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Do we really want to know? The journey to implement empirical research recommendations in the ICRC's responses in Myanmar and Lebanon

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Efforts to reduce the gap between the research evidence base and humanitarian responses have focused on producing quality evidence and ensuring its use in decision-making. Yet, how evidence translates into field-level implementation is not well understood in humanitarian contexts. This study analysed how recommendations produced through academic research partnerships were implemented by the International Committee of the Red Cross (ICRC) in Lebanon and Myanmar. The methodology included: social network analysis to represent collective dynamics; document reviews to assess implementation; qualitative interviews to comprehend why actors engaged; and a critical appraisal of these combined results. The application of Extended Normalization Process Theory provided information on 'anticipation of constraints' (access to information, staff turnover, context specificity, and the need to engage as a cohesive group). Future research efforts should concentrate explicitly on identifying and tackling implementation barriers such as power imbalances and ethical dilemmas related to service delivery by humanitarian actors.

Keywords: conflict setting, evidence-based, humanitarian, implementation, partnership, research uptake

Background

The extent to which research evidence is transformed into field-level action is an important matter within humanitarian settings. Academic researchers, humanitarian actors, and the people benefiting from an improved humanitarian response are all concerned with ensuring that empirical evidence is implemented appropriately.

Most disasters, such as humanitarian crises and conflicts, have become enmeshed in migration, climate change, and structural violence in an increasingly globalised and polarised world (Leaning and Guha-Sapir, 2013; Spiegel, 2017). While the contexts in which humanitarian agencies work are increasingly complex, the need to ensure that field responses are evidence-based is widely recognised by humanitarian actors, academics, and donor agencies (Zachariah and Draquez, 2012; DFID, 2014; Blanchet et al., 2017b; Kohrt et al., 2019).

As a result, two approaches have emerged in the literature. The first considers the production of research itself, by improving the quality and increasing the quantity of the

evidence yielded. Calls for stronger evidence involve more robust methodologies through counterfactual analysis (Ager et al., 2014; Kohrt et al., 2019) and qualitative approaches to compensate for the difficulty in determining causality in humanitarian settings (Frerks and Hilhorst, 2002; Hofmann et al., 2004; Dijkzeul, Hilhorst, and Walker, 2013). The improvements needed also entail better coverage of public health issues and geographic areas, as well as enhanced ethical processes (Ford et al., 2009; Tol et al., 2020). Such initiatives were developed by academics to create resource centres (Allen and Clarke, 2014; Blanchet et al., 2017b; Checchi et al., 2017) and by humanitarian actors such as Médecins Sans Frontières to develop pools of experts in the field (Kumar et al., 2016; Tripathy et al., 2018). However, efforts focusing on producing more evidence and of better quality have been limited by the fact that research alone is unlikely to be sufficient to modify the field response by itself (Darcy et al., 2013), combined with recognition that is difficult to discern what field responders value as evidence, what they use for decision-making, and what they are able to translate into action (Knox and Darcy, 2014).

Given these acknowledged limitations, the second approach emerges from the need to understand how decision-makers and field actors use evidence for policymaking, advocacy, and practice (Dijkzeul, Hilhorst, and Walker, 2013; Tripathy et al., 2018). This effort necessitates understanding whether the evidence generated had meaning for the end users—in a response context that required rapid adaptations and strategic choices (Mayne et al., 2018). This approach entails donor agencies and academics producing guidelines with synthetised evidence available in the field (DFID, 2016; Blanchet and Duclos, 2018), and academic researchers and humanitarian practitioners tailoring research findings to the specific decision-making needs of the latter (Harries et al., 2018; Mayne et al., 2018). In addition, researchers from the academic and humanitarian spheres have recognised that it is essential to understand what it takes to bring about change at systemic levels and who has the power to do so (Bradt, 2009; Bowsher et al., 2019; Khalid et al., 2020).

Combined, all of these efforts have contributed to a greater quantity and better quality of evidence produced and have increased the likelihood that this evidence informs decision-making by humanitarian actors. However, whether they result in changing field responses over time remains relatively unexplored to date (Bennett et al., 2017; Généreux, Lafontaine, and Eykelbosh, 2019). How can the persisting gap between the evidence base and the humanitarian response be understood? Should the initiatives leading to the production of a stronger evidence base, the use of this for decision-making, and the consequent response be viewed as separate efforts? If not, what might the intersections between and among these efforts implicate?

In this paper, 'evidence' is used interchangeably with the terms 'research recommendations', and 'integration or uptake of evidence' is used alternatively with 'implementation'. Lastly, 'context' relates to the specific social, economic, political, or historical dimensions of the response in humanitarian settings. When conducting research, contextual features can be seen as being too specific and leading to an apparent lack of generalisability. However, if one considers the production, use, and implementation of evidence as a connected set of processes, the specificities of a humanitarian context become crucial to

anticipating how evidence might be implemented (Dijkzeul, Hilhorst, and Walker, 2013; May, Johnson, and Finch, 2016). While humanitarian settings are distinct, they share common features such as disrupted social, political, and security circumstances, which create a tense and often unpredictable environment for conducting research. Further contextual specificities relevant to the research process in humanitarian settings include established power differentials, the notion of politicised knowledge, and the fact that the research process itself is not likely to be or be perceived as neutral (Sibai et al., 2019). Data collection, analysis, and the dissemination of research findings are potentially invasive processes exacerbating the power differentials related to unequal distribution of knowledge in such environments (Bowsher et al., 2019). Furthermore, the difficulties of managing a humanitarian operational response often mean that decisions need to be modified frequently based on rapid contextual changes (such as volatility in security or population movements) and that programmes and resources may need to be managed in short cycles (Mayne et al., 2018). These disruptive features need to be considered. To date, the literature engaging with humanitarian actors along these lines has found that power differentials, trusting relationships, collaborative aims, and the complexity of motivations must be addressed (Mackenzie, Mcdowell, and Pittaway, 2007; van der Haar et al., 2013). Such initiatives involve a dynamic analysis of the social process of conducting, using, and implementing evidence in what can take the shape of partnerships (Beran et al., 2016; Kohrt et al., 2019).

Based on these considerations, this paper explores how research findings for public health were implemented collectively by actors within one of the oldest humanitarian organisations, the International Committee of the Red Cross (ICRC) (Palmieri, 2012), in Myanmar and Lebanon. Recognising the need for evidence to guide the field response, the ICRC sometimes partners with academics to obtain more comprehensive evaluations and to promote institutional learning (ICRC, 2019). To date, no study has appraised how findings resulting from such partnerships are implemented by field teams.

This paper analyses the implementation process associated with two research partnerships conducted within the ICRC's health department. The first partnership, with the London School of Hygiene and Tropical Medicine (LSHTM) in 2016, aimed to assess the impact of physical rehabilitation programmes on people's economic status and quality of life in Myanmar. At the time of the study, Myanmar had recently elected a civilian government while its population remained burdened with poverty, landmine casualties, and unintentional injuries (Mactaggart et al., 2019). The research was led by the academic partners while the ICRC increased its support for national physical rehabilitation services.

The second partnership, with the François-Xavier Bagnoud Center for Health and Human Rights at Harvard University in 2016, investigated access to primary healthcare by conflict-affected Lebanese and Syrian women. At the time of the study, Lebanon was hosting the highest per capita ratio of refugees worldwide within its fragmented health system (Blanchet, Fouad, and Pherali, 2016; Hamadeh et al., 2021). The research partnership was conducted jointly by the academic partner, national authorities, and the ICRC, following three years of stable programme implementation (Leresche et al., 2020).

