Round Table

Leading a change process to improve health service delivery

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Abstract In the fields of health and development, donors channel multiple resources into the design of new practices and technologies, as well as small-scale programmes to test them. But successful practices are rarely scaled up to the level where they beneficially impact large, impoverished populations. An effective process for change is to use the experiences of new practices gained at the programme level for full-scale implementation. To make an impact, new practices need to be applied, and supported by management systems, at many organizational levels. At every level, potential implementers and likely beneficiaries must first recognize some characteristics that would benefit them in the new practices. An effective change process, led by a dedicated internal change agent, comprises several well-defined phases that successively broaden and institutionalize the use of new practices.

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Voir page 660 le résumé en français. En la página 661 figura un resumen en español.

يمكن الاطلاع على الملخص بالعربية في صفحة 661.

Introduction

In the fields of health and development, donors channel multiple resources into the design of new practices and technologies, as well as programmes to test them. Yet even while donors fund infrastructure, equipment, supplies, staff development, or research for promising practices, these practices are rarely scaled up[1] to the level where they beneficially impact large, impoverished populations.[2] To make an impact, effective changes need to be implemented and sustained at many organizational levels. Thus at every level, potential implementers and likely beneficiaries need to recognize some characteristics in a new practice that would benefit them.[3] When projected benefits outweigh probable costs, new practices get adopted and processes developed for support.[4]

In this article we present the critical factors that facilitate change and describe the five phases that constitute a change process that produces results.

Critical factors that facilitate change

An effective process is key to changing service delivery practices in health.[4] Five critical factors facilitate effective change in health services: (1) a dedicated, internal change agent, (2) clear purpose, benefits and expected results, (3) clear responsibilities assigned, (4) long-term support for staff, and (5) an organizational environment open to change.

A dedicated internal change agent

An internal change agent is a highly committed individual within the programme who takes responsibility for a change in the long term.[5] These individu als are "early adopters" or "opinion leaders"[4] who have the credibility to influence others within their environment.[3]

One example of a change agent is the founder of BRAC, a large NGO in Bangladesh, who developed the initial formula for oral rehydration s olution in the late 1960s when he noticed problems undermining oral rehydration programmes there. Over the next 20 years, he created a cadre of field workers who spread the use of the formula door-to-door throughout the country.[6] Another example is a hospital director within the province of Negros Oriental in the Philippines who addressed the breakdown of referrals between municipal providers and district hospitals during health sector reform in the 1990s. He spoke with municipal doctors about their concerns and helped them realize that establishing a district health system would improve services. He built the consensus needed for the province to establish health districts. When he later became a district health officer within the province, he built district-wide consensus around proposals to secure grants for improvements.[7]

In the field of health, early adopters take part in coordinated decision-making about significant new organizational practices. As a result, early adopters not only *influence* opinions, but *lead groups* in developing, applying and advocating for new practices. They convey their commitment and enthusiasm to those who do the day-to-day implementation that ultimately translates new practices into norms. Successful change agents hold themselves and the management accountable for facilitating efforts of their staff to achieve results.

When donors and senior managers identify an internal agent to lead a change in practices "within the system," they link the innovation with someone familiar, i.e. with whom staff have already worked. For example, the Governor of Negros Oriental advanced local health care when he asked the enterprising hospital doctor to become a district health officer.[7]

Clear purpose, benefits and expected results

Before testing a new practice, the change agent secures the support of a "champion," a powerful senior manager, who uses personal influence to overcome

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indifference or resistance to the innovation. The change agent in turn communicates strategically, through actions and words, to the team and other managers on what the new practice is likely to accomplish. At the same time, the agent learns stakeholders' perceptions of the new practice and uses this information to project its potential benefits, thus making others aware of the importance of the change.

The agent's communication speeds up the adoption of changes in practices. Spontaneous adoption is often slow. For example, lemon juice became integrated into British sailors' diet 193 years after its effect was known.[8] Even now, despite increase in media publicity, spontaneous adoption of a simple health practice may still take 20 years.

