

Tackling health workforce challenges to universal health coverage: setting targets and measuring progress

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Abstract Human resources for health (HRH) will have to be strengthened if universal health coverage (UHC) is to be achieved. Existing health workforce benchmarks focus exclusively on the density of physicians, nurses and midwives and were developed with the objective of attaining relatively high coverage of skilled birth attendance and other essential health services of relevance to the health Millennium Development Goals (MDGs). However, the attainment of UHC will depend not only on the availability of adequate numbers of health workers, but also on the distribution, quality and performance of the available health workforce. In addition, as noncommunicable diseases grow in relative importance, the inputs required from health workers are changing. New, broader health-workforce benchmarks – and a corresponding monitoring framework – therefore need to be developed and included in the agenda for UHC to catalyse attention and investment in this critical area of health systems. The new benchmarks need to reflect the more diverse composition of the health workforce and the participation of community health workers and mid-level health workers, and they must capture the multifaceted nature and complexities of HRH development, including equity in accessibility, sex composition and quality.

Abstracts in **عربي**, **中文**, **Français**, **Русский** and **Español** at the end of each article.

Introduction

The eight Millennium Development Goals (MDGs)¹ have been credited with catalysing a greater focus on the development priorities they targeted – poverty reduction, gender equality, primary education, maternal and child health, control of major diseases, environmental issues, and partnerships for development – and with mobilizing the relevant resources. With three of the MDGs being health-related, health is awarded a high priority in the current framework. The progress being made towards achieving these three goals is inequitable within and across countries, but despite this, many countries are recording improvements in health outcomes.²

However, limitations in the MDG framework – and particularly in the health-related MDGs – are being recognized: a lack of attention to equity,³ the neglect of health issues that were not explicitly included in any of the MDGs, and the fragmentation of efforts targeted at the different health priorities (the latter might have contributed to a narrowly selective focus on development assistance for health).⁴ The targets and indicators currently used for the health-related MDGs focus on increasing the coverage of some priority health services – such as skilled birth attendance – and on improving health outcomes in relation to maternal health, child health and infectious diseases. However, none of the MDG targets refers explicitly to the health system actions required to attain such objectives. Yet it has been evident for over a decade that only by overcoming the structural deficiencies of health systems – including those related to governance, the health workforce, information systems, health financing and supply chains – will it be possible to improve specific outcomes for individual diseases or population subgroups.⁵

Although econometric analyses have confirmed that an adequate health workforce is necessary for the delivery of essential health services and improvement in health outcomes,^{6,7} there have been systemic failures in the planning, forecasting, development and management of human resources for

health (HRH).^{8,9} This has led to unacceptable variations in the availability, distribution, capacity and performance of health workers, and these have resulted, in turn, in uneven quality and coverage of health services. In many low-income countries, acute shortages in the health workforce have been compounded by the emigration of health workers to high-income countries that offer better working conditions. The situation has heightened a sense of injustice that culminated in the adoption, in 2010, of the WHO Global Code of Practice on the International Recruitment of Health Personnel.¹⁰

Health workforce benchmarks

The world health report 2006 included an estimate of the minimum density threshold of physicians, nurses and midwives deemed generally necessary to attain a high coverage of skilled birth attendance: 2.28 per 1000 population.⁹ According to the statistics available when the report was published, 57 countries fell below this benchmark and an additional 4.3 million health workers would be required to achieve the minimum density globally.

