

MID-TERM EVALUATION

Project: 'Epidemic Control and Reinforcement of Health Services (ECRHS) Project in Sierra Leone'

Implemented By: CARE Sierra Leone

Donor: KfW

Evaluation Conducted By:
Faheem Khan (Team Leader),
Development Technicians LLC, USA
Teddy Morlai (Quantitative Lead),
Inclusive Development & Research Consultancy

Final Report By:
Faheem Khan (faheem@devtechnicians.com)

July 2017

TABLE OF CONTENT

EXECUTIVE SUMMARY	v
1. INTRODUCTION	1
1.1 Background to the project	1
1.2 Purpose and Objectives of the Evaluation.....	1
2. THE EVALUATION METHODOLOGY	2
2.1 Design and coverage	2
2.2 Sample size and sampling selection procedure.....	3
2.3 Sources of information	4
2.4 Evaluation tools, training and field data collection.....	5
2.5 The evaluation team and reporting structure.....	6
2.6 Data analyses and presentation	6
3. FINDINGS IN RELATION TO STANDARD EVALUATION CRITERIA	7
3.1 Achievements of outcomes/intermediate results.....	7
3.2 Analysis and achieved results	11
3.3 Efficiency and Effectiveness of the ECRHS project.....	28
3.4 Health Facility Mapping.....	29
3.5 Innovations and Lessons Learnt.....	29
3.6 Gaps/challenges in the ECRHS project implementation.....	31
4. CONCLUSIONS AND RECOMMENDATIONS	33
4.1 Conclusion.....	33
4.2 Recommendations	33
5. ANNEXES	36

LIST OF TABLE

Table 1: Sample size covered during the MTE exercise.....	4
Table 2: Achieved results on overarching program objective	9
Table 3: Table showing project baseline, targets and actual achievement	10
Table 4: Community responses to risk minimising behaviour	12
Table 5: Basic health services proved by level of health service delivery	16
Table 6: Basic health services provided by PHUs at district level	16
Table 7: Availability of basic items for routine deliveries and neonatal care.....	16
Table 8: Availability of basic items for routine deliveries and neonatal care at district levels	17
Table 9: Proportion of PHUs reporting availability of IPC materials	22
Table 10: Means of referrals reported by PHUs in the intervention zone	23
Table 11: Responses on decision making regarding sexual relations, contraceptive use and reproductive health care	25
Table 12: Responses to improved family and community resilience built by the project	25

Table 13: Total number of health facilities available in the intervention zone by level of functionality	29
--	----

LIST OF FIGURES

Figure 1: Map showing ECRHS project districts covered during the evaluation exercise.....	3
Figure 2: Training in Kingtom, Sierra Leone	5
Figure 3: % increase of PHUs which offer basic health services (immunization, safe delivery, family planning).....	7
Figure 4: % increase of PHUs which offer HIV counseling and testing	8
Figure 5: % change in negative livelihoods coping strategies reported by beneficiary households	9
Figure 6: Responses to availability of effective surveillance structures at community level	12
Figure 7: Sources of drinking water reported by households	13
Figure 8: Common Tippy-taps used in some communities	13
Figure 9: unsafe stream water used by some residents in Tealia village, Koinadugu district	14
Figure 10: Types of facilities targeted	15
Figure 11: proportion of PHUs by type offering all basic health services.....	15
Figure 12: % of PHUs reporting stock of essential ANC and child health medicines	18
Figure 13: Drugs stock-out report.....	19
Figure 14: Reported causes of stock-outs of drugs at PHUs in ECRHS project areas	19
Figure 15: Staff training on IPC and motivation	20
Figure 16: % of PHUs reporting linkages with community surveillance system in ECRHS project intervention zone.....	21
Figure 17: Level of preparedness expressed by PHUs for future disaster	22
Figure 18: Poor road network observed during MTE field exercise in Koinadugu district	23
Figure 19: Responses to availability and use of Family Planning services	24
Figure 20: % of ECRHS beneficiaries reporting hunger as a proxy for food insecurity measure	26
Figure 21: Dietary diversity reported in project intervention areas	26
Figure 22: Seed Voucher beneficiary posing at her vegetable gardening & nursery	27

ABBREVIATIONS / ACRONYMS

ABC Development	Association for the Wellbeing of Rural Communities and Development
ANC	Ante-Natal Care
CFW	Cash for Work
CHC	Community Health Centre
CHP	Community Health Post
CHW	Community Health Worker
CLTS	Community Led Total Sanitation
CWG	Community Watch Group
DHMT	District Health Management Team
DMO	District Medical Officer
ECRHS	Epidemic Control and Reinforcement of Health Services
ERP	Emergency Response Plan
EWVS	Early Warning System
F2F	Farmer to Farmer
FFS	Farmer Field School
FFW	Food for Work
FGD	Focus Group Discussion
HFAC	Health for All Coalition
HQ	Head Quarters
IMNCI	Integrated Management of Neonatal and Childhood Diseases
IP	Implementing Partner
IPC	Infection Prevention Control
IR	Intermediate Result
KII	Key Informant Interview
KfW	German Development Cooperation
LARC	Long Acting and Reversible Contraceptive
MADAM	Mankind's Activities for Development Accreditation Movement
MAFFS	Ministry of Agriculture Forestry and Food Security
MCHP	Maternal & Child Health Post
MoHS	Ministry of Health and Sanitation
MIS	Management Information System
MTE	Mid-Term-Evaluation
PAC	Post-Abortion Care
PHU	Peripheral Health Unit
PLW	Pregnant and Lactating Women
PMTCT	Prevention of Mother-to-Child Transmission
RODA	Rofutha Development Association
SBA	Skilled Birth Attendant
SLA	Service Level Agreements
SRH	Sexual Reproductive Health
TBA	Traditional Birth Attendant
ToR	Terms of Reference
VSLA	Village Savings and Loan Association
WASH	Water Sanitation and Hygiene
WHO	World Health Organisation

EXECUTIVE SUMMARY

The Epidemic Control and Reinforcement of Health Services (ECRHS) project is funded by the German Development Cooperation (KfW) as a direct response to the Ebola outbreak, for the period 1 November 2015 to 31 May 2017. ECRHS reaches 400 communities in the four northern districts of Bombali (100), Tonkilili (110), Kambia (90) and Koinadugu (100), where the Ebola outbreak was prominent. ECRHS also reaches 233 Peripheral Health Units (PHU) located in these districts.

The Ministry of Health and Sanitation (MoHS) is the executing agency, and the project is implemented through CARE and three national partners – Mankind's Activities for Development Accreditation Movement (MADAM), Rofutha Development Association (RODA), and Association for the Wellbeing of Rural Communities and Development (ABC Development), together with active partnership with the Mano River Union Secretariat, the Health for All Coalition (HFAC), and the Government of Sierra Leone Ministry of Health and Sanitation (MoHS).

The Ebola epidemic was contained at the onset of the project, where Sierra Leone was declared Ebola free on 7 November 2015 by the World Health Organisation (WHO). The ECRHS project nonetheless continued its implementation, focusing on strengthening “systemic” structures both within the community, as well as the broader government support structures.

The overall goal of ECRHS is to “Improve the health status of Sierra Leoneans in four northern districts (Bombali, Tonkilili, Kambia and Koinadugu). To achieve this goal, the project had three primary objectives: 1. Contain and stop the Ebola outbreak; 2. Stabilise the Health System; and 3. Increase Resilience among the affected population.

The MTE employed a mixed-methods approach, using both *quantitative* and *qualitative* tools for data collection and analysis. A total of 429 households were interviewed as part of the household sample survey, as well as 34 community level FGDs were conducted to collect both quantitative and qualitative data. A total of 55 Key Informants were interviewed, a mix of implementing partners, government partners, and CARE to collect qualitative data. Additionally, 37 PHUs were visited to conduct qualitative surveys with staff working in these Health Facilities.

KEY FINDINGS

Achievement of Overarching Program Objective

The evaluation captured four program level indicators to assess the overall achievement of the project goal: i) Ebola incidence maintained at zero (resilient zero) in the intervention zone, ii) Percent increase of PHUs which offer basic health services (immunization, safe delivery, family planning services, HIV testing, counselling and treatment), iii) Percent increase of PHUs which offer HIV counselling and testing, and iv) Percent reduction of beneficiary households in target communities reporting negative livelihoods coping strategies.

Since Sierra Leone was declared to be Ebola free in November 2015, there have only been two reported cases of Ebola. The ECRHS program was therefore initially designed to provide response to on-going Ebola transmission and prevent the emergence of new cases in affected areas (hot spots). Accordingly, the incidence of Ebola has been contained over the project life, and hence the **Program level indicator of maintaining Ebola incidence at a resilience zero has been largely achieved over the 12-month implementation period of ECRHS Phase I.**

Increasing the number of PHUs which offer basic health services including immunization, safe delivery and family planning from a baseline value of 59.6 percent to a target of 70.0 percent was achieved; and this

was tested to be statistically significant at 95% level of confidence. The Mid Term Evaluation (MTE) revealed 100 percent of all health facilities assessed reportedly offering these basic health services across the intervention districts. This is an especially significant achievement by the ECRHS intervention-considering that the ECRHS program was designed at a time many people have lost trust in the health system and have already decided not to seek services for fear that they would be exposed to Ebola virus if they visit a health facility.

The proportion of PHUs which offer HIV counselling and testing proved to have significantly increased by 74% from a baseline value of 11.7 percent to MTE result of 85.7 percent. This MTE result therefore indicates that the ECHRS program has contributed to a larger extent towards improved service readiness for HIV counselling and testing in the intervention districts.

However, the MTE findings revealed that the ECRHS program made little progress towards reducing negative livelihood coping strategies. There was a reported increase in beneficiary households involved in negative coping strategies across the intervention districts. 79.4 percent (about 16% increase in baseline value) of livelihoods beneficiaries interviewed reportedly involved in all consumption soothing coping strategies in the last 30 days preceding the interviews. However, the programmatic **target of reaching 2,000 beneficiaries with the CFW programme was fully met.**

The table below presents progress made in achieving program level indicators and the resultant changes at 95 percent level of significant.

Objective Indicators	Baseline	Target	Achieved result	z-score	p-score	Result	Comment
1. Ebola incidence maintained at zero (zero resilience) in the intervention zone	0.0%	0.0%	0.0%		n/a	n/a	Zero resilience maintained
2. % increase of PHUs which offer basic health services (immunization, safe delivery, family planning services)	59.6%	70.0%	100.0%	4.3	P<0.0001	P<0.05	Statistically significant change
% increase of PHUs which offer HIV counselling and testing	11.7%	13.0%	85.7	6.4	P<0.0001	P<0.05	Statistically significant change
3. % reduction of beneficiary households in target communities reporting negative livelihoods coping strategies	63.6%	58.6%	79.4%	5.1	P<0.0001	P<0.05	Highly significant increase in negative coping strategies

Achievement of outcomes/intermediate results

“IR 1.1 Effective surveillance, contact tracing and alert systems in place and functioning at community level” – has been largely successful where Community Watch Groups (CWG) are operating effectively where 91.2 percent of FGD respondents were confident they had functional surveillance structures in place. However, with the additional indicators¹ requested to be added by the project management to this survey, the project was largely unsuccessful in changing behaviours of communities to adopt appropriate procedure in the event if Ebola was detected in their community.

¹ Additional indicators collected in the MTE, which were not reflected at the start of the project included

- % community members agreeing to call 117 or isolate sick relative showing signs and symptoms of Ebola until after swabbing results (Result at MTE – 34.7%)
- % community members agreeing to call 117 or isolate relative who dies with signs and symptoms of Ebola until after swabbing results (Result at MTE – 37.8%)
- % community members agreeing to seldom or not shake hands when greeting (Results at MTE – 34.5%)

Against “IRI.2: Improved knowledge and changed behaviours to prevent Ebola transmission at community level,” it is seen the project was largely successful in developing awareness in communities where 81.1 percent respondents correctly stated three means of Ebola transmission, prevention, signs and symptoms. However, only 45.2 percent were willing to await swabbing of relatives before burial indicating that there is more analysis and effort required to understand why people are not adopting appropriate practices and behaviours.

In the area of access to safe drinking water, 63.4 percent household survey respondents shared they now have access to safe drinking water, exceeding the target of 22.0 percent as set by the project. This is expected to rise further over the coming months as the rehabilitation of the 80 water points was only completed recently in May-June 2017, and many of these are now awaiting chlorination and cleaning. 33.8 percent household survey respondents shared they now have safe hand washing facilities, exceeding the target of 15.0 percent as set by the project. The additional indicators taken in this survey indicates the project had some success in changing behaviours for communities to adopt appropriate hygiene practice where 56.4 percent washed hands before preparing food, and 56.9 percent washed hands after using the toilet or handling garbage.

Objective 2 was to “Stabilise the Health System.” **The ECRHS project had mixed results.** With regards to building the knowledge capacity of PHU staff, the project was successful where it facilitated the training on Infection Prevention Control of 92.4 percent of PHU staff in its catchment areas, and ensured that 87.5 percent of PHUs were providing both HIV counselling and testing. However, PHUs continue to lack medicine and equipment to provide essential services, which is a reflection of the poor resources within the MoHS and the District Health Management Teams (DHMT). Notably, 89.2 percent PHUs reported they have stock-out of essential drugs, which supports the responses of where only 27.0 percent PHUs said they have essential stocks of infection prevention control supplies; and only 21.6 percent said they have the necessary supplies and equipment to provide routine services. PHUs appeared to be somewhat better prepared for ANC services where 62.2 percent said they have no stock-out of essential ANC medicines, which is relatively better than the other services provided, yet still quite low to make the PHU effective with ANC care. More concerning was that only 55.9 percent PHUs felt they were prepared and ready for future potential disasters.

Reviewing these various results, the MTE concludes that the project had limited progress on developing the capacity of PHUs. This is not entirely a reflection on the ECRHS project, but rather highlights the poor resources within the MoHS and DHMTs to be able to adequately provide the PHUs with the necessary equipment and medicine they require to be effective.

Objective 3 attempted to build the resilience of participating households through the Seed Voucher and cash for work components. The programmatic target of reaching 6,000 beneficiaries with the seed vouchers was overwhelming achieved, as up to 8,539 individuals benefited from all four districts. In addition, the Cash for Work (CFW) programme reached target as 2,000 benefited from the programme. The project was largely successful in the Seed Voucher component where 75.5 percent respondents said they were appreciative of this intervention. However, when looking at the indicators, it is evident these two interventions has had little impact in strengthening the resilience of these households. Only 5.4 percent households claimed to be food secure, which meant that 94.6 percent households remained food insecure, where 91.1 percent households ate less than two meals a day, and 90.7 percent households adopted coping strategies by eating less preferred food.

This assessment also looked at sexual and reproductive health issue around Family Planning (FP) service provision and utilisation of service. Whereas an extremely high number of PHUs (about 95%) reportedly

provide at least one stock of modern contraception, demand by service users (women aged 15-49 years). Accordingly, only an approximated 40 percent of 385 women of reproductive age (15-49 years) are reportedly using modern methods of contraception. In addition rate of first time users of modern contraception methods is very low (about 1%), which signals low sensitisation and counselling, and limited access to contraception in the ECRHS intervention zone. This was confirmed by about 52 percent of women aged 15-49 who claimed limited access to modern contraceptives. Below are key results from responses on decision making regarding sexual relations, contraceptive use and reproductive health care.

The table below depicts a summary of project intermediate results level from the assessment in comparison to the targets.

