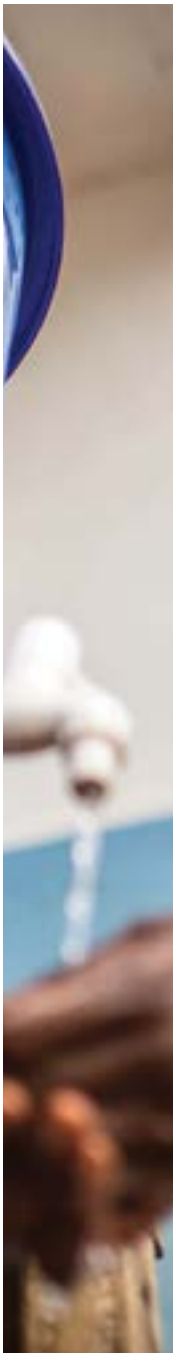
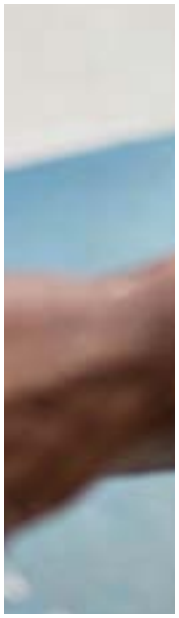
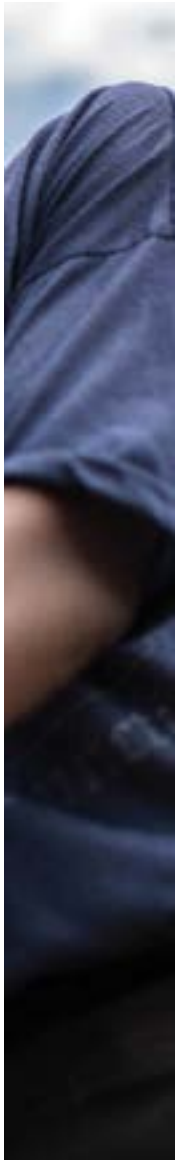
THE ALLIANCE
FOR CHILD PROTECTION
IN HUMANITARIAN ACTION







GUIDANCE NOTE: PROTECTION OF CHILDREN DURING INFECTIOUS DISEASE OUTBREAKS

The Ebola epidemic, which was declared over in Liberia for a third time in January 2016, hit the West African nation the hardest with 4,800 deaths, and ravaged its under-resourced, fragile health system. Photo courtesy of Plan International.

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Acknowledgements

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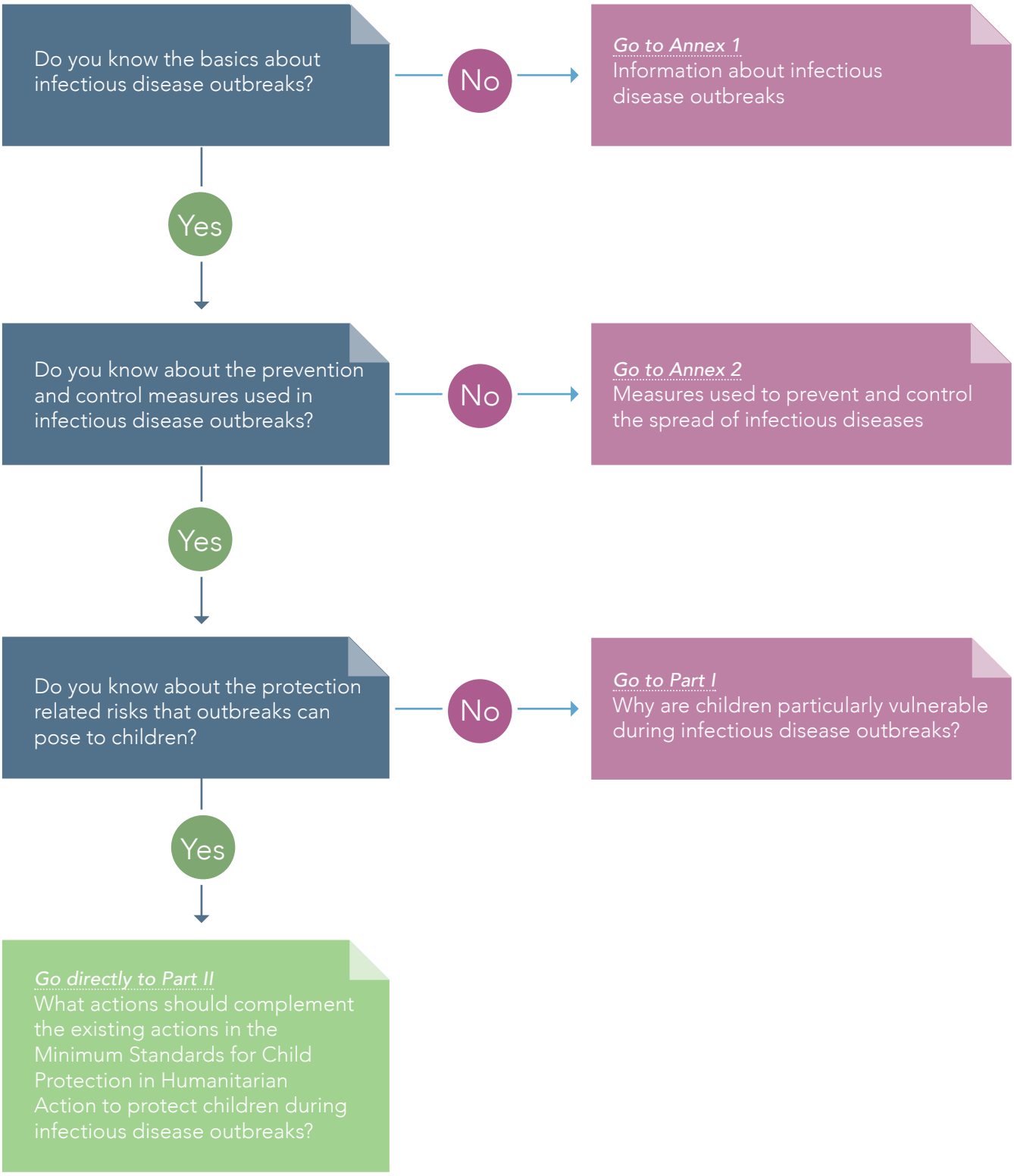
Flowchart

The flowchart is designed to help you navigate this Guidance Note. Answering the questions in dark blue will highlight which sections of the Guidance will be most relevant for you to review.



Acronyms

CDC	Centres for Disease Control and Prevention, USA
CFS	Child Friendly Spaces
Co-V	Coronavirus
EDV	Ebola Virus Disease
ETU	Ebola Treatment Unit
FTR	Family Tracing and Reunification
HEPI	Health Emergency Preparedness Initiative
HIV	Human Immunodeficiency Virus
IASC	Inter-Agency Standing Committee
ICC	Interim Care Centre
ID	Infectious disease
IFRC	International Federation of the Red Cross
IHR	International Health Regulations
L3	IASC Level 3 emergency
MHPSS	Mental Health and Psychosocial Support
OICC	Observation Interim Care Centre
PHEIC	Public Health Emergencies of International Concern
PPE	Personal Protective Equipment
PSS	Psychosocial Support
SARS	Severe acute respiratory syndrome
SOP	Standard Operating Procedures
UNISDR	United Nations Office for Disaster Risk Reduction
WHO	World Health Organization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Introduction

RATIONALE

There has been an increase in frequency of infectious disease outbreaks worldwide over the past 40 years.[1] Globalisation and the related increased movement of people and goods between countries and across continents have increased the potential for infectious diseases to spread quickly around the world.[2] Even though progress has been made in the prevention, surveillance and treatment of diseases, infectious disease outbreaks remain a major public health concern.[1(p5)]

Infectious disease outbreaks may arise during a humanitarian crisis or may themselves constitute a humanitarian emergency, defined by the United Nations Office for Disaster Risk Reduction (UNIDSR) as a hazardous event that causes widespread human, material, economic or environmental losses that exceed the ability of the affected community or society to cope using its own resources.[3] As of December 2016, the IASC has widened the activation criteria for Level 3 (L3) emergencies to include infectious disease events.[4] An L3 emergency is the classification for a severe, large-scale, sudden-onset humanitarian crisis that requires system-wide mobilisation to scale up a humanitarian response and improve overall assistance.

Children in particular are vulnerable during infectious disease outbreaks for a variety of reasons. Beyond the immediate impacts on their health and that of their caregivers, the social and economic disruptions caused by outbreaks also present risks to children's well-being and protection. Experience from recent outbreaks, including the 2016-17 cholera outbreak in Yemen and the 2014-16 Ebola Virus Disease (EVD) epidemic in West Africa, have shown that infectious disease outbreaks pose distinct challenges to traditional child protection responses, which have historically been grounded in contexts of armed conflict and natural disaster. Humanitarian responses to recent infectious disease outbreaks have also highlighted the existing gap in available guidance to support child protection responses in public health emergencies.

AIMS AND AUDIENCE

This Guidance Note aims to provide humanitarian child protection practitioners, particularly child protection advisors and program managers, with guidance on how to engage in responses to infectious disease outbreaks to ensure children's protection needs are taken into account in preparedness for, and during responses to, the outbreaks. The Guidance Note draws upon lessons learned during infectious disease outbreaks globally in a variety of contexts.

STRUCTURE

This Guidance Note is divided into two parts:

Part I Explains why children are particularly vulnerable during infectious disease outbreaks, describing their **specific susceptibilities to infection**, the **disruptions outbreaks can cause to their environments** and the **protection risks** that can arise during outbreaks.

Part II Describes recommended **preventive and responsive actions** to complement existing actions in the *Minimum Standards for Children Protection in Humanitarian Action* (2012) to guide practitioners.

Previous Page: Staff from Plan International Brazil have been busy working with the national government and local authorities to tackle the spread of the Zika virus. A lot of this work is about raising awareness and ensuring children and their families have the resources and information they need to be able to stop the spread of the mosquitoes that carry the virus. No community action would be complete, however, without the involvement of children. Photo courtesy of Plan International / Brazil.

1.

Why are children particularly vulnerable during infectious disease outbreaks?

Children are particularly vulnerable during infectious disease outbreaks for three main reasons:

1. Children have **specific susceptibilities to infection** during infectious disease outbreaks.
2. Infectious diseases can **disrupt the environments in which children grow and develop.**
3. Measures used to prevent and control the spread of infectious diseases can expose children **to protection risks.**

"Gender can add an additional layer of susceptibility to infection. Females are suggested to be disproportionately exposed to directly transmitted infectious diseases due to their traditional roles as caregivers."

1. CHILDREN'S SUSCEPTIBILITY TO INFECTION

Children's susceptibility to infection during infectious disease outbreaks is influenced by a number of factors related to their developmental stage, their evolving capacities and their dependence on caregivers.[1] These include:

- Children have unique exposure pathways that adults do not have, including in utero exposure, exposure during delivery and exposure through breast milk.[5] Children are also more prone to putting things in their mouths and by so doing increase their exposure to infectious agents transmitted through the faecal-oral route.
- Children, especially those under five years of age, seek close proximity to caregivers and family members, increasing their risk of exposure if they fall ill.[6]
- Children are less likely to adhere to some behavioural and hygienic practices such as routine hand washing that prevent, or reduce the risk of, infection due to their age, maturity and evolving capacities.[7] Messages about health promoting behaviours are also most often targeted at adults.
- Children's immunologic defence is generally lower than adults since their immune systems are still developing.[8] In addition, children's central nervous, reproductive, digestive, skeletal, muscular, endocrine and other systems are also still developing and so infectious diseases can have long-term consequences for children into adulthood.
- Due to their nutritional requirements, children are at greater risk of malnutrition than adults, which increases their risk of infection for a number of diseases.[9–12]
- Immunisations are not all available for all age groups. The WHO-approved oral cholera vaccine Dukoral, for example, is only licensed for children above the age of two years, and the vaccines Shanchol and mORCVAC are only recommended for children above two years.[13]
- Gender can add an additional layer of susceptibility to infection. Females are suggested to be disproportionately exposed to directly transmitted infectious diseases due to their traditional roles as caregivers.[14,15] During the West African EVD outbreak, for example, adolescent girls assumed responsibility for caring for caregivers and siblings who had fallen ill putting them at greater risk of disease.[6,16]

There are notable differences in the incubation periods, symptoms and periods between symptom onset and death in children and adults for many infectious diseases.[17–19] In some contexts children have a higher burden of disease and higher case fatality rates,[20–22] while for other diseases children have notably lower-case rates.[23]

Previous Page: Photo courtesy of Terre des hommes / Olivier Girard / Burkina Faso 2016.

