

Community Pharmacist in Dementia Care: A New Avenue in Community Pharmacy Practice: An Indian Perspective

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ABSTRACT

Dementia is a critical and growing public health challenge in India, with cases projected to triple by 2050. This crisis is exacerbated by a fragmented healthcare system, a severe shortage of specialists, and profound social stigma. As one of the most accessible and trusted health care professionals, Community Pharmacists (CPs) are a vital yet underutilized resource can become a cornerstone of community-based dementia support. This article identifies challenges in dementia care and highlights the opportunities for CPs to bridge the dementia care gap. CPs can adopt a multi-faceted role in person-centred services, enabling early detection, optimizing medication management, supporting caregivers, and linking people with dementia to formal services. This viewpoint also argues for urgent policy reform, pharmacy curriculum updates, and public-private partnerships to formally integrate dementia care into community pharmacy practice. These steps are essential to build a scalable, compassionate support system for millions of affected people with dementia and their caregivers.

Keywords: Community Pharmacy, Community Pharmacist, Dementia, Alzheimer's Disease, Caregiver Burden, India, Deprescribing, Public Health.

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INTRODUCTION

Dementia is a syndrome characterised by a progressive decline in cognitive function, and it is one of the most significant public health challenges in both developing and developed countries (Dhananjayan *et al.*, 2018). In India, the ageing population and life expectancy are rising; at the same time, the prevalence of dementia (≥ 60 years of age) also increased substantially from 5.3 million to 8.8 million (Lee *et al.*, 2023). This is expected to increase by 15 million by 2050, making India a country with the world's largest population of people with dementia (Kallumpuram and Kumar, 2019).

India is also facing a severe shortage of geriatric specialists, neurologists, and memory clinics, particularly in semi-urban and rural areas (Hartalkar and Hartalkar, 2025). The National Programme for Health Care of the Elderly (NPHCE) exists, but its implementation in daily practice regarding dementia-specific care is weak (Ahuja *et al.*, 2025). Even though in the absence of limited support from government, there are non-governmental organizations such as the Alzheimer's and Related Disorders Society of India (ARDSI), and Dementia India Alliance (DIA)

have been instrumental in creating awareness through various programmes in India to mandate the World Health Organisation's (WHO) Global Action Plan 2017-2025 (Garg and Gopal, 2025).

People with dementia and their caregivers can get adequate support from healthcare professionals to manage the problems associated with the syndrome.

Among them, Community Pharmacists (CPs) are highly accessible and trusted healthcare professionals who can serve as the first point of contact without the need for an appointment (Tsuyuki *et al.*, 2018). CPs are underutilised, even though they are available to offer essential longitudinal support to people with dementia (Muscat *et al.*, 2024). However, the current role of CPs in India is largely confined to dispensing, with the vast potential of person-centred care support remaining untapped. The aim of this article is to sensitise the challenges of dementia care in Indian health care settings and highlight the opportunities framework for Indian CPs to integrate into the dementia care system. Furthermore, the article discusses the key barriers to implementation in practice. It concludes with recommendations for policymakers and institutions to integrate dementia care into standard community pharmacy practice.

THE CHALLENGES IN DEMENTIA CARE

Low- and Middle-Income Countries (LMIC) face significant challenges in dementia care (Shaji, 2009). In particular, the Indian scenario presents a distinct set of challenges such as massive



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treatment gap, family caregiver burden, and polypharmacy and self-medication (Figure 1).

Massive Treatment Gap

There is an immense treatment gap in people with dementia between those who are affected and receiving appropriate diagnosis, treatment, and care. In India, over 80% of the cases remain undiagnosed without medical validation or support (Lee *et al.*, 2023). Even in some of the diagnosed populations, access to pharmacological and psychological interventions, rehabilitation services, day-care facilities, and caregiver support remains extremely limited, especially outside metropolitan areas (Alladi, 2021).

