Title: Raising Gender Equity Voices: Reflections from an International Virtual Assembly in Global Surgery

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- 3 **Author names:** Letícia Nunes Campos<sup>1,A\*</sup>; Natalie Pawlak<sup>2,3,A\*</sup>, Lotta Velin<sup>4,A</sup>, Nensi Melissa Ruzgar<sup>5,A</sup>; Ayla
- 4 Gerk<sup>6,B</sup>; Kevouy Reid<sup>7,B</sup>; Habab Ali Iraqi<sup>8,B</sup>; Zineb Bentounsi<sup>9,B</sup>; Michalina Drejza<sup>10,B</sup>; Dhrumil Patil<sup>11,A</sup>; Nour
- 5 Nassour<sup>12,B</sup>; Heaven Yeshaneh Tatere<sup>13,B</sup>; Mehr Muhammad Adeel Riaz<sup>14,A</sup>; Tanya L. Zakrison<sup>15,B</sup>
- 6 \*First authors: both authors have equally contributed to this work.

7

- 8 **Degrees:** A. Medical Student; B. Medical Doctor (MD)
- 9 Affiliations: 1. Faculty of Medical Sciences, Universidade de Pernambuco, Recife, Brazil; 2. Tufts University
- 10 School of Medicine, Boston MA, USA; 3. Tufts University Graduate School of Biomedical Sciences Clinical
- and Translational Science Program. Boston, MA, USA; 4. Surgery and Public Health, Department of Clinical
- 12 Sciences, Faculty of Medicine, Lund University, Lund, Sweden; 5. Yale University School of Medicine, New
- Haven, CT, USA; 6. Universidad Católica Argentina, Buenos Aires, Argentina; 7. Department of Medicine,
- 14 Spanish Town Hospital, Medical officer, Jamaica; 8. Al-Yarmouk College of Medical Sciences, Khartoum,
- 15 Sudan; 9. University Hospital Southampton, Southampton, UK; 10. Department of Perinatology and
- Gynecology, Poznan University of Medical Sciences, Poland; 11. Baroda Medical College, Vadodara, India; 12.
- 17 University of Balamand, Faculty of Medicine, Al Koura, Lebanon; 13. Addis Ababa University, College of health
- sciences, Ethiopia; 14. Punjab Medical College, Faisalabad, Punjab, Pakistan; 15. University of Chicago,
- 19 Section of Trauma & Acute Care Surgery, Chicago, IL, USA.

2021

- **About the author:** Letícia Campos is currently a 4<sup>th</sup> year medical student at *Universidade de Pernambuco*, a six-year program. She currently is a member of the International Student Surgical Network (InciSioN) advocacy
- international team, and chair of InciSioN Brazil, the Brazilian working group affiliated with InciSioN.

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- Natalie Pawlak is a medical student at Tufts University School of Medicine in Boston, as well as a student at the Tufts University Graduate School of Biomedical Sciences, where she is earning her MSc and conducting
- 27 research as part of her TL1 research fellowship. She has also served as VP for Education on the national
- 28 leadership team for the Global Surgery Student Alliance, which is the USA affiliate branch of InciSioN.

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#### **Authors Contribution Statement:**

