



Assessment of Data Use Constraints

An assessment tool to identify barriers and constraints that inhibit evidence-based decision making

Data Demand and Information Use
Part Two: Strategies and Tools

MEASURE Evaluation
www.cpc.unc.edu/measure

Assessment of Data Use Constraints

Smallpox—the highly contagious disease that killed 300 to 500 million people in the 20th century—was finally subdued by aggressive vaccination campaigns. In 1979, the World Health Organization certified the disease beaten—eradicated.

So you can imagine the alarms that went off when a West African government authority reported an incidence of smallpox some 25 years later. This was a serious matter for the country and the world, requiring urgent attention. Could a virulent new strain be surfacing? How many human lives could be affected?

When a department head investigated the reported case, he found that the physician had actually diagnosed chickenpox—a simple disease that most children contract and survive, with no lasting effects other than immunity. The local officer responsible for sending local data to state headquarters did not realize the mistake, nor did he have an expert eye or a computer system that could have spotted the error before it went up the line.

An assessment of the data use constraints identified the shortage of skilled personnel, computers and other resources—and empowered program managers to lobby effectively for those resources, plus more staff training on data quality.

Scenario

Why is this tool important?

Vast amounts of data are sitting in reports that will never be used for decision making. Why?

In health information systems, the ultimate purpose of collecting and analyzing data is to improve programs by enabling more informed decisions—evidence-based decisions.

“Did the awareness campaign increase use of oral contraceptives?” ... “Have our counseling efforts increased acceptance of HIV/AIDS testing?” ... “Have we increased the percentage of pregnant women who receive ante-natal care over the past three years as planned?” ... Questions such as these must be answered with facts, rather than intuition or estimation. Yet in many areas of the world, decision-makers do not have access to the required data... or they do not realize how data can be used to improve decisions... or the information they need does not exist or is not trusted. There are many reasons, or constraints, for these conditions.

Organizational constraints. Organizational processes might not support the use of data. For instance, officials might be reluctant to use data that has not been officially sanctioned. Perhaps the release of certain, sensitive information—such as figures that reveal a measles outbreak—is tightly controlled. This information can be shared only by official protocol. More often, there are simply no channels or systematic processes to share data with people who could use it.

Technical constraints. The endemic shortage of computers is an obvious technical constraint, but there are other common technical issues that erode data quality. For instance, contributors could be defining health indicators differently, or using different sources for the same data element or indicator, or using different algorithms to report it.

What if the World Bank gives one estimate for infant mortality and the ministry of health gives another one? In one case, the ministry of health estimate for contraceptive prevalence was twice as high as the estimate from the Demographic and Health Survey for that country. Other health indicators differed by similar amounts. Decision makers would be rightfully cautious about using these estimates.

Individual constraints. Many information systems suffer from shortages of:

- ❑ Skilled people to manage, interpret and use the data.
- ❑ Guidelines and forms to establish systematic protocols for data collection.
- ❑ Motivation and incentive to generate high-quality data, or to rely on data to make decisions instead of just consulting with supporters and colleagues.

In short, there are many reasons that available data is not being used for anything more than filing reports. Some of those reasons might be insurmountable, but if you know what they are, you can at least account for them. Other barriers and constraints *can* be resolved, and the following rapid assessment tool can help lead the way.

Description

What does this tool do?

Identifies the barriers and constraints to data use, and leads to effective approaches to address them.

The Assessment of Data Use Constraints is a tool for rapid assessments—primarily a guide for interviewing key informants—that serves three key purposes:

- ❑ Identifies existing barriers and constraints to data use.
- ❑ Identifies existing best practices in data use, so these practices can be applied elsewhere.
- ❑ Helps in designing and prioritizing approaches for addressing the barriers and constraints.

The assessment is made by interviewing key informants at various levels, such as national and district-level policymakers and program managers from the public and private sectors. This document includes a sample questionnaire to guide these confidential interviews. The consultant then creates a report that summarizes and synthesizes the findings.

The Assessment of Data Use Constraints can be applied at the national, sub-national (district) or organizational level. When the assessment looks at information processes within a single organization, it can be incorporated into health information and organizational capacity-building assessments at the national and sub-national levels.

Identify the barriers and constraints to data use.

This assessment tool looks at organizational, technical or individual constraints to answer questions about deficiencies in data use: Why are monitoring and evaluation (M&E) systems not producing all the real-world value they could? Why are findings inconsistent among different reporting entities? Where are the disconnects that prevent information sharing among decision makers?

For example, one health information unit, despite having an M&E system for HIV/AIDS, was still not getting the data it had requested from the field and from its service sites. Where was the problem? Why was the data not properly reported?

In another case, a ministry of health discovered that its estimates of infant mortality differed greatly from estimates provided by international donor organizations. When researchers traced estimates to original data sources, and investigated the methods used for calculating those estimates, they were able to determine which figures should be used for reporting and decision making.

Identify existing best practices in data use.

Although the tool is called Assessment of Data Use Constraints, the analysis will also reveal areas where the information flow is working *well*, which could serve as a model for improvements in other initiatives. For example, a U.S. government team shared its data with all implementing partners in a program designed to reduce maternal-to-child transmission of HIV/AIDS. Moreover, they not only shared country-wide summaries; they disaggregated the data in a way that was meaningful to each partner. Each health facility received information specific to its locale, so staff could understand their own performance *and* the broader context.

