LEX LOCALIS-JOURNAL OF LOCAL SELF-GOVERNMENT
ISSN:1581-5374 E-ISSN:1855-363X
VOL. 23, NO. S5(2025)

EMPOWERING COMMUNITY HEALTH: THE ROLE OF PHARMACY IN STRENGTHENING LOCAL SELF-GOVERNANCE IN INDIA

Mithul V Mammen[1], Abhishek Anand[1], Abhishek Suman[2], Amit Kumar[2], Dimple Pratap Singh[2]

[1]Department of Pharmacy Practice, Teerthanker Mahaveer College of Pharmacy, Teerthanker Mahaveer University, Moradabad, Uttar Pradesh, India – 244001
[2]Shri Venkateshwara School of Pharmacy, Shri Venkateshwara University, Rajabpur, Gajraula, Amroha, Uttar Pradesh, India – 244236

Corresponding Author:Amit Kumar*
Shri Venkateshwara School of Pharmacy, Shri Venkateshwara University, Rajabpur, Gajraula, Amroha, Uttar Pradesh, India – 244236
E-mail: amittph1812017@gmail.com
Ph: 9653941766

Abstract
Local self-governance has emerged as a cornerstone of decentralized public health delivery in India following the 73rd and 74th Constitutional Amendments, which empowered Panchayati Raj Institutions (PRIs) and Urban Local Bodies (ULBs) to plan and manage health services at the community level [1]. Pharmacists—traditionally focused on drug dispensing—are increasingly recognized as integral actors in public health promotion, medicine supply, and health education [2,3]. This review explores the evolving role of pharmacy in strengthening local self-governance to improve community health outcomes. Drawing on national health policies, case studies, and peer-reviewed evidence, the paper analyses how pharmacists support essential drug distribution, disease surveillance, preventive services, and health system resilience. Special attention is given to programs such as Pradhan Mantri Jan AushadhiYojana, Ayushman Bharat Health and Wellness Centres, and community-based vaccination drives [4–6]. Challenges such as workforce shortages, regulatory gaps, and limited integration with Panchayat-level health planning are critically assessed. Opportunities include digital health platforms, telepharmacy, and capacity building initiatives for pharmacists at the grassroots level. By situating pharmacy services within the broader framework of decentralized governance, this review highlights a pathway for empowering communities, reducing health inequities, and advancing India's Universal Health Coverage (UHC) goals.

Keywords: Community health, pharmacy, local self-governance, India, decentralization, public health policy.

Introduction

1. Background:

Community Health and Local Governance in India India's health system has undergone a gradual shift from a centrally driven model to a decentralized approach where states, districts, and villages play increasing roles in health planning and delivery [7]. The landmark 73rd and 74th Constitutional Amendments of 1992 institutionalized local self-governance through PRIs and ULBs, granting them authority over primary health care, sanitation, and nutrition programs [1]. Decentralization was intended to improve responsiveness, equity, and community participation in public health decision-making. Community health encompasses preventive, promotive, curative, and rehabilitative services delivered at the grassroots level. In rural India, Sub-Centres, Primary Health Centres (PHCs), and Community Health Centres (CHCs) form the backbone of service delivery. In urban areas, ULBs manage dispensaries and health posts. However, gaps persist in workforce capacity, medicine availability, and public engagement, which local self-governance seeks to address [8].

2. Role of Pharmacy in Public Health: Global and Indian Perspectives

Globally, pharmacists have expanded their roles beyond dispensing to include immunization, chronic disease screening, and health counseling [9,10]. The World Health Organization (WHO) recognizes pharmacists as part of the health workforce essential for Universal Health Coverage [11]. In India, the pharmacy profession is regulated by the Pharmacy Act (1948) and overseen by the Pharmacy Council of India (PCI). With over 1.4 million registered pharmacists, India has one of the world's largest pharmacy workforces [12]. Despite this, their contribution to community health remains underutilized, particularly in rural and peri-urban areas. Several initiatives have attempted to integrate pharmacists into public health systems. The Pradhan Mantri Jan AushadhiYojana (PMJAY) operates a network of low-cost medicine outlets staffed by pharmacists. The Ayushman Bharat Health and Wellness Centres (AB-HWCs) emphasize comprehensive primary care with medicine supply and health promotion activities in which pharmacists can participate [4–6].

3. Pharmacy and Local Self-Governance: Converging Agendas

Local self-governance provides a unique opportunity to integrate pharmacy services with community needs. Under Schedule XI of the Constitution, PRIs are responsible for "health and sanitation, including hospitals, primary health centres and dispensaries" [1]. Yet, the operationalization of pharmacist roles at Panchayat and ward levels is fragmented. Most pharmacists are concentrated in private retail settings, while government health facilities often face vacancies. By embedding pharmacists within the local self-governance framework, communities can benefit from improved access to essential medicines, drug information, and preventive services. Pharmacists can assist local health committees in planning drug budgets, managing supply chains, and monitoring rational medicine use [13,14].

