Recommendations for Post Distribution Monitoring Implementation

Prepared for AMF

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Introduction

IDinsight is working with GiveWell to assess the monitoring system of Against Malaria Foundation (AMF). This document presents recommendations specific to the post distribution monitoring (PDM) surveys that AMF conducts through a local partner to monitor the continued use of insecticide treated nets. The goal of this document is to help AMF develop a more standardized PDM process that leads to more accurate and higher quality data. Prioritizing PDM data accuracy is critical for AMF because results can both demonstrate the effectiveness of AMF's program and inform strategic decisions regarding future net distributions. Additionally, PDM data accuracy is key to GiveWell's assessment of AMF's impact and influences their funding decisions.

IDinsight pooled a variety of resources to develop this list of best practices and recommendations, listed in Annex 1.

This document consists of tables that highlight the best practices for each stage of the PDM. Each table has four columns: "Best Practices"; "Priority for data accuracy"; "Recommendation for AMF"; and "AMF status". The table below details the purpose and contents of each column:

Best Practice	Priority for data accuracy[1]	Current AMF practice	Recommendation for AMF
Generally accepted best practices to incorporate into each step of surveying. **Justification**: Why is this a best practice, and how does it contribute to data accuracy?	High Medium Low	What is AMF/country partner's current practice as it relates to the best practice? Please note: this column is filled in to the best of IDinsight's knowledge of AMF's practices, and may not be complete. AMF should fill in the gaps, if any.	**How can AMF incorporate this best practice into the PDM process?**

[1] All the recommendations noted in this document are important for data accuracy and should be implemented for AMF to be confident of the data their partners are collecting. We strongly recommend AMF implement the 'High' recommendations as soon as possible.

Survey Instrument

The table below outlines best practices that should be incorporated into the actual survey instrument for the PDM.

Best Practice	Priority for data accuracy	Current AMF practice	Recommendation for AMF
A unique respondent ID is recorded on each PDM form (main form and backcheck form). This ID is generated selecting the random sample. Each respondent has one unique ID. **Justification:** Unique IDs allow for easy tracking of surveys completed and for linkage of a given survey to the its data that will be entered later, making it easier to: (i) Compare data collected to data entered (ii) Compare the PDM survey to the back-check survey. (iii) Help avoid duplication of surveying and data entry	High	AMF forms currently do not use 'unique IDs'. If an error is caught in data entry, surveys are matched to the paper form by name, which can contribute to mismatches and incorrect entry. Manual matching makes the process more burdensome, decreasing the likelihood of it actually happening.	During the sample selection process, AMF should assign each respondent a unique id that is then recorded by a specific question on the PDM form. Back-check forms must also capture the same unique ID of the respondent. AMF should generate a 3-digit number to be used as an ID for each individual surveyed during a PDM. The number can be generated via the same template AMF currently uses to randomly select respondents. This ID should be included on the list of respondents and spares that is sent to a country partner before every PDM survey. One question should be added to the survey form for the enumerators to manually enter this 3-digit number. For e.g.: MA-NT-12-001, where MA – Malawi (Country), NT – Ntcheu (Region/District), 12 - 12 month PDM 001 - respondent ID → this is the only information the enumerator should have to enter on the form. The MA-NT-12 should be printed on the form itself. MA-NT-12-001 is the ID that should be used to compare PDM and backcheck forms, as well as to confirm accurate data entry.
A survey instrument is lean and only collects data that is most decision relevant. **Justification:** A lean survey tool focuses the data collection process on gathering data that will allow an organization to make informed decisions regarding the intervention.	High	AMF's current PDM survey is a half-page survey that has a limited set of questions that collect data on bed net usage/coverage.	**AMF should continue to maintain the short PDM form but consider changing the order of questions.** For e.g. the PDM form asks for the size of the household at the end, when it should be asked in the beginning to help the flow of questions make more intuitive sense.

Training

The table below outlines best practices that should be followed when developing and conducting training sessions for supervisors and field team members.

