

The new reality: perspectives on future integrated WASH

Nikolas Sorensen and Marielle Snel

Over the next 10 years, the humanitarian and development fields will face significant changes as new skills, expanded technologies, and shifting funding streams prompt innovation in order to maintain impact. As the length of humanitarian crises expand relief response can no longer be viewed merely through the humanitarian lens, but current and future crisis responses increasingly require long-term development considerations. Integration across the humanitarian-development nexus will be vital to future emergency response. The interdisciplinary nature of the WASH sector makes it ideally placed to lead further integration with sectors like health, nutrition, livelihoods, child protection, and education. Integration of the WASH sector is not only possible but essential to face the challenges of future crises. COVID-19 is a wake-up call showing how quickly global humanitarian needs can change and the need for a more integrated response to emergencies. Tomorrow's WASH practitioners will need to be proactive in developing new hard and soft skills and have broader multi-sectoral experience to succeed. Future integration will require stronger relationships between multi-mandated organizations, governments, and the private sector as well as new innovative funding sources, including impact investing, blended finance, and development impact bonds. We argue that there is a unique window of opportunity to bridge these gaps as COVID-19 brings the value of effective WASH programming forward as a foundational part of long-term resilience building. To indeed provide life-saving interventions as humanitarian works claim to do, we must start with a clear focus on the long-term developmental ends in mind.

Keywords: WASH, humanitarian–development nexus, integration, emergencies

THIS PAPER IS A CALL to action for water, sanitation, and hygiene (WASH) professionals to consider future trends of the WASH sector. This call to action is all the more relevant as we face the ramifications of the COVID-19 outbreak and the role WASH can play in humanitarian and development response. Due to the intersectoral nature of the WASH sector, and its impact on disease outbreak prevention and response, as well as on people's overall health and nutrition, WASH is an ideal starting point for further multi-sector innovation and integration as humanitarian and development organizations make necessary adjustments due to future trends. As humanitarian organizations run towards COVID-19 response, it will be all too easy to fall

Nikolas Sorensen (niksorensen@gwu.edu), Fellow, Save the Children US; Marielle Snel (msnel@savechildren.org), Senior Global Humanitarian WASH Specialist, Save the Children US
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back into our siloed, business-as-usual nature, and lose sight of the vital need for purposeful coordination and integration to truly reach the outcomes we seek.

Humanitarian crises around the world have become increasingly complicated as more people are impacted by famine, disease outbreaks, extreme violence, conflict, natural disasters, and climate change. Currently, there are an estimated 170 million people who are reliant on humanitarian assistance (UN OCHA, 2019). As humanitarian crises have become more protracted, humanitarian organizations have had to expand quickly to meet the ever-growing needs of affected people and yet have struggled to keep up with the frequency of more prolonged and complex emergencies (Guinote, 2018). The average length of humanitarian appeals is now seven years (Nakamitsu et al., 2017), with many countries seeking aid for nine or more years (Mason et al., 2017); relief response can no longer be viewed merely through the humanitarian lens, but current and future crisis responses increasingly require long-term development considerations.

As humanitarian crises grow in length, there has been increased pressure on individual sectors within humanitarian response, like WASH, to innovate to meet the needs of the most marginalized people (Rammal, 2019). Integration across the nexus will bring efficiency and focus to assistance, allowing humanitarian response to bridge the gap between beneficiaries' short-term and long-term needs. A 2019 report on the capacity of the WASH sector to respond to severe, protracted crises found that WASH infrastructure often becomes idle and falls into disrepair as crisis durations drag on, complicating linkages between humanitarian response and recovery efforts. Nathaniel Mason et al. indicated that 'in such contexts, a lack of complementarity and collaboration between humanitarian and development WASH actors has heavy consequences, making it more costly to provide WASH services, reducing effectiveness of targeting and sustainability, and ultimately increasing the vulnerability of poor people to disease and missed socio-economic opportunities' (2017, 1). These problems are not unique to WASH, and 'there is a recognized gap between emergency and development (the nexus) across all sectors' (Grunewald et al., 2019, 62). The disconnect between humanitarian and development WASH is in part due to the protracted nature of today's crises and short funding structures that do not allow humanitarian responders to maintain infrastructure until recovery begins (Nakamitsu et al., 2017).