In general, the public and people working in primary care centres also have a lack of understanding and awareness about dementia (Suvarna *et al.*, 2022). On the other hand, due to inadequate training in geriatric management, GPs face difficulties in distinguishing the symptoms of dementia in an individual, whether it is due to ageing or mood disorders (Soni *et al.*, 2025), and this leads to misdiagnosis. This way, an individual affected by dementia stays in the line without proper diagnosis, treatment and care. The root causes of these treatment gaps are,

- Social stigma and Misconceptions – Due to the inability of the individual with dementia, his/her family hide them from the social environment (ARDSI, 2010). People have a false belief that symptoms of dementia are due to normal ageing and do not consider it a medical condition (Pacífico *et al.*, 2022).
- Lack of trained specialists – In India, there are severe shortages of trained geriatricians in dementia care (Hartalkar and Hartalkar, 2025). As of July 2025, there are only 300-350 geriatricians practising in India (Mittal, 2025).
- Primary Health Centres (PHCs) – Dementia care is poorly integrated into PHCs.
- Financial strain – Dementia care is costly right from diagnosis, long-term treatment, and care support, altogether making it so expensive for families (Rao and Bharath, 2013).
- Lack of national policy for dementia – There is a lack of national policy on dementia-specific care (Anirudhan *et al.*, 2025). A national dementia policy is essential, and it is the need of the hour.

The outcome of these treatment gaps affects both people with dementia and their caregivers. In the case of people with dementia, they lose the time for early diagnosis, because of this, their Behavioural and Psychological Symptoms of Dementia (BPSD) worsen and result in a severe health crisis (Jones *et al.*, 2021). Due to a lack of proper directions, family caregivers experience severe stress and financial problems. Altogether, leads to social isolation and withdrawal from community life (Azevedo

et al., 2021). (Note: BPSD symptoms - delusions, hallucinations, aggression, screaming, restlessness, wandering, depression, and anxiety).

The Family Caregiver Burden

In the Indian context, family members who serve as primary caregivers are often untrained, unsupported, and face uniquely different challenges. Family caregivers (informal) face physical, emotional, social, and financial strains (Reinhard and Feinberg, 2020). People with dementia exhibit specific activities such as nighttime wandering and frequent toileting. Caregivers are the ones who must observe such activities of people with dementia and assist them. These repeated activities are not only a physical burden (exhaustion and sleep deprivation) for caregivers but also make them neglect their own health (Turner *et al.*, 2024). Chronic stress in caregivers also affects immune function, which in turn increases their vulnerability to infections and chronic illnesses (Chakraborty *et al.*, 2023).

Family caregivers experience chronic grief due to the progressive decline of their loved ones and intense social isolation arising from dementia-related stigma (Palani *et al.*, 2025). In addition, they experience guilt, frustration, helplessness and frequently misinterpret the symptoms of people with dementia (in the form of aggression, raising their voice, throwing objects, or even physically attacking) as personal attacks (Prunty and Foli, 2019). This leads to a high prevalence of anxiety and depression in family caregivers, and they are resourceless to manage and maintain their psychological well-being (Lillekroken *et al.*, 2024).

Apart from physical and emotional burden, families face financial strain due to direct costs of medications, doctor consultations, and medical care supplies (Derya, 2024). It may also force a family member to quit employment and become a full-time caregiver, resulting in the permanent loss of income and financial independence (Choi *et al.*, 2023).

Primary caregivers experience a complete loss of identity and time to concentrate on their personal aspirations and relationships due to constant demands (Patel, 2025). Caregivers encounter unbearable pressure as they are caught between ageing parents and their own children. In an Indian family context, this burden can further intensify through the conflict between idealised joint family expectations and reality.

Next, the society's belief that taking care of one's own family members is a selfless duty, where caregivers also bear the weight of such cultural expectations. Relatives of people with dementia do not provide tangible support to family caregivers; rather, they are only curious to know about the illness and situation (Bhati, 2025).

Caregivers are unable to acknowledge their burnout or reach out for support because they fear being judged as selfish or negligent

(Ramesh, 2025). Above all, the severe lack of formal respite care or day-care centres leaves them truly alone.

Polypharmacy and self-medication

Polypharmacy is defined as a prescription containing five or more medications prescribed to an individual (Yu *et al.*, 2024). A polypharmacy prescription is a complex regimen that is problematic and gives rise to drug-drug interactions.

Polypharmacy is a serious concern for an individual who is under the treatment of different specialists for multiple comorbidities such as hypertension and diabetes (Khaizer *et al.*, 2024). People with dementia are usually exposed to siloed prescriptions with polypharmacy, and caregivers may observe and misinterpret the side effects (e.g. confusion) of one drug (e.g. diuretics) as a new condition and can treat the individual with dementia with another drug, which then induces further adverse effects (Buyer, 2024). Antipsychotics are used for agitation in people with dementia, but they can induce excessive sedation and increase the risk of stroke (Rogowska *et al.*, 2023). Diuretics taken along with other antihypertensives can cause dizziness and drowsiness that dramatically increase debilitating falls (Handler, 2009). These dangers can also occur through Over-the-Counter (OTC) medications (self-medication). In India, access to pharmacies is easier, where prescription medicines are often obtained without a prescription. Any medicine sold in a pharmacy should be taken cautiously; people should not believe that any medicine sold in a pharmacy is safe, overlooking the real risks of side effects and contraindications.

