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Framework for assessing governance of the health system in developing countries: Gateway to good governance

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ABSTRACT

Governance is thought to be a key determinant of economic growth, social advancement and overall development, as well as for the attainment of the MDGs in low- and middle-income countries. Governance of the health system is the least well-understood aspect of health systems. A framework for assessing health system governance (HSG) at national and sub-national levels is presented, which has been applied in countries of the Eastern Mediterranean.

In developing the HSG framework key issues considered included the role of the state vs. the market; role of the ministries of health vs. other state ministries; role of actors in governance; static vs. dynamic health systems; and health reform vs. human rights-based approach to health. Four existing frameworks were considered: World Health Organization's (WHO) domains of stewardship; Pan American Health Organization's (PAHO) essential public health functions; World Bank's six basic aspects of governance; and United Nations Development Programme (UNDP) principles of good governance. The proposed HSG assessment framework includes the following 10 principles—*strategic vision*, *participation and consensus orientation*, *rule of law*, *transparency*, *responsiveness*, *equity and inclusiveness*, *effectiveness and efficiency*, *accountability*, *intelligence and information*, and *ethics*.

The framework permits 'diagnoses of the ills' in HSG at the policy and operational levels and points to interventions for its improvement. In the case of Pakistan, where the framework was applied, a positive aspect was the growing participation and consensus orientation among stakeholders, while weaknesses were identified in relation to strategic vision, accountability, transparency, effectiveness and efficiency and rule of law.

In using the HSG framework it needs to be recognized that the principles are value driven and not normative and are to be seen in the social and political context; and the framework relies on a qualitative approach and does not follow a scoring or ranking system. It does not directly address aid effectiveness but provides insight on the ability to utilize external resources and has the ability to include the effect of global health governance on national HSG as the subject itself gets better crystallized.

The improved performance of the ministries of health and state health departments is at the heart of this framework. The framework helps raise the level of awareness among policymakers of the importance of HSG. The road to good governance in health is long and uneven. Assessing HSG is only the first step; the challenge that remains is to carry out effective governance in vastly different institutional contexts.

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1. Introduction

Governance is thought to be a key determinant of economic growth, social advancement and overall development, as well as for the attainment of the Millennium Development Goals in low- and middle-income countries. The former Secretary General of the United Nations, Kofi Annan's statement that "good governance is perhaps the single most important factor in eradicating poverty and promoting development" is an apt reflection its need [1]. Health is the subject of Transparency International's *Global corruption report 2006*, which acknowledges the vast scale of corruption in rich and poor countries however the poor are disproportionately affected, thus reinforcing the need for good governance for better health outcomes [2].

Governance is not about governments alone. United Nations Development Programme (UNDP) defines governance as the exercise of political, economic and administrative authority in the management of a country's affairs at all levels. Governance comprises the complex mechanisms, processes and institutions through which citizens and groups articulate their interests, mediate their differences and exercise their legal rights and obligations.

Despite the growing discourse on governance [3–8], the literature on governance of the health system is not particularly abundant. Health systems governance concerns the actions and means adopted by a society to organize itself in the promotion and protection of the health of its population [9]. In the broadest sense, this includes the institutions – the formal and informal rules that shape behavior – and the organizations that operate within these rules to carry out the key functions of a health system [10]. The *World health report 2000* proposed stewardship as one of the four main functions of the health system, along with financing, creating and managing resources, and service delivery [11]. It recognized stewardship as the function of the government responsible for the welfare of the population and concerned about the trust and legitimacy with which its activities are viewed by the citizenry [11–14]. Good stewardship is thus at the essence of good governance in health. However, assessing governance and stewardship has been elusive.

2. Purpose and rationale

The purpose of this article is to present a framework developed to assess the governance of the health system at national and sub-national levels. In doing so, the paper first summarizes contemporary issues in relation to the governance of the health system. Second, the different frameworks for the assessment of health system governance are reviewed. Third, the proposed health system governance principles and the assessment framework are presented. Fourth, the findings of the application of the health system governance assessment framework in Pakistan are shared. Finally, the paper concludes with the appraisal and policy implications of the health system governance framework.

Assessment of governance as the gateway for promoting good governance of the health system is a key consideration that underpins this effort. Governance influences all other health system functions, thereby leading to improved performance of the health system and ultimately to better health outcomes. The proposed framework is currently being tested as an instrument for the assessment and comparative analysis of governance of the health system across several countries.

3. Contemporary issues in the governance of the health system

Health systems governance is currently a critical concern in many countries because of increasing demand to demonstrate results and accountability in the health sector, at a time when increasing resources are being put into health systems where institutional contexts are changing rapidly. An assessment framework will need to address a number of key issues summarized below.