The 2016 World Humanitarian Summit and the development of the New Way of Working came out of a recognition that future emergency crises will only grow in complexity and length (Nakamitsu et al., 2017). The New Way of Working aims to foster collaboration between the humanitarian and development sectors to meet the short-term and long-term needs of crisis-affected populations. We argue that integration of the WASH sector is not only possible but essential as we face the challenges of future crises. Humanitarian and development WASH practitioners must take the lead in 'remov[ing] the wedge that currently drives the two worlds apart – building on the strengths and capacities of existing organisations and sector structures from the ground up, rather than inventing new global initiatives from the top down' (Mason et al., 2017, 1). This change will not only require innovation in the collaboration between humanitarian and development WASH but real recruitment,

organizational, and systematic changes that will allow WASH programmes to save lives and build resilience in the future.

Our objectives in this paper are to, first, critically reflect on the future of the WASH sector in ongoing crises as it relates to disease outbreaks, climate change, population growth, immigration, food security, geopolitical conflicts, and the protracted nature of humanitarian crises. Second, the paper highlights the role Save the Children is playing with integrated programming within the sectors of disease outbreaks with the READY programme (Save the Children, 2018), and food security with the PRO-WASH initiative (FSN Network, n.d.). Additionally, the paper reflects on Save the Children's focus on integration around their three pillars of Survival, Learn, and Protection as it is related to WASH and health, nutrition, livelihoods, child protection, and education. Third, the paper considers the value that integration across silos brings to the future of the humanitarian and development WASH divide and its impact on the people.

The next generation of development/humanitarian workers

Over the next 10 years, the humanitarian and development field will face significant changes as new skills, expanded technologies, shifting funding streams, and growing complexity all collide within the sector (Next Generation Professional, n.d.). This will require professionals to be even more open-minded, proactive, and innovative to remain successful. Additionally, this will require teams, especially multi-mandated organizations, to reimagine their systems, organizational structures, implementing principles, and expectations in a way that promotes 'collaborative co-production' between teams leading to new shared outcomes (Fanning and Fullwood-Thomas, 2019). This cooperation will have to move beyond just humanitarian and development sectors and include partnerships with researchers (Saywell and Crocker, 2019), which can lead to a better grasp of bottlenecks and long-term learning as the WASH sector embraces the changes needed to meet future challenges. WASH professionals will have to reflect critically on their role in the sector as they consider new skill sets and linkages between external factors and their impact on WASH programming. These external factors will require specialized knowledge to effectively manage, and will include topics such as disease outbreaks, climate change, food insecurities, and protectorate war crises.

Devex recently conducted a survey on humanitarian and development practitioners and found that developing new skills and competencies with technology are vital areas that practitioners will need in order to thrive in the next decade and beyond, especially tools like geographic information systems (GIS), artificial intelligence (AI), and big data (Next Generation Professional, n.d.). Success in the future will be greatly enhanced based on these practitioners' abilities to learn and utilize new technologies in programme design and implementation. As the challenges faced by development workers grow, these tools will become more critical to continue to make the impact governments and organizations aim to create. However, more important than just learning to apply these tools in a development context is the ability to integrate technology with collaboration between governments, development and humanitarian organizations, and external partners. This collaboration

will require the next generation of development workers to acquire substantial abilities in both hardware skills in balance with soft skills such as communication, adaptability, creativity, and innovation (Next Generation Professional, n.d.).

