



Report of the Kenya Health Data Collaborative

Resource Mapping for Health
Information and Monitoring and
Evaluation Systems

October 2017

Republic of Kenya
Ministry of Health



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Julius Korir, CBS
Principal Secretary, Ministry of Health

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ABBREVIATIONS

AMREF	Africa Medical Research Foundation
CMLAP	County Measurements Learning and Accountability Program
DFID	Department for International Development
DPT	data processing team
FA	focus area
GIZ	Deutsche Gesellschaft für Internationale Zusammenarbeit
HDC	Health Data Collaborative
HIGDA	Health, Informatics, Governance, and Data Analytics
HIS	health information system(s)
KHDC	Kenya Health Data Collaborative
KHSSP	Kenya Health Sector Strategic and Investment Plan
M&E	monitoring and evaluation
MEval-PIMA	MEASURE Evaluation PIMA
MOH	Ministry of Health
SDGs	Sustainable Development Goals
SUDK2	Sustaining Use of DHIS 2 in Kenya
UN	United Nations
UNICEF	United Nations Children's Fund
USAID	United States Agency for International Development
WHO	World Health Organization

FOREWORD

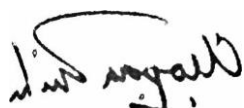
In September 2015, the United Nations Sustainable Development Goals set an ambitious agenda for a fairer, safer, and healthier world, with 17 goals and 169 targets that were adopted by all countries. Achieving the goals will require reliable data to properly understand the scale of the work to be done and to make good decisions about how to allocate resources for the most efficient and effective results. Lack of reliable data is a barrier to good decisions about where to target resources to improve health and help people to live longer, healthier, and more productive lives.

Over the past two decades, Kenya has received massive support for strengthening health information systems (HIS). To accomplish the vision for the health sector—i.e., “to provide equitable and affordable quality health services to all Kenyans”—the first Medium Term Plan 2008–2012 of Vision 2030 identified the need to strengthen national health information systems with timely and understandable information on health. Furthermore, health information was identified as a key investment area in the Kenya Health Sector Strategic and Investment Plan (2014–2018) for better coordination and alignment of healthcare resources.

Assessments using standard tools revealed that while progress has been made in improving data quality and level of analysis and use, Kenya was still having challenges in ensuring better resourcing, integration, and harmonization of efforts from stakeholders. These elements are essential for minimizing duplication of activities in the monitoring and evaluation (M&E) of HIS and ensuring the efficient use of available resources in strengthening health information systems.

The Kenya Health Data Collaborative conference, held in May 2016, brought all health sector stakeholders together to discuss one common M&E framework and to set milestones. Key “quick win” milestones were the midterm review of the Kenya Health Sector Strategic and Investment Plan (KHSSP) and resource mapping for HIS/M&E activities.

As a country, we are proud to show leadership by being among the initial group of countries who have embraced the Health Data Collaborative Initiative. We are also keen to learn from this platform what is working well elsewhere and adapt it to improve our health information and M&E systems. The future looks bright indeed.



Dr. Cleopa Mailu, EGH
Cabinet Secretary

1. INTRODUCTION

In September 2015, the United Nations (UN) Sustainable Development Goals (SDGs) set an ambitious agenda for a fairer, safer, and healthier world, with 17 goals and 169 targets that were globally adopted (UN, 2016). The third UN sustainable development health goal is “ensure healthy lives and promote well-being for all at all ages.” For this health goal, 13 targets were set along with indicators that are required to show progress toward achieving the set goal and targets. Monitoring progress toward achievement of the health SDGs requires countries to produce reliable health data and to make good evidence-based decisions about how to allocate resources for the most efficient and effective results (Gao, 2015).

In June 2015, leaders of global health agencies endorsed the Health Measurement and Accountability Post-2015 Roadmap and the 5-Point Call to Action (World Bank, United States Agency for International Development [USAID], & World Health Organization [WHO], 2015). Implementation of the roadmap and call to action requires specific country-led activities by stakeholders and development partners with a focus on strengthening the country’s monitoring and evaluation (M&E) systems for improved measurement of results and accountability. The five points outlined for the Call to Action on Measurement and Accountability are:

1. Investments: levels and efficiency (domestic and international)
2. Capacity strengthening (from data collection to use)
3. Well-functioning population health data sources
4. Effective open facility and community data systems, including surveillance and administrative resources
5. Enhanced use and accountability (inclusive transparent reviews linked to action)

1.1 The Health Data Collaborative

Global stakeholders interested in collaborating on health data investments joined together to form the Health Data Collaborative (HDC) (HDC, 2017). The main purpose of HDC is to enhance country statistical capacity and stewardship, and for partners to align their technical and financial commitments around strong, nationally owned health information systems (HIS) and a common M&E plan. At the global level, the work to establish common standards, indicators, and databases is geared toward contributing to country HIS. The collaborative is a unique initiative in helping countries improve measurement and accountability by using existing country systems.

Globally, HDC missions aim to promote technical and political support to the country-led health sector information and accountability platform in line with the common agenda for the post-2015 era and the 5-Point Call to Action for measurement and accountability of health results. The specific objectives of the HDC are the following (HDC, 2017):

- Enhance country capacity to monitor and review progress toward health SDGs through better availability, analysis, and use of data.
- Improve efficiency and alignment of investments in health data systems through collective actions.

- Increase the impact of global public goods¹ on country health data systems through increased sharing, learning, and country engagement.

1.2 The Kenya Health Data Collaborative

For Kenya's health sector to achieve the goals and objectives that are set out in the country health policy and strategic and operational documents, there is a need to establish and implement an accompanying robust and efficient HIS/M&E system. Recognizing this fact, the health sector, through the stewardship of the Ministry of Health (MOH), sought to bring all stakeholders in health together to forge a common course for M&E by holding the first Kenya Health Data Collaborative (KHDC) conference. To organise this conference, Kenya worked closely with the global HDC.

The first KHDC conference was attended by more than 150 participants drawn from different groups, including national and county governments, civil society, the private sector, and development partners, each representing their different constituencies (Health Data Collaborative, 2016a).

The conference had the following objectives:

- Raise the profile of SDGs and the global effort to strengthen country HIS/M&E systems as a platform for information and accountability.
- Rally all stakeholders toward support of a common country M&E framework through ensuring that there is a clear plan for the provision of long-term support.
- Agree on a high-level roadmap for implementation of priority HIS/M&E actions in Kenya.
- Launch the KHDC.

A highlight of the conference was the launch of the KHDC. Its main purpose is to enhance country statistical capacity and stewardship, and for partners to align their technical and financial commitments around strong nationally owned HIS and a common M&E plan. To this end, partners signed a joint communiqué outlining their major areas of commitment and identified six priority areas to advance commitment to a single M&E framework for the health sector in Kenya (MOH, 2016). Finally, partners deliberated on and adopted the KHDC roadmap (Health Data Collaborative, 2016b), which was informed by a strengths, weaknesses, opportunities, and threats analysis of Kenya's HIS/M&E system and the overall health sector M&E plan (MOH, 2014a). The roadmap consists of quick wins to be implemented through a rapid results initiative and short- and long-term priorities.

1.3 Mapping of Support for HIS/M&E in Kenya

Achievement of the KHDC objective of rallying all stakeholders in Kenya's health sector to one M&E framework that enjoys full support and implementation by all actors in health is intertwined with the need for partners to align their technical and financial commitments around strong, nationally owned HIS and a common M&E plan. Thus, one of the quick wins recommended for implementation was the comprehensive mapping of partner support to HIS/M&E activities in the health sector.

¹ These are "goods with benefits and/or costs that potentially extend to all countries, people, and generations. Global public goods are in a dual sense public: they are public as opposed to private; and they are global as opposed to national." Source: <https://nautilus.org/gps/applied-gps/global-public-goods/what-are-global-public-goods/>

In accordance with this recommendation, a partner resource mapping activity was initiated in August 2016. The goal of the mapping exercise was to estimate existing resources for Kenya's HIS from all sector stakeholders. This information would allow for more informed and efficient investments in HIS in the future. Resource mapping was also intended to help identify gaps and potential duplicative investments at the national and county levels, providing stakeholders with the evidence necessary to inform modification of their future investments according to the priorities set out in Kenya's health plans and especially in the M&E plan. Once completed, resource mapping would inform the development of a multi-year, multi-stakeholder investment plan for M&E that would align technical and financial assistance with country-defined priorities, reduce fragmentation and duplication of efforts, and lower the burden of reporting, resulting in more efficient and aligned investments in M&E.

2. OBJECTIVES OF THE RESOURCE MAPPING ACTIVITY

The objectives of this resource mapping exercise were to:

- Take stock of resource distribution and allocation for HIS/M&E activities across all the stakeholders.
- Identify potential duplicative investments in focus areas at the national and county levels.
- Consolidate gaps in focus areas and geographical distribution.
- Inform and initiate the development of a joint investment case for HIS/M&E in the health sector.

Expected outcomes are as follows:

- Better-informed and more-efficient investments in health information systems in future budget cycles
- Informed modification of future investments by all stakeholders to cover areas of most pressing need
- Clarity on the relative contribution of each partner—nationally and by county—to overall outcomes or impact
- Consolidation of resources and efforts in HIS/M&E on focus areas across national and county levels

The activity was implemented using a detailed Excel mapping tool, which was designed to help identify details of all investments in HIS/M&E. Each organization (e.g., donors, implementers, and government agencies) contributing to the development of Kenya's HIS was expected to complete the tool. Once the data were analysed, the stakeholders would be able to see where investments are duplicated (e.g., multiple agencies working on the same activity in the same county) or where gaps exist (e.g., no investment in a specific activity in an area).

The mapping tool addressed the following aspects of partner investments in HIS/M&E activities in Kenya:

- **Who:** All government agencies, funders, and implementing partners contributing to HIS
- **What:** Type of investment activities (e.g., district health information system rollout, HIS strategy, analytic training)
- **How:** Cost categories included within the focus area (e.g., training, equipment)
- **Where:** Investments by county and national levels
- **When:** Current budget year as well as a few future years, if information is available
- **How much:** Budget (or best estimate) for the activity by geographic area

3. METHODS

3.1 The Implementation Approach

The M&E Unit of the MOH was the custodian and coordinator of the resource mapping exercise. The activity began with adaptation of the mapping tool with help from partners, including the United Nations Children’s Fund (UNICEF), WHO, and MEASURE Evaluation PIMA (MEval-PIMA), funded by USAID. This was followed by a consultative meeting with all partners and stakeholders to provide comments on the tool. Partners who completed the initial version of the tool identified some areas requiring further refinement. Feedback was received from USAID, UNICEF, WHO, and Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ), and revisions were made accordingly. During a Development Partners for Health in Kenya meeting, and to maximize participation in the resource mapping exercise, stakeholders and partners were briefed on the need to conduct the activity, and detailed steps on how to complete the tool were carefully explained.

Data collection began in November 2016 and was conducted for a period of three months. Partners had the opportunity to ask questions and receive remote or onsite support concerning any part of the exercise.

3.2 Targeted Sample

The M&E Unit of the MOH was responsible for identifying participants for the resource mapping activity. Participants were identified through purposive sampling—partners implementing HIS/M&E activities were identified from information obtained from the Development Partners in Health in Kenya and the Health Nongovernmental Associations Network, organizations that maintain a comprehensive inventory of activities supported by their members in Kenya. Thirty partners, including the Government of Kenya, that contribute substantially to HIS/M&E activities at different levels were identified: Health Informatics Governance and Data Analytics (HIGDA) (Palladium), County Measurements Learning and Accountability Program (CMLAP) (Palladium), Sustaining Use of DHIS 2 in Kenya (SUDK2) (University of Nairobi), MEval-PIMA (University of North Carolina), PS Kenya, Global Affairs Canada/Department of Foreign Affairs, Trade and Development, Clinton Health Assistance Initiative, Danida, MOH, Bill & Melinda Gates Foundation, German Development Cooperation-GIZ, Japan International Cooperation Agency, Department for International Development (DFID), Kenya Health Management Information System project-Palladium (United States Centers for Disease Control and Prevention), Africa Medical Research Foundation (AMREF), Kenya Red Cross, TB Program (Global Fund), HIV Program (Global Fund), Malaria Program (Global Fund), UNICEF, WHO, Institute of Medicine (IOM), Joint United Nations Programme on HIV/AIDS, World Bank, African Population and Health Research Centre, ICL-I Choose Life, ICRH-Kenya, PATHFINDER, Elizabeth Glaser Pediatric AIDS Foundation (EGPAF), mHealth-Kenya, and Government of Kenya-MOH support. Twenty-eight out of 30 participants submitted their activity mapping templates with enough information for use in further data analysis, a highly positive response rate of 93 percent. Of the 28 participants, however, only 26 provided committed budgets for 2016–2017, and therefore only the data from these 26 participants have been analysed.

For activity completion purposes, the MOH, through the M&E Unit, attempted to contact an additional 10 multinational organizations for information on whether they support any HIS/M&E activities. However, there were no positive responses from these organizations. These multinational organizations were: European Union, France-Health Department, Korea International Cooperation Agency, Swiss

Development Corporation, World Food Programme, African Development Bank, United Nations Office on Drugs and Crime, United Nations Development Programme, United Nations Population Fund, and GAVI.

3.3 The Activity Mapping Tool

The activity mapping process required each participating organization to provide their estimated budget commitments by project, activity, implementing partners, and geography (e.g., allocations by county or national levels). An Excel-based activity mapping tool provided a basic template for recording these disaggregated budget estimates, as well as other activity details. The tool was made easy to use by including explanations as well as a dropdown list of input choices where possible. The following categories of information were collected from each partner.

3.3.1 Activity and Actors

- Program or Project Name
- Activity Name
- Source of Financing or Funder
- Financing Agent
- Implementing Agent

3.3.2 Activity Programmatic Classification

Focus Areas

Each activity from the partners was linked to at least one of six focus areas adapted from the classification of HIS/M&E activities in the Kenya Health Sector Strategic and Investment Plan (KHSSP) (Republic of Kenya, 2013). The six focus areas were identified as follows:

- Health information policy, planning, and monitoring
- Facility-based information
- Community-based information systems
- Health research information
- Disease surveillance and response
- Health surveys information

Subfocus and Development Partner Investment Areas

For clarity, each focus area was further classified into subfocus areas. This subclassification is illustrated in Table 1.

Table 1. Focus and subfocus areas

	Focus area	Subfocus area
1	Health Information Policy, Planning, and Monitoring	<ul style="list-style-type: none"> • Health information policies and planning • HIS data verification and quality assurance • HIS systems operations and maintenance • Annual sector performance reporting
2	Facility-based Information	<ul style="list-style-type: none"> • Facility-based information systems (training, printing forms) • Establishing and expanding electronic reporting systems • e-Health records system
	Focus area	Subfocus area
3	Community-based Information Systems	<ul style="list-style-type: none"> • Community-based monitoring of vital events • Community-based health information
4	Health Research Information	<ul style="list-style-type: none"> • Health and operations research • Health observatory
5	Disease Surveillance and Response	<ul style="list-style-type: none"> • Disease surveillance and response systems
6	Health Surveys Information	<ul style="list-style-type: none"> • Health surveys—service delivery section

Link to KHSSP Strategic Objectives

Partner investments in HIS/M&E were further linked to KHSSP (2014–18) strategic objectives and health investment areas and to KHSSP (2014–18) services. Thus, each participant identified, for each of their supported activities, the disease programs they were working under and the service delivery level that was targeted for support.

3.3.3 Geography

This category of information was intended to clarify whether the activity was to be implemented at the national or county level. In the case of county-level activity, a list of 47 counties was provided for participants to indicate the specific counties where implementation would be done. There was the option of selecting “Across all Counties” if an activity’s implementation would span all 47 counties.

3.3.4 Cost Category

This information was necessary to show the approximate allocation, as a percentage, of each activity’s budget across the main cost categories that had been identified for this exercise. The six expense categories were:

- Personnel
- Training
- Equipment
- Professional Services
- Operating Expenses
- Other Costs

3.3.5 Budget Commitments

This section sought to find out budget commitments for each activity for the next three fiscal years, including the current fiscal year (FY 2016–2017). Participants were requested to align their budget estimates with the government of Kenya’s July-to-June fiscal year cycle. Budgets were provided in the

participant’s preferred currencies, which were automatically converted to U.S. dollars. Participants were also asked to record any assumptions used in generating their respective budget estimates because these could be used later to help ensure consistency over time and across agencies. At a minimum, the respondents had to provide the activity budget for the current fiscal year to enable inclusion of their data in subsequent analyses.

3.4 Data Collection

The MOH team worked closely with a technical assistant from MEval-PIMA to administer the mapping tool and provide customized support for the data collection process. The technical assistant provided onsite support. The coordination team developed and regularly updated a submission tracking sheet listing all organizations that were expected to complete the mapping tool, along with their contact details and their status in completing the tool. This was very useful for monitoring progress and follow-up during roll out of this activity.

The resource mapping exercise proceeded as follows:

1. **Step 1:** Each organization completed the mapping tool, including both the “Organizational INPUT” and “Program INPUT” worksheets.
2. **Step 2:** Organizations submitted the completed tool to the coordination team comprising staff from the MOH along with support from the technical assistant.
3. **Step 3:** The coordination team conducted a data quality review and determined instances of double counting between funders and implementing partners. The coordination team liaised with each respective organization regarding potential errors and double counting.
4. **Step 4:** Organizations submitted final inputs to correct any errors.
5. **Step 5:** The coordination team consolidated all partner data into an Excel spreadsheet and added a pivot table for use in analysing data.

3.5 Data Processing

Elaborate data processing procedures were developed for resource mapping of Kenya’s HIS. These procedures accounted for the need to ensure that the data that the partner organisations submitted were complete and of high quality, and to eliminate any double reporting of support between different partners. Data from each partner were checked for completeness and accuracy and merged into an All Partners database that was eventually used for all data analysis. The following is a summary of the data processing steps followed in this exercise.

- **Submission:** Each participating organisation submitted a completed Resource Mapping template updated with information on the HIS/M&E activities they support in Kenya’s health sector.
- **Archiving:** The data processing team (DPT) received each submission and stored the original version based on the agreed-upon standard protocol. A copy of the data was also made, and the copy was used in subsequent data processing steps.
- **Merging:** Each quality-checked submission was processed and merged into the full (or “All Partners”) data set for final data cleaning and analysis.
- **Quality checks:** The DPT reviewed each submission—and each row—for completeness and accuracy.
- **Identification of double counting:** The DPT compared each submission to the full data set for potential double counting of investments. Double counting occurred when both the donor or

financier and the implementing partners submitted their support information. Where double counting was identified, duplicate rows of data were NOT removed, but they were clearly marked to allow accurate analysis.

- **Partner clarifications:** Where necessary, the DPT contacted the partner for any clarifications. Data processing steps four through six were repeated as many times as needed to ensure quality and completeness of the final data set.
- **Edit data set (if needed):** If sufficient clarification from partners was not received in a timely manner, the DPT had the discretion to make minor edits to the data set to enable further analysis. All edits were clearly marked or documented in the data set with comments and notes.
- **Reformat data set:** For easier analysis, the full data set was slightly reformatted for more convenient and effective analysis using the pivot table tool in Excel.
- **Create pivot table:** The final data set was used to create a user-friendly pivot table in Excel for easy analysis and to derive the main findings from the data.

3.6 Limitations

The limitations experienced in undertaking this activity were mostly because the tool was new and significant capacity support was needed for some organisations to input their data correctly. Specific challenges included:

- Classification of budget information detail was different for each organisation. Consequently, budgets did not easily conform to the reporting tool, and the information was not easily comparable across organisations.
- There was room for misinterpretation of the meaning of some data elements. For example, it was unclear whether the budget presented by the partner was specifically for activity-based expenses or also included the partner's own expenses, e.g., for their own staff operating expenses when supporting specific activities. This should be clarified in subsequent mapping exercises.
- The meaning of the different focus and subfocus areas may not have been uniformly understood by all partners who completed the tool. Since the focus and subfocus information provides the necessary link of the partners' activities to the KHSSP, in future there is need for closer engagement with the partners for a common understanding of the range of activities that fall under each HIS/M&E focus and subfocus area.
- Respondents who were still using older versions of MS Excel (2007 and below) had challenges accessing some of the drop-down options built into the tool. This caused them to use manual methods of data entry, sometimes keying in the wrong values and necessitating additional effort during the data cleansing phase.

4. RESULTS

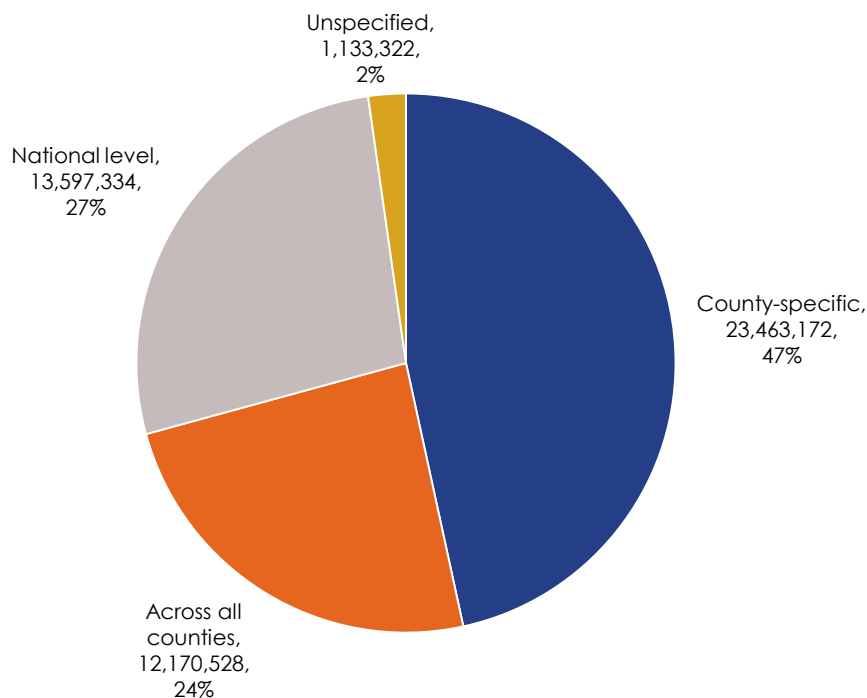
4.1 Overall Investment in HIS/M&E

This section describes the main findings based on analysis of the combined data received from the 26 partners who participated in the mapping activity and provided budget commitments for FY 2016–2017. The total FY 2016–2017 budget commitment from all these partners was US\$50,364,355.

4.1.1 Distribution of Budget across Implementation Levels

Figure 4.1 shows how the overall budget was distributed across the different geographical levels (national or county). The national level received a large allocation at 27 percent, and the rest of the budget was either allocated to specific counties or across all counties. A few partners did not indicate the level at which their budgets were allocated.

