Ophthalmic Knowledge Assessment Program (OKAP) exam has been shown, in the third year of residency, to predict success on the Written Qualifying Examination given by the American Board of Ophthalmology.

Purpose:

We aimed to determine if a relationship exists between weekly quizzes given at our institution and resident performance on the OKAP exam.

Methods:

Average quiz scores from 81 different ophthalmology residents at a single institution were evaluated over 18 years from 2002-2019. Quizzes were scored out of ten points. Residents' OKAP scaled scores (relative to all residents taking the exam of the same year) were used. Pearson's correlation test and regression analysis were performed.

Results:

211 average annual quiz scores and associated OKAP scaled scores were assessed. The average quiz score was 6.6 (Standard deviation (SD)= 1.1) and average OKAP scaled score was 577 (SD=76). A significant positive correlation between average quiz results and OKAP scaled score was found, r = 0.697 (p < 0.001). Residents who scored higher on weekly quizzes scored higher on the OKAPS.

Conclusions:

Weekly quiz scores at a single institution strongly correlated with resident OKAP scaled scores and may signify a useful tool for evaluation of resident knowledge and prediction of success on OKAP exams.

Webinar Education in Ophthalmology during the COVID-19 Pandemic

KATHERINE JOLTIKOV, MD*; DEEPAK P. EDWARD, MD, FACS, FARVO; PETER MACINTOSH, MD

Background:

Ophthalmology education is changing amidst the COVID-19 pandemic.

Purpose:

The purpose of this study is to describe and evaluate the implementation of webinars combined with online resources for review for ophthalmology trainees.

Methods:

This is a single-center descriptive survey study. A validated survey tool was distributed 2 months after implementation of webinar education. The survey population comprised residents, fellows, and faculty in a Chicago ophthalmology training program.

Results:

Eighteen residents (100% response rate), 9 fellows (81.8% response rate) and 20 faculty members (44.4% response rate) responded to the survey. Barriers to webinar education and limitations to learning during webinars were rated as low in both groups (avg. 1.98 ± 2.04 and 2.16 ± 1.82, respectively). The educational value of the webinars was moderately well rated (avg. 7.35 ± 1.66). Interest in webinars replacing in-person lectures was neutral (avg. 5.45 ± 2.54). Faculty expressed fewer barriers ($p = 0.005$), and a higher preference to use webinar education frequently ($p = 0.003$) and instead of in-person lectures ($p = 0.009$), compared to trainees.

Conclusions:

The findings of this survey suggest that webinars in ophthalmology education are effective and feasible, with some perceived limitations.

Attitudes Towards Parental Leave and Breastfeeding During Ophthalmology Residency

GRACE REILLY, BS*; CAROLINE TIPTON, BS; PAULINA LIBERMAN, MD; MEGHAN BERKENSTOCK, MD

Background:

The Accreditation Council for Graduate Medical Education (ACGME) mandates residency programs have parental leave policies, but a lack of standardized requirements leads to inconsistencies between programs.

Purpose:

We assess resident and program director (PD) attitudes toward parental leave and examine the range of policies on parental leave and breastfeeding within ophthalmology residency programs.

Methods:

Two surveys assessing perceptions toward parental leave and breastfeeding were created for ophthalmology residents and PDs. Surveys were co-sponsored and distributed by the Association of University Professors of Ophthalmology (AUPO).

Results:

The most reported effects on training were missed surgical training and impact on research. Nearly 60% of residents reported receiving negative feedback surrounding the leave. The majority of residents felt PDs and co-residents were supportive (53.8%, 48.1%, respectively), but leave negatively affected co-residents (46.2%). PDs reporting more negative impacts on surgical training for female residents (p=0.035). Twenty-five PDs reported written parental leave policies in place at their institution. All PDs were supportive of breastfeeding, but only half reported a breastfeeding policy.

Conclusions:

National discussion on standardizing parental leave policies across ophthalmology residency programs is warranted. Residents should be provided a written plan addressing call responsibilities, meeting milestones in alignment with peers, and breastfeeding on return to clinic.

