

# “I consider myself to be a leader”: a qualitative exploration of early career women family physicians’ intentions to assume a leadership role

Annie Koempel<sup>1,\*</sup>, Melissa K. Filippi<sup>2</sup>, Madeline Byrd<sup>1</sup>, Anam Siddiqi<sup>2</sup>, Andrew Bazemore<sup>1,3</sup>,  
Yalda Jabbarpour<sup>2</sup>

<sup>1</sup>American Board of Family Medicine, 1648 McGrathiana Parkway, Lexington, KY 40511, United States

<sup>2</sup>Robert Graham Center for Policy Studies in Family Medicine and Primary Care, 1133 Connecticut Ave NW #1100, Washington, DC 20036, United States

<sup>3</sup>Center for Professionalism and Value in Healthcare, 1016 16th Street NW, Suite 700, Washington, DC 20036, United States

\*Corresponding author: American Board of Family Medicine, 1648 McGrathiana Parkway, Suite 550, Lexington, KY 40511-1247, USA. E-mail: [AKoempel@theabfm.org](mailto:AKoempel@theabfm.org)

## Abstract

**Background:** Despite the increasing presence of women in US medical schools over the past 25 years, gender equity in medical leadership remains elusive. This qualitative study delves deeper into definitions of institutional leadership roles, who they are designed for, and how women currently contribute in unrecognized and uncompensated leadership positions.

**Methods:** We recruited family physicians who responded to the American Board of Family Medicine 2022 or 2023 graduate survey. We developed a semistructured interview guide following a modified life history approach to uncover women's experiences through the stages from residency to workforce. A qualitative researcher used Zoom to interview 25 geographically and racially diverse early career women physicians. Interviews were transcribed verbatim and analyzed utilizing NVivo software following an Inductive Content Analysis approach.

**Results:** Three themes emerged from the data. First, the nature of institutionally recognized leadership positions was largely perceived as bureaucratic and disciplinary, which did not appeal to most participants. Second, women engaged in leadership roles that increased practice efficiency, improved working conditions, and added to their emotional labor—without remuneration. Third, women experienced a tension between work and family, but this did not impact their long-term career goals—which remained focused on patient care or lower-level leadership positions.

**Conclusion:** Increasing the number of women in leadership positions can be achieved through innovative leadership models that prioritize collaboration, flexibility, and work–life balance. Organizations must revise definitions of leadership to expand it to include the valuable, unrewarded work women undertake that advance their goals and overall patient health.

**Keywords:** family medicine; leadership; pay equity; primary care; primary care physicians; qualitative research; women physicians

## Background

Over the past quarter century, women have comprised a significant portion of the US medical student population, recently surpassing men in total enrollment numbers [1]. However, gender parity has not reached medical leadership. Women are severely underrepresented in high-level medical leadership roles like hospital CEOs (Chief Executive Officers) (18%), deans (27%), department chairs (25%), editors-in-chief of medical journals (7%), and executive teams (33%) [1–4]. Additionally, research shows lower promotion rates for women faculty. Among those who became assistant professors in 2003–04, 31% of women achieved promotion over 10 years compared to 37% of men. Some medical departments exhibit even larger promotion discrepancies disfavoring women [4].

While some progress has been made, persistent gaps across levels of medical leadership indicate systemic and institutional barriers continue to impede the advancement of women in medicine. This is not only a setback for women, but for the systems that would benefit from their leadership

[5, 6]. Research suggests implicit gender biases, discrimination against women with children, restrictive organizational policies and cultures, intersectional disadvantage, work–life pressures rooted in gender norms, and workplace sexism as reasons for the extensive underrepresentation [1, 5, 7–10]. Evidence also shows that women and men equally enjoy and thrive in decision-making managerial roles [11, 12]. Ultimately the data reveal the root causes of women's absence from medical leadership are systemic and institutionalized biases and barriers—not deficiencies in women [9]. Many women may actually be better suited to values-driven leadership models that emphasize collaboration, support, advocacy, and strong communication [6].