Both research partnerships resulted in internal reports and peer-reviewed publications (Blanchet et al., 2017a; Mactaggart et al., 2019; Truppa et al., 2019).

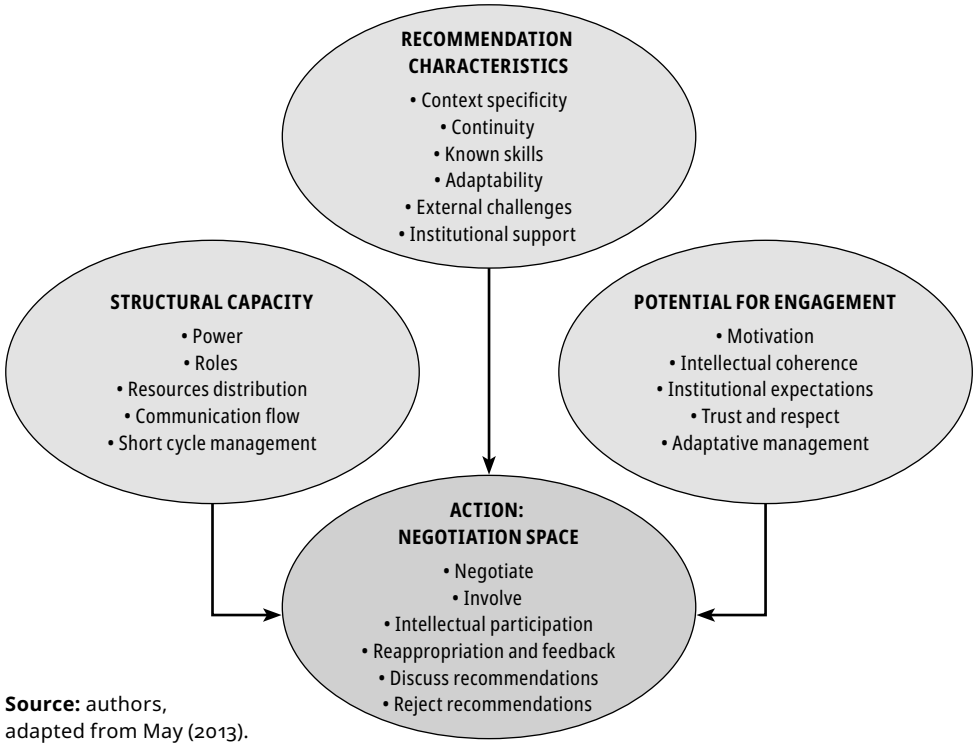
This paper aims to identify the mechanisms that influenced research implementation by ICRC actors collectively in the field. It examines first the implementation mechanisms and results of these two research partnerships by independent academics, and then presents a critical discussion of the results with collective input from the academics and ICRC actors who were involved either in the primary research partnerships or in this comparative study.

Methods

Conceptual framework based on implementation theory

To understand what factors induce field actors to implement research recommendations in humanitarian responses, it was necessary to determine simultaneously who was involved at different levels, in what range of organisational roles, and within what existing collective engagements. In this situation, Extended Normalization Process Theory provided a strong basis to capture and connect the different aspects of what might influence the implementation of evidence in the context of a humanitarian organisation and

Figure 1. Adapted implementation model to integrate evidence into humanitarian responses



Source: authors, adapted from May (2013).

setting (May, 2013; May, Johnson, and Finch, 2016). The power of this analytic frame allowed for simultaneous consideration of two sets of limitations: (i) those imposed by the organisational and humanitarian setting (the context); and (ii) those related to the research recommendations themselves (the object).

Within the framework of Extended Normalization Process Theory and in this paper, 'structural capacity' is understood as the institutional roles, the power attached to each role, access to specific resources, and the effect of human resources turnover within the ICRC. The limitations imposed by the 'recommendations' themselves are assessed in terms of contextual feasibility, cultural appropriateness, and continuity. The 'potential for engagement' that actors have is understood here as their intrinsic motivation, their sense of coherence while integrating research findings, and the trust they expressed in proposing a change. The 'action' itself is the space in which research recommendations might be discussed and the implementation process negotiated.

Given these factors, an implementation model adapted for humanitarian settings is presented in Figure 1. Based on this model, different investigative tools were combined to collect and analyse data. Each is described below.

Social network analysis

Social network analysis allows for the examination of the interactions between actors in a holistic and dynamic way, which has proved crucial to understanding the structural capacity for collective action (Hanneman and Riddle, 2005). First, the criteria for including actors in either research network were defined. ICRC actors employed between 2016 and 2019 were included (anonymised and given numbers) if they had initiated the research or disseminated the results or had institutional responsibilities for the recommendations made (based on documented organisational roles). Second, data on actors' features were collected from existing documents to define a range of 'attributes', such as their 'role' or 'geographic location'—coded as binary or categorical variables. Third, the nature of the relationship between actors in the network was defined. Planning ties were used because such organisational interactions allowed for the capture of the formal spaces that actors could use to integrate research recommendations. Planning ties were coded for presence ('1') or absence ('0') of a tie for each full network if actors attended organisational planning meetings jointly, or when they had a direct hierarchical relationship and overlapped for one month. Once the network boundaries, actors' attributes, and the nature of the tie were defined, a graphic representation of all actors involved and their ties was created using the Netdraw tool in the UCINET software package (Borgatti, Everett, and Freeman, 2002). Actors' attributes were displayed on the graphs depending on the questions to be answered in the analysis.

Document review

Decision-making power is distributed from the ICRC's headquarters to the field through a complex web of operational managers and technical (such as health) actors. To be implemented, research results must be processed collectively from problem analysis to agreement

Table 1. Roles and attributes of actors interviewed

Gender	Role	Location	Commissioning the research	Recipients of recommendations	Role to implement	Planning
Female: 7	Management: 6	Headquarters: 5	Commissioning: 4	Recipients of recommendations: 7	Do not implement: 2	Not tied in for planning: 1
Male: 8	Health: 9	Delegation: 4	Not commissioning: 11	Not recipients of recommendations: 8	Implement: 13	Tied in for planning: 14
		Sub-delegation: 6				

Source: authors.

on objectives, monitoring indicators, and specific budget lines. A retrospective thematic analysis of existing planning and monitoring documents was used to examine what happened to the research recommendations as they began to flow through the ICRC's institutional planning framework. To compare how recommendations appeared for each partnership, three key components were compared. First, the characteristics of the recommendations were assessed in terms of the skills needed, operational continuity, and institutional support. These characteristics were extracted from planning documents and institutional policies and were discussed in interviews. Second, to understand who was aware of the research findings in each partnership, a retrospective mapping of the diffusion process was documented, including the roles of each actor, the date, the type of communication, and the sender. Third, to compare the implementation status in each setting and over time, four yearly planning and monitoring cycles were analysed thematically. One table per partnership (Myanmar and Lebanon) was built to cross-tabulate each recommendation with four years of planning. Quarterly and annual health reports allowed us to appraise whether recommendations guided what was monitored. This time frame accounted for the time expected to compare the results and observe a change in implementation after the study was conducted (2016–19).