3.1. Role of the state vs. the market in health

In many low- and middle-income countries, there has been a dramatic spread in market relationships in the health sector, with a substantial portion of health expenditures and health care transactions involving out-of-pocket payments [15]. Pluralistic health systems have developed in most countries, with a wide variety of providers of health-related goods and services, even if many governments remain focused on the public sector [16]. In many cases, the growth of health-related markets has followed the rapid expansion of markets in other sectors and is associated with economic growth. In other countries, the growth of health-related markets has been linked to the inability of the state to provide services. A common problem is that markets have often grown faster than the capacity of the state and other key actors to set up appropriate regulatory regimes to influence their performance. The result is that many health market transactions take place outside of a legal regulatory framework, and are not supportive of public policy priorities. Assuming that governments have the responsibility for the health of their people, which can be fulfilled only by the provision of adequate health and social measures [17], it is easy to end up in normative discussions about the appropriate roles of the public and private sector in delivering health services [18]. For some, the recognition of the role of markets in the provision of health-related goods and services is politically dangerous, and could open the possibilities for economically powerful actors to dominate the health sector (e.g. pharmaceuticals companies, private hospital conglomerates). The poor are particularly dependent on health care from inadequately trained providers, or from barriers to quality care due to payments due at both public and private health facilities. For health policymakers a vexing question has been to agree on the appropriate sense of balance between governments' direct control over health interventions on the one hand and application of free market principles on the other. While the state has a definite role to play in health care, as the financier, organizer and regulator of health services, the extent to

which it should directly involve itself with the provision of health care is less certain, which has a bearing on how the health system is governed. Rather than relying on a strictly normative approach, an alternative would involve understanding the different market actors (e.g. government, for-profit and not-for-profit providers, professional bodies, informal networks), assessing the institutional context (the incentives, formal and informal rules that influence behavior), and applying strategies that aim for long-term institutional change, such as through the ability to manage resources, inform different actors, and different ways to enforce rules.

3.2. Role of the ministries of health vs. other state ministries

Ministries of health (MoH) in most developing countries have a major role as providers of health services, even as private health transactions are growing. Advocacy for public provision of services such as the provision of clean water, environmental sanitation, and food and nutrition is often stated in principle as being within the scope of MoH but in practice it is a casualty of day to day service demands. This raises an important issue: if the MoH limit their role to health care interventions then who is ultimately responsible for the overall health of the population? Other state ministries are not only responsible for the delivery of public services, but also for setting the enabling conditions to increase accountability of services providers (in both public and private sectors), and to enhance the rule of law, both of which are essential to peoples' health. Assessment of health system governance should tackle health in its holistic sense and not restrict itself to provision of health services.

3.3. Actors in governance—public sector, civil society and the private sector

Governance is a function of the state yet it cannot function without all actors across the health system—communities, civil society, private providers, membership organizations, public health functionaries and development partners. The increasingly complex set of international actors and institutions is bringing into play how global health governance can influence health system governance within countries. Good governance is determined by the extent to which state functionaries value the views of these stakeholders. Whether the civil servants or policymakers believe in 'ruling' or 'serving' the population has a bearing on the quality of governance. Similarly, the policy of coercive regulation vs. supportive facilitation of the non-state sector can make the difference as to how it could be harnessed to achieve public health goals. There is a growing recognition that effective regulatory structures are not simply a function of state enforcement, but of partnerships between the state and other stakeholders [19,20]. Such partners may involve government, professional providers, citizens groups, or pharmaceuticals industry. Since such arrangements are also susceptible to narrow interests, there is a need to understand the political context in which such arrangements are possible, and the potential role of the state or other institutions in mediating conflicts between other actors in the interests of the public.

3.4. Static vs. dynamic health systems

Health systems are evolving and have to continuously respond to the changing demographic and epidemiologic profiles of populations; rising expectations of a more educated clientele; a fast growing private health sector; rapid changes in medical technology; increasing influence of globalization; and the desire to rapidly expand services and achieve universal health coverage. The implications of dynamic or adaptive systems are that blueprints do not work well, especially if transplanted from elsewhere, and that rules created at one time may lose their effectiveness over time. Often governments are unable to adjust quickly to these changing realities in terms of their new responsibilities. Governance framework should be resilient to be able to assess the demands placed on these 'organic' health systems.

3.5. Health reform vs. human rights-based approach to health

Structural and management reforms are at the center of many health reforms, whereas advocacy for health as a basic human right is at the heart of a "rights-based approach". While the two approaches are not mutually exclusive, the types of reforms promoted by the World Bank and many international development partners since the 1980s has focused on reforms to the financing, management, and structure of health systems [21,22]. Many countries have and continue to implement these type of health reforms to improve health system performance.

Protecting and promoting health and respecting, protecting, and fulfilling human rights are inextricably linked [23]. Health is enshrined as a basic human right in the constitution of many countries, and most are a signatory to at least one human rights treaty that includes the right to health and a number of rights related to conditions necessary for health. Management and rights-based approaches are not mutually exclusive, and should be considered by any health system governance framework.

