A national framework for sustainability of health knowledge translation initiatives in Uganda

Full Report

Included:
- Description of a health system problem
- Viable options for addressing this problem
- Strategies for implementing these options

Not included: recommendations
This policy brief does not make recommendations regarding which policy option to choose

Who is this policy brief for?
Policymakers, their support staff, and other stakeholders with an interest in the problem addressed by this policy brief

Why was this policy brief prepared?
To inform deliberations about health policies and programmes by summarising the best available evidence about the problem and viable solutions

What is an evidence-based policy brief?
Evidence-based policy briefs bring together global research evidence (from systematic reviews*) and local evidence to inform deliberations about health policies and programmes

*Systematic review: A summary of studies addressing a clearly formulated question that uses systematic and explicit methods to identify, select, and critically appraise the relevant research, and to collect and analyse data from this research

Executive Summary
The evidence presented in this Full Report is...
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Competing interests
None known.

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SURE – Supporting the Use of Research Evidence for Policy in African Health Systems – is a collaborative project that builds on and supports the Evidence-Informed Policy Network (EVIPNet) in Africa and the Regional East African Community Health Policy Initiative(1). SURE is funded by the European Commission’s 7th Framework Programme. www.evipnet.org/sure

REACH - The Regional East African Community Health-Policy Initiative is an institutional mechanism or “knowledge broker” designed to link health researchers with policy-makers and other vital research-users. It connects these constituencies through shared and dynamic platforms that support, stimulate and harmonize evidence-based and -informed policymaking processes in East Africa. www.eac.int/health/index.php?...regional-east-af

The Evidence-Informed Policy Network (EVIPNet) promotes the use of health research in policymaking. Focusing on low- and middle-income countries, EVIPNet promotes partnerships at the country level between policymakers, researchers and civil society in order to facilitate policy development and implementation through the use of the best scientific evidence available. www.evipnet.org
Table of contents

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Preface</td>
<td>5</td>
</tr>
<tr>
<td>Executive Summary</td>
<td>8</td>
</tr>
<tr>
<td>Key messages</td>
<td>8</td>
</tr>
<tr>
<td>Policy options</td>
<td>18</td>
</tr>
<tr>
<td>Implementation considerations</td>
<td>21</td>
</tr>
<tr>
<td>References</td>
<td>24</td>
</tr>
<tr>
<td>Appendices</td>
<td>26</td>
</tr>
</tbody>
</table>
Preface

The purpose of this report
This report is intended to inform the deliberations of those engaged in developing policies on sustainability of health knowledge translation initiatives policies as well as other stakeholders with an interest in such policy decisions. It summarizes the best available evidence regarding the design and implementation of policies on how to advance sustainability of health knowledge translation initiatives policies in Uganda’s [mainstream] health system. The purpose of the report is not to prescribe or proscribe specific options or implementation strategies. Instead, the report allows stakeholders to consider the available evidence about the likely impacts of the different options systematically and transparently.

How this report is structured
The report is presented in two parts. The first is an executive summary which outlines each section. This summary may be particularly useful to those who do not have enough time to read the full brief. The second part contains the full report: this details the problem, the available evidence used to address the problem, and the approaches that were used during the preparation of the brief. The executive summary and full report each contain a one page summary of the key messages.

How this report was prepared
This report brings together both global and local evidence to inform deliberations about advancing the sustainability of health knowledge translation initiatives in the health system. We searched for relevant evidence describing the problem, the impacts of options for addressing the problem, barriers to implementing those options, and implementation strategies to address those barriers. The search for evidence focused on relevant systematic reviews regarding the effects of policy options and implementation strategies. We have included information from other relevant studies when systematic reviews were unavailable or insufficient. Other documents, such as government reports and
unpublished literature, were also used. The methods used to prepare this brief are further elaborated in Appendix 1.

