



ENVISION

FY16 PY5 Semi Annual Report

October 1, 2015–March 30, 2016

ENVISION Semi Annual Report FY16 PY5 Q1–Q2

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ENVISION PROJECT OVERVIEW

ENVISION is an eight-year project funded by the U.S. Agency for International Development (USAID) aimed at providing assistance to national neglected tropical disease (NTD) control programs for the control and elimination of seven targeted NTDs: lymphatic filariasis, onchocerciasis, schistosomiasis, three soil-transmitted helminths (roundworm, hookworm, and whipworm), and trachoma. ENVISION contributes to the global goal of reducing the burden of these targeted NTDs so that they are no longer a public health problem.

ENVISION is implemented by RTI International, in partnership with CBM International, The Carter Center, Fred Hollows Foundation, Helen Keller International, IMA World Health, Light for the World, Sightsavers, and World Vision. The period of performance for ENVISION is September 30, 2011 through September 29, 2019.

Cover Photos: Top row: MDA in Tanzania (left), Participants learn how to use the Integrated NTD Database at WHO AFRO Workshop in Johannesburg, South Africa in November 2015 (right); Bottom row: ENVISION Senegal conducts data quality assessment (left), ENVISION Indonesia celebrates launch of National Filariasis Elimination Month in Indonesia, October 2015 (right).



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ACRONYM LIST

AE	Adverse Event
AFRO	Africa Regional Office (WHO)
ALB	Albendazole
AO	Agreement Officer
AOR	Agreement Officer's Representative
APOC	African Programme for Onchocerciasis Control
ASTMH	American Society for Tropical Medicine and Hygiene
BMGF	Bill and Melinda Gates Foundation
CBM	CBM International
CCA	Circulating Cathodic Antigen
CDC	U.S. Centers for Disease Control and Prevention
CDD	Community Drug Distributor
CDS	Department of Communicable Diseases
CNTD	Centre for Neglected Tropical Diseases, Liverpool School of Tropical Medicine
DC	District of Columbia
DEC	Diethylcarbamazine
DFID	UK Department for International Development
DLNTD	WHO District Level Management NTD Training Course
DRC	Democratic Republic of Congo
DSA	Disease-Specific Assessment
DQA	Data Quality Assessment
ELISA	Enzyme-Linked Immunosorbent Assay
END	End Neglected Tropical Diseases
EPI	Expanded Programme for Immunization
EPIRF	Epidemiological Data Reporting Form
ESPEN	Expanded Special Project for Elimination of Neglected Tropical Diseases
EU	Evaluation Unit
FHF	Fred Hollows Foundation
FMOH	Federal Ministry of Health
FOG	Fixed Obligation Grant
FPSU	Filarial Programmes Support Unit
FTE	Full-time Equivalent
FTS	Filariasis Test Strip
FY	Fiscal Year
GAELF	Global Alliance to Eliminate Lymphatic Filariasis
GET2020	Global Elimination of Blinding Trachoma by 2020
GHD	Global Health Division
GIS	Geographic Information System
GNNTD	Global Network for Neglected Tropical Diseases
GSA	Global Schistosomiasis Alliance
GSK	GlaxoSmithKline
GTMP	Global Trachoma Mapping Project
HKI	Helen Keller International
HMIS	Health Management Information System
HQ	Headquarters

HRA	High-Risk Adult
ICT	Immunochromatographic Test
ICTC	International Coalition for Trachoma Control
IEC	Information, Education, and Communication
IMA	IMA World Health
IR	Intermediate Result
ITI	International Trachoma Initiative
IVM	Ivermectin
JAF	Joint Action Forum
JAM	Joint Application Matrix
JAP	Joint Application Package
JRF	Joint Reporting Form
JRSM	Joint Request for Selected (PC) Medicines (WHO)
KAP	Knowledge, Attitudes, and Practices
KM	Knowledge Management
LF	Lymphatic filariasis
LFTW	Light for the World
LQAS	Lot Quality Assurance Sampling
LSHTM	London School of Hygiene & Tropical Medicine
M&E	Monitoring and Evaluation
MDA	Mass drug administration
MDSC	Multi-Disease Surveillance Centre
MEB	Mebendazole
MMDP	Morbidity Management and Disability Prevention
MOH	Ministry of Health
MSD	Medical Stores Department
MSH	Management Sciences for Health
NGDO	Non-governmental Development Organization
NGO	Non-governmental Organization
NIMR	National Institute for Medical Research
NNN	NTD NGDO Network
NTD	Neglected Tropical Disease
NTD-SC	NTD Support Center (Task Force for Global Health)
NTD-STAG	Strategic and Technical Advisory Group on Neglected Tropical Diseases
NTD WGA	Working Group on Access to Quality Assured Essential Medicines for NTDs
OCP	Onchocerciasis Control Programme
OV	Onchocerciasis
PAHO	Pan American Health Organization
PCR	Polymerase Chain Reaction
PC	Preventive Chemotherapy
PEAR	Platform for Electronic Analysis and Reporting
PFSA	Pharmaceutical Fund and Supply Agency
PMTC	Program Managers Training Course (WHO)
PZQ	Praziquantel
RDT	Rapid Diagnostic Test
REMO	Rapid epidemiological mapping of onchocerciasis
RPA	Resident Program Advisor
RPRG	Regional Program Review Group

SAC	School-Age Children
SAE	Serious Adverse Events
SAFE	Surgery, Antibiotics, Facial cleanliness, Environmental improvements
SAR	Semiannual Report
SCH	Schistosomiasis
SCI	Schistosomiasis Control Initiative
SEARO	Southeast Asia Regional Office
SF	Standard Form
SIAPS	Systems for Improved Access to Pharmaceuticals and Services
SMS	Short Messaging Service
STH	Soil-Transmitted Helminths
TA	Technical Assistance
TAF	Technical Assistance Facility
TAS	Transmission Assessment Survey
TCC	The Carter Center
TD	Tropical Data
TEC	Trachoma Expert Committee
TEMF	Trachoma Elimination Monitoring Form
TEO	Tetracycline Eye Ointment
TF	Trachomatous Inflammation-Follicular
TFGH	Task Force for Global Health
TIPAC	Tool for Integrated Planning and Costing
TIS	Trachoma Impact Survey
TOT	Training of Trainers
TT	Trachomatous Trichiasis
UK	United Kingdom
USAID	U.S. Agency for International Development
WASH	Water, Sanitation, and Hygiene
WCBA	Women of Childbearing Age
WG-CS	Working Group for Capacity Strengthening
WHO	World Health Organization
WPRO	Western Pacific Regional Office
WV	World Vision
ZTH	Zithromax®

INTRODUCTION

ENVISION’s goal is to support disease-endemic countries to control and/or eliminate seven neglected tropical disease (NTD)s by increasing mass drug administration (MDA) coverage, improving the evidence base for action, and strengthening the environment for implementation. In this fifth year of implementation, the ENVISION project is at a critical junction: national NTD programs have been working tirelessly to complete baseline disease mapping and to commence and scale up MDA in at-risk communities. Many have reached full geographic coverage for mapping and/or MDA, and are securing this foundation while also planning to assess impact. ENVISION is now at this intersection of accelerating interventions to achieve global NTD goals while simultaneously building a secure foundation for the future, including post-MDA surveillance and dossier preparation. ENVISION’s FY16 activities—focusing on support to 19 specific countries and informing the NTD community globally—reflect the multifaceted nature of this period.

This semiannual report (SAR) illustrates progress towards programmatic milestones in the achievement of ENVISION’s NTD elimination and control goals, including advancement in all ENVISION activities planned for fiscal year 2016 (FY16) and early results from MDA conducted during the first half of the year (October 2015 through March 2016). In addition, for the first time, this SAR provides a detailed, in-depth analysis of complete FY15 data (October 2014 through September 2015), whether by *disease* (in section “Progress by Disease”), by *activity* (in “Focus on Supporting Countries”; from mapping through preparation for elimination), or by *country* (in the individual country reports). As data are collected by national NTD programs supported by ENVISION (thereby focusing on strengthening local health systems), reporting often takes more time than if parallel data collection systems had been created.

Data from the overall USAID NTD portfolio—managed by ENVISION in the USAID NTD Database—are found in the SAR appendices. A few key points regarding USAID-supported projects can be highlighted here:

- A cumulative total of **\$12.8 billion USD worth of donated drugs have been delivered** to USAID-supported countries to date¹.
- More than **1.6 billion cumulative treatments have been delivered** to date;
- A total of **760 million cumulative persons have been treated** to date.

During the second half of the year (April through September 2016), ENVISION activities will focus on completing mapping gaps, achieving geographic coverage, improving the quality of MDA, disseminating lessons learned, and continuing to strengthen the global NTD environment through collaboration in policy, research, technical expertise, and advocacy.

¹ FY07-FY16 Q1-2

PROJECT OVERVIEW

The U.S. Agency for International Development (USAID)'s ENVISION project (2011–2019) mandate is to support the vision of WHO and its member states by targeting the control and elimination of seven NTDs: lymphatic filariasis (LF), onchocerciasis (OV), schistosomiasis (SCH), trachoma, and three soil-transmitted helminths (STHs; roundworm, whipworm, and hookworm). ENVISION's goal is to strengthen NTD programming at the global and country levels and support Ministries of Health (MOHs) to achieve their NTD control and elimination goals.

At the global level, ENVISION—in coordination and collaboration with WHO, USAID, and other stakeholders—contributes to several technical areas in support of global NTD control and elimination goals, including the following:

- Drug and diagnostics procurement where global donation programs are unavailable;
- Capacity strengthening;
- Management and implementation of ENVISION's Technical Assistance Facility (TAF);
- Disease mapping;
- NTD policy and technical guideline development; and
- NTD Monitoring & Evaluation (M&E).

At the country level, ENVISION provides support to national NTD programs in 19 countries in Africa, Asia, and Latin America (Figure 1) by providing strategic technical, operational, and financial assistance for a comprehensive package of NTD interventions, including:

- Strategic annual and multi-year program planning;
- Advocacy;
- Social mobilization and health education;
- Capacity strengthening;
- Baseline disease mapping;
- Preventive chemotherapy (PC) or MDA implementation;
- Drug and commodity supply management and procurement;
- Program supervision; and
- M&E, including disease specific assessments (DSA) and surveillance.

The ENVISION-supported countries are Bangladesh, Benin, Cambodia, Cameroon, Democratic Republic of Congo (DRC), Ethiopia, Guinea, Haiti, Indonesia, Laos, Mali, Mozambique, Nepal, Nigeria, the Philippines, Senegal, Tanzania, Uganda, and Vietnam.

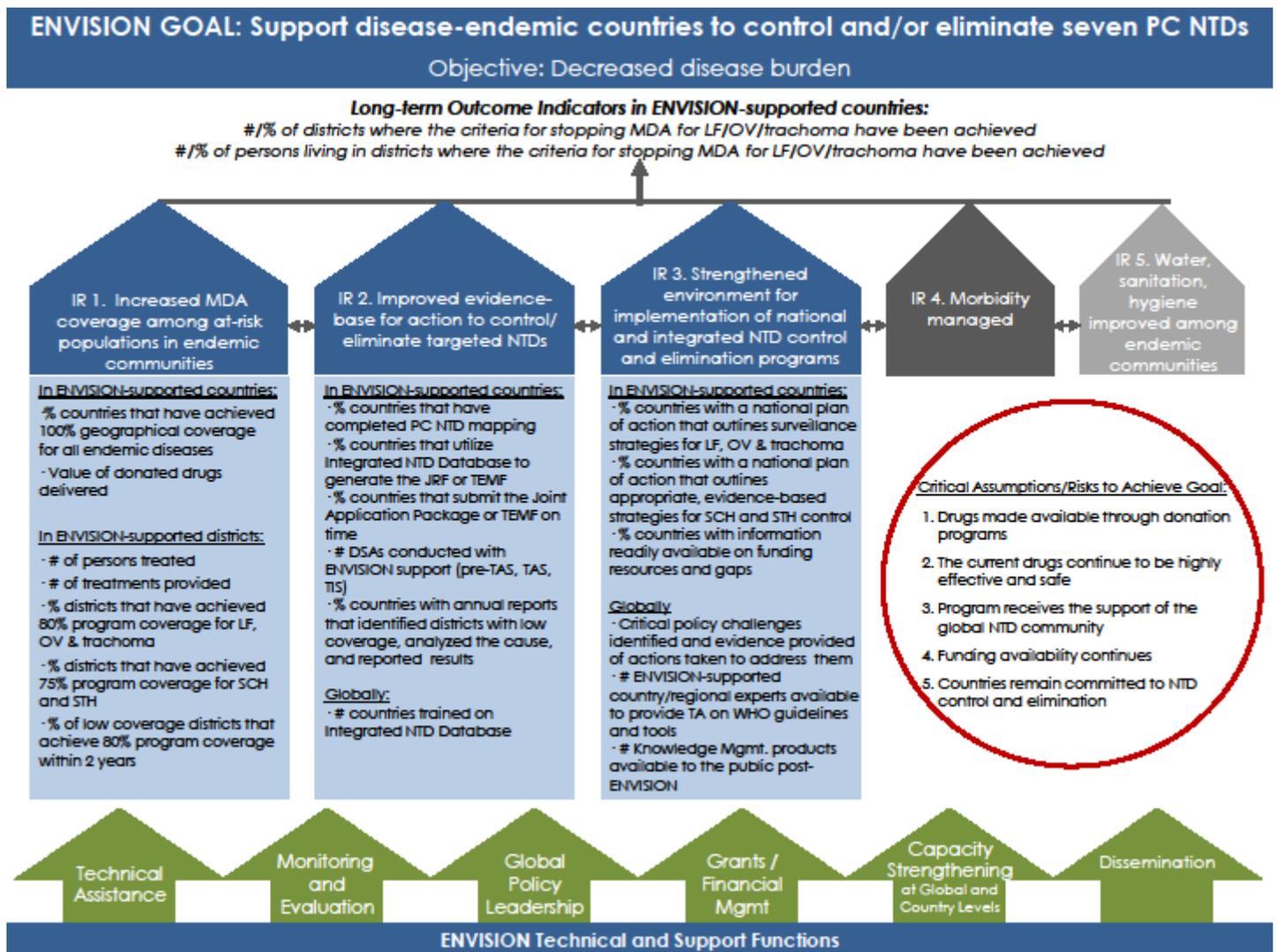
Figure 1. Countries supported by ENVISION in FY16



PROJECT FRAMEWORK

Based on the World Health Organization (WHO) NTD rollout package² and the accomplishments from the earlier USAID-funded NTD Control Program (2006–2012), RTI International and USAID designed the ENVISION project with the goal of supporting disease-endemic countries to control or eliminate seven NTDs. Through a package of technical and support functions, ENVISION aims to empower governments of endemic countries to lead and implement national NTD control programs and scale up the delivery of PC for targeted NTDs.

Figure 2. ENVISION's results framework³



² Hanson, C., Weaver, A., Zoerhoff, K. L., Kabore, A., Linehan, M., Doherty, A., Engels, D., Savioli, L., Ottesen, E. A. (2012). Integrated implementation of programs targeting neglected tropical diseases through preventive chemotherapy: identifying best practices to roll out programs at national scale. *Am J Trop Med Hyg* 86, 508–513.

³ Updated in September 2015.

Figure 2 illustrates the revised ENVISION results framework through which project activities are designed, implemented, monitored, and evaluated. ENVISION's technical and support functions include providing (1) technical assistance (TA), (2) M&E, (3) global policy leadership, (4) grants and financial management, (5) capacity strengthening, and (6) dissemination. These functions are designed to support activities aiming at the agreed-upon ENVISION Intermediate Result (IR) domains:

IR 1: Increased MDA coverage among at-risk populations in endemic communities

IR 2: Improved evidence base for determining and assessing action to control/eliminate targeted NTDs

IR 3: Strengthened environment for implementation of national and integrated NTD control and elimination programs

To achieve ENVISION's goal of strengthening NTD control and elimination at global and country levels, ENVISION engages with local, regional, and international stakeholders to provide technical, operational, and financial assistance and build capacity, ensuring that standard tools (such as the WHO Integrated NTD Database), techniques, and state-of-the-art approaches (such as data quality assessments [DQAs]) are used effectively. By influencing global policies and building local capacities and systems, ENVISION aims to foster efficient and sustained integrated NTD control beyond the life of the project.

Several critical assumptions are considered during ENVISION's work planning and implementation; these assumptions speak to the importance of the project's reputation and leadership throughout the NTD community and are continuously monitored by project management.

During the first half of the year, ENVISION began developing a process to collect data on the new indicators outlined in the revised Results Framework⁴. Some of these indicators will be easily calculated using the existing data-capture tools, whereas others will require slight revisions to existing data-collection processes. ENVISION will report on these indicators in the FY16 Annual Report. In collaboration with USAID, ENVISION will define new milestones following the revised results framework during the second half of FY16.

Multi-year results data for the ENVISION and END in Africa are provided as a separate attachment to this report in **Appendix 1**.

⁴ Approved by USAID as part of the ENVISION extension awarded to RTI in 2015.

PROGRESS BY DISEASE

1. Lymphatic Filariasis (LF)

Overview

All 19 ENVISION-supported countries are endemic for LF. More than 301 million people are still living in areas at risk of LF in these countries, representing approximately 25% of the global at-risk population. More than 115 million people in 13 ENVISION-supported countries are now living in areas that have passed a first-round transmission assessment survey (TAS1) and achieved the criteria for stopping MDA (Table 1), and 2 of these countries (Cambodia and Vietnam) have passed TAS3 in all endemic implementation units. Of the 301 million persons still living in areas at risk, 109 million are targeted to receive treatment with USAID support in FY16.

Country	# Currently endemic districts	# Non-endemic districts	# Districts where MDA was ever implemented	# Districts where criteria for stopping MDA achieved	# Persons still living in areas at risk	# Persons no longer at risk (living in areas where criteria for stopping MDA achieved)
Bangladesh*	1	45	20	18	3,415,912	34,094,246
Benin	27	27	48	23	3,659,005	2,743,497
Cambodia**	0	20	4	4	0	579,603
Cameroon	153	23	144	5	17,722,392	789,043
DRC	225	262	6	0	33,035,298	0
Ethiopia	113	723	57	0	11,305,804	0
Guinea	24	14	10	0	7,161,619	0
Haiti	94	0	140	46	9,443,937	2,087,791
Indonesia	216	273	158	24	84,800,837	13,493,539
Laos**	1	16	1	0	137,089	0
Mali	40	0	63	23	10,956,140	7,386,860
Mozambique	114	46	112	0	19,584,658	0
Nepal	41	14	61	20	16,220,057	9,992,231
Nigeria	121	623	141	30	25,638,320	6,908,560
Philippines**	22	36	44	22	21,879,837	20,065,576
Senegal	50	26	50	0	8,551,109	0
Tanzania	65	63	103	38	21,099,893	8,344,095
Uganda	21	58	54	33	6,861,848	8,158,795
Vietnam**	0	59	4	4	0	656,872
TOTAL	1,328	2,328	1,220	290	301,473,755	115,300,707

Data as of FY16 1st SAR.

* Based on most recent data – FY15 2nd SAR End Neglected Tropical Diseases (END) in Asia workbook.

** Cambodia, Laos, the Philippines, and Vietnam all use “province” as implementation unit.

USAID’s goal for LF is to help countries achieve the World Health Assembly’s resolution to eliminate LF as a public health problem by 2020. Given a shift to greater scale down of LF MDA (Table 2) in some but not all countries, the project provides assistance toward two major objectives: (1) accelerating the scale up of effective MDA activities for LF, and (2) ensuring appropriate scale down through implementation of high-quality TAS.

Table 2. Progress in achieving milestones for LF

Country	Mapping	MDA started	Under post-MDA, pre-validation surveillance	FY by which all districts are expected to be under post-MDA, pre-validation surveillance*								
				15	16	17	18	19	20	21	22+	
Cambodia	100%	100%	100%	X								
Vietnam	100%	100%	100%	X								
Bangladesh	100%	100%	97%			X						
Laos	100%	100%	0%			X						
Uganda	100%	100%	61%				X					
Nepal	100%	100%	33%				X					
Philippines	100%	100%	50%				X					
Tanzania	100%	100%	37%				X					
Haiti	100%	100%	33%				X					
Mozambique***	100%	100%	0%					X				
Nigeria**	100%	100%	20%							X		
Benin	100%	96%	46%							X		
Senegal	100%	100%	0%							X		
Cameroon	100%	91%	3%									X
Mali****	100%	100%	37%									X
Indonesia	99.8%	66%	10%									X
Ethiopia***	100%	50%	0%									X
Guinea	100%	42%	0%									X
DRC***	94%	3%	0%									X

Data as of FY16 1st SAR. Data reflect the percentage of districts achieving each milestone.

* Assumes all districts achieve at least five rounds of sufficient epidemiological coverage in remaining years, and pass pre-TAS and TAS1.

** Reflect data in 10 USAID-supported states.

*** Reflect data received by ENVISION to date. Data will continue to be updated as ENVISION receives additional information from non-USAID supported areas.

**** Insecurity has resulted in missing years of treatment for some districts. The projections for TAS1 to stop-MDA in these districts are unknown.

Mapping

All ENVISION-supported countries (except DRC) have completed initial mapping for LF. However, mapping refinements are ongoing in Indonesia and Ethiopia using the mini-TAS methodology, and in Benin in coordination with the Task Force for Global Health (TFGH) in areas with suspect initial results. Thus far, reassessments in Indonesia and Ethiopia have not resulted in a dramatic change to the number of endemic districts, with 1 of 3 confirmed endemic in Indonesia, and 41 of 45 confirmed endemic in Ethiopia. In Q3–Q4, Indonesia will remap one additional district and Ethiopia will map for LF as part of multi-disease mapping in 10 refugee camps in Gambella and Benishangul-Gumuz. In Benin, operational research is being implemented to determine the status of LF endemicity in two major cities—Cotonou and Porto-Novo.

MDA Geographic Coverage

To meet the 2020 LF elimination goal, operationalized by achieving five rounds of effective MDA coverage in all endemic areas by 2020, national programs must reach 100% geographic coverage in 2016. In a significant shift from FY15, two ENVISION countries—Ethiopia and Indonesia—are planning to scale up to 100% geographic coverage with LF MDA in calendar year 2016. Ethiopia has closed this gap with support from various donors, while Indonesia is using a combination of national budget, district budgets, and WHO support. **Thus, most ENVISION-supported countries, with the exception of DRC and parts of Cameroon and Guinea experiencing security issues, are planning to reach 100% geographic coverage for LF MDA in calendar year 2016.**⁵

This success is due in large part because of the expanded support to LF MDA throughout the life of ENVISION. While ENVISION treated 50 million people through LF MDA in FY12, this number grew to almost 84 million treated in FY15. An estimated 109 million people are targeted for treatment in FY16 (Appendix 2).

Progress toward Reduced LF Burden

ENVISION has supported TAS since FY12. Since that date, 91% of evaluation units (EUs) that implemented TAS1 with USAID support passed the assessment (Table 3), and 94% of EUs that implemented TAS2 with USAID support passed. Overall, there have been few TAS failures. Nevertheless, with the upcoming number of TAS—184 districts projected to implement TAS with ENVISION support in FY16 Q3–Q4 and 395 districts need TAS (regardless of funding source) in FY17—ENVISION is focusing on developing tools now to help districts improve TAS outcomes. **To our knowledge, all required assessments are being conducted in areas supported by ENVISION; i.e., none can be deemed overdue.**

⁵ Some of these results will not be reported until FY17, due to the timing of MDA.

Table 3. Number of districts included in ENVISION-supported TAS1, by country (as of FY16 1st SAR)

Country	# conducted	# with results available ⁶	# Passed	% Passed
Cameroon	5	5	5	100%
Haiti	60	47	44	94%
Indonesia	13	13	6	46%
Mali	29	21	21	100%
Nepal	16	16	15	94%
Tanzania	2	2	2	100%
Uganda	34	34	33	97%
TOTAL	159	138	126	91%

A preliminary analysis of TAS failure in ENVISION-supported countries showed that passing TAS was significantly associated with low baseline prevalence (OR 0.945; CI 0.915-0.976)⁷ and high median epidemiological coverage (OR 1.044, CI 1.008-1.082). This finding is in line with previous guidance that areas with high baseline prevalence might need more than five rounds of treatment, as well as emphasizes the importance of achieving effective coverage. Additional analyses are currently ongoing to determine what other factors could affect the likelihood of passing TAS.

Each ENVISION country with TAS failure has investigated the failure(s) and implemented responses:

- The one district that failed TAS in Uganda in 2012 completed two additional MDA rounds and passed re-TAS1 in 2015.
- The failures in Haiti were not surprising, given that all were in districts with very high baseline prevalence; two additional MDA rounds will be implemented, per WHO guidance.
- The failure in one district in Nepal was due to systematic non-compliance and potentially due to economic migration to and from India; two additional MDA rounds were completed, with special attention paid to reaching non-compliant groups. This district has failed pre-re-TAS (and two neighboring districts failed pre-TAS), and a WHO-led meeting is being organized in Q3 to further explore next steps.
- A TAS Expert Meeting was held in Indonesia in March 2016 to explore TAS failures because the majority of failures have been in Brugia-endemic areas in Indonesia. Experts provided feedback on Indonesia's proposed responses to TAS failure and set priority operational research questions to be explored in the next year.

More information about these country-level findings and activities can be found in the country reports.

ENVISION participated in a series of meetings with WHO, the U.S. Centers for Disease Control and Prevention (CDC), USAID, and other partners in FY16 Q1–Q2 to explore issues surrounding TAS failure. These meetings resulted in ENVISION and WHO drafting a set of checklists to improve TAS outcomes. The checklists aim to help countries confirm they (1) have adequately *prepared* for TAS in ensuring

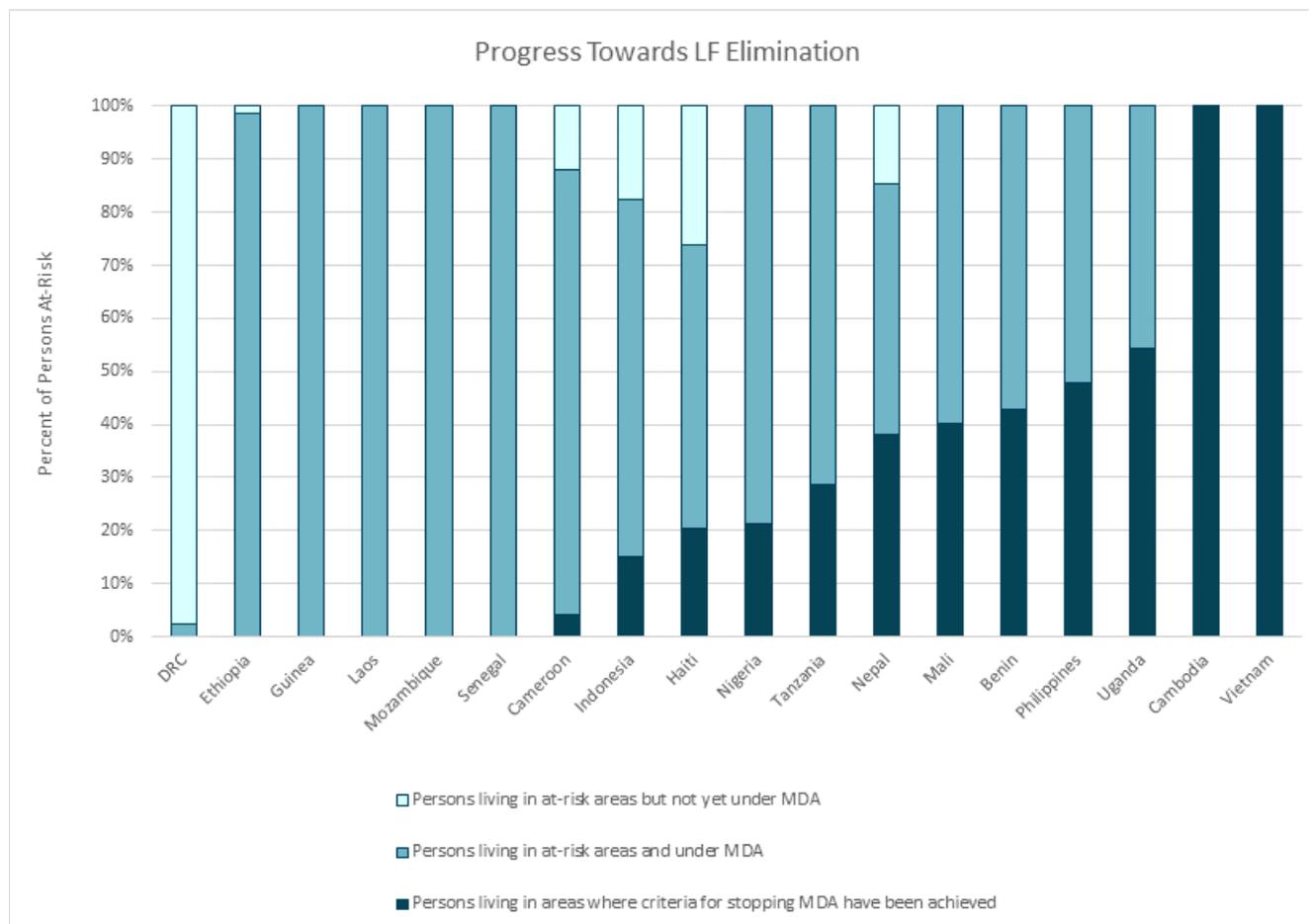
⁶ Results for all TAS are forthcoming and are being pursued by ENVISION.