The next 10 years will also see significant adjustments to financing streams as development work becomes more competitive, and humanitarian response becomes longer and harder to sustain. These growing challenges will push current and new professionals to cooperate closely with other implementers and to build new and further partnerships, especially in the private sector. These financial models, like impact investing, blended finance, and development impact bonds, are relatively new and more complicated than the traditional funding streams to which humanitarian practitioners are accustomed (Smith, 2018a). In other words, the next generation will need to come to the table with a broader range of skills, including business knowledge and experience, and utilize these tools to effectively respond to the complex challenge they will face (Smith, 2018b). In this regard, the future WASH professional predicted to be most in demand will be integrators, or rather individuals with strong competencies in multiple sectors with the knowledge and skills on how they can impact and influence each other. These individuals will then be ideally qualified to coordinate the response between humanitarian, development, and government responses and foster a bridge between the three (Smith, 2018a). For the seasoned development worker, change may be painful and unwanted. However, integration is not just about acquiring skills but approaching change and the future with an even more open, proactive attitude and innovative mind.

An essential focus in the coming years will be to further strengthen national WASH coordination with the WASH Cluster and other humanitarian responders. Not only will future WASH professionals need to be integrators who are well versed in new, essential technologies, but they will also need to be well connected with the local context and have the ability to transition between humanitarian, development, and national government priorities. It is vital for these national experts to understand the United Nations Cluster and SPHERE systematic response, national priorities and to connect emergency response with local governments' priorities along with the Sustainable Development Goals (SDGs) and SPHERE standards. This will require a significant strengthening of national WASH coordination structures.

Focus areas in the coming years

With increasing population growth and urbanization, water competition and scarcity (Snel, 2018) are going to be one of the most significant issues for humanitarian WASH in the future (Mason and Msello, 2016). The humanitarian WASH sector will have to pivot as climate change response becomes an increasing part of humanitarian and development programming and will necessitate integration with other sectors like health, nutrition, agriculture, and others. This is further complicated by the increase in the number and duration of crises facing the industry. A 2019 Global WASH Cluster report indicated that 'the WASH sector currently does not have the resources to cope with multiple level 2 or 3 disasters taking place at

the same time in different parts of the world, and lasting a relatively long time' (Grunewald et al., 2019, 56).

Additionally, there will be an increase in disease outbreaks beyond cholera and Ebola, as we are seeing with the recent COVID-19 outbreak. Outbreaks are going to be a significant focus of humanitarian and development programming in the coming years. They will necessitate preparedness and integration across sectors and silos to create resistance and resilience. Although humanitarian WASH response to cholera (Cardon et al., 2018) and to a lesser extent Ebola (Trajano et al., 2016) can be very effective due to best practices learned in recent outbreaks, major emphasis will have to be placed on developing effective and efficient responses to new and largely unknown diseases like coronavirus. The COVID-19 outbreak will have a devastating impact on humanitarian and economic systems around the world, and this is compounded in fragile states (Salem, 2020). The humanitarian and development sector must create a coordinated and efficient way to address outbreaks in the future, and this will require cross-sectoral collaboration and further aligning our current systems.

As part of Save the Children's (SC') Global Humanitarian WASH Guidance for 2019–2021, SC has focused on integration to contribute to the preparedness, prevention and control of the major WASH-related infectious diseases (Save the Children, 2019). SC's READY programme, which aims to strengthen the capacity for humanitarian and development response to infectious disease outbreaks, is ideally placed to lead in coordination and integration. WASH integration with health, nutrition, livelihoods, child protection, education, and across the humanitarian and development nexus is going to be vital to facing key future trends, including the effects of outbreaks and climate change.

The success of future national WASH coordination will require the full participation of women to meet and achieve the high ambitions set in the SDGs. In many parts of the world women and girls carry the primary weight of WASH-related needs in the home. UNICEF cites that 'as managers at the household level, women also have a higher stake in the improvement of water and sanitation services and in sustaining facilities' (UNICEF, 2003). It is vital for future WASH professionals at the national level to increase the involvement of women in developing, preparing, and maintaining WASH infrastructure before, during, and after humanitarian crises.

WASH financing

Funding within the WASH sector is one of the most significant barriers and greatest opportunities for integrated programming. Though WASH funding has increased over the last few years, this growth is insufficient to meet current growing needs (Fanning and Fullwood-Thomas, 2019). This financial discrepancy shows the extent of the siloed worlds the humanitarian and development sectors remain in and they need further adaptation to meet future circumstances (Fanning and Fullwood-Thomas, 2019). For those who live in acute crisis conditions, there is no significant difference between humanitarian and development response, as both are about survival and rebuilding lives.