Best Practice	Priority for data accuracy	Current AMF practice	Recommendation for AMF
An additional training is held for supervisors, and supervisors are involved in enumerator training as 'advisors'. **Justification:** Additional trainings for management roles ensure that the teams are well managed and members have an in-depth understanding of their roles. Supervisors are able made to be 'authority figures' which increases accountability.	High	PDM trainings are currently not separated by role, and supervisors seem to receive the same amount of training as enumerators.	**AMF should ensure that supervisors attend a separate PDM training and that supervisors participate in enumerator training.** Supervisors should be trained on leading a team, tracking progress, providing guidance and feedback when required, answering questions that enumerators might have, as well as collecting and checking PDM forms for errors. Supervisors should be responsible for ensuring the right people are being surveyed, and that the enumerator is recording accurate information. Supervisors should conduct 'spot checks' i.e. random checks on enumerators to ensure they are conducting the survey accurately.
Trainings have standardized survey definitions and protocols. **Justification:** Standardization of survey definitions and protocols ensures that trainings are consistent across regions. This is important in ensuring that the survey is collecting accurate and consistent responses.	High	AMF's current protocol document does not provide sufficient guidance on the interpretation of the questions on the PDM form. In the Ghana PDM trainings, trainers walked through all parts of the survey, but did not provide concrete answers to how to respond to scenarios that may arise in the field, such as households refusing consent, or households complaining that they did not receive nets and asking the enumerator to give them a net.	**AMF should ensure that all PDM trainings have standardized survey definitions and protocols across country partners.** Ideally, AMF is able to send representatives to each enumerator training to ensure quality, but if not possible, AMF should attend a handful as a check mechanism. This will be especially useful as AMF implements their new Standard Operating Protocol documents. AMF should include the definitions of key terms and 'frequently asked questions' into the Standard Operating Procedure (SOP) document[2] sent to each partner. Detailed guidelines on question and response interpretation will make sure the survey is conducted

[2] AMF is currently developing this document to share with country partners.

		In the two PDMs we observed, it seemed like there was no clear definition of who the respondent was supposed to be. In Malawi, anyone from the selected household was interviewed, whereas only the head of the household was interviewed in Ghana. This lead to several households being declared unavailable in Ghana, which mean more spares were needed and used. If this process was standardized, Ghana might not need as many spares.	uniformly across all countries AMF works in, and that all responses are recorded the same way. AMF should clearly define who the respondent should be, and who is an acceptable replacement if that person is unavailable. For e.g. can anyone in the household respond to the survey? Does it have to be the household head? If the household head is at work, can the wife or oldest child respond? These questions should be answered by AMF and protocol should be conveyed to the country partner.
Trainers run through the full survey while training the enumerators, by reading every question, explaining how the question should be interpreted, and why it is being asked. **Justification:** Discussing each question one-by-one ensures that all enumerators understand the question in the same way to facilitate standardized data collection.	High	While the Ghana PDM training went through each question during the training, IDinsight cannot ascertain if the practice is followed in other countries.	**AMF should ensure that each training includes a detailed run through of the entire survey, including reading and correctly interpreting each question. The detailed SOP that AMF will send to country partners should have all the information the partners (and trainers) need to conduct a complete, air tight training.** If there are any questions to which the country partner does not know the answer, the country partner should reach out to AMF to clarify before starting data collection.
Trainings include a clear explanation of the back-check and spot-check processes for enumerators and supervisors. **Justification:** Incorporating clear explanations of back- checks and spot-checks ensure that supervisors and enumerators understand and adhere to back-check and spot-check protocols and maintain data accuracy throughout data collection. Repercussions for low performance should also be clear.	High	AMF's training currently does not explain the purpose and process for conducting spot-checks and back- checks nor how that data is being used to monitor data collection and enumerator performance.	**AMF should standardize the explanation of back-checks and spot-checks for all PDM trainings. This explanation should include the rationale for conducting checks to ensure enumerators know their work is being checked.**