Thanks to its grounding in evidence, its relative simplicity and the fact that it could be easily standardized, the minimum density of physicians, nurses or midwives suggested in *The world health report 2006* – 2.28 per 1000 population – has become the most widely used health workforce “target”. It was adopted in the commitments of the Group of Eight (G8) in 2008¹¹ and has served as a basis for several monitoring and accountability processes that were either focused on the health workforce¹² or had a different and broader focus.¹³ However, this benchmark focuses exclusively on physicians, nurses and midwives and was developed with the objective of attaining relatively high coverage of selected essential health services of relevance to the health MDGs. In today’s world, it is no longer adequate in the health workforce discourse for at least four reasons:

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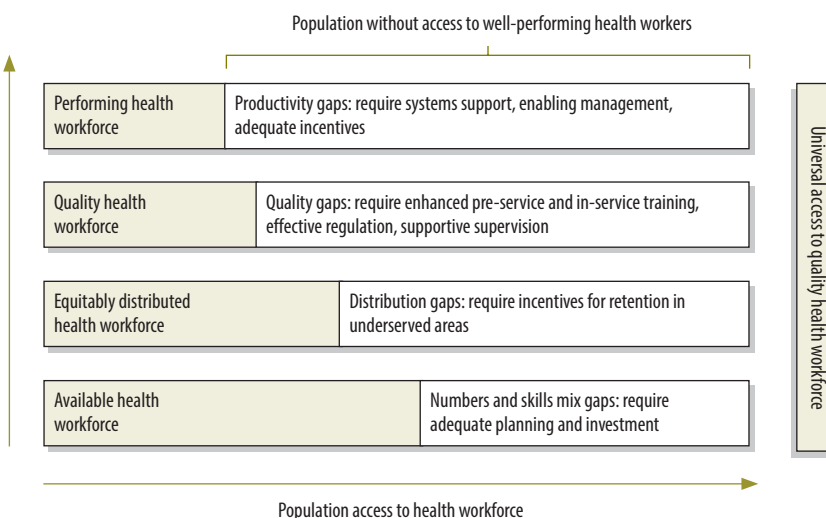
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- i) The evidence underpinning the threshold value was based on data on immunization coverage and skilled birth attendance. No consideration was given to health workforce requirements with respect to a wider range of health services, including the control and treatment of noncommunicable diseases.
- ii) The benchmark only allows the identification of inadequacies in the numbers of health workers. In the attainment of universal health coverage (UHC), many other challenges of equal – if not greater – importance exist, such as issues relating to access to, and the quality and performance of, the health workforce that were not captured by the simple density-based benchmark. Aspects such as distribution, responsiveness, affordability and productivity were crucially missing.
- iii) The macroeconomic implications of attaining the density benchmark have not been examined. It has been estimated that some low-income countries would have to allocate 50% of their gross domestic product to health to be able to reach the benchmark.¹⁴
- iv) The benchmark only relates to physicians, nurses and midwives. However, community health workers^{15,16} and mid-level health workers¹⁷ can also improve the availability and accessibility of health services while maintaining – when appropriately trained and managed – quality standards that are similar to those of cadres undergoing longer training. Despite a growing evidence base and a significant political momentum in support of their role, including through the global One Million Community Health Workers Campaign and similar initiatives,^{18,19} these cadres are often operating at the margins of health systems and are largely excluded from HRH information systems and benchmarks.

A few other benchmarks have been used, such as the Sphere standards.²⁰ However, these benchmarks – which call for at least one physician and 50 community health workers for every 50 000 population – are only of primary relevance to humanitarian operations in refugee settings.

Fig. 1. **Human resources for health actions required to achieve universal health coverage**



Source: Jim Campbell and Giorgio Cometto (2012), adapted from Tanahashi (1978).

Evolving health workforce needs

The renewed focus on UHC in the health policy discourse – which culminated in December 2012 in the adoption of a United Nations General Assembly resolution on global health and foreign policy – has contributed to a wider recognition of the need for an “adequate skilled, well-trained and motivated [health] workforce.”²¹

The progressive realization of the right to health for all people – and of UHC – will entail a wide array of actions to address the specific needs of each country. As national health systems in low- and middle-income countries try to broaden the services they provide to cover noncommunicable diseases as well, new demands will be made on their health workers. Population demands for more equitable access to health care of good quality will also have to be reflected in efforts at securing greater accessibility of health workers – especially in rural and other underserved areas²² – and improving their competence and performance. There will also be an increasing demand for greater efficiency: in general, the countries that are facing the greatest obstacles to the attainment of UHC are also the most fiscally constrained. Affordable approaches to boost the performance of health workers are urgently required. There may be trade-offs between the broader HRH needs entailed in the UHC paradigm and the

financial constraints faced by many countries. It may be possible to increase the cost-effectiveness of an expanding health system by awarding more prominent roles to community health workers and mid-level health workers. Similarly, the adoption of appropriate management systems and incentive structures could help to optimize the performance of existing health workers and reduce wasteful spending.²³

