# GENEVA FOUNDATION FOR MEDICAL EDUCATION AND RESEARCH



### **ANNUAL REPORT 2020**

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## Preface by the director

The Geneva Foundation for Medical Education and Research (GFMER) is a non-profit organization established in 2002. It is supported by the Department of Social Affairs of the City of Geneva and other Swiss and international institutions and works in close collaboration with the World Health Organization (WHO).

In 2020 the foundation and its partners launched for the eleventh consecutive year, a series of distance training/online courses on sexual and reproductive health research: a total of 310 health professionals from 55 countries attended the adolescent sexual and reproductive health training programme.

GFMER continues its active partnership with the UNFPA/WHO 'Campaign to end fistula'. The aim has been to create a 'Centre of Excellence for the prevention and treatment of obstetric fistula' in Northern Benin, which would serve other countries in the region under the name of "Tanguieta Model". During 2020, several missions were conducted in Benin, where Professor Charles-Henry Rochat (who has the overall responsibility for GFMER's fistula project) and his team of specialists, operated on a total of 288 obstetric fistula cases in different countries. Moreover, local doctors were trained on the management of obstetric fistula.

In 2020, the Geneva Foundation for Medical Education and Research (GFMER) in collaboration with the Oxford Maternal and Perinatal Health Institute (OMPHI) commenced the development of a training course "COVID-19 in pregnancy, delivery and the neonatal period" in response to the current COVID-19 pandemic which has directly and indirectly negatively impacted the health and wellbeing of mothers and their babies.

GFMER in 2020 commenced the development of a public health course on Cancer in the context of Universal Health Coverage.

GFMER has built a strong partnership with governmental and non-governmental organizations and universities for the exchange of information and expertise at international level. The website of the foundation had 2568081 page views and visitors from all over the world.

We believe our efforts to assist in many countries and the programmes we deliver contribute to improving the reproductive and sexual health status of the populations in need.

Finally, I would like to thank the City of Geneva, the World Health Organization (WHO) and other institutions, for their financial and technical support, which have ensured the successful implementation of our projects and programmes.

Prof. Aldo Campana

The Director

#### Mission

The overall objectives of the Foundation are to promote and develop health education and research programs.

GFMER has a mandate to address challenges, such as:

- The organization of training programmes in Geneva, covering research methodology, epidemiology, reproductive and sexual health, and other medical areas.
- The dissemination of the Geneva training courses in other countries.
- The initiation and provision of support for researchers to plan, conduct and publish their scientific work.
- The dissemination of medical information on Internet.
- The dissemination of clinical guidelines for use in clinical training programmes.
- The collaboration with the UNFPA/WHO programme to end obstetric fistula.

#### **Foundation Council**

- Prof. Giuseppe Benagiano (President)
- Dr. Blaise Bourrit (Secretary)
- Prof. Ana Maria Langer Glas

#### **Executive Committee**

- Prof. Aldo Campana (Director)
- Prof. Charles-Henry Rochat (Co-director)
- Dr. Karim Abawi
- Dr. Anne-Caroline Benski
- Dr. Hongguang Dong
- PD Dr. Pierre Vassilakos

#### **GFMER** main fields of activities

#### 1. Training course in sexual and reproductive health research 2020

#### https://www.gfmer.ch/SRH-Course-2020/

Since 2003 GFMER, in partnership with the WHO and other partner institutions, has organized a training course on sexual and reproductive health research. The course focuses on research methodology and attracts the participation of health professionals from different countries, particularly from developing countries. Through the pool of participants, GFMER has managed to disseminate the course in different countries.

In order to reach more health professionals, in 2010 GFMER in collaboration with WHO and other partners launched the online course on sexual and reproductive health research "From Research to Practice: Training Course in Sexual and Reproductive Health Research" that offers a training package specially developed for those health professionals involved in research, whose access to learning is limited by time, financial resources or other constraints and for whom access to quality education and learning is limited. The programme is designed to meet a wide range of contemporary issues in sexual and reproductive health, especially in developing countries. It helps students to better identify the problems related to reproductive and sexual health, it helps to improve the skills of caregivers, and it promotes good practices. To better tailor the course to the specific needs of our participants, in 2018, the course was restructured into individual modular courses "Courses on Sexual and Reproductive Health and Research" each with its own goal and objectives.

The courses form part of the WHO policy for increasing human resources in the field of sexual and reproductive health, particularly in developing countries. GFMER is mandated to organize the courses.

In 2020, GFMER successfully implemented the eleventh edition of its online training course, bringing to bear the experience gained from the previous editions.

#### Course in adolescent sexual and reproductive health 2020

#### https://www.gfmer.ch/SRH-Course-2020/Adolescent-health-participants.htm

The 2020 online training course in adolescent sexual and reproductive health: "Lessons learned and experiences gained in improving the SRH of adolescents in the 25 years since the ICPD" and "Responding to the SRH needs of adolescents in the context of the COVID-19 crisis" was held for four weeks.

Working in close Collaboration with Family Planning 2020 (FP2020), the United Nations Population Fund (UNFPA) and the World Health Organization (WHO), GFMER recruited a total of 310 health professionals from 55 countries for the course. The Course coordinator was Dr Venkatraman Chandra-Mouli of the WHO Department of Sexual and Reproductive Health & Research. Dr Raqibat Idris and Mrs Fionna Poon were the GFMER Course Manager and the GFMER Course Administrator respectively.