1 For more information about infectious diseases outbreaks and how diseases are transmitted, see Annex 1. For specific information about different individual infectious diseases, see Annex 3.

2. OUTBREAKS DISRUPT THE ENVIRONMENTS IN WHICH CHILDREN GROW AND DEVELOP

Disruptions caused by infectious diseases

Infectious disease outbreaks can disrupt the environments in which children grow and develop. The disruptions can be caused directly by individual infectious diseases and by measures taken to prevent and control the infectious disease outbreak.

The social ecological model is useful to help to illustrate the impacts infectious diseases can have on children and their environments. As figure 1 illustrates, children generally grow and develop within family and friendship circles that are nested within communities. Disruptions to families, friendships and the wider community can have detrimental consequences for children's well-being, development and their protection.

Families

Infectious diseases can have short and long-term effects on family composition and functioning. Since children, especially younger ones, are reliant on their caregivers for providing nurture, care and protection and for meeting their basic needs, these changes pose salient risks to their well-being and development.

Disruptions to family structure

During infectious disease outbreaks, caregivers may be unable to provide attentive care to their children due to illness, death or for other reasons such as psychological distress. Reduced parental supervision can leave children more vulnerable to violence, exploitation and abuse.

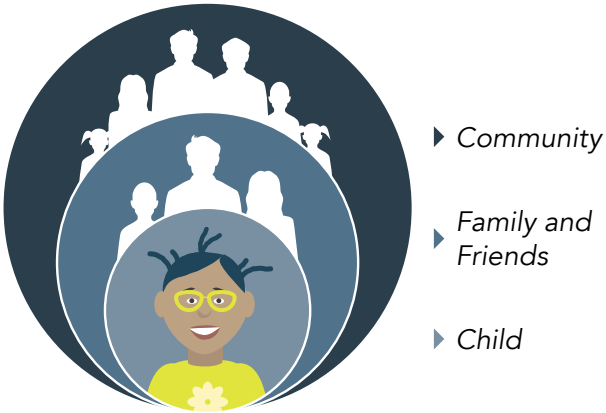


Figure 1: Children's social ecologies

The absence of responsive care may also activate a child's stress response system, as it signals a threatening situation to the child. Prolonged exposure to stress can influence children's biological systems to become hyper-responsive to stress.[24] Whereas exposure to low and moderate levels of stress are promotive of healthy child development, levels of stress that are too "strong, frequent or prolonged" can become toxic for children, particularly when they do not have supportive relationships to buffer the effects.[24(p236)] In extreme cases, neglect, or the persistent absence of responsive care, can disrupt the development of children's brain architecture with long-term consequences.

Family structure may also be changed by deliberate actions on behalf of caregivers, such as sending their children away to non-affected areas to stay with extended family or friends with the hope of keeping them safe. Children displaying symptoms of the disease may also be abandoned by their caregivers for fear of transmission to family members, social stigma associated with the disease or because they are unable to afford the cost of treatment.[25] Accounts from frontline workers during the EVD epidemic in Liberia suggest that some caregivers did not visit their sick children in treatment centres or return for them after they had recovered, and in some instances extended family members rejected child survivors and children whose caregivers had died.[26] In both cases, the decision to abandon the child stemmed from the families' fears of being shunned by their communities.

Disruptions to family income

Infectious disease outbreaks can also have a devastating effect on family functioning by limiting sources of income of family members due to illness, due to the need to care for sick family members, or by increasing household expenditure for healthcare. During an outbreak of Chikungunya in Orissa, India in 2006, for example, a study showed the catastrophic nature of household out-of-pocket expenditure for health care, which challenged families' means of subsistence.[27] The effects of this loss of income can have immediate and longer-term consequences for the access of family members, including children, to adequate nutritious food, health care, and other basic needs.[28]

Friendships

Beyond the family, children's relationships with their friends can also be disrupted due to an infectious disease. Children may be too sick to play with peers or their friends may fall ill. Social interactions children have with peers play an important role in children's social development. As children grow, the social competencies they require are learned through interactions with their peers and others.[29] Moreover, the play that children engage in when with friends is known to improve children's cognitive, linguistic and social-emotional skills.[30] During the EVD epidemic in Sierra Leone, children reported feeling sad, lonely and lost without the camaraderie of their peers.[31]

Communities

At the community level, infectious diseases can disrupt productivity, social relations between community members and the cultural way of life.[32] When community members fall ill, their ability to contribute to the workforce reduces, as does their social and civic engagement. For pastoralist societies that rely on livestock as a source of subsistence, zoonotic diseases such as Rift Valley Fever (RVF), present threats to the livelihood and way of life of whole communities.[33] In Tanzania, for example, the impacts of a RFV outbreak in 2007 included the stigmatisation of affected communities for having lost "respect and dignity".[33(p319)] Infectious diseases have also been shown to have a psychological impact on community members who are not infected with the disease and who do not have infected family members. In the case of the SARS outbreak in Singapore in 2003, the outbreak was suggested to have a psychological impact on healthy community members, fostered by anxiety and fear of infection.[34] All of these community-level impacts affect children.

Below: Photo courtesy of Terre des hommes / Will Baxter / Burundi 2016.

3. MEASURES USED TO PREVENT AND CONTROL INFECTIOUS DISEASE OUTBREAKS CAN PRESENT RISKS TO CHILDREN

Measures taken by public health and medical professionals to prevent and control the spread of the disease during infectious disease outbreaks are important and necessary to reduce the disease burden and the risk of infection. (For more information on the different types of preventive and control measures used for different infectious diseases, see Annex 2.) While the benefits of commonly adopted public health interventions outweigh the risks, a number of these measures can also present risks to children that are not directly associated with the intervention, including in the area of child protection. By highlighting the potential child protection risks these measures can present, the aim is to identify ways potential unintended harmful impacts can be mitigated.

PREVENTIVE MEASURES

Preventive measures to stop new infections include immunisations, and educational and environmental measures. Although these measures safeguard against infection, they may simultaneously pose risks to children's protection and well-being.

Immunisation

- During immunisation campaigns, some of the most vulnerable children may not be reached – such as children living on the streets in urban centres, and those living in remote rural areas.[35] In order to address this mobile phone technologies have been trialled in Bangladesh, for example, to improve vaccine coverage among these hard-to-reach populations.[36]

Educational measures

- During awareness raising campaigns, messages developed to raise awareness about the disease, modes of transmission, and/or behaviours to reduce the risk of transmission may be misunderstood or they may lead to stigmatisation of at-risk groups. Additionally, the content of awareness raising initiatives, together with the manner in which such messages are disseminated, are often not tailored to children and young people. Not understanding the messages correctly can induce panic and psychosocial distress amongst children.

"While the benefits of commonly adopted public health interventions outweigh the risks, it is important to consider the child protection risks that may emerge from the measures."

Environmental measures

- Environmental measures taken to prevent the spread of diseases, such as vector control, may not protect persons against infection as they may be misused for a variety of reasons. For example, in Lake Victoria, Kenya, insecticide-treated bed nets that had been distributed to reduce malaria prevalence (especially amongst children below five years of age), were instead used to dry fish as parents were not convinced about their effectiveness to combat malaria.[37] As a result, children did not benefit from this preventive measure, and their susceptibility to malaria remained unchanged.

CONTROL MEASURES

In order to control the spread of an infectious disease, measures that are commonly enacted include social distancing interventions such as quarantine and isolation, and the treatment of the disease.[38] These measures can also present risks to children.

Treatment

- During treatment, caregivers may be unable to provide attentive care to their children due to their own hospitalisation or that of their other children. Moreover, where family details of the caregiver being treated are not collected, this can present difficulties in identifying surviving children in the event that the caregiver dies, and ensuring alternative care arrangements are put in place.
- Health facilities providing treatment to children may not have child friendly services that aim not only to treat children medically, but that are also attuned to children's developmental and psychosocial needs.[39]
- Children may not receive timely treatment due to the lack of available treatment for children or delays in recognising and diagnosing a disease. This is often due to difficulties in detecting signs and symptoms of disease in children, especially in new-borns, infants and younger children.
- Health facilities may not have the specialised training, medical supplies and equipment required for the clinical care for children, especially critical care for severely ill patients.

Above: Kadan Abdi Jama and her son, Abdirahman Saed (one year and eight months old) stand in front of the cholera treatment unit's female ward. In May 2017, the Somali Red Crescent, Canadian Red Cross and Norwegian Red Cross deployed a cholera treatment centre in response to rising cases of acute watery diarrhoea/cholera in Somaliland. The Red Cross and Red Crescent movement took a critical leading role in controlling the outbreak and bringing cases down from 200 patients per day during the peak in June to five - six cases a day as of October 2017. Image courtesy of the International Federation of Red Cross and Red Crescent Societies (IFRC) / Somaliland 2017.

- Health facilities providing treatment may not have care provisions in place for children accompanying patients. In Yemen during the cholera outbreak in 2017, for example, children who accompanied their sick caregivers to cholera treatment centres were at times left alone to sleep outside on the veranda while their caregivers were admitted for treatment. This unsupervised arrangement exposed children, especially girls, to risks of harassment, sexual violence and abuse.[40] Caregivers who arrived at treatment centres with other family members were able to address this risk by ensuring the supervision of their children while they were receiving treatment.
- Treatment provided for a specific infectious disease might overshadow other treatments required by the population, including by children with disabilities or chronic illnesses. During the EVD epidemic, for example, instances of preventable morbidity and mortality amongst children and pregnant women were documented.[41] This was partially attributed to health facilities directing their focus predominantly towards the treatment of EVD.[31]

Isolation

- During admission to designated isolation units, caregivers will be unable to provide attentive care to their children. Similarly, when children are isolated, they are often unable to receive nurturing care from their caregivers.
- During isolation, children in many instances do not have access to cognitive or social stimulation offered by education and through socialising with peers.
- Patients who have been isolated risk becoming stigmatised. During the MERS outbreak in Qatar, for example, the fear of social stigma was also shown to be a reason for patients not being compliant with medical isolation.[42]
- Isolation has been shown, in some instances, to impact upon the mental health and well-being of patients, including increasing depression and anxiety.[43,44]
- Isolation units can be misinterpreted by community members to be places where people go to die alone, as was the case initially with the Ebola treatment units in Liberia. This can lead to suspicion of health facilities and a resistance toward voluntary admissions.[45]

Above: Razafino Mensanahary, 23, a Malagasy Red Cross volunteer gets ready for an emergency evacuation of an infant plague suspect. Image courtesy of the International Federation of Red Cross and Red Crescent Societies (IFRC) / Maria Santto / Madagascar 2017.