4. Rationale for This Review

Although decentralized governance and pharmacy services have developed in parallel, their intersections remain underexplored in the Indian context. This review synthesizes evidence on how pharmacists can strengthen community health under local self-governance structures. It addresses the following questions:

• What are the current roles of pharmacists in community health delivery in India?
• How do local self-governance structures influence pharmacy services at the grassroots level?
• What policy and programmatic measures can enhance pharmacists' contributions to community health?

5. Objectives

1. To analyze the constitutional, policy, and programmatic frameworks linking pharmacy to local self-governance.
2. To identify the roles, challenges, and opportunities for pharmacists in strengthening community health.
3. To propose recommendations for integrating pharmacy services within decentralized health planning.

2. Pharmacy and Community Health in India2.1 Historical Evolution of Pharmacy in India

The pharmacy profession in India evolved in response to both colonial and post-independence health system demands. Early pharmacists were largely compounders and dispensers attached to hospitals. The Pharmacy Act of 1948 formally established standards for pharmacy education and practice [1]. Over the decades, India's pharmaceutical industry has grown to become the third

largest by volume globally, yet community-level pharmacy services remain unevenly developed [2].

2.2 Current Landscape of Community Pharmacy Practice

India has an estimated 1.4 million registered pharmacists and over 800,000 retail outlets, many of which function as the first point of contact for health advice, especially in rural and peri-urban settings [3,4]. However, these outlets are primarily private and often focus on drug sales rather than public health services. Government health facilities such as Primary Health Centres (PHCs), Community Health Centres (CHCs), and Health and Wellness Centres (HWCs) frequently experience pharmacist vacancies [5]. Key programs like Pradhan Mantri Jan AushadhiYojana (PMJAY), which provides affordable generic medicines, rely on qualified pharmacists to operate Jan AushadhiKendras. This initiative underscores the government's recognition of pharmacists as a bridge between affordable medicines and underserved populations [6].

2.3 Pharmacists as a Link to Local Self-Governance

Under Schedule XI of the Constitution, PRIs are responsible for "health and sanitation" including the management of dispensaries and PHCs [7]. In practice, Panchayats often form Village Health, Sanitation, and Nutrition Committees (VHSNCs) to plan local health actions. Pharmacists—especially those stationed at HWCs or PHCs—can serve as technical advisors to these committees on drug supply, rational use, and pharmacovigilance [8,9].

2.4 Expanding Public Health Functions

Globally, pharmacists provide services beyond dispensing, including vaccination, chronic disease screening, smoking cessation counseling, and antimicrobial stewardship [10–12]. In India, similar roles are emerging:

• Vaccination support: Pharmacists at HWCs assist with cold chain maintenance and immunization logistics [13].

• Non-communicable disease (NCD) screening: Blood pressure, blood glucose, and BMI measurement as part of population-based screening [14].

• Health education: Counseling on safe medicine use, adherence, and preventive care.

• Pharmacovigilance: Reporting adverse drug reactions to national monitoring centers.

These expanded roles align with the government's push for Comprehensive Primary Health Care (CPHC) and Universal Health Coverage (UHC) targets.

2.5 Community Participation and Health Committees

Community participation through Village Health, Sanitation and Nutrition Committees (VHSNCs) is a critical aspect of local self-governance. Pharmacists can act as resource persons, helping communities understand essential medicine lists, rational antibiotic use, and preventive health behaviors [15]. This integration can enhance accountability, improve supply chains, and strengthen trust between the health system and the community.

2.6 Workforce Training and Capacity Building The Pharmacy Council of India (PCI) has proposed continuing education and skill enhancement programs to prepare pharmacists for broader public health roles [16]. Short courses on public health pharmacy, digital health tools, and community engagement can improve their effectiveness at the local level.

Table 1. Constitutional and Policy Framework Linking Local Self-Governance to Health Services in India

Provision/Policy	Year	Key Features Relevant to Pharmacy and Community Health
73rd Constitutional Amendment (Panchayati Raj Institutions)	1992	Empowers village, block, and district-level bodies to manage health, sanitation, and dispensaries [7].
74th Constitutional Amendment (Urban Local Bodies)	1992	Empowers municipal bodies to deliver urban health services and regulate local pharmacies.
National Health Mission (NHM)	2005	Strengthens decentralized health planning, supports VHSNCs, and integrates community participation [17].
Ayushman Bharat Health and Wellness Centres (AB-HWCs)	2018	Comprehensive primary care including essential drug supply and health promotion; scope for pharmacist involvement [5].
Pradhan Mantri Jan AushadhiYojana (PMJAY)	2015	Affordable generic medicines via Jan AushadhiKendras staffed by pharmacists [6].

2.7 Key Challenges in the Indian Context Despite these opportunities, several challenges hinder the integration of pharmacists into community health and local self-governance:

a) Workforce Shortages: Many PHCs lack full-time pharmacists [18].
b) Training Gaps: Limited exposure to public health in pharmacy curricula [16].
c) Regulatory Oversight: Variable enforcement of prescription-only drug sales and quality standards [19].
d) Digital Divide: Limited access to e-health platforms in rural pharmacies [20].
e) Coordination Issues: Weak linkage between pharmacists, ASHAs, ANMs, and Panchayat committees [21].