Parental Leave and Residency; Policies and Parity

REBEKAH HUFFMAN, DO*; DANIEL B. MOORE, MD

Background:

Recent research has indicated that on average female residents perform fewer operations than their male counterparts. This data showed that mean cataract volume and total procedural volume were significantly unequal; with male residents outperforming their female counterparts. The difference wasn't explained by the parental leave analysis performed.

Purpose:

In the aforementioned research, only 24 programs participated. Our goal was to further investigate parental leave policies for US ophthalmology residency programs and how these policies relate to the gender disparities in training.

Methods:

IRB exempt, anonymous survey was sent to 103 ophthalmology residency programs.

Results:

31 programs responded. The majority of programs have institutional and departmental policies about parental leave and have had residents take leave while training. Most will allow 6 weeks of leave that do not have to be made up. There are varying amounts of vacation time that can be added to their parental leave. Usually this doesn't lead to an extension of training and isn't felt to have impacted the resident's preparedness to graduate. Overall it was not felt that leave created inequity in training with co-residents.

Conclusions:

The vast majority of programs have policies regarding parental leave, these appear to widely vary and appear accepting of taking parental leave.

Interpretation of Optical Coherence Tomography by Ophthalmology Residents

ELISSE PARK, MD*; EVAN SILVERSTEIN, MD; JAMES BARNES; WILLIAM WAGNER

Background:

The purpose of ophthalmology residency is to prepare trainees to become competent, independent practitioners. Part of the training entails learning how to interpret images from various modalities including optical coherence tomography (OCT). OCT is one of the most commonly used imaging studies used in the ophthalmology clinic. It is used to aid in diagnosis and management of a multitude of ocular diseases including glaucoma and diabetic macular edema.

Purpose:

The aim of this study was to determine whether ophthalmology residents had an improved rate of identifying abnormalities on OCT images when provided with a reference (normal) OCT.

Methods:

The research team recruited participants by first contacting the program directors of all ophthalmology residency programs in the United States. After obtaining permission to email the programs' residents the survey, the residents were then sent emails with a survey link. The first page of the survey contained an informed consent form.

All residents were randomized by program and year of training to group 1 or group 2 before the recruitment emails were sent. Residents received either survey 1 or survey 2 according to their group.

Survey 1 contained images A, B, and C without a reference image, followed by images D, E, and F with a reference image.

Survey 2 contained images D, E, and F without a reference image, followed by images A, B, and C with a reference image.

The data was analyzed using the Fisher exact test for statistical computation.

Results:

A total of 47 surveys were included in the analysis. The percentage of residents who answered individual questions correctly ranged from 12.0% to 95.5%. There was no statistically significant difference in this percentage when comparing the residents who were provided the reference OCT versus those were not (p value ranged from 0.42 to 1.00). There was no statistically significant difference in the average total score on the survey between residents of different post-graduate years.

Conclusions:

Having a reference image does not improve ophthalmology residents' ability to correctly interpret OCTs. There are certain pathologies on OCT that seem to be difficult to correctly identify and trainees may benefit from further education in order to improve their ability to do so.

Results:

Data collection in progress. Preliminary results will be available for presentation at the AUPO meeting.

Conclusions:

Pending.

Improving Patient Wait times in the Emergency Department by Expanding the Resident Call Pool

JONG PARK, MD*; BRYCE HWANG, BS; JOSE DAVILA, MD; GIANCARLO GARCIA, MD; MALINI PASRICHA, MD; SUZANN PERSHING, MD

Background:

Until 2019, Stanford ophthalmology residents had a single call pool covering both Stanford and Santa Clara Valley county hospitals. The residents observed a large variability in patient wait times in the Emergency Department. In an effort to improve patient wait times, the residents proposed and implemented a second call pool.

Purpose:

To determine if expanding the resident call pool could improve patient wait times in the Emergency Department.

Methods:

Prospective, longitudinal study of Stanford ophthalmology residents from 2018-20. Residents completed self-reported questionnaires before and after expansion of the call pool. Weighted average scores were calculated for each study site.

Results:

8 questionnaires were completed each year. Before expanding the call pool, the most common patient wait time at Stanford hospital was <1 hour on weeknights and 1-2 hours on weekends. At the county hospital it was <1 hour on weeknights and 2-3 hours on weekends. After expanding the call pool, the most common wait time at both Stanford and county hospitals was <1 hour on both weeknights and weekends. There was a large decrease in wait times of >3 hours compared to the previous year.