This qualitative study of early career women family physicians adds needed nuance to current understandings of what institutional leadership roles are, who they are designed for, and the ways women occupy unrecognized and unrewarded leadership positions. While previous research has explored women's experiences in leadership, this is the first study to focus exclusively on women who are *considering* leadership.

## Key messages

- Participants hesitated to take on bureaucratic and disciplinary leadership roles.
- Women already engage in leadership activities and roles without additional pay.
- Family was not a perceived barrier to achieving long-term career goals.

## Methods

This paper is part of a larger qualitative study concerning the gender pay gap within family medicine, of which leadership is one piece. A purposeful sample of American Board of Family Medicine (ABFM) diplomates who self-identified as women were recruited via email. All participants were early career physicians (3–5 years out of residency) and reported making less than the average income of \$250 000 for a family physician in the USA. For a more detailed review of the methods, refer to Koempel et al. (2024) [13]. This study was approved by the American Academy of Family Physicians Institutional Review Board.

## Results

Efforts were made to recruit a diverse sample of early career women family physicians; 155 emails were sent to eligible physicians inviting them to participate with a final sample of 25 participants. Interviews continued until thematic saturation was achieved. Forty percent of the sample self-identified as White, a quarter (24%) as Black, and a quarter (24%) as Asian (Table 1). Approximately one-third of participants (32%) worked in the Western census region of the USA, primarily in an urban location (84%). The average age of participants was 35 years old and 36% worked in a hospital or hospital-owned practice.

While the language in this study and current paper reflects a gendered binary, it is important to note that nonbinary and transindividuals face their own challenges navigating the same systems. Furthermore, we acknowledge the fluidity of gendered perspectives rather than strict, binary rules.

Three main themes emerged from the data about leadership. First, the nature of institutionally recognized and rewarded leadership positions was largely perceived as bureaucratic and disciplinary, which did not appeal to most participants. Second, women quietly engaged in leadership roles that increased practice efficiency, improved working conditions, and added to their emotional labor—without remuneration. Third, women experienced a tension between work and family, but this did not impact their long-term career goals—which remained focused on patient care or lower-level leadership positions. For additional exemplary quotations per theme, please see Table 2 (below).

1. Recognized leadership positions are perceived as bureaucratic and disciplinary

Many women previously took on leadership positions during medical school and residency, but ultimately found the work, particularly sitting through meetings, tedious. They also found other aspects of leadership positions distasteful, particularly responsibilities that were seen as highly bureaucratic and/or disciplinary:

**Table 1.** Race and practice information of study participants from 2022 and 2023 ABFM National Graduate Survey (early career) ( $n = 25$ ).

Variable	Category	Percent ( $n$ )
Race	White	40% (10)
	Asian	24% (6)
	Pacific Islander or Native Hawaiian	8% (2)
	Black	24% (6)
	Other	4% (1)
Practice type	Hospital or Hospital-Owned Practice	36% (9)
	FQHC (Federally Qualified Health Center)	16% (4)
	Managed Care or HMO (Health Maintenance Organization)	8% (2)
	Academic Health Center	20% (5)
	Federal	4% (1)
	Government Clinic, nonfederal	4% (1)
	Independently Owned Medical Clinic	12% (3)
Rurality	Urban	84% (21)
	Rural	16% (4)
Census region	West	32% (8)
	South	28% (7)
	Northeast	24% (6)
	Midwest	16% (4)

“I don’t know [if I want a leadership position]....Mostly your responsibilities is to yell at people, to close their notes and call the patients who’ve complained that that doctor wasn’t nice or whatever.” (34, White, FQHC)

Many leadership roles increased meetings, paperwork, and disciplinary responsibility while simultaneously decreasing time spent in highly valued patient care. Many participants expressed strong emotional reactions to previous experiences in leadership.

