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# **KINGDOM OF CAMBODIA NATION-RELIGION-KING**

## **HEALTHCARE QUALITY IMPROVEMENT HANDBOOK**

**SEPTEMBER 2021**

*A Guide to Enhancing the Performance of  
Quality Improvement Teams in Cambodia*

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## Chapter 1. Introduction

### Setting the Scene

Cambodia is on the path to attaining universal health coverage and achieving the Sustainable Development Goals (SDGs). According to new global guidance, however, service quality is also a critical factor. The Cambodian MOH has stated that care must be safe, effective, patient-centered, accessible, efficient, equitable and continuous. As such, the Third Health Strategic Plan (HSP3) highlights “equity in access to quality health services” and the commitment of the Royal Government of Cambodia (RGC) to improve the quality and safeness of healthcare in the country, thereby reducing overall harm.

Committing to a strategy for healthcare quality at the Government level sets the countrywide expectation to prioritize improving patient outcomes, as well as healthcare staff experience and wellness. Achieving this expectation requires the commitment and support of all stakeholders to enable staff at all levels of the healthcare system to make an impact on the outcome for service users.

RGC is working to establish a national healthcare accreditation system with QI at the core. The Cambodian Hospital Accreditation Standards have already been developed, accredited by the International Society for Quality in Health Care (also known as ISQua) and introduced in hospitals to define the quality of the healthcare services they provide. The National Policy for Quality and Safety in Health explicitly connects patient priorities and the values of those working within and supporting healthcare in Cambodia. On a practical level, the performance-based National Quality Enhancement Monitoring (NQEM) program carries out a quarterly assessment of public hospitals and health centers (HCs). Implementing facility-based QI initiatives can serve as a catalyst to complement, build upon and amplify the existing performance-based financing (PBF) approach to the newly developing accreditation system and empower frontline workers in making positive changes for their patients.

### QI Coaches

**QI coaches** are the primary target audience for this handbook. QI coaches are health managers or health professionals trained in QI, practicing QI and willing to work with the QI team of each health facility to support the improvement of the services provided by staff at all levels. The QI coach is responsible for coaching QI teams and building their capacity as they go through the MFI steps using the appropriate tools.

QI coaches in Cambodia are often the health managers of each facility. Others are subject matter experts from the operational district (OD) or provincial health department (PHD),

NQEM coaches, or people from national programs (such as the National Center for Tuberculosis and Leprosy Control [CENAT] and the National Maternal and Child Health Center [NMCHC]). There are also some coaches from nongovernmental organizations (NGOs) that focus on QI, like FHI 360 and the German Society for International Cooperation (Deutsche Gesellschaft für Internationale Zusammenarbeit). Lastly, the hospital QI coordinator, the position mandated by the Quality Improvement, Patient Safety, and Risk Management Standard (QIS.2) to coordinate QI activities, can also take on the role.

After the necessary training, some QI coaches will emerge from the QI teams — usually those who excelled in QI work at their facility and inspired others with their success and passion. Appendix 1 describes the responsibilities as well as the qualities and skills expected of a QI coach.

**Table 1. QI coach profile.**

Personal qualities	Understanding of the system	Communication and people skills	QI skills
<ul style="list-style-type: none"> <li>• Open to new ideas and willing to experiment and try new things</li> <li>• Enthusiastic</li> <li>• Persuasive</li> <li>• Likes to lead and take initiative</li> <li>• Passionate about improving the quality of healthcare in Cambodia</li> </ul>	<ul style="list-style-type: none"> <li>• Has extensive knowledge of the system that is under improvement</li> <li>• Has experience working in the system (for example, supervisors)</li> <li>• Is an expert in at least one area of the work</li> </ul>	<ul style="list-style-type: none"> <li>• Likes to work with people and empower them</li> <li>• Active listener</li> <li>• Provides constructive criticism</li> <li>• Enjoys facilitating discussions and meetings</li> <li>• Likes to explain complex ideas to peers</li> <li>• Is respected by peers</li> </ul>	<ul style="list-style-type: none"> <li>• Knows and practices the MFI</li> <li>• Knows and practices system thinking tools</li> <li>• Coaches a team rather than coaching individuals</li> <li>• Is open to collecting data to understand the problem</li> <li>• Likes to interpret and analyze data</li> </ul>

Extensive international experience and shared global learning have shown that using formal QI methods to address complex and recurring areas of concern will yield higher rates of success. Such challenges typically have multiple causes and require the involvement of a range of stakeholders to identify necessary improvements. Public and private health system contributors, as well as external health systems, add value and increase the speed of learning.

For QI efforts to be effective, it is necessary to choose the right tools and explore the appropriate theory of change for the situation. One successful combination is using the MFI framework as the logical basis of any QI effort while using IHI's collaborative model called the Breakthrough Series to set up, lead, support and spread large-scale QI efforts.

While RGC has increased equitable access to healthcare by expanding financial coverage, the suboptimal quality of health services has stalled progress toward universal health coverage — particularly within the public sector. Cambodia's vision for a health system capable of achieving the health-related SDGs requires a comprehensive, multifaceted approach to QI.

