

The Long View: History, Context, and the Future of Rural Healthcare in India

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Abstract: *It is not enough to simply look at the policies and statistics of India's National Rural Health Mission in order to appreciate its significance. An approach that historians refer to as the "long view" is required. In the same way that an archaeologist uncovers layers of civilisation, a historian must dive underneath contemporary issues in order to comprehend the historical silt that determines the way healthcare is delivered in rural India today. Taking this perspective into consideration reveals that the National Rural Health Mission (NRHM) is not only a government program that was initiated in 2005; rather, it is the most recent chapter in a centuries-long effort to introduce modern medicine to India's rural areas while simultaneously traversing the complicated terrain of colonial legacies, social hierarchies, and cultural traditions. This article tries to investigate into this dynamic relationship between the state of India and its policy towards the rural spatiality, through the discourse pertaining to rural health and NRHM.*

Keywords: Rural Health, Medicine, India, State Policy, NRHM

Understanding India's National Rural Health Mission requires more than examining its policies and statistics. It demands what historians call the 'long view.'¹ Like an archaeologist uncovering layers of civilization, a historian must dig beneath contemporary challenges to understand the historical sediment that shapes how healthcare functions in rural India today. This perspective reveals that the NRHM is not simply a government program launched in 2005 but rather the latest chapter in a centuries-long struggle to bring modern medicine to India's villages while navigating the complex terrain of colonial legacies, social hierarchies, and cultural traditions.²

History teaches one to think of inappropriate time scales. Contemporary policy analysis often expects rapid results, but historical perspective reveals that meaningful social change, particularly in areas as complex as healthcare

systems, typically requires decades rather than years.³ The National Health Service in Britain, often regarded as a model, has taken decades to achieve its current effectiveness and has undergone numerous reforms and adaptations.⁴ Hence, successful health systems in developing countries, such as those in Thailand or Brazil, require sustained effort over multiple political cycles.⁵ This historical perspective does not excuse slow progress, but it helps set realistic expectations and design programs for long-term sustainability rather than short-term political gains. It also allows us to recognize that apparent failures in early years might be laying the groundwork for future success, just as early investments in education and infrastructure might not show health benefits for a generation.⁶

India launched the NRHM in 2005, recognizing a stark reality: while urban areas had relatively better healthcare infrastructure, rural India, where over 65% of the population lived, faced severe shortages of doctors, nurses, medicines, and basic facilities.⁷ Maternal mortality rates were alarmingly high, children were dying from preventable diseases, and entire communities had little to no access to quality healthcare.⁸ The NRHM aimed to address the healthcare needs of nearly 800 million people residing in hundreds of thousands of villages, many of which lacked proper roads, electricity, and communication systems. This was the challenge.

The Government of India's National Urban Health Mission (2013) was later merged with the National Rural Health Mission (NRHM) to form the National Health Mission.⁹ It focused on economically underprivileged and slum populations by establishing urban primary health centres and community health centres in urban areas. It included a comprehensive approach to rural healthcare. ASHA (Accredited Social Health Activist) program: one ASHA per 1,000 population;¹⁰ *Rogi Kalyan Samitis* (Patient Welfare Committees) for local governance; Mobile Medical Units for remote areas, and upgraded infrastructure at all levels with Indian Public Health Standards (IPHS).¹¹ The National Rural Health Mission (NRHM) represents one of India's most ambitious attempts to transform healthcare delivery in its villages and remote areas.

The NRHM operates on a 'pyramid of care' approach.¹² At the base are Accredited Social Health Activists (ASHAs). It includes trained women from local communities who serve as the first point of contact for health services. These community health workers bridge the gap between families and the formal healthcare system, providing basic health education, maternal care support, and connecting people to higher-level services.¹³ Moving up the pyramid are the Auxiliary Nurse Midwives (ANMs) at sub-centres, serving populations of 3,000 to 5,000 people. These trained professionals handle routine healthcare, immunizations, and prenatal care. Above them are Primary Health Centres (PHCs), which are staffed with qualified doctors and serve 20,000-30,000 people, followed by Community Health Centres (CHCs) at the district level, providing specialized care.¹⁴

Past Shaping the Present Healthcare

The British administration established distinct administrative systems across regions, fulfilling the economic and strategic interests of the ruler.¹⁵ Areas under direct British rule developed distinct institutional cultures compared to princely states that maintained semi-autonomous governance.¹⁶ These colonial-era differences in administrative capacity, educational development, and infrastructure investment continue to influence how programs like the NRHM function today.