Qualitative research

Semi-structured qualitative interviews were conducted between June and October 2019 to understand the constraints that actors felt they faced, their perceptions of individual or collective initiatives, and their trust in proposing a change. An interview guide was piloted with three ICRC field respondents who were familiar with one of the partnerships. As a result of the testing, a summary of the key research recommendations was shared in the middle of the interview for subsequent interviews. Sharing recommendations ensured that all participants could refer to them specifically, as some interviewees did not recall them or were not aware of them. In total, nine actors were purposefully selected from each research network, representing a comprehensive range of geographic positions and of roles. Three of these actors (from both networks) did not respond to three follow-up invitations to participate. The reason for non-response was not explored further. Eight actors were

interviewed in Lebanon and seven in Myanmar (15 in total). Signed informed consent was obtained from all participants prior to starting the interview. An initial deductive thematic analysis was conducted based on the theoretical framework, which was then compared with the results of an unfettered and inductive exploratory analysis. The comparison between both approaches permitted the identification of additional themes, such as missed opportunities for understanding buy-in or (in)action. A comparative thematic analysis was not performed between both partnerships, to ensure anonymity, as the number of actors included was small.

Ethics

Ethical approval was received from the Ethics Committee of the LSHTM, by the ICRC's Health Unit, and by each field delegation. Both primary research partnerships, which were used to build the comparison for the case study, had previously undergone an academic Internal Review Board process, which received further approval from national authorities (Mactaggart et al., 2019; Truppa et al., 2019).

Results

In this section we assess: the constraints on research implementation imposed by the organisational context; the challenges related to the characteristics of the research recommendations; what allowed actors to engage collectively in the process; and how key challenges to research uptake were negotiated in each partnership.

Organisational constraints to be negotiated in each network

First, the origins of the research varied. For Myanmar, the research questions were rooted in a programme evaluation (conducted by the LSHTM). For Lebanon, the questions related to global initiatives (Zeid et al., 2015) and to the low antenatal care attendance rates captured by field monitoring (Truppa et al., 2019). Second, control over financial resources diverged. The amount attributed to Myanmar was higher (20 per cent of the programme's direct costs) and managed by ICRC headquarters. For Lebanon, the financial envelope (10 per cent of the programme's direct costs) was managed by the field health team. This field proximity to the budget allowed the team in Lebanon to adapt to changes imposed by the shifting humanitarian context, which was difficult for Myanmar. Third, the structural characteristics of each network differed. Both networks presented a central group of influential actors positioned in the field. The central actors highly connected in the field are referred to as the 'central group of actors', whereas actors less connected around them are referred to as 'the periphery'. We observed that the level of separation between headquarters and the field (see Figure 2), the continuity of the number of actors from the field initiating the research initiative (see Figure 3), and the proportion and type of actors who were aware of the research findings (see Figure 4) differed between the two partnerships.

Figure 2. Actors' geographic positions (2017–19) in the field, at headquarters, or between both locations

Key: ■ Headquarters ▨ Field □ Switching between both

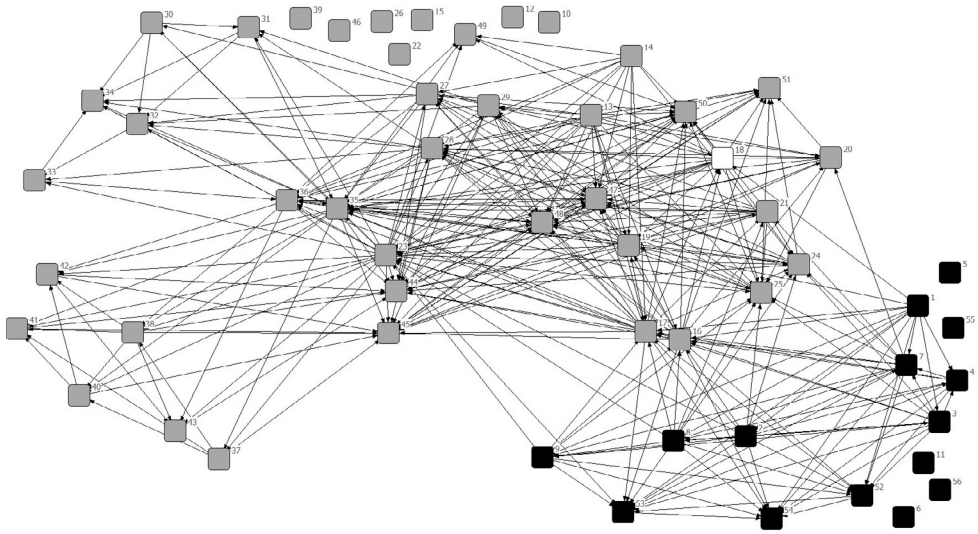


Figure 2a. Myanmar research network 2017–19: 322 planning ties and 56 actors. Attributes by 'geographic area'. One actor switches positions between the field and headquarters.

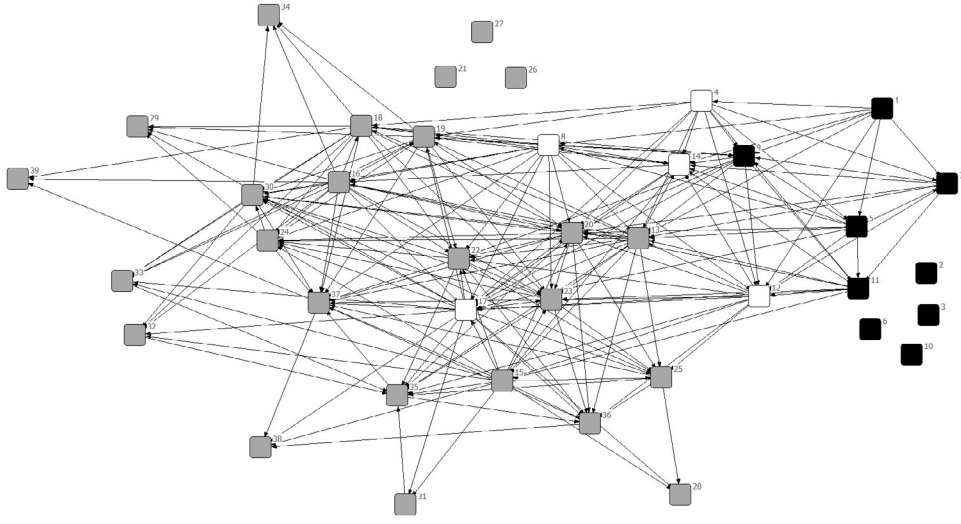


Figure 2b. Lebanon research network 2017–19: 201 planning ties and 39 actors. Attributes by 'geographic area'. Five actors switch position between the field and the headquarters.

Source: authors.

Figure 2 shows that the main difference pertains to the level of separation between actors from the headquarters and actors in the field in each network. For Myanmar, the headquarters and the field are two separate sub-groups with one actor who switches position. For Lebanon, five actors switch positions in a structure that is much more fluid.