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Contributor Role	Role Definition	1	2	3	4	5	6	7	8	9	1 0	1 1	1 2	1 3	1 4	N A
Conceptuali zation	Ideas; formulation or evolution of overarching research goals and aims.	Х	Χ	Χ	Χ	Χ		Χ								
Data Curation	Management activities to annotate (produce metadata), scrub data and maintain research data (including software code, where it is necessary for interpreting the data itself) for initial use and later reuse.	X	Χ													
Formal Analysis	Application of statistical, mathematical, computational, or other formal techniques to analyze or synthesize study data.	X	Χ					Х							,	
Funding Acquisition	Acquisition of the financial support for the project leading to this publication.									2						X
Investigatio n	Conducting a research and investigation process, specifically performing the experiments, or data/evidence collection.	Χ	Χ	Χ	Χ	Χ		A								
Methodolog y	Development or design of methodology; creation of models	X	Χ	Χ	Χ	X		X								
Project Administrati on	Management and coordination responsibility for the research activity planning and execution.	Χ	Х			7										
Resources	Provision of study materials, reagents, materials, patients, laboratory samples, animals, instrumentation, computing resources, or other analysis tools.	X	X			À										
Software	Programming, software development; designing computer programs; implementation of the computer code and supporting algorithms; testing of existing code components.															X
Supervision	Oversight and leadership responsibility for the research activity planning and execution, including mentorship external to the core team.														Х	
Validation	Verification, whether as a part of the activity or separate, of the overall replication/reproducibility of results/experiments and other research outputs.	X	Χ	Χ	X	Χ	Χ	Χ								
Visualizatio n	Preparation, creation and/or presentation of the published work, specifically visualization/data presentation.	Х	Χ				Х									
Writing – Original Draft Preparation	Creation and/or presentation of the published work, specifically writing the initial draft (including substantive translation).	X	X	X	X	X		X								
Writing – Review & Editing	Preparation, creation and/or presentation of the published work by those from the original research group, specifically critical review, commentary or revision – including pre- or post-publication stages.						Х		Х	Χ	Х	Х	Х	X	Х	

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## Personal, Professional, and Institutional Social Network accounts.

Facebook: : https://www.facebook.com/leticia.campos.718;

https://www.facebook.com/natalie.pawlak.9; https://www.facebook.com/lotta.velin.5;

https://www.facebook.com/nensi.ruzgar; https://www.facebook.com/ayla.g.rangel;

https://www.facebook.com/profile.php?id=100005049911543; https://www.facebook.com/habab.iraqi

96; https://www.facebook.com/zineb.bentounsi; https://www.facebook.com/michalina.drejza;

https://www.facebook.com/dhrumil.patil; https://www.facebook.com/nour.nassour.9;

https://www.facebook.com/heaven.yeshaneh; https://www.facebook.com/adeel.riaz.1800;

https://www.facebook.com/tanyaliv.zakrison; https://www.facebook.com/GenderEqSurg

Twitter: <u>@Leti Campos</u>; <u>@PawlakNatalie</u>; <u>@VelinLotta</u>; <u>@NensiRuzgar</u>; <u>@ayla gerk</u>; <u>@kevouy</u>;
 <u>@habab iraqi</u>; <u>@ZinebBentounsi</u>; <u>@MichalinaDrejza</u>; <u>@patildhrumil</u>; <u>@NourNassourMD</u>;
 @hev yeshaneh; @MehrAdeelRiaz; @tzakrison; @gendereqsurg

#### **Discussion Points:**

1.	Although the current global surgery agenda promotes a spirit of collaboration, an imbalanced gender
	and geographic distribution in leadership and scholarly recognition remains, with more efforts needed
	to integrate gender equity perspectives in global surgery.

- 2. The reported conference signifies an important step to empowering low-and-middle income country health workers and gender minorities in surgical specialties in both an international and region-specific context.
- 3. Our piloted General Assembly provided a more equitable platform for idea sharing and community building, while maintaining the interactive learning and engagement of in-person experiences.
- 4. Attendees were highly interested in sessions about intersectionality, diversity, and non-Anglophone speaker perspectives, emphasizing their desire to shift away from the traditional representation of high-income country, cisgender male, and exclusively English-speaking voices.

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#### THE EXPERIENCE.

- Global surgery is an area of study, research, practice, and advocacy that seeks to improve health outcomes and achieve health equity for all people who need surgical, obstetric, and anesthesia (SOA) care.<sup>1</sup> Even though "global" promotes a spirit of collaboration, the colonial background and long history of gender inequity still influences global health.<sup>2</sup> This is evident by the imbalanced gender and geographic distribution of leadership, where only 17% of global health leaders come from low- and middle-income countries (LMICs), with women representing 5% of this amount.<sup>3</sup> This pattern extends to global surgery, where women and non-binary gendered people are underrepresented in SOA specialities.<sup>1</sup>
- In order to inform the surgical community and the public on gender disparities in SOA fields, the Gender Equity
  Initiative in Global Surgery (GEIGS) was founded in 2019, based on three pillars: research, mentorship, and
  advocacy.<sup>4</sup> Given the paucity of open-access learning opportunities on gender equity in surgery, GEIGS and
  similar organizations show potential for providing such instructional spaces. In light of the COVID-19 pandemic,
  the adaptation of conferences to virtual platforms has allowed more international colleagues and
  underrepresented members of the surgical workforce to access educational opportunities.<sup>5</sup>

