Three case studies in making fair choices on the path to universal health coverage

Alex Voorhoeve*#, Tessa TT Edejer*, Lydia Kapiriri*, Ole F Norheim*, James Snowden,*
Olivier Basenya, Dorjsuren Bayarsaikhan, Ikram Chentaf, Nir Eyal, Amanda Folsom, Rozita
Halina Tun Hussein, Cristian Morales, Florian Ostmann, Trygve Ottersen, Phusit Prakongsai,
Carla Saenz, Karima Saleh, Angkana Sommanustweechai, Daniel Wikler, Afisah Zakariah.

* Lead author; # Corresponding author

Word count (excluding, abstract, references and authors' affiliations): 6,175

Abstract

The goal of achieving Universal Health Coverage (UHC) can generally be realized only in stages. Moreover, resource, capacity and political constraints mean governments often face difficult trade-offs on the path to UHC. In a 2014 report, *Making fair choices on the path to UHC*, the WHO Consultative Group on Equity and Universal Health Coverage articulated principles for making such trade-offs in an equitable manner. We present three case studies which illustrate how these principles can guide practical decision-making. These case studies show how progressive realization of the right to health can be effectively guided by priority-setting principles, including generating the greatest total health gain, priority for the worse off, and financial risk protection. They also demonstrate the value of a fair and accountable process of priority setting.

Introduction

Universal health coverage (UHC) is at the center of current efforts to strengthen health systems and improve the level and distribution of health and health services. The values that motivate this goal—improving population health, fairness in access to health services and in the distribution of health, and financial risk protection—should also determine the

path to it. In 2011, the World Health Assembly called on the World Health Organization (WHO) to provide support and advice to countries seeking to move towards UHC. The WHO Consultative Group on Equity and Universal Health Coverage was set up to develop guidance on how countries can best address issues of fairness (or equity) that arise on the path to UHC. The Consultative Group issued its report, *Making fair choices on the path to universal health coverage*, in early 2014. The report has been widely discussed. ²

After the publication of *Making fair choices*, work begun on a set of eight case studies intended to illustrate how the principles articulated in the report apply to a diverse set of cases. To develop these cases, the present group of authors, who are academics and health policy professionals, was convened by the WHO. This paper reports three of these studies.

The case studies are drawn from experience, but have been simplified to allow key ethical issues to be discussed in a compact and accessible manner. They have also been generalized, to highlight features which apply to choices faced in many countries. Consequently, though they draw inspiration from reality, they are not an evaluation of particular countries' decisions.

In what follows, we first offer a brief summary of *Making fair choices* and then discuss three cases.

Summary of Making fair choices on the path to universal health coverage

The WHO has defined UHC as "all people receiving quality health services that meet their needs without being exposed to financial hardship in paying for them." This definition leaves room for interpretation. On the understanding adopted here, given resource constraints, UHC does not require that all possibly effective services are provided to everyone. Rather, it requires that a comprehensive range of services, well-aligned with other social goals, is available to all at bearable cost.

To achieve UHC, countries must advance in at least three dimensions: expanding priority services, including more people and reducing out-of-pocket payments. In doing so, they face the following critical decisions:

i. Which services to expand first?

- ii. Whom to include first?
- iii. How to shift from out-of-pocket payment toward prepayment and pooling of funds?

They also face trade-offs between these dimensions, e.g. between covering more services or covering more people.

Making fair choices recognizes that many values are relevant to making these decisions and that their importance will depend on each country's context. Nonetheless, it also argues that, in all contexts, the following three principles should play a central role in evaluating the available alternatives:

- I. Health benefit maximization. This involves generating the greatest total healthrelated well-being gain. This is measured in terms of the total number of healthy life years added through an intervention. (One healthy life year is an amount of healthrelated well-being that is just as valuable to a person as one year in full health. For example, a person gains a healthy life year by living one extra year without health problems, or by living two extra years with health problems which give them only half the quality of life in a given year that they would have if they were fully healthy. Various measures exist for determining the health-related quality of life for a person in a given year. 4) For a given budget, one maximizes total health gain by choosing the interventions that cost the least per healthy life year gained. These are referred to as the most cost-effective interventions. (Below, we shall use multiples of a country's income per person—GDP per capita—that an intervention requires to generate one healthy life year as a measure of cost-effectiveness. The lower this number, the more cost-effective an intervention is. For example, for a given budget, an intervention costing two times GDP per capita per healthy life-year will generate three times as many healthy life-years as an intervention costing six times GDP per capita.)
- II. Fair distribution, which incorporates priority to the worse off. Coverage and use of services should be based on need. Moreover, extra weight should be given to the needs of those who are relatively disadvantaged with respect to health prospects, health outcomes, access to health care, or social and economic status (interpreted broadly to include groups facing discrimination and marginalization).

