Published by Oxford University Press in association with The London School of Hygiene and Tropical Medicine *Health Policy and Planning* 2015;**30**:111–120
© The Author 2013; all rights reserved. Advance Access publication 26 December 2013
doi:10.1093/heapol/czt102

Coherence between health policy and human resource strategy: lessons from maternal health in Vietnam, India and China

Tim Martineau,[1] Tolib Mirzoev,[2] Stephen Pearson,[2] Bui Thi Thu Ha,[3] Qian Xu,[4] K V Ramani[5] and Xiaoyun Liu[6]*

[1]Department of International Public Health, Liverpool School of Tropical Medicine, L3 5QA, UK [2]Nuffield Centre for International Health and Development, University of Leeds, LS2 9LJ, UK [3]Hanoi School of Public Health, 138 Giang vo - Ba Dinh,Vietnam [4]School of Public Health, Fudan University, Shanghai 200032, P.R. China [5]Public Systems Group, Centre for Management of Health Services, Indian Institute of Management, Ahmedabad 380 015, Gujarat, India and [6]China Centre for Health Development Studies, Peking University, Beijing 100191, P.R. China

*Corresponding author. China Centre for Health Development Studies, Peking University, Mailbox 505, 38 Xueyuan Road, Haidian District, Beijing 100191, P.R. China. E-mail: xliu@bjmu.edu.cn

Accepted 21 November 2013

The failure to meet health goals such as the Millennium Development Goals (MDG) is partly due to the lack of appropriate resources for the effective implementation of health policies. The lack of coherence between the health policies and human resource (HR) strategy is one of the major causes. This article explores the relationship and the degree of coherence between health policy—in this case maternal health policy—processes and HR strategy in Vietnam, China and India in the period 2005–09. Four maternal health policy case studies were explored [skilled birth attendance (SBA), adolescent and sexual reproductive health, domestic violence and medical termination of pregnancy] across three countries through interviews with key respondents, document analysis and stakeholder meetings. Analysis for coherence between health policy and HR strategy was informed by a typology covering 'separation', 'fit' and 'dialogue'. Regarding coherence we found examples of complete separation between health policy and HR strategy, a good fit with the SBA policy though modified through 'dialogue' in Vietnam, and in one case a good fit between policy and strategy was developed through successive evaluations. Three key influences on coherence between health policy and HR strategy emerge from our findings: (1) health as the lead sector, (2) the nature of the policy instrument and (3) the presence of 'HR champions'. Finally, we present a simple algorithm to ensure that appropriate HR related actors are involved; HR is considered at the policy development stage with the option of modifying the policy if it cannot be adequately supported by the available health workforce; and ensuring that HR strategies are monitored to ensure continued coherence with the health policy. This approach will ensure that the health workforce contributes more effectively to meeting the MDGs and future health goals.

Keywords Health policy, human resources, maternal health, policy analysis

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

KEY MESSAGES

- The implementation of health policy is likely to be more successful if human resource (HR) needs such as more or differently skilled staff are planned for.
- Ideally this should be done at the policy development stage, but adjustments can be made at the implementation stage when HR problems are identified.
- A review of HR needs may lead to a modification of the ambition of the health policy and HR needs may change during the course of policy implementation which may require continuous monitoring/assessment of these needs.

Background

It is well-recognized that the health workforce is the major barrier to achieving the health-related Millennium Development Goals—not just the number of staff but also the appropriate skills (World Health Organization 2006). There is ample evidence of an absolute shortage of health workers (Anand and Barnighausen 2004; Scheffler *et al.* 2009). Nevertheless, improvements in the utilization of the existing workforce as a key resource for delivering services are needed to meet these goals. Investments in proposed scale-up initiatives (Crisp 2007; Task Force on Scaling up Education and Training for Health Workers 2008) would also benefit.

The reason why the health goals are not being met is partly because of the way in which the health policies are developed and implemented. Implementation can be hampered by lack of resources. The lack of human resources (HR) is often a result of the lack of coherence—including synergies and complementarities (Organisation for Economic Co-operation and Development 2002), between health policy and HR strategy (Figueroa-Munoz *et al.* 2005). (The term 'HR strategy' is used here and throughout to make the distinction between broader strategy and HR or personnel policy.)

The need for coherence between policy initiatives at organizational level and HR strategy is well documented in the human resource management (HRM) literature (Richardson and Thompson 1999; McCourt and Eldridge 2003). The extent to which there is coherence between organizational policy and HR strategy will vary between organizations and for specific policy issues and will depend on a number of factors. These might include actors (including HR professionals), evidence, the nature of the policy and the actual policy processes including the agenda-setting, development and implementation (Buse *et al*. 2005). Although some frameworks do exist for categorizing levels of this coherence in generic terms (see below), there is a lack of empirical studies exploring the coherence between organizational policy and HR strategy in general and in particular in the health sector in low- and middle-income countries (LMIC). In this context, we look for coherence between the health policy (rather than the more generic organizational policy) and HR strategy.

