

# EDUCATION

## A discussion of contemporary platforms for women in surgery

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### Abstract

While the number of females entering medical training has been increasing in recent years, only 30% of surgeons in Canada are women. This discrepancy can be attributed to many aspects, and the lack of representation is a notable barrier that aspiring female surgeons face early in their medical careers. With the growing popularity of virtual platforms, many thread-based discussion websites have placed connecting with like-minded individuals at our fingertips. An accessible platform for women interested in surgery is a natural progression to help bridge the gender gap within the field, and yet it has not been created. While there are many pre-existing women in surgery organizations that promote a mentorship ideology, accessibility is limited by membership fees. A completely free, thread-based platform that connects both prospective and current women in surgery may serve to advance the field through the lens of diversity and collaboration.

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The field of surgery has long been a male-dominated one, with women making up a significantly smaller percentage of practicing surgeons. According to the Canadian Medical Association, 43% of practicing physicians in Canada are female, yet only 30.3% of physicians in surgical specialties are women<sup>1</sup>. This finding is similar in the United States, where women make up only 28% of surgeons<sup>2</sup>. While the number of women entering medical school has been on the rise in recent years, with 57.9% of Canadian medical students being female in 2020/21<sup>3</sup>, this trend has yet to translate over into the surgical specialties. This lack of representation can make it difficult for female medical students, who are interested in surgery, to find female mentors and role models to provide guidance and support, as they navigate their training and career. This issue can be exacerbated when there are particularly lower female numbers in one's local area. Studies have found that the absence of a female mentor in surgery can discourage female medical students from pursuing a certain surgical specialty<sup>4</sup>. This lack of mentorship can make it difficult for students to gain the confidence and skills they need to succeed in the field and can also make it harder to find opportunities to build a network of peers and connect with other female surgeons.

Another challenge facing female medical students interested in surgery is the lack of personal connections with upper-year students, residents, and attendings. Without pre-existing relationships, it can be difficult for students to build the connections they need to succeed in the field. Not only can this make it harder for them to find opportunities to learn from more experienced surgeons, but it can also make it more dif-

icult for them to find guidance throughout medical school. According to a study published in the *Journal of Surgical Education*, female medical students are more likely to enter a residency program that has a significantly higher proportion of female residents in the year ahead<sup>4</sup>.

Organizations such as the Association of Women Surgeons (AWS) and the Women in Surgery Network (WiSN) in the UK are valuable resources for female surgeons to connect and support each other; however, memberships like these often require a yearly fee, which limits their accessibility. Mentorship can take many forms and can come from many different sources. While programs currently exist to connect female mentors with mentees, it can be difficult for mentors to maintain a 1-on-1 commitment with their already busy schedules. Female medical students interested in surgery should not limit themselves to only finding a traditional mentor, but also look for role models, peers and sponsors who can provide guidance and support in their journey.

To ameliorate this current issue facing women with surgical interests, an online platform to connect women in surgery and female medical students interested in surgery from across the Atlantic provinces should be considered. Prior to the Covid-19 pandemic, online platforms were seldom used for education; however now, they are here to stay. This online platform could provide medical students, residents, and attendings an area to discuss topics all from the comfort of their own home. The platform could be restricted to those enrolled in undergraduate or postgraduate medical education programs along with practicing physicians to

maintain its integrity.

Similar to pre-existing forum websites, a thread-based platform could be used to enable members to post and receive feedback from anyone on the platform and allow freedom for users to communicate whenever convenient. This design eliminates the burdensome relationship that a mentee and mentor relationship can often create. Further, it may enable mentees to develop relationships with more than one mentor, which may provide multiple perspectives on a given matter. All users could have their first and last name as well as a photo linked to the account to limit the potential toxicity that anonymous online forums can sometimes create. This may also aid in bridging the disconnect that exists when using virtual platforms. Profiles could be customizable, where one can share personal achievements and interests to aid in networking and potentially further one's career. Finally, it could have a catchy title like "SurgX" to attract the younger generation of surgeons.

A limitation in this platform's implementation would be funding, which could be remedied through funding from institutions or provincial health authorities. A yearly maintenance fee could provide the platform with enough funding not only for its implementation, but also its routine maintenance. Departments of Surgery at various universities may find this to be a valuable investment if their goal is to increase the diversity of their departments. Lack of time for professionals to provide their input also poses an issue, which could be remedied by having quarterly webinars for physicians to attend whenever their schedule allows. Further, having multiple surgeons from across the Atlantic provinces on this platform would increase the pool of available mentors at any given time. Visibility may also be limited in the preliminary stages; however, Women in Surgery Interest Groups are commonplace in medical schools and would be inclined to help promote this platform.

In conclusion, the lack of female representation in the surgical specialties has created a large barrier for female medical students interested in surgery. With so few female mentors and role models to look up to, it can be difficult for these students to gain the confidence and skills they need to succeed. However, female medical students could overcome these challenges by using an accessible platform such as the one described in this article to build connections with like-minded individuals and mentors which may help them succeed in their chosen field. Overall, discussions aimed at increasing the diversity and representation of the surgical field must be supported by institutions, societies, and organizations before any real change can be seen in this field.

## References

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