Common self-medication practices that can introduce specific dangers are,

- Drugs available for rhinitis or rhinorrhoea (e.g. Diphenhydramine, doxylamine, chlorpheniramine) through OTC contain anticholinergic properties that can impair memory directly (Gray and Hanlon, 2016).
- Benzodiazepines and non-benzodiazepines used for sleep disturbances can cause confusion and falls (Umbricht and Velez, 2021).
- Drug-drug interactions are possible with supplements (e.g. memory booster) (Sharma *et al.*, 2024).
- Having allopathic drugs (containing polypharmacy) or self-medication with herbal drugs in parallel (e.g. ayurveda or homoeopathy) can cause Herb-drug interaction risk (Kahraman *et al.*, 2021).

Therefore, inappropriate polypharmacy or self-medication can significantly accelerate cognitive decline in people with dementia.

OPPORTUNITIES: PROPOSED FRAMEWORK FOR THE INDIAN COMMUNITY PHARMACIST IN DEMENTIA CARE

The role of the CPs must evolve from a product-centred dispenser to a person-centred and caregiver-centred health advisor. This proposed framework outlines a significant and necessary evolution in the role of CPs, particularly in the context of managing chronic, complex conditions like dementia (Figure 2). Here, the opportunities are clear for a CP to fulfil the challenges in dementia care.

Community Pharmacist as an early detector and navigator in dementia care

The CPs are easy to approach and attentive healthcare professionals who can identify early warning signs of dementia through patterns of medication use and cognitive changes in an individual.

People usually have frequent visits to the community pharmacy for refilling medicines rather than to a GP, where a consultation occurs occasionally, unless an emergency arises. Therefore, frequent visits can give an opportunity for CPs to detect changes in an individual's response during interaction. CPs can observe changes (e.g. appearance, behaviour, interaction and medicines management) in elderly individuals (from their routine) who frequently visit their community pharmacy. Some of the changes that can be identified by CP are,

- Improper personal grooming reflects a lack of self-care.
- Difficulty in counting money or understanding co-payments.
- Confusion during interaction with the CP over previously understood dosage instructions.
- Signs of distress - display uncharacteristic irritability or withdrawal.
- Chronic medication adherence patterns - Consistent late prescription refills.
- Managing a simple pill – Tend to ask repetitive questions about the purpose of familiar medications, or new difficulty managing a simple pill organiser (Elliott *et al.*, 2015).
- An individual frequently visits a pharmacy to buy medicines, but accompanies a family member who has suddenly assumed responsibility for medication management.

If CP identify any non-adherence to medicine by the individual, CP's next step is to initiate a friendly conversation using simple language. This conversation should always express concern regarding the safety and support. For example (Herein given in English).

“CP: I have noticed your medicine refills have been less regular. Everything okay?”

Such conversations will be helpful for CP to identify the cognitive variations in an individual during the early stages of dementia. In addition, if the CPs identify any of the aforementioned differences in appearance and behavioural characteristics of an elderly individual, it might be a sign of declining executive function and memory (Macekova *et al.*, 2025). Based on these observations, CPs can recommend and facilitate a formal medical evaluation with a GP or a specialist, or through NGOs.

Community Pharmacist as a medication therapy manager

In dementia care, person-centred medication oversight is an essential task of a CP to enhance therapeutic outcome, and this can be achieved by acting as a Medication Therapy Manager (MTM). As an MTM, CPs can optimise medication use, improve medication adherence and therapeutic outcomes. This critical function can begin with the following actions in dementia care.

- **Deprescribing** – Deprescribing can reduce polypharmacy and simplify treatment in people with dementia. It is the responsibility of a CP to review the prescription to identify any of the drugs that can affect the cognition of an individual. (For example, anticholinergics for allergies or bladder issues, sedative-hypnotics, and certain older-generation antidepressants) (Bjerre *et al.*, 2018). If the prescription contains any drugs that can affect cognition, a CP can contact GPs and discuss about the problems associated with the medicines. Upon GP approval, a CP can deprescribe the drugs that impact cognition.