It is important to delineate the boundaries of the health system governance framework. In addition to recognizing that rules can be formal or informal, it is also important to recognize that the governance mechanisms can be situated different levels. This includes the local/sub-national (e.g. district health authority), national (e.g. Ministry of Health), regional (e.g. Pan American Health Organization), international (e.g. World Health Organization) and the global levels. Global health governance has been the subject of ongoing debate among the academia [9,24–26]. At the other end of the governance spectrum is the area of clinical governance, which is a framework through which National Health Service organizations in the United Kingdom are accountable for continuously improving the quality of their services and safeguarding high standards of care by creating an environment in which excellence in clin-

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ical care will flourish [27]. The current effort focuses on the governance of the health system at the national and sub-national levels, which while related to both global health and clinical governance is an important building block that on its own can influence health system performance.

4. Existing frameworks for assessing governance

Currently, a framework for assessing health system governance in countries does not exist. Prior to developing such a framework we extensively reviewed four frameworks developed for the analysis and measurement of national governance, which are briefly explored in this section. These are: (i) World Health Organization's (WHO) domains of stewardship; (ii) Pan American Health Organization's (PAHO) essential public health functions (EPHF); (iii) World Bank's six basic aspects of governance; (iv) UNDP's principles of good governance.

4.1. World Health Organization's (WHO) domains of stewardship

The *World health report 2000* recognizes stewardship as a function of the health system akin to governance. It identifies several basic tasks of stewardship: formulating health policy – defining the vision and direction; exerting influence – approaches to regulation; and collecting and using intelligence, and attributes the task of stewardship primarily to the MoH [11]. It also acknowledges that much conceptual and practical discussion is needed to improve the definition and measurement of how well stewardship is actually implemented in different settings. The domains of stewardship have subsequently been characterized as shown in Box 1 [14].

4.2. Pan American Health Organization's (PAHO) essential public health functions

The Pan American Health Organization proposed the concept of the EPHF [28]. The principle of public health that supports the definition of EPHF is that of collective intervention by the state and civil society to protect and improve health of the people. The 11 EPHF constitute an important component of the responsibilities of the state in health and are part of its steering role (Box 1). Attempts have been made to undertake performance measurement of essential public health functions at the national level and test the instruments in selected countries of the region [29].

4.3. World Bank's (WB) six basic aspects of governance

The World Bank has been among the leading agencies in raising awareness of the importance of governance in economic development, in developing methodological approaches to its measurement and in ranking countries on the basis of governance performance [4,7,30]. The World Bank's governance indicators are organized into three clusters corresponding to the six basic aspects of governance (Box 1) [31]. The governance results are presented as summary measures which are used to rank and compare performance between countries.

4.4. UNDP's principles of good governance

The UNDP enunciates a set of principles of good governance for which there is evidence that these have a claim to universal recognition [3,5]. These five principles have been further elaborated into nine thematic areas (Box 1). These principles are in some sense a combination of the results of power or the policy goals, as well as, about how well power is exercised or the policy processes. Some principles emphasize the 'ends' such as direction, fairness and performance and the others the 'means' for achieving them such as legitimacy and voice and accountability.

4.5. Appraisal of existing governance frameworks

The terms stewardship and governance are often used interchangeably by many, however, the translation of the word stewardship in many languages has created confusion. In this article, we have incorporated many of the domains of stewardship in the proposed framework, however we prefer the term *governance* as one of the functions of the health system as it offers several advantages: (i) performance of the health system is dependent on overall governance within a country and not just on the stewardship function of the health system; (ii) governance is better understood by those who work within the health system and those outside and who have a major influence on its overall performance; and (iii) many international development agencies and institutions have delineated the characteristics and attributes of governance that are well understood and have been used for its assessment [4–6,31]. This does not mean that the word governance is not without problems as many associate it primarily with managing corruption. The proposed health system governance (HSG) framework sets forth a set of principles and its operational elements that permit its assessment without restricting it to corruption.

All four frameworks have elements that are useful but none can adequately be used for assessing HSG. For instance, the stewardship framework does not explicitly mention some governance principles such as the rule of law, effectiveness and efficiency, and equity. More important, there is no accompanying instrument that would allow measuring the domains of stewardship in countries. Measuring PAHO's EPHF helps assess the performance of the national health authority or the MoH and indirectly ascertains the quality of health system governance. However, EPHF per se do not assess HSG and hence can not be used for this purpose.