This article explores the relationship and the degree of coherence between health policy—in this case maternal health policy—processes and HR strategy in Vietnam, Guangxi Autonomous Region in China and the state of Gujarat in India in the period 2005–09. The paper reports findings from the Health Policy-Making in Vietnam, India and China (HEPVIC) project that examined health policy processes using case studies related to maternal health policies. The analysis of the health policy processes is reported elsewhere (Green *et al.* 2011). Recognizing the systemic linkages in policy-making, the project studied the relationships between health policy and cross-cutting areas including health systems, health service delivery and HR. HEPVIC would therefore provide an ideal opportunity to address the lack of empirical studies exploring the coherence between health policy and HR strategy and the following two questions are addressed in this article:

- to what degree was there coherence between the development and implementation of maternal health policy and the HR strategy?
- what factors influenced the degree of coherence?

An overview of the methods used in the HEPVIC project is presented first. Next, after presenting background information on the project case studies we report the degrees of coherence found between the maternal health policies and the relevant HR strategies. We then discuss our findings and conclude with key policy implications of our study.

Methods

The HEPVIC project used a multi-method, retrospective comparative study of case studies of maternal health policy processes in Vietnam, India and China (Leeds HEPVIC Team 2009). We first provide a brief overview of the methods used by the wider study, then the research methods specific to this article.

Brief description of overall study

Maternal health is used as a tracer of the wider policy processes. Given the breadth of policy areas that could be labelled under 'maternal health', it was necessary to define which maternal health topics would be included and prioritized in the research. This was done by identifying which areas of maternal health would be appropriate as primary or secondary foci for the research. To facilitate comparability, it was proposed that ideally the same maternal health policies will be selected in the three study countries. The research focused on three different types of maternal health policies to act as case studies:

- One policy would be 'non-controversial', and have a clearly defined and widely accepted international policy which needs implementation at a country/state/province level.
- One policy would be 'controversial', i.e. some actors support whereas other actors oppose the policy, and response may vary depending on the context of a particular country/province/state.

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

Table 1 Maternal health case studies chosen by study country

Country Territorial focus		**Vietnam** National (Vietnam)	**India** State (Gujarat)	**China** Region (Guangxi Autonomous Region)
Maternal health case study	Type			
Skilled birth attendance	'Non-controversial'	✓	✓	✓
Adolescent sexual and reproductive health	'Controversial', and inter-sectoral	✓	✓	✓
Domestic violence against women	'Controversial', and inter-sectoral	✓		✓
Medical termination of pregnancy	'Controversial', and inter-sectoral		✓	

Table 2 HEPVIC data collection methods

Research method	**Vietnam**	**India**	**China**	**Total**
Semi structured interviews	40	42	42	124
Documents reviewed	138	317	98	553
Participatory stakeholder workshops	3	1	1	5

- At least one policy would have clear inter-sectoral elements. This was a response to demand from local stakeholders.

After discussion between partners, four maternal health policy cases were selected to investigate the policy process: skilled birth attendance (SBA) in all three countries though in China this was incorporated into a broader institutional delivery policy, adolescent sexual and reproductive health (ASRH) in all three countries, domestic violence (DV) in China and Vietnam and medical termination of pregnancy (MTP) in India (see Table 1). Details of the case studies and their policy processes are available in the research report (Leeds HEPVIC Team 2009).

The conceptual framework which guided the overall study used the four inter-related elements of health policy-making from the policy triangle of Walt and Gilson (1994):

- How policies are made (processes).
- By whom policies are made (actors).
- What are wider issues affecting health policies (context).
- What are the policy outputs (contents).

Two new elements were added (Green *et al.* 2011):

- the nature of the policy issue which is related to the context, and
- what informs policy decisions (evidence).

A unified research methodology was developed to guide the data collection and analysis in three research countries. Qualitative data were collected from December 2006 to July 2008. The main research methods used were interviews with key respondents, document analysis and participatory stakeholder workshops (to allow share and validate findings)—see Table 2.

Further details of the data collection and analysis methods use in the overall study are reported in Green *et al.* (2011). Ethical approval was obtained in each country.

In addition to questions about the general policy-making process, questions relevant to each of the cross-cutting areas were asked. The specific methods for data collection and analysis for the HR theme are described in the following section.

Methods specific to this article

The primary data source for analysing HR in policy process was the three country reports (Leeds HEPVIC Team 2009). Our analysis for the data on coherence between health policy and HR strategy was informed by a typology developed by Torrington *et al.* who argue that 'desirability . . . of the link between business strategy and HR strategy is a consistent theme that runs through the [HRM] strategy literature' (2002: 32). The degree of coherence ranges from complete separation between the organizational and HR strategy (category A) to a situation where there is dialogue between the two (category C) and beyond to where HR strategy is in a prime position (category E) as shown in Table 3. Given the fragmented nature of the HR function within ministries of health (Martinez and Martineau 1998) and that often their human resources for health (HRH) units 'are not fit for the purpose, and lack the ability to influence policy directions'(Nyoni and Gedik 2012), reaching the state of 'dialogue' might be considered a reasonable goal in the current climate.