⁷ OR = odds ratio; CI = confidence interval.

eligibility, developing methodologies (including composition of EUs), storing, and quality testing of rapid diagnostic tests (RDTs); (2) can effectively *supervise* TAS to ensure correct sample selection, diagnostic test usage, and recording of results; and (3) can *investigate* failed TAS through diagnostic test quality assurance, data analysis, and focus group/key informant interviews. These checklists will be piloted in Indonesia and Nepal in FY16 Q3.

Scaling down. FY16 is seeing a significant shift toward stopping MDA in many ENVISION countries. Cambodia and Vietnam stopped LF MDA in 2009. In Uganda, 55% of people originally at risk now live in areas where criteria for stopping MDA have been met, and 40 to 50% of people in Mali, Benin and Philippines live in areas where the stopping MDA criteria have been met (Figure 3).

Figure 3. Progress toward LF elimination, as of March 2016



* For DRC, no MDA data is available for non-USAID supported areas.

** Nigeria only includes ENVISION-supported states.

*** Benin assumes MDA will occur in FY16 in two cities if they are confirmed endemic.

The number of persons living in areas where MDA for LF has stopped increased dramatically, from 8 million to 58 million during FY15, reflecting the impact of assistance from ENVISION for MDA and evaluation activities. In Q1–Q2 FY16, an additional 2.28 million people were added to this total, and by the end of FY16, this number is projected to reach **117 million people**. The projected percentages of LF-endemic districts that are or will be under post-MDA surveillance are continuing to rise from FY16 to FY22 (Table 4).

Table 4. Projected percentage of LF-endemic districts under post-MDA surveillance

Country	FY16	FY17	FY18	FY19	FY20	FY21	FY22
Cambodia	100%	100%	100%	100%	100%	100%	100%
Vietnam	100%	100%	100%	100%	100%	100%	100%
Laos	0%	100%	100%	100%	100%	100%	100%
Uganda	76%	87%	100%	100%	100%	100%	100%
Haiti	75%	96%	100%	100%	100%	100%	100%
Tanzania	66%	97%	100%	100%	100%	100%	100%
Nepal	51%	67%	100%	100%	100%	100%	100%
Philippines	50%	50%	100%	100%	100%	100%	100%
Mozambique	18%	75%	89%	100%	100%	100%	100%
Nigeria	20%	26%	26%	26%	90%	100%	100%
Senegal	0%	0%	14%	26%	26%	100%	100%
Benin	46%	72%	96%	96%	96%	100%	100%
Cameroon	23%	80%	85%	85%	85%	91%	100%
Indonesia	16%	35%	45%	51%	73%	99%	100%
Guinea	0%	0%	0%	0%	13%	46%	100%
Mali****	75%	95%	95%	95%	95%	95%	95%
Ethiopia	4%	4%	12%	12%	57%	57%	57%
DRC	0%	0%	0%	0%	3%	3%	3%

Data reflect the percentage of districts achieving each milestone.

The scaling down of LF MDA will have effects on MDA for other diseases that use the LF platform for distribution of drugs. Given that LF MDA also covers school-age children (SAC) requiring MDA for STH, this is of significant concern. ENVISION’s work to prepare for and support countries to make this transition is included in the STH section of this report.

Preparing for validation. ENVISION is continuing earlier USAID support under the FHI360-led END in Asia project to aid countries in preparing for validation of elimination through dossier development in Cambodia, Vietnam, Bangladesh, and the Philippines. In FY15, the use of the WHO dossier template narrative and Excel data sections proved useful in organizing and presenting information to the Regional Dossier Review Group in the WHO Western Pacific Regional Office (WPRO). As expected, the process to achieve validation of elimination is taking a significant amount of time. The first step of compiling and cleaning the data for entry into the dossier; filling in gaps; and, in some instances, confirming data with lower levels has taken consultants two weeks in country, with almost a year to implement their recommendations. Once the dossier is ready for submission, it needs to be approved by the MOH (a process that can take three to six months in some countries), followed by the WHO Regional Dossier

Review Group (a process that can also take three to six months). The ENVISION experience and learnings from these countries will help inform and hopefully facilitate the experience for other countries in the future.

2. Trachoma

Overview

USAID's goal is to contribute to the elimination of trachoma as a public health problem by the year 2020, including the elimination of associated blindness. To meet this ambitious goal, the ENVISION project provides assistance toward two major objectives: (1) accelerating the scale up of effective MDA activities for trachoma, and (2) ensuring appropriate scale down through implementation of high-quality trachoma impact surveys (TIS) and trachoma surveillance surveys (TSS). ITI has expressed willingness to provide azithromycin for a single round of MDA in districts with baseline prevalence of trachomatous inflammation-follicular (TF) between 5 to 9.9%. Per WHO guidelines, all districts with $TF \geq 5\%$ are considered endemic; this change in definition is being made in the USAID NTD M&E system. The number of endemic districts and population living in endemic areas are expected to increase in ENVISION-supported countries because of this change.

Of the 19 ENVISION-supported countries, 15 are trachoma-endemic, including: Benin, Cambodia, Cameroon, DRC, Ethiopia, Guinea, Laos, Mali, Mozambique, Nepal, Nigeria, Senegal, Tanzania, Uganda and Vietnam. Globally⁸, 1.2 million people are blind due to trachoma and 200 million people live in areas that need interventions in 42 countries. A total of 3.6 million people are estimated to need TT surgery.

Table 5 shows the status of trachoma endemicity in ENVISION-supported countries. Following baseline mapping, by end of FY15, a total of 707 districts were found to be endemic, of which 606 (86%) had been reached with MDA. Of the 606 endemic districts, a total of 162 (27%) have met the criteria for stopping MDA (TF prevalence <5%). By the end of FY15, more than 46 million people lived in areas where trachoma MDA has been stopped.

⁸ Data presented by WHO at the 2016 meeting of the GET2020 Alliance.

Table 5. Trachoma endemicity by country

Country	# Currently endemic districts	# Non-endemic districts	# Districts where MDA ever was implemented	# Districts where criteria for stopping MDA achieved	# Persons still living in areas at risk	# Persons no longer at risk (living in areas where criteria for stopping MDA achieved)
Benin	4	73	4	0	527,491	0
Cambodia**	0	24	0	0	0	0
Cameroon	16	160	21	5	2,465,277	603,586
DRC	9	498	0	0	1,661,657	0
Ethiopia	584	194	331	6	74,268,842	580,984
Guinea	9	29	9	0	3,043,724	0
Laos**	0	17	0	0	0	0
Mali	7	9	54	47	435,568	14,923,987
Mozambique	26	119	42	15	3,588,848	1,497,410
Nepal	0	51	18	20	0	9,599,613
Nigeria*	3	770	7	1	424,264	207,008
Senegal	15	58	18	3	3,360,266	672,928
Tanzania	19	112	57	35	4,675,918	9,448,068
Uganda	15	76	36	21	3,194,030	6,572,045
Vietnam**	0	54	9	9	0	2,662,000
TOTAL	707	2,244	606	162	97,645,886	46,767,629

Data as of FY15 2nd SAR.

* Nigeria data is from FY15 2nd SAR disease workbook.

** Cambodia, Laos, and Vietnam all use province instead of district

Table 6 illustrates overall progress towards the elimination of active trachoma as a public health problem in ENVISION-supported countries. Out of 15 countries, four (Cambodia, Laos, Nepal and Vietnam) achieved elimination thresholds for active trachoma (i.e., prevalence of TF <5%) in all districts during or prior to FY15. All formerly endemic districts are currently under pre-validation trachoma surveillance.

In four countries where 100% of districts are receiving MDA, all districts will be expected to be under pre-validation trachoma surveillance in FY17 (Cameroon and Uganda) and FY18 (Mali and Mozambique). Five countries (Nigeria, Senegal, Ethiopia, Benin, and Guinea) are expected to have all districts under pre-validation surveillance in FY21, while all endemic districts in DRC will be expected to be under pre-validation surveillance no sooner than FY22.

Table 6. Progress in achieving milestones for trachoma

Country	Mapping	MDA started*	Under post-MDA, pre-validation surveillance	FY by which all districts are expected to be under post-MDA, pre-validation surveillance**								
				15	16	17	18	19	20	21	22+	
Cambodia	100%	100%	100%	X								
Laos	100%	100%	100%	X								
Vietnam	100%	100%	100%	X								
Nepal	95%	100%	100%	X								
Mali***	100%	100%	87%		X							
Cameroon	100%	100%	29%			X						
Mozambique	100%	100%	41%				X					
Senegal	100%	94%	17%				X					
Uganda	100%	100%	56%					X				
Tanzania	100%	98%	66%						X			
Nigeria****	100%	100%	25%							X		
Ethiopia*****	94%	56%	1%							X		
Benin	100%	0%	0%							X		
Guinea	90%	89%	0%							X		
DRC*****	98%	0%	0%									X

Data as of FY16 1st SAR. Data reflect the percentage of districts achieving each milestone.

* Denominator defined as districts with baseline TF $\geq 10\%$. Districts with baseline TF prevalence between 5%–9.9% may also be included if treatment has started.

** Assumes all districts achieve the recommended rounds of sufficient epidemiological coverage in remaining years and pass their trachoma impact survey (TIS). The national program may decide to treat districts with baseline TF prevalence between 5%–9.9%, which may postpone the projected year indicated here.

*** Projections assume ability to implement TIS in areas that are currently insecure.

**** Reflect data in 10 USAID-supported states.

***** Reflect data received by ENVISION to date. Data will continue to be updated as additional information is received from non-USAID supported areas.

Mapping

As a result of the DfID- and USAID-funded Global Trachoma Mapping Project (GTMP), the majority of suspected endemic districts have completed baseline trachoma mapping globally.

Trachoma mapping is expected to be nearly complete by the end of FY16 in all ENVISION-supported countries (excluding inaccessible areas of Ethiopia, Nigeria, and parts of DRC⁹). The few remaining districts in ENVISION-supported areas include four districts in Guinea that have been inaccessible due to the Ebola virus outbreak, approximately 16 districts in DRC, and four districts that need to be re-mapped in Nepal. Limited areas of Nigeria and Ethiopia may require baseline trachoma mapping in FY16 following the end of the GTMP; these have been inaccessible due to insecurity and it is unknown when they will become accessible. ENVISION is collaborating closely with DFID-funded partners to close all trachoma mapping gaps as soon as feasible.

MDA Coverage

Table 7 shows the trends of MDA geographic coverage for ENVISION-supported countries. In Benin and DRC, both of which were mapped recently, Trachoma Action Plan (TAP) workshops were undertaken in FY15 and the International Trachoma Initiative (ITI)'s Trachoma Expert Committee approved MDA for both countries for FY16. In the other countries, geographic coverage has fluctuated over time. In Ethiopia, the number of endemic districts under ENVISION support increased from 210 in FY13 to 584 in FY14; however, geographic coverage has remained low in the entire country. In FY15, only Mozambique attained 100% geographic coverage, while the other countries had geographic coverage ranging from 28% in Ethiopia to 89% in Tanzania.

Country	FY12		FY13		FY14		FY15	
	# endemic districts	% geo coverage						
Benin					3	0%	4	0%
Cameroon	16	81%	16	100%	11	82%	12	50%
DRC							9	0%
Ethiopia			210	91%	584	26%	584	28%
Guinea	10	0%	9	22%	9	89%	9	78%
Mali	19	21%	27	41%	17	0%	7	0%
Mozambique			38	26%	38	55%	22	100%
Nepal	4	75%	4	50%	3	100%	0	.
Nigeria*			7	100%	7	0%	3	0%
Senegal			16	56%	18	67%	15	33%
Tanzania	47	64%	42	76%	49	0%	38	89%
Uganda	36	89%	35	46%	31	100%	16	44%

⁹ Trachoma mapping is complete in Guinea; M&E workbooks will be updated accordingly.

Table 8 shows the trends of mean MDA program coverage and proportion of districts achieving the target coverage of 80% and above. Overall, there has been a marked improvement in mean MDA coverage in Cameroon, Ethiopia, Guinea and Mozambique with 83% to 100% of districts achieving the MDA coverage target in FY15. Tanzania also showed improvement in coverage, achieving a mean MDA coverage of 83% in FY15; however, only 56% of districts achieved the coverage target of 80% and above. Uganda has consistently reported lower mean MDA coverage, with the proportion of districts achieving MDA coverage of at least 80% ranging from 25% to 45% from FY12-FY15. Country specific analysis and actions to address insufficient program coverage is included in the country semi-annual reports.

Table 8. Mean trachoma MDA program coverage with ENVISION support								
Country	FY12		FY13		FY14		FY15	
	median coverage rate	% districts achieving target	median coverage rate	% districts achieving target	median coverage rate	% districts achieving target	median coverage rate	% districts achieving target
Benin								
Cameroon	95%	100%	89%	69%	89%	78%	93%	83%
DRC								
Ethiopia	.	.	83%	69%	.	.	94%	98%
Guinea	.	.	81%	50%	80%	50%	85%	100%
Mali								
Mozambique	.	.	92%	90%	76%	48%	93%	95%
Nepal	70%	0%	82%	50%	81%	67%	.	.
Nigeria	.	.	93%	100%
Senegal								
Tanzania	70%	24%	79%	48%	.	.	83%	56%
Uganda	77%	38%	62%	25%	74%	45%	77%	29%

Much of the planned FY16 trachoma MDA has not yet taken place across most ENVISION-supported countries (Table 9). It is expected that MDA will take place in the subsequent quarters. However, delays in shipment of Zithromax by ITI and Pfizer in FY16 are likely to impact timely completion of MDA in most ENVISION-supported countries.

Table 9. Status of trachoma MDA implementation in FY16 Q1–Q2 in ENVISION-supported countries as of March 2016*

Countries	# districts targeted in FY16	# districts treated in Q1–Q2	# persons targeted in FY16	# persons treated in Q1–Q2
Benin	4	0	527,491	0
Cameroon	5	0	846,091	0
DRC ¹⁰	0	0	0	0
Ethiopia	240	39	27,817,541	4,521,609
Guinea	9	0	3,043,724	0
Mali	0	0	0	0
Mozambique	26	0	3,588,848	0
Nepal	0	0	0	0
Nigeria	0	0	0	0
Senegal	6	4	1,131,332	738,303
Tanzania	20	2	5,429,536	250,437
Uganda	12	2	2,393,666	437,444
TOTAL	322	47	44,778,230	5,947,793

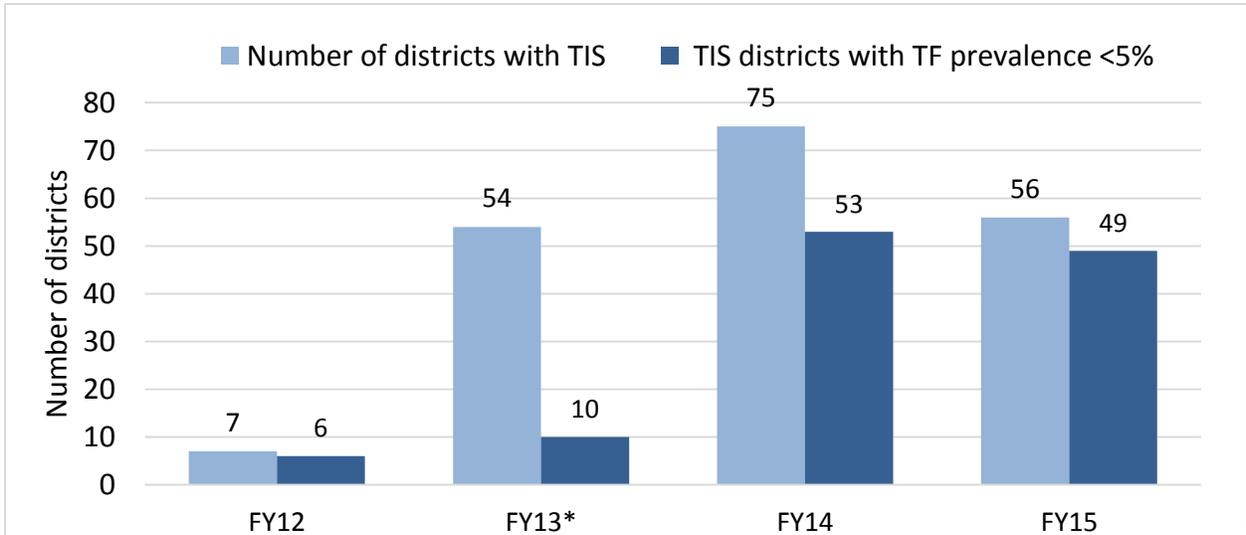
Progress towards reduced trachoma burden

Districts stopping MDA

To our knowledge, all required assessments are being conducted in areas supported by ENVISION; i.e., none can be deemed overdue. Figure 4 shows the number of districts that implemented TIS with ENVISION support, and the number of districts that achieved criteria for stopping MDA (prevalence of TF <5%). Over the period FY12 to FY15, a total of 192 districts underwent TIS, of which 118 (61%) had TF prevalence of <5% and therefore stopped MDA. The proportion of districts with TF prevalence <5% following TIS varied by country, ranging from 5% in Ethiopia to 100% in Mozambique. The majority of the districts undergoing TIS in FY13 were in Ethiopia (41) of which only 2 attained TF prevalence of <5%. Facial cleanliness and environmental improvement interventions are still warranted in districts where MDA has been stopped to reduce risk of trachoma transmission. In addition, depending on the prevalence of trachomatous trichiasis (TT), sustained trichiasis surgery services will be required.

¹⁰ DRC trachoma MDA targets are being updated in M&E workbooks.

Figure 4. Number of districts with TIS and Districts with TF prevalence < 5% in ENVISION-supported countries, FY12 to FY15



*In FY13, TIS done in 41 districts in Ethiopia of which only 2 had TF<5%

Population impacted by MDA

Table 10 shows the number of people impacted by trachoma MDA in ENVISION-supported countries. **By the end of FY15, a total of 45 million people lived in 118 districts that were no longer endemic for active trachoma following MDA.** Through conducting TIS, we anticipate that by the end of FY16, more than 61 million people will live in areas that will no longer need trachoma MDA. This represents nearly half (48%) of the total population living in what were trachoma endemic areas at the beginning of ENVISION.

Table 10 Success following implementation of trachoma MDA

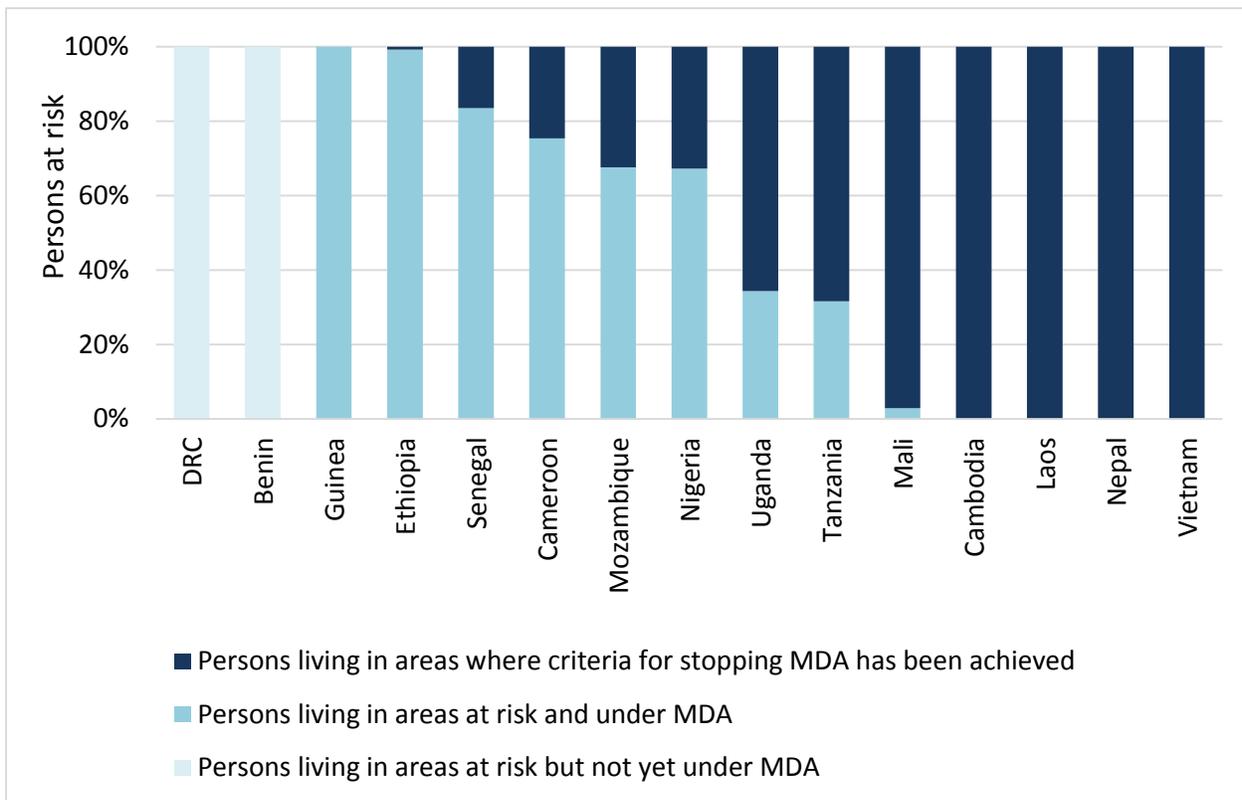
(TF now < 5%)

Country	# Persons no longer at-risk	% of total ever at-risk	# Persons no longer at-risk	% of total ever at-risk
	End FY15		End FY16 (projected)	
Benin				
Cambodia				
Cameroon	597,431	25%	2,221,368	92%
DRC				
Ethiopia	570,043	1%	10,901,807	15%
Guinea				
Laos				
Mali	14,498,214	97%	15,359,555	100%
Mozambique	1,442,292	32%	1,497,410	34%
Nepal	9,392,187	100%	9,599,613	100%
Nigeria	207,008	33%	207,008	33%
Senegal	630,236	17%	2,785,381	73%
Tanzania	9,298,131	68%	10,938,343	81%
Uganda	6,229,147	66%	9,928,893	100%
Vietnam	2,662,000	100%	2,662,000	100%
TOTAL	45,526,689	33%	66,101,378	48%

Scaling down MDA

Figure 5 shows the progress towards elimination of active trachoma in ENVISION-supported countries as of FY15. In FY16, a significant shift toward stopping MDA is projected in a number of countries. The population living in areas where MDA is no longer required is expected to increase by nearly 50% in FY16 (from 45 million to 66 million).

Figure 5. Progress toward trachoma elimination, as of March 2016



Preparing for validation of elimination

In FY16, ENVISION is continuing earlier support under END in Asia to aid countries in preparing for validation of elimination of trachoma through dossier development in Cambodia, Vietnam and Laos. A draft dossier comprising of a narrative section and spreadsheets has been developed by WHO in FY16. The initial steps will entail compiling and cleaning the data for entry into the dossier; filling in gaps; and, in some instances, confirming data with lower levels.

3. Onchocerciasis (OV)

Overview

More than 109 million people—or approximately 91% of the population at risk for OV in sub-Saharan Africa¹¹—are in ENVISION-supported countries (Table 11).

Country	# Currently endemic districts ¹²	# Non-endemic districts	# Districts where MDA ever was implemented	# Districts where criteria for stopping MDA achieved	# Persons still living in areas at risk	# Persons no longer at risk (living in areas where criteria for stopping MDA achieved)
Benin	51	26	51	0	5,936,430	0
Cameroon	111	70	111	0	9,594,851	0
DRC	262	258	256	0	35,718,860	0
Ethiopia	179	657	150	0	15,630,764	0
Guinea	24	14	24	0	4,388,654	0
Mali	18	43	20	2	5,371,243	726,845
Mozambique	0	160 ¹³	0	0	0	0
Nigeria	106	668	106	0	21,967,677	0
Senegal	8	68	8	0	382,446	0
Tanzania	23	143	23	0	5,538,509	0
Uganda	22	76	36	14	2,786,601	1,621,391
TOTAL	804	2,183	785	16	107,316,035	2,348,236

Data as of FY15 2nd SAR.

USAID's goal for OV is --where determined feasible by USAID-- elimination, and control elsewhere. This determination does influence ENVISION's approach for providing TA in an OV endemic country. Implicit in the concept of elimination are two key notions:

1. Hypo-endemic communities¹⁴ must be identified and treated if they are at risk. In African Programme for Onchocerciasis Control (APOC)'s former control paradigm, which focused on the

¹¹ Approximately 120 million people at risk in 2012.

¹² For the purposes of this table, endemicity is defined as meso- or hyper-endemic. However, for certain countries (Cameroon, DRC, Guinea, Mali, Senegal, and Tanzania), hypo-endemic districts are also included in the total, where these are known.

¹³ Includes hypo-endemic districts, some of which may require treatment.

¹⁴ Defined by APOC as <20% prevalence of palpable nodule carriers, as determined through a rapid epidemiological assessment (REA) sample of at least 50 adult men.

highest risk communities,¹⁵ hypo-endemic communities were classified as “non-urgent” and in certain cases were not mapped in detail.

2. That treatment coverage must reach a minimum of 80% of the eligible population, rather than the 65% criteria used in areas where the goal is control.¹⁶

Challenges in reaching OV elimination vary from one country to another, but may include high pre-control endemicity; the long lifespan of the adult *Onchocerca volvulus* worm and the difficulty in sustaining high treatment coverage; strong presence and long flight range of the *Simulium damnosum* vector; co-endemicity with *Loiasis*, which can make treatment with ivermectin (IVM) dangerous for the population; the proximity of endemic areas across borders; and/or conditions of conflict and/or instability that impede the necessary surveys or treatment.

WHO’s new guidelines for OV elimination, which focus on the phases from stopping treatment through to verification of elimination,¹⁷ do not specify how the hypo-endemic areas are to be mapped, or how to determine whether those areas require treatment.¹⁸ In spite of these gaps, the new guidelines offer an opportunity to refine both the strategies and the tools for OV elimination. In May 2016, the TFGH’s NTD Support Center (NTD-SC) will be holding a meeting to review available data on Ov-16 enzyme-linked immunosorbent assay (ELISA) and point-of-care rapid diagnostic tests (RDTs), with the goal of making recommendations to WHO with regards to the utilization of these two tests.

The new guidelines specify the need for polymerase chain reaction (PCR) based testing of the heads of wild-caught female black flies using parasite-specific DNA probes O-150 to detect whether flies are infected. Presently, three ENVISION-supported countries (Ethiopia, Nigeria, and Uganda) have laboratories, each supported by The Carter Center (TCC), that are equipped to conduct the necessary PCR testing of the flies. The other ENVISION-supported countries that have conducted entomological surveys (Mali, Senegal, and Tanzania) have relied on the Multi-Disease Surveillance Centre (MDSC) laboratory in Ouagadougou, Burkina Faso, for testing but the capacity of this laboratory to conduct OV-related entomology is uncertain following the closure of APOC in 2015. It is important to identify and/or build the capacity of other laboratories—either within specific supported countries or within the sub-region and available to several countries—that could perform this service.

To advise on specific strategies and programmatic decisions within each endemic country, the guidelines recommend the creation of a national oversight committee by the MOH. It is specified that “[t]he committee should be independent from the national programme and comprise national and international experts”; and that it “can be embedded in any existing national committee for neglected tropical disease activities or OV-specific matters.”¹⁹ Among ENVISION-supported countries, presently Ethiopia, Nigeria, Tanzania, and Uganda have established such committees, and DRC has a National OV Task Force that is operational and could serve as the necessary platform.

Table 12 presents details on progress toward milestones for OV.

¹⁵ APOC classified treatment as “urgent” in hyper-endemic communities (>39% of nodule carriers) and “desirable” in meso-endemic communities (20%–39% of nodule carriers).

¹⁶ This target is for WHO’s Africa Region; in the Americas Region, the goal is 85%.

¹⁷ WHO. (2016). *Guidelines for stopping mass drug administration and verifying elimination of human onchocerciasis: criteria and procedures*.

¹⁸ Strategies were proposed by WHO/APOC in *Report of the consultative meetings on Strategic Options and Alternative Treatment Strategies for Accelerating Onchocerciasis Elimination in Africa* (WHO/MG/15.20, Dec 2015) and in *Guidelines for revising ivermectin treatment boundaries within the context of onchocerciasis elimination* (WHO/MG/15.21, n.d.).

¹⁹ WHO. (2016). *Guidelines for stopping mass drug administration and verifying elimination of human onchocerciasis: criteria and procedures*. p. 22.