Guaranteeing UHC is a multifaceted endeavour. To approach the issue through the health workforce lens, it is necessary to go beyond mere numbers and address gaps in equitable distribution, competency, quality, motivation, productivity and performance. Improving access to effective coverage will not be possible otherwise (Fig. 1).

On the path towards UHC, fundamental changes will have to be adopted by countries and by the global health community in relation to how health workers are trained, deployed, managed and supported.²⁴ The role of the public sector in shaping health labour market forces will also have to be strengthened. A critical element in this endeavour is the inclusion of HRH benchmarks and of a corresponding monitoring framework in the UHC agenda.

Aiming for universal health coverage

HRH are not an end in themselves but the indispensable means to achieving

improved health outcomes. Aware of the importance of measurable targets and linked accountability mechanisms in stimulating action, countries and the international community should include a health-workforce-specific benchmark in the framework for UHC and the post-2015 development agenda. The inclusion of HRH benchmarks in the post-2015 agenda could help to foster collaboration between countries and global partners and to focus policy actions and investments where they are most required.

The development of new benchmarks in the field of HRH should take into account several interrelated factors, including:

- i) population growth and the demographic transition;
- ii) the growing burden of noncommunicable diseases and the corresponding changes in demand for health services by citizens;
- iii) the need to adapt the skills and competencies of health workers to match these changed demands;
- iv) an appreciation of health workforce challenges other than numerical shortages, and of the potential contributions of cadres other than physicians, nurses and midwives in improving health service availability and accessibility – especially in

those disrupted health systems that face the most acute challenges;

- v) the role of non-state actors, which has never been adequately captured in previous benchmarks or in the corresponding monitoring frameworks.

New benchmarks are required that give a better reflection of the diverse composition of the health workforce. They should take account of the contributions that are made by social workers who are involved in long-term care and by community health workers and mid-level health workers. The inclusion of these other cadres could result in targets that are realistically attainable even by low-income countries. Recent costing studies suggest that providing care through community health workers is affordable.²⁵ However, any additions to the roles and expectations of health workers are likely to increase resource requirements.

Even adopting a more affordable skills mix and increasing efficiency in HRH spending through a renewed emphasis on performance and quality of care, the financial path towards UHC for some low-income countries and fragile states will inevitably involve, at least in the short-term, a role for official

development assistance. Feng Zhao et al. discuss in an editorial in this theme issue how to maximize the returns of external financing for HRH.²⁶

HRH benchmarks should influence the planning, management, support and monitoring of health systems. They should also be reflected in the setting of the targets used – at the national and global level – to track progress towards UHC and the health priorities of the post-2015 development agenda.

It would also be helpful, besides setting quantitative targets, to introduce an equity lens and explore needs in other dimensions, including the geographical distribution and sex composition of the health workforce. Minimum standards need to be established for all aspects of health worker performance – including responsiveness and competency and the associated management, financing and information systems. This round table base paper is complemented by four discussants,^{27–30} on how to strike the right balance between benchmarks that are sharp, actionable and measurable while simultaneously capturing the multifaceted nature and complexities of health workforce development. ■

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ملخص

التصدي لتحديات القوى العاملة الصحية للتغطية الصحية الشاملة: وضع الأهداف وقياس التقدم

