



**USAID** | **GHANA**  
FROM THE AMERICAN PEOPLE

# Setting Baseline Values and Targets for Project Performance Indicators

## USAID Recommendations

Office of EG IP M&E Working Group Meeting  
GILLBT Training Center, Tamale  
June 15, 2015



**USAID**  
FROM THE AMERICAN PEOPLE

## Objectives of Session

- ❖ Familiarize participants with the principles of establishing baselines and setting targets for performance indicators
- ❖ Review the integration of baseline and target setting in the USAID Program Cycle
- ❖ Provide examples of how to apply target setting approaches



**USAID**  
FROM THE AMERICAN PEOPLE

## Content of Presentation

- ❖ Part I: Establishing Baselines
- ❖ Part II: Setting Targets
- ❖ Part III: Reviewing IPs Targets for FY2015 and Out-Years



**USAID**  
FROM THE AMERICAN PEOPLE

## Why Baselines and Targets?

**Establishing quality baselines and setting ambitious, yet achievable, targets is necessary for the successful management of development assistance programs.**



**USAID**  
FROM THE AMERICAN PEOPLE

## **ADS 203.3.9 Setting Baselines and Targets**

**Every performance indicator, whether measuring a part of the CDCS Results Framework or PROJECT LOGFRAME, MUST have a baseline value at the beginning of the strategy or project and set performance targets that are ambitious, but can realistically be achieved within the stated timeframe and with available resources.**



**USAID**  
FROM THE AMERICAN PEOPLE

## What is a baseline?

- ❖ A baseline is the value of a performance indicator before the implementation of USAID-supported strategies, projects or activities.
- ❖ Conducted prior to delivery of a project output, and whether that project/activity is:
  - USAID's initial assistance in that area; or
  - A follow-on.
- ❖ This is required in order to learn from and be accountable for the change that occurred during the project/activity with the resources allocated to that project/activity