Though humanitarian investment has seen a considerable increase since 2014, that increase has not been sufficient to meet current humanitarian needs, especially within the WASH sector. As the crises around the world grow in number and length, funding deficits become a critical concern, and WASH is one of the sectors which is consistently underfunded. On average, only about 45 per cent of WASH funding requirements are met despite their importance (Grunewald et al., 2019). This gap puts significant pressure on humanitarian and development WASH practitioners to consider alternative funding streams to continue to meet the needs of the people they seek to help. With these significant WASH funding gaps, Guy Hutton argued that universal access to adequate water and sanitation should be the target for WASH practitioners, 'cautioning that WASH targets should be realistic – in terms of how fast it is likely WASH services can be scaled up with the available financing and local implementation capacities' (Hutton, 2015, 1) within targeted countries.

With the recent COVID-19 outbreak, and the 2014–2015 Ebola outbreak, the argument for integration within the humanitarian silo is strengthened. Integration is key to stabilizing health, nutrition, and WASH funding. It allows humanitarian responders to take advantage of their unique access to beneficiaries to impact a broad array of individuals with programming from multiple sectors. With the current COVID-19 outbreak still spreading, funding for health is likely to see a substantial increase over the next year or two which is only going to exacerbate the funding inequality. A focus on integration over the next year will allow WASH programming to continue to play its crucial part in the COVID-19 response. Though there is a significant funding fluctuation between humanitarian sectors, there is relative consistency in overall funding from year to year. Integrating WASH with health and nutrition, as well as other sectors, allows WASH practitioners to shift their focus from maintaining their portion of the humanitarian funding pie to expanding into new, innovative financing streams. This requires a perspective shift on the part of funders and WASH professionals to view funding in, say, health, nutrition or education through an integration lens to meet WASH outcomes as well.

Although integration of WASH with health and nutrition is a vital step to stabilize funding streams, integration alone is not enough to overcome the consequences of underfunding. To meet the WASH needs of future governments and organizations, humanitarian and development workers are going to have to innovate to meet the growing water needs. Catarina Fonseca indicated that taxes, tariffs, and external transfers are the only three sources of WASH funding available to developing countries. However, she highlights that 'the combination of these funding sources is not sufficient to address the need for water and sanitation services in developing countries' (Fonseca and Pories, 2017, 5). The current COVID-19 outbreak can serve as an effective opportunity to test new funding sources, reminding new and existing funders about the integrated role WASH plays in health response and mobilizing them behind additional WASH strategies.

Multi-year funding for humanitarian response is an often discussed solution in this direction. This change would factor in the protracted nature of most humanitarian crises and would allow for better alignment of humanitarian and

development actors. The vast majority of humanitarian appeals are for short periods, many less than a year in length and are often extended for five or more years. Grunewald et al. argued that ‘This short-term approach is detrimental to resilience efforts during protracted crises, as it leads to insufficient timeframes to either lessen the impacts of disasters or to strengthen the capacity for an effective humanitarian response should a disaster overwhelm prevention measures’ (2019, 39). Grunewald et al. went on to say, ‘Multi-year planning and appeals are critical to ensure that the preparedness and prevention measures necessary for a resilient WASH sector are put in place’ (2019, 39). These shifts would allow humanitarian aid programmes to plan for integration and would allow for a broader, more efficient dissemination of life-saving interventions in crisis areas. However, achieving this integration requires short-term funding structures to become more flexible, allowing their use on system strengthening programmes with long-term aims in mind.