الأزمات غير السارية بأهمية نسبية، فإن الإسهامات المطلوبة من العاملين الصحيين تتغير. ولذلك، ثمة حاجة لوضع أسس مرجعية جديدة أوسع نطاقاً للقوى العاملة الصحية – وإطار رصد مقابل – وإدراجها في جدول الأعمال للتغطية الصحية الشاملة بغية تسريع الاهتمام والاستثمار في هذا الجانب الهام من النظم الصحية. ويتعين أن تعكس الأسس المرجعية الجديدة التركيبة الأكثر تنوعاً للقوى العاملة الصحية ومشاركة العاملين في مجال الصحة المجتمعية والعاملين الصحيين من المستوى المتوسط، ويجب أن تستوعب الطبيعة متعددة الأوجه لتطوير الموارد البشرية الصحية وتعقيدها، بما في ذلك الإنصاف في الإتاحة والتركيب من الجنسين والجودة.

سوف يتعين تعزيز الموارد البشرية الصحية إذا كانت هناك رغبة في تحقيق التغطية الصحية الشاملة. وتركز الأسس المرجعية القائمة للقوى العاملة الصحية بشكل حصري على كثافة الأطباء والمرضى والقابلات، وتم تطويرها بهدف بلوغ التغطية المرتفعة نسبياً لخدمات التوليد التي يقدمها أشخاص مهرة وغيرها من الخدمات الصحية الأساسية ذات الصلة بالأهداف الإنمائية للألفية في مجال الصحة. وعلى الرغم من ذلك، لن يعتمد بلوغ التغطية الصحية الشاملة على إتاحة الأعداد الكافية من العاملين الصحيين فحسب، ولكنه سيعتمد كذلك على توزيع القوى العاملة الصحية المتاحة ونوعيتها وأداءها. بالإضافة إلى ذلك، نتيجة لنمو

摘要

应对全民医疗保障的卫生劳动力挑战：设定目标，衡量发展

要实现全民医保 (UHC)，就必须强化卫生人力资源 (HRH)。现有卫生人力基准仅仅关注医生、护士和助产士的密度，其发展目标在于实现熟练助产和其他卫生千年发展目标 (MDG) 相关基本卫生服务的较高覆盖率。但是，实现 UHC 不仅依赖于足够数量卫生工作者的可及性，还在于可用卫生劳动力的分布、质量和绩效。此外，随着非传染性疾病相对重要性的提高，

对卫生工作者所提供服务的要求也在变化。因此，需要制定更广泛的卫生劳动力基准以及相应的监控框架，并将其纳入 UHC 日程中，以便促成对卫生系统这一关键领域的关注和投入。新的基准需要反映更加多样的卫生劳动力组合以及社区卫生工作者和中级卫生工作者的参与，并且必须把握 HRH 发展的多样化和复杂性，包括可及性、性别组成和质量方面的公平性。

Résumé

Relever les défis des effectifs de santé pour réaliser la couverture sanitaire universelle: établir les objectifs et mesurer les progrès

Les ressources humaines de la santé devront être renforcées pour pouvoir réaliser la couverture sanitaire universelle. Les points de référence existants des effectifs de santé se concentrent exclusivement sur la densité des médecins, infirmiers et sages-femmes, et ils ont été développés avec l'objectif d'atteindre une couverture relativement élevée des accouchements médicalisés et des autres services de santé essentiels qui sont importants pour la réalisation des objectifs du Millénaire pour le développement (OMD) de la santé. Cependant, la réalisation de la couverture sanitaire universelle ne dépendra pas seulement de la disponibilité d'un nombre approprié de professionnels de la santé, mais également de la distribution, de la qualité et de la performance des effectifs de santé disponibles. En outre, comme le nombre des maladies non transmissibles ne cesse de croître, les

contributions requises de la part des professionnels de la santé sont en train de changer. Des points de référence nouveaux et plus larges des effectifs de santé – et un cadre de suivi correspondant – doivent donc être développés et inclus dans l'agenda pour la couverture sanitaire universelle afin de catalyser l'attention et les investissements dans ce domaine critique des systèmes de santé. Les nouveaux points de référence doivent refléter la composition plus diverse des effectifs de santé et la participation des agents sanitaires des collectivités et des agents sanitaires de niveau intermédiaire, et ils doivent saisir la nature polymorphe et la complexité du développement des ressources humaines de la santé, y compris en ce qui concerne l'équité dans l'accessibilité, la composition sexospécifique et la qualité.