**USAID**  
FROM THE AMERICAN PEOPLE

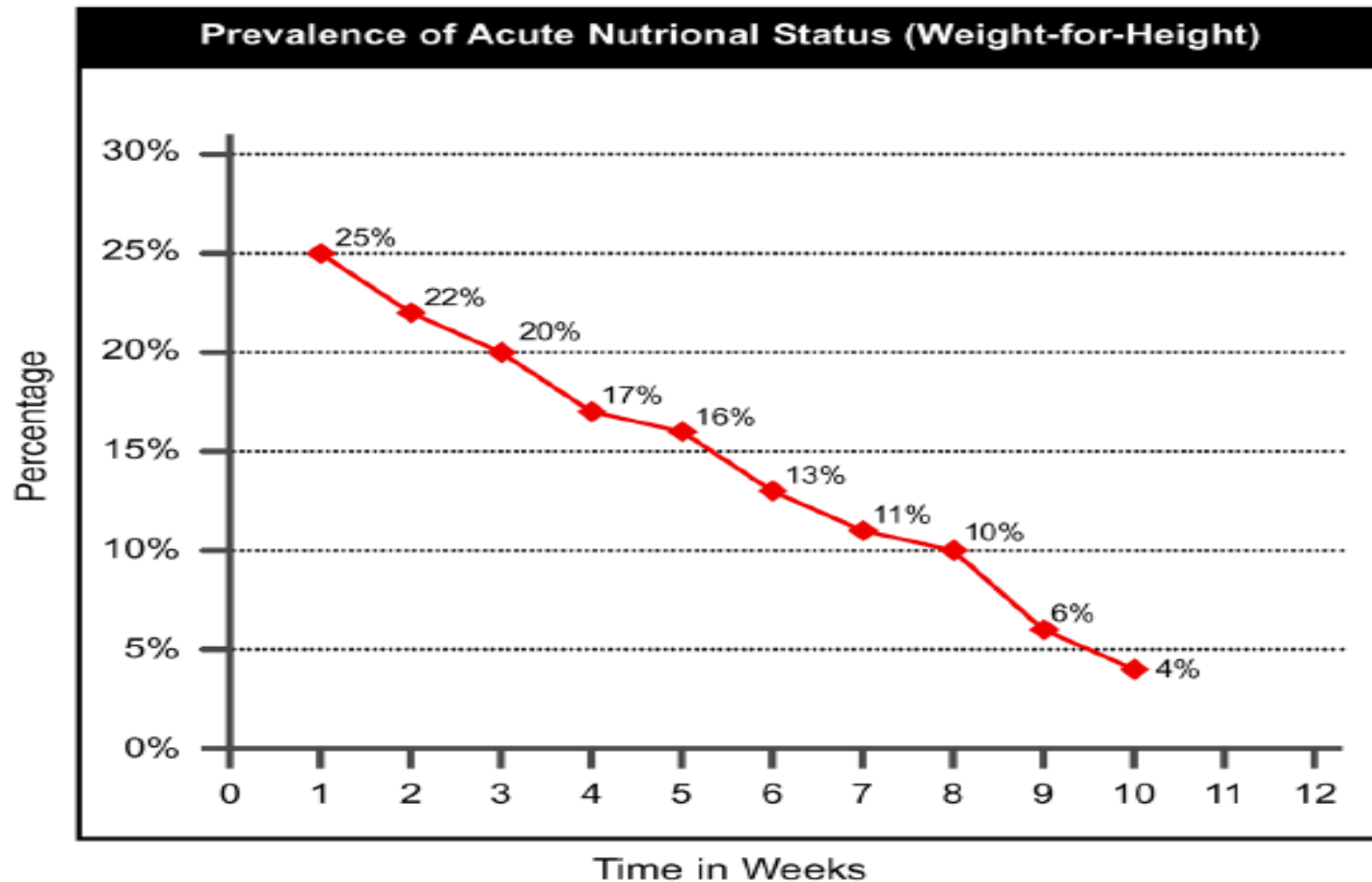
## Rationale for Baselines

- ❖ Baselines help managers **determine progress** in achieving results.
- ❖ Help identify the **extent to which change has happened** at each level of result.
- ❖ Baseline data is needed for both performance **monitoring and evaluation** purposes



**USAID**  
FROM THE AMERICAN PEOPLE

## How Baseline is used to measure change over time



Source: World Food Program. "How to Plan a Baseline Study." *Monitoring and Evaluation Guidelines*. UN WFP, Office of Evaluation.





**USAID**  
FROM THE AMERICAN PEOPLE

## Question: What baseline information is required to measure these outcomes?

- ❖ Improve the skills and knowledge of community-based health workers
- ❖ Reduce the tax burden on Ag focused SMEs
- ❖ Reduce the amount of time it takes to start a new business



**USAID**  
FROM THE AMERICAN PEOPLE

## Who is responsible for collecting baseline data?

- ❖ USAID staff (AORs/CORs) are responsible for ensuring that baseline data is collected
- ❖ However, baseline data can come from numerous sources:
  - **Primary data** contracted by USAID or its projects (surveys, assessments)
  - **Secondary data** sources (e.g. World Bank, United Nations, host Government Ministries and Agencies)
  - **Implementing Partners** as part of their award



**USAID**  
FROM THE AMERICAN PEOPLE

## Level of the CDCS RF and Project LogFrame and data source

Level of CDCS Results Framework	Level of the Project LogFrame (typical)	Likely Baseline Data Sources
<b>Goal</b>	-	<ul style="list-style-type: none"><li>• Secondary Data</li></ul>
<b>DO</b>	Project Goal	<ul style="list-style-type: none"><li>• Primary Data</li><li>• Secondary Data</li></ul>
<b>IR</b>	Project Purpose	<ul style="list-style-type: none"><li>• Primary Data</li><li>• Secondary Data</li><li>• IPs</li></ul>
<b>Sub-IR</b>	Project Sub-Purpose	<ul style="list-style-type: none"><li>• Primary Data</li><li>• Secondary Data</li><li>• IPs</li></ul>