Table 12. Progress in achieving milestones for OV

Country	Mapping	MDA started	Under post-MDA, pre-verification surveillance	Year all districts are projected to meet criteria for stopping MDA – APOC projections						
				By 2015	2016	2017	2018	2019	2020	2021+
Mali	100%	100%	10%		X					
Benin	100%	100%	0%			X				
Guinea	100%	100%	0%			X				
Senegal	100%	100%	0%			X				
Uganda	100%	100%	39%					X		
Mozambique	100%	*	*					X		
Tanzania	100%	100%	0%					X		
Cameroon	100%	100%	0%						X	
Nigeria**	100%	100%	0%						X	
Ethiopia***	100%	84%	0%						X	
DRC***	100%	98%	0%							X

Data as of FY16 1st SAR. Data reflect the percentage of districts achieving each milestone.

* Hypo-endemic OV may be present in at least five provinces; only those districts that are co-endemic for LF have initiated treatment with IVM (the latter for the purpose of LF elimination).

** Reflects data in ten USAID-supported states.

*** Reflects data received by ENVISION to date; will be updated as data are received from non-USAID-supported areas.

Mapping

All 11 OV-endemic countries supported by ENVISION have completed mapping of meso- and hyper-endemic areas (see Table 13). Certain countries (Guinea, Mali, and Senegal, which were part of the Onchocerciasis Control Programme [OCP], for which mapping was standard practice) have also mapped their hypo-endemic areas, while others (DRC and Cameroon, for example), each of which have had specific support from APOC for this purpose) have done so in part.

With a view to achieving elimination, countries that have not yet fully identified their hypo-endemic areas and/or have not initiated treatment in those areas may need to conduct some form of “elimination mapping” to determine which, if any, additional areas require treatment. This “elimination mapping” could include determining the current status of areas previously defined as hypo-endemic; defining the hypo-endemic areas more clearly; and completing mapping in areas that were never mapped or that were missed through the original rapid epidemiological mapping of OV (REMO) on the assumption that transmission could not be sustained in those areas.

Following the closure of APOC, another WHO entity, the Expanded Special Project for Elimination of Neglected Tropical Diseases (ESPEN), will be supporting countries in developing and implementing their strategies for OV along with the four other PC-NTDs. Assessments to determine gaps and needs for support are underway in Benin, DRC, Ethiopia, Guinea, and Nigeria.

It is anticipated that Cameroon, DRC, Ethiopia, Mozambique, and Tanzania will complete the mapping of their hypo-endemic areas, much of which is underway and anticipated to be completed in 2016 with a variety of non-USAID funding. In general, plans for such “elimination mapping” will best be determined based on review of all available data from WHO/Africa Regional Office (AFRO) by national oversight committees, taking into account factors such as co-endemicity with LF or loiasis and the risk of transmission from neighboring areas.

Table 13. OV Hypo-endemic areas targeted for elimination mapping

Country	Hypo-endemic areas (as of Mar 2016)	
	Have been identified	Are targeted for “elimination mapping”
Benin	N/A	N/A
Cameroon	No	No
DRC	Ongoing	Yes
Ethiopia	Ongoing	Yes
Guinea	Yes	N – not required at this time
Mali	Yes	No
Mozambique	Yes	Yes – certain districts in Tete and Zambezia Regions, probably with WHO funding
Nigeria ²⁰	Yes	Requested by the FMOH – hypo-endemic delineation in Cross-River State ²¹
Senegal	Yes	No – not required at this time
Tanzania	No – seeking data from WHO/AFRO	Yes – recommended by National OV Expert Committee
Uganda	Yes	No

In **DRC**, mapping of loiasis with verification of the presence of OV was completed in five health zones of Equateur Province in calendar year 2016 with joint funding from APOC, World Vision, and ENVISION; the results should be available in the coming months. IVM treatment has not been initiated in these health zones, and the situation of loiasis is unknown. Because specific information on loiasis is also needed to be able to plan for elimination of LF, WHO AFRO has recommended that LF mapping be conducted in these same health zones.

In **Mozambique**, the MOH (MISAU) and the National Institute of Health (INS) are each aiming to conduct OV surveys, using up-to-date diagnostic tools, in calendar year 2016. These will be the country’s first OV-specific surveys since REMO in 2001 and 2007, which found that hypo-endemic OV may be present in at least five provinces (Cabo Delgado, Inhambane, Niassa, Tete, and Zambezia), with the highest risk areas likely to be across the borders from endemic foci in Malawi and Tanzania. Only those districts that are co-endemic for LF have initiated treatment with IVM.

In **Tanzania**, which may have been treating certain hypo-endemic areas via treatment for LF, it will be necessary to conduct further mapping to understand whether these areas will continue to need treatment for OV once they are eligible to stop LF treatment. This mapping is expected to take place in FY16 or FY17.

In **Uganda**, one hypo-endemic district that confirmed elimination of LF in FY15 will need to decide whether further OV-specific treatment is required; this may require an assessment. Not all hypo-endemic areas have been mapped, but in general these areas are included in post-treatment surveillance activities (supported by TCC), so they are being monitored.

²⁰ Concerns the nine USAID-supported states.

²¹ OV is supported by UNICEF in Cross-River State, in coordination with ENVISION activities.

MDA Coverage

In FY16, ENVISION plans to support MDA in 10 endemic countries (Table 14), principally in hyper- and meso-endemic areas, as well as in hypo-endemic areas where this was initiated previously. MDA will be conducted once a year, with the exception of Ethiopia, Nigeria, and Uganda, where ENVISION is continuing to support twice-yearly treatment.²²

Country	FY12		FY13		FY14		FY15	
	# endemic districts	% geo coverage						
Benin	0	.	51	100%	51	100%	51	100%
Cameroon	110	100%	111	100%	111	100%	111	100%
DRC	0	.	0	.	0	.	262	2%
Ethiopia	0	.	195	58%	197	54%	179	65%
Guinea	24	100%	24	83%	24	100%	24	25%
Mali	20	90%	20	90%	20	20%	18	94%
Mozambique	0	.	0	.	0	.	0	.
Nigeria	0	.	108	98%	106	100%	106	100%
Senegal	0	.	8	0%	8	0%	8	100%
Tanzania	21	95%	23	100%	23	0%	23	100%
Uganda	29	93%	27	100%	22	100%	22	100%

In general, within ENVISION-supported areas, most ENVISION-supported countries have achieved 100% geographic MDA coverage in hyper- and meso-endemic districts; Nigeria has done so within the ENVISION-supported states. As part of the former OCP, Guinea, Mali, and Senegal have also treated their hypo-endemic areas, most of them for longer than ten years. Cameroon is also treating some of its hypo-endemic areas. It is possible that both Mozambique and Tanzania may have conducted treatment in certain hypo-endemic districts, as part of treatment for LF. Gaps remain in Ethiopia, as well as in Mozambique, which has not begun specific treatment for OV. Table 15 presents strategies for OV MDA, implemented by MOHs. Explanations for low geographic coverage, and for how this is being addressed, are found in the individual country reports.

²² In Nigeria, the second round is funded by TCC with non-USAID funds.

²³ Districts are included in the numerator and denominator for geographic coverage if they treated in the same year as achieving criteria for stopping MDA. These districts are also classified as endemic in this table. The table includes treatment data through all funding sources within ENVISION countries, including non-USAID supported MDA. This represents the best information available.

Table 15. Strategies for OV MDA implemented by MOH, supported by ENVISION

Country	In hypo-endemic areas	Twice-annual
Benin	N/A	N
Cameroon	N	N
DRC	N	N
Ethiopia	Y	Y
Guinea	Y	N
Mali	Y	N
Mozambique	N	N
Nigeria	Y	Y
Senegal	Y	N
Tanzania	Y	N
Uganda	Y	Y

In certain supported countries (including Cameroon, DRC, and Nigeria), OV is co-endemic with *loiasis*, which, due to IVM drug side-effects, can impede treatment with IVM and in some cases necessitates alternate strategies (e.g., test-and-treat). Nigeria’s FMOH has identified a list of additional local government areas needing assessment for *loiasis*, for consideration by partners.

Evidence of Reduced Disease Burden

ENVISION has supported impact assessments for OV in six countries to date. The results of these assessments enabled Uganda to scale down, stopping MDA in 35 districts even as it intensifies treatment in other parts of the country in an effort to achieve elimination. Results of assessments conducted in Mali and Senegal are pending and will be considered in decisions as to whether treatment can be stopped in selected or all endemic districts. **To our knowledge, all required assessments are being conducted in areas supported by ENVISION; i.e., none can be deemed overdue.**

Senegal conducted an OV impact survey in Kédougou, Kolda, and Tambacounda regions in calendar years 2014–2015, collecting epidemiological samples and data in calendar year 2014 and entomological samples across the peak transmission season of both years. Blackflies collected as part of the first round of captures (jointly funded by ENVISION and APOC) were examined and tested with PCR for evidence of the *O. volvulus* parasite in the MDSC laboratory, showing no positives. The results from a second round of blackfly captures in calendar year 2015 (funded by APOC) should be available shortly. The epidemiological component of the survey in Kédougou Region (jointly funded by ENVISION and CDC with USAID funds), which also incorporated a LF co-endemicity survey, showed no skin-snip or immunochromatographic test (ICT) positives in two districts, while in the third district (Salémata), 0.7% (1/150) of participants were skin-snip positive and 3.4% (6/176) were ICT positive (village range: 1.9%–6.4%). LF prevalence in that third district remained above the threshold for LF treatment (antigenemia $\geq 1\%$), while across the three districts, Ov16 results suggested that OV transmission was still occurring in the last 10 years. The results from Kolda and Tambacounda regions (jointly funded by ENVISION and TFGH) are still being analyzed as statistical analyses are being completed by TFGH to determine what constitutes a positive or negative result for Ov-16 ELISA tests; the laboratory analysis of these tests was

completed in February 2016. It is expected that these critical cut-offs will be determined, and epidemiological survey results from the two regions will be released early in the next reporting period. The complete findings of the overall OV impact survey will allow for informed decision making about the next steps for OV elimination in Senegal.

Uganda is presently monitoring OV vectors with joint support from ENVISION and TCC (with non-USAID funding). This includes surveillance to determine infection and PCR test preparations to determine vector infectivity, with some districts implementing monthly entomological surveys. The latter include fly-catching and crab-trapping. Prevalence of onchocercal nodules and microfilaridemia, via skin-skips, are also monitored.

4. Schistosomiasis (SCH)

Overview

In ENVISION-supported countries, more than 250 million people live in areas endemic for SCH. ENVISION supports SCH MDA in Senegal, Uganda, Cameroon, Mali, Guinea, DRC, Benin, Indonesia, and Nigeria (see Table 16). Four of these countries (Tanzania, Ethiopia, DRC, and Nigeria) account for almost 70% of the SCH burden worldwide. MDA for SCH targets SAC primarily. Treatments with praziquantel (PZQ) have been extended to high risk adults (HRAs) in many countries where prevalence is over 50%.

Country	# Currently endemic districts	# Non-endemic districts	# Districts where MDA ever was implemented	# Persons still living in areas at risk
Benin	76	1	32	10,622,441
Cameroon	131	50	81	17,576,590
DRC	371	116	4	58,692,403
Ethiopia	325	322	90	36,148,794
Guinea	31	7	10	11,354,105
Indonesia	2	512	2	40,500
Mali	63	0	50	17,818,999
Mozambique	160	0	150	26,021,634
Nigeria	156	618	94	5,963,838
Senegal	60	16	58	9,441,161
Tanzania	166	0	135	47,302,959
Uganda	74	38	71	8,266,666
TOTAL	1,615	1,680	777	249,250,090

Data as of FY15 2nd SAR.

Schistosomiasis mekongi is endemic in one province in Laos and two provinces in Cambodia, with a goal of elimination as a public health problem in 2016. Elimination in this context does not mean stopping MDA, due to potential animal reservoirs such as dogs and buffalo. To help these countries find sustainable solutions for elimination of SCH, ENVISION has supported a consultant to work with WHO on a cross-border strategy for elimination which includes not only MDA, but animal surveillance and WASH activities. The Philippines, which is endemic for *S. japonicum*, has developed a comprehensive strategic plan which includes snail surveillance and animal control. In order to improve MDA coverage in the Philippines (not supported by ENVISION), the Department of Health is piloting an approach which adds SCH treatment to STH national school deworming days.

USAID’s goal for SCH is to build capacity for sustained control. ENVISION supports national programs to complete mapping to identify treatment needs and implement MDA with PZQ. In most countries, PZQ is co-implemented with other drug packages and can be co-administered with albendazole (ALB) or mebendazole (MEB) for STH in co-endemic districts. ENVISION purchases PZQ for countries where the PZQ donation is not available.

ENVISION staff provide TA to countries to support their planning for SCH programmatic issues, including frequency of treatment and implementation of sentinel sites surveys and impact assessments in line with WHO guidelines. ENVISION also encourages collaboration and synergies with water, sanitation, and hygiene (WASH) projects.

Mapping

Mapping for SCH is complete for most ENVISION-supported countries. In collaboration with partners (NTD-SC and WHO/AFRO), ENVISION has supported the mapping of SCH along with LF and *Loa loa* in remaining districts in DRC in FY15

MDA Coverage

Although progress is being made, efforts are still needed to assist SCH programs to reach 100% geographic coverage. See Tables 17 and 18.

Table 17. Progress in achieving milestones for SCH

Country	Mapping	MDA started
Cambodia	100%	100%
Indonesia	100%	100%
Laos	100%	100%
Philippines	100%	100%
Uganda*	100%	96%
Mozambique	100%	94%
Senegal	100%	97%
Tanzania*	100%	81%
Mali*	100%	79%
Cameroon*	100%	62%
Guinea	100%	32%
Nigeria**	100%	60%
Benin	100%	42%
Ethiopia***	76%	28%
DRC***	94%	1%

Data as of FY16 1st SAR. Data reflect the percentage of districts achieving each milestone.

*Not at 100% geographic coverage in areas of low endemicity

** Reflect data in 10 USAID-supported states

***Reflect data received by ENVISION to date. Data will continue to be updated as additional information is received from non-USAID supported areas.

Table 18. SCH MDA geographic coverage, ENVISION-supported countries FY12–FY15

Country	FY12		FY13		FY14		FY15	
	# endemic districts	% geo coverage						
Benin			8	100%	38	45%	76	21%
Cambodia	2	100%	2	100%	2	100%	2	0%
Cameroon	135	57%	132	28%	132	59%	131	60%
DRC							371	1%
Ethiopia			49	0%	299	0%	325	27%
Guinea	21	38%	29	0%	34	0%	31	0%
Indonesia	2	100%	2	100%	2	0%	2	0%
Laos	1	100%	1	0%	1	100%	1	100%
Mali	59	34%	59	53%	59	17%	63	57%
Mozambique			160	28%	160	83%	160	27%
Nigeria*			157	32%	158	36%	156	42%
Philippines	28	100%	28	100%	28	100%	28	100%
Senegal			57	89%	56	95%	60	97%
Tanzania	149	38%	166	42%	166	8%	166	74%
Uganda	74	50%	78	46%	80	89%	74	49%

Districts are included in the numerator and denominator for geographic coverage if they treated in the same year as achieving criteria for stopping MDA. These districts are also classified as endemic in this table.

Includes treatment data through all funding sources within ENVISION countries including non-USAID supported MDAs. This represents the best information available.

Including 3 SE Asia countries that were previously supported through END in Asia; data have been triangulated and compiled through the END in Asia workbooks, RPRG presentations, for FY12-FY15.

*Only in USAID-supported states

Ethiopia, Nigeria, and Tanzania have made remarkable progress in terms of scaling-up SCH MDA with support from ENVISION. DRC has successfully launched SCH MDA in ENVISION-supported health zones, and Mali and Senegal have increased coverage reaching more people for SCH MDA in moderate and high-prevalence areas. Benin and Ethiopia will continue scaling up SCH MDA in FY16. Many countries, however, are unable to achieve 100% geographic coverage due to the impracticality of operationalizing the WHO recommendation to treat SAC twice during their primary schooling age (e.g., once on entry and once on exit) in districts with low SCH prevalence (<10%). Also, it is not always feasible to provide PZQ for routine treatment in health facilities for suspected cases as per WHO recommendation for low SCH-endemic areas.

More than 14 million people, including almost 7 million SAC, were treated for SCH in FY15 in areas supported by ENVISION (See Appendix 2). SCH program coverage has increased in almost all the endemic districts due to intensified social mobilization and improvement of drug delivery to reach most of the SAC. In addition, critical analysis of data and better management, reporting, and transmission of data following the MDA have contributed to increasing the number of districts and persons treated in Benin, Senegal, Mali, Cameroon, and Tanzania. These activities are discussed in more detail in the country reports and in the MDA section of this report.

Evidence of SCH Control

ENVISION is working with national SCH control programs to implement sentinel site surveys and impact studies (including the use of circulating cathodic antigen [CCA] as appropriate). The results of these surveys inform programmatic decisions regarding the frequency of treatment, while also providing evidence of reduced SCH prevalence and all that means for improved community health and child development.

DRC, Mali, Tanzania, and Uganda have all found evidence of reduced SCH prevalence and are now able to reduce the frequency of MDA conducted in qualifying districts.

The following are important lessons for SCH programming going forward:

1. A comprehensive assessment of the status of SCH following years of program implementation is necessary for refining SCH MDA strategy.
2. Sentinel-site survey data provide key information about the impact of the control measures but also help in the identification of hotspots.
3. Proper management of drugs at the peripheral levels, including inventory of leftover and unused drugs, are key elements for micro-planning of SCH MDA.
4. Countries should take census of the SCH-targeted populations prior to MDA to better account for the quantity of PZQ.
5. Countries should assess their school-based distribution platform to identify opportunities for reaching non-enrolled SAC.
6. Social mobilization strategies; information, education, and communication (IEC); and health messaging should be strengthened to include HRAs as targets for SCH MDA, especially when community-based platforms are used for MDA implementation.

ENVISION is providing assistance to assess MDA delivery platforms and to critically compare the school- and the community-based platforms for SCH and STH implementation. It is anticipated that the advantage of one platform over the other will be country- and context-specific.

5. Soil-transmitted Helminthiasis (STH)

Overview

All 19 countries supported by ENVISION in FY16 are endemic for STH (Table 19); the current status of STH is summarized in Table 20. There are 2,459 districts considered endemic for STH (>20% at baseline), with a population of 139 million SAC at risk of being infected with STH who required either annual or biannual treatment at the start of 2015. The total number of SAC at risk will likely increase because DRC and Ethiopia still require STH baseline prevalence mapping in several districts. In certain countries, national policy for controlling STH as part of the integrated control/elimination of NTDs extends treatments to SAC living in districts that are <20% STH at baseline.

Country	# Endemic districts	# Non-endemic districts	# Districts requiring mapping	# Persons at risk	# SAC at risk
Benin	45	32	58	5,681,660	1,590,865
Cambodia*	24	0	24	13,980,911	4,194,273
Cameroon	78	103	181	7,735,512	2,065,382
DRC	279	208	6	42,514,336	14,834,111
Ethiopia	438	209	444	54,416,684	14,552,492
Guinea	17	21	19	5,071,372	1,267,843
Haiti	140	0	139	11,531,728	2,882,932
Indonesia	514	0	212	255,461,689	39,596,562
Laos*	17	0	17	6,129,765	1,435,158
Mali	63	0	61	18,343,000	5,136,040
Mozambique	152	8	144	25,738,595	7,206,807
Nepal	75	0	75	27,723,373	7,657,196
Nigeria	120	654	146	25,564,373	7,226,917
Philippines*	80	0	80	29,472,894	.
Senegal	76	0	76	14,784,831	4,262,467
Tanzania	166	0	136	48,634,115	9,361,381
Uganda	112	0	62	37,092,213	11,754,522
Vietnam*	63	0	42	90,729,400	4,580,664
TOTAL	2,459	1,235	1,922	720,606,452	139,605,611

Data as of FY15 2nd SAR.

* Cambodia, Laos, the Philippines, and Vietnam all use province instead of district.

The USAID goal for STH under the ENVISION project has been to achieve “control in the context of an integrated NTD program,” with the objective of reducing morbidity (anemia and stunting) associated with moderate to high infections of *Ascaris lumbricoides* (roundworm), *Trichuris trichiura* (whipworm), and hookworms by treating at least 75-100% of all at-risk SAC during MDA. Although this objective is consistent with WHO recommendations, given the changing dynamics of disease prevalence and the increased number of districts transitioning from integrated MDA platforms to SCH and/or STH only

platforms, as well as the desire of countries that successfully achieve STH control to transition to the aspirational goal of achieving STH elimination (<1% moderate to heavy infection), the STH data presented under the ENVISION project will require greater specificity. The natural conclusion of LF programs that pass TAS and stop MDA presents a growing challenge to maintaining STH treatments among at-risk populations, including pre-school-age children (pre-SAC), SAC, and women of childbearing age (WCBA) according to WHO guidelines.^{24, 25} It will be important for the STH community, in the future post-integration phase, to examine the three STH as separate diseases and gather more information to inform national program transitions, as well as advocate for clarity on the WHO goals and USAID's (and thus ENVISION's) focus within these.

Mapping

As indicated in Table 20, while the majority of countries have completed STH baseline mapping, DRC and Ethiopia still have several districts that need to be mapped for STH. In DRC, plans need to be developed to map STH in 33 districts. In Ethiopia, plans for STH mapping have been developed by the FMOH in refugee camps in areas of Gambella and Beneshangul-Gumuz.

Table 20. Progress in achieving milestones for STH

Country	Mapping	MDA started
Bangladesh	100%	100%
Benin	100%	100%
Cambodia	100%	100%
Cameroon	100%	100%
Guinea	100%	100%
Haiti	100%	100%
Laos	100%	100%
Mali	100%	100%
Mozambique	100%	100%
Nepal	100%	100%
Philippines	100%	100%
Senegal	100%	100%
Uganda	100%	100%
Nigeria*	100%	92%
Tanzania	100%	82%
Vietnam	100%	68%
Indonesia	100%	41%
Ethiopia**	76%	69%
DRC**	94%	2%

²⁴ *Eliminating soil-transmitted helminthiasis as a public health problem in children: Progress report 2001–2010 and strategic plan 2011–2020.* http://whqlibdoc.who.int/publications/2012/9789241503129_eng.pdf?ua=1

²⁵ WHA54.19 *Schistosomiasis and soil-transmitted helminth infections.* http://www.who.int/neglected_diseases/mediacentre/WHA_54.19_Eng.pdf

Data as of FY16 1st SAR. Data reflect the percentage of districts achieving each milestone.

* Reflect data in 10 USAID-supported states

** Reflect data received by ENVISION to date. Data will continue to be updated as additional information is received from non-USAID supported areas.

MDA Coverage

In terms of MDA geographic coverage, the large majority of ENVISION-supported countries have also initiated MDA in districts with STH prevalence >20%. DRC, Ethiopia, Indonesia, Nigeria, Tanzania, and Vietnam are still working to achieve 100% geographic scale.

ENVISION support for integrated NTD control has facilitated the distribution of a single round of STH treatment (ALB or MEB) in 650 districts, typically through co-administration with IVM, diethylcarbamazine (DEC), and/or PZQ. In districts where prevalence of STH is $\geq 50\%$, government-supported school health programs or other non-governmental organization (NGO) initiatives are expected to support at least one round of the biannual treatment strategy. In FY15, ENVISION supported a second round in 229 districts in Cameroon, Haiti, Nigeria, and Tanzania. Compared to SCH coverage rates, which are primarily school-based, STH treatment coverage is slightly higher because many treatments are distributed as part of the LF drug package, which is community based and therefore more likely to reach children not attending school. In other districts, STH coverage may be higher than LF coverage among SAC because of refusal by children to take IVM or DEC.

ENVISION countries in Southeast Asia, including Bangladesh, Cambodia, Laos, the Philippines, and Vietnam, have all established STH MDA programs for pre-SAC and SAC, independent of other NTD MDA platforms. For SAC, these platforms are annual or biannual school deworming days, which have been effective at maintaining high program coverage. For pre-SAC, these platforms are community based, working with local kindergartens and health clinics, and traveling to households when necessary to provide treatment. Government funding for these activities, however, is often in danger of being reduced, and longer term solutions need to be found. The Southeast Asia countries are transitioning to a focus on upscaling WASH activities to maintain gains from MDA and move toward breaking the cycle of transmission.

Table 21. Progress in reaching milestones for STH – >75% coverage of at-risk SAC (ENVISION)

Countries	FY12		FY13		FY14		FY15		FY16
	Sum of # SAC treated (USAID)	% of targeted SAC treated (USAID)	Sum of # SAC treated (USAID)	% of targeted SAC treated (USAID)	Sum of # SAC treated (USAID)	% of targeted SAC treated (USAID)	Sum of # SAC treated (USAID)	% of targeted SAC treated (USAID)	Sum of SAC targeted for MDA (USAID)
Indonesia	1,413,134	99.1%	2,425,385	88.8%	2,444,582	86.6%	3,379,612	90.0%	2,458,649
Tanzania	4,228,916	62.4%	4,109,027	67.1%	2,443,709	80.9%	3,634,533	89.3%	6,238,989
Uganda	2,937,797	73.3%	3,365,974	91.8%	3,818,289	80.0%	3,242,444	76.4%	2,174,520
Nepal	3,711,847	67.7%	4,451,296	79.3%	3,019,859	74.1%	1,421,829	69.2%	1,690,495
Cameroon	4,822,579	89.0%	5,420,119	94.8%	5,947,072	80.0%	6,167,851	88.2%	6,110,506
Haiti	1,212,093	89.2%	1,249,676	91.1%	1,289,819	87.4%	896,050	108.5%	1,249,361
Guinea	691,654	91.2%	-	0.0%	222,148	15.2%	218,958	81.4%	759,262
Nigeria			696,878	91.3%	5,024,781	65.3%	6,996,156	86.5%	10,044,333
Senegal			2,652,558	87.4%	3,741,556	92.2%	3,913,204	94.40%	3,257,070
Benin			126,555	55.9%	449,991	61.8%	1,108,147	67.6%	2,274,381
Mali	-		-		372,882	66.6%	4,412,581	184.4%	-
Ethiopia			-		-		90,301	71.5%	103,961
DRC							197,958	89.8%	220,360
Mozambique			-		-		-		-
Total	19,018,020	75.4%	24,497,468	81.4%	28,774,688	75.5%	35,679,623	91.9%	36,581,886

Overall, the ENVISION project has improved program coverage of STH among targeted SAC from 75.4% in FY12 to 91.9% in FY15 (objective >75% coverage of SAC; see Table 21). During the same period the percentage of countries that achieved at least 75% coverage increased from 57% in FY12 to 77% in 2015. All but two ENVISION-supported countries (Ethiopia and Benin) have achieved at least 75% coverage of SAC in ENVISION-supported districts in a single year between 2012 and 2015. During this same period, ENVISION has supported a greater percentage of the total at-risk SAC within certain countries; on average, ENVISION supports approximately one-quarter of the total estimate of at-risk SAC. In Cameroon, Nigeria (TCC-supported states), Senegal, and Mali, ENVISION supports more than 80% of the at-risk SAC population. In other ENVISION countries, STH MDA supported by ENVISION contributed to less than 40% of the total at-risk SAC.

The largest increase in the number of SAC treated for STH between FY14 and FY15 was observed in Tanzania (49%), Nigeria (38%), and Indonesia (38%). In Tanzania this increase might be a result of the MOH creating a taskforce to review available SAC demographic data, increased focus on data collection during trainings, and targeted supportive supervision during school MDAs. In Nigeria, the increase in treatment is related to the expansion of STH treatments to additional SCH- and OV-targeted areas. In Indonesia, improved geographic and program coverage for LF has resulted in an increased number of SAC being reached with ALB.

Among the districts classified as currently endemic (which does not include districts that achieved stop MDA criteria the same year they treated), only 548 (24%) were supported by ENVISION. Another 624 (27%) were treated with any funding. Non-ENVISION-supported areas do not always report deworming

activities to the MOH, let alone ENVISION, so it is not always clear whether the remaining endemic districts received a round of ALB or MEB. This includes districts supported by school health programs that might not systematically report treatment figures to the national NTD control program. In FY15, several countries claimed treatment for STH in districts with <20% STH per government policy to treat all districts for STH, including: Benin (12 districts), Cameroon (103 districts), Ethiopia (23 districts), and Mozambique (1 district). In FY16, of the 2,275 districts estimated to have STH prevalence >20% in ENVISION countries, 1,816 (80%) of those districts are expected to be targeted with all funding (from ENVISION and other sources).

A major challenge to STH control is the lack of donated drugs for pre-SAC or HRAs, particularly WCBA. Additionally, the lack of coordination in reporting treatments outside of the national NTD control programs makes it difficult for countries to truly assess coverage and progress toward achieving ≥75% in pre-SAC, SAC, or WCBA. Attempts by the Global NGO Deworming Inventory²⁶ (www.deworminginventory.org) to ensure that NGO-administered deworming treatments are accurately reflected in the WHO-managed PC databank will hopefully clarify some of the coverage gaps, but improving coordination among implementing partners and government agencies is still required in all countries.