When we observe that Tamil Nadu consistently outperforms Bihar in health indicators or that Kerala's community participation is more effective than in other states, these are not random variations in administrative efficiency. They are the products of what historians call 'path dependence,' where decisions made generations ago continue to influence present outcomes.¹⁷ Tamil Nadu's current healthcare success, for instance, builds on investments in education and social development that began in the early twentieth century under the Justice Party reformers.¹⁸ The state's emphasis on women's education and social reform created foundations that would prove crucial when the NRHM emphasized community participation and women's roles as health activists. This historical perspective explains why simply replicating Tamil Nadu's current policies in other states often fails, as the underlying social and institutional foundations are different.¹⁹

Similarly, Kerala's remarkable ability to implement participatory health programs reflects a unique history of social reform movements, missionary education, and political mobilization that created a culture of civic engagement spanning generations.²⁰ When Village Health Sanitation and Nutrition Committees work effectively in Kerala, they draw on social capital accumulated over decades of democratic participation and literacy campaigns.²¹

Learning from Historical Parallels: The Community Development Legacy

India's ongoing challenges with implementing rural healthcare reflect patterns seen in previous development programs. The Community Development Program of the 1950s, like the NRHM, aimed to transform rural India through community participation and integrated development.²² It faced bureaucratic resistance, elite capture of benefits, and difficulty sustaining community motivation, which are remarkably similar to those currently faced by the National Rural Health Mission (NRHM). The Community Development Program's ultimate shortcomings offer valuable lessons.²³ It failed because it relied too heavily on top-down planning, underestimated the complexity of rural social structures, and was unable to sustain community engagement without addressing the underlying power dynamics.²⁴

These historical insights help explain why the NRHM's emphasis on women's participation through ASHA workers represents a crucial innovation; it attempts

to work through existing social networks while gradually transforming them.²⁵ Conversely, examining successful historical health interventions reveals the conditions that enable large-scale programs to succeed in the Indian context. The smallpox eradication campaign and early family planning programs succeeded because they combined centralized planning with local adaptation, invested in training local workers, and maintained flexibility in implementation while staying focused on clear objectives.²⁶

The Continuity of Challenge: What is New about the NRHM?

A historical perspective helps distinguish between genuinely innovative aspects of the NRHM and the challenges that have persisted for generations. The problem of providing healthcare to scattered rural populations is not new.²⁷ The colonial and early post-independence governments faced a similar fundamental challenge of reaching remote villages with limited infrastructure.²⁸ What is genuinely innovative about the NRHM is not the idea of community health workers, but rather traditional systems, which included community-based healers and midwives who played similar roles.²⁹ But the innovation lies in formalizing, training, and integrating these workers into modern healthcare systems while maintaining their community connections. The ASHA program represents an attempt to bridge the ancient and modern, combining traditional community roles with contemporary medical knowledge.³⁰

Similarly, the challenge of coordinating across multiple government departments: health, education, infrastructure, and agriculture reflects the colonial administrative legacy of departmental silos.³¹ The NRHM's integrated approach acknowledges this historical reality while attempting to create new patterns of coordination.

Many rural areas still struggle with irregular electricity supply, poor road connectivity, and unreliable communication networks.³² A Primary Health Centre might have modern equipment that sits unused because power cuts are frequent, or ambulances cannot reach patients during the monsoon season when roads become impassable. However, challenges become more complex as infrastructure development requires coordination across multiple government departments and levels of government. The health department might build a facility, but the power department has not extended the electrical grid, the roads department has not improved connectivity, and the telecommunications department has not ensured phone coverage. Each operates on different timelines and priorities, creating a coordination nightmare.³³

The NRHM established protocols and guidelines for everything from drug storage to patient care procedures.³⁴ However, implementing these standards uniformly proves extremely difficult. A Community Health Centre in relatively prosperous Punjab faces different challenges than one in remote Odisha or mountainous Himachal Pradesh. Local adaptations become necessary, but they create their own problems. Hence, the infrastructure puzzle, along with the

quality control dilemma, continues.

