



# Prevention of chronic diseases

## reorienting primary health systems in India

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## Key policy recommendations



# Executive summary

Individuals should be entitled to a 'fair innings', and the primary role of health systems should be the prevention of premature mortality.

In India, 66 percent of all deaths during 2010-15 were premature. Over the decades, the burden of premature mortality has shifted from child (0-5 years) to adult (30-69 years) level – 65 percent of premature deaths happened at the adult and 22 percent at the child level during 2010-15.

Primary health systems, however, continue to focus almost exclusively on child mortality. They need to make a health system transition and engage in prevention of chronic diseases – the major cause of adult mortality – together with their original focus on child mortality.

This policy brief analyzes some of the major challenges in terms of governance, manpower and financing that such a transition will be faced with, and develops a number of actionable policy recommendations to address them.

It does so based on extensive desk and field research in 4 Indian states – Uttar Pradesh, Rajasthan, Kerala, Tamil Nadu – and 4 countries – Japan, Canada, United States, Sri Lanka – involving interactions with close to 200 stakeholders from policy, industry, international organizations, civil society and the academia.

In less than a decade, the burden of chronic diseases will overwhelm health systems in India – 89 percent of mortality will happen at 30+ year level by 2025-2030.

A reorientation of national and state health policies, systems and resources is urgently required. The Central government should accept its moral responsibility, strengthen its regulatory capacity, and provide technical together with financial support to state / UT governments.

The latter, on their part, would have to embrace their legal responsibility of being the primary agents for survival and health of their populations. Their role is critical because prevention of chronic diseases requires a sustained, long-term engagement.<sup>1</sup>

<sup>1</sup> For a detailed discussion of issues highlighted in this policy brief, kindly refer to ICRIER Working Paper 321.





# Key facts and findings

- While more people died in China between 2010-15, the number of premature deaths (below the age of 70 years) was highest in India – 31 million or 20 percent of world's total. 66 percent of all deaths within India were premature.
- While more people died in China due to noncommunicable diseases (NCDs) in 2012, 58 percent or 3.4 million of NCD deaths in India, again the highest worldwide, were premature.
- 65 percent of premature deaths in India happened at the adult level (30-69 years), 22 percent at the child level (0-4 years).
- India's at-risk adult population is 535 million – that of Uttar Pradesh's (66) close to Japan's (68), that of Rajasthan's (24) more than Canada's (19). The burden of adult mortality in these states (41 and 36 percent of total deaths) is higher than that of their child mortality (22 percent each).
- Primary health systems, however, continue to focus almost exclusively on child mortality, despite 'the double burden of premature mortality', especially in 'health-backward states'.
- Being the first points of contact, primary health systems in particular have a central role to play in the prevention of premature adult mortality due to chronic diseases.
- States that perform poorly on health also have higher levels of poverty compared to 'health-advanced states'. Reductions in adult mortality will help poverty reduction.
- As nations develop, and as individuals and populations age, chronic diseases emerge as the leading cause of death and disability. In 2013, 8 chronic diseases accounted for 74 percent of total mortality at the adult level.
- In less than a decade, the burden of chronic diseases will overwhelm health systems in India – 89 percent of total mortality will be concentrated at the 30+ year level by 2025-2030.
- India's average income loss due to NCDs was estimated at 23 billion dollars a year (constant 1998 international dollars) – 0.4 percent of GDP in 2005 and 1.3 in 2015, higher than China's 0.3 and 1.2 percent. If left unaddressed, 4 chronic diseases alone – CVDs, CRDs, cancer and diabetes – will impose an economic loss of 3.6 trillion dollars (2010) on India between 2012 and 2030.
- India is the only country among top 10 economies that spends more on military than health (public) – its military expenditure is third highest (2.4 percent of GDP), more than China's (2.1), and total government health expenditure (Centre+states) the lowest (1.3).
- Unless we **Make India Healthy**, there won't be much quality to **Make in India** or **Skill India**.



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There can be little doubt that living long is a much shared aspiration. Even though it is clearly not the only thing we seek, a long life is *inter alia* fairly universally valued – and valued very strongly. ... big changes in mortality that are continuing to occur across the world does not involve extending lives to unimaginable lengths, but relate to the saving of premature mortality – of infants, children, and young or middle-aged adults.