This information-sharing practice has many positive effects:

- Eliminates duplication of data reporting.
- Ensures that reports used standard definitions.
- Increases confidence in data among implementing partners.
- Increases use of data for planning future programs.
- Helps people appreciate the importance of their role in data processes.

Provide essential knowledge for addressing constraints and barriers.

The assessment generated by this tool should be far more than a list of barriers and constraints. It should be forward-looking and prescriptive, showing ways that these obstacles and deficiencies can be overcome. This goal explains why the tool focuses on organizational, technical and individual constraints. These are areas that can usually be addressed with targeted interventions. Outside of these areas, there is a broader environment of political, economic and social issues that might be inescapable realities.

Once you know the barriers and constraints in an information system, you can plan M&E systems to either change what you can change, or acknowledge (and work around) what you cannot change.

For instance, before embarking on an intensive data collection effort, a researcher might first facilitate discussions to sensitize stakeholders about the importance of surveillance and M&E systems to create awareness and obtain buy-in. If there are constraints in areas that cannot be influenced, such as a shortage of a healthcare commodity or budget in general, the study can be designed to navigate around or account for that inflexible constraint.

Audience

Who should use this tool?

Key people involved in collecting, analyzing, reporting or using health information

The tool has two principal sets of users, each with unique roles in using the tool:

(1) Consultants from MEASURE Evaluation and/or other technical assistance agencies:

- Use the tool to guide the process of interviewing key informants.
- Through the interview process, identify existing uses of data, and constraints and barriers to data use.
- Create a report that presents the findings of the interview process.
- Use the report findings to help design improvement interventions.
- Share this report with program managers who would implement these interventions.
- Incorporate this tool into training programs for host-country M&E staff, to help them think more strategically about data use and constraints.
- Incorporate key questions from this interview process into other formal and informal assessment methodologies.

(2) Host-country program managers and other stakeholders:

- Adapt the questionnaire to best reflect their unique circumstances for using data.
- Through interviews, share their knowledge of barriers and constraints to data use, and how they have worked with these constraints in the past.
- Use findings of the assessment to influence the design of interventions.

Timing

When would this tool be used?

There is never a bad time, but certain circumstances would trigger this activity.

The Assessment of Data Use Constraints can prove useful at any time, but several conditions may trigger a need for an assessment:

A national M&E framework is being designed. An external agency might be developing an M&E framework for HIV/AIDS programs for a region. Knowing the existing barriers and constraints to data use, the M&E design can include plans to resolve the organizational, technical and individual issues that can be changed—and account for the political, economic and cultural conditions that cannot be changed.

Existing information is underutilized. M&E specialists or other data managers might wish to see greater use of data resources they have created. An Assessment of Data Use Constraints can help identify why data are not being used, and what to do about it.

A new data collection activity is being planned. The Assessment of Data Use Constraints ensures that the planned research activity will produce quality, relevant information that will be available and used by decision makers.

Additionally, MEASURE Evaluation representatives might identify a need based on their knowledge of external agency activities or in-country conditions.

Applications

Who has already used this tool?

Representative field applications

Nigeria – September 2005

Assessment for design of MEASURE Evaluation program activities

A host-country consultant from the Centre for Research, Evaluation Resources and Development conducted an assessment to support the design of MEASURE Evaluation program activities in Nigeria. The interview process included key informants at the national, state and local levels from public health agencies and non-governmental organizations (NGOs).

This analysis revealed practical and often culture-specific nuances that might not have been evident from an outsider's perspective. For example, what depth of data expertise would you expect of an individual with a Bachelor's degree? Do the people involved in data collection understand and care about the importance of their work?

The findings influenced the way MEASURE Evaluation prioritized activities. Training had been planned all along, but it now received much higher priority because the assessment showed a notable shortage of data management skills.

South Africa – Fall 2004

Regional HIV/AIDS training programs

MEASURE Evaluation adapted the Assessment of Data Constraints tool to serve as a module in a training program for NGOs involved in regional HIV/AIDS prevention programs. Through formal workshops, participants used this tool to design action plans to improve data use within and among their organizations.

About this document

What is in this tool guide?

Tool description, interview questionnaire, guidelines and process, respondent log and report template

In this document, you will find descriptions of:

- The purpose, audience and typical applications for this tool.
- Guiding principles of the methodology and tips on interview process.
- Guide and questionnaire for interviewing key informants.

- ❑ Template and sample respondent log.
- ❑ Outline for a standard assessment report.
- ❑ Systematic process for conducting the assessment.
- ❑ Checklist to use in implementing the process.

Guiding principles

The Assessment of Data Use Constraints approach

Issues and considerations for using this tool

The tool focuses on organizational, technical and individual constraints.

The practical utility of health information—how often and how effectively it is used—depends on three immediate factors: the attitudes and actions of people who produce or use data, the technical aspects of data processes and tools, and the organizational context that supports (or inhibits) data processes. This tool focuses on these categories because issues in these areas can usually be addressed with targeted interventions.

The interview process should include a range of key informants.

This assessment focuses on decision maker perceptions about constraints and barriers that hinder the ability to make evidence-based decisions. “Decision makers” are defined here as individuals responsible for decisions on policies or operational protocols and guidelines, on project designs and plans, and on resource allocation.