- Medication non-adherence is one of the challenges in dementia care, and CPs can implement the following, which can significantly reduce errors and increase adherence to medicine.

- o Caregivers can be introduced to multi-compartment pill organisers that are labelled with days and frequency (morning, noon, night). Pill organisers are easy to manage, and a CP can identify whether the individual has been adhering to medication usage as per prescription during refills (Apte *et al.*, 2025).

- o Present personalised pictorial medication charts in a language that is easier for the dementia caregiver.

- **Safety counselling** – This forms a continuous dialogue, where the CP can explicitly warn about fall risks associated with specific drugs, can scrutinise OTC drugs and herbal supplements for dangerous interactions (e.g., with blood thinners), and monitor for drug-disease interactions that exacerbate BPSD.

This management is not only conducted by CP alone, but in collaboration with the physician and the caregiver. As aforementioned, upon receiving a prescription, a CP can monitor for efficacy and side effects and provide structured feedback to the GP or specialist regarding the necessity of deprescribing. Then, CP can educate the caregiver on the rationale behind each medication, drug administration techniques and symptom observation.

Through this holistic MTM role, CP can ensure that the medication regimen is not only effective but also minimally burdensome and maximally safe, thereby preventing hospitalisations, slowing

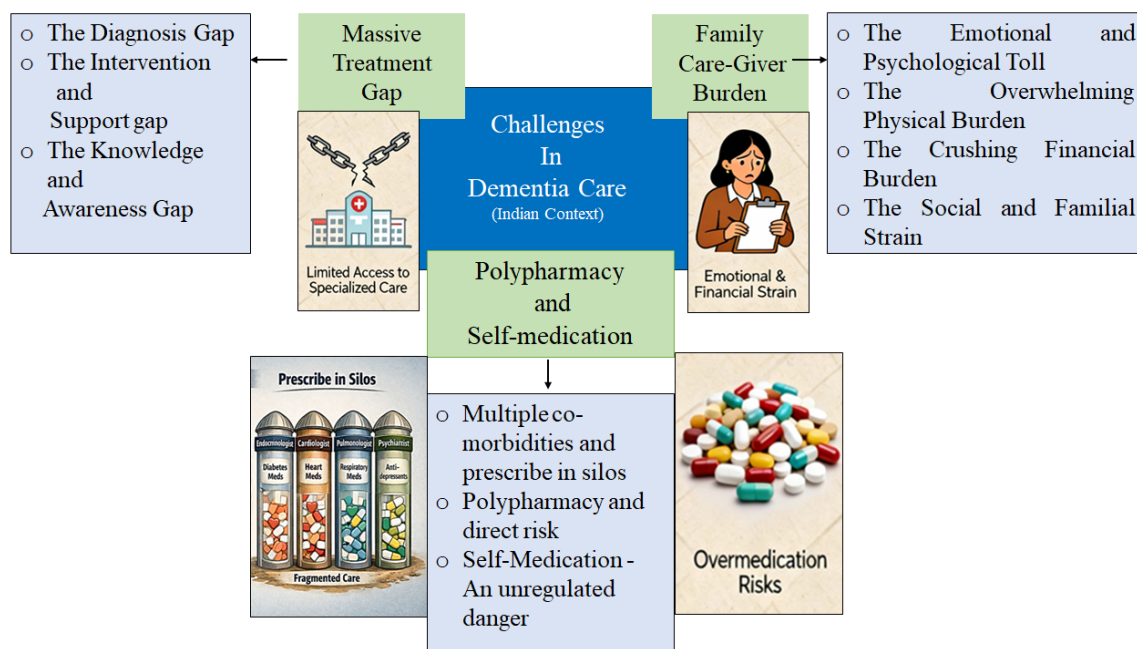


Figure 1: Challenges in Dementia care – An Indian Context.