2.8 Opportunities for Policy Innovation

a) Telepharmacy and Digital Health: Leveraging the Ayushman Bharat Digital Mission (ABDM) to connect pharmacists with local health plans [22].
b) Community-Based Surveillance: Pharmacists as sentinel nodes for reporting outbreaks, adverse drug reactions, and counterfeit medicines [23].
c) Public–Private Partnerships: Involving community pharmacists in government supply chains and immunization drives.
d) Gender and Social Inclusion: Recruiting women pharmacists in rural areas to improve service uptake among female beneficiaries.

3. Local Self-Governance Framework in India:

Opportunities for Pharmacy Integration 3.1 Constitutional Foundations of Local Self-Governance India institutionalized decentralized governance through the 73rd and 74th Constitutional Amendments enacted in 1992. The 73rd Amendment created Panchayati Raj Institutions (PRIs) at the village, intermediate, and district levels, whereas the 74th Amendment established Urban Local Bodies (ULBs) such as municipalities, municipal corporations, and nagar panchayats [1]. Both amendments emphasize local planning and accountability in health, sanitation, and social welfare. Under Schedule XI (for PRIs) and Schedule XII (for ULBs), local bodies are responsible for “health and sanitation, including hospitals, primary health centres and

dispensaries" [24]. This places pharmacists—especially those stationed at government facilities—in a direct relationship with locally elected bodies.

3.2 Institutional Structures for Community Health Planning

Village Health, Sanitation and Nutrition Committees (VHSNCs) and RogiKalyanSamitis (RKS) act as community-level platforms to plan, implement, and monitor health activities under the National Health Mission (NHM) [25]. These committees receive untied funds and oversee PHC operations, making them ideal forums for pharmacists to provide technical input on drug supply, rational medicine use, and adverse drug reaction reporting [13]. At the block and district levels, District Health Societies (DHS) coordinate health planning and budgeting. Pharmacists, especially those working in District Hospitals or Jan AushadhiKendras, can liaise with DHS to ensure uninterrupted medicine supply and patient counseling services [6].

3.3 Financing and Resource Allocation

Local self-governance also involves fiscal decentralization. State Finance Commissions (SFCs) recommend grants to PRIs and ULBs, including allocations for health services. Pharmacists can help Panchayats plan drug procurement, reduce wastage, and implement essential medicine lists more efficiently [8].

3.4 Community Accountability and Social Audits

One key innovation under decentralized governance is the social audit, wherein community members evaluate public services including health care [26]. Pharmacists participating in VHSNC meetings can strengthen transparency in drug supply chains and medicine quality. Public display of drug stock registers and price lists at Jan AushadhiKendras also enhances accountability [6].

3.5 Integration of Pharmacists into Local Health Planning

Pharmacists can bolster local self-governance by offering technical guidance on selecting and managing essential medicine stocks, leading community workshops to promote rational antibiotic use, safe over-the-counter medication practices, and awareness of adverse drug reactions [9,10], assisting Village Health, Sanitation, and Nutrition Committees (VHSNCs) in monitoring medicine utilization patterns and reporting to district authorities, and facilitating the integration of village-level medicine supply data into the Ayushman Bharat Digital Mission to enhance health system connectivity [22].

3.6 Policy Instruments Supporting Decentralization

Policy/Guideline	Relevance for Pharmacists
National Health Mission (NHM)	Mandates decentralized planning and creation of VHSNCs. Pharmacists can serve as resource persons.
Indian Public Health Standards (IPHS)	Specifies pharmacist posts at PHC/CHC levels, including responsibilities for drug supply and counseling.
Ayushman Bharat Health and Wellness Centres	Expands preventive and promotive care requiring pharmacist participation.
State Drug Procurement Agencies	Work with PRIs and pharmacists to ensure low-cost, quality medicines.

3.7 The Digital and Telehealth Dimension With the rollout of the Ayushman Bharat Digital Mission (ABDM) and eSanjeevani telemedicine platforms, local bodies are gaining tools to integrate digital health data. Pharmacists can act as on-the-ground facilitators for e-prescriptions, teleconsultations, and community-based drug delivery [22,27].

3.8 Strengths of the Local Self-Governance Model

a) Responsiveness to local needs: Decisions on medicine procurement and health programs are based on local epidemiological profiles.
b) Community ownership: Health committees enhance participation and trust.
c) Flexibility: Untied funds allow Panchayats to address emergent health needs, including emergency drug purchases.

3.9 Challenges and Limitations

Despite its potential, decentralized health governance faces obstacles [28]: • Limited technical capacity in Panchayats to manage complex drug supply chains.

a) Frequent transfers or vacancies of government pharmacists reduce continuity.
b) Lack of standardized training for pharmacists in public health or governance.
c) Fragmented coordination between Panchayats, PHCs, and district authorities. Addressing these challenges requires systematic training, supportive supervision, and policy guidelines that clearly define pharmacists' roles in local self-governance.