Here are some guidelines for selecting the key informants for a typical assessment of an M&E framework for a national program:

- ❑ A typical assessment process should include interviews with 20 to 25 individuals.
- ❑ Up to two-thirds of these people can be from the national level, but at least one-third should represent the provincial or district level.
- ❑ One-half of informants should be from the public sector, including the ministry of health and related parastatal organizations, including national population councils or national AIDS commissions. The other half should include decision makers from the NGO sector (for example, program managers or executive director from the national family planning NGO, and directors of mission hospitals) and from the private sector (private hospitals, industry executives from companies that provide health services to their workers).
- ❑ The list should include policymakers and program managers in the health sector or a related position in finance or planning.

Although donor representatives also make decisions, this assessment focuses on host-country public- and private-sector decision makers. This is not intended to be a comprehensive survey; the objective is to locate individuals who can contribute informed perspectives about constraints and barriers to data use, and how to address those issues.

Using these criteria, the consultant may choose key informants to interview on an opportunistic basis.

For example, to minimize travel costs, provincial and district representatives may be approached for an interview when they are in the capital city on another assignment.

The Assessment of Data Use Constraints tool is adaptable.

This tool can be used in a stand-alone assessment or as a component of a larger assessment—or parts of it can be extracted to serve specific purposes. In addition, the questionnaire itself is adaptable. In fact, you should customize the questionnaire to the environment and scope of the assessment. For example, an assessment of a national survey program would focus on barriers and constraints to using a particular set of national survey data. An assessment of one organization would include different questions than an assessment of a regional or national M&E framework.

Adapt the questionnaire at the outset, then conduct two or three pilot interviews, and fine-tune the questionnaire again based on those initial experiences.

Standardize the interview process within an assessment.

The questionnaire will be customized to suit different assessments, but within one assessment, you should use a consistent questionnaire and standard process for guiding the interviews. Consistency of process will deliver more useful results and enable fair comparisons of perspectives among informants.

The interview process demands confidentiality and consent.

The process expects a core group of people to be very open with their opinions and perceptions about potentially sensitive topics, such as deficiencies in their organization, problems with existing processes, or concerns about government policies.

The interviewer can only earn the candor of informants by securing their consent and guaranteeing anonymity. Be sure informants know that their responses will be modified to eliminate any identifying information, their titles will be made generic, such as “public health official,” and reporting on constraints will not identify particular individuals or agencies.

Encourage respondents to think proactively about possible resolutions.

The interview process should not focus solely on identifying constraints, but should also encourage respondents to think positively about approaches for addressing those constraints. It is very easy for respondents to list things that are wrong with the system, but as a facilitator, you will have to help them think about resources within their organizations that can be organized or leveraged for improvements.

Not all constraints can be resolved, but they can be addressed.

If a constraint is an individual one—for example, data collectors do not know to use correct methods—the issue can be resolved with training. Technical constraints can be resolved with additional computing resources or data management protocols. Organizational constraints can often be resolved with changes in policy.

However, in the greater context, there are other constraints that probably cannot be easily resolved, but at least they can be addressed:

Economic constraints. “We wish we could gather survey data at the district level, but it would be prohibitively expensive to do so.” “Data analysis would show that more people should receive anti-retroviral therapy, but funding is limited.”

Political constraints. “Knowledge is power, so some departments are hoarding it.” “Our division head doesn’t want authorities to know the severity of this health issue in our district, for fear of disrupting the tourist industry.”

Socio-cultural constraints. “Salary decisions used to be based on detailed economic surveys, but now it’s just a political debate between the workers’ union, the courts and the agency.” “The head of that program is under pressure from a multinational corporation to support its agenda.”

In one assessment, a public health officer said, “There is so much influence from political figures to the point of manipulating health officers to cheat on data so as to get more government resources.” A district statistical coordinator in the same assessment said, “To a large extent [these factors] result in having most decisions not based on empirical data but focused on the narrow social, political, and economic interests.”

These types of constraints will not be resolved by the kinds of interventions that are within the scope of this tool. However, acknowledging that these circumstances exist can be very helpful for designing programs that work with or navigate around these constraints.

Key Informant Interview Questionnaire

Assessment of Data Use Constraints

Decision maker perceptions

Interview logistics		
Date:		
Time Start/End	Start:	End:
Interviewer Name:		
Title of Respondent:		
Number of Years in this Position:		
Specialization: <i>(circle all that apply)</i>	A.	Population, Health and Nutrition
	B.	Child Survival
	C.	HIV/AIDS
Level:	National	District
Responsibilities: <i>(circle all that apply)</i>	Policy	Program
Sector <i>(circle one)</i>	Private	Public

About this interview—and why your participation is so important
<p>In health information systems, the ultimate purpose of collecting and analyzing data is to improve programs by enabling more informed decisions based on facts. However, information is not always available to make decisions—or if it is available, it is not always used. This study is designed to find out what barriers and constraints are causing these conditions, and how to resolve them.</p> <p>Your participation is requested to provide your insights about constraints and barriers to data use. Your participation is very important to this research, but it is entirely voluntary. Your responses will be treated as confidential, and we will ensure that any statements or comments you make cannot be linked either to you as an individual or to your organization. We will be producing a report that is intended mainly to help MEASURE Evaluation staff and our collaborating organizations design effective monitoring and evaluation activities.</p> <p>Are you willing to participate? YES <input type="checkbox"/> NO <input type="checkbox"/> (stop interview)</p>

Introductory questions	
RA1	What was the last major decision related to policies or programs that you made?
RA2	What information did you use to make this decision?
RA3	How did you use information to make this decision?
RA4	Was there any information you needed but did not have in order to make this decision?
RA5	Who are the primary stakeholders in the use of information?
RA6	Whose interests are most served by health information systems?
RA7	How do health information systems meet your needs for information?

