

WEEKLY BULLETIN ON OUTBREAKS AND OTHER EMERGENCIES

Week 47: 18 – 24 November 2019

Data as reported by: 17:00; 24 November 2019



World Health Organization

REGIONAL OFFICE FOR **Africa**
WHO Health Emergencies Programme

1

New event

60

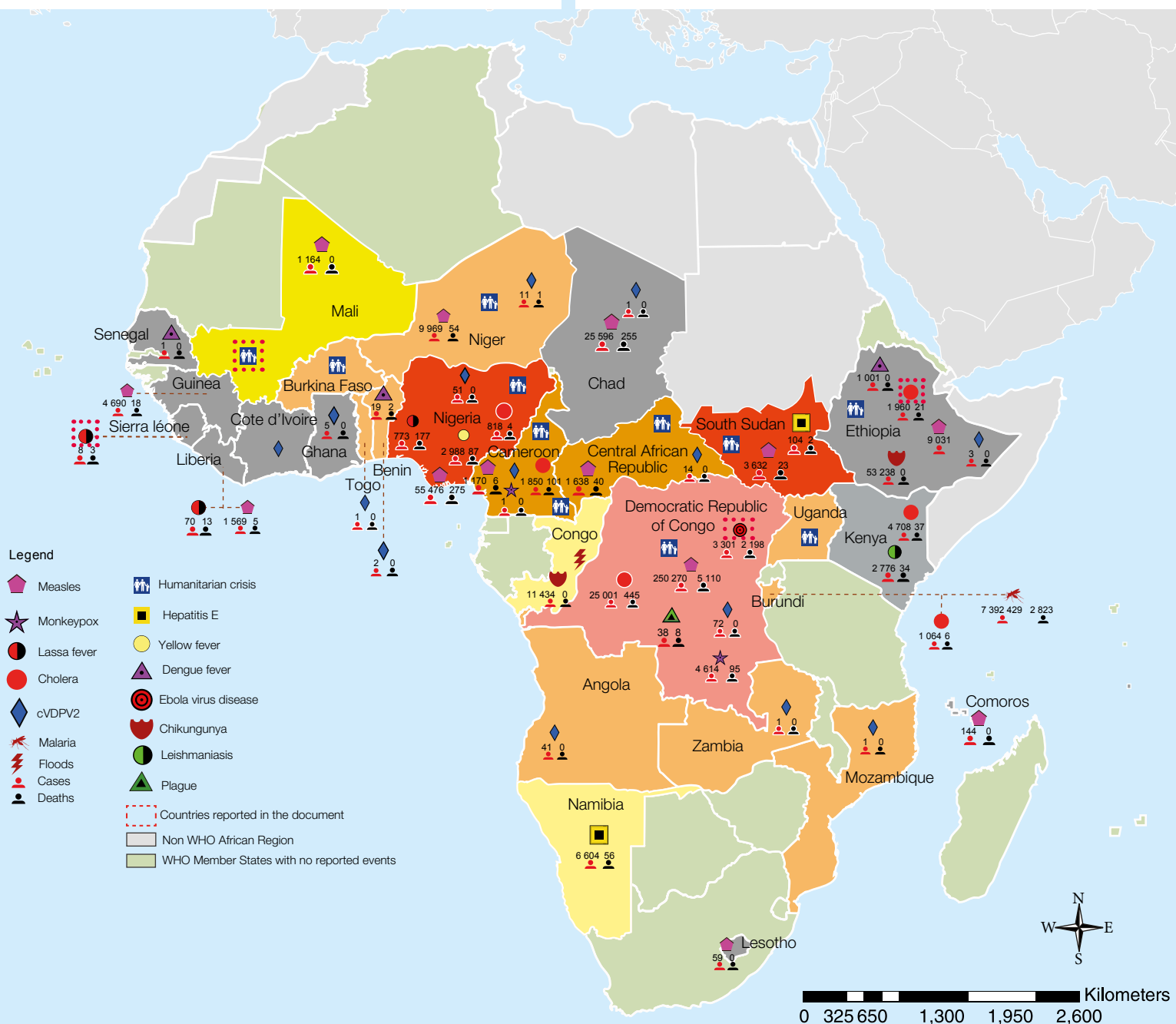
Ongoing events

50

Outbreaks

11

Humanitarian crises



Overview

Contents

- 2 Overview
- 3 New event
- 4 - 6 Ongoing events
- 7 Summary of major issues, challenges and proposed actions
- 8 All events currently being monitored