## **Creating the General Assembly**

Aiming to address the gap in open-access gender equity education, GEIGS held its first General Assembly on December 12th and 20th, 2020. The agenda was centered on "Building Capacity for Gender Equity in Global Surgery." The event was carried out by an organizing committee (OC), which was selected by an open call for volunteers to all GEIGS members in October 2020. The OC was composed of 11 individuals, eight of which were female, from nine different countries, including six LMICs. This intersection of diverse perspectives was a crucial component to planning a General Assembly focused on capacity building in a truly global context.

In total, there were 199 attendees from 46 countries; a world map depicting these countries and levels of attendance by country is shown in Figure 1. Stratification of participants using the World Bank income categories shows that: 43 (21.6%) were from high income countries, 80 (40.7%) from upper-middle income countries, 54 (27.6%) from lower-middle income countries, and 19 (9.5%) from low-income countries.

The assembly featured six region-specific networking and capacity building sessions, adopting the World Health Organization regional model.<sup>6</sup> Each focused on a context-specific set of topics and challenges related to gender equity. While there is a paucity of research on the causes of gender disparities within surgical fields in LMICs, the reasons discussed by participants in these sessions echoed those discussed in previous HIC-centric studies, including: structural barriers that preserve cisgender male dominance in higher-ranking positions, overt and covert discrimination, and the lack of same-gender mentorship or adequate parental leave policies that could ameliorate this gap.<sup>7</sup>

### **Emerging Themes and Knowledge Gaps**

Despite expected differences in attendee perspectives in the regional sessions, overarching themes also emerged. One unifying topic discussed was the silencing of non-English-speaking experts from academic

conferences.<sup>8</sup> Echoing the oppressive colonially rooted history of global health, many international scientific and medical conferences continue to favor English-proficient experts for keynote speeches.<sup>8</sup> Meanwhile the availability of translating services is often lacking due to the additional costs, logistical difficulty, or lack of planning.<sup>8</sup> The gravity of how much valuable learning is lost from this practice was deeply understood following the session on gender inclusivity on Day 1, which featured speaker and transgender activist Ms. Sophie Nouveau, a member of the State LGBT Health Technical Committee of Rio Grande do Sul in Brazil. This session was able to take place because of the interconnected, international network of the OC and GEIGS, which made translation available. Not surprisingly, the session was very well-received by participants and frequently mentioned in region-specific sessions. Removing linguistic barriers in academic spheres increases access to unique perspectives, which are otherwise missed when the discourse only takes place in English.<sup>8</sup>

Another session that proved challenging to organize, mainly due to the paucity of resources, was the one focusing on "Gender Equity and National Surgical, Obstetric, and Anesthesia Plans (NSOAPs)." Despite being a central concept in global surgery, to the authors' knowledge, there are no existing or openly available educational resources focusing on the integration of gender equity indicators and NSOAPs.<sup>1</sup>

#### **Global Outreach and Social Media**

According to Twitter analytics from the GEIGS account, the General Assembly had 34 tweets but as many as 27,141 Twitter impressions (total number of views generated by original tweets and an indicator of brand presence) for the days that the event took place. While original tweets represent content creation from the OC, impressions reflect the influence of the tweets and interest from the general public to consume this information.<sup>6</sup> GEIGS Twitter impressions and engagement counts over a 60-day span that encompasses the General Assembly, as well as the days preceding and following the event, are depicted in Figure 2. On Facebook, GEIGS saw a 394% increase in video engagement and a net 8% increase in followers following the live streaming of the event. With its opportunity for instantaneous global connectivity and discussions, social media can have an important role complementary to conferences in terms of enhancing scholarly dissemination, capacity building, and professional networking.<sup>5</sup>