By clarifying the purpose, benefits and expected results, the change agent also shapes the way others apply new practices. For example, trainers who trained community dispensers through the Cambodian National Malaria Center in the use of artesunate/mefloquine distributed blister packs of these medicines only to the trained dispensers, thus discouraging tampering and irrational drug use.[9]

Clear responsibilities assigned

As change progresses, the change agent and supervisors assign staff roles. The agent makes certain that those who test and implement the practice know their roles and can clearly communicate them to others. This helps in effectively implementing the change and encourages the staff to accept it.

Long-term support for staff

Throughout the change process, testers and implementers run into barriers that impede progress. Other responsibilities may cramp their ability to work through these barriers. The change agent thus engages supervisors and other managers to offer encouragement to the staff, secure institutional and community resources and garner necessary approvals. Supervisors can appropriately motivate staff by entrusting them with the challenge of integrating the new practice(s) into their work, clarifying changes in responsibilities and offering support when needed.

Organizational environment open to change

Changing practices is less difficult if the programme and community involved already empower people to work together to make improvements. If not, the process requires more time and political skill. For example, to adapt a tested approach, the change agent would need to prepare the groundwork for the change by reviewing experiences and noting successes and pitfalls. In this scenario, the senior champion assumes a greater role in protecting the endeavour until successful results are obtained.

The change process

A well-defined change process has five phases: (1) recognize a challenge, (2) identify promising practices, (3) adapt and test a set of practices, (4) implement the new practice(s), and (5) scale up the successful new practice(s).[10] The change process is likely to succeed when the five critical factors are integrated into each phase of the process.

Phase 1: Recognize a challenge

Where others see problems, a determined individual recognizes an organizational shortcoming that must be addressed to meet clients' needs. Early in the change process, this person reaches an agreement with others on this challenge and becomes a change agent involving others in creating a vision of a better future that generates commitment. Together, the change team identifies barriers to realizing this vision and the root underlying causes. The team then defiess their challenge and develops priority actions which address the root causes.[11]

Analyses of root causes will help in determining the underlying reason most responsible for each problem. The root causes may relate to people, procedures, policies, or the environment. For example, a human immunodeficiency virus/acquired immunodeficiency syndrome (HIV/AIDS) programme might define its challenge as "How can we increase the use of voluntary counselling and testing (VCT) when clients will not allow us to test for HIV?" The root causes that limit the use of VCT could include staff fears about those living with HIV/AIDS (people), the lack of treatment sites (policy), lack of networks for treatment referral (procedures), and communal discrimination against those with HIV/AIDS (environment). The use of the Five Whys[12] and Fishbone[13] techniques can help in exploring the root causes leading to a more robust solution.

Phase 2: Identify promising practices

The change agent identifies new practices that appear to have a high level of success and transferability, and can address the challenge without wasting time thus increasing the chances of impact.[14] Next, the change agent mobilizes a team to review the practices and guide the change process. If several possibilities exist, the agent and the team choose more than one set of practices supported by strong evidence, transferability, and the best match to existing needs, programme mission and resources.[15] At this point in the process, the agent brings the senior champion on board to determine the feasibility of these practices in terms of estimated time, cost and resources for implementation, as well as their potential for improving quality of care in the long term. Together they select one set of practices and begin planning for additional resources if these practices prove successful enough to be scaled up.

Phase 3: Adapt and test a set of practices

Every new practice needs to be adapted to its setting (i.e. fit to the context and work out any problems) so that others accept it. The change agent and the team analyse the new practices with regard to their setting and adapt them to conform to the unique characteristics of their location. To test the new practices, the agent identifies motivated testers, conveys the purpose of the test and the new practices, assigns staff responsibilities and communicates anticipated results. During the test, the agent develops monitoring processes and engages supervisors and other managers to assist the testers in overcoming barriers. The agent inspires staff about the "wins" achieved, however small.