Trainers test that enumerators are sufficiently familiar with the electronic data collection tool (where applicable). **Justification:** Additional training on electronic data collection will ensure that enumerators understand how to use the tool and the various components such as skip patterns and logic checks built into the form. The forms are built to check for common mistakes and data entry errors, and the enumerators should be trained to know what to enter where.	High	In the Ghana PDM training, trainers spent time going over the tablets for electronic data collection and enumerators were able to test the tablets.	**AMF should continue to ensure that areas with electronic data collection have trainings that go into detail on how to use the survey instrument.**
Trainings include a field practice component during which enumerators practice conducting the survey in real world situations with real respondents, usually near the training center. Field practice should not be conducted on the same population that will be surveyed. **Justification:** Practicing and testing the survey in the field prior to data collection is important as it tests field logistics and addresses issues that could come up in the field in a controlled environment.	Medium[3]	While a field practice exercise was implemented in the Ghana PDM training, it is not clear if this practice is followed in other countries Currently, it seems as though it is common for there to be in-class practice (not field practice) sessions to occur within the training.	**AMF should ensure that all survey trainings include a component of field practice i.e. conducting the survey in a village/town environment which is similar to where they will be conducting the real survey.** These field practice activities are crucial for enumerators to internalize the survey and practice responding to real world situations, which is important as they will not be able to rely on the trainer when they are in the field.
Trainings include an assessment of enumerators' understanding of the survey instrument and data collection protocols. **Justification:** Incorporating an assessment of enumerator's understanding of the survey allows for supervisors to identify parts of the training that require further attention, correct	Medium	While it seems as though the Malawi PDM training used a practice session to assess enumerators' understanding of the survey, it is not clear if this practice is followed in other countries.	**AMF should follow Malawi's model and require that country partners implement a standardized assessment of enumerators' understanding of the PDM in all trainings.** Enumerators should demonstrate sufficient knowledge of the survey instrument before they are allowed to start data collection.

[3] The priority for piloting would be "High" if they were also testing the survey instrument, but since the instrument is fixed, it has been assigned a priority level of "Medium."

misunderstandings, as well as narrow down and pick the most competent enumerators.			

Data collection

The table below outlines best practices that should be followed by supervisors and field team members during the data collection period.

Best Practice	Priority for data accuracy	Current AMF practice	Recommendations for AMF
Data collection follows a standardized 'spare' household protocol. Using a spare is always a last resort. If the enumerator does need to use a spare, they should use the first one on the list, and not consider the others unless they need another spare. **Justification:** Enumerators should follow a specific protocol for when they can and cannot use the 'spare' households provided by AMF. Following the protocol decreases the probability of sampling bias[4] in the data. With additional household tracking, supervisors should know when a household was visited, and when and why a spare was used.	High	In recent PDMs, enumerators were not recording the reasons for using spares, and spares were not consistently being tracked. Enumerators would also mark households that were temporarily gone (in the field for the day etc.) as "not found" instead of returning later. It is unclear if AMF has standardized protocols for spare household uses.	**AMF should ensure that field teams adhere to a spare household protocol (while considering cost implications)**. Additional details with specific recommendations for recording spare households can be found in Annex 2.
Supervisors frequently collect all paper forms, including incomplete forms, and refusals. Daily form collection is best practice to allow the supervisor to assess the day's forms and have the enumerator re-do forms that are incomplete or seem wrong. If	High	Incomplete or inconsistent forms were being discarded in Ghana during data entry with no clear record of why.	**AMF should require country partners to mandate that supervisors frequently collect all PDM forms, regardless of completion. All complete forms should be entered into the DES.** Here are solutions to situations that may arise:

[4] Here, the sampling bias (or a non-random sample) can, for example, result from enumerators picking spares conveniently located to other households in the study, or picking other easily available households

daily collection is not possible, twice a week is recommended. **Justification:** Consistent form collection keeps enumerators accountable and reduces the chance of fraud between enumerators and back-checkers. In addition, knowing the number of refusals and "not-mets" provides important indicators of potential bias.			1. If forms are incomplete or there are clear mistakes, every attempt should be made to re-survey that household. 2. If forms are illegible, try and find the enumerator who filled it to clarify the responses. Collecting forms daily or twice a week ensures that enumerators are able to go back to the households to resurvey rather easily, which might not be the case if the forms are checked a week or more after data collection. If there is no way to correct/complete the form, the unique ID of the household should be recorded, and the reason for discarding that form should be noted.

Data quality assurance

The table below outlines best practices that should be incorporated to maintain and increase data quality throughout the PDM.