State Variations as Historical Laboratories

The dramatic differences in NRHM implementation across states represent more than administrative variations. India's states differ not just in size and population but in fundamental ways that shape how any extensive program must operate.³⁵ For instance, Maharashtra generates significant fiscal capacity and can supplement central funding. Whereas Bihar struggles with limited resources, thereby relying almost entirely on central support.³⁶ It reflects various models of governance and development that have evolved over decades or centuries. These differences create 'implementation ecosystems'.³⁷ It is a unique combination of resources, institutions, politics, and culture that determines how programs function in practice; different soil conditions require adapted approaches to achieve similar health outcomes. Understanding these as 'implementation ecosystems' shaped by unique combinations of resources, institutions, politics, and culture explains why 'one-size-fits-all' approaches consistently fail to achieve their intended goals.

The High Performers: Building on Historical Advantages

States like Tamil Nadu and Kerala did not suddenly become effective at implementing health programs in 2005. Their success builds on institutional capabilities that have been developed over generations.³⁸ Tamil Nadu's systematic institutional building began in the 1970s and 1980s, creating infrastructure that the NRHM could enhance rather than build from scratch.³⁹ The state's strategic decision to complement central funding with substantial state resources reflects a political culture that values long-term investment in public services, itself a product of historical experiences with social reform movements.⁴⁰ Tamil Nadu did not just wait for central allocations; instead, it invested its revenue in healthcare infrastructure, medical education, and staff recruitment. This created a virtuous cycle in which better services led to improved health outcomes, which in turn generated political support for continued investment.

Kerala presents a different but equally illuminating model. The state achieved remarkable health outcomes through a 'social development first' approach.⁴¹ High literacy rates, particularly among women, created communities that actively demanded quality healthcare services.⁴² This social pressure, combined with intense political competition and active civil society organizations, created accountability mechanisms that ensured NRHM programs reached their intended beneficiaries.

Kerala's approach demonstrates how high literacy rates, particularly among women, create communities that actively demand quality healthcare services. It resulted from deliberate educational policies pursued consistently since the early twentieth century, combined with intense political competition that made

politicians responsive to popular demands for public services.⁴³ Kerala, with its high literacy rate and political awareness, is better equipped to participate meaningfully in Village Health Sanitation and Nutrition Committees.⁴⁴ These committees influence healthcare planning and hold providers accountable for the quality of their services. The result is that the NRHM's community participation components work more effectively than in states where literacy and political awareness are lower.

The Struggling Giants: Historical Constraints in Action

On the other end of the spectrum, Uttar Pradesh, India's most populous state, faces enormous challenges in implementing the NRHM, highlighting the complexity of scaling healthcare programs.⁴⁵ With over 200 million people, larger than most countries, Uttar Pradesh presents implementation challenges that are almost incomprehensible in their scale. Uttar Pradesh suffers from 'implementation deficit disorder', weak institutional capacity at every level of government.⁴⁶ When the central NRHM fund reaches the state, it must flow through administrative systems that often lack the competence, integrity, or motivation to deploy resources effectively. Corruption is not just an occasional problem; it is a systemic challenge that diverts resources from their intended purposes.⁴⁷

Bihar presents similar challenges but with additional complexity stemming from historical neglect and extreme poverty.⁴⁸ For decades, Bihar received limited investment in basic infrastructure, including roads, power, education, and healthcare. This created a situation where the NRHM had to build not only health systems but also the foundational infrastructure necessary for any modern program to function effectively. Despite enormous challenges, certain districts and programs within Bihar have achieved remarkable improvements when they received sustained attention and resources, suggesting that the historical disadvantages are not insurmountable, but require much more intensive and sustained intervention than initially envisioned.⁴⁹

The challenges faced by large states like Uttar Pradesh and Bihar reflect more than their current administrative capacity, as they stem from historical patterns of limited investment in basic infrastructure and institutional development.⁵⁰ For decades, these states received minimal investment in roads, power, education, and healthcare, creating situations where the NRHM had to build not just health systems but the foundational infrastructure necessary for any modern program to function. Bihar's situation particularly illustrates both the limitations and potential of external interventions.