Figure 3. The number of actors commissioning the research and remaining tied in for planning, 2017–19

Key: ■ Actors commissioning ▢ Actors *not* commissioning

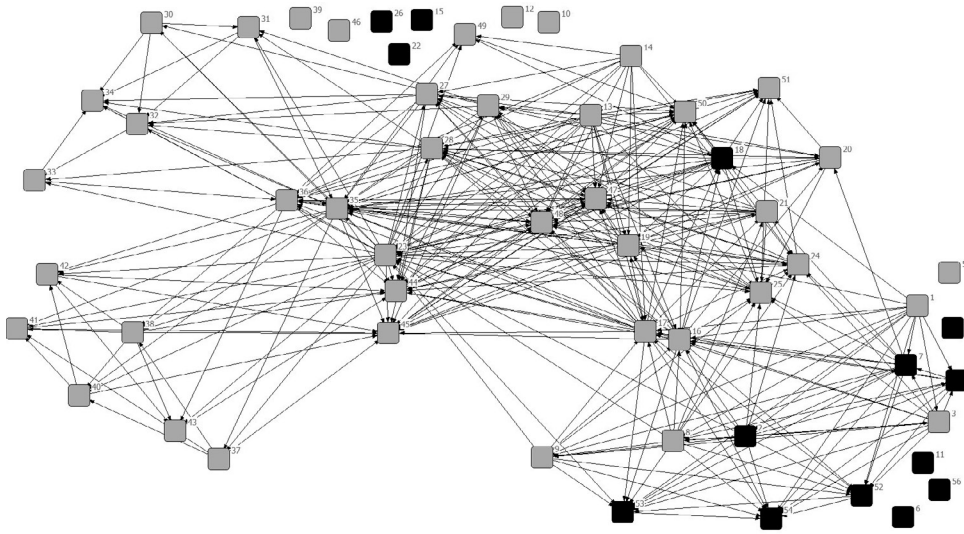


Figure 3a. Myanmar research network 2017–19. Attributes by 'commissioning'. Nodes of equal size. Planning ties.

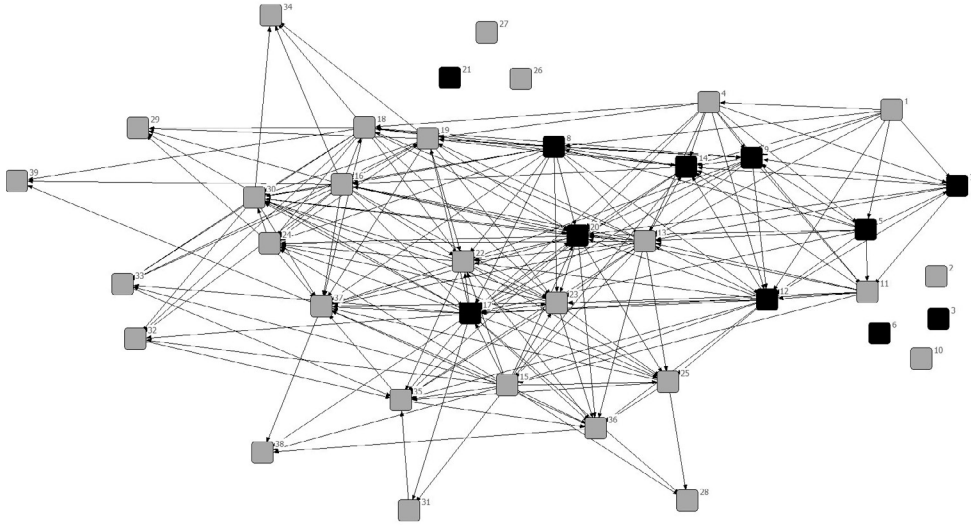


Figure 3b. Lebanon research network 2017–19. Attributes by 'commissioning'. Node of equal size. Planning ties.

Source: authors.

In terms of turnover, Figure 3 shows that Myanmar had more actors who initiated the partnership (commissioning) and were left out of planning (7 of 14), as compared with Lebanon where most actors involved in commissioning remained for subsequent planning (8 of 11). In both cases, actors on the periphery were absent from the commissioning process.

Figure 4. The number and type of actors who were aware (recipients) of the research findings between 2017 and 2019

Key: ■ Health recipient ● Management recipient ▲ Other recipient
□ Health *not* recipient ○ Management *not* recipient △ Other *not* recipient

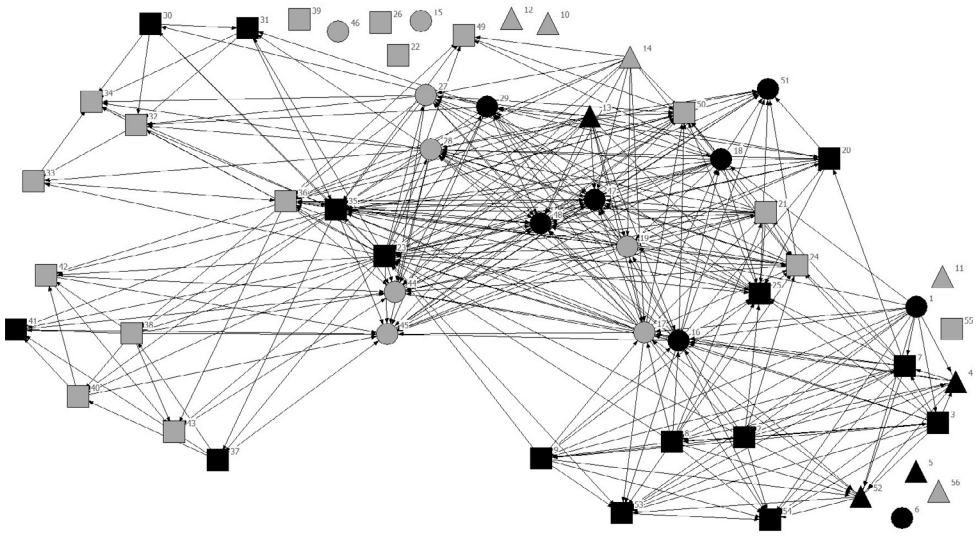


Figure 4a. Myanmar research network 2017–19. Attributes by 'recipient' and by 'role'. Nodes of equal size. Planning ties.

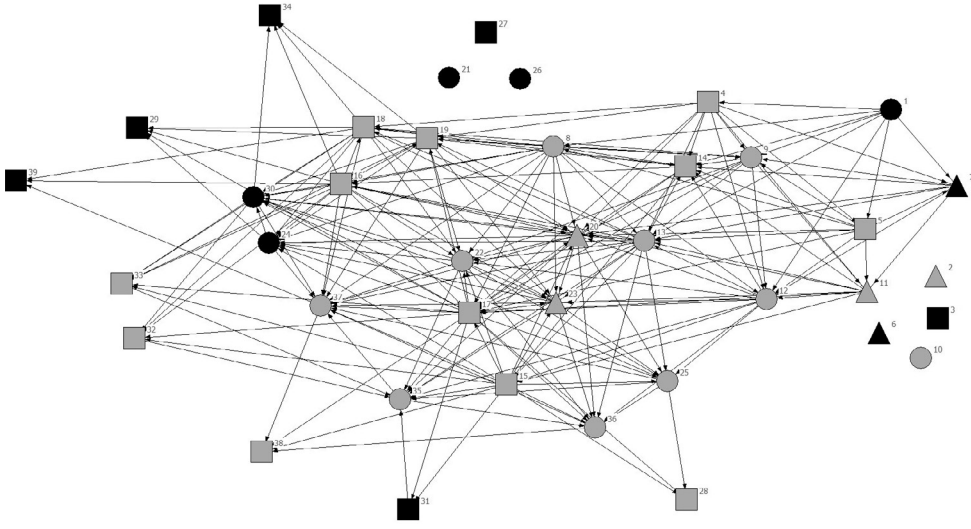


Figure 4b. Lebanon research network 2017–19. Attributes by 'recipient' and by 'role'. Planning ties.