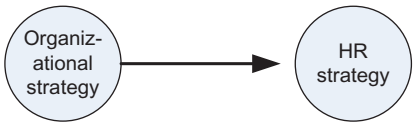
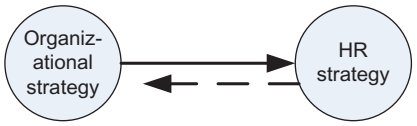
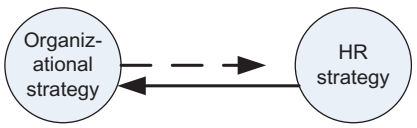
The questions on HR that were included in the interviews and for guiding the document review were designed to capture the possible implications of new policies. For each case study, questions were asked about the following topics: HR planning and deployment of the workforce, training and financing because of the implications of scaling up the workforce, e.g. for the SBA policy; continuing professional development, e.g. to encourage behaviour change related to the new policy such as becoming more 'youth-friendly' for the ASRH policy; and performance management, including the use of incentives and sanctions, e.g. supporting institutional delivery vs home delivery for the SBA policy. The initial findings were explored in workshops in each country with key stakeholders.

One way to classify policy processes is by approach to the derivation of policy decisions, which includes five broad models: incrementalist, mixed-scanning, argumentative, social experiment and interactive learning (Sutton 1999). An alternative approach is to describe the policy process by its stages (often known as the 'stages heuristic') (Gilson and Raphaely 2008).

In this article, we draw upon the stages heuristic model and in exploring the degree of coherence between health policy and HR strategy we specifically focus on two of the four stages of policy processes: policy development and policy implementation. This is done in recognition that coherence between policy and HR strategy is unlikely to occur at the agenda-setting

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

Table 3 Potential relationships between organizational strategy and HR strategy

Category	Definition	Relationship
A. Separation	'... no relationship at all, if indeed organizational and human resource strategy does exist in an implicit form in the organization'	
B. Fit	'Employees are seen as key in the implementation of the declared organizational strategy, and human resource strategy is designed to fit with this.... The relationship in the fit model is exemplified by organizations which cascade their business objectives down from the senior management team through functions, through departments, through teams and so on.... In this way the HR function... is required to respond to organizational strategy by defining strategy which meets organizational demands'	
C. Dialogue	'... takes the relationship one step further, as it recognizes the need for two-way communication and some debate. What is demanded in the organizations strategy may not be viewed as feasible and alternative possibilities need to be reviewed'	
D. Holistic	'... represents the people of the organization being recognized as the key to competitive advantage rather than just the way of implementing organizational strategy... HR strategy is not just the means for achieving business strategy (the ends), but an end in itself'	
E. HR driven	'places human resource strategy in a prime position... If people are the key to competitive advantage, then we need to build on our people strengths'	

Source: Adapted from Torrington *et al*. 2002, pp. 31–33.

and evaluation stages of policy process: e.g. resource issues are typically considered as part of the options appraisal part of policy development and normally would not be considered at the agenda-setting stage.

The analysis of the data in country reports was conducted in the following way:

(1) Using the questions on HR that were included in the interviews and for guiding the document review, two researchers independently reviewed the country reports.
(2) All references to the HR consideration in policy development and implementation stage were coded and extracted from all cased studies in the country reports.
(3) These references were then discussed by the two researchers and categorized according to degrees of coherence between health policy and HR strategy using the Torrington framework given in Table 3.

Results

First we provide background information on the case studies focusing on HR situation, nature of policy issues and policy status. This is then followed by identification of types of relationships between health policies and HR strategies at policy development and implementation.

Background to the case studies

HR in the health sector

All three countries are rapidly developing Asian economies, with private health sectors that are expanding fast. Nevertheless, a common characteristic in each of the study countries is the low number of health personnel (see Table 4) though none is amongst the 57 countries with HR crisis (World Health Organization 2006).

Inequitable distribution of staff—particularly in remote rural areas—is also a major HR challenge in each country. For example, though more recent data from China show an overall increase compared with the data in Table 4, the disparity remains: urban areas had 2.97 doctors and 3.09 nurses per 1000 population in 2010, whereas rural areas only had 1.32 doctors and 0.89 nurses per 1000 population. (Ministry of Health China 2011).

Only in China was there a national Health Human Resource Development plan (2001–15) though in India and Vietnam

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

Table 4 Key staffing indicators by country

Indicators	Vietnam	India	China	Year (source)
Doctors (per 1000 population)	0.6	0.14	0.6	2003 (a)
Nurses (per 1000 population)	0.8	0.10	0.13	2003 (a)
Births attended by skilled personnel (%)	88	47	98	2006 (b)

Sources: (a) WHO (2009), (b) UN (2009).

there were various training plans for strengthening the health workforce. These higher level plans were mostly generic and not related specifically to maternal health.

Nature and status of the policy

The SBA policies are perceived in all countries as falling firmly within the remit of the health care sector and clearly need HR strategies to provide skilled birth attendants. This contrasts with that of DV which inevitably draws on the expertise and resources of a number of government agencies (e.g. legal, social and health) and thus requires a more multi-sectoral approach. The remaining two case-studies, ASRH and MTP, lie between these two with potential for a very wide set of interventions; in practice in the planning and implementation of the policy processes they were treated as primarily health service issues. DV, ASRH and MTP policies are all considerably more socially sensitive than the SBA policy (Ha *et al.* 2010; Green *et al.* 2011).