#### **Objectives**

The objectives of the course were as follows:

1. To review the progress made in Adolescent Sexual and Reproductive Health and Rights (ASRHR) over the last 25 years.

- 2. To examine the priorities in ASRHR for next 25 years, with a particular focus on the SDGs.
- 3. To learn about the impacts of coronavirus disease (COVID-19) on young people.
- 4. To identify approaches to respond to the SRH needs of adolescents during the COVID-19 crisis, that are appropriate to one's context.

#### **Course participants**

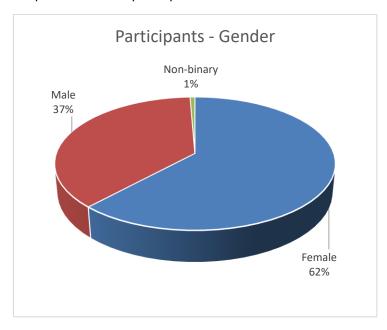
The students in the course were health professionals from diverse background but mainly from low-and middle- income countries, involved in the area of reproductive and sexual health and whose access to healthcare training is limited by time and/or financial resources. This included doctors, midwives, nurses, health educators, social workers, advocates, reproductive and sexual health programme managers and other healthcare workers. Most of the participants were in the age group 30 to 39 years. The health professionals in this age group have work or familial obligations and, for them, our courses are likely to have the most impact; thanks to the flexibility of the courses, which offers a good opportunity to access continuing training in the field of care. Women were well-represented as they made up more than half of the participants of the course.

Table 1: Age of participants

Age Group	No. of participants	%
<20	1	0%
20-29	78	25%
30-39	131	42%
40-49	77	25%
50-59	18	6%
> 60	5	2%
Total	310	100%

The majority of participants (42%) were in the age group 30 to 39 years.

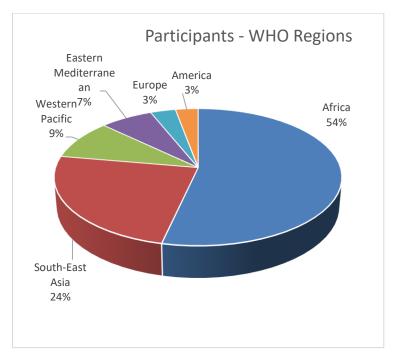
Graph 1: Gender of participants



As indicated by the graph above, women made up 62% of participants.

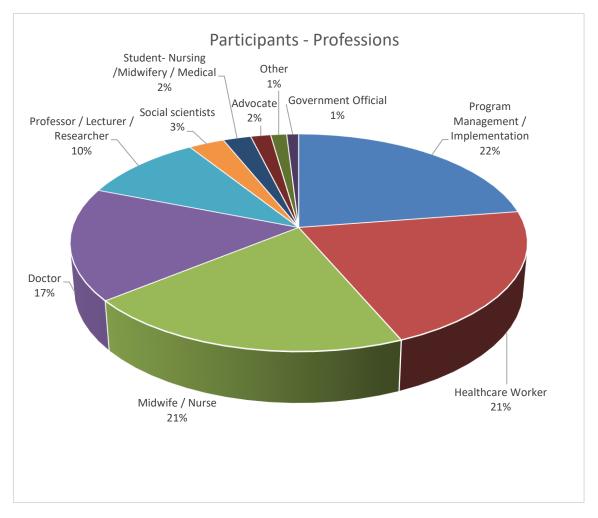
This course was attended by health professionals mainly from low- and middle- income countries with the following distribution: Africa (54%), South-East Asia (24%), Western Pacific (9%), Eastern Mediterranean (7%), Europe (3%) and America (3%).

Graph 2: Geographic distribution of participants by WHO Regions



The following graph shows the proportions between the different professions.

Graph 3: Participants' professions



#### **Recruitment of participants**

The participants became aware of the course through the following means:

- Publicity for the course through local contact coordinators in the countries and regions.
- Publicity for the course on the GFMER website and partner sites.
- Mobilization of the GFMER and WHO networks. These include WHO regional/country offices, local and international NGOs, especially FP2020, UNFPA, WHO collaborating centres at the country level, health ministries, and universities.

#### **Selection of participants**

This course is a post-graduate/continued learning course for health professionals with a diploma involved in the field of sexual and reproductive health. The criteria for selection are as follows:

- A degree in a relevant discipline of health sciences, natural sciences, or social and economic sciences.
- Involved in the domain of sexual and reproductive health.
- Preference is given to health professionals who work for health establishments at the district level, an NGO, or a ministry of health.
- Nomination by WHO/ FP2020 and other institutions- sponsored participants.
- The Foundation favours the participation of women.

It is noted that the Foundation has established partnerships with NGOs, health ministries, and universities in different countries. Certain entities include our courses in their human resource development programmes. Moreover, each year, a number of participants find the information on their own when consulting the Foundation site or on partner sites.

The application must contain the following elements:

- A CV.
- A certified copy of the diploma in medicine or related fields and any additional diplomas.
- A letter of motivation indicating clearly their interests and goals for the course.

Based on the application form and documents provided by the candidates, we make our preselection and the selected candidates or their employers are contacted by our Geneva Team. We communicate the list of candidates to the country coordinators who we ask to also contact the candidates by phone, email, or skype. When possible, we try – via our coordinators - to meet on site. For countries where we do not have local coordinators, we ask other coordinators in nearby regions to assume contact. For example, for South Sudan, we call our coordinator in Sudan.

#### **Course contents**

The content of this course is based on recommendations by WHO, and it can therefore be recognised by other global institutions. It is also enhanced by field experience from our teachers with a wide range of experience in the field of sexual and reproductive health. It is based on groundwork, especially in low- and middle- income countries and proposes pragmatic solutions. We provide reference materials for our students and encourage them to use it in their professional practice (prevention, treatment and training as well as in advocacy and programming).

