Community-Led Total Sanitation in Rakhine State

Lessons Learned 2015 - 2016

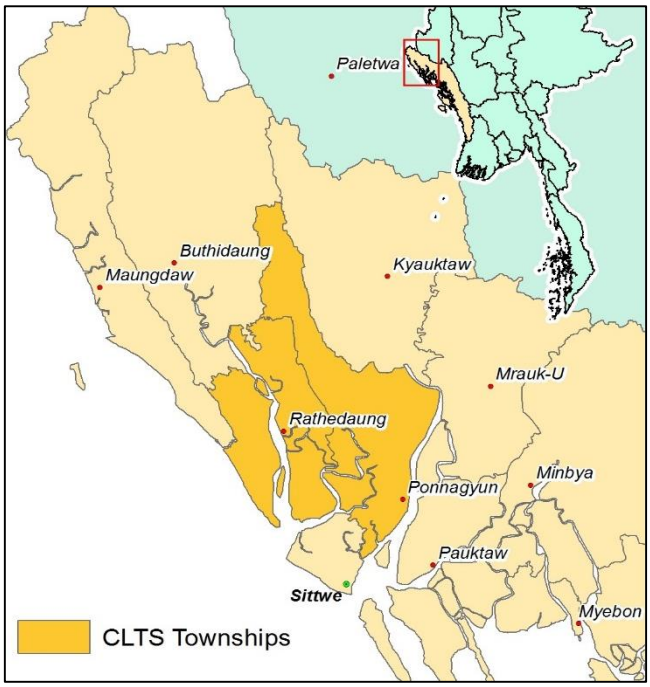
Introduction

From 2015-2016, the International Rescue Committee (IRC) conducted two rounds of UNICEF-supported community-led total sanitation (CLTS) programming with rural communities in Ponnagyun and Rathedaung Townships, Rakhine State.[1] After adapting to significant challenges during the implementation of the project, IRC's team decided to review what they had learned. This paper documents the results of that review process, explaining what we did, what we learned, and what we would recommend for future uses of CLTS approaches in the Rakhine context.

The review included a comprehensive debriefing workshop with the team, as well as field research in three of our project villages – one that had achieved open-defecation free (ODF) status, one that was halfway there, and one that had made little progress. In each village, we ran a group discussion with male and female members of the village WASH committee—around 15 people in each group—and spoke individually to two men and two women at their homes about their attitudes and behaviours concerning latrine usage.

Background

Globally, unsafe sanitation is a major contributing factor to higher rates of infant malnutrition and infant mortality.[2] While rural sanitation coverage in Myanmar as a whole is relatively high compared to some of its neighbours,[3] this is not the case in Rakhine, where 71% of all rural households lack any kind of sanitation facilities. These figures are even more extreme in Rathedaung and Ponnagyun townships, with no sanitation in 83% of all households.[4] Although diarrhea prevalence in Rakhine is only slightly higher than the national average at 7.6%, recent research in Rathedaung indicates rates as high as 16%. Rakhine also fares poorly in indicators associated with malnutrition, with the highest national incidence of underweight



Map of IRC / UNICEF CLTS intervention areas

children (37.4%) and wasting (10.8%); Rathedaung township was reported to have an "alert level" of 10.6% Global Acute Malnutrition score in 2014.[5]

Rakhine's high levels of open defecation are likely due to a combination of factors. The state is one of the country's poorest areas, meaning households have minimal spare resources to devote to latrine construction. In addition, much of its populated area is made up of low-lying paddy land divided by a maze of creeks and channels. This provides many opportunities for "consequence-free" open defecation directly into bodies of water. It also means that any latrines that people do build are vulnerable to frequent flooding, if they are not washed away entirely during one of the area's regular cyclones.[6] In many areas, a combination of a high water table and rocky soil also make latrine construction challenging without specialized equipment. Given low rates of latrine use, markets for relevant construction materials are underdeveloped, and are generally limited to township centres.