**Mortality as an indicator of economic success and failure**

Nobel Laureate Amartya Sen, 1998

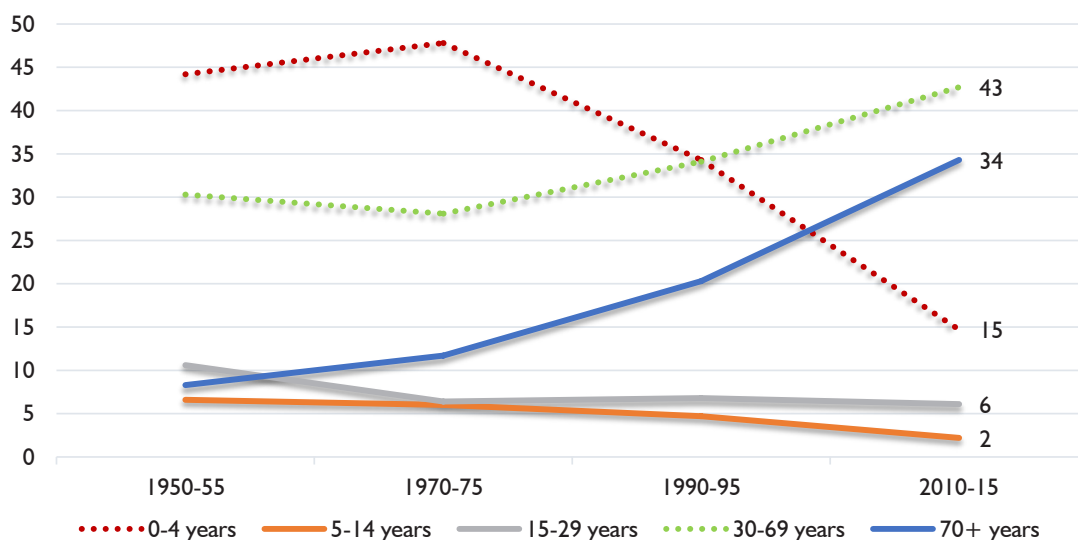
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# Rationale

People should be entitled to a 'fair innings', to use Alan Williams's phrase (1997). Premature mortality, from this perspective, is the first and foremost challenge facing health systems. Of 280 million deaths during 2010-2015, 154 million or 55 percent were premature – with 31 million or 20 percent of latter, the highest in the world – in India alone. While total number of deaths in China was slightly higher than India, 41 percent of deaths in China were premature vis-à-vis 66 percent in India. Over the decades (figure 1), the prime burden of premature mortality has shifted from child (0-4 years) to the adult age group (30-69 years).

Being the first points of contact, primary health systems in particular have a central role to play in reducing premature mortality. Primary health systems in developing countries like India – with them, health policies and resources – need to make a health system transition, and prioritize reductions in premature adult mortality, while continuing to focus on child mortality until it goes down below 1 percent, as in developed countries. Policymakers have already signed the Sustainable Development Goals – now is the time to act upon them.

Figure 1: Distribution of deaths by broad age groups  
(as percentage of total deaths), India, 1950-2015



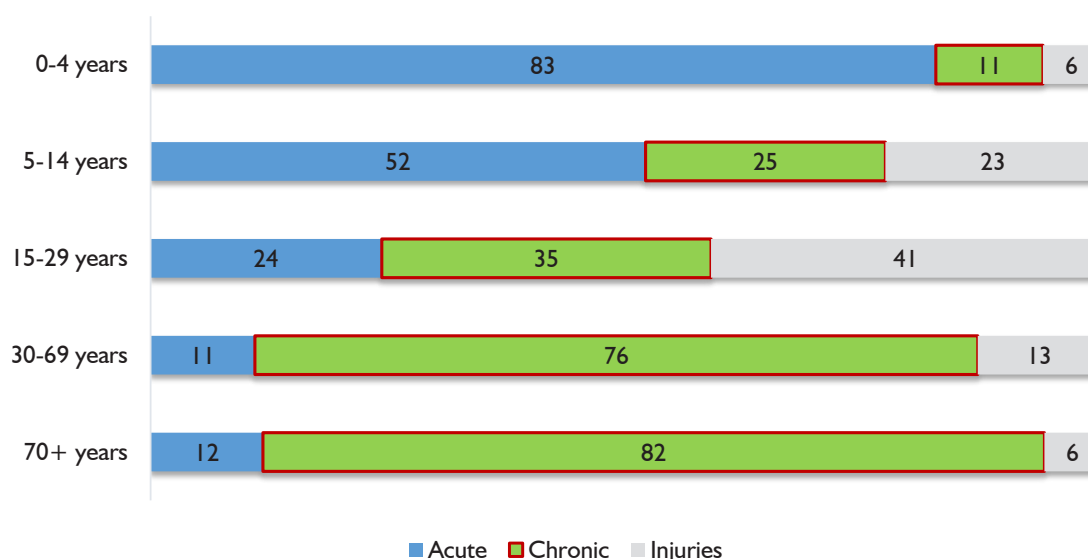
Source: World Population Prospects: The 2015 Revision (WPP 2015), United Nations Population Division (UNPD).