#### https://www.gfmer.ch/SRH-Course-2020/index.htm

GFMER training courses are run by course coordinators who decide the content and schedule of the course and designate its contributors. The course coordinators are experts or scientists from WHO and/or various universities who possess important professional networks at the international level.

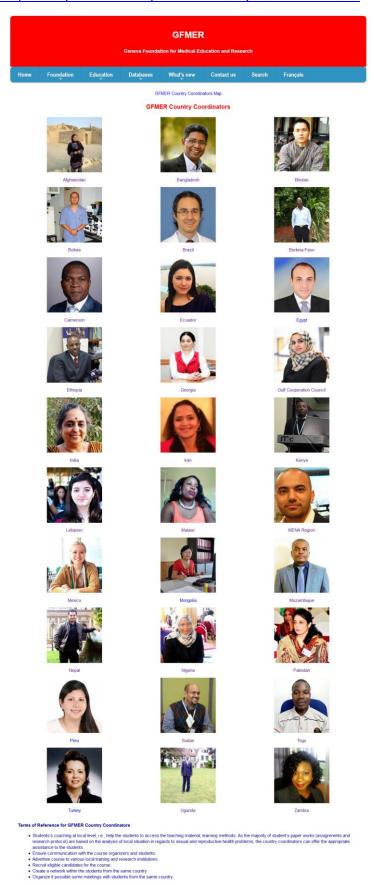
#### Teachers, partner institutions

The speakers, lecturers, and course facilitators are highly trained professionals from WHO, universities, and specialized institutions. They have a wide range of knowledge and experience in the field of sexual and reproductive health, especially in low-income countries.

In 2020, a total of 11 teachers from WHO, GFMER as well as other national and international institutions were involved in teaching and tutorship for the online training course.

## **Course coordinators at country level**

 $\underline{https://www.gfmer.ch/country-coordinators/GFMER-country-coordinators.htm}$ 



GFMER has appointed a total of 30 coordinators in Afghanistan, Bangladesh, Bhutan, Bolivia, Brazil, Burkina Faso, Cameroon, Ecuador, Egypt, Ethiopia, Georgia, Gulf Cooperation Council, India, Iran, Kenya, Lebanon, Malawi, MENA Region, Mexico, Mongolia, Mozambique, Nepal, Nigeria, Pakistan, Peru, Sudan, Togo, Turkey, Uganda, and Zambia.

The main tasks of country coordinators consist of:

- Student coaching at local level, i.e., helping the students to access the teaching material and learning methods. As the majority of student's work (assignments and research protocol) is based on the analysis of local situations in regard to sexual and reproductive health problems, the local coordinators can offer the appropriate assistance to the students.
- Ensure communication with the course organizers and students.
- Advertise the course to various local training and research institutions.
- Recruit eligible candidates for the course.
- Create a network between students from the same country.
- Organize if possible some meetings with students from the same country.
- Identify potential sponsors to provide scholarships for students. It is worth mentioning that the majority of institutions allocate funds for their human resource capacity building programmes.

#### **Teaching methods**

Teaching methods consisted of on-line lectures (video recordings, didactic presentations), key readings, reading materials, additional references and referrals to related websites.

For each module, participants received assignments. For their assignments, the students received very precise instructions. We had prepared a guideline for assignments. Before writing the assignment, the student is asked to follow the course, read the reference documents that we put at their disposal, and write their text according to the given instruction. We also created an evaluation grid of personal work. Tutors and coordinators revised the assignments using the assignment marking guides provided. The goal is to help students deal with problems of adolescent sexual and reproductive health in their respective countries, using what they learn in our courses and preparing their work with respect to academic and scientific standards.

In terms of documentation and published educational resources, the Training Course in Adolescent Sexual and Reproductive Health is among the richest in the world. It contains the most reference documents (guidelines), continuously updated in the field of adolescent sexual and reproductive health. These help participants to become more familiar with scientific reading and writing and use the knowledge acquired in the training course in their day-to-day professional practice. A personal coach is assigned to each participant. Coaches are GFMER country coordinators and former participants, who facilitate the learning process with the participants. As part of the students' work is based on the analysis of local situations in regard to sexual and reproductive health problems, the assistance of country coordinators / coaches is very important.

The participation of a student is measured by the submission of assignments in the time given. Once their work is completed, reviewed, and accepted for a given module, the student is credited with a number of hours (6 to 8 hours per week), regardless of the actual time it took to complete the work.

To support the participants, different mechanisms of communication and interaction (Facebook, Google Groups, Skype, Twitter) were used. These tools favour interaction between participants and teachers and, allow for the creation of a rich network of exchange between health professionals. The diversity within the community of students and the establishment of communication tools has

furnished an excellent means of learning and of sharing experiences between students from different countries.

GFMER provides free access to the course contents, which are an important source of information for professionals who are involved in the domain of sexual and reproductive health (only registered students benefit from a regular monitoring and obtaining a certificate).

The online community created by GFMER for the training course improves communication with and between participants and provides access to academic and administrative support. The diversity among participants and the network facilitated by GFMER provide an opportunity to learn from and share experiences with peers from around the world.

#### **Final evaluation**

At the end of the course, participants of the Training Course in Adolescent Sexual and Reproductive Health received a certificate if they meet the following conditions:

- Participants are required to have completed the assignments of each course module.
- Participants are required to complete and submit the end of course survey.

Throughout the training course, participants are supervised by country coordinators, the course coordinators, teachers and tutors.