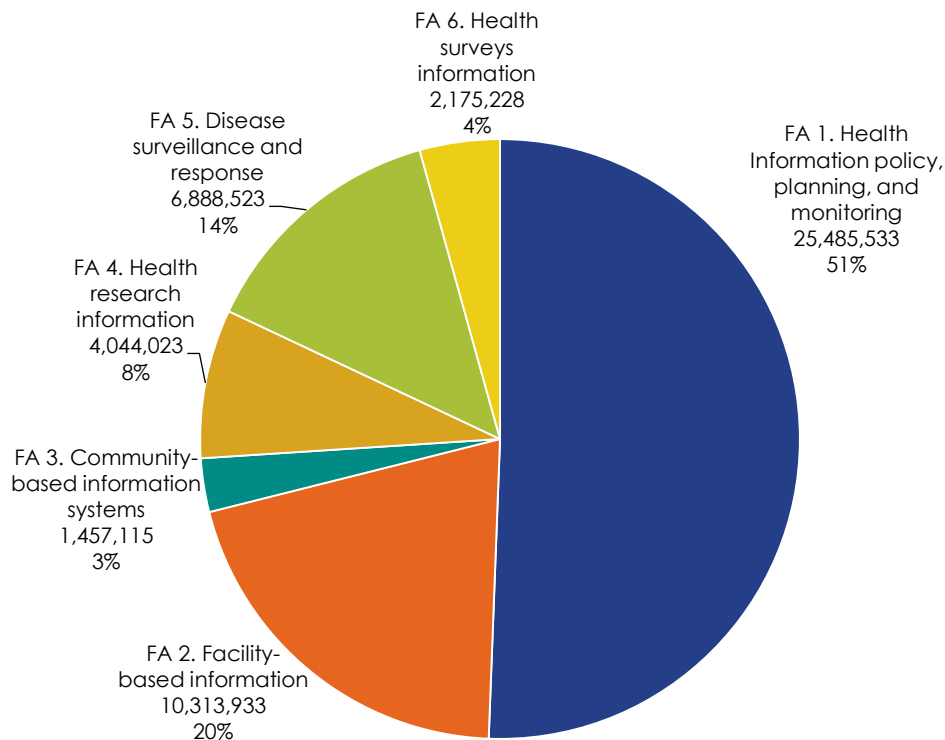
Figure 4.1. FY 2016–2017 budget distribution across implementation levels



4.1.2 Budget Distribution across Focus Areas

Figure 4.2 indicates that more than 50 percent of stakeholder investments in HIS/M&E was spent on Health Information Policy, Planning, and Monitoring (focus area [FA] 1), followed by investment in Facility-based Information (FA 2) at 20 percent, and Disease Surveillance and Response (FA 5) at 14 percent. Health Surveys Information (FA 6), Health Research Information (FA 4), and Community-based Information Systems (FA 3) received the least amount of resources, with allocations of less than 10 percent each.

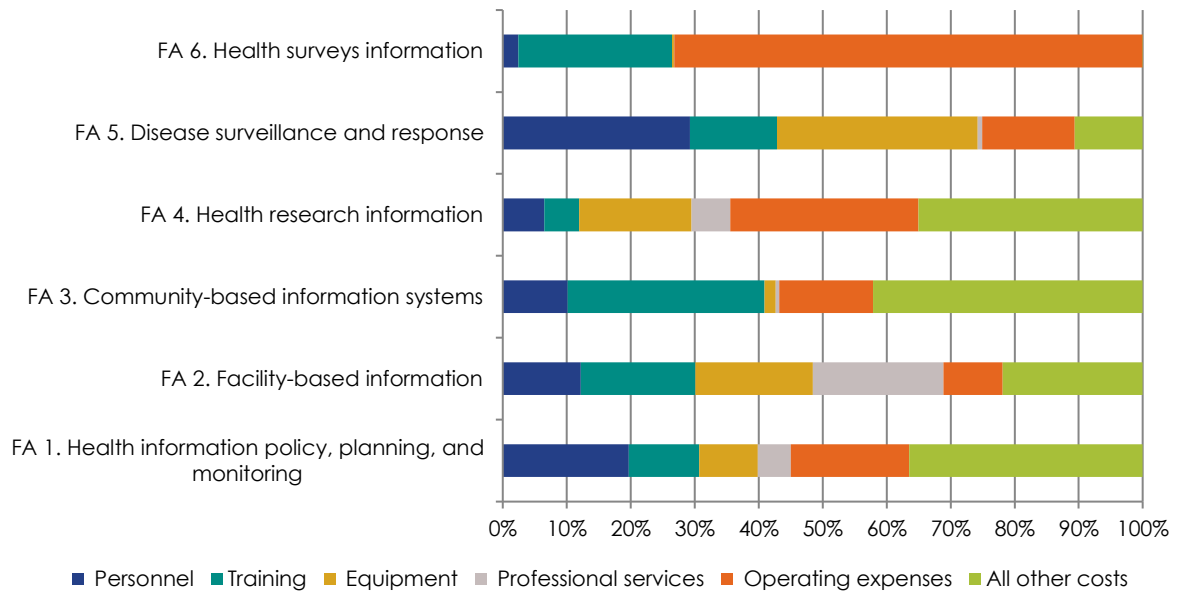
Figure 4.2. FY 2016–2017 budget distribution across HIS/M&E focus areas



4.1.3 Distribution of Funds across Cost Categories for Each Focus Area

A closer look at the six focus areas shows that the distribution of funds across cost categories differs depending on the focus area (see Figure 4.3). For example, operating expenses took up the largest proportion of the budget for Health Surveys Information (FA 6), and personnel and equipment took up the larger proportion for Disease Surveillance and Response (FA 5). For the remaining focus areas, other undefined costs took up the largest proportion of the budget.

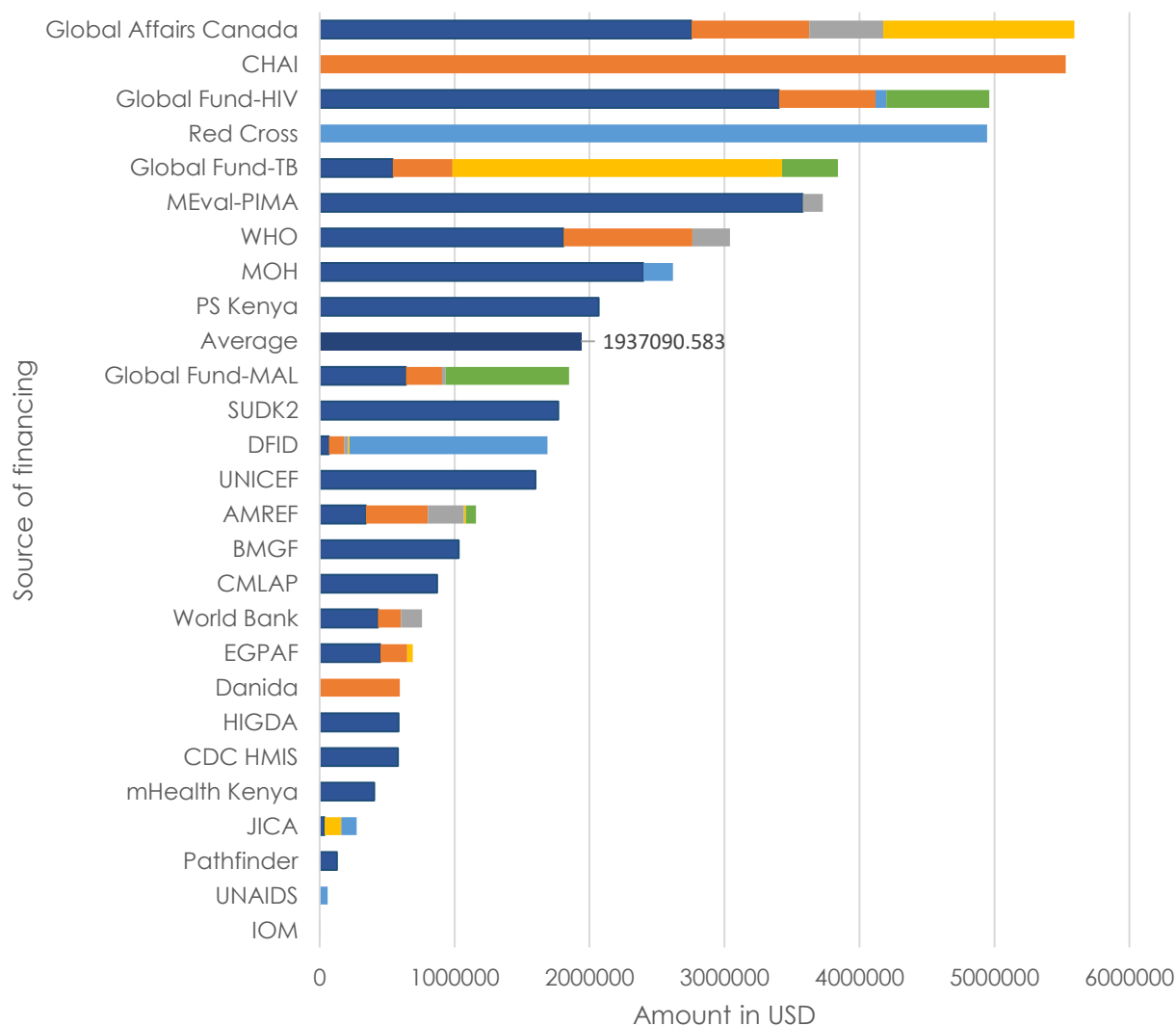
Figure 4.3. Distribution of funds across cost categories for each focus area



4.1.4 Individual Partner's Budget Allocation

Figure 4.4 shows total FY 2016–2017 funding from the various sources for each HIS/M&E focus area. Most partners have allocated budget to Health Information Policy, Planning, and Monitoring (FA 1). Global Affairs Canada contributes the highest budget allocation and the International Organization for Migration the lowest. The average of all partner budget allocations across HIS/M&E focus areas stands at US\$1,937,091.

Figure 4.4. Distribution of each partner's budget across HIS focus areas



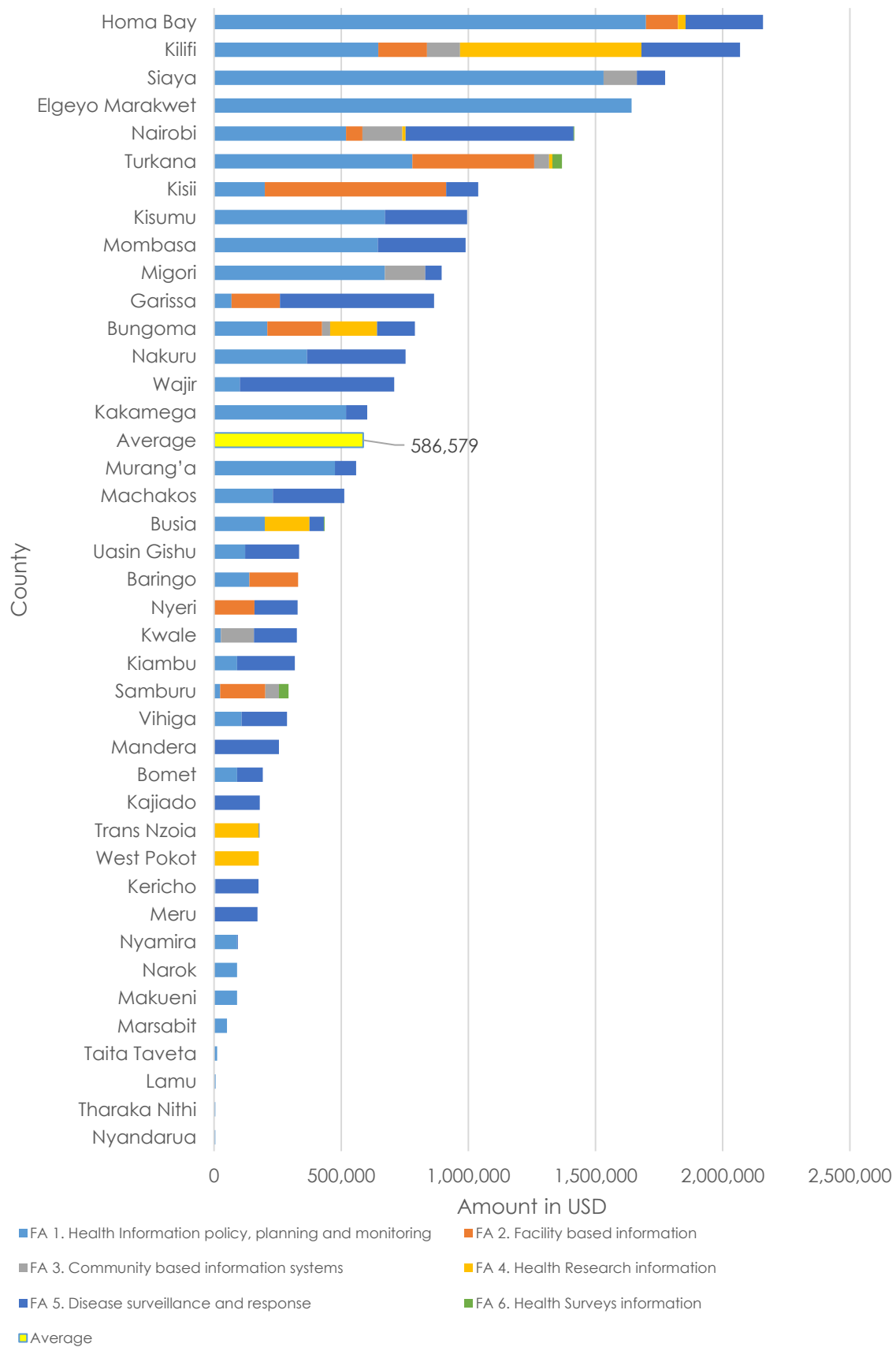
- FA 1. Health Information policy, planning, and monitoring
- FA 2. Facility-based information
- FA 3. Community-based information systems
- FA 4. Health research information
- FA 5. Disease surveillance and response

Key: CHAI (Clinton Health Access Initiative); MEval-PIMA (MEASURE Evaluation PIMA); WHO (World Health Organization); MOH (Ministry of Health); PS Kenya (Population Services Kenya); Global Fund-MAL (Global Fund-Malaria); SUDK2 (Sustaining Use of DHIS 2 in Kenya); DFID (Department for International Development); UNICEF (United Nations Children's Fund); AMREF (Africa Medical Research Foundation); BMGF (Bill & Melinda Gates Foundation); CMLAP (County Measurements Learning and Accountability Program); EGPAF (Elizabeth Glaser Pediatric AIDS Foundation); HIGDA (Health Informatics Governance and Data Analytics); CDC HMIS (United States Centers for Disease Control and Prevention Health Management Information System); JICA (Japan International Cooperation Agency); UNAIDS (Joint United Nations Programme on HIV/AIDS); IOM (International Organization for Migration)

4.1.5 Allocation of Investment in Different Counties

Of the 47 counties included in the mapping assessment, 40 counties received some level of budgetary support for HIS/M&E activities. Seven counties—Laikipia, Embu, Isiolo, Kirinyaga, Kitui, Narok, and Tana River—received no funding at all. Figure 4.5 shows the HIS/M&E focus areas that are funded across the 40 counties that receive budgetary support. The figure shows that budget distribution across the counties is disproportionate, with some getting a large share and others receiving minimal support or no support at all. Only Nairobi County had support in all six focus areas, and only 11 counties (23.4 percent) received support for more than three focus areas. In addition, only 15 of the 40 counties (35 percent) received support above the average amount of US\$586,579 based on the total F Y2016–2017 budget allocation by all stakeholders. Health Information Policy, Planning, and Monitoring (FA 1) was the most-funded in nearly all counties, and Health Research Information (FA 4) received the least amount of support.

Figure 4.5. Allocation of investment by county

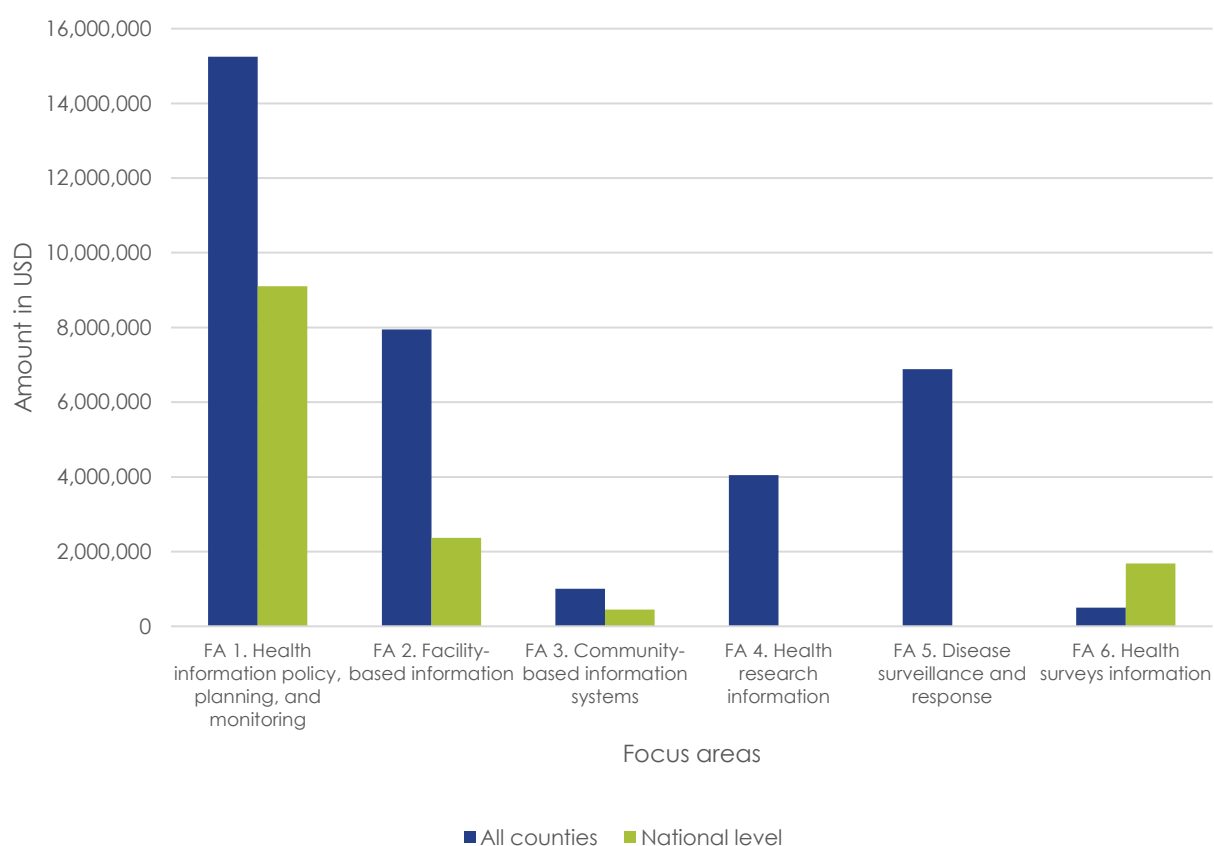


4.1.6 Distribution of Funds at the National Level and across All Counties

Figure 4.6 shows the combined budgetary support for the various HIS/M&E focus areas at the national and county levels. Overall, counties receive support in all six focus areas, but the national level does not receive support in two of the focus areas—Health Research Information (FA 4) and Disease Surveillance and Response (FA 5).

Data show that, at the county level, Health Information Policy, Planning, and Monitoring (FA 1) received the highest allocation (US\$15,251,264), and Health Surveys Information (FA 6) received the smallest allocation (US\$495,238). At the national level, Health Information, Policy, Planning, and Monitoring (FA 1) received the highest allocation (US\$9,100,947), and Community-based Information Systems (FA 3) received the smallest allocation (US\$451,259).

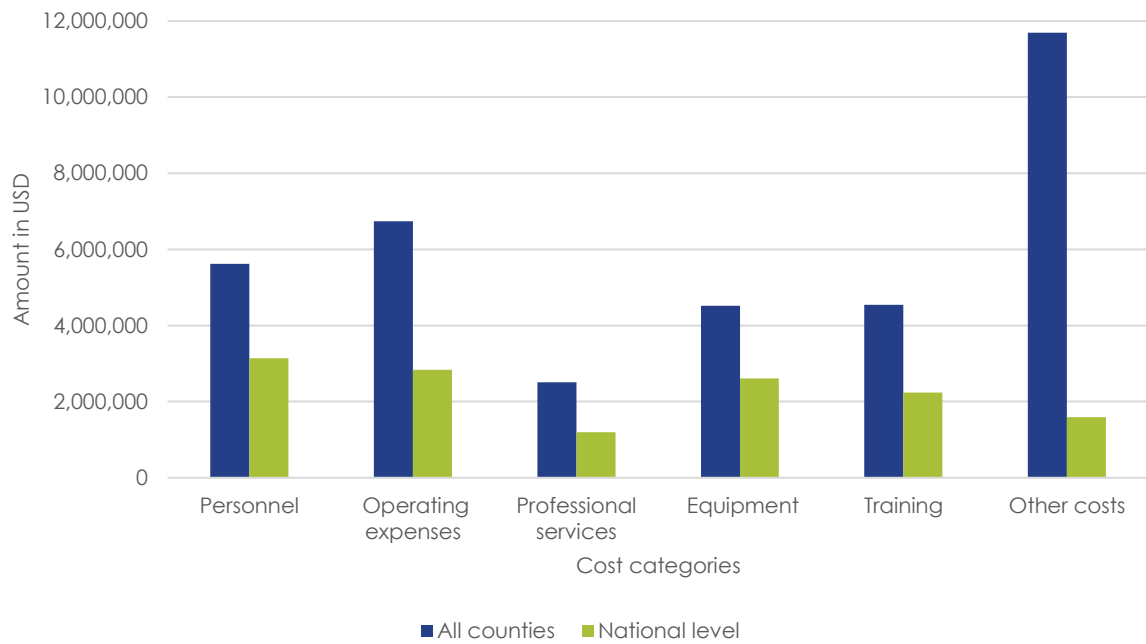
Figure 4.6. Funds allocation at national and county levels



4.1.7 Distribution of Funds across Cost Categories: National and County Levels

At a glance, counties were allocated more resources across all cost categories than were allocated at the national level (see Figure 4.7). However, keeping in mind that there are 47 counties, the average allocation per county for each cost category is less than the national-level allocation. Among the cost categories, operating expenses had the highest budget allocation, followed by personnel, equipment, and training; professional services had the smallest budget allocation. Section 4.1.8 drills down further to show the contribution to each of these cost categories by stakeholder and by county.