Intermediate Results/outcomes	Indicators	Baseline	Target	Achievement of target
Objective 1: Contain and stop the Ebola outbreak				
IR1.1: Effective surveillance, contact tracing and alert system in place	▪ % of communities within intervention zone with functional surveillance structures	60.8%	70.0%	91.2%
IR1.2: Improved knowledge and change behaviours to prevent Ebola transmission at community level (social mobilisation)	▪ % of population within intervention that can correctly state three means of Ebola transmission, prevention and signs and symptoms	90.0%	90.0%	81.1%
	▪ % of population within intervention zone willing to await swabbing before burial of relatives suspected of Ebola	95.0%	95.0%	45.2%
IR1.3: Improved access to and behaviours concerning water, sanitation and hygiene	▪ % of households within the intervention zone that have access to safe drinking water	18.5%	22.0%	64.3%
	▪ % of households within intervention zone with hand washing facilities	10.0%	15.0%	33.8%
Objective 2: Stabilise the Health System				
IR2.1: The PHUs are able to provide essential health services	▪ % of PHUs which offer basic health services (immunisation, safe delivery, family planning services)	59.6%	70.0%	100.0%
	▪ % of PHUs within intervention zone with essential stocks of infection prevention control supplies (gloves, masks, bucket for hand washing)	51.0%	55.0%	27.0%
	▪ % of PHUs within intervention zone with supplies and equipment to provide routine services (no stock out)	51.0%	55.0%	27.0%
	▪ % of PHUs within intervention zone that have stock of essential Ante-Natal Care (ANC) medicines (no stock out)	14.0%	20.0%	62.2%
	▪ % of PHUs within intervention zone that have stock of essential child health medicines	74.0%	80.0%	18.9%
	▪ % of PHU personnel trained within intervention zone on Infection, Prevention and Control (IPC)	90.0%	90.0%	92.4%
	▪ % of PHUs which offer HIV counselling and testing	11.7%	13.0%	85.7%
	Objective 3: Increase resilience among the affected population			
IR3.1: Improved family and community resilience to shocks	▪ # of farmers who receive seed vouchers	0	6000	8539
	▪ # of households who benefited from the Cash for Work (CfW) activities in the community	0	2000	2000

In terms of relationship with the government, the evaluation team was impressed with the level of collaboration between the project and the various government partners. There are instances that the project can reconsider, such as greater involvement of the district Water Directorate in the selection of Contractors – however, **overall the project has done very well** in cultivating relationships with government counterparts.

CONCLUSION AND RECOMMENDATIONS

The project made significant successes in establishment of community based surveillance structures and effective coordinated processes in the varied districts. In particular, the Community Health Workers (CHWs) are continuously engaged in collecting surveillance information in their communities, and prepare Health Management Information System (HMIS) reports each month and submit to PHUs. The PHUs further collate the information submitted by CHWs and forward to the DHMTs, who in turn update the central MoHS information system. This system has worked well, and proved to be very instrumental in detecting new epidemics at community level. The design of the project and implementation strategies proved appropriate; and have largely contributed to containing and preventing disease outbreak in the target region.

Notwithstanding, achieving the stabilization of the health system with essential services proved difficult within the project intervention area because it were not a directly project deliverable. This is the reason why most indicators under 'IR2.1: PHUs are able to provide essential health services (basic/primary health services are ensured)' were not reached.

While the project design succinctly takes into account a longer-term view and works towards putting in place preparations for transition to an extended health system strengthening (HSS) efforts, a number of recommendations have been made to improve of future project performance.

- Already there are Community Health Workers (CHWs) present in every community and are well connected with the health system in the ECRHS intervention zone. These structures must be encouraged to periodically continue with sensitisation and community-based surveillance activities and report to PHUs as may be required. Continued engagement of communities on risky behaviours that may perpetuate Ebola and/or similar epidemic is critical to maintain gains made from the ECRHS project intervention. While the ECRHS project has undoubtedly contributed to (and maintained to a larger extent), improved knowledge on means of Ebola transmission and prevention, behaviour change remains critical in the intervention zone. Community members demonstrated high level of complacency now that Ebola epidemic has subsided. The proportion of community members who claimed to engage in risky behaviours such as touching sick and deceased relatives showing signs and symptoms of Ebola without swabbing was significantly high. These are existing potentials that would perpetuate the spread of an epidemic once an outbreak occurs.
- It is undoubted that the ECRHS project achieved in putting in place an effective community surveillance structures largely comprising of Community Health Workers (CHWs). It is recognised the ECRHS project evolved as an emergency response to the Ebola outbreak. However, the Ebola threat has subsided, and the project now has an opportunity to work on more "systemic" issues leading to long-term sustainable development. The project, over this past 19 months, has firmly established relationships with the MoHS, and the DHMTs in its four target districts. The project now has the opportunity to build on this relationship over the one-year extension, and into the new phase of the project. The project should therefore ensure in the extension phase that its cadre of CHWs is more

efficient, and effective in their roles on sensitisation, reporting to PHUs, and to link the community to the PHU.

- Cross-border migration continues to be a significant threat. Migrants from Guinea in the north of Sierra Leone, travel with ease into this country to take advantage of the better and free health services offered in the PHUs. This invariably comes with a great deal of risk as migrants can potentially carry illnesses, which can infect the local population, leading to epidemics. The project has sensibly partnered with the Mano River Union Secretariat to help monitor such movement, and it is highly recommended this partnership be strengthened. However, the ECRHS project, as a stand-alone, can have little impact on trans-boundary migration, as this requires a higher-level advocacy programme involving Liberia, Guinea and Sierra Leone to find ways to mitigate this issue. This is well beyond the scope of the ECRHS project.
- Further mapping and provision of water facilities is crucial in efforts to control epidemics in the project intervention zone. Efforts should be made to include this in an extended phase of the project to reach more communities.
- The ECRHS project can also initiate pilots on rainwater harvesting, by collecting rain water from drainage systems on roofs or other means. Sierra Leone is rich in rainwater with rainfall over the months of April to December, during which time rainwater harvesting can be an excellent approach to capture water. Adopting this approach, will greatly reduce the stress on community water points. The same concept can be applied to PHUs.
- Efforts to strengthen the post-Ebola health system in an extended phase of the ECRHS project must also include Sexual and Reproductive Health (SRH) services that was observed to be particularly problematic from the baseline results. Whilst the supply of modern contraception methods a very high at the service provider side, public demand from eligible clients (women age 15-49) proved to be very low. More community mobilisation and engagement, and creation of adolescent and youth friendly services (AYFS) for counselling and mentoring in the intervention zone cannot be overemphasised and phase II of the project should be intentional right at the design.
- It is recommended the project considers reducing its geographic coverage, such that all project communities receive livelihood assistance in all programming elements of the project. Given the high level of vulnerability of these communities, the Seed Voucher intervention can be designed such that all the poorest households receive these vouchers at least once over the extension period or the next phase of the project. Seed Fairs have been promising over this phase of the project, but concerns remain of how these will continue without the project. MAFFS expressed their desire to continue these fairs, but did acknowledge this would be difficult without the support from an external donor.

1. INTRODUCTION

1.1 Background to the project

The Epidemic Control and Reinforcement of Health Services (ECRHS) project was funded by the German Development Cooperation (KfW) as a direct response to the Ebola outbreak, for the period covering 1st November 2015 to 31st May 2017. The project reached 400 communities in the four northern districts of Bombali (100), Tonkilili (110), Kambia (90) and Koinadugu (100), where the Ebola outbreak was at its peak. ECRHS also reached 233 Peripheral Health Units (PHU) located in these areas.

The project was implemented through CARE International in Sierra Leone and three national partners – Mankind’s Activities for Development Accreditation Movement (MADAM), Rofutha Development Association (RODA), and Association for the Wellbeing of Rural Communities and Development (ABC Development), together with active partnership with the Mano River Union Secretariat, the Health for All Coalition (HFAC), and the Government of Sierra Leone Ministry of Health and Sanitation (MoHS). MADAM, RODA and ABC Development were responsible for developing the community surveillance systems, developing the capacity of PHUs, and assisting in the promotion of hygiene messaging. These organisations worked closely with the District Health Management Teams (DHMT). Mano River Union operated in the border areas across the three districts of Bombali, Koinadugu and Kambia, working on social mobilisation of communities to strengthen their surveillance structures. HFAC played an overall monitoring role to determine how well communities were adhering to surveillance procedures and whether burial teams were adopting recommended practices; ensuring information was being shared to PHUs of infected people, and similarly that PHUs were keeping families informed of their loved ones; collecting and reporting data from quarantined homes; and monitoring the effectiveness of social mobilisation campaigns.

CARE was responsible for the overall management of project implementation, working on detailed planning with the partners, and tracking progress of the project. Additionally, CARE took direct responsibility of working with the Water Directorate to identify the 80 water points that were rehabilitated over the project life, and managing the tendering and contracting process of Well Rehabilitation Contractors. CARE also worked closely with the Ministry of Agriculture, Forestry and Food Security (MAFFS) to identify, together with communities, the beneficiaries that were included in the Cash for Work (CfW) and the Seed Voucher components.

The overall goal of ECRHS was to “Improve the health status of Sierra Leoneans in four northern districts (Bombali, Tonkilili, Kambia and Koinadugu). To achieve this goal, the project was guided by three key objectives including to, 1) contain and stop the Ebola outbreak, 2) stabilise the health system, and 3) increase resilience among the affected population.

1.2 Purpose and Objectives of the Evaluation

The major purpose of the mid-term evaluation (MTE) was to assess the progress and contributions made towards achieving the project outcomes in line with the objectives defined in the Terms of Reference (TOR). The results from the evaluation will provide direction in preparing the next implementation period of twelve months. The evaluation findings will further provide guidelines in designing other CARE projects in the sectors covered by the ECHRHS project. Best practices documented from the evaluation are intended to be shared with local governments and partners in Sierra Leone for replication in similar project interventions.

It is also noteworthy that CARE and the Ministry of Health and Sanitation (MoHS) recognise the importance of Sexual Reproductive Health (SRH) services in the country, and the value of strengthening

these services in the intervention areas with the view of working towards a strong inclusion of this component (including products) in their programming in the extension phase. In view of this, the evaluation design captured key SRH indicators to generate data that will be used to strengthen a comprehensive approach for restoring strong and resilient health systems in the districts.

Specifically, the mid-term evaluation was done to achieve the following objectives:

- a) Assess the extent to which the outcomes / intermediate results of the project have been achieved (the success of the project) (high priority),
- b) Assess the nature of post-Ebola health services and surveillance mechanisms and structures within the communities and their linkages to the overall health systems (high priority)
- c) Determine efficiency and effectiveness of ECRHS project. (high priority),
- d) Conduct a mapping of health facilities in the target region (CHC: Community Health Centre; CHP: Community Health Post, MCHP: Maternal Community Health Post), in terms of availability, accessibility and quality, with special reference to SRH services, so as to highlight potential gaps for an evidence-based programming in future work. (medium priority),
- e) Draw conclusion and make recommendations for purposes of learning and future programming (medium priority).

2. THE EVALUATION METHODOLOGY

2.1 Design and coverage

The mid-term evaluation was noted as target-actual assessment of progress against targets following baseline data gathered at the inception of the ECRHS project. This required quantitative data; and therefore the evaluation designed adopted the descriptive research design to a larger extent. However, given the processes involved and contributions made towards achieving the project outcomes, exploratory research design was include soliciting qualitative information from key stakeholders using in-depth interviews through open-ended questions, Focus Group Discussions (FGDs) and key informant interviews.

The evaluation exercise covered all districts targeted by the ECRHS project to have fair knowledge and comparative results of progress made across these districts. Figure 1 is a map showing the ECRHS project districts covered in the course of the mid-term evaluation exercise.

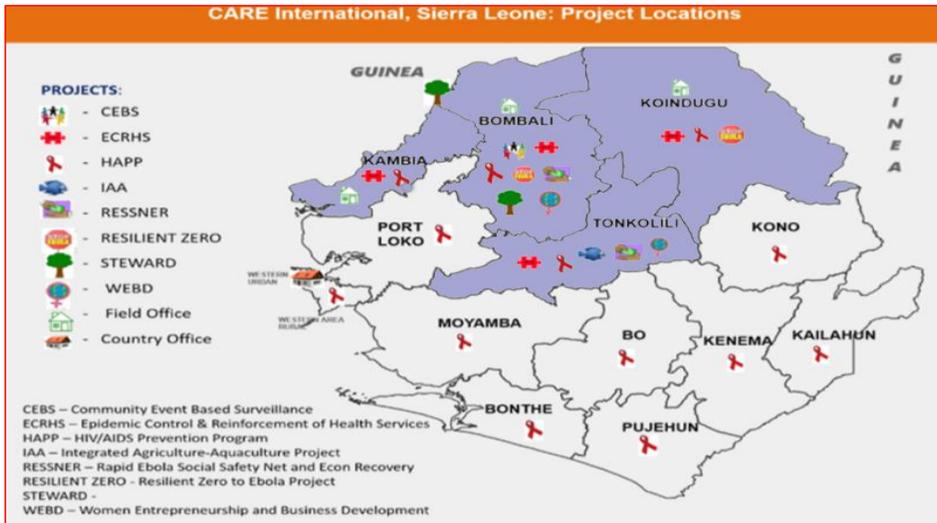


Figure 1: Map showing ECRHS project districts covered during the evaluation exercise

2.2 Sample size and sampling selection procedure

The ECRHS project covered three key components including 1) strengthening surveillance and health facilities, 2) WASH, and 3) livelihoods. In an effort to strengthen a comprehensive approach for restoring strong and resilient health systems in the intervention districts, the SRH components was also added to the evaluation design. This therefore required complex sampling procedures for representativeness across the four components. Considering the limited time allocated for field data collection and that livelihoods target were direct beneficiaries that would have all four components required for the evaluation, a purposive sampling method was adopted. It is therefore noteworthy that the Cash for Work (CfW) and Food Voucher beneficiary households were targeted as primary sampling units during the evaluation exercise.

The descriptive design intended to reach a minimum of 384 households to ensure this was statistically significant using a Margin of Error of +/- 5%; a Confidence Level of 95.0% (corresponding Z Score of 1.96); and a Standard Deviation (StDev) of 0.5. This desired minimum sample size was computed using the following formula:

$$\text{Sample Size} = (Z\text{-score})^2 * p*(1-p) / (\text{margin of error})^2$$

Where p is assumed as the proportion of the population actually impacted by the project,

$$\begin{aligned} & ((1.96)^2 \times .5(.5)) / (.05)^2 \\ & (3.8416 \times .25) / .0025 \\ & .9604 / .0025 \\ & 384.16 \end{aligned}$$

However, with the purposive sampling where direct ECRHS livelihoods beneficiary households characterised by all four components were targeted as primary sampling units, the sample size reached was 439 households. Considering these households for all questions on the different components during field interviews, 429 questionnaires for each of the Health, WASH and Livelihoods components and 386 questionnaires for the SRH component were administered across 45 communities. However, 4 additional communities with PHUs were further targeted to increase the number of PHUs assessed in Bombali (3

PHUs) and Kambia (1PHU). Overall a total of 37 PHUs were assessed across the four intervention districts. Table 1 presents the total number of responses and PHUs assessed during the mid-term evaluation exercise.

Table 1: Sample size covered during the MTE exercise

District	# of c/doms sampled	# of communities sampled	# of h/h targeted	# of WASH & health responses	# of SRH responses	# of livelihoods beneficiary HH interviewed	# of PHUs covered	# of FGD
Bombali	4	9	55	55	55	55	9	6
Kambia	4	11	95	95	80	95	6	8
Koinadugu	8	13	150	150	130	150	10	10
Tonkolili	3	16	129	129	121	129	12	10
	19	49	429	429	386	386	37	34

While the project management team were keen for a statistically significant sample size, the sample selection was done through a rigorous procedure that combined all components (including SRH) of the design as mentioned inter alia.