Quarantine

Home-based quarantine

- Home-based quarantine is a social distancing measure used to reduce exposure to infection. When home-based quarantine is targeted at children, for example during the 2009 H1N1 influenza pandemic in Victoria, Australia, this can have unforeseen financial implications for households as caregivers are required to take time off to care for their children.[46]
- Home-based quarantine can have psychological impacts on individuals. In response to the SARS outbreak in Toronto, Canada in 2003, for example, persons quarantined at home showed heightened levels of anxiety and depression, describing feelings of uncertainty, rejection, boredom, isolation, frustration and worry amongst others.[47–49]

Facility-based quarantine

- During facility-based quarantine, caregivers may be unable to provide attentive care to their children due to their own quarantine in facilities or that of their children.
- Facilities for quarantining individuals may not have services in place tailored to the specific needs of children, including opportunities for cognitive and social stimulation.
- For children admitted into quarantine facilities, the child's family information may not always be registered, making it difficult to contact and reunite the child with his/her family once s/he is ready to leave the facility. In Liberia during the EVD epidemic, for example, children placed in the Observation Interim Care Centres (OICC) for 21 days of observation did not always know whether their caregiver had survived Ebola, or where their caregivers were being treated.[25]

Zone-based quarantine (village or community level quarantine)

- Quarantine imposed on whole villages or communities can be successful in limiting the spread of infection, but can simultaneously limit the ability of family members to work, to engage in agricultural activities and to access markets due to the restrictions on movement.[50] During the EVD epidemic in Sierra Leone, this family-level financial impact presented particular protection risks for children, including the engagement of adolescent girls

in transactional sex to supplement household incomes.[51]

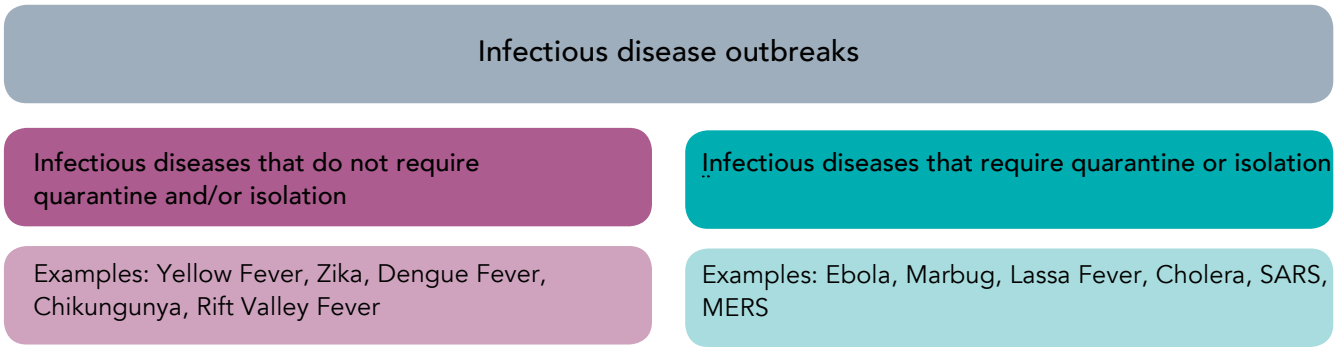
- Community level quarantine may include the closure of schools when there are concerns about the spread of infection through schools. This necessarily impacts upon children's access to education and socialisation with their peers.[52] In Guinea, Liberia and Sierra Leone, for example, an estimated 5 million children did not go to school during the EVD epidemic due to school closure.[53] It was noted that children's well-being suffered due to their inability to engage in normal activities such as playing, being with other children and learning, as well as reduced parental supervision and care.[51]
- Community level quarantine can be a cause of prolonged family separation when caregivers and children find themselves in different locations at the time that village and/or district level quarantine measures are imposed, and are unable to reunite until the quarantine measures are lifted.[51]
- Community level quarantine can impact upon the availability of, and access to, health and civil registration services. A sharp decline in birth registrations, for example, was noted during the EVD outbreak in Sierra Leone between 2014 and 2015, where an estimated 700,000 children were not registered during this period.[54] Although it is not possible to attribute this decline solely to quarantine measures, they are thought to have played a role.
- Where community level quarantine measures are enforced but not well understood by community members, this can create fear and panic. During the EVD epidemic in Liberia, for example, measures imposed resulted in an increase in stigmatisation, a disruption of existing social networks of solidarity and a lack of compliance with the quarantining measures.[55]

WHICH PREVENTION AND CONTROL MEASURES ARE USED IN WHICH INFECTIOUS DISEASE OUTBREAKS?

Prevention and control measures are designed to stop the spread of infection. Different measures are thus required for different infectious diseases, depending mainly on how the diseases are transmitted.

Broadly speaking, two main categories of diseases can be described – those that require quarantine and isolation, and those that do not require quarantine and isolation. This is because measures including immunisations, educational and environmental measures and treatment are relevant, but quarantine and isolation measures will only be used in outbreaks where diseases are highly contagious, and transmitted directly from person to person. Figure 2 below illustrates these two categories with examples.

Figure 2: Types of infectious disease outbreaks



Bringing together the content of Part 1, below is a table summarising the main protection risks for children that may arise during infectious disease outbreaks. These include protection risks presented by the disease itself, as well as protection risks that can inadvertently arise from measures taken to prevent and control further spread of the disease.

Table 1: A summary of the protection risks for children that can arise in infectious disease outbreaks

CHILD PROTECTION ISSUE	RISKS PRESENTED BY DISEASE	RISKS PRESENTED BY PREVENTION AND CONTROL MEASURES	
		INFECTIOUS DISEASES THAT DO NOT REQUIRE QUARANTINE AND ISOLATION	INFECTIOUS DISEASES THAT REQUIRE QUARANTINE AND ISOLATION
Separation of children from caregivers	• Death or disability of caregiver • Children sent away by parents to stay with other family in non-affected areas	• Hospitalisation of caregiver or child for treatment	• Isolation of caregiver or child • Community level quarantine imposed while family members are apart • Abandonment of children after they have received treatment or have been quarantined
Psychological distress	• Fear of infection with the disease • Stigmatisation of individuals infected with, or suspected to be infected with, the disease • Death or illness of family, friends and neighbours	• Hospitalisation of caregiver for treatment	• Hospitalisation of caregiver for treatment • Isolation in insolation units and home-based quarantine can leave children feeling anxious and lonely, particularly if they cannot be physically comforted or play with their friends • Community-level quarantine measures can create fear and panic in the community • Personal protective gear worn by health workers can appear alien and be frightening
Sexual violence	• Death or illness of caregiver reduces family protection	• Lack of supervision for children when caregivers are hospitalised	• School closure and/or reduced access to sexual and reproduction health information and services can lead to increased risky behaviour • Reliance on outsiders to transport goods and services to the community, who may prey on children's reduced supervision or demand sex in return for assistance • Increased obstacles to reporting incidents of sexual violence

CHILD PROTECTION ISSUE	RISKS PRESENTED BY DISEASE	RISKS PRESENTED BY PREVENTION AND CONTROL MEASURES	
		INFECTIOUS DISEASES THAT DO NOT REQUIRE QUARANTINE AND ISOLATION	INFECTIOUS DISEASES THAT REQUIRE QUARANTINE AND ISOLATION
Child labour	• Loss of household income due to death or illness of caregiver	• Loss of household income due to death or illness of caregiver increases the risk of child labour and – for girls in particular — transactional sex • Disruption of livelihood, which in turn encourages girls to engage in transactional sex	• Loss of household income due to isolation or quarantine measures can increase children's risk of engagement in hazardous labour and transactional sex
Social exclusion	• Social stigmatisation of individuals infected or of individuals suspected to be suspected	• Social stigmatisation of individuals receiving treatment or those suspected of being infected • Social stigmatisation of 'at-risk' groups targeted by awareness raising campaigns	• Social stigmatisation of individuals who were in quarantine or treatment • Social stigmatisation of 'at-risk' groups targeted by educational materials • Disruption to birth registration processes due to quarantine
Neglect	• Death or illness of a caregiver • Abandonment due to fear of transmission	• Children may not receive consistent levels of social and/or cognitive stimulation during the period of illness	• Isolation or quarantining of caregivers away from their children • Isolation or quarantining of children without social and/or cognitive stimulation • Closure of schools and other facilities
Physical violence	• Loss of household income due to death or illness of caregiv-er increases family tensions and risks of domestic violence • Fear of transmission, the need to care for sick family members or parental inability to cope with children's psychosocial distress	• Lack of supervision for children whose caregivers have been hospitalised	• Household and community quarantine measures can lead to tensions between caregivers and children in the household, resulting in increased parental frustration and corporal punishment • Increased obstacles to reporting incidents of physical violence

2.

Umaru, 12, years old, from Moyamba district, Sierra Leone. "One day I will be a doctor because I want to help my family, the country, some of my friends, as well as my mother and my grandmother. Some day, if they are not well, but I am educated, I will help them so much. When my father got Ebola, he said his head was aching, so he went to the hospital first. They said he had Ebola, so they referred him to the Ebola treatment centre."
Image courtesy of Plan International / Sierra Leone.

What actions should complement the existing actions in the *Minimum Standards for Child Protection in Humanitarian Action* to protect children during infectious disease outbreaks?

Humanitarian responses to infectious disease outbreaks necessarily need to first and foremost focus on preventing and controlling disease transmission. In doing so, responses should take into consideration the consequences of outbreaks on children, their families and communities. There is a need, in particular, to consider the unique ways in which outbreaks, and ensuing measures to prevent and control the spread of disease, pose threats to children's well-being and protection.

This section identifies how we can ensure that the protection of children is a key component of the responses to infectious disease outbreaks in humanitarian crises. To this end, activities that are required to prevent and respond to different child protection needs that can arise during an infectious disease outbreak are identified and described below. *The Minimum Standards for Child Protection in Humanitarian Action* are used as a frame and only actions that **complement existing actions in each standard** are included. All of the 26 minimum standards were not included below, only those that require complementary actions during an infectious disease outbreak.

Reference is made to two broad types of infectious disease outbreaks: those that require quarantine and/or isolation and those that do not. Where special considerations are needed for infectious diseases that require quarantine and/or isolation, these actions are specified.

MINIMUM STANDARDS TO ENSURE A QUALITY RESPONSE

1 STANDARD 1: COORDINATION

Preparedness Actions

- Ensure child protection actors are engaged with preparedness efforts in-country for potential infectious disease outbreaks led by health actors. During the preparedness planning, ensure due consideration is given to child protection risks that may arise from the disease and from preventive and control measures, and identify mitigation measures.

Response Actions

- Recognise that the cluster approach or refugee coordination model may not be employed in infectious disease outbreak responses and identify existing coordination mechanisms that can incorporate child protection response actions. It may be necessary to engage with multiple coordination groups.

> The UN Security Council determined the EVD epidemic in West Africa to be a "threat for international peace and security" in September 2014 and established the first ever UN emergency health mission, the UN Mission for Ebola Emergency Response (UNMEER). UNMEER supported a coordination model based on four pillars – case management, case finding and contact tracing, safe and dignified burials, and social mobilisation – that was unlike the cluster approach or the refugee coordination model used in other humanitarian crises.56 Instead of having a separate child protection sub-cluster, child protection actors coordinated response efforts through all four pillars of the response.

- Where infectious disease outbreaks occur in failed states or states affected by armed conflict, humanitarian actors may need to coordinate with non-state actors, in line with agreed protocols and precautionary measures.

> In Yemen, child protection actors responding to the cholera outbreak in territory held by non-state armed groups were working with health and social work ministries established by a shadow government. While not part of a legitimate, internationally recognised government, these ministries were to some extent operational, and humanitarian actors required their buy in and participation to act. Concurrently, humanitarian actors had to maintain contact with the deposed central government that, although not operational in some of the cholera-affected areas, was internationally recognised as the legitimate government.

- Where a coordination mechanism exists, designate a child protection focal person to participate in health sector working group meetings as required, and request the health sector to designate a focal person to participate in relevant child protection working group meetings.
- Work with the health sector to develop and disseminate Standard Operating Procedures for identification and referral of vulnerable children, including in health centres.
- Within the child protection sector, appoint geographical or thematic child protection focal points, representing, for example, affected districts or key child protection concerns, and share their contact information with health sector counterparts.

In addition, for infectious diseases which require quarantine and/or isolation:

- Promote close coordination between agencies managing treatment and observation or quarantine centres, with particular reference to standardising the documentation of cases (including age, sex and disability disaggregated data), in order to identify individuals with protection concerns.

1 For more information on diseases that require quarantine and isolation, please refer to Figure 2 and Annex 3.

Above: Many women come to this creek, filling one or two buckets and drinking as much as they can while they are here. One of them explains: "We don't have hand pumps to gather water. The only two that were functional here dried up during the dry-season. Water is very scarce, and it is very far to get to the creek. We know this creek water is not safe for drinking, but it is the only water we have for now." Image courtesy of Plan International.