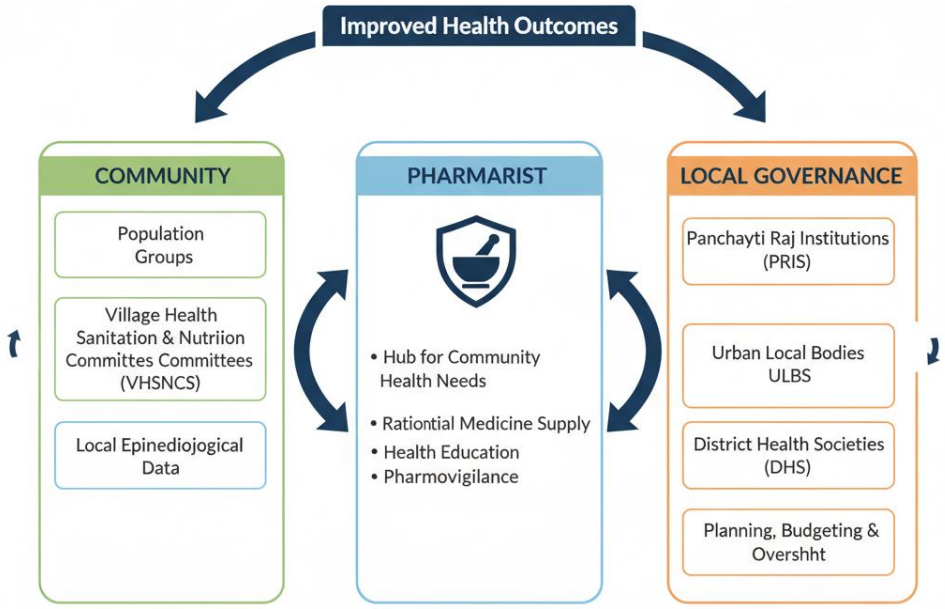

Figure 1. Conceptual Framework: Pharmacy as a Bridge Between Community and Local Governance

4. Empowering Community Health Through Pharmacy

4.1 From Medicine Dispensers to Public Health Advocates

Traditionally, pharmacists in India have been viewed as dispensers of medicine at primary health centres (PHCs), community health centres (CHCs), and hospitals. However, the evolution of community pharmacy practice worldwide shows that pharmacists can actively contribute to public health outcomes, disease prevention, and chronic disease management [29]. In India's decentralized health governance framework, this means working directly with Panchayati Raj Institutions (PRIs), Urban Local Bodies (ULBs), and community committees to co-design health services.

4.2 Community-Based Pharmaceutical Services

4.2.1 Essential Medicine Management

Pharmacists play a pivotal role in forecasting, procurement, storage, and rational distribution of medicines at the local level. Using Essential Drug Lists (EDLs) and adhering to Indian Public Health Standards (IPHS), they can minimize stock-outs and ensure timely supply [30]. By working with PRIs, they can also provide data on drug utilization patterns, helping local governments prioritize spending.

4.2.2 Pharmacovigilance and Drug Safety

India's Pharmacovigilance Programme (PvPI) provides a national framework for reporting adverse drug reactions (ADRs). Pharmacists, embedded in VHSNCs and District Health Societies, can help train frontline health workers to recognize ADRs and transmit reports to PvPIcentres [31].

4.2.3 Community Health Education

Pharmacists can conduct village-level workshops on:

a) Safe use of antibiotics (antimicrobial stewardship),
b) Correct use of over-the-counter medications,
c) Lifestyle and adherence counselling for chronic diseases such as diabetes and hypertension,
d) Addressing vaccine hesitancy [32,33].

4.2.4 Pharmacist Contributions to Community Health and Local Governance

Pharmacists can significantly contribute to local self-governance and community health by supporting national health programs like the National TB Elimination Program and the National Vector Borne Disease Control Program through ensuring quality assurance, temperature-controlled vaccine storage, and accurate record-keeping for last-mile drug delivery [34], acting as facilitators for eSanjeevani teleconsultations to ensure timely dispensing of digital prescriptions at the community level [35], overcoming barriers to their involvement in local governance by incorporating short-term public health and local self-governance modules into pharmacy curricula and continuing education programs [36], and enhancing the effectiveness of Accredited Social Health Activists (ASHAs) and Auxiliary Nurse Midwives (ANMs) by supporting them with drug kits, quality checks, and refresher training on medicine use [37].

4.2 Case Examples from India

1. Kerala: Community pharmacists engaged with Panchayats under the Kudumbashree mission provided health education sessions on hypertension screening and medication adherence [38].
2. Tamil Nadu: The Tamil Nadu Medical Services Corporation (TNMSC) has pioneered efficient drug procurement with pharmacists involved at every stage, showing how state-level procurement can synergize with local delivery [39].
3. Rajasthan: Jan AushadhiKendras in rural areas run by pharmacists have improved access to affordable generics and reduced out-of-pocket spending [40].

