Leading the World: Perspectives of a Female President of WFSA

Angela Enright, MB, FRCPC

Department of Anesthesia, University of British Columbia, Royal Jubilee Hospital, Victoria, British Columbia, Canada

In an editorial titled "Women, Minorities and Leadership in Anesthesiology: Take the Pledge," published in Anesthesia & Analgesia in 2017, Professor Kate Leslie and colleagues state that we must "take a broad view on leadership, considering it to include many visible and influential roles such as elected office in a membership-based organization; tenure in the higher ranks of an academic institution; a management role in an anesthesia group or health care facility; prominence in conducting, reviewing, and speaking about research; as a champion for quality and safety; and in educational leadership roles." During 17 years of involvement in the World Federation of Societies of Anaesthesiologists (WFSA), including 8 as Chair of the WFSA Education Committee and 4 as President, I have had the privilege of getting to know many female anesthesiologists who occupy the roles described by Dr Leslie. Moreover, many come from low and middle-income countries (LMIC), where the challenges are enormous. Others come from highincome countries, but are dedicated to improving anesthesia in LMICs.

WFSA

The WFSA is a society of societies founded in 1955. From 26 initial members, it has grown to 134 member societies representing anesthesiologists from 150 countries. The objectives of the organization then were "exclusively educational, scientific, and charitable in nature" and aimed "to make available the highest standards of anesthesia and resuscitation to all peoples of the world." Since that time, these goals have remained generally the same, but have expanded to include all aspects of modern anesthesia practice.

Address Correspondence to: Angela Enright, MB, FRCPC, Department of Anesthesia, Royal Jubilee Hospital, 1952 Bay Street, Victoria, BC, Canada V8R 1J8. E-mail: acenright1@gmail.com

INTERNATIONAL ANESTHESIOLOGY CLINICS Volume 56, Number 3, 128–140, DOI:10.1097/AIA.000000000000194 Copyright © 2018 Wolters Kluwer Health, Inc. All rights reserved. Women began to get involved in the WFSA in the late 1980s and the early 1990s. The early pioneers who were elected to the Executive Council of the WFSA (EXCO) were Professor Elena Damir (Russia), Dr Deepthi Attygale (Sri Lanka), and Professor Maria Janecsko (Hungary). All were prominent members of their national societies, and Drs Attygale and Janecsko held major positions in their respective regional sections of the WFSA. Dr Anneke Meursing (Netherlands) was elected to the EXCO in 1992 and went on to become Honorary Secretary from 1996-2004, when she was elected President (2004-2008), the first woman ever to hold that office. She was followed by Dr Angela Enright from 2008-2012 and Dr Jannicke Mellin-Olsen (Norway) from 2018-2020.

Many women have held positions of prominence in the WFSA—Drs Janecsko and Florian Nuevo (Philippines) were Chairs of the EXCO; Drs Enright and Mellin-Olsen—Chairs of the Education Committee; Dr Isabeau Walker (UK)—Chair of the Publications Committee; Professor Fauzia Khan (Pakistan)—Chair of the Safety and Quality Committee; Dr Maria Cristina Celesia (Argentina)—Chair of the Obstetric Committee; and Dr Dusica Simic (Serbia)—Chair of the Pediatrics Committee. Other female anesthesiologists have served on committees including the Board, for example, Dr Carolina Haylock Loor (Honduras) and Dr Bisola Onajin-Obembe (Nigeria). Bisola has now gone on to become Secretary of the G4 Alliance, a very important organization for the support of surgery, anesthesia, trauma, and obstetrics.

What is interesting about these women is that they have all been nominated by their national societies to serve on the WFSA. Those on EXCO (now the Board) have all been elected to that committee by the national member societies of the WFSA. Most have been active in their regional societies and so are well known before they arrive at the WFSA. This level of participation seems to compare very favorably with the part played by women in national societies of anesthesia.

Once women arrived in the WFSA, it became quite egalitarian and women were recognized for their abilities. They were willing to take on the challenges of the various positions within the organization. They were, and are, hardworking and also good communicators; thus, it was no surprise that they assumed important roles. What is so notable about the WFSA is that it matters not where people come from or whether their home country is rich or poor; the WFSA provides the opportunity to get to know anesthesiology colleagues from around the world and to work together to improve the standard of anesthesia everywhere.

As Chair of Education and subsequently President, I devoted most of my time to developing and supporting educational projects around the world. In that capacity, I met many extraordinary, committed anesthesiologists. Because this issue is about women in anesthesia, I will concentrate on their particular contributions. After my term as President, I have continued my involvement in WFSA activities and added others such as Lifebox and the Canadian Anesthesiologists' Society International Educational Foundation (CASIEF). All of these have provided me with a broad perspective on the world of anesthesia, especially in LMICs. What I write is by no means all inclusive; rather it is just a snapshot of my personal recollection of many of the outstanding female anesthesiologists I have encountered.