In Liberia, different agencies managed the EVD observation centres and treatment centres. There were inadequate communication and coordination mechanisms in place. As a result, movement of patients between centres was not well recorded, nor were patient histories, including details of caregivers whose children had been admitted to care centres, and details of extended family members.[25]

Mother-of-six Cira Santos has been learning how to stop mosquitoes from breeding — Brazil. Photo courtesy of Plan International / Brazil.

2 STANDARD 2: HUMAN RESOURCES

Preparedness Actions

- At the global level:
  - Ensure child protection is integrated into the HEPI tools across all priority diseases.
  - Establish and maintain an inter-agency database of standby personnel with expertise in child protection and experience of working in infectious disease outbreaks, in order to expedite recruitment and deployment processes.
  - Expand current child protection in emergencies trainings for standby roster members and child protection specialists to include information on the unique child protection needs and priority actions in infectious disease outbreaks, and ensure that eligible participants are added to the global inter-agency database and/or standby pool.

> Staffing humanitarian responses to infectious disease outbreaks can be a challenge as often under resourced and weak health systems contributed to the rise of the epidemic in the first place.[57] In the case of the EVD epidemic, years of civil war in Liberia and Sierra Leone had devastated existing health systems. In this environment, recruiting sufficient staff was difficult for three main reasons: funding, identification of sufficiently experienced experts and assurances for incoming staff on safety (i.e. medical evacuation, special treatment facilities, etc.). Surge deployments were used to address some of the challenges with international recruitment. UNICEF, for example, deployed a total of 714 people to the EVD emergency. UNICEF Liberia, Sierra Leone and Guinea requested 67 Child Protection Specialists, and 56 were deployed."[53(p57)]

Response Actions

- Consider the mental health and psychosocial support needs of all staff, especially frontline workers, and how they may be specifically affected as a result of their involvement in responding to the infectious disease outbreak. Ensure that appropriate in situ and remote psychosocial support is available, and provide regular opportunities for staff to participate in creative activities, individual counselling and/or guided group discussions.

3 STANDARD 3: COMMUNICATION, ADVOCACY AND MEDIA

Preparedness Actions

- Identify key actors who can support communication on child protection issues, including local journalists, community health workers, community members and local community groups, and strengthen their capacities to do this in the context of infectious disease outbreaks.
- Ensure that policies and processes for communicating on all outbreak-related issues, including those involving children, are coordinated between agencies and across sectors.
- In collaboration with partners, authorities and other child protection actors, identify key child protection messages (including on child protection risks and mitigation measures, how the disease is spread, how to reduce the risk of infection, how to recognise signs and symptoms of disease, where to take children who present with symptoms, and what to do with children if the primary caregiver is unwell) and develop a common dissemination strategy.
- Ensure messages consider age-appropriateness and are informed by an understanding of sociocultural conditions and behavioural determinants related to knowledge and perceptions of the disease, its prevention and control measures, and care seeking patterns.
- Engage well-known local artists, such as singers, comedians, television and film stars and radio personalities, in creating positive, contextualised, educational and awareness raising messages that draw on popular local modes of communication, including song and theatre.

Response Actions

- Recognise that messages aimed at adults will be seen and heard by children, who may not be developmentally or emotionally ready to understand their content. Work with other sectors to ensure that lifesaving messages – even those that are aimed only at adults – are phrased in a manner that avoids causing undue distress to children or their caregivers.

Messages disseminated during the EVD outbreak stating, "Ebola Kills" induced panic in adults and children alike. People felt hopeless, afraid, and powerless to avoid the disease. The perception that death was inevitable and imminent discouraged compliance with safe practices, led to heightened feelings of fear among children.[53]

- Ensure that protective messages are designed to respond to the risk factors for children of both sexes and of different ages, in a manner that is child-friendly and culturally sensitive.

In Sierra Leone, EVD messages around risks of transmission and the importance of avoiding person-to-person contact were generic. They were not adapted to the types of person-to-person contact activities that children and adolescents might engage in, such as sports and sexual activities. EVD-related safe sex messages did not target adolescents, an important target group during the epidemic.[58]

- Engage religious leaders and traditional healers including medicine men and midwives in community-based interventions and engage their support in identifying and temporarily deferring or adapting local practices that may constitute infection risks. These may include the eating of certain foods, such as bush meats, customs associated with the burying of the dead, and other rites of passage, including ceremonies that mark important transitional periods in children's lives.

4 STANDARD 4: PROGRAMME CYCLE MANAGEMENT

Response Actions

- Ensure that child protection assessments, together with on-going situation monitoring, cover the situation of children in quarantine centres, treatment centres and communities facing restrictions on movement.

5 STANDARD 5: INFORMATION MANAGEMENT

Preparedness Actions

- Develop information sharing and data protection protocols with health and other key actors as part of preparedness planning for infection disease outbreaks.

Response Actions

- Develop consensus amongst child protection actors on which categories of children affected by the infectious disease outbreak will be used for data collection, program implementation and reporting procedures.

At the beginning of the response to the EVD outbreak, child protection actors came together to define the broad categories of EVD-affected children that will be used by agencies (EVD survivors, EVD orphans, etc.). This classification was practical and allowed for common denominators in data collection and program implementation.

- Together with health actors, develop information sharing protocols and referral pathways for the immediate registration and referral of children in need. Information sharing protocols should adhere to medical ethics, respecting patient confidentiality, as well as the confidentiality of family members. What information is shared, and with whom, should be on a strictly need to know basis, and only in the best interests of the child.
- Ensure that the infection and disease status of individual children and their family members is maintained as confidential and is shared only on a strict need to know basis.
- Ensure that persons entrusted with collecting, analysing and encrypting data that includes reference to the infection and disease status of individual children and their family members are trusted, have received training in data confidentiality, and understand the potentially sensitive nature of the information they are handling.

6 STANDARD 6: CHILD PROTECTION MONITORING

Response Actions

- For each concern to be monitored, disaggregate the number of male/female children affected by the infectious disease outbreak from the total number of male/female children affected. If possible, include separate indicators for each causal factor; e.g.: family separation due to quarantine measures; due to abandonment; due to admittance of child / caregiver to a care centre; etc.
- Establish systems to monitor the situation of children who may be at increased risk of violence, abuse and neglect, such as children with disabilities, chronic illnesses or albinism; child victims and survivors of the disease; and children with family or household members who have contracted the disease.

In Sierra Leone, District Emergency Response Centres (DERC) were established in the various districts and linked to the National Emergency Response Centre (NERC). The DERC led the EVD outbreak response at district level, which included several pillars. The pillars were situated under the Command Centre. Protection Desks were established within the DERCs with the objective to link different protection cases to the appropriate service providers and ensure they received timely and appropriate response. Having the Protection Desks within the DERC ensured a quick and improved response to vulnerable children and families.

MINIMUM STANDARDS TO ADDRESS CHILD PROTECTION NEEDS

8 STANDARD 8: PHYSICAL VIOLENCE

During infectious disease outbreaks, the imposition of quarantine measures and the resulting suspension of regular income generation, educational and social activities, may increase tensions in the home. Children who are unable to attend school or play with their friends can find themselves angry and frustrated with their caregivers, who are themselves suffering extreme stress. During the EVD epidemic in Sierra Leone children reportedly received more beatings for disobeying their parents and also for crying out of hunger[59]

All response strategies developed should be informed by local expertise and lessons learned from engaging on these issues in the local context.

9 STANDARD 9: SEXUAL AND GENDER BASED VIOLENCE

Although evidence is scant on hard to measure issues such as sexual violence in outbreak settings, accounts from frontline workers describe specific risks related to sexual violence that outbreak situations have presented. In Sierra Leone, a number of girls were sexually assaulted during the EVD epidemic by community members charged with enforcing community level quarantine, as well as by taxi drivers transporting goods and people between affected communities.[51] Enabling factors included disruption of protective family structures, social networks and routines due to by-laws passed by authorities, together with reduced community supervision. Caregivers were described as predominantly preoccupied with caring for sick relatives and finding ways to meet basic needs including getting food. School closures and restrictions on public gatherings also meant that children were not engaged in supervised play, learning or productive activities.

Response Actions

- Advocate with health actors to (a) maintain separate wards for girls and for boys in care centres where possible; (b) consider age and gender in the assignment of personnel to these wards; and (c) ensure that all persons with access to children's wards have undergone child protection background checks, received child safeguarding training, and signed a child safeguarding policy. Advocate with health actors to establish suitable visitation procedures.
- Establish safe alternative care arrangements for children who accompany their caregivers to treatment centres, including observation centres in case quarantine is required, and kinship care for children who are able to return to a family environment.
- Work with the community to increase awareness of the unique risks and consequences of sexual violence in the context of infectious disease outbreaks, including potential transmission of the disease.
- Discourage any potentially predatory behaviour by strengthening the protective environment for children in quarantined communities, especially those whose caregivers are infected and unable to provide their day-to-day care.
- Train government and community-based guards on their child protection obligations, mandate their signing of and adherence to child protection policies, and prosecute perpetrators of sexual violence against children, imposing stronger administrative and criminal penalties against those in positions of authority.
- Disseminate messages emphasising the importance of seeking medical assistance for child survivors – to treat any injuries sustained during the assault and/or to administer post-exposure prophylaxis within the 72 hours window, but also to check for symptoms of the disease in order to commence rapid treatment if needed.
- Provide financial and material assistance to families whose income generating opportunities are curtailed by illness.

In addition, for infectious diseases which require quarantine and/or isolation:

- Establish mechanisms to ensure that communities facing restrictions on movement have continued access to child-friendly, holistic care for child survivors of violence and their families.
- Coordinate with the legal, health and social work actors to ensure that all child survivors, regardless of their infection and disease status, receive timely and appropriate care and assistance.
- Provide financial and material assistance to families whose income generating opportunities are curtailed by quarantine or illness.

Response Actions For infectious diseases that require quarantine and/or isolation:

- Coordinate with caregivers, teachers, social workers, health workers, law enforcement officers and relevant community-based groups to raise awareness of the health risks posed by harmful traditional practices that involve bodily contact; inter alia scarification, branding/infliction of tribal marks, piercing, circumcision and other body modifications; virginity testing; and child marriage[60]. Alongside any existing strategies aimed at ending harmful practices, engage with traditional and religious leaders to discuss the potential of deferring or adapting such practices during infectious disease outbreaks in order to limit contagion. Strategies developed should be informed by local expertise and lessons learned from engaging on these issues in the local context.

10 STANDARD 10: PSYCHOSOCIAL SUPPORT AND MENTAL DISORDERS

During infectious disease outbreaks, children may experience distress for a variety of reasons. When caregivers, family members or friends fall ill, children may be unable to visit them in treatment centres, and may not receive regular updates on their condition. They may lose their regular support networks due to placement in alternative care or rejection by neighbours, extended family and community members. The collective anxiety and grief that a community experiences can impact heavily on children. Limited public knowledge of the disease may trigger misinformation, rumours and panic.[61] Children may become hyper vigilant, afraid of their caregivers or other family members falling ill and dying. They may also experience the loss of caregivers and family members, upon whom they are dependent for care and survival.[25] Media campaigns can also increases levels of distress in the population. During the Zika outbreak in El Salvador, for example, there was a great amount of media attention focused on the disease, which is said to have increased levels of anxiety amongst pregnant women.[62]

Preparedness Actions

- Ensure actors engaged in preparedness planning for infectious disease outbreaks are familiar with the IASC MHPSS Guidelines.

Response Actions

- Tailor mental health and psychosocial support interventions to the nature of the infectious disease outbreak, its impact on children and families, and whether people can safely gather.
- Consider a range of delivery options for psychosocial interventions, including community-based, home-based, peer-to-peer and one-on-one care.

During the EVD outbreak, child protection actors identified different PSS interventions for different categories of EVD affected children. These are captured in Table 2 below.