III. Fair contribution and financial risk protection. Contributions for needed coverage and services should be based on ability to pay and should not depend on individuals' health risks or the severity of their condition. Moreover, impoverishment due to ill health, associated expenditure and loss of earnings should be minimized.

There are different acceptable ways of balancing these three substantive principles' requirements. Moreover, these principles are not exhaustive. There is no simple recipe for arriving at the right decision and there may be reasonable disagreement on which decisions are right. Under such circumstances, fair procedures for setting priorities contribute to the legitimacy of decisions. *Making fair choices* therefore also endorses the following procedural principle:⁵

IV. Accountability. Citizens are not merely recipients of services, but are also agents, who should be able to play a part in evaluating, deliberating about and influencing health policy. Mechanisms for strong public accountability should therefore be set up to enable them to do so.

We shall now summarize how, drawing on these principles, *Making fair choices* develops a framework for making critical choices about expanding service coverage, including more people and shifting to pre-payment and pooling of funds.

Which services to expand first?

Health services should be sorted into three priority tiers: high, medium and low, based on their contribution towards health benefit maximization, fair distribution, financial risk protection and other relevant values. Though there are many reasonable ways of weighing these values, it is sensible to first create a partial classification on the basis of costeffectiveness (defined as cost per healthy life year gained) and then render the classification more complete by an appeal to other principles. This involves assigning high priority to highly cost-effective interventions and low priority to very cost-ineffective interventions, and let other criteria help determine the priority class of the intervention only in the (substantial) range in between these extremes. We emphasize that we do not endorse a simple, universally applicable rule. Whether a proposed intervention is relatively cost-

effective in a given context is determined by many factors, including the cost-effectiveness of interventions that one could do instead.⁶

One reason for using such a procedure is the extreme variability between the cost-effectiveness of different health services: the cost-effectiveness of interventions in the WHO Choice database, for example, is spread over four orders of magnitude. An initial, partial prioritization on the basis of cost-effectiveness can therefore help focus resources where they will do much more good. Moreover, focusing on the expansion of highly cost-effective services will often offer greatest benefits to the poor, because they disproportionately lack access to even the most cost-effective services.

Nonetheless, there are cases in which pursuing only maximal cost-effectiveness would come at a cost to the worse off (for example, because providing services to poor, remote areas is more expensive) or to financial risk protection. In such cases, the procedure permits concern for the worse off or for financial risk protection (and other relevant concerns) to determine into which priority class a service should fall.

Whom to include first?

Once sufficient progress has been made in classifying services, near-universal coverage for high-priority services should be at the top of countries' lists. Many countries have significant coverage gaps, especially among poor, rural and marginalized groups. In expanding coverage for high-priority services against a backdrop of inequality, meeting the needs of disadvantaged groups is especially important. This implies that, all else being equal, an expansion of such services to a marginalized population should take priority over an expansion to a better off population.

How to shift from out-of-pocket payments to pre-payment?

A shift from out-of-pocket payment to mandatory prepayment with pooling of funds can alleviate the risks of catastrophic health expenditure. When making this shift, countries should first reduce out-of-pocket payments for high-priority services. At the same time, countries should endeavor to make prepayments depend on individuals' ability to pay, to

ensure that everyone has effective access to the most important services. This will reduce the risk of financial distress caused by high payments or ill health.

Accountability

It is advisable to institutionalize accountability mechanisms, for example, through founding a standing national committee on priority setting. A robust system for monitoring progress and for policy evaluation is essential for accountability and for enabling learning on the path to UHC.

Applying the principles

We shall now discuss how these principles apply in three stylized cases. Although we arrive at a judgment in each case, other judgments may also be reasonable. Moreover, the correct judgment in any real-world case will depend on context-specific factors, including both particular moral considerations and constraints faced by decision-makers. These stylized case studies are therefore not intended to yield prescriptions that apply in all analogous real-world cases. Rather, they are meant to serve as discussion pieces, which can illuminate the implications of the principles endorsed in *Making fair choices* and illustrate the forms of moral and empirical reasoning required to form reasonable judgments about real-world cases.

Case 1: Cover treatment for hepatitis B cirrhosis or extend services to more people?

A middle-income country currently ensures effective access to a basic package of health services for 60% of the population. (People have effective access when they do not incur an excessive financial burden in using needed services and face no other substantial barriers in accessing them, such as distance to health services, lack of information, insufficient staffing, etc.) Lack of effective access disproportionately affects members of worse-off socioeconomic groups and, in particular, rural populations. Consequently, those who have access to the package are, on average, better off than those who lack it. The basic package consists mainly of services that are high priority on grounds of cost-effectiveness, priority to the worse off, and financial risk protection. In particular, the vast majority of currently

covered services cost up to two times GDP per capita for each healthy life year gained. Among the services not currently included is a treatment for hepatitis B cirrhosis. This disease is quite prevalent in the country and can lead to cancer or liver failure. The incremental cost of including this treatment would be six times GDP per capita for each healthy life year gained.⁸

Some new funding has become available, which the health authorities can use for one of the following:

- (1) Add the treatment for hepatitis B cirrhosis. This supplements the services provided for the population that currently has effective access to the benefit package, without extending access to other parts of the population.
- (2) Extend access to the existing package. This offers somewhat more people effective access to this package, without adding services to it.