**Why we have focused on systematic reviews**

Systematic reviews of research evidence constitute a more appropriate source of evidence for decision-making than relying on the most recent or most publicised research study (2). We define systematic reviews as reviews of the research literature that have an explicit question, an explicit description of the search strategy, an explicit statement about what types of research studies were included and excluded, a critical examination of the quality of the studies included in the review, and a critical and transparent process for interpreting the findings of the studies included in the review.

Systematic reviews have several advantages (3). Firstly, they reduce the risk of bias in selecting and interpreting the results of studies. Secondly, they reduce the risk of being misled by the play of chance in identifying studies for inclusion or the risk of focusing on a limited subset of relevant evidence. Thirdly, systematic reviews provide a critical appraisal of the available research and place individual studies or subgroups of studies in the context of all of the relevant evidence. Finally, they allow others to appraise critically the judgements made in selecting studies and the collection, analysis and interpretation of the results.

While practical experience and anecdotal evidence can also help to inform decisions, it is important to bear in mind the limitations of descriptions of success (or failures) in single instances. They may be useful for helping to understand a problem, but they do not provide reliable evidence of the most probable impacts of policy options.

**Uncertainty does not imply indecisiveness or inaction**

This brief has instances where there is “insufficient evidence”. Nonetheless, policymakers must make decisions. Uncertainty about the potential impacts of policy decisions does not mean that decisions and actions can or should not be taken. However, it does suggest
the need for carefully planned monitoring and evaluation when policies are implemented (4).

**Limitations of this report**

For options where we did not find an up-to-date systematic review, we have attempted to fill in these gaps through other documents, through focused searches and personal contact with experts, and through external review of the report.

Summarising evidence requires judgements about what evidence to include, the quality of the evidence, how to interpret it and how to report it. While we have attempted to be transparent about these judgements, this report inevitably includes judgements made by review authors and judgements made by ourselves.
Executive Summary

Key messages

The problem:
There is no explicit sustainable system for KT activities that would ensure that KT informs health policy, strategies, practices, public opinion and social transformation in Uganda. Knowledge translation could improve health care delivery particularly for special needs population groups like the poor and rural populations. World Health Organization points out that developing a coalition between researchers, policy makers and practitioners’ plays an important role in linking research, policy and Evidence-Informed Decision Making (EIDM).

Policy options:
Consideration could be made of a combination of these options:

1) Advocacy on importance and use of KT
2) Institutionalize KT
3) Capacity building for researchers and research users

1. UNHRO working closely with the entire health sector could identify and use a champion. Dissemination on what KT can provide to the President, Cabinet, Parliament and other politicians of various shades including policy makers, practitioners and implementers needs to be carried out.
2. An operational framework should be in place and put in use. UNHRO and the entire sector could explore different governance, financial arrangements, outputs, activities and how they can be delivered.
3. Capacity building for researchers and research users, policy and decision makers in KT with a focus on training mid-level managers especially the District Health Teams.
Implementation strategies:

1. Health system concerns like national and international research policy will affect KT sustainability as well.

2. The availability of resources for KT will impact on sustainability. These factors are fixed in the short term and determine what is feasible.

3. Consideration of interests of stakeholders who include funders especially donors, Government of Uganda, the managers, staff of the current KT initiatives, policy and evidence informed decision makers at large will affect sustainability.

4. The sustainability of KT shall be influenced by the way the leaders in the health sector in Uganda appreciate the value of evidence in decision making.

5. Training of stakeholders, KT programs monitoring and evaluation are likely to impact on sustainability.
The problem

Introduction and framing of the problem

This evidence policy brief aims at contributing to policy development of knowledge platforms in which products of health research can be converted into usable, actionable outputs within the health sector in a sustainable way in Uganda. It attempts to address sustainability of all knowledge translation initiatives in the country. This could improve health care delivery particularly for special needs groups like the poor and rural populations. The World Health Organization points out that developing a coalition between researchers and policy makers and practitioners’ plays an important role in linking research, policy and Evidence-Informed Decision Making (EIDM). It has been identified as one of the ways through which governments can improve the health of their populations. Full use should be made of scientific evidence, and we should also work to bridge gaps between decision-making and scientific research (1). "If you are poor, you actually need more evidence, before you invest, rather than if you are rich" (5). Indeed all countries need to step up efforts to increase investment in health research. At the same time, full use should be made of scientific evidence, and efforts should be geared at working to bridge gaps between decision-making and scientific research (1).