Technical constraints	
Technical constraints are related to the ability to generate high-quality data and analyses.	
RA8	Have you ever had an experience while making a policy- or program-related decision when you were concerned about the quality of the information being used?
RA9	Are there multiple sources of information or statistics for issues of importance to you, and have you experienced any problems caused by having different estimates?
RA10	I am interested in knowing about technical capacity for collecting and using information. Does your agency have the technical capacity to produce reliable information without a lot of external technical assistance?
RA11	Does your agency have the technical capacity to ensure access to and availability of reliable data?
RA12	Has there been an occasion when data quality or local technical capacity made it difficult for you to use information in making a decision?
RA13	How would you have gone about preventing this situation?

Individual constraints	
Individual constraints are related to the capacity of staff to collect, analyze and interpret the data.	
RA14	<p>What specific challenges have you experienced among your staff when it comes to using data?</p> <p>Probe respondent for the following items following their response: awareness of data sources, technical skill, motivation, time and workload, lack of incentives or knowledge of the benefit to using data for policy change and program management.</p>

Organizational constraints	
I am interested in finding out about challenges in using information that are due to how your organization functions.	
RA15	How does your organization support having the necessary information to make decisions?
RA16	How does your organization support the prioritization and use of information in decision making?
RA17	How does your organization support training of staff in skills for using information in decision making?
RA18	Can you describe the mechanism or process within your organization/agency for approving research or survey data for dissemination?
RA19	How does this process affect your ability to use information to make decisions?
RA20	What are the challenges your organization/agency experiences in sharing survey and research data?
RA21	What are the challenges you experience in sharing research and survey data across organizations and agencies?
RA22	<p>Are there risks associated with sharing information? If so what are they?</p> <p>Record the response and the respondent's openness or reluctance to answering this question</p>

Closing thoughts		
RA23	How does the political, social and economic environment affect your use of information in decision making?	<i>Probe respondent for various influences including the following:</i> <ul style="list-style-type: none">- international priorities- NGO funding and donors
RA24	To what extent do these factors outweigh the importance of data itself in making decisions?	
RA25	Have you experienced any other challenges in using information to make decisions?	

Sample of a completed interview transcript

Assessment of Data Use Constraints

Decision maker perceptions

Interview logistics			
Date:	August 30, 2005		
Time Start/End	Start: 11:36am	End: 12:22pm	
Interviewer Name:	A. A.		
Title of Respondent:	Director, Public Health Department		
Number of Years in this Position:	5 years		
Specialization: (circle all that apply)	A.	Population, Health and Nutrition	
	B.	Child Survival	
	C.	HIV/AIDS	
Level:	National	State	Local
Responsibilities: (circle all that apply)	Policy	Program	
Sector (circle one)	Private	Public	

About this interview—and why your participation is so important

In health information systems, the ultimate purpose of collecting and analyzing data is to improve programs by enabling more informed decisions based on facts. However, information is not always available to make decisions—or if it is available, it is not always used. This study is designed to find out what barriers and constraints are causing these conditions, and how to resolve them.

Your participation is requested, to provide your insights about constraints and barriers to data use. Your participation is very important to this research, but it is entirely voluntary. Your responses will be treated as confidential, and we will ensure that any statements or comments you make cannot be linked either to you as an individual or to your organization. We will be producing a report that is intended mainly to help MEASURE Evaluation staff and our collaborating organizations design effective monitoring and evaluation activities.

Are you willing to participate? YES NO (stop interview)

Introductory questions

RA1	What was the last major decision related to policies or programs that you made? The last was the immunization program.
RA2	What information did you use to make this decision? We used data supplied by the LGAs to determine (1) the number of eligible children in the state, (2) the quantity of vaccine that is needed for the immunization. We generated data from the field. M&E officers at the local governments visited health facilities to collect data which was sent to us and we tried to analyse it.
RA3	How did you use information to make this decision?

RA4	<p>Was there any information you needed but did not have in order to make this decision?</p> <p>The reports that came were actually sufficient to make the decision.</p>
RA5	<p>Who are the primary stakeholders in the use of information?</p> <p>The primary stakeholders are the people in the community who are affected by the decisions that we take. Others include the policymakers and our partners like WHO and UNICEF.</p>
RA6	<p>Whose interests are most served by health information systems?</p> <p>The community.</p>
RA7	<p>How do health information systems meet your needs for information?</p> <p>In the last 2-3 yrs, the Health and Human Services Secretariat (the equivalent of a state ministry of health) had tried to strengthen the health information system. We have been able to acquire computers, train people on the use of forms used in collecting data. There were initial complaints about the NHMIS form, that it is too voluminous with too many sections on immunisation, family planning, malaria treatment, etc. and that for one person to complete this is too much.</p> <p>We have to train these workers on how to complete this form, as it is our main source of data. Most of the health workers at the local facilities have no serious educational training, so it is a problem for them to correctly use the NHMIS forms without the training. After we have embarked on capacity building in this regard, our needs for data is being met through this method.</p>

