



# UN High-Level Meeting on Non-Communicable Diseases: addressing four questions

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Non-communicable diseases (NCDs), principally heart disease, stroke, cancer, diabetes, and chronic respiratory diseases, are a global crisis and require a global response. Despite the threat to human development, and the availability of affordable, cost-effective, and feasible interventions, most countries, development agencies, and foundations neglect the crisis. The UN High-Level Meeting (UN HLM) on NCDs in September, 2011, is an opportunity to stimulate a coordinated global response to NCDs that is commensurate with their health and economic burdens. To achieve the promise of the UN HLM, several questions must be addressed. In this report, we present the realities of the situation by answering four questions: is there really a global crisis of NCDs; how is NCD a development issue; are affordable and cost-effective interventions available; and do we really need high-level leadership and accountability? Action against NCDs will support other global health and development priorities. A successful outcome of the UN HLM depends on the heads of states and governments attending the meeting, and endorsing and implementing the commitments to action. Long-term success requires inspired and committed national and international leadership.

## Introduction

In recognition of the global threat of non-communicable diseases (NCDs)—mainly heart disease, stroke, cancer, diabetes, and chronic respiratory diseases—the UN High-Level Meeting (UN HLM) on NCDs will be held in September, 2011.<sup>1</sup> The world's heads of states and governments will attend the meeting, creating a unique opportunity to advance globally the prevention and treatment of NCDs. An urgent and collective response is required because no country alone can address a threat of this magnitude. We know what needs to be done, and have set out five overarching actions—ie, leadership, prevention, treatment, international cooperation, and monitoring and accountability—in a previous report.<sup>2</sup> These are needed to enable the implementation of five priority interventions—ie, tobacco control, salt reduction, improved diets and physical activity, reduction of hazardous alcohol intake, and access to essential drugs and technologies.<sup>2</sup> However, despite substantial evidence in favour of concerted action, some countries, development agencies, and individuals still express concerns about how to achieve the best response to NCDs.<sup>3</sup> To ensure the UN HLM results in consensus for an effective global response to NCDs, four questions need to be addressed—ie, are NCDs a global crisis; in what way is NCD a development issue; are affordable and cost-effective multisectoral and health-system interventions available; and why are high-level leadership and accountability necessary?

In this report, we address these questions by providing evidence for the realities of the NCD situation, and summarise key messages for heads of state and governments. Specifically, we show that the burden of global NCDs is huge, and will undermine current development efforts if it remains unaddressed; a strong business case exists for investment in NCDs; cost-effective and feasible multisectoral and health-system

interventions are available for all countries; and progress requires sustained leadership and accountability.

## NCDs and the global crisis

NCDs pose a global threat and require a global response. The burden of death and disability attributable to NCDs is rising everywhere because of the changing patterns in the way we live and work; millions of people are dying needlessly every year.<sup>4</sup> NCDs are not just a domestic challenge, but also cause and entrench poverty, and are a threat to human, social, and economic development. The 36·1 million deaths per year as a result of NCDs represent almost two of three deaths per year worldwide.<sup>5</sup> 22·4 million of these deaths arise in the poorest countries, and 13·7 million in high-income and upper-middle-income countries (figure 1).

### Key messages

- NCDs threaten economic and human development; action against NCDs will support overall development goals, including the Millennium Development Goals
- The global crisis in non-communicable diseases (NCDs) requires a global multisectoral response
- Strong national and international leadership is essential; tackling NCDs should be part of both national and international health and development agendas
- Population-wide multisectoral preventive interventions are cost saving and will have a rapid effect
- Improving primary health care for prevention and treatment in people at high risk of NCDs is cost effective
- Efficient use of existing resources and new innovative financing methods are needed, not a new global fund
- The success of the UN High-Level Meeting on NCDs requires the participation of the heads of states and governments, and commitment to sustained action and accountability