In all three countries, there is a hierarchy of different types of policy instrument with implications for their authority, ability to access resources and degree of prescriptive detail possible within the policy. Such instruments included legislation (as in the case of Domestic Violence Act in Vietnam and the Medical Termination of Pregnancy Act in India), resolutions (such as with DV in China), plans (such as with Adolescent Reproductive Health in Vietnam) and programme strategies (such as in SBA in all three countries). Each of the policy instruments requires different development processes and involves different sets of actors. The policy instruments covered a range of stages of development: the DV policy in Vietnam was still at development stage and in contrast the SBA policies in all three cases were at the implementation stage.

Policy actors and their roles in policy processes

Government in the three study countries, in most cases through its line ministries, has the formal responsibility to lead and manage the policy process. Nevertheless, there is little evidence that the HR department in the ministries of health in Vietnam and China had been sufficiently involved in the policy process and in Gujarat there was no HR department for health at state level. For example, in Vietnam the Department of Personnel and Organisation of the Ministry of Health (MoH) was included neither in the ARSH Policy Working Group (though it was asked for comments on the draft national master plan) nor in the National Technical Advisory committee for the SBA policy.

Nevertheless, there is evidence that some individual policy makers did play key roles in supporting or leading the process to ensure coherence between maternal health policy and HR. For example, for the Indian Institutional Delivery policy the Gujarat Health Commissioner promoted the involvement of private practitioners in the SBA services. In Vietnam, the leader of Maternal and Child Health (MCH) department at MoH supported the development and implementation of SBA policy.

In addition to the actors in government, there is an increasing range of non-state actors participating—or striving to—in the policy processes though their interests in HR was not always in line with the objectives of the particular policy. In the Indian SBA case study, Non-governmental organizations (NGOs) lobbied government to reinstate traditional birth attendant (TBA) training in contradiction of the policy of using skilled birth attendants. In the MTP case study in the same country it was reported that the medical community, having been influential in the development of the Medical Termination of Pregnancy Act in 1971, was trying to ensure that doctors were used to carry out MTPs in order to make use of the large untapped pool of doctors, whereas several civil society organizations were advocating for the use of mid-level providers as being more cost effective and appropriate for working at community level.

Coherence between maternal health policy and HR strategies

Illustrations of results relating to the policy development process are presented first. The examples provided are categorized by degrees of coherence (categories A–C). Results relating to the policy implementation stage are then given using the same process of categorization. At the policy development stage, there are examples of different degree of coherence ranging from A to C whereas at the policy implementation mostly types A and B are reported. No examples of holistic or HR-driven (categories D and E, respectively) were identified. The findings are summarized in Table 5 and are expanded upon in the text below.

Policy development stage

Category A—'separation' between the maternal health policy and HR strategy

Lack of HR strategy to support DV policies being implemented in China and Vietnam. In China, there was greater emphasis on the development of the legislative instrument for the DV policy than on translating the policy into action. The situation was similar in Vietnam. The DV policy was manifested in the form of a legal instrument, which only provided very general guidance for implementation. In neither case was there any planning of resources for implementation—including HR.

However, stakeholders in the MoH in Vietnam were able to anticipate the possible HR implications of the DV law for the health sector though their actions did not support the objectives of the policy. Without waiting for guidelines to be developed, the MoH opposed the regulations that health workers should have responsibility to deal with DV victims, with the argument that the health workforce did not have the capacity in terms of both numbers and skills to provide services to DV victims.

Category B—'fit' between the maternal health policy and HR strategy

Transformation of the TBA's role in China. The institutional delivery policy required that TBAs ceased delivering babies themselves and instead encouraged women to deliver at health

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

Table 5 Summary of findings on coherence between maternal health policy and HR strategies

Coherence/policy stage	Development	Implementation
Category A—separation	Lack of HR strategy to support DV policies being implemented in China; avoiding using health HR in Vietnam	Not started in either China or Vietnam, but would lead to problems in implementation of DV policies
	Insufficient planning for training for ASRH in Vietnam and China	Insufficient capacity or resources to meet ASRH training requirements in Vietnam and China
	Insufficient staff planning to deliver ARSH services in Vietnam	Pressure on existing health staff to deliver new ARSH services instead of normal work in Vietnam
Category B—fit	Transformation of the TBA's role in China	New TBA role continues
		Introduction of a stretcher service staffed by volunteers for institutional delivery in China
		Increasing service delivery staff following evaluations of ASRH programme in China
	Involving the private sector in provision of skilled birth attendance in India	Use of private sector continues in India
	Training strategies developed for MTP (India) and ASRH (India and Vietnam) though insufficient in quantity and quality to support implementation	Insufficient skills to support MTP in India and ASRH and Vietnam and China
Category C—dialogue	Temporary use of the 'ethnic midwife' in place of fully skilled birth attendants in Vietnam; continued in implementation	
	Temporary use of FHW as skilled birth attendants in India; continued in implementation	

centres. Policy makers recognized that behaviour change of the TBAs would need to be managed. They therefore developed incentives, including both a financial reward for bringing a woman to deliver at the institution and sanctions to deter the TBAs from continuing to do the deliveries themselves.

Involving the private sector in provision of SBA in India. The need for providing skilled attendance at birth (a recommendation of the 1943 Bhore committee long before this became The World Health Organization (WHO) policy) led to introduction of two training courses which included midwifery skills, approved by the Indian Nursing Council. However, in rural India including Gujarat state where the case study was carried out, there is a marked shortage of professional health workers in the public sector in rural areas. Observing the excess of supply of qualified skilled birth attendants in the private sector, the state government contracted out the SBA under the Chiranjeevi scheme (Bhat *et al.* 2009).