Резюме

Устранение проблем, связанных с кадровыми ресурсами здравоохранения при внедрении всеобщего охвата медико-санитарной помощью: постановка целей и отслеживание выполнения

Для достижения всеобщего охвата медико-санитарной помощью (ВОМСП), необходимо усилить кадровые ресурсы здравоохранения (КРЗ). Существующие в настоящее время методы оценки достаточности кадров здравоохранения сосредоточены исключительно на обеспеченности населения врачами, медсестрами и акушерками и были разработаны с целью достигнуть относительно высоких показателей по количеству профессиональных акушеров и других важных медицинских служб в соответствии с Целями тысячелетия в области развития здравоохранения. Тем не менее, достижение всеобщего охвата зависит не только от адекватного количества работников здравоохранения, но также от распределения, качества и профессиональных показателей доступных кадровых ресурсов здравоохранения. Кроме того, с ростом относительной

важности лечения неинфекционных заболеваний меняются требования к работникам здравоохранения. Поэтому должны быть разработаны и включены в программу действий по ВОМСП новые, более широкие методы оценки кадровых ресурсов здравоохранения, а также соответствующая система наблюдения. Это поможет активизировать привлечение внимания и инвестиций к этой исключительно важной области системы здравоохранения. Новые методы оценки должны отражать многообразный состав кадровых ресурсов здравоохранения и задействование местных медработников, а также работников здравоохранения среднего звена. Кроме того, эти оценки должны отражать многопрофильность и сложность развития КРЗ, включая равенство при обеспечении доступности, половой состав и качество подготовки.

Resumen

Abordar los desafíos del personal sanitario para alcanzar la cobertura universal de la salud: fijación de objetivos y evaluación del progreso

Es fundamental fortalecer la acción de los recursos humanos en sanidad (RHS) para alcanzar la cobertura universal de la salud (CUS). Los parámetros de referencia actuales sobre el personal sanitario se centran exclusivamente en la densidad de médicos, enfermeros y comadronas, y se desarrollaron con el fin de alcanzar una cobertura relativamente alta de asistencia especializada durante el parto y otros servicios de salud esenciales, que fueran para lograr los Objetivos de Desarrollo del Milenio (ODM). Sin embargo, la consecución de la cobertura universal de la salud no solo depende de la disponibilidad de un número adecuado de personal sanitario, sino también de la distribución, la calidad y el desempeño del personal sanitario disponible. Además, la contribución necesaria por parte del personal sanitario cambia a medida que la

importancia de las enfermedades no transmisibles crece relativamente. Por lo tanto, es necesario desarrollar e incluir en el programa otros parámetros de referencia más amplios y actuales, así como su marco de seguimiento correspondiente, de modo que los trabajadores comunitarios de salud puedan catalizar la atención y la inversión en esta área clave del sistema sanitario. Los nuevos puntos de referencia deben reflejar la composición más plural del personal sanitario y la participación de los trabajadores comunitarios de salud, así como de los trabajadores sanitarios de nivel medio. De esta manera, deben captar las múltiples facetas y complejidades del desarrollo de los recursos humanos para sanidad, incluyendo la equidad en la accesibilidad, la composición por sexo y la calidad.

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Round table discussion

Health workforce indicators: let's get real

Ties Boerma^a & Amani Siyam^a

Health workforce indicators?¹ Those should be easy. We just need to count the numbers entering from training institutions or through re-entry, the numbers working, and the numbers exiting. If we know where these people work, we have the distribution of health workers within a country, and if we also have information on their competencies, responsiveness and productivity, we can know about their performance.