The WB framework is robust in terms of measuring governance and correlating it with development outcomes, its extrapolation to assess governance in health has to be taken advantage of. The World Bank governance indicators have been used to suggest measures to tackle the level of corruption in public health care systems [32,33]. The effort reinforces the need for a framework that allows for a systematic and comprehensive approach to assessing all

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Box 1: Possible frameworks for assessing health system governance

WHO's domains of stewardship [14]	*PAHO's essential public health functions* [28,29]	
	Function	Description
Generation of intelligence	EPHF 1	Monitoring evaluation and analysis of the health situation of the population
Formulating strategic policy direction	EPHF 2	Public health surveillance, research and control of risks
Ensuring tools for implementation: powers, incentives and sanctions	EPHF 3	Health promotion
Building coalition/building partnership	EPHF 4	Social participation in health
Ensuring a fit between policy objectives and organizational structure and culture	EPHF 5	Development of policies and institutional capacity for planning and management in public health
Ensuring accountability	EPHF 6	Strengthening the institutional capacity for regulation and enforcement in public health
	EPHF 7	Evaluation and promotion of equitable access to necessary health services
	EPHF 8	Human resource development and training in public health
	EPHF 9	Quality assurance in personal and population-based health services
	EPHF 10	Research in public health
	EPHF 11	Reducing the impact of emergencies and disasters on health (prevention, mitigation, preparedness, response and rehabilitation)

World Bank's governance indicators—three clusters and six basic aspects of governance [31]	*UNDP's five principles of good governance* [3]	
	Principles	Thematic areas
Process by which those in authority are selected and replaced	Legitimacy and voice	Participation
Voice and accountability		Consensus orientation
Political instability and violence	Direction	Strategic vision
Ability of the government to formulate and implement sound policies	Performance	Responsiveness
Government effectiveness		Effectiveness and efficiency
Regulatory burden	Accountability	Accountability (decision-makers in government, the private sector and civil society organizations)
Respect of citizens and the state for institutions which govern their interaction		Transparency
Rule of law	Fairness	Equity and inclusiveness
Graft (control of corruption)		Rule of law

elements of HSG, and to suggest well-directed interventions for its improvement at the national and sub-national levels.

In our review we concluded that the UNDP governance principles provided a useful basis for developing an analytical framework for assessing HSG, permitted a direct approach to its assessment, and allowed developing tools for in-depth assessment at the national and sub-national levels. There was however a need to adapt the UNDP framework to include additional governance principles due to certain characteristics peculiar to health. The subsequent section describes the framework developed for assessing HSG.

5. Principles and framework for assessing health system governance

The framework for assessing HSG while adapting the widely accepted UNDP definition and the principles of governance [3], has incorporated key parameters relevant to health as articulated in the WHO's domains of stewardship, PAHO's essential public health functions and World Bank's aspects of governance.

5.1. Principles

The 10 principles proposed for the analytical framework for assessing governance of the health system are strategic vision, participation and consensus orientation, rule of law, transparency, responsiveness, equity and inclusiveness, effectiveness and efficiency, accountability, intelligence and information and ethics (Table 1).

Intelligence and information and *ethics* have been included as two additional principles and *participation and consensus orientation* have been merged into one. The rationale for including intelligence as a separate principle was the unique nature of asymmetry of information in health which demands a specific assessment of its creation, flow and use, affording it a higher priority. Any framework on HSG cannot be complete without considering the ethical aspects of health care and research. The commonly accepted principles of health care ethics include respect for autonomy, nonmaleficence, beneficence and justice [34]. The recently developed UK Biobank ethics and governance framework is an acknowledgment of the importance attached to ethics in the framework on HSG [35]. The reason for merging consensus orientation with participation

Table 1
Health system governance principles

Governance principle	Explanation
Strategic vision	Leaders have a broad and long-term perspective on health and human development, along with a sense of strategic directions for such development. There is also an understanding of the historical, cultural and social complexities in which that perspective is grounded
Participation and consensus orientation	All men and women should have a voice in decision-making for health, either directly or through legitimate intermediate institutions that represent their interests. Such broad participation is built on freedom of association and speech, as well as capacities to participate constructively. Good governance of the health system mediates differing interests to reach a broad consensus on what is in the best interests of the group and, where possible, on health policies and procedures
Rule of law	Legal frameworks pertaining to health should be fair and enforced impartially, particularly the laws on human rights related to health
Transparency	Transparency is built on the free flow of information for all health matters. Processes, institutions and information should be directly accessible to those concerned with them, and enough information is provided to understand and monitor health matters
Responsiveness	Institutions and processes should try to serve all stakeholders to ensure that the policies and programs are responsive to the health and non-health needs of its users
Equity and inclusiveness	All men and women should have opportunities to improve or maintain their health and well-being
Effectiveness and efficiency	Processes and institutions should produce results that meet population needs and influence health outcomes while making the best use of resources
Accountability	Decision-makers in government, the private sector and civil society organizations involved in health are accountable to the public, as well as to institutional stakeholders. This accountability differs depending on the organization and whether the decision is internal or external to an organization
Intelligence and information	Intelligence and information are essential for a good understanding of health system, without which it is not possible to provide evidence for informed decisions that influences the behavior of different interest groups that support, or at least do not conflict with, the strategic vision for health
Ethics	The commonly accepted principles of health care ethics include respect for autonomy, nonmaleficence, beneficence and justice. Health care ethics, which includes ethics in health research, is important to safeguard the interest and the rights of the patients

follows from the logic of including intelligence. In the case of health, participation and consensus orientation in the process of decision-making are important in their own right. However, it is the compilation, synthesis and comprehension of information for decisions that are the defining factors for these two principles.