Technical constraints	
RA8	<p>Have you ever had an experience while making a policy or programme related decision when you were concerned about the quality of the information used?</p> <p>Yes, those NHMIS forms were designed without input from the grassroots. Interpreting the forms correctly have been problematic for health workers who are mostly primary school or secondary school leavers. Therefore, the data that they are generating is sometimes doubtful, and that is why we embarked on training them.</p>
RA9	<p>Are there multiple sources of information or statistics for issues of importance to you, and have you experienced any problems caused by having different estimates?</p> <p>Yes, we have different sources from various LGAs, but there have not been problems caused by having different estimates.</p>
RA10	<p>I am interested in knowing about technical capacity for collecting and using information. Does your agency have the technical capacity to produce reliable information without a lot of external technical assistance?</p> <p>Not much technical capacity within the organisation itself really, but we have been receiving much assistance from agencies like WHO, UNICEF, and other consultants.</p>
RA11	<p>Does your agency have the technical capacity to ensure access to and availability of reliable data?</p>
RA12	<p>Has there been an occasion when data quality or local technical capacity made it difficult for you to use information in making a decision?</p> <p>Yes, we have such cases. There was an occasion when a report was sent from an LGA and I saw an incidence of smallpox. A serious matter like that requires urgent attention because the disease was thought to have been eradicated. I summoned the HOD in charge of health in the LGA (who is a medical doctor) to go and confirm the reported case. By the time he returned to brief me, he found that the doctor actually diagnosed chickenpox, but the local officer responsible for sending data to the state headquarters recorded smallpox. Such a case can make you think twice in using data collected by certain category of staff and that again bothered me on the quality of staff collecting/ recording various statistics in the health facilities. I have to warn that if anybody do not understand the handwriting of the health official who made certain diagnosis, clarification should be sought from the officer rather than assume and record just anything. That every information they forward is being scrutinised and not just dumped on the shelf. We asked them to do the job for specific reasons, but they seem not to understand how important the job they are doing is.</p>

RA13	<p>How would you have gone about preventing this situation?</p> <p>Preventing this situation requires training the staff adequately. If you do not understand what the health officer had diagnosed, it is important for you to confirm rather than just record anything. It seems they do not know the importance or value attached to every piece of information they send in.</p>
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Individual constraints

Individual constraints are related to the capacity of staff to collect, analyse and interpret the data.

RA14	<p>What specific challenges have you experienced among your staff when it comes to using data?</p> <p>I was talking about the technical ability of the DSNOs (Disease Surveillance and Notification Officers). He should be a person who can investigate disease outbreak. The main challenge has been the technical qualification of those collecting and sending data to us. A problem we are still grappling with is educating the workers on the reason why they are collecting the data. They should not be collecting the data without first knowing the reason or how vital the job is. I think I once discussed that our M&E officers has to be trained on data management. Many of our M&E officers cannot even use computers. People need to know why we are collecting data and why we must have correct data.</p>
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Organisational constraints

Challenges in using information that are due to how the organization functions

RA15	<p>How does your organization support having the necessary information to make decisions?</p> <p>The Public Health department is replicated in the LGAs, called the PHC departments. These units are headed by medical doctors. The Secretary of Health and Human Services always request that any recommendation that we forward should be backed by data. This is the only way to ensure that decisions on outbreaks of diseases or other health issues are based on facts.</p>
RA16	<p>How does your organization support the prioritization and use of information in decision making?</p>
RA17	<p>How does your organization support training of staff in skills for using information in decision making?</p> <p>Yearly, our budget includes funds for training and health capacity building. We regularly train our staff internally and sometimes overseas. About 2 or 3 of our staff were sent overseas for training and they have returned here to continue to work for us. We also employ staff for the area councils that are short of manpower in key areas.</p>
RA18	<p>Can you describe the mechanism or process within your organization/agency for approving research or survey data for dissemination?</p> <p>Dissemination of research data is very important, because if you collect data or do research without disseminating the result, you have done nothing. What we do is to send data for all necessary agencies and the FMH, e.g., immunisation data is sent to both the FMH and the NPI. We also share information with UNICEF and WHO—both have been very strong partners working with us. There are no strict bureaucratic procedures for approving survey data, for dissemination. Apart from forwarding such data to the FMH, I also have the liberty to take immediate steps in ensuring that the data get to all necessary end users, especially if immediate action on certain issues needed to be taken for instance to curtail/prevent an outbreak of disease.</p>
RA19	<p>How does this process affect your ability to use information to make decisions?</p>
RA20	<p>What are the challenges your organization/agency experience in sharing survey and research data?</p> <p>There are really no serious challenges except where very sensitive issues are involved. In such cases, you may need the approval of the appropriate ethical committee to be able to release certain information for public consumption and sometimes you need to obtain clearance from your supervisors. But largely, there are no serious challenges.</p>

RA21	What are the challenges you experience in sharing research and survey data across organizations and agencies?
RA22	Are there risks associated with sharing information? If so, what are they? (Paused) I would not say there are no risks. But I think the most important thing is to ensure that information that you share is not likely to cause undesirable effects, I have to be very sure of my facts and be certain before I can release any information.

Closing thoughts

RA23	How does the political, social and economic environment affect your use of information in decision making? Have not encountered problem politically or socially. I remember however that there was a time when river blindness was a serious illness in the country because people were afraid of moving to certain parts of the country for fear of the disease. Although consultants from the University were already making progress on addressing the issue then, it was seriously politicised and hence, we cannot just go on air to release any information that we have about the disease. We have to carefully manage things. Apart from that, there is no serious issue that cannot be discussed.
RA24	To what extent do these factors outweigh the importance of data itself in making decisions?
RA25	Have you experienced any other challenges in using information to make decisions?