Education, Education, Education

Pediatric Anesthesia

One of the major ways used by WFSA to improve anesthesia practice in a country is to send promising young anesthesiologists for subspecialty training. They commit to returning to their home country, where they will help lead the development of subspecialty anesthesia, teach, and train others. One of the earliest WFSA programs was in Santiago, Chile, at Calvo McKenna Children's Hospital. It began in 1996 at the urging of Drs Haydn Perndt and Kester Brown of Australia. The WFSA provides a 1-year scholarship for the Fellow. The program was led then, and is still led, by Dr Silvana Cavallieri, a pediatric anesthesiologist from Santiago. She has trained 29 young anesthesiologists from South and Central America, and is considered the matriarch of pediatric anesthesia in Latin America. Her WFSA graduates are to be found in Ecuador, Peru, Guatemala, Bolivia, Honduras, El Salvador, Nicaragua, Venezuela, Cuba, Colombia, and the Dominican Republic. All but 3 returned to their own country to practice. It is an extraordinary commitment to be the volunteer program director for over 20 years (Fig. 1).

On the basis of the success of the Santiago program, the WFSA began another pediatric anesthesia fellowship program in Vellore, India, under the auspices of the Christian Medical College and led by Professor Rebecca Jacob. She has trained young anesthesiologists from Nepal, the Maldives, Bangladesh, Afghanistan, India, Bhutan, Nigeria, Rwanda, Myanmar, Indonesia, and Papua New Guinea. All have returned home to share their new expertise with colleagues and patients. In addition, Dr Jacob persuaded her good friend to begin a WFSA intensive care unit training program (Fig. 2).

A more recent development is the Pediatric Anesthesia Fellowship program in Nairobi, Kenya. This grew from an idea by Dr Zipporah Gathuya, who had just returned from a WFSA Fellowship program at Red Cross Children's Hospital in Cape Town. It took much effort over years from many people including me, Dr Jannicke Mellin-Olsen, and Dr Wayne Morriss, all Chairs of the WFSA Education Committee, along with the University of Nairobi and the Kenyan Society of



Figure 1. Past WFSA Pediatric Fellows from the Santiago program: From left: Drs Armando Sanchez (Honduras), Mirka Rivera (Bolivia), Viviana Medina (El Salvador), and Bernardo Morales (Guatemala) with Dr Angela Enright (Canada) third from left and Dr Silvana Cavallieri (Chile) far right. full color



Figure 2. Dr Rebecca Jacob. full color

Anaesthesiologists, to get this program under way. It has now been running for 5 years under Kenyan director Dr Mark Gacii, with Dr Susane Nabulindo as Academic Coordinator and Dr Faye Evans from Boston as the WFSA liaison. Dr Evans has helped develop the Fellowship through its initial few years, seeking funding for Fellows, arranging visiting teachers, and spending significant amounts of time in Nairobi teaching and supporting the local teachers. Under her leadership, there now exists the Safe Paediatric Anaesthesia Network (SPAN), accredited, audiovisual-linked, international pediatric anesthesia case rounds that are attended by Fellows from Nairobi, Boston Children's, Vanderbilt, Great Ormond Street Children's Hospital, and Red Cross Hospital in Cape Town. The Fellows take turns presenting and leading the discussion and find the perspectives from each department very useful. The Nairobi program has now trained 11 pediatric anesthesiologists from Kenya, Rwanda, Uganda, Zambia, Zimbabwe, and Malawi (Fig. 3).

What do all these women have in common? They see a need; they respond to a request for help; they devote time to teaching and organizing a program; and they help improve the standard of pediatric anesthesia in many parts of the world. They are superb role models for all anesthesiologists, but particularly for young female colleagues, who can see what can be achieved by having a vision, working hard, and persisting until the objective is achieved.



Figure 3. Drs Susane Nabulindo and Faye Evans. full color

SAFE Courses

In many parts of the world, anesthesia is provided by nonphysicians.³ These may be well-trained nurse anesthetists as in the United States, but in many LMICs, the anesthesia provider may have received only 6 months to 3 years of training after high-school graduation. Thus, the quality and safety of anesthesia can be very variable. In addition, for economic and geographical reasons, continuing medical education is difficult to obtain. Dr Kate Grady, an anesthesiologist working in Manchester, UK, saw a need and developed a new course in obstetric anesthesia aimed specifically at those working in LMICs⁴ (Fig. 4).