Training strategy developed—MTP and ASRH in India and Vietnam. Training was planned as an HR strategy to support the MTP policy. However, the training plans were unrealistic for a number of reasons and appeared not to meet the need. There was not enough training capacity in government institutions and private institutions that could have provided training found the registration processes too cumbersome and were not keen to get involved. In addition, informants said that the training was too long and candidates found it difficult to get leave to do the course.

A training course for staff to provide services in a way that was 'youth-friendly' was developed to support the ASRH policy in both India and Vietnam. However, the training was short and considered by many to be inadequate to bring about the essential and substantial change in attitude of service providers to effectively support the policy.

Category C—'dialogue' between the maternal health policy and HR strategy

Use of the 'ethnic midwife' in place of fully skilled birth attendants in Vietnam. The SBA policy has been accepted and generally implemented in Vietnam. However, in the remote and mountainous regions of the country there is a shortage of skilled staff who have the 30 skills required to be an SBA. As a temporary solution to this problem the MoH and the United Nations Population Fund (UNFPA) trained women selected from local ethnic populations with basic midwifery skills and sent them back to work as 'ethnic midwives' in their villages.

Temporary use of female health workers as skilled birth attendants in India. The female health worker (FHW) within the public health system is not considered a skilled birth attendant by international standards, as the basic FHW training course is only 18 months long and does not cover all the essential skills. Nevertheless, the Government of India and many state governments were in the short term relying upon the FHW as SBAs with a short additional training.

Policy implementation stage

At the implementation stage, there were examples where the coherence between maternal health policy and HR strategy at the planning stage breaks down at the implementation stage leading to 'separation'.

Category A—'separation' between the maternal health policy/strategy and HR strategies

Insufficient capacity or resources to meet ASRH training requirements. Despite the success in getting HR on the

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

agenda for the design of new ASRH programmes in China as a result of previous problems at the implementation stage, there were problems in realizing the relevant HR strategies. One of the obstacles was the limited training capacity. The HR planning did not appear to go into enough detail and depth to ensure that sufficient resources were available for the training.

The evaluation of ASRH pilot programmes in Vietnam revealed the needs for capacity building in health service management. The policy recommendations were included in the National Master Plan for Adolescents and Youth. However, insufficient budget was provided for training. It was mainly spent on training of trainers at provincial level on providing youth-friendly services to limited numbers of health care staff. This was insufficient to meet the needs identified in the programme evaluation.

Pressure on existing health staff to deliver new ASRH services in Vietnam. The provincial reproductive health centre developed a new unit to provide youth-friendly services, but additional staff were not assigned to the new unit. Therefore, the existing health care staff had to stop their normal work when adolescent clients visit the ASRH care and andrology unit.

Category B—'fit' between the maternal health policy and HR strategy

In some cases such as the transformation of the TBA role in China and the involvement of the private sector in the provision of SBA, 'fit' continued into the implementation stage. There were also examples where there had been a lack of coherence (separation) between health policy and HR strategy at the planning stage, but this moved to 'fit' (category B) at the implementation stage as human (and other) resource requirements became more obvious.

Introduction of a stretcher service for institutional delivery in China. In the course of implementing the institutional delivery policy in a phased way, the health service managers identified access to health facilities to be a major constraint for women living in remote areas who were experiencing complications. The only way to get them to the health facilities was by stretcher. These were provided to remote communities. The HR requirement to support this service was stretcher bearers who needed to be based in the remote communities. The only option was to mobilize volunteers when needed. This proved to be a successful innovation for supporting the institutional delivery policy.

Increasing service delivery staff following evaluations of ASRH programme in China. In China, there was a succession of ASRH programmes. The evaluations of each programme produced wide-ranging recommendations including those related to HR. For example, though the main actor in the fifth reproductive health and family planning country programme (CP5) was the China Family Planning Association, a separate agency outside the MoH, the evaluation of CP5 suggested increasing capacity to deliver youth-friendly health services. This led to the involvement of MoH in CP6 and plans for appropriate training of health professionals were included in CP6.

In summary, separation (category A) between health policy and HR strategy led to poor ASRH policy implementation in China and Vietnam through lack of skills or insufficient staff and potential problems for the DV policy. A good 'fit' (category B) is found at both development and implementation stages for the SBA policy in India and China; greater 'fit' is seen at the implementation stage in China, but absence of fit at the implementation stage when training strategies were not followed through (e.g. for MTP in India and ASRH in Vietnam and China). Examples of 'dialogue' (category C) are found in addressing the shortage of skilled staff to implement the SBA policy in India and Vietnam. None of the case studies has examples of categories D (holistic) and E (HR driven).

Discussion

Coherence between maternal health policy and HR strategy

The levels of coherence between the different stages of maternal health policy and the HR strategy in the case studies were mixed. There were some clear examples of what Torrington *et al.* categorize as 'separation', or no relationship at all between maternal health policy and HR strategy. An example is the case of the DV policies in China at the development stage.