**USAID**  
FROM THE AMERICAN PEOPLE

## Timing of Baseline Data Collection

Level of CDCS Results Framework	Level of the Project LogFrame (typical)	When is the baseline required?
Goal	-	• Prior to <u>PMP approval</u>
DO	Project Goal	• Prior to <u>PMP approval</u>
IR	Project Purpose	• Prior to <u>Proposal approval</u>
Sub-IR	Project Sub-Purpose	• Prior to <u>activity implementation</u>



**USAID**  
FROM THE AMERICAN PEOPLE

## Where do you document the baseline?

- ❖ Update the **PMP/M&E Plan** with baseline value and timeframe
- ❖ Also document baseline timeframe in the **Performance Indicator Reference Sheet**
  - This is maintained in the **FTFMS** ,and very soon, **AIDtracker Plus**

USAID Performance Indicator Reference Sheet	
Name of Result Measured (Goal, DO, IR, sub-IR, Project Purpose, Project Output, etc.):	
Name of Indicator:	
Is this a Performance Plan and Report indicator? No <input type="checkbox"/> Yes <input type="checkbox"/> for Reporting Year(s) _____	
If yes, link to foreign assistance framework:	
DESCRIPTION	
Precise Definition(s):	
Unit of Measure:	
Disaggregated by:	
Rationale or Justification for indicator (optional):	
PLAN FOR DATA COLLECTION BY USAID	
Data Source:	
Method of data collection and construction:	
Reporting Frequency:	
Individual(s) responsible at USAID:	
DATA QUALITY ISSUES	
Dates of Previous Data Quality Assessments and name of reviewer:	
Date of Future Data Quality Assessments (optional):	
Known Data Limitations:	
TARGETS AND BASELINE	
Baseline timeframe (optional):	
Rationale for Targets (optional):	
CHANGES TO INDICATOR	
Changes to indicator:	
Other Notes (optional):	
THIS SHEET LAST UPDATED ON:	



**USAID**  
FROM THE AMERICAN PEOPLE

# Establishing Baselines



**USAID**  
FROM THE AMERICAN PEOPLE

## Baseline Scenarios

1

Baseline is **already established**

2

Baseline **must be collected**

3

Baselines are established on a **rolling basis**

4

Baseline is **zero**



**USAID**  
FROM THE AMERICAN PEOPLE

## Scenario One: Baseline is Already Established

- ❖ Common for outcome indicators from third party sources
  - Gross National Product or Gross Domestic Product
  - Prevalence of stunted children or Prevalence of Anemia
- ❖ May be possible to use secondary data (compiled or raw)
- ❖ Source and data collection methodology should remain the same over the course of the strategy/project.
- ❖ Data from existing sources need to meet USAID data quality standards





**USAID**  
FROM THE AMERICAN PEOPLE

## Scenario Two: Baseline Data Must be Collected

- ❖ If there is no existing data with which to establish a baseline, USAID and/or its IPs have to collect it.
  - IP-collected gross margin data
  - Score in percent of Organization Capacity (OCA Score)
- ❖ IPs may have data collection protocols, instruments, scoring procedures, etc. from prior activities that can be used
- ❖ The cost of baseline data collection needs to be factored into project planning and awards.
- ❖ The plan for baseline data collection should be clearly stipulated in the PMP/M&E Plan and project agreement



**USAID**  
FROM THE AMERICAN PEOPLE

## Scenario 3: Baselines are Established on a Rolling Basis

- ❖ Typical for outcome indicators for projects that are rolled-out across multiple sites at different times.
- ❖ Example: A health project is being rolled out sequentially across districts over a three-year period.
  - Data collected in the first District will serve as baseline for Year One;
  - Data collected in the second District will serve as baseline for the second District in Year Two; and so forth.
- ❖ Think through challenges for aggregation and reporting
- ❖ Always collect raw data!