#### Following participants after the course

Each participant of our courses becomes a member of our Foundation and continues contact with them. Monitoring and maintaining contact with them and between them prove to be very useful. Today, GFMER has available an international network of healthcare professionals on ground in direct contact with their community. It is thanks to this network that we have established collaborations with Harvard University and Oxford, and the Service of Gynaecology at the University Hospital of Geneva. These institutions collaborate with GFMER to develop training tools for healthcare providers at the community level. The network that the foundation runs facilitates the dissemination of these tools. This allows us also to establish contacts with NGOs, ministries of health or other institutions in a number of countries.

In addition, participants of the 2020 ASRH course were put in contact with their country/ regional WHO, FP2020 and UNFPA offices to serve as a pool of resources in ASRH for their respective countries and regions.

#### Picture of the week

#### https://www.gfmer.ch/gfmervoices/index.htm

We have created a section on our website entitled "Picture of the week". Each week, we publish the photo of a student showing their professional activities in a treatment facility, in a refugee camp, on site, in class, etc. This initiative has proved to be very gratifying for our students. It emphasizes the importance of distance training for health professionals where access to training is sometimes limited. It also shows the application of knowledge acquired by our students in their professional practice.





#### 2. Sexual and reproductive rights

#### https://www.gfmer.ch/srr/index.htm

In order to achieve sexual and reproductive health, people need to know their sexual and reproductive rights. The Geneva Foundation for Medical Education and Research (GFMER) therefore sees a close relationship between sexual and reproductive health on the one hand and the legal and political system on the other. For these reasons, the Foundation created a dedicated website on Sexual and Reproductive Rights. Since its establishment in 2002, GFMER has exchanged sexual and reproductive health expertise with governmental and non-governmental organizations all over the world. GFMER has become a resource centre for training and research in human sexuality and reproduction, creating a vast network of health professionals in developing and developed countries.

With this website GFMER seeks to contribute to a meaningful inclusion of human rights in sexual and reproductive health issues.

Content of the sexual and reproductive rights website:

- Introductions to major sexual and reproductive rights topics.
- Regularly updated summaries of national legislations for the major areas of sexual and reproductive health.
- Selected publications on legislation and ethical issues in sexual and reproductive health.

#### 3. Clinical training, prevention and treatment of obstetric fistula

http://www.gfmer.ch/fistula/index.htm



Today, at least two million women needlessly suffer from untreated fistula.

Since 1993, Dr Charles Henry Rochat together with a group of specialists and local medical doctors, delivered fistula repair surgery to more than 3600 women.

GFMER is a partner in the UNFPA/WHO campaign to end fistula. The aim of GFMER participation in this campaign is to create a "Centre of Excellence for the prevention and treatment of obstetric fistula" in Tanguieta (Northern Benin), which would serve as a model to other countries in the region.

In addition to the care of patients from Benin, Togo, Burkina Faso, Guinea Conakry, Cameroon, and Madagascar, the program aims to train local and international staff. A «prevention» and «reintegration» component was also implemented with local NGOs.

#### **Objectives**

- Reconstructive surgery, with mainly treatment of obstetric fistulas and complex urological cases.
- Medical training and research.
- Improving healthcare system, preventative care and reintegration of patients.
- Raising awareness among political leaders at the regional level.

#### Activities and achievements in 2020

#### 1. Reconstructive surgery

During 2020, Fistula Group focused on ways to bring about good reconstructive surgery for fistula patients in West and Central Africa, especially in Tanguieta but also in Cameroon, Burkina Faso, Congo and Madagascar.

- Fistula Group organized surgical workshops in order to treat patients and train African local
  doctors in fistula surgery in several African countries. Two of them took place in Cameroon and
  three of them in Benin. During these surgery missions, a total of 110 obstetric fistula cases were
  operated.
- In Burkina Faso: 114 women have been operated on.
- In Madagascar: 89 women have been operated on.

In total, 313 patients were treated with very good results (more than 75% of patients successfully treated) despite the complexity of the cases.

#### 2. Scholarship

The Fistula Group program focuses on reconstructive surgery, treatment of obstetric fistula and prolapse, improvement of the health care system, prevention, reintegration of patients, but also, and above all, training and research, thanks to the support of CARIGEST.

The «Tanguiéta Model» has resulted in one of the most successful training centres for surgical treatment of obstetric fistula in West Africa. In Tanguiéta, dozens of surgeons but also trainers of surgeons have passed through and followed operative workshops. It is also in Tanguiéta that the necessary didactic material was developed in the sub-region and more generally on the African continent. The hospital has generated a «cascade effect» with the replication of «fistula treatment schools» in emerging countries. The scholarship strategy set up is a long-term program that covers several years (up to 6 years for surgeons).

In 2020, it has aimed to train more than twenty doctors and nurses who have been carefully selected for their skills but also for their professionalism and motivation.

The fellows are mainly from the two partner hospitals of Fistula Group:

- Saint Jean de Dieu de Tanguiéta (Benin)
- Saint Jean de Dieu d'Afagnan (Togo)

But also from Madagascar, which is cruelly lacking in specialized surgeons, or from Congo and Cameroon.

#### 3. Research

Fistula Group carried out research and analysis, invested in long-term change initiatives and enabled collaboration through its networks.

Dr Rochat and his team (composed of specialists from Switzerland, France, USA, Cameroun and Burkina Faso) disseminated information and research to different kind of public organising conferences and workshops on diagnosis, treatment and follow-up of fistula cases.