When a good fit between the setting and practices is achieved, the test is repeated at several different demonstration sites (rural versus urban, and if suitable, clinic versus hospital or with less-expensive categories of staff). At this stage it is critical to evaluate the impact of the practices against predetermined indicators. Comparing these results against results from control settings allows for mid-course adjustments and the decision on whether to implement and scale up.

Phase 4: Implement the new practice(s)

Sometimes known as mainstreaming, this phase helps in building a support base that makes it possible to move from adaptation to actual application and integrates the new practices into the "root" systems of the programme.

The change agent, the team and the champion create opportunities to discuss how the changes link to programmatic goals to enlist the support of senior and other managers in the change effort. They reach an agreement on the required steps, on who would take them, and on the resources (in-kind, technical and financial) to mobilize. They broaden monitoring systems to track the effects of these practices and make adjustments as needed. They work towards supportive policies and management systems, including performance systems, rewards and structures that promote these practices. For example, research has shown that young adult reproductive health programmes have expanded worldwide through the development of curricula and standards of care, training of providers and establishment of policies that raise national awareness and support programme coordination.[16]

Phase 5: Scale up the successful new practice(s)

Scaling up expands the reach of the new practice(s) within and beyond the programme. The change team evolves into a guiding coalition with authority, contacts and staying power, such as a national public–private coalition that can perform outreach to other organizations or other levels, or a district planning board that can organize multiple changes at one level. While the change agent often hands over to a more senior and better-situated person in this phase, there is a need to first lay the groundwork for scale-up. The practices have to be streamlined so that fewer resources are required while maintaining effectiveness, and new communications strategies are developed tailored to different audiences.

The champions who replace the change agent and team form partnerships for planning and implementing the practices, build trust and handle inevitable conflicts among diverse groups. The champions may identify barriers to scaling up and plan mini-pilots to address them. For example, the Ugandan National Tuberculosis and Leprosy Program held a stakeholder workshop with donors when they realized that the scale-up of community-based DOTS for tuberculosis was slowing down. District and sub-district staff jointly identified barriers to progress and, in view of the knowledge about existing incentives and disincentives, devised solutions and planned steps to test them.[17,18]

Expanding support for the new practices

Throughout the change process, successful change agents and their teams continually face new audiences and need to convey benefits of the new practices to them. Thus, the need for maintaining relationships and effective communication is important. Messages for different audiences about potential results are created, their perceptions are ascertained and then these messages are suitably revised and disseminated to all who are directly and indirectly affected to keep them involved.

Change teams foster relationships with other potential adopters to initiate dissemination of the practices.[4] To motivate people to follow, they communicate the urgency of the change by accurately verbalizing the challenge that faces them.[19] If during implementation and scale up resistance occurs, change teams need to sympathetically handle individuals' doubts. When convinced, these individuals may welcome opportunities to explore the possibilities the change can bring.[20]

These messages and relationships need to be supported with evidence of results as they emerge through monitoring and evaluation. Since some practices take years to achieve full impact, a university or government research branch should obtain data prior to implementation and after scale-up to evaluate the effects of the practices.

Conclusion

All levels of government, nongovernmental organizations and communities, international donors and research or technical agencies who strive to improve health are fundamentally either supporting or leading changes in clinical and management practices that support community health. When change agents within health programmes lead others to address critical challenges, they can achieve widespread success by following a change process of adapting, applying and supporting promising practices incrementally throughout their programmes. By helping people perceive the benefits of a proposed change, these agents with their teams can gain widespread commitment to the change; and by integrating the new practices with programmatic values, behaviours and routine processes, they can make the change endure. ■

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Résumé

Pilotage d'un processus de changement visant à améliorer les prestations de service dans le domaine sanitaire