To strengthen the quality of service delivery, the MOH's Health Equity and Quality Improvement Project (H-EQIP) is implementing the NQEM system in all public hospitals and HCs throughout the country, excluding national hospitals. NQEM is a score-based quality assurance mechanism that is the basis of a PBF scheme where facilities and providers receive additional funds when they achieve certain scores. Quality assurance is a system for monitoring and ensuring that a process meets a set standard; meanwhile, QI is the method of improving that process to meet or exceed the standard. Established at different levels of Cambodia's primary and secondary public health system, NQEM is associated with creating a positive momentum toward improving healthcare quality. Quarterly assessments through the NQEM process conducted in provincial and district referral hospitals (RHs) and HCs focus on three dimensions of healthcare quality: structure, process and client satisfaction. NQEM, as an external quality assessment tool, should be complemented by a yet-to-be-institutionalized internal facility-based mechanism of continuous QI.

Quality improvement collaboratives (QICs) — established through the USAID-funded EQHA in target districts of Cambodia since 2019 — serve as catalysts that complement, build upon and amplify the effects of the PBF approach. Facility-based QI teams use the MFI to address the recurrent issues identified through NQEM assessments and other gaps that health facility providers have identified. NQEM coaches and QI teams are trained on the MFI, systems analysis and improvement tools such as Ishikawa diagrams, system and process mapping, and using change concepts to generate ideas that are then tested within the PDSA cycle. In a QIC, teams from various health facilities go through repeated iterative cycles of testing change ideas and sharing what they learned regarding processes and outcomes.

### [Results Achieved with the Use of the QI Approach in Cambodia](#)

NQEM assessments identified recurrent service delivery gaps in Cambodian public facilities, leading to the implementation of QICs to empower these facilities to address the gaps. The health providers prioritized areas including MCH, family planning (FP) services, infection prevention and control (IPC), and tuberculosis (TB).

QICs were implemented in 16 ODs across six provinces in Cambodia, including six RHs (from

January 2019 through December 2020) and over 163 HCs (from June 2019 through December 2020). Performance has improved in all these areas as a result of the change ideas that QI teams tested and implemented across multiple health facilities (Table 2). This also shows that QICs in Cambodia not only produce better results but also obtain results at scale.

## Chapter 2. Introducing the MFI

At the heart of QI in any industry is the goal of making positive changes in the system, including the input, processing and interpretation of outcomes. MFI is an evidence-based tool for testing and making positive changes in the health system. Don Berwick, IHI president emeritus and former administrator of the Centers for Medicare & Medicaid Services, once said that, although “the model isn’t magic,” it is a solid approach to testing change. It has been designed, tested and adapted to support the successful small-scale testing of change ideas. These tests build on evidence to support scaling up a change or build the confidence to abandon it if it does not work. Every part of the model is essential for making the process successful. This chapter introduces and gives an overview of the MFI before enumerating the details step by step in subsequent chapters.

The model has two parts (illustrated in Figure 1):

- The first part involves resolving three fundamental questions, which can be addressed in any order.
- The second part is the PDSA cycle to test changes in real work settings. The PDSA cycle guides the testing of a change to determine if it will bring about an improvement.

The MFI introduces the principle of testing changes while monitoring outcome and process measures to determine whether the changes could lead to an improvement. Testing also provides the space for any necessary modifications to the original idea before a change is adopted. Changes are tested using the PDSA cycle. The PDSA cycle is a scientific approach that enables a team to try a potential solution on a small scale before a system-wide implementation.

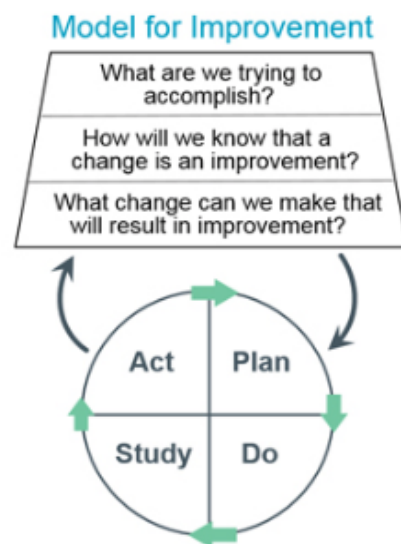


Figure 1. The two parts of the MFI.



## Chapter 3. Starting the Improvement Process: What Are We Trying to Accomplish?

Identifying the right area for improvement is the key to success. In most cases, the facility has a clear mandate from local health authorities or the MOH to address a certain health issue and achieve certain objectives. In Cambodia, identification of the area for improvement may rely on NQEM scores hospitals' journeys toward accreditation. Appendix 2 lists some guiding questions for creating an aim.

The design of the QI effort often requires a situation analysis or rapid assessment to define the borders of the system that needs improvement. The assessment process requires gathering information, defining expectations and obtaining consensus among the stakeholders of the system undergoing improvement. Table 3 outlines steps providing guidance to the rapid assessment.