**USAID**  
FROM THE AMERICAN PEOPLE

## Scenario Four: Baseline is Zero

- ❖ Typical for output indicators at the beginning of an intervention.
- ❖ Examples:
  - Number of Farmers Trained on new technology.
  - Number of CHN Trained in counseling services
  - Number of sub-grants awarded to local organizations



**USAID**  
FROM THE AMERICAN PEOPLE

# Going Practical - Establishing Baselines for Output, Outcome and Impact Indicators

## The FTFMS Way!



**USAID**  
FROM THE AMERICAN PEOPLE

## Output Indicators

- ❖ Count things directly funded by the project
- ❖ **New projects; BL = 0**
- ❖ **On-going projects;**
  - **Previously collected; BL = FY12 (or baseline year) actual**
  - **Not previously collected; BL = leave blank**



**USAID**  
FROM THE AMERICAN PEOPLE

## Outcome Indicators

- ❖ Capturing change in a project-attributable **condition**
  - **BL = condition prior to project**
  - **Exceptions:** value of loans, value of private sector investment **BL = 0**
  
- ❖ Capturing change in a project-attributable **number of units (e.g. people, organizations) with the outcome**
  - **BL = 0**
  - Exception: # facilities w/capacity to manage acute undernutrition
  - **BL = number prior to project**



**USAID**  
FROM THE AMERICAN PEOPLE

## Outcome Indicators

- ❖ Capturing change in **ZOI population-based conditions**
  - **BL = value when PBS conducted**
  
- ❖ Capturing change in **national conditions**
  - **BL = value in FY 2012 (or baseline year determined by project)**



**USAID**  
FROM THE AMERICAN PEOPLE

## Impact Indicators

- ❖ Capturing change in **ZOI population-based conditions**
  - **BL = value when PBS conducted**
  
- ❖ Capturing change in **national conditions**
  - **BL = value in FY 2012 (or baseline year determined by Mission (Office of EG))**





**USAID**  
FROM THE AMERICAN PEOPLE

## Impact Indicators

- ❖ Value of **Incremental sales** indicator **cannot be calculated if value of baseline sales is missing.**
  - If baseline prior to project is not available, use the **reporting year sales from the first year it was reported as the baseline.**
  
- ❖ In all other cases, if baseline for an indicator is not available, leave blank.
  - **Do not enter 0** (which is a real value)



**USAID**  
FROM THE AMERICAN PEOPLE

## Considerations for Using Secondary Data

- ❖ Is the data from a **reliable** source?
- ❖ Is the data at the **right level and unit of analysis**?
- ❖ Is the data sufficiently **timely**?
- ❖ Is it sufficiently **precise** based on expected effect size?
- ❖ Does the data have any **use limitations**?
- ❖ How **accurate and complete** are the data? Are there any gaps? Are there any notable potential biases?
- ❖ Have there been any changes in context (political, economic, conflict) that would call into question the **validity** of the data?



**USAID**  
FROM THE AMERICAN PEOPLE

## Baseline Challenges

- ❖ Need **beneficiary list** to establish baseline
  - **Sampling “likely” beneficiaries** from the overall population is **risky**
  - Self- and project-**selection bias**
  - Often **difficult to apply** complete set of **criteria** to be used to select beneficiaries
    - Subjective and objective criteria often used
- ❖ **Extrapolation** difficulties
  - Distorted weighted average gross margin
  - Likely overestimate of value of baseline sales



**USAID**  
FROM THE AMERICAN PEOPLE

## Baseline Challenges

### ❖ **Timing** of baseline

- **Wait** until beneficiary list has been developed
- **Different recall periods** baseline and annual reporting
- We'll just have to live with it

### ❖ Consider ethics, risks, protocols



**USAID**  
FROM THE AMERICAN PEOPLE

Any questions?



**USAID**  
FROM THE AMERICAN PEOPLE

# Part II

## Setting Targets



**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets for Performance Indicators

- ❖ A **target** is the specific, planned level of result to be achieved within an explicit timeframe with a given level of resources. (ADS 203.3.9)
- ❖ Please keep in mind that an indicator is a neutral measure, i.e. prevalence of poverty.
  - Targets add notions of quantity, quality, and time (for example a 20% reduction in prevalence of poverty in 5 years).
- ❖ Document the rationale behind your targets
- ❖ Required for performance indicators, but not context indicators



**USAID**  
FROM THE AMERICAN PEOPLE

## Relationship between Baselines and Targets

- ❖ Baselines establish a **reference value** against which progress is subsequently measured.
- ❖ Baselines capture a situation at the start of the programming period for the dimension covered by the respective result target.
- ❖ Targets should be expressed in the same statistical unit the baseline.