Sound health workforce statistics enable countries to develop policies that ensure the equitable and effective distribution of the workforce. They can be used to forecast needs by making projections and to plan accordingly. They can also be the basis for implementing policies to improve performance and the regulation of the public and private sectors. These statistics would also allow for reliable global monitoring of progress, including progress towards achieving benchmark targets,² and for monitoring the implementation of the WHO Global Code of Practice on the International Recruitment of Health Personnel.³

And yet, health workforce statistics are fraught with measurement problems. This is not for lack of agreement on core indicators or because we do not know what needs to be monitored. And it is not because measuring indicators is complicated or costly, as is true in other areas of health. For some indicators, such as those that capture productivity, more work is needed, but many indicators are well established.^{4,5}

Health workforce information systems fail to deliver comprehensive, reliable and timely data in many countries. As a consequence, planning and policy-making are often based on very limited evidence and global monitoring in areas such as the implementation of the Global Code and the setting of benchmarks is conducted with inadequate country statistics.

The challenges begin at the very basis: with the definition and classification of health workers. Indicators are intended for tracking progress over time, so country-specific definitions make it difficult to assess trends and conduct comparative analyses. The International Standard Classification of Occupations of the International Labour Organization facilitates the mapping of country health labour data, but it does little to take the statistical dimension into account, as is done, for example, for the International Classification of Diseases (ICD).⁶ Some solvable issues are not well addressed, among them the classification of non-physician clinicians and community health workers.⁷

Measuring the size and distribution of the health workforce involves drawing data from several sources, including sources outside the health sector.⁴ Currently too little is done to make use of these multiple, imperfect sources, reconcile the numbers and develop a best estimate. Human resources for health observatories aim to improve the information base,⁸ yet to date they have had little impact on the quality of health workforce data and statistics.

It's time to get real. Reliable and comparable health workforce statistics are essential and global partners and countries simply have not invested enough. It is necessary to invest in health workforce registries. Carefully designed, these become timely and consistent sources of data on the health workforce. Creating such registries will take time. In addition, a census of health facilities should be conducted to update a database of the public and private sector workforce and lay the groundwork for a continuous health workforce registry. Such a census could also be used to collect information on characteristics such as infrastructure, medicines, diagnostic readiness and the observance of universal precautions for the prevention of nosocomial infections, and could therefore provide a comprehensive picture of service availability and readiness.⁹ Finally, investments in strengthening country analytical capacity are crucial for improving the quality of health workforce statistics. ■

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Towards universal health coverage: a health workforce fit for purpose and practice

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The finality of universal health coverage (UHC) is to ensure that *all* people are able to access the *quality* health services they *need* without suffering undue financial hardship. Margaret Chan describes it as the ultimate expression of *fairness*.¹ The italicized words above should therefore frame the starting point for a contemporary discourse on human resources for health

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in the post-2015 development agenda for health (2015–2030).

UHC is an aspirational concept. It establishes what is to be achieved but says little on how to get there.² However, the first step in accelerating progress towards UHC – building a health workforce that is both fit for purpose and fit to practice – is relatively simple. How does one go about it? By developing the competencies and regulatory frameworks needed to deliver quality care in accordance with the burden of disease and health priorities. The planning and implementation lens is *ex ante*: What health workforce do we need by 2030 to attain “effective coverage”^{3–7} of an agreed package of care that meets the needs of all people, be they rich or poor? This line of questioning, which is increasingly evident,⁸ generates the strategic intelligence to inform evidence-based decisions on human resources for health. Once need is quantified, a secondary but important policy consideration is pragmatism surrounding the available human and capital resources and fiscal space within national settings. Such pragmatism can inform the pace of acceleration towards UHC but should not undermine the initial workforce visioning process or the obligation of governments to deliver on the right to health.⁹

Existing thresholds for the required number of professional health workers (midwives, nurses and physicians) per 1000 population – 2.28 and 3.45 according to the World Health Organization (WHO) and the International Labour Organization, respectively^{10–12} – provide valuable references for translating need into indicative workforce requirements, but they should be considered part of the process of planning the workforce to meet the needs of the population rather than an absolute target in countries currently below these thresholds. To promote effective coverage and deliver services closer to the client, it is essential to further analyse the availability or supply of the workforce; its accessibility in spatial, temporal and financial terms; its acceptability to clients; and its quality, in terms of performance. This entails using internationally recognized standards to classify the different occupations in the health workforce; gaining a better understanding of the health labour market within a country; moving beyond counting health workers to assessing their full-time equivalent and available working time; and being more cognisant of the skill mix – and educational pathways – required for the workforce to become fit for purpose.