The Supporting Use of Research Evidence project (6) of Makerere University College of Health Sciences (MakCHS), in collaboration with the Uganda National Health Research Organization (7) instigated this process of developing a framework for sustainability of national health knowledge translation (KT) initiatives. UNHRO is an autonomous body in the Ministry of Health responsible for coordination, promotion and guidance of health research in Uganda (7). SURE is funded by the European Union. It builds on and supports the Evidence-Informed Policy Network (EVIPNet) in Africa and the Regional East African Community Health Policy Initiative (1). The project involves teams of researchers and policymakers in seven African countries (Ethiopia, Mozambique, Uganda, Zambia, Central African Republic, Burkina and Cameroon) and is supported by research teams in four European countries (Norway, Sweden, France and Switzerland) and Canada. The project supports the improvement of health policy in Low and Middle Income Countries
(LMICs) by developing, piloting and evaluating strategies designed to strengthen access to and use of relevant research syntheses in policy making. One of these strategies is production of evidence briefs for policy in priority areas identified in consultation with national health policymakers (1).

This brief is organised in three sections: the introduction, where the background to the problem of lack of sustainability of the current KT initiatives is presented, international and national context of KT, size and cause of the problem in Uganda. In section 2, we do propose policy options for policy makers and practitioners. Finally, section three provides the implementation considerations and references. In the appendix section, we do provide details on how the brief was prepared and finalised. Included also are acronyms and abbreviations, glossary, acknowledgement and references.

**Background**

The Evidence Informed Policy Network (EVIPnet) for Africa points out that universal and equitable access to health care, health-related Millennium Development Goals (MDGs) and other national health goals are unlikely to be achieved without evidence-informed health policies and actions. In addition, it is unfortunate that health policies are often not well-informed by research evidence. Indeed, poorly informed decision-making is one of the reasons why services fail to reach those who need them most. EVIPnet further indicates that health indicators are off track, and it appears unlikely that many countries in Africa will meet the health-related MDGs. Reasons for this include problems with the production and accessibility of relevant research and problems with the use of research evidence by policymakers (1).

In this evidence brief, knowledge translation is defined as a dynamic and iterative process that includes synthesis, dissemination, exchange and ethically sound application of knowledge to improve health, provide more effective health services and products and strengthen the health care system (8). Besides knowledge translation, there are other related terminologies that depict knowledge sharing activities. These are knowledge
Brokering, knowledge exchange and knowledge mobilization (9). KT strategies are used in public health to promote Evidence-Informed Decision Making (EIDM). In this brief, EIDM refers to incorporating the best available research evidence into public health policy and program decision making. Use of EIDM is believed to optimize patient and population health outcomes (10, 11). Sustainability is the ability to maintain programming and its benefits over time at certain rate and level. It involves the existence of structures and processes that allow a program to leverage resources to effectively implement and maintain evidence-based policies and activities. It includes organizational and systems characteristics (12, 13).

Evidence informed policy making in LMICs has the potential to reduce morbidity and mortality. However, mediating the ‘know-do’ gap is undoubtedly still a challenge (14). A systematic review by Lavis et al highlights the difficulty policymakers face in accessing and using research evidence for policy-making (15). Translating best available research evidence into programmatic change is a complex process (11). Barriers to EIDM include lack of financial incentives at different levels of the health care system; limited access to research evidence and lack of equipment in health care organizations. Furthermore, existing standards may not be in line with recommended practice by health care teams; individual health care professionals lack adequate knowledge, attitudes and skills in critically appraising and using evidence from the literature. Lack of time and resistance to change are also barriers to EIDM (10, 16, 17).