Cultural Navigation: The Deep Challenge of Medical Modernity

The intersection of modern medicine with traditional practices represents one of the NRHM's most complex challenges, rooted in centuries of cultural development.⁵¹ Healthcare does not exist in a cultural vacuum, and the program

must navigate traditions, beliefs, and social customs that influence how communities perceive and interact with medical services.⁵² This cultural navigation requires an understanding that traditional healing practices, religious beliefs, and social customs are not simply obstacles to overcome but rather represent alternative knowledge systems that communities have relied on for generations.⁵³ The challenge is not to override these practices but to find ways to integrate beneficial traditional approaches while promoting evidence-based modern medicine.⁵⁴

Many traditional practices emerged from genuine experience with local disease patterns and available treatments.⁵⁵ Discarding these entirely can create a vacuum that undermines community trust. The most successful NRHM implementations have found ways to respectfully engage with traditional healers and incorporate applicable traditional practices while introducing modern medical interventions.⁵⁶ Therefore, it requires healthcare workers to be not only medically competent but also culturally sensitive and skilled in community diplomacy: a combination of skills that's difficult to develop and maintain across a vast and diverse program.

The Technology Challenge: Digital Aspirations Meet Historical Realities

The NRHM's increasing adoption of technology solutions, such as electronic health records, telemedicine, and mobile health applications, illustrates the tension between modernizing aspirations and historical realities.⁵⁷ Limited internet connectivity, irregular power supply, and low digital literacy create barriers that reflect decades of uneven infrastructure development.⁵⁸ More fundamentally, there is often a mismatch between technologies designed for urban contexts and the realities of rural areas. It reflects a broader historical pattern in which modern interventions designed for urban settings often struggle when transplanted to rural contexts without adequate adaptation.⁵⁹

Federalism and Political Dynamics: The Long-Term View

India's federal structure grants states significant autonomy in implementing centrally sponsored schemes, and political dynamics significantly influence implementation choices.⁶⁰ States with stable, long-term political leadership often demonstrate more consistent policy implementation because politicians who expect to remain in power have incentives to invest in programs that yield results over years rather than months.⁶¹ The historical pattern shows that successful health system development requires sustained effort across multiple political cycles.⁶² States like Gujarat, which maintained relatively stable political leadership during much of the NRHM period, could pursue consistent healthcare policies over various years, enabling institutional learning and the sustained effort required for complex health system improvements.⁶³

Innovation within Constraints: Learning from Success

States that have become innovation laboratories within the NRHM framework, such as Rajasthan with its 'Janani Express Program' and Chhattisgarh with its 'Tribal Outreach Initiatives', demonstrate how historical constraints can spark creative solutions.⁶⁴ These innovations emerged from recognizing local realities rather than simply implementing standardized approaches. Rajasthan's free transportation program for pregnant women emerged from the understanding that geographical barriers are significant obstacles to institutional deliveries.⁶⁵ Rather than accepting this constraint, state officials developed targeted interventions that addressed specific challenges. This contextual innovation represents the best of NRHM implementation, as it adapts national frameworks to address local realities while building on existing social and institutional foundations. Chhattisgarh presents another model of innovation, particularly in reaching tribal and remote populations. The state developed mobile health units and outreach programs specifically designed for communities that traditional facility-based services could not effectively reach. These innovations required an understanding not just of geographical challenges but also of cultural and social dynamics that influenced how different communities interacted with healthcare services. What is particularly instructive about these innovation hubs is how they demonstrate the importance of local leadership and institutional capacity. Both Rajasthan and Chhattisgarh had state health officials who combined technical competence with political support, enabling them to experiment with new approaches and sustain them over time.

The Sustainability Question: Building for Generations

The most profound implementation challenge involves building sustainable systems rather than delivering short-term interventions.⁶⁶ Many NRHM initiatives prove effective when they receive focused attention and resources, but struggle to maintain their effectiveness over time. This sustainability challenge requires thinking beyond immediate health outcomes to consider how to build systems that can adapt, evolve, and maintain quality over decades rather than years.⁶⁷ Historical perspective reveals that the most successful health interventions created institutions and capabilities that could evolve to address new challenges as they emerged. The NRHM's transformation into the National Health Mission and integration with other welfare schemes demonstrates this kind of institutional learning and flexibility, crucial qualities for programs operating in India's diverse and complex social landscape.⁶⁸