“I think every time I try and sit in on one of those meetings, I can just feel my blood boiling. It doesn’t bring me joy. And being in a room with a patient or doing a procedure with a resident that brings me joy, that fills my cup up. So I want to focus on that.” (37, White, Managed Care Organization)

The responsibilities of leadership were seen to compromise not only opportunities to provide patient care, but personal and professional values:

“A lot of the people who take up leadership positions are not as interested in connectedness and collaboration and having those meaningful relationships and encounters with other people....That’s not my work style.” (32, Asian, Hospital)

Even when women were not in leadership positions, their exposure to meetings with leadership proved frustrating. Women reported not being listened to, being talked over, and not being taken seriously. They were not given any indication that this dynamic would change if they were in a leadership position.

"I don't know that the potential contribution in terms of leadership of women is equally recognized in comparison to my male colleagues. For example, in program meetings, I notice that the male opinion is valued more highly and they're less likely to be dismissed. Their comments are more likely to be acknowledged rather than glossed over in meetings." (38, Pacific Islander, Government nonfederal Clinic)

Other women valued their familial leadership roles more than advancing their careers.

"I consider myself to be a leader in my family and in my clinic." (35, Asian, Academic Health Center)

Along with motherhood, it is important to note the other leadership roles many women play in their families, as burdens of housework and elder care often also fall to women. As one physicians shared:

"I still have responsibilities at home, just because I work in medicine doesn't mean that my family doesn't expect me to be home, get dinner ready, get the kids ready for bed, school bag ready, all of these things are still my responsibility and that doesn't change just because I'm in medicine." (38, Pacific Islander, Government nonfederal Clinic)

## 2. Women already engage in leadership positions

Participants reported performing leadership activities that were not institutionally recognized or rewarded, such as teaching others to efficiently utilize electronic health records, collaborating to improve working conditions, cleaning up when staff were busy, and performing extra emotional labor. Many women took on patients with specialized treatment needs, including (but not limited to) young women with eating disorders or married women who wished to avoid pregnancy; two groups who are hesitant to discuss such matters with male physicians. Due to these—and other particularities—most women reported that their perceived workload was greater than their male counterparts.

"[Compared to men] women do a lot of unpaid work that is not directly visible unless you see it happening in real time. And that can be anything from staying longer, to finish calling patients, to being more attentive when in a patient encounter and spending more time with the patient, to spending more time talking to residents and mentoring them unofficially in unscheduled ways." (32, Asian, Hospital)

Women also reported additional emotional labor required to maintain respect from both patients and colleagues. This took the form of "going the extra mile" to prove themselves,

and having a constant "fear of stating needs," even when those needs concern work boundaries (i.e. not working after 7 p.m.) or family (i.e. picking up children or taking them to the doctor). Despite this, some women attempted to implement a values-driven leadership and communication style.

"[The previous medical director] was a paternalistic like 'this is how it's going to be' and 'this is what I need you to do' and 'you must do what I tell you'. And I'm a little bit more of a 'let's have a conversation and figure things out and decide what's best for our clinic.'...The current clinical director has made several comments to me.... He's just really struggling with the fact that I don't always agree with him." (37, White, Hospital)

If leadership is understood as influencing or guiding teams or organizations, women engage in near-constant leadership by standing up to male colleagues or spending extra time mentoring or providing quality patient care.

## 3. Women experienced tension between family and work but it did not impact long-term career goals

All participants were asked if they hoped or planned to hold any kind of leadership position. A minority stated that they had goals to become program directors or, in one case, the regional medical director. Only one participant desired an executive administrator position. This participant already had a young child and expressed frustrated uncertainty with the difficulties of being a leader at home and work.

"I don't know how to have a kid and be a leader because I just started this whole kiddo thing 10 seconds ago - like being fully present in my work is something that I pride myself in but trying to balance that with my kiddo...." (39, Black, Academic Health Center)

Women early in their careers may feel torn between the decision to start a family or step into a leadership role. This may be reinforced by advisors, mentors, and administrators. While participants who were interested in leadership stated they would wait until their children were grown, one woman delayed starting a family to step into a program director position.