This evidence brief is limited to sustainability of KT activities related to health systems building blocks. These blocks are health services delivery including health education, human resources issues like health worker staffing, health infrastructure, health commodities such as equipment, medicines and logistics. Other health systems issues to be addressed are health information system, effective financing of health services, leadership and governance.
**International policy context**

The Mexico statement of 2004 summit of Health Ministers on health research knowledge for better health on strengthening health systems called for national governments to establish sustainable programs to support evidence based public health and health care delivery systems, and evidence-based health related policies (18). In the African continental context, the WHO Algiers Declaration of 2008 Ministerial conference on research for health called for support to translate research into policy and action by establishing appropriate mechanisms and structures, including setting up networks of researchers (19). It also called for allocation of at least 2% of the national expenditure and 5% of health external project and programmed aid to health research and to generate evidence for better decision making (19).

Ethiopia is the only country in the SURE consortium that has an elaborate established government structure for KT. The Ethiopian Health and Nutrition Research Institute (EHNRI) has a Technology Transfer & Research Translation Directorate, responsible for advocating the formulation and/or amendments of sound policies in the Ethiopian health sector, based on scientific evidence. It has produced evidence briefs, tested user policy briefs and intends to establish a clearinghouse that will serve as an online repository of policy briefs for informed decision making and health policies (20).

The East African Community established East African Health Research Commission as a research coordinating organ. There are two programmes under this mechanism: the Integrated Disease Surveillance and Regional East African Community Health Policy Initiative (1). REACH is an institutional mechanism or “knowledge broker” designed to link health researchers with policy-makers and other vital research-users. It connects these constituencies through shared and dynamic platforms that support, stimulate and harmonize evidence-based and informed policymaking processes (21).
National policy context and achievements

The national development plan 2010/11-14/15 points out that one of strategic actions for improving public sector management and administration by Ugandan government is to ensure that policies are based on sound research, analysis and evaluation. The plan further underscores the lack of a national database of research done and limited translation of research findings into policy in the health sector (22). The health sector has favorable policies towards health research and KT. The second national health policy sets out to create a culture in which health research plays a significant role in guiding policy formulation and action to improve the health and development of the people of Uganda. It points out underfunding of research activities and limited translation of research findings into policy and the dissemination of results as some of key challenges in the health sector. The sector sets to establish a functional integration between the public and private sectors in health care delivery, training and research. The health sector strategic and investment plan 2010-11-2014/5 points out that, as a result of lack of resources, research in Ugandan health sector is mainly donor driven. There are few regular meetings of researchers, policy makers and practitioners to turn research findings into policy (23). Uganda National Health Research Organization has the mandate to coordinate health research in Uganda and to facilitate dialogue between the policy makers and practitioners, researchers in different disciplines, health providers and communities in order to ensure that research findings are utilized by relevant stakeholders (24). The health research policy in Uganda 2012-2022 underscores the need for application of evidence in policy development and practice (7). Currently, UNHRO is severely understaffed, underfunded and therefore unable to carry out its full mandate (25).

The Ugandan health sector has previously carried out undertakings in KT in health systems that have been used to shape country policies. These include anti-malarials drug use and resistance, use of nevirapine in prevention of mother to child HIV transmission and involvement of community health workers in integrated management of childhood illness (24, 26-28). Other examples include studies on safe male circumcision in HIV prevention (29) and routine HIV counselling and testing which were quickly adopted for
policy after research demonstrated overwhelming benefits for HIV prevention (30, 31). In most instances, the push for policy changes or development usually arises from the Ministry of Health, political pronouncements and manifestos of sitting governments or an internationally recognized need, often through the World Health Organization (32).