[1] For more details on the approach, see Kamal Kar with Robert Chambers, "Handbook on Community-Led Total Sanitation" (Plan/Institute for Development Studies: London/Brighton, 2008).
[2] Annette Prüss-Üstün et al., "Safer Water, Better Health: Costs, benefits and sustainability of interventions to protect and promote health" (World Health Organisation: Geneva, 2008).
[3] "Second Review of Community-Led Total Sanitation in the East Asia and Pacific Region" (UNICEF: Bangkok, 2015).
[4] The 2014 Myanmar Population and Housing Census; datasets available from the Myanmar Information Management Unit: http://www.themimu.info/census-data (accessed 15 August, 2016).
[5] Rakhine data: "Myanmar Multiple Indicator Cluster Survey 2009-10" (UNICEF/Ministry of National Planning and Economic Development/Ministry of Health: Yangon, 2011). Rathedaung data: "Integrated Nutrition Survey of 6 to 59 Month Children: Rathedaung Township" (Action Contre la Faim: Yangon, 2014).
[6] "Multi-Hazard Risk Assessment in Rakhine State of Myanmar" (United Nations Development Programme: Yangon, 2012).

What is CLTS?

Community-Led Total Sanitation (CLTS) focuses on persuading communities to change their sanitation behaviour. In this approach, facilitators use a participatory workshop to encourage the community to think about and analyse their sanitation situation. Through this method, communities themselves realise the dangers of open defecation, and then decide together how they will create a clean and hygienic environment that benefits everyone. The CLTS process is community-led and community-owned – no latrines, money or material from outside is provided. Social solidarity, help and cooperation among the households in the community are a common and vital element in CLTS.

Adapted from Kamal Kar with Robert Chambers, "Handbook on Community-Led Total Sanitation"

In terms of barriers to behavior change, open defecation is so common that it has come to be seen as part of local "culture."[7] At the same time, negative perceptions of latrines are deep-rooted: people often see them as uncomfortable and unsanitary, and think they should be sited well away from people's living areas (a view rooted in part in people's experiences of badly-built and poorly-maintained latrines at the majority of schools in rural areas). In addition, widespread awareness of the presence of humanitarian aid activities in Rakhine—likely driven by broadening use of the internet and social media—means that many people now expect programmes run by NGOs to take the form of direct subsidies or in-kind distributions.

All of this makes Rakhine an especially challenging environment for implementing standard CLTS approaches. At the same time, its poor state of sanitation coverage and high rates of malnutrition highlight the urgent need for innovative approaches to fixing the problem.

What we did

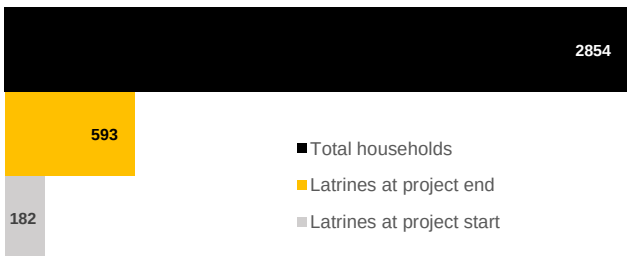
IRC implemented two rounds of CLTS programming in its target townships. The first round lasted eight months from December 2014 to August 2015, targeting 11 communities with a total population of 2,079 households. The second round ran for the same duration, from December 2015 to August 2016 targeting 9 communities with a total population of 775 households. In both rounds, IRC teams conducted triggering sessions using the following set of tools:

- Transect walks and participatory mapping of open defecation sites in the village
- Shit calculations: calculating the amount of shit a village produces
- Medical expenses calculations: calculating the amount people in the village spend to treat diarrhea.
- Fecal transfer demonstrations: where participants are shown how shit can be transferred—via flies or animals—to food

Sessions were split into two groups. Adults and children were triggered separately, and children's groups were then brought in to reinforce triggering among adults. Villages then developed an action plan for achieving open defecation, and IRC staff provided support and technical advice on latrine construction during subsequent follow-up monitoring visits.

Overall, two first-round villages and one second-round village achieved ODF status, verified by IRC in collaboration with the Ministry of Health. This translates to a project success rate[8] of 15%, slightly higher than the 12% average success rate of CLTS projects in Myanmar more generally but still low compared to CLTS projects in many other countries.[9] In both rounds, latrine coverage expanded from an average of around 6-7% at project start to around 20% at project end, and a total of 411 households built latrines during the project lifetime. In round 1, around half of all villages demonstrated any evidence of successful triggering (more than 10% increase in latrine coverage), while around three-quarters did in round 2 sites. In round 1 villages, latrine coverage also continued to expand beyond the end of the project in one-third of all villages.