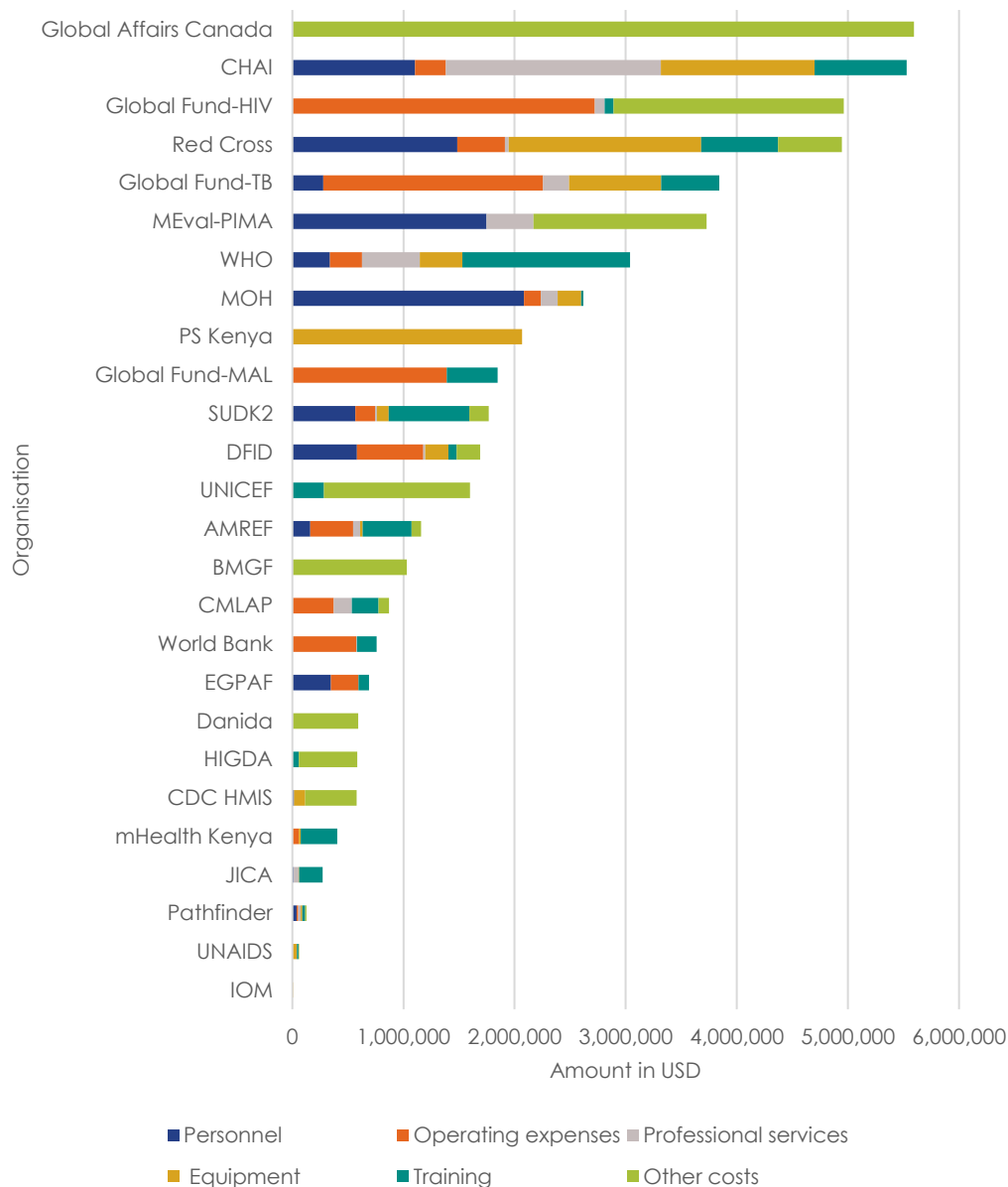
Figure 4.7. Distribution of funds across cost categories: National and county levels



4.1.8 Distribution of Funds across Cost Categories

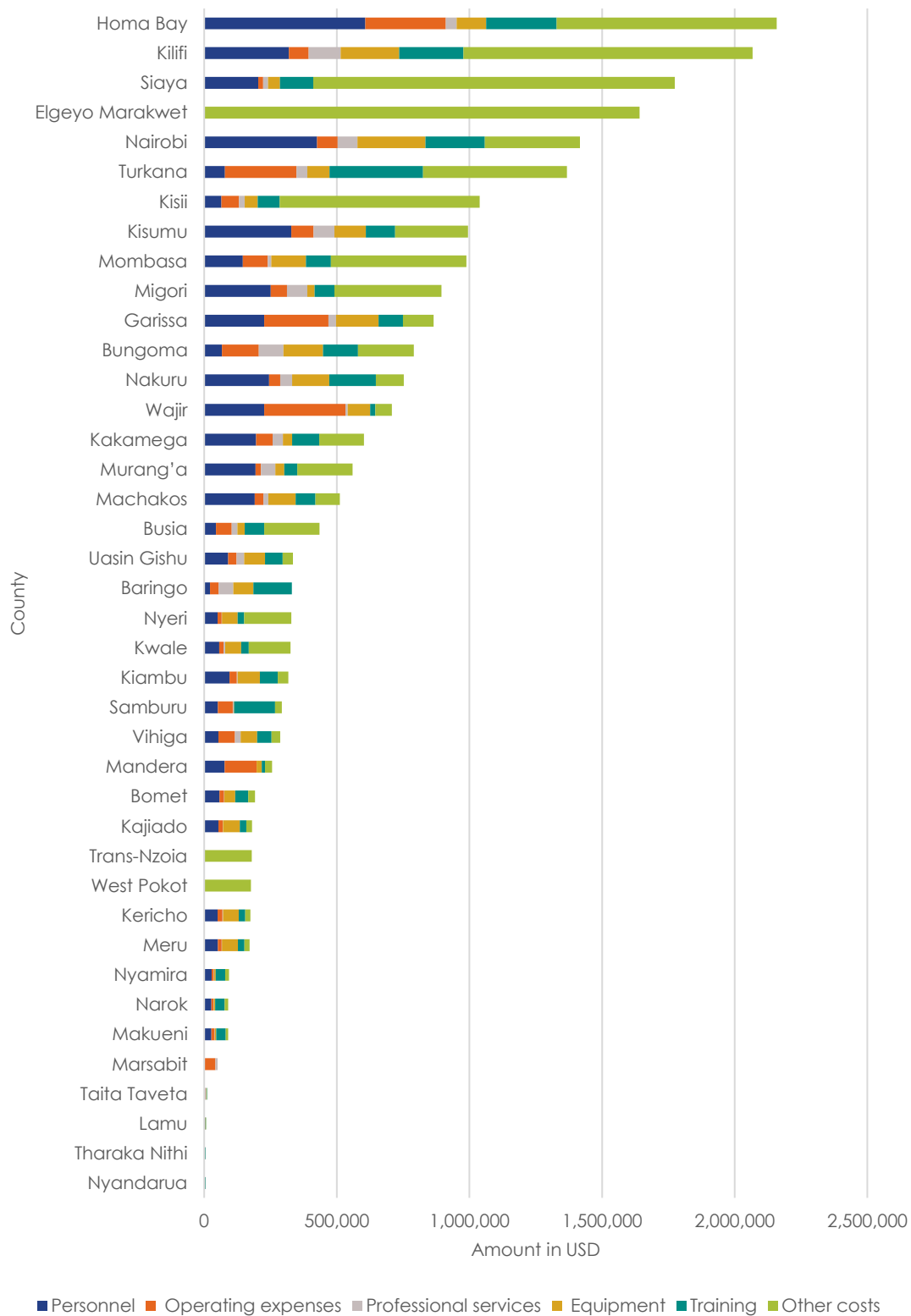
Figure 4.8(a) shows that most partners classified their supported-activities budget under other costs, followed closely by costs pertaining to personnel expenses. Figure 4.8(b) shows a similar pattern of budget distribution across cost categories at the county level.

Figure 4.8(a). Budget commitment across cost categories for each organisation



Key: CHAI (Clinton Health Access Initiative); MEval-PIMA (MEASURE Evaluation PIMA); WHO (World Health Organization); MOH (Ministry of Health); PS Kenya (Population Services Kenya); Global Fund-Malaria; SUDK2 (Sustaining Use of DHIS 2 in Kenya); DFID (Department for International Development); UNICEF (United Nations Children's Fund); AMREF (Africa Medical Research Foundation); BMGF (Bill & Melinda Gates Foundation); CMLAP (County Measurements Learning and Accountability Program); EGPAF (Elizabeth Glaser Pediatric AIDS Foundation); HIGDA (Health Informatics Governance and Data Analytics); CDC HMIS (United States Centers for Disease Control and Prevention Health Management Information System); JICA (Japan International Cooperation Agency); UNAIDS (Joint United Nations Programme on HIV/AIDS); IOM (International Organization for Migration)

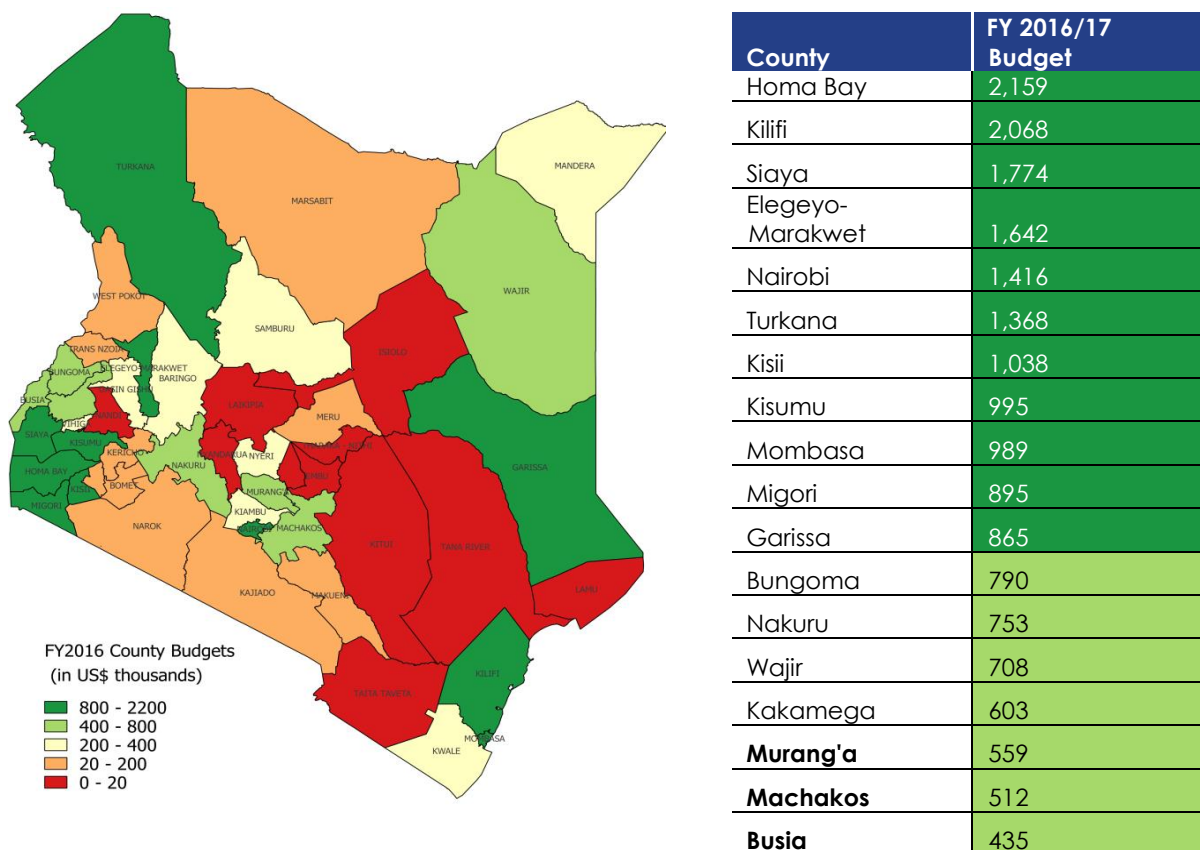
Figure 4.8(b). Budget commitment for each county across cost categories



4.1.9 Visual Representation of County Budgets

The map in Figure 4.9 represents the geographic distribution of FY 2016–2017 budgets across counties. It emphasizes the fact that this distribution has a wide variation throughout the entire country.

Figure 4.9. Map of FY 2016–2017 budgets by county (in US\$ thousands)



County	2016/17	County	2016/17	County	2016/17
Uasin Gishu	334	Bomet	192	Taita Taveta	12
Baringo	330	Kajiado	180	Lamu	6
Nyeri	328	Trans-Nzoia	179	Nyandarua	5
Kwale	325	West Pokot	176	Tharaka-Nithi	5
Kiambu	318	Kericho	174	Embu	0
Samburu	292	Meru	171	Isiolo	0
Vihiga	287	Nyamira	93	Kirinyaga	0
Mandera	255	Narok	91	Kitui	0
		Makueni	90	Laikipia	0
		Marsabit	51	Nandi	0
				Tana River	0

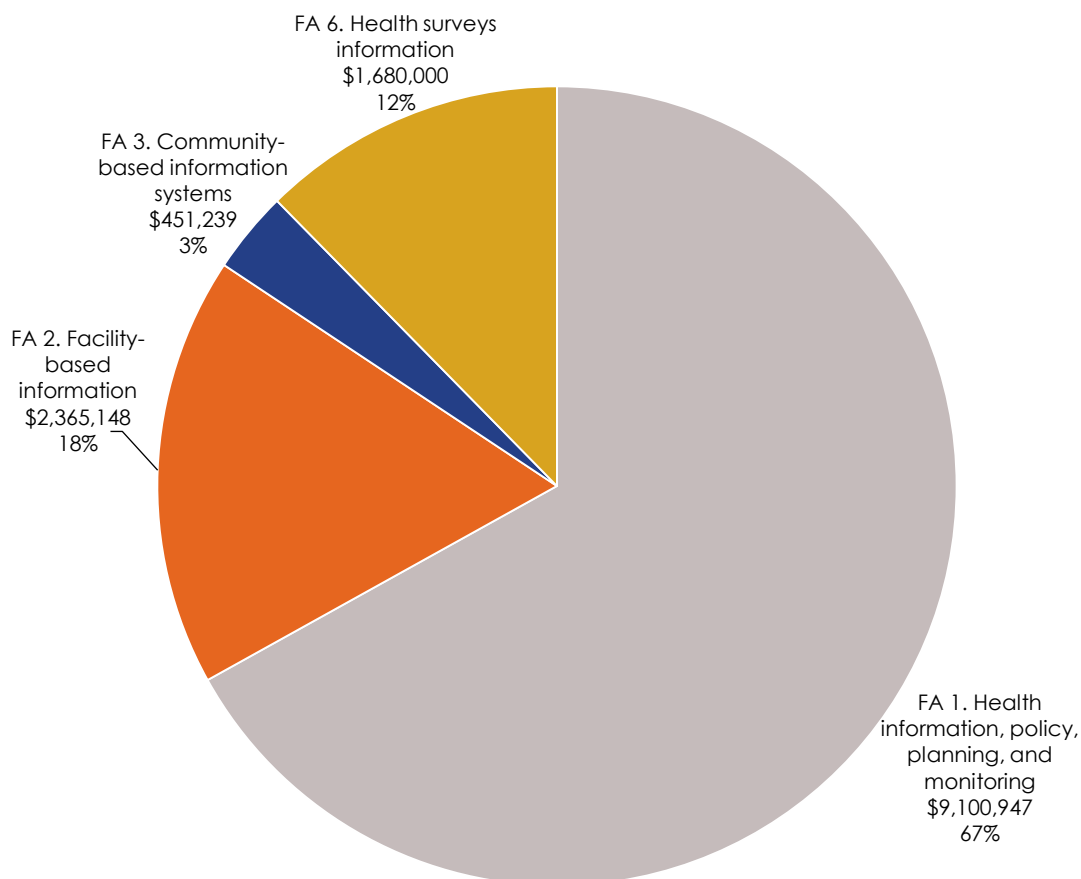
4.2 Focus on the National Level

From the analysis, at the national level approximately 27 percent of the total budget was allocated to support HIS/M&E activities. Additional analysis was done to further explore how the allocated funds were distributed across the HIS focus and subfocus areas at this level. It was interesting to see which organizations were supporting those activities and by what budgetary amounts, as well as the overall distribution of these funds across the different cost categories.

4.2.1 Budget Distribution across Focus Areas—National

Figure 4.10 shows that, at the national level, four out of the six HIS focus areas have been allocated some budgetary support. The first focus area, Health Information Policy, Planning, and Monitoring, represents the largest allocation at 67 percent.

Figure 4.10. Distribution of national budget across focus areas



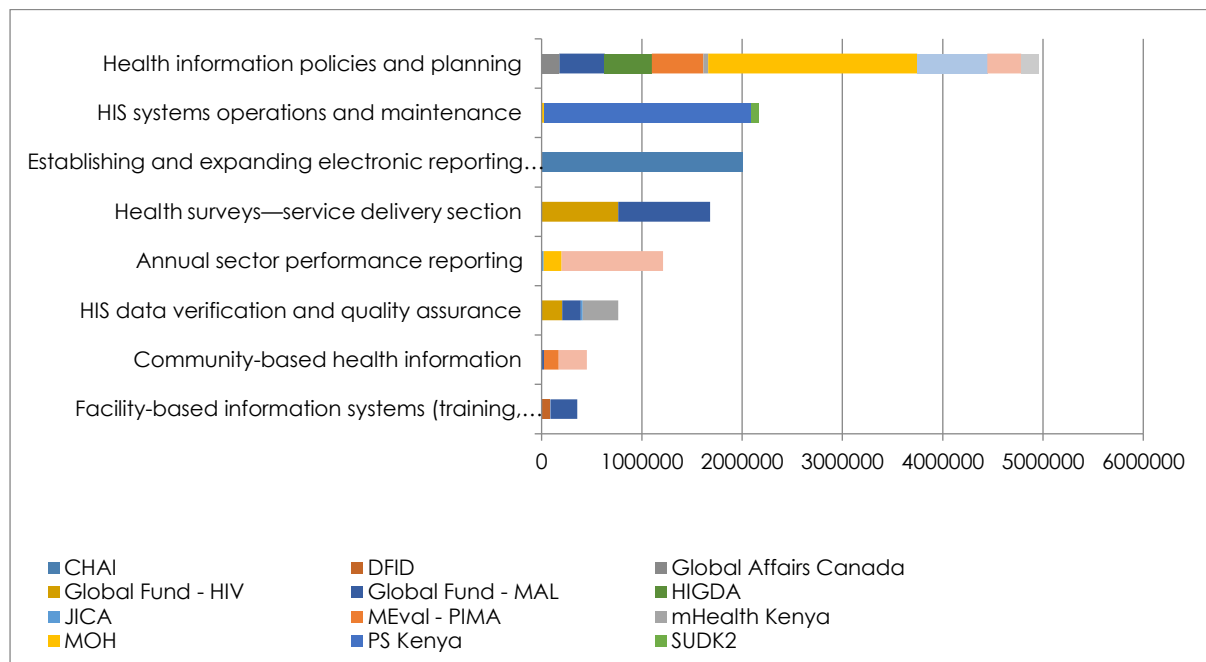
4.2.2 Budget Commitments across Subfocus Areas—National

Drilling down further to understand how this budget was allocated across subfocus areas, Figure 4.11 shows that, at the national level, the budget commitment is across eight subfocus areas. The largest proportion of this budget is allocated to health information policies and planning. The other subfocus areas that receive a sizeable amount of the budget are:

- HIS systems operations and maintenance
- Establishing and expanding electronic reporting systems
- Annual sector performance reporting
- Health surveys

The figure also shows that 15 of the 26 partners who participated in the mapping are supporting implementation of HIS/M&E activities at the national level. It is notable that the health information policies and planning subfocus area is supported by nine of these partners.

Figure 4.11. Partner support across subfocus areas at the national level

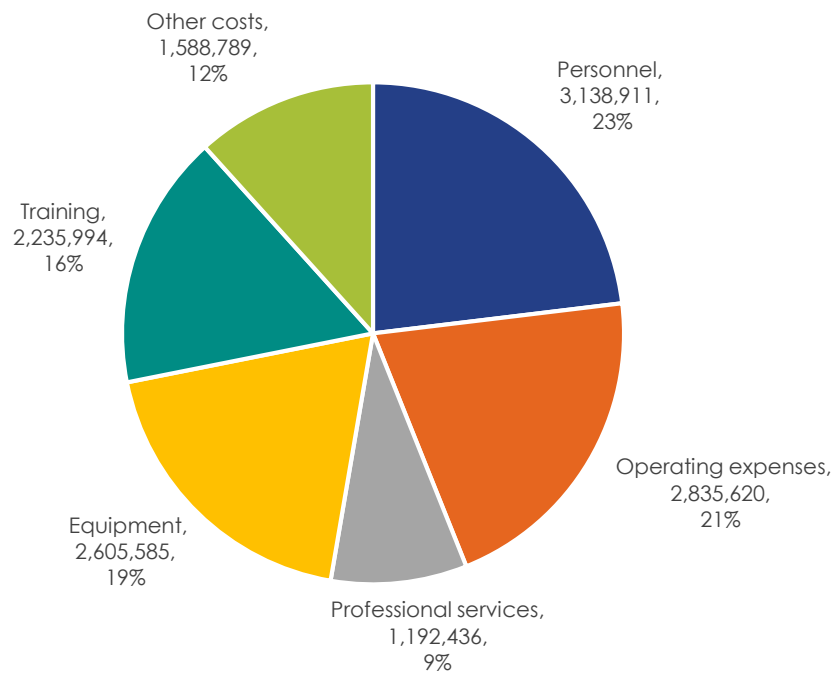


Key: CHAI (Clinton Health Access Initiative); JICA (Japan International Cooperation Agency); MEval-PIMA (MEASURE Evaluation PIMA); UNICEF (United Nations Children’s Fund); DFID (Department for International Development); Global Fund-MAL (Global Fund-Malaria); PS Kenya (Population Services Kenya); WHO (World Health Organization); HIGDA (Health Informatics Governance and Data Analytics); MOH (Ministry of Health); SUDK2 (Sustaining Use of DHIS 2 in Kenya)

4.2.3 Budget Distribution across Cost Categories—National

Figure 4.12 shows the distribution of the national-level budget by cost categories. Personnel, operating expenses, and equipment took up the bulk of the total budget at this level.