# The burden of chronic diseases

As nations develop, and as individuals and populations age, chronic diseases become the leading cause of death. That is not of primary concern – people have to die ultimately, no matter what the cause. What is of foremost concern is premature mortality and its causes. 16 million people died prematurely due to NCDs in 2012 – 21 percent or 3.4 million in India alone, the highest in any country. While mortality due to NCDs was much higher in China – 8.6 vis-à-vis 5.9 million in India – 36 percent was premature vis-à-vis 58 percent in India.

Within a decade, the burden of chronic diseases would overwhelm health systems in India – as per medium variant estimates of UNPD, 89 percent of mortality will occur at 30+ year level in India by 2025-2030 (more than 3/4th mortality at that level, even at India's current stage of development, is due to chronic diseases: figure 2). Even if development is slow, the proportion of chronic disease-related mortality even in younger age groups would increase. In terms of DALYs due to chronic diseases too, India is at the top of the world – with 18 percent or 280 million of the global total, followed by China at 273 million.

Figure 2: Causes of death by age groups (percent), India, 2013



Source: Institute for Health Metrics and Evaluation (IHME).

**Table 1: Deaths due to all and 8 major chronic diseases in India and its global rank, 1990-2013**

Disease type	Number of deaths			India's global rank		
	1990	2000	2013	1990	2000	2013
Chronic diseases	4,835,057	5,716,656	6,810,313	2	2	2
Cardiovascular diseases	1,507,858	2,034,752	2,760,755	2	2	2
Chronic respiratory disorders	1,096,746	1,146,030	1,395,760	1	1	1
Cancers	427,285	515,824	677,241	3	3	2
Tuberculosis	850,914	660,529	545,516	1	1	1
Digestive diseases	316,664	306,678	324,482	1	1	1
Cirrhosis	125,514	185,926	262,180	2	1	1
Diabetes mellitus	134,783	179,768	237,774	1	1	1
HIV/AIDS	64,125	281,202	78,662	1	1	3

Source: IHME.

Even if we ignore the future trajectory, the given burden of chronic diseases in India is truly staggering (table 1). Share of deaths due to communicable, maternal, neonatal, nutritional causes declined from 50 to 28 percent between 1990 and 2013, while share of NCD mortality increased from 41 to 60 percent. These top 8 chronic diseases are among the leading killers at the adult level as well, and should be prioritized at the policy level. In terms of disability, diabetes and CRDs were at least thrice more critical than CVDs, and should be prioritized accordingly. However, more years were lost due to deaths (170 million) than disability (103 million) caused by chronic diseases in India in 2013. The former is, obviously, more critical.

As far as risk factors of the top 8 chronic diseases are concerned, the metabolic – high blood pressure, plasma glucose, cholesterol, BMI, glomerular filtration – should be the focus for primary health systems, even as there is immense need and scope for multisectoral action vis-à-vis the behavioral and environmental risk factors. Primary prevention of risk factors – calling for behavioral change – can, at best, be a supplementary strategy to deal with the scale of premature death and disability. Primary focus should be on detection of metabolic risk factors (secondary prevention) and follow-up treatment (tertiary prevention).

# Economic impact of chronic diseases

The impact of chronic diseases in the context of developing countries like India is more in terms of premature mortality and potential loss of human capital, productivity and growth. Several estimates have been provided regarding the economic impact of chronic diseases in India – its average loss in income was estimated at 23 billion dollars a year (constant 1998 international dollars), which was 0.4 percent of GDP in 2005 and 1.3 percent in 2015, higher than that of China's 0.3 percent and 1.2 percent respectively. If India would have achieved 2 percent annual reduction in deaths due to chronic diseases between 2005 and 2015, it would have not only led to substantial gains in its labor supply and human capital, but also saved India 15 billion dollars. Recent estimates show that the 4 major chronic diseases – CVDs, CRDs, cancer, diabetes – caused a loss of 3.6 trillion dollars (2010) in India between 2012 and 2030. Instead of being productive investment, out-of-pocket health expenses in India impoverish 8 percent of the country's population every year. Share of NCDs in OOP health expenditure increased from 32 to 47 percent between 1995-96 and 2004, with income and savings being the most important source of financing. This has serious implications for the capacity of households to save for, or spend on, productive capital formation.