When faced with this choice, a first step should be to estimate the relevant effects of each option. These effects will be context-specific. Nonetheless, drawing on country experiences, one can offer the following general considerations.

I. Health benefit maximization

Adding the treatment for hepatitis B cirrhosis is far less cost-effective than the existing package. Still, one must consider that extending access to the existing package may also be somewhat less cost-effective than providing the basic package to the population which currently enjoys access, because some parts of the population (particularly in rural areas) may be harder and more expensive to reach. However, given that effective access is currently only at 60% and that newly available resources will finance only a marginal expansion of the population with access, it is unlikely that the cost-effectiveness of extending access to the existing package will be substantially worse than that of the package in the status quo. Extending access to the existing package is therefore very likely to be the more cost-effective alternative and is thus likely to have a greater positive impact on population health.

II. Priority for the worse off

In determining who is worse off in terms of health, it is reasonable to consider both an individual's heath prospects and their health outcomes.¹⁰

In terms of health prospects, adding the treatment for hepatitis B cirrhosis helps people with poor prospects, because hepatitis B sufferers have a low life expectancy if untreated. However, extending access to the existing package also assists people with poor prospects, because those who currently lack effective access (mostly the rural poor) generally have worse health prospects than those who currently have such access.

In terms of health outcomes, adding the treatment for hepatitis B cirrhosis helps people avert a large individual disease burden (29 years of life lost in people who die from it). ¹¹ This is larger than many of the diseases targeted by currently covered interventions, although not as large as some life-threatening childhood illnesses, the interventions for which are covered in the current package.

Other grounds for being counted among the worse off are low social or economic status.

Those who currently lack effective access are generally of lower social or economic status.

Extending access to the existing package will therefore help those who are worse off in this respect.

In sum, priority for the worse off in terms of health prospects and outcomes may give a reason to favor *adding the treatment for hepatitis B cirrhosis*. On the other hand, priority for the worse off in terms of social and economic status and in terms of access to health services provide reasons to *extend access to the remaining population*.

III. Financial risk protection

Adding the treatment for hepatitis B cirrhosis will avert some cases of catastrophic expenditure, because the treatment is very expensive. However, extending access to the existing package for currently underserved populations is also likely to considerably reduce financial distress due to ill health and health expenditure. Health improvements can prevent out-of-pocket payments downstream and can increase the income-earning potential of the beneficiaries. Because services included in the current package are much more cost-

effective than the treatment for hepatitis B cirrhosis, one can prevent much more ill health by extending the former. One may therefore be able to offer greater financial risk protection by *extending access to the existing package*.

Recommendation

Considering all three principles, extending access to the existing package very likely has great advantages in terms of both population health and improving the lot of the socially or economically worse off. While it is a matter of judgment, these considerations seem to outweigh the especially large individual disease burden that one alleviates by adding treatment for hepatitis B cirrhosis. On balance, there is therefore a stronger case for expanding access to the existing package.

More generally, to move fairly towards UHC, a country should categorize services as high, medium, or low priority on the basis of the three principles. It should then start with measures that move it towards universal coverage for high-priority services before adding medium- or low-priority services to the package. The existing package consists mostly of high-priority services. By contrast, the treatment for hepatitis B can be properly classified as a medium or low-priority service, because its cost-effectiveness is very low and the comparatively large individual disease burden of hepatitis B is unlikely to provide a sufficiently strong countervailing consideration. (We emphasize, however, that countries should apply their own weight to these considerations.) The general rule therefore recommends extending access to the existing package.

Given the substantial interests at stake, the decision should be made through a fair priority-setting process. The health authorities should also clearly communicate the grounds for their decision to allow for accountability to the population and especially to those affected.

Case 2: Eliminate user fees for maternal services for the poorest or for everyone?

A low-income country with high rates of maternal and under-five mortality currently charges considerable user fees for health services. These fees represent substantial barriers to the use of health services for the poor and near-poor, which make up around 50% of the

population.¹⁴ The government aims to increase utilization of a package of high-priority maternal and child services by adjusting user fees for these services. Without raising new taxes, the government only has sufficient budget to abolish user fees for the poorest quintile. If user fees were to be eliminated for all, new revenue would have to be raised for the health system to remain financially sustainable. A policy consensus has been reached that this new revenue would be raised through increasing the value added tax (VAT); to protect the poor, essential items such as food would be exempted from this tax increase.

The government has the following options:

- (1) Eliminate user fees for the poorest quintile only.
- (2) Eliminate fees for all while raising VAT (with exemptions for items such as basic foodstuffs on which the poor spend a large share of their income).