This Weekly Bulletin focuses on public health emergencies occurring in the WHO African Region. The WHO Health Emergencies Programme is currently monitoring 61 events in the region. This week's main articles cover key new and ongoing events, including:

- [Lassa fever in Sierra Leone](#)
- [Ebola virus disease in Democratic Republic of the Congo](#)
- [Cholera in Ethiopia](#)
- [Humanitarian crisis in Mali.](#)

For each of these events, a brief description, followed by public health measures implemented and an interpretation of the situation is provided.

A table is provided at the end of the bulletin with information on all new and ongoing public health events currently being monitored in the region, as well as recent events that have largely been controlled and thus closed.

Major issues and challenges include:

- An outbreak of Lassa fever has been reported in The Netherlands, with origin in Sierra Leone, where a cluster of cases have been identified. Contacts have also been identified in several other countries. This event has highlighted the ease with which infectious diseases can spread across nations and the need for countries to maintain a high level of alert at all times. All countries, especially those in the African region, should maintain the impetus generated with the occurrence of major Ebola epidemics, to ramp up measures for outbreak prevention, preparedness and control.
- The Ebola virus disease (EVD) in Democratic Republic of the Congo continues to improve, with the number of new cases greatly declining to a low level and transmission limited to few areas. While this trend is encouraging, the gains made so far could be easily eroded by the kind of insecurity and civil unrest experienced during the week. It is hoped that the security situation will normalize to allow Ebola responders to reach all parts of remote communities where transmission has persisted.

EVENT DESCRIPTION

On 20 November 2019, health authorities in The Netherlands notified WHO of a confirmed Lassa fever case, with a travel history to Sierra Leone. On 24 November 2019, the Ministry of Health in Sierra Leone formally notified WHO of the Lassa fever outbreak in the country. The first confirmed case-patient was a male Dutch medical doctor who worked in Masanga hospital, Tonkolili District, Sierra Leone. He fell ill on 11 November 2019 with non-specific constitutional symptoms and was initially treated with antimalarials and antibiotics, with no improvement. The case-patient was evacuated to The Netherlands on 19 November 2019 in a dedicated air ambulance but without barrier nursing procedures. Laboratory investigation conducted at the Erasmus University Medical Centre in Rotterdam showed Lassa virus infection by polymerase chain reaction (PCR) on 20 November 2019. The case-patient died on the night of 23 November 2019.

On 21 November 2019, a second Lassa fever case was confirmed in a female Dutch healthcare worker, who worked (alongside the first confirmed case to perform two surgical procedures) in Masanga hospital. This case-patient developed illness on 11 November 2019. Blood and urine specimens collected and shipped (in the air ambulance) to the Erasmus University Medical Centre on 19 November 2019 tested positive for Lassa virus infection by PCR on 21 November 2019. The case-patient has since been evacuated to The Netherlands under barrier-nursing procedures.

On 22 November 2019, the Kenema Hospital laboratory confirmed a third Lassa fever case in a local nurse anaesthetist who worked alongside the first two confirmed cases in Masanga hospital. Three additional suspected Lassa fever cases have been identified in Sierra Leone, all healthcare workers in Matsanga hospital. All but one participated in the said surgical procedures. Test results of the three suspected cases are being validated.