At the first stage, all 400 project communities were included as they all benefited from the surveillance and health facility strengthening component of the project (Objective 1). In Stage Two, the 400 project communities were filtered down to only those communities observed to have benefited from the water well rehabilitation – that is 71 communities.² In Stage Three, communities with households that benefited from the ECRHS Livelihood interventions (either CFV or Seed Vouchers) were overlapped with the 71 communities filtered in Stage Two to determine which communities received both WASH and Livelihood interventions. A total of 45 communities were as a result found to have received all three elements of the programme interventions (Annex 4 contains the final selected list of communities).

2.3 Sources of information

There were several activities undertaken as part of this MTE, including, 1) desk reviews, 2) household interviews, 3) focus group discussions, 4) assessment of Primary Health Units (PHUs), and 5) key informant interviews. These activities were grouped into two categories namely, secondary and primary sources of information.

2.3.1 Secondary sources of information

A large number of documents related to the ECRHS project were sourced from all actors directly involved in the project. Annex 3 provides a list of key documents received by the evaluation team for review. These documents aided in profiling the status of the project at various intervals regarding progress, lessons learned and issues encountered.

2.3.2 Primary sources of information

The Team Leader drafted questionnaires to collect data on all the research questions as detailed in the ToR. These were reviewed by the CARE Senior Program Officer and the National Consultant, who extended these questionnaires to collect more in-depth details around the topics of surveillance and health facilities, WASH, Livelihoods and SRH, which could be beneficial for future programme design and

² It was noted that 80 water points were rehabilitated, but several communities benefited from the rehabilitation of two water wells – this was especially evident for communities with PHUs. Therefore the number of communities that actually benefited from the rehabilitation project was 71.

implementation. These tools were particularly used to solicit primary information from a variety of respondents from households (including women and girls aged 15-49 years) targeted across the four intervention districts.

The Team Leader conducted a total of **55 Key Informant Interviews (KII)**. The list of key informants is attached in Annex 6. Key informants at the central level were purposively selected to include strategic government partners – the Mano River Union Secretariat, and the MoHS. The project was unable to arrange a meeting between the Team Leader and a representative from the HFAC, and unfortunately this remains a gap in the response of one major partner. Detailed interviews were also held with key project and CARE country level technical and management staff.

Similarly, at the district level, KIIs were conducted by the Team Leader with the three implementing partners of ECRHS – MADAM, RODA and ABC Development, as well as interviews with key government staff from the DHMT, the Water Directorate and MAFFS. Project staff were also interviewed including District Coordinators, Surveillance Officers, Livelihood Officers, WASH Officers, and M&E / Accountability Officers.

2.4 Evaluation tools, training and field data collection

The Team Leader, together with the National Consultant at the start of the evaluation first drafted and agreed on the approaches to be adopted for this evaluation- that is, the sampling strategy, and the detailed tools to be used for the MTE (Annex 1 contains the tools used for the surveys, together with the statistical data collected, and Annex 2 the Evaluation Schedule over the duration of the MTE).

The following evaluation tools were developed for primary data collection: 1) the Household Interview Questionnaire focused on surveillance systems, WASH, Livelihoods, and SRH; 2) the Health Facility Assessment; and 3) the FGD questionnaire. These tools were digitized onto mobile platforms by the National Consultant.



Figure 2: Training in Kintom, Sierra Leone

A total of 19 Enumerators were recruited and trained on these tools over a two-day period (10-11 July). The National Consultant led and conducted the training, covering each of the questionnaires, where Enumerators were introduced to topics, and all indicators requiring data collection. The National Consultant then uploaded the mobile app “Survey CTO³” on every Enumerators individual mobile phones. The National Consultant continued with training on the operation of the app by going through all indicators.

Once all Enumerators were comfortable with the mobile app, a field test was initiated where the Enumerators ran a trial by interviewing test respondents from the surrounding neighbourhood. Enumerators reconvened after completing their test interviews, and discussed as a group, areas which needed attention in either the indicators, or the automation of the mobile app itself. The National Consultant then finalized all tools and the mobile app.

The primary survey was conducted over a period of five days (13-19 July). Four field teams were created, where each team conducted household interviews, Focus Group Discussions (FGD), Community Health

³ Survey CTO was used as the platform to digitize questionnaires onto mobile platforms

Worker (CHW) interviews, and PHU assessment in the communities selected for the sample frame (Annex 4).

The 19 Enumerators were then deployed across the 45 communities and tasked to first randomly identify between 8-10 households who had received support in all the different project interventions. This could only be done at the time the Enumerators visited the community considering that only a selected number of households received the Livelihoods support. Through discussion with community elders and snowballing technique, the Enumerators were able to identify the households that had received Livelihoods support, and then randomly choose between 8 and 10 of these households.

On selection of these households, the Enumerator requested to speak to the responsible household head. If they were not available, the Enumerator requested for any member above the age of 18 years who would be willing to be interviewed. If there was no household member of a responsible age, the Enumerator then ceased the interview and moved to the next household.

If the household head, or a responsible household member was available and willing to be interviewed, the Enumerator conducted the Household Questionnaire on the topics of surveillance, WASH and Livelihoods. Considering these households were purposively selected, they had received all three project interventions and hence could respond to all the indicators within these questionnaires. Information collected were both *quantitative* and *qualitative* information, and responses were directly transcribed onto the mobile app by the Enumerator. Adopting this approach, a total of **429 household interviews** was achieved.

On completing the programme intervention questionnaires, the Enumerator inquired if there was a woman within the household who was of reproductive age (15-49 years). Provided these eligible members were available and willing to respond to the interviews, they would be engaged on the Sexual and Reproductive Health questions with the agreement of the male partner.

Furthermore a total of **34 FGDs** were also conducted from a selection of the sampled communities. FGDs were conducted by the Supervisors. However, each supervisor was opened to work with an enumerator- with one person facilitating the discussions and the other transcribing responses on the mobile app. The Supervisors also interviewed **eleven (11) Community Health Workers (CHW)**, in addition to those collected by the National Consultant.

2.5 The evaluation team and reporting structure

The MTE Team consisted of the Team Leader, one National Consultant, and a survey team consisting of 19 Enumerators (Annex 8). The Senior Programme Officer in CARE Sierra Leone was the primary point of contact between the MTE Team and the ECRHS project on all programmatic issues, and the Project Director was the primary contact on administrative issues.

2.6 Data analyses and presentation

Performance-based analyses were done to a larger extent, where baseline-target-actual comparisons were made. Meanwhile in-depth analyses were further made to understand the extent and contributions of the ECRHS project. These were presented in the forms of tables and charts. In addition, content analysis was done for qualitative responses received from key informant interviews (KIIs) and FGDs administered to key stakeholders, Community Health Workers, and other community members. The Team Leader and the National Consultant presented findings to CARE and its partners on 25 July 2017, at the CARE Head Quarters in Sierra Leone. The list of attendees to this event is attached in Annex 5. Feedbacks from the presentation were used to finalise the report, which was further reviewed, revised and submitted as final report.

3. FINDINGS IN RELATION TO STANDARD EVALUATION CRITERIA

3.1 Achievement of Overarching Program Objective

The overarching objective of the ECRHS project was to “Improve the health status of Sierra Leoneans in four northern districts (Bombali, Tonkili, Kambia and Koinadugu)”. To track achievement of this objective, the evaluation captured four key performance indicators including, i) Ebola incidence maintained at zero (resilient zero) in the intervention zone, ii) Percent increase of PHUs which offer basic health services (immunization, safe delivery, family planning services, HIV testing, counselling and treating), iii) Percent increase of PHUs which offer HIV counselling and testing, and iv) Percent reduction of beneficiary households in target communities reporting negative livelihoods coping strategies.

3.1.1 Ebola incidence maintained at zero (resilience zero) in the intervention zone

It is noteworthy that the ECRHS project was initially designed to provide response to on-going Ebola Virus Disease (EVD) transmission and prevent the emergence of new cases in affected areas (hot spots). As a key performance indicator, the ECRHS program aim to maintaining Ebola incidence at a resilience zero was achieved in the course of the 12-month intervention period across the four target districts. This means the systems, processes and procedures adopted by the program to contain and stop the virus were appropriate programmatic approaches that would require replications in similar future health emergency interventions (including epidemiological surveillance mechanisms).

3.1.2 Increase of PHUs which offer basic health services (immunization, safe delivery, family planning services, HIV testing, counselling and treatment)

Increasing the number of PHUs which offer basic health services including immunization, safe delivery and family planning from a baseline value of 59.6 percent to a target of 70.0 percent was achieved and was tested to be highly statistically significant at 95% level of confidence (See Figure 3). The MTE revealed 100 percent of all health facilities assessed reportedly offering these basic health services across the intervention districts. This is an especially significant achievement by the ECRHS program. Notably, the ECRHS program was designed at a time many people have lost trust in the health system and have already decided not to seek services for fear that they would be exposed to Ebola virus if they visit a health facility. Further evident was that many service providers were argued to have discontinued operations due to resource constraints including human resources, making access more difficult even for those who would choose to seek services. This had meant putting in place preparations for transition to an extended health system strengthening (HSS) effort once the outbreak subsided. The achievement made by the ECRHS program intervention in restoring the health systems across the intervention districts validates its relevance and timeliness.

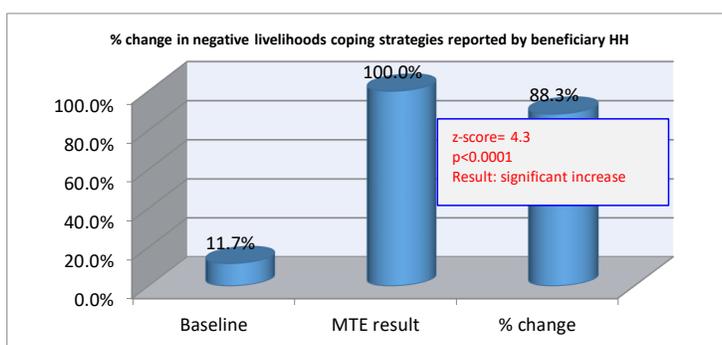


Figure 3: % increase of PHUs which offer basic health services (immunization, safe delivery, family planning)

3.1.3 Increase of PHUs which offer HIV counselling and testing

The proportion of PHUs which offer HIV counselling and testing proved to have significantly increased by 74% from a baseline value of 11.7 percent to MTE result of 85.7 percent (See Figure 4). Secondary reports captured in the ECRHS design also argued that the marked reductions in care for HIV positive patients (as observed in the baseline value) was strongly linked to mistrust of the health system and discontinued operations of routine health services during the EVD outbreak.

However, this 85.7% achievement could be miss leading because the question posted in the facility survey was if the facility offers “**Voluntary counseling and testing (VCT) for HIV?**” Most facility offering only counselling responded with ‘Yes’. Therefore, the MTE result for this indicator did not accurately address the two issues.

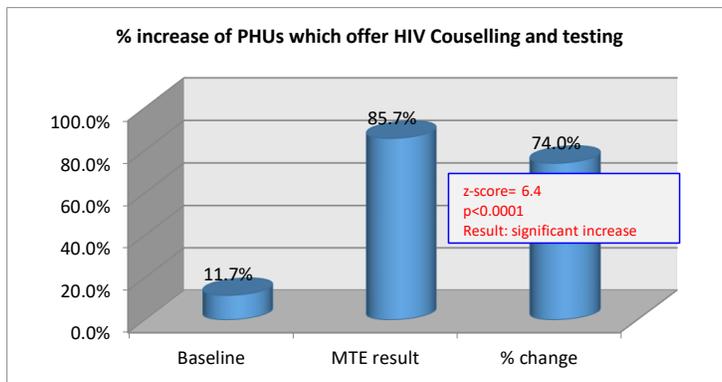


Figure 4: % increase of PHUs which offer HIV counseling and testing

3.1.4 Reduction of beneficiary households in target communities reporting negative livelihood coping strategies

The MTE result revealed that the ECRHS program made little progress towards reducing negative livelihood coping strategies. There was a reported increase in beneficiary households involved in negative coping strategies across the intervention districts. As depicted in Figure 5, 79.4 percent (about 16% increase in baseline value) of livelihoods beneficiaries interviewed reportedly involved in all consumption soothing coping strategies in the last 30 days preceding the interviews.

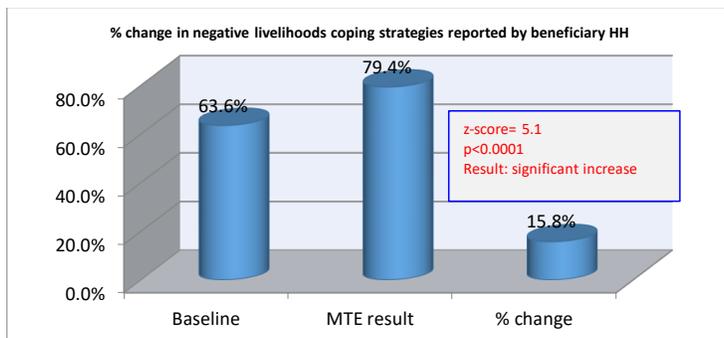


Figure 5: % change in negative livelihoods coping strategies reported by beneficiary households

Further, while the program underscores food insecurity as a foreseeing resultant effect of the outbreak that required attention for vulnerable households, it has made little progress in addressing this issue. Overall, about 71.1 percent of livelihoods beneficiary household expressed they had experienced one form of severe hunger (such as running out of food, being hungry but could not eat and going to bed without eating).

Table 2 presents a summary of the achievement of the program level indicators for the overarching aim of the ECRHS project.

Table 2: Achieved results on overarching program objective

Objective Indicators	Baseline	Target	Achieved result	z-score	p-score	Result	Comment
Ebola incidence maintained at zero (zero resilience) in the intervention zone	0.0%	0.0%	0.0%		n/a	n/a	Zero resilience maintained
% increase of PHUs which offer basic health services (immunization, safe delivery, family planning services)	59.6%	70.0%	100.0%	4.3	P<0.0001	P<0.05	Statistically significant change
% increase of PHUs which offer HIV counselling and testing	11.7%	13.0%	85.7	6.4	P<0.0001	P<0.05	Statistically significant change
% reduction of beneficiary households in target communities reporting negative livelihoods coping strategies	63.6%	58.6%	79.4%	5.1	P<0.0001	P<0.05	Highly significant increase in negative coping strategies

The overall achievement made on the overarching aim of the ECRHS program could be better explained using the five intermediate results development to track progress in the ECRHS project:

- IR1.1: Effective surveillance, contact tracing, and alert systems are in place and functioning at community level,
- IR1.2: Improved knowledge and change behaviours to prevent Ebola transmission at community level,
- IR1.3: Improved access to and behaviours concerning water, sanitation and hygiene
- IR2.1: The PHUs are able to provide essential health services
- IR3.1: Improved family and community resilience

Whilst achievement of many of the intermediate results led to the overall achievement of the ECHRHS program goal, there were mixed results which have guided in programmatic recommendations for future interventions. Table 2 presents the general performance against targets set in the project design. Specifically, the evaluation findings revealed promising trends on epidemic control and water, sanitation and hygiene (WASH). About 81 percent of community members interviewed in the project intervention areas clearly demonstrated an understanding of the signs and symptoms of Ebola, and how the virus could be transmitted and prevented. Furthermore, approximately 64 percent (42% above target) of households reportedly have access to safe drinking water, and about 34 percent (19% above target) have hand washing facilities. Further observed was that about 91 percent of communities were reported to have functional surveillance structures in place. While lack of understanding of the transmission, prevention, signs and symptoms of Ebola and poor hygiene practices were the major factors that contributed to the spread of the virus, these evaluation findings revealed that community mobilisation and awareness raising on epidemic control were far-reaching across communities covered by the ECHRHS project.

Meanwhile, stabilising the health system and sustaining it was revealed to have major bottlenecks. Even though increased knowledge on Infection Prevention and Control (92.4%) and availability of stock of Ante-Natal Care (ANC) medicines (62.2%) were evident in the findings, the health system still remains fragile in the intervention districts. In particular, only 27 percent of PHUs targeted across the intervention districts reportedly have essential stocks of IPC materials, and supplies of equipment to provide routine services. In addition, only 19 percent of PHUs reported availability of essential child health medicines in the intervention zone. The evaluation however, noted differences by types of PHUs assessed due to levels of functionality; and thus these differences are deliberated under 'analyses and achieved results' section.