When faced with a choice between these policies, the first step should be an assessment of their expected impacts. The results of this assessment will vary by country. The following analysis draws on common country experiences.

I. Health benefit maximization

If effectively implemented, *eliminating user fees for the poorest quintile* is likely to increase service utilization by members of the poorest quintile because it reduces their financial barriers to access. Some low-income countries have indeed had success in targeting the poorest for waivers of fees for services or insurance premiums. However, other countries have faced difficulties with such exemptions. In countries where a majority of the population derives its income from the informal sector, it is hard to establish household income. Other difficulties include non-uniform application of exemption criteria, verifying the identity of patients and lack of information among users about who is eligible. Moreover, those among the poor and near-poor who fall within the remaining 80% of the population for which user fees would be kept in place will continue to be deterred from seeking treatment.

Eliminating user fees for all while raising VAT avoids the drawbacks often associated with targeting and eliminates barriers to the use of some high-priority services for all. It is

therefore likely to lead to increased utilization across all income groups.¹⁷ This strategy is therefore likely to secure greater health gains.¹⁸ However, by reducing the disposable income of the poor and near-poor, the VAT increase will make it more difficult for them to improve their lives in other ways. It is therefore important to exempt goods and services that make up a large part of the poor's budget.¹⁹

II. Priority for the worse off

In terms of health outcomes, pregnant women, mothers and infants who fall severely ill or die due to lack of access to services are among the worse off. As argued above, *eliminating* user fees for all is likely to do more to increase service utilization among the poor and near-poor and thereby avert more of these large individual health burdens.

In terms of economic status, because all income groups pay the same flat fee, the current system of substantial user fees makes the poor pay a larger proportion of their income for access to needed services. ²⁰ Eliminating user fees for the poorest quintile will make health system financing fairer in this respect. Nonetheless, the remaining 80% of the population will still pay a flat fee. Among them, the payments remain disproportionately burdensome for the less well off.

If the VAT is designed to exempt goods and services traded by the poor in the informal economy, *eliminating user fees for all while raising VAT* is likely to more fairly distribute the burden of paying for the health system. Research indicates that in low-income countries, VAT can be implemented so that the better off generally pay a larger proportion of their incomes in VAT than the poor.²¹

Overall, *eliminating user fees for all* is likely to be best for the worse off in health and, if the VAT is well-designed, is reasonably likely to be best for the economically worse off, since it benefits more of the poor and near-poor.

III. Financial risk protection

Financing health systems through general taxation rather than user fees means that the cost of health care is spread across the population, rather than concentrated on those who need it. VAT is a predictable expenditure and, unlike large health expenditures, is unlikely to

impoverish citizens who pay it. Financial risk protection therefore favors *eliminating user* fees for all.

Recommendation

Considering all three principles, *eliminating user fees for all* is likely to be the fairest alternative. First, it avoids the problem of identifying the poorest quintile for free access. Second, by improving access to all poor and near-poor, it promises greater health improvements and does more to help the worse off in health. Third, it improves financial risk protection for a wider class of poor and near-poor. In pursuing this strategy, governments should keep in mind common challenges in implementation. In particular, they should provide the resources to replace the loss in fee income and to meet the anticipated increase in demand.²² Given the substantial impact of the decision on people's access to health and disposable income, fair public participation in decision-making and public accountability for the decision are required.

Case 3 :Who should decide which services are offered: the judiciary or a priority-setting institution?

An upper-middle-income country recognizes the "right to health" at the constitutional level. Disputes about what this right entails are commonly resolved through the judicial system. The Ministry of Health currently formulates a package of health interventions for which everyone is meant to be covered. It faces frequent legal challenges both from citizens who claim that they are not being provided with services to which the package entitles them and from citizens who claim that they should be provided with services not included in the package. The country has a civil law system. Litigation cases take the form of claims made by individual persons and judgments normally apply only to the claimant. Courts make decisions on the basis of the claimants' needs, often without careful consideration of social costs or competing interests. A substantial proportion of claims is for services that have been excluded from the standard benefit package on the grounds that they offer relatively little improvement in health relative to their incremental cost—for example, around 80% of

the claims for pharmaceuticals are for medicines excluded from the package for these reasons.²³

Recent years have seen a steep increase in the number of cases of right to health litigation. In a large majority of cases, the courts ruled in favor of the claimants.²⁴ Consequently, a substantial and increasing proportion of public sector health spending is devoted to complying with these rulings. This has an impact on the level of health provision for other services.²⁵ Legal costs are also large: in about half the cases, they exceed the cost of the services that were sought.²⁶ The government is exploring whether to implement reforms to address this situation.