In an effort to support the use of research evidence for policy making in Uganda, SURE Project-Uganda has been testing evidence briefs for policy, policy deliberative dialogues and a rapid response service to address urgent questions by policy makers and practitioners. The REACH/SURE Project Uganda Office has developed a clearinghouse and a web-based portal as a dissemination strategy for Uganda-specific evidence documents. These are policy deliberative dialogue summaries, evidence briefs, rapid response summaries and research syntheses among others (6). SURE is a donor funded project that expires in 2014. To build on the SURE project, the African Centre for Systematic Reviews and Knowledge Translation (AFRICENT) is involved in strengthening capacity in knowledge translation in the African systems and builds on experience of SURE project. The AFRICENT is an International Development Research Centre of Canada funded project under the College of Health Sciences (1, 33). There are other KT initiatives in the health sector like the evidence briefs in human resources for health in the School of Public Health, Makerere University College of Health Sciences, and HIV/AIDS Control related KT by the Uganda AIDS Commission which are also donor funded with a fixed time frame (25). MakCHS-School of Public Health also runs health systems Knowledge Translation Network for Africa (KTNet). It shares a platform for KT and builds capacity among the eight coalitions and relevant stakeholders. It also promotes collaborations and KT best practices sharing across network and other global partners (34).

There are other research institutions that provide research input to government and other stakeholders and also regulate research. Uganda National Academy of Sciences (UNAS) is an eminent body offering independent merit-based advice for the prosperity of (35). Uganda National Council of Science and Technology is a Government of Uganda agency under the Ministry of Finance Planning and Economic Development. It is mandated to
facilitate and coordinate the development and implementation of policies and strategies for integrating science and technology into the national development process (36).

**Size of the problem**

There is no explicit sustainable system for KT activities that would ensure that KT informs health policy, strategies, practices, public opinion and social transformation in Uganda. UNHRO sometimes plays a key role in KT like in the case of SURE project where the Director General of UNHRO is one of the investigators but in many other undertakings UNHRO is not involved (25).

**Causes of the problem**

The findings from the interviews of stakeholders and Ugandan based KT studies revealed a number of causes (25, 37). These causes have been supplemented by additional published literature and are presented in this section.

**Lack of advocacy and limited capacity to use evidence**

Interviews with stakeholders revealed that there was no specific unit in the health sector to coordinate and synthesize research. There is hardly any elaborate culture of KT. Furthermore, there is inadequate direct linkage of researchers and KT intermediaries with decision makers. Indeed, there is limited advocacy work for health research and KT in Ugandan health sector. Communication of research findings is not well packaged to suite the audience and specifically, the decision makers. There are limited meeting grounds for researchers, policy makers, practitioners and implementers. KT is at its infancy and not well understood and received. Uganda policy makers and practitioners including top and mid-level health services managers have received limited training in evidence based decision making. In a decentralized system, districts and municipalities make by-laws and other policies but do not have a specific unit which can address their KT needs (25, 37).
A study on research, evidence and policy making in Uganda pointed out limited capacity among policy makers and practitioners in research processes, interpretation, synthesis and application of evidence. This same study underscores that policy makers, practitioners and decision makers in Uganda are reluctant to use evidence. This is also echoed by other studies which place emphasis on significance of capacity building among policy makers and practitioners in KT so as to increase uptake of evidence (38, 39). Lavis in his work on assessing provincial and national efforts to link research and action points out that KT is new and there is need of researchers’ skill- development programs to develop their capacity to execute evidence-informed KT strategies. For research users, skills development programs to enhance their capacity to acquire, assess, adopt and apply research could enhance use of KT (39). Probably, it is when there is marked use of research evidence that sustainability of KT platforms will have greater relevance than it does today (25).

Lack of a framework for KT:
There is no sustainability mechanism for the current country frameworks or platforms nor a system to ensure a sustained coordination mechanism of existing national health KT platforms. There are multiple players and each one working in his or her own domain (25). In his work on knowledge infrastructure for healthcare systems, Ellen & Lavis came up with a proposal that such framework should include the broad domains of research production, activities used to link research to action and evaluation (40, 41). Jacobson et al further propose that a framework could consists of five domains: the user groups, the issue, the research, the knowledge translation relationship and dissemination strategies (42).