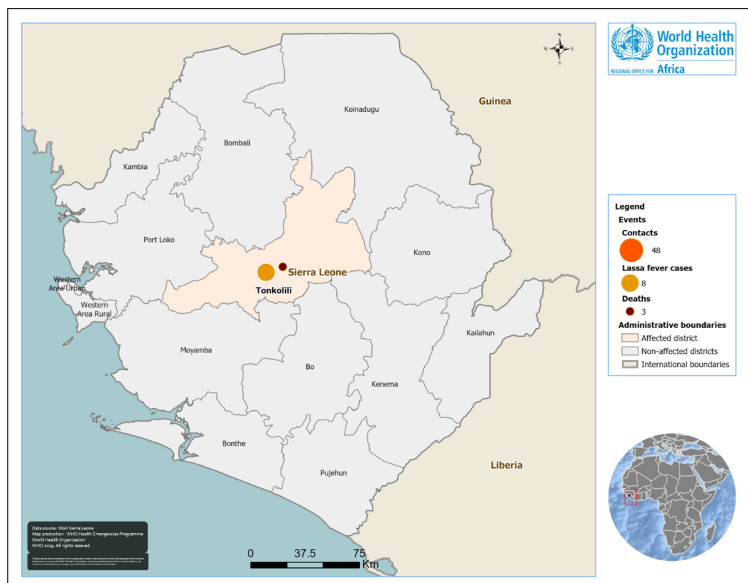
Retrospective investigations established that the three-confirmed case-patients, with other healthcare workers, performed two separate surgical procedures on two patients with maternal health-related conditions in Masanga hospital on 4 November 2019. Both patients died post-operatively on 4 and 19 November 2019, respectively, and are being considered as the origin of this outbreak – thus probable cases.

As of 25 November 2019, a total of 48 contacts have been identified and are being monitored in Denmark, Germany, Sierra Leone, The Netherlands, Uganda and United Kingdom. Further investigations on this event are ongoing and update will be provided as more information becomes available.

PUBLIC HEALTH ACTIONS

- The National IHR Focal Points in The Netherlands and Sierra Leone formally notified WHO of the event in their countries. The National IHR Focal Points and health authorities in all countries that had links to the events have been informed to take necessary precautionary measures. Those involved include The Netherlands, Germany, Morocco, Sierra Leone, United Kingdom, Uganda and Denmark.
- On 24 November 2019, the Ministry of Health convened an emergency national task force meeting to strategize and plan for the response to this outbreak. Task force meetings have been constituted in Tonkolili and Bombali districts to coordinate response activities at local level.

Geographical distribution of Lassa fever cases in Sierra Leone, 4 - 25 November 2019.



- The Ministry of Health in Sierra Leone, supported by US CDC and WHO, has deployed the national rapid response team to conduct outbreak investigations in all areas with links to this event, including Tonkolili and Bombali districts.
- Contact tracing and monitoring activities have been initiated in Sierra Leone, The Netherlands, Germany, United Kingdom and Uganda, set to go for 21 days following the last potential exposure.
- The suspected cases have been isolated in Kenema and Masanga hospitals, and are undergoing clinical and nursing care.

SITUATION INTERPRETATION

A cluster of Lassa fever cases has been confirmed in Sierra Leone, with excursion to The Netherlands and contacts being identified in several other countries. This event highlights the importance of applying standard universal precautions while taking care of and providing treatment to all patients, regardless of their perceived or confirmed infectious status. Standard precautions are meant to reduce the risk of transmission of bloodborne and other pathogens from both recognized and unrecognized sources. Given the nonspecific presentation of viral haemorrhagic fevers, consistent implementation of these measures is key to preventing secondary transmission.

Health authorities and partners in Sierra Leone need to put in stringent measures to ensure that thorough investigations are conducted, all contacts are meticulously identified and followed up.

EVENT DESCRIPTION

During the reporting week 47 (week ending 24 November 2019), there was increased insecurity and civil unrest in Beni, Butembo and Oicha health zones, Democratic Republic of the Congo, disrupting Ebola response activities. This is of grave concern, not least to the Ebola response, as gains made against the outbreak could be lost if such violence continues.

Since our last report on 17 November 2019 ([Weekly Bulletin 46](#)), there have been nine new confirmed cases and three new deaths. Four health zones, Beni, Mabalako, Mandima and Oicha reported new confirmed cases in the past seven days. Eleven health zones and 18 health areas reported confirmed cases in the past 21 days (3 to 23 November 2019), with the principle hot spots being Mabalako (58%; $n=15$ cases) and Beni (31%; $n=8$). Nyakunde Health Zone has had no new confirmed cases for the past 42 days.