From a preventive perspective, policymakers in India should try to avoid the scale of losses that China and higher income countries are incurring due to chronic diseases by drawing policy lessons from what has worked and what hasn't in these countries. Prevention in India is critical since only 18 percent of urban and 14 percent of rural Indians have any form of health insurance coverage (NSS 2014). And with low public health care allocations, rising medical costs, especially vis-à-vis chronic diseases, direct economic burden in the form of OOP expenditure is also high and graded by economic class. Not only has OOP expenditure for NCD-related hospitalizations increased almost five-fold between 1995-96 and 2004 – total NCD-related OOP spending increased from 85 to 347 billion or 27 to 41 percent of all OOP spending during this period – it was relatively less managed through income or savings and more through borrowings in 2004, with catastrophic consequences.

# Prevention in primary health systems

India's network of primary health system, one of the most extensive in the world, has been quite successful in reducing child mortality in the past. There is a great deal of institutional memory with this network and health workforce associated with it. While adult mortality is different, there is no reason why this network cannot be leveraged to address its burden. In 2010, the Government of India launched the National Program for Prevention and Control of Cancers, Diabetes, Cardiovascular Diseases and Stroke (NPCDCS) towards this direction. Primary health systems in states like Kerala and Tamil Nadu have already begun massive action towards addressing chronic diseases. The Central government needs to give a major push to them, more so to the laggard states, by adopting adult mortality together with child mortality as the criterion for allocation of resources under National Health Mission (NHM).

With tackling metabolic risk factors as their key mandate, primary health systems should focus on secondary and tertiary preventive interventions by means of:

1. Surveillance of the focus age group (30-69 years) proactively, others opportunistically;
2. Treatment of borderline cases and follow-up screening periodically;
3. Referral of cases with early to advanced levels of metabolic risk factors for secondary or tertiary screening and treatment;
4. Coordination of continuum of care by a systematic follow-up of cases referred by them for secondary and tertiary screening and treatment (3), with the co-operation of households and communities wherever required;
5. Since engagement with the primary health systems is supposed to start at the pre-birth level, they should also try to ensure continuum of care horizontally – from birth till end of life – in which case, risk factors can be addressed and prospective human and economic costs avoided in time. Their role in this regard is going to be critical as burden of chronic diseases rises even among the younger age-groups.



# Governance

**P**rimary health systems are at the center of health care systems – they are not only the first point of contact for the sick, they proactively deliver core medical and preventive care, and coordinate with secondary and tertiary health systems to ensure continuum of care. When they are efficient, they not only reduce health care costs and improve health outcomes, but also mitigate inequalities in access to health care and outcomes. Although evidence on their performance regarding primary prevention is weak, they are considered highly effective for secondary and tertiary prevention. Primary health systems should do what they do best.

## Challenges and recommendations

### Broad institutional challenges

There is an inherent anomaly in the Indian public health system, to begin with, which has a critical bearing on issues related to responsibility and accountability, essential pillars of any effectively governed entity. Legally, health is a state subject as per Seventh Schedule, Article 246 of the Indian Constitution. However, the Central government not only frames the National Health Policy and a number of national health programs – in the light of which states are expected to design their priorities, policies and programs – central contribution in state health expenditures has been high. Without such support from the Centre, many backward states would not have been able to achieve the progress that they have at the moment. However, from a governance perspective, it has led to a number of challenges.

**Decentralization:** To ensure local responsibility and accountability, and develop a sense of ownership among local health systems and the community, decentralized planning and priority-setting is critical. However, devolution of power in the health sector is especially difficult due to many reasons, including lack of: a) technical guidance at local levels; b) clarity on functions, duties and responsibilities; c) integration between various systems of medicines and multiplicity of bodies managing health budgets.

**Weak local technical capacity:** is a major hindrance for decentralization in health sector. An interesting model which could be replicated is the collaboration between Uttar Pradesh government and the Bill and Melinda Gates Foundation, under which the latter contracted the University of Manitoba and the India Health Action Trust to set up a Technical Support Unit (TSU) to support state and local government structures and frontline workers (FLWs).

**Delineation of responsibility:** While the Centre should provide financial and technical support to states / UTs as well as oversee their development, it should be publicly clear that the ultimate responsibility and accountability for health care is that of state governments and local bodies. For this, access to health care or health itself should be made a legal right.

**Corruption:** Major corruption cases have been reported under NRHM not only in north Indian states, but also the southern state of Karnataka. Rampant corruption is not only an obstacle in the strengthening of health systems, it erodes people's trust in governments and health systems in particular.