"My husband and I were planning on trying to get pregnant this fall, but then once this [program director] offer came around, I asked the current [program director] what should I do?...So then she essentially told me that if I did need to go on some type of medical or parental leave that lasted for longer than 12 weeks, then I would no longer be program director anymore....[This] feels like a once in a career opportunity that if I were to say no now it might never come up..." (32, Asian, Academic Health Center)

While women felt there was tension between family and leadership, this did not prevent them from considering certain career goals. Most participants did not want an upper-level leadership role because they enjoyed patient care, did not want to do the job, or both—not because of family obligations. For example, one participant traveled weekly to another state to care for her aging father, but this did not factor into her career

**Table 2.** Additional Quotations by Theme.

Recognized leadership positions are perceived as bureaucratic and disciplinary	<p>"I don't know [if I want a leadership position]....Mostly your responsibilities is to yell at people, to close their notes and call the patients who've complained that that doctor wasn't nice or whatever." (34, White, FQHC)</p> <p>"I think every time I try and sit in on one of those meetings, I can just feel my blood boiling. It doesn't bring me joy. And being in a room with a patient or doing a procedure with a resident that brings me joy, that fills my cup up. So I want to focus on that." (37, White, Managed Care Organization)</p> <p>"I do know I don't have any interest in owning a practice or running a practice or being in administration or climbing the medical ladder....I'm trying to think of what leadership roles are available, but I'm like no, I don't want to do any of that" (33, Black, Independent Practice)</p> <p>"I would love to have a leadership position, but would that come along with a lot of just boring meetings and people management responsibility that I don't want?" (35, Asian, Academic Health Center)</p> <p>"I don't love leadership because I don't like being in charge of other people. So if [I do take on a leadership position] it would be less for telling other people what to do, because I hate that. And more for how can we improve the process for everyone." (37, Asian, Hospital)</p> <p>"I don't want to lead anyone, I don't want to manage people. That might change in the future, but I like just being responsible for myself. And not having other people work under me that I have to worry about." (35, Black, Academic Health Center)</p> <p>"My male colleagues did...a lot less patient care leadership and more administrative care leadership, which I fully admit, I have zero interest in." (33, White, Military)</p> <p>"Is [a leadership position] a hope and aspiration? No. Because when I hear leadership...that means I need to be in more meetings and do you get compensated for those things? Like for this little rural hospital, I'm the chair of the acute care committee and it doesn't have anything except a title....I don't necessarily have aspirations to be in a leadership position because there's no benefit at the end of the day." (32, Pacific Islander, FQHC)</p> <p>"A lot of the people who take up leadership positions are not as interested in connectedness and collaboration and having those meaningful relationships and encounters with other people....That's not my work style." (32, Asian, Hospital)</p> <p>"When I was a resident what seemed appealing to me was to be in a position where I was influential in the future of family medicine....as I slowly entered the workforce...I think the idea of being this influential person in family medicine became less and less real to me because I realized that it was fictitious....I don't have any desire to do the things that it would be required of me to get to that kind of leadership position. The people who I saw in leadership positions weren't doing meaningful work." (32, Asian, Hospital)</p> <p>"I don't think I could do only leadership or only administrative work because I take too much pride and satisfaction from seeing my patients." (37, White, Hospital)</p> <p>"I consider myself to be a leader in my family and in my clinic." (35, Asian, Academic Health Center)</p> <p>"I still have responsibilities at home, just because I work in medicine doesn't mean that my family doesn't expect me to be home, get dinner ready, get the kids ready for bed, school bag ready, all of these things are still my responsibility and that doesn't change just because I'm in medicine." (38, Pacific Islander, Government nonfederal Clinic)</p>
Women already engage in leadership positions	<p>"[Compared to men] women do a lot of unpaid work that is not directly visible unless you see it happening in real time. And that can be anything from staying longer to finish calling patients, to being more attentive when in a patient encounter and spending more time with the patient, to spending more time talking to residents and mentoring them unofficially in unscheduled ways." (32, Asian, Hospital)</p> <p>"I'm going to be that person doing unpaid emotional labor because I think it matters to the fabric of the place and I'm in and I want to be connected to the people who I work with." (32, Asian, Hospital)</p> <p>"As women we're expected to do more of the behind the scenes work, right? Like we're expected to - if we're running behind, we're expected to go get the patient from the front room or from the waiting room, we're expected to put in all the data, all the things that I just don't think I could see my male counterparts from residency actually doing that extra work. Or restocking my room....making sure that the trash is picked up in the hallway....or putting the water bottles back." (38, White, Managed Care Organization)</p> <p>"As far as committees to make change and stuff like that, there's women doing a lot more of that....part of joining the [hospital] network...it's put out as a soft obligation, but to teach, and I've had a lot of students already....I was reaching out to someone saying, 'it's a little upsetting to me that I have no idea what my title is, what my role is, is there any compensation for this?'... And this woman wrote back, she [wrote], 'there's no policy or protocol....one thing we do know is that women are definitely taking students on way more than men.'" (49, White, Hospital)</p> <p>"From a mentorship perspective, whenever our residents are thinking about family planning, whenever they're thinking about job negotiation, whenever they have any issue that comes up, they're much more inclined to ask one of our women faculty for advice." (32, Asian, Academic Health Center)</p> <p>"I definitely have more patience than my [male] colleagues to be able to have medical assistants or residents working with me on a regular basis....they didn't do it as often as I did." (33, Black, Independent Practice)</p> <p>"[The previous medical director] was a paternalistic like 'this is how it's going to be' and 'this is what I need you to do' and 'you must do what I tell you'. And I'm a little bit more of a 'let's have a conversation and figure things out and decide what's best for our clinic.'...The current clinical director has made several comments to me.... He's just really struggling with the fact that I don't always agree with him." (37, White, Hospital)</p> <p>"We have formalized ways of giving feedback and sometimes my feedback has included things like 'you're too outspoken,'... 'don't ask for that,'....I think if I was doing those things as a male, they would be like....'he's such a leader, he's really speaking up.'" (35, Asian, Academic Health Center)</p> <p>"When it comes to...workplace morale [like setting up] the Christmas party - maybe guys would sometimes pay for it, but they were definitely not doing the work involved." (33, White, Hospital)</p>