As of 23 November 2019, a total of 3 301 EVD cases, including 3 183 confirmed and 118 probable cases have been reported. To date, confirmed cases have been reported from 29 health zones: Ariwara (1), Bunia (4), Komanda (56), Lolwa (6), Mambasa (78), Mandima (340), Nyakunde (2), Rwampara (8) and Tchomia (2) in Ituri Province; Alimbongo (5), Beni (688), Biena (18), Butembo (285), Goma (1), Kalunguta (193), Katwa (651), Kayna (28), Kyondo (25), Lubero (31), Mabalako (401), Manguredjipa (18), Masereka (50), Musienene (84), Mutwanga (32), Nyiragongo (3), Oicha (63), Pinga (1) and Vuhovi (103) in North Kivu Province and Mwenga (6) in South Kivu Province.

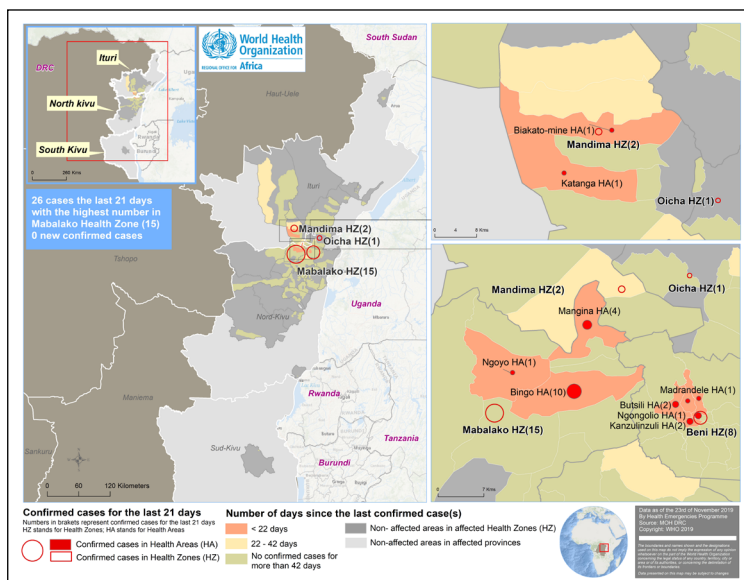
As of 23 November 2019, a total of 2 198 deaths were recorded, including 2 080 among confirmed cases, resulting in a case fatality ratio among confirmed cases of 65% (2 080/3 183). The cumulative number of health workers remains 163, which is 5% of the confirmed and probable cases to date.

Contact tracing is ongoing in five health zones. A total of 3 371 contacts are under follow-up as of 23 November 2019, of which 2 878 (85%) have been seen in the past 24 hours. Alerts in the affected provinces continue to be raised and investigated. Of 2 833 alerts processed (of which 2 708 were new) in reporting health zones on 23 November 2019, 2 5686 were investigated and 349 (13%) were validated as suspected cases.

PUBLIC HEALTH ACTIONS

- Surveillance activities continue, including case investigations, active case finding in health facilities and communities, and identification and listing of contacts around the latest confirmed cases. Cross-border collaboration continues, particularly with Uganda and Rwanda.
- As of 23 November 2019, a cumulative total of 255 136 people have been vaccinated since the start of the outbreak in August 2018.
- Point of Entry/Point of Control (PoE/PoC) screening continues, with over 121 million screenings to date. A total of 96/110 (88%) PoE/PoC transmitted reports as of 23 November 2019.

Geographical distribution of confirmed Ebola virus disease cases reported from 3 to 23 November 2019, North Kivu, South Kivu and Ituri provinces, Democratic Republic of the Congo



- There are continued community reintegration and psychosocial activities for patients discharged from ETCs, along with psychoeducation sessions to strengthen community engagement and collaboration in the response.
- Water, sanitation and hygiene (WASH) activities continue, and prevention measures at Bingo primary school have been strengthened following negotiations around decontamination.
- Community awareness and mobilization messages are being updated, revised and harmonized and have been pre-tested by the commission and will subsequently be shared in coordination and sub-coordination activities.
- As part of the zero-case Ebola campaign in Biakato, a conference-debate was organized with the Babila-Babombi Youth Parliament.
- In order to improve their perception of the management of TB and CTE patients, a guided tour of the Mangina and Komanda CTEs was organized for the indigenous peoples of the Buhumbani health area, Mabalako Health Zone.