Although multi-year funding and humanitarian sector integration may lead to a stabilization of WASH funding, the real opportunity for WASH funding growth in the future will likely be found in alternative funding sources, most notably through blended financing. The Global WASH Cluster’s road map for 2020–2025 seeks the ‘use of emerging models or blended approaches, that strategically combine and optimize aid, public and private funds’ (2019, 16). However, the most substantial barrier to private financing is the risk involved in attracting the private sector into unstable crises. This is why Fonseca and Pories argue that it is essential for governments to increase investments into water and sanitation systems, which in part ‘would give private financial institutions more confidence to invest in these countries and utilities’ (2017, 9). With COVID-19 there is a tremendous opportunity for outbreak response funding to be connected to preventative WASH programming as a means of building these incentives for further investment.

Blended financing opportunities require careful planning to get the right balance. Still, if done correctly, it can free up public resources and aid governments in building longer-lasting, more stable WASH systems. As Fonseca and Pories also highlight, blended finance uses ‘public taxes, development grants and concessional loans to mobilize private capital flows to emerging and frontier markets—can leverage additional funds for the sector and reduce borrowing costs as compared to a fully commercial arrangement’ (2017, 15). The first part of this balance Catarina de Albuquerque argued will be in how ‘governments and their partners work with the financing sources they already have but are underutilized: domestic water tariffs, taxes, and micro and macro loans’ (Devex Editor, 2020). By using existing resources more efficiently and securing private sector funding, Catarina de Albuquerque argues further that governments and development firms would be able to focus their resources on developing the ‘non-sexy, invisible issues such as independent regulation, policies, and capacity building’ with fewer high interest loans (Devex Editor, 2020).

COVID-19 is the perfect catalyst for a further development in WASH sector funding especially in alignment with the health and nutrition sector. The multi-sectoral

nature of WASH makes it the necessary funding foundation of a coordinated response to an outbreak. Resilience to future outbreaks will require a stronger worldwide WASH foundation to build upon, especially in developing countries where WASH programmes are currently severely underfunded. This multi-country, multi-sector necessity is ideally solved with a renewal in further developed WASH funding that reflects across the humanitarian and development divide.

Development of the nexus

Integration across the humanitarian and development nexus is vital to successfully navigate the complicated crises of the future, specifically protracted emergencies, disease outbreaks, climate change, and food insecurity. To solve these problems and others, DuBois argues that a new humanitarian mindset is needed that ‘conceives of short-term action within a long-term vision of needs; pays attention to the long-term consequences of humanitarian approaches on development or peace; and exchanges analysis and views organically across multi-sector teams’ (DuBois, 2020). As discussed above, the development of this new mindset will require retraining of humanitarian and development practitioners and significant changes in the systematic structures of funding appeals as well as implementors’ organizational structures. Furthermore, for these structures to succeed Fanning and Fullwood-Thomas explain that:

This will require consensus-building, brokering and building new partnerships; navigating and communicating complex ideas; using systems thinking; facilitating open dialogues; and co-creating ideas. Investment is needed to develop joint tools, analysis and language, and to ensure that the views of people affected by crises are integrated at every step, and local leadership comes to the fore. All of this will require flexible funding instruments and changes in programme management structures (2019, 5).

Integration across the nexus better aligns humanitarian and development interventions with the realities of people in crisis, which allows aid workers responding to outbreaks, climate change, food insecurity, and other protracted crises to tie life-saving interventions into the long-term needs and goals of those they serve. DuBois articulated further that ‘the urgency of food, water, healthcare or shelter needs in Syria or eastern DRC displaces but does not diminish the longer-term hopes and aspirations of people in terms of wanting economic progress, a functioning healthcare system or political empowerment’ (2016). In the end, saving lives during a crisis must also be connected with the long-term expectations and aspirations of those served.

Integrated programming linked to future trends

Integrated programme design, and implementation, between emergency WASH and emergency health, nutrition, livelihoods, child protection, and education is a vital step towards integration between emergency WASH and development

given the future protracted crises linked to disease outbreaks, climate change, and food insecurities. Bridging gaps between sectors within the humanitarian silo is an essential step towards bridging the divide between humanitarian response and long-term development. This requires systematic alignment between organizations and governments so they can all work towards a shared vision for crisis response, recovery, and future resilience (Fischer, 2019). Successfully bridging these divides is also a vital principle of the 'do no harm' mandate as it allows for greater range and efficiency in programme implementation, allowing interventions to better reach the most marginalized populations with the least duplication. There is a unique window of opportunity to bridge these gaps as COVID-19 brings the value of effective WASH programming forward as a foundational part of long-term resilience building.