Respondents Log

Assessment of Data Use Constraints

Decision maker perceptions

Assessment: _____

Country: _____

Consultant: _____

Complete this form by inserting the information requested in each column. Insert a new row if you interview more than 20 individuals. For assistance or clarification, contact MEASURE Evaluation at measure@unc.edu.

	Title of respondent	Level of government	Type of position (program or policy)	Specialization (PHN, HIV/AIDS, CH/N/M)	Consent Given
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Sample of a completed respondents log

Assessment of Data Use Constraints

Decision maker perceptions

Assessment: [Title of Assessment Activity]

Country:

Consultant: A.A

Complete this form by inserting the information requested in each column. Insert a new row if you interviewed more than 25 individuals. This form must be typed and should be returned with the data analysis matrix as well as annexed in the final report.

For assistance or clarification, contact MEASURE Evaluation at measure@unc.edu.

	Title of respondent	Level of government	Type of position (program or policy)	Specialization (PHN, HIV/AIDS, CH/N/M)	Consent Given
1.	Director, Gender and Social Policy Studies	(NGO)	Policy/programme	PHN	Yes
2.	Programme Officer	(NGO)	Programme	PHN, HIV/AIDS	Yes
3.	Programme Officer, M&E	(NGO)	Programme	PHN, HIV/AIDS	Yes
4.	Director, Public Health	Local	Programme	PHN, HIV/AIDS, CH/N/M	Yes
5.	Principal Records Officer, M&E	Local	Programme	PHN, CH/N/M	Yes
6.	Programme Coordinator, Immunisation	Local	Programme	PHN, HIV/AIDS, CH/N/M	Yes
7.	Programme Manager	Local	Programme	HIV/AIDS	Yes
8.	Programme Manager, IMCI	Local	Programme	CH/N/M	Yes
9.	Supervisory Counsellor, Health	Local	Policy/Programme	PHN, HIV/AIDS, CH/N/M	Yes
10.	Director, Development and Population Activities	National	Policy	PHN	Yes
11.	Director, M&E	National	Programme	HIV/AIDS	Yes
12.	Director, Policy	National	Policy	HIV/AIDS	Yes
13.	Programme Officer, Nutrition	National	Programme	PHN, CH/N/M	Yes
14.	Programme officer, M&E	National	Programme	HIV/AIDS	Yes
15.	Chief Environmental Health Officer	State	Policy/program	PHN, CH/N/M	Yes

Report outline

Template for Assessment of Data Use Constraints final report

Contact MEASURE Evaluation for a Microsoft Word template of this report format.

Cover page: Report title, date and author

A Rapid Assessment of Data Use Constraints

Decision-maker Perceptions among Key Informants in [Country]

[Date] - [Author]

Report content:

Abbreviations and acronyms used in the report

Table of contents

Executive summary

Background and objectives

Purpose of the study

Methodology

- Study design
- Sampling
- Data collection methods
- Data analysis methods
- Limitations and methodological difficulties

Findings - *Presentation of findings. Include quotes to support the findings.*

1. Decision-making by respondents
 - Types of decisions (use examples to illustrate types of decisions)
 - Constraints experienced by respondents (e.g. timeliness, format)
 - Missed opportunities for using data to make decisions
 - How data is currently meeting needs of respondents
 - Examples of using data to make decisions
 - Data and donors
2. Technical constraints
 - Technical capacity
 - Quality of data
 - Barriers: specific barriers...RHIS, survey data, research results
 - Proposed methods to overcome these barriers
3. Individual constraints
 - Staff and use of data
 - Staff and communicating data
 - Suggestions for overcoming lack of staff use of data
4. Organizational constraints
 - Leadership, structure, culture, roles/responsibilities, resources
 - Environment, international priorities, economic, political, social
5. Other areas/findings that do not fit the above categories

Discussion

1. Interpretation of the findings
2. Importance of the results to others thinking about the problem

Conclusions and recommendations

1. Implications of findings
2. Next steps

Process Action Plan**For conducting and reporting an Assessment of Data Use Constraints***Five steps***Step 1. Perform pre-assessment planning.**

This step relies on communication with MEASURE Evaluation representatives (or other external consultants) in-country.

- 1.1 **Identify a potential need or opportunity.** Communicate with host-country counterparts to identify opportunities where an Assessment of Data Use Constraints can be beneficial. Sometimes the opportunity becomes clear when a consultant is asked to develop an M&E framework, implement a new data collection process, or discover why existing datasets are not being utilized.

An assessment can also identify practical applications of new datasets as they become available. The opportunity is often brought to light by MEASURE Evaluation colleagues and host-country counterparts. They can help determine an appropriate time to engage in this activity and help make introductions with in-country informants and stakeholders.

- 1.2 **Determine the scope of the assessment.** Will you be looking at data use constraints within an organization, or at the national or sub-national level? What types of informants would be appropriate to include?
- 1.3 **Coordinate with key development partners,** including your U.S.-based and in-country colleagues, to define a preliminary plan for selecting and interviewing key informants, as well as an achievable timeline for performing the assessment.
- 1.4 **Write an internal summary of the planned activity.** This document could be as simple as an email or one- or two-page proposal, which could describe:

- The need identified in Step 1.1.
- How you will provide technical support to address that need.
- How this activity fits into your organization's priorities and workload.
- The preliminary list of informants and how they will be engaged.
- A high-level outline of process steps and timeline for project milestones.