In contrast, the transformation of the TBA's role and the involvement of the private sector in India to support the SBA policy appear to demonstrate 'fit' between policy and HR strategy at the development stage. This level of coherence was sustained through to the implementation stage. Although the case studies on ASRH do not provide evidence of 'fit' at the development stage, following programme evaluations in China it was recognized that more staff were needed leading to a better 'fit' at the policy implementation stage. The introduction in China of the stretcher service, staffed by volunteers, to support institutional deliveries is a similar example of 'fit' occurring at the policy implementation stage. Finally, the temporary use of 'ethnic midwives' in Vietnam and of Family Health Workers in India are two examples of 'dialogue' in which the maternal health policy is adapted at the development stage to what is feasible with the current HR situation.

The majority of health care in LMIC is provided through large government organizations and key decision-making on staffing matters involves numerous agencies in addition to the relevant line ministry (e.g. public service commission, a civil service ministry—see Vujicic *et al.* 2009). Because of this complexity, the highest level of coherence between health policy and HR strategy one might expect in such large bureaucracies—particularly in weaker and less flexible ones—is category B (fit). This level of coherence is illustrated by the objectives to expand service delivery in Kenya in 2005 being supported by an appropriate expansion of the workforce (Health Sector Reform Secretariat 2005). In category C (dialogue), the HR department begins to take on the role of a strategic partner in the leadership and management of the organization (Ulrich 1998). This level of coherence is illustrated by the ambitious antiretroviral treatment in Malawi was reduced to match the availability of human resources as was advocated for (Harries *et al.* 2006). Achieving categories D and E (holistic and HR driven) in public sector organizations in LMIC is

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

likely to be merely aspirational though more research is needed to confirm this.

Ideally at the policy development stage—or even better at the agenda-setting stage—HR requirements (as with all resource requirements) would be identified as part of the planning for implementation (Figueroa-Munoz *et al.* 2005). The case studies provide examples of insufficient resource planning at the policy development stage, but in some cases the need being picked up through monitoring and evaluation processes at the implementation stage. Although better late than never, the assumed delays and opportunity costs could be avoided with more careful planning.

Thorough planning might be carried out at the development stage but not followed through, lacking what Patterson *et al.* (2010) refer to as 'implementation fidelity' resulting in the same problems for policy delivery. Because of the known HR challenges in the study countries (and others), a risk analysis approach is needed at the policy development stage which may result in actually changing the policy. As mentioned earlier this was done in Malawi (Harries *et al.* 2006) and there is evidence in this study of modifications of the SBA policies in Vietnam and India with the temporary use of SBA substitutes.

Factors influencing the level of coherence between health policy and HR strategy

Although we argue for a logical approach to ensuring coherence between maternal health policy and HR strategy, it is possibly more important to understand why in some cases this approach is followed and in others not. The case studies offer insights to these factors both in relation to the nature of the maternal health policy and to the actors involved. Three key influences on coherence between health policy and HR strategy, as explained below, emerge from our findings: (1) health as the lead sector, (2) the nature of the policy instrument and (3) the presence of 'HR champions'.

Health as the lead sector

In all three countries, most attention was given to HR at the development stage of the SBA policy. This is unsurprising as, with the exception of China where more emphasis is put on the institutional aspect of the policy, it is largely an HR policy of matching appropriate skills to the tasks of safe delivery. Where the policy is multi-sectoral the issue might be which sector is leading the process. In Vietnam, the MoH was not the lead for the DV policy and it was actually being strategic by ensuring separation between the health-related policy and HR strategy in order to protect its scarce HR for the delivery of higher priority health policies.

The nature of the policy instrument

The nature of the policy instrument such as legislation may indicate that the political statement is more important or requires less commitment than the implementation. If this were the case for the DV policies in China and Vietnam, it would in fact have been unwise for the MoH to invest too much energy into ensuring that HR concerns—or any other inputs—are being addressed, at least until a more detailed implementation plan had been developed.

The presence of 'HR champions'

Where lack of existing complementary HR strategy and engagement of HR departments will seriously impede successful policy implementation, 'HR champions' (Ulrich 1997) are needed. As reported, these champions were in evidence in some case studies—e.g. the leader of MCH department at MoH in Vietnam for the SBA policy and the Gujarat Health Commissioner in the Indian Institutional Delivery policy (though the involvement of the private sector might have been for ideological reasons). HR departments in the health sector generally need to take on more strategic roles (Fritzen 2007) and this would ensure a 'seat at the table' in the policy development process. This may require elevating the position of the HR department within the MoH. A recent study in the African region shows that out of 25 countries responding, nine had HR departments only headed by a deputy director (Nyoni and Gedik 2012). In their absence, other actors may step in to fill the vacuum. Although the intentions of some of the 'HR champions' appeared to be in line with the maternal health policy being implemented, this may not always be the case. For example, non-government organisations (NGO) in India lobbied government to re-instate TBA training which was completely contrary to the SBA policy.