Figure 4.12. Budget by cost categories at the national level



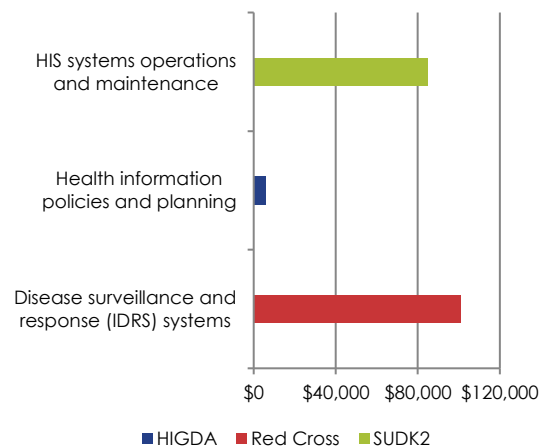
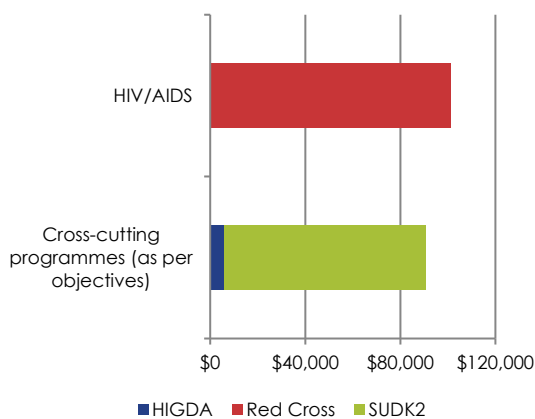
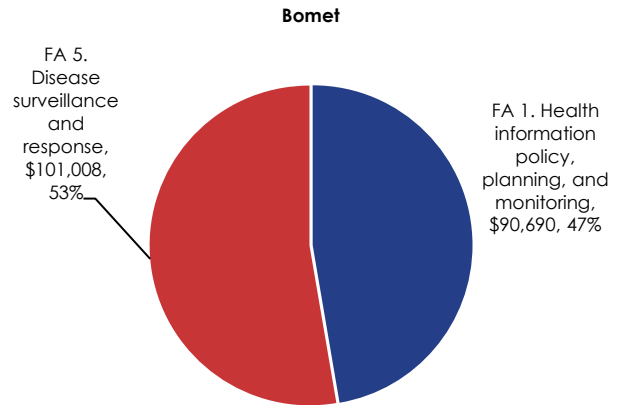
4.3 County-Specific Analysis

Bomet County

Figure 4.13(a) shows that in Bomet County, two of the six focus areas received budget allocations: Health Information Policy, Planning, and Monitoring (FA 1) received US\$90,690, and Disease Surveillance and Response (FA 5) received US\$101,008. It is notable that Disease Surveillance and Response received more funds (53 percent) than Health Information Policy, Planning, and Monitoring (47 percent). It depicts a scenario in which allocation of budget is limited to a few focus areas and disease programs. It is also possible that there is inaccurate mapping of partner support and what is observed is duplication of resources in one focus area.

Focus areas

Figure 4.13(a). Bomet County HIS/M&E budget allocation



Disease programs

The assessment found that for disease program areas, activities are supported by partners within the county, including HIGDA, Red Cross, and SUDK2. Red Cross focuses primarily on HIV/AIDS activities, with a budget allocation of approximately US\$100,000; HIGDA and SUDK2 support cross-cutting programs, with a combined budget allocation of approximately US\$90,000, with the major portion of this allocation funded by SUDK2.

Specific focal areas of investment

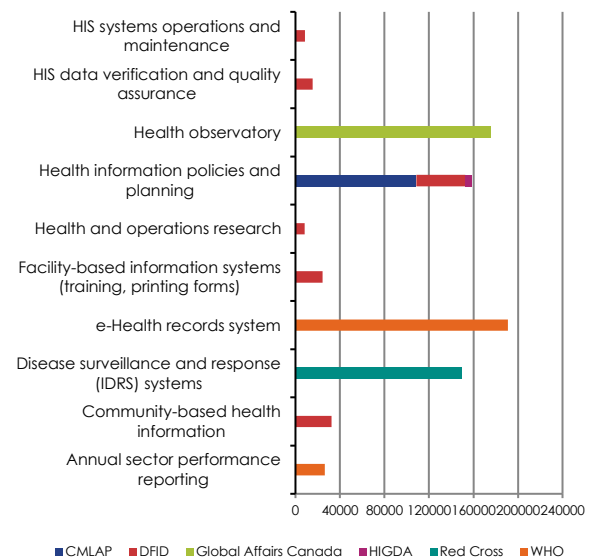
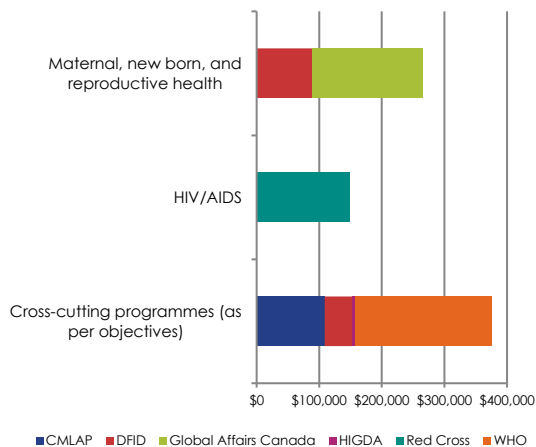
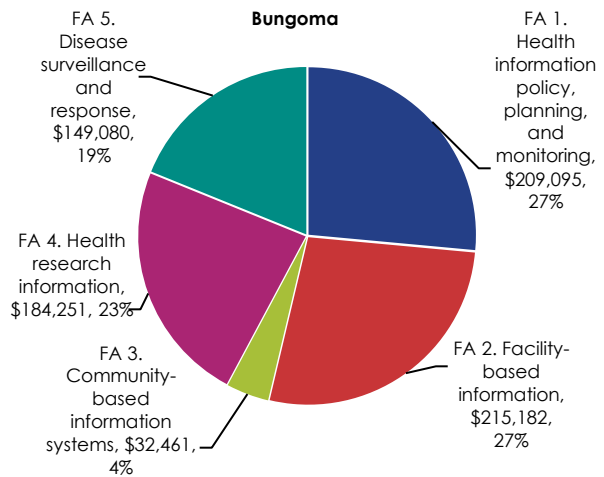
Red Cross is the leading partner in the county for the support of disease surveillance and response, with a budget allocation of approximately US\$100,000. SUDK2 supports health systems operations and maintenance, with a budget allocation of approximately US\$85,000, and HIGDA budgets approximately US \$5,000 for the support of health information policies and planning.

Bungoma County

Figure 4.13(b) shows that five out of six HIS/M&E focus areas have been allocated some budgetary support in Bungoma County. Facility-based Information (FA 2) is allocated the highest budget amount (US\$215,182), and Community-based Information Systems (FA 3) is allocated the least amount (US\$32,461).

Focus Areas

Figure 4.13(b). Bungoma County HIS/M&E budget allocation



Disease programs

For disease programs that receive budget allocations, the assessment found that four partners—CMLAP, DFID, HIGDA, and WHO—support cross-cutting programs as per objectives; in addition, the Red Cross budgets funds for HIV/AIDs, and DFID and Global Affairs Canada provide budget support for maternal and new born and reproductive health.

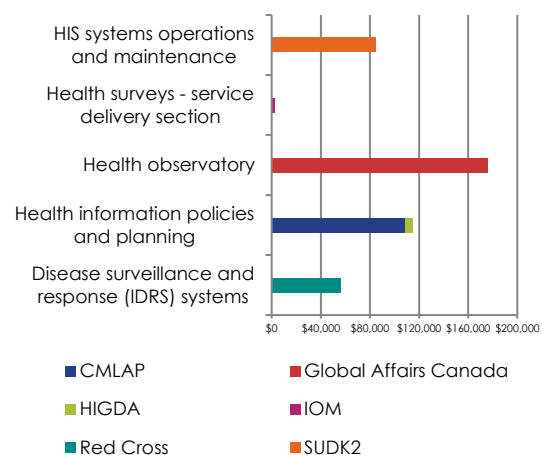
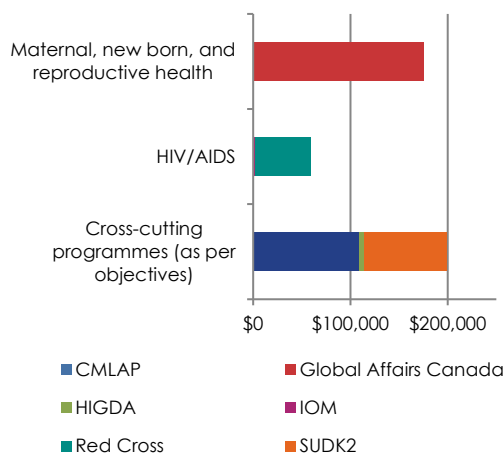
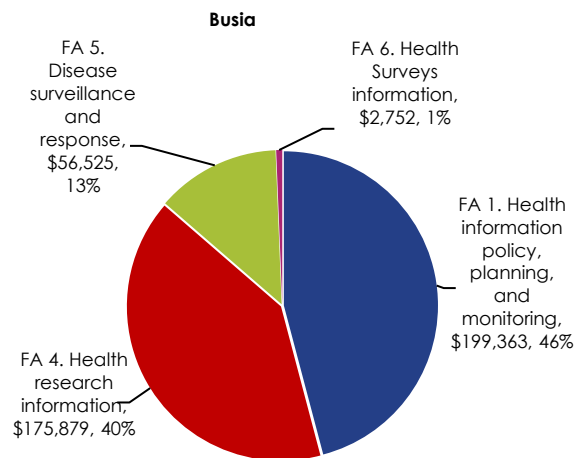
Specific focal areas of investment

Busia County

Figure 4.13(c) shows that in Busia County four out of the six HIS focus areas have been allocated some budgetary support. However, Health Surveys Information (FA 6) received only 1 percent of the total budget allocation, and Facility-based Information (FA 2) and Community-based Information Systems (FA 3) received no budget at all.

Focus areas:

Figure 4.13(c). Busia County HIS/M&E budget allocation



Disease programs

For disease programs that received budget allocations, maternal and new born and reproductive health (US\$175,000) and cross-cutting programs (US\$175,000) received the highest budget allocations. The main investment area being funded in Busia County is the Health Observatory, a subfocus area of Health Research Information (FA 4), with a budget allocation of approximately US\$175,000. The lowest budget amount, less than US\$10,000, was allocated to health surveys—survey delivery section, a subfocus area of Health Surveys Information (FA 6).

Specific focal areas of investment

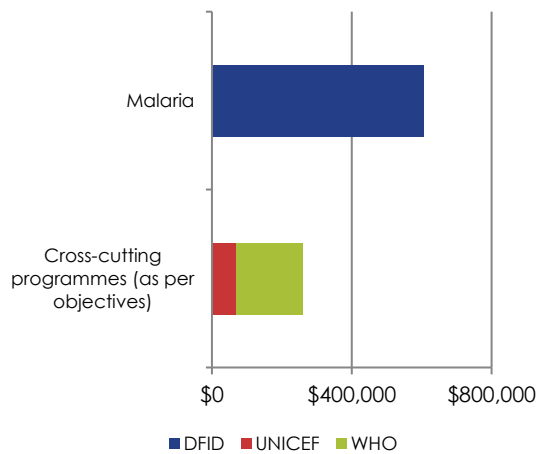
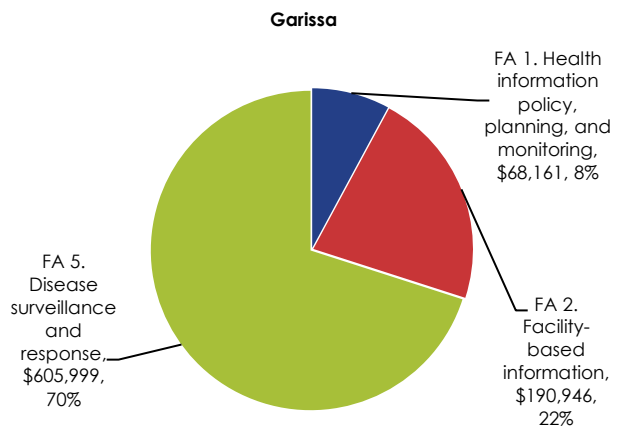
Garissa County

Figure 4.13(d) shows that in Garissa County, for the three focus areas receiving support, Disease Surveillance and Response (FA 5) received the most support (US\$605,999), and Health Information Policy, Planning and Monitoring (FA 1) received the least support (US\$68,161).

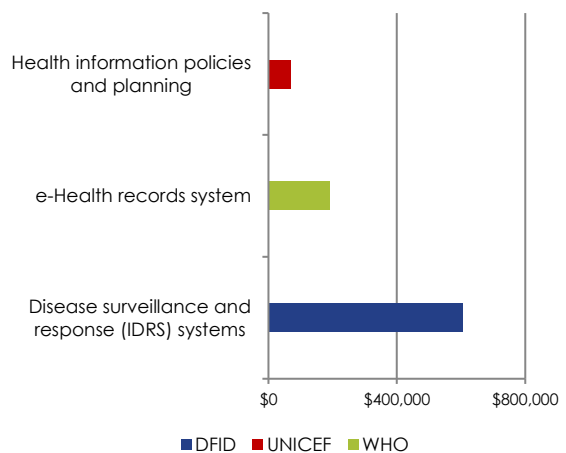
For FA 5, support comes primarily from DFID and was directed specifically to the malaria program. Support from DFID accounts for most of the resources going to Garissa County.

Focus Areas

Figure 4.13(d). Garissa County HIS/M&E budget allocation



Disease programs



Specific focal areas of investment

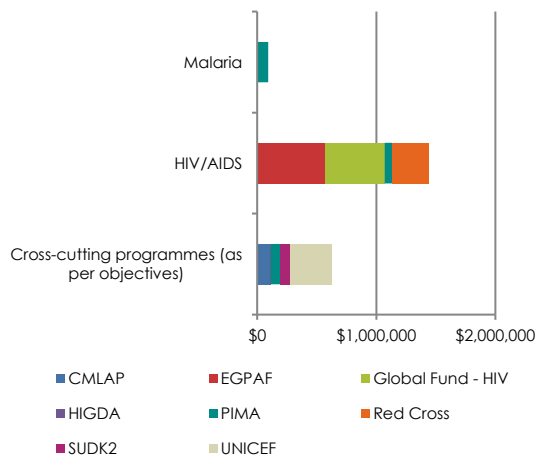
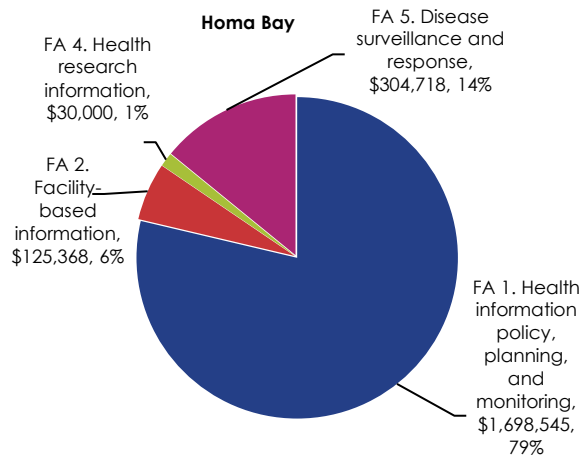
Homa Bay County

Figure 4.13(e) shows that four out of six HIS/M&E focus areas receive some budgetary support in Homa Bay County. Health Information Policy, Planning and Monitoring (FA 1) has the highest budgetary allocation (79 percent), and Health Research Information (FA 4) has the lowest (1 percent).

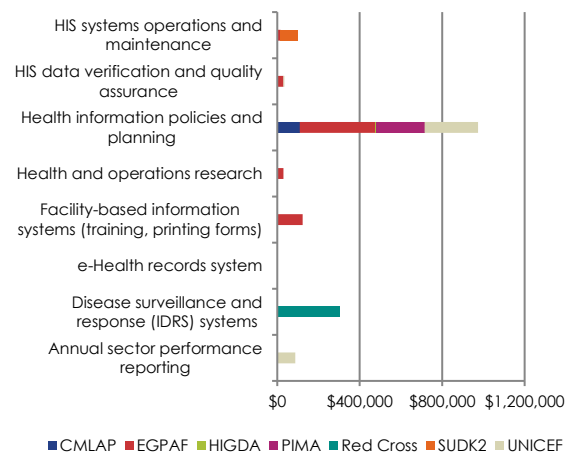
For disease programs receiving funding, HIV/AIDS received the highest budgetary allocation from the four partners supporting it. Malaria received the lowest budgetary allocation, with only one partner, CMLAP, supporting it. For specific investment areas, health information policies and planning received the highest budgetary allocation, with five partners supporting it; e-health records system received the lowest allocation and is being supported by only one partner, UNICEF.

Focus Areas

Figure 4.13(e). Homa Bay County HIS/M&E budget allocation



Disease programs



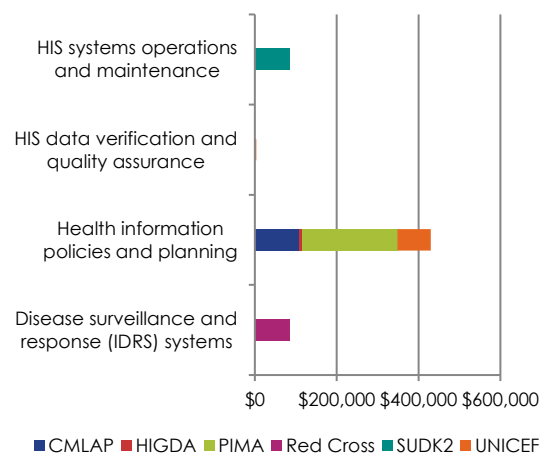
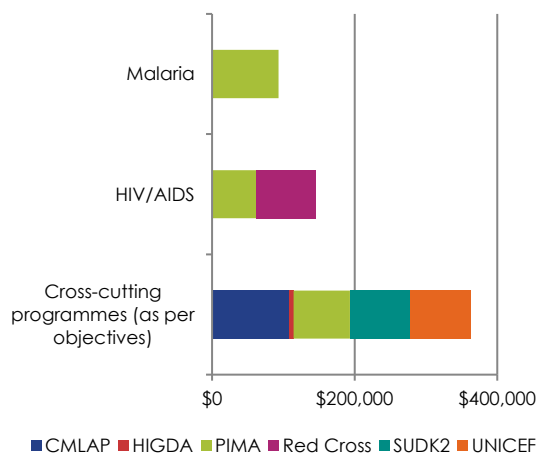
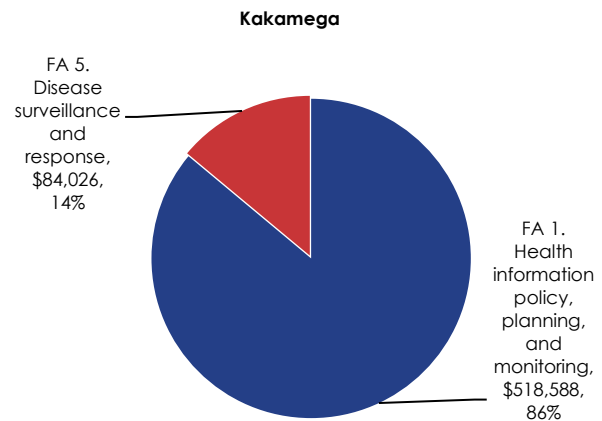
Specific focal areas of investment

Kakamega County

Figure 4.13(f) shows that the main focus area for HIS/M&E investment in Kakamega County was in Health Information Policy, Planning, and Monitoring (FA 1), with a budget allocation of US\$518,588, or 86 percent of the entire budget. Specific investment support of slightly more than US\$400,000 from a number of partners, including CMLAP, HIGDA, MEval-PIMA, and UNICEF, was given to health information policies and planning. HIS systems operations and maintenance was funded by SUDK2 in the amount of approximately US\$80,000. In addition, HIGDA invested just under US\$10,000 for HIS data verification and quality assurance. The other HIS/M&E investment focus area was Disease Surveillance and Response (FA 5), with a budget allocation of US\$84,026, and a specific investment of US\$80,000 in disease surveillance and response systems from the Red Cross.

Focus Areas

Figure 4.13(f). Kakamega County HIS/M&E budget allocation



Disease programs

Within the disease program area, partners MEval-PIMA, CMLAP, HIGDA, SUDK2, UNICEF, and Red Cross focused their HIS/M&E resources on HIV (about US\$150,000), malaria (US\$100,000), and cross-cutting programs (US\$350,000). MEval-PIMA supported all three program areas, the Red Cross focused mainly on HIV, and the remaining partners focused on cross-cutting programs.

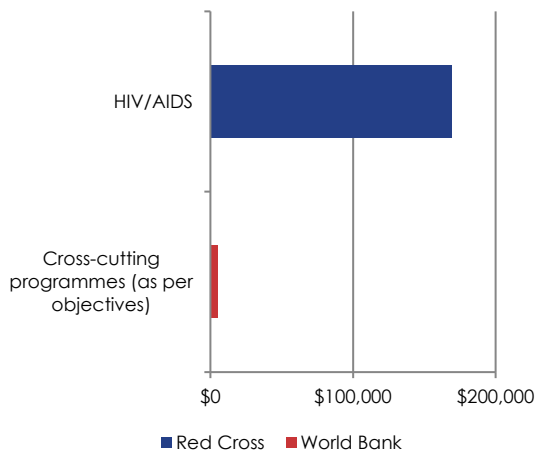
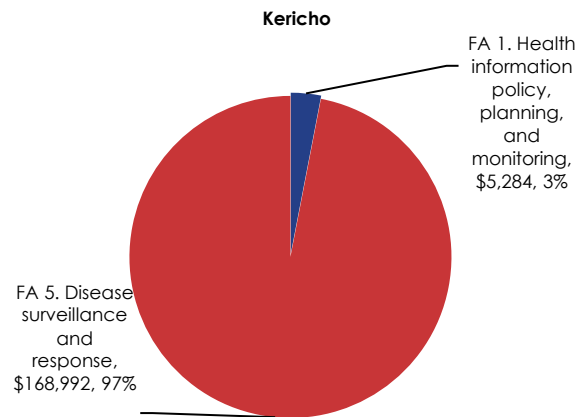
Specific focal areas of investment

Kericho County

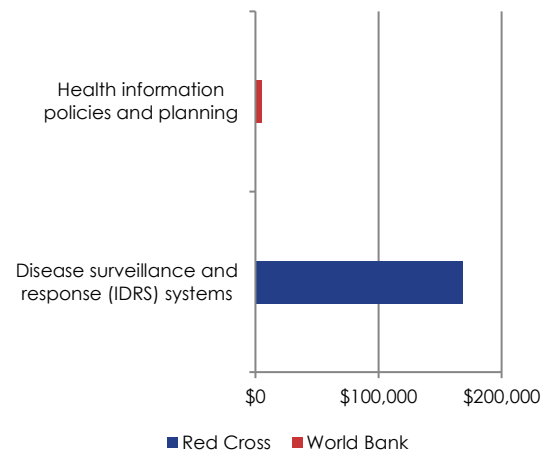
Figure 4.13(g) shows that for Kericho County, the main focus area for HIS/M&E investment was Disease Surveillance and Response (FA 5), with a budget allocation of US\$168,992 (97 percent of the budget) from the Red Cross, the main partner. Health Information Policy, Planning, and Monitoring (FA 1) had an allocation of 3 percent, supported by the World Bank. In terms of disease programs, 97 percent of funding was directed toward HIV/AIDS, with only 3 percent designated for cross-cutting programs.

