



## Women in Nephrology—India: A Vision for the Future

With more women joining the nephrology workforce in recent years, their challenges are being increasingly appreciated. The advent of women nephrologists has been a significant catalyst for progress in medical science and nephrology. This societal change in attitude and acceptance took a lot longer, over 100 years since India had the privilege of having the first woman physician—Dr. Anandi Gopal Joshi.<sup>1</sup>

Research has shown that women health professionals contribute unique perspectives, fostering a more inclusive healthcare environment. Their diverse approaches improve decision-making, patient trust, and overall healthcare quality, improving patient outcomes. Greenwood *et al.* revealed an asymmetry in acute myocardial infarction (AMI) mortality based on physician–patient gender concordance.<sup>2</sup> Female patients treated by male physicians compared to female physicians had a higher mortality, underscoring the critical role of gender balance in enhancing healthcare outcomes. The study additionally revealed that male physicians show greater efficacy in treating female AMI patients when they work alongside more female colleagues and have a history of treating a greater number of female patients. Another study showed that elderly patients cared for by female internists experienced lower mortality and readmissions.<sup>3</sup> These findings emphasize the nuanced differences in practice patterns between male and female physicians, signaling essential clinical implications of gender diversity in the medical workforce for overall patient well-being.

The contribution of women scientists in renal physiology by scientists such as Phyllis Adele Bott and Margaret Mylle has been acknowledged over the years.<sup>4,5</sup> But the major push for women physicians in our sub-specialty happened half a century back when Prof. Priscilla Kincaid-Smith had the distinction of leading the International Society of Nephrology (ISN) as its first female president (1972–1975).<sup>6</sup> On a global scale, as well as in India, there is an increasing representation of women in the medical profession, including nephrology. The increasing number of women in the medical workforce in India, as highlighted by a recent WHO report, signifies a transformative shift in the healthcare landscape. Female allopathic doctors outnumber their male counterparts by significant margins in states like Himachal Pradesh, Uttarakhand, and Kerala.<sup>7</sup> The trend extends to medical education, with 82% (data from Kerala) of seats filled by girls in MBBS, Dentistry, Homeopathy, and Ayurveda courses over the last 5 years (Admission year 2017 to 2021).<sup>8</sup> In 2013, approximately 2 lakhs, were pursuing undergraduate medical courses compared to 1.75 lakh boys.<sup>9</sup> This increase in female

representation brings exciting prospects for the future of medicine, including nephrology. With the increasing number of women in medicine, nephrology is expected to also see a rise in female professionals. Therefore, it is highly probable that the gender disparity will diminish. The disparities in certain states underscore the need for targeted efforts to enhance female participation in medicine, ensuring a balanced and inclusive healthcare workforce.

The first women's professional body was the Women in Nephrology, which started in 1983. In India, Prof. Vidya Acharya, one of the pioneers in Indian nephrology, articulated the need for a similar initiative many years ago. Her inspiring life has, over the years, transformed the professional landscape for lady nephrologists. She always thought of an organization that would empower women nephrologists and foster an environment of equality. Her distinction as the first woman nephrologist in the country and the first woman president of the Indian Society of Nephrology is a testament to her unwavering dedication and exemplary leadership. The first such initiative was a meeting of all women nephrologists in the city of Bengaluru under the aegis of the Indian Society of Nephrology in 2011. This meeting was well attended and it was decided that this initiative should be taken forward. After smaller gatherings and sessions in the Indian Society of Nephrology, this idea finally came to fruition with the virtual launch of Women In Nephrology-India (WIN-India) on August 13, 2021. This initiative is committed to recognizing and nurturing the talents of women in nephrology.<sup>10</sup> It wishes to advocate for equal opportunities and celebrate the achievements of young women professionals. By fostering a culture of inclusivity, WIN-India wishes to pave the way for a brighter future in nephrology, where women's contributions are instrumental in advancing kidney care and research.

WIN-India intends to create connections with a variety of participants, from patients and nurses to dialysis technicians, voluntary organizations, and nutritionists to experts in fields like cardiology, pathology, and endocrinology.