In 2020, 4 articles were published in academic reviews:

- Tebeu PM, Bakouetila RS, Odzebe Anani W, Antaon JSS, Mabiala CR, Rochat CH. Réinsertion psycho-sociale et économique des femmes opérées pour fistules obstétricales et non obstétricales au Congo [Psycho-social and economic reintegration of women operated for urogenital fistula]. Prog Urol. 2021 Feb;31(2):112-118. French. Available from: https://doi.org/10.1016/j.purol.2020.04.004
- Randazzo M, Lengauer L, Rochat CH, Ploumidis A, Kröpfl D, Rassweiler J, Buffi NM, Wiklund P, Mottrie A, John H. Best Practices in Robotic-assisted Repair of Vesicovaginal Fistula: A Consensus Report from the European Association of Urology Robotic Urology Section Scientific Working Group for Reconstructive Urology. Eur Urol. 2020 Sep;78(3):432-442. Available from: https://doi.org/10.1016/j.eururo.2020.06.029
- 3. Tseunwo C, Mail SHW, Antaon JSS, Obama CM, Tebeu PM, Rochat CH. Obstetric Fistula Knowledge, Attitudes and Practices among the Professionals of Communication in Yaounde. Health Sciences and Disease. 2020 May 20;21(6). Available from: <a href="http://www.hsd-fmsb.org/index.php/hsd/article/view/2048">http://www.hsd-fmsb.org/index.php/hsd/article/view/2048</a>
- 4. Tebeu PM, Olsen JPK, Zeck CN, Antaon JSS, Moukouta CS, Rochat CH. Besoins en réinsertion psycho-sociale et économique des patientes opérées de fistule vésico-vaginale au Cameroun. PAMJ Clinical Medicine. 2020 Apr 6;2(138). Available from: <a href="https://dx.doi.org/10.11604/pamj-cm.2020.2.138.22057">https://dx.doi.org/10.11604/pamj-cm.2020.2.138.22057</a>

#### 4. Exhibition

On the occasion of the Dies Academicus 2020, and the awarding of the title of Alumnus 2020 to Dr. Charles-Henry Rochat, Fistula Group highlighted its projects through an exhibition at the University of Geneva by the photographer Nicolas Cleuet, who was present during a Fistula Group mission in Tanguiéta in 2019.

#### 5. Delivery of equipment

Affected by a major political crisis, Madagascar has fallen into a critical economic and social situation, particularly between 2009 and 2013. Now one of the poorest countries in the world, the country has a significant deficit of infra-structures and equipment, particularly in the health sector.

In 2020, Fistula Group was able to send two respirators (donated by the Genolier Foundation), an electric scalpel and endoscopy equipment to Antananarivo.

#### Supporting institutions for obstetric fistula project

The GFMER obstetric fistula programme is supported by:

- La commune de Chêne-Bourg
- Fondations Ambre
- Fondation ALBATROS
- Fondation Rumsey Cartier
- Fondation Philanthropique Famille Firmenich
- Fondation de bienfaisance de la banque Pictet & Cie
- Fondation Genolier
- Global Foundation for Life Sciences
- The Pharos Trust foundation
- Fondation Baur
- Swiss Philanthropy Foundation
- Carigest
- ARTEMEDIS
- Private donors
- Medtronic (for suture equipment)

#### Ongoing activities for obstetric fistula project

- Collaboration with the Fondation Claudine Talon (first lady of Benin).
- Collaboration with Women and Health Alliance International WAHA.
- Collaboration with Synergies africaines in Cameroon, Congo, Central Africa, and Chad.
- Dissemination of the "Tanguieta model".
- Dissemination of the fistula database and fistula group website.
- Organization of local events to provide the training module on fistula to health professionals.
- Ciespac and Oceac partnership.
- Contribution to the awareness and prevention of "obstetric fistula".
- Participation in the hospitalization costs of the patients.
- Contribution to travel expenses of the African and expatriated teams on the various sites.
- Contribution to purchase of equipment for surgical missions.
- Contribution to Scholarships for the specialization of doctors and physicians from Benin, Togo, and Madagascar.
- Financing the continuity of the programme Guinea-Conakry, Burkina Faso, Cameroon and Benin.
- Supervision theses and publications.

# 4. E-learning public health course on Emergency and surgical care in Universal Health Coverage

#### https://www.gfmer.ch/surgery/index.htm

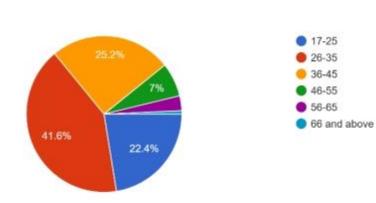
The GFMER's online public health e-learning course on Emergency and Surgical Care in Universal Health Coverage (ESC in UHC) was launched in July 2019. Dr Meena Nathan Cherian, the director of GFMER Emergency and Surgical Care oversees this program. This course was developed in partnerships with academic experts. It created an interest for further collaborations by several academic partners to explore topics on Global Health New Challenges for more such courses in the future.