Evidence of STH Control

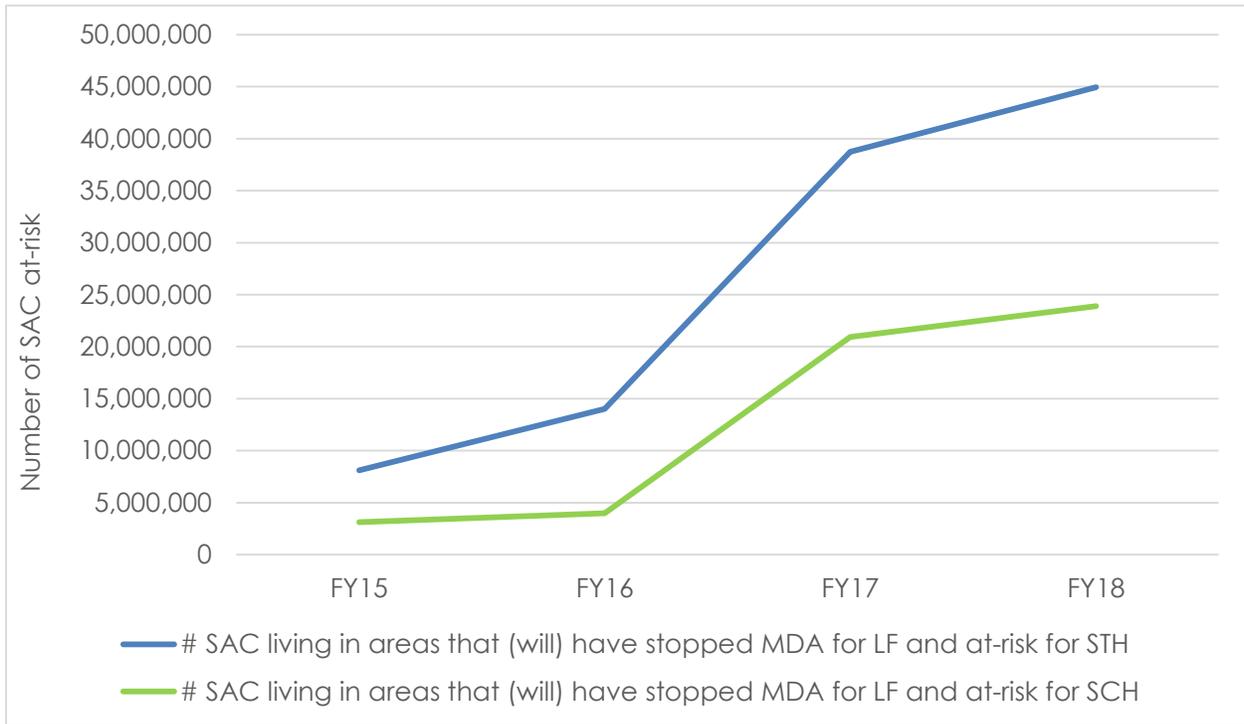
ENVISION monitors evidence of reduced disease burden for STH resulting from MDA implementation through the use of sentinel-site surveys. To date, among 789 districts that had STH baseline prevalence >20% and where subsequent sentinel site data is available, results show that at least 17.5% of these districts have succeeded in reducing prevalence to <20%. Accordingly, these districts can and should re-evaluate the frequency at which deworming drugs are provided if no longer covered by LF MDA.

STH transition as LF programs close

As LF programs successfully meet the criteria for stopping MDA, the gap in providing STH treatments will have to be filled by other donors or covered by domestic financing - otherwise the number of at-risk children not receiving treatment is likely to increase (Figure 6). Some positive examples of national programs managing this include Nepal, where the MOH has taken on the support of all STH treatments in areas where LF MDA has stopped, and Haiti, where the Inter-American Development Bank has done the same. These new models still need to carefully monitor activities and coordinate between partners and government agencies to ensure that key indicators are reported on (coverage of pre-SAC, SAC, and WCBA) and more nuanced data (disease intensity by species and age group) are collected to inform potential changes in the STH control strategy.

²⁶ The Global NGO Deworming Inventory is a collaborative effort of the World Health Organization, the STH Coalition, and the Global Schistosomiasis Alliance, in partnership with Children Without Worms (CWW).

Figure 6. Number of at-risk SAC living in areas that plan to stop MDA for LF



Further analysis of the ENVISION database shows that among the 237 districts that have passed TAS by FY15 and are recommended for stopping MDA, the large majority (206) still have > 20% STH prevalence. Among these 206 districts, 42 are endemic for OV and could maintain community-based treatment for STH by adding ALB or MEB (4 of these districts also have SCH platforms in schools and trachoma platforms in communities); 40 are endemic for SCH but not OV (5 of these districts have trachoma platforms in communities); and 9 are only endemic for trachoma and could maintain community-based treatment for STH.

This means that 115 districts will not have any MDA platform to support STH MDA post-LF MDA, unless covered by an alternative platform (e.g., school health, immunizations). These districts are primarily in Haiti, Indonesia, Tanzania, and Nepal. Note, the number of districts in this category is expected to increase in subsequent years as more districts pass TAS1.

PROJECT MANAGEMENT

1. ENVISION Partnership

ENVISION Partner Coordination

RTI International leads ENVISION in partnership with CBM International, TCC, Fred Hollows Foundation (FHF), Helen Keller International (HKI), IMA World Health (IMA), Light for the World (LFTW), Sightsavers, and World Vision (WV). ENVISION’s partner support by country is provided in Table 22. Activities in many ENVISION-supported countries are implemented by a consortium of ENVISION partners (e.g., in DRC, Ethiopia, Nigeria, and Uganda), and regular partner coordination is crucial to ensuring programmatic success.

Quarterly partner call. RTI led a quarterly conference call in October 2015 that included representation from most ENVISION partners. During the call, ENVISION discussed key themes of the project extension, the timeline for the semiannual report (SAR), the status of FY16 work plans, Africa Regional Office (AFRO) Regional Program Review Group (RPRG) issues, and partner updates. Due to the ENVISION Partners Meeting in January 2016, no call was scheduled for the second quarter.

Annual ENVISION Partners’ Meeting, January 2016. Representatives from USAID, RTI, and all project partners attended a day-long meeting held in Washington, DC. The meeting served as a platform to provide updates from USAID and RTI, facilitate discussion among the group on important technical focus areas of the project, and report progress toward WHO 2020 goals. The following were also discussed: global guidelines and recent or pending changes; how to best ensure quality programming and shift from integrated programs to long-term control; capacity strengthening, compliance, and drug and diagnostics procurement updates; and project contributions to the global NTD landscape.

Country	ENVISION partner
Benin	RTI
Cameroon	HKI
Guinea	HKI
DRC	RTI, IMA, CBM, and WV
Ethiopia	RTI, LFTW, and FHF
Haiti	IMA
Indonesia	RTI
Mali	HKI
Mozambique	RTI and LFTW
Nepal	RTI
Nigeria	RTI and TCC
Philippines	RTI
Senegal	RTI
Tanzania	IMA
Uganda	RTI and TCC

Staffing

The ENVISION project currently includes 306 full-time equivalent staff (FTE): 43 FTE are located in headquarter (HQ) offices (RTI and partners), and 263 are located in the field in 15 countries. **Appendix 2** presents an updated organization chart of the ENVISION home office that reflects the most recent changes in structure.

The Project Director, Lisa Rotondo provides strategic direction for and overall leadership of the project and serves as the primary liaison with Rob Henry, the Agreement Officer’s Representative (AOR) and USAID NTD team. ENVISION’s senior leadership is complemented by Deputy Director Amy Doherty, Chief

Technical Advisor Eric Ottesen, and --as RTI's corporate representative-- the Global Health Division (GHD) Vice President Richard Reithinger.

The ENVISION senior leadership team—the Project Director, Deputy Director, Chief Technical Advisor, and GHD Vice President—meet biweekly to ensure transparent communication; discuss relevant technical and operational issues; identify potential problems; propose solutions; and review issues to be discussed with USAID and the ENVISION NTD management team, which comprises project leadership and six Senior Managers.

Four Senior Managers – Molly Brady, Katie Crowley, Phil Downs and Achille Kabore - provide expert technical guidance and management oversight for their portfolio countries, liaise with the other ENVISION functional teams to provide coordinated support to national NTD programs, and engage in and lead global leadership activities. They support project leadership, serve as subject matter experts, mentor staff, and provide TA. The country teams, led by an in-country Resident Program Advisor (RPA) in collaboration with a home office NTD Advisor, are guided by the Senior Managers. The procurement of drugs and diagnostics is managed by one of the Senior Managers, with assistance from a Project Associate and the RTI Procurement business partner.

Senior Operations and Grants Manager Margaret Davide-Smith leads a team of award managers responsible for sub-award management, budget administration, operations, and logistics support to assigned country programs and provides regulatory, project administration, and organizational guidance as well as capacity development across ENVISION. The Senior Operations and Grants Manager provides standardized guidance, training, and oversight for the issuance of fixed obligation grants (FOGs) to government entities. Additionally, project coordination, administrative assistance, and procurement and logistics support is provided by two Project Associates – Dano Gunderson and Shea Flynn. Finally, Financial Analyst, Beth Millikan assumes the role of monitoring the project's financial performance and providing overall budget management and analysis.

The Knowledge Management (KM) team, led by the Senior Manager KM, Maggie Baker, supports global activities, publications, and coverage analyses and oversees project M&E, communications, and capacity strengthening. The three KM functional areas responsible for capturing, distributing, and effectively using knowledge are administered by a Communications Manager, Jennifer Leopold, with support from a Communications Specialist, Laura Cane; the Senior M&E Specialist, Katie Zoerhoff, with support from Data Manager, Maureen Kelly and the country M&E focal points listed in Table 2; and Training Specialist, Kaleigh Robinson.

ENVISION's programmatic activities at the country level are supported by a US-based country team comprising technical, operations, and M&E focal points (Table 23).

Table 23. ENVISION project focal points by country

Country	Technical Focal Point	Operations Focal Point	M&E Focal Point
Bangladesh	Josh Sidwell	Josh Sidwell	Kalpana Bhandari
Benin	Jean Jacques Tougoue	Cheri Brown	Hannah Frawley
Cambodia	Josh Sidwell	Josh Sidwell	Kalpana Bhandari
Cameroon	Jean Jacques Tougoue	Erika Walker	Brian Fuller
DRC	Jean Jacques Tougoue	Josh Sidwell	Brian Fuller
Ethiopia	Scott McPherson	Julie Abella	Hannah Frawley
Guinea	Abdel Direny	Erika Walker	Brian Fuller
Haiti	Abdel Direny	Cheri Brown	Kalpana Bhandari
Indonesia	Molly Brady	Ruth Yohannes	Kalpana Bhandari
Laos	Josh Sidwell	Josh Sidwell	Kalpana Bhandari
Mali	Abdel Direny	Erika Walker	Brian Fuller
Mozambique	Daniel Cohn	Ruth Yohannes	Hannah Frawley
Nepal	Delali Bonuedi	Julie Abella	Kalpana Bhandari
Nigeria	Alexis Serna	Erika Walker	Kalpana Bhandari
Philippines	Josh Sidwell	Josh Sidwell	Kalpana Bhandari
Senegal	Daniel Cohn	John Shutt	Brian Fuller
Tanzania	Delali Bonuedi	Cheri Brown	Hannah Frawley
Uganda	Alexis Serna	John Shutt	Hannah Frawley
Vietnam	Josh Sidwell	Josh Sidwell	Kalpana Bhandari

ENVISION staff also serve as global NTD leaders and engage regularly with WHO bodies and offices and other NTD stakeholders by participating in multiple WHO NTD working groups, other technical and advocacy groups, and global NTD meetings (detailed in the FY16 work plan). ENVISION coordinated with DFID-funded NTD partners, including the Filariasis Programmes Support Unit (FPSU; formerly Centre for Neglected Tropical Diseases), Liverpool School of Tropical Medicine; Schistosomiasis Control Initiative (SCI); and Sightsavers, by taking advantage of existing global-level NTD gatherings, such as the Annual Meeting of the American Society for Tropical Medicine and Hygiene (ASTMH) and the NTD Non-governmental Development Organization (NGDO) Network (NNN) meetings, to engage in side meetings to discuss NTD matters of country-specific and global importance. ENVISION staff participated in regular meetings of the major drug donation review bodies, including the TEC and Mectizan® Expert Committee; facilitated coordination of the medicines and funding for NTD programming; and ensured alignment of long-term drug forecasting with country-level programming plans, targeting 2020 elimination goals and USAID donation objectives. As part of our global leadership and advocacy, ENVISION staff engaged and coordinated with NTD stakeholders and funders, including the End Neglected Tropical Diseases (END) Fund, Geneva Global, Queen Elizabeth Diamond Jubilee Trust, TOMS, the Global Network for Neglected Tropical Diseases (GNNTD), and the Bill and Melinda Gates Foundation (BMGF), to plan for and maximize available resources to benefit country programs. This interaction and coordination encompassed technical (e.g., DSAs), operational (e.g., MDA and drug procurement), resource allocation, and advocacy activities.

ENVISION–USAID Partnership

ENVISION management maintains continuous communication with USAID on all matters affecting the project and implementation.

Biweekly meetings with USAID. RTI hosted biweekly meetings with the USAID NTD team to discuss issues related to disease-specific updates, project implementation, and strategy. ENVISION management, in collaboration with USAID, developed meeting agendas and minutes. An action item tracker was maintained and routinely reviewed to help the team monitor pending actions and address them in a timely manner. In addition, a calendar of upcoming global, technical, and country-level meetings was kept up-to-date to determine participation and ensure pre-meeting planning was coordinated.

USAID Annual Partners' Meeting. RTI's ENVISION staff participated in a USAID-led meeting in Washington, DC, in December 2015 to discuss USAID's portfolio and share best practices and accomplishments with USAID, WHO, CDC, and USAID NTD implementing partners.

Biweekly ENVISION country and procurement updates. RTI moved from biweekly country and procurement updates to monthly reports and submitted them to the USAID team to keep them informed about accomplished and future activities in each of the ENVISION countries.

Coordination with in-country visits. RTI's ENVISION staff informed USAID about planned visits to countries and important in-country events so that trips were coordinated and the opportunity for collaboration with national programs was maximized. ENVISION assisted with in-country coordination for Pfizer visits to Uganda and Ethiopia to maintain the high visibility of drug donors that is critical to the success of national NTD programs.

Coordination with USAID missions. ENVISION HQ and field-based staff coordinated and engaged with USAID country missions in all ENVISION-supported countries. The level of engagement varied from country to country, but included regular programmatic updates, participation in mission health team meetings and briefings, and mission participation in field-based NTD events, as schedules permitted.

Coordination with other USAID NTD Projects. To strengthen the overall USAID NTD portfolio and coordinate project efforts, RTI and ENVISION partners liaised regularly with other USAID and UK Department for International Development (DFID) partners. This applied particularly to the END in Africa project managed by FHI 360, the Coalition for Operational Research on NTDs project managed by the TFGH NTD-SC, and the Morbidity Management and Disability Prevention (MMDP) project managed by HKI (on which RTI is a sub-partner). ENVISION staff maintained regular communication with FHI 360 regarding the dissemination of materials for NTD best practices, M&E technical support needs, and long-term supply chain planning, among other topics. RTI also worked closely with Management Sciences for Health (MSH)'s USAID-supported Systems for Improved Access to Pharmaceuticals and Services (SIAPS) project. ENVISION staff collaborated with MSH to complete a supply chain assessment in Senegal and facilitate and attend supply chain workshops in Nigeria and Ethiopia. RTI worked with WHO, Sightsavers, and other trachoma stakeholders to establish the Tropical Data (TD) collaborative, to modify the TD system and training materials and begin planning the pilot TD initiative in Senegal, Nigeria, and Uganda, as well as continued trachoma activities with the DFID-funded GTMP, which closed out in April 2016.

Supporting USAID staff with agency reporting. RTI's ENVISION team provided ongoing TA as requested by the USAID NTD Team for the agency's various reporting requirements, including portfolio review and other agency reports, such as Global Health Initiative projections.

USAID special requests. ENVISION responded to USAID’s special requests as needed. These included data and analysis from USAID’s NTD Database, technical guidance for countries outside the ENVISION portfolio, input on USAID NTD portfolio strategic direction, queries about NTD drug and diagnostic procurement activities, and insight into funding and support trends in the community. ENVISION’s operations team also responded to routine and special requests from USAID to conduct specific financial analyses, forecasts, and accruals and baseline reports.

Coordination with USAID Communications. ENVISION’s communications team began developing joint project communications and promoting the USAID 10-year NTD celebration to deliver messages about project achievements and success stories through USAID dissemination channels, such as the USAID NTD Program website and other online communications platforms.

Project reporting. In accordance with the ENVISION Cooperative Agreement, RTI submitted financial reports in compliance with 22 CFR 226.52. The Standard Form (SF) 425 for PY4 Q4 and PY5 Q1 was submitted on time via electronic format to the U.S. Department of Health and Human Services. An electronic copy and hardcopies of the form were also submitted to the Agreement Officer (AO) and the AOR simultaneously.

Semiannual reports (SARs). An annual performance monitoring report was submitted to the AOR on November 15, 2015. It described the accomplishments for the reporting period, any significant obstacles prohibiting the completion of planned activities, planned activities for the next reporting period, and other pertinent information concerning ENVISION’s activities.

USAID’s Development Experience Clearinghouse. RTI sent the SAR and publications to the USAID AOR in addition to posting them on the Development Experience Clearinghouse, USAID’s online resource for USAID-funded technical and program documentation.

Project work planning for FY17. ENVISION began collaborating with the USAID NTD Team to discuss modifications to the work plan narrative and templates as well as scheduling and coordination of visits for country work planning.

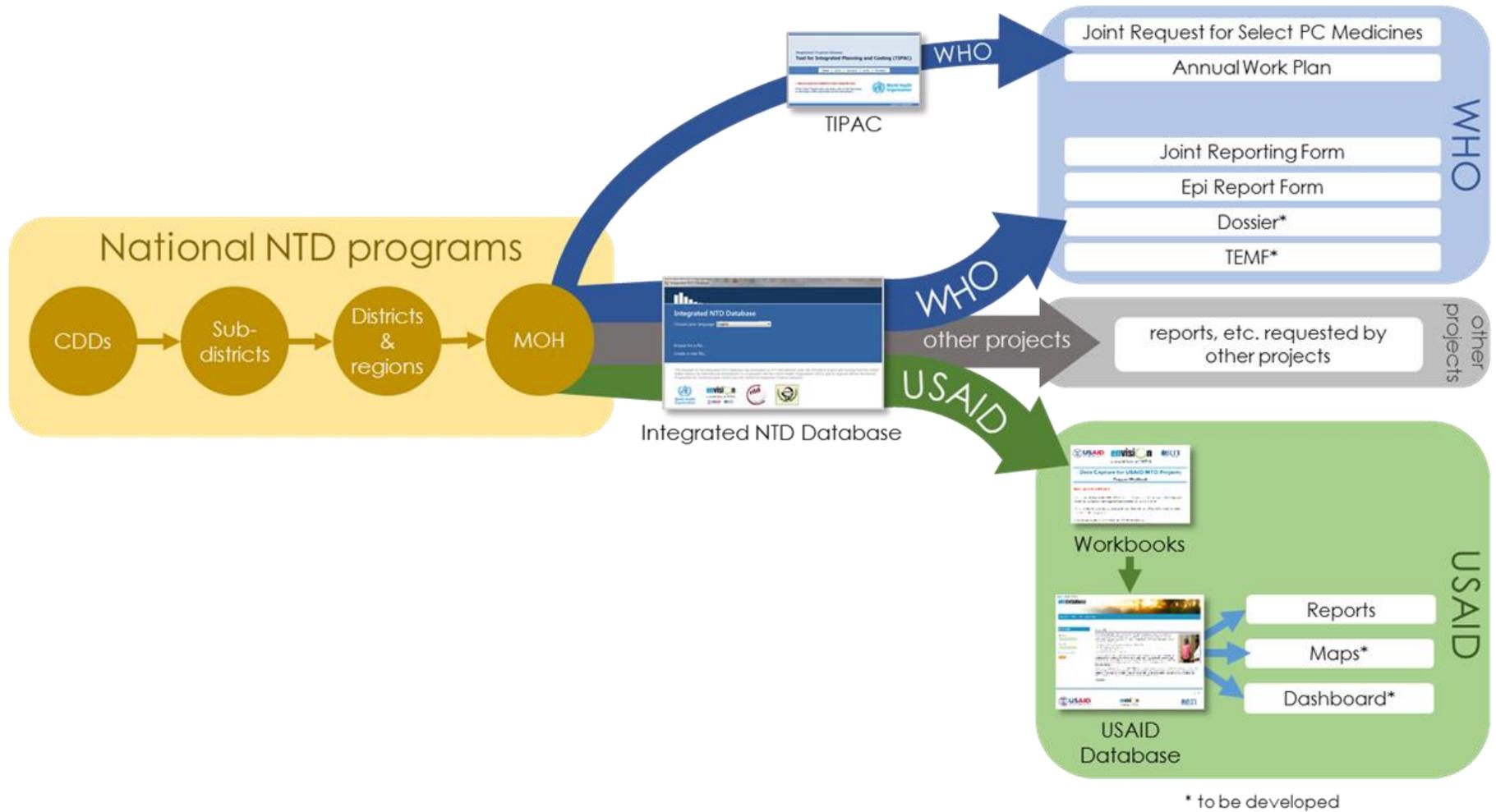
M&E for the USAID NTD Portfolio

Support for USAID’s NTD M&E system. As USAID’s flagship project for NTD control and elimination, ENVISION is responsible for the development and maintenance of USAID’s NTD Program M&E system, which supports ENVISION and End in Africa projects. The objectives of the M&E system are to ensure quality reporting by USAID, to guide national programs in making programmatic decisions, and increasingly take a leadership role in contributing to the global learning agenda.

Capacity strengthening for USAID and USAID-funded partners in USAID NTD M&E system and indicators. RTI has continued to strengthen capacity on the USAID NTD M&E system among staff at USAID, ENVISION, and END in Africa through in-person and virtual mentorship. During the reporting period, RTI trained END in Africa’s new M&E Specialist, and worked closely with USAID to provide requested training in M&E for NTDs, including topics on defining indicators and targets, conducting data collection and reporting (including project reporting tools), and monitoring and interpreting coverage.

Maintenance of USAID’s NTD Database. The USAID NTD Database, which contains all current and historical reported data from USAID’s NTD projects, includes pre-calculated, standardized indicators at district, regional, and national levels for 25 countries within USAID’s NTD program portfolio. During Q1–Q2, significant changes to the system stability and infrastructure led to increased responsiveness and reduced downtime, thereby enhancing the stability, improving the database performance, and reducing costs.

Figure 7. Illustration of data flow from national NTD programs to WHO, USAID, and other projects



Refining USAID NTD data-capture tools (see illustration of NTD data flow in Figure 7). Global NTD policy has evolved since the beginning of the ENVISION project, and RTI has also received user feedback by using the Disease and Program Workbooks for data capture in USAID-supported NTD activities. In line with this, in Q1–Q2, RTI began to make the following changes to the data-capture processes and tools:

- *Change USAID NTD workbooks to align with latest WHO guidance (with a particular focus on trachoma and OV):* RTI proposed updated indicators and has started to solicit feedback on key priority indicators with USAID and MMDP, USAID’s flagship morbidity management project. It is anticipated that these changes will be incorporated into updated data-collection tools in the coming months.
- *Incorporate data for country (ies) implementing WHO’s recommendation to treat LF in areas co-endemic with Loa loa with ALB twice a year:* Because the number of countries affected by co-endemicity is small, RTI established a process to collect this information without making costly changes to the data-collection tools and the USAID NTD Database. Further revisions to this strategy may be undertaken based on feedback.
- *Capture historical mapping data for select indicators (e.g., baseline TF) through a manual, one-time data-entry process:* RTI collected historical mapping data for many districts, which have been uploaded to the database; these data are now available through the MDA Coverage Report. Additional data will continue to be collected as they become available.
- *Capture DSA results by uploading data from the WHO Epidemiological Reporting Form (EPIRF):* In the first half of FY16, RTI reviewed the WHO EPIRF and Trachoma Elimination Monitoring Form (TEMF) and determined that the forms were sufficient for capturing USAID-supported DSA data. RTI will start requesting these forms be submitted to ENVISION as the primary method of reporting DSA results; the goal of using these forms is that ENVISION will reduce the reporting burden placed on national programs by not establishing a parallel reporting form. In addition, ENVISION will be able to strengthen the data quality of the forms submitted to WHO.
- *Make improvements based on user feedback, such as finalizing the revised Training tab in the Program Workbook to capture more activities in specific training categories:* RTI reviewed the current training data-collection requirements and drafted a revised Training tab that incorporated user feedback during the first part of the year. These changes will be incorporated into the data-collection tools in the coming months.

Review of USAID’s NTD project data. RTI has continued to review the data of 25 countries supported by USAID’s NTD projects ENVISION and END in Africa and actively liaised with USAID and FHI 360 to provide consolidated feedback on those projects’ data. Through this effort, RTI aims to ensure that across all 25 countries, high-quality data are available for appropriate interpretation and use, standardized to facilitate reporting, and accessible to the relevant individuals for decision-making while respecting national ownership.

Finalizing any outstanding FY13–FY15 data was prioritized to allow final, or nearly final, multi-year data to be presented in the first FY16 SAR. The data were reviewed for completeness, accuracy, and consistency, and feedback was consolidated with that of USAID and END in Africa and shared with the countries supported through those projects. USAID’s NTD Database facilitated project data review, feedback, and storage.

Analysis of USAID’s NTD data to inform decision-making. Supporting USAID: ENVISION is providing ongoing TA to the USAID NTD Team regarding the agency’s various reporting requirements, including the U.S. Government’s Global Health Program indicator reference sheet, website, fact sheet, progress report, and data call; Annual Performance Report; Annual Priority Goals; and Performance Plan and Report. During FY16, ENVISION continued to support USAID NTD staff, and the USAID NTD M&E Advisor in particular, with agency reporting to share the M&E strategy and results from USAID-funded efforts in NTD control and elimination with decision-makers in the U.S. Government and other partners.

Supporting countries: The use of data to facilitate decision making in FY16 has been strengthened by providing country level analysis of data that informs a program manager’s understanding of low coverage issues and by providing projections that helps countries plan their activities and monitoring progress towards elimination goals. These have been included in this year country SARs and will be used by TAs during work planning.

USAID NTD Dashboard. RTI’s Center for Data Sciences has developed Phase 1 of the NTD Dashboard, which involved linking the main overview page of the Dashboard prototype to data for the USAID NTD portfolio as of March 2016. Phase 1 has been circulated to ENVISION senior management and will be shared with USAID in Q3. For Phase 2, the design team will work closely with ENVISION technical experts and USAID to determine how the Dashboard could be enhanced (e.g., developing disease-specific or country-specific dashboards, tracking progress toward elimination goals, and analyzing other performance measures).

Map-making solution for visualization of USAID’s NTD data. The web-based mapmaker has advanced beyond the prototype phase and now has the ability to create endemicity and geographic coverage maps by district for all targeted NTDs in 14 countries. In Q3-Q4, RTI will release a request for proposals to continue programming the tool, advance capability and promote use among ENVISION-supported countries, staff and USAID.

In addition to the web-based mapmaker, an RTI GIS specialist prepared updated maps for the SAR and custom maps for publications, in particular papers from Haiti and Ethiopia. She also continued to coordinate with the team managing the GeoConnect database to share shapefiles and information on redistricting to generate the most up-to-date maps possible.

Project Communications

The ENVISION Communications team works closely with USAID to share the stories of ENVISION and USAID’s contributions to NTD control and elimination, targeting USAID’s portfolio partners, the NTD community and the general public. In the first half of the year, the Communications team worked with technical staff to develop and share updates online and through social media, begin developing new and improved marketing materials, and contribute to planning efforts for two high-profile events, namely the September 2016 NNN Meeting and USAID’s NTD Program 10th Anniversary event, both taking place in Washington D.C. later this year.

Website and participation in social media dialogue. In the first half of FY16, RTI made significant updates to the ENVISION project’s website (www.NTDenvision.org), including updates to technical areas, success stories, and NTD news-related items and resources from ENVISION and other key partners such as WHO. Work will continue throughout the remainder of FY16 to update ENVISION country pages and provide more information on project impact by disease.

Sharing success stories. RTI established an FY16 calendar for the production of success stories from ENVISION-supported countries. A team of writers is currently supporting the country teams in

identifying, developing, and writing stories for external communications. Several success stories are currently in development and will be shared in the second half of FY16. The ENVISION **quarterly e-newsletter** was disseminated in March 2016 to share news and updates from ENVISION and was viewed by nearly 400 individuals in the NTD community.