Table 2: Possible Alternative Psychosocial Support (PSS) Activities

Persons who have been **exposed** to infection and are in quarantine: at home	Persons who have been **exposed** to infection and are in quarantine: in facilities	Persons **confirmed** with an infectious disease: in treatment units
Distribution of survival kits	Dissemination of messages and programmes through TV or radio	
Carry out community based activities, including follow up and support to families	Engagement of counsellors to visit patients where needed	
	Distribute recreational and educational kits	
Conduct age- and gender- appropriate awareness raising activities through the TV and radio		
Provide support to social welfare workforce to engage in community level visits	Establish social worker presence linked to child protection system - including rapid registration for family tracing and reunification	
Conduct capacity building for response staff, health workers and community workers on psychosocial first aid and the referral of cases requiring specialised MHPSS services		
Build capacity of systems for IDFTR and alternative care for orphans and vulnerable children		
Coordinate the referral of services for children and their families		

- Encourage communities to adopt safe, positive coping mechanisms to deal with their fear and grief, and to continue celebrating special occasions, adapted if necessary, to guard against transmission.
- Develop referral pathways and offer psychosocial support to children whose caregivers or family members are admitted to treatment centres.

> In Yemen, frontline workers reported a high degree of trauma among children who accompanied their caregivers to cholera treatment centres, particularly when their caregivers subsequently died. Some health facilities had psychosocial support care workers or health personnel who had received basic psychosocial support training, who were available to provide support to children whose caregivers were admitted. Depending on the child's age, the psychosocial support staff engaged children in discussion around their treatment, the contagion risks for contracting cholera and how they could protect themselves and others. This allowed children to understand what was happening to them, and to feel some degree of empowerment.[40]

- Ensure that specialised support is available to children, caregivers and other family members whose loved ones have died or been irreparably affected by the disease.

> In Brazil during the Zika outbreak, women who gave birth to babies with microcephaly were found to be at risk of having high levels of anxiety and low quality of life during the first twelve months of their new-born's lives. This impacted their abilities to care for and engage with their other children. A study conducted in 2016 found that the majority of mothers of infants with Zika-associated microcephaly did not receive specialised psychosocial support or counselling.[63]

In addition, for infectious diseases which require quarantine and/or isolation:

- Train caregivers, teachers and community animators on alternative ways of comforting, engaging and interacting with children.

> In Liberia during the EVD epidemic, psychosocial support and socio-recreational activities were delivered home to home by community members, or in a communal area accessible to adjacent quarantine homes. In other instances, NGO psychosocial support teams facilitated activities from behind the barrier demarcating the quarantine area. Additionally, the manner of comforting children relied more on singing, speaking and dancing, as personal contact presented contagion risks.[25]
>
> In Sierra Leone during the EVD epidemic, youth who had survived EVD worked as trained volunteers in interim care centres to provide psychosocial support to children. In addition to the activities they offered, the youth were able to share a message of hope that it is possible to survive the disease.[58]

- Work with traditional and religious leaders, and other community members, to adapt traditional burial and grieving ceremonies.

> In Sierra Leone, burial teams were trained not only in conducting safe and dignified burials, but also in addressing bereavement, communicating with distressed family members, and basic child protection, in order to identify children in need to specialised care and support. Initially, EVD victims were buries in mass graves without funerals, which was deeply distressing for surviving family members. Burial traditions were later adapted to allow for the preparation of deceased women's bodies by female members of safe burial teams; for deceased to be buried in individual named graves (which facilitated the 12-month anniversary tombstone unveiling ceremony); and for funeral parties to attend, standing at a distance from the grave, outside

Above: Photo courtesy of Terre des hommes / Olivier Girard / Burkina Faso 2016.

the contagion radius. These changes allowed children to grieve for deceased caregivers and family members, and to feel that their loved ones were respected in death.[64]

- In coordination with relevant health professionals and social workers:
  - Adapt psychosocial support measures to the nature of the disease, in particular its modes of transmission.

During the cholera outbreak in Yemen, infected children were usually separated from infected adults. From a psychosocial perspective, however, children felt safer with their mothers. Thus, decisions were made on a case-by-case basis, especially for younger children, for mothers who were also undergoing treatment to remain with their child.40 By contrast, during the West African EVD outbreak, when children arrived at treatment centres with their sick caregivers, the risk of infection meant that children had to be separated from their caregivers. This held true even if the child was also under treatment, since exposure to other infected persons had a detrimental effect on patient outcomes.

  - Create safe opportunities (via the adoption of prophylactic measures; telecommunication options such as Skype, WhatsApp, Messenger or telephone; the exchange of letters, photos, videos and drawings; or other appropriate mechanism) for children to maintain regular contact with their caregivers and family members, should one or both parties be admitted to a care centre.

During the EVD response, the mode of transmission meant that children could not be comforted through touch. In Liberia, children who were separated from their families due to quarantine or who were in treatment centres were able to maintain contact with their caregivers using video calls and exchange of pre-recorded videos. In Sierra Leone, phone calls between separated children and their caregivers were scheduled for the same time every week, giving children a sense of routine. These telecommunication measures were a critical means of reassuring caregivers and children alike, since they often did not know where they were being evacuated to, for how long they would be apart, and when or whether they would be able to reunite.[26]

  - Train teachers to support the social reintegration of students once schools reopen and to provide opportunities for students to grieve the difficulties they have experienced, including the loss of family and friends to the disease.

12 STANDARD 12: CHILD LABOUR

In an assessment conducted in 2015 in Sierra Leone, children described the need to take on new roles and responsibilities to supplement household income and reported a direct correlation between school closure and increases of child labour and exploitation.[31] Frontline workers In Liberia during the EVD epidemic also identified children engaging in hazardous labour in order to supplement family income that was lost as a result of the by-laws and quarantine measures.[25] Children themselves also reported increased pressure for both boys and girls to supplement the household income, both for children who had lost caregivers due to the disease and those had not.[31] In Sierra Leone, transactional sex in particular was identified as an emerging phenomenon during the outbreak as adolescent girls identified ways to meet the basic needs of their families. Drivers behind this increase were suggested to include deepening poverty and the inability of caregivers to provide food and material goods for their children.[51] Accounts from responders in Liberia suggest similar patterns of risk emerged.[25]

Response Actions

For infectious diseases that require quarantine and/or isolation:

- Advocate for quarantine measures to be accompanied with financial or material supports to affected households and/or communities, in line with best practices around the targeting of cash and/or NFIs.

Above: Photo courtest of Terre des hommes / Olivier Girard / Burkina Faso 2016.

13 STANDARD 13: UNACCOMPANIED AND SEPARATED CHILDREN

Children can be separated from their caregivers during infectious disease outbreaks due to the death of a caregiver, deliberate actions of caregivers, such as sending the child away to stay with others, or as a result of public health measures to control the spread of the disease. Young children are at particular risk of family separation if they are admitted to observation or treatment centres on their own, or if they accompany caregivers who are admitted and subsequently die, as they often do not know their village of origin or the names and contact details of family members.

A. Key actions - Identification, documentation, tracing and reunification (IDTR)

Preparedness Actions

- Identify, train and mentor local health actors and officials who would likely be involved with responses to infectious disease outbreaks on preventing family separation, identification and referral of unaccompanied and separated children, age-appropriate methods for interviewing children, adapted techniques for interviewing children in observation and treatment centres, and procedures to be followed for completing and managing the forms to be used locally.

> During the EVD response in Liberia, case management files were opened for all children admitted to observation or treatment centres, using standard case management forms which were adapted to integrate the child's health details. The forms captured the child's name, date of birth and place of origin; details of the child's caregivers and extended family; as well as when the child was brought in and by whom. The form was progressively updated as per usual protocols, and every time the child received a visitor or had a medical check.

- Avoid disseminating information that might unintentionally encourage families to abandon their children, such as misinformation about modes of transmission, or rumours that children in observation centres will receive special or priority assistance.

Response Actions

- Ensure that children or caregivers who show symptoms of disease are admitted to the closest treatment centre that would facilitate on-going family contact. If children are removed for treatment, they should where possible not be taken long distances from their family, and the families should always know where the children are. Concurrently, children whose caregivers are undergoing treatment should be informed about where their caregivers are and, if appropriate, their caregiver's health status.
- Coordinate with health actors, social workers and other actors to establish or strengthen existing referral mechanisms for children.
    - o If children are removed from their family and placed in medical care facilities, their details and those of their family must be documented when the child is removed from the family, not when the child arrives at the care facility. A sick child should never be removed from a family without documenting next-of-kin information and keeping it with the child. The child's family should always know where the child will be treated, and should receive regular updates on the child's condition and location.
    - o From the moment a separated or unaccompanied child comes into contact with health services, active tracing of the child's family should begin in order to facilitate family reunification after the child is discharged or, if necessary, determine an appropriate alternative care option. Do not wait for a child to be transferred to a longer-term facility.

In addition, for infectious diseases which require quarantine and/or isolation:

- Coordinate with health actors to ensure the registration of children who are admitted to observation or treatment centres including details of the child's name, date of birth and place of origin; the names of the child's caregivers; and names and contact details of other family members who could provide alternative care if needed.

During the early response to the EVD outbreak in Liberia, frontline workers noted that children were often admitted to observation and treatment centres in places unknown to their families, and vice versa.[25] Sometimes they were moved on to secondary care centres, without any record of who was being moved where, or any communication to family members. In many cases, no family details were taken, further hindering family reunification efforts. This was a particular concern for younger children (under five years of age), who could not communicate the names and contact details of their caregivers and extended family members, or their communities of origin. This situation improved over time, as a common form was used in all observation and treatment centres to capture the child's identifying information, as well as the identifying information of caregivers and extended family members, together with patient movements.

The risk of permanent family separation was heightened during the EVD response in Sierra Leone since in some cases caregivers were placed in treatment centres in one district, and children were placed in quarantine or treatment centres three or four districts away. Poor communication meant that separated caregivers and children often did not know where the other was, or if they were still alive.

- Ensure procedures are put in place to support continued remote or virtual contact between children and caregivers who are physically separated due to quarantine, isolation or treatment.

During the EVD response in Sierra Leone, deliberate efforts were made to keep siblings together if they were being admitted to treatment or observation centres, or placed in kinship care. Children in quarantine centres whose caregivers were in a known location were able maintain contact through weekly scheduled telephone calls. People caring for infants and young children whose caregivers were in quarantine or treatment centres were encouraged to contact the caregivers to advise them where their children were, and to reassure them that the children were well.

- Coordinate with health actors, social workers and other actors to establish or strengthen existing referral mechanisms for children.

During the EVD epidemic, the collaboration between social workers, health and community workers was unique, in that referral pathways were set up between different types of care centres (centres for observation and treatment). Social workers and community-based workers were trained in specific health measures such as infection prevention and control, which had a positive effect on the care children received. Foster families were included in the referral pathways that were developed and were included in a broader protection/ health system for the first time. Multi-disciplinary teams were involved in coordination on follow up, care and support, resulting in more positive impacts for children.[53]

  - In cases where medical facilities are far away from families' places of origin, ensure that appropriate temporary accommodation is available for caregivers whose children have been admitted to observation or treatment centres. This will both reduce the risk of family separation and facilitate psychosocial support for the child.
  - If an adult is admitted for treatment or observation, establish if there are children left behind, where they are, and the care arrangements in place; i.e.: whether and by whom they are being cared for.
  - Where either a child or his/her caregivers have been admitted to a medical facility, ensure mechanisms are in place for communication between children and their families. This could include safe options for visiting (if proper precautions are in place); electronic media such as Skype, telephone or WhatsApp; or the exchange of letters, photos or videos.
  - Reduce the risk of stigma and/or rejection by ensuring that when a child survivor is discharged from a medical care centre or reunited with his/her family after a period of separation, or when a healthy child is placed in alternative care due to the illness or death of a caregiver, the responsible adult is provided with information in a format that s/he can understand (i.e.: orally, simple printed materials, or graphic materials) that explains the child's health status.

