

## Editorial:

### TURNING BRAIN DRAIN OF HEALTH PROFESSIONALS INTO BRAIN GAIN: STRATEGIES FOR HARNESSING THE POTENTIAL OF SKILLED DIASPORA FOR PAKISTAN

Dr. Wajiha Rizwan (MBBS, FCPS), Associate Professor, Pediatrics, University of Child Health Sciences Lahore, drwajiharizwan@gmail.com & Dr. Noor-i-Kiran Naeem (MBBS, FCPS, MSc. MEd), Assistant Professor, Medical Education, ABWA Medical College, Faisalabad, noorikiran@yahoo.com

## Abstract:

“Brain drain” is the migration of skilled professionals to improve their quality of life and living standards where better salary packages, advanced learning opportunities and healthier working environment are considered major driving forces. The phenomenon of brain drain of health professionals from developing countries to developed nations for greener future has been matter of serious concern for almost last two decades now. Around 56% of all international immigrant doctors from developing countries are relocating to four high income countries out of which 45% of immigrant doctors are from three countries including Pakistan, India and the Philippines. This immigration leads to severe shortage of medical expertise in their home countries. There is a need to explore the underlying existing factors leading to doctor immigration in Pakistan.

**Key words:** Doctor, Immigration, Brain Drain

## Introduction

Pakistan is a developing country that is the sixth most populous country in the world. The Health Care Delivery System(HCS) of Pakistan has always been subjected to many political, cultural and socioeconomic challenges. The political instability as well interference, poor funding, very insufficient budget reserved for health sector and improper management of resources are major factors that hamper the development of Pakistan’s HCS.<sup>1</sup> According to health workforce profile of Pakistan published by WHO in 2020<sup>2</sup>, Pakistan faces serious shortage of healthcare staff including nurses, paramedics and doctors. The doctor-to-patient ratio in Pakistan is 1:1300, much less compared to WHO suggested ratio of 1:1000.<sup>3,4</sup> This shortage eventually leads to poor healthcare access and delivery, overburdened health facilities impairing quality of care and loss of productivity having negative impact on economy due to increased illness rate among workforce. It also adds to dissatisfaction of patients as well health professionals.

According to an estimate, in Pakistan around 32,879 physicians graduate annually and 40% of these graduates go abroad to avail better professional opportunities citing low income, long hours of job, and inequality as the main reasons<sup>5</sup>. As reported by Bureau of Emigration and Overseas Employment, only 10 to 15 percent of physician, who leave country, come back.<sup>6</sup> This immigration unfortunately involves the most intellectual genius doctors who possess the ability to bring major reforms in health sector through innovative ideas. In 2022, around 832,339, skilled personal headed abroad. It shows that every day 2312 Pakistanis left their homeland during the recent year. This included 2,464 (0.29%) doctors, and 1768 (0.21%) paramedics and nurses.<sup>7</sup>



## **Factors Leading to Brain drain of health professionals and Possible Solutions:**

Addressing the following factors and implementing policies related to solutions can help mitigate the brain drain of doctors from Pakistan and encourage them to stay and contribute to the country's healthcare system.

	<b>Factor leading to brain drain</b>	<b>Possible solution</b>
1	Limited Career Opportunities	Creating more job opportunities in healthcare through public and private sector collaboration. Invest in expanding healthcare facilities and creating job opportunities based on merit. <sup>12,8</sup>
2	Low Salaries and Benefits	Increasing doctors' salaries and providing competitive benefits packages. Implementation of performance-based incentives to reward excellence. <sup>8,10,11,13</sup>
3	Security Concerns	Improve security in healthcare facilities and the surrounding areas. Develop specialized security measures for medical professionals. <sup>8,10</sup>
4	Political Instability	Work on political stability to create a conducive environment for professionals. Encourage medical associations to advocate for political reforms. <sup>8</sup>
5	Lack of Continuing Medical Education (CME)	Establish CME programs to keep doctors updated with the latest medical advancements. Provide financial support for doctors to attend conferences and workshops. <sup>8,10</sup>
6	Corruption and Red Tape	Implement strict anti-corruption measures and streamline administrative processes in healthcare institutions to reduce bureaucracy interference. <sup>8</sup>
7	Quality of Life	Improve living conditions, education, and healthcare for doctors and their families. Develop housing schemes and provide quality education for their children. <sup>10, 12, 13</sup>
9	Professional Recognition and Respect	Recognize and appreciate the contributions of doctors through awards and honors adding to their self-esteem. Promote a culture of respect for healthcare professionals. <sup>10,11, 12</sup>
10	Inadequate Job Satisfaction	Conduct regular surveys to assess job satisfaction among doctors and address their concerns. Create platforms for doctors to voice their opinions and be part of decision-making processes. <sup>12</sup> Develop telemedicine infrastructure to allow doctors to serve remote areas, increasing their reach and job satisfaction. <sup>12</sup>



11	Lack of Research Opportunities	Promote medical research by allocating funds, establishing research centers, and encouraging collaboration with international institutions. <sup>8,10,12,13</sup>
13	Limited Specialization Options	Expand the range of medical specialties available within Pakistan. Encourage doctors and nurses to pursue specialized training within the country. <sup>8,12</sup>