5.2. Assessment levels

MoH being the principal governing body of the health system has the mandate for health policymaking, planning, regulation, monitoring and evaluation and for ensuring access to essential health services. There are thus two levels—health policy formulation and policy implementation. In some countries, the MoH is responsible for both, while in others implementation of health services falls under the jurisdiction of sub-national (state, provincial, district or local) governments. In addition to the MoH there is a level above that influences HSG. The national government through its broad social and economic policies, legislative function, civil service reforms, and by its political (in)stability influences health system governance. The analytical framework thus poses the broad and specific questions and items for each principle at three levels—*the national level*, *the health policy formulation level*, and *the policy implementation level*.

Each governance *principle* has been disaggregated into *domains* to capture as best as possible its full meaning and to express it in more operational terms. From the various *domains* are derived *broad questions*. The *broad questions* are translated into *specific questions and items* that form the basic instrument for data collection. The logic of the framework and the sequencing of questions are illustrated in Box 2. The framework asks altogether 63 broad questions across the 10 governance principles (Table 2) ranging from contextual, descriptive, process related and outcomes related.

The framework includes analysis of the organizational structure of the MoH and sub-national health departments and their relationship with the stated roles and functions. This is useful to determine the extent to which the organizational structure is aligned with the governance and other functions of the health system.

5.3. Sources of information

The sources of information for assessing HSG are categorized into published and unpublished reports and information collected through interviews. The information acquired through interviews is important as it depicts different points of view for a composite picture to emerge and helps corroborate information retrieved from documents. A wide range of stakeholders should be interviewed such as national and MoH policymakers, mid- and senior managerial staff of the MoH or its component departments, civil society organizations, international development agencies, academic institutions, media personnel and direct community representatives. A list of possible sources of

Box 2: Analytical framework for assessing strategic vision

The governance **principle** being assessed is *strategic vision*:

The **domain** is long-term vision:

The **broad question** at the:

- *National level*. What are the broad outlines of economic policy of the government;
- *Health policy formulation level*. Whether there is a long-term vision (policy) for health;
- *Policy implementation level*. Whether the implementation mechanisms are in line with the stated objectives of health policy.

The specific question at the:

- *National level*. Where does health rank in the overall development framework by resource allocation, and as percentage of total government expenditure and as percentage increase in expenditure;
- *Health policy formulation level*. Is there a national health policy/strategic plan available stating objectives, strategies with a time frame and resources allocated;
- *Policy implementation level*. What priority programs are being implemented and how do they correspond to the policy objectives.

documents and persons to be interviewed to assess each of the 10 principles of health system governance is shared *a priori* with the country investigators along with the framework.

6. Applying the health system governance framework in a country setting

The analytical framework has been used to assess HSG in some low- and middle-income countries the results of which are being shared in a separate paper. The primary purpose of this section is to illustrate its applicability in a country setting. The HSG matrix of Pakistan for all 10 principles at the three assessment levels is illustrated in Table 3. The assessment was undertaken by a reputed civil society organization, the *Heartfile* in 2006, and is based on an extensive review of documents and interviews with stakeholders from the public sector, international development agencies, academic institutions and civil society organizations. The HSG assessment framework was successfully administered in Pakistan without major problems. Indeed the independence and credibility of the assessment team was critical to successfully undertaking such an assessment.

The assessment has identified some positive elements and several shortcomings. The positive aspects at the central level include the presence of social safety nets for the poor and the vulnerable; and increasing role of the media and NGOs in protecting people's health. At the health policy formulation level, preparation of draft bills to update health legislation; emerging role of the Pakistan Health Policy Forum as a civil society organization; and the stable turnover of health policymakers during the last six years are positive elements. The aspects of good governance at the policy implementation level are increasing public–private interaction; and the preventive programs, especially the Lady Health Worker program for rural areas which has a strong community as well as an equity dimension.

The weaknesses in HSG offset its strengths. At the central level the culture of accountability has yet to take roots; parallel streams of bureaucracy and technocracy do not work in unison; and the lack of consumer protection procedures denies and delays justice. At the health policy formulation level the achievement of short-term objectives overrides the need for strategic vision and the focus on health outcomes; health equity is not high on the policy agenda; mechanisms to monitor transparency of decisions are not well developed; decisions are often tinged with personal preferences and are not evidence-based; legislation on minimum standards of care is absent with lax regulation and enforcement capacity; policy, planning, health information and surveillance units are weak; there are delays in release and utilization of funds; accountability systems focus on procedure instead of performance; and bioethics is not on the policy radar of MoH.