Dans les domaines de la santé et du développement, les donateurs consacrent des moyens importants à la conception de méthodes et de technologies nouvelles, ainsi que de programmes à petite échelle pour les tester. Toutefois, il est rare que l'application des méthodes ayant subi ces tests avec succès soit transposée à une échelle permettant que les populations démunies en bénéficient largement. Un processus de changement efficace consisterait à utiliser l'expérience acquise dans le cadre du programme de test pour organiser une mise en œuvre à plus grande échelle. Pour avoir un impact, les nouvelles méthodes doivent être appliquées

et appuyées par les systèmes d'encadrement à plusieurs niveaux organisationnels. A chacun de ces niveaux, les responsables de la mise en œuvre et les bénéficiaires potentiels doivent d'abord identifier les aspects de ces nouveaux concepts pouvant leur être profitables. Une personne interne au système et spécifiquement chargée de faire évoluer les procédés pourra alors piloter un processus de changement efficace, comprenant plusieurs phases bien définies, en vue d'élargir le champ d'application des nouvelles méthodes et de les faire entrer dans la pratique.

Resumen

Liderar un proceso de cambio para mejorar la prestación de servicios de salud

En los campos de la salud y el desarrollo, los donantes destinan muchos recursos a idear nuevas prácticas y tecnologías y a emprender programas en pequeña escala para ensayarlas. Pero las prácticas exitosas rara vez se extienden masivamente al nivel en que pueden beneficiar a amplias poblaciones empobrecidas. Una estrategia de cambio eficaz consiste en reproducir las experiencias de nuevas prácticas adquiridas a nivel de programas en aplicaciones a gran escala. Para que realmente tengan impacto, las nuevas prácticas deben ser aplicadas, y respaldadas por sistemas de gestión, a muchos niveles organizacionales. En cada nivel, los ejecutores potenciales y los beneficiarios probables deben reconocer antes que nada en las nuevas prácticas algunas características que puedan beneficiarles. Un proceso de cambio eficaz, dirigido por un agente interno especializado, comprende varias fases bien definidas que amplían sucesivamente el uso de las nuevas prácticas y las institucionalizan.

ملخص

تنفيذ عمليات التغيـير الرامية إلى تحسين إيتاء الخدمات الصحية

في مجالي الصحة والتنمية، عادةً ما يوجِّه المانحون موارد متعددة نحو تصميم ممارسات وتكنولوجيا جديدة، وبرامج صغيرة لاختبار هذه الممارسات والتكنولوجيا. غير أن الممارسات الناجحة نادراً ما ترتفع إلى المستوى الذي يتيح لها أن تؤثِّر تأثيراً مفيداً على المجموعات السكانية الكبيرة الفقيرة. وثَمَّة عملية فعالة للتغيـير، تتمثَّل في الاستفادة من الخبرات المكتسبة من الممارسات الجديدة على مستوى البرامج، من أجل تنفيذها على نطاق شامل. فلكي تحقق الممارسات الجديدة تأثيراً ملموساً، ينبغي تنفيذها ودعمها من خلال نظم إدارية في العديد من المستويات التنظيمية. وفي كل مستوى من هذه المستويات، يتعين على منفذي الممارسات المحتملين والمستفيدين المتوقعين منها أن يدركوا أولاً بعض الخصائص التي من شأنها أن تنفعهم في تنفيذ الممارسات الجديدة والاستفادة منها. فأي عملية تغيـير فعَّالة تقودها هيئة أو وكالة تغيـير داخلية متفانية، لابد وأن تتكون من عدة مراحل محددة جيداً، لتوسيع وترسيخ استخدام الممارسات الجديدة بشكل ناجح.

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Round Table Discussion

Accountability and good governance are essential to deliver health services

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The world over — and in developing countries in particular — the manner in which health services are delivered leaves much to be desired. In these situations, the people who suffer most are those in the poorest strata of society.