The government is considering the following options:

- (1) *Judicial decision-making about service provision*. This involves maintaining the existing reliance on the judiciary to make decisions about specific individuals' claims to services that were initially excluded from the government-provided package.
- (2) Priority setting by a dedicated institution. This involves establishing an entity tasked with making decisions about a benefit package for all using a publicly accountable process and an explicit priority-setting mechanism based upon reasonable principles. A central task of the judiciary will then be to establish whether this process has been followed and this mechanism properly implemented—including whether individuals received services to which they are entitled as part of the agreed benefit package.

In making this decision, the first step is an assessment of the expected impacts the two approaches to priority setting in health. The results of this assessment will vary by country. The following draws on common country experiences.

I. Health benefit maximization

Judicial decision-making has the drawback that courts are generally not well placed to systematically take account of cost-effectiveness.²⁷ Indeed, at present, courts in the country do not even require robust evidence of medical effectiveness; a substantial share of claims upheld by the courts are based on weak evidence of effectiveness.²⁸ As a consequence, the

decision is often made to fund expensive services that offer limited or highly uncertain benefits. This reduces the funds available to provide proven, more cost-effective services.

Priority setting by a dedicated institution can overcome these problems, if the institution is designed to draw on relevant expertise and can be insulated from undue pressures from interest groups. An entity that makes decisions at a population level, taking into account the system's capacity, the implied trade-offs and the alternative possible uses of resources would be able to have a greater positive impact on overall population health with a given level of resources.²⁹ Health benefit maximization therefore requires that such an institution be established where the capacity exists to ensure its proper functioning.

II. Priority for the worse off

Bringing a case to court can require significant financial resources. It also requires time and knowledge of the legal system. Government and charity-provided legal support can substantially improve the ability of the poor to litigate but, in some countries, there are indications that the better off are more able to initiate litigation. A reliance on the judiciary to ensure individual coverage can therefore favor the socially and economically better off. Thus, *judicial decision-making* may exacerbate inequalities in access to health services.

Prioritizing the worse off also means giving additional weight to the interests of those who bear the greatest disease burden. However, the propensity of citizens to seek legal remedies varies with features of their situation that have little relation to their disease burden, such as income, social status and access to a lawyer. Since citizens who do not bring cases will not have their interests heard, the results are opposed to equity, which requires equal consideration of cases with the same disease burdens. *Priority setting by a dedicated institution* can avoid this inequity, if care is taken to institutionalize decision-making according to fair principles.

III. Financial risk protection

Because litigation saves some successful claimants from very large health expenditures, *judicial decision-making* provides some citizens with financial risk protection. However, as

noted, litigation is often for relatively cost-ineffective treatments.³¹ Litigation is therefore likely to divert resources from where they will prevent more illness and illness-related financial distress. Insofar as litigation is disproportionately pursued by the better off, it will also have a particular impact on resources available to meet the needs of the poor and will increase the poor's exposure to the financial risks caused by ill health and health expenditure.³²

IV. Other considerations

Judicial decision-making has implications for accountability. While courts sometimes recognize the need to take into account the aforementioned three principles (and other relevant principles), the process by which they do so is neither explicit nor systematic. 33 Generally, judges are not best-placed to weigh evidence of medical efficacy. Nor are they well-positioned to evaluate the impact of an isolated decision on the fairness of resource allocation in a health system. 4 Consequently, it may be difficult to discern a coherent rationale in the complete set of decisions by different courts. There is also no guarantee that relevantly similar cases will be treated similarly. This thwarts accountability. Priority setting by a dedicated institution, in contrast, can enhance fairness and legitimacy by making coverage decisions through mechanisms that employ reasonable principles and that allow for public accountability and participation and for like cases to be treated alike. 35

Recommendation

Priority setting by a dedicated institution—establishing an independent mechanism or body that sets priorities in an accountable and transparent manner, based on explicit, reasonable criteria—is morally preferable. The judiciary has important roles to play within this framework. First, to check that the priorities pursued by the health authorities are based on reasonable, non-discriminatory criteria which are consistently followed. Second, to ensure that citizens are granted access to those health interventions to which they are entitled under the priority-setting framework. Such recourse to legal action is a crucial way in which marginalized groups can ensure that their interests are properly served.

Despite its promise, one must acknowledge threats to this strategy's success, especially with regards to capacity building, establishing a proper independence from interest groups (such

as the pharmaceutical industry) and short-term political pressure, and earning public confidence for both its knowledge base and the impartiality of its decision-making. Countries can learn from the experience of nations that have managed these threats.³⁶ In the long run, if this reform is implemented correctly, it has the potential to significantly improve the allocation of scarce resources within the health care system. It can also contribute to greater public awareness of the unavoidability of setting priorities.

Conclusion

Because all governments face resource, institutional and political constraints, moving towards UHC involves balancing competing interests. The progressive realization of the right to health requires that such trade-offs be made fairly. The three case studies presented here show how this can be done by using the principles articulated by the WHO Consultative Group on Equity and Universal Health Coverage. These principles include (i) health benefit maximization, (ii) priority for the worse off, (iii) financial risk protection and (iv) accountability. There is no simple algorithm for using these principles (and other principles that are relevant in a particular context) to arrive at a correct decision—often, a difficult exercise in judgment is required. Nonetheless, these case studies illustrate that, by employing these principles in careful empirical and moral reasoning, it is possible to arrive at decisions that advance us towards the goal of ensuring everyone has affordable access to a comprehensive range of needed health services.