The project was further observed to have reached its target of 2000 beneficiary households, in an effort to increase resilience among population affected by the Ebola Virus Disease (EVD) epidemic.

Table 3: Table showing project baseline, targets and actual achievement

Intermediate Results/ outcomes	Indicators	Baseline	Target	Achievement of target
Objective 1: Contain and stop the Ebola outbreak				
IR1.1: Effective surveillance, contact tracing and alert system in place	▪ % of communities within intervention zone with functional surveillance structures	60.8%	70.0%	91.2%
IR1.2: Improved knowledge and change behaviours to prevent Ebola transmission at community level (social mobilisation)	▪ % of population within intervention that can correctly state three means of Ebola transmission, prevention and signs and symptoms	90.0%	90.0%	81.1%
	▪ % of population within intervention zone willing to await swabbing before burial of relatives suspected of Ebola	95.0%	95.0%	45.2%
IR1.3: Improved access to and behaviours concerning water, sanitation and hygiene	▪ % of households within the intervention zone that have access to safe drinking water	18.5%	22.0%	64.3%
	▪ % of households within intervention zone with hand washing facilities	10.0%	15.0%	33.8%
Objective 2: Stabilise the Health System				
IR2.1: The PHUs are able to provide essential health services	▪ % of PHUs which offer basic health services (immunisation, safe delivery, family planning services)	59.6%	70.0%	100.0%
	▪ % of PHUs within intervention zone with essential stocks of infection prevention control supplies (gloves, masks, bucket for hand washing)	51.0%	55.0%	27.0%
	▪ % of PHUs within intervention zone with supplies and equipment to provide routine services (no stock out)	51.0%	55.0%	27.0%
	▪ % of PHUs within intervention zone that have stock of essential Ante-Natal Care (ANC) medicines (no stock out)	14.0%	20.0%	62.2%

	▪ % of PHUs within intervention zone that have stock of essential child health medicines	74.0%	80.0%	18.9%
	▪ % of PHU personnel trained within intervention zone on Infection, Prevention and Control (IPC)	90.0%	90.0%	92.4%
	▪ % of PHUs which offer HIV counselling and testing	11.7%	13.0%	85.7%
Objective 3: Increase resilience among the affected population				
IR3.1: Improved family and community resilience to shocks	▪ # of farmers who receive seed vouchers	0	6000	8539
	▪ # of households who benefited from the Cash for Work (CFW) activities in the community	0	2000	2000

3.2 Analysis and achieved results

In-depth analyses of evaluation findings covered the three project objectives and nature of post-Ebola health services and surveillance mechanism. In this section, new indicators added to the baseline indicators (including key indicators on sexual reproductive health) are discussed in detail to affirm the extent of achievement made by the ECRHS project implementation.

3.2.1 Containing and stopping Ebola outbreak

One of the three specific objectives of the ECRHS project was to contain and stop the Ebola Virus Disease (EVD) outbreak in newly affected areas. Notably two new reported cases of Ebola emerged in the course of the project implementation, which validates this objective. Putting in place effective and functional surveillance, contact tracing and alert systems at community level was an expected result the project intended to achieve. The Community Health Workers (CHWs) were observed to be the main community surveillance structures supported by the project. Whilst CHWs were noted to be present in almost all communities targeted by the project, mixed public views about their effectiveness were documented. Whereas 74 percent of 429 personal interviewees rejected the fact that a surveillance structure is functional in their community, about 91 percent of outcomes from 33 FGDs held across 33 communities revealed that indeed these surveillance structures are functioning effectively. The outcomes from the FGDs were further affirmed by interviews at the Primary Health Units (PHUs), who serve as primary recipient of all surveillance information disseminated by the CHWs. All PHUs (100%) targeted across the four intervention districts reported to be well connected with CHWs for disease surveillance (see Figure 6). However, the low response rate from the personal interviews could be partly due to low community sensitisation on the roles and importance of community-based surveillance structures.

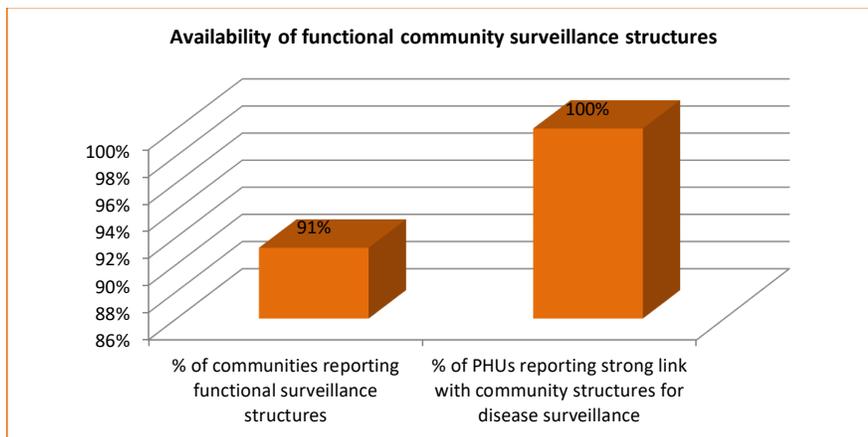


Figure 6: Responses to availability of effective surveillance structures at community level

Furthermore the project activities around awareness on Ebola transmission and prevention were observed to have been effective; and therefore have largely resulted in **'improved knowledge and changed behaviours to prevent Ebola transmission at community'**. As mentioned in previous discussions, about 81 percent of community members demonstrated knowledge, and could correctly state the means of Ebola transmission, prevention, signs and symptoms.

Even though demonstrated community knowledge on the means of Ebola prevention, transmission, signs and symptoms was observed, more in-depth analyses revealed low risk minimising behaviour among community members in the intervention areas. Only 38 percent of community members in the project intervention districts were noted to either call 117 or isolate sick relatives showing signs and symptoms of Ebola until after swabbing results. In particular, Koinadugu (24.5%) and Bombali (32.8%) districts showed potential signs of high risky behaviors that could accelerate contracting and spreading of the virus (see Table 4). Also about 25 percent of the population in the intervention districts are more likely to avoid calling 117 and perform burial rituals without swabbing results for relatives who died with signs and symptoms of Ebola. The evaluation further noted widespread hand shaking practice (67.4%) across the intervention districts, and this is highly evident in Koinadugu (76.8%), Tonkolili (71.1%) and Kambia (61.7%) districts.

Table 4: Community responses to risk minimising behaviour

Risk minimising behaviour	Total (n=429)	District			
		Bombali (n=55)	Kambia (n=94)	Koinadugu (n=151)	Tonkolili (n=128)
% of community members who agreed to call 117 or isolate a sick relative showing signs and symptoms of Ebola until after swabbing results	37.5%	60.0%	52.1%	24.5%	32.8%
% of community members who agreed to call 117 or isolate a relative who dies with signs and symptoms of Ebola until after swabbing results	65.2%	40.0%	60.6%	80.8%	60.5%
% of community members who agreed seldom or not shaking hands when greeting	32.6%	58.2%	38.3%	23.2%	28.9%

Access to safe drinking water was noted to be relatively improved, with an approximated 64 percent (42% above target) of households reporting access to safe water source in the ECRHS project intervention

zones (see Figure 7). Safe water sources reported by households include protected water well with and without hand pump (59%), piped water supply (4%) and protected water with solar station (1%). Meanwhile only 6 percent of households interviewed claimed to have used water points rehabilitated by the ECRHS project as their main water source in the last six months preceding the mid-term evaluation. This finding is unsurprising as the rehabilitation work from the ECRHS package for 80 water points was only completed in May-June 2017, and many of these water points are awaiting treatment (such as chlorination and cleaning) before they are considered as safe for drinking purpose. Opening these water points to the community for drinking purpose, would therefore lead to marked increase in the current figures across the intervention areas.

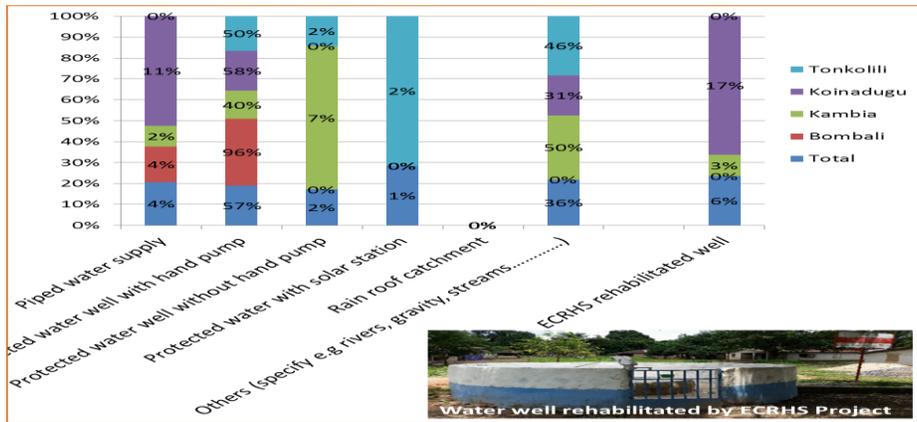


Figure 7: Sources of drinking water reported by households

Notably, an impressive progress against targets on availability of hand washing facilities for households in the project areas was observed. About 34 percent of households interviewed reportedly have access to safe hand washing facilities. This figure exceeds the project target by 18 percent; but then the project has actually contributed to 24 percent⁴ increase in household access to hand washing facilities. Interestingly, the proportion of households who claimed to be adopting various types of hygiene (including water, food and hand hygiene) practices almost doubled (on average) those with hand washing facilities. For instance, about 56 percent of households claimed household members wash hands before preparing food; 63 percent reportedly ensure children wash hands when given food, and 57 percent reportedly claimed household members always wash hands after using toilets or garbage. This progress was unsurprising, as some communities were observed to have used lessons learned from hygiene education to introduce an innovative approach towards increased hand washing habits. As depicted in Figure 8, Tippy-taps were observed to have been introduced in some communities for hand washing by the public.



Figure 8: Common Tippy-taps used in some communities

⁴ That is 24% above baseline figure of 10%

In spite of the progress made so far on WASH, some findings from the mid-term evaluation revealed that efforts to reinforce epidemic control continue to remain crucial in the ECRHS intervention zones. Many respondents shared that access clean water remains a critical challenge. For instance, households who lack access to safe drinking water source were observed to be using water sources that may perpetuate the proliferation of water-borne diseases such as cholera and diarrhoea. As Figure 7 in previous discussions presents, about 36 percent of households reportedly use unsafe water sources such as rivers/streams for drinking purpose. The drinking water source shown in Figure 9 is an epitome of alternative, but unsafe drinking water sources used by households with limited access to protected and safe water sources in the project intervention areas.



Figure 9: unsafe stream water used by some residents in Tealia village,

Mechanisms to maintain water supply facilities were further noted to have been instituted in communities with rehabilitated water points, but sustainability was observed to be doubted. The ECHRS project ensured that Community WASH Committees and Pump Mechanics are established and sufficiently trained on pump maintenance. These Committees and the communities have also been reportedly well sensitised on hygiene practices. Community bye-laws are also developed in every community, and this is claimed to play an important role in maintenance especially when backed by community elders. Meanwhile, respondents shared that Pump Technicians had not been sufficiently trained and that many of these technicians had not received their toolkits as yet. Generating a maintenance fund for the water points was also proving to be difficult in many communities as there was a feeling of “entitlement” that future projects would continue to fund the maintenance and rehabilitation of these water points.

The selection of Contractors for well rehabilitation was centrally managed by CARE, as the work was time sensitive, where the national level Water Directorate were involved in the tendering process. This strategy was not well received by many government stakeholders. In particular, district level representatives from the Water Directorate were concerned that they were not included, and raised the issue that most contractors were outside of the region. This raised concern that it would be difficult to hold these contractors accountable for poor work, or issues arising after the one month warranty period expired after the completion of the work. Lack of clear WASH strategy, was further expressed the Government and implementing partners (IPs). There were alluded notions that the ECRHS project while the project included rehabilitation of water points, it failed to capture how the project intends to effectively mobilise communities and households to adopt overall hygiene behaviour.

3.2.2 Stabilising the Health System

Stabilising the health system is one of the specific objectives of the ECHRS project. The project intends to contribute to health system strengthening in northern Sierra Leone by ensuring that ‘Primary Health Units (PHUs) are able to provide essential health services’ in the intervention zone. Specifically, the ECRHS is expected to ensure that PHUs within the intervention zone have a) essential stocks of infection prevention control (IPC) supplies, b) supplies and equipment to provide routine services with no stock-outs, c) stock of essential of Ante-Natal Care (ANC) medicines with no stock-outs and d) stock of essential child health medicines. It is also expected that PHUs in the intervention zones have personnel trained on IPC.

As discussed in the evaluation methodology section, a total of 37 PHUs were assessed in the project intervention zone. This includes 17 Maternal Child Health Posts (46%), 16 Community Health Posts (43%) and 4 Community Health Centres (11%). (See Figure 10)

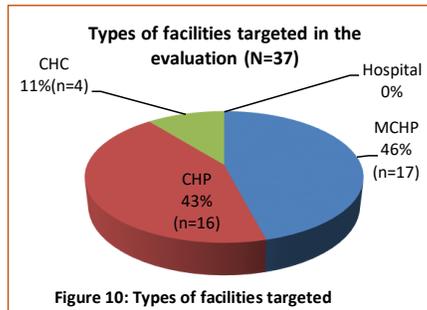


Figure 10: Types of facilities targeted

Findings from the evaluation revealed that stabilising the health system with sustainable provision of essential health services is far from being achieved. Overall, only 38 percent of all PHUs targeted are reportedly well resourced to offer all basic health services including child immunisation, labour and safe delivery, family planning, voluntary counselling and testing (VCT) for HIV, treatment of HIV/AIDS and prevention of mother-to-child transmission of HIV. This figure is 32 percent below target, and shows a somehow decline (by 38 percent) of health facilities' status at start of the ECRHS intervention. Surprisingly (as presented in Figure 11) no Community Health Centre (CHC) reportedly provides all these basic health services. 56 percent and 44 percent of PHUs who are reportedly providing these basic services are Community Health Posts (CHPs) and Maternal Child Health Posts (MCHPs) respectively.

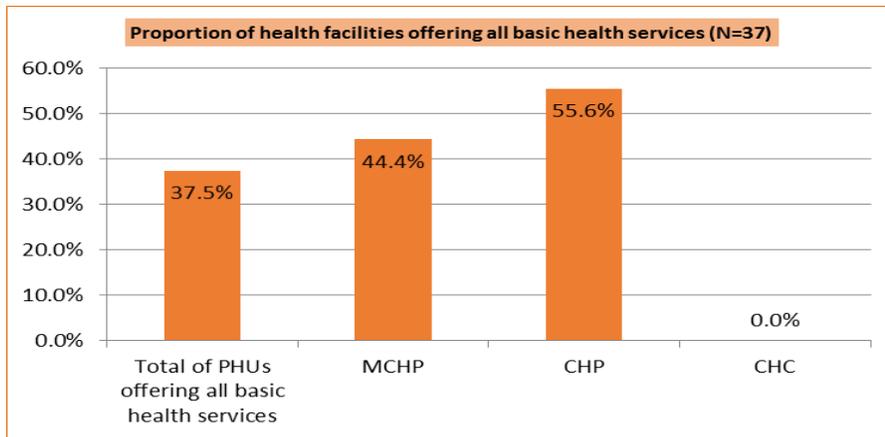


Figure 11: proportion of PHUs by type offering all basic health services

Meanwhile specific findings revealed that immunization, labour and delivery, and family planning services are offered by all PHUs targeted. Every PHU however requires attention for Voluntary Counselling and Testing (VCT), treatment and PMTCT of HIV. In particular CHCs which serve as highest health cadres at primary/community level proved less effective in carrying out PMTCT and VCT, with none reportedly offering these services. (See Table 5)

Table 5: Basic health services proved by level of health service delivery

Basic service provided	All PHUs	MCHP	CHP	CHC
Child immunization services	100.0%	100.0%	100.0%	100.0%
Labour and safe delivery services	100.0%	100.0%	100.0%	100.0%
Family Planning services	100.0%	100.0%	100.0%	100.0%
Voluntary counseling and testing (VCT) for HIV	87.5%	84.6%	100.0%	0.0%
Treatment of HIV/AIDS	41.7%	30.8%	50.0%	100.0%
Prevention of mother-to-child transmission (PMTCT) of HIV	79.2%	69.2%	100.0%	0.0%

At district level, Kambia and Tonkolili districts proved vulnerable in terms of HIV transmissions (see Table 6). 25 percent of targeted PHUs in these districts are respectively not offering any VCT. Further, 50 percent and 33 percent of PHUs in Kambia and Tonkolili districts respectively lack PMTCT services.