WIN-India was long overdue as challenges of gender bias persist in the medical field. Gender prejudices include inadequate acknowledgment, pay inequity, and insufficient representation in national and international nephrology societies. They often face stereotypes and prejudices that hinder their professional growth.

Notably, the issue of pay equity remains a pronounced challenge, specifically within the private sector.<sup>11</sup> For young professionals, balancing a demanding career with personal

and family responsibilities can be overwhelming. Societal expectations and cultural norms can and do impose limitations on women pursuing careers in difficult and busy subspecialties like nephrology. WIN-India stands provides a supportive platform, and offers visibility, mentorship, and opportunities for women across the country, particularly the younger generation. Through mentorship from experienced senior women nephrologists who have navigated similar challenges, the newer generation receives valuable guidance.

Since its inception, WIN-India has grown to a membership of more than 300 lady nephrologists nationwide. The organization remains actively involved in promoting and disseminating knowledge. Online seminars, quizzes, and symposia have been organized regularly. Both national and international nephrology trainees have participated in its activities. WIN-India's facilitation of webinars on statistical analysis effectively stoked the research enthusiasm of junior faculty and trainees. These webinars aimed to provide valuable guidance to aspiring researchers, fostering their interest and proficiency in statistical methodologies. According to a survey conducted on WIN-India, over 60% of respondents expressed that the educational material provided was beneficial for both practical use and examination purposes.<sup>12</sup> The organization WIN-India has launched a website at [www.winindia.org](http://www.winindia.org) and also a newsletter entitled Women in Nephrology-Gupshup (WINGS) and is releasing a quarterly journal titled "Indian Journal of Kidney Diseases (IJKD)." Apart from the central governing body, several states have initiated the setting up their own WIN-India state chapters. In August last year, WIN-India organized its inaugural annual WIN-ICON conference, which featured national and international faculty and provided numerous budding nephrologists with valuable opportunities. The second conference was organised in August 2023 in Bengaluru.

WIN-India also engages in collaborative educational initiatives with various national societies such as pathology, endocrinology, cardiology, pediatric nephrology, and renal nutrition. ISN has been a constant source of support and has allocated an hour for a dedicated symposium at the World Congress of Nephrology (WCN). Two such symposia were conducted in WCN 2022 and 2023. WIN-India consistently engages patients in its activities. Between 2022 and 2023, four patient advocacy programs focused on raising awareness about organ donation and patient well-being have been conducted. Efforts are underway to establish registries specifically targeting kidney disorders in women.

WIN-India has also participated during the World Kidney Day activities, invoking participation from patients, nurses, dialysis technicians, nutritionists, doctors, and voluntary organizations. WIN-India's growth has inspired African

women nephrologists and initiated their activities under the umbrella of WIN-AFRAN.

WIN-India exhibits a robust social media presence across multiple platforms, including Twitter, Instagram, and Facebook and has effectively coordinated interactive discussions, known as #IWINChat, on Twitter, pertaining to significant subjects within the field of nephrology. In recognition of their outstanding efforts, WIN-India received the NephJC Social Justice Award in 2021.<sup>13</sup>

The insights gained from these initiatives hold considerable potential for utilization in administrative advocacy and facilitating improvements in kidney care on a global scale. Besides providing networking and training platforms, pursuing research and propagating advancements is a key focus for the organization. By actively engaging in research endeavors, young nephrologists contribute to advancing medical knowledge and developing innovative treatment approaches for kidney diseases. Promoting academics and mentor-mentee activities is another vital goal. By nurturing a culture of mentorship and fostering an environment of support, women in nephrology empower young professionals to thrive in their careers. One notable initiative, WIN-India, exemplifies these goals by uniting young nephrologists nationwide. By leveraging the wealth of experience seasoned professionals possess, this organization aims to enhance knowledge exchange and encourage research in the field of kidney diseases. Moreover, this initiative aims to promote women's participation and leadership roles. By advocating for gender equality and inclusivity, they strive to shape a future where women have equal opportunities to excel and lead in the field.