Alex Voorhoeve, PhD, is Associate Professor in the Department of Philosophy, Logic and Scientific Method, London School of Economics, Houghton Street, London, WC2A 2AE, UK

Tessa Tan-Torres Edejer, MD, is Coordinator, Coordinator of Costs, Effectiveness, Expenditure and Priority Setting, Health Systems Governance and Financing, and Health Systems and Innovation, World Health Organization, 20 Avenue Appia, CH 1211, Geneva 27, Switzerland

Lydia Kapiriri, PhD, is Associate Professor in the Department of Health, Aging, & Society, McMaster University, McMaster University, 1280 Main Street West, Hamilton, Ontario L8S 4M4, Canada

Ole Fritjof Norheim, MD, PhD is Director of Global Health Priorities in the Department of Global Public Health and Primary Care University of Bergen, Postboks 7804, N-5018 Bergen, Norway

James Snowden, MSc, is Research Analyst at Giving What We Can, Centre for Effective Altruism, Suite 2, Littlegate House, St Ebbes Street Oxford OX1 1PT, UK

Olivier Basenya, MD, MSc, is Performance-Based Financing Expert in the Ministry of Health, Avenue Pierre Ngendandumwe, Bujumbura, Burundi

Dorjsuren Bayarsaikhan, MPH, is Health Economist in the Department of Health Systems Governance and Financing, World Health Organization, 20 Avenue Appia, CH 1211, Geneva 27, Switzerland

Ikram Chentaf, MBA, is International and Intergovernmental Cooperation Program Manager in the Cooperation Division at the Ministry of Health, 3, Avenue Mohamed V, Rabat, Morocco

Nir Eyal, DPhil, is Associate Professor, Department of Global Health and Population, TH Chan School of Public Health, Harvard University, 651 Huntington Avenue, Boston, MA 02115, USA

Amanda Folsom, MPH, is a Program Director at the Results for Development Institute, 1111 19th Street, NW, Suite 700, Washington, DC 20036, USA

Rozita Halina Tun Hussein, MPH, is Deputy Director, Unit for National Health Financing,

Planning and Development Division, Ministry of Health, Block E1, E3, E6, E7 & E10, Complex

E, Federal Government Administrative Centre, 62590 Putrajaya, Malaysia

Cristian Morales, MSc, is Representative of PAHO/WHO in Cuba, Calle 4 No. 407, entre 17 y 19 Vedado, La Habana, Cuba, C.P. 10400

Florian Ostmann, MA, is a Ph.D. candidate in the School of Public Policy, University College London, 29/31 Tavistock Square, London, WC1H 9QU, UK

Trygve Ottersen, MD, PhD, is Research fellow, Department of Global Public Health and Primary Care, University of Bergen and Associate Professor, Oslo Group on Global Health Policy, Centre for Global Health, University of Oslo. Address: Department of Global Public Health and Primary Care, University of Bergen, PO Box 7804, 5020 Bergen, Norway

Phusit Prakongsai, PhD, is Director, Bureau of International Health, Ministry of Public Health, Tivanond Road, Nonthaburi 11000, Thailand

Carla Saenz, PhD, is Bioethics Regional Advisor, Pan American Health Organization, 525 Twenty-third Street, N.W., Washington, D.C. 20037, USA

Karima Saleh, PhD, is a Senior Economist in Health at the World Bank, Room j-10-119, 1818 H Street NW, Washington, DC 20433, USA

Angkana Sommanustweechai, PhD, is a Research Fellow at the Ministry of Public Health, Tivanond Road, Nonthaburi 11000, Thailand

Daniel Wikler, PhD, is Mary B. Saltonstall Professor of Ethics and Population Health,

Department of Global Health and Population, TH Chan School of Public Health, Harvard

University, 651 Huntington Avenue, Boston, MA 02115, USA

Afisah Zakariah, MD, PhD, is Director, Policy, Planning, Monitoring and Evaluation, Ministry of Health, P.O.Box M 44, Ministries, Accra, Ghana

Please address correspondence to the authors to: Alex Voorhoeve, Department of Philosophy, Logic and Scientific Method, London School of Economics, Houghton Street, London, WC2A 2AE, UK, a.e.voorhoeve@lse.ac.uk

Acknowledgements

Work on these case studies was supported by the Ministry of Foreign Affairs of Norway, the Norwegian Agency for Development Cooperation (NORAD), the Norwegian Research Council, the Pan-American Health Organization, grant AH/J006033/1 of the British Arts and

Humanities Research Council, and the Uehiro Centre for Practical Ethics. We thank Daniel Cotlear, Agnes Couffinhal, Amanda Glassman, Gina Lagomarsino, Ewan Rodgers, Hasbullah Thabrany, two anonymous referees and the Editors of this journal comments.