Best Practice	Priority for data accuracy	Current AMF practice	Recommendation for AMF
Back-check teams are independent of main enumerator teams and collect data soon after the initial data collection.[5] **Justification:** Independent back-check teams ensure that the back-check activities and primary data collection do not influence one another.	High	In Ghana, the enumerators were aware which households were to be back-checked and may have modified their survey technique for those households. In some cases, it is also possible that the back-checks happened before the main survey.	**AMF should require that country partners maintain independent back-check teams during data collection and ensure that back- check teams are collecting back-check data after initial data collection. Back-checks should be conducted two to three days after the original survey.**
Data collection follows a detailed survey scrutiny protocol. **Justification:** Following the survey scrutiny protocol allows for supervisors to identify problems with data collection or enumerators in the field and correct them in a timely manner.	High	In the Malawi PDM, supervisors and project leads checked completed forms for errors and inconsistencies before submitting them for data entry. However, it was not clear how consistently this was done, if these checks led to feedback, nor whether this is a standard practice across countries. In Ghana, supervisors did not seem to collect completed forms in a timely manner, which would have allowed enumerators to course correct and collect the accurate data.	**AMF should require that country partners enforce a standard survey scrutiny protocol.** Details regarding specific recommendations for the survey scrutiny protocol can be found in Annex 2.

[5] Back- checks are generally conducted two to three days after the original survey, to reduce the risk of recall bias and to ensure no major changes occur that would alter responses.

Data collection has and follows a detailed spot check protocol. **Justification:** Spot checks help supervisors observe their team in the field, understand data collection quality, identify errors, and provide timely feedback on how to improve data quality.	High	AMF has a spot check protocol in place. However, it is not clear how closely it is followed by supervisors. There is also the challenge of distance between data collection sites that compromises the ability to consistently spot check.	**AMF should require that country partners enforce a standard spot- check protocol and train supervisors accordingly.** Specific recommendations for appropriate spot-check protocol can be found in Annex 2.
Data collection follows a pre-determined back-check protocol. **Justification:** Back-checks are critical to data quality assurance and should be conducted frequently and compared to original surveys daily. This can be done in real time by the supervisors.	High	The primary purpose of back-check data is to compare them to the original data to check for discrepancies that can lead to wrong estimates. While back-checks were conducted regularly and both sets of data (PDM and back check) were entered into the data entry system (DES), the data were not compared, either manually or via the DES.	**AMF should require that country partners enforce a standard and timely back-check data comparison protocol.** Details regarding specific recommendations for back-check protocols can be found in Annex 2.
Electronic data collection is preferred. **Justification:** If resources allow, electronic data collection increases the accuracy and efficiency of the data collection process; it allows for analysis and comparisons to be done in a timely manner, as well as provides other data quality checks such as GPS and time tracking, restrictions on enumerators' ability to make changes to the survey after submitting, and more frequent and accurate uploading of data to the DES.	Medium	AMF piloted electronic data collection in Ghana and is planning to roll out electronic data collection in Togo. It is not clear if this practice will be continued in future PDMs in other countries.	**AMF should consider expanding electronic data collection in all countries.**

Collected paper copies of surveys are saved for a pre-designated period of time (usually 2 years) **Justification:** Saving paper copies for a period of time after data collection allows for further data checks to be conducted if issues arise during analysis and if future rounds of data collection produces different results.	Low	AMF country partners currently save paper copies of the PDM following data collection. However, the period of time has not been specified.	**AMF should continue to require that country partners save paper forms for a specified period of time (3-5 years or beyond the next cycle of data collection.)**
Incorrect or incomplete forms are also entered into the data system, not discarded. It is important to know how many, why, and which forms (by unique ID) were discarded. **Justification:** Discarding filled forms can be a sign of weak enumerators or poor data collection practices. If a large number of forms were discarded, it might also mean that several replacement households were picked, which might undermine the 'random' selection component of the survey. Thus, recording all forms is important to understanding which households were visited and helps prevent sampling bias in the data from occurring.	High	In recent PDMs, incorrect and incomplete forms were discarded prior to data entry with no way of tracking which ones or why.	**AMF should require that country partners maintain an electronic record of all paper forms before discarding, including the unique ID and the reason for why it was discarded. It is important to tally how many forms were discarded in each round of the PDCM and work on reducing this count in subsequent PDM surveys, through better training and providing fewer replacement options.** It is important to be able to track every household that was originally selected to be in the sample. While we think the short PDM form is best practice, we recommend adding one question - "Why did this household not respond to the survey?" it should be a multiple choice question with normal reasons why a household might not be available. Some choice options are: "Not at home after, even after 3 visits", "Household has moved away", "Household refused to participate in the survey", (and other reasons that the country partner might be able to provide). If the household was available and consented to the survey, this question should be left blank.
Management sets and uses a detailed communication and team management plan that highlights the frequency of debriefs and	High	In the Malawi PDMs, a planning document was developed. However, it was high level and did not provide details on how the	**AMF should ask for a communication and team management plan from country partners.**