To an extent, *The Kampala declaration and agenda for global action* and the *WHO Global Code of Practice on the International Recruitment of Health Personnel* offer existing global benchmarks.^{13,14} The accountability report from the meeting of the G8 held in June 2013 in Lough Erne, Northern Ireland, provides evidence that some countries are monitoring their recommended actions.¹⁵ However, the international community has yet to fully grasp the inherent value of these documents in fostering accountability. The 2013 progress report on the Global Code of Practice, for example, is a sober reminder that existing health workforce recommendations are not being implemented at scale in all WHO regions.¹⁶

A contemporary strategy on human resources for health, embedded within the post-2015 development agenda for health, is needed to accelerate progress towards UHC. Such a strategy should promote effective coverage with health services staffed

by a workforce that is both fit for purpose and fit to practice. This requires an accompanying accountability and reporting mechanism not only for tracking the stock or density of the health workforce or the coverage of health interventions, but for collating disaggregated data on the availability, accessibility, acceptability and quality of the workforce to meet population needs, ensure the delivery of quality care and achieve fairness for all. ■

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Health workforce benchmarks for universal health coverage and sustainable development

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Universal health coverage (UHC) includes the guarantee that everyone will be protected over the entire life-cycle by a defined set of essential health services fulfilling four interrelated criteria, as set out in Social Protection Floors Recommendation, 2012 (202) of the International Labour Organization (ILO): availability, accessibility, acceptability and quality.¹ Insofar as it furthers health, which is essential to human productivity and economic progress, UHC – and the health workforce needed to attain it – serves as a foundation to sustainable development.

Gaps in the health workforce – in number, distribution and skills – undermine service availability, acceptability, accessibility and quality. Such gaps can also create financial barriers and impoverish people when they have to seek care without being covered by a social health protection system or scheme. Access to quality services is vitally dependent on the existence of a health workforce that is able to meet needs and enjoys decent working conditions, characterized by training opportunities, attractive employment, good career prospects, fair remuneration, adequate social protection, a safe work environment and access to dispute settlement mechanisms, as described in the ILO Nursing Personnel Convention No. 149.²

Service accessibility is further compromised by factors external to the health sector that influence the financing of health and of the health workforce. Of particular relevance are the socioeconomic contexts in which people live and work. Poverty, unemployment and low wages affect a household's ability to pay for needed health care, be it through taxes, employee contributions, premiums or out-of-pocket expenditure. At the national level, high poverty rates and the existence of large informal economies often result in tax revenues that are insufficient for adequate funding of health care and that challenge governments' technical capacity to supply services in areas where unregistered workers and their families live. In highly vulnerable countries, defined by the ILO³ as those where most people work in the informal economy and most of the population is poor, health care is accessible to much fewer people than in countries with low poverty rates and small informal economies.⁴ Furthermore, in such countries most health care is financed by out-of-pocket payments that can reach catastrophic levels and plunge families into dire poverty or bar their access to needed care. According to the ILO, over 1.5 billion people in the world are living and working in socioeconomic contexts that challenge adequate financing of UHC and the attainment of sustainable development, so critically dependent on the presence of a healthy population.

Any health workforce benchmark for measuring sustainable progress towards UHC must reflect the above-mentioned aspects, including the basic socioeconomic causes of UHC gaps beyond the health sector.⁵ One such benchmark is the

ILO's staff-related access deficit indicator (SAD).^{3,6} The SAD measures the relative difference between a particular country's health workforce density and the population-weighted median health workforce density in a group of countries defined by the ILO as having low vulnerability (and hence used as the global standard). These are countries with low poverty levels and small informal economies and therefore with the potential to successfully tackle the root causes of health workforce gaps and access-related deficits in UHC and, ultimately, to achieve sustainable development.