As we envision the future of WIN-India, it is essential to recognize the immense potential of the young nephrologists and the vital role they play in shaping the nephrology landscape of India. In this regard, the organization has many plans. It wishes to start mentorship programs that pair experienced researchers with aspiring women nephrologists. Engaging in public outreach activities and advocacy is another area where WIN-India will work with all stakeholders (local communities, nongovernmental organizations, etc.). Online registry platforms are already in place, and ethical approvals have been obtained. Developing an e-library is also in the pipeline. This digital repository will serve as a valuable tool for self-learning, professional development, and staying updated with advancements in the field. WIN-India is actively engaged and will continue to promote gender-sensitive healthcare practices, including early diagnosis, personalized treatment plans, and mental health support. Collaboration with governing bodies and policymakers will be essential in formulating guidelines that address the specific needs of women patients with kidney diseases.

The goals of WIN-India extend beyond mere career advancement. The provision of maternity leave, lactation rooms, and supplementary childcare assistance are crucial issues that require attention. Furthermore, it is acknowledged that the equilibrium between professional and personal life and the psychological well-being of female nephrologists holds significant value. Our commitment lies in enhancing these domains, and cultivating a milieu that facilitates personal and occupational growth. Table 1 shows key features of Women in Nephrology-India organization in a glance.

In conclusion, the increasing presence of women in nephrology has positively impacted medical science, with their unique perspectives enhancing healthcare inclusivity and decision-making. WIN-India has been actively addressing challenges, providing support, and building a strong community for women nephrologists. Through its global collaborations, educational focus, and advocacy efforts, WIN-India has demonstrated its commitment to achieving gender equality, promoting excellence, and prioritizing the well-being of women in nephrology. With a continued vision of empowerment, the organization

**Table 1: Women in Nephrology — India: In a glance**

Inception of Women-In Nephrology	2021
Total number of conferences conducted (WIN-ICON)	2 (2022 and 2023)
Total number of WIN-India members	300
Website	www.winindia.org
Newsletter	WINGS (Women in Nephrology-Gupshup)
Journal	“Indian Journal of Kidney Diseases (IJKD)” published quarterly
Educational activities	Online seminars, quizzes, symposiums, webinars on statistical analysis and nutrition in kidney diseases on a regular basis
Collaborative programs	For patients, nurses, dialysis technicians, nutritionists, and doctors. Collaboration with governing bodies, voluntary organizations, and policymakers.
Social media activities	Engaging profiles on Twitter, Instagram, and Facebook. Interactive #IWInChat on Twitter. Received NephJC Social Justice Award in 2021
Public outreach activities and advocacy	With the help of all stakeholders (local communities, nongovernmental organizations, etc.).
Future directions	Mentorship program, online registry platforms, and developing an e-library

WIN-ICON -Women in Nephrology-India Conference; WIN-Women in Nephrology; NephJC-Nephrology Journal Club; IWIn-India Women in Nephrology

provides mentorship, outreach, and learning resources, all while emphasizing the importance of work-life balance and mental health.

### Conflicts of interest

There are no conflicts of interest.

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### About the Cover Image

A 51-yr-old female presented with trace proteinuria and renal dysfunction. She gives a history of dryness of eyes and mouth. Serum is positive for Anti-SSA and Anti-SSB antibodies. C3 is normal. Serum albumin was 4.2 gm/dL and serum creatinine 2.4 mg/dL.

Kidney biopsy showed 10 glomeruli. Glomeruli show focal and segmental shrinkage of the tufts with ischemic wrinkling of capillary walls. Tubulointerstitial compartment shows moderately dense lymphomononuclear cell infiltrates and lymphoid aggregate formation (a). Admixture of plasma cells and lymphocytes are seen in the interstitium (b). Arteries show mild degree of tunica media hyperplasia and intimal thickening. Immunohistochemistry for CD138 highlights plasma cells in the interstitium (c).

A diagnosis of chronic tubulointerstitial nephritis rich in plasma cells, consistent with Sjogrens' syndrome, is made.

Courtesy: Dr. Mahesha Vankalakunti, Consultant Nephropathologist, Manipal Hospital, Bengaluru, India