Focus Areas

Figure 4.13(g). Kericho County HIS/M&E budget allocation



Disease programs



Specific focal areas of investment

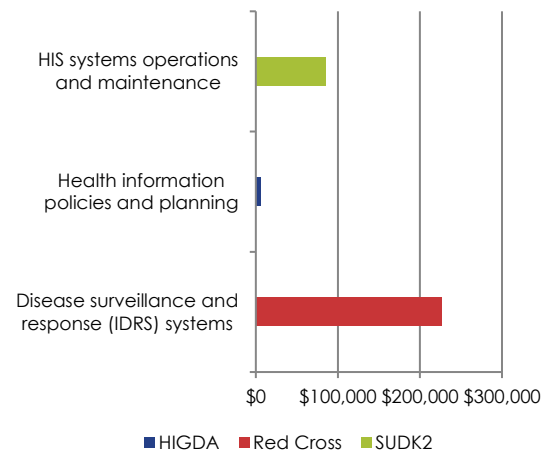
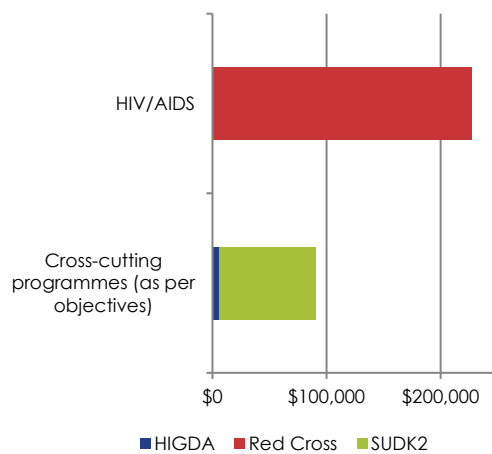
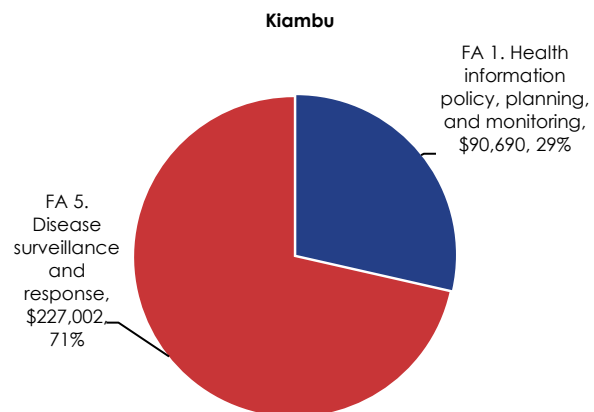
Kiambu County

Figure 4.13(h) shows that Kiambu County receives support in two focus areas: Health Information Policy, Planning, and Monitoring (FA 1) and Disease Surveillance and Response (FA 5).

FA 5 is allocated the largest share of total funding, receiving 71 percent, equivalent to US\$227,002.

Focus areas

Figure 4.13(h). Kiambu County HIS/M&E budget allocation



Disease programs

Most of the funding support in Kiambu for disease programs is received from Red Cross and supports the HIV/AIDS disease program area. HIGDA and SUDK2 are also providing some support to cross-cutting programs in Kiambu. For specific investment areas, Disease Surveillance and Response systems receive the largest proportion of HIS/M&E funding. The subfocus area of HIS systems operations and maintenance is supported by SUDK2 at slightly less than US\$100,000, with some minimal support from SUDK2 for the subfocus area of health information policies and planning.

Specific focal areas of investment

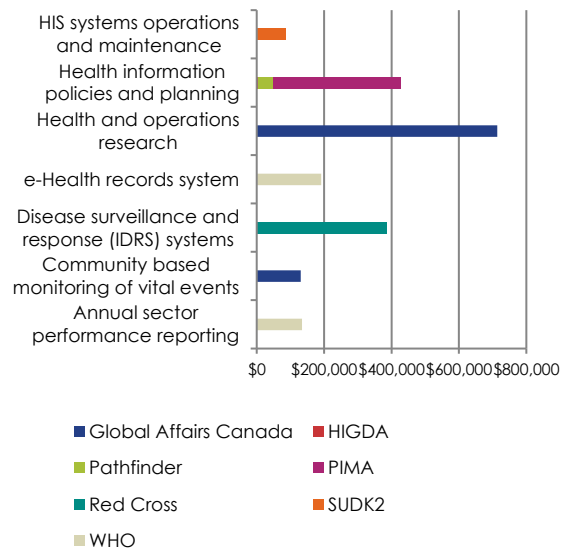
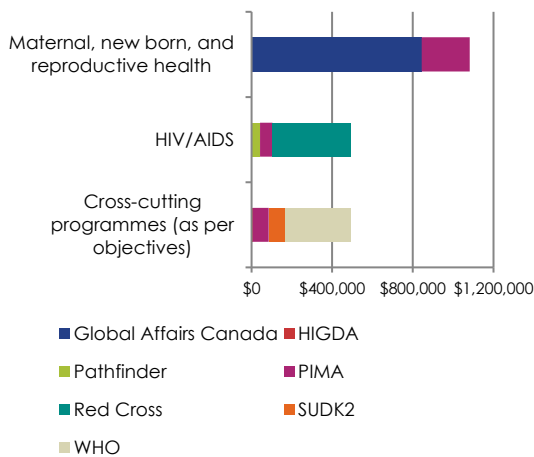
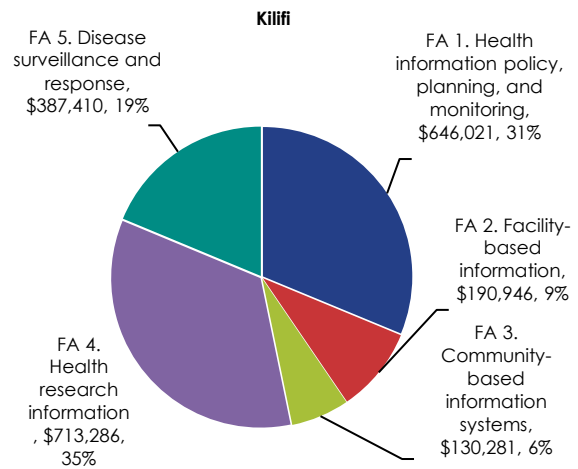
Kilifi County

As shown in Figure 4.13(i), Kilifi is one of the counties that has high support in focus areas. Out of the six focus areas, the county has support in five. Health Information Policy, Planning, and Monitoring (FA 1) has the highest support, with total funding of US\$713,286, or 35 percent of allocations to all focus areas.

Community-based Information Systems (FA 3) has the smallest share of funding at US\$130,281, or 6 percent of all funds allocated.

Focus areas

Figure 4.13(i). Kilifi County HIS/M&E budget allocation



Disease programs

For disease programs that receive budget allocations, maternal and new born and reproductive health has the highest funding and is supported by Global Affairs Canada and MEval-PIMA. Other programs with nearly the same resource allocation are HIV/AIDS supported by Red Cross, MEval-PIMA, and Pathfinder, and cross-cutting programs supported by SUDK2, MEval-PIMA, HIGDA, and WHO.

Specific focal areas of investment

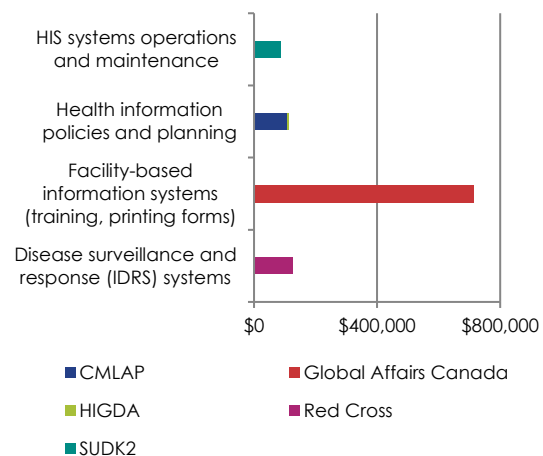
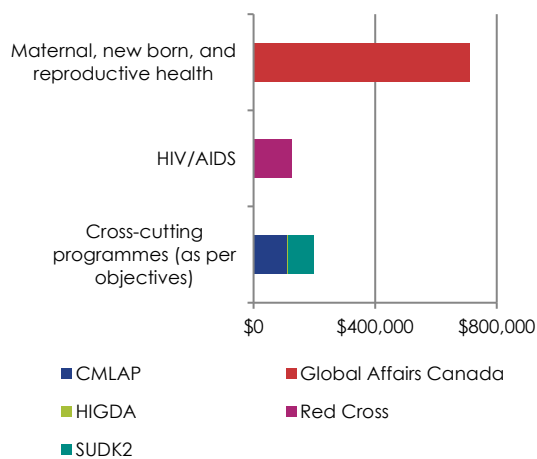
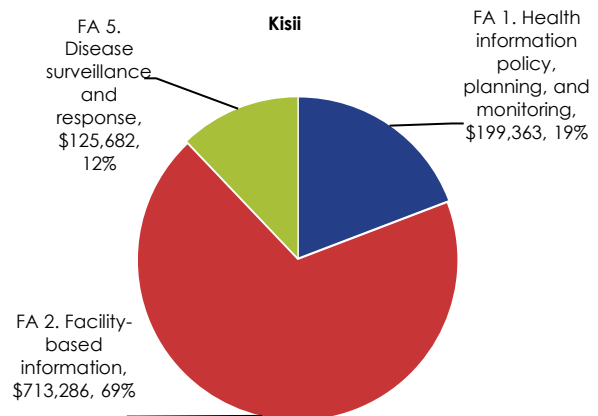
Data for specific investment areas indicate that health operations research has a high level of support from Global Affairs Canada, HIS systems operations and maintenance has a small resource allocation from SUDK2, and health information policy and planning has relatively high support from three partners (MEval-PIMA, HIGDA, and Pathfinder).

Kisii County

Figure 4.13(j) shows that for Kisii County, three out of six HIS/M&E focus areas received budget allocations, with support totalling US\$1,038,331. Facility-based Information (FA 2) received the highest allocation (69 percent), followed by Health Information Policy, Planning, and Monitoring (FA 1) at 19 percent and Disease Surveillance and Response (FA 5) at 12 percent.

Focus areas

Figure 4.13(j). Kisii County HIS/M&E budget allocation



Disease programs

Analysis by disease program areas indicates there are five partners in the county. The leading partner is Global Affairs Canada, which supports maternal and new born and reproductive health (about US\$700,000), followed by Red Cross, which contributes US\$120,000 to support HIV/AIDS. HIGDA, CMLAP, and SUDK2 support cross-cutting programs, with contributions of approximately US\$200,000.

Specific focal areas of investment

Facility-based information systems (printing training forms) is the most supported investment area in the county, receiving a total of US\$705,000 from Global Affairs Canada, followed by disease surveillance and response supported by Red Cross with approximately US\$105,000. CMLAP and SUDK2 support health information policy and planning with approximately US\$102,000, and SUDK2 supports HIS systems operation and maintenance with approximately US\$98,000.

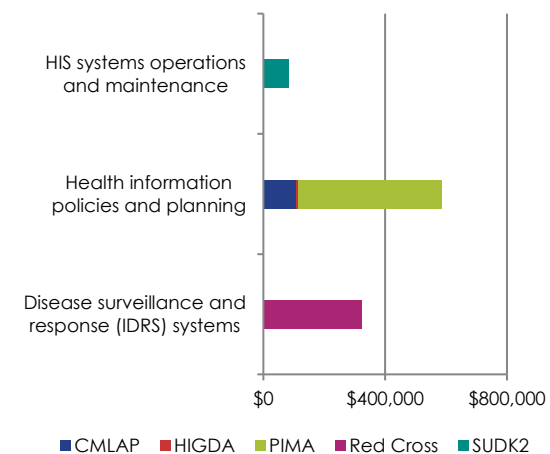
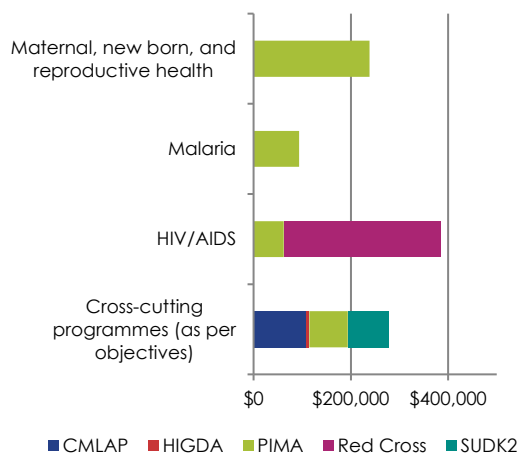
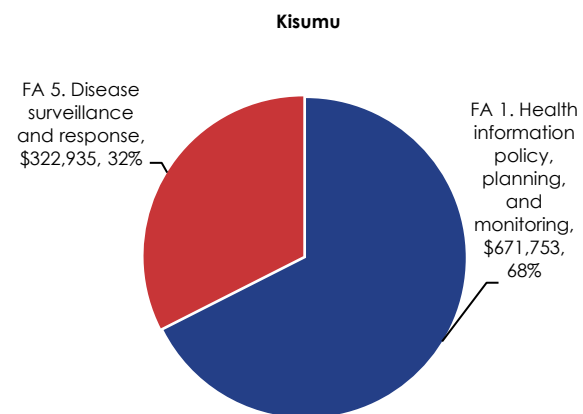
Kisumu County

As shown in Figure 4.13(k), in Kisumu County, HIS/M&E investment partner support focused on two of the six focus areas: Health Information Policy, Planning, and Monitoring (FA 1) received a budget allocation of US\$671,753 (68 percent), and Disease Surveillance and Response (FA 5) was allocated US\$332,935 (32 percent).

For funded disease programs, cross-cutting programs are supported by four partners: CMLAP, HIGDA, MEval-PIMA, and SUDK2. HIV/AIDS is supported by MEval-PIMA and the Red Cross, and MEval-PIMA supports both malaria and maternal and new born and reproductive health.

Focus areas

Figure 4.13(k). Kisumu County HIS/M&E budget allocation



Disease programs

For specific focus areas of investment in Kisumu, SUDK2 supports HIS systems operations and maintenance; CMLAP, HIGDA, and MEval-PIMA support health information policies and planning, and the Red Cross funds disease surveillance and response systems.

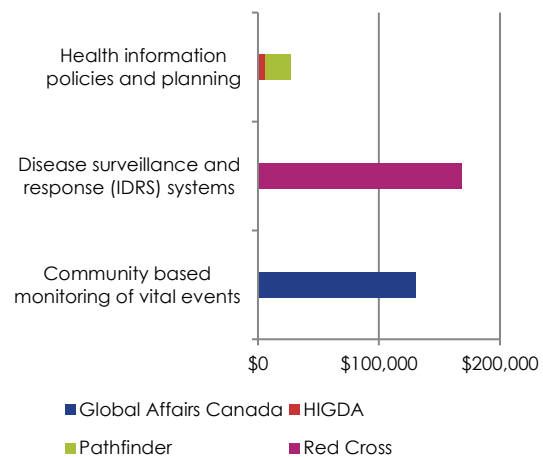
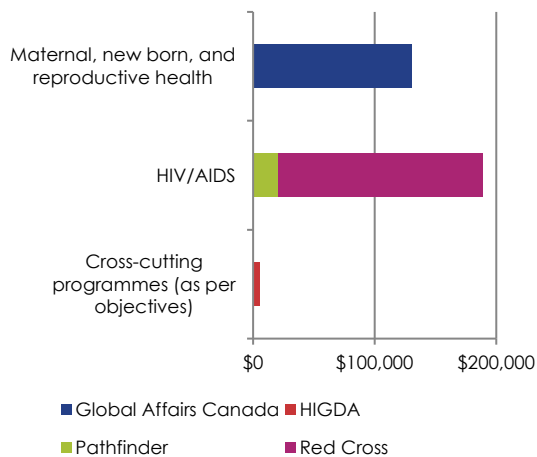
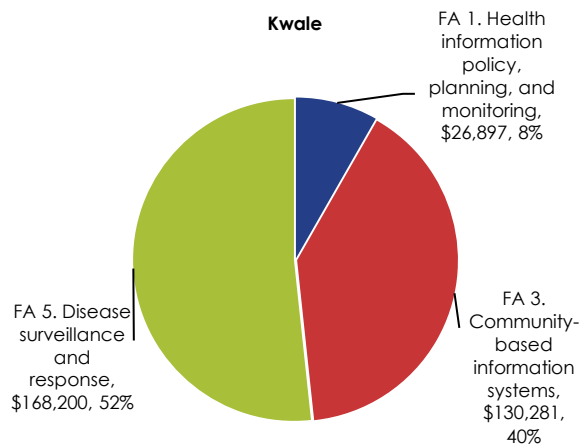
Specific focal areas of investment

Kwale County

As shown in Figure 4.13(I), three out of six HIS/M&E focus areas in Kwale County received budget allocations, totalling US\$325,378. Disease Surveillance and Response (FA 5) received the highest allocation at 52 percent, Community-based Information Systems (FA 3) received 40 percent, and Health Information Policy, Planning, and Monitoring (FA 1) received 8 percent of the total budget allocation.

Focus areas

Figure 4.13(I). Kwale County HIS/M&E budget allocation



Disease programs

HIV/AIDS was the highest-supported disease program, receiving approximately US\$200,000 from Pathfinder and the Red Cross, with the Red Cross providing the bulk of this support. Another well-supported disease program is maternal and new born and reproductive health, which receives budgetary support from Global Affairs Canada. Some minimal funds were allocated by HIGDA to cross-cutting disease programs. In terms of subfocus areas, disease surveillance and response, funded by the Red Cross, was the most highly supported, followed by community-based monitoring of vital events funded by Global Affairs Canada.

Specific focal areas of investment

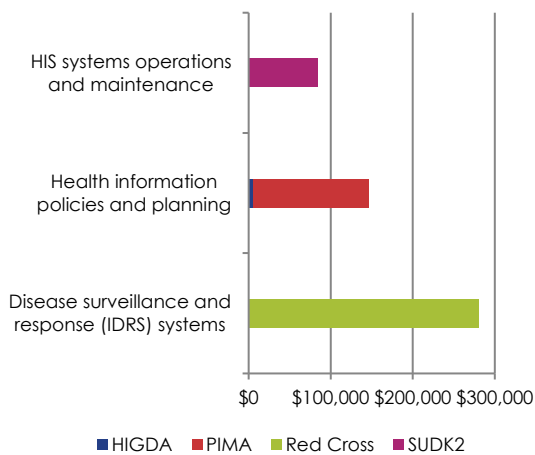
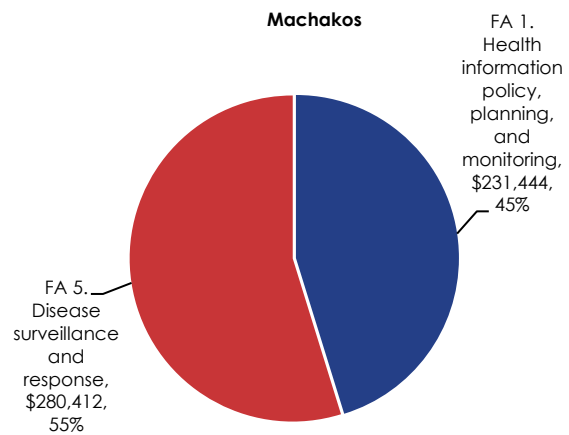
Machakos County

As shown in Figure 4.13(m), in Machakos County only two of six HIS/M&E focus areas are being supported: Health Information Policy Planning, and Monitoring (FA 1) and Disease Surveillance and Response (FA 5). Both receive comparable allocations. In the disease program area, HIV/AIDS received the highest allocation with support from two partners.

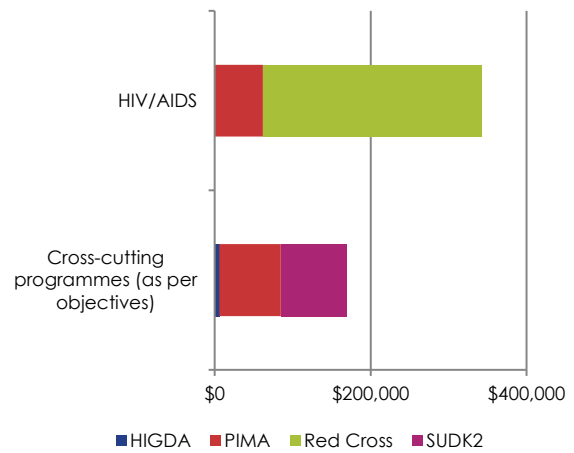
For specific areas of investment, disease surveillance and response systems received the highest allocation with support from the Red Cross.