Photos and real-time activity updates (including activities supported by other NTD initiatives) have been shared regularly on the ENVISION Facebook page and through the Twitter handle @RTIfightsNTDs. The twitter handle now has 1,321 followers (individuals and institutions), corresponding to an increase of nearly 20% from the previous reporting period, and has posted more than 2,800 tweets on NTD activities in ENVISION-supported countries. The ENVISION project website saw nearly 18,000 page views in the first half of FY16, with 65% estimated to be first-time visitors.

Country profiles. ENVISION is working with a graphic design firm to develop country profiles with strong visual appeal for each supported country to highlight achievements. Country profiles are currently in development and will be completed during Q3.

NNN 2016 Meeting. The 7th Annual Meeting of the NNN, hosted by RTI, will be held in Washington, DC, September 29–October 2, 2016. The NNN Chair is ENVISION’s Project Director Lisa Rotondo. She and several other ENVISION staff and NNN position holders have been working closely with professional event organizers, Maximize Your Time, to plan the conference. The Marriott at Metro Center has been secured for the meeting, and an event website has been developed and launched. An invitation for registration was circulated to the NNN’s seven NGDO networks on March 28, 2016.

With additional donations from CBM and Sightsavers, the NNN will be able to offer 25 flights and 5 lodging reimbursements as travel awards to representatives of organizations that would otherwise be unable to attend. The applications have been shared and are due on May 14, 2016. Member NGDOs have also been asked to suggest sessions that fit the criteria proposed by the NNN Executive Committee for the meeting agenda. Maximize Your Time is coming to Washington, DC, on May 14 for further logistical planning. The detailed agenda and side meeting schedule will be finalized and made available on the event website in the coming months.

USAID’s 10-year Event (in conjunction with NNN 2016 in Washington, DC). RTI worked with USAID to secure Friday, September 30, 2016, as the date for the USAID 10th Anniversary celebration to be held at the Newseum in Washington, DC. Invitations and registration will be coordinated with the NNN registration. RTI is also helping to lead the Communications Working Group for the celebration. The Working Group comprises USAID partner representatives who will be working together to develop news and stories in line with USAID-established themes building up to the September event.

Devex article on Ethiopia partnership. RTI mobilized a journalist from Devex to develop an article detailing how the NTD partnership in Ethiopia had resulted in donor commitments to achieve full SAFE at scale for the FY16 MDA. The article highlighted ENVISION leadership and included inputs from other collaborating partners working in Ethiopia. The article was released to coincide with Pfizer’s 500 millionth event in Ethiopia in November 2015. *Link to article:* www.devex.com/news/bringing-ntds-into-sharp-focus-a-joint-vision-for-better-sight-in-ethiopia-87226

FOCUS ON SUPPORTING COUNTRIES

1. ENVISION Support for Baseline Disease Mapping

FY16 Technical Objectives

Objective 1: Ensure completion of all baseline NTD mapping in ENVISION-supported countries so that interventions and resource needs can be planned and identified, respectively.

Objective 2: Support key countries outside of USAID’s direct implementation areas to complete baseline NTD mapping to contribute to the global NTD control and elimination goals.

FY16 Activities Update

Continuation of trachoma baseline mapping (GTMP). To date, ENVISION has played a key role as a partner on the GTMP. Launched in December 2012, the DFID-funded GTMP aimed to map trachoma globally. In FY16, ENVISION continued to collaborate at the global level by participating in weekly GTMP management calls and attending regular in-person GTMP technical and advisory meetings until the GTMP close-out in March 2016. ENVISION-supported countries will continue to undertake remaining trachoma mapping using the GTMP standards.

Although the DFID funding to GTMP ended, ongoing support for trachoma mapping will be provided in certain countries. In FY16, ENVISION is working with USAID to review the mapping progress and identify countries with mapping gaps that could be supported by ENVISION. Currently, the list of countries that will need ENVISION funding includes Nigeria (non-USAID-supported states), Chad, Ethiopia (non-USAID-supported regional states), Central African Republic, and DRC. WHO and ENVISION partner Sightsavers will oversee trachoma mapping.

Table 24 illustrates ENVISION’s targets for mapping in FY16, demonstrating the total mapping needs and the mapping achieved in FY16 Q1–Q2 as reported to date. In total, three out of four districts were mapped for LF in Indonesia, two of which were funded by ENVISION. During the same period, 14 and 4 districts were mapped for trachoma in DRC and Guinea, respectively. No mapping was undertaken for OV, SCH, or STH.

Table 24. Districts to be mapped with ENVISION support in FY16

Country	Number of districts to map in FY16					Notes—Including if mapping is complete or will be completed through other support and by when
	LF	OV	SCH	STH	TRA	
DRC	0	complete	0	0	14 completed	Two districts to be mapped for trachoma in Q3. Additional financial support would be necessary to complete LF, SCH, and STH mapping in DRC. Additional mapping will be needed in FY17.
Ethiopia	complete	complete	complete	complete	0	The 52 districts that remain to be mapped for trachoma will be mapped as soon as security allows.
Guinea	complete	complete	complete	complete	4 completed	Mapping these four districts for trachoma completed mapping in Guinea.
Nepal	complete	n/a	n/a	complete	4 planned	See Nepal SAR for details.
Nigeria*	0	complete	0	0	0	Mapping is complete in the 10 USAID-supported states. The gaps in mapping in non-USAID-supported states, due to security issues in certain areas, are expected to be filled by the Federal Ministry of Health (FMOH) by the end of FY16.
Benin	complete	complete	complete	complete	complete	
Cameroon	complete	complete	complete	complete	complete	
Haiti	complete	n/a	n/a	complete	n/a	
Indonesia	3 districts mapped (2 ENVISION funded, 1 other)	n/a	complete	complete	n/a	Three districts have been mapped for LF, and two more USAID-funded districts remain to be mapped.
Mali	complete	complete	complete	complete	complete	See Mali SAR for details.
Mozambique	complete	complete	complete	complete	complete	
Senegal	complete	complete	complete	complete	complete	
Tanzania	complete	complete	complete	complete	complete	A more vigorous analysis of SCH and STH data to date will be conducted by a consultant in FY16 to develop clear treatment strategies for both diseases, including determining the need for STH mapping in country.
Uganda	complete	complete	complete	complete	complete	

Table 25 shows the status of mapping completion for all ENVISION-supported countries at the end of the reporting period. The majority of ENVISION-supported countries have completed mapping across the USAID-targeted diseases by March 31, 2016. Substantial mapping gaps remain in Ethiopia (24% of districts awaiting mapping for SCH and STH in FY16), and DRC has some mapping gaps (6% of districts expected to be mapped for SCH and STH and 2% for trachoma).

Table 25. Percent of mapping completion for each country, by disease

Country	LF	Oncho	SCH	STH	Trachoma
Bangladesh	100%	-	-	100%	-
Benin	100%	100%	100%	100%	100%
Burkina Faso	100%	100%	100%	100%	100%
Cambodia	100%	-	100%	100%	100%
Cameroon	100%	100%	100%	100%	100%
Cote d'Ivoire	100%	100%	100%	100%	100%
Ethiopia*	100%	100%	76%	76%	94%
Ghana	100%	100%	100%	100%	100%
Guinea	100%	100%	100%	100%	90%
Haiti	100%	-	-	100%	-
Laos	100%	-	100%	100%	100%
Mali****	100%	100%	100%	100%	100%
Mozambique***	100%	100%	100%	100%	100%
Nepal	100%	-	-	100%	95%
Niger	100%	100%	100%	100%	100%
Nigeria**	100%	100%	100%	100%	100%
Philippines	100%	-	100%	100%	-
Senegal	100%	100%	100%	100%	100%
Sierra Leone	100%	100%	100%	100%	-
Tanzania	100%	100%	100%	100%	100%
Togo	100%	100%	100%	100%	-
Uganda	100%	100%	100%	100%	100%
Vietnam	100%	-	-	100%	100%
Indonesia	99.8%	-	100%	100%	-
DRC*	94%	100%	94%	94%	98%

- Indicates not applicable because disease is not endemic.

* Reflect data received by ENVISION to date. Data will continue to be updated as additional information is received from non-USAID supported areas.

**Reflects data in ENVISION-supported states.

2. ENVISION Support for Mass Drug Administration (MDA)

ENVISION has helped MOHs and partner organizations sustain the major achievements of large-scale implementation to date, develop clear strategies for accelerated geographic coverage, disseminate best practices for managing low program coverage, strengthen in-country drug supply management, and build sustainability to support longer-term control efforts. Figure 8 captures updated information for MDA completed in FY15 and progress toward achieving FY16 targets.

During FY15, **929 districts completed at least one MDA with USAID support:**

- 624 districts for STH,
- 624 districts for LF,
- 333 districts for SCH,
- 267 districts for OV, and
- 132 districts for trachoma.

In FY15, a total of **115,168,943 people (regardless of age) in 14 countries received PC for at least one NTD:**

- 88,606,632 people (≥ 5 years for IVM/ALB or >2 years with DEC) for LF,
- 80,053,508 people (pre-SAC, SAC, and HRAs) for STH,
- 22,226,598 people (5 years and older) for OV,
- 17,205,990 people (6 months and older) for trachoma, and
- 16,766,342 people (SAC and HRAs) for SCH.

Provisionally, 100 districts (8.7% of ENVISION-targeted districts) reported at least one MDA being completed to date in FY16. Among the districts targeted by ENVISION, the MDA status is as follows:

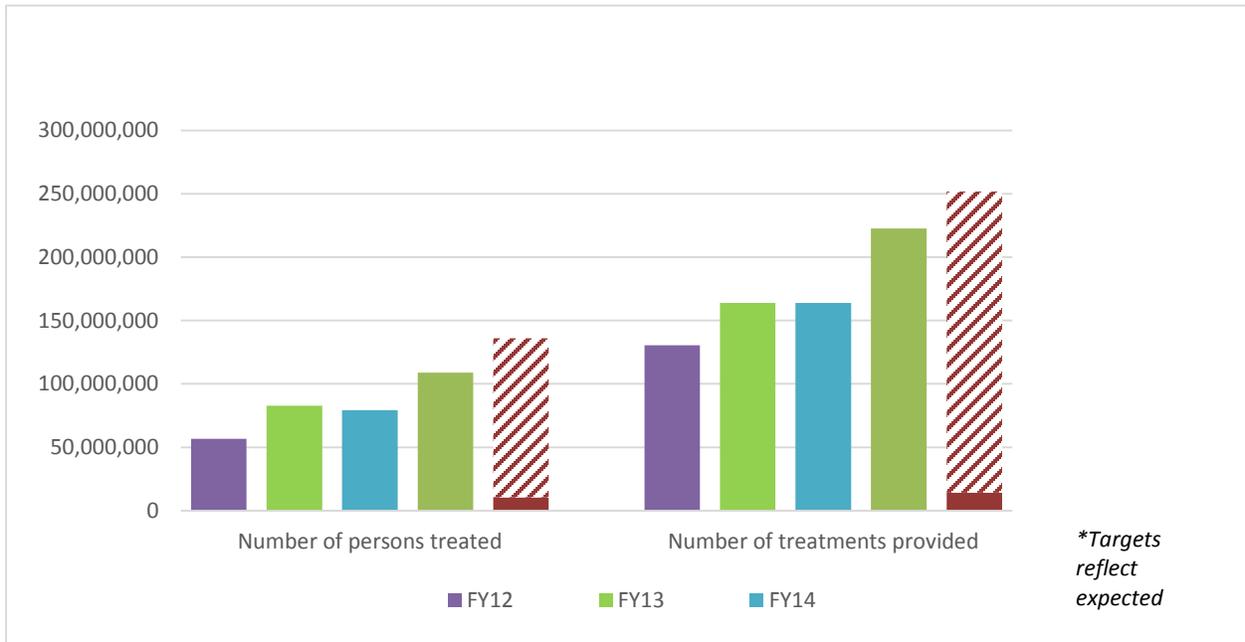
- 20/553 (4%) districts²⁷ have completed MDA for LF,
- 24/306 (8%) districts have completed MDA for OV,
- 47/177 (27%) districts have completed MDA for trachoma,
- 32/615 (5%) districts²⁸ have completed MDA for STH, and
- 6/377 (2%) districts²⁹ have completed MDA for SCH.

²⁷ Excludes districts not suspected endemic, requiring mapping, pending DSA results.

²⁸ $>20\%$ STH

²⁹ $>1\%$ SCH

Figure 8. MDA treatments supported by ENVISION: FY12–FY16 (targeted)



Geographical coverage. Among the 19 ENVISION-supported countries (less the 5 former END in Asia countries), all but two countries (DRC and Ethiopia) achieved 100% MDA geographical coverage for at least one of the targeted diseases (Table 26). By the end of FY15, approximately half of ENVISION-supported districts were on track to meet trachoma goals by 2020, although all should be able to meet these goals by FY21 if treatment is started soon in Guinea, Benin, and DRC. Among the 14 countries supported by ENVISION in FY15, ENVISION-supported treatments covered 574 (44%) of all endemic districts for LF, 259 (32%) for OV, 668 (29%) for STH, 132 (19%) for trachoma, and 277 (17%) for SCH. These results do not necessarily mean that other districts were not treated; indeed, in many countries, the remaining districts are supported by other project (e.g., DFID-funded partners like Sightsavers).

Table 26. Geographical MDA coverage in FY16, by disease

Country	LF	OV	SCH	STH	TR
Nepal	100%	-	-	100%	100%
Haiti	100%	-	-	100%	-
Uganda	100%	100%	84%	100%	100%
Mali	100%	100%	79%	100%	100%
Mozambique	100%	*	94%	100%	100%
Nigeria**	93%	88%	100%	100%	100%
Cameroon	91%	100%	62%	100%	100%
Senegal	100%	-	98%	100%	94%
Tanzania	100%	100%	81%	82%	98%
Guinea	42%	100%	32%	100%	89%
Benin	96%	100%	42%	100%	0%
Indonesia	66%	-	100%	41%	-
Ethiopia***	50%	84%	28%	69%	55%
DRC***	3%	98%	1%	2%	0%

*Mozambique is considered to be hypo-endemic for OV; the treatment strategy in the context of OV elimination is under discussion.

**Reflects data in 10 USAID-supported states

***Reflects data received by ENVISION to date. Data will continue to be updated as additional information from non-USAID-supported areas is received.

- Not applicable because disease is not endemic.

Achieving required program and epidemiological coverage. The vast majority of ENVISION-supported districts are meeting targets for program and epidemiological coverage. The total number of USAID-supported districts that did not meet the epidemiological and program coverage targets in FY15 ranged from 16% to 37%, depending on disease (Table 27). These included 410 (21.0%) instances of districts not meeting **epidemiological coverage** targets for at least one disease and 492 (25.0%) instances of districts not achieving **program coverage** targets for at least one disease. As described in the country reports, the reasons for low coverage are multi-faceted and include issues with denominator/census estimations (Benin, Cameroon, Ethiopia, Haiti, Indonesia, Nigeria, Tanzania, and Uganda); security issues (Cameroon, Ethiopia, Guinea, Haiti, Mali, Nigeria, and Tanzania); MDA timing, communication, and training (Benin, Cameroon, Mozambique, Senegal, and Uganda); serious adverse events/adverse events (SAEs/AEs) (Benin, Ethiopia, Indonesia, and Tanzania); population migration (Guinea, Haiti, and Uganda); drug delays (Ethiopia, Nigeria, and Uganda); and urban centers (Nepal and Uganda). Disease-specific problems and solutions are discussed in the disease-specific sections of this report, whereas country-specific challenges and ENVISION solution strategies are described in the country reports.

Table 27. USAID-supported program and epidemiological coverage, FY15

Epidemiological coverage targets are defined below.

Programmatic coverage targets are ≥80% of the eligible population

NTD	Total number of districts treated in FY15 (aggregate of all countries) ¹	Epidemiological coverage targets	Number of districts that did not meet coverage targets in FY15*	
LF	624	≥65% epi coverage	Epi: 112	Program: 125
Trachoma	132	≥80% epi coverage	Epi: 22	Program: 22
OV	267	≥65% epi coverage	Epi: 39	Program: 43
SCH	333	≥75% epi coverage of SAC	Epi: 108	Program: 125
STH	624	≥75% epi coverage of SAC	Epi: 129	Program: 177
Cumulative number of districts treated in FY15	1,980	Cumulative number of districts that did <u>not</u> meet coverage targets	Epi: 410	Program: 492
		Cumulative percent of districts that did <u>not</u> meet coverage targets	Epi: 21%	Program: 25%

¹ Report based on available results only. Total does not include daughter districts for which no coverage data are available. Also does not include districts that treated but were not either (1) currently endemic for the disease or (2) treated in the same year as achieving stop MDA criteria. Example: ~120 districts in Benin and Cameroon were treated for STH but were not endemic at the time of treatment (government policy to treat all districts regardless of prevalence or DSA results during the same year showing the district to be non-endemic).

² 929 districts treated at least one disease. The sum of the column is 1,980, indicating that districts could be counted multiple times. Of the 929 districts, 300 (32%) districts treated for at least one NTD had insufficient epidemiological coverage for at least one NTD, and 323 (35%) districts treated for at least one NTD had insufficient program coverage for at least one NTD.

FY16 Technical Objectives

Objective 1: Provide evidence-based approaches to improving coverage.

Objective 2: Strengthen in-country drug supply management.

Objective 3: Build national programs' capacity to manage SCH and STH activities.

The FY16 ENVISION work plan identified the activities described below to achieve these objectives.

FY16 Activities Update

Develop and support roll-out for Data Review Guide (Objective 1). To promote the use of data for decision-making, ENVISION piloted a Data Review Guide in FY15. This guide, which is to be used during work planning meetings, includes a PowerPoint presentation, data visualization, and discussion prompts to facilitate participatory problem solving. Following this pilot and further consultation with partners, this guide has been revised and is being re-named the "**Data Action Planning Guide**" to reflect its focus on data use for action and planning – building on current practices to review data. The guide consists of two components:

1. The first component is focused on strengthening existing data review meetings, including how to conduct annual data review meetings, effective data visualization methods, and suggestions for synthesizing recommendations. Conducting data review meetings is a best practice that should be implemented following MDA and each survey conducted during the programmatic year, including coverage surveys, DQAs, and DSAs.
2. The second component is a template to be populated by countries before work planning, for presentation and reference during work planning. This template will provide space for national programs to synthesize recommendations from the various data review meetings held during the year, present specific and focused goals for improving coverage in the coming year, capture program improvements, and encourage future sustainability planning.

The Data Action Planning Guide will be finalized in May 2016 and rolled out in ENVISION-supported countries during FY17 work planning.

Develop a low coverage algorithm package (Objective 1). RTI began developing a low coverage algorithm package in FY15 to guide countries as they determine next steps when low coverage occurs. The algorithm package walks users through the following steps: (1) assess data quality, (2) identify the populations with low coverage, (3) review whether the program was implemented as planned, and (4) assess the program's acceptability in the community. Additionally, the algorithm package organizes key resources for easy reference, including DQA guidelines, post-MDA coverage survey guidelines, supportive supervision checklists and best practices, and checklists for strengthening program activities.

The package was reviewed internally during the first half of the year and presented at the ENVISION Partners' Meeting for input. This package will be finalized in May 2016 and shared with country teams, including ENVISION field and MOH staff, during the work planning visits. ENVISION will provide TA as appropriate to help countries understand the algorithm and determine which steps would be appropriate to take, depending on the reported coverage in each country.

Conduct post-MDA coverage surveys and meta-analysis of results from previous coverage surveys (Objective 1). Coverage evaluation surveys are used to validate routinely reported coverage figures and collect information from community members on their knowledge, attitudes, and practices (KAP) related to NTD programs, including awareness, reasons for refusals, and access to treatments. The results should inform the design of social-mobilization strategies and M&E systems. National programs often require support for designing surveys, ensuring quality data collection, analyzing results, and—often the most challenging—ensuring that results are used to refine MDA strategies to achieve improved treatment coverage.

In the first half of FY16, ENVISION accomplished the following:

- Provided TA to support the rollout of surveys in two countries: Ethiopia and Indonesia. ENVISION will provide the same support to the remaining five countries conducting surveys in Q3–Q4 FY16 (Table 28);
- Analyzed available information from 67 surveys conducted over four years in Haiti, Benin, and Nepal. The results have been used to inform the development of guidance for implementing social-mobilization and communication strategies, are being used to inform FY17 work plans in these countries, and have been compiled in a report that will be disseminated in the second part of FY16, and;
- Conducted a literature review of the issues most related to coverage; based on this review, ENVISION is drafting a list of questions to include with coverage surveys that will be programmatically actionable; and
- Developed standard approaches to analyze survey results

The support package for coverage surveys will be finalized in FY16 and will include the protocol, a questionnaire template, and support for data analysis and dissemination to influence MDA planning.

Table 28. FY16 coverage surveys with ENVISION support	
Country	Status Update/Findings
Benin	A post-MDA coverage survey for trachoma is planned for July, within 30 days following the MDA, and will consist of assessing the coverage of activities in all four communes. The surveys will be conducted to validate MDA data in communes with questionable reported data and/or identified issues during the trachoma MDA campaign.
Ethiopia	Coverage assessments are currently underway in four zones in Western Oromia, with additional assessments planned in the regions of Tigray, Beneshangul-Gumuz, and Eastern Oromia in April and May.
Indonesia	Indonesia conducted surveys for LF in eight districts in February and March 2016. Preliminary analysis was in progress at the time of reporting. Preliminary analysis in Indonesia will be presented at the ENVISION review and work planning meetings in April to stimulate discussions on improving coverage among the 50 ENVISION-supported districts.

Table 28. FY16 coverage surveys with ENVISION support	
Mozambique	Mozambique is planning to conduct surveys in August following the trachoma MDA.
Nigeria	ENVISION, will conduct two coverage surveys in two local government areas upon the completion of the FY16 MDA; these are planned to begin in August 2016.
Tanzania	Tanzania will conduct post-MDA coverage surveys following school- and community-based MDA in the six former APOC project regions. The MDA are scheduled for April and August.
Uganda	Uganda's National NTD program plans to conduct coverage surveys in six districts in Q3 of FY16.

Conduct independent MDA monitoring (Objective 1). Various types of independent monitoring have been implemented during MDA in numerous USAID-supported countries to improve the knowledge regarding populations that are either not being reached by drug distributors or are choosing not to participate in MDA, so as to facilitate making real-time decisions during MDA to improve coverage. These decisions may include tailoring the social-mobilization messages broadcast as radio clips or by town criers, deploying additional drug distributors to a certain area, or extending the duration of the MDA. Ideally, this activity would be implemented by individuals who are not associated with the MDA intervention to ensure an objective understanding of the MDA's reach and effectiveness.

ENVISION will provide technical and financial assistance to conduct independent monitoring in Benin, DRC, and Guinea in the second half of FY16.

Create community of practice focusing on MDA coverage (Objective 1). ENVISION has laid the ground work to launch a community of practice focused on improving MDA coverage in early Q3 of FY16. This community of practice will bring together ENVISION in-country RPAs, MOH staff from national NTD programs (from ENVISION-supported countries and beyond), and other experts in regular virtual interactions to share experiences and generate solutions to improve coverage.

During this reporting period, the project formalized the idea and structure of the community of practice, more specifically defining the targeted community (ENVISION in-country RPAs, Regional TAs, and MOH staff from national NTD programs); the platforms that will be utilized (closed webinars, list serves, newsletters, and potentially an online platform with Facebook-like chat capabilities); and the activities that will enable sharing, including knowledge and experience sharing, question or issue sharing, solution generation, resource sharing, and documenting and sharing best practices.

ENVISION has further honed its webinar skills during Q1–Q2, which will be used in closed webinars with the community of practice participants. It also delved further into the issues of low coverage and began generating tools and guidance to improve coverage, including the Data for Action Planning Guide, Coverage Job Aid, and Low Coverage Algorithm Package. Finally, ENVISION began planning for the soft launch of the first community of practice activities, including a closed webinar, to be held in May 2016.

Conduct MDA coverage meeting for USAID NTD portfolio (Objective 1). With the 2020 goals fast approaching, the importance of achieving adequate coverage is heightened for all countries. ENVISION is preparing to host a two-day MDA coverage meeting for the USAID NTD portfolio on May 24–25 to

inform the community's learning on this topic. In close collaboration with USAID, invitations have been sent, an agenda has been developed, and the preparation of case studies is underway.

Disseminate supportive MDA supervision checklist templates (Objective 1). The DQAs implemented to date have highlighted the need for strengthened supportive supervision during MDA and for data collection and reporting. During FY15, ENVISION began compiling the supportive supervision checklists currently in use by national programs and has started drafting a template that incorporates best practices. In the first half of FY16, ENVISION finished a review of country-specific supportive supervision checklists. The questions were consolidated and grouped into categories. Questions that appeared on multiple checklists were selected, as were several other questions important to program performance. The rationale for asking each question was also included. The draft checklist was shared with WHO for feedback. In addition to a paper-based version supported by ENVISION, RTI will release an electronic version for mobile devices. A draft for piloting will be ready for sharing during FY17 country work planning sessions. Supportive supervision guidelines and job aids for NTD programs will be drafted to accompany the checklist.

Develop behavior-change communications plan (Objective 1). Social-mobilization activities constitute a substantial portion of each country's MDA budget, and increasing the effectiveness of these activities is desirable. RTI initiated work this year with ENVISION partner Sightsavers to review current social-mobilization strategies and develop a guide for working with national programs to develop strategies.

A review of current practices was completed in the first half of FY16 and presented to ENVISION and USAID staff, and the final report is being prepared. This effort included a review of the strategies and products used, an analysis of budget and costs, and an analysis of effectiveness measures using KAP surveys. Sightsavers will meet with and provide guidance to all TAs for working with national governments to strengthen their proposed social-mobilization plans. Guidance will be written up by the end of FY16 for broader dissemination and use.

Disseminate SAE resource package (Objective 2). ENVISION is finalizing SAE job aids to accompany the recently published *Handbook for Managing Adverse Events following Mass Drug Administration and SAEs*, also called the *SAE Handbook*. The resource packet will provide further guidance for national NTD programs preparing for, managing, and reporting SAEs. ENVISION has developed separate job aids for overall SAE management, key messages for communities and the media related to SAEs, guidance on treating common AEs, and a communications/reporting pathway template. The drafts of the job aids will be finalized after review by USAID and should be completed in early Q3.

Develop tracker for the WHO Joint Request for Selected Medicines (JRSM) and Joint Reporting Form (JRF) (Objective 2). The WHO JRSM and JRF, along with the EPIRF, constitute the Joint Application Package and are key documents that must be submitted annually to WHO by August 15 to ensure appropriate and timely allocations of donated medicines and inclusion of the ENVISION country achievements in the WHO PC databank. In the first half of FY16, ENVISION developed a tracker for country submissions to monitor the status of each component of the Joint Application Package: JRSM, JRF, and EPIRF. The ENVISION tracker, called the Joint Application Matrix (JAM) captures the country-reported date of submission and whether the documents were generated using ENVISION-supported tools, such as the Tool for Integrated Planning and Costing (TIPAC) (JRSM) and Integrated NTD Database (JRF and EPIRF). Because countries are not required to copy partner and funder staff when submitting these documents to WHO, ENVISION has requested that WHO Geneva share submission dates. For the JRSM, ENVISION is also requesting that WHO share the date the application was approved. In general, ENVISION HQ- and country-level staff will provide constant technical and logistic support to national programs to ensure their timely submission of high quality JRSM and EPIRF to WHO.

In the second half of FY16, ENVISION HQ and sub-partner staff will begin reminding countries of the due date for these key submissions. These reminders will start in May 2016 and then continue on a monthly basis through July 1, at which point ENVISION will switch to weekly reminders. Additionally, beginning July 1, ENVISION will ask country offices to provide weekly updates on the progress toward submission. As each country reports the submission status, it will be included in the JAM tracker managed by the ENVISION NTD Program Associate. ENVISION will report on the progress toward submission at biweekly meetings with USAID and work with countries and WHO that appear to be falling behind to ensure timely submission.

Strengthen in-country drug supply chain (Objective 2). Donated and purchased medicines are the backbone of NTD programs; without these medicines, the programs cannot achieve their control and elimination goals. Not only is it critical to ensure the timely ordering of donated drugs (see previous paragraph) and purchased drugs, once the drugs arrive in-country, the supply chain must meet the needs of the program, including transportation, storage, tracking, and collection after the MDA is complete. ENVISION has identified two main methods of addressing these identified supply chain issues in ENVISION-supported countries: (1) where feasible, hire a drug logistics officer who is seconded to the MOH to facilitate relationships between the NTD program and pharmaceutical management agencies, and (2) provide targeted TA for key supply chain road blocks. In the first half of FY16, ENVISION provided support for supply chain strengthening in Senegal, Tanzania, Uganda, Mozambique, DRC, Ethiopia, and Mali.

In Senegal, MSH conducted a supply chain assessment in FY15. RTI staff at headquarters and in Senegal provided significant assistance in managing logistics and meeting preparation before the assessment, and, in the first half of FY16, reviewed and edited several iterations of the meeting report and provided technical feedback. MSH is finalizing its draft report, with feedback from RTI, and in April 2016, the two organizations will discuss and decide on a strategy for disseminating the report in country. The organizations will also discuss possible recommendations and prospects for requesting TA from the USAID-funded SIAPS before that project's anticipated closure at the end of the FY. TA that does occur is likely to focus on drug quantification, storage, and reverse logistics.