B. Key actions – Alternative care

Preparedness Actions

- Conduct awareness raising campaigns, supplemented by information, educational and communication materials, to ensure that kinship and community care systems are not dissuaded from caring for unaccompanied and separated children on the basis of misplaced fears about the nature of the disease and modes of transmission.
- Identify persons in affected communities who are best placed to care for unaccompanied and separated children in the event of an infectious disease outbreak. This may include survivors who have developed immunity to the disease. Potential caregivers should undergo a pre-screening process, child protection training, and agree to adhere to a child safeguarding policy and monitoring visits.

Response Actions

- Unless the disease is directly transmissible, do not separate children from a sick caregiver without ensuring that the children are left under the care of a responsible adult. If kinship or community-based care arrangements are unavailable, consider whether temporary safe childcare facilities can be established adjacent to the observation or treatment centre to which the caregiver has been admitted.
- If a sick caregiver is admitted to a health care facility accompanied by a child, ensure that information about the child and his/her family is gathered at the point of admission. This information should be used to identify appropriate caregiving arrangements for the child while the caregiver is under observation or treatment, and to identify remaining family members to provide permanent care in the event that the caregiver dies.
- Foster care families should be as close as possible to the child's place of origin, and/or to the place where his/her caregivers are being treated (if alive, and if known).

Child protection actors responding to the EVD outbreak in Sierra Leone faced difficulties placing unaccompanied and separated children in kinship or community-based care. The barrier for many families was not fear of infection or discrimination, but the economic burden entailed by caring for another child. Nonetheless, the vast majority of children were ultimately cared for in kinship relationships.[26]

- Take measures to preserve family unity. Where the disease leaves child survivors or surviving caregivers with chronic health problems or longer-term needs, reduce the risk of family separation by providing additional financial and/or material assistance in order to enable caregivers to continue caring for their children.

In Sierra Leone, during the EVD response, child protection staff accompanied children who were returning to their community from treatment or observation centres. They organised the transport, and gave the children integration kits comprised of, inter alia, a mattress, pillows, clothing, food and cooking items. Child protection actors also engaged with religious leaders who were facilitating community-healing ceremonies, to use those ceremonies to promote the acceptance and full social reintegration of child survivors of EVD.

In Liberia, children who had survived Ebola in treatment facilities or had completed the mandatory observation period in isolation centres were provided with a package to help facilitate family and community reintegration. Child protection actors and social workers also worked at the community level to prepare the community for the child's return.

Standard: Neglect

Infectious disease outbreaks can increase the risks of children receiving insufficient social and cognitive stimulation. In addition to family separation due to illness or death of a parent, the ability of caregivers to provide responsive care can undermined by measures to control the spread of disease such as quarantine or isolation. In Sierra Leone during the EVD epidemic, for example, by-laws restricted movements as well as human contact between people. Given what is known about the need for responsive care and the stress reaction children have when this is absent, this no doubt had consequences for young children.

Response Actions

- Where possible, child protection actors should strengthen family relationships, for example by promoting frequent contact between children in observation or treatment centres and their caregivers and/or family members or vice versa.
- Identify ways to educate caregivers about the importance of responsive relationships between themselves and their children, especially in high stress situations such as infectious disease outbreaks.
- Advocate for families in need of accessing basic supports, such as nutritious food, water, medical care, and mental health services, as a way of ensuring children's basic needs are met and sources of stress are reduced.
- Identify ways to provide children in treatment, isolation and quarantine with opportunities for cognitive stimulation for example through the distribution of educational material through radio programmes.

MINIMUM STANDARDS TO DEVELOP ADEQUATE CHILD PROTECTION STRATEGIES

15 STANDARD 15: CASE MANAGEMENT

Response Actions

- Ensure that caseworkers are aware of how the infectious disease outbreak can impact child protection concerns, which children are likely to be most vulnerable and why, and what support services are available.
- Provide caseworkers with in-depth intensive case management training, incorporating a range of child protection topics specific to the infectious disease outbreak. This might include training on how to provide on-going support to foster families; especially families caring for children orphaned by the disease who are grieving and have withdrawn from family and community life. Complement the course with regular refresher training, formal one-on-one and/or peer supervision, case consultations within each case management agency, and case management workshops.
- Ensure that caseworkers understand basic facts about the infectious disease, including modes of transmission and risks of infection, so that they can effectively combat myths that stigmatise child survivors or children of survivors.
- Building on existing mechanisms, develop procedures with the health sector, local administrators and community leaders by defining criteria and processes for the registration, referral and follow up of children at risk of violence, abuse or neglect as a result of the infectious disease outbreak. Priority should be given to children who are separated from

their caregivers, including those in observation centres, treatment centres, or alternative care; children in households affected by restrictions on movement or lack of access to services; children with disabilities, chronic illnesses or albinism; child victims and survivors of the disease, who may be rejected by their families and/or communities; and children with family or household members who have contracted the disease.

16 STANDARD 16: COMMUNITY-BASED MECHANISMS

Preparedness Actions

- Together with community-based child protection groups, identify what role these groups could play in following-up on children placed in alternative care during an infectious disease outbreak.

Response Actions

- Engage community volunteers, both adults and children, in identifying appropriate local messages and raising awareness about transmission sources and risks of infection. Work with different demographics to develop key messages and effective dissemination strategies that are child-friendly, taking age, gender, literacy and education levels, (dis)ability and socio-economic status into account.

In both Sierra Leone and Liberia, survivors of EVD played an increasingly important role in the child protection response by facilitating psychosocial and socio-recreational activities for children, conducting awareness raising, identifying and referring child protection cases, and providing basic interventions for the well-being of children who were infected or suspected of having contracted the disease. Survivors were key agents of social change, able to interact with the children because they had developed immunity to Ebola – something child protection specialists were unable to do – to understand and mitigate the risks that children faced; and to counteract the stigma and discrimination associated with child survivors and children whose caregivers had contracted the disease.

17 STANDARD 17: CHILD-FRIENDLY SPACES

Child friendly spaces (CFS) are often used to deliver psychosocial support to children in humanitarian crises. During infectious disease outbreaks, however, it may be necessary to consider a broader range of interventions, depending on the nature of the outbreak, its impact on children and families, and whether people can gather safely. If restrictions on movement are in place, or if people cannot safely touch each other, mental health and psychosocial support interventions will need to be rethought in order to adequately care for children.53,65 Alternatives to CFS are described below.

Response Actions

- Discuss with health and WASH actors whether and where CFS can be safely established, taking into account the nature of the infectious disease outbreak. For outbreaks of diseases that are transmitted indirectly, identify locations at a safe distance from possible sources of infection and ensure safe water, sanitation and vector control are in place.
- Where appropriate, establish CFS in treatment centres and other places where children may be confined, as well as in locations accessible to children whose caregivers or other family members have been admitted to a care facility and/or died.

In Yemen, some cholera treatment centres had adjacent CFS staffed by psychosocial support workers. This was considered good practice, in that it enabled the identification of protection risks for children undergoing treatment or accompanying their caregivers. In the case of cholera treatment centres without adjacent CFS, children were encouraged to engage in socio-recreational activities at nearby community centres, staffed by government social workers and/or community-based para-social workers who had received training in child rights, child protection and psychosocial support.

- Ensure that CFS staff and volunteers understand basic facts about the infectious disease, including symptoms and modes of transmission, so that they can refer children for treatment or observation, they can promote infection prevention within the CFS and can combat myths about the disease.

- Ensure all CFS staff and volunteers are aware of the protection related risks the infectious disease outbreak can pose for children, which children are likely to be most vulnerable and why, and how to refer children to available support services.

In addition, for infectious diseases which require quarantine and/or isolation:

- Determine ways in which CFS activities can be adapted and what types of activities can safely be facilitated to avoid child-to-child or child-to-animator transmission. Recreational materials must be easily disinfected. Alternatives such as radio programmes might be considered.

During the EVD response in Liberia, adult and youth survivors, who had developed immunity to the disease, facilitated the CFS activities in quarantine and observation centres. To the extent possible, children were brought in as a family unit (e.g.: a group of siblings and cousins), to promote a sense of safety and well-being. Recreational materials and toys were disinfected daily to reduce contagion risks. Initially, while the quarantine period was still in effect, activities involved speaking, singing, dancing, and individual play. After the quarantine period had passed, the children were able to play together, albeit without touching each other; for example: football, jump rope and swing sets.

18 STANDARD 18: PROTECTING EXCLUDED CHILDREN

Infectious disease outbreaks are often accompanied by a public sense of panic, driven by fear of infection and uncertainty as to how diseases are transmitted.53 Children who become sick, or whose caregivers or other family members have contracted the disease, may be discriminated against or isolated by the community and their peers – even after the victim has recovered from the illness. Infectious diseases most associated with stigma are those considered to be deadly and those where the cause of the disease is thought to be the fault of the infected individual are thought to be.[66]
In addition, in cultures where witchcraft beliefs exist, experience from the HIV/AIDS epidemic suggests that infectious disease outbreaks may be attributed to supernatural forces. In some contexts, children considered "socially undesirable" – such as children with disabilities, chronic illnesses or albinism, or children who are perceived to be rebellious, badly behaved or otherwise "different" – have been accused of causing an infectious disease outbreak.[67] Accused children face a range of protection risks including expulsion from their homes, abandonment, subjection to violent or abusive ritual cleansing practices through tactics such as beatings, being chained or tied up, the withholding of food and water, or death.[67–70]

Preparedness Actions

- Work with the lead health actors in context to develop strategies to include marginalized and hard to reach children, such as children living on the streets, during vaccination campaigns.

Response Actions

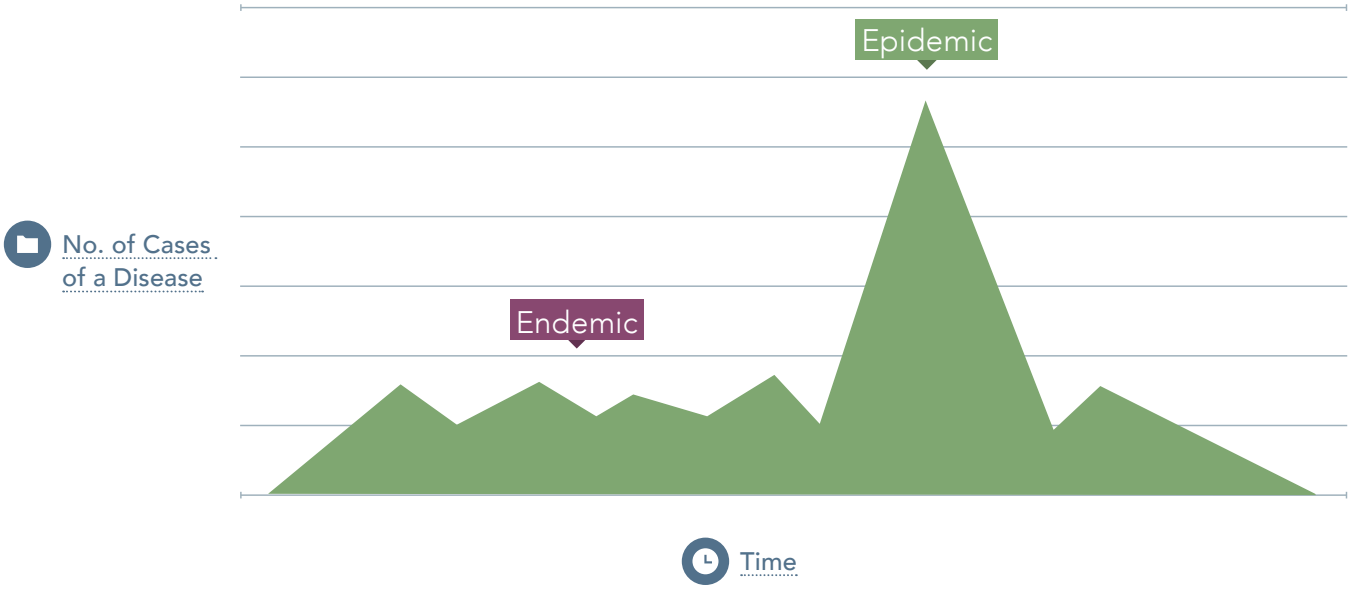
- Identify children whose excluded status renders them more vulnerable during the infectious disease outbreak. This might include children without family care; children living and/or working on the street in close proximity to transmission sources; and children with disabilities, whose care routines may be disrupted by measures such as quarantine and reduced access to essential services.