Table 6: Basic health services provided by PHUs at district level

Basic service provided	Bombali (n=9)	Kambia (n=6)	Koinadugu (n=10)	Tonkolilii (n=12)	Total (n=37)
Child immunization services	100.0%	100.0%	100.0%	100.0%	100.0%
Labour and safe delivery services	100.0%	100.0%	100.0%	100.0%	100.0%
Family Planning services	100.0%	100.0%	100.0%	100.0%	100.0%
Voluntary counseling and testing (VCT) for HIV	100.0%	75.0%	100.0%	75.0%	87.5%

Further observed was that basic items for routine delivery services are limited across all PHUs covered during the evaluation. As presented in Table 7, only 22 percent of PHUs reportedly have stocks of all basic items required for delivery and neonatal care. A more disaggregated data revealed that health facilities with all basic items for delivery and neonatal care are CHPs (62.5%) and MCHPs (37.5%); but also none of the CHCs reportedly has all these basic items. In particular, communities are at risk of fatal obstetric (pregnancy-related) complications including post-abortion complications, assisted vaginal delivery and removal of placenta retained products. A relatively large number of PHUs reportedly lack the basic items needed to attend to complications. For instance, about 68 percent reportedly lack vacuum extractor (ventous) and Dilators/Manual Vacuum Aspirator (MVA) respectively. Supply of neonatal resuscitation also proved to be a critical challenge- as 16 percent of PHUs reportedly lack this item, which is useful for neonates born with birth asphyxia (breathing difficulty).

Table 7: Availability of basic items for routine deliveries and neonatal care

Basic items for routine deliveries and neonatal care	All PHUs	MCHP	CHP	CHC
[a] Standard delivery beds/tables	70.3%	58.8%	81.3%	75.0%
[b] Pairs of artery forceps	94.6%	88.2%	100.0%	100.0%
[c] Pairs of scissor	97.3%	94.1%	100.0%	100.0%
[d] Tray with cover	81.1%	76.5%	93.8%	50.0%
[e] BP machines	83.8%	82.4%	93.8%	50.0%
[f] Cotton wool	91.9%	100.0%	87.5%	75.0%

[g] Thermometers	94.6%	94.1%	100.0%	75.0%
[h] IV stands	73.0%	70.6%	87.5%	25.0%
[i] Placenta dish/ kidney basin	73.0%	64.7%	87.5%	50.0%
[j] Resuscitation trolley or cabinet	48.6%	47.1%	56.3%	25.0%
[k] disposable delivery kits	78.4%	64.7%	93.8%	75.0%
[l] Needle, syringes and cannulas	100.0%	100.0%	100.0%	100.0%
[m] Vacuum extractor (ventous) for assisted vaginal delivery	32.4%	23.5%	50.0%	0.0%
[n] Dilators/ Manual Vacuum Aspirator (MVA) for removal of retained products	32.4%	23.5%	50.0%	0.0%
[o] Cord clamps or clean cord ties	94.6%	94.1%	100.0%	75.0%
[p] Baby scale/ weighting pants	83.8%	88.2%	93.8%	25.0%
[q] Ambu resuscitator and mask for neonates	83.8%	82.4%	87.5%	75.0%
[r] MUAC tape/tape line	100.0%	100.0%	100.0%	100.0%
[s] Hanging scales	86.5%	82.4%	93.8%	75.0%

District level data further revealed poor service readiness for deliveries and child care by PHUs in Koinadugu, Tonkolili and Kambia districts. Notably, 80 percent and 75 percent of PHUs in Koinadugu and Tonkolili districts respectively fall short of all basic items necessary for routine deliveries and neonatal care. Specifically, none of the PHUs in Kambia district has Vacuum extractor (ventous) and dilators/Manual Vacuum Aspirator (MVA); and 80 percent and 58 percent of PHUs in Koinadugu and Tonkolili districts also lack these items respectively. This situation signals a looming high rate of case fatalities that result from obstetric complications in these districts. (See Table 8)

Table 8: Availability of basic items for routine deliveries and neonatal care at district levels

Basic service provided	Bombali (n=9)	Kambia (n=6)	Koinadugu (n=10)	Tonkolili (n=12)	Total (n=37)
% of PHUs with basic items for routine deliveries & neonatal care	88.9%	66.7%	20.0%	25.0%	21.6%
Standard delivery beds/tables	100.0%	50.0%	60.0%	66.7%	70.3%
Pairs of artery forceps	100.0%	83.3%	100.0%	91.7%	94.6%
Pairs of scissor	100.0%	83.3%	100.0%	100.0%	97.3%
Tray with cover	100.0%	50.0%	80.0%	83.3%	81.1%
BP machines	100.0%	50.0%	80.0%	91.7%	83.8%
Cotton wool	88.9%	83.3%	90.0%	100.0%	91.9%
Thermometers	100.0%	66.7%	100.0%	100.0%	94.6%
IV stands	77.8%	33.3%	80.0%	83.3%	73.0%
Placenta dish/ kidney basin	100.0%	50.0%	70.0%	66.7%	73.0%
Resuscitation trolley or cabinet	55.6%	33.3%	20.0%	75.0%	48.6%
Disposable delivery kits	88.9%	66.7%	70.0%	83.3%	78.4%
Needle, syringes and cannulas	100.0%	100.0%	100.0%	100.0%	100.0%
Vacuum extractor (ventous) for assisted vaginal delivery	55.6%	0.0%	20.0%	41.7%	32.4%
Dilators/ Manual Vacuum Aspirator (MVA) for removal of retained products	55.6%	0.0%	20.0%	41.7%	32.4%
Cord clamps or clean cord ties	100.0%	83.3%	100.0%	91.7%	94.6%
Baby scale/ weighting pants	88.9%	33.3%	100.0%	91.7%	83.8%
Ambu resuscitator and mask for neonates	77.8%	50.0%	100.0%	91.7%	83.8%
MUAC tape/tape line	100.0%	100.0%	100.0%	100.0%	100.0%
Hanging scales	88.9%	66.7%	100.0%	83.3%	86.5%

It is noteworthy that one of the rationales for 'stabilising health system' component in the ECRHS project was to ensure essential drugs for ANC and child health are available at all PHUs in the intervention zone with no stock-out reported. Meanwhile this did not reflect in the MTE findings. About 28 percent of PHUs targeted reportedly lack a number of stocks of essential medicines necessary for Ante-Natal Care (ANC). Availability of all stocks of essential child health medicines with no stock out especially proved difficult for PHUs in the intervention zone. Only an approximated 19 percent reportedly have all stock of essential child health medicine at the time of the assessment. At district level Kambia, Tonkolili and Koninadugu districts proved especially vulnerable in terms of child health care. (See Figure 12)

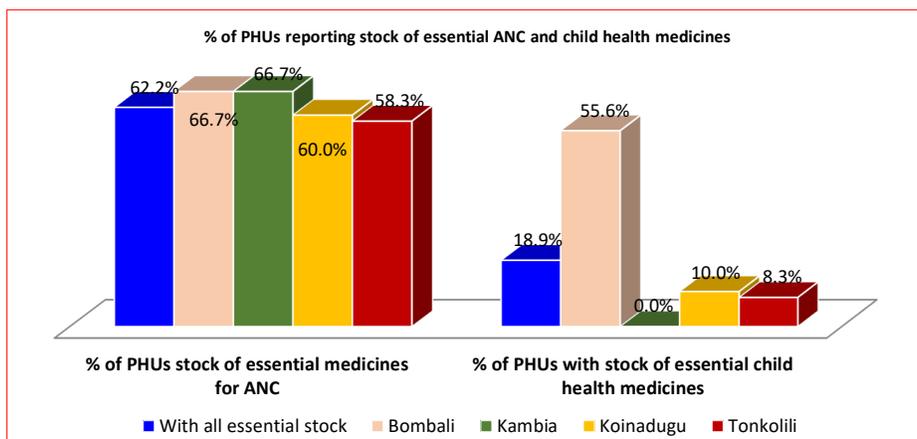


Figure 12: % of PHUs reporting stock of essential ANC and child health medicines

Reported drug stock-outs are notably high. Figure 9 presents stocks of drugs that have been reported for stock-outs at PHUs in the last six months preceding the MTE across the ECRHS intervention districts. About 89 percent of all PHUs assessed reported drug stock-outs. Reported stock-out rates are particularly higher in Bombali and Koinadugu districts, where all PHUs targeted in the assessment reported stock-outs of essential drugs. Stock-outs were reported for almost all essential categories of drugs. Drug categories largely reported for stock-outs are anti-biotics (64%), pain management (56%), anti-convulsant (36%) and anti-anaemia (36%) drugs.

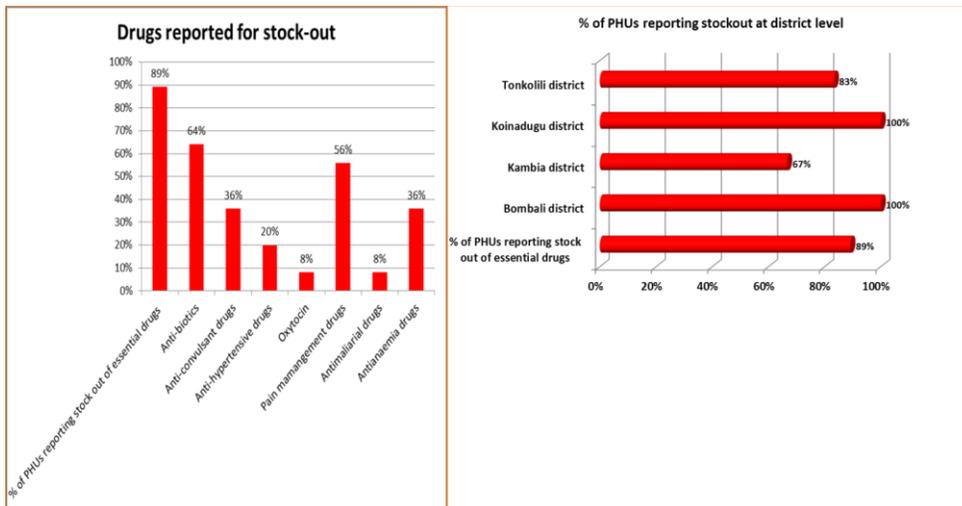


Figure 13: Drugs stock-out report

Delay in drug supply (89%), inadequate supply of drugs (81%) and case surge (70%) were associated with the reportedly high stock-outs of drugs at PHUs in the intervention zone (see Figure 14). These three major causes of drugs stock-outs were reported by all PHUs in Bombali district. In Koinadugu district, all PHUs reported delay in drug supply and case surges as major causes of stock-outs; while 75 percent and 67 percent of PHUs in Tonkolili district reported delay in drug supply and inadequate supply of drugs.

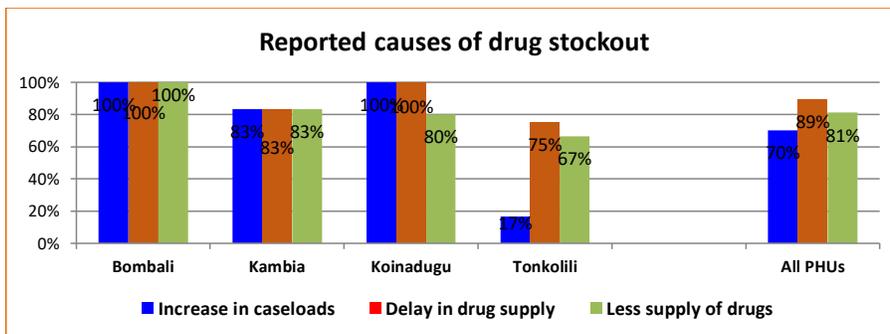


Figure 14: Reported causes of stock-outs of drugs at PHUs in ECRHS project areas

3.2.3 Nature of Post-Ebola Health Services and Surveillance Mechanisms and Structures within Communities

The ECRHS project contribution towards strengthening epidemic control and surveillance structures was observed to be far-reaching across health catchments in the intervention areas. Training over the project period proved to have gone well. About 92 percent of trained and qualified PHU personnel have been reached in terms of training on Infection Prevention Control (IPC) measures. Comparatively more health personnel in Tonkolili (91%) and Koinadugu districts reportedly received training on IPC, than PHUs in

Bombali (81%) and Kambia (85%) (See Figure 10). Meanwhile, a relatively high number of these health personnel are not financially motivated. Interestingly 30 percent of those health personnel who are trained and qualified/certified are not on formal government payroll, and therefore are reportedly serving as volunteers in remote communities without salaries. PHUs operating in border areas remain particularly neglected, and far from communities in the catchment zones. Therefore staff deployed without motivation would hamper the effective functioning of the health systems in remote settings.

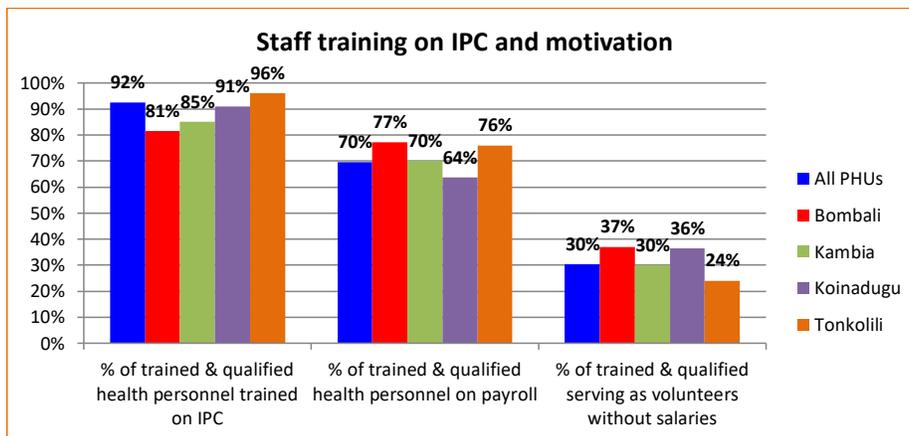


Figure 15: Staff training on IPC and motivation

Putting in place an effective surveillance system, contact tracing and alert systems at co was one of the expected results, and forms a critical part of the ECRHS project. The presence of community health structures and their linkages with overall health systems was very impressive- which explains to a larger extent that the project has been successful in terms of efforts to build effective community-based surveillance mechanisms. In particular Community Watch Groups (CWGs) and Community Health Workers (CHWs) were established and given capacity building support. The evaluation observed a strong presence of these structures that are providing support on community mobilisation and sensitisation on a broader range of topics including means of transmission and prevention of Ebola and other epidemics, and improved hygiene behaviour.