SAFE-OB is an acronym for Safer Anaesthesia from Education in Obstetrics. It is a very intense, hands-on, practical course addressing the common problems in obstetric anesthesia. The development and distribution of the SAFE-OB course have been supported by the Association of Anaesthetists of Great Britain and Ireland (AAGBI) and the WFSA. It has been taught in 21 countries to over 2000 physician and nonphysician anesthesia providers.⁵

The SAFE-OB course is almost always accompanied by a Train the Trainers course for the local anesthesiologists. All material necessary to run the course is left with the national anesthesia society. The intention is for the local providers to continue to teach the course and thus improve the management of obstetric patients in their country. It is difficult to establish whether training through the SAFE-OB course changes the national statistics, but 1 study from Rwanda demonstrates the effects on the anesthesia



Figure 4. Dr Kate Grady. full color



Figure 5. Drs Carolina Haylock Loor and Maytinee Lilaonitkul. full color

providers, who feel empowered to speak up and are more confident in their practice, especially in terms of preparation and communication.⁶

Inspired by the SAFE-OB course, Drs Isabeau Walker, Michelle White, and Faye Evans, all female pediatric anesthesiologists, the former 2 from the United Kingdom and the latter from Boston, got together and developed a SAFE-Paeds course. Children under 15 make up 26% of the world's population⁷ and the majority live in economically challenged areas. Therefore, it is essential that they can access safe anesthesia and surgery. The SAFE-Paeds course has been delivered in Kenya, Uganda, Madagascar, Ethiopia, Malawi, Zambia, and Guatemala. As with SAFE-OB, a Train the Trainers course enables the local teachers to adopt and disseminate the teaching. The recent course held in Guatemala trained 36 anesthesiologists from Latin America as SAFE-Paeds instructors. This course was planned and organized by Dr Sandra Izquierdo, with the support of the Guatemalan Society of Anesthesiologists (AGARTD), Dr Carolina Haylock Loor of Honduras from WFSA, and Dr Faye Evans and Dr Maytinee Lilaonitkul from the SAFE program—another triumph for the women of our specialty (Fig. 5).

Patient Safety

Global Oximetry (GO) Project, Surgical Safety Checklist, Lifebox

Women anesthesiologists have made very significant contributions toward improving patient safety in anesthesia. Dr Isabeau Walker of the

United Kingdom, Dr Florian Nuevo of Philippines, and Dr Ellen O'Sullivan of Ireland were major contributors to the development of what was called the GO Project initiated at the World Congress of Anaesthesiologists held in Paris in 2004.8 This project was conceived to test the theory that giving pulse oximeters to anesthesia providers who lacked one would improve patient safety. There were 4 test sites: India, Philippines, Vietnam, and Uganda. After education and training in the use of pulse oximetry, participants kept logbooks recording episodes of hypoxia and their responses to them. Over 8000 anesthetics were reviewed and the responses were considered to be appropriate. This project proved to be of great importance when the World Health Organization (WHO) was developing its Safe Surgery Saves Lives initiative.9 There was a great deal of discussion about what should be included on the Surgical Safety Checklist (SSCL). The GO project provided essential background information on the use of pulse oximetry, but the final push was provided by a distinguished female Professor of Anesthesia from Ibadan, Nigeria, Dr Olaitan Soyannwo. She recounted the story of how her firstborn suffered hypoxic brain damage, which likely would have been prevented if a pulse oximeter had been available. 10 The effects of hypoxia are life changing and long lasting, and the inclusion of oximetry on the SSCL is critical to the safety of patients worldwide.

As a result of the inclusion of an oximeter on the SSCL, the Lifebox Foundation was born. It was estimated that 77,000 operating rooms around the world lacked access to oximetry. Lifebox set out to develop an oximeter suitable for use under austere circumstances and at a reasonable cost. Lifebox does not provide oximeters alone, but combines this with education so that the recipients are comfortable with using the monitor and know how to respond to changes in oxygen saturation. This is of vital importance because so many anesthesia providers are nonphysicians. The success of Lifebox is well documented. Many people have been involved in this project, but Drs Isabeau Walker and Angela Enright (Canada) have been Trustees since its inception and, together with Dr Faye Evans, have developed the educational materials (Fig. 6).