**USAID**  
FROM THE AMERICAN PEOPLE

## Why Set Performance Targets?

- ❖ Help to **establish clear expectations** for USAID staff, implementing partners, and key stakeholders.
- ❖ **Serve as the guideposts** for monitoring whether progress is being made on schedule and at the levels originally envisioned.
- ❖ **Promote transparency and accountability** by making available information on whether results have been achieved.
- ❖ **Help justify** a program by describing in concrete terms what USAID's investment will produce.



**USAID**  
FROM THE AMERICAN PEOPLE

## Why Set Performance Targets Contd.?

- ❖ Targets can be important tools for effective program management.
- ❖ However, the extent to which targets are, or are not met, should not be the only criterion for judging the success or failure of a program.
- ❖ Targets are essentially flags for managers; if the targets are wildly exceeded or well-below expectations, the program manager should ask, “Why?”



**USAID**  
FROM THE AMERICAN PEOPLE

## Timing of Targets

Level of CDCS Results Framework	Level of the Project LogFrame (typical)	When are targets set?
Goal	-	<ul style="list-style-type: none"><li>• Prior to <u>PMP approval</u></li></ul>
DO	Project Goal	<ul style="list-style-type: none"><li>• Primary to <u>PMP approval</u></li></ul>
IR	Project Purpose	<ul style="list-style-type: none"><li>• Prior to <u>PAD approval</u></li></ul>
Sub-IR	Project Sub-Purpose	<ul style="list-style-type: none"><li>• Prior to <u>activity implementation</u></li></ul>



**USAID**  
FROM THE AMERICAN PEOPLE

## Different ways to Express Targets

- **Absolute level of achievement**
  - 85% of all farmers have doubled their yields by the end of year 4.
  - 50 SMEs have won contracts in the Oil and gas sector by the end of the activity.
- **Change in the level of achievement**
  - Yields per hectare under improved management practices increased by 25% by the end of year 4.
  - Prevalence of stunting reduced by 5 percentage points from 2012 to 2017.
- **Change in relation to the scale of the problem**
  - 35% of total births in target area attended by skilled health personnel by the end of year two of the project.
  - Proportion of households with access to reliable potable water increased by 50% by 2015.



**USAID**  
FROM THE AMERICAN PEOPLE

- **Creation or provision of something new**
  - 4,000 doses of tetanus vaccine distributed in year one of the activity.
  - Law permitting NGOs to generate income is passed by 2016.
- **Quality of expected results**
  - Average customer satisfaction score for registration of a business license increases to six by the end of the program (based on a 7-point scale)
- **Cost efficiency of expected results**
  - Cost of providing a couple-year-of-protection is reduced to \$10 by 2016
  - Per-acre costs of a growing maize are reduced by 20% between 2014 and 2016.

*The way a target is expressed* depends on the nature of the data, the specific indicators, and the project's objectives



**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets

- ❖ Consider USAID's manageable interest.
- ❖ Target setting is more challenging:
  - For indicators that measure higher level results
  - When there is a less predictable relationship between inputs, outputs, and outcomes
- ❖ A natural tension exists between the need to set realistic targets and the desire to set targets ambitious enough to ensure that staff and stakeholders will stretch to meet them
- ❖ Targets should be realistic, meaningful, and useful.



**USAID**  
FROM THE AMERICAN PEOPLE

## Factors that Affect the Achievement of Targets

Targets should be defined **on the basis of an objective assessment of what can be accomplished given certain conditions and resources**. Consider:

- Resources (funding, human resources, material goods, and institutional capacity)
- Implementation stages
- Implementation capacity
- Development hypothesis
- Indicator trajectory and baseline value
- Country conditions (e.g. political, economic, geographic, social)
- Technical constraints
- Data availability

Also remember:

- Manageable interest
- Critical assumptions
- Contributions of other donors, host government international organizations, etc.