#### **GFMER Emergency & Surgical Care Program**

- The GFMER created an Emergency and Surgical Care (ESC) program to highlight the importance of five billion people lack access to basic life-saving surgical care which is still not considered as a priority in the field of public health globally and national plans of low- and middle- income countries (LMICs). Timely access to lifesaving and disability-preventing emergency and surgical care services are crucial in the entire life-course from birth to old age (in pregnancy-related complications, trauma, congenital anomalies, cancer, abdominal conditions, disasters). Countries are underway to develop their national policies and plans on their health priorities in order to meet the Sustainable Development Goals (SDGs) towards Universal Health Coverage (UHC). With the passing of the first World Health Assembly Resolution on 'Strengthening of emergency and essential surgical care and anesthesia services in the context of UHC', it made evident that this is the most strategic time to share evidence-based knowledge with people interested in population health on its essential role in maternal and child health, noncommunicable and communicable diseases and humanitarian crises. However, there is a lack of training tools specifically to make informed policy decisions for the integration of safe surgical (including obstetrics, trauma, anesthesia) care services into their community, district or national health plans towards meeting the SDGs. <a href="https://www.gfmer.ch/surgery/course-overview.htm">https://www.gfmer.ch/surgery/course-overview.htm</a>
- GFMER developed an online public health training course on Emergency & Surgical Care in Universal Health Coverage which aimed to engage people interested to:
  - i. apply evidence-based knowledge for influencing decision-making in policies or
  - ii. advocate as a public health issue on a global platform.
- The online public health course was developed with experts and over 100 reviewers from published resources of the WHO, Lancet Global Surgery, Disease Control Priorities (3rd edition), International Committee of the Red Cross and Médecins Sans Frontières, with the following learning objectives to: (i) understand the implications of the unmet needs for timely access to safe and quality surgical care services within health systems, (ii) identify public health solutions to surgical care crisis at all levels of healthcare, including humanitarian crises, and (iii) understand ways to strengthen surgical care systems towards achieving UHC.
- Emergency & Surgical Care in UHC public health training course, was launched in July 2019.
  - The online course takes approximately four hours to complete with four modules which
    informs the learner on the global burden of lack of timely access to essential surgical care
    both in normal situation and in humanitarian crises, and strategies for imbedding its quality
    and safety and influencing evidence-based planning and policies with its central role in
    achieving UHC.
  - The course is free, however, participants can upgrade at any time for a fee of 97 USD to benefit access to the Global Discussion Forum for relevant topics with peers, certificate signed by GFMER and global experts, continuing professional development (CPD) credits of 4.0 approved by the Royal College of Surgeons in Ireland upon scoring 70% in the MCQ test as well as completing a short assignment on 'how the knowledge/skills gained will be applicable in the participant's current or future projects, in their country or other LMICs. (pictures in GFMER Photo Gallery)
  - Updates on the ESC course: to date 1300 participants of diverse disciplines from over 65 countries have registered. The online free course features a short quiz before and after the course for participant's self-evaluation and learning progress. The outcome of this course has thus far been successful based on the response received from participants who have asked for additional information on surgical care's role as a public health issue.

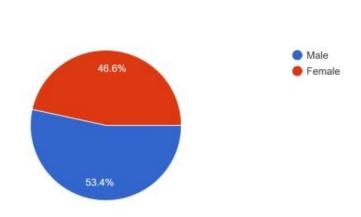
#### Participants by age





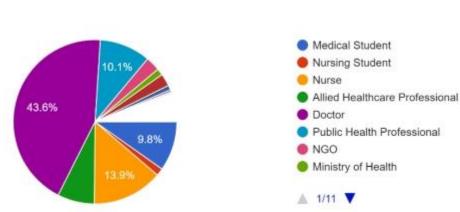
#### Participants by gender





#### Participants by professions

1,301 responses



- **Research:** Prior to the launch of the course, the GFMER ESC program conducted a worldwide anonymous public health awareness survey to understand the gap in surgical care knowledge.
  - Based on the research a paper was developed with a team of experts and submitted for publication in a peer-reviewed journal and awaiting decision.
- The success of the ongoing online public health ESC course an interest was generated by various organisations to develop similar high-quality courses on global public health topics in collaboration with GFMER under the Global Health New Challenges: online courses program. This resulted in:
  - Collaboration with WHO Global Learning Open courses to add open access COVID-19 courses on GFMER ESC webpage. GFMER collation of specific WHO online courses on COVID-19
  - Commencement of a new online public health course on 'Cancer in the context of UHC', in the last quarter of 2020 with academic experts and expansion of collaborations and partnerships. This is planned for finalisation in 2021.
  - Collaborations with several organisations on advocacy and guidance documents with WHO
    (Switzerland), Health Information For All (HIFA-WHO Essential Health Services COVID-19
    Working Group) and Simple COVID Working Group (UK).
- GFMER representation in various global and national conferences, meetings and education programs including with partners via the digital platforms due to the pandemic situation https://www.gfmer.ch/surgery/gallery.htm included:
  - Guest Lecture (in person) on Quality and Safety International Anaesthesia Conference of Indonesia Anaesthesiologists, Indonesia. Feb. 2020
  - Keynote address in Vein-Week Webinar series of the v-WIN project. April, Italy, 2020.
  - International Society of Geriatric Oncology Supporting Global Policy for Cancer in Ageing Webinar on Impact of COVID-19 on Older Adults with Cancer of International Society of Geriatric Oncology, Switzerland. 2020.

#### 5. Institutional partnerships

# GFMER collaborative activities with Oxford Maternal and Perinatal Health Institute and Harvard Maternal Health Taskforce

https://www.gfmer.ch/omphi/index.htm

#### The evidence-based management of Pre-eclampsia and Eclampsia

https://www.gfmer.ch/SRH-Course-2010/pre-eclampsia-University-of-Oxford/index.htm

OMPHI and GFMER developed the first online training course on the evidence-based management of Pre-eclampsia and Eclampsia in June 2011. This course is available in English and Spanish. The update of the course is currently ongoing.

The dissemination of this module continued during 2020 and, since its launch to December 2020, a total of 3169 health professionals from 120 countries have successfully completed the training and knowledge assessment and have been awarded certificates.

#### The evidence-based management of postpartum haemorrhage

#### https://www.gfmer.ch/omphi/pph/index.htm

After the success of the evidence-based pre-eclampsia and eclampsia training course, OMPHI and GFMER developed another online training course on the evidence-based management of postpartum haemorrhage (PPH) in June 2013. This course is available in English, Spanish and Russian.