The Measurement Challenge: Understanding Progress over Time

Effectively monitoring and evaluating a program operating across hundreds of thousands of locations with varying contexts requires a sophisticated understanding of how change occurs over time.⁶⁹ The NRHM generates an enormous amount of data, but transforming this information into actionable

insights for program improvement remains challenging, precisely because meaningful change often occurs on timescales longer than those of classic political or administrative cycles.⁷⁰ Different stakeholders require different types of information across various time horizons. Community members want to know if their local facility is improving year by year. State officials require aggregate data for informed policy decisions that may take years to yield results. Program managers require operational information for day-to-day improvements. Creating systems that serve all these needs simultaneously while recognizing the different rhythms of change proves extremely challenging.⁷¹

Future Trajectories: Learning from Historical Patterns

Understanding long-term patterns enables more intelligent thinking about the future of rural healthcare in India.⁷² Historical analysis of how India has addressed previous demographic transitions can inform planning for the current epidemiological transition, as rural areas face increasing challenges from chronic diseases alongside persistent challenges from infectious diseases.⁷³ The emergence of new technologies, shifting demographic patterns, and evolving economic structures will present both new challenges and opportunities for rural healthcare delivery. However, these future developments will unfold within the same basic constraints that have shaped rural healthcare for generations, including geographic diversity, cultural complexity, administrative capacity limitations, and the ongoing challenge of coordinating across multiple levels of government.⁷⁴

Conclusion

The historical perspective transforms our understanding of the NRHM from a contemporary policy program to a chapter in India's ongoing story of development and social change. This view reveals both the enormous ambition of the undertaking and realistic pathways toward achieving its goals. Understanding the NRHM historically does not excuse slow progress or accept inevitable limitations. Instead, it provides frameworks for designing more effective interventions that work with rather than against historical patterns and social realities. It suggests that sustainable improvements in rural healthcare will come not from perfect policy designs but from programs that can adapt to local conditions while gradually transforming the social and institutional foundations that support health system functioning.

The long view reveals that transforming rural healthcare in India is not merely a technical challenge but a social transformation that intersects with broader processes of development, democratization, and modernization.⁷⁵ Success will require not just better policies and more resources but also the patient building of the social capital, institutional capacity, and cultural foundations that enable complex health systems to function effectively across India's extraordinary

diversity. This historical perspective offers hope alongside realism. While the challenges are enormous and deeply rooted, the capacity for change and adaptation demonstrated throughout India's history suggests that sustained, thoughtful effort can gradually transform even the most entrenched patterns. The NRHM, understood in this context, represents both a significant achievement and a foundation for continued progress toward the goal of accessible, quality healthcare for all Indians.

Notes and References (Endnotes)

1. Fernand Braudel, *The Mediterranean and the Mediterranean World in the Age of Philip II*, University of California Press, Berkeley, 1995
2. David Arnold, *Colonizing the Body: State Medicine and Epidemic Disease in Nineteenth-Century India*, University of California Press, Berkeley, 1993
3. Paul Pierson, *Politics in Time: History, Institutions, and Social Analysis*, Princeton University Press, 2004
4. Charles Webster, *The National Health Service: A Political History*, Oxford University Press, 2002
5. Sanguan Nitayarumphong & Anne Mills, *Achieving Universal Coverage of Health Care: Experiences from Middle Income Countries*, Health Systems Research Institute, Nonthaburi, 1998
6. Daron Acemoglu & James A. Robinson, *Why Nations Fail: The Origins of Power, Prosperity, and Poverty*, Crown Business, New York, 2012
7. Government of India, Ministry of Health and Family Welfare, *National Rural Health Mission: Framework for Implementation 2005-2012*, MOHFW, New Delhi, 2005
8. Registrar General of India, *Sample Registration System Bulletin*, Office of Registrar General, New Delhi, 2005
9. Government of India, Ministry of Health and Family Welfare, *National Health Mission: Mission Document*, MOHFW, New Delhi, 2013
10. Ministry of Health and Family Welfare, *ASHA Training Modules*, Government of India, New Delhi, 2006
11. Directorate General of Health Services, *Indian Public Health Standards for Primary Health Centres*, MOHFW, New Delhi, 2007
12. World Health Organization, *Primary Health Care: Report of the International Conference on Primary Health Care*, WHO, Geneva, 1978
13. Layla Saprii et al, 'Community health workers in rural India: analysing the opportunities and challenges Accredited Social Health Activists (ASHAs) face in realising their multiple roles', *Human Resources for Health* 13, no. 1, 2015, p.95
14. Government of India, *Rural Health Statistics 2019-20*, Ministry of Health and Family Welfare, New Delhi, 2020
15. Thomas R Metcalf, *Ideologies of the Raj*, Cambridge University Press, 1994
16. Barbara N. Ramusack, *The Indian Princes and their States*, Cambridge University