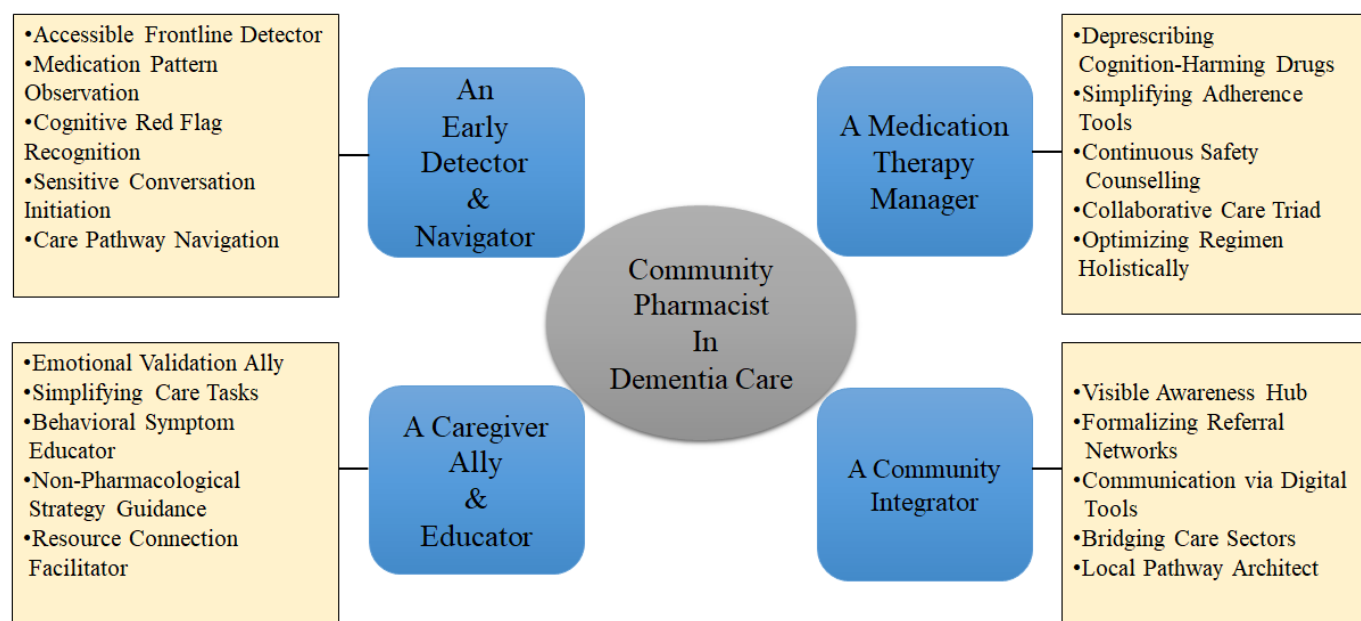


Figure 2: Opportunities for Community Pharmacist in dementia care.

functional decline, and fundamentally improving the quality of life for both the person living with dementia and their caregiver.

Community Pharmacist in mitigating the burden of dementia caregivers by acting as caregiver ally and educator

The quality of life of people with dementia depends not only on medicines, but also on the well-being of the caregiver. This is because caregivers are the ones who directly observe and assist with the daily activities of people with dementia. Therefore, the well-being of caregivers is also important for the treatment outcome of people with dementia. Caregivers often have sleep disturbances due to frequent toileting and night wandering behaviour of people with dementia. CPs can suggest strategies to improve the sleep quality or refer them to a sleep specialist.

CPs should reduce caregiver burnout by providing respite resources and emotional relief through supportive and friendly communication. An example of such communication with empathy is shown below,

“CP: You have made a very big sacrifice.”

Understanding the issues of dementia by caregivers is important for maintaining the quality of life in both people with dementia and their caregivers. CPs should educate caregivers about the issues of dementia and its care. They are,

- People with dementia usually exhibit BPSD symptoms, and it is very difficult for caregivers to face them. CPs should educate the caregiver that these characteristics are manifestations of the syndrome in people with dementia and not personal attacks towards them. Understanding these characteristics

can alleviate guilt and frustration in caregivers (Leontjevas *et al.*, 2024).

- For effective daily management of people with dementia, CPs can provide non-pharmacological strategies such as listening to calming music, simplifying the living area, and breaking down activities of daily living into manageable steps (Leggieri *et al.*, 2019).
- People with dementia have difficulty in swallowing (dysphagia), which may lead to nutritional deficiency, so CPs should provide counselling to caregivers on nutrition for easy-to-swallow foods. People with dementia are also prone to falls; CPs should provide counselling on safe home modifications to prevent falls.

In addition to acting as a caregiver ally and educator, CPs can connect them to formal support groups such as local ARDSI chapters and DIA for further counselling.

By transforming the community pharmacy counter into a confidential space for assurance and problem-solving, the CPs can alleviate the caregiver's isolation, prepare them with sustainable coping tools, and ultimately become a crucial pillar in the support ecosystem, helping to preserve the health of both the caregiver and the person they care for. (Note: Respite care is a form of temporary relief for family caregivers, allowing them to take breaks from their caregiving responsibilities).