## **Secondary prevention: Identification and outreach**

At present, screening is supposed to be done at NCD clinics as part of NPCDCS at the CHCs and district hospitals. The challenge is to identify and reach out proactively to target group. For those in the formal sector, basic medical tests can also be done in their offices since the equipment required for them is quite handy. Employers should either be given incentives or the government should pay for screening. This is how Japan started its universal health care – high-risk individuals currently undergo annual check-ups at the workplace itself. For target population outside the formal workforce, which is huge in India, a community-based approach should be adopted. Kerala is doing this under NPCDCS by engaging community health workers for mobilization. Screening is done for individuals aged 30 years and above in detection camps at ward, SC and block levels. Monthly follow-up camps are organized at SCs by junior public health nurses and ASHAs. Screening that involves local community health workers would have local legitimacy and support, be more responsive to the needs of local communities, encourage them to assume ownership of interventions, and possibly generate trust in primary health systems and, by implication, in the State itself.

## **Tertiary prevention**

**Referral system:** In India, as in several parts of the world, referral mechanisms are either missing due to provider choice or are weak due to casual enforcement. One major factor in bypassing primary care for higher levels is the perceived quality of its care. The focus, therefore, should not only be on developing and enforcing an efficient system of referral, but also on addressing the causes which tend to render such a system ineffectual.

Thoughtless referral to higher health facility should be prevented and penalized. In Canada, access to specialist care requires formal referral from a family physician, and several states disincentivize direct specialist consultation by refusing payment. In Japan, though patients have a choice to visit any provider, they are charged a premium if they visit a specialist without referral. In India, treatment in public secondary or tertiary health facilities should be refused without a proper primary health system / practitioner referral, on a pilot basis.

For coordinating referrals downstream – with families or communities for various levels of prevention – primary health systems should have a parallel ASHA-type network, if existing network is overburdened. In any case, prevention of chronic diseases should not be treated as a subsidiary function. Alternatively, there could be an agency on PPP lines. In United States and Canada, representatives of public health agencies pointed out that India can be the leader in IT-enabled referral systems, given its technological capability. Policymakers should encourage and duly incentivize IT companies to leverage this and related capability.

**Drug procurement process:** Since an essential component of RMM prevention would involve treatment at a massive scale, and given that medicines are a major component of disease management, and a major component of treatment expenses, universal access to essential medicines is crucial. The Central government has already started the *Jan Aushadhi* scheme to make quality generic medicines available at affordable prices at special outlets. This is a wonderful initiative and should be scaled up to the optimal level. At the same time, given that health is essentially a state subject, state governments should draw lessons from the experience of their counterparts in Tamil Nadu and Rajasthan in terms of regional procurement. Tamil Nadu, for instance, procures directly from manufacturers through a tender process and has monitoring mechanisms in place to ensure the quality of supplied drugs. Among other things, regional procurement arrangements would require states to develop capacity in terms of effectively procuring and negotiating prices without compromising on the safety, quality and efficacy of drugs.

# Human resources

**T**he demands of effective primary health systems cannot be achieved without adequate and duly trained, skilled and motivated health workforce. Health sector in developing countries is one of the critical areas which has been seriously affected by the international migration of professionals – the number of Indian-born doctors is the highest, that of nurses second highest, of foreign-born doctors and nurses in OECD countries. Shortage of public health staff is worse in poor, rural and remote areas – where chronic disease premature mortality tends to be the highest – and should, therefore, be addressed on a priority basis.

## Challenges and recommendations

### Health workforce survey

Little is known about India's health workforce – its numbers, types, qualifications, location, etc. There should be a nationwide periodic census of public health workers – which can be financed by the Central government as part of its technical health support for states as well as to facilitate its supervisory role – covering workers in various systems of medicine, their characteristics, respective work-loads, etc. Such a census would help in not only knowing the status of existing workforce, but also shortages vis-à-vis traditional and emerging health concerns, skilling / upskilling requirements, etc. Anyone paid from the public purse should mandatorily provide verified information on a regular basis. Post-recruitment, there should be regular track-and-trace which can help in their redeployment in underserved areas. Such initiatives would be particularly helpful for health-backward states like Uttar Pradesh and Rajasthan where the combined health workforce density per 1,000 population was 0.54 and 1.32 respectively, lower than the national average (2.08), let alone health-advanced states like Kerala (4.61) and Tamil Nadu (4.57). Clearly, there are linkages with the number, not to deny the role of quality and commitment, of health staff in terms of health outcomes. While the proposed census would be a long-term measure, the Centre should try to address the gap in health workforce density in health-backward states on top priority.

### Type of workforce

Prevention of chronic diseases necessitates a shift in health systems which rely largely on physicians to one in which professionals from multidisciplinary backgrounds – including community health workers, social workers, physicians, therapists, etc. – would have to play a role. Secondary prevention, particularly, at the primary health level would require greater involvement of non-specialist health staff. For opportunistic screening, AYUSH doctors can be engaged in primary health systems. For proactive screening in community, a new cadre can work in coordination with existing field staff. The criteria for selecting the new cadre should be based on

their education as well as willingness to work in primary health systems in their localities. Such individuals can be entrusted with the task of profiling and screening risk factors for individuals through door-to-door surveys, with the help of a 'chronic disease prevention kit', and help in managing referrals and coordination with other levels of care.