Annex 1: Information about infectious disease outbreaks

ABOUT INFECTIOUS DISEASE OUTBREAKS

Infectious disease outbreaks occur when there are more cases of a particular infectious disease than what is normally expected in a given community, geographical area or season. Outbreaks may occur in a restricted geographical area, or they may extend over several countries or continents, becoming pandemics.[71]

Figure 3
Endemic vs. epidemic levels of disease



1. Epidemic

Epidemics can be caused by endemic diseases, or diseases that have a constant presence within a given population or area such as dengue fever and malaria, or by newly emerging diseases such as Severe Acute Respiratory Syndrome (SARS) and the 2009 H1N1 influenza. Epidemics pose a threat to the well-being of whole communities.

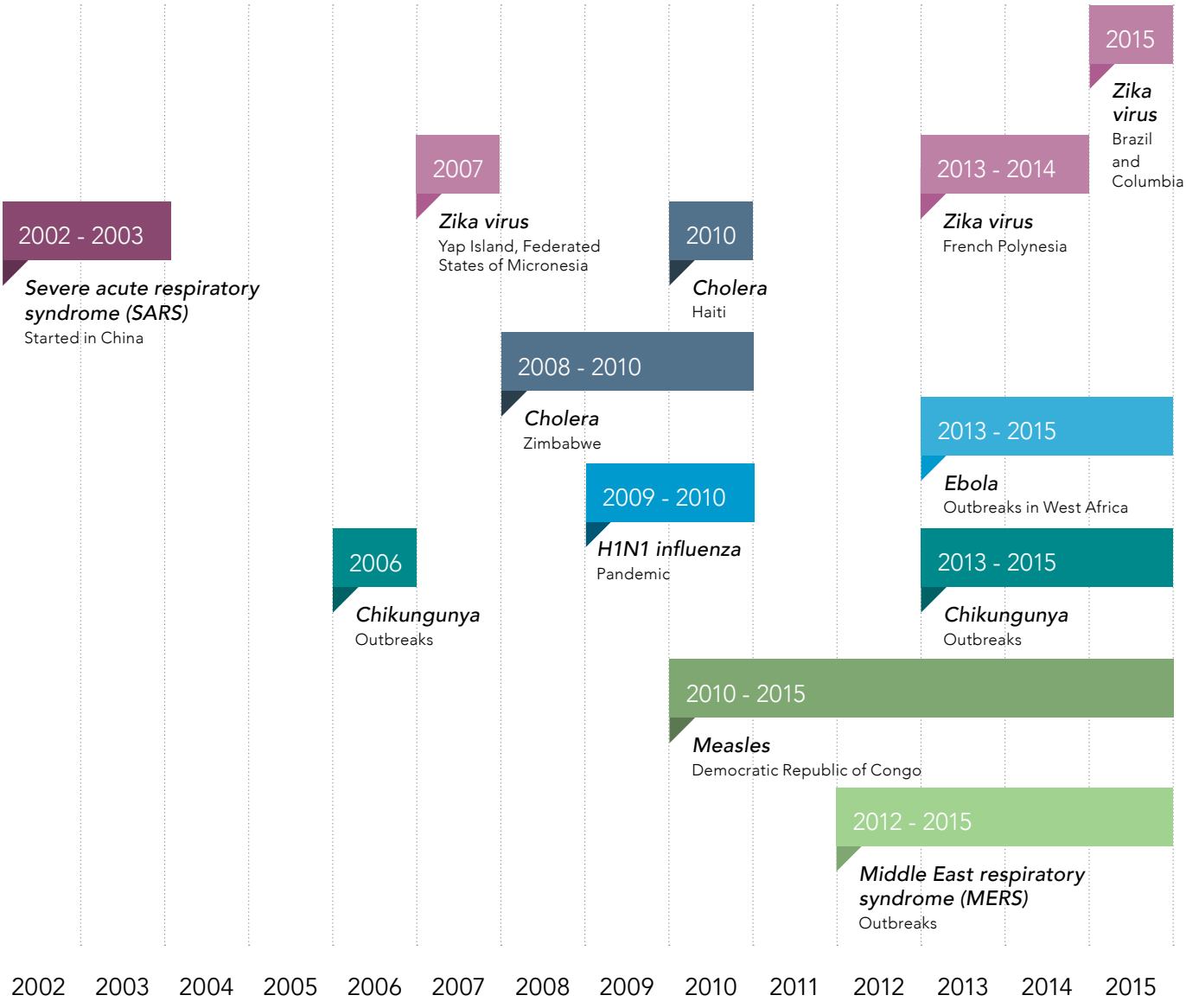
2. Pandemic

When an epidemic spreads over several countries or continents usually affecting a large number of people, it is referred to as a global epidemic or pandemic. The global spread of the H1N1 influenza virus in 2009 is an example of a pandemic.

The major infectious disease epidemics and pandemics that occurred globally from 2002 to 2015 are illustrated in Figure 3 on the next page.[72 (p1281)]

Previous Page: Photo courtesy of Terre des hommes / Olivier Girard / Burkina Faso 2016.

Figure 4
Major emerging and remerging infectious disease outbreaks from 2002 to 2015



Some infectious diseases are recognised for their potential to spread quickly around the world. An outbreak of this kind of infectious disease can be declared a Public Health Emergency of International Concern (PHEIC) by the WHO.

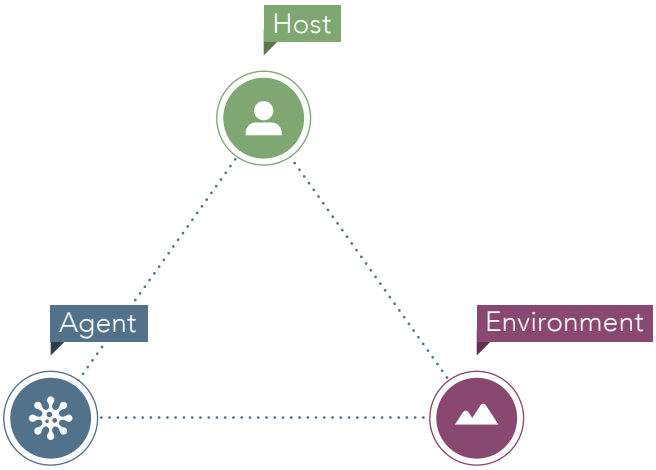
CAUSES OF INFECTIOUS DISEASES AND THEIR MODES OF TRANSMISSION

Causes of infectious diseases

Infectious diseases are caused by pathogenic microorganisms or microbes, such as bacteria, viruses, parasites or fungi, that can be spread, directly or indirectly, from one person to another. The epidemiological triangle[73(p52)] illustrates how diseases are caused through the interaction between infectious agents, hosts and the environment.

Agent:	Pathogenic microorganism that causes the disease
Host:	Human who can become infected and get sick
Environment:	Factors, including physical and socio-economic, that provide the opportunity for an agent to be exposed to host

Figure 5
Epidemiological triangle



When conditions in the environment are favorable for the survival of an agent and when conditions allow for the exposure of a host to an agent, this can give rise to infection and disease.

Transmission of infectious diseases

Infectious diseases have two main modes of transmission.[73]

1. Direct transmission where infectious diseases are transmitted between people through:

Direct contact: an infectious agent is transmitted through physical contact between two individuals. This can be through skin-to-skin contact, kissing or sexual intercourse. Ebola Virus Disease (EVD), for example, is transmitted through direct contact with the blood, secretions and body fluids of infected people; and contact with infected dead bodies.

Droplet spread: infectious agents are spread through spray produced by sneezing or coughing. SARS, for example, is mainly spread by large respiratory droplets spread through coughing and sneezing.

2. Indirect transmission where infectious diseases are transmitted through:

Vectors: animals that carry an infectious agent such as mosquitos, fleas, ticks and sand flies. Malaria, for example, is transmitted between via the bite of a mosquito.

Vehicles: inanimate objects (also known as fomites) such as doorknobs, bedding and towels as well as food water and other biological products such as blood. Cholera, for example, can be carried by water or food and can infect a person who eats or drinks the water/food.

Airborne: which can carry infectious agents, suspending them in the air for short or long periods of time. Measles, for example, can be transmitted to a child in a doctor's office up to two hours after another child with measles has left the room as the virus can remain suspended in the air.

Some infectious diseases have multiple modes of transmission. Cholera, for example, is transmitted primarily through contaminated water or food, but it can also be transmitted through the bodily fluids. The same is true of Lassa fever, which is primarily transmitted via the handling of rats, but can also be transmitted via contact with bodily fluids of infected persons and contaminated bedding and clothing.

Yemeni Red Crescent Society volunteer Ameerah stands among a gathering of children at the slum quarter in Sanaa, trying to teach them protective healthy ways against cholera infection and tells them how to wash their hands with soap before and after eating. Photo courtesy of the International Federation or Red Cross / Red Crescent Societies (IFRC) / Yemen.

Annex 2: Measures used to prevent and control infectious diseases

PUBLIC HEALTH MEASURES USED TO PREVENT AND CONTROL THE SPREAD OF INFECTIOUS DISEASES

PUBLIC HEALTH MEASURES

Depending upon their modes of transmission, different public health measures are recommended to prevent and control the spread of infectious diseases. These include:

- **Preventive measures:** aimed at preventing individuals from getting infected.

- **Control measures:** aimed at preventing further spread of the disease from infected persons, and minimizing the period of communicability in order to reduce illness and death.[74]

The prevention and control measures applied in different outbreaks will depend on a number of factors including the feasibility, availability, acceptability, safety and cost of measures.[75] (p126)

DIRECTLY TRANSMITTED INFECTION DISEASES

Preventive measures include:

- Immunisation, where a vaccine for the disease exists. Some directly transmitted diseases including diphtheria and influenza including H1N1 have vaccines but many do not.[76]

- Educational measures about the infectious disease and behaviours that increase the risk of infection, such as unsafe sexual intercourse or unsafe burial practices, or reduce the risk of infection, such as using a insecticide-treated bed net.[77]

- Environmental measures, including the provision of resources individuals can use to prevent transmission (e.g. condoms).

- Standard precautions (for Infection Prevention and Control), that is, a series of procedures that must be performed in health care settings when dealing with all patients, independent of their infectious status. Key elements include hand hygiene, personal protective equipment (based on risk assessment of the procedure), safe injection practices, environmental cleaning, respiratory hygiene, and use of aseptic technique.

Control measures include:

- Isolation or the separation of sick people who have been infected from those uninfected to prevent exposure to the disease.[78] Isolated persons may be kept and cared for in their homes, in hospitals or in designated treatment facilities.[79]

- Quarantine, which refers to the separation and restriction of movement of healthy people who were exposed to an infectious disease to see if they become sick.[78] A variety of strategies are used by health authorities as quarantine measures from voluntary home-based quarantine to the cancellation of public gatherings and in extreme cases, the establishment of a cordon sanitaire or a barrier around a geographic area with enforcement of a prohibition of movement in or out of that area.[80] A combination of these quarantine measures was used, for example, in Sierra Leone during the EVD epidemic. Quarantine measures were instituted at the household, village and chiefdom/district level.[81] In household level quarantine, part or all household members were asked to remain in the house for the EVD incubation period of 21 days. Village level quarantine meant that an entire village was restricted from moving outside of their village. In chiefdom/district level quarantine, the movement of persons between whole chiefdoms/districts was restricted.[81]

- Management of contacts, which refers to the identification and follow-up, sometime quarantining, of persons who may have come into contact with the infected person so they can be quickly isolated before infecting more people in close contact with them.[82] Contact tracing, for example, was used in countries affected by the SARS pandemic where contacts were closely monitored for symptoms of disease.[83] It was also used during the EVD epidemic

where contacts were put into quarantine for observation.[84]

- **Treatment** of the disease. Depending on the existing healthcare infrastructure and the contagiousness of the disease, specific treatment centres may be established such as those set up during the EVD outbreak in West Africa.