Competing interests: none.

1

¹ WHO. Making fair choices on the path to universal health coverage: Final report of the Consultative Committee on Equity and Universal Health Coverage (Geneva, World Health Organization, 2014).

² See A. Weale, "Making fair choices: a symposium," *Health Economics, Policy and Law* 11 (2016): pp. 67-69 and "The path from nowhere?" *Health Economics, Policy and Law* 11 (2016), pp. 97-102; A. T. Woldemariam, "The administrator's perspective," *Health Economics, Policy and Law* 11 (2016), pp. 79-83; B. E. Rumbold and J. Wilson, "Reasonable disagreement and the generally unacceptable: a philosophical analysis of *Making fair choices*," *Health Economics, Policy and Law* 11 (2016), pp. 91-96; P. Littlejohns and K. Chalkidou, "Information will be the key to successful implementation", *Health Economics, Policy and Law* 11 (2016), pp. 85-89; A. Voorhoeve, T. Ottersen, and O. F. Norheim, "Response to Our Critics," *Health Economics, Policy and Law* 11 (2016), pp. 103-111; and M. Chan, "Making fair choice on the path to universal health coverage," *Health Systems and Reform* 2 (2016), pp. 5-7.

³ WHO. *Universal health coverage: supporting country needs* (Geneva: World Health Organization 2013).
⁴ For an overview of methods of measuring health-related quality of life and cost-effectiveness, see G. Bognar and I. Hirose. *The Ethics of Health Care Rationing: An Introduction* (Abingdon: Routledge 2014).

⁵ N. Daniels and J. E. Sabin. "Accountability for reasonableness: an update." *BMJ* 337 (2008), pp. a1850.

⁶ J. Ochalek, J. Lomas, and K. Claxton. "Cost per DALY averted thresholds for low- and middle-income countries: evidence from cross-country data," *CHE Research Paper 122*, University of York, (2015).

⁷ World Health Organization. Cost effectiveness and strategic planning. http://www.who.int/choice/cost-effectiveness/en/2014 [Accessed 28 April 2014].

⁸ F. Kanwal, M. Farid, P. Martin, G. Chen, I. M. Gralnek, G.S. Dulai, and B.M. Spiegel. "Treatment alternatives for hepatitis B cirrhosis: a cost-effectiveness analysis," *The American journal of gastroenterology* 101 (2006), pp. 2076-2089; N. Tsai, L. Jeffers, L. Cragin, S. Sorensen, W. Su, L. Rosenblatt, H. Tang, T. Hebden, and T. Juday. "Cost-effectiveness of entecavir versus adefovir for the treatment of chronic hepatitis B in patients with decompensated cirrhosis from a third-party US payer perspective," *Clinicoeconomics and outcomes research* 4 (2012), p. 227-235.

⁹ See, e.g. J. Uddin, T. Perez-Koehlmoos, N. Chandra Saha, and I. Ansary Khan. "Child immunization coverage in rural hard-to-reach areas of Bangladesh," *Vaccine* 28 (2010), pp. 1221-1225.

¹⁰ See, e.g. A. Voorhoeve and M. Fleurbaey. "Priority or Equality for Possible People?" *Ethics* 126 (2016), in press.

press.

11 WHO. Global Burden of Disease Database. http://www.who.int/healthinfo/global_burden_disease/en/ (data from 2010 edition, access December 2015).

¹² J. Lu, A. Xu, J. Wang, L. Zhang, L. Song, R. Li, S. Zhang, G. Zhuang, and M. Lu. "Direct economic burden of hepatitis B virus related diseases: evidence from Shandong, China." *BMC health services research* 13 (2013): p. 37.

¹³ WHO, 2014 (see note 1).

¹⁴ L. Gilson and D. McIntyre. "Removing user fees for primary care in Africa: the need for careful action," *BMJ* 331 (2005), pp. 762-765.

¹⁵ A. Kalk, N. Groos, J. C. Karasi, and E. Girrbach. "Health systems strengthening through insurance subsidies: the GFATM experience in Rwanda." *Tropical Medicine and International Health* 15 (2010), pp. 94-97.