Focus areas

Figure 4.13(m). Machakos County HIS/M&E budget allocation



Disease programs



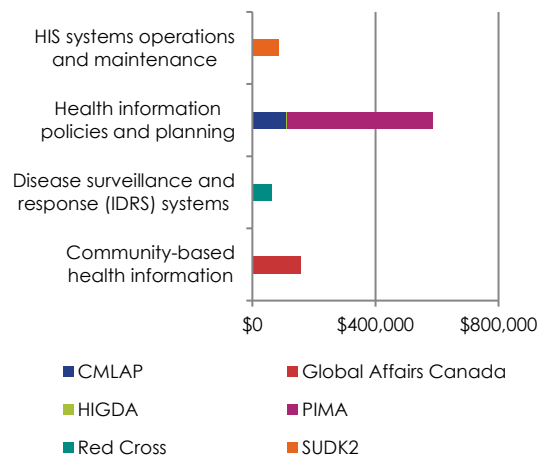
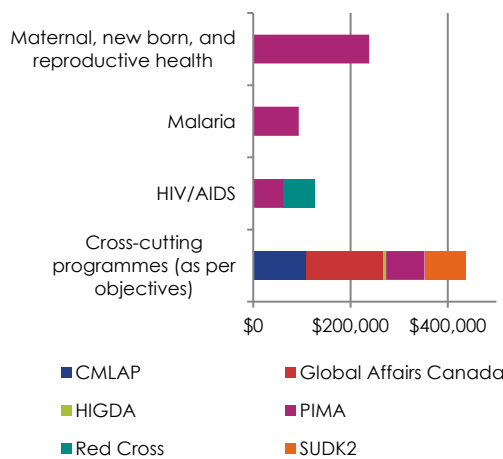
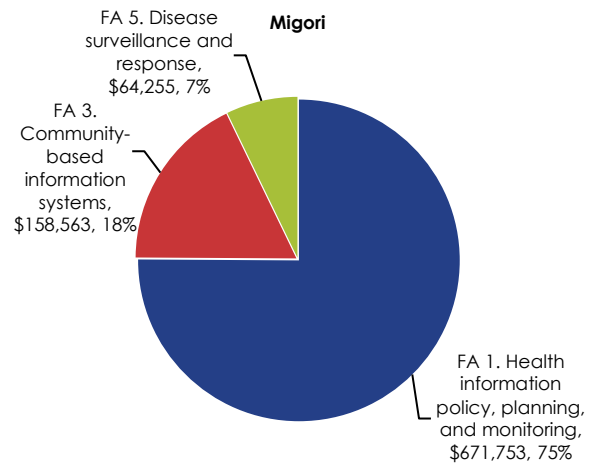
Specific focal areas of investment

Migori County

As shown in Figure 4.13(n), three out of six HIS/M&E focus areas are supported in Migori County. The bulk of this support goes to Health Information Policy, Planning, and Monitoring (FA 1), which received 75 percent of the total allocation of US\$894,572. The other focus areas that are supported are Community-based Information Systems (FA 3) and Disease Surveillance and Response (FA 5).

Focus areas

Figure 4.13(n). Migori County HIS/M&E budget allocation



Disease programs

Specific focal areas of investment

A total of six partners provided some budgetary support to HIS/M&E activities in Migori. Cross-cutting programs were allocated the bulk of the budgetary support, which came from five partners: CMLAP, Global Affairs Canada, HIGDA, MEval-PIMA, and SUDK2. The Red Cross provided support for HIV/AIDS, malaria, and maternal and new born and reproductive health. MEval-PIMA provided additional support for the HIV/AIDS disease program. For specific investment areas, the bulk of the support is allocated to health information policies and planning. Other subfocus areas supported include community-based health information, disease surveillance and response, and HIS systems operations and maintenance.

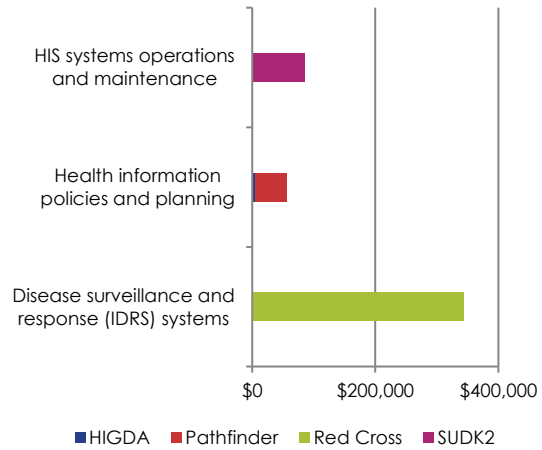
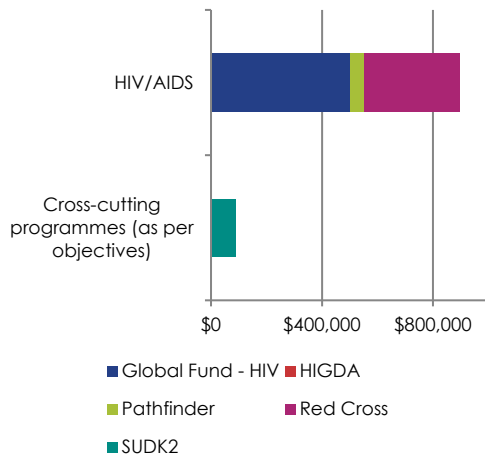
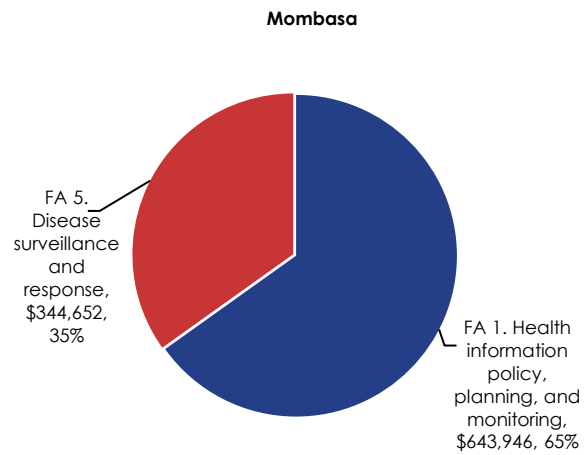
Mombasa County

As shown in Figure 4.13(o), in Mombasa County, two of six focus areas are being supported: Disease Surveillance and Response (FA 5) and Health Information Policy, Planning, and Monitoring (FA 1).

FA 1 received the highest resource allocation, with 65 percent of total funds allocated; FA 5 received an allocation of US\$344,652, with 35 percent of the total allocation.

Focus Areas

Figure 4.13(o). Mombasa County HIS/M&E budget allocation



Disease programs

For disease programs, two efforts are being supported in Mombasa County. The Red Cross, Pathfinder, and Global Affairs Canada have partnered to support HIV/AIDS, the program with the highest allocation. HIGDA and SUDK2 have allocated funds to support cross-cutting programs.

Specific focal areas of investment

A study of funding across specific health investment areas indicates that health information policies and planning, supported by HIGDA, Global Affairs Canada, and Pathfinder, receives the highest budget allocation; health systems operations and maintenance, supported by SUDK2, receives the lowest allocation.

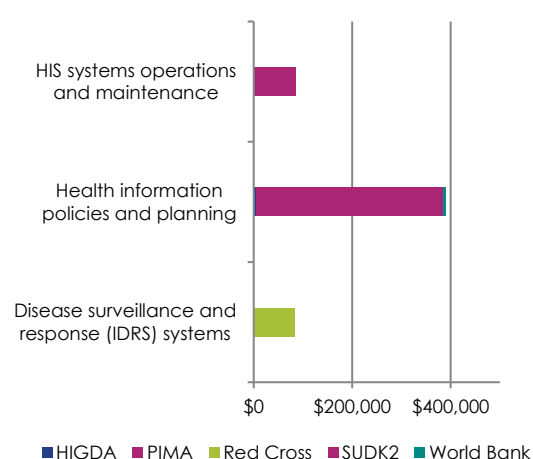
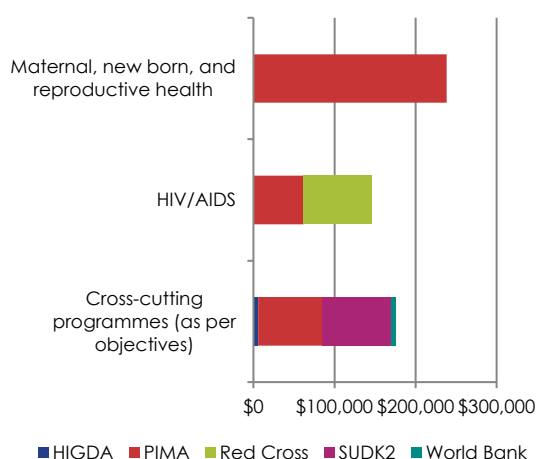
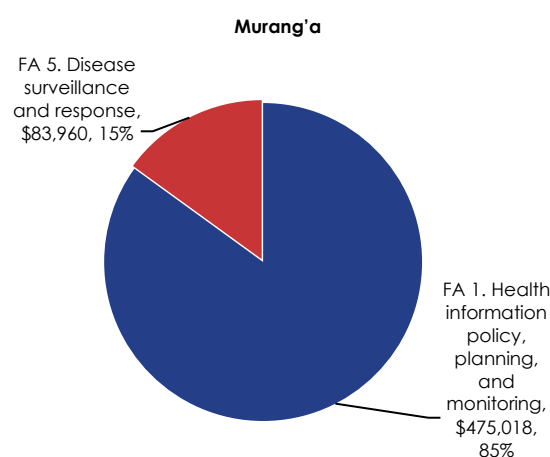
Murang'a County

As shown in Figure 4.13(p), in Murang'a County two out of six focus areas receive budget support: Disease Surveillance and Response (FA 5) and Health Information Policy, Planning, and Monitoring (FA 1).

FA 1 has the highest resource allocation, receiving 85 percent of the total budget commitment. FA 5 has an allocation of US\$83,960, or 15 percent of the total budget of US\$558,978.

Focus Areas

Figure 4.13(p). Murang'a County HIS/M&E budget allocation



Disease programs

Five partners indicated some budgetary support for HIS/M&E activities in Murang'a. For disease programs, maternal and new born and reproductive health was allocated the bulk of budgetary funding, supported by MEval-PIMA. Cross-cutting programs followed, with a total budgetary commitment of about US\$170,000 from four partners—HIGDA, MEval-PIMA, SUDK2, and the World Bank. The HIV/AIDS disease program received support from MEval-PIMA and the Red Cross. Regarding specific areas of investment, the bulk of the support is allocated to health information policies and planning. Other supported subfocus areas are disease surveillance and response systems and HIS systems operations and maintenance.

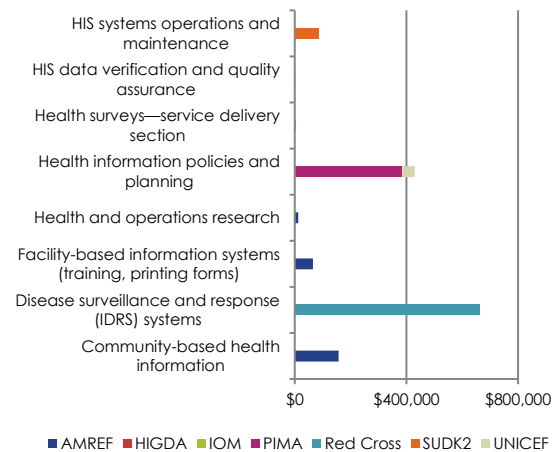
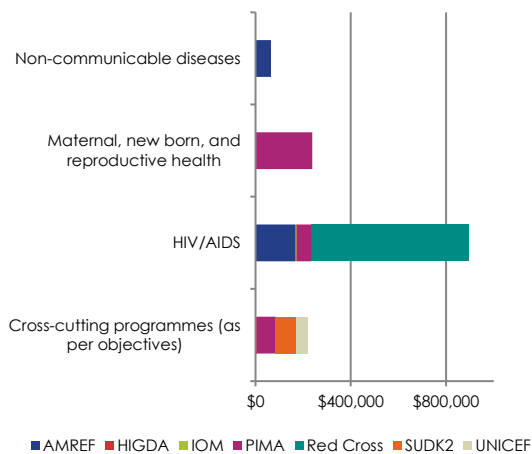
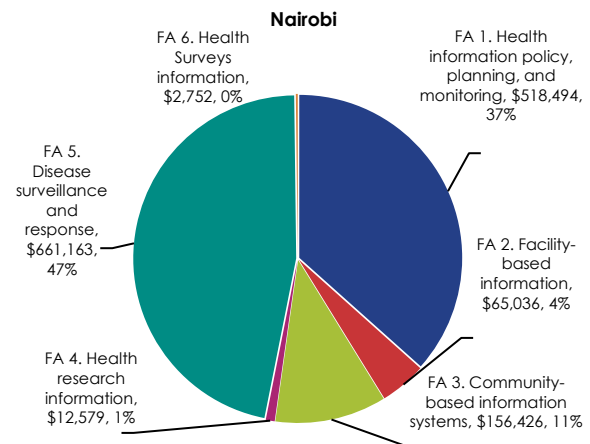
Specific focal areas of investment

Nairobi County

As shown in Figure 4.13(q), Nairobi County has budget allocations for all six HIS/M&E focus areas. The largest allocations went to FA 5—47 percent to Disease Surveillance and Response—and to FA 1—37 percent to Health Information Policy, Planning and Monitoring. Total investment in the other four focus areas is approximately 16 percent.

Focus areas

Figure 4.13(q). Nairobi County HIS/M&E budget allocation



Disease programs

For disease programs, HIS/M&E investment focused primarily on HIV/AIDS, with more than US\$800,000 allocated. Other disease programs receiving funding were maternal and new born and reproductive health, cross-cutting programs, and non-communicable diseases.

Specific focal areas of investment

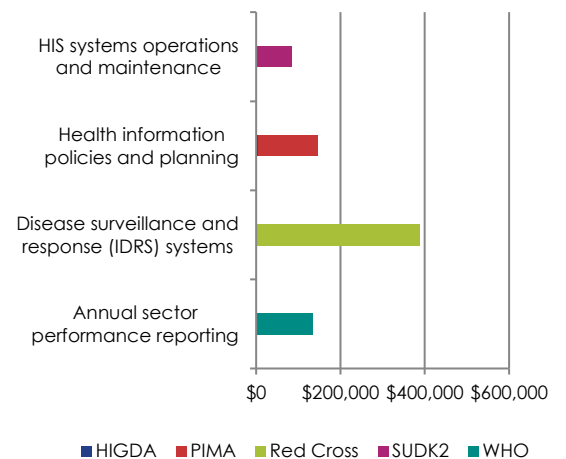
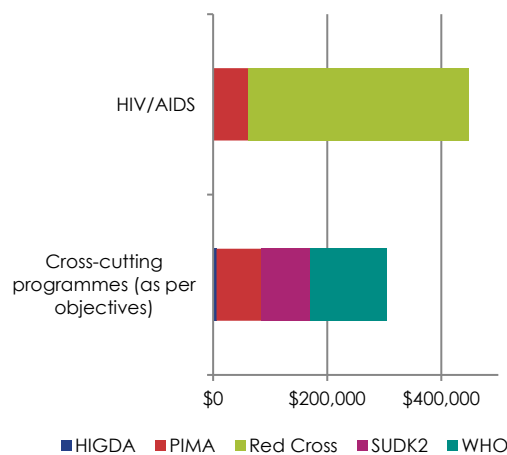
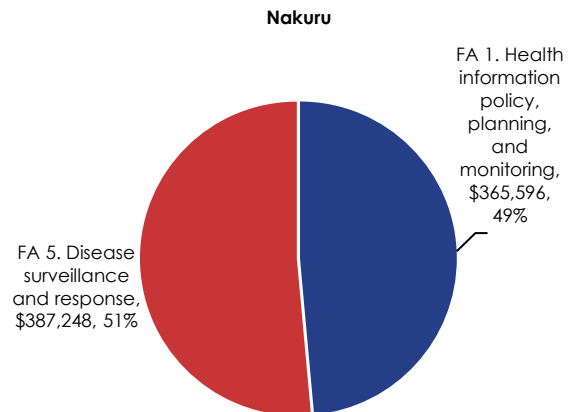
Nakuru County

As shown in Figure 4.13(r), investments by partners for HIS/M&E in Nakuru County focused on two areas: Health Information Policy, Planning, and Monitoring (FA 1), with funding of US\$365,596, or 49 percent of the total budget, and Disease Surveillance and Response (FA 5), with funding of US\$387,248, or 51 percent of the total budget.

These two focus areas directed funding to specific programs, such as disease surveillance and response systems funded by the Red Cross, HIS systems operations and maintenance funded by SUDK2, health information policies and planning funded by HIGDA and MEval-PIMA, and annual sector performance reporting funded by WHO.

Focus area

Figure 4.13(r). Nakuru County HIS/M&E budget allocation



Disease programs

For the disease program area, MEval-PIMA and the Red Cross funded the HIV/AIDs program; cross-cutting programmes were funded by HIGDA, MEval-PIMA, SUDK2, and WHO.

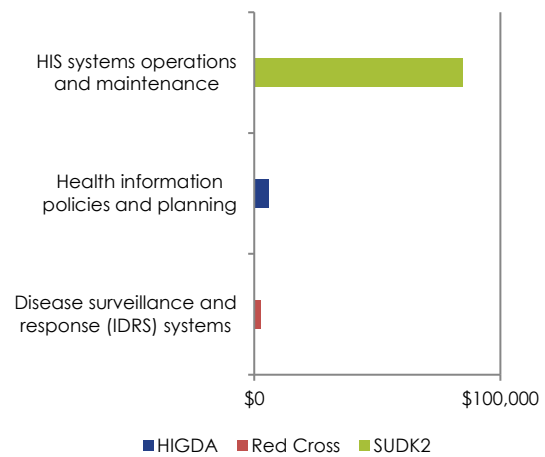
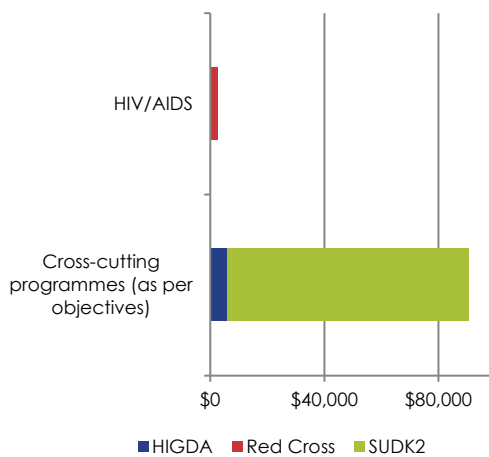
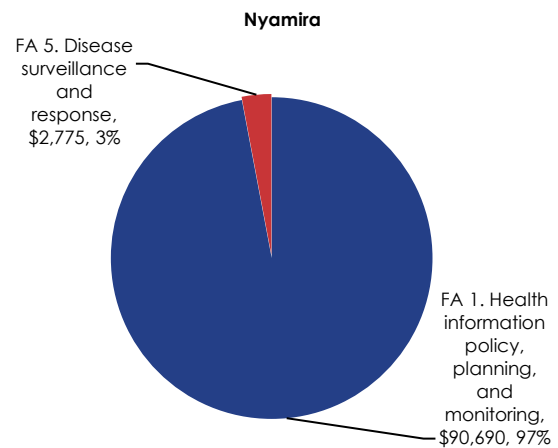
Specific focal areas of investment

Nyamira County

As shown in Figure 4.13(s), in Nyamira County, the largest allocation for HIS/M&E resource investment was US\$90,690 in Health Information Policy, Planning, and Monitoring (FA 1), with US\$84,860 funded by SUDK2 allocated to HIS systems operations and maintenance, and approximately US\$5,830 funded by HIGDA and allocated to health information policies and planning. The second focus area was in Disease Surveillance and Response (FA 5), funded by the Red Cross at \$2,775, with a specific focus on disease surveillance systems.

Focus areas

Figure 4.13(s). Nyamira County HIS/M&E budget allocation



Disease programs

Analysis of disease program areas indicated that partners in the county, including SUDK2, HIGDA, and the Red Cross, focused their HIS/M&E resources on HIV (less than US\$10,000), and on cross-cutting programs (US\$90,690) primarily supported by SUDK2.

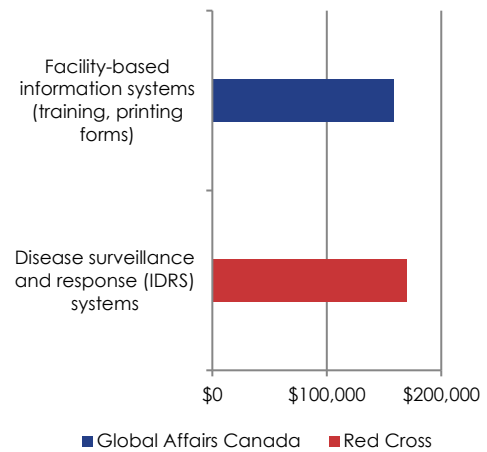
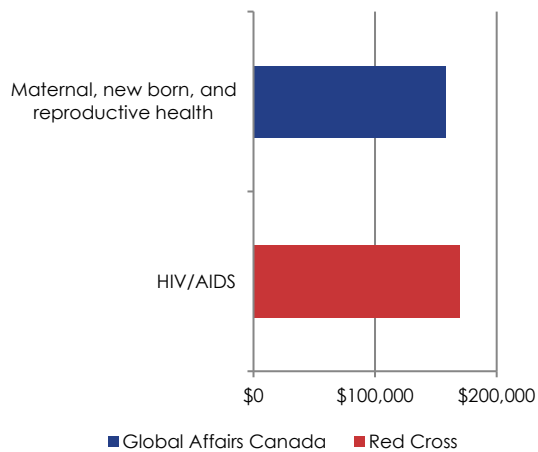
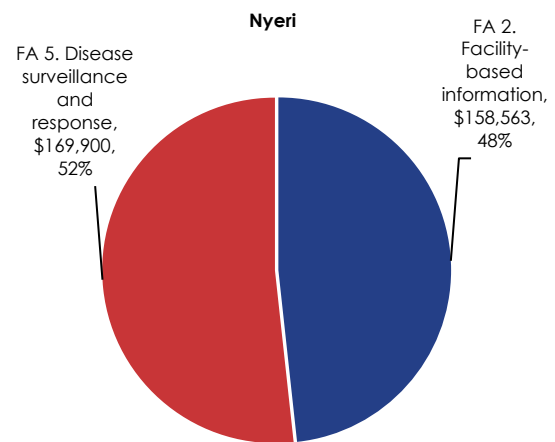
Specific focal areas of investment

Nyeri County

As shown in Figure 4.13(t), in Nyeri County, only two of six HIS/M&E focus areas receive budgetary allocation. The two focus areas are Facility-based Information (FA 2) and Disease Surveillance and Response (FA 5), with both areas receiving comparable allocations. Two disease-specific programs—maternal and new born and reproductive health and HIV/AIDS—received funding with the support of only one partner. FA 2 is supported by Global Affairs Canada, and FA 5 is supported by the Red Cross.