The above article by Claire Bahamon et al. identifies some of the bottlenecks and suggests solutions to them. The strategy of many service delivery programmes to date, which is highlighted, emphasizes concern for effectiveness but, surprisingly, seems to have almost totally neglected institutional and governance issues.

Key factors that the authors are unaware of or chose to ignore are corruption and lack of transparency, particularly in the national health services of developing countries. Without addressing these crucial issues it will not be possible to scale up good practices. Corruption can be defined as the use of public office for private gain. In measuring the impact of corruption on effectiveness of health spending, Rajkumar & Swaroop [1] analysed data from 1990 to 1997: controlling for GDP per capita, female educational attainment and urbanization, among other factors, they found that effectiveness of public health spending in the reduction of child mortality hinges on the integrity rating (1–5 ranges based on level of perceived corruption), with higher integrity associated with reduced mortality.

Yet another example of a total lack of regard for accountability is the misuse of public funds. For example, public funds diverted for private use could be described as theft. In addition, in the process of calling for tenders and making payments, acts of misappropriation are known to be made.

Another bane in the health sector is the marked lack of transparency in most parts of the world: a series of studies has placed developing countries at the top of the list. Bribes are the order of the day in most countries. The practice is so rampant in certain countries (e.g. Bosnia and Herzegovina [2]) that 35% of health officials declared that those who refuse bribes face some sort of retribution from those who accept them!

Reform aimed at facilitating access to health services could also be a participatory process involving the public, who could work in tandem with health officials — a step that would ensure more accountability and stem corruption. While there is no record of such participatory methods being the panacea in this respect, they could still prove to be effective as the integrity of public health officials would be put to the test. Citizens could also h ighlight shortcomings, irregularities and misdemeanours — verbally or in writing — all of which would help a ministry of health (representing a government) and its employees to address vital issues and contribute to a better health service.

Tackling issues of corruption and transparency that prevent the health sector from achieving optimum performance is worthy of mention, as it is also likely to assist a decline in poverty, mortality and morbidity as stated in the Millennium Development Goals.

These considerations bring to the fore the need to ensure good governance at all levels within the health sector. After all, what would the pouring in of valuable funds achieve, if those at the helm overlook or shrug off their responsibilities in respect of the functions that govern all connected activities? To deliver health care in a world where sickness is rampant is a task that needs a committed and concerted effort. The responsibility does not lie only with the health officials: it requires commitment by those involved with governance at all levels. ■

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Closing the knowledge translation gap will help to improve health service delivery

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The second half of the 20th century witnessed a remarkable expansion in the scientific enterprise to improve health and health care. As a direct result of public and private sector investments in biomedical research, life expectancy increased substantially in developed countries, and the natural course of many diseases has been considerably modified. Most importantly, new donors have emerged to address global health challenges. These successes, however, cannot obscure the fact that in all countries we have yet to learn how to translate improved knowledge into enhanced health — both rapidly and efficiently. A study from the United States estimated that it takes on average 17 years to turn 14% of funded research to the benefit of patient care.[1] Ironically, then, the translation gap is blind to geography and the net resources of any nation. Moreover, the slow uptake of effective knowledge spans the continuum from basic public health interventions to the most sophisticated treatments.

The above paper by Bahamon et al. focuses on specific aspects of this challenge as it relates to health and development in countries with large and impoverished populations. The authors identify critical factors likely to be successful in bringing about change, including: the need for dedicated internal change agents; a clear purpose, with anticipated benefits and expected results; clear roles and responsibilities; and strategies to nurture an organizational climate that can maintain and scale up positive results. An essential observation that we ignore at our peril is that the pace of spontaneous adoption can be pitifully slow; other points regarding the process of change are similarly thoughtful and worthy of serious debate. Bahamon et al.

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provide a straightforward model from problem identification through to implementation, which clarifies a logical series of steps that should be considered prior to launching any effort to improve health and health care. In short, they articulate clearly that failure to attend to all details of how improvements will be implemented and sustained will doom the best-intentioned efforts and even those that are well funded.