The governance issues at the policy implementation level are a reflection of the issues at the policy level. There is minimal protection against exploitation by providers for over supply of services to maximize their incomes or against medical errors incurred in providing these health services; gaps exist in policy and practice for recruitment, posting and promotion of staff and rules favor seniority over meritocracy; instruments for evaluation of staff performance are improperly used; responsiveness of public sector health services is not monitored; physicians turned managers lack understanding of administrative matters while bureaucrats lack health orientation; physicians and allied staff extensively engage in private practice outside and often within public institutions; support systems function inefficiently; and a code of ethics exists with the professional associations but is not practiced.

A summary of where Pakistan stands in terms of the HSG principles suggests that there is growing *participation and consensus orientation* across the three levels of assessment. The weaknesses identified in HSG assessment were particularly in relation to the principles of *strategic vision*, *accountability*, *transparency*, *effectiveness and efficiency* and *rule of law*.

The health system governance matrix of Pakistan suggests interventions in several areas such as the: (i) formulation of evidence-based national health policy, through wide participation of stakeholders, that provides long-term strategic vision; (ii) reorganization of the federal MoH that has well functioning information and surveillance unit, and policy and planning units; (iii) development and enforcement of health legislation and regulation that protect against supplier-induced-demand or for protection against adverse events during the provision of personal health services; (iv) capacity development of health professionals and bureaucrats and measures to improve synergy among them; and (v) raising the level and importance of bioethics while formulating polices, planning for services or commissioning research.

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Table 2
Analytical framework for assessing health system governance

Principle	Domains	Assessment level	Broad questions
Strategic vision	Long-term vision; comprehensive development strategy including health	National	What are the broad outlines of economic the policy of the government? Has health been recognized as a basic human right in the constitution of the country? What is the importance of heath in the overall development framework? How does health rank in priority in the overall development and plan of the country? What is the state's responsibility in the provision of health care and health?
		Health policy formulation	Is there a long-term vision and policy for health? Is there a national health policy/strategic plan stating objectives to be achieved with time frame and resources?
		Policy implementation	Are the implementation mechanisms in line with the stated objectives of health policy? What is the extent of implementation of the health policy?
Participation and consensus orientation	Participation in decision-making process; stakeholder identification and voice	National	Are the private sector, civil society, line departments and other stakeholders consulted in decision-making? How are decisions related to health finalized—cabinet, parliament, head of government or state?
		Health policy formulation	How are the inputs solicited from stakeholders for health policy? How does government reconcile the different objectives of various stakeholders in health decision-making? Are other state ministries involved in by the MoH in policies and programs to tackle health determinants?
		Policy implementation	What is the level of decentralization in decision-making? What is the extent of community participation in health services provision?
Rule of law	Legislative process; interpretation of legislation to regulation and policy; enforcement of laws, and regulations	National	Who initiates or where are initiated laws relevant to health? Are laws/regulations related health service provision, infrastructure, technology, human resources, pharmaceuticals in place? How are the laws translated into rules, regulations, and procedures?
		Health policy formulation	Is the MoH consulted for laws/regulations which relate to health? Does the MoH consult other line departments for laws/regulations pertaining to health? What is the relationship of MoH to the regulating bodies? What is the capacity of MoH for contracting, regulating, accrediting, licensing?

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Table 2 (*Continued*)

Principle	Domains	Assessment level	Broad questions
		Policy implementation	What procedures are in place for redressing grievances of (a) consumers, (b) contractors? How are the relevant laws enforced? Are tools/instruments for various functions like accreditation, regulation, licensing for health related activities available and how are they enforced/used?
Transparency	Transparency in decision-making; transparency in allocation of resources	National	Is information about financial and administrative procedures readily available? How transparent is the process of resource allocation?
		Health policy formulation	Are there monitoring mechanisms in place to ensure transparency of decisions? Who is involved in monitoring of the health services?
		Policy implementation	How are the district managers appointed/transferred? How soon is information from the financial audit available after the funds are disbursed?
Responsiveness of institutions	Response to population health needs; response to regional local health needs	National	Are health subsidies targeted? What is the targeting mechanism? Is needs assessment conducted as part of the policy process?
		Health policy formulation	Does the health policy address the health needs/burden of the local populations? Is the quality of health services and user satisfaction valued high by the MoH
		Policy implementation	How does the health system respond to regional/local priority health problems? How responsive are the health services to the medical and non-medical expectations of the population?
Equity	Equity in access to care; fair financing of health care; disparities in health	National	Are there any social protection schemes in place to address financial barriers for the poor?
		Health policy formulation	What policies are in place for identifying issues of equity in provision and financing of health services and rectifying them?
		Policy implementation	What are the differences in access to care by residence, income, gender, ethnicity, religion and others? Is allocation of public sector resources by states, provinces, districts equitable?
Effectiveness and efficiency	Quality of human resources; communication processes; capacity for implementation	National	What is the turnover/tenure of the leadership at the MoH? What is the quality of bureaucracy, technocracy (training, qualifications, career development)?
		Health policy formulation	How efficient and up to date are the communication processes at the MoH; extent, form, filing, timeliness? Is there an in-service training program for staff?