Source: authors.

In Figure 4, 'recipient' denotes those actors who were aware of the research recommendations following dissemination. The research results reached actors differently in terms of the proportion who were aware of the findings, and in relation to the roles missed by the dissemination process. Figure 4 shows that 52 per cent of the actors are recipients

in the case of Myanmar, as compared with 66 per cent for Lebanon. In addition, for Lebanon, almost all of the central influential actors were recipients, which is not the case for Myanmar where central managerial (6) and health central (4) actors were missed. This difference led to fewer influential actors with an understanding of the rationale of the research for Myanmar. In contrast, a higher number of headquarters actors were missed by the dissemination process for Lebanon.

Some structural constraints, however, were similar in both partnerships. Technical health actors at the periphery were less aware of the research recommendations. Another similarity was the structure of the planning tool that could create a sense of competition between or within departments, which traditionally incentivises planning in silos. A third common constraint was a budget subject to yearly approval, which created uncertainties about the financial capacity to implement longer-term objectives.

Overall, these findings suggest that Myanmar might face specific challenges in retaining institutional memory within the central group of actors, since one-half of the actors initiating the partnership had either left before the next planning started or were not connected through planning at all. In Lebanon, headquarters and field actors were more connected in planning, in part because five actors switched positions in the process (see Figure 2), and because most actors involved in initiating the partnership remained for subsequent planning (Figure 3). The fluidity of the information, knowledge of the initiative, control over the budget, and level of continuity in terms of human resources were all stronger in the Lebanese partnership. In both cases, the buy-in of health technical actors at the periphery of the networks would need to have been negotiated, a possible competition for funds might have limited collaborative endeavours, and recommendations entailing longer-term engagements might have been more difficult to secure within an annual budget framework.

Constraints owing to the nature of the research recommendations

Next, we analysed the features of the research recommendations. These features were identified by the actors themselves. First, actors mentioned the importance of institutional coherence. Both initiatives were based on institutional questions such as: 'how can we make the invisible visible at the primary level of care?'; or 'how can we measure the impact of the physical rehabilitation programme on people's lives?'. Recommendations that were supported institutionally brought a sense of shared responsibility: 'This is something I find really interesting, that we have to come up with recommendations that are part, should be part of our identity'. Institutional coherence could also emerge from field experience: 'And to some extent there are also some recommendations that were there before, that confirms a direction that was taken before'. In interviews, coherence with respect to institutional policies or field experience supported a sense of shared responsibility. In contrast, when a lack of coherence was discerned, it appeared to be diverting the focus and the resources.

Second, the perception of control in the implementation process was key. Most actors perceived recommendations that were situated beyond the close control of the ICRC as challenging: 'those are things that are not only up to the ICRC to influence, those are the

sort of issues that go beyond the influence of the ICRC, so there you need to come up with a policy approach, you know, discussions with the authorities, public communication [. . .] things are linked to the system as such, and to the perception of the population of their rights and their duties and things like that, you know, that goes way beyond what the ICRC can do'.

Actors also expressed a weaker sense of control when recommendations were related to approaches that necessitated working towards both short- and long-term aims (ICRC, 2016), and those that might necessitate finding a subtle balance between immediate substitutive mechanisms and longer-term capacity-building: 'And we cannot be in the substitution mode ourselves, right? [. . .] because if we do the substitution mode, then we are not going to improve, we are not going to strengthen the capacity of the system, of the [national body] to act and face the workload'. Having a sense of control or, in the absence of it, being able to discuss and agree on the risks taken was viewed as crucial. Lastly, in both networks, many recommendations were perceived to lack specificity: 'I mean, well the first thing is that they seem quite, how would I say, I think maybe not very context-specific, but you know, those are recommendations that can be made on many programmes that we have, across countries'. Several actors also mentioned the relevance of contextual appropriateness: 'Yes, but you know maybe somebody can do the study, but I am having the feeling that it should be someone really literate with the context, it should not only be a foreigner from whatever region of the world, European, African or whatever, it should be someone from the context'. Specificity of experience and cultural appropriateness were seen as enabling the uptake of research recommendations.

Why actors participated in the research implementation process

This subsection examines what actors stated was necessary for them to engage in the implementation process, and how the nature of each partnership might have constrained the potential of actors to negotiate the possible limitations. Several factors are perceived to influence engagement in implementing research recommendations. The first is early and regular involvement in the research process: 'So, I could have been involved more frequently, in more steps'. Continuity in the process of sharing the information is also crucial and supported by most actors. For instance: 'More often, in a lighter way, rather than, in a heavy way all of a sudden'.

Once involved, actors often relate the research to their field experience: 'I think while we engage in those types of exercises, is kind of . . . to systematise, and probably also to get a confirmation of what we already know. I think very often we have kind of anecdotal arguments on a number of things, and I think this is where research can help us to really confirm things that we see, but maybe see in an anecdotal way'.

Another factor influencing potential to engage is related to the dissemination of the findings. Face-to-face presentations mobilise actors around the operational response: 'I got feedback through presentations that were done in [place], where we were briefed about the content and outcomes of the study, which I remember was very much focusing on [type of outcome] and one of the main factors was [issue], so there was something we could do as an organisation'.

Face-to-face presentations also create a discussion space: 'It was the sharing, and it was followed by a kind of first discussion on how and what we can do based on those results. So, it was already a bit more than a sharing'. Oral presentations of the results allowed actors to clarify issues: 'It was actually during the presentation. It was there because as we said the draft report was over [number of] pages so difficult to take out was the salient points, so it came clear in this [place] presentation in [month], what were the findings, and what were the follow up of the recommendations, the changes that had to be made'.

In contrast, e-mails are often related to issues of recall or oversaturation: 'No, I had never heard about it before. Or maybe, maybe I would not say that I was not getting an e-mail, but as you know [. . .] there are so many e-mails [. . .] and maybe . . . we are receiving so many of those e-mails for some study, research, that sometimes we don't even reply'.

Lastly, the timing of sharing research results was important. Delays in doing so engendered a sense of disconnect: 'So, there is a matter of time. From the moment when the research was conceived, to the moment when it was conducted, the moment we had clear results, and the moment we had clear recommendations, the time lapse was huge'. Delays in sharing comprehensive results also led to not involving actors who would implement the recommendations in the field: 'I think there was a gap. Normally I arrived after this was already given to the field, but there was always, when you were going to the field, people requested on having something more to know about [name of research partner] and there was always the issue that we have to wait a bit before to share the complete report'.