## Medical education

With the exception of departments of community/preventive/social medicine, mainstream medical educational institutions in India tend to be rather curative than preventive in their orientation, disposing graduates towards secondary and tertiary rather than primary health care. Consequently, doctors perceive themselves exclusively as clinical service providers.

Existing departments of community/preventive/social medicine should be strengthened, and more developed in public sphere or through incentives to private medical institutions, which in any case should be promoted. Faculty in these departments should be incentivized with higher salaries, additional perks, research and travel grants, etc. All students in these departments, in public as well as private medical institutions, should receive government scholarships to cover the entire cost of education. In return, service for at least five years in primary health centers should be made mandatory for both teachers and students, enforced through legal bonds, incentivized for them and their families (clear-cut career progression path, excellent housing facilities, quality schooling provision for children and the like).

## Medical training / skilling

Training specific to prevention and management of chronic diseases at the primary health level should be included in the Human Resources Qualification Standards. Frontline health workers in northern states expressed willingness to work for prevention of chronic diseases, if proper training and incentive structures are built around it. The newly formed Healthcare Sector Skill Council (HSSC) is committed to skill 4.8 million people in the paramedics and allied healthcare services over the next decade. Such initiatives should be strengthened and purely private ones should be promoted as well through incentives.

With skilling and employment-generation as major goals of the government, unemployed youth from various local communities, especially in rural areas, should be encouraged to take up coaching and skilling and undertake local community health work, particularly for secondary prevention and managing referrals proactively. It will ensure delivery of care and coordination in a culturally-sensitive manner, which is critical as chronic diseases are long-term and require long-term engagement with local health providers.

An excellent initiative taken up by one of the Urban Health Training Centres (UHTCs) in Lucknow (Uttar Pradesh) is that medical interns are engaged in a comprehensive exercise of capturing socioeconomic data and assessing risk factors and disease profiles of families living nearby. Simultaneously, the faculty, who are practitioners as well, provide treatment and counseling to those who visit such centres. There should be more of such institutions, which can also serve as local hubs of secondary and tertiary prevention and generate sample data for decentralized policymaking and planning. Such training institutes can also ensure that standardized protocols

are being followed for screening by community health workers. Establishing regional training centres and linking these with medical teaching institutions and colleges becomes crucial for capacity-building at the state level. Like UHTC, the Rural Health Training Centres (RHTC) should also be further expanded and strengthened.

Emphasis should also be placed on capacity-building and skill development of the AYUSH workforce – they should be equally involved and incentivized in providing primary care.

# Financing

**P**rimarily health systems have an extraordinary potential of containing both direct and indirect costs of chronic diseases, given the scope for prevention (early diagnosis and treatment) at their level. Policymakers at international, national and provincial levels need to recognize their potential in this regard and make health sector allocations accordingly. Since chronic diseases require a long-term commitment, such a recognition at the national and especially the provincial levels will be of utmost significance.

## Challenges and recommendations

### Public financing

Arguing for public health expenditure to be raised to 2.5 percent of GDP, the draft National Health Policy 2015 argues that India's 'failure to attain minimum levels of public health expenditure remains the single most important constraint' to public health in India. It is the only country among top 10 economies in the world which spends more on military than health (public) – its military expenditure is third highest (2.4 percent of GDP) among them, more than China's (2.1), while its public health expenditure (Centre and states combined) is lowest (1.3). The Centre cannot justify spending almost 8 times more on military (as a percent of GDP) to save citizens from external threats, while millions die prematurely due to chronic diseases within our borders. In countries where health care affordability among citizens is much higher, governments spend a much higher percent of GDP on health. Sri Lanka manages universal health support with similar allocation levels with higher levels of efficiency. India's public health system has been neither efficient nor well-financed.

### Role of Union Ministry of Finance

#### Provide universal health coverage or tax exemptions

In a situation where neither Central nor state governments are providing comprehensive, universal health coverage, there should be for the:

1. *Partially / completely uninsured taxpayers*

Income tax exemption for all medically necessary health expenses incurred by individuals on themselves and their families. There should also be a push to extend health insurance coverage to the highest levels of preventive and curative care, even if it means increase in insurance premium, which should also be completely covered through tax exemptions for this category. MOF can pass on / share these tax deduction liabilities with states/UTs.