The dissemination of this module continued during 2020 and, since its launch to December 2020, a total of 3160 health professionals from 128 countries have successfully completed the training and knowledge assessment and have been awarded certificates.

#### **Maternal infections**

#### https://www.gfmer.ch/omphi/maternal-infections/index.htm

Following the success in disseminating evidence-based knowledge and the high demand for similar courses, in 2014 GFMER in partnership with the Maternal Health Taskforce of the Harvard School of Public Health, the Oxford Maternal and Perinatal Health and the Global Health Network developed a third e-learning module on Maternal infections, that is one of the six major causes of maternal death worldwide.

The dissemination of the module continued during 2020. Since the launch of the module in June 2015 to December 2020, a total of 1295 health professionals from up to 90 countries successfully completed the knowledge assessment for the module and were awarded certificates.

#### **Obstetric fistula**

#### https://www.gfmer.ch/fistula/Obstetric-fistula-2015.htm

A fourth training module was developed on obstetric fistula. Its dissemination continued in the current year. Since its launch in July 2015 to December 2020, the fistula module has been disseminated to a total of 1202 health professionals from up to 90 countries successfully completed the knowledge assessment for the module and were awarded certificates.

A French version is also available (<a href="https://www.gfmer.ch/fistule/Fistules-obstetricales-2017.htm">https://www.gfmer.ch/fistule/Fistules-obstetricales-2017.htm</a>).

#### **INTERGROWTH-21st**

#### https://www.gfmer.ch/omphi/intergrowth-course/index.htm

The International Fetal and Newborn Growth Consortium for the 21<sup>st</sup> Century is a global multidisciplinary network of more than 300 researchers and clinicians from 27 institutions in 18 countries worldwide. They are dedicated to improving perinatal health globally and committed to reducing the millions of preventable newborn deaths that occur as a result of preterm birth or poor intrauterine growth.

In order to meet this goal, there is need for the international growth standards to measure and improve maternal and newborn clinical care and compare outcomes across populations. Such standards exist to monitor the growth of infants and children. These are the WHO Child Growth Standards and their release in 2006 was a landmark achievement. These scientifically based standards are now used worldwide.

However, the fetal and newborn counterpart has been missing, which led the Consortium to implement the INTERGROWTH-21<sup>st</sup> Project. Their aim was to extend the WHO Child Growth Standards into the fetal and neonatal period, providing tools for continuity of care from conception to 5 years of age.

The INTERGROWTH-21<sup>st</sup> Consortium implemented three population-based studies using standardized methods and clinical and research protocols. They gathered a rich body of data on health, growth, and nutrition from pregnancy to early infancy from close to 60,000 women and newborns across five

continents, making the INTERGROWTH-21<sup>st</sup> Project the largest collaborative venture in the field of perinatal health research to date.

The resulting data provide unique insights into growth and development for the 21<sup>st</sup> century. The findings also provide new ways of classifying preterm and small for gestational age newborns. In addition, a new international equation for estimating gestational age through ultrasound early in pregnancy based on the first international crown-rump length standards was produced, and the resources necessary for enabling the adoption and scale-up of these tools at all levels of the health care system were developed.

By improving the ability of clinicians to monitor growth and development, standardizing research methods, and providing maternal and newborn health programme and policymakers with new, practical, international tools, the health of women and newborns worldwide can be improved.

GFMER has been designated as one of the principle partners for the dissemination and implementation of the INTERGROWTH-21<sup>st</sup> project at a global level through its international network of health professionals and partner institutions.

The INTERGROWTH-21<sup>st</sup> course on maternal, fetal and newborn growth monitoring was jointly developed by the <u>Geneva Foundation for Medical Education and Research (GFMER)</u>, <u>The Global Health Network</u>, <u>Maternal Health Task Force at the Harvard School of Public Health</u> and <u>Oxford Maternal & Perinatal Health Institute (OMPHI)</u>. The course development was motivated by the commitment of the INTERGROWTH-21<sup>st</sup> Consortium to improving perinatal health globally. The course communicates the methodology of maternal, fetal and newborn growth monitoring and the application of the INTERGROWTH-21<sup>st</sup> international growth standards to make judgement about appropriateness of growth.

This open, online training course was officially launched in June 2016 with the publication of its first module "Assessing newborn size by anthropometry". The module was published first in response to the need for guidance on the correct measurement technique for newborn head circumference and an international prescriptive standard for comparisons, following the outbreak of ZIKA virus infection in some part of the world. The module is available in four languages, English, Portuguese, Spanish and Italian. GFMER disseminated the course through its vast network of health care professionals in three phases: 1) Provision of training to the current participants of the annual course "From Research to Practice: Training Course in Sexual and Reproductive Health Research 2016" as well as the participants from the 2010 to 2015 editions of the course; 2) provision of the training module to a much larger number of health care providers worldwide and 3) dissemination of the course, through the Foundation network of country coordinators, collaborating institutions and former students in selected countries.

The dissemination of the course continued during 2020 and in February 2020, three local workshops were held in Pakistan. A second module "Assessing maternal anthropometry and weight gain during pregnancy" was launched in January 2017. The translation of the module to Portuguese and Spanish was completed in 2020. As at December 2020, a total of 5327 health professionals from up to 195 countries successfully completed the knowledge assessment for one or two of the modules and were awarded certificates.

