Economic Growth and the need for Health Workers: a financial and fiscal analysis

Dr Agnès Soucat, Director
Department of Health Systems Governance and Financing
World Health Organization
Geneva, Switzerland
The needs are there

- Efforts to reach the Millennium Development Goals (MDGs, 2000–2015) revealed shortages in the number of available health workers worldwide, especially in lower-income and lower-middle-income countries.

- Taking into account growth in both needs and supply implies that a total of 18 million additional health workers will be needed globally by 2030 in order to meet conservative estimates of the Universal Health Coverage targets required by the SDGs (i.e. 4.45 health workers per 1000 population).
But where is the economics?

Strategic planning approaches to the health workforce (focusing on need) leave a number of economic questions unanswered:

- Where will these 18 million additional health workers come from (supply)?
- Who will hire them (demand)?
- Will societies and governments be able meet the corresponding costs (fiscal and financial space)?

We address the latter question here.
Fiscal space

Fiscal space represents the government’s ability to pay without jeopardizing the sustainability of its financial position or the stability of the economy. It is affected by:

a. taxation, including raising government revenues or improving tax collection and administration;

b. fiscal impacts of economic and population growth;

c. earmarking funds through indirect taxes or social insurance contributions;

d. borrowing from domestic or external lenders;

e. monetary policies;

f. efficiency gains, through improving allocative efficiency or technical efficiency;

f. external grants [Heller, 2005; Heller, 2006; Tandon & Cashin C. 2010; Barroy et al. 2016].
Fiscal space: traditional public policy levers

1. Official Development Assistance (% of GDP)
2. Domestic Revenues Mobilization (% of GDP)
3. Deficit Financing (% of GDP)
4. Reprioritization & Efficiency of Expenditures (% of GDP)
Financial space

• However, since economic development and population growth (b) and effective public policies on tax (a) and spending (f) catalyze private investments, and

• Since external grants/loans (d) and (g) – including both private and philanthropic financing – are instrumental in supporting public policy,

• We extend the concept of fiscal space to include the availability of financing from private sources, both domestic and external.

• We refer to this broader concept as financial space.

• When we wish to take account the availability of both public and private financing, we use the term “financial space”.

First major finding of CHEEG

Health employment promotes economic growth and increases the productivity of other sectors.

The employment of health workers:

1. smooths the effects of economic downturns,
2. does not contribute to wage inflation (Baumol), and
3. renders non-health sectors more productive (Rajan-Zingales).

(Arcand JL, Araujo, EC, Weber M. Health sector employment, health care expenditure and economic growth: what are the links? Washington (DC): World Bank Group; manuscript.)
Second major finding CHEEG: fiscal space

Public funds can meet the recurrent costs of health workers in most countries.

A simple scenario about the limits of public expenditure. Makes assumptions about:

- the extent to which governments can increase total tax revenues ("fiscal growth"),
- the extent to which health can receive a higher level of priority ("priority increase").

We assume average health worker wages (all cadres) maintain a constant multiple of GDP p.c. and:

- that GDP growth follows World Bank projections, and
- that population growth follows the projections of the United Nations Population Division.
Currently observed wage bills

Sample statistics for wage bills as a proportion of general government expenditure on health, estimated from unpublished data in the Global Health Expenditure Database ($n = 136$), by World Bank income group:
Currently observed health worker wages

Comparison of average health worker wage indexes (all cadres) estimated from ILOSTAT and from the Global Health Expenditure Database, by World Bank income group:

![GDP per capita index](chart.png)
Second major finding, cont.

Number of countries where the wage bills of meeting normative health worker targets would amount to more than 60% of projected public spending on health in 2030 ($n = 183$)
Second major finding, cont.

Number of countries where the wage bills of meeting normative health worker targets would amount to more than 90% of projected public spending on health in 2030 ($n = 183$)
Third major finding CHEEG: financial space

Domestic financing can meet most costs of needed health workers in LICs and LMICs.

• There is sufficient financial space for HRH iff:

1. the annual financing gap for the wages is a reasonable proportion of total annual economic output (i.e. GDP);

2. the projected annual financing gap for the wages of needed health workers is a “reasonable” proportion of total health expenditure in those countries.
Third major finding, cont.

% of GDP and % total health expenditure required to pay additional wage bills in low-income countries over the period 2016–2030, assuming an average health worker wage index (for all cadres) of 3 times GDP per capita.
Third major finding, cont.

% of GDP and % total health expenditure required to pay additional wage bills in lower middle-income countries over the period 2016–2030, assuming an average health worker wage index (for all cadres) of 3 times GDP per capita.
Conclusions: fiscal space

• If wage bills are expressed as a proportion of projected public spending on health under our fiscal scenarios, and conditional on estimates of a plausible range of health worker wage indexes of 3-6 times GDP per capita, only a small number of countries (4–16 countries) are projected to show wage bills outside the upper range of the distribution of currently observed wage bills.

• For countries where meeting health worker targets could require more than the more conservative ceiling of 60% of public spending on health (possibly 4-69 countries, depending on wage levels), additional assistance may be needed to support the financing of non-salary inputs and to ensure access to care, quality of care and the productivity of health workers.
Conclusions: fiscal space

• There is the potential for public funds to meet the recurrent costs of needed health workers in many countries.

• Countries that are projected not to meet their wage bills in 2030 from public finances display the common feature of low levels of general government expenditure on health.

• For example, the 69 countries reported as potentially not meeting their wage bills in 2030, even in the optimistic scenario of fiscal growth and increased prioritization of health spending, show an average share of general government expenditure on health of only 2% of GDP in data from the GHED (whereas a target of 5% has been recommended).
Conclusions: financial space

At lower wage levels (3 x GDP p.c.), the implications for financial space of paying additional required health workers appear challenging but manageable, assuming:

- appropriate public policy (including broad-based health financing reform) and
- international engagement (including targeted aid, where necessary).

If average wage levels are as high as 6 times GDP p.c., the financial implications of funding the wage gap begin to appear unrealistic in low-income countries.

At such higher wage levels, the implications for total health expenditure are also quite challenging in lower middle-income countries, again, at least initially.
Thus, an implicit background assumption involves the **effective management of wage bill growth**, not through arbitrary caps, but rather through **addressing the shortages** of health workers – as well as the persistent mismatches in skills mix and in modes of service delivery as compared with population health needs – that have been affecting low-income and lower middle-income countries, and that will continue to affect these countries in the absence of bold new measures to increase the supply of (and, where appropriate, the demand for) health workers.
Overall conclusions: fiscal and financial

1. Analysis reveals challenges in a (small) number of countries (optimistically, as few as 4-16 countries; less optimistically, as many as 69 countries) with low baseline levels of GGHE.

2. Highlights the important role of adequate general government expenditure on health in meeting the challenges of the SDGs.

3. Financial space driven primarily by assumptions about growth in overall economic output (GDP) and total health expenditure, and reveals challenges mainly in the group of 29 low-income countries, especially at higher wage levels.

4. Considering both the fiscal and financial scenarios, one concludes the number of countries requiring sustained development assistance from donor nations is limited, possibly as few as 20-30 countries.
Main messages

• Addressing the financing gap for additional needed health workers is a tractable challenge:

  ✓ from both a financial and a fiscal perspective, and

  ✓ for both donors and domestic policy makers.