Community Pharmacist as a Community Integrator

The Indian CPs can integrate the community through various ways in dementia care. They can transform the retail business shop into a health information centre.

As a community integrator, CPs can display posters in their community pharmacy premises regarding dementia awareness and contact details of NGOs for psycho-social support and counselling. This will help individuals who suspect they have a cognitive impairment or families who need help.

CPs can send messages through advanced online platforms for:

- To remind people with dementia or their caregivers about prescription refills.
- Information related to respite care resources and virtual support groups for caregivers (Brookman *et al.*, 2023).

This structured support can create continuity where the physician diagnoses, the CPs manage therapy and caregiver support, and NGOs provide holistic resources.

DISCUSSION

Community Pharmacist – The right person to contact, bridging the gaps and addressing the issues

The profound growing challenge of dementia care in India is characterised by diagnostic delays, caregiver burden, fragmented services, and low public awareness. In response, this article proposes a novel, structured care practice leveraging the unique accessibility, trust, and clinical skills of the CP as a first-line support node.

This model positions the CP as a critical healthcare professional in dementia care. Their frequent contact with an individual can enable proactive screening by identifying subtle red flags in medication adherence and cognition. Through this trusted relationship, CPs can initiate sensitive conversations, provide destigmatising education, and facilitate referrals to physicians, thereby creating a novel early-detection pathway between community observation and formal diagnosis.

CPs can deliver direct clinical value through medication management, which enhances safety, prevents hospitalisations, and improves outcomes for both people with dementia and caregivers. Community pharmacies are accessible healthcare hubs that can extend their role to counselling and caregiver support groups.

If implemented, these services of community pharmacy are new to Indian settings, but at the world stage, Australia already integrated CPs into the dementia care system, and it is currently in practice (Pharmaceutical Society of Australia, 2024).

By coordinating with physicians and linking families to social resources, CP can integrate India's fragmented dementia care system.

However, the proposed framework for the CPs represents a paradigm shift, yet its implementation faces significant systemic

hurdles. A thorough examination of these challenges, paired with actionable recommendations, is crucial for translating this vision into reality.

Implementation Challenges in the Current Indian Scenario

Lack of Formal Training

In India, the current undergraduate pharmacy (B.Pharm.) curriculum lacks formal training in community pharmacy. A majority of registered pharmacists working in retail pharmacies are experienced in skills such as store-keeping, stock management and drug dispensing. To work in dementia care settings, pharmacy professionals should understand dementia, caregiver burden, the psychology of caregivers and the importance of medication review. For this, formal training is required for pharmacy graduates in dementia care services.

Workload and Supportive Remuneration Model

In India, a community pharmacy is a retail shop where people recognise and pay only for the dispensed drug. It will be a new experience for the public if they receive any input regarding person-centred care services. Along with dispensed drugs, the remuneration for a person-centred care service is an additional cost for people and will be a challenging factor for community pharmacy. Apart from this, there will be a significant loss in time and dispensing revenue, because medication review and counselling can take 20 to 30 min. Furthermore, other services such as pictorial medication charts or fall risk assessment cannot be provided for free. Even though integrating CP into dementia care is a noble objective, from the viewpoint of pharmacy proprietors, allocating staff time and physical resources to any non-revenue-generating activity is not simply viable. A profit-making pharmacy business model cannot offer some critical services without a financial incentive for their additional products and expert services.

Infrastructure

In India, most community pharmacies are busy, designed for the sales of medicines and not suitable for confidential and empathetic discussions. In such an infrastructure without a consultation room, it is practically impossible for a CP to provide counselling services due to a lack of privacy. This creates a major hurdle for the CPs to conduct a medication review, identify or discuss about cognitive decline during interaction with individuals or caregiver burnout. In the midst of unorganised, open-plan environment community pharmacy settings, India also has some of the well-organised, world-class modern pharmacy chains established in most of the Indian Tier-1 and Tier-2 cities that can effectively deliver relevant and appropriate dementia care services through a well-trained CP.

Comprehensive Recommendations for Systemic Reform, Collaboration and Technology Integration

Curriculum Reform

Proposed action

Pharmacy Council of India must revise the curriculum to integrate the study of person-centred care services for various diseases, disorders and syndromes, including Dementia.