Funding and other resources for KT:
The current scattered KT efforts in Uganda are largely donor funded, and there is no earmarked government funding (25). There is no stable funding and capacity to expand and sustain the current/past level of capacity, priority setting, governance and clearly defined relationships with the Ministry of Health and other stakeholders (43).
Lavis further points out that the days of government funding for KT are limited and further elaborates that institutions involved in KT could raise money through peer-reviewed grant competitions like the case of the McMaster Health Forum (41). Holmes et al point out that organizations involved in KT could use current resources while developing the internal, external resources and partnerships needed towards the development and implementation of KT (43). Health programs that depend on international funding are hard to sustain because of the complex relations of sustained resource flow, increasing the difficulty in aligning health programs and their powerful stakeholders (12). Research funders might also promote KT directly by developing their own knowledge translation strategy, disseminating information about funded and completed research. They could involve end users in prioritizing research topics (i.e., commissioned research), and funding implementation research i.e., the scientific study of methods to promote the use of research findings in practice) (44). National agencies may be more motivated to engage in knowledge translation activities than international funding agencies. These findings lend credence to the perception that international funding agencies may not be well connected to realities on the ground at country-level (14).

Policy options

Based on results of problem analysis, interviews of stakeholders (25) and Ugandan based KT studies (25, 37), supplemented by additional literature and a deliberative policy dialogue, we do present policy options in this section. The three options are complementary, with the primary aim of ensuring the optimal use of research evidence as a vital input in policy making policy process evidence informed decision making and ultimately, efficient and effective care. The policy makers, practitioners and other stakeholders could consider these options while developing a national strategy for sustainability of KT initiatives in Uganda. Minimal published research evidence was found on these options, their feasibility and impacts of intervention; the major input was evidence adduced from key informant interviews and a deliberative policy dialogue.

Policy option 1:
Advocacy on importance and use of KT

Uganda National Health Research Organization working closely with the entire health sector could identify and use champions. Currently, there is no clearly identified champion on KT sustainability. In their systematic review on an integrated approach for sustainability of health programme planning, Gruen et al adduce evidence from several studies that one of the key factors affecting sustainability of any program is presence of a champion (12). They elaborate further that it is strategic that these champions should be part of the upper or middle management of an organisation. The champions could be politicians with expertise in the health sector with high regard in the use of research evidence.

Dissemination of information on what KT can provide to the President, Cabinet, Parliament and other politicians of various shades and other policy makers, practitioners and implementers needs to be carried out. The sector could solicit for political commitment to ask for evidence. The media could be involvement in KT. Knowledge brokers could do regular media conferences on KT. The researchers and knowledge brokers could use simple language/English in communication and use of websites, blogs and other web based communication channels. One of the key undertakings could be to explore the linkages of KT in the health sector with other sectors. The sector could also rally support from health professionals and the civil society organizations to mobilize resources for KT (25).

Policy option 2:

Institutionalize KT

An operational framework should be put in place. UNHRO and the entire sector could explore different governance, financial arrangements, outputs, activities and how they can be delivered. It could involve developing a KT framework which could be a platform or a clearing house or a coordination structure/unit or both. The government structure to handle KT could be UNHRO or a public University. The UHRO strategic plan 2010-2014 provides for setting up a national knowledge translation platform for health research
evidence and application. Big units in the health sector like Mulago National Referral Hospital should have their own KT units. UNHRO could link with Uganda National Academy of Sciences, Uganda National Council of Science and Technology and other institutions involved in KT (25). The government could as well budget for KT from consolidated funds in line with Algiers declaration (19). The sector could also explore a business model of paying for KT services for whatever institution is in need of services from an established KT unit like in the case of National Institute of Health Care and Excellence in the British National Health Service (45). This is futuristic; in Uganda importance of evidence is not yet valued.