## 2. *Publicly / employer insured*

- a) It is actually awkward there is a cap on coverage for a health scheme meant for the poor (RSBY) – that too a miniscule INR 30,000 for a family of five – but none for those covered under CGHS or ECHS. The government should gradually expand coverage under RSBY – demographically, financially as well as by level and type of care (including preventive health and alternative systems of medicine).
- b) As far as ESIS is concerned, existing upper wage limit for coverage under ESI Act – INR 15,000 per month – should be increased as this is miniscule and leaves out a huge section of the workforce that cannot afford appropriate curative, let alone preventive, care.
- c) In case of private employer-insured, the MOF should offer at least some tax incentives to employers providing partial / complete insurance to their employees.

## 3. *Unemployed / uninsured*

MOF should make provisions to have them covered under some form of health insurance. Until that happens, they should have first right over public resources for health, preventive and curative, by their level of unaffordability. In case of the unemployed, it can be part of an unemployment insurance / allowance.

Alternative financing sources should be considered to expand pool of current resources.

- a) Industry health tax / incentives: Industries with a negative bearing on health should be taxed, and those that have a positive impact on health should be incentivized. A 'Health Impact Assessment Index (HIAI)' should be developed to determine the level of impact and the concomitant level of tax liability / incentive.
- b) Earmarking health-related taxes: Until taxes related to chronic diseases are earmarked for their prevention and treatment – as was the case for health cess on tobacco products to fund NRHM, and more recently the Swachh Bharat cess, the proceeds of which fund activities under the Clean India Drive – such taxes will neither help the cause of chronic diseases nor carry legitimacy among related taxpayers and the general public. However, it is debatable whether imposing health cess is a justifiable measure as health is a core function of State and should be paid for from general taxes, as in draft NHP 2015 as well.
- c) Corporate Social Responsibility (CSR): A certain percentage of CSR should be earmarked for prevention of chronic diseases, given their impact on the working-age population, specifically on employee productivity and company profitability. Companies should be allowed to use such funds for funding preventive activities of their own staff, have the option to fund Central / state / local interventions for prevention of chronic diseases, which would incentivize governments to improve governance and compete for these funds, especially if pooled and managed centrally, for instance by industry associations.



## Ensure affordability of essential medicines

Recently, the Union Ministry of Finance withdrew customs duty exemption on more than 70 life-saving medicines, mainly used in the treatment of chronic diseases such as cancer, CVDs, diabetes, neurological and renal disorders. The strategy is expected to strengthen domestic pharmaceutical manufacturing capacity in line with the Make in India campaign. However, imposition of import duties on active pharmaceutical ingredients, which are vital for manufacturing essential medicines locally, is expected to raise manufacturing costs of locally produced medicines as well, which in turn will be passed on to consumers, with further implications for OOP health expenditures, nearly half of which go into buying medicines. And what about the choice of medicines in terms of quality for those who can afford? Why make quality health care choices more difficult when the government is not putting adequate resources in health sector, let alone providing universal health coverage?

## Budgetary inefficiencies

Budgetary inefficiencies arise due to insufficient / total lack of data on actual departmental requirements, delays in receipt of sanctioned funds and under-utilisation of funds. In most cases, health finances remain unutilized not necessarily because they are in excess, but also due to reasons like skill shortage of health personnel and infrastructural inadequacies. This is particularly true for health-backward states. The right measure here would be to enhance the technical and absorptive capacity of health systems by implementing sound governance and monitoring mechanisms. Institutional capacity-building vis-à-vis manpower and skill development, infrastructure, etc. are also critical to reduce budgetary inefficiencies.

## Prioritization of health expenditures

In India, chronic diseases and their prevention are accorded lower priority within miniscule health expenditures. In 2014-15, share of NCD expenditure in NHM was only 2.6 percent. It should also be noted that NHM NCD budget also includes outlays for health conditions like blindness, elderly care and tobacco control – only 42 percent of approved outlay under it in 2015-16 went to NPCDCS. Within NPCDCS, share of primary health systems is meagre.

- a) 27 percent allocated for health system strengthening under NRHM should be utilized from the perspective of chronic diseases as well rather than only on RCH.
- b) As households have been leading sources of health care financing in India, they should be sensitized and offered prioritized incentives for the prevention of chronic diseases.
- c) Centre should consider leaving curative expenditures and insurance coverage to states, and focus on financing prevention of premature child and adult mortality in states/UTs.
- d) Not only in the official primary health system, prevention of chronic diseases should be structured in CGHS, ESIS and other public dispensaries as well as all health insurances.