The SAD – currently 34.5 health workers per 10 000 population⁷ – suggests that one third of the world's population lacks access to health care because of gaps in the health workforce. Globally, more than 90 countries are challenged by health workforce deficits. Burundi, for example, has a deficit of 33 health workers per 10 000 population, which leaves 95% of the population without access to health care. These and other countries with high levels of poverty and large informal economies should strive towards the achievement of the SAD benchmark by adopting coherent socioeconomic and health policies that foster sustainable development by prioritizing adequate labour market policies, poverty alleviation and decent working conditions. This relative benchmark has the flexibility to respond to health developments such as the growing burden of noncommunicable diseases and the demographic transition. It is useful for planning and investment purposes at the national level. Countries must, however, make internal decisions to achieve an equitable health workforce distribution and adopt socioeconomic policies embedded in national development strategies to create synergy between increased wealth and improved health. ■

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Empowering patients and strengthening communities for real health workforce and funding targets

Brook K Baker^a

The setting of ambitious targets for expanding the health workforce and improving its quality, efficiency and equitable service delivery is a task long overdue. It has been nearly one decade since the minimum needed density of physicians, nurses and skilled midwives – 2.28 workers per 1000 inhabitants – was established, but without attention to other health worker cadres. Furthermore, the estimate was based on only two areas of health worker activity – skilled birth attendance and measles immunization – that represent a minuscule fraction of people's health-care needs.¹ As a result, it grossly underestimated the health workforce needed in low- and middle-income countries to respond effectively to the pandemics of human immunodeficiency virus infection (HIV), tuberculosis and malaria; the burden of neglected tropical diseases; unmet needs in child, maternal and sexual and reproductive health; and the growing prevalence of noncommunicable diseases. In addition to being unsuitable for responding to epidemiological trends and other contextual variables, the established worker density target was minimalistic and non-dynamic, for it conveyed the impression that meeting only the most rudimentary needs of health systems would suffice to alleviate the crisis in the area of human resources for health. No aspirational goals were set for progressively expanding and strengthening a health workforce to meet a population's broad-spectrum health needs.

Cometto & Witter² are correct in asserting that much has been learnt about the value of properly trained mid-level³ and community health workers⁴ in improving health service coverage and efficiency. Work is still being conducted to determine the best skill mixes and workforce ratios for different countries and to establish good practice models for health workforce training, task sharing and teamwork. Although simplification, combined with equity and quality, is the overall goal, the path is laborious given the headwinds of bureaucratic intransigence, chronic underfunding and persistent brain drain. To overcome these headwinds, it is crucial that health workers be paid living wages and given incentives to work in neglected areas.⁵

Despite the above, the framework described by the authors is not inclusive enough because it omits the transformation taking place in the delivery of robust, affordable and operable point-of-care diagnostics by health workers with less training.^{6,7} The possibility of making a diagnosis at the periphery of health services rather than in tertiary facilities is made even more attractive by growing evidence that dispersed community-based care is often as good as concentrated facility-based care or even better.⁸ More importantly, we have learned from HIV activists and people living with HIV that patients can and must be empowered to prevent ill health and manage their own care – in short, to be partners in their own well-being – through health literacy and communal support systems. Similarly, communities and community systems

must be strengthened if they are to support patients and their caretakers in their efforts to seek care and preserve health. Only by placing patients at the centre of human resource strategies and strengthening the interface between health and community systems will we attain the efficiency and quality in health care that we seek.

Empowered patients and strengthened communities will be in a position to hold health systems and their leaders accountable.⁹ They will demand of both domestic funders and foreign donors the resources needed to recruit, train and retain health workers capable of delivering good, equitable care. They will also demand dynamic targets for strengthening the health workforce, matched with enforceable targets for adequate and sustained funding. ■

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