SITUATION INTERPRETATION

The current declining trend in the number of new confirmed EVD cases is encouraging, although low level of transmission is still occurring in Mandima, Mabalako and Beni. The resumption of violence against civilians in Beni and surrounding areas is of grave concern as this will affect continuing outbreak control measures in those areas and create an environment for unhindered propagation of the disease in the community. It is critical that all areas of response remain effective, engaged and fully resourced.

EVENT DESCRIPTION

The cholera outbreak in Ethiopia, which has been ongoing since late April 2019, continues at a low level. There has been a slight upsurge in the number of new cases in recent weeks, following a steady drop from week 39, when a peak of 170 cases was reached, to a low of 15 cases in week 43. In week 46 (week ending 17 November 2019), a total of 31 suspected cholera cases were reported (with no associated deaths), compared to 51 cases reported in week 45. The upsurge has occurred in Somali and Afar regions.

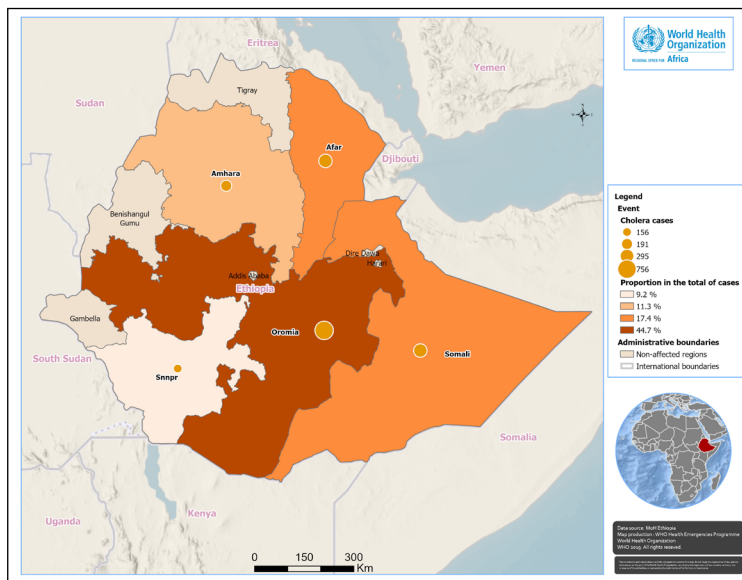
As of 17 November 2019, a cumulative total of 1 960 with 21 deaths (case fatality ratio 1.1%) has been reported in nine regions. The outbreak started in Amhara region on 24 April 2019. The most affected regions are Oromia (756), Afar (295), Somali (293), Amhara (191) and Southern Nations Nationalities Peoples (SNNP) (156). So far, 93 stool samples were tested for *Vibrio cholerae* with 60 yielding growth of the microbe on culture.

The most affected age group are people between the age of 15 and 44, accounting for 52% of all cases. The outbreak has affected more males than females with a ratio of 1.1:1. The main propagating factors of the outbreak include insufficient potable water, poor sanitary and hygiene facilities among populations in many of the affected communities. The affected regions, particularly Afar, have frequently experienced outbreaks of acute watery diarrhoea in recent years.

PUBLIC HEALTH ACTIONS

- Public health officers and data managers have been deployed to all affected regions to provide technical support to surveillance activities including active case search and management of data
- WHO donated 2000 cholera rapid diagnostic test (RDT) kits to facilitate early diagnosis of cases.
- Water quality testing for coliforms is ongoing in affected communities to guide water purification activities.
- Case management is ongoing in designated treatment facilities in the regions with active outbreak.
- Community engagement activities are also ongoing in the affected communities, including dialogue with local and opinion leaders and dissemination of preventive messages through various channels

Geographical distribution of cholera cases in Ethiopia, 24 April - 17 November 2019.