Integrated programme design frequently takes the form of shared, baseline studies, monitoring, and evaluation, and learning from outcomes between organizations, governments, and other partners who are all serving the same affected population. It is particularly important to work with local partners who can contextualize learning with programme design and implementation. Fanning and Fullwood-Thomas highlighted, 'this requires information-sharing, cross-fertilization of findings and the co-habitation of interventions, geographically, by organizations (or departments within organizations) delivering across the triple nexus, to build a holistic programme strategy based on high-quality analysis' (2019, 29). As crises grow in length and size, these integrated programme designs bring efficiency to humanitarian interventions allowing for reductions in monitoring and evaluation costs and increased ability to reach the most vulnerable populations.

Integration within the humanitarian silo is vital to the effectiveness of future crisis response; however, equally vital is integration between the humanitarian and development silos. Well-thought-through humanitarian programme design, especially in regards to monitoring, evaluation, and learning (MEL), along with strong coordination between organizations and government agencies, creates a perfect entry point for long-term development programmes to begin their work. Timothy Grieve suggested, 'A change in approach from delivering aid to ending need in fragile and conflict-affected contexts is a call to action that will ensure that humanitarian needs are met, and the effects of hazards are absorbed and reduced, and disasters prevented, while protecting and accelerating progress towards the SDGs for water and sanitation' (2019, 46). To indeed provide life-saving interventions as humanitarian works claim to do, we must start with a clear focus on the long-term developmental ends in mind.

Effective humanitarian/development integration should:

1. Jointly conduct and share needs assessments, monitoring and evaluation, and programme learning to reach a shared understanding of context and needs.
2. Coordinate programme design and implementation to reduce programme duplication and gaps in populations served.
3. Focus on ending need, not delivering aid.

The following are recommendations on how to integrate WASH with health, nutrition, livelihoods, child protection, and education:

- *WASH linked to health.* Effective health care requires safe, reliable WASH facilities to reduce the severity and spread of infections and diseases, especially diarrhoea and cholera. This is particularly true for children under the age of five and poses risks of malnutrition along with education and livelihood absenteeism if sustained. WASH linkages to health include:
 - Access to clean WASH is required for the proper function of health facilities. This is critically true for the treatment of cholera.
 - Lack of adequate WASH increases the spread and severity of disease and infections, particularly cholera.
 - Disease and infections decrease people's ability to obtain and carry clean water home.
 - Collaboration between WASH, nutrition, and health programming has a profound impact on children's future education and economic opportunities.
- *WASH linked to nutrition.* Inadequate WASH systems and practices have a profound impact on the nutrition and long-term health of children, especially those under the age of five.
 - Weak WASH systems lead to diarrhoea and intestinal worms and have a direct impact on the nutrition and wellbeing of children, especially of children under the age of five.
 - Sustained poor nutrition impacts people's ability to maintain economic opportunities.
- *WASH linked to food security and livelihoods.* Clean and reliable access to water decreases absenteeism and increases the time available for livelihood generating activities. Save the Children focuses on integration between food security and livelihoods and WASH as a means of reducing malnutrition and increasing the opportunity for economic growth.
 - Water is required for washing, cleaning, and cooking.
 - Large distances between safe water and sanitation facilities decrease the time available for livelihood activities.
 - Water and sanitation-related disease create absenteeism from livelihood opportunities.
 - WASH activities provide new livelihood opportunities for communities (job creation).
- *WASH linked to child protection.* Adequate access to WASH facilities critically decreases the risks to children, especially children under the age of five, girls, and those with disabilities. All children should have access to safe and reliable WASH services that reduce the risk of physical and sexual violence and have access to hygiene information and resources.
 - Children, especially girls, face an increased risk of physical and sexual abuse and rape while collecting water and using latrine facilities where available.
 - Children, especially those out of school, receive less hygiene education and are therefore, more vulnerable to diseases.