Notably, the Community Health Workers (CHWs) have playing an effective role in connecting communities to PHUs. This was confirmed by about 91 percent of communities engaged on Focus Group Discussions (FGDs) and 100 percent of PHUs assessed. CHWs were particularly noted to have carried out the function of assisting community members such as Pregnant and Lactating Women (PLW) and children by connecting them to PHUs. Training received on simple First Aid treatment for common diseases (such as bloody diarrhoea, malaria and pneumonia) and nutrition such as use of MUAC (Mid-Upper Arm Circumference) tape to assess nutritional status of children were also demonstrated by CHWs in the ECRHS intervention zones. Accordingly 100 of PHUs reported to have strong linkage with CHWs, and have often (27%) or very often (73%) received surveillance messages and complicated health related cases from them (see Figure 16).

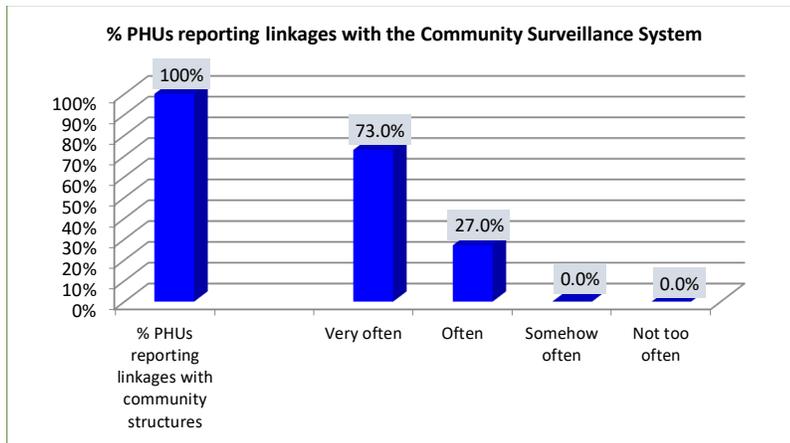


Figure 16: % of PHUs reporting linkages with community surveillance system in ECRHS project intervention zone

Additionally, the District Health Management Team (DHMT), Ministry of Health and Sanitation (MoHS), Implementing Partners (IPs) and CARE expressed high satisfaction of the ECRHS project contribution to enhancing the DHMT capacity to effectively coordinate the activities of various agencies to avoid overlaps and duplication of efforts towards health systems strengthening in the intervention zone. Also the project has been lauded by different stakeholders interviewed for strengthening the Health Information System. Notably, there is now a seamless flow of information from communities to PHUs and DHMTs. CHWs collect and compile health related data/information and submit them to PHUs, who in turn submit to the DHMT in the district hospitals.

The ECRHS project was also noted to have helped in the reproduction of an Integrated Management of Neonatal and Childhood Diseases (IMNCI) material and its delivery to all PHUs covered by the project. There was a general feeling that women and girls are now more comfortable to report to PHUs for treatment- which is an important reflection of the building of lost confidence in the health systems that almost collapsed during the EVD outbreak. The assessment shows that about 96 percent of deliveries in the intervention zone were attended skilled birth attendants (SBAs).

However, maintaining successes registered by the ECRHS project presents a huge number of challenges. As Figure 17 depicts, about 46 percent of PHUs do not think they are prepared to effectively to future disaster or epidemic due to a number of enumerated reasons. Major weaknesses expressed by staff of these PHUs include a) lack of isolation centres, b) inadequate supply of Personal Protective Equipment (PPE), c) inadequate supply of disinfectants (including soap, hand sanitizers), d) lack of screening centres, e) lack of ringers lactate, normal serine and other fluids needed in times of emergencies, f) inadequate supply of essential drugs, h) lack of electricity and h) inadequate number of qualified staff.

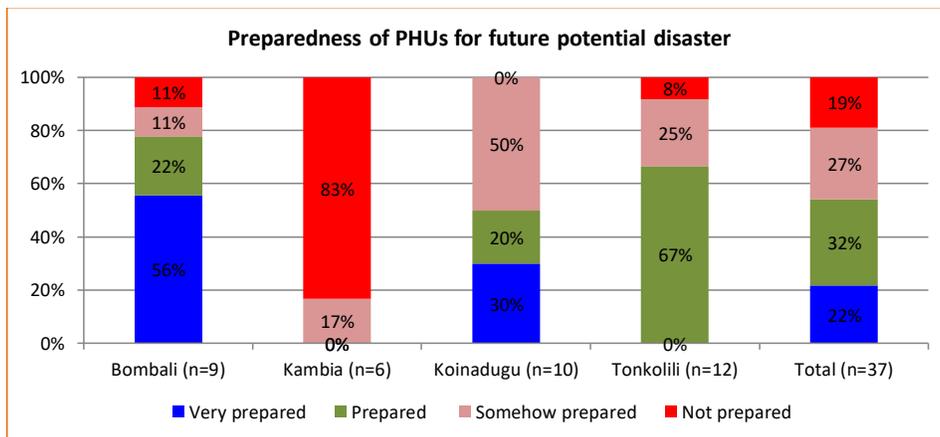


Figure 17: Level of preparedness expressed by PHUs for future disaster

PHUs in Kambia (83%) and Koinadugu (50%) districts are especially concerned about their weaknesses to respond to future epidemics (as presented in Figure 12). This finding is also confirmed in Table 9 where none of the PHUs in Kambia and only 20 percent of PHUs in Koinadugu reportedly have all necessary IPC materials.

Table 9: Proportion of PHUs reporting availability of IPC materials

Available IPC material	All PHUs (n=37)	Bombali (n=9)	Kambia (n=6)	Koinadugu (n=10)	Tonkolili (n=12)
Have all IPC materials	27.0%	44.4%	0.0%	20.0%	33.3%
[a] Protective boots and utility gloves (and/or sterile gloves)	100.0%	100.0%	100.0%	100.0%	100.0%
[b] Masks	100.0%	100.0%	100.0%	100.0%	100.0%
[c] Water for hand washing	97.3%	100.0%	100.0%	90.0%	100.0%
[d] Decontamination/puncture proof sharp containers	100.0%	100.0%	100.0%	100.0%	100.0%
[e] Metal rubbish bins with cover	70.3%	55.6%	33.3%	100.0%	75.0%
[f] Bleach/antiseptics/chlorine	91.9%	100.0%	83.3%	100.0%	83.3%
[g] Running water in delivery/labour room	45.9%	33.3%	100.0%	20.0%	50.0%
[h] Provision of linen for patient	64.9%	44.4%	66.7%	90.0%	58.3%
[i] Incinerator/burial pits	81.1%	100.0%	83.3%	60.0%	83.3%

While all PHU personnel argued to have got a functional referral system in their health catchments due to the effective coordination with CHWs and DHMT, the means of referrals during emergencies is expressly a huge challenge. In fact all PHUs targeted in Kambia district reportedly have no access to any form of mobility for referrals (including ambulance). In Tonkolili district about 17% and 83% of PHUs expressly have no access to ambulance and communications facility/equipment respectively. Table 9 presents the various means used by PHUs for referrals during emergencies.

Table 10: Means of referrals reported by PHUs in the intervention zone

Referral system	Bombali (n=9)	Kambia (n=6)	Koinadugu (n=10)	Tonkolili (n=12)	Total (n=37)
Facility reportedly having functional referral system	100.0%	100.0%	100.0%	100.0%	100.0%
[a] Use of ambulance	100.0%	0.0%	100.0%	83.3%	78.4%
[b] Use of motor Bike	33.3%	0.0%	90.0%	91.7%	62.2%
[c] Use of hammock	0.0%	0.0%	0.0%	50.0%	16.2%
[d] Use of boat	11.1%	0.0%	10.0%	16.7%	10.8%
[e] Use of commercial/private vehicle	100.0%	0.0%	70.0%	25.0%	51.4%
[f] Telephone or radio handset	100.0%	100.0%	100.0%	16.7%	73.0%
[g] Use partographs to monitor labor and complications	100.0%	100.0%	100.0%	100.0%	100.0%
[h] Others	0.0%	0.0%	0.0%	0.0%	0.0%

Poor road network was also observed as a major gap in the referral system in the intervention zone. This has major implications on health catchment areas with ill-equipped/ weak health infrastructure with limited capacity to respond to emergencies. Figure 18 presents the road network situation captured during the MTE field exercise in Koinadugu district.



Figure 18: Poor road network observed during MTE field exercise in Koinadugu district

PHUs in the border areas remain particularly neglected, and far from communities in these areas making these PHUs difficult to access. The DHMT lacks resources to operate efficiently on its own, and is heavily reliant on external resources from projects such as ECRHS to conduct its most routine work of coordination, capacity building of PHU staff, and offering health services. Further, DHMTs are over-stretched trying to respond to the many competing demands from development agencies operating in their region. Even though the DHMT attempts to coordinate activities and holds regular coordination meetings, individual agencies still require the DHMT to respond to agency level support needs, which becomes unmanageable given the large volume of implementers active in the region.

Responses from the community FGDs highlighted that during the Ebola epidemic, the responsiveness from health centres was very efficient. However, after the Ebola epidemic subsided, responsiveness of health centres has fallen steeply. While this is understandable, this does raise potential issues in that health centres are not able to respond efficiently, unless there is external support from donors. FGD respondents supported the responses of the PHU staff, where they cited PHUs are lacking the necessary medication and equipment to provide adequate support to patients.

Finally, it was universally agreed that **Trans-border migration issues remains a significant challenge**. Given the higher quality and free health services offered by the PHUs to young mothers with children under the age of five years, many migrants from Guinea and Liberia come into Sierra Leone to avail these health services. This immediately raises the risk of cross-border disease transmission, and this is purported to have been compounded by pressure on PHUs to deal with the higher volume of patients/cases.

3.2.4 State of Sexual Reproductive Health

Data collection on SRH indicator intends to develop baseline values that will allow SRH to be added as a programme component for the ERCHS project as it moves forward with its extension and new phase.

In particular, SRH data analyses were considering demand and supply values. Major gaps were observed in terms of Family Planning (FP) service provision and utilisation of service (shown in Figure 19). Whereas an extremely high number of PHUs (about 95%) reportedly provide at least one stock of modern contraception, demand by service users (women aged 15-49 years). Accordingly, only an approximated 40 percent of 385 women of reproductive age (15-49 years) are reportedly using modern methods of contraception. In addition rate of first time users of modern contraception methods is very low (about 1%), which signals low sensitisation and counselling, and limited access to contraception in the ECRHS intervention zone. This was confirmed by about 52 percent of women aged 15-49 who claimed limited access to modern contraceptives. At service level, about 95 percent of PHUs offer hormonal contraception (including injectables, combined pills, etc), which also largely demanded by users (47%) in addition to LARC use (47%). Few women (about 3%) use permanent contraception; and this was generally observed to be used by women reporting persistent birth complications. While emergency contraceptives (ECPs) are very important in averting potential pregnancy, it appears that little interest is shown for this stock of drug in terms of both demand (12%) and supply (27%).

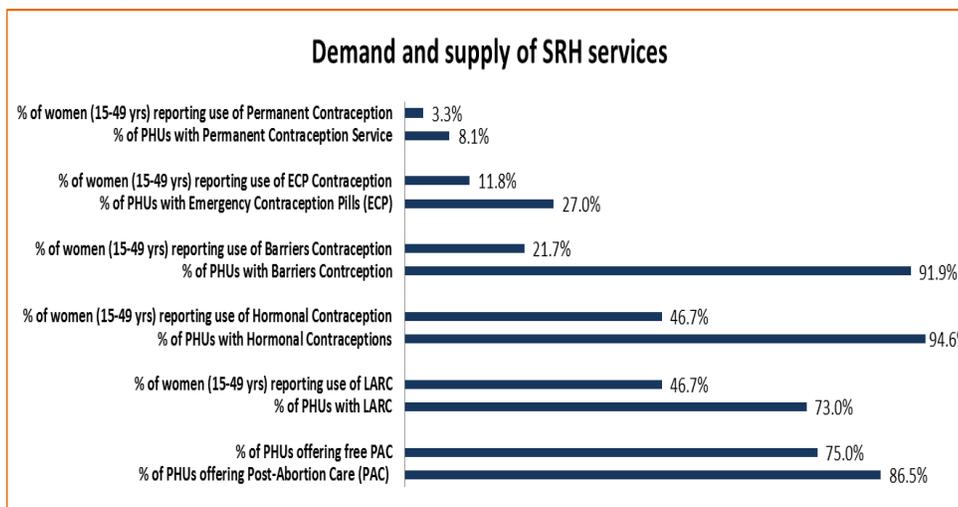


Figure 19: Responses to availability and use of Family Planning services

Table II presents responses on decision making regarding sexual relations, contraceptive use and reproductive health care in the ECRHS intervention zone. The findings indicate that women largely have limited power to exercise decisions on their own sexuality, or rights over their own bodies. Only 30.4 percent of women in reproductive age group (15-49 years) reportedly decide on their own sexual relations, 33.0 percent independently decide on the use of contraceptives, and 33.8 percent claimed they make independent decision on use of Family Planning centres. The use of Ante-Natal Care (ANC) is relatively improved considering that 54 percent of women agreed to have made independent decisions regarding Antenatal Care (ANC) in the project intervention district.

Table 11: Responses on decision making regarding sexual relations, contraceptive use and reproductive health care

Indicator	Result
SRH4.1: Proportion of women aged 15-49 yrs who make their own informed decisions regarding sexual relations	30.4%
SRH4.2: Proportion of women aged 15-49 yrs who make their own informed decisions regarding use of contraceptives	33.0%
SRH4.3: Proportion of women aged 15-49 yrs who make their own informed decisions regarding access to Antenatal Clinic (ANC)	54.0%
SRH4.3: Proportion of women aged 15-49 yrs who make their own informed decisions regarding access to Family Planning	33.8%
SRH4.5: Proportion of women aged 15-49 yrs reporting easy access to contraceptives	48.3%

3.2.5 Increasing resilience among affected population

Objective 3 of the ECRHS project focused on developing the livelihood capacities of a selection of beneficiaries, building greater resilience for these beneficiaries to meet and deal with potential future shocks and stresses. The livelihood component of the project is divided in two package of activities – Cash for Work (CFW) and Seed Vouchers. The CFW engaged a total of 2,000 beneficiaries, across 102 communities, primarily working on activities to improve the hygiene conditions of their community. This included building permanent fences around water points, digging compost pits, and constructing plate racks, waste disposals, drainage, cloth lines, and other such activities. The Seed Voucher programme transferred vouchers to a total of 8,539 beneficiaries, across 226 communities, enabling them to purchase good quality seed from participating seed vendors. Table 12 shows the results to date on intermediate result related to improving family and community resilience to shocks.

Table 12: Responses to improved family and community resilience built by the project

Indicator	Baseline	Target	Result
# of HHs who benefit from seed vouchers	0	6000	8539
% of beneficiaries who appreciated seed voucher modality (NEW)			75.5%
Possible contributions for the HH from seed vouchers & CFW (NEW) (sample below)			
- % of beneficiary HHs currently food secure			5.4%
- % of beneficiary HHs eating less than 2 meals a day			91.1%
- % of beneficiary HHs eating less preferred and less expensive food			90.7%
- % of beneficiary HHs consuming or selling reserved grains for farming			41.5%
- % of beneficiary HHs taking loans to purchase food			70.6%

The **target of reaching 2,000 beneficiaries with the CFW component was successfully achieved** by the project. The following indicators are all new indicators the ECRHS project management requested for the MTE team to collect, to gain impressions of beneficiary satisfaction with CFW and the Seed Voucher components, as well as to gain some understanding of their effectiveness to make these households more resilient. All households interviewed were purposively selected to ensure they had participated in either the CFW or the Seed Voucher intervention.