**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets - Methodology

### ❖ **Methods for setting targets include:**

- **Historical Trends**
- **Expert Judgments**
- **Research Findings**
- **Farm model**
- Stakeholder Expectations
- Achievement of Similar Programs





**USAID**  
FROM THE AMERICAN PEOPLE

## Historical Trends

- ❖ Understanding the underlying historical trend in the indicator value over time.
- ❖ What pattern of change has been evident in the past five to ten years on the performance indicator?
- ❖ Is there a trend, upward or downward, that can be drawn from existing reports, records, or statistics?
- ❖ Trends are not always a straight line; there may be a period during which a program plateaus before improvements are seen



**USAID**  
FROM THE AMERICAN PEOPLE

## Example: Guinea Education

**Table 4.2. Gross Primary Enrollment in Guinea and Selected Neighboring Countries, 1960–96**

	<i>% gross primary enrollment</i>			<i>Change (% points)</i>	
	<i>1960</i>	<i>1980</i>	<i>1996<sup>a</sup></i>	<i>1960-1996<sup>a</sup></i>	<i>1980-1996<sup>a</sup></i>
Côte d'Ivoire	46	75.0	71.3	25.3	-3.7
Ghana <sup>a</sup>	38	79.4	78.7	40.7	-0.7
Mali	10	26.3	45.1	35.1	18.8
Senegal	27	46.3	68.2	41.2	21.9
Guinea	30	36.4	52.6	22.6	16.2

a. Reference year for Ghana is 1994

Source: World Development Indicators, World Bank (various years).



**USAID**  
FROM THE AMERICAN PEOPLE

## Expert Judgments

- ❖ Another option is to solicit expert opinions as to what is possible or feasible with respect to a particular indicator and country setting.
- ❖ Experts should be knowledgeable about the program area as well as local conditions.
- ❖ Experts will be familiar with what is and what is not possible from a technical and practical standpoint – an important input for any target-setting exercise.



**USAID**  
FROM THE AMERICAN PEOPLE

## Example: Guinea Agriculture

**Table 4.1. Agricultural Growth in Guinea and Selected Neighboring Countries, 1970–2000**

<i>3-year moving average</i>	<i>Guinea</i>	<i>Côte d'Ivoire</i>	<i>Ghana</i>	<i>Mali</i>	<i>Senegal</i>
<b>1987–2000</b>					
mean	4.2	3.2	3.0	4.0	1.3
standard deviation	1.1	1.7	1.4	2.4	2.5
<b>Frequency 1970–2000<sup>a</sup></b>					
Moving average >10 %	0	0	0	3	2
Moving average < 0 %	0	6	6	6	8
<b>Projected growth in 2010 from linear trend over</b>					
1987–2000	7.3	2.8	7.8	0.4	4.8
1970–2000	–	2.6	3.3	4.8	1.4

a. Period for Guinea is 1987–2000.

Source: World Development Indicators, World Bank (various years).



**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets: Expert Judgments

- ❖ Identify the technical experts for your field who will know what is technically and practically feasible.
- ❖ Ask: what is possible or feasible with respect to a particular indicator and country setting?
- ❖ How: questionnaires, key informant interviews, focus groups, Delphi method



**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets: Expert-Driven Analysis

- ❖ Different techniques can be used to establish an empirical relation between targets and their correlates
  - Simulations: evaluate the feasibility of targets by simulating the likelihood of other key variables that affect targets.
  - Modeling: examine the effect of different variables on the outcome of interest, controlling for time and other effects, using techniques like multivariate regression analysis
  - Forecasting: use current and past levels and trends to project a range of likely future values, using approaches such as time series analysis or cohort component demographic projections.



