HOW LEAPFROGGING IN PRIMARY CARE CAN CONTRIBUTE TO UPSCALING NCD CORE SERVICES

By: Liesbeth Borgermans, Jan De Maeseneer, David Beran and Juan Tello

Summary: In response to the exponential growth of noncommunicable diseases (NCDs), multi-morbidity and the related demographic changes, health systems need to leapfrog the implementation of NCD-relevant core population interventions (tobacco, alcohol, nutrition and physical activity) and individual services (early detection and management of cardiovascular disease, diabetes, lung diseases and cancer). This article describes four essential strategies to leapfrog NCD core services in primary care. These strategies are: 1) the creation of larger scale multidisciplinary team-based services with a different mix of professionals, 2) pro-active population health management, 3) goal-oriented care, and 4) coordinated and integrated service delivery.

Keywords: Leapfrogging, Noncommunicable Diseases, Primary Care, Multidisciplinary Care, Integrated Care, Population Health Management

The need to tackle NCDs

Noncommunicable diseases (NCDs), multi-morbidity and the related demographic changes, especially ageing populations, are major factors endangering the sustainability of health systems. NCDs not only have an impact on people’s health and quality of life, but also on the economy in terms of lower labour market participation and productivity (absenteeism, number of hours worked and levels of wages). As the spectrum of ill-health changes, health systems have to respond. Policy action is needed to reduce the number of people dying prematurely and to increase the number of years that people live in good health. The reason for urgent reform is clear: the power of existing interventions is not matched by the power of health systems to deliver them to those in greatest need, in a comprehensive way, and on an adequate scale. The mismatch between actual performance of fragmented health systems and society’s rising expectations is a cause for concern and internal pressure for health authorities and political leaders.

Accelerating the health system response

Important gains have been made in the WHO European Region for certain NCDs, sometimes at the expense of...
other NCDs. For practically all countries where robust data are available, there is a clear decline in premature NCD deaths in the last decade. The decline is fastest in the countries with the highest mortality, and the Region is converging at a steady rate, leading to a reduction in east-west inequality. Almost all countries in the Region have comfortably achieved the original bold goal of a 2% annual reduction over the decade 2007–2017.\footnote{The Health 2020 goal of a regional 1.5% annual reduction is well on the way to being achieved and even exceeded in the next three years.} The Health 2020 goal of a regional 1.5% annual reduction is well on the way to being achieved and even exceeded in the next three years.\footnote{These data show that large improvements in health can be achieved at a reasonable cost, for individuals and for large populations.}

Leapfrogging strategies

From single-handed practices to multi-profile primary care-based teams

Multidisciplinary primary care teams have been set up in Belgium, Estonia, Finland, France, Italy, the Netherlands, Portugal, Spain, Sweden and the United Kingdom, to overcome the limitations of single-handed practices and doctor-nurse tandem\footnote{For more information see Box 1}. Multidisciplinary primary care teams consist of various primary care entities, including primary health care practitioners, located in one place. These teams aim to proactively and adequately address the needs that patients and communities present on a health–wellness continuum and offer a comprehensive service (see Box 1).

Primary care teams have significant resolutive capacity and can thus broaden the scope of individual core NCD services.\footnote{There are two main reasons to embed core services more resolutely into these teams. The first is that most patients targeted by core NCD services can be diagnosed and treated within primary care, provided that health care practitioners have the requisite training and that the legal framework permits this. For example, the vast majority of patients with type 2 diabetes mellitus can be treated at the primary level, as can patients with hypertension, heart failure, those in need of secondary stroke or heart attack prevention, cancer screening and palliative care. Most chronic diseases generally only require short specialist interventions for complex diagnostic work-up or at the time of severe exacerbations and hospital admissions.} There are two main reasons to embed core NCD services more resolutely into these teams. The first is that most patients targeted by core NCD services can be diagnosed and treated within primary care, provided that health care practitioners have the requisite training and that the legal framework permits this. For example, the vast majority of patients with type 2 diabetes mellitus can be treated at the primary level, as can patients with hypertension, heart failure, those in need of secondary stroke or heart attack prevention, cancer screening and palliative care. Most chronic diseases generally only require short specialist interventions for complex diagnostic work-up or at the time of severe exacerbations and hospital admissions.

The second reason to embed core NCD services more solidly into primary care teams is that most people have more than one primary and secondary risk factor or chronic condition (such as hypertension, obesity, diabetes and depression) and present with multiple psychological and social needs.\footnote{It would therefore make sense to treat their conditions and needs with an integrated framework of care provided by several professionals who address their patients’ physical, emotional, and social disease-related challenges in a comprehensive manner.} It would therefore make sense to treat their conditions and needs with an integrated framework of care provided by several professionals who address their patients’ physical, emotional, and social disease-related challenges in a comprehensive manner. Single-handed general practitioners, even with peers or nurses in group practices, do not always have the time or competences to provide good quality patient education and support for patient self-management. These interventions are complex and time-consuming and require highly trained professionals, such as advanced nurse practitioners, supported by nutritionists and health psychologists, who help patients make lifestyle changes. This type