Table 2. Community-Level Pharmacy Interventions within Local Self-Governance in India

Domain	Activities	Key Partners	Expected Outcomes
Medicine Supply & Logistics	Demand forecasting, stock management, essential medicine procurement	PRIs, District Health Societies	Reduced stock-outs, cost-effective procurement
Pharmacovigilance	ADR reporting, training frontline workers	VHSNCs, PvPIcentres	Early detection of drug safety issues
Health Education	Village campaigns on antibiotic stewardship, chronic disease adherence	ASHA workers, NGOs	Improved health literacy, reduced misuse
Support to National Health Programs	TB, HIV, vaccination cold-chain support	Local Health Departments, PHCs	Increased coverage and adherence
Telehealth Support	Linking e-prescriptions with local dispensing	Ayushman Bharat Digital Mission, local kiosks	Seamless digital health integration

4.3 Integrating Pharmacy into Local Health Governance

To make pharmacists an integral part of local self-governance, several strategic steps can be taken:

1. Formal Representation: Reserve seats for pharmacists in VHSNCs or health sub-committees under Panchayats.
2. Performance-Based Incentives: Link pharmacist incentives to community health outcomes (e.g., improved medicine adherence rates).
3. Data-Driven Planning: Utilize pharmacy data to inform village health action plans (VHAPs).
4. Community Feedback Loops: Establish channels for patients to report medicine shortages or adverse effects directly to the pharmacist and VHSNC.

4.4 Benefits to Community Health

By integrating pharmacists, local self-governance bodies can achieve: • Increased access to affordable, quality medicines
, • Improved rational drug use,
• Enhanced public health awareness, • Strengthened disease surveillance, and
• Reduced burden on tertiary health centres [41].

4.5 Overcoming Barriers and Envisioning Future Pathways for Pharmacy in Local Health Governance

Several barriers hinder the integration of pharmacists into local health governance, including workforce shortages, as many Primary Health Centres (PHCs) lack qualified pharmacists, role ambiguity due to job descriptions that fail to specify public health responsibilities, resource constraints with limited Panchayat-level funds for health education materials, and regulatory overlaps causing coordination challenges between state drug controllers and local governments, necessitating a multi-level policy approach where state governments amend public health acts and pharmacy councils update practice standards to explicitly include community-level roles

[42]; looking ahead, future pathways include strengthening Jan AushadhiKendras as community health hubs staffed by trained pharmacists, establishing Rural TelepharmacyCentres in collaboration with Panchayats, and linking Pharmacist Performance Indicators to Sustainable Development Goal (SDG) targets such as reducing non-communicable disease (NCD) prevalence and improving essential medicine availability [43].

5. Building Capacity and Partnerships

5.1 The Imperative of Capacity Building For pharmacists to meaningfully contribute to decentralized health systems, capacity building is essential at three levels:

1. Individual Level – Knowledge and skills in public health, community engagement, and local governance.
2. Institutional Level – Health facilities and Panchayats with systems to integrate pharmacist input.
3. Policy Level – National and state policies recognizing pharmacists as public health partners [44]. Capacity building should be continuous, competency-based, and aligned with India's health system reforms under the National Health Policy 2017 [45].

5.2 Enhancing Pharmacist Contributions to Community Health and Local Governance

To strengthen pharmacists' roles in community health and local governance, India's predominantly industry-focused Bachelor of Pharmacy (B.Pharm) curriculum should incorporate public health modules on local self-governance, social determinants of health, and community-based interventions to prepare future pharmacists for Primary Health Centres (PHCs) and community settings [46]. Short-term Continuing Education Programs (CEPs) on rational drug use, pharmacovigilance, and telehealth, supported through partnerships with the Pharmacy Council of India (PCI), State Health Resource Centres (SHRCs), and National Health Mission (NHM), can enhance existing pharmacists' skills [47]. Leadership development workshops on negotiation and public speaking can empower pharmacists to represent their profession effectively in Village Health, Sanitation, and Nutrition Committees (VHSNCs) and Panchayat meetings to drive actionable outcomes [48]. Institutionally, pharmacists should be formally nominated to District Health Societies and Village Health Committees to contribute to Village Health Action Plans (VHAPs) and advocate for rational drug procurement and community-based programs [25]. Universities can establish Community Pharmacy Practice Units in collaboration with Panchayats for student internships and public health projects [49]. A National Network of Community Pharmacists under PCI or the Indian Pharmaceutical Association (IPA) can foster knowledge exchange, research, and policy advocacy [50]. Intersectoral collaboration should involve pharmacists working with doctors and nurses for integrated patient care, medication therapy management, and chronic disease follow-up, supporting Accredited Social Health Activists (ASHAs) and Auxiliary Nurse Midwives (ANMs) in last-mile medicine delivery, drug kit management, and health education, partnering with Panchayati Raj Institutions (PRIs), Urban Local Bodies (ULBs), and Standing Committees on Health to provide technical expertise in drug procurement, budgeting, and monitoring, and collaborating with NGOs on TB, HIV, maternal health, and non-communicable diseases (NCDs) for community outreach and supply chain management [51]. Policy enablers should include explicit recognition of community pharmacy as a public health profession by the Ministry of Health and Family Welfare (MoHFW) and PCI to secure funding and training [52]. Performance-based incentives can be introduced for achieving targets in essential medicine availability, antimicrobial stewardship, and pharmacovigilance reporting, alongside integration into the Ayushman Bharat Digital Mission as verified health

professionals to securely access and update patient records [22]. Operational research on pharmacist-led rural interventions, dashboards linking pharmacist data to health outcomes, and published case studies of successful collaborations can generate evidence for policy replication [53]. Regular monitoring of interventions using metrics like essential medicine stock-out rates, patient counseling percentages, adverse drug reaction (ADR) reports, VHSNC participation, and patient satisfaction scores, integrated into District Health Information Systems (DHIS) or Health Management Information System (HMIS), is critical for evaluation [54].