Focus Areas

Figure 4.13(t). Nyeri County HIS/M&E budget allocation



Disease programs

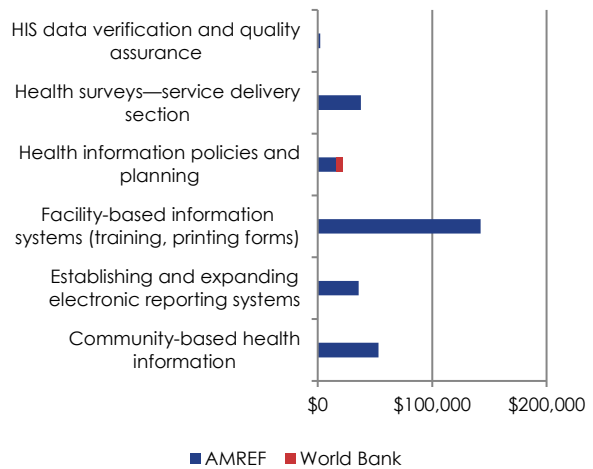
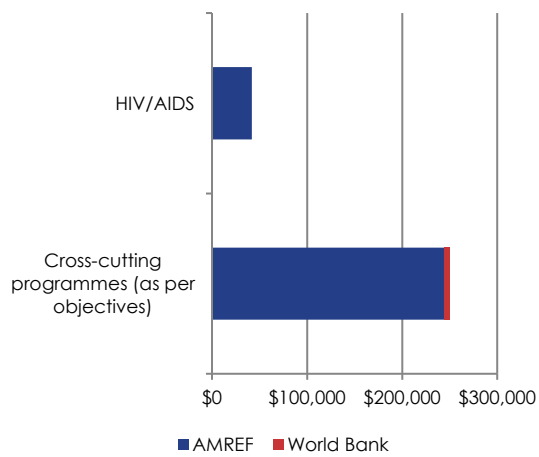
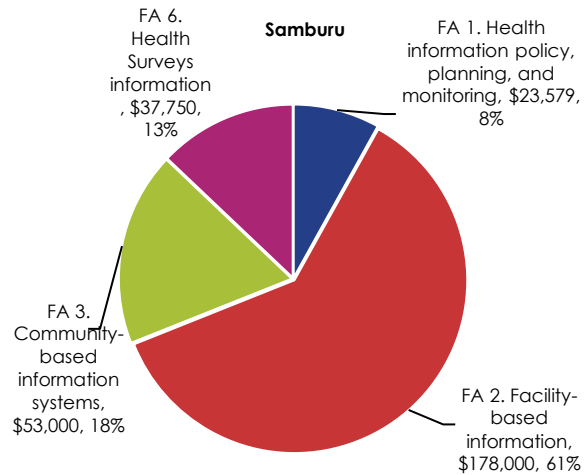
Specific focal areas of investment

Samburu County

As shown in Figure 4.13(u), analysis by area of investment to HIS/M&E inputs in Samburu County showed that the highest investment of the four focus areas funded was in Facility-based Information (FA 2), which received an allocation of 61 percent, or US\$178,000, with a specific focus on facility-based information systems, with a budget allocation of more than US\$140,000. Other focus areas receiving allocations were Health Information Policy, Planning, and Monitoring (FA 1), Health Surveys Information (FA 6), and Community-based Information Systems (FA 3), with specific investment focus on community-based information, HIS data verification and quality assurance, and health surveys on service delivery, health information and policy, establishment and expansion of electronic reporting systems, and health information policy and planning.

Focus Area

Figure 4.13(u). Samburu County HIS/M&E budget allocation



Disease programmes

Analysis by disease program areas indicated that most HIS/M&E investments were in cross-cutting programs, funded at approximately US\$250,000, and HIV/AIDS programs, funded at slightly less than US\$50,000.

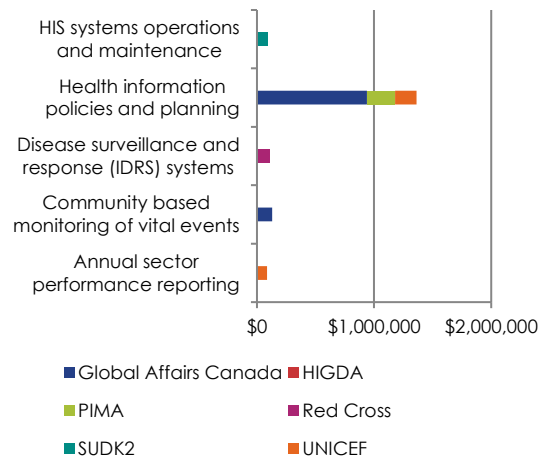
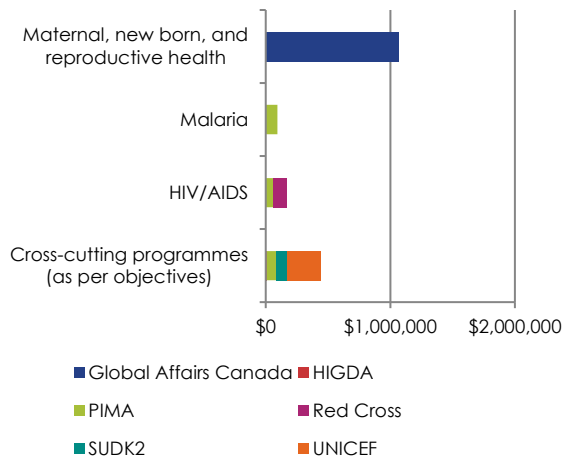
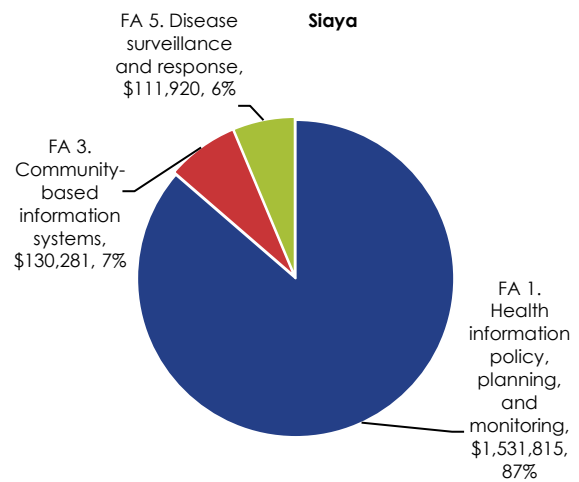
Specific focal areas of investment

Siaya County

As shown in Figure 4.13(v), Siaya County is one of the counties with high budgetary support for HIS/M&E activities, with a total commitment of US\$1,774,015. The bulk of this support—87 percent—is for Health Information Policy, Planning, and Monitoring (FA 1). The rest of the budget is shared almost equally between Community-based Information Systems (FA 3) and Disease Surveillance and Response (FA 5).

Focus Areas

Figure 4.13(v). Siaya County HIS/M&E budget allocation



Disease programs

Six partners indicated their intention to provide some budgetary support to HIS/M&E activities in Siaya. For disease programs, maternal and new born and reproductive health was allocated the bulk of budgetary support at almost US\$1.1 million, with all funding coming from Global Affairs Canada. Cross-cutting programs were supported by HIGDA, MEval-PIMA, SUDK2, and UNICEF in the amount of approximately US\$400,000. Other disease programs funded were HIV/AIDS supported by MEval-PIMA and Red Cross, and malaria supported by MEval-PIMA. The health information policies and planning subfocus area received the bulk of budgetary support at almost US\$1.4 million. The remaining support is allocated to community-based health information, disease surveillance and response systems, HIS systems operations and maintenance, and annual sector performance reporting.

Specific focal areas of investment

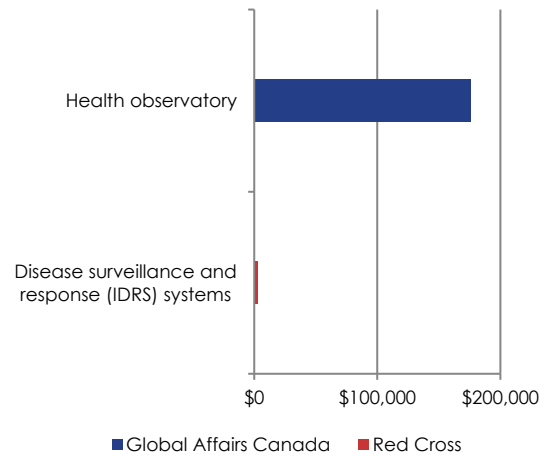
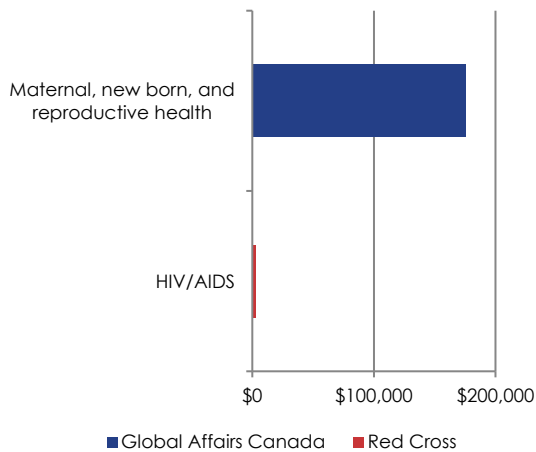
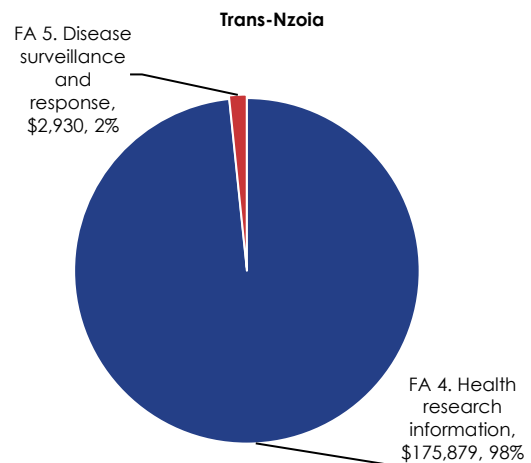
Trans-Nzoia County

As shown in Figure 4.13(w), Trans-Nzoia County has resource allocations in only two focus areas: Disease Surveillance and Response (FA 5) and Health Research Information (FA 4).

FA 4 receives the highest resource allocation of US\$178,879, or 98 percent of the total, and FA 5 receives only 2 percent of the total budget allocation.

Focus areas

Figure 4.13(w). Trans-Nzoia County HIS/M&E budget allocation



Disease programs

Trans-Nzoia receives budget support in maternal and new born and reproductive health from Global Affairs Canada, along with a small allocation to fight against HIV/AIDS from the Red Cross. Other disease programs receive no support.

Specific focal areas of investment

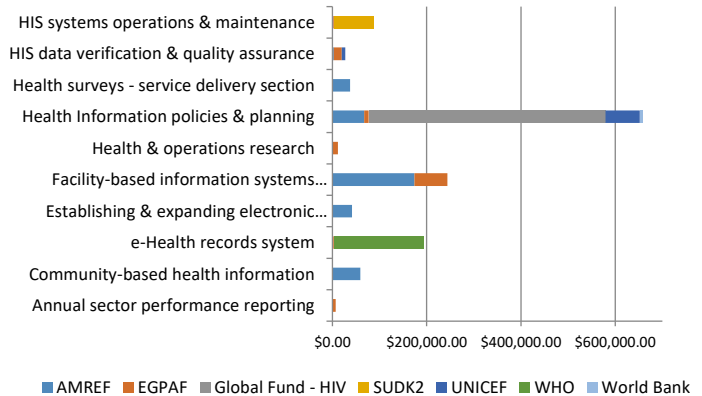
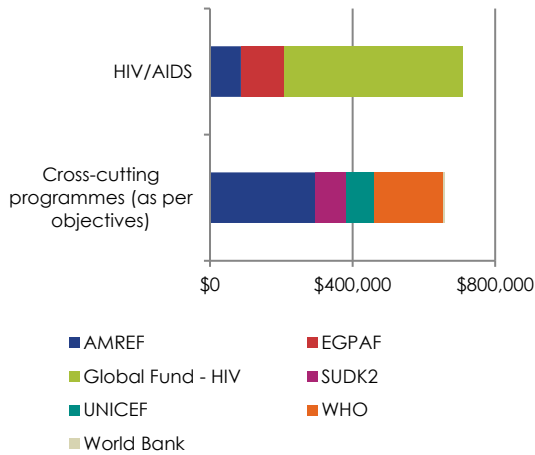
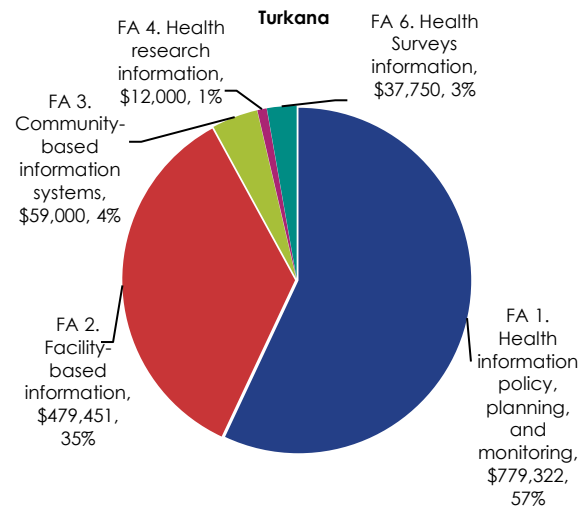
The county does have support to develop a health observatory with resource support from Global Affairs Canada. In addition, the Red Cross has allocated some resources to the county to strengthen its disease surveillance and response system.

Turkana County

As shown in Figure 4.13(x), Turkana is another very highly supported county, with a total budget commitment for FY 2016-2017 of US\$1,367,523. Of this commitment, 57 percent is for Health Information Policy, Planning, and Monitoring (FA 1). Facility-based Information (FA 2) receives 35 percent of the allocation, and the rest of the support is shared between Community-based Information Systems (FA 3), with an allocation of 4 percent, Health Surveys Information (FA 6), with an allocation of 3 percent, and Health Research Information (FA 4), with an allocation of 1 percent.

Focus Areas

Figure 4.13(x). Turkana County HIS/M&E budget allocation



Disease programs

Seven partners are committed to providing budgetary support for HIS/M&E activities in Turkana. The HIV/AIDS disease program was allocated a slightly larger portion of the budgetary support in the amount of approximately US\$700,000 from three partners—AMREF, the Elizabeth Glaser Pediatric AIDS Foundation, and UNICEF. The remaining funds, provided by AMREF, SUDK2, UNICEF, WHO, and the World Bank, are allocated to support cross-cutting programs. Ten out of 13 subfocus areas received some budget commitment, which is quite impressive. However, the bulk of the support goes to health information policies and planning, which is funded to receive almost US\$700,000.

Specific focal areas of investment

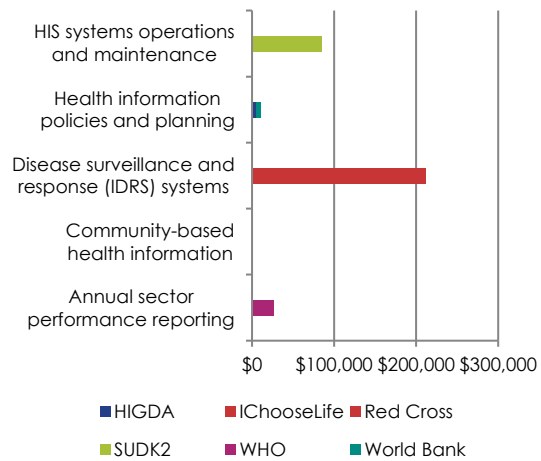
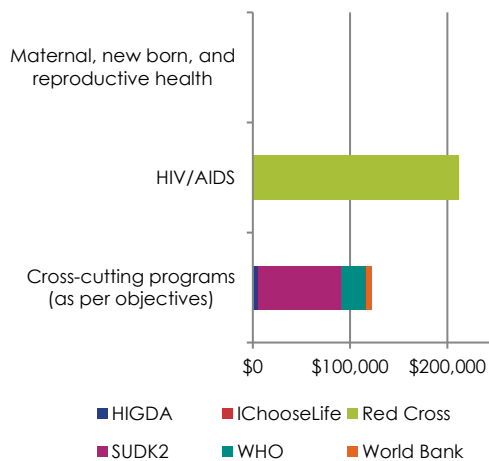
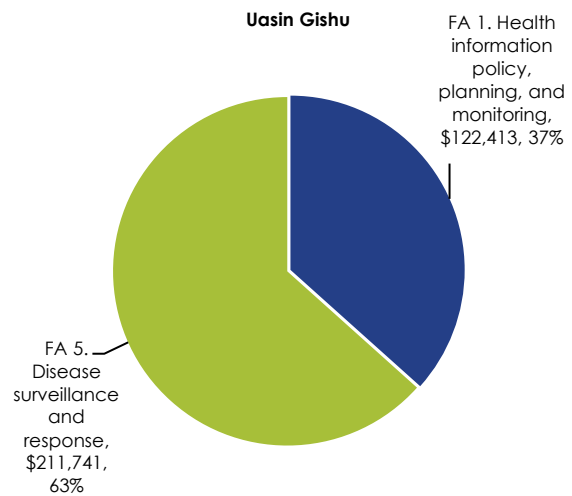
Uasin Gishu County

Figure 4.13(y) shows that Uasin Gishu County received a total of US\$334,154 allocated to two out of six HIS/M&E focus areas. Health Information Policy, Planning, and Monitoring (FA 1) received a budget allocation of 37 percent; Disease Surveillance and Response (FA 5) received the highest allocation—63 percent or US\$211,741.

In this county, several partners support only two focus areas, meaning that the remaining focus areas might not have adequate budget allocation for implementation of related activities.

Focus area

Figure 4.13(y). Uasin Gishu County HIS/M&E budget allocation



Disease programs

Specific focal areas of investment

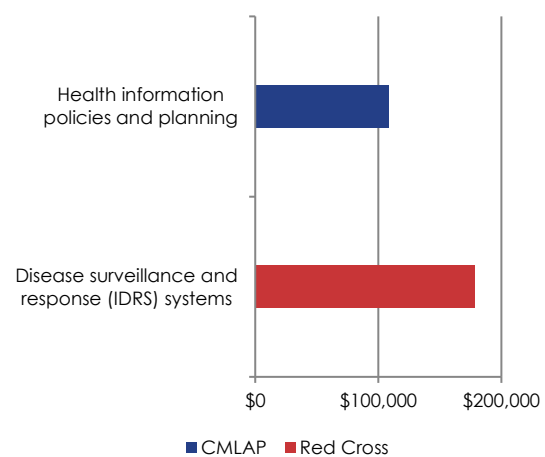
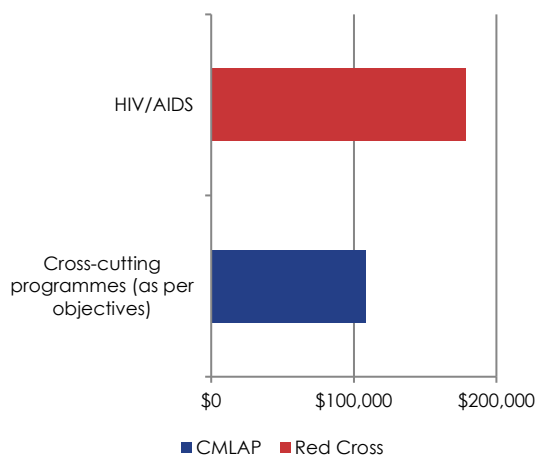
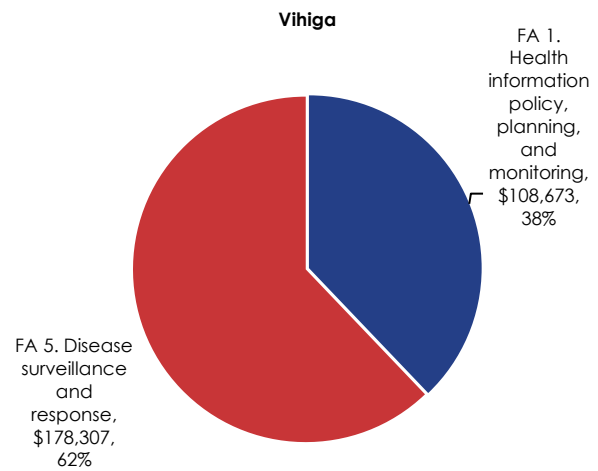
HIV/AIDS is the most highly funded disease program in Uasin Gishu County. Survey responses indicated that the Red Cross contributed approximately US\$200,000. Other partners, consisting of HIGDA, ICL-I Choose Life, SUDK2, WHO, and World Bank, supported cross-cutting programs with funding in the amount of approximately US\$130,000. Note that maternal and neonatal and reproductive health did not receive any support. The county received funding support from the Red Cross in the amount of US\$110,000 for disease surveillance and response systems, followed closely by HIS systems operations and maintenance funding in the amount of US\$70,000 from SUDK2. Annual sector performance reporting and health information policies and planning each received funding support of less than US\$20,000.

Vihiga County

As shown in Figure 4.13(z), analysis of HIS/M&E resource investments by partners in Vihiga County showed that primary support focused on Disease Surveillance and Response (FA 5), with funding of US\$178,307, and specific investment focus on disease surveillance and response systems. The other focus area receiving funding was Health Information Policy, Planning, and Monitoring (FA 1), with specific investment focus on health information policies and planning. The two partners involved were CMLAP and the Red Cross.

Focus areas

Figure 4.13(z). Vihiga County HIS/M&E budget allocation



Disease programs

Analysis by disease program areas indicated that two partners in Vihiga County, CMLAP and the Red Cross, focused their HIS/M&E resources on HIV (approximately US\$180,000) and cross-cutting programs (approximately US\$100,000). The main HIS/M&E partner was the Red Cross, supporting HIV activities.

Specific focal areas of investment

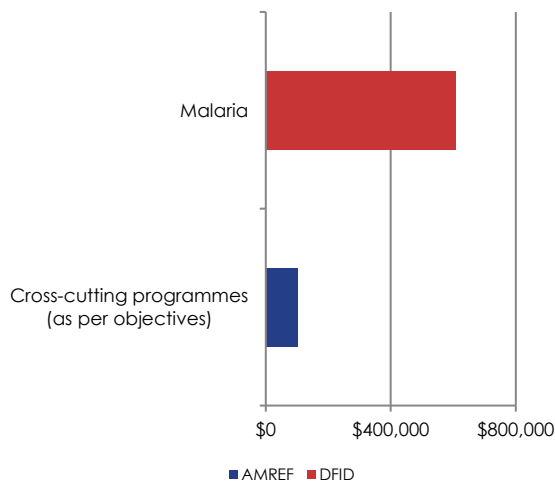
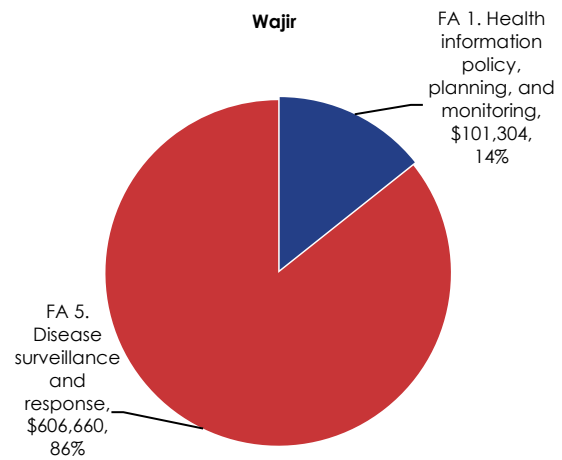
Wajir County

As shown in Figure 4.13(aa), in Wajir County, only two of six HIS/M&E focus areas were allocated budgetary support; 85 percent of the total budget was allocated for Disease Surveillance and Response (FA 5).