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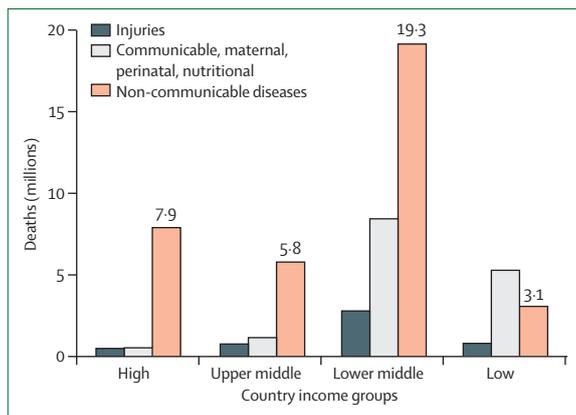


Figure 1: Broad cause of death in countries, by World Bank income groups, 2008<sup>4</sup>

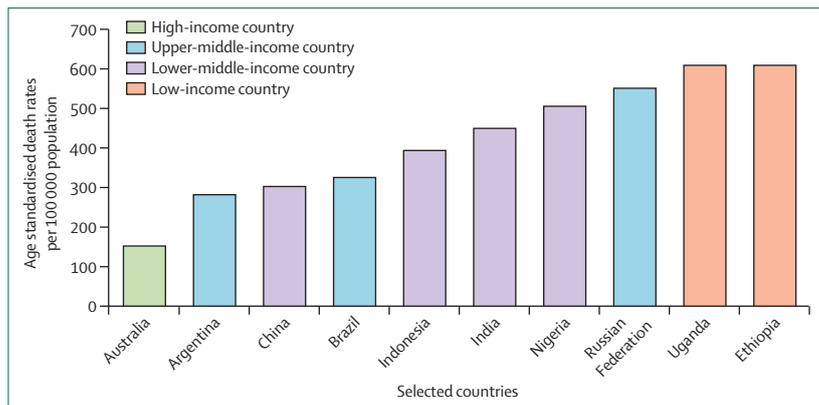


Figure 2: NCD death rates in people aged 15–69 years, by World Bank income groups, 2008<sup>4</sup>  
NCD=non-communicable disease.

The data do not support the fallacious argument that NCDs are only problems for elderly men in wealthy countries or wealthy men in poor countries. There are as many deaths in women as there are in men, and poor people are disproportionately affected. NCD death rates are already much higher in low-income and lower-middle-income than in wealthy countries (figure 2). Almost two-thirds (63%) of premature deaths in adults (aged 15–69 years), and three of four of all adult deaths are attributable to NCDs. In all countries, NCDs are the major health issue for men and women, and are a serious issue for all health-care systems.

Four key risk factors that cause NCDs—ie, tobacco use, including exposure to second-hand smoke,<sup>6</sup> diets high in fats, salt, and sugar, environments that prevent physical activity, and alcohol consumption—and the intermediate risk factors obesity, increased blood pressure and concentrations of glucose and cholesterol, are now common in the poorest countries, and are rising rapidly.<sup>7–9</sup> Underlying these main risk factors are socioeconomic determinants—eg, poverty, inequality, unemployment, social instability, unfair trade, and global imbalances—that are the root causes of the

pandemic.<sup>10</sup> Improved understanding of the origins of several risk factors early in life emphasises the importance of NCD prevention during the lifetime of an individual, beginning with the health and nutrition of girls and young women before conception and during pregnancy.<sup>11</sup>

NCDs also account for half of all global disability. The consequences of NCDs are familiar to those who have witnessed a family member suffer from diabetes, cancer, or heart disease. Without treatment, these diseases often lead to a slow and painful death. An important cause of disability is mental health, and the UN HLM has also been called on to address mental health issues.<sup>12</sup>

By focusing the UN HLM on just the four main NCDs and their shared risk factors, UN member states realised that the agenda was already very broad and complicated, and the need to start with a few diseases that will lead to systems of health care to address all NCDs. Because mental health issues and NCDs are inter-related, treatment and prevention of NCDs would also have positive effects on mental health.<sup>13</sup> Most health problems benefit from continuity of care; strengthening primary health-care services to deliver long-term care for all disabling illnesses will benefit patients with mental health issues and people with other NCDs—eg, kidney disease and musculoskeletal disorders.