Table 3. Capacity-Building and Partnership Strategies for Community Pharmacists

Strategy	Level	Key Actors	Expected Outcomes
Integrate Public Health Modules into B.Pharm Curriculum	Pre-Service	PCI, Universities	Graduates with community health orientation
Continuing Education on Local Governance and Telepharmacy	In-Service	SHRCs, NHM, PCI	Updated skills among practicing pharmacists
Formal Representation in VHSNCs/DHS	Institutional	Panchayats, District Health Societies	Pharmacist input into local planning
Leadership & Advocacy Workshops	Individual	Professional Associations	Enhanced pharmacist leadership in community forums
Community Pharmacy Practice Units	Academic-Public Health	Universities, PRIs	Student-led public health projects in villages
National Network of Community Pharmacists	Policy	PCI, IPA	Knowledge sharing, research, advocacy

5.8 Future Directions

1. Scaling Telepharmacy Hubs: Using Panchayat buildings or Common Service Centres to deliver telepharmacy services.
2. Developing Mobile Apps for Pharmacist Reporting: Linking ADRs and medicine stock data to state dashboards.
3. Creating a Career Pathway for Public Health Pharmacists: Including promotions, specialized training, and leadership roles.
4. Aligning with Sustainable Development Goals (SDGs): Pharmacists' activities directly contribute to SDG 3 (Good Health and Well-being) and SDG 16 (Strong Institutions).

6. **Enhancing Pharmacist Contributions to Community Health and Local Governance**

To strengthen pharmacists' roles in community health and local governance, India's predominantly industry-focused Bachelor of Pharmacy (B.Pharm) curriculum should incorporate public health modules on local self-governance, social determinants of health, and community-based interventions to prepare future pharmacists for Primary Health Centres (PHCs) and community settings [46], while short-term Continuing Education Programs (CEPs) on rational drug use, pharmacovigilance, and telehealth, supported through partnerships with the Pharmacy Council of India (PCI), State Health Resource Centres (SHRCs), and National Health Mission (NHM), can enhance existing pharmacists' skills [47], and leadership development workshops on negotiation and public speaking can empower pharmacists to represent their profession effectively in Village Health, Sanitation,

and Nutrition Committees (VHSNCs) and Panchayat meetings to drive actionable outcomes [48]; institutionally, pharmacists should be formally nominated to District Health Societies and Village Health Committees to contribute to Village Health Action Plans (VHAPs) and advocate for rational drug procurement and community-based programs [25], with universities establishing Community Pharmacy Practice Units in collaboration with Panchayats for student internships and public health projects [49], and a National Network of Community Pharmacists under PCI or the Indian Pharmaceutical Association (IPA) to foster knowledge exchange, research, and policy advocacy [50]; intersectoral collaboration should involve pharmacists working with doctors and nurses for integrated patient care, medication therapy management, and chronic disease follow-up, supporting Accredited Social Health Activists (ASHAs) and Auxiliary Nurse Midwives (ANMs) in last-mile medicine delivery, drug kit management, and health education, partnering with Panchayati Raj Institutions (PRIs), Urban Local Bodies (ULBs), and Standing Committees on Health to provide technical expertise in drug procurement, budgeting, and monitoring, and collaborating with NGOs on TB, HIV, maternal health, and non-communicable diseases (NCDs) for community outreach and supply chain management [51]; policy enablers should include explicit recognition of community pharmacy as a public health profession by the Ministry of Health and Family Welfare (MoHFW) and PCI to secure funding and training [52], performance-based incentives for achieving targets in essential medicine availability, antimicrobial stewardship, and pharmacovigilance reporting, and integration into the Ayushman Bharat Digital Mission as verified health professionals to securely access and update patient records [22]; further, operational research on pharmacist-led rural interventions, dashboards linking pharmacist data to health outcomes, and published case studies of successful collaborations can generate evidence for policy replication [53], while regular monitoring of interventions using metrics like essential medicine stock-out rates, patient counseling percentages, adverse drug reaction (ADR) reports, VHSNC participation, and patient satisfaction scores, integrated into District Health Information Systems (DHIS) or Health Management Information System (HMIS), is critical for evaluation [54].