**USAID**  
FROM THE AMERICAN PEOPLE

## Example: FTF Poverty Reduction Targets

- ❖ FTF aspirational target of 20 percent reduction in FTF ZOIs
- ❖ BFS and E3 staff have analyzed national trends in poverty reduction and GDP growth to inform recommended poverty reduction targets for each mission.
- ❖ Missions may deviate from the recommended targets by five percentage points in either direction depending on analysis in region of geographic focus



**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets: Research Findings and Assessments

- ❖ Research Findings (e.g. in journals, reports, and other publications)
- ❖ Assessments (e.g. those conducted for CDCS development or Project Design)
- ❖ Evaluation findings





**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets: Achievement of Similar Programs

- Examination of the progress of similar programs, in similar contexts, to understand the expected rate of change.
- Examples may come from:
  - Recent or past programming
  - Other USAID Missions or offices
  - Other development agencies
  - Implementing partners
- Benchmarking – the process of comparing progress against similar programs



**USAID**  
FROM THE AMERICAN PEOPLE

## Setting Targets: General Steps

- ❖ Establish baseline
- ❖ Look at existing trend data
  - Make sure trend data from multiple periods is comparable
  - Consider variables of interest (e.g. geographic, gender, etc.)
- ❖ Supplement trend data with other sources of information (e.g. expert judgments, forecasting, etc.)
- ❖ Consider reasonable targets, given proposed intervention approach (also consider intervention approach needed to achieve a particular target)
- ❖ Assess feasibility of targets
- ❖ Continue steps iteratively, as needed.



**USAID**  
FROM THE AMERICAN PEOPLE

## Target Setting: Good Practices

- ❖ **Transparency.** Targets should be set in a manner that is transparent and based on a defensible line of reasoning.
- ❖ **Engage Stakeholders.** Participation of key stakeholders in setting targets is critical to establish a common understanding about what the project will accomplish and when.
- ❖ **Context.** Targets should incorporate careful consideration of contextual factors and dynamics and appropriate incentives.
- ❖ **Hybrid/Mixed Approaches.** Select an approach or hybrid of approaches for target setting most suited to the indicator.
- ❖ **Consistency.** Targets should be horizontally and vertically consistent.



**USAID**  
FROM THE AMERICAN PEOPLE

## Targets: Next Steps

- ❖ **Consider all of the information at your disposal.** What information do you have, and what information do you need?
- ❖ **Set interim and final targets based on a careful analysis of what is realistic to achieve**
  - ❖ Start at final performance level and work backwards, and/or set quarterly/bi-annual/annual performance targets and work forward
- ❖ **Consider variations in performance**, e.g., seasons and timing of activities and expected results.
- ❖ **Remember that progress is not always a straight line!**



**USAID**  
FROM THE AMERICAN PEOPLE

## Targets: Some Notes of Caution

- ❖ Targets can create perverse incentives.
- ❖ Targets can contradict one another.
- ❖ Targets may lead to suboptimal behavior and unintended consequences.
- ❖ Care must be taken in the design, implementation and evaluation of targets.



**USAID**  
FROM THE AMERICAN PEOPLE

## Documenting Targets

- ❖ Document, document, document!
- ❖ Strategy, project, and activity baselines, targets, and actual data are maintained in the FTFMS, and very soon AIDtracker Plus.
- ❖ The PIRS should clearly state the rationale for how the targets were selected and why target values were chosen.

USAID Performance Indicator Reference Sheet	
Name of Result Measured (Goal, DO, IR, sub-IR, Project Purpose, Project Output, etc.):	
Name of Indicator:	
Is this a Performance Plan and Report indicator? No ___ Yes ___ for Reporting Year(s) _____	
If yes, link to foreign assistance framework:	
DESCRIPTION	
Precise Definition(s):	
Unit of Measure:	
Disaggregated by:	
Rationale or Justification for indicator (optional):	
PLAN FOR DATA COLLECTION BY USAID	
Data Source:	
Method of data collection and construction:	
Reporting Frequency:	
Individual(s) responsible at USAID:	
DATA QUALITY ISSUES	
Dates of Previous Data Quality Assessments and name of reviewer:	
Date of Future Data Quality Assessments (optional):	
Known Data Limitations:	
TARGETS AND BASELINE	
Baseline timeframe (optional):	
Rationale for Targets (optional):	
CHANGES TO INDICATOR	
Changes to indicator:	
Other Notes (optional):	
THIS SHEET LAST UPDATED ON:	



**USAID**  
FROM THE AMERICAN PEOPLE

**Any questions?**

**Thank you!**