In Tanzania, during the first half of the year, ENVISION provided technical and financial support to ensure that all drugs were distributed on time to the service delivery points. No stock-outs were reported, and with ENVISION TA, districts were encouraged to re-allocate and transfer excess drugs to other locations where they were needed. The project has also supported stock verification at service delivery points. The new government in Tanzania has shown renewed dedication to closing loopholes. In addition, waivers for all organizations donating medicines have come under scrutiny. The MOH has requested that all vertical programs (including the NTD program) initiate discussions with donors to deliver all drug consignments to the Medical Stores Department (MSD) instead of to the ports. This new directive is expected to decrease the ministry's budget for clearing commodities but will have significant implications for donors. ENVISION will participate in these discussions in the coming months.

In Uganda, the ENVISION-funded logistics officer coordinated with the National Medical Stores in regard to the arrival of filariasis test strips (FTSs) and tetracycline eye ointment (TEO) to ensure timely clearance and delivery in Q2 of FY16. The logistics officer also assisted the MOH NTD program managers in estimating the drug quantities needed in each district and the timing of their delivery. Additionally, this individual helps the ministry monitor all drug shipments once they leave the National Medical Stores. His additional role in confirming drug stocks and their various quantity levels after MDA is critical for determining where drugs can be moved to prevent drug stock-outs during MDA and to conduct mop-ups in areas of low coverage. During late 2015, an operational research study supported by the NTD-SC (and implemented by RTI with funding from the Bill and Melinda Gates Foundation) investigated the use

of mobile calls and short messaging service (SMS) reporting to improve data flow and accounting for MDA and drug stocks. The automated voice calls were found to be potentially useful in verifying drug quantities at lower administrative levels before MDA to prevent drug stock-outs. The SMS reporting results were less conclusive; a comparison with routine paper reporting indicated that a substantial number of supervisors failed to submit SMS reports. A call script developed for the automated voice calls will be made available for other programs before FY17 work planning and could be used to standardize the manual calls used for drug stock check-ins at lower administrative levels before MDA begin.

In Mozambique, ENVISION contracts a drug consultant to assist with trachoma (Zithromax® [ZTH] and TEO) MDA, which may include repackaging drugs for campaigns, distributing pre-drugs for MDA, performing drug audits, and providing guidance to the MOH for drug requisitions. In discussions during the reporting period, WHO Mozambique, the USAID Mission, DFID, and other NTD partners suggested that a drug consultant is needed to work on all NTD drugs; this individual would help ensure that the NTD program advocates for sufficient drug supplies in-country and remains aware of the expiration dates of NTD drugs in the warehouses. Discussions will continue between partners and the MOH over the next six months to determine the most appropriate way forward.

In DRC, ENVISION funded a supply chain assessment by an independent consultant to detect potential issues and bottlenecks and to provide corrective measures. The consultant's report includes recommendations for improvements at the national, provincial, health zone, and health facility levels. In particular, the report notes the need for formalizing agreements between the coordination units and the regional distribution centers regarding the storage of medicines and communicating with provincial and health zone staff.

In Ethiopia, the Pharmaceutical Fund and Supply Agency (PFSA) is responsible for delivering all medical consumables to the health post level throughout the country. Recently, the PFSA completed the construction of 16 additional supply hubs to ensure that the needs of every health post in the country would be addressed. The FMOH NTD program signed a memorandum of understanding with the PFSA in January 2016 to take advantage of these new hubs and begin integrating NTD drugs into the national supply chain system. The first NTD drug delivery using this new system will consist of PZQ and ALB for the STH/SCH MDA planned for April. RTI has hired a supply chain expert for secondment to the PFSA in support of this new initiative. This seconded expert will be the main focal point for all NTD drug delivery needs and will serve as a counterpart to the NTD logistics officer at the FMOH. The expert will also work with the FMOH M&E advisor to complete the TEMF and JRSM each year. The seconded supply chain expert was officially introduced to the Ethiopian NTD community at the Zithromax Quantification Meeting held in March 2016. ENVISION partner LFTW also hired a logistics officer for secondment to the Oromia Regional Health Bureau to help ensure that the more than 30 million NTD drug treatments targeted for that region are delivered and accounted for, with a particular focus on establishing a reverse supply chain of unused drugs once the MDA are completed.

In Mali, the NTD program found that significant quantities of PZQ and ALB were missing in FY15 and was unable to determine the point at which the drugs disappeared. To address this issue, the MOH appointed a new pharmacist to the NTD program. As part of efforts to build the national pharmacists' and NTD program coordinators' capacities in NTD drug logistics, in January 2016, ENVISION conducted a training of trainers (TOT) session in supply chain management. In their final evaluations, all the participants rated the training very highly, and session outcomes included improved knowledge and skills about the NTD supply chain and a pool of national-level trainers who can train lower-level staff.

In addition to these specific TA activities, ENVISION continues to partner with USAID and MSH to participate in regional NTD supply chain trainings. In early Q1, ENVISION staff from Ethiopia, Tanzania,

and Uganda participated in the first supply chain management workshop in Addis Ababa. Following the meeting, ENVISION field staff have been working with MOH staff to ensure the action items identified during the workshop are taken forward. In Q2, RTI staff worked closely with MSH to plan for two Nigeria-specific supply chain management workshops (held in April 2016 (Q3)). At headquarters level, RTI met with MSH staff to discuss ENVISION priorities for the workshop, relaying Nigeria-specific supply chain problems as identified by the Nigeria FMOH National NTD Coordinator at the TCC annual review meetings. RTI Nigeria staff facilitated MSH's introduction to the FMOH NTD staff and coordinated planning for dates and locations, as well as suggested invitees, especially from partners. The workshops will include two attendees from each state, representing both the NTD and the supply chain management sectors, as well as relevant federal NTD and supply chain management staff and representatives from key partners.

MSH is planning two more trainings in FY16 in West Africa for Francophone countries. ENVISION headquarters and field staff will facilitate introductions with the invited Ministries of Health, facilitate discussions with the host countries (Benin and Guinea), and work closely with the MSH staff to ensure the workshops are successful. The following countries are anticipated to take participate: Benin, Cameroon, Guinea, Mali, and Senegal.

Conduct situational analysis for SCH and STH planning in Nigeria, Tanzania, and Uganda (Objective 3).

After years of MDA, the epidemiological situations of SCH and STH have evolved in the ENVISION-supported countries. Although all of the SCH programs are at full scale, most have not reached the required 75% epidemiological target for SAC and 80% program coverage. Although Uganda and Tanzania have not yet conducted their SCH/STH situational analyses, Tanzania has improved its SCH MDA strategy and intensified its IEC and advocacy efforts, thereby improving coverage in most endemic districts. During FY15, ENVISION assisted countries in reviewing their existing baseline data and results from specific assessments, including data from STH assessments collected through the combined transmission assessment survey (TAS)/STH surveys (Benin and Haiti). With ENVISION technical support, DRC has reviewed mapping and sentinel site data and made programmatic decisions regarding the MDA strategy in several health zones (districts), including postponing SCH MDA in two health zones pending further re-assessment of baseline data and conducting validation surveys.

Countries with mature and complex SCH/STH programs (Nigeria, Senegal, and Mali) conducted situational analyses for SCH and STH in the first half of FY16 and held in-country technical review meetings to analyze the SCH and STH data. The countries' completed TIPAC and the integrated NTD Database were valuable sources of information used during these reviews, and data were cleaned, compiled, analyzed, and presented to reflect the trends and current epidemiological profiles of SCH and STH. Overall, the in-country reviews indicated that as the SCH/STH control efforts progressed, and the geographical and program coverage increased (Benin, Senegal, and Tanzania). After analyzing the SCH/STH data, changes in the SCH and STH MDA frequencies were recommended to ensure alignment with the WHO SCH and STH guidelines. Analyzing the epidemiological and coverage data also revealed areas of both persistent high prevalence (hotspots) and drastic and rapid reductions in prevalence, allowing the programs to refine the treatment frequency and strategic plans going forward for SAC and/or HRAs. Although the definitions of HRAs are inconsistent and vary from one endemic district to another, efforts are being made to collect regular census data on the people targeted before the MDA and thereby estimate HRA populations more accurately (Mali and Senegal).

ENVISION and USAID have been raising awareness and voicing their concerns among MOHs, partners, and WHO about the effect of LF-MDA scale-down on the STH program given that an increasing number of districts are passing the TAS and stopping MDA. During the FY17 work planning period, the ENVISION project will work with USAID to assess SCH and STH programs to determine the STH status in each

country. As TAS/STH data become available, ENVISION will undertake a thorough cross-country analysis of SCH and STH data to estimate the costs of STH-only MDA and determine any potential gaps in the SCH program after donor support for LF stops. The data will also be used for short-term forecasting of PZQ and ALB needs for the programs, which will strongly support advocacy and the development of resource-mobilization plans among donors and partners, including the Global Schistosomiasis Alliance (GSA).

MDA Supported by ENVISION in FY16 as Reported to Date

Based on the **MDA reported to date**, a total of 13.4 million individuals in 201 districts were treated via MDA with ENVISION support so far in FY16. These efforts have benefitted 5.9 million people for trachoma, 3.9 million for LF, 3.4 million for STH, 0.8 million for OV, and 0.2 million for SCH. Thus far, in FY16, approximately 19.5 million drug treatments have been distributed by MOH programs, with technical, financial, and capacity strengthening activities being supported by ENVISION. Tables 29–33 show the proposed disease-specific treatment targets in FY16 for each country and the progress toward these targets during Q1–Q2.

The percent completion values toward the end-of-year targets are small because most MDA occur during April–September. It is important to note that in many cases, disease-specific targets have changed compared to the original workbooks submitted during FY16 work planning. These differences reflect changes and updates to districts’ epidemiological statuses since the start of work planning last year.

Countries	# districts targeted in FY16	# districts treated in Q1–Q2	# persons targeted in FY16	# persons treated in Q1–Q2	# treatments targeted for distribution in FY16	# treatments administered in Q1–Q2
Benin	27	0	3,110,154	0	3,110,154	0
Cameroon	134	0	13,029,944	0	13,029,944	0
DRC	6	0	616,216	0	616,216	0
Ethiopia	40	12	3,068,731	403,247	3,068,731	403,247
Guinea	16	0	3,965,844	0	3,965,844	0
Haiti	25	0	4,997,438	0	4,997,438	0
Indonesia	49	0	15,534,003	0	15,534,003	0
Mali	40	0	8,764,912	0	8,764,912	0
Mozambique	0	0	0	0	0	0
Nepal	18	0	6,120,548	0	6,120,548	0
Nigeria	121	0	20,849,425	0	20,849,425	0
Senegal	33	0	5,361,108	0	5,361,108	0
Tanzania	94	23	18,047,129	3,455,567	18,047,129	3,455,567
Uganda	21	0	5,489,478	0	5,489,478	0
TOTAL	624	35	108,954,931	3,858,814	108,954,931	3,858,814

Table 30. ENVISION-supported Trachoma MDA, FY16

Countries	# districts targeted in FY16	# districts treated in Q1–Q2	# persons targeted in FY16	# persons treated in Q1–Q2	# treatments targeted for distribution in FY16	# treatments administered in Q1–Q2
Benin	4	0	527,491	0	527,491	0
Cameroon	5	0	846,091	0	846,091	0
DRC	0	0	0	0	0	0
Ethiopia	240	39	27,817,541	4,521,609	27,817,541	4,521,609
Guinea	9	0	3,043,724	0	3,043,724	0
Mali	0	0	0	0	0	0
Mozambique	26	0	3,588,848	0	3,588,848	0
Nepal	0	0	0	0	0	0
Nigeria	0	0	0	0	0	0
Senegal	6	4	1,131,332	738,303	1,131,332	738,303
Tanzania	20	2	5,429,536	250,437	5,429,536	250,437
Uganda	12	2	2,393,666	437,444	2,393,666	437,444
TOTAL	322	47	44,778,229	5,947,793	44,778,229	5,947,793

Table 31. ENVISION-supported OV MDA, FY16

Countries	# districts targeted in FY16	# districts treated in Q1–Q2	# persons targeted in FY16	# persons treated in Q1–Q2	# treatments targeted for distribution in FY16	# treatments administered in Q1–Q2
Benin	51	0	5,664,392	0	5,664,392	0
Cameroon	111	0	8,838,545	0	8,838,545	0
DRC	6	0	616,216	0	616,216	0
Ethiopia	50	14	3,192,042	476,312	6,384,085	476,312
Guinea	15	0	2,736,434	0	2,736,434	0
Mali	0	0	0	0	0	0
Mozambique	0	0	0	0	0	0
Nigeria	12	10	2,043,791	274,191	2,043,791	274,191
Senegal	1	0	80,467	0	80,467	0
Tanzania	23	0	4,635,606	0	4,635,606	0
Uganda	22	0	2,661,279	0	4,907,410	0
TOTAL	291	24	30,468,772	750,503	35,906,946	750,503

Table 32. ENVISION-supported SCH MDA, FY16

Countries	# districts targeted in FY16	# districts treated in Q1-Q2	# persons targeted in FY16	# persons treated in Q1-Q2	# treatments targeted for distribution in FY16	# treatments administered in Q1-Q2
Benin	34	0	1,174,286	0	1,174,286	0
Cameroon	80	0	3,180,550	0	3,180,550	0
DRC	2	0	44,367	0	44,367	0
Ethiopia	1	0	115,193	0	115,193	0
Guinea	13	0	986,714	0	986,714	0
Indonesia	0	0	0	0	0	0
Mali	47	0	4,864,113	0	4,864,113	0
Mozambique	0	0	0	0	0	0
Nigeria	87	6	5,190,633	242,780	5,190,633	242,780
Senegal	9	0	308,794	0	308,794	0
Tanzania	59	0	2,790,680	0	2,790,680	0
Uganda	30	0	4,557,688	0	4,557,688	0
TOTAL	362	6	23,213,018	242,780	23,213,018	242,780

Table 33. ENVISION-supported STH MDA, FY16

Countries	# districts targeted in FY16	# districts treated in Q1-Q2	# persons targeted in FY16	# persons treated in Q1-Q2	# treatments targeted for distribution in FY16	# treatments administered in Q1-Q2
Benin	59	0	4,254,639	0	4,254,639	0
Cameroon	181	0	14,598,083	0	18,849,834	0
DRC	6	0	760,761	0	760,761	0
Ethiopia	4	0	383,150	0	383,150	0
Guinea	10	0	2,429,639	0	2,429,639	0
Haiti	25	0	4,997,437	0	4,997,437	0
Indonesia	50	0	15,862,249	0	15,862,249	0
Mali	63	0	14,674,400	0	14,674,400	0
Mozambique	0	0	0	0	0	0
Nepal	18	0	6,120,548	0	6,120,548	0
Nigeria	164	5	10,044,333	63,527	12,256,225	63,527
Senegal	49	0	6,601,011	0	6,601,011	0
Tanzania	126	23	19,907,362	3,367,188	24,493,109	3,367,188
Uganda	21	0	6,539,341	0	6,539,341	0
TOTAL	776	28	107,172,953	3,430,715	118,222,343	3,430,715

Training targets. Successful implementation of MDA depends on having well-trained and well-supervised health workers and volunteers at various administrative levels. Among the various countries targeted by USAID, a cadre of supervisors and field staff have been trained to participate in the distribution of drugs, including 804,799 targeted frontline community drug distributors (CDDs) and/or teachers (e.g., volunteers responsible for dosing and providing treatment to individual community members). In the first half of FY16, 13,402 frontline workers (CDDs and teachers) were trained. As noted above, the low number of people trained thus far is attributable to the timing of most MDA, which will occur in Q3–Q4 (Table 34).

Table 34. Drug distributors trained with support from ENVISION, FY16		
	FY16	FY16
Country	# drug distributors targeted	# drug distributors trained
Benin	30,938	0
Cameroon	79,432	0
DRC	6,964	0
Ethiopia	105,183	2,971
Guinea	13,170	0
Haiti	12,134	2,742
Indonesia	89,076	0
Mali	57,539	0
Mozambique	2,380	0
Nepal	32,762	0
Nigeria	128,389	0
Senegal	13,680	0
Tanzania	119,715	7,689
Uganda	113,437	0
TOTAL	804,799	13,402

3. ENVISION Support for Disease-Specific Assessments (DSAs) and Surveillance

DSAs are an important milestone for NTD programs—they enable NTD program managers to measure programmatic impact and make important determinations about the continuation or discontinuation of treatment and other complementary interventions. In FY16, the number of LF pre-TASs and TASs conducted will increase significantly in the ENVISION-supported countries, due to these countries' success in implementing at least five effective LF MDA rounds. Indeed, more than 10% of currently endemic districts across the ENVISION portfolio are targeted for TAS 1 in FY16 alone. Trachoma impact surveys are also planned in multiple trachoma-endemic countries, demonstrating the progress national programs have made implementing the SAFE strategy (Surgery, Antibiotics, Facial cleanliness, Environmental improvements) with support from partners. Similarly, many countries will need to implement SCH sentinel site surveys and OV epidemiological assessments in FY16. At present, all required assessments are being conducted in areas supported by ENVISION; i.e., none are understood to be overdue.

FY16 Technical Objective

Objective: Strengthen national program capacity to implement DSAs and to make data-driven decisions. The ENVISION FY16 work plan identified the following activities to achieve this objective.

FY16 Activities Updates

Regional LF-TAS training. The project engaged with the CDC to determine LF-TAS training options should a need be identified for USAID-supported countries. CDC confirmed that it is available to support facilitation of workshops or specific TA to countries. No regional training was conducted during the reporting period.

Continue to develop and disseminate DSA resources. ENVISION has completed final drafts of LF and trachoma job aids and began planning the field testing for them. The job aids take the key concepts and decision points from the WHO DSA technical guidelines and summarize them into simple and easy-to-understand one-page diagrams per disease. During Q3, additional job aids for OV, STH, and SCH will be drafted for review and feedback by USAID, WHO, and other disease experts; the reviewed job aids will be disseminated to all USAID-supported countries.

STH assessments integrated with TAS. The global conversation around how best to integrate STH assessments into TAS is still evolving. ENVISION began to work with countries to determine where best to integrate STH assessments with TAS, per the new WHO guidance.³⁰ In FY16, two EUs in Indonesia and seven EUs in Haiti have planned integration of STH-TAS with ENVISION support in Q3–Q4. Indonesia prioritized two EUs with ENVISION-supported MDA in two different regions, and Haiti prioritized EUs that had high STH prevalence during previous surveys in October 2013–January 2014.

Other national programs need guidance on how to prioritize these assessments. In early Q3–Q4, ENVISION will work with USAID to review TASs scheduled for FY17 to determine where best to integrate STH assessments into TAS, particularly in areas where STH/SCH sentinel site data collection or other STH prevalence data has not been recently collected.

³⁰ http://apps.who.int/iris/bitstream/10665/153240/1/9789241508384_eng.pdf?ua=1

Coordination with the WHO RPRG. As outlined in the work plan, ENVISION has begun coordinating with national programs and updating TAS application and report data in advance of RPRG meetings. The first update and discussion with USAID and MOHs—which will focus on critical issues identified during discussions with national programs—will occur before the April 2016 AFRO RPRG meeting. A similar model will be followed for the Southeast Asia Regional Office (SEARO) RPRG (June 2016) and the WPRO RPRG (July 2016).

The WHO RPRG may have within its remit the review of TIS and TSSs. Until another mechanism is defined, the RPRG works with ITI and the TEC to ensure countries conduct TIS and TSS on schedule. ENVISION supports the RPRG and TEC decisions and helps countries interpret decisions.

TA for development of elimination dossiers. The LF elimination dossier for Cambodia is awaiting WHO HQ clearance, with the national program expecting to receive formal recognition from WHO in Q3. TA for the development and finalization of LF dossiers will take place in Q3–Q4 in Vietnam, Bangladesh, and the Philippines. Vietnam will submit a provisional dossier to WHO in time for the July 2016 RPRG meeting, and after receiving feedback, they will submit it to the MOH clearance process. ENVISION support to Bangladesh and the Philippines will focus on developing “pre-dossiers” because MDA and M&E activities are ongoing.

The global trachoma community has reached a point at which countries are eager to prepare dossiers for validation; guidance to countries is urgently needed while the evidence base is still being developed. WHO and the NTD-SC convened a meeting of the WHO NTD-Strategic and Technical Advisory Group (STAG) M&E Working Group to discuss this topic on October 1–2, 2015, at the TFGH. During the meeting, participants—including ENVISION and USAID at WHO invitation—discussed the types of surveillance countries should undertake after validating trachoma’s elimination as a public health problem. ENVISION and USAID staff played a critical role in ensuring that the experiences of USAID-supported trachoma-endemic countries informed discussions at this meeting and will continue to do so at subsequent gatherings, with the ultimate goal of supporting WHO to develop and finalize a dossier for validation of elimination of trachoma as a public health problem.

Using the new WHO trachoma-elimination dossier template, ENVISION hired consultants to work with the national programs in Cambodia and Laos to complete their elimination dossiers. The dossier for Laos is in draft and will need to undergo MOH review before submission to WHO later in the FY. The Cambodia dossier is also in draft, but will not be submitted until the TT surgery backlog issue is resolved (see country report for more details). The Vietnam dossier work will begin in Q3; however, due to the TT backlog that must be addressed before submission, the dossier will likely not be submitted to WHO until FY17 or FY18.

Algorithm package for programs not achieving critical cut-offs. ENVISION is continuing to work with national programs to respond to DSAs that do not achieve critical cut-offs, specifically in LF TAS or TIS. Building on the list of basic questions to guide programs in understanding TAS failure that ENVISION developed in FY15, ENVISION worked with WHO in Q1–Q2 FY16 to develop a set of checklists to improve TAS outcomes (see LF section). These checklists include a review of previous MDA coverage, review of survey implementation, and follow up on diagnostic test performance. They are being piloted in Indonesia and Nepal in Q3–Q4.

Trachoma survey system–Tropical Data. ENVISION is working with WHO as part of a broad partnership to develop the GTMP-inspired Tropical Data platform so that it becomes accessible to endemic countries, and to ensure that high-quality, standardized approaches for surveys are effectively utilized for trachoma DSAs (and potentially other disease surveys going forward). The system is free to use and open to all national programs.

RTI, through ENVISION, provided technical leadership for the development of Tropical Data during FY16 to support national programs with their survey needs (trachoma mapping, impact, surveillance, and TT-only surveys), including information systems using mobile phones, cloud servers, and data managers. USAID and RTI are leading efforts to pilot Tropical Data in Nigeria, Uganda, and Senegal. Results from Nigeria's March 2016 pilot of trachoma surveillance surveys in Plateau and Nasarawa states shows that among the six EUs selected (Langtang, Shendam, Awe, Doma, Keana, and Obi), all had TF-adjusted prevalence of <5%, and two EUs had TT-adjusted prevalence of 0.1% (Keana and Obi).

Further testing in April will enable national programs to submit an electronic application and the survey protocol online. This submission will go to an expert for a first-round review. If additional technical improvements are needed, the national program will be notified and support will be provided to address any issues. If accepted, the survey protocol and form will pass to a second reviewer. The second review process ensures the technical consistency and validity of data gathered through Tropical Data.

ENVISION plans to help support the following activities during Q3–Q4:

1. TOTs:
 - a. 20th June – English-language super training
 - b. Early June – French-language super training
2. Baseline mapping activities:
 - a. DRC – currently mapping, should be ongoing in FY17
 - b. Ethiopia: Gambella refugee camp – currently working on the sampling approach

As mentioned, there is interest from the WHO NTD department to use Tropical Data for other NTDs, but a roadmap has not yet been developed. A host of activities must first be carried out (new experts for reviewing scientific protocol, data management, etc.) before this technology can extend beyond trachoma. However, a wider range of use is the long-term goal, and RTI's involvement in this—as technical experts in many NTDs—will be key. As a temporary solution to support country DSAs through a platform that is similar to Tropical Data, RTI (with non-ENVISION funding) created the Platform for Electronic Analysis and Reporting (PEAR), which will allow country programs to collect routine M&E data on a number of indicators, including LF TAS, LF TAS/STH, SCH/STH sentinel sites, OV assessments, drug coverage surveys, and supervisory monitoring. Pilot surveys using PEAR are expected to start in Uganda (TAS) and Senegal (SCH/STH sentinel site) during Q3–Q4. Where and when appropriate, surveys administered through PEAR can be transitioned to Tropical Data upon request.

DSA Supported by ENVISION in FY16 as Reported to Date

ENVISION provides financial assistance and technical support for implementing DSAs. ENVISION also assists in developing or reviewing the DSA protocols to assure they reflect the latest WHO guidelines.

ENVISION-supported DSAs as reported to date for FY16 are shown by disease (Tables 35–39).

Table 35. Reported ENVISION-supported DSA for LF in FY16 to date			
Country	Assessment type	No. targeted in FY16	No. conducted in Q1–Q2
Benin	LF Pre-TAS sentinel site	10	0
Cameroon	LF Pre-TAS spot-check site	86	0
	LF TAS: Stop MDA	31	0
	LF baseline sentinel site	17	0
Guinea	LF baseline sentinel site	11	4
Indonesia	LF Pre-TAS sentinel site	8	2
	LF Pre-TAS spot-check site	8	2
	LF TAS: Post-MDA Surveillance I	6	1
	LF TAS: Post-MDA Surveillance II	2	0
	LF TAS: Stop MDA	7	0
Mali	LF TAS: Stop MDA	29	14
Nepal	LF Pre-TAS sentinel site	21	11
	LF Pre-TAS spot-check site	21	11
	LF TAS: Post-MDA Surveillance I	15	0
	LF TAS: Stop MDA	16	0
Nigeria	LF Pre-TAS sentinel site	3	0
	LF Pre-TAS spot-check site	3	0
	LF midterm sentinel site	10	0
	LF midterm spot check	10	0
Tanzania	LF Pre-TAS sentinel site	29	0
	LF Pre-TAS spot-check site	29	0
	LF TAS: Stop MDA	29	0
Uganda	LF Pre-TAS spot-check site	6	0
	LF TAS: Stop MDA	8	0
	Post-MDA surveillance	14	0
TOTAL		429	45

Table 36. Reported ENVISION-supported DSA for trachoma in FY16 to date

Country	Assessment type	No. targeted in FY16	No. conducted in Q1-Q2
Cameroon	Confirm TF prevalence	1	0
	Trachoma impact survey	5	0
Nepal	Post-MDA surveillance	8	2
Nigeria	Trachoma impact survey	2	1
Senegal	Trachoma impact survey	10	0
Uganda	Other (Re-survey)	5	0
	Post-MDA surveillance	5	0
	Trachoma impact survey	15	0
TOTAL		51	3

Table 37. Reported ENVISION-supported DSA for OV in FY16 to date

Country	Assessment type	No. targeted in FY16	No. conducted in Q1-Q2
Ethiopia	Oncho epidemiological assessment	22	0
Nigeria	Entomological assessment, specifically the MX poolscreen covering 34 districts	1	0
Uganda	Oncho epidemiological assessment	3	0
TOTAL		26	0

Table 38. Reported ENVISION-supported DSA for SCH in FY16 to date

Country	Assessment type	No. targeted in FY16	No. conducted in Q1-Q2
Mali	SCH evaluation	28	4
Tanzania	SCH sentinel site	29	0
Uganda	SCH evaluation	12	0
TOTAL		69	4

Table 39. Reported ENVISION-supported DSA for STH in FY16 to date

Country	Assessment type	No. targeted in FY16	No. conducted in Q1-Q2
Indonesia	STH evaluation	2	0
Mali	STH evaluation	28	4
Tanzania	STH sentinel site	29	0
Uganda	STH evaluation	12	0
TOTAL		71	4

4. Procurement of NTD Medicines and Diagnostics

As stated in the MDA section, the successful implementation and scale up of MDA constitute a core activity of the ENVISION project. As countries move toward their control and elimination goals, DSA results are critical for making technical decisions and judging program success. To support these functions, the ENVISION project procures NTD medicines and diagnostics for program countries.

FY16 Technical Objectives

Objective 1: Procure and ship NTD medicines for ENVISION-supported countries.

Objective 2: Procure and ship NTD diagnostics for ENVISION-supported countries.

Objective 3: Forecast PZQ needs for FY17–FY18.

Objective 4: Assist country programs in quantifying their needs for NTD medicines and diagnostics for FY17 MDA and DSAs.

FY16 Activities Update

Procure and ship NTD medicines. ENVISION awarded contracts for PZQ and TEO to suppliers Missionpharma, IDA (International Dispensary Association) Foundation, and GlobalPharma. Orders for PZQ were placed for five countries: Benin, the Philippines, Mali, Tanzania, and Uganda. PZQ was delivered to all countries except Uganda, which will receive the medicines in May 2016.