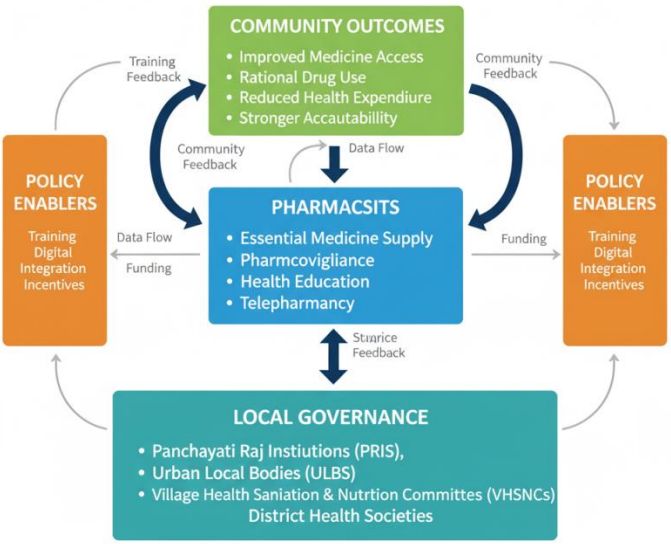

Figure 2: A Transformative Model of Pharmacy in Local Self-Governance

6.5 Key Recommendations Table

Policy Area	Recommendation	Impact
Governance	Mandate pharmacist representation in local health committees	Strengthened planning & accountability
Financing	Earmark SFC funds for pharmacist-led interventions	Sustainable operations
Training	Include public health and local governance modules in pharmacy education	Skilled workforce
Technology	Integrate pharmacists into ABDM & HMIS	Real-time monitoring &telepharmacy
Public Awareness	Community campaigns on pharmacists' role	Increased trust & utilization

6.6 Anticipated Impact Implementing the above recommendations can result in:

• Reduced stock-outs and wastage of essential medicines,
• Improved adherence to chronic disease treatments,
• Enhanced pharmacovigilance and patient safety,
• Lower out-of-pocket spending for rural households,
• Stronger local health governance aligned with SDG 3 and SDG 16.

6.7 Conclusion

Empowering community health through pharmacy is not simply about adding another health worker to the system—it is about leveraging pharmacists' unique expertise to make local health systems more responsive, efficient, and accountable. India's robust local self-governance framework, coupled with an expanding pharmacy workforce, provides a historic opportunity to integrate pharmacists into the very heart of community health decision-making. By implementing capacity-building, policy reforms, and technology integration, pharmacists can become a linchpin between communities and local health governance, ensuring that the vision of decentralized, people-centred health care becomes a reality.

References

1. Government of India. The Constitution (73rd Amendment) Act, 1992. New Delhi: Ministry of Law and Justice; 1992.
2. Anderson C, Bates I, Beck D, Brock T, Futter B, Mercer H, et al. The WHO UNESCO FIP Pharmacy Education Taskforce. Human Resources for Health. 2009;7:45.
3. Basak SC, Sathyanarayana D. Community pharmacy practice in India: Past, present and future. Indian J Pharm Sci. 2010;72(5):556-63.
4. Bureau of Pharma PSUs of India. Pradhan Mantri Jan AushadhiYojana Guidelines. New Delhi: Department of Pharmaceuticals; 2023.
5. Ministry of Health and Family Welfare. Ayushman Bharat – Comprehensive Primary Health Care. New Delhi: MoHFW; 2022.
6. National Health Authority. Ayushman Bharat Digital Mission. New Delhi: NHA; 2023.
7. Banerjee A, Duflo E. Addressing Absence. J Econ Perspect. 2006;20(1):117-36.
8. Planning Commission. High Level Expert Group Report on Universal Health Coverage. New Delhi; 2011.
9. Mossialos E, Courtin E, Naci H. Expanding the role of community pharmacists. BMJ. 2015;351:h4409.

10. Koster ES, Philbert D, Bouvy ML. Impact of the pharmacist on medication adherence in patients with chronic conditions. Br J ClinPharmacol. 2016;82(3):884-95.
11. World Health Organization. The role of the pharmacist in the health care system. Geneva: WHO; 2019.
12. Pharmacy Council of India. Annual Report 2022-23. New Delhi: PCI; 2023.
13. Deshpande PR, Joshi A, Patel K, Sharma A. Impact of pharmacists in public health. J Pharm Bioallied Sci. 2020;12(3):205-12.
14. Batta A. Pharmacist's role in rational drug use at primary health centres. Int J Health Policy Manag. 2021;10(2):75-9.
15. Kumar S, Singh S. Role of community participation in improving rural health outcomes. Indian J Public Health. 2020;64(1):3-8.
16. Pharmacy Council of India. Continuing Education Guidelines. New Delhi: PCI; 2021.
17. Ministry of Health and Family Welfare. National Health Mission: Framework for Implementation. New Delhi: MoHFW; 2021.
18. Government of India. Rural Health Statistics 2022-23. New Delhi: MoHFW; 2023.
19. Kotwani A. Regulatory enforcement in retail pharmacies in India. J Pharm Policy Pract. 2020;13:25.
20. Sharma R, Mishra S. Digital health access in rural India: Challenges and opportunities. Indian J Med Res. 2022;156(3):345-50.
21. Ved R, Gupta G, Singh S. Coordination challenges in community health programs. Indian J Community Med. 2019;44(4):299-304.
22. National Health Authority. Ayushman Bharat Digital Mission Integration Guidelines. New Delhi: NHA; 2023.
23. WHO. Pharmacovigilance in public health programs. Geneva: WHO; 2020.
24. Government of India. The Constitution (74th Amendment) Act, 1992. New Delhi: Ministry of Law and Justice; 1992.
25. National Health Mission. Village Health Sanitation & Nutrition Committees Guidelines. New Delhi: MoHFW; 2014.
26. Ministry of Rural Development. Social Audit Manual. New Delhi: MoRD; 2017.
27. Sharma R, Mishra S. Telepharmacy: Bridging rural health gaps in India. J Telemed Telecare. 2023;29(1):78-85.
28. Kumar S, Singh S. Role of community participation in improving rural health outcomes. Indian J Public Health. 2020;64(1):3-8.
29. Anderson C, Blenkinsopp A, Armstrong M. The contribution of community pharmacy to improving the public's health. London: RPSGB; 2009.
30. Government of India. Indian Public Health Standards (IPHS). New Delhi: MoHFW; 2022.
31. Indian Pharmacopoeia Commission. Pharmacovigilance Programme of India Annual Report 2023. Ghaziabad: IPC; 2023.
32. Goel P, Ross-Degnan D, Berman P, Soumerai S. Retail pharmacies in developing countries: a behavior and intervention framework. SocSci Med. 1996;42(8):1155-61.
33. World Health Organization. Community engagement for public health. Geneva: WHO; 2021.
34. National TB Elimination Program. Guidelines for Programmatic Management. New Delhi: MoHFW; 2022.