Description

The current curriculum of Bachelor of Pharmacy (B.Pharm.) comprises theoretical and practical courses on industrial pharmacy, pharmacology, medicinal chemistry and pharmacy practice. In the B.Pharm VIII semester, students are taught about Social and Preventive Pharmacy (BP802T), which contains five units. Out of five units, Unit IV is dedicated to national programs in health and diseases, and Unit V is for community services. In Unit IV, students are exposed to one of the topics known as “National Programme for the Health Care of the Elderly (NPHCE)”, which aims to enhance the quality of healthcare for the elderly in India, and ensure they receive essential support and services to lead a healthy life. In Unit V, students are taught about community services in rural, urban, and school settings.

Recommendation

In addition to NPHCE, Unit IV should also include theoretical concepts and practical training on social aspects of diseases, disorders and syndromes of national interest that affect the elderly, including dementia. Theoretical concepts enhance the knowledge of dementia and its care. Practical training equips them in person-centred care services. This can be achieved by integrating community pharmacy training into the practice school (course code: BP706PS) of the VII semester of the B.Pharm. The training should be supervised under a trained CP (in dementia care) in a dementia friendly community pharmacy with a focus on both drug dispensing and person-centred care services.

Therefore, in order to equip the students in theoretical aspects of person-centred care, it will be more appropriate to include the updated Social and Preventive Pharmacy (BP802T) course (with recommended additions) in the VII semester of the BPharm curriculum rather than in the VIII semester.

In addition, the curriculum should add a course on pharmacotherapy of diseases, disorders and syndromes, including geriatric pharmacotherapy (and dementia pharmacotherapy) in semester VII.

Policy and Advocacy

Proposed Action

The person-centred services in dementia care by CP should be recognised within the national health policy.

Description

The latest policy by the Government of India on healthcare is the National Health Policy (NHP) 2017, and the strategy of this policy is to ensure that all citizens of India have access to quality healthcare services.

Recommendation

The person-centred dementia care services by CP must be included in the National Health Policy (NHP). The Government of India must integrate CP services in dementia care into key national programmes such as the National Programme for Prevention and Control of Non-Communicable Diseases (NP-NCD). This inclusion can play a significant role in achieving official recognition of CP's role in dementia care.

Various non-profit organisations (e.g. ARDSI, DIA) and philanthropists are advocating for a national dementia policy (Anirudhan *et al.*, 2025); such a policy should also integrate CP in person-centred dementia care services.

In addition, dementia care services by CP must be covered under health insurance, which can create a sustainable revenue stream for services such as comprehensive medication therapy management and caregiver counselling.

To evaluate the reimbursement model for dementia care services provided by CP, a test project can be conducted in collaboration with a public-private partnership.

Public-Private Partnerships

Proposed action

The NPHCE should collaborate with non-profit organisations to certify Dementia-Friendly Pharmacies.

The registered pharmacist working in a dementia friendly community pharmacy should undergo Continuing Pharmacy Education (CPE) in Dementia care.

Description

The NPHCE services are available in primary health centres, community health centres, and district government hospitals. However, the service provided in these centres is very weak and does not reach a wide population. Therefore, a public-private partnership between NPHCE and non-profit organisations can develop a community pharmacy into a Dementia-Friendly Pharmacy.

Recommendation

In addition to dispensing, it should provide specialised care and reliable service in dementia care. A dementia-friendly pharmacy should have a private consultation area to conduct medication reviews and counselling. The NPHCE should ensure that the quality of community pharmacy has been recognised by government authorities to conduct person-centred care services.

It is also an important requirement for a dementia friendly community pharmacy to have at least one pharmacist trained in dementia care. This can be achieved by providing 1–2-week intensive Continuing Pharmacy Education (CPE) programs with practical components for registered pharmacists in dementia care.

To promote the services provided by Dementia Friendly Pharmacy and their readiness to act as a primary contact point for those who need support in dementia care, public awareness campaigns should be conducted by concerned pharmacies in collaboration with NPHCE, ARDSI, and DIA.

Collaboration & Acceptance

Proposed action

Collaborating with GPs, neurologists, and geriatricians for dementia care services.

Description

A CP can refer an individual to a GP, neurologist or geriatrician. A CP should follow strategies to develop acceptance from both doctors and the public for the services they provide.

Recommendation

If CPs detect any behavioural changes in an individual along with non-adherence to medications, they can refer the individual to a GP for further diagnosis and treatment. Furthermore, a GP can refer a CP for medication reviews and counselling. This approach will also free up GP time and enhance therapeutic outcomes. To do this, they should establish reliable collaboration with structured communication protocols and standardised referral forms.