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Table 2 (*Continued*)

Principle	Domains	Assessment level	Broad questions
		Policy implementation	What is the capacity of MoH for implementation measured in terms of regulatory, monitoring, financial and human resource management? What is the level of utilization of services? Is there an in-service training program for staff? Are job descriptions available and followed by staff?
Accountability	Accountability: internal; accountability: external	National	What is the role of the press/media? What is the role of elected bodies (legislature)? What is the role of judicial system?
		Health policy formulation	Are mechanisms for overseeing adherence to financial, administrative rules in place?
		Policy implementation	What evidence is present about the effective enforcement of accountability processes?
Intelligence, information	Information: generation, collection, analysis, dissemination	National	What information is available about the health system and health in the country and how accessible is it? What is the reliability of information available for development of policies?
		Health policy formulation	What evidence is there for the use of information in the decision-making process?
		Policy implementation	How is the relevant information about health generated? How is implementation of health policies monitored?
Ethics	Principles of bioethics; health care and research ethics	National	What is the importance attached to ethics in research and services?
		Health policy formulation	What principles of bioethics are included in national health policy? Is there a policy on promoting ethics in health care and research?
		Policy implementation	What are the institutional mechanisms to promote and enforce high-ethical standards in health research and health care?

7. Appraisal of the HSG framework

There have been efforts in the past to determine the influence of governance on specific health problems such as HIV/AIDS [36], or characteristics of effective governance in community health partnership [37]. To the best of our knowledge this is the first framework that assesses governance of a national health system. The strength of this assessment framework is that governance principles are itemized into domains, and broad and specific questions that lend themselves to assessment of HSG at the national and sub-national level. Used appropriately, it is a useful analytical tool that allows 'diagnoses of the ills' in HSG at the policy and operational levels and provides the basis for developing interventions. It brings to the table the sensitive issue of HSG for the consideration of policymakers. The improvement of the performance of the MoH and state health departments is at the heart of this assessment framework.

There are some caveats related to the framework that need to be recognized. First, the principles of health system governance are value driven rather than being normative, which have to be seen in their proper social and political context. Second, while the framework does not directly address the issue of aid effectiveness in a country, its application provides sufficient information on the ability of the country to effectively utilize external resources, a matter of great interest to the development partners.

Third, it raises the issue whether governance of the health system can be improved without addressing the overall governance of a country? The answer is perhaps yes. There is no doubt that improving governance as a whole is essential, improving HSG could be the harbinger of the former. The debate on health system reforms vs. broader civil service reforms is as applicable to reforming HSG vs. overall governance. Fourth, the HSG assessment framework relies on a qualitative approach and does not follow a scoring or ranking system. The advantage of a qualitative approach is that it retains the richness of information collected and permits identification and tackling key governance issues. However, the development of a scoring system is not precluded once the framework has been tested in several

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Table 3
Health system governance matrix of Pakistan—2006