Table 2. Continued

Women experienced tension between family and work but it did not impact long-term career goals	"I don't know how to have a kid and be a leader because I just started this whole kiddo thing 10 seconds ago - like being fully present in my work is something that I pride myself in but trying to balance that with my kiddo...." (39, Black, Academic Health Center)
	"My husband and I were planning on trying to get pregnant this fall, but then once this [program director] offer came around, I asked the current [program director] what should I do?...So then she essentially told me that if I did need to go on some type of medical or parental leave that lasted for longer than 12 weeks, then I would no longer be program director anymore.... [This] feels like a once in a career opportunity that if I were to say no now it might never come up..." (32, Asian, Academic Health Center)
	"[A long term career goal of mine] is all about work-life balance....I think the biggest barrier would just be raising a family and trying to have that balance." (38, White, Managed Care Organization)
	"I've often thought as my boys get to the ages where they're in school and school hours don't align with clinic hours. I have to figure out what to do....But in terms of stopping me from [achieving my career goals], no. I think at the end of the day, ultimately my family will come first and we'll make it work. But I do see that I'm going to have to shift and adjust at some point." (37, White, Hospital)
	"One of my other colleagues who is primary care sports, she just came back from maternity leave. And then my [colleague from residency], his wife is pregnant, he mentioned the other day about his paternity leave and so I don't think there's got to be barriers, but you have to figure out the logistics and that kind of stuff." (34, White, Hospital)
	"[My dad] was diagnosed [with cancer] not too long before I was hired....So right now I just work Mondays and Tuesdays in clinic every week and then every other Thursday I'm allowed to do remote....in case I needed to go see my dad....And that works fine." (37, Asian, Hospital)

calculations. Instead, she was waiting for an opportunity where she could "improve the process for everyone" without "being in charge of other people." In other words, the burden of childcare, housework, and elder care often fell to women, which often was in tension with their jobs, but having such responsibilities did not influence long-term career goals.