Conclusions:

Expanding the ophthalmology resident call pool at Stanford led to improved patient wait times in the Emergency Department.

Physician Compliance with Time-outs for Clinic Procedures: A Plan-Do-Check-Act Initiative

SANA QURESHI, MD*; AMY ZHANG, MD; EMILY CHANG, MD; MOSHIUR RAHMAN, PHD; JENNIFER S. WEIZER, MD

Background:

Patient verification is a basic tenet of safe healthcare delivery. Failure to correctly identify patients can result in medication errors, testing errors, and wrong person procedures. Physicians performing procedures in clinic should use time-out checklists for patient and procedure verification, but no such widely accepted checklist exists in ophthalmology.

Purpose:

We aimed to devise, assess, and improve physician adherence to a 6-point clinic procedure time-out checklist at the University of Michigan, Department of Ophthalmology.

Methods:

Eighty ophthalmology attending physicians and thirty-two residents and fellows at 4 different sites participated. A 6-point time-out checklist for clinic procedures was devised, confirming patient name, birthdate, procedure name, correct eye, procedure plan from clinic notes, and correct eye initialing. Adherence to the checklist was audited by an impartial observer who recorded the frequency at which providers correctly completed all measures, and gave immediate feedback. For non-procedural physicians, 2-point verification confirming patient name and birthdate was audited for clinic visits. Baseline data to determine level of adherence was collected, followed by educational interventions. Post-intervention data was then collected, followed by a second educational effort and then a collection of post-adjustment performance data.

Results:

For the 6-point procedure checklist, the "perfect score" rate at baseline, post-intervention, and post-adjustment was 87.9%, 92.7%, and 94.9% respectively. Increased adherence was seen in confirmation of birthdate, previous note procedure plan, procedure verification, and eye initialing. Two-point verification of patient name and birthdate improved from 87.9% at baseline to 100% at both post-intervention and post-adjustment phases.

Conclusions:

Eye care providers at the University of Michigan displayed continued improvement in adherence to time-out checklists for clinic procedures throughout the study period. Implementation of interventions helped to increase compliance rates to 100% for most checklist components.

A Sustainably Responsible Retina Rotation: Initiating Recycling in the Intravitreal Injection Room

SHEENA KHANNA, MD*; SELENE HERNANDEZ, COA; JHANSI RAJU, MD

Background:

Healthcare associated waste is reported to exceed 4 billion tons per year. As physicians, we have the opportunity to be leaders in our field by implementing sustainable practices to reduce waste and increase recycling. Ophthalmology clinics have a unique opportunity to address clinic waste generated by in-office procedures such as intravitreal injections.

Purpose:

The minor procedure room in the eye clinic at Hines VA Hospital is the site of 3,000-4,000 intravitreal injections per year. The purpose of this quality improvement project was to consciously reduce waste by initiating recycling of materials generated during intravitreal injections.

Methods:

Injection procedure supplies were investigated to determine which paper and plastic packaging materials were recyclable. Blue recycling bags and containers were obtained from the Hines Environmental Management Services department and appropriately positioned within the procedure room to facilitate accurate recycling of materials. Staff including technicians, residents, and attending physicians were educated about the new protocols for disposing of materials used during injections.

Results:

A recycling program was initiated and implemented in the Hines VA eye clinic procedure room. Prior to implementation of the program, 4 bags of waste were generated per day in the minor procedure room. After implementation of the program, only 1 bag of waste is generated daily and 2 bags of recyclable materials.

Conclusions:

Reducing waste and increasing recycling has both environmental and financial benefits for the clinic and hospital. Implementing a procedure room recycling program can serve as a launch point for recycling in other areas of the clinic such as the break room. By implementing a recycling program, we are addressing our civic duty towards sustainability and protecting the earth.

RESIDENT QI WINNER

Flipped Ophthalmology Classroom Augmented with Case-Based Learning

RYAN DIEL, MD*; KELLY YOM, BS; KARAM ALAWA, MD; JUSTINE CHENG, MD; SALMA DAWOUD, MD; DAVID RAMIREZ, MD; MICHELLE R. SNYDER; PAVLINA S. KEMP, MD

Background:

The flipped classroom is an effective way to teach ophthalmology; however, learners feel anxiety and burden while educators battle increased preparation time.