RTI placed TEO orders for Benin, Cameroon, DRC, Ethiopia, Guinea, Mozambique, and Uganda. All orders were delivered except that of Cameroon; RTI is working with the MOH to obtain a waiver and anticipates delivering the TEO in Q3. In the second half of FY16, RTI anticipates ordering and delivering TEO for Ethiopia and Senegal.

Procure and ship NTD diagnostics. FY16 marks the switch from ICT cards, which have typically been used by NTD programs to monitor LF elimination progress, to the FTS. Both are made by Alere, and RTI worked with this company to determine availability and timelines for transitioning from ICT cards to the FTS.

In addition, ENVISION is working with USAID to understand and facilitate the new WHO FTS donation. Katie Crowley participated in an FTS coordination meeting in November 2015 with USAID, BMGF, WHO, GlaxoSmithKline (GSK), DFID, and FPSU representatives. ENVISION also provided information about planned FTS procurement for TAS and pre-TAS to WHO, who are trying to track FTS for all countries, even where USAID or other donors are procuring. Two ENVISION countries—Haiti and Nepal—ordered FTSs through WHO in the first half of FY16. The Nepal order was received without delays. Unfortunately, the Haiti order was delayed because of staff changes at the WHO American Region Office and Haiti Country Office, and significant ENVISION staff time was required to determine whether the order had been placed with Alere, the location of the shipment, and when it would arrive. The shipment arrived at the end of March 2016. This situation highlights the fragility of the WHO system. Thus, RTI will continue to closely monitor future orders through WHO. In the second half of FY16, Nepal may request additional FTSs from WHO for TAS2 and TAS1 surveys; RTI is continuing to follow up with the national program.

Because of a large order placed by a non-ENVISION country in November, RTI procured ICT cards for Cameroon, Guinea, and Tanzania rather than FTs. These will be used for pre-TAS (Cameroon and Tanzania) and mapping (Guinea). In addition, two countries requested ICT cards instead of FTs: Nigeria, which will use the ICTs for TAS3, and Mali, which will use the ICTs for TAS1. ENVISION procured and delivered FTs for the following countries for use in pre-TAS and TAS: Cameroon, Nepal, and Uganda. Additional orders will be placed in Q3–Q4.

ENVISION also procured Brugia rapid tests locally for the Indonesia program for use in pre-TAS and TAS.

In December 2015, WHO approved a new supplier of Kato Katz kits, Combined Biotech Co. Ltd., which is based in China. RTI procured and delivered Kato Katz kits from Combined Biotech for Haiti and Senegal for use in STH-TAS (Haiti) and SCH/STH prevalence evaluation surveys (Senegal).

Table 40 presents details on commodities delivered by ENVISION to date in FY16.

Country	TEO	PZQ	ICTs	FTs	Kato Katz kits*	Brugia rapid tests
Benin	23,250	2,936,000				
Cameroon			6,300	30,870		
DRC	109,000					
Ethiopia	918,800					
Guinea	320,600		1,475			
Haiti					3	
Indonesia						11,000
Mali		5,709,000	18,025			
Mozambique	403,600					
Nepal				7,500		
Nigeria			1,800			
The Philippines		1,800,000				
Senegal					12	
Tanzania			5,000			
Uganda	27,900	5,238,000		6,120		
FY16 Q1–Q2 Total	1,803,150	15,683,000	32,600	44,490	15	11,000

* 100 tests per kit

Develop a two-year PZQ forecast for ENVISION countries. SCH treatment guidelines can make determining how much PZQ a country needs annually difficult. Often, the need shifts depending on the number of meso- and hypo-endemic districts and whether the country seeks to treat HRAs in addition to SAC. To help USAID and the global community understand future PZQ needs, RTI developed a four-year PZQ forecast for the five ENVISION countries for which USAID provides PZQ. This information was shared with WHO, and USAID used the estimates to develop and present a scale-down plan for PZQ procurement at the Working Group on Access to Quality Assured Essential Medicines for NTDs (NTD WGA) subcommittee meeting held March 30–31, 2016. ENVISION will continue to update this forecast in the future, providing much needed estimates for the project to key collaborators.

TA to countries in quantifying drug and diagnostic needs in FY17. In the second half of FY16, ENVISION staff will assist countries in quantifying their programmatic needs for NTD medicines and diagnostics to

be procured by RTI. Using the RTI-developed drug and diagnostic application forms, HQ and country-level staff will work closely with national programs to determine where ENVISION plans to support SCH and trachoma activities, and calculate the amount of PZQ and TEO needed in those districts. In countries using the TIPAC, this process will draw on data outputs. RTI and our sub-recipient staff will also help countries determine the quantities of FTS and Kato Katz kits needed for LF sentinel site surveys, STH surveys, and TAS.

5. Capacity Strengthening

Capacity strengthening for NTD control and elimination remains a clear priority for ENVISION-supported countries, as evidenced by increasing demands for quality and standardized training, tools, and guidelines. USAID and ENVISION endorse capacity-strengthening activities as an important element of assisting countries to reach NTD goals and building technical sustainability. ENVISION will continue to lead priority activities as defined by the WHO Working Group on Capacity Strengthening (WG-CS) and will collaborate with the group and be guided by its objectives and established goals.

With all national NTD programs in ENVISION countries being MOH owned, the countries themselves must have the capacity to implement their programs. Thus, strengthening country capacity is of utmost importance because national NTD programs must be sustainable, even if external funding support becomes unavailable, to ensure that achievements are not lost and that countries ultimately meet their control and elimination goals. Key challenges for capacity-strengthening efforts include the following:

- Gaps in specific technical areas exist within ENVISION countries.
- Capacity-strengthening activities need to be scaled up to meet the demands of all ENVISION countries and their differing capacity levels while minimizing costs and reliance on external inputs.
- Although substantial technical information and many NTD resources exist, national NTD programs are not always aware of these resources.
- More evidence is needed on the outcomes of capacity-strengthening activities and how they contribute to the overall achievement of NTD programs' goals

FY16 Technical Objectives

As countries strive to meet aggressive treatment targets, many are falling short of implementing the full package of interventions necessary to reach the NTD Roadmap to 2020 goals. A significant challenge identified by WHO and ENVISION is limited human resources within the national programs. To enhance the capacity of national programs for sustainable solutions and empower them to implement effective interventions and assessments, ENVISION is working toward the following four objectives:

Objective 1: Implement cost-effective measures to assess the effectiveness of training and capacity-development activities to determine gaps and help to improve curricula and tools.

Objective 2: Develop and expand local capacity to ensure sufficient country and regional expertise to support and provide TA to the MOH.

Objective 3: Advise, standardize, and support implementation of curricula in local languages to strengthen country NTD capacity.

Objective 4: Collaborate with WHO and the NTD community to disseminate technical information and NTD best practices to a wide audience of NTD program managers and other interested parties to enhance global awareness and capacity.

The ENVISION FY16 work plan identified the activities described below to achieve these objectives.

FY16 Activities Update

Capacity-strengthening needs assessment. RTI conducted a rapid ‘in-house’ capacity-strengthening needs assessment to analyze MOH (both central and district levels) and ENVISION country team capacity levels in key areas of management and NTD program implementation. ENVISION HQ staff participated in in-depth interviews for all of ENVISION’s countries. The results of the assessment are being compiled and will be used to guide individual and cross-project FY17 work planning, refine ENVISION’s overall staffing strategy, and help inform the next phase of the ENVISION Training Series.

E-Learning

Online course on SAEs. The ENVISION Capacity Strengthening team has begun developing an eLearning course on SAE management. This course is based on the SAE Handbook for national program managers preparing to manage AEs and SAEs and contains modules on treating patients with AEs, communicating with communities and the media, reporting SAEs, investigating potential SAEs, and correcting problems. The course will be interactive and include case studies, realistic scenarios, interactive activities, and quizzes. Completion of the course is expected in Q3.

TIPAC online tutorials. To provide additional, low-cost refresher resources for countries using the TIPAC, RTI is creating online TIPAC tutorial videos. The purpose of these videos is to show users how to use more advanced features of the tool and explain frequently asked questions using point-and-click video demonstrations. The first video, which is currently in production, walks users through how to use waived drug clearance fees to demonstrate a government’s in-kind contribution to its NTD program.

WHO NTD Program Managers Training Course (PMTC). RTI is providing support to WHO to create an open-access, online training course for NTD Program Managers. The online course will be based on the materials developed for the WHO PMTC and the District Level Management NTD Training Course (DLNTD) and will offer a low-cost, open-access option for first-time or refresher training for program managers and their staff. This resource will be especially valuable for new staff or staff in recently created administrative districts in countries where the full training has already occurred. RTI has formatted and finalized the English PMTC materials that will be used in the course and is in the process of formatting the English DLNTD and French PMTC and DLNTD materials.

NTD Technical Webinar Series. RTI launched the NTD Technical Webinar Series in FY15 to share the latest guidelines, best practices, and country experiences. Because of the overwhelming positive response, the Webinar Series is continuing in FY16. In Q2, RTI began preparing for a webinar on MDA Preparation, Implementation, and Evaluation, with presenters and examples from Haiti, Benin, and Burkina Faso. Held on April 4–5, 2016, this was the first webinar to be presented first in French and then in English, and it prompted more questions and participation than ever. Twenty-eight people joined for the French language webinar, and 57 joined the English-language version. ENVISION is looking to develop this platform further by increasing publicity and hosting in-country webinar viewing parties with the MOH and other key stakeholders. This viewing-party strategy has thus far expanded webinar viewership in, for example, Ethiopia, where the ENVISION RPA invited the MOH to watch the SAE webinar, and in Mali, where HKI held a viewing party with the MOH. All previous webinars are made available through the ENVISION website and are promoted through regular project communication

platforms. Webinars on managing SAEs and completing the JRSM have each had approximately 100 views on the ENVISION YouTube Channel since the original air date.

Communities of practice (See MDA section.)

Increasing accessibility to and streamlining technical resources

Translations. To make guidelines and training materials accessible across the ENVISION project and to wider audiences, RTI has continued to support the translation of key NTD resources. In the first half of FY16, RTI produced the Alere FTS video in Portuguese; provided ongoing translation support for the TIPAC and WHO Integrated NTD Database; and is in the process of translating the ENVISION webinar on SAEs into French, the SAE Handbook into Spanish, and the DLNTD materials into Portuguese.

Development of job aids. RTI is working to promote the adoption of existing guidelines by developing user-friendly and easy-to-use **job aids and handbooks**. During Q1–Q2 of FY16, ENVISION finalized the following draft job aids and handbooks:

- DSAs for LF
- DSAs for trachoma
- Simplified modes of transmission
- Calculating coverage
- Advocacy worksheet
- Advocacy booklet
- SAE management job aid packet
- Health worker NTD manual

After the drafts have received review from expert technical reviewers (including WHO), they will be prepared and finalized with the assistance of a graphics designer and should be ready for dissemination in the second half of the year.

Dissemination of ENVISION generated tools:

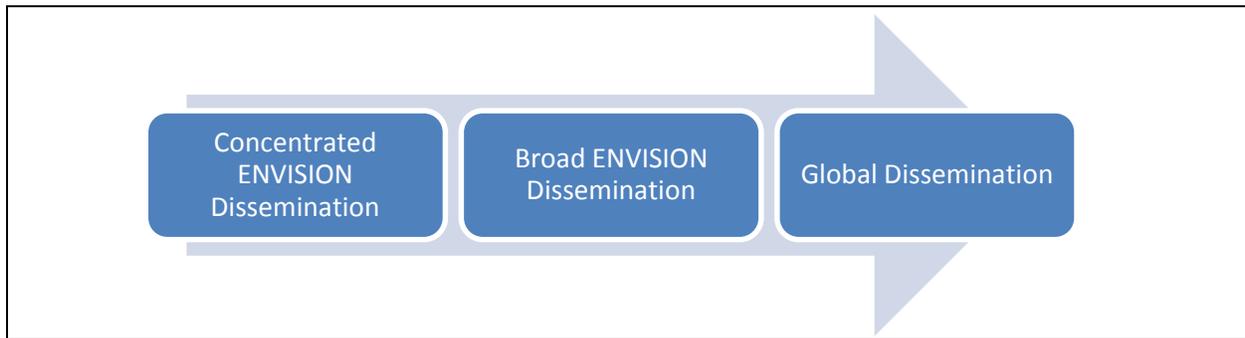
The goals for dissemination of tools are as follows:

Goal 1: Increase **Awareness** of ENVISION tools and training materials within the ENVISION-supported countries and globally when appropriate.

Goal 2: Increase **Use** of ENVISION tools and training materials within the ENVISION-supported countries and globally when appropriate.

As each tool is developed, a chain for vetting is required. The tool is first disseminated within a small group of the ENVISION team, modified and then circulated amongst the larger ENVISION team. Once all feedback is received and incorporated, the tool is ready for global dissemination (see **Figure 1**).

Figure 9. Dissemination Target Audience Groups and Stages of Dissemination



The following tools have been further developed in Q1 and Q2 of FY16 and are being prepared for broad ENVISION dissemination in Q3 and Q4:

- Best Practices Guide (Managing MDAs)
- An Approach to Data for Action and Planning (Managing MDAs)
- MDA Social Mobilization and Communications Best Practice Guide (Managing MDAs)
- Post-MDA Coverage and KAP Survey (Data Management and M&E)
- Online Mapping Tool (Data Management and M&E)
- Low Coverage Algorithm Package (Data Management and M&E)
- Supportive Supervision Checklist (Managing MDAs)

Another set of tools is now ready for the final global dissemination phase, including:

- LF Disease-specific Assessments Job Aid (Impact Assessments and Surveillance)
- Trachoma Disease-specific Assessments Job Aid (Impact Assessments and Surveillance)
- Integrated NTD database
- Tool for Integrated Planning and Costing (Planning NTD Programs)
 - Video: TIPAC Overview
 - Training: TIPAC
- Serious Adverse Events (Managing MDAs)
 - Serious Adverse Events Handbook
 - Training: Serious Adverse Events Course
 - Webinar: Serious Adverse Events: Safe Drugs and Safe MDA Programs
- Webinar: Completing the WHO Joint Application Package for NTDs (Planning NTD Programs)
- Training: WHO Transmission Assessment Survey (Impact Assessments and Surveillance)
- Training: WHO integrated NTD Programme Managers' Course (Planning NTD Programs)
- Training: WHO District-level NTD Programme management Course (Planning NTD Programs)
- Data Quality Assessment (Data Management and M&E)
 - Data Quality Assessment Course
- Webinar: Assessing MDA coverage (Data Management and M&E)
- Calculating Coverage Job Aid (Data Management and M&E)

To increase access to and use of the materials, RTI met with WHO and USAID in March 2016 to prepare a list (with hyperlinks to sources) of the agreed-upon essential and commonly used NTD tools, resources, and trainings for NTD program staff. This draft has also been shared widely among the NTD community to obtain further input. In May 2016, RTI will work with a graphics design firm to prepare a mobile-friendly layout to be made available online and a version for print distribution. Meanwhile, ENVISION has continued disseminating resources through its website, newsletter, and webinars and is building the capacity of TAs to promote and support the use of these materials with Ministries and other in-country partners.

A draft plan to monitor and evaluate these tools was shared in FY16 and will be finalized and implemented by the end of the year.

TOT

Build a roster of local NTD experts and trainers on NTD tools. To better organize and access individuals with NTD-related skills, RTI created an Excel-based database of past, current, and potential consultants. This database includes various characteristics, such as expertise, language, and location, and will allow the ENVISION project to identify and develop local experts to provide TA to national NTD programs.

To expand local capacity and minimize travel costs, RTI recruited a local consultant in Senegal to conduct a DQA in Côte d'Ivoire during the first half of FY16 as part of the TAF. This assignment allowed the consultant to gain exposure to and strengthen his expertise with facilitating DQAs under close supervision by Dr. Mawo Fall, ENVISION Senegal's RPA. A similar assignment was completed by another Senegalese consultant in Guinea Bissau during the last part of FY15.

In-person trainings

Integrated NTD Database. During the first half of FY16, ENVISION supported data management training workshops in the SEARO and AFRO regions, which included the Integrated NTD Database. A total of 20 program and data managers from eight Southeast Asian countries participated in the SEARO workshop, which was held in New Delhi, India, in October 2015. A total of 45 program and data managers from 21 African countries participated in the AFRO workshop, which was held in Johannesburg, South Africa, in November 2015. The participants at these workshops were introduced to the database and DQA tools and assisted with setting up databases and running initial reports for their countries.

In addition, in-country orientation was provided for 22 individuals in Cameroon by an ENVISION data manager from Haiti, a good example of ENVISION's south-to-south collaboration efforts. ENVISION also provided TA in-country and remotely for national programs using the Integrated NTD Database. The TA provided support for entering historical data and provided troubleshooting for any issues with using the database.

DQA. The 65 participants in the AFRO and SEARO data management workshops, which were conducted with facilitation and financial (AFRO) support through ENVISION, were also oriented on the DQA as a key workshop topic. ENVISION also provided TA for the implementation of the DQA in Côte d'Ivoire in the beginning of FY16. Furthermore, ENVISION's Senior M&E Specialist presented on countries' experiences implementing and using the results of the DQA at the WHO M&E Working Group meeting in February 2016.

Grants management training. RTI implemented a grants management training in Senegal for six staff members from the Senegal ENVISION team to expand the staff's capacity to successfully manage US

Government funds. Finance training was also implemented in Tanzania for 52 district- and regional-level accountants assigned to NTD programs, covering financial reporting, documentation, and compliance.

TIPAC TA and training. RTI implemented a TIPAC workshop in Nigeria for 75 state program managers and data managers from four zones who had not yet been trained on the TIPAC. The participants were taught how to use the TIPAC to create accurate NTD budgets and plan activities, which will aid Nigerian states that are preparing to scale up their NTD programs.

Additionally, during the first half of FY16, ENVISION developed a user questionnaire to help identify the most and least important features of the TIPAC and barriers to its use. The results from the questionnaire will be incorporated into the design and rollout of improvements in Q2–Q3.

In March 2016, the ENVISION team piloted a new approach to TIPAC implementation in Mozambique. This approach relied on the use of ENVISION endemicity and costing data to pre-populate much of the TIPAC before meeting with the MOH. During the time with the MOH, the focus was on reviewing the data in the TIPAC, and this activity was used as a training opportunity. Entering the total “lump-sum” costs for activities that already have donor support and saving detailed costing for activities that require additional advocacy or funding were also emphasized. In addition, an ENVISION Mozambique staff member was trained on the tool and will be working closely with the MOH to finalize the entry of cost data for other diseases and partners, particularly LF, for which MDA scale down is expected in the near future. This approach to implementation worked well and is an option to be considered for future implementation where the MOH has little capacity to take on the burden of initial data entry.

As noted above, the ENVISION HQ team also worked on scripts for videos to be used as online tutorials covering frequently asked questions and more advanced TIPAC topics. These videos will be available for countries to refer to as they encounter questions while using the TIPAC after the initial training period.

WHO NTD PMTC. To make the PMTC materials available to WHO regional offices, country programs, and partners worldwide, RTI supported the formatting and finalization of the English version of the PMTC course materials, which are now available on the WHO website in PDF format. RTI is now in the process of formatting the French version of the PMTC materials.

RTI made preparations to support and co-facilitate a PMTC in DRC for 79 national- and provincial-level program managers; however, the training has been postponed by the MOH until later in FY16.

WHO-standardized DLNTD. Similar to efforts with the PMTC, RTI is supporting the formatting and finalization of the English and French DLNTD materials, which will be made available to all stakeholders on the WHO website. RTI is in the process of translating the materials into Portuguese and is planning to work with WHO to implement district-level trainings in Mozambique in July.

Evaluation of capacity-strengthening outcomes.

Measure long-term NTD capacity strengthening. ENVISION prepared a conceptual framework and list of draft indicators for measuring capacity-strengthening activities. These tools were presented to USAID, FHI 360, WHO, and CDC, and their feedback was incorporated into the development process. By the end of FY16, ENVISION will finalize and implement the data-collection plan.

Collaboration with WHO-HQ.

ENVISION continued its global leadership in capacity strengthening through its participation in the WHO WG-CS, including keeping the group informed to promote awareness and dissemination of existing and newly developed resources. ENVISION worked closely with WHO and USAID to solicit disease and subject matter expert feedback as new tools were developed and refined to enhance acceptance as best practice resources and to encourage their widespread adoption.

In November 2015, ENVISION convened a meeting with WHO, USAID, CDC, END in Africa, and RTI/ENVISION in Washington, DC, to discuss the state of global NTD capacity needs and explore areas for collaboration in the coming year and beyond. A key outcome of the meeting was an agreement to work together to develop a strategic global implementation plan to disseminate/roll out trainings and tools across countries.

Table 41 contains further information on ENVISION-supported trainings conducted during the reporting period.

Table 41. Training courses in FY16 Q1–Q2					
Training	# of training participants	Profile of training participants	Countries or regions	Nature of ENVISION support	Collaborators and their role
Nigeria Trachoma Impact Survey Training	16	trachoma graders and survey recorders	Nigeria	Technical, financial, and facilitation	--
Cameroon Integrated NTD Database Training	20	National MOH and NGO program staff	Cameroon	Technical, financial, and facilitation	--
SEARO Integrated NTD Database and DQA Workshop	20	National NTD Program Managers	SEARO	Technical, financial, and facilitation	WHO-SEARO (technical, financial, and facilitation)
AFRO Integrated NTD Database and DQA Workshop	45	National NTD Program Managers and Data Managers	AFRO	Technical, financial, and facilitation	WHO and WHO-AFRO (technical, financial, and facilitation)
Senegal Grants Management Training	6	Senegal ENVISION staff	Senegal	Technical, financial, and facilitation	--
Guinea MDA Strategy and Tools Workshop	19	National MOH and NGO program staff	Guinea	Technical, financial, and facilitation	--
Nigeria TIPAC training	75	State Program Managers and Data Managers	Nigeria	Technical, financial, and facilitation	--
Mali TOT for Supply Chain Management	18	National MOH and NGO program staff	Mali	Technical, financial, and facilitation	--
Nigeria Trachoma Impact Survey/ Tropical Data Pilot Training	24	State-level trachoma graders and survey recorders	Nigeria	Technical, financial, and facilitation	WHO HQ, ITI, TCC, Sightsavers

Table 41. Training courses in FY16 Q1–Q2					
Haiti TAS Refresher Training	45	National and regional lab technicians	Haiti	Technical, financial, and facilitation	--
Tanzania Finance Training in OV Endemic Regions	52	Regional- and district-level accountants	Tanzania	Technical, financial, and facilitation	--
Tanzania Manuscript Development Workshop	35	National MOH and NGO program staff	Tanzania	Technical, financial, and facilitation	--

6. Strengthening National Program M&E Data Quality

ENVISION has collaborated with global experts to lead the development of NTD M&E tools to address issues of data access and quality. In particular, RTI worked with WHO HQ, AFRO, SEARO, WPRO, APOC, and FPSU to develop the Integrated NTD Database. This database enables countries to store, analyze, report, and use their data by ensuring that data are accessible in one location. In addition, RTI, together with WHO, led the development and rollout of a DQA tool specific to NTDs. By implementing DQAs, national programs strengthen their understanding of the quality of their data and develop steps to improve the quality as needed. ENVISION also continues to support the development of the TIPAC tool to generate JRSM, support strategic decisions, and produce information for use in advocacy materials.

Activities related to supporting the use of these tools through capacity-strengthening activities are described in the capacity-strengthening section; this section outlines the activities relating to maintaining and developing these tools.

FY16 Technical Objective

Objective: Ensure data are accessible and of high quality to best inform national decision-making, including corrective actions in poor-performing areas.

The ENVISION FY16 work plan identified the following activities to achieve this objective.

FY16 Activities Update

Maintenance and improvement of the Integrated NTD Database template. ENVISION has continued to support the integrated database tool, including developing the strategy to transition the data-to-data development and management of this tool to WHO. During this time, ENVISION dialogued with senior and technical staff at WHO to develop a transition plan, which includes the following:

- RTI organizing and transferring the source code;
- RTI developing a feature backlog and roadmap for remaining priorities; and
- WHO convening a data lab meeting with key stakeholders to (1) transfer and update trainers and WHO regions on the latest version of the Integrated NTD database, (2) determine requirements for the next version and prioritize features, and (3) establish mechanisms to manage help desk features and future in-country trainings.

The rollout of this transition plan will start in the second half of FY16. Part of the roadmap will include features identified in ENVISION's FY16 work plan, such as the following:

- respond to feedback received (e.g., to add data validation features);
- respond to updates in the global reporting tools, including the WHO TEMF and the TAS Eligibility and Reporting Form;
- support efforts to redefine districts; and
- allow for translations.

Additionally, during the second half of the year, in line with respecting national program ownership of data and building their capacity to carry out effective data management, RTI will pilot the database to generate automatic CSV file exports of mapping and DSA results for submission for USAID reporting requirements. This activity aligns with the FY15 discussions between USAID and RTI to minimize countries' reporting burdens and ensure that USAID and its NTD project staff have the necessary data to monitor progress toward NTD control and elimination goals.

DQA updates. During the WHO M&E Working Group meeting held in February 2016, four countries shared their experience implementing the DQA tool. One of the country representatives stated, "When we conducted the DQA, that's when we saw clearly what the problem [with data quality] was, and why things need to be addressed differently." Other countries described similar positive experiences. Therefore, the M&E Working Group recommended that the tool be updated to incorporate countries' feedback regarding DQA implementation and that the finalized version should be published on the WHO website and disseminated to national programs and partners. This is in line with ENVISION's goal for the tool and 2016 work plan activities.

During the second half of the FY16, ENVISION will continue to work with WHO to incorporate this feedback regarding DQA implementation to date. It is anticipated that the updated tool and guidelines will be published on the WHO website by the end of the FY16.

TIPAC updates and maintenance. To ensure the quality of the WHO-endorsed tool, ENVISION has continued to support updates and improvements to enhance the tool's usability. During the first half of FY16, this support consisted of technical guidance on tool developments funded through PAHO. In addition to adding details for other non-PC-NTDs, the PAHO contract included some updates proposed by ENVISION, including harmonizing the disease burden codes with those used in the Integrated NTD Database and USAID Disease Workbook, updating the trachoma algorithms to reflect the new standard

operating procedures, and modifying the method to select districts targeted for each disease. During the second half of FY16, ENVISION will fund any necessary updates required to ensure that the TIPAC remains compatible with the most recent versions of the WHO JRSM and for routine maintenance.

7. Preparing for Elimination

ENVISION's overarching focus on data collection, storage, management and analysis will serve to prepare countries for elimination and the preparation of the various documents anticipated through the validation and verification processes. ENVISION is supporting countries to prepare for the validation of LF elimination through dossier development.

Cambodia submitted its dossier to the Regional Dossier Review Group at the WPRO in July 2015 and should receive official validation of elimination from WHO HQ in May 2016.

Vietnam plans to submit a provisional dossier in July 2016 that includes information on morbidity from ongoing patient estimations and the results of the direct inspection protocol, which was supported by the MMDP project. Discussions are underway with WHO, USAID, CDC, and the Task Force regarding whether an assessment of two potential areas of focal transmission in Vietnam in non-endemic areas is necessary to validate the interruption of transmission.

Continuing the support under END in Asia, ENVISION will support further pre-dossier development in Bangladesh and the Philippines in FY16 Q3–Q4, helping these countries to collect, review, and consolidate data needed for the dossier on mapping, MDA, sentinel and spot-check sites, and TAS.

During this reporting period, ENVISION also reviewed and commented on the draft WHO trachoma elimination dossier, submitting these comments to USAID for compilation and consideration across the portfolio.

8. ENVISION Cost Share and Complementary NTD Work

ENVISION remains committed to utilizing cost share from host country governments and partners to expand the reach and impact of USAID-funded activities. Resources developed during FY16 to date include the following:

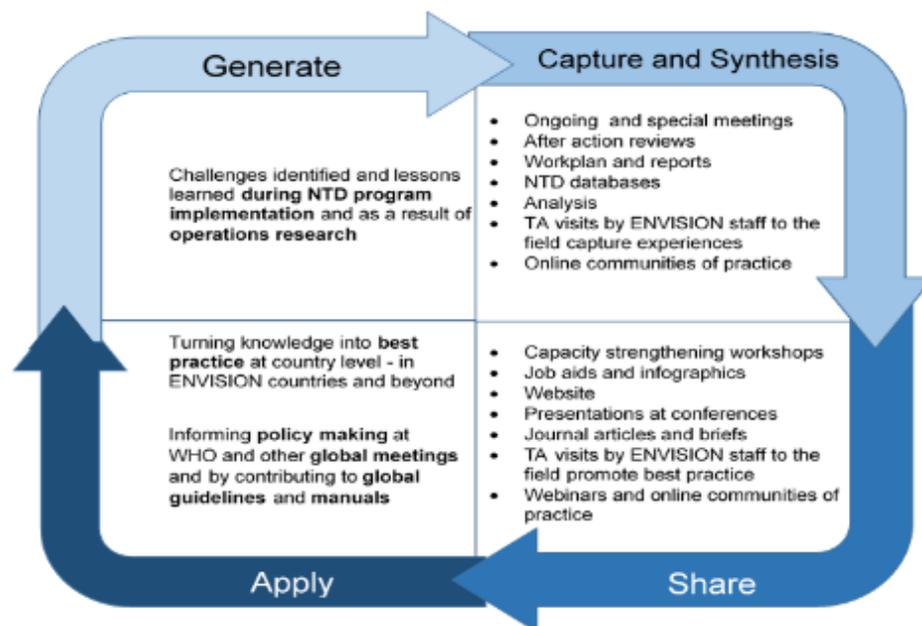
Districts in Indonesia. These districts contributed to the overall operational and maintenance budgets for LF/STH MDA. District coordination meetings were organized by the district health officer with relevant stakeholders to secure annual district-level commitment for social mobilization and cadre-training activities. Health center coordination meetings were also organized in each health center with heads of villages and representatives from health posts and other sectors to review the timelines of MDA-related activities. Cost share contributions to these meetings included transport to meetings and participant refreshments. Districts purchased radio spots and banners announcing the dates and purpose of MDA. Additional district contributions during MDA implementation and monitoring included drug packaging, provision of drinking water, and transportation for health center staff and cadres.