Implications for more coherence between health policy and HR strategy

Based on the findings of this study, we propose several following steps for increasing the coherence between health policy and HR strategy:

(1) Ensure that appropriate actors such as the HR departments and/or 'HR champions' who are supportive of the policy are involved to ensure that HR strategy is considered. Review the nature of the policy (instrument and role of health sector implementation) to identify particular risk of HR strategy being overlooked for the health sector. [Recent guidance on HRH impact assessment suggests checking the alignment of HRH policy/plan with national health sector development plan (Global Health Workforce Alliance 2011a)].
(2) Ensure that HR strategy is considered at the policy development stage or even before at the agenda-setting stage. The following algorithm could be included in the policy process (see Figure 1):
    (a) identify HR requirements to implement the policy;
    (b) in line with the risk analysis approach check if HR are likely to be available;
    (c) if 'yes', plan for or develop the resources required.
    (d) if 'no', i.e. sufficient numbers or the right type of staff are unlikely to be available (e.g. the SBA and DV policies in Vietnam), 'dialogue' will be necessary to make appropriate modifications to the health policy—or advocating more resources for HR.
(3) Ensure that HR strategies are monitored (including checking coherence with the health policy) at the implementation stage and adjustments made where necessary, especially as HR requirements for successful implementation of the policy may change over time.

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

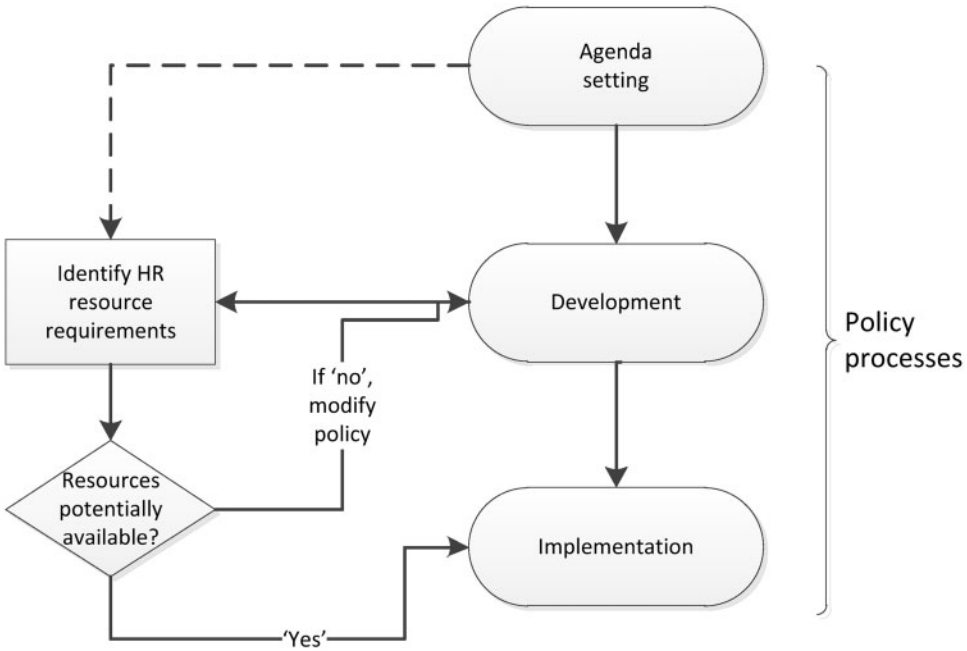


Figure 1 Algorithm for policy processes in maternal health modified to ensure coherence between maternal health policy and HR strategy

Strengths and limitations of the study

The strength of this study is that it provides new knowledge on the under-researched topic of coherence between policy processes and HR strategy, particularly in the health sector in mid- and low-income countries. Factors such as whether health is the lead organization, 'HR champions' are involved and the type of policies reviewed reinforce the importance of context-specific research, and the caution needed in assuming similar findings in other contexts. Collecting views from different respondents, and comparing these with the discussion in stakeholder workshops and written documents, strengthened the reliability of our analysis. However, although our research aimed to protect the anonymity of respondents, the small group of key informants involved in policy-making means some may have tailored their responses accordingly. Other limitations relate to the small number of countries covered, the restriction to maternal health policy and the retrospective nature of the enquiry that relies on the perception of the respondents. A greater focus on the HR theme in the overall study might have provided more detailed insights into the role of HR in the health policy process, but without additional resources this would have been at the expense of some other aspect of the overall HEPVIC study. The testing of the steps shown in Figure 1 would be a good way of taking research in this area forward.

Conclusion

The Global Health Workforce Alliance (2011b) reports progress with countries developing HRH plans with 86% of the 57 countries with severe staffing shortages having them in place. But as health policy is constantly being developed or modified, HR strategy needs to be dynamic. The results of this study signal that there is probably some way to go before government health agencies universally achieve sufficient coherence between new health policies and HR strategy. However, some of the results from this study—especially perhaps the learning demonstrated at the implementation stage in China—are a cause for optimism. With the guidance of the three steps given above, other countries can ensure that HR strategy is aligned with and therefore supportive of new health policies thus providing more chance of successful implementation as we approach the targets set for 2015 and in the planning of health targets beyond.

Acknowledgements

The project involved a consortium of eight partners: University of Leeds, UK; Fudan University, China; University of Bologna, Italy; Indian Institute of Management, India; Royal Tropical Institute, Netherlands; Prince Leopold Institute of Tropical Medicine, Belgium; Liverpool School of Tropical Medicine, UK. Professor Andrew Green provided insightful feedback on the first draft of the paper.

Funding

The work was funded by the European Community Sixth Framework Programme (INCO-CT-2005-517746).