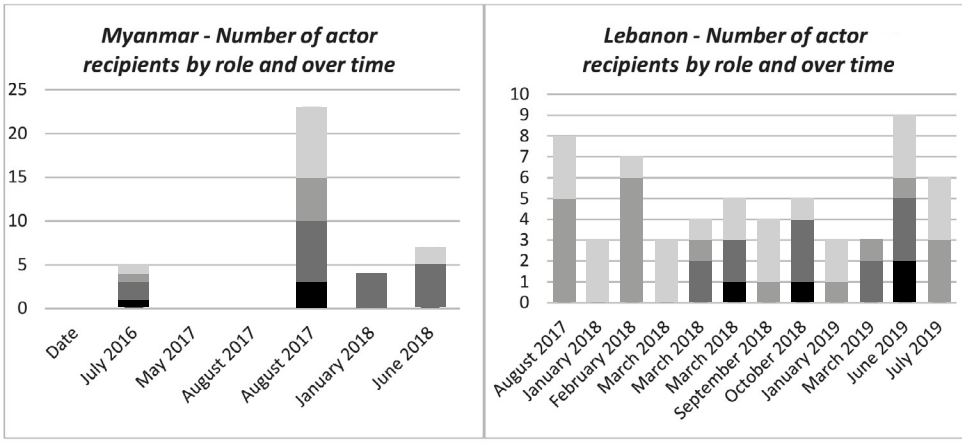
Building on what actors said was relevant to them, we now look at how such factors were shaped in each partnership. First, at the beginning of the collaboration, both field teams were engaged differently. A field scoping visit conducted by the academic team to Lebanon allowed the ICRC field team to analyse monitoring results and existing literature to refine the research question. In contrast, for Myanmar, the research question was formulated at headquarters and was strongly related to a funding initiative that was not of immediate concern to the field team.

Second, the modalities via which the findings were shared also differed. In Myanmar, the actors were informed of the research findings (the evidence) less frequently and mainly in written form (that is, by e-mail); and two external diffusion initiatives did not involve ICRC actors. In Lebanon, most of the initial dissemination took place through face-to-face presentations, before a switch to written modalities. Opportunities to discuss the recommendations early in the process were greater within the Lebanese network. In terms of the timing of an external peer-reviewed article, both settings took between 18 and 24 months to publish such a piece of work. Figure 5 shows who was involved in the diffusion sessions and how frequently.

Figure 5 shows that the dissemination process for Myanmar from the onset involved managerial and field actors, including those at headquarters and at the field level. For Lebanon, actors at headquarters were involved much later. The frequency of the dissemination sessions, however, was higher in Lebanon. The main challenge for Myanmar was the lack of discussions about the results, combined with a lower number of diffusion activities. For the Lebanese partnership, the late involvement of actors positioned at headquarters posed an important challenge.

Figure 5. Actor recipients of the research recommendations, by role, date, and geography

Key: ■ Management headquarters ■ Health headquarters ■ Management field □ Health field



Source: authors.

How key challenges to research uptake were overcome

In this subsection we look first at what different groups of actors said they could do to integrate the evidence into the field response. Then, we analyse the level of research implementation in each partnership.

Most actors, including peripheral health actors, expressed a need to have an important space in which to propose changes, the capacity to undertake initiatives, and the ability to propose modifications. However, in interviews, actors with different roles mentioned missed opportunities related to the lack of discussion on the constraints embedded in implementation. Managerial actors at headquarters conveyed that they were able to discuss the broader political decisions related to implementation if they were engaged early on and felt that they could trust the validity of the recommendations made. Managerial field actors were constrained by having to 'make priorities among priorities all the time', negotiating between what was relevant and what was feasible. These findings confirm the importance of engaging with issues of feasibility early on.

Health actors overall said that they had an important space in which to facilitate the discussions, build trust, or negotiate the resources needed to modify the existing field response. Health actors positioned at headquarters perceived that they were in the right position to identify opportunities and the alignment of influential parties. Health actors embedded at the centre of the planning process in the field believed that they could create opportunities to integrate recommendations, provided that they were engaged, sufficiently skilled, and able to discuss the implications of the results with their managerial counterparts at different levels and in the long term.

These results suggest that a sense of autonomy is expressed by actors in both partnerships. Keeping these findings in mind, we examine now how many and to what extent the recommendations have been implemented. The main results of the implementation status have been divided into three categories for each recommendation:

- 'normalised'—that is, integrated into planning and implemented;
- 'adopted'—that is, integrated into planning but proved difficult to implement; and
- 'rejected'—that is, not integrated into planning and not implemented.

The uptake levels were analysed in relation to three prior characteristics (May and Finch, 2009) that each recommendation was required to have:

- a set of technical skills compatible with the recommendations made—known skills;
- the ease of integrating them into existing plans and field response—continuity; and
- institutional support for priorities or policies—institutional readiness.

Implementation outcomes for Myanmar

For Myanmar, it is unclear how much the research findings were specific enough and whether they were used to modify the yearly problem analysis of the 2017 and 2018 planning documents. Lack of use of problem analysis is what one would expect when the actors involved did not have the opportunity to discuss the results or negotiate the constraints related to implementation. Nevertheless, three recommendations have been 'normalised', all of which aligned with existing objectives, known skills, and operational priorities. The normalisation took place through increased mine risk education activities, significant operational support to increase access to and the cost of rehabilitation services, and gradual consolidation of the outreach network. Recommendations necessitating internal collaboration, such as those for prevention, were based on a previously established internal agreement between the physical rehabilitation programme and the weapon contamination sub-units. Among the recommendations normalised were those relating to 'support to services', which led to a substantial increase in the number of physical rehabilitation structures supported through considerable field effort.

In contrast, the recommendations that were 'adopted' but difficult to implement all represented a discontinuity and were not translated into a new objective in the planning document up to July 2019. We see here that the limitations due to a lack of information, low level of engagement of actors in the field, and the internal shortcomings of the planning tool were difficult to overcome in this partnership. In addition, the recommendations that were 'rejected' for Myanmar fell outside of the field analytical and operational continuity of the physical rehabilitation programme, despite having institutional support. Alternative responses to what represented continuity at the level of the field were not integrated into the written analysis, field planning, objectives, or budget. Recommendations that were rejected came up against important barriers, such as the disconnect between the focus of the research, the operational priorities, and the feasibility of mobilising resources while maintaining vital operational effort to increase service support effectively. For Myanmar, the organisational lack of continuity combined with the fact that key planning actors were not engaged early on led to major difficulties in initiating changes, at least at that time—changes were reported but after the period under investigation.

Table 2. Research uptake levels in the ICRC's Myanmar response, as of July 2019*

Recommendations made for Myanmar	Uptake results	Known skills	Continuity	Institutional readiness
1. The vast majority of the impairment is traumatic and preventable through risk prevention policies.	**Normalised**	Yes	Yes	Yes
2. Loss of job and income is a significant concern among those interviewed. Catastrophic socioeconomic costs associated with acquired physical impairment in Myanmar.		Yes (in the economic security (EcoSec) department)	Developing (by EcoSec)	Yes
3. Service support is needed for persons with physical impairment.		Yes	Yes	Yes
4. Promote access to alternative vocational training and opportunities to allow job matching, possibly through community-based rehabilitation programmes.	**Adopted**	Yes (in EcoSec)	Developing	Yes
5. Women are under-represented and might be less likely to seek healthcare and access appropriate services—further research would be needed.	**Rejected**	Developing (at headquarters)	Developing (at headquarters)	Yes
6. Psychological adjustments to amputation affect mood, body image, social participation, independence, and identity.		Yes	No	Yes
7. Quality-of-life tools used did not capture specific issues related to amputation and physical functioning. None identified in the literature, suggesting this is a gap necessitating further research.		Developing	No	Yes

Notes: * As observed for the 2018–19 planning time frame. However, while discussing these results with the field teams, several important changes were introduced for 2020 planning, namely, the inclusion of women in programmes and in relation to mental health and psychosocial support. This evolution shows that measuring such outcomes has to account for sufficient time for change.