- Press, 2004
17. James Mahoney, 'Path dependence in historical sociology', *Theory and Society* 29, no. 4, 2000, pp.507-548
 18. David A. Washbrook, 'The Development of Caste Organisation in South India, 1880 to 1925', In *South India: Political Institutions and Political Change 1880-1940*, edited by Christopher Baker, 150-203, Macmillan, Delhi, 1976
 19. Jean Drèze & Amartya Sen, *An Uncertain Glory: India and its Contradictions*, Princeton University Press, 2013
 20. Robin Jeffrey, *Politics, Women and Well-Being: How Kerala Became 'A Model'*, Macmillan, London, 1992
 21. Robert D. Putnam, *Making Democracy Work: Civic Traditions in Modern Italy*, Princeton University Press, 1993
 22. Saurabh C. Dube, *Modernization and Development: The Search for Alternative Paradigms*, Zed Books, London, 1988
 23. Lloyd I. Rudolph & Susanne Hoeber Rudolph, *In Pursuit of Lakshmi: The Political Economy of the Indian State*, University of Chicago Press, 1987
 24. Francine R. Frankel, *India's Political Economy, 1947-2004*, Oxford University Press, New Delhi, 2005
 25. Devaki Nambiar, 'ASHA workers: The challenges of incentivizing and training community health workers', *Economic and Political Weekly* 49, no. 44, 2014, pp.88-95
 26. Lawrence B. Brilliant, *The Management of Smallpox Eradication in India*, University of Michigan Press, Ann Arbor, 1985
 27. Ibid.
 28. Roger Jeffery, *The Politics of Health in India*, University of California Press, Berkeley, 1988
 29. Charles Leslie (ed.), *Asian Medical Systems: A Comparative Study*, University of California Press, Berkeley, 1976
 30. Yamini Nair & Peggy D'Souza, 'Community health worker programmes: A comparative study of selection processes', *Indian Journal of Community Medicine* 28, no. 3, 2003, pp.123-127
 31. David C. Potter, *India's Political Administrators: From ICS to IAS*, Oxford University Press, New Delhi, 1996
 32. Ibid.
 33. V. K. Ramachandran et al, 'Inequalities in Health Status in Rural India.' *Economic and Political Weekly* 36, no. 38, 2001, pp.3663-3673
 34. Directorate General of Health Services, *Indian Public Health Standards Guidelines*, Ministry of Health and Family Welfare, New Delhi, 2012
 35. Atul Kohli, *The State and Poverty in India: The Politics of Reform*, Cambridge University Press, 1987
 36. Planning Commission, *Report of the Task Force on Public Private Partnership for the*