These issues merit broad debate and further assessment in their own right. For example, while a growing literature clarifies the importance of "change agents" and "champions", we do not yet know how to identify or cultivate these individuals, and few studies evaluate whether champions are specific to interventions or to topics. All organizations — from the most sophisticated hospital to a rural village — are by definition complex ecosystems that attempt to cope with multiple challenges concurrently. Our need to understand how cultural and environmental aspects support or impede change across specific conditions or populations cannot be overstated. For example, are participatory initiatives more likely to succeed than those that are perceived as externally driven or top-down approaches?

If readers retain one message it should be this: knowledge is necessary but is far from sufficient to effect sustained change and improvement. Definitions of "best practices" need to expand to incorporate specific characteristics related to effective adaptation and implementation. This round table underscores that opportunities exist for collaboration across initiatives to identify effective strategies for accelerating the pace at which advances in knowledge improve health. ■

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A structured improvement process sustains change in health service delivery and enables future improvement

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Well-intentioned donors, academic researchers and nongovernmental organizations regularly introduce creative interventions aimed at improving the quality of health care in developing countries. These interventions can make a significant difference to the lives of millions of people and can also be important sources of learning. Often, however, these pilot projects wither after a promising start: improvements cannot be sustained because local systems infrastructure is not built during the pilot phase, changes cannot be replicated with local resources, or no plan is developed to scale up or expand the changes beyond the boundaries of the initial project.

Bahaman et al. review five steps that are required to introduce an intervention in a resource-constrained environment and to nurture the process so that it grows and becomes embedded in the local environment. A further critical requirement is that implementers introduce a systems improvement plan and implant modern improvement methods into the environment they are seeking to change. The review rightly emphasizes the key role of the change agent: an active agent should be part of any improvement activity, though all stakeholders in the change should quickly develop skill in analysing and enhancing performance. Establishing a common aim is also a crucial starting point for any endeavour to change the system, and can often act as a rallying point or compass when a project seems to be losing its way. Finally, the role of testing change ideas on a small scale before widespread implementation is an important part of the process, since it allows local health workers to develop confidence in and ownership of the change.

The authors accurately describe the process of identifying challenges, determining the root causes of the problems, prioritizing the highest leverage changes to be tested, testing solutions on a small scale and then implementing successful strategies on a broader scale. In our experience, this process can proceed quickly through formation of a core improvement team within each health unit (e.g. clinic) that meets regularly, perhaps weekly, and is mentored by the change agent in continuously making local improvements and analysing the data from tests of these changes.[1] Broad change and rapid spread of successful pilot schemes can be accelerated by forming learning networks of improvement teams from multiple sites. Every level of the health care system — tertiary, secondary and primary care sites — should be represented, brought together by a common aim and acting, as much as possible, as an interdependent system, with each hospital or clinic making its best contribution to optimize limited resources.[2] This collaboration process needs to be well-coordinated by an experienced improvement expert.

Introducing change into a system when the change agent is not part of the government infrastructure (e.g. nongovernmental organization or academic unit) can be problematic if the local or regional health authority is not part of the process. It is crucial that local health structures such as the district health office are engaged in the design and leadership of change, and that change does not threaten their authority or pre-existing strategies. Securing governmental buy-in is even more crucial when contemplating scaling up successfully tested changes. Collecting and repeatedly disseminating data showing the effects of the change powerfully engages the support of local and regional departments of health.

Ultimately, sustainability and spread of new ideas will depend on the success of the initial change process, ownership of the change processes by the local health workers, a robust infrastructure for learning, and concomitant support from health-care leadership to allow local adaptation and testing of new ideas for improvement. A successful improvement process can transform the culture of health systems accustomed to introducing change through top-down approaches, ultimately empowering front-line providers of care, and building capacity to make future progress via a similar, structured improvement process. ■

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