### NCD crisis and development

NCDs are more than just a health issue, they are essential to the development of individuals and improved societies.<sup>14</sup> Because NCDs increase poverty and are a major economic drain on individuals, families, and businesses,<sup>15</sup> the crisis threatens social, economic, and environmental development, and women's empowerment.

Poverty causes NCDs, but NCDs also cause and entrench poverty. In all countries, payment for NCD treatment and care traps vulnerable households in cycles of debt, impoverishment, and illness—eg, in India, the treatment costs for an individual with diabetes are 15–25% of their household earnings.<sup>16</sup> One in four Indian families in which a family member has heart disease or stroke has catastrophic expenditure, pushing 10% of these families into poverty. Where families have no access to affordable care, they forego care or risk financial ruin; the poor end up suffering the worst.

NCDs also reduce families' resources. Workers with NCDs have an increased likelihood of missing work, underperforming at work, or becoming disabled and leaving the workforce before retirement.<sup>17</sup> Where there is a lack of social and health insurance, as in most low-income and middle-income countries, NCDs can cause much greater economic losses—eg, women might leave work to become carers and children might be forced to leave school to supplement household incomes. Money spent on tobacco, typically accounting for a greater proportion of

income for people in low-socioeconomic groups, displaces spending on health care and education.<sup>17,18</sup>

These economic effects of NCDs add up to a substantial drain on society's economic potential by adversely affecting the four main factors of economic growth—ie, labour supply, productivity, investment, and education. Even people who are no longer in the workforce make substantial contributions to the economic and social wellbeing of societies; they contribute indirectly to productivity by enabling younger people, especially women, to go out to work as they raise the children. The health of elderly people is of special importance in Africa because they are filling the roles of the generation decimated by HIV/AIDS. Every 10% rise in the rate of NCDs is associated with 0·5% reduction in rates of yearly economic growth;<sup>18</sup> accumulated over many years, this amount is substantial. For example, in Latin America, the 50% rise in NCDs predicted to occur by 2030 corresponds to an overall 2 percentage point reduction in economic growth rates per year. In 23 low-income and middle-income countries with a high NCD burden, in a business-as-usual scenario, an estimated US\$84 billion of economic output would be lost between 2005 and 2015 as a result of NCDs.<sup>19</sup> The World Economic Forum<sup>20</sup> ranks NCDs as one of the top global threats to economic development.

A strong case exists for investment in interventions to prevent and treat NCDs. First, the costs of inaction will increase as NCDs rise, threatening to overwhelm resource-poor and fragile health and social systems, and slow economic performance. Health systems, even in wealthy countries, already have difficulty in coping with the burden; none will be able to provide the current level of care to people with NCDs if the burden continues to rise. Second, many effective interventions have a net economic benefit, costing far less than the full costs of treatment of illness, and in some cases generate about a \$3 return per \$1 invested.<sup>21</sup> Achievement of feasible reductions in risk, such as a 2% reduction in NCD death rates per year, is estimated to increase economic growth by 1% per year after a decade. In a country like Brazil, this increase delivers estimated yearly gains of \$16 billion, much greater than the cost of the five priority prevention and treatment interventions.<sup>2</sup>

NCD interventions can contribute towards progress on the Millennium Development Goals (MDGs; panel 1); conversely, inability to implement effective interventions will adversely affect progress. NCDs cannot wait until the MDGs are achieved. In poor countries, nearly 2 million people, mostly women and girls, die every year from indoor-smoke-related respiratory diseases, setting back progress towards gender equity.<sup>30</sup> Policies for the prevention of NCDs, such as clean sources of energy, will also have a positive effect on climate change. Alignment of policies for the mitigation of climate change with those for public health will have beneficial outcomes because both climate change and NCDs result from our ways of living.<sup>31</sup>

### Panel 1: Development benefits for selected Millennium Development Goals (MDGs) from investment in non-communicable diseases (NCDs)

#### MDG 1: End poverty and hunger

- Reduction of adult mortality promotes poverty reduction<sup>22</sup>
- Subsidised NCD care reduces impoverishment<sup>23</sup>