The county has only two partner organizations, with DFID being the major contributor. For disease programs, malaria has the highest budget allocation of US\$600,000. Cross-cutting programs were allocated approximately US\$100,000.

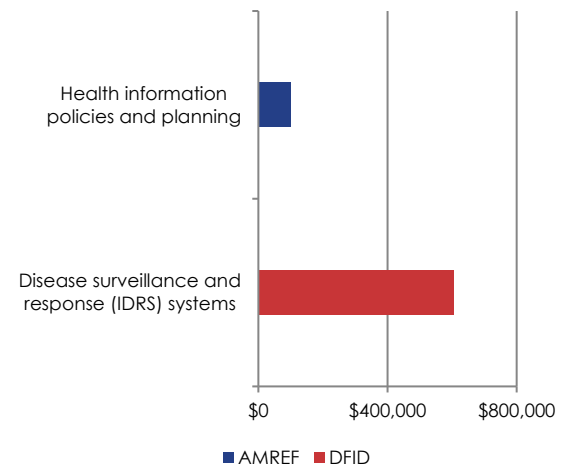
Focus area

Figure 4.13(aa). Wajir County HIS/M&E budget allocation



Disease programs

The main investment area being funded in the county is disease surveillance and response systems, with an allocation of US\$600,000; health information policies and planning received an allocation of US \$10,000.



Specific focal areas of investment

Other Counties

Data for counties whose support was limited to only one or two investment areas or one donor were analysed and are tabulated in summary tables for easier reference. The counties included in this category were Baringo, Elgeyo Marakwet, Kajiado, Lamu, Makueni, Mandera, Marsabit, Meru, Narok, Nyandarua, Taita Taveta, Tharaka Nithi, and West Pokot. Tables 4.1, 4.2 and 4.3 represent this information.

Table 4.1. Focus areas of investments in the selected counties (in US\$ thousands)

County	FA 1. Health Information Policy, Planning, and Monitoring	FA 2. Facility-based Information	FA 4. Health Research Information	FA 5. Disease Surveillance and Response	Grand total
West Pokot			175,879		175,879
Tharaka Nithi	5,284				5,284
Taita Taveta	12,039				12,039
Nyandarua	5,284				5,284
Narok	90,690				90,690
Meru				171,064	171,064
Marsabit	51,051				51,051
Mandera				255,473	255,473
Makueni	90,144				90,144
Lamu	6,287				6,287
Kajiado				180,114	180,114
Elgeyo Marakwet	1,641,536				1,641,536
Baringo	139,436	190,946			330,382

Table 4.2. Programs supported by partners within the counties (in US\$ thousands)

Program in the county	AMREF	DFID	Global Affairs Canada	HIGDA	Pathfinder	Red Cross	SUDK2	WHO	World Bank	Grand total
Cross-cutting programs (as per objectives)										
Baringo								325,098	5,284	330,382
Lamu									5,284	5,284
Makueni							84,860		5,284	90,144
Mandera		255,473								255,473
Marsabit	51,051									51,051
Narok				5,830			84,860			90,690
Nyandarua									5,284	5,284
Tharaka Nithi									5,284	5,284
HIV/AIDS										
Kajiado						180,114				180,114
Lamu					1,003					1,003
Meru						171,064				171,064
Taita Taveta					12,039					12,039
Maternal, new born, and reproductive health										
Elgeyo Marakwet			1,641,536							1,641,536
West Pokot			175,879							175,879
Grand total	51,051	255,473	1,817,414	5,830	13,042	351,179	169,720	325,098	26,421	3,015,227

Table 4.3. Partner support across the subfocus areas in the selected counties (in US\$ thousands)

Investment areas in the county	AMREF	DFID	Global Affairs Canada	HIGDA	Pathfinder	Red Cross	SUDK2	WHO	World Bank	Grand total
Baringo								325,098	5,284	330,382
Annual sector performance reporting								134,152		134,152
e-Health records system								190,946		190,946
Health information policies and planning									5,284	5,284
Elgeyo Marakwet			1,641,536							1,641,536
HIS systems operations and maintenance			1,641,536							1,641,536
Kajiado						180,114				180,114
Disease surveillance and response systems						180,114				180,114
Lamu					1,003				5,284	6,287
Health information policies and planning					1,003				5,284	6,287
Makueni							84,860		5,284	90,144
Health information policies and planning									5,284	5,284
HIS systems operations and maintenance							84,860			84,860
Mandera		255,473								255,473
Disease surveillance and response systems		255,473								255,473
Marsabit	51,051									51,051
Health information policies and planning	51,051									51,051
Meru						171,064				171,064
Disease surveillance and response systems						171,064				171,064
Narok				5,830			84,860			90,690
Health information policies and planning				5,830						5,830

Investment areas in the county	AMREF	DFID	Global Affairs Canada	HIGDA	Pathfinder	Red Cross	SUDK2	WHO	World Bank	Grand total
HIS systems operations and maintenance							84,860			84,860
Nyandarua									5,284	5,284
Health information policies and planning									5,284	5,284
Taita Taveta					12,039					12,039
Health information policies and planning					12,039					12,039
Tharaka Niithi									5,284	5,284
Health information policies and planning									5,284	5,284
West Pokot			175,879							175,879
Health observatory			175,879							175,879
Grand total	51,051	255,473	1,817,414	5,830	13,042	351,179	169,720	325,098	26,421	3,015,227

5. DISCUSSION

The goal of this partner resource mapping exercise was to document the estimated budget for planned activities across partners to enable more informed and efficient investments in HIS in future budget cycles.

The specific objectives were to:

- Take stock of **resource distribution** and allocation for HIS/M&E activities across all the stakeholders.
- Identify **potential duplicative investments** in focus areas at the national and county levels.
- Consolidate **gaps in focus areas and geographical** distribution.
- Inform or initiate the development of **joint investment cases** for HIS/M&E in the health sector.

The results obtained from this activity can, to a certain extent, address each of the stated objectives. This was the first time an assessment of this kind was done in Kenya, and as a result there were a few lessons learned about how the exercise can be conducted in the future to provide even richer information.

5.1 Resource Distribution and Allocations

The total amount of FY 2016–2017 budgetary support for health sector HIS/M&E by the 26 partners that provided data to this resource mapping activity was approximately US\$50 million. This is 3.2 percent of the national plus county governments combined health sector budget of approximately US\$1.52 billion for FY 2016–2017. According to the data received from the MOH during this mapping exercise, the national government allocation to health sector HIS/M&E area was estimated at US\$2,397,567, approximately 4.8 percent of the overall budget provided by the 26 partners. It appears that there is heavy reliance on donor funding for health sector HIS/M&E, which suggests that the government needs to step up its mandate to ensure strong alignment of partner funding with health sector strategy and the M&E plan. It also calls for a well-structured M&E plan and framework that is fully costed in accordance with the identified focus and subfocus areas.

Actual allocations by county health departments to the HIS/M&E budget were not obtained during the data collection phase of this activity. A rough estimate of the allocations has, however, been calculated by an MOH economist. This information is not included in the main report because it has not been confirmed by the counties; however, the summary table with these estimated allocations is provided in Appendix A.

5.2 Gaps and Potential Duplicative Investments

One of the objectives of this resource mapping activity was to identify potential gaps and duplicative investments in HIS/M&E activities. The findings from this exercise indicate that some focus and subfocus areas receive significantly higher budgetary allocations than others. At the same time, there are focus and subfocus areas both at the national and the county levels that received zero budgetary allocations, which suggests a funding gap in these areas.

The overall analysis shows several indications of duplicative investments:

- For FY 2016–2017, 51 percent of stakeholder investments is concentrated in Health Information Policy, Planning, and Monitoring (FA 1), with much less going to each of the five other focus areas.
- At the national level, allocation to Health Information Policy, Planning, and Monitoring (FA 1) is even higher at 67 percent. In fact, 12 out of the 14 stakeholders who have invested in HIS/M&E activities at the national level are all supporting this focus area.
- The county-specific analysis shows that there are several counties in which (1) several stakeholders are supporting activities in the same disease programs, and (2) several stakeholders are supporting the same HIS/M&E focus areas. Examples of such counties include Bungoma, Homa Bay, Kakamega, and Turkana.

These indicators alone do not provide conclusive evidence of duplicative investments, and thus it is not possible to confirm the suspected duplicative investments based solely on the data obtained in this mapping activity. In part, this is due to not having a costed work plan showing the amount that had been targeted to be spent at both the national and county levels under each of the six focus areas for FY 2016–2017. Indicators do, however, clearly point to the need to have consultative stakeholder forums in which all stakeholders can share their investment plans for HIS/M&E. Such forums would be even more fruitful if guided by a joint investment plan prepared by the MOH.

5.3 Joint Planning for Future Investments

This exercise points out the need for all partners supporting health sector HIS/M&E to have well-structured and institutionalized processes to enable joint reviews of their work plans in relation to MOH'S work plan for HIS/M&E. This also means that all stakeholders need to be involved in the development of a comprehensive and fully costed M&E plan that is in line with the overall health strategy and the identified focus areas for HIS/M&E. There is a clear need for a common investment framework, designed to align technical and financial assistance with country-defined priorities, and to reduce fragmentation and duplication of efforts. Although the current M&E Framework for the Health Sector (2014–2016) is costed, the costing is not in line with the six HIS/M&E focus areas identified in the Strategic and Investment plan, and only amounts to approximately US\$16 million for all four fiscal years (2014–2016). There is also a need to engage the counties in the investment planning process and empower them to undertake a similar activity at their level.

5.4 Relative Contribution of Each Partner

Based on a detailed look at the analysis, five out of the 26 partners provided more than 50 percent of the total budgetary allocation for the 2016–2017 fiscal year. If the data are accurate, it would be beneficial for the MOH to identify such key partners and deliberate with them very early in the work planning process to ensure that their budgets are well aligned to priority areas of implementation of HIS/M&E activities. This would also provide the opportunity to ensure that these key partners do not duplicate their investments in the same focus and subfocus areas. However, because of the different interpretation of the mapping tool by different partners, it is possible that some included their internal operational costs as part of the budget allocation to the MOH, and others have a clear delineation between their internal costs and the actual activity implementation costs.

Another challenge encountered during this assessment when evaluating contributions from all partners was that some partners provided minimal information on the specific HIS/M&E activities that they have committed to support. Such partners only indicated the names of the projects and activities plus the budgetary estimates, but they did not provide details on the HIS/M&E focus areas supported, the activity programmatic areas, the geographic distribution of the funds, or allocations across the cost categories. This meant that the team doing the data analysis had to make informed guesses on the missing information to enable inclusion of such data in the analysis.

5.5 Distribution across the Counties

Another area of concern based on the findings is the fact that out of the 47 counties in Kenya, a few of them are receiving a large proportion of the budgetary allocation, and others receive zero or near zero budgetary allocation. A case in point is Kilifi, which was allocated about US\$2 million, and the neighbouring Lamu, located in the same coastal region, which received approximately US\$6,000. It will be necessary to do further investigation beyond the scope of this mapping exercise to understand disparity in budgetary allocations.

Another challenge when looking at the county budgetary allocations was that 24 percent of total budget commitments (approximately US\$12 million) was indicated as being for support of activities “across all counties.” Ideally, this means that each of the 47 counties will benefit from this funding. However, it is not clear that this was the understanding of the stakeholders who submitted the data and will require better clarification in future investment mapping cycles.

6. CONCLUSION AND RECOMMENDATIONS

This first partner HIS/M&E activity mapping exercise has yielded interesting results that are worth disseminating to all stakeholders for their understanding of how the current support map looks. It also represents a good starting point for future work planning for both the MOH and for partners.

One gap discovered when trying to draw conclusions from this analysis is that the current MOH M&E framework does not include a budget pegged to the focus and subfocus areas for implementation of activities. Ideally, the budgets from the activity mapping exercise should be able to be linked to the overall MOH M&E activities budget to establish the gaps between what was planned and the budget commitments available. There is also a need to use the budgetary data collected from all partners for validation against the joint work plans prepared by the MOH in partnership with all stakeholders to show whether the funding that each partner committed to support corresponds to what they have reported as their committed budget in the activity mapping.

Although the tool was designed to collect data on the current fiscal year (2016–2017) plus commitments for the next two fiscal years, most of the partners only included information about their budgetary allocation for the current fiscal year. When undertaking future mapping activities, there may be a need to reconsider whether to restrict data collection to the current fiscal year only. It is possible that collecting data for the out years (i.e., future fiscal years) is misleading because budget projections and commitments do not always translate to actual expenditures. Anything could happen to cause the partners to modify their budgets. It might also be interesting to include retrospective expenditure data for at least the previous budget year. These data could be used to understand the situation on the ground before funding subsequent projects in terms of what had already been spent on certain activities, to see the continuity of funding for each activity, and to determine whether the same funders continued supporting the same activities across the years.

Finally, there is room for some enhancement of the mapping tool based on the identified limitations, and especially to ensure that all the participants have a common understanding of all the data elements being collected. Based and informed by this report, Kenya is in a better position to develop a comprehensive investment plan for HIS and M&E for the Health sector. Such a plan would subsequently inform the development of county specific HIS and M&E investment plans.

7. REFERENCES

- Gao, J. (2015). SDGs and health related SDG indicators. Beijing, China: World Health Organization/Western Pacific Region. Retrieved from <http://www.unicef.cn/en/uploadfile/2015/1119/20151119051904447.pdf>
- Health Data Collaborative. (2016a). *Kenya Health Data Collaborative conference report*. Retrieved from <https://www.healthdatacollaborative.org/news/article/kenya-health-data-collaborative-conference-report-69/>
- Health Data Collaborative. (2016b). *Kenya Health Data Collaborative roadmap*. Retrieved from <https://www.healthdatacollaborative.org/fileadmin/uploads/hdc/Documents/KENYA THE ROAD MAP Kenya Health Data Collaborative K H D C .pdf>
- Health Data Collaborative. (2017). Data for health and sustainable development. [Website]. Retrieved from <https://www.healthdatacollaborative.org/>
- Health Metrics Network. (2008). *Framework and standards for country health information systems*. 2nd Edition. Geneva, Switzerland: Health Metrics Network. Retrieved from <http://www.who.int/healthmetrics/en/>
- Kieny, M. (2015). The Sustainable Development Goals: The place of health in the post-2015 agenda. Geneva, Switzerland: World Health Organization. Retrieved from <http://graduateinstitute.ch/files/live/sites/iheid/files/sites/globalhealth/ghp-new/events%202015/Ties%20Boerma The%20Sustainable%20Development%20Goals%20-%20The%20place%20of%20health%20in%20the%20post-2015%20agenda 17%20May.pdf>
- Ministry of Health, Republic of Kenya. (2014a). *Health sector monitoring and evaluation framework, July 2014–June 2018*. Nairobi, Kenya: Ministry of Health. Retrieved from http://publications.universalhealth2030.org/uploads/monitoring_and_evaluation_framework_2014_20181.pdf
- Ministry of Health, Republic of Kenya. (2014b). *Kenya health policy, 2014–2030*. Nairobi, Kenya: Ministry of Health. Retrieved from <http://publications.universalhealth2030.org/ref/d6e32af10e5c515876d34f801774aa9a>
- Ministry of Health, Republic of Kenya. (2016). Communiqué on commitments to support One Monitoring and Evaluation Framework for Kenya. Nairobi, Kenya: Ministry of Health. Retrieved from https://www.healthdatacollaborative.org/fileadmin/uploads/hdc/Documents/Kenya_Final_One_ME_Communique.pdf
- Republic of Kenya. (2013). *Health sector strategic and investment plan (KHSSP), July 2014–June 2018*. Retrieved from http://www.who.int/pmnch/media/events/2013/kenya_hssp.pdf
- World Bank, United States Agency for International Development, & World Health Organization. (2015). Health measurement and accountability post 2015: Five-point call to action. Retrieved from <http://www.hivsharespace.net/resource/health-measurement-and-accountability-post-2015-five-point-call-action>

United Nations. (2016). Sustainable development goals: 17 goals to sustain our world. New York, NY: UN. Retrieved from <http://www.un.org/sustainabledevelopment/development-agenda/>

APPENDIX A. ESTIMATED ALLOCATIONS TO HIS/M&E BY COUNTY DEPARTMENTS OF HEALTH

S/No.	County	County budget 2016/17	PE County	O&M - M&E - HIS	PE - M&E-HIS	M&E-HIS	Percentage M&E	Per capita (USD)	
								Total allocation	Total HIS
1	Baringo	18,136,143	10,452,796	11,717	348,828	360,544	1.99%	26.00	0.52
2	Bomet	8,533,988	4,087,114	14,534	168,871	183,404	2.15%	9.31	0.20
3	Bungoma	20,064,904	2,792,086	16,141	397,044	413,185	2.06%	12.80	0.26
4	Busia	14,518,555	8,370,722	31,304	287,293	318,597	2.19%	17.12	0.38
5	Elgeyo Marakwet	12,975,167	9,487,970	15,468	256,753	272,221	2.10%	27.93	0.59
6	Embu	18,832,179	12,099,920	47,001	372,651	419,653	2.23%	33.09	0.74
7	Garissa	14,344,992	7,548,744	8,585	283,859	292,444	2.04%	32.95	0.67
8	Homa Bay	14,912,380	8,564,253	18,791	295,086	313,877	2.10%	13.18	0.28
9	Isiolo	7,265,668	4,298,633	26,236	143,773	170,009	2.34%	45.98	1.08
10	Kajiado	15,283,399	8,295,238	8,634	302,428	311,062	2.04%	17.71	0.36
11	Kakamega	31,894,988	15,137,873	18,018	631,138	649,156	2.04%	16.85	0.34
12	Kericho	15,108,539	9,398,449	32,980	298,968	331,948	2.20%	16.00	0.35
13	Kiambu	39,106,472	21,386,935	22,091	773,839	795,930	2.04%	20.79	0.42
14	Kilifi	24,469,816	12,299,183	15,559	484,209	499,767	2.04%	17.61	0.36
15	Kirinyaga	11,387,960	9,381,560	16,694	225,345	242,039	2.13%	18.60	0.40
16	Kisii	27,103,848	15,067,860	36,918	536,331	573,249	2.12%	20.03	0.42
17	Kisumu	24,016,593	14,376,051	12,292	475,240	487,532	2.03%	21.11	0.43
18	Kitui	23,158,032	10,078,595	13,134	458,251	471,385	2.04%	20.75	0.42
19	Kwale	17,565,528	8,032,683	5,831	347,587	353,418	2.01%	21.58	0.43
20	Laikipia	5,461,896	2,723,618	12,762	108,080	120,842	2.21%	10.90	0.24
21	Lamu	6,976,070	3,715,783	24,912	138,042	162,954	%	54.85	1.28
22	Machakos	22,259,026	14,695,040	45,621	440,462	486,083	2.18%	18.38	0.40
23	Makueni	21,394,570	10,890,085	10,842	423,356	434,198	2.03%	21.94	0.45
24	Mandera	17,003,121	6,177,926	29,180	336,458	365,638	2.15%	23.72	0.51
25	Marsabit	10,807,305	6,020,184	4,800	213,855	218,655	2.02%	33.65	0.68
26	Meru	19,288,295	12,552,079	19,840	381,677	401,517	2.08%	12.90	0.27
27	Migori	11,393,064	5,365,644	5,166	225,446	230,612	2.02%	10.58	0.21
28	Mombasa	27,635,213	15,549,910	24,807	546,846	571,653	2.07%	23.50	0.49
29	Murang'a	15,620,633	10,684,422	13,784	309,101	322,885	2.07%	14.30	0.30
30	Nairobi City	68,422,111	36,918,023	59,641	1,353,937	1,413,578	2.07%	15.74	0.33
31	Nakuru	42,343,532	30,514,218	25,387	837,894	863,281	2.04%	21.04	0.43

S/No.	County	County budget 2016/17	PE County	O&M - M&E - HIS	PE - M&E-HIS	M&E-HIS	Percentage M&E	Per capita (USD)	
								Total allocation	Total HIS
32	Nandi	15,982,475	6,033,688	7,105	316,261	323,366	2.02%	16.91	0.34
33	Narok	12,523,669	6,449,060	8,538	247,818	256,356	2.05%	11.73	0.24
34	Nyamira	15,984,287	7,023,300	7,671	316,297	323,969	2.03%	22.76	0.46
35	Nyandarua	9,351,357	6,381,617	14,858	185,045	199,903	2.14%	13.53	0.29
36	Nyeri	23,073,266	15,931,355	27,639	456,574	484,213	2.10%	28.70	0.60
37	Samburu	7,217,946	3,896,525	4,598	142,829	147,427	2.04%	25.67	0.52
38	Siaya	19,348,516	9,808,749	22,136	382,868	405,004	2.09%	19.56	0.41
39	Taita/Taveta	10,289,523	5,922,608	7,585	203,609	211,194	2.05%	28.86	0.59
40	Tana River	11,547,739	3,270,224	9,040	228,507	237,547	2.06%	38.39	0.79
41	Tharaka Nithi	12,222,301	6,474,200	6,050	241,855	247,905	2.03%	30.35	0.62
42	Trans-Nzoia	15,529,826	9,075,857	8,233	307,304	315,538	2.03%	15.11	0.31
43	Turkana	11,976,715	137,247	6,091	236,995	243,086	2.03%	11.15	0.23
44	Uasin Gishu	15,461,480	9,118,943	10,960	305,952	316,911	2.05%	13.78	0.28
45	Vihiga	10,671,522	5,085,592	8,772	211,168	219,940	2.06%	16.88	0.35
46	Wajir	11,398,132	5,775,145	5,723	225,546	231,269	2.03%	24.64	0.50
47	West Pokot	12,789,376	6,944,724	6,304	253,076	259,380	2.03%	19.87	0.40
	County total	842,652,117	454,292,430	809,976	16,664,350	17,474,326	2.07%		
	National MOH	611,949,748	-	231,544	2,083,897	2,315,441	0.38%		
	Sector	1,454,601,866	454,292,430	1,041,520	18,748,247	19,789,766	1.36%	32.08	0.44

Republic of Kenya
Ministry of Health



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