Home office labor and associated indirect costs were contributed by **Sightsavers** during the reporting period to support the central administration and management of trachoma mapping activities in Côte d'Ivoire and Zambia.

INFORMING THE GLOBAL NTD COMMUNITY—IDENTIFYING AND ADDRESSING GLOBAL TECHNICAL, PROGRAMMATIC, AND OPERATIONAL CHALLENGES

ENVISION has a unique role in the global NTD community as it is the largest operational NTD platform worldwide. In addition to its responsibility to affect the capacity and effectiveness of NTD programs in meeting the established WHO guidelines, ENVISION also has the opportunity to recognize and highlight programmatic challenges; identify and disseminate lessons learned; engage in operational research and share programmatic knowledge with the broader NTD community; work with global partners to formulate new, more effective strategies; and finally, help countries implement programmatic improvements. The key cycle of this systematic, KM approach to programmatic challenges is depicted in Figure 9.

Figure 10. Knowledge management under ENVISION



To operationalize the approach, ENVISION engages with the global community in multiple ways, including the following:

- **Operational research:** Engage with the research community to facilitate finding new solutions to meet operational challenges;
- **Dissemination of lessons learned:** Identify and share programmatic challenges, management best practices and innovations, tools, and program results;
- **Global partnerships:** Help to translate the knowledge gained to new NTD policies through strong working global partnerships; and
- **TA:** Provide TA through the TAF to improve service delivery and increase program performance.

1. Operational Research

Gaps in knowledge and disease-specific programmatic issues impede program implementation in many countries. ENVISION staff are sought as technical experts and programmatic resources by a wide variety of operational research partners. ENVISION embarked on operational research efforts to assist the countries to develop practical solutions to NTD implementation or evaluation problems. The accelerating elimination efforts in most of these countries are rendering operational research more relevant and pressing for solving technical issues. Operational research is expected to generate new solutions for specific problems while contributing to the general knowledge of the NTD community.

New USAID mechanisms to provide immediate operational research support and address the needs of the implementing programs (i.e., through funding and oversight to both CDC and TFGH) are now fully in place. They have been designed to be quite flexible and facilitate the rapid and effective deployment of resources/TA as needed. In FY15, ENVISION assisted countries in prioritizing pressing programmatic challenges and then translating these needs into specific operational research projects, in collaboration with USAID and its supported projects.

In collaboration with partners, ENVISION staff have provided technical support in identifying major challenges faced by the programs, designing studies, developing protocols, supervising implementation, and supporting the interpretation of results and dissemination of findings through publications.

FY16 Technical Objective

Objective: Engage with the research community to facilitate finding new solutions to meet operational challenges.

The ENVISION FY16 work plan identified the following activities to achieve this objective.

FY16 Activities Update

ENVISION has supported operational research activities, principally through providing TA, and has already participated in numerous operational research activities, many of which are complete. The dissemination of these operational research results is scheduled to occur in FY16 (Table 42).

Table 42. NTD operational research under ENVISION, FY16

Operational research activity	ENVISION's role	Status
Diagnostic tool availability and validation		
Exploring alternative indicators for trachoma endpoint decision-making Objective: Identify which tool is best to use with TISs to decide whether MDA can safely be stopped. This activity is part of a multi-center study comparing detection by clinical (TF), infection (PCR), and serological (antibody by ELISA) tools. Collaborators: NTD-SC (012), RTI, GTMP, London School of Hygiene & Tropical Medicine (LSHTM), and WHO Funding: BMGF (through TFGH)	Research programmatic support for TIS and clinical grading Country: Uganda	Field work / data collection: complete Analysis: ongoing

Table 42. NTD operational research under ENVISION, FY16

Operational research activity	ENVISION's role	Status
<p>The epidemiological assessment of LF and OV by ELISA and rapid diagnostic antibody tests Objective: Compare Biplex-RDT and ELISA antibody tests for OV and LF across all age groups. Collaborators: NTD-SC (020), RTI, APOC, MOH, and WHO Funding: BMGF (through TFGH)</p>	<p>Support field-based investigator teams and data management Country: DRC</p>	<p>Field work / data collection: complete Analysis: ongoing</p>
<p>Comparing new serology and RDT tests with skin snip monitoring in OV programs Objective: Compare OV16 ELISA serology and OV16 RDT with skin snips to detect OV infection. Collaborators: NTD-SC (065.3), RTI, APOC, MOH, and Funding: BMGF (through TFGH)</p>	<p>Lead implementation study design, field operations, research support, and data management Countries: Uganda (2015) and DRC (2015)</p>	<p>Field work / data collection: complete Analysis: ongoing</p>
<p>Comparing new serology tests with skin snip monitoring in OV programs Objective: Compare OV16 ELISA serology with skin snips to detect OV infection. Collaborators: NTD-SC (065.3), RTI, APOC and MOH Funding: USAID and BMGF (through TFGH)</p>	<p>Lead implementation study design, field operations, research support, and data management Country: Senegal (Kolda and Tambacounda regions)</p>	<p>The survey was conducted in 2014 (FY14), but the analysis of the Ov16 (and Wb123) ELISA tests remains incomplete.</p>
<p>Determination of LF status in areas treated for OV but not for LF Objective: Using WB123 serology and ICT cards (for LF), OV16 ELISA and skin snip (for OV) to assess the impact of IVM treatment for OV in locations where residents have not yet been treated for LF Collaborators: RTI, APOC, MOH, CDC, and IMA Funding: USAID (through IMA/CDC and ENVISION)</p>	<p>Co-implementation in collaboration with CDC and IMA; involved in study design, field operations, research support, and data management Country: Senegal (Kédougou)</p>	<p>Manuscript in press Publication / dissemination of results: pending</p>
<p>Develop and test the CCA diagnostic test for SCH Objective: Compare the point-of-contact CCA with the Kato Katz kit for detecting <i>Schistosoma mansoni</i> infections Collaborators: RTI, NTD-SC (060), and MOH Funding: USAID and BMGF (through TFGH for CCA procurement)</p>	<p>Lead implementation, study design, field operations, research support, and data management Countries: DRC and Senegal</p>	<p>DRC: Publication / dissemination of results: pending Senegal: Ongoing field implementation</p>

Table 42. NTD operational research under ENVISION, FY16

Operational research activity	ENVISION's role	Status
Optimizing survey methodology		
<p>Alternative approaches to coverage surveys Objective: Compare the cost, time, and feasibility of three different survey sampling methodologies (Expanded Program for Immunization [EPI] approach, lot quality assurance sampling [LQAS], and design and probability sampling) for conducting coverage surveys. Collaborators: NTD-SC (039), RTI, and WHO Funding: BMGF (through TFGH)</p>	<p>Support coordination, logistics support, training, and data management. Countries: Uganda, Nigeria, and Indonesia</p>	<p>Field work / data collection: complete Analysis: ongoing Final data collection completed in Indonesia in FY16 Q2</p>
<p>Methods for prioritizing trachoma mapping surveys Objective: Develop and validate methodologies for determining which districts should be targeted for district-level prevalence assessments by population-based probability sampling. Collaborators: FPSU (DRC) and RTI (Uganda and Tanzania) Funding: USAID Conference presentations: ASTMH 2014 and Trachoma Scientific Informal Workshop 2015</p>	<p>Design and support field studies, analysis, and reporting Countries: Uganda, Tanzania, and DRC</p>	<p>Field work / data collection: complete Analysis: ongoing</p>
<p>Coverage supervisory tool Objective: Develop a rapid assessment tool to permit program managers to assess coverage and compliance. Collaborators: NTD-SC (043), RTI (Uganda), and WHO Funding: BMGF (through TFGH)</p>	<p>Provide coordination, supervision, logistical support, and training Countries: Uganda and Ethiopia</p>	<p>Field work / data collection: complete Analysis: ongoing</p>
<p>Targeting urban populations: LF transmission assessment in urban cities Objective: Develop a simple, effective sampling strategy to permit program managers to map and monitor MDA in urban settings. Collaborators: RTI and NTD-SC Funding: USAID (through TFGH)</p>	<p>Develop and implement protocol, monitor field operations, and assess outcomes Country: Benin</p>	<p>Field research ongoing in FY16</p>
Improving MDA program elements		
<p>Optimizing approaches to improve MDA data flow Objective: Develop and expand current Health Management Information System (HMIS) SMS-based mTrac system for the collection of MDA indicators and apply automated call system for monitoring drug supply (Reliefwatch). Collaborators: UNICEF, NTD-SC (057), RTI, and Reliefwatch Funding: BMGF (through TFGH)</p>	<p>Develop and implement protocol, support MDA and delivery of drugs, and assess program success Country: Uganda</p>	<p>Study completed; final report to be submitted in FY16</p>

Table 42. NTD operational research under ENVISION, FY16

Operational research activity	ENVISION's role	Status
<p>Incentivizing CDDs and health workers</p> <p>Objective: Review multi-center protocol to assess different mechanisms to enhance the performance of CDDs supporting MDA.</p> <p>Collaborators: NTD-SC (079M), RTI, FHI 360, and MOH</p> <p>Funding: USAID and BMGF (through TFGH)</p>	<p>Develop and implement protocol, manage program data, and assess program success</p> <p>Countries: Cameroon and Uganda</p>	<p>Resubmission of study protocol</p>

2. Dissemination of Lessons Learned and Project Results

Policies, guidelines, and program management approaches for NTDs are “being built as we fly.” Therefore, the timely availability of information, gained through implementation experience, is important to build the existing evidence base on what works (and what does not work) and thus contribute to strengthening policies and guidelines. As USAID’s flagship project on NTDs, supporting MOH efforts in 19 countries, ENVISION has an important leadership role to play in sharing program results, challenges, and lessons learned with the global community. Key topics being addressed include the following:

- Improving coverage through providing strong project management, retaining high-performing drug distributors, ensuring successful social mobilization, addressing side effects, and using quality data;
- Determining how to reach “difficult to treat” populations;
- Assessing the impact of MDA on target diseases and peoples’ lives; and
- Contributing to identifying and addressing operational research questions.

FY16 Technical Objective

Objective: Identify and share programmatic challenges, lessons learned, innovations, and program results.

The ENVISION FY16 work plan identified the following activities to achieve this objective. All products were developed in close coordination with the MOHs to reinforce the importance of country ownership and buy-in, with WHO and with the research community where relevant.

FY16 Activities Update

ASTMH 2015 / Submissions for ASTMH 2016. ASTMH is the primary scientific conference targeted for sharing best practices from the project. This venue provides an opportunity to disseminate country results, lessons learned and challenges. Our presence, in terms of the number of symposia and abstracts accepted, has grown steadily each year since the beginning of ENVISION.

At the 2015 annual meeting held in Philadelphia, PA, ENVISION had its largest presence to date, with 5 symposia, 5 oral presentations, and 15 poster presentations. Thanks to travel support provided by the NTD Support Center with BMGF funding, national NTD program staff from 10 USAID-supported countries presented on their work during the conference. Additionally, they participated in the COR-NTD technical meetings, organized by TFGH, that preceded ASTMH, contributing their perspectives as part of a panel composed of NTD Program Managers and led by ENVISION Project Director, Lisa Rotondo.

ASTMH 2016 will occur in November 2016 in Atlanta GA. In Q2, ENVISION worked closely with USAID to identify topics, submitted proposals for 5 symposia, and began preparing 17 abstracts for oral or poster presentations (submitted for review by the ASTMH scientific program committee in April). Acceptance notifications are expected in May and September, for symposia and presentations, respectively. ENVISION will continue to work with field teams to develop abstracts for submission as late breakers or for other important venues.

Publications. Ensuring that data, information and best practices from the project are available in the public domain is a priority of ENVISION’s MOH and USAID colleagues and ENVISION staff. Complementing conferences / meeting attendance and presentations, peer-reviewed publications are an important channel through which ENVISION’s experiences and achievements are documented, shared with a wide audience, given credibility, and ensure that they influence global NTD policy and practice.

Recognizing the considerable effort that is required to produce peer-reviewed publications, ENVISION has been working closely with USAID to prioritize topics and questions relevant to the project and to advancing the global NTD community’s agenda. A tracker for publications at different stages of development has been shared with USAID and is updated on a quarterly basis. Publications submitted for publication in the first half of FY16 are listed in Table 43; these publications focus on documenting trachoma mapping and LF impact results and lesson learned for building strong partnerships.

Table 43. Key manuscripts submitted for publication through ENVISION-MOH collaboration in FY16*		
Title	ENVISION contributing authors (RTI unless otherwise stated)	Journal to which submitted
Progress of trachoma mapping in mainland Tanzania: prevalence of baseline surveys in 2012 to 2014	Jeremiah Ngondi, Kathryn Crowley, Lisa Rotondo	Ophthalmic Epidemiology
Baseline trachoma surveys in Kaskazini A and Micheweni districts of Zanzibar: Results of two population-based prevalence surveys conducted with the Global Trachoma Mapping Project	Jeremiah Ngondi, Lisa Rotondo	Ophthalmic Epidemiology
Trachoma mapping results in Mozambique	Phil Downs, Sharone Backers, Amir Bedri (LFW), Laura Senyonjo (Sightsavers)	Ophthalmic Epidemiology
Successful NTD Program in Haiti and the Underlying Programmatic Strategies	Abdel Direny, Sarah Carciunoiu (IMA), Lior Miller (IMA), Katie Crowley, Kalpana Bhandari, Eric Ottesen, Maggie Baker	PLoS NTDs

Table 43. Key manuscripts submitted for publication through ENVISION-MOH collaboration in FY16*		
Title	ENVISION contributing authors (RTI unless otherwise stated)	Journal to which submitted
Brugia Rapid™ antibody responses in communities of Indonesia in relation to the results of ‘transmission assessment surveys’ (TAS) for the lymphatic filariasis-elimination program	Molly Brady, Wita Larasati, and Herty Herjati	Parasites & Vectors
Evaluation of Lymphatic Filariasis and Onchocerciasis in Three Senegalese Districts Treated for Onchocerciasis with Ivermectin	Achille Kabore	PLoS NTDs
Establishing baseline prevalence using POC-CCA and Kato-Katz diagnostic techniques	Achille Kabore	PLoS NTDs
Ecological drivers of <i>Mansonella perstans</i> infection in Uganda and patterns of co-endemicity with lymphatic filariasis and malaria	Ambrose Onapa	PLOS-NTD
Ethiopia and its steps to mobilize resources to achieve 2020 NTD elimination and control goals	Scott McPherson, Katie Crowley, and Hannah Frawley	International Health
The Neglected Tropical Disease Non-governmental Development Organization Network (NNN: The value and future of a global network aiming to control and eliminate NTDs)	Lisa Rotondo	International Health
Mapping of Bancroftian Filariasis in Cameroon: Prospects for Elimination	Yaobi Zhang, Ann Tarini, Julie Afame (all HKI)	PLOS-NTD

* Note that these are in addition to manuscripts being developed as part of operational research collaborations, which are listed in Table 20 (NTD operational research under ENVISION, FY16).

Data analysis to support the global learning agenda: As ENVISION moves into a new phase of the project with increased focus on using data to contribute to global learning on NTDs, ENVISION’s M&E team is rapidly increasing its capacity for data analysis. Examples of data analysis efforts conducted this year that inform the global learning agenda include addressing questions such as:

- What are the determinants of TAS failure?
- What is the projected size of the gap in funding of STH treatments?
- What are the relative strengths and weaknesses of different platforms for delivering STH and SCH treatments?
- Is there gender equity in MDAs?
- What has been the cost and impact at country level of the social mobilization strategies implemented?
- How accurate are routinely reported coverage results?

It is expected that these lines of enquiry will lead to future publications and presentations.

To strengthen in-country capacity to present and publish results, ENVISION is holding **scientific stature workshops** for project and MOH staff on data analysis, interpretation, and writing. Supporting MoH with writing of publications is a great capacity building tool, and a channel through which country MOH achievements are recognized and documented for the future. In Tanzania, two workshops were held in the first half of FY16, led by Senior Regional NTD Technical Advisor Jeremiah Ngondi and supported by HQ-level TAs who were in country at that time. The first workshop focused on examining the data and proposing key ideas and topics, and writing started in the second workshop. Following these workshops, a technical writing group (including IMA, the National Institute for Medical Research [NIMR], and TZ NTD Control Program) was set up to support continued writing efforts. Two papers have since been accepted for publication (see Table 21), and several other drafts are in the pipeline. The lesson learned through this effort is that significant support beyond workshops is required to continually mentor writers all the way to successful publication. The second half of FY16 will focus on developing a support plan for Uganda to ensure that the efforts put into the FY15 workshop bear fruit.

3. Global Partnerships

Policy dialogue occurs at many different levels, starting globally but extending to the national, regional, and local levels. At each of these levels, ENVISION plays an active role, bringing its real-world experience to bear on policy decisions. ENVISION staff work closely with USAID to provide technical leadership by actively participating in global and national forums, including with WHO and the pharmaceutical donor community and at the national MOH level.

FY16 Technical Objective

Objective: Help translate the knowledge gained into new evidence-based NTD policies through strong working global partnerships by, for example, participating in the following:

- WHO global forums;
- NTD Global Medicines forums; and
- Other global forums

FY16 Activities Update

Participation in WHO global forums.

ENVISION staff continued to represent the project and project-supported country programs at WHO technical meetings during FY16. Because ENVISION staff are intimately involved with national NTD program implementation, their participation helps national NTD program perspectives be heard in global WHO policy development meetings in both Geneva and regional HQs. In addition, our staff bring first-hand knowledge of the tools developed by or with support from ENVISION that are now adopted by WHO's global NTD programs. Highlights from ENVISION's participation in global meetings and working groups in FY16 so far is provided below.

In Q1, ENVISION (Senior Manager, Achille Kabore) attended the **WHO African Region NTD RPRG Third PC meeting (October 1–2, 2015)**. The RPRG meeting was a combination of open plenary meetings and break outs of countries divided into working groups based on various thematic areas. The main focus of the meeting was drug applications, usage, and reporting. During the meeting, AFRO reported that drug

applications are often incomplete or inaccurate and that 30% of the drugs donated last year were unaccounted for. As a result, ENVISION has committed to work more closely with the MOHs to ensure accurate applications and reporting.

ENVISION (Senior Manager, Molly Brady) participated in the **WHO SEARO Programme Managers and RPRG meetings (November 9–16, 2015)** to ensure that ENVISION was represented at these meetings and to advocate for solutions to technical issues of concern in ENVISION-supported countries, including Bangladesh, Indonesia, and Nepal. Global and regional updates by WHO staff highlighted the striking progress made by the LF-elimination program in (a) mapping, (b) scaling up the number of treatments delivered, and (c) the number of TAsS conducted. Of particular interest was the submission of dossiers by three endemic countries in the region, signaling the successful completion of their elimination efforts. Other updates included the recently finalized process of the validation of elimination of LF as a public health problem and the recent efforts of WHO to develop a toolkit of resources for MMDP activities to set up effective programs and monitor them. Program managers from ENVISION-supported countries (Bangladesh, Indonesia, and Nepal) and other managers provided summaries of progress made in LF and STH programs.

During the SEARO RPRG, ENVISION requested a small group meeting of WHO and RPRG members to consider unique challenges and additional support for the Indonesia NTD program. Accordingly, a special meeting chaired by the Director of the Department of Communicable Diseases (CDS) of SEARO was organized to examine the special needs of the Indonesian program. The meeting was attended by members from WHO HQ and the Regional Office (SEARO), the Indonesian program team, and ENVISION and USAID representatives. The meeting acknowledged the significant progress made in NTD control and the strong political commitment demonstrated by the country. The group also recognized that the country deserved special attention to ensure that the elimination goals would be met in a timely fashion. As a result, WHO organized a visit by a high-level expert delegation to facilitate discussions and secure commitment on issues such as assured funding, the use of donated drugs in MDA programs, improved supply chain management, and enhanced monitoring and reporting.

ENVISION was represented by Project Director Lisa Rotondo at **ITI's TEC Meeting (November 2015)**. Lisa became a member of the TEC at this meeting. During the meeting, the TEC reviewed the largest number of applications to date: for 2016, requests for ZTH were submitted for 165 million treatments covering 1,174 districts across 31 countries, and of these, TEC approved 129 million treatments in 946 districts. ZTH applications from 11 ENVISION-supported countries were reviewed. ENVISION representation at these meetings is important for monitoring and informing the global plans for ZTH allocation, especially in 2016, because production has been delayed.

ENVISION staff (Kabore) took part in the **APOC Joint Action Forum (JAF) (December 13–17, 2015)** to monitor plans for the closure of APOC and the transition to ESPEN. During the meeting, JAF participants proposed a liaison position within AFRO because the administrator role will no longer be provided from within APOC. The group suggested that this position could be funded by NGO partners, as was done for the previous position. ENVISION representation was important in monitoring the transition of support in areas previously supported by APOC and the emerging plans for ESPEN.

ENVISION participated in the **7th WHO M&E Working Group Meeting (February 17–19)** in Geneva. Katie Zoerhoff served as rapporteur for the meeting and presented the results from the implementation of DQAs in four countries. As a result of the meeting, WHO recommended the DQA for final revisions and adoption as a WHO-approved resource. This tool is expected to be placed on the WHO website. A key recommendation that arose from the meeting was the need to move from an emphasis on tool development toward tool dissemination. ENVISION is in the process of creating a dissemination plan, which will be available in the second half of FY16. Plans have also been developed for the dissemination

of ENVISION tools and resources through the NTD Toolbox (see the Capacity-strengthening section for more details).

Participation in NTD Medicines Forums.

In FY16, RTI continues to provide leadership to initiate donor coordination mechanisms to strengthen procurement in support of country programs. In addition to our ongoing participation in WHO-led discussions about PZQ procurement, RTI worked with WHO and the drug donation programs, particularly ITI, to track applications, approvals, and shipments of donated IVM, ALB, MEB, and ZTH. As such, ENVISION continued to play an important role in facilitating communication between national NTD and drug donation programs.

In FY16, ENVISION attended the **STAG NTD WGA subcommittee meeting (March 30–31, 2016)**. ENVISION representatives included Katie Crowley and Amy Doherty, with Eric Ottesen representing TFGH. The main goals of the meeting were to provide an update on the distribution of Merck-donated PZQ, updates from other PZQ donors, updates on WHO’s prequalification process, and work with PZQ manufacturers. ENVISION participated in discussions with DFID, SCI, WHO, and Merck about the distribution of Merck-donated PZQ to ENVISION, END in Africa, and SCI countries. Katie Crowley served as rapporteur at the request of WHO’s Azadeh Baghaki.

At the NTD WGA, ENVISION staff met with representatives from Merck, SCI, DFID, and WHO to discuss harmonizing procurement and forecasting. Notable outcomes included an agreement to hold regular teleconferences every two months to monitor PZQ supply and demand. In addition, DFID committed to developing a spreadsheet to coordinate forecasts and procurement among DFID, USAID, and Merck. RTI shared the WHO JAM with all partners, and WHO agreed that USAID and DFID could have access to information about when the JAM is submitted.

RTI staff also attended the **NTD Supply Chain Forum (January 19–20, 2016)** and provided new and much appreciated insight into supply chain issues and drug donations from the implementing partner perspective. The NTD Supply Chain Forum is a small group composed of the companies that donate NTD drugs, the donation program administrators, WHO, DHL, and BMGF. The group is generally concerned with the “first mile”—forecasting, quantification, manufacture, and shipping to the beneficiary countries. The group meets three times each year to discuss common issues and progress on key activities; in the past, however, implementing countries and partners have not participated.

Through ENVISION participation, RTI presented an overview of the challenges reported by ENVISION countries and implementing partners, including the complexity of the JAM, the lack of communication to countries and partners at all stages of application review and before drug shipping, and the difficulties facing country programs when drugs arrive late. RTI also learned more about how WHO reviews and approves drug applications and made contact with drug donation programs, particularly Merck KGaA PZQ, which will facilitate greater communication and, hopefully, improved information for country programs about when drugs will be shipped. RTI provided recommendations to the group, particularly regarding how WHO can improve communications with countries and partners and changing deadlines to help prevent late drug arrival.

Participation in other global forums.

ENVISION project staff also participated in other critical global-level working groups, as summarized in Table 44. These, along with a number of global meetings (Annual Meetings for Uniting to Combat NTDs, Global Alliance to Eliminate Lymphatic Filariasis [GAELF], Global Elimination of Blinding Trachoma by 2020 [GET2020], TCC, and the International Coalition for Trachoma Control [ICTC]), continue to be important forums in which ENVISION has shared experiences from USAID-supported countries;

significantly shaped the formulation of policies, strategies, and best practices for NGDO support to national NTD programs; and highlighted gaps requiring programmatic support or funding. To date in FY16, ENVISION has contributed to the Uniting to Combat NTDs Scorecard Review, which will be released in early May. With the strong participation of NGOs in FY16, the fourth report is expected to include a more critical analysis of progress on each of the diseases.

In October 2015, ENVISION collaborated with ITI, Pfizer, USAID/Washington, DC, and USAID/Ethiopia to **celebrate the 500 millionth dose of ZTH shipped**. The in-country event and global media attention allowed ENVISION, pharmaceutical partners, endemic country governments, and the drug donation programs an opportunity to highlight the historic donations of pharmaceutical products to the global NTD control and elimination campaign. The event also included an announcement regarding the significant expansion of the national trachoma elimination program in the country.

Table 44. ENVISION staff contributions to global working groups beyond WHO

ENVISION staff	Name of working group or sub-working group
Lisa Rotondo	NNN Chair (Chair as of October 2015) and Executive Committee
	Uniting to Combat NTDs Stakeholder Working Group, under NNN role
	GTMP Advisory Committee and Tropical Data development group
Eric Ottesen	BMGF STH External Advisory Group
	Coalition for Operational Research on the NTDs, TFGH
Achille Kabore	GSA – Co-Chair, Implementation Working Group
Molly Brady	LF NGDO Network: Appointed as Vice-Chair in September 2014 NNN Executive Committee
Philip Downs	STH Coalition
	LF Network – WASH: Represented LF network at WASH working group meeting at NNN
Sharone Backers	NNN WASH Working Group
Scott McPherson	NNN Disease Management, Disability and Inclusion (DMDI) Working Group
Alex Pavluck	GTMP Advisory Committee

4. Technical Assistance Facility (TAF)

Originally designed to support TA requests by any NTD-endemic country, including the ENVISION-supported countries, the scope of TAF has progressively evolved and currently focuses on non-ENVISION-supported countries. ENVISION designed the TAF to be flexible and responsive, with the level of effort determined by demand and coordinated through a small ENVISION management and technical team accessing a broad range of consultant expertise. In recent years, the number of requests put forward to the TAF has notably decreased, as its scope is more defined and TA is provided through other channels.

FY16 Activities Update

In FY16, RTI created an Excel-based database of consultants highlighting key characteristics, such as expertise, language, and location. This database will allow RTI to better organize and access consultants who could potentially support future TAF requests, and to identify opportunities to build local capacity.

Table 45 provides a summary of FY15 TAF activities that continued into FY16. The primary focus has been supporting the rollout of DQAs in Guinea Bissau, Ivory Coast, and South Sudan. All three of the DQA TAF requests have been completed, and RTI is in the process of reviewing the final reports. As of March 31, 2016, RTI has not received any new TAF requests this year.

To develop regional capacity for conducting NTD DQAs, RTI selected two Senegalese consultants to support DQA TAF assignments in Guinea Bissau and Ivory Coast. Both consultants were well qualified but lacked intensive experience with conducting DQAs. Each strengthened their skills under close mentorship from ENVISION's RPA in Senegal while providing TA.

Requester	Country	Topic	Status
USAID	Vietnam	LF-elimination dossier development	Complete (transferred from TAF to direct ENVISION funding)
Sightsavers	Guinea Bissau	DQA rollout	Final report under review by RTI
Sightsavers	Ivory Coast	DQA rollout	Final report under review by RTI
Sightsavers	South Sudan	DQA rollout	Final report under review by RTI

APPENDICES

Appendix 1: Multi-year Results, USAID Portfolio

Appendix 2: RTI Organizational Chart