Household latrine coverage at project start / end



[7] "Knowledge, Attitudes and Practice Study into Water, Sanitation and Hygiene in 24 Townships of Myanmar" (UNICEF/Ministry of Health: Yangon, 2011).
[8] "Proportion of triggered villages that are then declared ODF
[9] "Second Review of Community-Led Total Sanitation in the East Asia and Pacific Region."

What we learned

Site selection: In general, the project found that triggering was more challenging in villages with more than 150 households. In larger villages, a smaller proportion of community members are likely to attend triggering workshops, meaning behavior change is less likely to take hold. However, this is not the only contributing factor to success – one of the project's largest villages also saw some of the largest gains in latrine coverage. Other criteria the team identified as important for the success of triggering include the presence of more active and younger village leaders, and the existence of active community organisations.

Timing: The implementation period for both rounds of the project was only 8 months. This created significant challenges in making sure triggering was effective, and reduced opportunities for adapting methodology or trying out new ideas. Teams found themselves under pressure to achieve the required number of triggering and follow-up monitoring visits within the project timeline. As a consequence, they only spent a small amount of time providing critical training on latrine construction techniques, and had few opportunities to arrange exchange visits or other activities to promote and strengthen behavior change. In addition, triggering in round 2 took place too close to rainy season. This meant that villagers who intended to build latrines were in many cases forced to put these plans on hold by the arrival of the monsoon. As a consequence, the triggering process as a whole suffered a major loss of momentum.

Triggering process: According to both team members and villages, the most effective tools in the triggering process were the participatory mapping exercise—which helped people understand the reality of open defecation in their villages—and the fecal transfer demonstration, which was most often the triggering moment. In round 2, the IRC team were able to improve quality control and reflection when delivering triggering sessions by using a more structured set of monitoring tools.

Latrine construction: Community members at all field sites universally felt that offset concrete pit latrines were the most appropriate for their surroundings. This is because bamboo pits or other types of basic latrine were vulnerable to flooding, destruction by cyclone, or undermining by rodent infestation. Villagers and team members also pointed out the risk of building poor-quality starter latrines in Rakhine (usually the quickest first step in moving up the "sanitation ladder" toward better sanitation hardware in other contexts).[10] In Rakhine's harsh environment, such facilities rapidly deteriorate and become unsanitary. This can undo the hard work of the triggering process by confirming peoples' previously-held skepticism about the value of latrines, and lead to a fast return to open defecation. In communities where household compounds are small, there may also not be enough space to build a new, improved latrine as well as the starter unit.

Household offset concrete pit latrine built by community members in Rathedaung CLTS site

Testimony from villagers also shows the importance of skills transfer in Rakhine, where in many villages the presence of household latrines of any type is almost unknown. Users and non-users of latrines both said that the perceived cost and difficulty of building their desired type of latrine was the main barrier to latrine construction after triggering. In villages where households adopted concrete pit latrines, discussion of construction techniques with IRC teams, and especially through exchange visits with other villages was seen as critical. This helped people understand how to procure materials locally, how to build simple designs previously seen as too complicated, or to provide a realistic breakdown of the costs involved.

[10] "Handbook on Community Led Total Sanitation."
[11] For evidence on household income data in Rakhine, see for example "Tat Lan Sustainable Food Security and Livelihoods Program: Baseline Assessment Final Report" (CARE International: Yangon, 2014).

Overall, villagers reported that the costs of building their preferred type of latrine were between 50,000 and 100,000 MMK depending on the details of the design—this represents a substantial investment, exceeding the average monthly income for the majority of households in the area.[11] As a consequence, the pace of latrine construction was slow in many villages – several people we interviewed reported that they were planning to build latrines but were still saving up the resources to do so.

Most significant changes: Despite the relatively slow speed of latrine construction in target areas, both team members and villagers felt that increased understanding of the link between open defecation and illness was the most important and sustainable result of the project. In particular, villagers said they had become more aware of the hygiene of their surroundings after triggering. Even in non-ODF villages, people explained how they now noticed shit in ponds or rivers, or lying around in their compounds. They compared this situation to before triggering, when they had not seen this as a problem. In an environment where open defecation is so deeply ingrained, this change in attitudes is an important first step.

In common with other CLTS experiences across the world, people in areas with a lot of latrine construction also reported an increased sense of collective spirit – such as more motivation to work on community projects, or more active participation in village affairs. This was a result of working together to share knowledge and gather resources for latrine construction.