- Village and school groups/clubs are useful entry points for disseminating and discussing child protection issues.
- *WASH linked to education.* Safe and clean WASH facilities are the first step towards creating a healthy learning environment for children. These include gendered toilet facilities and handwashing stations. Schools also provide the best space to teach effective hygiene techniques for boys and girls, which will decrease illness and increase attendance.
 - Children, especially girls and those with disabilities, drop out of school due to inadequate WASH facilities.
 - Children, especially girls, drop out of school due to the need to collect water over large distances.
 - Water and sanitation infections cause school absenteeism that, if sustained, decreases future livelihood opportunities.
 - Schools are ideal locations to teach water, hygiene, and sanitation best practices.

WASH plays a vital role in reducing the risks of health, nutrition, livelihoods, child protection, and education in both humanitarian and development programming and in the lives of beneficiaries. As discussed in this paper, developing innovative means of implementing each of these integrated approaches is going to take significant changes in the way organizations think about and confront problems. However, an area where integration with WASH may be easiest to implement is in non-household settings, specifically temporary learning centres and health centres.

Integrated programming through non-household settings in alignment with the nexus

Non-household settings, particularly temporary learning centres (TLCs) and health care facilities (HCFs), are among the best opportunities for an integrated approach linking WASH with other sectors and with long-term development. Cronk et al. showed that inadequate WASH in TLCs and HCFs has a detrimental impact on the 'health, education, welfare, and productivity of populations, particularly in low- and middle-income countries' (2015, 694). WASH considerations in schools and TLCs create safe, hygienic spaces for girls, which increases attendance, and teaches hygiene techniques to boys and girls which decreases the spread of disease. SC focuses on integration within TLCs as a vital means to 'continue children's education and general socio-economic recovery' (2019, 18). Furthermore, discussing HCFs, Grunewald et al. indicated that 'inappropriate WASH management in health structures can lead to the rapid spreading of nosocomial diseases and difficulties in controlling secondary recontamination' (2019, 18). One of SC's WASH priorities is on HCFs as a means to prevent mortality and reduce morbidities across children and other affected populations (2019). TLCs and HCFs are the low-hanging fruit that provides a focused opportunity for the coordination of integrated WASH programmes that can impact the health, nutrition, education, safety, and economic future of men, women, boys, and girls.

One of the easiest ways to integrate programming in a way that increases communication between sectors and reduces costs is through shared monitoring and evaluation. Coordinated MEL that begins during humanitarian response with long-term development in mind can minimize unnecessary duplication in costs when new actors arrive by creating a more streamlined transition between implementors. This process Cronk et al. argued:

Include[s] the development of a monitoring framework for improving and expanding monitoring over time, developing setting-specific standards and guidelines, increasing the capacity of national level actors to monitor non-household settings, establishing clear roles and responsibilities for actors involved in monitoring, and translating monitoring data into actionable evidence for use by policy makers and service delivery providers (2015, 701).

Simply agreeing upon and sharing MEL measures across the nexus and between implementing organizations and sectors would help in creating a shared vision for further integration in the future.

Capacity building with TLCs and HCFs staff is another key area where effective integration can be achieved. Training staff to understand both sides of the humanitarian and development nexus, including funding structures, guiding principles, and measurement techniques, would allow staff to align their outputs with the broader goals of both humanitarian and development objectives. This would include training staff about the connections TLCs and HCFs each have on health, nutrition, livelihoods, child protection, and education as well as training on how these non-household settings can be utilized to impact people across all these sectors.

Recommendations

Programme success in the future is going to hinge on organizations as well as between organizations' ability to integrate and coordinate their effort across sectors and across the humanitarian and development divide. In alignment with the Global WASH Cluster's road map for 2020–2025, 'The WASH sector should harness the momentum created by the nexus to reduce risk and vulnerability, increase resilience and advocate for sustained development, particularly for those affected by crises' (2019, 19). It is vital that we break down the siloed, business as usual approach and create the necessary integration that bridges the gaps between humanitarian assistance and international development. Recommendations are divided into the following, although not necessarily exclusive, categories, namely training/capacity development, funding, advocacy, and MEL.