Review this plan with the contributors from Step 1.3, and incorporate their feedback.

- 1.5 Get the necessary approvals from the sponsoring organization(s), according to your organization's protocol, to proceed with the assessment.

Step 2. Engage a senior national consultant to perform the assessment.

The assessment could be performed by a MEASURE Evaluation representative or other U.S.-based consultant, but the process tends to be more effective and produce more robust results when conducted by a host-country national—particularly one with the seniority to be respected by high-ranking key informants. Compared to a U.S.-based consultant, a host-country consultant is more likely to:

- Have more intimate knowledge of the cultural and political environment.
- Know the informants and have better access to them for interviews.
- Gain the confidence and candor of key informants, to solicit more meaningful responses.
- Conduct the process cost-effectively, since it may be impossible to schedule all the interviews within the short period of an external consultant's visit.

Step 3. Meet with project stakeholders and development partners.

The usefulness of the assessment depends partly on ensuring that the people who are designing M&E programs and other data-management activities have some sense of ownership in the process and confidence in its findings. That means good relationships and buy-in are essential and should be cultivated from the start.

Convene a core group of three to six stakeholders who have technical expertise and knowledge of the policy environment. This group might include a director of M&E for a national program, program managers from national country government projects, and representation from implementing partners in development organizations.

In this meeting, the group will:

- **Define a preliminary list of 20 to 25 key informants.** Determine the types of people who should be interviewed, and organizations or roles they should represent. List any specific individuals who should be included.
- **Adapt the questionnaire as necessary** to suit the dataset, institution, or information processes being assessed. You will later test this questionnaire with two or three pilot interviews and fine-tune it if necessary.

Step 4. Conduct and document the interviews.

- 4.1 **Set up appointments to interview the key informants** identified in the previous step. Plan on 45 minutes to an hour for each interview. These interviews can take place on an opportunistic basis. For instance, if you need to interview a mix of national, district and regional-level representatives, it can be convenient to meet with them when they travel to the capital for a training program, regular meeting or national conference.

4.2 Conduct the interviews, following the questionnaire that was adapted in Step 3.

The interview should take place in a secure environment—a location where the interview will not be disturbed or overheard by outsiders.

Secure the participant's consent. The cover sheet of the questionnaire includes a checkbox for the participant to note consent. Read the introduction to the respondent, which explains the purpose and methodology of the assessment, and have the participant indicate his/her consent (the checkbox is sufficient; a signature is not necessary).

Follow best practices for interviewing. For example:

- ❑ Begin with question #1 in the questionnaire, but the rest of the interview does not have to rigidly follow the order of questions. You may find the conversation naturally drifting to questions out of order, and this is perfectly acceptable.
- ❑ Encourage open discussion, and allow the respondent to talk freely without interruption until you see a good opportunity to move on to the next question. You can leave a copy of the questionnaire behind with the respondent.

Wherever possible, it is better to delve into the specific reasons there was a constraint, and provide specific examples of cases where data was not used to make a decision, and why not.

- ❑ If the respondent doesn't address sub-questions in the natural flow of discussion, solicit this information by using non-leading prompts, such as: "How do you mean?" ... "In what way?" ... "What other methods/ways do you know of?" ... "There is no hurry. Take a moment to think about it, and tell me all that comes to mind." These prompts above solicit more detail without influencing the response.

In contrast, these are examples of leading probes not to use: "Do you mean –?" ... "You do not mean that –?" ... "Are you saying that –?" ... "Is that the only thing you can think of?" Leading prompts will skew the responses to reflect the interviewer's perceptions and bias.

It is not necessary for each informant to answer every sub-question. The focus should be on recording their good ideas and examples of constraints and barriers. The follow-up questions are only needed when leading to more specific examples.

Record the respondent's answers. The interviewer can audiotape the interview if desired, but this is not required, and can even inhibit open discussion. In most cases, the interviewer references the questionnaire and takes careful and detailed notes on a separate piece of paper. A verbatim transcript is not necessary, since the goal is to capture key insights.

4.3 Type out the notes from the interview. After the interview—preferably within two to four hours—type out the notes from the interview, sorting the notes to fit into the questionnaire format. If there were useful parts of the interview that fell outside the scope of the questionnaire format, include these notes at the bottom of the page.

Step 5. Analyze and report the findings.

When you have conducted and documented all the interviews, prepare a report (approximately 10 pages) that summarizes the findings and recommendations.

This report should follow the outline provided earlier in this document, incorporating your interpretations and conclusions. If you prefer to create the report by computer—which is recommended and preferred—you can download a Microsoft Word template of the report format from the MEASURE Evaluation Web site, <http://www.cpc.unc.edu/measure>.

The complete report package will include the following elements:

- A typed list of respondents, following the template provided in this document.
- Cover sheets from the questionnaire for each interview, showing that consent was given.
- Typed notes from each interview, in the questionnaire format.
- The final report summarizing findings, in the suggested outline/template.