Finally, households who had built latrines spoke about the benefits they had brought for women and older people, who no longer had to face discomfort or safety risks when going to defecate outside their compounds.

Recommendations

Based on the experiences of our team and the testimony of project participants, we recommend the following steps for making sure CLTS approaches help make a difference in Rakhine state:

- **Integrate CLTS triggering approaches into existing WASH or nutrition programming:** Given the extent of open defecation practices in Rakhine, simply building or subsidizing latrines is unlikely to result in substantial changes in people's behavior. [12] Results from this project suggest that CLTS triggering workshops have powerful potential as a behavior change communication tool, and could be usefully incorporated into existing development projects in the state.
- **Start triggering at the right time:** To allow communities enough time to implement their action plans to become open defecation free, triggering sessions should be timed to begin immediately after rainy season and after the rice harvest. This gives communities a period of 5-6 months before the rainy season when they can gather resources and build latrines without being interrupted by bad weather. This way, they can keep the momentum going.
- **More sustained community engagement after triggering:** Future CLTS approaches in Rakhine should place a much greater emphasis on supporting communities achieve their sanitation goals after triggering, especially in the following areas:

  Skills transfer: helping communities develop the skill they need to build the right latrines is critical given people's lack of previous experiences with safe sanitation.

  Exchange visits and knowledge sharing: experience from this project suggest people's skepticism about building latrines can best be overcome through interaction with early adopters of safe sanitation. As locals, these people can be the most effective at convincing their neighbours about the affordability, practicality and comfort of adopting new and unfamiliar hygiene practices. In particular, projects could identify more motivated villages during a first round of triggering, and work with them as "seeds" to help improve the speed of change in nearby communities.
- **Longer and more flexible CLTS programmes:** In order to make sure teams have enough time to engage more fully with communities, experiment with new approaches, and deal with obstacles such as unpredictable weather, future attempts at CLTS programming in Rakhine should consider working in timeframes of around 18 months. This would allow for two rounds of triggering, with the second building on the lessons of the first.

[11] For evidence on household income data in Rakhine, see for example "Tat Lan Sustainable Food Security and Livelihoods Program: Baseline Assessment Final Report" (CARE International: Yangon, 2014).
[12] For evidence of poor latrine uptake in full subsidy programmes in Rakhine, see for example "Tat Lan Sustainable Food Security and Livelihoods Program: 2015 Outcome Monitoring and Programme Quality Assessment"(CARE International: Yangon, 2014).

Low-lying village in Ponnagyun township

- **Marketing and subsidies:** Given the levels of poverty in Rakhine and the risks of encouraging people to build poor-quality "starter" latrines, WASH actors should consider how to support people in building the right latrine for their environment:

  Partial subsidies of key materials: Especially while markets for latrine materials are weak and transport networks are to township centres are poor, actors should consider subsidizing hard-to-reach materials such as cement or concrete moulds, while encouraging communities to provide locally-available materials themselves.

  Targeted subsidies to poorer households: Given the high rates of poverty in Rakhine, actors could also consider incorporating community-based targeting of subsidies for the poorest households as part of community action planning during and after the triggering process.

  Identify means of financing latrine supplies: Especially in longer projects, actors should consider how to make the significant costs of latrine construction more manageable for villagers. On the demand side, this could begin with integrating seasonal calendars and expenditure mapping tools into CLTS triggering processes to facilitate better action planning. This could then extend to integrating CLTS approaches with financial management programmes such as village savings and loan associations. On the supply side, this could include working with latrine component suppliers at township level to provide low-interest credit to CLTS villages, or facilitating bulk procurement and transport of latrine materials by multiple villages.

- **Further research:** Any scale-up of CLTS in Rakhine – including incorporation into more integrated WASH, nutrition or livelihoods programming – should include more rigorous research on which combinations of approaches lead to the most sustainable outcomes for latrine usage, diarrhea incidence, and malnutrition rates.

Overall, IRC's experiences in Rakhine suggest that CLTS is a promising first step in changing people's attitudes to open defecation. However, to bring about lasting behavior change, it must be combined with careful efforts to help communities overcome the steep challenges they face in building affordable, sustainable sanitation in their areas.

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75 YEARS FROM HARM TO HOME