Purpose:

Examine medical students' perceptions of a case-based flipped classroom compared to traditional didactic lecture series and evaluate the impact of case-based learning on students' confidence managing common ophthalmic complaints.

Methods:

We created an interactive case-based flipped classroom curriculum. Paired pre-/post-clerkship surveys used a 6-point Likert scale.

Results:

75 students were included. Pre-clerkship questionnaires revealed no preference for either teaching modality. Wilcoxon Signed Rank test comparing pre-/post-data revealed a significant increase in student ratings favoring the case-based flipped classroom model. Students reported significant reductions in pressure to perform, course burden, and overall anxiety; and increased confidence triaging common eye complaints. Our 6 case-based modules have since been viewed or downloaded over 2,000 times by users across the world.

Conclusions:

Students favor the case-based flipped classroom modality, which prioritizes key learning objectives while increasing participation and confidence. The reproducibility and accessibility of standardized prepared video lectures and cases will help other institutions better incorporate ophthalmology into pre-existing rotations. Because this model utilizes electronic lecture delivery and synchronous discussions, this model provides a sustainable and efficacious curriculum as educators adapt to the COVID-19 pandemic.

Assessment of EHR-based Falls Screening in an Academic Ophthalmology Department

ARIEL CHEN, MD*; JIAWEI ZHAO, MD; PRADEEP Y. RAMULU, MD, PHD; WENDY C. SHIELDS, PHD, MPH; FASIKA A. WORETA, MD, MPH

Background:

Unintentional falls is a leading cause of fatal and non-fatal injuries in the United States. Impaired vision is a known risk factor for falls; however, falls-screening integrated into an electronic health record (EHR) has never been assessed in outpatient ophthalmology clinics.

Purpose:

To assess an electronic health records-based falls screening program at an academic ophthalmology department.

Methods:

Falls screening in the EHR was implemented at ophthalmology clinics for patients 18 years or older starting June 2016. Patients were screened with two questions: if they tripped or fell in the past 12 months and if they have difficulty with balance. If either answer was positive, patients were given information on fall prevention and home safety techniques.

Results:

212,766 patients were seen over 3.5 years. 70.2% of patients were screened for falls. 15.6% reported falling, 14.9% reported balance difficulties, and 28.7% reported both. Patients in the Low Vision and Neuro-ophthalmology clinics had the highest rate of reported falls at 37.1% and 25.6% respectively.

Conclusions:

Falls screening for patients with visual impairment is particularly important due to their increased rates of falls. Future studies on interventions to reduce falls among high risk patients are warranted.

Increasing Diversity in Ophthalmology: A Report from the Mountain West

CHRISTOPHER BAIR, MD*; BRADLEY JACOBSEN, MD; JUDITH WARNER, MD; JEFF PETTEY, MD, MBA; RACHEL SIMPSON, MD; SRAV VEGUNTA, MD

Background:

Diversity in ophthalmology is lacking, with less than 7% of ophthalmology residents belonging to a group considered underrepresented in medicine (URiM). Like many institutions across the country, the Moran Eye Center (MEC) currently has no URiM residents. Diversity in the workforce leads to improved access to care and can help combat racial and ethnic disparities.

Purpose:

In order to better understand the lack of URiM residents at MEC it is imperative to review applications and determine priorities when considering residency programs. MEC values diversity in ophthalmology and is making this a priority for future applicants.

Methods:

A retrospective review of interviewee applications between 2017-2019 was completed. Objective measures from applications were recorded. In order to encourage URiM applications, we will award a $5,000 research scholarship to any URiM who matches at MEC.

Results:

URiM interviewees at MEC had an average Step 1 score of 244, an average of 4 publications, 2 oral presentations, 4 poster presentations, and 3 leadership positions. Furthermore, there has been increased interest among URiM applicants surrounding our scholarship offering.

Conclusions:

We should not accept the status quo of the shortage of URiM trainees within medicine. We will compare URiM applications to those who have matched at MEC to determine if there are actionable differences and gauge the interest generated from our scholarship offering.

Save the Date!

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