The report should include a concise executive summary that can be shared with senior decision makers. Below is a sample executive summary from a 2005 assessment:

Executive Summary

The study is a rapid assessment of the perceptions of decision makers on the use of data and obstacles to data use. Respondents were drawn from the health sector and included 20 federal, state and local officials who were involved in decision making or programme management in three main areas, namely, (i) population, health and nutrition (ii) child survival, and (iii) HIV/AIDS at either the national, state or local level.

The study found that many decision makers had no clear understanding of how policies were formulated. It was also found that the organizational structures that were in place in these agencies were a constraint on efficient data management processes as it made the lower levels in the administrative hierarchy (local and state agencies) almost entirely dependent on the officers at the national level for analysis and interpretation of the information that they collected.

Most of the lower level staff were poorly trained and unable to even interpret data. The training, where provided, was often ad hoc and could not be sustained. Moreover, those who were trained do not always have the environment to put into use whatever training they might have been given due to lack of necessary facilities in their offices. The lack of technical capacity to generate and use data is thought to be an important constraint on the availability of current national data in the country and an obvious impediment to efficient policymaking. The study also highlighted poor funding and socio-cultural/political interference as factors hindering data generation, policy formulation and programme implementation.

The study recommended a serious re-orientation of both the decision makers and the entire staff of these agencies. The study also recommended training the decision makers at both state and national levels on skills necessary to use information for decision making, and on the significance of good data management to efficient policymaking and programme management. Finally, the government is urged to accelerate the development of the country's National Health Management Information System (NHMIS) into a credible and readily accessible databank as a way of avoiding duplication of data generation by various agencies thereby reducing cost and time spent on acquiring data for policy formulation.

In preparing the report, be sure to fully respect the confidentiality of the key informants. It is important that statements and comments and examples not be linked, even indirectly, to specific individuals or small groups.

Step 6. Share the findings with stakeholders.

Convene the core group of stakeholders who helped design the assessment activity, and share the findings with them. In this meeting, the group will:

- Define a strategy for disseminating the findings** to a broader audience. For example, you might know of a group that is initiating a new research activity; this group could receive the assessment to help improve the design of their activity or use of the data they collect.
- Develop a list of recommendations and actions** for resolving barriers and constraints. This information will have immediate applicability, but it will also contribute to a broader national and international understanding of how to improve data use.

Checklist

For performing an Assessment of Data Use Constraints

Summary of the Process Action Plan.

Photocopy this checklist to use as a reference for the process steps. This checklist ensures that a systematic approach and best practices have been followed.

- Step 1. Perform pre-assessment planning.**
 - 1.1 Identify a potential need or opportunity.
 - 1.2 Determine the scope of the assessment.
 - 1.3 Coordinate with key development partners to define approach.
 - 1.4 Write up an internal summary of the planned activity.
 - 1.5 Get the necessary approvals from the sponsoring organization(s).
- Step 2. Engage a senior national consultant to perform the assessment.**
- Step 3. Meet with project stakeholders and development partners.**
 - Define a preliminary list of 20 to 25 key informants.
 - Adapt the questionnaire as necessary.
- Step 4. Conduct and document the interviews.**
 - 4.1 Set up one-hour appointments to interview key informants.
 - 4.2 Conduct the interviews, following the adapted questionnaire.
 - Get the participant's consent.*
 - Follow best practices for interviewing.*
 - Record the responses.*

- 4.3 Type out the notes as soon as possible after the interview.
- Step 5. Analyze and report the findings.**
 - Typed list of respondents (in the Respondents Log template).
 - Cover sheets from interview questionnaires, showing consent.
 - Typed notes from each interview, in the questionnaire format.
 - Final report with executive summary, in the suggested outline/template.
- Step 6. Share the findings with stakeholders.**
 - Define a strategy for disseminating the findings to a broader audience.
 - Define and prioritize approaches for addressing barriers and constraints.

Conclusion

Promoting better data use to benefit more programs and people

Identify and resolve the barriers and constraints to using data to improve programs with evidence-based decisions.

In complex decision-making environments, influenced by multiple internal and external pressures, it can be extremely difficult to follow best practices for data collection and use.

Often, valuable data resources remain unused, when they could yield better decisions that improve the effectiveness of programs and organizations, and in turn benefit the lives and health of more people.

What are the barriers and constraints? There are many reasons that available data might be used for little more than filling reports.

Sometimes the constraint is *organizational*; the processes and culture do not support data use. Often, the issue is *technical*; data quality is suspect, so people do not have confidence using that data to make decisions. Very often, the constraint is *individual*, a shortage of skills or incentive to create high-quality data and analysis—prerequisites for data to be useful.

In the broader perspective, there will always be political, economic and socio-cultural constraints at play. Data might be available to support evidence-based decisions, but political influence, financial realities and cultural bias intervene. Such constraints might be fixed realities, but if they are identified and acknowledged, they can at least be accounted for when planning information systems.

On the other hand, organizational, technical and individual constraints generally *can* be resolved—through policies, procedures, awareness, skills-building and other interventions. This is where the Assessment of Data Use Constraints tool proves its value. It provides a systematic methodology for identifying—and resolving—the barriers and constraints that would inhibit data use.

Acknowledgments

The Assessment of Data Use Constraints tool was created by Alan Johnston and Shannon Salentine, specialists on the Data Demand and Information Use (DDIU) team of MEASURE Evaluation, with assistance from Charles Teller at USAID, Roger Schimberg at Tulane University, and Scott Moreland and Karen Foreit at Constella Futures.