#### MDG 3: Gender equity<sup>24</sup>

- Prevention of NCD promotes women's health because NCDs are the leading causes of deaths in women in most countries
- Provision of care for NCDs increases opportunities for women and girls

#### MDG 4: Child health

- Reduction of smoking and indoor air pollution reduces childhood illnesses<sup>25</sup>
- Improved maternal and infant nutrition reduces prevalence of obesity and diabetes<sup>26</sup>

#### MDG 6: Combat HIV/AIDS, tuberculosis, and malaria

- Reduction of smoking and diabetes reduces the number of cases of tuberculosis<sup>27</sup>
- Provision of care for diabetes and cardiovascular disease reduces risks of patients with HIV dying from the side-effects of antiretroviral treatment<sup>28</sup>

#### MDG 7: Environmental sustainability

- Promotion of public transport, walking, and cycling reduces dependence on fossil fuels<sup>29</sup>

### Cost-effective and feasible interventions

Prevention of NCDs is essential to reduce the immediate burden, and protect future generations by providing an environment that supports people to remain healthy. Multisectoral preventive interventions, including policy changes, regulation, and market intervention, are of highest priority; once an NCD develops, the burden on health systems, already ill prepared and equipped in many countries, is substantial.<sup>32</sup> Several affordable and adaptable cost-effective, pro-poor, and feasible multisectoral interventions for prevention are available and will have positive effects within 1–2 years.<sup>2</sup> The most cost-effective interventions are tobacco control and salt reduction, requiring actions outside the health system to achieve the maximum effect, and low-cost generic drugs for people at high risk of a heart attack or stroke.<sup>33,34</sup> These three interventions, if widely adopted, would prevent 23 million deaths over 10 years in 23 low-income and middle-income countries with a high burden of NCDs at a cost of \$1·20–2·40 per person per year.

These preventive interventions can be applied in a step-wise manner, according to the country's readiness and resources. First, all countries should accelerate full implementation of the Framework Convention on Tobacco Control, and provide simple services for tobacco

For more on the Framework Convention on Tobacco Control see <http://www.who.int/fctc/en>

cessation for all smokers that are modelled on the programme for patients with tuberculosis.<sup>35</sup> The second step includes multisectoral programmes to reduce salt intake in a population, promote healthy diets and physical activity, and reduce the hazardous consumption of alcohol,<sup>36</sup> with improved management in primary care of people at high risk of NCD. The third step covers the full range of cost-effective multisectoral and health-systems interventions.

The response of health systems to NCDs can benefit from the lessons learned from HIV/AIDS, especially the importance of a comprehensive and integrated approach involving prevention, treatment and long-term care, and the need to embrace a rights-based framework. The development of methods, strategies, and systems to support HIV programmes and train workers, and support task shifting provide useful models.<sup>37</sup> Lessons can also be learned from the delivery of drugs and technologies for the prevention and long-term care of patients with HIV/AIDS and tuberculosis. Largely because of the MDGs, health-system strengthening is now higher on the agenda of the major global health initiatives and the focus on universal health coverage is increasing. An important outcome of the UN HLM will be commitment and support for primary health care to deliver services that address all major diseases, irrespective of their cause, and this outcome will contribute to the achievement of the MDGs.

### Crucial components Leadership and cooperation

Success in addressing the NCD crisis will depend on strong and effective leadership; a strong leader can catalyse and lead change.<sup>38</sup> Sustained leadership by heads of states and governments is needed to coordinate the many sectors involved in implementing national NCD plans and whole-of-government approaches.<sup>39</sup> Civil society can support, encourage, and strengthen the necessary leadership.

A primary reason for the UN HLM was the recognition that to address the main causes of NCDs, the involvement of non-health-care sectors, such as agriculture, finance, education, transportation, will be needed; UN organisations such as the World Bank, UN Children's Fund, UN Development Programme, International Monetary Fund, and Food and Agriculture Organization will have important roles to play. An effective mechanism is needed to achieve cooperation between these international agencies to address the NCD crisis. WHO will continue to play a major facilitative leadership role and must be supported by member states to achieve this function.