The "Intersectionality in Global Surgery" and the "The Value of Equity, Social Justice and Diversity in Surgical Education" sessions garnered the most attention and engagement on social media. Intersectionality is traditionally defined as the investigational framework of inequities exacerbated at the intersection of gender and race. These sessions aimed to expand gender equity in SOA fields beyond the cis-normalized gender binary view and to highlight the additional inequities at intersection with these social identities, particularly in regards to racism. To

# Conclusions

- Engaging in global surgery demands management of actor power, to promote visibility and attract stakeholders.<sup>3</sup>
- Consequently, identifying leaders who will build awareness and gather sociopolitical influence is critical. Hence
- 39 initiatives like the GEIGS General Assembly are relevant to highlight the previously neglected topic of gender

- disparities in the global surgery field and to provide capacity building, education, supportive leadership, and
- 2 diverse mentorship where these have been lacking. This conference model can be applied for other trainee-led
- 3 global surgery conferences.

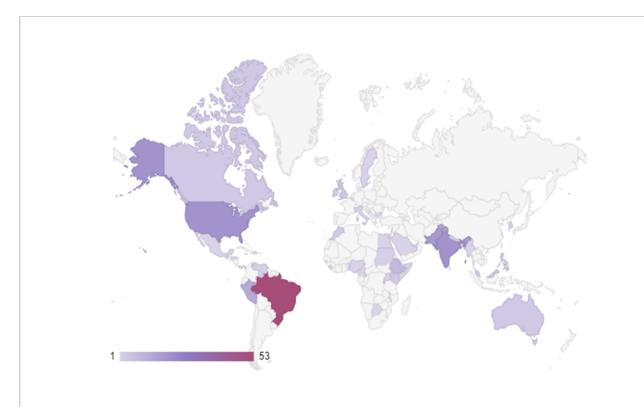


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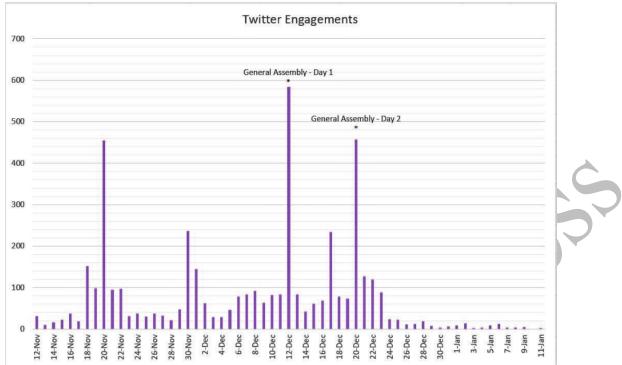
# FIGURES AND TABLES.

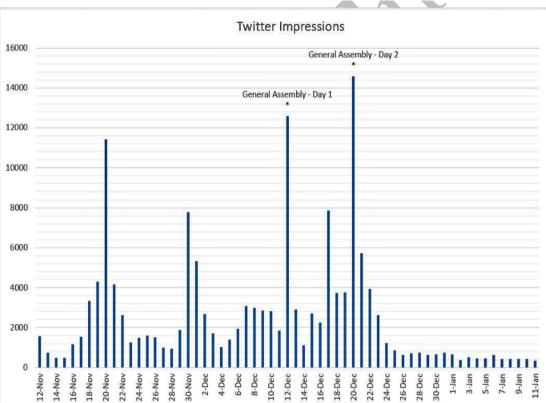
Figure 1: International Representation at the GEIGS General Assembly



This world map depicts the number of registered attendees per country and the different countries that were represented in the GEIGS General Assembly. There were 199 attendees from 46 countries.

## Figure 2: GEIGS Twitter Engagement and Impressions Before, During, and After the General Assembly





The GEIGS General Assembly social media campaign launched its first promotional materials on November 30th, with an invitation to save the date for the upcoming event. The campaign progressed in the following days with information on registration and external speakers, culminating in high levels of engagement (top) and impressions (bottom) on the days of the event.