The Helsinki Declaration on Patient Safety in Anesthesiology¹³

Dr Jannicke Mellin-Olsen of Norway was the driving force behind this initiative. The European Board of Anaesthesiology and the European Society of Anaesthesiology (ESA) produced this document in 2010 to improve patient safety in anesthesia in Europe. It includes useful suggestions for anesthesiologists to incorporate into their practice. It has been endorsed by the WHO, WFSA, and European Patients' Federation, and by many anesthesia societies worldwide. As a result, a new patient



Figure 6. Dr Isabeau Walker. full color

safety task force was launched in Europe. In 2016, the Patient Safety Movement Foundation named Dr Mellin-Olsen to its Board of Directors. 14

Dr Mellin-Olsen has been enormously active not only in European circles, but worldwide. She was Chair of the WFSA Education Committee from 2008-2012 and is now President Elect of WFSA. She was Chair of the European Board of Anaesthesiology and is currently Secretary of the ESA. Her contributions to anesthesia are legendary (Fig. 7).



Figure 7. Dr Jannicke Mellin-Olsen. full color

Women Leaders in LMICs

There are many women leaders in high-income countries who have been very active in working to improve anesthesia care in LMICs. Most are quite well known—people such as Dr Kelly McQueen, founder of the Alliance for Surgery and Anesthesia Presence Today (ASAP-Today), Dr Medge Owen, founder of Kybele, and Dr Lena Dohlman for her work with Health Volunteers Overseas. All 3 are recipients of the Nicholas Greene Humanitarian Award from the American Society of Anesthesiologists (ASA). However, I want to introduce to you some of the female leaders from LMICs whose work has led to change and improvement in anesthesia in their countries and regions. They are the unsung heroines.

Dr Florian Nuevo of Philippines has been a leader for patient safety not just in Philippines but in the Asian region. She is a past President of the Philippine Society of Anesthesiologists and a former Chair of the Executive Committee of the WFSA. Besides patient safety, her clinical interest lies in cardiac anesthesia and she is a frequently invited speaker. She is based at University of Santo Tomas in Manila (Fig. 8).

Dr Jeanne Uwambazimana was the only Rwandan anesthesiologist remaining in practice after the 1994 genocide in Rwanda. She carried the weight of Rwandan anesthesiology on her shoulders until help arrived in the form of the CASIEF and the ASA Global Humanitarian



Figure 8. Dr Florian Nuevo with Dr Gonzalo Barreiro President WFSA and Dr Angela Enright. [vullcore]

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Outreach Committee. Together with the Rwandan Government and the National University of Rwanda, they began a formal residency training program in 2006. It has since graduated 18 anesthesiologists, 12 of whom have stayed to practice in their country. The ratio of anesthesiologists to population is still very low, 13 anesthesiologists for 10 million people, but the progress has been enormous in every respect. Together with Dr Patricia Livingston from Halifax, Nova Scotia, who has been the CASIEF lead in this program for over 10 years, Dr Uwambazimana has played a key role in advancing anesthesia progress in Rwanda.

Professor Fauzia Khan has been a leader of anesthesia in Pakistan for many years. She has had a stellar academic career with teaching, research, and publications. She has served as Head of Department of Anesthesia at Aga Khan University in Karachi and was Dean, Faculty of Critical Care, College of Physicians and Surgeons of Pakistan, from 2009-2015. She is currently the Chair of the WFSA Committee on Safety. Fauzia is an excellent role model for anesthesiologists seeking an academic career.

Dr Carolina Haylock Loor comes from San Pedro Sula in Honduras, where she practices pain medicine. She is a member of the Board and Council of WFSA and a President of the Honduran Society of Anesthesiology (SHARD). Because her main interest is in pain management, she has been leading the development of the Essential Pain Management Course in Latin America. This is a short course developed to improve the recognition, assessment, and treatment of pain and is aimed at all medical professionals.

Dr Daniela Filipescu hails from Romania and is the first woman to lead the ESA. With over 30,000 members, the ESA is one of the largest societies of anesthesia in the world. Her term as President was so successful that the ESA awarded her Honorary lifetime membership. She was elected to the Council of the WFSA in 2016. A strong believer in teamwork, Daniela is fond of quoting the words of Henry Ford: "Coming together is a beginning, staying together is progress, and working together is success" (Fig. 9).



Figure 9. Dr Daniela Filipescu. full color

Conclusions

Those words of Henry Ford seem like a good way to end this brief review of some of the women who have contributed significantly to anesthesia across the world. Of course, there are many more—both recognized and unsung. However, these are among the most effective and determined women I have ever met. They have vision. They understand what it takes to improve medicine in general and anesthesia in particular and they have set about changing their world. They have been effective. They are wonderful role models not just for young female anesthesiologists, but for all. Without them, our specialty and many thousands of patients would be much worse off. To quote Margaret Mead: "Never doubt that a small group of thoughtful, committed citizens can change the world; indeed it is the only thing that ever has." 15

A.E. is a Past President of the WFSA and a member of the Board of the Lifebox Foundation.

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