From the set of indicators related to food and nutrition security (see Figure 15), it is observed that even though these households had participated in the livelihood component of the project, only 28.8 percent households reported to have experienced no severe hunger (as a proxy to food security measures), leaving 71.1 percent households to have experienced severe hunger at least once in the last 30 days preceding the MTE. 91.1 percent households reported eating less than two meals a day, and 90.7 percent households

reported having to adopt coping mechanisms eating less preferred or less expensive food items. Equally concerning was that 41.5 percent households still continued to either consume or advance sell their reserve grain, and 70.6 percent households were forced to take loans to purchase food. Consuming seed or advance selling seed, as well as having to take loans to provide for basic necessities, increases the vulnerability to the future well-being of any household as they no longer have the vital resources to generate income, and can adversely continue to spiral into debt. The figures indicate the majority of these households are still far from being self-resilient.

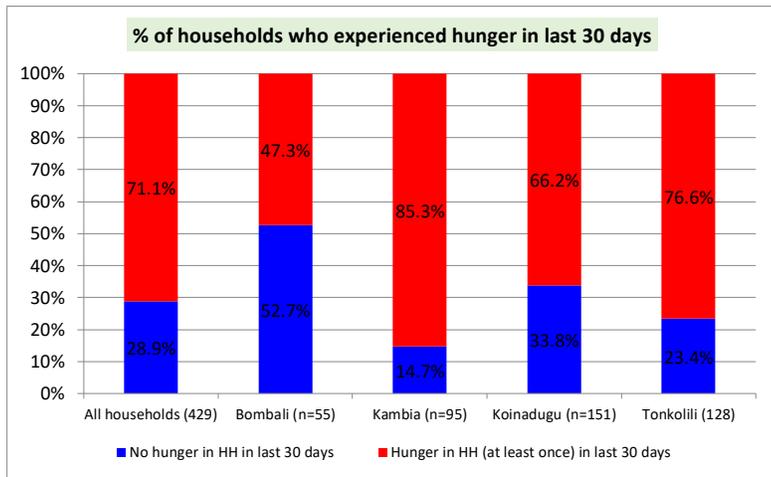


Figure 20: % of ECRHS beneficiaries reporting hunger as a proxy for food insecurity measure

Dietary diversity among beneficiary households however presents an improved situation on nutrition. As present in Figure 21, about 85 percent of beneficiary households demonstrated high household dietary diversity score (HDDS) thereby reportedly eating six or more food groups in the last seven days preceding the assessment. 13 percent ate between 4 and 5 food groups, while only 2 percent reported very low dietary diversity. This progress signals effective sensitisation and awareness raising program of nutrition in the intervention zone.

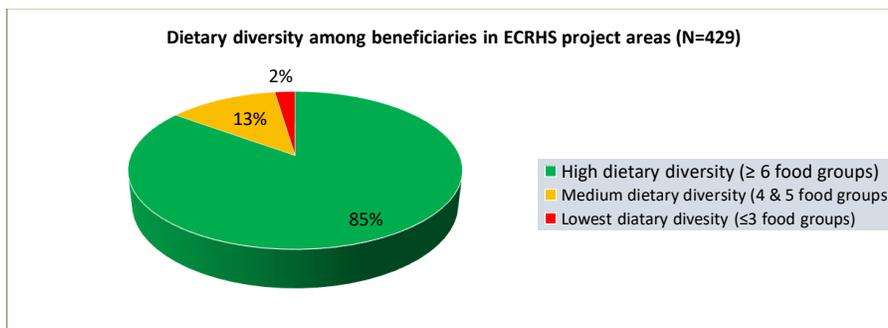


Figure 21: Dietary diversity reported in project intervention areas

From the qualitative discussions, it was evident that **the Seed Voucher intervention was timely**, replenishing depleted seed stock which the majority of households had consumed at the time of the Ebola outbreak. These households had few other options but to eat their seed as many of these communities had been quarantined, as well as the government had restricted farmers to go beyond their communities to tend to their crops. So the **Seed Voucher intervention was most appreciated**. The Government took an active role in ensuring the quality of seed, **guaranteeing beneficiaries access to quality seed**. Seed fairs organised by the project brought together seed vendors and offered beneficiaries wider choice in choosing the type of seed they were interested in, as well as empowering them to choose the vendor from whom they would like to purchase the seed from. An important outcome of Seed Fairs was **connecting beneficiaries to MAFFS staff**, where people were reported to have exchanged names and contact numbers. This was an important “systemic” outcome as beneficiaries now had better knowledge of where and who to contact from the government support services.



Figure 22: Seed Voucher beneficiary posing at her vegetable gardening & nursery

Finally, the **Seed Vouchers was a far more efficient programming approach**, reducing logistical demands on the project. At the same time, the Seed Voucher approach **energized, to an extent, local markets and seed vendors**.

Challenges included seed vendors charging more for selling seed, as they included transportation costs to attend Seed Fairs.⁵ Seed Voucher beneficiaries benefited from basic instructional training from the MAFFS Block Supervisors, but there was concern there were insufficient numbers of Block Supervisors and the training itself was not in-depth, or long enough, to truly make an impact.

Several key informants raised concern that many farmer’s advance sell their harvest to middle men, to access loans for purchasing agricultural inputs. This can be a serious issue as these farmers are then “debt hostages” where they have little negotiating power on commodity sales prices, and can therefore be victims of not being paid the prevalent market price.

Women were included, especially Female-Headed-Households, under the Seed Voucher component. Whilst this economically benefited these women, a potential unintended outcome that respondents shared from KILs, was that the project may have inadvertently increased the workload of these women, in the attempt to make them more economically viable. Considering the ECRHS project did not have a dedicated strategy on Women Empowerment programming, women may well have increased their workload as they took on economic activities on top of their normal duties of cleaning, cooking and taking care of children.

The CFW intervention benefited the 2,000 beneficiaries who participated and their work contributed to the protection of water points and in contributing to the hygiene of the community. Having the community participate in the selection of the CFW beneficiaries was an appropriate approach to reduce tensions among community members given that so few people were a part of the CFW activities. Community selection led to “community ownership” in the selection process, where they agreed on identifying the most vulnerable among them and recommend for inclusion in CFW.

⁵ Responses from KILs

Although CFW activities were readily appreciated by beneficiaries, which is unsurprising given that they are guaranteed cash at times of need. However, the project needs to pay attention as CFW interventions can lead to a sense of “dependency” or “entitlement” as much of the work performed under the ECRHS project did not lead to any long-term sustainable development, where the majority of the work done would have to be performed again in following years.

The project offered a 3-day income generating training to all CFW beneficiaries, facilitated by experts from MAFFS. Although this training was on developing the general financial skills of beneficiaries, the training fell short of developing capacities of these beneficiaries in specific income generating activities which different community members depended on for their livelihoods. Best practice worldwide has shown that to truly develop the income capacities of individuals, projects need to have dedicated modules and training given to different occupational groups as their skills sets and markets can be very different. For example, the type of skill strengthening needed for a farmer growing paddy will be different to a poor individual engaged in petty trading. Accordingly, the training offered by the project had limited impact in building the overall resilience of these CFW beneficiaries as is evident by the proxy indicators showing the continued high incidence of food insecurity among these beneficiaries.

3.2.6 Migration and gender implications of the ECRHS project

Cross-border migration continues to be a significant threat. Migrants from Guinea in the north, travel with ease into Sierra Leone to take advantage of the better and free health services offered in the PHUs. This invariably comes with a great deal of risk as migrants can carry illnesses that can infect the local population, potentially leading to epidemics. The project has sensibly partnered with the Mano River Union Secretariat to help monitor such movement, and it is highly recommended this partnership be strengthened. However, the ECRHS project, as a stand-alone, can have little impact on trans-boundary migration, as this requires a higher level of advocacy, involving Liberia, Guinea and Sierra Leone, to find ways to mitigate this issue. This is well beyond the scope of the ECRHS project.

The project has attempted to empower women and girls through interventions such as the Seed Voucher programme where women were given preference. However, the project lacked a disciplined strategy on gender programming, and hence important issues such as intra-household power dynamics, remained neglected. Accordingly, with the best of intention of engaging women in income generation, the project may have inadvertently placed more pressure on women, who now were more involved in generating income, as an additional workload on top of their normal household chores. It is recommended that for the extension and new phase of the project, ECRHS introduces a comprehensive gender component, dealing with equitable work distribution within the household between women and men, and where women exert a greater control over resources.

3.3 Efficiency and Effectiveness of the ECRHS project

The project implementation developed tools and templates that ensured quality implementation of the activities, used across operations, including DHTM and implementing partners. Generally, CARE provided both technical direction and monitoring in the general implementation and the partners reports they had constant engagement with CARE staff at both field and Freetown levels. An example of constant engagement demonstrated in the quarterly review meetings that took place in large and small groups to discuss issues and challenges. To a very large extent, the implementation demonstrated proper use of funds, which resulted to gains from exchange rate used for the no cost extension period.

In terms of relationship with the government, the evaluation team was impressed with the level of collaboration between the project and the various government partners, such as District Health Management teams, Water Directorate, Ministry of Agriculture, Forestry and Food Security as well as with the District Councils.

3.4 Health Facility Mapping

Efforts were made to include health facility mapping in the ECRHS project intervention zone. It is worth noting that the ECRHS project management team had developed a data base that serves as a 'Master Facility List'. The Master Facility List comprises of a harmonised list of health facilities across the four intervention districts including, Bombali, Kambia, Koinadugu and Tonkolili districts in northern Sierra Leone. The analyses generated 331 health facilities from the 'Master Facility List'. Notably and as presented in Table 12, more MCHP (180) and CHP (92) are available across the ECRHS project intervention districts. In addition 52 CHCs, 2 private clinics and 5 hospitals were tracked. At district level Bombali and Tonkolili districts have more facilities- with each almost doubling the number of health facilities in Kambia district.

Table 13: Total number of health facilities available in the intervention zone by level of functionality

District	MCHP	CHP	CHC	Clinic	Hospital	Total	% covered by ECRHS
Bombali	37	52	17	2	2	110	19%
Kambia	27	8	11	0	1	47	98%
Koinadugu	43	17	12	0	1	73	81%
Tonkolili	73	15	12	0	1	101	59%
Total	180	92	52	2	5	331	56%

Analyses of project coverage however revealed that coverage is almost exhaustive in Kambia district, with almost 98 percent of facilities tracked in the 'Master Facility List' covered. In Koinadugu districts about 81 percent of available health facilities have been covered. Meanwhile, this outcome does not mean the project have been successful in these districts, given that many of the facilities covered by the ECRHS project require further attention. Conversely coverage made from the ECRHS project is relatively low for Tonkolili district, with Bombali district registering the lowest coverage.

3.5 Innovations and Lessons Learnt

The ECRHS project has taken a laudable approach in its site selection process

The ECRHS project has taken a laudable approach in its site selection process. From the onset, the project involved Chiefdom Counsellors to select potential project sites, where the Counsellors chose a list of communities that would most benefit from the project. These sites were passed to the DHMT, Water Directorate and MAFFS who tried to minimise overlap with other agency interventions, after which CARE conducted surveys for the final selection of communities. Adopting this approach, the ECRHS project generated ownership from the very start of the project, and commendably reinforced the relationship with key government counterparts. Further, the sites eventually selected, were the areas where the project was most needed as perceived by the government.

Commented [EM1]: This is what was in the first report shared with Eberhard, which I have replace with the yellow: ;;;;;;; The ECRHS project generally is managed by CARE. The evaluation found that the Project Director is responsible for administrative and financial matters, whereas the Senior Program Officer is responsible for programmatic oversight of the project. At the district level, CARE retains a team that includes the District Coordinator, the Health Officer, the Surveillance Officer, the Livelihoods Officer, the WASH Officer, and the Accountability Officer. The Implementing Partners have a team of four in each district – the District Supervisor, and three Project Officers. Given this setup, there are more CARE staff members than partner staff in any given district assigned to the ECRHS project. This invariably leads to duplication of effort where Implementing Partners shared that they are not clear where their role begins and ends, and how this is different to CARE's workload. There is joint planning between CARE and the Implementing Partners, when undertaking tasks.

At the CARE central level, siloes appear where different sector leads are responsible for their own targets and strategies. Technical point persons in the field all report up to their individual sector leads at HQ further reinforcing siloes. There is a dotted line between the District Coordinator and the Technical Leads in the field. However this appears to be predominantly related to discussing administrative and logistical issues, rather than core programming elements and looking for programme synergies between different technical themes. The Implementing Partners were grateful to be included as partners in this project.

In terms of relationship with the government, the evaluation team was impressed with the level of collaboration between the project and the various government partners. There are instances which the project can reconsider, such as greater involvement of the district Water Directorate in the selection of Contractors – however overall the project has done very well in cultivating relationships with government counterparts.

After selection of project communities, the Water Directorate was fully engaged in the selection of the 80 water points to be rehabilitated, thereby engaging them from the onset. For the selection of beneficiaries to be included on the Seed Voucher component and the CFW component, communities were involved where they were tasked to select who from their community best deserved to participate in these programmes. Involving communities was a smart approach as these interventions can raise resentment considering not all of the households in a community directly benefit from these activities. However, having the community themselves select people for these interventions significantly reduces the tension as community members, through dialogue and reflection, recognise that some among them are less fortunate and in greater need of such aid.

The key government partners of ECRHS, were all committed to taking charge of coordination efforts, as well as taking ownership of developing its institutions. This attitude is certainly welcomed and is an essential step towards long term sustainable change, should the resources be available. The ECRHS project's strategy of putting the government counterparts at the fore and centre is commendable and should be continued. The project provides logistical support only for the DHMT, the Water Directorate and the MAFFS to conduct their regular coordination meetings, and to connect experts from the DHMT to train PHU staff, and for experts from MAFFS to conduct Financial Training to Seed Voucher and CFW beneficiaries. Adopting this approach, the project is careful not to erode existing capacities within government, and rather connects experts to build capacities further down the chain, as well as ensuring the government remains the lead coordinator of all development and relief work in their respective areas. The Service Level Agreements (SLAs) are also an excellent tool for coordination, where the government requires all agencies to sign these before implementation. The SLA is an important tool to minimise duplication of effort.

The ECRHS project's strategy of putting government counterparts front and center is commendable and should be continued

The MoHS's intention of formally recognising and including CHWs within the ministry is commendable, should the resources be available. Formally indoctrinating CHWs will provide greater incentive for these CHWs to perform, as well as minimise parallel structures being built in communities as development and relief agencies would have a ready list of CHWs to work with. This is already mandated by the MoHS, where agencies must work with existing CHWs – hence formalising a register of CHWs will make this process more efficient.

The engagement of the Government Seed Certification Board in the project Seed Voucher component is commendable. The Certification Board works with MAFFS to check the quality of seed from vendors supplying seed to Seed Voucher Beneficiaries, thereby minimising the risk of poor quality seed being transferred.

Seed vouchers have gained considerable attention globally due to its several advantages. Seed vouchers significantly reduce logistical pressures, where organisations are relieved of the burden to directly procure, transport and supply seeds to beneficiaries. At the same time, this is an excellent approach to re-energize local markets, which is key to developing long-term sustainable self-reliant systems. Vouchers also develop a more transparent system where beneficiaries are empowered to choose the types of seed they wish to procure, and from vendors they trust.

The relationship between the ECRHS project and the various government counterparts is a commendable partnership. After interviewing government partners in all four districts, as well as the Deputy Minister of the MoHS in Freetown, it was evident that the government is happy with the support provided by the project, especially as it closely aligns with government plans. The project also endeavours to engage the relevant government departments at all stages of the programme, which is appreciated.

At a community level, Community Bylaws are well respected, and when endorsed by Elders, are found to be effective tools to ensure communities adhere to these laws. This is therefore seen as an important

tool for the maintenance of water points, and can be extended to cover more community level options of bringing about a cleaner and hygienic environment.