how team members will be held accountable during data collection. **Justification:** A communication and team management plan will highlight specific practices that will be followed to maintain data quality during data collection through debriefs, feedback, and shared learnings on issues that arise in the field.		team was to be managed during data collection. It was also unclear if this is a common practice with all partners.	Details regarding specific recommendations for team management are in Annex 2. The country partners should be the ones developing these communication plans, but AMF should require it to be followed. Having AMF sign off on the plan and requiring it to be done is a way to signal importance, and hold partners accountable if not done.
Data is monitored in "real time" during data collection as it comes in. **Justification:** Monitoring data in real time allows issues like fraud, misinterpretation, and errors to be detected and fixed during data collection.	Medium	This practice or a variation of it was not observed during site visits, and IDinsight cannot ascertain if the practice is followed.	**AMF should check data collected in real time during the PDM. Here, the point is to ensure that data collected is not fraudulent, and that the enumerator is not collecting incomplete information.** Some of the issues that the data should be checked for are: 1. Check responses by enumerator – do all or many of an enumerators forms have the same answers for any question? 2. Do the self-reported number of nets match the number of nets recorded in the table in Question 2? 3. Does it look like two different people filled out the same form?

Data entry

The table below outlines best practices that should be followed while entering paper forms into AMF's Data Entry System.

Best Practice	Priority for data accuracy	Current AMF practice	Recommendation for AMF
Data entry clerks are also trained on the contents of the survey.	High	AMF currently trains data clerks on the survey instrument.	**AMF should continue to train data clerks on the PDM survey instrument.**

Justification: Training data clerks on the contents of the survey allows them to be able to better contextualize answers and identify abnormalities when entering forms.			
Each form is entered into the DES twice. This is done by two different data clerks, making sure to enter the right unique ID with each form. If it is too expensive to enter each form twice, a randomly selected subset of the forms is double entered. **Justification:** Double data entry helps decrease the instance of errors that occur during data entry, and more reliable data during analysis leads to more reliable results. This practice may be expensive, so if it is not possible to do, it is ideal to use a secondary best practice.	High	In recent PDMs, data entry clerks were not implementing double-entry or other data entry checks. AMF updated its DES interface to minimize data entry errors, however, it is not clear what impact the change has had on the rate of error for data entry.	**AMF should require that paper forms are entered twice.** If double entry of all surveys is not possible, consider double entering only a predetermined percentage of surveys (randomly selected) or physically checking paper forms against the entered data. Rules should be built in to know how many 'error' forms are acceptable before having to re-enter all the forms, and what protocols the country partner should follow if discrepancies are found (for e.g.: providing actionable feedback to the enumerator, reprimanding or firing repeat offenders) For e.g.: A 10% random sample of the forms can be entered twice with the rule that if 10% or more of these forms have a discrepancy, then all forms have to be re-entered.
Data entered into the server are automatically compared to other data entered with the same unique ID. The DES system should be set up to do this internally. **Justification:** Double data entry with the same unique ID can raise flags for any discrepancies between the PDM form and the backcheck form.	High	The DES is already programmed to match data and raise flags to the data entry supervisor. It is, however, possible that the DES is currently matching forms on name of the respondent, which can be tricky due to the high likelihood of similar or same names.	**AMF should program the DES to be able to match unique IDs (like MA-NT-12-001) and compare the data on those forms. If the data do not match, the DES should raise a flag to mark the discrepancy for the supervisor. The supervisor should then follow the rule for number of discrepancies allowed (see an example discrepancy rule in Annex 2), to determine how many forms need to be re-entered.**
Electronic data are encrypted. **Justification:** Data encryption helps to maintain and protect the privacy and information of the respondents of the survey especially when that data is being shared across organizations.	Low	It is unclear whether data is encrypted on the DES.	**AMF should ensure that all data are encrypted.**

Reporting

The table below outlines best practices that should be followed during data analysis and development / distribution of the PDM results report.