#### **INTERPRACTICE-21st**

#### https://www.gfmer.ch/omphi/interpractice/index.htm

The INTERPRACTICE-21<sup>st</sup> Project promotes the optimal postnatal growth of preterm infants and standardises growth measurement in selected populations around the world. It is based on the implementation of the INTERGROWTH-21<sup>st</sup> international standards for preterm postnatal growth and evidence-based feeding recommendations based on human milk.

The "Preterm infant feeding and growth monitoring: Implementation of the INTERGROWTH-21<sup>st</sup> protocol, interactive e-Learning course" was launched in September 2017. Spanish (<a href="https://www.gfmer.ch/omphi/interpractice/index-spanish.htm">https://www.gfmer.ch/omphi/interpractice/index-spanish.htm</a>), Russian (<a href="https://www.gfmer.ch/omphi/interpractice/index-russian.htm">https://www.gfmer.ch/omphi/interpractice/index-russian.htm</a>), Portuguese (<a href="https://www.gfmer.ch/omphi/interpractice/index-portuguese.htm">https://www.gfmer.ch/omphi/interpractice/index-italian.htm</a>) and Italian (<a href="https://www.gfmer.ch/omphi/interpractice/index-italian.htm">https://www.gfmer.ch/omphi/interpractice/index-italian.htm</a>) versions of the course are available.

The dissemination of the module continued during 2020 including three local trainings in Pakistan in February 2020. As at December 2020, a total of 3061 health professionals from up to 127 countries successfully completed the knowledge assessment for the module and were awarded certificates.

It is worth mentioning that the above-mentioned modules can also be accessed by Smartphone and tablet. Moreover, a PDF version is also made available for each module to allow for their offline use.

#### COVID-19 in pregnancy, delivery and the neonatal period

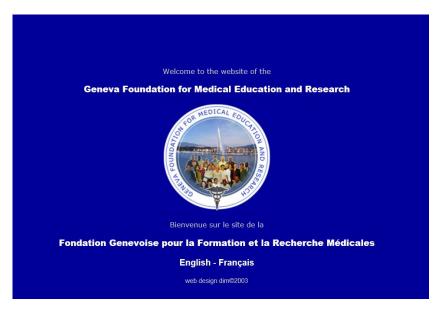
In 2020, the world witnessed a global emergency, the COVID-19 pandemic. Its effects on pregnancy and newborn include the direct spread of disease to pregnant women and their babies and indirectly, the reduction in access to essential maternal and newborn healthcare services resulting in maternal and newborn morbidity and mortality. In response to this pandemic, GFMER and OMPHI are currently developing an e-learning course on COVID-19 in pregnancy, delivery and the neonatal period. The aim of the course is to provide healthcare providers with evidence-based recommendations for disease prevention and management of pregnant women and their babies during the COVID-19 pandemic in order to reduce the adverse maternal and newborn outcomes. The module development will be completed in 2021 with a subsequent worldwide dissemination.

#### **E-learning modules – Statistics**

E-learning module	Duration	No. of participants who successfully completed the test
Pre-eclampsia and eclampsia	June 2011 - December 2020	3169
Postpartum haemorrhage	June 2013 - December 2020	3160
Maternal infections	May 2015 - December 2020	1295
Obstetric fistula	July 2015 - December 2020	1202
INTERGROWTH-21st/Assessing newborn size and /Assessing	June 2016 - December 2020	5327

maternal anthropometry and weight gain during pregnancy		
INTERPRACTICE- 21st/Assessing preterm infant feeding and growth monitoring	September 2017 - December 2020	3061

# GFMER website (https://www.gfmer.ch/)



The GFMER website is extensive, regularly updated and provides easy access to useful information. The website contains information about the Foundation, education programmes (courses), partners, international collaboration and information resources such as publications, presentations and databases. The GFMER website contains information in English, French, German, Italian and Spanish.

In 2020, the website of the foundation had 2568081 page views and visitors from all over the world. See the following link for the statistics of the website:

https://www.gfmer.ch/Usage statistics/pdf/GFMER-visitors-2020.pdf

## **Activities planned for 2021**

#### Courses on sexual and reproductive health and research 2021

The Geneva Foundation for Medical Education and Research in collaboration with the World Health Organization and other partners will continue to offer a series of online training courses in the field of sexual and reproductive health and research in 2021 as follows:

- Adolescent sexual and reproductive health
- Research methodology and research protocol development
- Sexually transmitted infections, HIV/AIDS
- Family planning

#### Sexual health course

This e-learning course on Sexual health developed by GFMER in partnership with the World Health Organisation and UNESCO will be offered to our online course students and it will be disseminated globally to health professionals, through the GFMER and partners' networks.

# **GFMER** collaborative activities with Oxford Maternal and Perinatal Health Institute and Harvard Maternal Health Taskforce

1. COVID-19 in pregnancy, delivery and the neonatal period e-learning course

The development of this e-learning course which started in 2020 will be completed in 2021 followed by the launching and dissemination of the course.

2. Dissemination of e-learning courses

GFMER will continue to disseminate all courses through its wide and expanding network of health professionals with ongoing monitoring. More country workshops on Newborn Anthropometry and Preterm infant feeding and growth monitoring courses are planned for the year 2021.

3. Update of e-learning courses

The update of the online course "the evidence-based management of Pre-eclampsia and Eclampsia' will be completed. GFMER will propose the update of other existing e-learning courses to its partners as necessary.

#### **Cancer in the context of Universal Health Coverage**

GFMER will be finalising the online public health Course on Cancer in the context of Universal Health Coverage to be launched in 2021.

#### **Development of new e-learning modules**

GFMER and partners will explore the possibility to develop new e-learning modules in sexual and reproductive health and related fields including cancer.