### ***Policies to convert “Brain Drain” into “Brain Gain and Regain”:***

There are certain benefits like remittances sent home and collaboration in education, innovation and research that migration of health professionals may lead to “financial and intellectual gain.” The government of Pakistan must establish effective policies to at least minimize the negative impact of brain drain to promote the development of health sector and economic stability in country.<sup>13</sup>

- **Pakistani foreign faculty hiring programs:** The government through public-private partnerships can offer permanent or short term employment to skilled diaspora in various medical institutes of Pakistan. These programs can help in “Brain Regain” bringing back those competent professionals and researchers who gained expertise and skill and can now transfer their knowledge and skills to Pakistani faculty and students.<sup>12</sup> The overseas Ph. D scholars can be attracted to return to homeland by establishing postdoctoral centers.<sup>14</sup>
- **Brain Circulation:** The Government needs to create financial incentives and attractive career pathways for doctors to stay in Pakistan yet offer opportunities for international collaboration and experience without requiring permanent relocation.<sup>14</sup>
- **Utilization of Remittance:** Remittances from skilled health professionals living abroad adds to foreign revenue for many developing countries. The policies to ensure the proper transfer of remittances can lead to the generation of revenues that could be invested in the social and economic development of the Pakistan. This can only have impact if this revenue is properly utilized in development through education and research. If our foreign faculty can be allowed exemption in tax and provided with some other incentives, they are willingly investing in innovation and research in Pakistan it will help to utilize the foreign remittance effectively.<sup>9</sup>

**Conclusion:** Skilled diaspora who have emigrated for various reasons are recoverable assets and can play vital role in development of homeland. However, this “Brain Regain” requires the opening of various creative conduits and supportive environment. Foreign trained health professionals should be encouraged to contribute to areas of national priorities for research and development.<sup>9</sup> Ultimately, involving health professionals who are living abroad in creating opportunities at homeland can help in retention and repatriation of national medical graduates

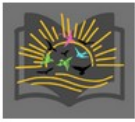
**Conflict of interest :** None

**Acknowledgement :**None

**Source of funding:** Not Applicable

### **References:**

- 1 Akram M, Inayat S, Hussain M. Analysis of the health care delivery system in Pakistan and Nepal. IJAHS. 2021 Sep 22;4(01):22-8.



- 2 WHO Regional Office for the Eastern Mediterranean. World Health Organization; Health workforce profile of Pakistan, 2020.
- 3 Khan SA. Situation analysis of health care system of Pakistan: post 18 amendments. *Health Care Current Reviews*. 2019;7(3):244.-
- 4 Khan SJ, Asif M, Aslam S, Khan WJ, Hamza SA. Pakistan's Healthcare System: A Review of Major Challenges and the First Comprehensive Universal Health Coverage Initiative. *Cureus*. 2023 Sep 4;15(9).
- 5 Nadir F, Sardar H, Ahmad H. Perceptions of medical students regarding brain drain and its effects on Pakistan's socio-medical conditions: A cross-sectional study. *PJMS*. 2023 Mar;39(2):401.
- 6 Bureau of Emigration and Overseas Employment. Islamabad: Government of Pakistan; 2002. [Accessed on Oct 13 2023]. Available at: <http://www.beoe.gov.pk>.
- 7 Evidence-based analysis. *Pakistan Journal of Medical Sciences*. 2023 May 27;39(4). doi:10.12669/pjms.39.4.7853
- 8 Sajjad N. Causes and Solutions to Intellectual Brain Drain in Pakistan. *Dialogue*. 2011;6(1):31-55.
- 9 Dodani S, LaPorte RE. Brain drain from developing countries: how can brain drain be converted into wisdom gain?. *Journal of the Royal Society of Medicine*. 2005 Nov;98(11):487-91.
- 10 Daugėlienė R, Marcinkevičienė R. Brain drain problem in Lithuania: Possible actions for its' solution via brain gain. *European Integration Studies*. 2009:14-22.
- 11 Firdos UZ, Asghar RS, Ashraf S. Managing Nursing Brain Drain from Pakistan. *European Academic Research*. 2020;7(10):5231-41.
- 12 Muula AS. Is there any solution to the "Brain Drain" of Health Professionals and Knowledge from Africa?. *Croatian Medical Journal*. 2005 Feb 1;46(1).
- 13 Pang T, Lansang MA, Haines A. Brain Drain and Health Professionals: a Global Problem Needs Global Solutions. *BMJ*. 2002 Mar 2;324(7336):499-500.
- 14 Nadir F, Sardar H, Ahmad H. Perceptions of Medical Students Regarding Brain Drain and its Effects on Pakistan's Socio-Medical Conditions: A cross-sectional study. *PJMS*. 2023 Mar;39(2):401. doi: 10.12669/pjms.39.2.7139
- 15 Chanda R. Trade in health services. *Bulletin of the World Health Organization*. 2002;80(2):158-63.