Governance principle	Principal findings		
	National/federal level	Health policy formulation level	Policy implementation level
Strategic vision	National policies focus on liberalization, economic growth and development	Lack of strategic vision contributes to fragmentary nature of the health system and vacillating priorities with focus on short-term objectives	Programs exist but are under funded for most priorities identified in national health policy
	Social sectors not given priority and remain under funded	National health policy lacks outcome orientation and attention to health determinants and health system issues	Lack of health system reform programs to address workforce, management and financing issues
	HDI ranking 135 out 177		
Participation and consensus orientation	Lack of participatory decision-making keeps the culture of accountability from taking roots	Lack of open forum to discuss health plans, programs and budgets, proposed regulations, etc.	Partnership with non-state sector improving, especially with civil society organizations and some NGOs
		Pakistan Health Policy Forum hosted by an NGO provides a non-partisan platform for policy dialogue	Some community involvement through Lady Health Program
Rule of law	Consumer protection act does not exist and malpractice cases dealt under the general Pakistan penal code	Eight draft bills have been prepared for enactment since 2000	Minimal protection against hazards from personal health services (patient safety)
	Justice is often delayed or denied as litigation procedures are cumbersome and expensive	Absent legislation on minimum standards of care and compliance, lax regulatory environment and limited enforcement capacity	Instances of revocation of licenses of professionals, institutions or sale and use of counterfeit drugs few and far between
Transparency	Freedom of Information Act 2005: all documents to be protected until declared public	Mechanisms to monitor transparency of decisions in the health, for example, on rationale for resource allocation not well defined	Gap between policy and practice for recruitment, posting, promotion and performance assessment of health managers
	Ranked 144 out of 159 by Transparency International on level of corruption		Rules favor seniority over meritocracy
Responsiveness	Government concern insufficient for the quality and responsiveness of public sector social services	Patient/client satisfaction especially for the vulnerable not considered	No instrument in place to monitor responsiveness of public sector health services
Equity and inclusiveness	Social safety nets for poor exist such as *Zakat* and poverty reduction programs. Some evidence of reduction in poverty	Health equity not explicitly stated in the national health policy agenda	Social protection schemes cover civil servants, formal urban sector; 75% health expenditure out-of-pocket
	PRSP prepared which has a chapter on health	Lack of understanding and effort to promote equity in health care financing	Successful targeting of rural population through Lady Health Worker Program
Effectiveness and efficiency	Bureaucrats and technocrats responsible for administrative and technical matters respectively; do not work in unison	Stable turnover of policymakers since last 6 years	Physicians turned managers have inadequate understanding of administrative matters, bureaucrats lack health orientation
	Government rules and procedures seem to override outcomes	Weak units in MOH for policy, planning, health information, surveillance	Physicians and allied staff extensively engage in private practice outside and within public institutions
	Civil services reforms urgently needed but not forthcoming	Delays in release and inadequate utilization of funds	Poorly functioning support systems—medicine supply, monitoring, etc.
		Tall hierarchy and preoccupation with financial and administrative matters	
Accountability	Public accounts committee on health currently non-functional	Instruments for accountability partially developed, for example, annual confidential report (ACR) for staff evaluation; Planning Commission proformas III and IV for project monitoring and evaluation, respectively	ACR not used for proper performance assessment

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Table 3 (*Continued*)

Governance principle	Principal findings		
	National/federal level	Health policy formulation level	Policy implementation level
	Media and NGOs playing increasing role in protecting people's health but needs to do more		PC III and PC IV proformas for policy monitoring and evaluation almost never used Office of the Auditor General performs annual audit of accounts, emphasis is on procedures instead of performance
Intelligence and information	Household surveys and census used for assessing social sector performance	Health management information system functions sub-optimally	HMIS report, monitoring, and use inadequate and private health sector not covered
	Print media is free and influences decision-making, electronic media gaining freedom	'Culture' of informed decisions has not taken roots allowing decisions tinged with personal preferences	Managers lack capacity in informed decisions despite extensive training programs
Ethics	Discourse on professional ethics is not a national concern or mentioned as a priority in policy documents	Low level of awareness of the value of bioethics among policymakers	Institutional review boards on bioethics not functional in most training and research institutions
		Bioethics is not on the policy agenda of the MOH	Code of ethics exists with professional associations (medical, pharmaceutical) but not adequately practiced

countries and its usefulness further established. Fifth, does the assessment framework allow for cross-country comparison of the governance function? A HSG matrix can be developed for each country, as illustrated in Table 3, which permits comparison between countries in the absence of a scoring system. Sixth, there are several contemporary issues in relation to the governance of health systems that have been highlighted in the paper. While many have been included, there is flexibility in the framework to integrate newer ones as they emerge. Finally, the HSG assessment framework does not include the emerging subject of global health governance [9,24–26]. The framework, however, has the flexibility to incorporate the influence of global governance on national HSG as the subject gets better crystallized and greater experience accumulates with the use of this framework. Similarly, the framework does not include assessment of clinical governance the focus of which is to encourage local organizations to improve and assure the quality of clinical services for patients [27,38].

8. Policy implications of assessing health system governance

Assessing HSG has several policy implications since it is the gateway to good governance in health. First, it raises the level of awareness among national and health policymakers of the importance of governance as a function of the health system and its influence on all other health system functions and health outcomes. It provides an avenue for debate on a subject that is often 'pushed under the carpet'. Second, there are policy implications of assessing each governance principle, whether it is strategic vision, rule of law, equity and inclusiveness, transparency or ethics and for developing interventions to improve these. Third, the framework points to HSG issues at three levels, thereby, allowing for measures to be instituted at the policy or implementation levels of the health system. Finally, improving HSG has a certain financial cost. In addition to political commitment it requires resources for developing interventions and a parsimonious set of indicators to monitor the governance function at different levels.

The road to good governance in health is long and uneven. Assessing HSG is only the first step towards it. The challenge that remains is to have a comprehensive approach to improving governance, that the key actors in government, civil society, and the health sector have the commitment and capacity to adhere to it and have a positive influence on the performance of the health system.

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