To gain public acceptance and establish CPs as trusted educators and partners, awareness campaigns and seminars should be conducted, featuring testimonials of beneficiaries.

Technology Integration

Proposed action

Use advanced technologies to increase adherence in dementia care and reduce caregiver burden

Description

CPs can employ technologies that are easier for the caregivers to use, communicate with other health care team members and organisations. Advanced technologies should provide sustainable solutions to the problem.

Recommendation

CPs can provide QR-coded dementia care packs to people with dementia and their caregivers, which can help with medicine management, respite resources and support.

CPs can send automated messages (e.g. SMS or WhatsApp) to deliver reminders about medication adherence and appointments.

Community pharmacies can provide telepharmacy consultation for those who are unable to reach the pharmacy or live far from cities.

Furthermore, CP can use referral trackers, where they can send a referral to a GP and in return, they receive notifications upon completion of the referral.

CONCLUDING REMARKS AND FUTURE DIRECTIONS

Dementia cases are increasing in India; CP can act as a bridge in addressing the gaps in dementia care. By revising the pharmacy curriculum, practice and attending CPEs appropriate for dementia care, a CP can play a significant role in person-centred care services. In addition to drug dispensing, CPs can detect some early cognitive flags, medication adherence, and assist with caregiver issues. This new avenue of person-centred care services by CP will help millions of people with dementia and their caregivers.

To implement this in future, a funded pilot program in collaboration with non-profit organisations has to be initiated in selected Indian urban and rural community pharmacies. In addition, India needs a National Dementia Policy to create a framework for addressing the issues of dementia burden, which should integrate the role of Dementia-Friendly Pharmacy in dementia care.

A successful validation of this initiative will address the most pressing national issue and create an expandable community-based dementia care. A society welfare-focused Indian community pharmacies can be a powerful template for other low- and middle-income countries to implement and integrate CP in their healthcare system to overcome similar challenges in gaps and resource limitations.

Therefore, effectively addressing the challenges and recommendations, CPs can provide medical care services and social support for people with Dementia and their caregivers through a Dementia-Friendly Pharmacy.

ABBREVIATIONS

CP: Community Pharmacist; **ARDSI:** Alzheimer's and Related Disorders Society of India; **DIA:** Dementia India Alliance; **BPSD:** Behavioural and Psychological Symptoms of Dementia; **MTM:** Medication Therapy Manager.

CONFLICT OF INTEREST

The authors declare that there is no conflict of interest.

SUMMARY

India faces major challenges in dementia care such as a massive treatment gap, caregiver burden, polypharmacy and self-medication. The root causes of these treatment gaps are social stigma, misconceptions regarding dementia, lack of trained specialists, dementia care being poorly integrated into primary health centre, financial strain and lack of national policy in dementia care. Among the healthcare team, CPs are easily accessible healthcare professional who can assist people with dementia and their caregivers to address the challenges in dementia care. CPs have various opportunities to help people with dementia and their caregiver by acting as an early detector of cognitive changes in individual and navigate them for an appropriate treatment. Managing medicine is one of the challenges that reduces therapeutic outcome, CPs can effectively identify these issues and increase adherence by introducing specialized pill organisers. Caregivers face extreme stress and burnout, CPs can act as an ally by making them to understand about BPSD symptoms, techniques to reduce dysphagia and falls. As a community integrator, CPs can integrate public by creating dementia awareness posters in their pharmacy premises, formally referring to GP for diagnosis and treatment, and NGOs for psycho-social support. However, in Indian scenario there are some challenges to implement this model in community pharmacy such as lack of formal training, infrastructure and workload and supportive model. To successfully implement this model, the curriculum of pharmacy education has to be revised with mandatory community pharmacy training in both drug dispensing and person-centred care services including dementia care; the CPs should undergo continuing pharmacy education in dementia care service. Next, the role of CP in dementia care services has to be recognized within National Health Policy. In future, National Dementia Policy should also integrate the role of CP in dementia care; and a public-private partnership is needed to establish a certified dementia friendly pharmacy in rural and urban areas consisting a trained CP in a person-centred dementia care. In addition, a collaboration between CPs and GPs based on a formal referral pathway will enhance the therapeutic outcome in dementia care. Therefore, this new avenue is an opportunity for CPs to take part in a person-centred dementia care.

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