Development agencies and donor countries will benefit national NCD programmes most effectively by cooperating to ensure the efficient delivery of technical advice and resources for priority actions, raising the priority of NCDs in their development agendas, and allocating funding to complement national resources for

the poorest countries. Most importantly, alignment of support for NCD programmes with other development programmes, such as the MDGs and their successors, will be mutually beneficial. Support from donors and aid agencies will be forthcoming only if NCDs are afforded appropriate national priority, in keeping with the Paris Declaration on Aid Effectiveness and Accra Declaration for Action for alignment of aid with the health needs of the population.

Market forces contribute to the rise in NCDs—eg, epidemics induced by obesity, tobacco, and alcohol result from the successful marketing of unhealthy products; this outcome provides strong justification for government intervention through regulatory and legislative responses. Industries proclaiming their intent to change to healthier products and promotional practices should be encouraged through appropriate incentives. Industries resisting change should be steered towards changes to protect children and young people through regulation, legislation, and market interventions. Monitoring the actions of the private sector will require transparent and independent assessment of progress towards agreed targets—eg, product reformulation, and a commitment from industry to achieve the same outcomes in all countries. Clear and transparent rules, based on public health goals, are needed for engagement with the private sector; there is no basis for engaging with the tobacco industry.

The NCD Alliance is a partnership of four international non-governmental organisations (World Heart Federation, International Diabetes Federation, Union for International Cancer Control, and International Union Against Tuberculosis and Lung Disease). Together with major development non-governmental organisations, and professional, academic, consumer, patient, and faith-based organisations, the NCD Alliance can stimulate and support continued national and international actions.

### Accountability and transparency

Transparency and independent mechanisms are needed for monitoring and assessment at national and international levels, including UN agencies. The key accountability requirement is to assess progress on the national and international commitments that will be agreed at the UN HLM. Resources spent on NCDs must be shown to have benefits—ie, extra-healthy lives for every dollar spent—to ensure continued political and public support, and to achieve the expectations of all stakeholders.

The three key elements of accountability are monitoring, review, and improvement. Monitoring is the availability and dissemination of accurate information about progress towards agreed goals. Review requires an independent, transparent, expert-led process in which the performance of every partner—country, donor, or non-state actor—is analysed, appraised, and reported. Improvement requires a mechanism to address the shortfalls in performance.

For the Paris Declaration on Aid Effectiveness see <http://www.mfdr.org/sourcebook/1stEdition/2-1Paris.pdf>

For the Accra Declaration for Action see [http://www.oecd.org/document/52/0,3746,en\\_21571361\\_43407692\\_45714804\\_1\\_1\\_1\\_1,00.html](http://www.oecd.org/document/52/0,3746,en_21571361_43407692_45714804_1_1_1_1,00.html)

For more on the NCD Alliance see <http://www.ncdalliance.org>

At the national level, key features of an accountability framework include a national commission or agency responsible for monitoring progress towards national goals and targets, and reviewing and reporting the performance of all partners. The framework should be integrated with the mechanism for monitoring progress towards other national health goals. Non-governmental organisations can contribute to national reports or by issuing their own reports.

At the international level, the accountability framework would benefit from an independent expert technical review panel, responsible for ensuring that commitments made by all partners are being honoured. The review panel could also report progress on global goals and targets, and synchronise stakeholders' efforts. Such a review panel should be integrated with the mechanism for monitoring progress towards other global health goals—eg, maternal and child health, and would report every 2 years to the UN General Assembly through the UN Secretary General. National progress should be reported regularly and channelled to this review panel. A new international mechanism to coordinate all partners might be required.

The accountability mechanism, nationally and globally, must be based on a technically valid mechanism for tracking progress towards a global goal of reducing death rates by 2% per year<sup>40</sup> and a small number of quantified targets with appropriate timeframes for measurement of their effects. Short-term targets (1–2 years) increase compliance and should be complemented by long-term and more ambitious targets. Key indicators based on risk-factor surveillance and improved vital registration systems should be agreed globally and nationally to help the measurement of progress.

## Conclusions

The UN HLM has the potential to advance NCD prevention and treatment rapidly, while ensuring an integrated response to all priority diseases. In the lead up to the meeting, several actions by heads of states and governments are necessary.

