RWSSP: Technical Advisory Note 3.2
Monitoring & Evaluating Health Outcomes & Impact

Introduction

It is well established that water supply together with sanitation leads to significant improvements in community health, most notably a reduction in the incidence of diarrhoeal disease. A necessary precursor to improved health is the practice of appropriate hygiene behaviours, to break the disease transmission route. This causal pathway is shown in the following diagram:

Stage 1: Facilities (Results)
Improved water supply
VIP latrines

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Stage 2: Changed behaviours/practices
Safe household drinking water storage and handling
Handwashing with soap
Safe disposal of faeces

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Stage 3: Improved health outcomes
Reduced diarrhoeal incidence
Reduced scabies/skin sores

RWSSP must monitor the quality of achievements (results, outcomes, impact) at each stage of the project. Stage 1 measures the quality of the results (deliverables) of the project. Stage 2 and 3 are concerned with measuring the health outcomes and impact, and are the main focus of this TAN.

Stage 1: Monitoring results

Key result areas rely on delivery of activities for their achievement. The programme will monitor that activities for each NSA are achieved, and that they meet quality standards and set targets.

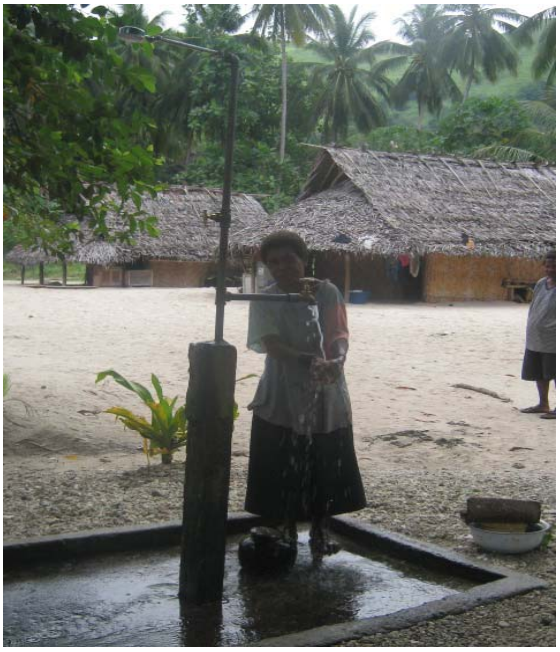
Stage 2: Monitoring behaviour

Hygiene is behaviour that serves to prevent infection. Stage 2 is supported by an intensive hygiene promotion programme, and expects to achieve changes in key behaviours and practices (see TAN 3.1). The project must monitor that these changes are occurring, to have confidence in the programme resulting in improved community health (Stage 3). Efforts to promote hygiene in RWSSP will focus around three key practices:

- handwashing with soap,
- the removal of faeces from the household environment, and
- safe storage of household drinking water.

Key behaviours to monitor in RWSSP: Five key behaviours/practices will therefore be monitored:

- Handwashing behaviour - with/without soap (Form MKBC 01)
- Handwashing (where) after going to the toilet (Form MKBC 02)
- Handwashing (where) before handling food, before eating (Form MKBC 03)
- Defecation behaviour - main location (Form MKBC 04)
- Household drinking water storage practices (Form MKBC 05).



Method of data collection: data collection will be undertaken in every community within each scheme, by the NSA health officer, working with small groups that are representative of all people in the community, using the PHAST Pocket Chart methodology. A village walkaround can confirm findings for safe storage practices.

Timing of data collection: data collection will occur three times over the life of the project:

- at project commencement (baseline data),
- halfway through NSA contract implementation,
- at the end of the NSA contract.

Measuring at the halfway point is called “process evaluation” and measures the progress being made in behaviour change. If no changes are

occurring, the NSA needs to know this, find out what the barriers are to change, and reinvigorate the hygiene promotion interventions appropriately to achieve desired changes.

Stage 3: Evaluating health impact

The goal of RWSSP is to improve community health. The logic is that if hygiene practices have changed one expects to see a reduction in incidence of key diseases in beneficiary communities.

Key diseases to measure: incidence data (new cases) for diarrhoea and scabies/skin sores have been selected for measurement in RWSSP.

Method of data collection: data will be collected in every community within each scheme, by a village volunteer identified by the community. Disease data will be collected weekly from each household. Forms have been developed for this purpose (RWSSP CR 01, RWSSP CR 01)and NSAs will train the volunteers in data collection protocols.

Timing of data collection: data will be collected continuously throughout implementation of the scheme by the NSA, and data from the first three months (baseline data), and last three months (end-of-project data) will be used to measure the Project's impact on health. The measure of interest will be the percent reduction in number of new cases over the project period.

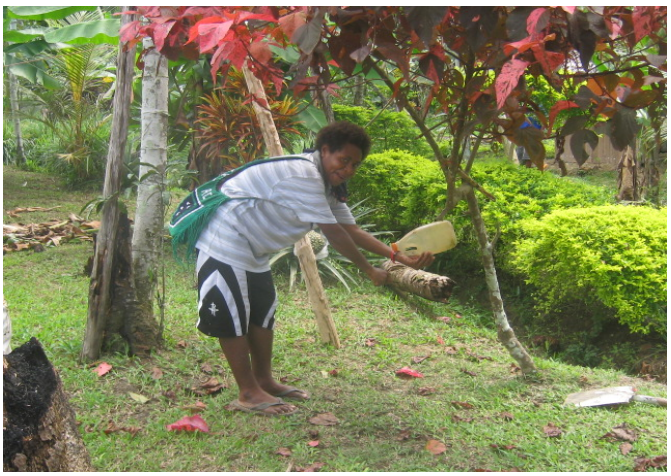
Rationale for project specific data collection systems

A project needs to know whether or not its interventions have worked i.e. achieved the project goal. It must monitor that quality outputs have been delivered and intermediate outcomes (behavioural change) have occurred in order to have some confidence that health of beneficiaries has improved.

National data systems do not collect behavioural data in relation to water supply and sanitation. In relation to measuring improved community health (incidence of diarrhoea, scabies/skin sores) national data systems only report on diarrhoeal mortality, and Inpatient and Outpatient presentations (morbidity). The lowest level to which these data are broken down is the District level. Village identified data are not available in government/health facility data collection systems past the Aid Post level. The national database does not report on scabies/skin disease. Therefore the national system cannot be used to measure the effectiveness of RWSSP as it cannot identify morbidity by project beneficiary communities. The project must therefore establish its own simple system for measuring impact. The project is using an approach to data collection that sits well with already established community systems. Both levels of data collection (outcome, impact) will provide useful models that could be used by provincial/district government to measure achievement of subsequent RWSS programs. NSAs will collate data into summary graphs at both the outcome and impact level to present back to communities, completing the feedback loop that is so important in the monitoring cycle.

Concluding Comments

It is critical that RWSSP establishes simple but robust systems for measuring the health impact of the project. The reliability and validity of findings will depend very largely on every NSA understanding and adhering to the data collection protocols, and doing its part to ensure that every community participates fully in the data collection process. NSAs will need to ensure that data are reported back to communities (the feedback loop). This in itself is often a strong motivating factor to change behaviours so that health does improve. The NSAs can assist communities to develop graphic presentations for this purpose.



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