35. National Health Authority. eSanjeevani Telemedicine Platform. New Delhi: NHA; 2023.
36. Pharmacy Council of India. Continuing Education Guidelines. New Delhi: PCI; 2021.
37. Bhatnagar P, Mishra R. Role of pharmacists in strengthening ASHA and ANM networks. Indian J Community Med. 2020;45(4):450-5.
38. Kerala State Health Mission. Kudumbashree Health Interventions Report. Thiruvananthapuram; 2022.
39. Tamil Nadu Medical Services Corporation. Annual Report 2023. Chennai: TNMSC; 2023.
40. Bureau of Pharma PSUs of India. Jan Aushadhi Kendra Impact Assessment. New Delhi: DoP; 2024.
41. FIP. Community pharmacy at a glance 2023. The Hague: International Pharmaceutical Federation; 2023.
42. Kumar S, Sharma N. Decentralised public health and pharmacy: a policy review. Health Policy Plan. 2024;39(2):170-8.
43. United Nations. Sustainable Development Goals Progress Report. New York: UN; 2024.
44. World Health Organization. Building capacity for health systems strengthening. Geneva: WHO; 2019.
45. Government of India. National Health Policy 2017. New Delhi: MoHFW; 2017.
46. Pharmacy Council of India. B.Pharm Regulations. New Delhi: PCI; 2023.
47. State Health Resource Centre. Capacity building of pharmacists in public health. Raipur; 2022.
48. Saini B, Brillant M, Shenfield G. Leadership training for pharmacists: a scoping review. Res Social Adm Pharm. 2020;16(9):1205-13.
49. Indian Pharmaceutical Association. Community pharmacy internship model. Mumbai: IPA; 2023.
50. PCI & IPA. National Network of Community Pharmacists. New Delhi; 2024.
51. Mishra S, Patel K. NGO-pharmacist partnerships for rural health. Indian J Community Med. 2021;46(2):237-42.
52. MoHFW. Draft Policy on Community Pharmacy. New Delhi: MoHFW; 2024.
53. Kumar S, Deshpande P. Operational research on pharmacist-led interventions in rural India. J Pharm Policy Pract. 2024;17:65.
54. Ministry of Health and Family Welfare. Health Management Information System (HMIS) Portal. New Delhi: MoHFW; 2024.
55. Government of India. Model Public Health Act. New Delhi: MoHFW; 2023.
56. Ministry of Housing and Urban Affairs. Urban Local Bodies Standing Committees Guidelines. New Delhi: MoHUA; 2022.
57. State Finance Commission Reports. New Delhi: Ministry of Finance; 2023.
58. National Health Mission. Standard Drug Kit Guidelines. New Delhi: MoHFW; 2023.
59. National Health Authority. ABDM Professional Registration Portal. New Delhi: NHA; 2024.
60. PCI. Community Pharmacy Practice Units: Model Guidelines. New Delhi: PCI; 2024.
61. Planning Commission. Rural Health Workforce Gap Analysis. New Delhi; 2022.
62. Sharma P, Bhatnagar R. Continuing education in public health pharmacy. Indian J Pharm Educ Res. 2023;57(4):245-9.

63. MoHFW. National Coordination Committee for Community Pharmacy. New Delhi; 2024.
64. FICCI. PPP Models for Rural Health. New Delhi: FICCI Health Services; 2023.
65. WHO SEARO. Building Trust in Health Professionals. New Delhi: WHO; 2023.
66. Macinko J, Harris MJ. Brazil's Family Health Strategy — Delivering community-based primary care. N Engl J Med. 2015;372:2177-81.
67. Wananukul W, Pongcharoen P. Primary care pharmacy practice in Thailand. Pharm Pract. 2021;19(1):2197.