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CLINICAL PHARMACIST IN INDIA – SEARCHING FOR JOB IN THE WRONG PLACE

I have been visiting India every year since 2010, except for the 2 years when Covid interfered with all aspects of daily life - including travel. In the first few years of start of PharmD program in India, 2010-2012, when I asked students - how many of them would like to go to US following graduation – almost 80% of the hands went up. I shouldn't have been surprised, as most students joining PharmD were made to believe that once they get their PharmD degree, they will be qualified to practice as pharmacist in US and would be able to earn 10 times as much per year than they are investing in their education. No one ever told the students that they need to jump multiple hurdles, that was expensive both in terms of time and money, before they could be licensed.

Most of us, at least in India, decide on a career when we are 17. For most folks, in the 21st century, only the following three major career options were considered worth pursuing – Medicine, Engineering and Computer Science. As parents continue to pay for their children's college education, college bound students must choose one of the above three majors that is favored by their parents. Majority of the PharmD students chose this major because they didn't get the "Medical Seat". I have yet to meet a student over the past 10 years, who has joined the program because of the drug expertise they would gain, which in turn would enable them to improve their patients' life and alleviate human suffering. Second unusual reason for joining PharmD was the fact that they could put Dr. in front of their name. Looking back, I am not surprised, as these students all wanted to be Doctors and they are happy that they could now become "Dr" even though they didn't go to medical school!

This along with the fact that almost none of faculty member or administrator of the pharmacy colleges had ever worked in the community pharmacy had led to an erroneous belief that PharmD's should only practice in the hospital setting along with doctor. This fundamental logical error further prevented the recognition of the profession by the public, as they, on daily basis interact with poorly trained personnel managing medicine shop – who takes the money, hands over their drug without providing any information that could be considered of any value!

Compared to PharmD students in my College [in US], Indian PharmD students do get far more hospital exposure. In my college, most students do only 50 hours of intermediary pharmacy practice experience in a hospital setting prior to their advanced pharmacy practice rotation [clinical] rotations in their final professional year of pharmacy. In India, students go to hospital once a week in their third year [of 6-year program], spend several days a week doing a research project in their 5th year before starting their clinical rotation in 6th year. All this time spent in the hospital, certainly leads to much better clinical skills than students in US, but also make them believe that their skills are only relevant to hospital and not in a community setting.

Though three of the large hospitals I have visited employed over a dozen PharmD graduates as clinical pharmacists', most Indian hospitals only employ D.Pharm / B. Pharm graduates to fill the role of dispensing pharmacist [which meets the legal requirement as all three degrees - D.Pharm, B.Pharm and Pharm D are called registered pharmacist], with no clinical pharmacist on staff. With over 200 colleges awarding PharmD graduates, each with a graduating class of 30, results in over 6000 new PharmD graduates coming into the market every year and very few of them are ever going to find a job as clinical pharmacist in the hospital setting.

Many of them are therefore taking up jobs in

companies - servicing the area of pharmacovigilance, medical writing, multinational clinical trial, and outsourced medication therapy management services for US. Motivated students, acquiring additional skills while leveraging their strong foundation in drug knowledge have done both professionally and financially well and are certainly opening opportunities for additional PharmD graduates in these new areas.

In US, 70% of the pharmacy graduates [unlike India, to be a registered pharmacist in US requires PharmD degree], work in community setting. Why? Because that is where patients are. In India, however, while majority of the patient population lives outside the hospital, our PharmD graduates are only interested in working in the hospital!

According to article published by Geldsetzer [1] et al in JAMA, India has 97.5 million diabetes and around 300 million hypertensive patients. In a meta-analysis published by Koya et al [2] only 25% of the hypertensive patients in India are under control. If you take diabetes, according to Mathur et al. [3] - of the diabetic patients 45.8% were aware of their diabetics, 36.1% were on treatment and 15.7% had it under control. If PharmD's roll up their sleeves and start taking care of just diabetics and hypertensives, first in their family and then in the community – they would not only make a good living, but they also would have a tremendous impact on community health in a positive manner.

During my visits in the past decade, I had requested colleges I was visiting to add community pharmacy rotation for the final year student. No one did. I decided to take up the challenge and competed for a Fulbright -Nehru award titled – "Improving Patient Care by Empowering Community Pharmacist in India". I was successful and we are doing the first randomized control study on the impact of pharmacist in hypertension management.

While I look forward to sharing our findings in peer-reviewed publications and future issues of this journal, my question to the pharmacy practitioner is – *why they are inside hospital when patients are waiting outside in millions for your service?*

References:

1. Geldsetzer P, Manne-Goehler J, Theilmann M, et al. Diabetes and Hypertension in India: A Nationally Representative Study of 1.3 Million Adults. *JAMA Intern Med.* 2018;178(3):363–372. doi:10.1001/jamainternmed.2017.8094

2. Koya SF, Pilakkadavath Z, Chandran P, Wilson T, Kuriakose S, Akbar SK and Alic A. Hypertension control rate in India: systematic review and meta-analysis of population-level non-interventional studies,2001–2022. The Lancet Regional Health – Southeast Asia 2023;9: 100113

3. Mathur P, Leburu S, Kulothungan V. Prevalence, Awareness, Treatment and Control of Diabetes in India From the Countrywide National NCD Monitoring Survey. Front Public Health. 2022 Mar 14;10:748157. doi: 10.3389/fpubh.2022.748157. PMID: 35359772; PMCID: PMC8964146.