Box 1: Multi-disciplinary primary care teams

Services include:
- prevention and health promotion
- curative services
- patient education and self-management support
- patient and family caregiver empowerment
- psychological counselling
- social services, referral and care coordination

Teams include:
- family physicians
- registered nurses
- psychologists
- health promotors
- nutritionists
- clinical community pharmacists
- physical activity counsellors
- community health workers
- front desk staff

Source: 12
of comprehensive service offering is characteristic of multidisciplinary teams. Other interventions include the prevention of, among others, foot ulcers and limb amputation in diabetic patients, which require close monitoring by allied health professionals such as podiatrists. Another example is polypharmacy in patients who present with multimorbidity. Polypharmacy is closely linked to adverse drug reactions, risk of drug – disease interactions, inappropriate dosing and nonadherence. In this context, community pharmacists can provide important support and optimise medication reconciliation services before or after the patient is discharged from hospital.

Important examples of population health management tools are patient registries and health registries, using the WHO International Classification of Primary Care (ICPC-2) coding. ICPC-2 classifies patient data and clinical activity in the domains of general or family practice and primary care, taking into account the frequency distribution of health problems seen in these domains. It allows for classification of the patient’s reason for encounter, the problems or diagnosis managed, interventions carried out, and the ordering of these data by episodes of care. Based on these data, much more attention can be placed by teams on the prevention of complications, which is essential to improving NCD core services.

The International Classification of Functioning (ICF) is another useful tool that allows for the multidimensional assessment of functional status in patients. It is a WHO framework for measuring health and disability both at individual and population levels. As the functioning and disability of an individual occurs in a particular context, the ICF includes a list of environmental factors. Proactive management of individuals and communities is also enhanced by the use of risk stratification tools. These build on health data from empanelment, which is the assignment of individual patients to individual primary care providers with sensitivity to patient and family preference.

One example of a first generation risk stratification tool is the risk stratification tool for cardiovascular disease (CVD) recommended in the WHO Package of essential noncommunicable (PEN) disease interventions in which CVD and diabetes with their risk factors are considered in an integrated manner. This approach can be a good starting point for low capacity and low resource countries. When using second generation risk stratification tools, patients are risk stratified to identify opportunities for intervention before the occurrence of any adverse outcomes that would result in increased medical costs. These tools enable people to be grouped according to the “constellation” of diseases they experience and the support they receive, ranging from those in good health, for whom the appropriate interventions are health promotion and screening, to those requiring end-of-life care. Risk stratification, using predictive modelling, is a key stage in evidence-based intervention focused on improved NCD core services.

In settings with low primary care capacity, population health management should be considered a staged process, requiring the development of teams that gradually implement new care processes, new competencies, changes in provider culture and the adequate use of information technology, all conducive to effective population health management.

From a problem-oriented model of care to goal-oriented care

The problem and disease-oriented model targeting disease-specific interventions is less well suited to the management of chronic illnesses, health promotion and disease prevention. It is not particularly conducive to an interdisciplinary team approach and tends to shift control of health away from the patient and toward the physician. Effective detection, diagnosis, and treatment of NCDs and multimorbidity requires the orientation of care to be directed at and evaluated in the context of individually-specified goals (goal-oriented care in terms of quality of life and goals that are important to the patient).

When applying a goal-oriented model of care, each individual is encouraged to achieve the highest possible level of health as defined by that individual. Characterised by a greater emphasis on individual strengths and resources, this approach represents a more positive approach to health care too. The patient is actively engaged in shared decision-making that respects and starts from their personal goals.

These goals often encompass lifestyle changes using a stepwise approach while setting realistic goals. Supporting patients with lifestyle changes is complex and time-consuming and requires highly trained professionals, such as advanced nurse practitioners, supported by nutritionists, physical therapists and health psychologists. Other goals that are often expressed by patients include dealing with adverse drug reactions. In
this context, community pharmacists can provide important support and optimise medication reconciliation services before or after the patient is discharged from hospital.

Well-established processes are required to identify patients in need of care coordination. Mutually accepted interdiscipli

Obstacles that need to be addressed

The necessary changes can only be realised if there are a sufficient number of effective regulatory instruments that allow new service-delivery models to grow. Regulatory instruments in support of new service-delivery models should address human resources (volume, type and distribution of services and skill-mix), educational requirements, governance, financing mechanisms, medicine policies, life course approaches to health, people-centred strategies and information solutions.

Countries need to show political courage, a medium and long-term perspective to their policy interventions and a whole-of-society approach to call in those stakeholders that currently are underrepresented in health policymaking, such as patient and family caregiver organisations, civil society, professional associations and health managers.

Conclusions

The ageing population and the increase in the number of people diagnosed with multiple NCDs are forcing policymakers and public health leaders to reform health care systems with increasing urgency. Scaling up NCD core services requires multi-profile primary care-based teams, pro-active population health management, goal-oriented care and coordinated and integrated service delivery. These necessary changes require timely and effective regulatory instruments that support their implementation.

References