- **Post-exposure prophylaxis** – a term used to describe the provision of a pharmaceutical intervention (e.g. vaccine, antibiotics, etc.) to people exposed to an infectious patient to prevent disease in that individual and the spread to others. This intervention is setting, context and disease specific.

INDIRECTLY TRANSMITTED INFECTIOUS DISEASES

Preventive measures include:

- **Immunisation** where vaccines exists. Some indirectly transmitted infectious diseases such as yellow fever and cholera have vaccines, but many do not.[76]

- **Educational measures** about reducing risk of infection such as mosquito avoidance behaviours.

- **Environmental measures,** including providing safe, clean water, adequate shelter and adequate sanitation as well as providing material resources to prevent transmission such as bed nets.[75] For diseases such as malaria or yellow fever, controlling the vector is also a preventive measure.

- **Standard precautions (for Infection Prevention and Control)** – the series of procedures that must be performed in health care settings when dealing with all patients, independent of their infectious status. Key elements include hand hygiene, personal protective equipment (based on risk assessment of the procedure), safe injection practices, environmental cleaning, respiratory hygiene, and use of aseptic technique.

Control measures include:

- **Treatment** of the disease through inpatient or outpatient arrangements using relevant precautions.

- **Post-exposure prophylaxis** – a term used to describe the provision of a pharmaceutical intervention (e.g. vaccine, antibiotics, etc.) to people exposed to an infectious patient to prevent disease in that individual and the spread to others. This intervention is setting, context and disease specific.

KEY CONSIDERATIONS FOR CHILD PROTECTION RELATED TO PREVENTION AND CONTROL MEASURES

Child protection actors need to consider what implications the prevention and control measures have in terms of protection risks for children and the delivery of child protection interventions. Tables 3 and 4 below list some key questions for consideration.

Table 3: Implications of preventive and control measures for child protection risks

What protection risks for children could arise from the prevention and control measures?

Preventive measures

Immunisation

- Are immunisations being applied safely for children of different age groups? Check the recommended age for relevant vaccines. For example, the two WHO approved oral cholera vaccines are not suitable for children younger than one and two years of age respectively.[85]
- Are there children who risk being excluded from prevent and control measures such as immunisation campaigns?

Educational measures

- Are children of different ages and abilities sufficiently targeted in educational measures on infection prevention?

Control measures

Isolation

- How might the stigmatisation of infected persons including children be promoted through isolation measures? What can be done to militate against this social stigma?
- Are isolation units child-friendly?

Quarantine

- How do restrictions on movement imposed through quarantine impact upon children's well-being? How can negative impacts be mitigated?

- How might quarantine measures unintentionally promote the stigmatisation of infected persons including children? What can be done to mitigate this stigma?

Treatment
- What protection related risks do treatment centres pose for children?
- Are treatment facilities child-friendly?
- Are staff and volunteers aware of the child protection codes of conduct and how they apply in treatment centres?

It is important for child protection actors to consider what implications the prevention and control measures have both in terms of child protection risks and for the delivery of child protection interventions.

Table 4: Implications of prevention and control measures for child protection interventions

How do child protection interventions need to be adapted in light of the prevention and control measures used during outbreaks?

Preventive measures

Immunisation
- Where immunisation campaigns are underway, do child protection interventions promote these or do they interfere with these campaigns in any way?

Educational measures
- Do messages used in child protection interventions align with educational messages used to educate about risk behaviours for infection?

Environmental measures
- Do sites where child protection interventions are conducted have vector- or vehicle control measures in place (i.e. disinfecting objects, removing stagnant water where mosquitos can breed)?
- Do sites where child protection interventions are conducted provide clean water and adequate hygiene and sanitation?

Control measures

Isolation
- How do child protection interventions, such as the provision of psychosocial support for children, need to be adapted to reach children in isolation units?
- Are child protection actors working with health actors to mitigate the potential negative effects of isolation on children's well-being?

Quarantine
- How do child protection interventions, such as the provision of psychosocial support for children, need to be adapted to reach children in under quarantine?
- Are child protection actors working with health actors to mitigate the potential negative effects of quarantine on children's well-being?

Treatment
- Are child protection actors working with health actors to ensure treatment centres are child-friendly and do not pose risks for children?
- Are educational messages about preventing infection tailored to children of different sex, age and ability?

Above: Photo courtesy of Terre des hommes / Will Baxter / Burundi 2016.

Annex 3: Types of infectious disease outbreaks

Figure 2: Types of infectious disease outbreaks

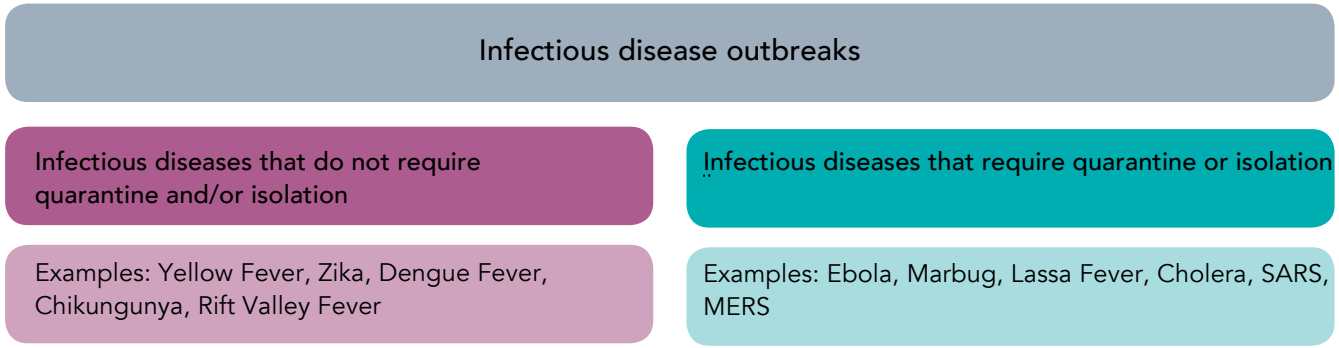


Table 5: Examples of infectious diseases[74]

Disease name	Identification (Clinical features)	Case Fatality Rate (CFR)	Infectious Agent	Incubation period	Mode of transmission	Methods of prevention and control
Ebola	Severe acute viral illness; sudden fever, intense headache, nausea, vomiting	Varies from 25%-90% in past outbreaks (average rate is 50%)[86]	Virus: *Ebolavirus*	From 2-21 days	Direct contact with infected human or animal blood, secretions, organs or semen.	**Prevention:** Avoid contact with bodily fluids of infected persons **Control:** Isolation of infected persons; concurrent disinfection; contact tracing; quarantine potentially infected persons
Marburg	Severe acute viral illness; sudden fever, intense headache, nausea, vomiting	Varies from 24% - 88%[87]	Virus: *Marburgvirus*	From 2-21 days	Transmitted to humans from fruit bats; human-to-human transmission via contact with infected human blood, secretions, organs or semen.	**Prevention:** Avoid contact with bodily fluids of infected persons **Control:** Isolation of infected persons; concurrent disinfection; contact tracing; quarantine potentially infected persons

SARS	High fever, chills, headache, body aches, diarrhoea	Estimated 0%-50% (overall CFR of 14-15%)	Virus: *SARS-associated coronavirus (SARS-CoV)*	From 2-10 days (mean of 5-6 days); isolated reports of longer incubation	Respiratory droplet spread; in some situations, fomites	**Prevention:** hand-washing with soap; avoid touching eyes, mouth **Control:** Isolation of infected persons; wear protective gear for airborne infection when near infected person
MERS[89]	A viral respiratory illness: fever, chills, cough, shortness of breath	Estimated 35%[90]	Virus: *Middle East Respiratory Syndrome-Coronavirus*	From 2-14 days, on average 5 days	Transmitted through contact with infected dromedary camels; human contact in healthcare settings	Prevention: Practice good hygiene; avoid contact with sick animals Control: Isolation of persons testing positive for MERS
Plague	Fever, chills, malaise, nausea, sore throat. Lymphadenitis often develops	Est. 50%-60%[91] for bubonic plague; est. 100% for pneumonic plague if untreated	Bacteria: *Yersinia pestis, the plague bacillus*	From 1-7 days	Transmitted by fleas; direct contact with infected bodily fluids or contaminated materials; droplet inhalation	**Prevention:** Reduce likelihood of flea bites **Control:** Isolation only for pneumonic plague; persons who have been in contact with patient should be placed in strict isolation for 7 days; disinfection
Lassa fever	Acute viral illness; gradual onset with malaise, fever, headache, cough, nausea	1% (15% among patients hospitalized with severe cases)[94]	Virus: *Lassa virus*	From 2-21 days	Spread through contact with food or items contaminated with infected rodent urine or faeces; contact with bodily fluids of infected person[94]	**Prevention:** Promote rodent control and practice good hygiene; wear protective gear when in contact with infected persons **Control:** Isolation of infected persons; concurrent disinfection; contact tracing; quarantine potentially infected persons
Cholera	Sudden onset painless watery stool, nausea, vomiting.	Without treatment death can occur in hours. Varies from 0%-15.8%[95] but can be higher in children with severe acute mal-nutrition	Bacteria: *Vibrio cholerae* serogroups O1 and O139	From few hours to 5 days, usually 2-3 days	Ingestion of infective dose of contaminated food or water	**Prevention:** Oral cholera vaccines; wear protective gear when in contact with an infected person; concurrent disinfection **Control:** cohorting of patients infected with same pathogen; quarantine not recommended.

Disease name	Identification (Clinical features)	Case Fatality Rate (CFR)	Infectious Agent	Incubation period	Mode of transmission	Methods of prevention and control
Zika	Mild fever, skin rashes, conjunctivitis, muscle and joint pain, headache		Virus: F*lavivirus*	Usually 2-14 days	Bite of infected mosquitoes; sexual transmission; mother to foetus transmission; transfusion	**Prevention:** Manage mosquito vector habitats; no vaccine available **Control:** Use bed net for patients; no specific treatment available; quarantine not recommended.
Yellow fever	Acute viral disease; fever, chills, headache, nausea, vomiting	Varies from 5% in endemic regions to 20-40% during outbreaks	Virus*: Flavivirus*	3-6 days	Bite of infected mosquitoes; transfusion	**Prevention:** Immunisation **Control:** prevent access of mosquitos to patient; take blood and fluid precautions; quarantine not recommended.
Dengue fever	Acute febrile viral disease; sudden fever, intense headache, nausea, vomiting	Varies from 1% with early diagnosis and medical care to over 20%[92]	Virus: *Flavivirus* serotypes 1, 2, 3, 4	From 3-14 days, commonly 4-7 days	Bite of infected mosquitoes	**Prevention:** manage mosquito habitats **Control:** prevent access of mosquitos to patient; take blood precautions; quarantine not recommended.
Chikungunya	Sudden fever, muscle pain, nausea, fatigue, joint pain	Estimated at 1%[93]	Virus: *Flavivirus*	From 1-12 days, typically 3-5 days	Bite of infected mosquitoes	**Prevention:** manage mosquito habitats **Control:** prevent access of mosquitos to patient; take blood precautions; quarantine not recommended.
Rift Valley fever	Acute febrile viral disease; sudden fever, intense headache, nausea, vomiting	Estimated 0.5% - 2%	Virus: *Phlebovirus*	3-12 days	Bite of infected mosquitoes; handling of animal tissue; transmission by aerosols or contact with highly infective blood	**Prevention:** precautions in care and handling of infected animals and their products, as well as human acute phase blood; immunisation with inactivated cell vaccine. **Control:** Isolation of infected persons; concurrent disinfection

Photo courtesy of Terre des hommes / Olivier Girard / Burkina Faso 2016

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Below: Ebola tore through Sierra Leone two years ago, claiming around 4,000 lives in the country and devastating one of the world's most fragile economies. Sierra Leone was declared Ebola-free in November 2015 but the impact on families and communities will be felt for years to come, and it will take many years to fully recover. Photo courtesy of Plan International.

THE ALLIANCE
FOR CHILD PROTECTION
IN HUMANITARIAN ACTION

Photo courtesy of Plan International.