The ECRHS project is leading the development of the Emergency Response Plan (ERP) across the four districts it operates in. Although the ERP was not reviewed as part of the evaluation, it is highlighted here as this is considered to be a good practice to develop long-term response plans to future shocks and stresses. The ERP engages major development and relief agencies in these regions, to discuss potential future threats, and response activation mechanisms, should these occur. ERP plans are an excellent tool to bring better coordination and response, as these are pre-planned and identify organisational responsibilities, agreed beforehand.

3.6 Gaps/challenges in the ECRHS project implementation

Government departments such as the DHMT taking the lead in training PHU staff, the MAFFS experts conducting Financial Training of CFW beneficiaries, and Water Directorate experts training Water Committees and Pump Maintenance teams on maintaining water pumps and keeping water sources clean, are commendable leadership from the government. Further, the lead taken by these government departments on coordination reduces duplication of effort between implementing agencies, and results in smoother implementation processes. Government taking the lead is encouraged as it will lead to systemic strengthening of these key institutions, leading to long term positive development.

However, a limitation of the ECRHS project was the lack of a sustainability plan of how the government would continue to perform these functions on their own accord, once the project concluded. When interviewed and probed, it was evident that all these departments are reliant on external donor funding to perform even the most routine functions such as holding coordination meetings, managing their own logistical costs for technical staff to travel to the field for monitoring purposes, or to conduct trainings. Accordingly, the ECRHS project is temporarily filling a funding void to enable these government departments to hold coordination meetings and send experts to the field for monitoring and training purposes. Once the project comes to an end, these government departments will either regress, or need to actively partner with another benefactor to continue normal operations.

The intention of the MoHS to absorb CHWs is commendable. However, it is evident from the various interviews held with the MoHS and the DHMTs that there is little budget allotted to manage this. Each CHW, once registered with the MoHS, undergo a three-month intensive training, after which they are provided with a mobile phone, and in some instances with a motorcycle. The MoHS is heavily reliant on external donors and funding agencies to meet these needs, and similarly there were no sustainability plans built in the ECRHS project to look for longer term solutions to this problem.

During the evaluation, it was evident the DHMTs are very appreciative of the work performed by CHWs, especially in preparing the Health MIS reports each month, which they submit to the PHUs. The PHUs in turn collate the information and forward these to the DHMTs, who similarly collate information from the PHUs to send up to the central MoHS information system. It was evident this process is now being completed far more efficiently after the project intervened. However, there was little discussion on how the quality of the information being collected by CHWs was monitored. This was a concern raised by several of the Implementing Partners and CARE field staff. The DHMTs are mandated to oversee the quality of data gathered by CHWs, but lack the resources in terms of DHMT personnel to perform this effectively.

The CFW and the Seed Voucher components were added to build the resilience of participating households. However, neither of these interventions were invested enough to build long-term sustainable resilience of these households. The Seed Voucher intervention did provide much needed seed to replenish seed stocks that had depleted during the Ebola outbreak. This reached 8,539 households across

226 communities, which has now raised demand from other beneficiaries to be included. Further, beneficiaries who had received support through Seed Vouchers, 41.5 percent either sold or consumed this seed stock indicating that their more immediate needs took precedence over waiting to sow the seed for future harvests.

The evaluation found that only 5.4 percent CFW and Seed Voucher beneficiary households were food secure, meaning 94.6 percent were food insecure. 90.7 percent of these households were adopting coping strategies by consuming less desirable food items, and 91.1 percent households were eating less than two meals a day. These are clear indicators that the limited interventions of the project in Seed Vouchers and CFW was not sufficient to build the resilience of these households.

The Seed Voucher's primary intent was to improve agricultural production of select beneficiaries, where women were specifically targeted, which may have had an unintended impact of putting more workload on women. Considering there was no substantive "gender programming" within the project, although women may have improved their engagement in agricultural production, they were still required to perform all their traditional roles of maintaining and cleaning the household, cooking for household members, and looking after children. Consequently, many of these women may have been overburdened, without the support of their male counterparts to engage in a more equitable distribution of duties and chores.

The WASH intervention equally was not sufficiently engaging to achieve long-term sustainable hygiene behaviour change. Only 71 communities out of 400 benefited from water points being rehabilitated. The project could only rehabilitate 80 water points with the budget available, and although a portion of the remaining 329 communities possibly did receive WASH support from other agencies, there were many communities still lacking this support. Of the 71 communities that did receive water point rehabilitation, the Water Committees and Pump Maintenance teams did receive messaging on keeping the water sources clean and safe. It was too early to assess how effective this messaging was given that the water rehabilitation work only concluded in May-June 2017.

Partnerships between the ECRHS Implementing Partners and CARE, with the various government departments is going well, ranging from planning, coordination and implementation. However, the management relationship between the Implementing Partner and CARE appears to be a "one-to-one" hierarchy. Each Implementing Partner responsible for a district, consists of one District Supervisor, supported by three Programme Officers. CARE, within each district, also has one District Coordinator, supervising a team of five – the Health Officer, the Surveillance Officer, the WASH Officer, the Livelihoods Officer and the Accountability Officer. The CARE Technical Officers work with the Implementing Partner staff in the planning of activities, and then closely monitors activities to ensure *quality* is not compromised.

Finally, cross-border issues remain a significant challenge for Sierra Leone. As described earlier, given Sierra Leone's higher quality of health services, and free services to young mothers, migrants from Guinea regularly cross into Sierra Leone to avail these services from PHUs. Isolating activities to only within the borders of Sierra Leone therefore is far from sufficient, and unless trans-border migration is actively considered together with neighbouring countries, Sierra Leone will continue to face threats of future outbreaks imported from individuals who may be infected coming from across the border.

4. CONCLUSIONS AND RECOMMENDATIONS

4.1 Conclusion

The overarching aim of the ECRHS project was to stop ongoing transmission and prevent the emergence of new cases in affected areas (hot spots) in northern Sierra Leone. Notably, the project was implemented at a time new Ebola cases had already emerged in some parts of the intervention zone. While wide claim should not be made to successes in containing the EVD (giving the number of different humanitarian responses during the surge), the design of the project and implementation strategies proved appropriate; and have largely contributed to containing and preventing future outbreak of Ebola. This was especially noted by the establishment of community based surveillance structures and effective coordinated processes and procedures observed in surveillance and information management system. In particular, the Community Health Workers (CHWs) are continuously engaged in collecting surveillance information in their communities, prepare Health Management Information System (HMIS) reports each month and submit to PHUs. The PHUs further collate the information submitted by CHWs and forward to the DHMTs, who in turn update the central MoHS information system. This system has worked well, and proved to be very instrumental in detecting new epidemics, malnutrition, etc. at community level.

However, achieving the stabilization of the health system with essential services proved difficult within the project intervention area because it was not a directly project deliverable. The reason why most indicators under IR2.1: PHUs are able to provide essential health services (basic/primary health services are ensured) were not reached. Additionally sustainability of what has been achieved presents critical challenges that required continuity of the project, which has been addressed by the extension period of additional year. While the project design succinctly takes into account a longer-term view and works towards putting in place preparations for transition to an extended health system strengthening (HSS) efforts, a number of recommendations have been made to improve of future project performance.

4.2 Recommendations

4.2.1 Improving knowledge and changing behaviours to prevent Ebola transmissions.

Continued engagement of communities on risky behaviours that may perpetuate Ebola and/or similar epidemic is critical to maintain gains made from the ECRHS project intervention. While the ECRHS project has undoubtedly contributed to (and maintained to a larger extent), improved knowledge on means of Ebola transmission and prevention, behaviour change remains critical in the intervention zone. Community members demonstrated high level of complacency now that Ebola epidemic has subsided. The proportion of community members who claimed to engage in risky behaviours such as touching sick and deceased relatives showing signs and symptoms of Ebola without swabbing was significantly high. These are existing potentials that would perpetuate the spread of an epidemic once an outbreak occurs. Vigilance and more engagement of community members should continue. Already there are Community Health Workers (CHWs) present in every community and are well connected with the health system in the ECRHS intervention zone. These structures must be encouraged to periodically continue with sensitisation and community-based surveillance activities and report to PHUs as may be required.

Cross-border migration continues to be a significant threat. Migrants from Guinea in the north of Sierra Leone, travel with ease into this country to take advantage of the better and free health services offered in the PHUs. This invariably comes with a great deal of risk as migrants can potentially carry illnesses which can infect the local population, leading to epidemics. **The project has sensibly partnered with the Mano River Union Secretariat to help monitor such movement, and it is highly recommended this partnership be strengthened.** However, the ECRHS project, as a stand-alone, can have little impact on trans-boundary migration, as this requires a higher-level advocacy programme

involving Liberia, Guinea and Sierra Leone to find ways to mitigate this issue. This is well beyond the scope of the ECRHS project.

4.2.2 Improving access to, and behaviours concerning WASH

Access to safe drinking water has significantly increased (even more than project targets); but there are potentials of prevalence of water-borne diseases- with a relatively high proportion of the population demonstrating poor water hygiene due to limited access to safe drinking water. An immediate limitation was that the project only had funding to rehabilitate 80 water points in 71 communities, out of the 400 communities targeted. Further mapping and provision of water facilities is crucial in efforts to control epidemics in the project intervention zone. Efforts should be made to include this in an extended phase of the project to reach more communities.

The ECRHS project can initiate pilots on rainwater harvesting, by collecting rain water from drainage systems on roofs or other means. Sierra Leone is rich in rainwater with rainfall over the months of April to December, during which time rainwater harvesting can be an excellent approach to capture water. Adopting this approach, will greatly reduce the stress on community water points. The same concept can be applied to PHUs.

Enforcing community mobilisation and promotion of hand hygiene practices are required to consolidate achievements and efforts in the epidemics control campaigns in all ECRHS intervention zones. This must include monitoring, distribution of IEC materials, launch of WASH talk shows on radio and provision of readily accessed and less expensive hand washing materials such as tippy-taps across communities in the intervention zone.

4.2.3 Stabilising the health system

Rebuilding health systems in the aftermath of an outbreak requires getting essential health services back up and running in a safe and reliable way, and addressing weaknesses of the system. This means recovering from Ebola requires putting in place effective infection prevention and control (IPC) and patient safety measures, surveillance systems, fit-for-purpose workforce and essential packages of services. The project was also successful in putting in place effective surveillance mechanism and has connected community surveillance to the national surveillance system.

However, the health system still remains fragile, showing poor service readiness. In particular, stock-outs of essential ANC and child health care drugs and items/ equipment are critical issues that remained to be tackled. A number of health facilities remain weak in terms of responding to future epidemics due to lack of materials and other resources, and the required workforce. The following recommendations therefore require attention:

Many PHUs are reportedly less prepared for future epidemics. Accordingly, they are less resourced with a number of facilities required to effectively prevent and control outbreaks. Major weaknesses reported to undermine the ECRHS project, and hence require attention include a) lack of isolation centres, b) inadequate supply of Personal Protective Equipment (PPE), c) inadequate supply of disinfectants (including soap, hand sanitizers), d) lack of screening centres, e) lack of ringers lactate, normal serine and other fluids needed in times of emergencies, f) inadequate supply of essential drugs, h) lack of electricity and h) inadequate number of qualified staff. Other facilities which may have long-term presence, but are lacking in a relative high number of facilities include incinerators/burial pits, and running water in delivery/labour rooms.

Efforts to strengthen the post-Ebola health system in an extended phase of the ECRHS project must also include Sexual and Reproductive Health (SRH) services that was observed to be particularly problematic from the baseline results. Whilst the supply of modern contraception methods a very high at the service

provider side, public demand from eligible clients (women age 15-49) proved to be very low. More community mobilisation and engagement, and creation of adolescent and youth friendly services (AYFS) for counselling and mentoring in the intervention zone cannot be overemphasised.

Considering the poor road network, which makes most of the health catchment areas in the ECRHS intervention zone extremely remote and inaccessibility by vehicles, drug replenishment rules must be flexible for such areas. Sufficient supplies of essential ANC and child care drugs and items must be routinely provided to facilities in these remote areas without stock-outs. This also applies to health facilities in border areas, which are perpetually overwhelmed with case surge resulting from cross-border migrations. Although this is not a direct deliverable to the project, efforts should be made by CARE to engage the MoHS and the DHMTs to ensure supplies are available at the facilities. In particular, cross-border health facilities must be fully equipped with routine supplies of Basic Obstetric Emergency and Neonate Care (BEmONC) facilities with no stock.

4.2.4 Increasing resilience among the Ebola affected population

The MTE results show that the ECRHS livelihoods approach has been less impactful due to the broader scope and little resources invested towards this component. The ECRHS project neither had the breadth, nor the depth, to make any significant impact in this area. Even within the households that benefited from either the Seed Voucher intervention, the high level of food insecurity that continues to be exhibited is an important indicator that even with the project intervention, these households remain highly vulnerable. The direct correlation between food security and population health cannot be over emphasised, and with the project overall goal to “improve the health status of Sierra Leoneans in four northern districts (Bombali, Tonkilili, Kambia and Koinadugu), the importance of this component of the project is valid.

Given this reality, it is recommended the project considers reducing its geographic coverage, such that all project communities receive livelihood assistance in all programming elements of the project. Given the high level of vulnerability of these communities, the Seed Voucher intervention can be designed such that all the poorest households receive these vouchers at least once over the extension period or the next phase of the project. Seed Fairs have been promising over this phase of the project, but concerns remain of how these will continue without the project. MAFFS expressed their desire to continue these fairs, but did acknowledge this would be difficult without the support from an external donor.

4.2.5 Sustainability of project achievement

It is undoubted that the ECRHS project achieved in putting in place an effective community surveillance structures largely comprising of Community Health Workers (CHWs). It is recognised the ECRHS project evolved as an emergency response to the Ebola outbreak. However, the Ebola threat has subsided, and the project now has an opportunity to work on more “systemic” issues leading to long-term sustainable development. The project, over this past 19 months, has firmly established relationships with the MoHS, and the DHMTs in its four target districts. The project now has the opportunity to build on this relationship over the one-year extension, and into the new phase of the project.

The project should therefore ensure in the extension phase that its cadre of CHWs is more efficient, and effective in their roles on sensitisation, reporting to PHUs, and to link the community to the PHU. It is recommended the ECRHS project develops a core strength in surveillance across all DHMT staff, to enable much quicker response if and when future epidemics strike. At these times, quick response times are of the utmost urgency to contain further outbreak of the epidemic – and hence having a trained team to deploy on short notice can be invaluable.

Finally, it is advisable for the ECRHS project to develop “graduation” strategies where the project, over time, reduces its engagement in providing logistical support for government coordination meetings, surveillance and capacity building endeavours. This can be a graduated step backwards by the project, at predefined timelines, where the government will increasingly step forward to fill the void and take more control over the process. Unless strategic steps are initiated, the ECRHS project risks continuing only propping up a system, which can regress when the project ends.

4.2.6 Collaboration and coordination

CARE has a responsibility to ensure local partners are not only used as service delivery vehicles, but that they are recognised as important development structures that can bring change to the region. CARE should consider developing a comprehensive partnership strategy, such that opportunities offered by projects such ECRHS can be used to develop local partners in different areas of administration, finance and programming. This can be an important sustainability strategy for CARE Sierra Leone, developing local organisations to continue building the capacities of the poor and vulnerable communities in their region. Where possible and appropriate, Implementing Partners should be more involved in the development of the project strategy, and implementation plans to bring greater ownership. Partners did mention this is already taking place and is commendable.

5. ANNEXES

- Annex 1: Statistical Data
 - Annex 2: Evaluation Schedule
 - Annex 3: List of Secondary Documents
 - Annex 4: List of Communities in Sample Survey
 - Annex 5: List of Attendees in Final Presentation
 - Annex 6: List of Key Informants
 - Annex 7: Achievement Rating Scale
- (Please refer to attachments).