Conflict of interest

None declared.

References

Anand S, Barnighausen T. 2004. Human resources and health outcomes: cross-country econometric study. *The Lancet* **364**: 1603–9.

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021

Bhat R, Mavalankar DV, Singh PV, Singh N. 2009. Maternal healthcare financing: Gujarat's Chiranjeevi Scheme and its beneficiaries. *Journal of Population and Nutrition* **27**: 249–58.

Buse K, Mays N, Walt G. 2005. *Making Health Policy*. London: Open University Press.

Crisp N. 2007. *Global health partnerships: the UK contribution to health in developing countries*. London, TSO.

Figueroa-Munoz J, Palmer K *et al.* 2005. The health workforce crisis in TB control: a report from high-burden countries. *Human Resources for Health* **3**: 2.

Fritzen SA. 2007. Strategic management of the health workforce in developing countries: what have we learned? *Human Resource for Health* **5**: 4.

Gilson L, Raphaely N. 2008. The terrain of health policy analysis in low and middle income countries: a review of published literature 1994–2007. *Health Policy and Planning* **23**: 294–307.

Global Health Workforce Alliance. 2011a. *PIAT: Human Resources for Health National Policy Impact Assessment Tool*. http://www.who.int/workforcealliance/knowledge/toolkit/57/en/index.html, accessed 3 October 2013.

Global Health Workforce Alliance. 2011b. *Progress Report on the Kampala Declaration and Agenda for Global Action*. Reviewing Progress, Renewing Commitment. http://www.who.int/workforcealliance/knowledge/resources/kdagaprogressreport/en/index.html, accessed 17 July 2011.

Green A, Gerein N, Mirzoev T *et al.* 2011. Health policy processes in maternal health: a comparison of Vietnam, India and China. *Health Policy* **100**: 167–73.

Ha BTT, Green A, Gerein N, Danielsen K. 2010. Health policy processes in Vietnam: a comparison of three maternal health case studies. *Health Policy* **98**: 178–85.

Harries AD, Schouten EJ, Libamba E. 2006. Scaling up antiretroviral treatment in resource-poor settings. *The Lancet* **367**: 1870–2.

Health Sector Reform Secretariat. 2005. *Reversing the Trends: The Second National Health Sector Strategic Plan of Kenya (NHSSP II 2005-10)*. Nairobi: Ministry of Health.

Leeds HEPVIC Team. 2009. *Comparative Analysis Report on Health Policy-Making in China, India and Vietnam, Their Determinants and Their Inter-Relationships*. Leeds: Nuffield Centre for International Health and Development. http://www.leeds.ac.uk/nuffield/documents/hepvic/hepvic_d19_Comparative_analysis.pdf, accessed 17 July 2011.

Martinez J, Martineau T. 1998. Rethinking human resources: an agenda for the millennium. *Health Policy and Planning* **13**: 345–58.

McCourt W, Eldridge D. 2003. *Global Human Resource Management: Managing People in Developing and Transitional Countries*. Cheltenham: Edward Elgar.

Ministry of Health China. 2011. *2010 Health Statistics Yearbook in China*. Beijing: Peking Union Medical College Press.

Nyoni J, Gedik G. 2012. *Health Workforce Governance and Leadership Capacity in the African Region. Review of Human Resources for Health Units in the Ministries of Health*. Human Resources for Health Observer—Issue No. 9. Geneva: World Health Organization.

Organisation for Economic Co-operation and Development. 2002. *The DAC Journal: Development Co-operation Report 2001*. Paris: OECD.

Patterson M, Rick J, Wood S *et al.* 2010. Systematic review of the links between human resource management practices and performance. *Health Technology Assessment* **14**: 1–334.

Richardson R, Thompson M. 1999. *The Impact of People Management Practices on Business Performance: A Literature Review*. London: Institute of Personnel and Development.

Scheffler RM, Mahoney CB, Fulton BD, Dal Poz MR, Preker AS. 2009. *Estimates of Health Care Professional Shortages in Sub-Saharan Africa by 2015. Health Affairs* **28**: w849–62.

Sutton R. 1999. *The Policy Process: An Overview*. Working Paper 118. London: Overseas Development Institute.

Task Force on Scaling up Education and Training for Health Workers. 2008. *Scaling Up, Saving Lives*. Geneva: WHO/Global Health Workforce Alliance.

Torrington D, Hall L, Taylor S. 2002. *Human Resource Management*. Harlow: Financial Times Prentice Hall.

Ulrich D. 1997. *Human Resource Champions: The Next Agenda for Adding Value and Delivering Results*. Boston: Harvard Business School Press.

Ulrich D. 1998. A new mandate for human resources. *Harvard Business Review* **76**: 125–34.

Vujicic M, Ohiri K, Sparkes S. 2009. *Working in Health: Financing and Managing the Public Sector Health Workforce*. Washington, DC: The World Bank.

Walt G, Gilson L. 1994. Reforming the health sector in developing coun tries: the central role of policy analysis. *Health Policy and Planning* **9**: 353–70.

World Health Organization. 2006. *World Health Report 2006: Working together for Health*. Geneva: WHO.

Downloaded from https://academic.oup.com/heapol/article/30/1/111/566926 by IIM Ahmedabad Consort user on 09 November 2021