Source: authors.

This research partnership encountered three shortfalls:

- the research question was not anchored in monitoring;
- the initiative was controlled centrally; and
- the dissemination modalities allowed few spaces for multi-level discussions.

The crucial resource in the field was the alignment of three recommendations with the physical rehabilitation programme's focus and skills. At headquarters level, these recommendations contributed to better understanding of how women access physical rehabilitation services in conflict-affected settings (Barth et al., 2020); however, the research recommendations were only used directly in field planning later on.

Implementation outcomes for Lebanon

Constraints on research implementation in the Lebanese partnership differed from those faced in Myanmar. The four recommendations that were 'normalised' all relate to a clear problem identified before the study begun, confirming the importance of allowing research to validate earlier hypotheses, in terms of populations, research needs, and the evidence base. These recommendations also corresponded with amended planning objectives. Some recommendations that were normalised represented a discontinuity, such as providing incentives to key staff or reducing the cost to beneficiaries, and new resources were mobilised during the subsequent planning processes. One of these changes entailed an entirely new operational objective—to 'decrease the cost for beneficiaries and ensure financial support'—resulting from an internal collaborative effort. One also sees that three of the four recommendations implemented were supported institutionally.

Table 3. Research uptake levels in the ICRC's Lebanon response, as of July 2019

Recommendations made for Lebanon	Uptake results	Known skills	Continuity	Institutional support
1. Decrease the cost for beneficiaries and ensure financial support.	**Normalised**	Developing	No	Yes
2. Provide incentives to key staff such as midwives and gynaecologists.		Yes	No	Developing
3. Increase awareness through community-based approaches and outreach.		Developing	Yes	Yes
4. Scale up sexual and reproductive health and availability of non-communicable services.		Developing	Yes	Yes
5. ICRC is in the right place: stay as the ICRC reached out to the most vulnerable.		Yes	Yes	Yes
6. Promote trust in the public health system and adequate drug prescription.	**Adopted**	Developing	Yes	Developing
7. Reach out to poor Lebanese.		Yes	Yes	Yes
8. Move to a multi-year approach.		Developing	Yes	Yes
9. Tailor to specific needs and expand existing packages for non-communicable diseases (to musculoskeletal conditions).	**Rejected**	No	No	Developing
10. Include dental care in the package at the primary level of care and advocate at the country level.		Developing	No	No
11. Further research on non-communicable diseases among pregnant women.		Developing	No	Developing
12. ICRC should share its population-based vision and tool with external actors.		Developing	Developing	Yes
13. Donors should adapt funding mechanisms based on results (population coverage) rather than activities (outputs).		Developing	No	Developing

Source: authors.

The four recommendations that were 'adopted' all had three things in common:

- much weaker use of the research recommendations in the analytical part of the planning document;
- the absence of specific amendment of the programme objectives; and
- an implementation process that was initiated by field teams but then documented as being interrupted in monitoring reports.

When issues were identified without an operational objective, this lack of clarity also led to fewer resources being allocated to bring about a change. Several recommendations that were 'adopted' were heavily dependent on external constraints such as trust in the public health system, which the ICRC field team perceived to be difficult to influence over time. Lastly, 'rejected' recommendations were not processed in the planning, either at the level of the analysis or with regard to objectives. Most of the recommendations rejected encountered barriers in terms of organisational and external context. Most of these were outside the ICRC's institutional framework and would have entailed a discussion at the headquarters level (for instance, to expand the package of healthcare provided). Recommendations rejected were also related to a set of external operational and political constraints that characterised the humanitarian setting. Barriers included complex strategic positioning in protracted conflicts and the problem of multi-year approaches. In Lebanon, late communication of the findings with headquarters might have contributed to a lack of discussion of broader levels of change.

Discussion

This is the first study to assess the mechanisms influencing research implementation in the health department of the ICRC. The application of Extended Normalization Process Theory enabled the identification of key challenges and social mechanisms at play while ICRC actors negotiated the integration of research results into the humanitarian response.

Factors that have influenced the creation of a negotiation space

First, early access to information and continuous discussions at field level were essential. In this study, recommendations that represented a discontinuity with ICRC field programming proved challenging to implement when influential actors were not involved at different levels and over time. When key actors were not aware of the recommendations, the use of research was minimal. The oral diffusion modalities also played a part in creating a space for discussion, while written modalities did not allow for much interactive negotiation. The need to ensure that key actors have clear information for decision-making is documented in the literature (DFID, 2016; Kumar et al., 2016; Khalid, 2017; Hernandez, Ramalingam, and Wild, 2019).

Second, the capacity to account for staff turnover was vital. Both networks were nested within a centralised organisational structure, which narrowed the negotiation space when

new staff were not informed. An ongoing capacity to account for and adapt to staff turnover was fundamental to the implementation process. In the literature, the high turnover of staff also relates to the identification of specific actors such as knowledge brokers or entrepreneurs who are able to ensure that information is not lost (Rogers, 1983; Zachariah et al., 2012; Mayne et al., 2018).

Third, the creation of a small cohesive research group allowed for discussion of the results for planning purposes over time. Engaging this technical and managerial group led to structural continuity and an open negotiation space. Building engagement over time can facilitate negotiation regarding the mobilisation of resources (May, Johnson, and Finch, 2016; Hernandez, Ramalingam, and Wild, 2019) or bringing different forms of knowledge into the negotiations, which is important in contexts where there is a reluctance to innovate (Lewis, 2003; Mezias and Starbuck, 2003; DFID, 2014; Khalid, 2017). Knowledge-sharing and empowerment are also recognised tools to enhance collective commitments (Lok and Crawford, 2004; Lee et al., 2010).

Fourth, the recommendations needed to be specific, institutionally relevant, adapted to the context, and discussed. Elaborating the recommendations with field actors allowed for the mobilisation of their experience and knowledge of monitoring results, which augmented a sense of continuity and coherence. In the literature, the need for adaptation and piloting is documented (Rogers, 1983; Bennett et al., 2017). The validation process helps to ensure robustness, credibility, relevance, consistency, and rootedness (Knox and Darcy, 2014; Hernandez, Ramalingam, and Wild, 2019;).

Lastly, the major finding is that the potential to engage (understood as the motivations or collective commitments) was pivotal and influenced the other components described above. The need to include actors regularly, at different levels and throughout the process, was essential to sustain the openness of the negotiation space wherein innovative propositions could be digested. The engagement of actors throughout the network appears to be an overarching factor needed to integrate research recommendations into the routine work of all concerned. When highly connected actors managed the research budget, defined the research question, and formulated the recommendations, they could interact in a powerful way and propose innovative responses. Conversely, weak or absent potential to engage narrowed the negotiation space. The relevant literature documents the importance of ensuring that policymakers and programme managers are engaged regularly in the research process (Zimmerman et al., 2016; Cairney and Kwiatkowski, 2017; Mayne et al., 2018). The notions of trust, creativity, collective learning, cognitive immersion, and widespread participation are crucial supports to the innovation process (Lok and Crawford, 2004; Lawler, 2005; Lee et al., 2010).