¹⁶ See D. McIntyre, M. K. Ranson, B. K. Aulakh, ad A. Honda. "Promoting universal financial protection: evidence from seven low- and middle-income countries on factors facilitating or hindering progress." *Health Research and Policy Systems* 11 (2013), p. 36; T. Mkandawire. *Targeting and universalism in poverty reduction*. (Geneva, United Nations Research Institute for Social Development, 2005); D. T. Jamison, L. H. Summers, G. Alleyne, K. J. Arrow, S. Berkley, A. Binagwaho, F. Bustreo, D. Evans, R. G. Feachem, J. Frenk. "Global health 2035: a world converging within a generation," *The Lancet* 382 (2013), pp. 1898-1955; S. Witter, D. K. Arhinful, A. Kusi, and S. Zakariah-Akoto. "The experience of Ghana in implementing a user fee exemption policy to

provide free delivery care," *Reproductive health matters* 15 (2007), pp. 61-71; P. Apoya and A. Marriott. *Achieving a shared goal: free universal health care in Ghana*. (Oxford, Oxfam International, 2011); J. Akazili, J. Gyapong, and D. McIntyre. "Who pays for health care in Ghana?" *International Journal for Equity in Health*, 10/26 (2011), DOI: 10.1186/1475-9276-10-2.

- ¹⁷ Witter et al. (see note 16).
- ¹⁸ M. Lagarde and N. Palmer. *The impact of user fees on access to health services in low- and middle-income countries*. The Cochrane Database of Systematic Reviews, 2011, http://onlinelibrary.wiley.com/doi/10.1002/14651858.CD009094/full
- ¹⁹ R. M. Bird, P.-P. Gendron. *The VAT in developing and transitional countries.* (New York and Cambridge: Cambridge University Press, 2007).
- ²⁰ Akazili et al. (see note 16).
- ²¹ Ibid. and Bird and Gendron (see note 19).
- ²² Gilson and McIntyre (see note 14).
- L. Reveiz, E. Chapman, R. Torres, J. F. Fitzgerald, A. Mendoza, M. Bolis, O. Salgado. "Right-to-health litigation in three Latin American countries: a systematic literature review." Revista Panamericana de Salud Pública 33 (2013), pp. 213-222, on p. 215.
 L. Reveiz et al. (see note 22); O. F. Norheim and S. Gloppen. "Litigating for medicines: How can we assess
- ²⁴ L. Reveiz et al. (see note 22); O. F. Norheim and S. Gloppen. "Litigating for medicines: How can we assess impact on health outcomes?" In A. E. Yamin and S. Gloppen (eds) *Litigating health rights: can courts bring more justice to health?* (Cambridge: Harvard University Press, 2011), pp. 304-330; and D. Wang, "Right to Health Litigation in Brazil: The Problem and the Institutional Responses," *Human Rights Law Review* 15 (2015), pp. 617-641.
- pp. 617-641.

 ²⁵ R. Iunes, L. Cubillos-Turriago, and M.-L. Escobar. "Universal health coverage and litigation in Latin America," *Journal of Health Organization and Management* 26 (2012), pp. 390-406; and O. L. M. Ferraz. "Health inequalities, rights and courts: the profile and impact of the "judicialization of health" in Brazil. In A. E. Yamin and S. Gloppen (eds) *Litigating health rights: Can courts bring more justice to health?* (Cambridge, MA: Harvard University Press, 2011), pp. 180-201.
- ²⁶ Reveiz et al. (see note 23).
- ²⁷ Wang (see note 24).
- ²⁸ Reveiz et al. (see note 23); Norheim and Gloppen (see note 24); and Ferraz (see note 25).
- ²⁹ Norheim and Gloppen (see note 24).
- ³⁰ T. M. G. Menicucci and J. A. Machado. "Judicialization of health policy in the definition of access to public goods: individual rights versus collective rights," *Brazilian Political Science Review (Online)* 4 (2010), pp. 33-68; O. L. M. Ferraz. "The right to health in the courts of Brazil: Worsening health inequities?" *Health and Human Rights* 11 (2009), pp. 33-45; and P. Bergallo. "Courts and the right to health: Achieving fairness despite 'routinization' in individual coverage cases?" In Yamin and Gloppen (see note 24), pp. 43-75.
- ³¹ Menicucci; Ferraz (see note 30).
- ³² Ferraz (see note 25).
- ³³ D. Wang. "Courts and health care rationing: the case of the Brazilian Federal Supreme Court," *Health Economics, Policy and Law* 8 (2013), pp. 75-93.
- ³⁴ Norheim and Gloppen (see note 24).
- ³⁵ N. Daniels, T. Porteny, and J. Urritia. "Expanded HTA: Enhancing fairness and Legitimacy," *International Journal of Health Policy and Management* 5 (2015), pp. 1-3.
- ³⁶ A. Glassman and K. Chalkidou. *Priority-Setting in Health: Building Institutions for Smarter Public Spending.* Washington DC, Center for Global Development, 2012, especially chapter 6.
- ³⁷ B. Rumbold, R. Baker, O. Ferraz, S. Hawkes, C. Krubiner, P. Littlejohns, O. F. Norheim, T. Pegram, A. Rid, S. Venkatapuram, A. Voorhoeve, D. Wang, A. Weale, J. Wilson, A. E. Yamin, and P. Hunt, "Universal Health Coverage, Priority Setting and the Human Right to Health," manuscript, available on http://personal.lse.ac.uk/voorhoev