Training/capacity development

Changes in the way humanitarian and development organizations and staff think about and address current and future crises is necessary. Especially with the onset

of COVID-19, there is a clear opportunity to link WASH with the health response and a need for a stronger plan to connect the humanitarian response to long-term resilience goals. Development organizations should:

- Adjust educational training for the new generation of WASH practitioners as well as internal training along with organizational and system structures and external recruitment to develop and attract a broad range of new skills over the humanitarian and development divide that foster innovative use of various skills, including GIS, AI, big data, adaptability, creativity, and coordinated communication across the humanitarian and development divide, to change the way we think about and respond to emergencies.
- Develop a clearer picture of organizations' strengths and weaknesses, as well as the strengths and weaknesses of other organizations to foster a proactive coordination between actors.
- Develop 3–5-year master plans for each humanitarian WASH response, which clearly articulate how programmes will connect and transfer to development outcomes, aimed at reducing future need. This will include a master plan for the unique future threats of disease outbreaks, climate change, urbanizations, population growth, and protracted crises and a clear plan to develop new skills and competencies needed to adapt to these changing needs.

Funding

Further restructuring the current funding system is essential to adapting WASH response to current and future crises. This will require thinking differently and stepping away from easy and often over-competitive funding streams and reaching for innovative investment sources. Development organizations should:

- Develop and recruit staff who can navigate the complexities of new investment tools, including: impact investing, blended financing, and development impact bonds. This will require business expertise alongside a deep understanding of the humanitarian and development sector to successfully merge these opportunities.
- Advocate for an increase in WASH funding, especially humanitarian WASH funding. COVID-19 provides a unique opportunity to connect integrated WASH programming with the multi-sectoral nature of effective infectious disease response, which can be utilized to highlight the value of increased WASH investment and integration.
- Call on governments and officials to be more purposeful in WASH investment, better utilizing funding tools such as tariffs and taxes to invest in infrastructure, to reduce instability and increase the incentives for private sector investment.
- Join the call for funding agencies, governments, and private partners to restructure humanitarian funding into multi-year appeals that allow for a purposeful integrated response to WASH programming, and allow for a smoother transition to long-term development.

Advocacy

Creating a unified focus for humanitarian and development interventions, and the value integration brings to programme design and response is vital to creating the impact current and future crises require. Development organizations should:

- Innovate and integrate across sectors and silos as a means to create a clearer focus on ending need.
- Especially in response to COVID-19, create integrated preparedness plans that focus on connecting WASH with health, nutrition, livelihoods, child protection, and education, articulating a seamless transition between humanitarian response and long-term development. This will likely require some level of organizational restructuring to effectively build short-term action that is focused on a clear long-term vision.
- Coordinate with other humanitarian and development organizations to reduce duplication and gaps in services. This will require building bridges between actors, sectors, and silos, especially in areas such as outbreaks, climate change, food security, peace, and security.

MEL

MEL is an ideal low-hanging fruit for integration. Development organizations should:

- Create a master plan to jointly coordinate and share baseline studies, MEL outcomes, and indicator design to reduce gaps and duplication in services rendered, and improve the efficiency and effectiveness of aid.
- Develop a MEL system with indicators along the humanitarian and development spectrum around integrated WASH programming that would be monitored by global, regional, and national WASH cluster and be coordinated by the entity within the Global WASH Cluster as a means of gathering relevant data and thereby evidence on this type of programming.

Closing remarks

This paper looks at the challenges and opportunities in the coming years and the vital role integrated WASH can play in the humanitarian-development nexus. The COVID-19 outbreak is a wake-up call for us all. It is our aspiration that some of the critical reflections in this paper will stimulate a call to action for current as well as the next generation of WASH professionals, organizations, and funders to strengthen collaboration across the humanitarian and development nexus.

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