## Conclusions

This study explored early career women family physicians' perceptions of and willingness to engage in leadership positions, contributing new perspectives in an ongoing discourse surrounding gender disparities in medical leadership. Women largely perceived institutionally recognized and rewarded leadership positions as bureaucratic and disciplinary, which would take time away from highly valued patient care. Participants also reported a wide range of leadership activities they engaged in that increased practice efficiency, improved working conditions, and added to their emotional labor—without recognition or remuneration. Finally, most women expressed a tension between family and work responsibilities, particularly as the result of their disproportionate share of childcare, eldercare, and housework burdens. Notably, this tension created barriers but did not prevent women from conceptualizing or working to attain their long-term career goals.

Leadership positions are widely understood as those that are institutionally recognized and rewarded, which contributes to overlooking the wide range of leadership activities women already regularly engage in. Previous research found that women spend more time providing patient care, which can negatively impact productivity-based metrics and payment while improving health outcomes [14–16]. This research adds to the conversation by highlighting the additional work women undertake, from providing complex women's health care to taking a more collaborative approach to daily practice management. Women's unseen leadership activities are outside institutionally recognized bureaucratic and disciplinary roles, but demand just as much—if not more—attention and remuneration.

The root causes of women's absence from medical leadership are not the result of deficiencies in women [9]. Many women in this study valued being present for their family alongside career advancement—a decision that reflects values-driven leadership styles that could play a key role in transforming the healthcare system [6]. Women often face a double bind in that they must "act like men" or risk being overlooked [5]. When it comes to leadership, many women in the present study refused to "act like men" by not pursuing leadership roles that reinforced the status quo. Rather, they continued to press against barriers, becoming leaders in their own way. Future research should explore the institutional implementation of such innovative, values-driven leadership models that prioritize collaboration, flexibility, and work-life balance. Future research should also explore the role of spouses, siblings, and other support networks in supporting women to care for their families without abandoning their long-term career goals.

The narrowly defined sampling frame of this study (early career women physicians who are diplomates of the ABFM and earn less than average) is a strength in that it increases the transferability of results across similar groups in the USA. However, the results of this study are not generalizable.

Data collection methods were designed to gather in-depth, nuanced data concerning women's experiences in their first job(s) after residency. A strength of this method is in the range of human experience revealed and that is often lost in the process of quantification. This research cannot speak to the perspectives of later career women, men, nonbinary individuals, or health systems' administrators. Additionally, most participants worked in an urban setting; results may not fully reflect the experiences of rural physicians.

Early career women family physicians perceived institutionally recognized and rewarded leadership positions as bureaucratic, disciplinary, and often unappealing, particularly juxtaposed against time spent in highly valued patient or family care. Participants overwhelmingly reported engaging in unrecognized and undervalued leadership activities. Organizations must shift toward values-driven

leadership models that include the valuable, unrecognized, and unrewarded work women regularly undertake, which will benefit both women physicians and the healthcare system. Institutions should develop innovative compensation models, such as educational value units for academic work and non-fee-for-service contracts to ensure fair compensation for the full range of leadership and care activities performed by women physicians.

## Acknowledgments

This study was made possible by the participation of women family physicians who volunteered their time and stories to advance the understanding of the personal impacts of the gender pay gap and other gendered issues within medicine.

## Conflict of interest

A.K., M.B., and A.B. are employees of the American Board of Family Medicine; M.K.F., A.S., and Y.J. are employees of the Robert Graham Center for Policy Studies in Family Medicine and Primary Care.

## Funding

None declared.

## Data availability

Due to the sensitive nature of qualitative data and concerns around participant privacy, the full data set is not available. Access to the data may be available upon a reasonable request with specific restrictions on data use and protection of participant anonymity.