Implications and trade-offs for the humanitarian community

The findings suggest that organisational challenges need to be addressed early on. Key actors should be involved actively from the onset, while intentionally mixing roles in relation to commissioning, planning, and implementing the findings. This study shows that a lack of engagement of actors is possibly linked to failures in addressing human

resources turnover or in interacting with discontinuity even when there is an institutional commitment. Instead, structural constraints can be modified, and innovative approaches piloted when a range of actors are engaged across horizontal and vertical power structures. One important limitation is time and expertise: those who are the best at leading in the field are not necessarily from research or academic backgrounds and have extremely busy roles, so they may need support and dedicated time to engage fully. Active involvement might also mean that a field-led research agenda is needed to drive programme change. Another limitation is internal inwardness, wherein the ideas challenging the previous norms remain difficult to discuss critically, especially when field actors are dealing with competing operational priorities within a tense humanitarian response. A related constraint is the inclusion of recommendations that go beyond the control of health professionals in contexts where notions of empirical research and public health cannot be transmitted quickly. There may be a need to incorporate such notions institutionally and discuss these throughout the research process.

These results also mean that a negotiation space needs to remain open over time. For the academic partner, this would suggest discussions with programme planners and policymakers to interpret findings and to guide the recommendations. Such an approach is not straightforward as there might be logistical, short-time funding, or language barriers to overcome. For the humanitarian organisation, to bring research results into the routine monitoring process there is a need to create an institutional 'research culture' that would allow any internal actor to be aware of the importance of relevant research findings. A stronger research culture also would imply trust in empirical methods as core components of the usual working modalities. And stronger consensus would need to be built between field staff who implement the findings and those who ensure ethical and programmatic coherence centrally.

Lastly, the results convey that the recommendations need to be specific and adapted to the setting and should be elaborated using the inputs of field actors at the very beginning. Involving key actors early on seems to be the only way to make sure that evidence can be realistically implemented in the field. A robust effort to strengthen the capacity of such actors would need to be included in the design of and the budget for the research process.

Strengths and weaknesses of the study

The weaknesses of this study include retrospective data collection and the absence of a possible comparison of the qualitative accounts of the two partnerships (to preserve anonymity). These limitations were compensated for by the use of a mixed-methods approach, combining the different facets of the implementation process. Purposive sampling for the interviews may also have inadvertently led to an underestimation of the barriers to research implementation, which might not have been captured. Another weakness was the position of the lead author and researcher, Enrica Leresche, who had past organisational relationships with actors in both networks. This issue was partially controlled by: the timespan between the end of the last field assignment of the main researcher with the ICRC (July 2018) and the start of the comparative study (July 2019);

a clear role limited exclusively to conducting the research; using recorded and transcribed interviews; and the use of a consistent and systematic methodology.

An important strength of this paper is that the results were discussed by the co-authors, who represent a range of experiences of humanitarian settings in general and these two partnerships in particular. Another strength is the consideration of a full network of actors, permitting a retrospective analysis for each partnership and over a long period of time. Lastly, the different tools employed in a systematic way supported the triangulation of the results. This approach permitted the presentation of comprehensive results. Qualitative interviews revealed that there were opportunities missed to discuss the results in both partnerships—an observation that was visible from the results but difficult to understand by viewing the retrospective documentation alone. The tools combined allowed for an extensive, replicable, and in-depth analysis of the implementation process in each partnership.

Unanswered questions

This study left several matters unaddressed. First, it is uncertain whether an actors' potential to engage is more powerful within adaptative management and in unstable contexts such as humanitarian settings, as compared with more stable environments where changes might be slower to take place. In relation to this uncertainty, the existence of early appreciation by humanitarian actors of what is negotiable is possible. The actors involved in this study showed that they were able to integrate recommendations or to reject them if they seemed to be threatening the equilibrium of the response capacity. Opposed mechanisms emerged from within the same network that could not be attributed solely to the characteristics of the recommendations. The either fixed or fluid notions of what is or is not negotiable, what these notions consist of, and how these issues can be overcome to integrate research results into the field responses need to be explored further.

Second, the influence of the broader context was constrained by the organisational focus of this study, as viewed through the lens of the characteristics of the recommendations. The influence of ethical dilemmas or power differentials should be ascertained further, as they remain unexplained in the literature (Knox and Darcy, 2014; Bowsher et al., 2019). More specifically, how power is distributed within the implementation process needs to be determined. For instance, power imbalances might manifest through the adoption or rejection of research results. In the literature, contextual features such as insecurity and power differentials could explain why evidence might be rejected (Bradt, 2009; Dijkzeul, Hilhorst, and Walker, 2013). Negotiating implementation might involve engaging in a debate beyond inherited power structures, such as those pertaining to gender discrimination (Lokot, 2019; Patel et al., 2020), colonial legacies (Barnett, 2011; Singh et al., 2021), or conflict-related political, economic, ethnic, or social inequalities (Shdaimah and Stahl, 2012; Oliver, Kothari, and Mays, 2019; Sibai et al., 2019; El Achi et al., 2020). An organisation's lack of political will and/or its short-time programme and funding cycles can also possibly affect how evidence is implemented in such settings (Knox and Darcy, 2014). And there is a sense that humanitarian organisations may absorb knowledge

only within their own realms of social construction. Some of these features might be revealed and emerge from the implementation process itself.

This study only partially explains the success or failure of the implementation process. As we see in both partnerships, the rejection of several recommendations might be linked to what is relevant, feasible, and negotiable, or to the capacity to manage the uncertainty about whether or not the evidence used is sufficiently strong to withstand the unpredictability of unstable humanitarian settings. The meaning of these findings needs to be assessed in a different humanitarian organisation and in the literature. This wider evaluation would allow one to confirm whether the gap in evidence-based humanitarian responses has so far been only partially met by strategies focusing on producing evidence and on ensuring evidence use in decision-making. If so, this confirmation leaves open the possibility that the implementation part of the process has only begun to be explored.

Conclusion

Building humanitarian responses based on empirical research results is more than producing additional evidence, generating higher-quality research, or including stakeholders in a dissemination mechanism—even if such efforts are crucial and are embedded in the overall initiative. Actors involved in implementation have a central role to play collectively, which is closely related to whether or not they will negotiate the barriers encountered in the implementation process. Further research is needed to understand the social interactions, as well as the internal and external constraints within humanitarian organisations and in humanitarian settings, that influence research implementation. For the academic research partner, there is often a gap between the academic 'end point' of writing a report and other publications and being able to follow up to see which recommendations are implemented and to what degree. For the humanitarian actor, there is an awareness that a critical appraisal of how evidence is implemented makes a difference, since research that cannot lead to changes in practice might not be justified in the first place. Establishing a connection between research and implementation within a given humanitarian response offers a route to building a negotiation space, whereby academic partnerships in humanitarian settings can bring methodological approaches to the field, share applied findings with the academic community, and ultimately provide a better response for the people affected by a crisis.

This study demonstrates that both academic research and humanitarian communities are keen to know whether evidence is incorporated in humanitarian responses, especially in the medium-to-long term. Funding options that allow for continued integration of research into the humanitarian field response are needed to guarantee that some of the barriers identified in this study can be overcome. However, the issue of whose responsibility it is to ensure that this linkage materialises is beyond the scope of this study. Future research should investigate factors such as ethical dilemmas and power imbalances that are not fully controlled by either academics or humanitarians to ensure that research efforts to fill evidence gaps in humanitarian responses are not undertaken in vain.

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Data availability statement

The data that support the findings of this study are available from the corresponding author upon reasonable request.[2]

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