Policy option 3:

**Capacity building for researchers and research users**

The sector could carry out orientation and stakeholder involvement in research and KT especially for politicians. It could work out modalities of appointing right team with skills and expertise in KT. The team should be mentored, given leadership skills tailored training in use and sustainability of KT. Partnerships of researchers with policy makers and practitioners, decision makers and other stakeholders could be built. The sector could carry out training of researchers, policy and decision makers in KT with a focus on training mid-level managers especially the District Health Teams. Capacity of researchers to write and communicate briefs should be built as well. A strategy on how KT could benefit the frontline worker should be developed. Involvement of committees from inception could be very vital in the use of research evidence and derive lessons for sustainability (25).
Implementation considerations

We did not come across elaborate published evidence on the facilitators of each option, and what the barriers and other considerations for implementation are. However, we do capture and present key factors that arise in the problem analysis and in developing policy options related to KT sustainability and present them in a model in figure 1. The model is a modification from one by Gruen et al in their study on sustainability of health programme planning (12). The model presented by Gruen et al has been adopted to Ugandan context and to the topic of KT sustainability. The modified model takes into consideration of the context and resources, stakeholders of whom one should serve as a champion. KT sustainability will depend on the prevailing Uganda’s and international contexts’ that are characterized by socio-cultural, political, economic, geographical, Uganda’s policy context, environmental and partnerships. Health system concerns like national and international research policy will affect KT sustainability as well. Indeed, the way the UNHRO is going to implement Uganda national health research policy and strategic plan will affect KT. Furthermore, the availability of resources for KT will impact on sustainability. These factors are fixed in the short term and determine what is feasible. The other key KT interventions could be advocacy, communication and program design. The stakeholders for KT sustainability in Uganda include funders especially donors and the government of Uganda, the managers and staff of the current KT initiatives, policy and evidence informed decision makers at large. Others are communities and their leaders who are to be affected by the policies or decisions. The key donors in the field of KT have been multilaterals like European Union, bilateral development agencies and research organizations from Norway and Canada. The government of Uganda has not directly funded KT (25).

The sustainability of KT shall be influenced by the way the leaders in the health sector in Uganda appreciate the value of evidence in decision making. Donor funds are affected by political economy of the donor governments, multilateral institutions like The World Bank, European Union and implementing partnering organization from the donor world. Gruen et al further point out that demonstration of positive effect of KT interventions or lack thereof will affect resource mobilization (12). The KT interventions that aim at
advocacy or communication, training of stakeholders and program monitoring and evaluation are likely to impact on sustainability. The relationship between stakeholders, KT interventions and health system concerns is bidirectional. Understanding of a health system concerns informs KT interventions and modifies understanding and response by stakeholders. It is analogous to the quality cycle; the health system problems inform KT interventions and in effect KT modifies the health system problem. The perceptions of health system problems depend on why policies and decisions are perceived. The definition of the health system problem is subjective, depends on the stakeholder and is complex and bidirectional (12).

This evidence policy brief will inform the health sector in Uganda and other countries with similar settings on the health knowledge translation sustainability and further research in the field.
Figure 1: A System for KT sustainability in Uganda
References


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**Appendices**

**Appendix 1. How this policy brief was prepared**
The methods used to prepare this evidence brief are described in detail in these studies reviewed. A working group with expertise in research, practise and application of KT was put in place by the SURE project to guide the process of developing a sustainable KT framework in Uganda. The group identified 33 key informants in the field of KT who were interviewed and provided views and information needed for the development of the KT framework. These were policy makers and practitioners in Ministry of Health, Development Partners (donors) including the civil society, researchers, academicians and health systems practitioners.