## References

1. Mangurian C, Linos E, Sarkar U, et al. What's holding women in medicine back from leadership. *Harv Bus Rev*. Published online 19 June 2018. <https://hbr.org/2018/06/whats-holding-women-in-medicine-back-from-leadership> (15 February 2024, date last accessed).
2. Adetoye M, Gold K. Race and gender disparities among leadership in academic family medicine. *J Am Board Fam Med* 2022;35:902–5. <https://doi.org/10.3122/jabfm.2022.05.220122>
3. Odei BC, Seldon C, Fernandez M, et al. Representation of women in the leadership structure of the US health care system. *JAMA Netw Open* 2021;4:e2136358. <https://doi.org/10.1001/jamanetworkopen.2021.36358>
4. Lautenberger D, Raezer C, Bunton SA. *The Underrepresentation of Women in Leadership Positions at U.S. Medical Schools*. AAMC Analysis in Brief. <https://www.aamc.org/media/7946/download?attachment> (15 February 2024, date last accessed).
5. Women in Global Health. *The State of Women and Leadership in Health*. Washington DC, USA: Women in Global Health, 2023, 20.
6. Herbert CP. Perspectives in primary care: values-driven leadership is essential in health care. *Ann Fam Med*. 2015;13:512–3. <https://doi.org/10.1370/afm.1877>
7. Stone T. *Closing the Gender Gap in Healthcare Leadership*. <https://www.oliverwyman.com/our-expertise/insights/2020/mar/needed-more-women-with-power/collection-of-articles/closing-the-gender-gap-in-healthcare-leadership.html> (15 February 2024, date last accessed).
8. Shlian, D. Women continue to make gains in medicine, but much work remains to be done. *MedicalEconomics*. 4 May 2023. <https://www.medicaleconomics.com/view/women-continue-to-make-gains-in-medicine-but-much-work-remains-to-be-done> (15 February 2024, date last accessed).
9. Mousa M, Boyle J, Skouteris H, et al. Advancing women in healthcare leadership: a systematic review and meta-synthesis of multi-sector evidence on organisational interventions. *EClinicalMedicine* 2021;39:101084. <https://doi.org/10.1016/j.eclinm.2021.101084>
10. Gin N. *Opinion | Four Key Steps to Advance Women Leaders in Medicine*. 8 March 2023. <https://www.medpagetoday.com/opinion/second-opinions/103444> (8 February 2024, date last accessed).
11. Stephenson AL, Sullivan EE, Hoffman AR. Primary care physician leaders' perspectives on opportunities and challenges in healthcare leadership: a qualitative study. *BMJ Lead* 2023;7:28–32. <https://doi.org/10.1136/leader-2022-000591>
12. Sullivan EE, Stephenson AL, Hoffman AR. Engaging physicians in leadership: motivations, challenges, and identity-based considerations. *J Healthc Manag* 2022;67:254–65. <https://doi.org/10.1097/JHM-D-21-00224>
13. Koempel A, Filippi MK, Byrd M, et al. “This seemed more negotiable”: a qualitative assessment of how early career family medicine women physicians negotiate their first job after residency Journal of the American Board of Family Medicine. *J Am Board Fam Med* 2024;37:690.
14. Asgari MM, Carr PL, Bates CK. Closing the gender wage gap and achieving professional equity in medicine. *JAMA* 2019;321:1665–6. <https://doi.org/10.1001/jama.2019.4168>
15. Eden AR, Bazemore A, Morgan ZJ, et al. Family physicians increasingly deliver care in diverse languages. *J Am Board Fam Med* 2022;35:5–6. <https://doi.org/10.3122/jabfm.2022.01.210190>
16. Ganguli I, Sheridan B, Gray J, et al. Physician work hours and the gender pay gap—evidence from primary care. *N Engl J Med* 2020;383:1349–57. <https://doi.org/10.1056/NEJMsa2013804>