The case for strong action must be fully appreciated and endorsed without doubt about the magnitude of the global NCD crisis, and the availability of affordable and rapidly effective interventions. Member states, as they prepare the crucial outcome document, must have national data and evidence to justify the commitments that the heads of state will be asked to make. Agreement about the main contents of the proposed outcome document is a necessity. Various suggestions have been made for the priority commitments;<sup>2,41</sup> alignment by the interested parties and, most importantly, member states, for the desired commitments is urgently needed. The agreement in New York should build on the model of support for international action such as for maternal and child health that resulted from the interaction between the UN and other high-level meetings—eg, G8

and G20 meetings. There is an urgent need for advocacy to raise awareness at the national and global levels of NCD as a development issue, and not solely as a health issue. Additionally, increased capacity for implementation research and policy development is required in all countries.

The commitments should include an action plan for the first 12 months and the next 10 years after the meeting, and a process for monitoring the achievements. The lessons learned after the UN General Assembly Special Session<sup>42</sup> in 2001 for HIV/AIDS can provide suggestions for sustained actions after the UN HLM, although the challenges for HIV/AIDS a decade ago and those for NCDs now are different.<sup>43</sup> Panel 2 summarises the many desirable outcomes, based on the commitments of the UN General Assembly Special Session for HIV/AIDS, and the international action for maternal and child health.

Reduction in the rates of NCDs does not require a new agency or a new global fund, although funds will be needed to support the poorest countries after they have committed to an integrated plan of action. The

For more on **maternal and child health** see [http://www.who.int/topics/millennium\\_development\\_goals/accountability\\_commission/en/](http://www.who.int/topics/millennium_development_goals/accountability_commission/en/)

### Panel 2: Requirements for the success of the UN High-Level Meeting on Non-Communicable Diseases (NCDs)

#### Declaration for the global NCD crisis that includes:

- Commitment to sustained leadership to overcome the global crisis
- Commitment to a multistakeholder approach to prevention
- Universal access to treatment with affordable and cost-effective drugs and technologies
- Agreement on outcome-based and time-bound targets
- Sustained global and national campaigns with champions in key sectors

#### Multisector and transparent dialogue involving:

- Governments and intergovernmental agencies
- Non-governmental organisations, civil society, and private sector, with clear rules of engagement for public interest

#### National accountability framework that includes:

- High-level commission to coordinate and monitor all sectors, government and non-government
- National champions for sustained advocacy
- Establishing outcome-based indicators and time-bound targets
- Ensuring delivery of priority cost-effective interventions
- Assessing effect of interventions: monitor, review, and recommend improvements
- Reporting to the UN General Assembly every 2 years through the expert panel

#### Global accountability framework that includes:

- Establishing an independent expert panel to monitor, review, and improve performance
- Reviewing progress towards time-bound targets
- Reporting on progress every 2 years

resource gap in many countries can be filled through new financing mechanisms and more effective use of existing resources. Many NCD interventions are revenue-generating, such as increases in taxation for tobacco and alcohol that will simultaneously reduce NCD risks and contribute to a reduction in inequalities. The estimated global price tag for the priority interventions is quite small, especially for tobacco control and salt reduction.<sup>2</sup> Much can be achieved in the short term by implementation of the priority interventions; investment in cost-effective interventions is an investment in development.

In the long term, monitoring and accountability are necessary, but not sufficient for implementation of mutually synergistic interventions as shown with the slow implementation of the Framework Convention on Tobacco Control. Follow-up action should emphasise integration of NCD interventions into national development processes and the actions of multilateral institutions.

A successful outcome of the UN HLM depends on heads of states and governments attending the meeting, endorsing, and then implementing the commitments into action. Long-term success requires inspired and committed national and international leadership. Now is the time for politicians to grasp the opportunity and make a huge and lasting improvement to the health of all people.

#### Contributors

RBc provided overall leadership and guidance on the development of the paper. RBc and RBa prepared the first and subsequent drafts with major inputs from all the other authors.

#### Conflicts of interests

RH is the editor of *The Lancet*. The other authors declare that they have no conflicts of interest.

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