# Key policy recommendations

Theme	Problem	Policy recommendation	Potential impact	Concerned agency
Financing	Low public allocation to health	<ul style="list-style-type: none"> <li>Increase public health expenditure as percentage of GDP commensurate with India's standing in top 10 economies</li> <li>Set a decent cut-off below which per capita public health expenditure should not fall in any state/UT</li> </ul>	Reduction in OOP health expenditure	PMO, MOF, NITI Aayog, MOHFW
	Absence of comprehensive, universal health coverage	<ul style="list-style-type: none"> <li>Provide income tax exemptions for all medically necessary health expenditures to partially / completely uninsured taxpayers and tax incentives to employers providing partial or complete insurance to employees</li> <li>Expand demographic and financial coverage under RSBY; increase upper wage limit for coverage under ESI Act</li> </ul>	Allocation of public resources for health by degree of unaffordability; reduced vulnerability of households to catastrophic health expenditures	
	Low priority accorded to chronic diseases and their prevention	<ul style="list-style-type: none"> <li>Utilize existing 27 percent outlay allocated to 'health system strengthening under NRHM' for chronic diseases along with RCH</li> <li>Financing prevention of premature mortality should be responsibility of the Centre and curative expenditures and insurance coverage should be that of the states/UTs</li> <li>Structuring chronic disease prevention in CGHS,ESIS, public primary health systems and public and private health insurances</li> </ul>	Expansion of NPCDCS budget in general and for primary health systems in particular	
Governance	Inadequacy of primary health care in urban areas	<ul style="list-style-type: none"> <li>Empaneling private clinics / nursing homes wherever public primary health system is missing</li> </ul>	Widened access to primary health system for urban population	MOHFW
	Lack of accountability and ownership among local health systems and community	<ul style="list-style-type: none"> <li>Embracing a bottom-up approach to planning and priority setting</li> </ul>	Formulation of state health policies according to local requirements	MOHFW, MOPR
	Lack of well-defined responsibility between the Centre and states	<ul style="list-style-type: none"> <li>Confining Centre's role to monitoring state health systems and providing financial and technical support and making it publicly clear that ultimate responsibility and accountability is that of state governments and local bodies</li> </ul>	Enforcement of responsibility at various levels through proactive accountability by community	MOHFW

Theme	Problem	Policy recommendation	Potential impact	Concerned agency
Governance	Lack of robust referral and monitoring system	<ul style="list-style-type: none"> <li>Developing and enforcing an appropriate referral and coordination mechanism between health systems</li> <li>Penalizing treatment in public secondary or tertiary health systems without proper primary health system referral</li> <li>Leveraging India's IT potential to develop IT-enabled referral systems</li> </ul>	Thoughtless referrals to secondary / tertiary health facilities will be restricted	MOHFW, MCIT
	Irregular procurement and availability of drugs	<ul style="list-style-type: none"> <li>Centralizing procurement of drugs and instituting monitoring mechanisms (e.g. the TNMSC model)</li> </ul>	Availability, rational usage and quality of supplied drugs shall be guaranteed	MOHFW
Manpower	Orientation of medical education towards treatment based paradigm	<ul style="list-style-type: none"> <li>Strengthening existing departments of community/preventive and social medicine; adequately incentivizing faculty and students in these departments</li> <li>Making five years of service in primary health centers mandatory for teachers and students through a legal contract</li> </ul>	Reinvigorate the role of prevention at the level of primary health systems	MOHFW, MHRD
	Lack of medical training for prevention of chronic diseases	<ul style="list-style-type: none"> <li>Establishing regional training institutions and linking these with medical universities and colleges. In this regard, role of Urban Health Training Centres and Rural Health Training Centres should be further expanded</li> </ul>	Along with ensuring that medical trainees are appropriately skilled to timely address risk factors, such training centers can generate sample data for decentralized policymaking	MOHFW, MHRD, MSDE
	Absence of health workforce survey	<ul style="list-style-type: none"> <li>Creating a nationwide real-time database for all public health care professionals</li> </ul>	Facilitate timely and systematic recruitment, training and capacity building	MOHFW, MOSPI
	Limited workforce for population-based screening of metabolic risk factors	<ul style="list-style-type: none"> <li>Creating a new cadre which can work in coordination with the existing AAA network</li> <li>Ensuring that the new cadre is selected based on their education and willingness to work in primary health systems in their own localities</li> </ul>	Help in ensuring proactive screening of target age group (30-69 years) through door-to-door surveys, and effective referrals and coordination with other levels of providers	MOHFW, MSDE

PMO	Prime Minister's Office
MOHFW	Ministry of Health and Family Welfare
MOF	Ministry of Finance
MOPR	Ministry of Panchayati Raj
MOSPI	Ministry of Statistics and Programme Implementation
MSDE	Ministry of Skill Development and Entrepreneurship
MHRD	Ministry of Human Resource Development
MCIT	Ministry of Communications and Information Technology



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