Best Practice	Priority for data accuracy	Current AMF practice	Recommendations for AMF
Country partners and enumerators provide useful qualitative and anecdotal evidence on coverage and use, given the time they spend with beneficiaries. This knowledge is often captured in a post-survey report, detailing interesting findings or possible reasons net usage might be low. **Justification:** Reviewing data to answer these questions might reveal patterns with respect to net coverage that can better inform distribution strategies in the future.	Medium	In the Malawi PDM report, there was initial data on which individuals are most likely to be covered by nets (children under and over 5 years, pregnant women, adults) but did not include an in-depth analysis of why this might be the case.	**AMF should use country partners' local knowledge to try to understand why net prevalence and net usage numbers are what they are, to improve on future distributions and campaigns.** Country partners are best placed to help AMF understand the current situation on the ground, through anecdotal evidence and qualitative interviews of select respondents.
Data quality assurance measures, along with conclusions and solutions, followed during data collection are included in the report AMF's partners send to AMF at the end of data collection. **Justification:** Reporting data quality measures provides details on how best practices were incorporated during data collection, informs conclusions regarding the success of the data collection, and highlights lessons learned to apply to future data collections.	High	In the Malawi PDM report, measures such as overall coverage, population breakdown of coverage, nets hung, and net condition were included, however there was no information on the results of the back check and spot-checks, nor on the number of data entry errors. It seems that no country partner shares data collection quality assurance measures with AMF, even if these quality measures are being conducted.	**AMF should require country partners to incorporate more data quality assurance measures in the field, and the results of these data quality assurance measures should be reported in the data collection report.** It is highly recommended that country partners report the following in their final report: 1. How many spot checks were done? 2. Were there any incidences of (suspected) data fraud? How was the situation resolved? 3. How many back checks were done? Who did the back checks? What were the results of the back checks? How were discrepancies handled?

			4. What percentage of forms were double entered? How many were errors? What was done to correct these (and other forms)? 5. How many forms were incomplete, and why? 6. How many spares were surveyed? It is important to note that the responses to these measures should never be 'all forms were back checked', and 'no discrepancies arose', as these are signs of misreporting. Having all of the above information can assure AMF that the data collected was of high quality. Without these reports, it is difficult to know if any attention was paid to data quality in the field, which can make it hard to trust the numbers that are finally reported. With this information, AMF can work with country partners to improve data quality.
Final results, disaggregated by relevant geographic strata, on coverage and usage are shared with enumeration teams and local partners. **Justification:** Sharing final results with local partners and field teams concretizes the purpose of the PDM, allows them to note any issues they can correct in the next PDM, and reinforces data quality.	Medium	This practice or a variation of it was not observed during site visits and IDinsight cannot ascertain if the practice is followed.	**AMF should share final results with local partners and field teams for two reasons:** 1. **To ensure buy in from the local partner, and help them feel vested in the success of the program.** 2. **To help country partners to track their progress over time.** A partner committed to full bed net coverage and vested in ensuring data collection of the highest quality will be a very useful partner for AMF. Sharing appropriately disaggregated data with the country partners will help them plan better for the future, and to know which areas (sub-districts/communities) they have to improve their work in.

Reports inform decisions regarding the improvement of intervention implementation strategies and should be linked to action plans for future activities. **Justification:** Having decision-oriented reports ensures that the data collected is being used in a manner that leads to programmatic changes for future distributions and PDMs**.**	High	In the Malawi PDM report, a "lessons learned" section was included that highlighted practices to continue and incorporate for future PDMs. However, the report did not highlight problems encountered during the data collection process. It is unclear if other PDM reports follow this same format.	**AMF should require that reports are written with the aim to inform decisions regarding the improvement of bed net distribution strategies and should be tied to future program decisions.**

Annex 1

Sources consulted:

AMF documents

- PDM planning document Malawi-Dowa
- PDM planning document Malawi-Ntcheu
- PDM final report Malawi-Ntcheu

IDinsight trip reports

- PDM trip report for Malawi (June 2017)
- PDM trip report for Ghana (July 2017)

IDinsight internal documents

- IDinsight Survey protocol
- IDinsight Data collection protocol

External research

- JPAL/IPA Research Protocols. https://www.poverty-action.org/researchers/research-resources/research-protocols
- ICES Survey Protocols. http://www.ices.dk/publications/our-publications/Pages/Survey-Protocols.aspx
- U.S. Fish & Wildlife Service "How to Develop Survey Protocols." https://www.fws.gov/policy/SurveyProtocalsHB.pdf

Annex 2

The following recommendations are specific ideas (in the right column) on how AMF can follow certain protocols (in the left column).