- Eleventh Plan*, Government of India, New Delhi, 2006
37. Peter B. Evans, Dietrich Rueschemeyer, and Theda Skocpol, eds. *Bringing the State Back In*, Cambridge University Press, 1985
 38. Patrick Heller, *The Labor of Development: Workers and the Transformation of Capitalism in Kerala, India*, Cornell University Press, Ithaca, 1999
 39. S. Guhan, 'Social Security Options for Developing Countries', *International Labour Review* 133, no. 1, 1994, pp.35-53
 40. Ibid.
 41. Govindan Parayil, *Kerala: The Development Experience*, Zed Books, London, 2000
 42. Amartya Sen, *Development as Freedom*, Anchor Books, New York, 2000
 43. P.K. Michael Tharakan, 'Socio-Economic Factors in Educational Development: Case of Nineteenth Century Travancore', *Economic and Political Weekly* 19, no. 45, 1984, pp.1913-1928
 44. Thomas T.M. Isaac & Richard W. Franke, *Local Democracy and Development: The Kerala People's Campaign for Decentralized Planning*, Rowman & Littlefield, Lanham, 2002
 45. Jean Drèze & Reetika Khera, 'Recent Social Security Initiatives in India', *World Development* 98, 2017, pp.555-572
 46. Stuart Corbridge et al., *Seeing the State: Governance and Governmentality in India*, Cambridge University Press, 2005
 47. Arvind N. Das, *The Republic of Bihar*, Penguin India, New Delhi, 1992
 48. Ibid.
 49. World Bank, *Bihar: Towards a Development Strategy*, World Bank, Washington, DC, 2005
 50. Paul R. Brass, *The Politics of India since Independence*, Cambridge University Press, 1994
 51. Mark Nichter, *Anthropology and International Health: Asian Case Studies*, Gordon and Breach, Amsterdam, 1989
 52. Helen Lambert, 'Medical Knowledge, Power and Religion: Anthropological Perspectives on Medical Pluralism in South Asia', *Social Science & Medicine* 43, no. 7, 1996, pp.1069-1082
 53. Arthur Kleinman, *Patients and Healers in the Context of Culture*, University of California Press, Berkeley, 1980
 54. Mark Nichter & Mimi Nichter, *Anthropology and Global Health: From Theory to Practice*, Jossey-Bass, San Francisco, 2008
 55. David Hardiman, *Healing Bodies, Saving Souls: Medical Missions in Asia and Africa*, Rodopi, Amsterdam, 2006
 56. Harish Naraindas, Johannes Quack & William S. Sax (eds.), *Asymmetrical Conversations: Contestations, Circumventions, and the Blurring of Therapeutic Boundaries*, Berghahn Books, New York, 2014

57. Ministry of Health and Family Welfare, *National Digital Health Mission Strategy Overview*, Government of India, New Delhi, 2020
58. Telecommunications Regulatory Authority of India, *The Indian Telecom Services Performance Indicators*, TRAI, New Delhi, 2020
59. Rob Kling & Suzanne Iacono, 'The mobilization of support for computerization: The role of computerization movements', *Social Problems* 35, no. 3, 1988, pp.226-243
60. Balveer Arora, 'Adapting Federalism to India: Multilevel Governance or Presidents' Rule?', In *Federalism in Asia*, edited by Baogang He, Brian Galligan, and Takeshi Inoguchi, 71-103, Edward Elgar, Cheltenham, 2007
61. R. Kent Weaver & Bert A. Rockman (eds.), *Do Institutions Matter? Government Capabilities in the United States and Abroad*, Brookings Institution Press, Washington, DC, 1993
62. James Manor, *Power, Poverty and Poison: Disaster and Response in an Indian City*, Sage Publications, New Delhi, 1993
63. Aseema Sinha, *The Regional Roots of Developmental Politics in India*, Bloomington: Indiana University Press, 2005
64. Nishant Jain et al., 'Contextualizing health interventions in Indian states: a comparative analysis', *Health Policy and Planning* 30, no. 8, 2015, pp.1001-1014
65. Government of Rajasthan, *Janani Express Scheme: Guidelines and Implementation*, Department of Health, Jaipur, 2011
66. Russell L. Gruen et al., 'Sustainability science: an integrated approach for health-programme planning', *The Lancet* 372, no. 9649, 2008, pp.1579-1589
67. Rifat Atun et al., 'Health systems, systems thinking and innovation', *Health Policy and Planning*, 27, suppl_1, 2010, pp.iv4-iv8
68. Government of India, *National Health Policy 2017*, Ministry of Health and Family Welfare, New Delhi, 2017
69. World Health Organization, *Everybody's Business: Strengthening Health Systems to Improve Health Outcomes*, WHO Press, Geneva, 2007
70. David H. Peters et al., 'Implementation research: what it is and how to do it', *BMJ* 347, 2013, p.6753
71. Cesar G. et al. Victora, 'How changes in coverage affect equity in maternal and child health interventions in 35 Countdown to 2015 countries: an analysis of national surveys', *The Lancet*, 380, no. 9848, 2012, pp.1149-1156
72. David E. Bloom & David Canning, 'The health and wealth of nations', *Science* 287, no. 5456, 2000, pp.1207-1209
73. K. Srinath Reddy et al, 'Towards achievement of universal health care in India by 2020: a call to action', *The Lancet*, 377, no. 9767, 2011, pp.760-768
74. Yarlina Balarajan et al., 'Health care and equity in India', *The Lancet*, 377, no. 9764, 2011, pp.505-515
75. Amartya Sen, *The Idea of Justice*, Harvard University Press, Cambridge, MA, 2009