The problem this evidence brief addresses was identified through an explicit priority setting process involving policymakers and other stakeholders, further clarification with key informant interviews of relevant policymakers, review of relevant documents and discussion with the REACH sustainability of KT Working Group. Research describing the size and causes of the problem was identified by reviewing government documents, routinely collected data, electronic literature searches, contacts with key informants and reviewing the reference lists of relevant documents that were retrieved. Strategies used to identify potential options to address the problem included considering interventions described in relevant documents, considering ways in which other jurisdictions have addressed the problem, consulting key informants and brainstorming (29).

We searched electronic databases using index terms or free text in PubMed, Health Systems Evidence, Cochrane Library, Campbell Collaboration, DARE, HTA databases, SUPPORT evidence summaries, HINARI for full text articles of citations identified. Grey literature sources searched include: OpenSIGLE, WHOLIS, Google Scholar, national reports and government documents. We supplemented these searches by checking reference lists of identified studies, communication with authors to find other relevant published or unpublished studies. The publications for inclusion were based on consensus by the authors. There were no specific systematic reviews found on sustainability of KT initiatives. Drafts of each section of the report were discussed with the REACH Uganda KT sustainability Working Group. The external review process of a draft version was managed by the SURE Uganda Office. Comments provided by the external reviewers and the authors’ responses are available from the authors. People who provided comments or contributed to this policy brief in other ways are acknowledged in appendix 4.

Appendix 2. Glossary, acronyms and abbreviations

SURE- Supporting the Use of Research Evidence in African Health Systems (www.evipnet.org/sure)
Appendix 3. Glossary

<p>| Knowledge translation | A dynamic and iterative process that includes synthesis, dissemination, exchange and ethically sound application of knowledge to improve health, provide more effective |</p>
<table>
<thead>
<tr>
<th><strong>Sustainability</strong></th>
<th>Is the ability to maintain programming and its benefits over time at certain rate and level. It involves the existence of structures and processes that allow a program to leverage resources to effectively implement and maintain evidence-based policies and activities. It includes organizational and systems characteristics.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Evidence informed decision making</strong></td>
<td>Incorporating the best available research evidence into public health policy and program decision making.</td>
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<tr>
<td><strong>Evidence informed health policymaking</strong></td>
<td>Evidence informed health policymaking is an approach to policy decisions that aims to ensure that decision making is well-informed by the best available research evidence. It is characterised by the systematic and transparent access to, and appraisal of, evidence as an input into the policymaking process.</td>
</tr>
<tr>
<td><strong>Ethically sound</strong></td>
<td>Ethically sound knowledge translation activities for improved health are those that are consistent with ethical principles and norms, social values as well as legal and other regulatory frameworks - while keeping in mind that principles, values and laws can compete among and between each other at any given point in time.</td>
</tr>
<tr>
<td><strong>Synthesis</strong></td>
<td>The contextualization and integration of research findings of individual research studies within the larger body of knowledge on the topic. A synthesis must be reproducible and transparent in its methods, using quantitative and/or qualitative methods.</td>
</tr>
<tr>
<td><strong>Evidence Briefs for Policy (EBP)</strong></td>
<td>Research syntheses in a user-friendly format, offering evidence informed policy options. The EBP is to convince the target audience of the urgency of the current problem and the need to adopt the preferred alternatives or strategies of intervention.</td>
</tr>
<tr>
<td><strong>Deliberative dialogue</strong></td>
<td>Face-to-face method of public interaction facilitate interactions between researchers, policy-makers and stakeholders exchange and weigh ideas and opinions about a particular issue in which they share an interest.</td>
</tr>
<tr>
<td><strong>Rapid response services</strong></td>
<td>Mechanism for providing concise, user-friendly evidence briefs for policy in a short time period (hours to days) in order to meet the needs of policymakers and practitioners research evidence that is appraised, contextualised and accessible in a short timeframe.</td>
</tr>
</tbody>
</table>

**Appendix 4. Acknowledgement**

People who provided comments or contributed to this policy brief in many ways are acknowledged:
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