Protocol	Best Practices
Spare household protocol	• If the target respondent is not present but will be present later the same day or the next day, the enumerator should revisit the household several times before moving on to a spare[6]. There should be a minimum of three visits to a household before declaring them 'missing', or 'not reachable'. • If the household is unreachable after three attempts, then (and only then) should the enumerator use a spare household. It is important to try and minimize the use of spares to replace a household that is not home at the time of the survey. If we replace a 'randomly selected' household with a deliberately[7] chosen spare, the estimate of net coverage and usage can be biased. • Enumerators should keep track of number of visits and fill out a form for the missing households.
Back-check protocol	• 5% of surveys[8] (of each enumerator) and any households not located during primary data collection should be back-checked. • Results from the revisits should be matched and cross-checked against the original surveys. This can be done on the DES (matched using a unique ID), or manually by supervisors in the field. • Results of the back checks should be communicated to the team to ensure improvement in data quality over time. • Results of the various data quality checks should be summarized and sent to GiveWell (and other relevant stakeholders) to increase stakeholder confidence in the quality of data collected.
Survey scrutiny protocol	• Supervisors should review every question on each completed survey. • If errors are found (blank questions, legible answers, etc.), the questionnaire should be returned to the enumerator to fix the error. If necessary and feasible, enumerators should return to the respondent to obtain the correct data. • Supervisors should place extra scrutiny on problem enumerator's forms. • Supervisors should also cross check the PDM form with the corresponding back-check form to ensure the data matches, if it does not match or seems fraudulent, the survey should be re-administered by a better/trusted enumerator.
Spot-check protocol	• Supervisors should conduct unannounced visits to observe enumerator adherence to survey protocols and identify any issues during data collection; observations should be communicated back to the team. • Spot checks should be conducted on all enumerators, across all areas, and during the entire duration of the survey. Supervisors should, however, prioritize spot checking weak or problematic enumerators more frequently. supervisors should also spot check problem enumerators.

[6] https://dism.ssri.duke.edu/survey-help/tipsheets/tipsheet-nonresponse-error. Call backs/reminders are a good way to ensure respondents take the survey "Researchers should contact sampling units multiple times during the data collection period with reminders to complete the survey." While this source does not specify number of times a household should be revisited, we believe a household should be re-visited as many times as is possible, with 3 being the ideal.

[7] We say 'deliberately chosen' spare to imply that there is a possibility of enumerators picking spares that are close by or are at home or are easier to find than the other spares on their list. If they do pick a spare in this manner, the randomness of the sample is lost, and we introduce a bias into the estimate. Our sample can no longer be considered 'representative'.

[8] The general rule of thumb for back checks is 10% (in academia) but 5% is not considered low. It is more important to actively compare the back check data to the survey data and to take corrective action in case of discrepancies.

Communication and team management plan	• Supervisors should communicate data collection issues to project managers; project managers should share lessons learned with all supervisors. • Field teams should participate in frequent debriefs throughout the data collection period to distribute and collect survey forms and provide feedback. • Data collection and entry should have a "three-strikes rule" for enumerators, data entry clerks, and supervisors; team members who are consistently making mistakes will have three warnings (which may include additional actions such as additional training and probation) before being replaced; falsification of data should result in immediate termination. • If errors found during crosschecking can be traced to a particular data entry clerk, crosscheck all of that clerk's entries. • Enumerators should fill out surveys with pens to reduce the opportunity that an answer is difficult to read or for an enumerator to change or make up information at the end of the survey in order to meet criteria for completed forms. • Enumerators should physically mark completed households. • Enumerators should mark the tags of the nets checked. Each round of PDCUs should use different colours so as to not confuse marks from older PDCUs.