- An Oral Cholera Vaccine (OCV) campaign has been conducted, covering 489 112 people during the first round of the exercise.

SITUATION INTERPRETATION

The cholera outbreak in Ethiopia continues, with a recent upsurge of cases seen in Afar and Somali regions. Outbreak response activities are ongoing in affected communities, including enhanced surveillance, case management, water, sanitation and hygiene (WASH) and community engagement. Non-the-less, there is a need to establish the reasons for the recent upsurge and implement targeted interventions guided by sound epidemiologic analysis.

EVENT DESCRIPTION

The humanitarian crisis in Mali continues to deteriorate despite the multifaceted efforts implemented since 2012. The security situation continues to worsen in the Northern and Central regions of the country, with persisting attacks by armed groups, ongoing intra- and inter-community conflicts and increasing population displacement. In total, 2 759 432 people have been affected by the crisis and 1 146 314 are in need of humanitarian assistance.

As of 31 September 2019, a total of 187 139 Internally Displaced Persons (IDPs) were recorded, representing a 9% (15 702) increase since 31 August 2019. The increase in the number of IDPs has been linked to violent attacks in the regions of Mopti, Gao, Segou, Timbuktu, Ménaka, Sikasso and the border strip between Mali and Burkina Faso. In parallel, 74 205 returnees have been recorded in the month of September 2019, an increase of 62 people compared to August 2019.

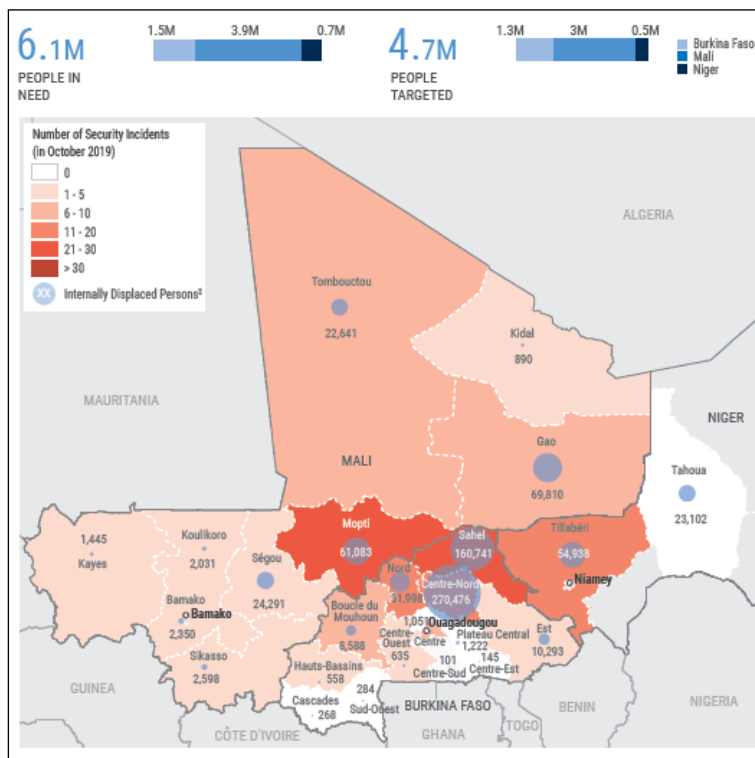
According to the internal displacement monitoring report produced in June 2019, insecurity was the main cause of displacement for 98% of IDPs whereas conflict-induced economic difficulties, food insecurity and fear of attacks accounted for 2% of displacements. Overall, more than 76% of displaced households received one-time humanitarian assistance. However, despite this assistance, urgent humanitarian needs persist in all sectors.

The country is concurrently experiencing various infectious disease outbreaks, including measles, malaria and dengue fever. Since the beginning of the year as of week 46 (week ending 17 November) the country reported 338 confirmed cases of measles, 1 569 221 confirmed cases of malaria and seven confirmed cases of dengue fever. Furthermore, a total of 5 562 cases of acute malnutrition were detected during epidemiological week 45 (week ending 10 November) compared to 6 313 in the preceding week.

PUBLIC HEALTH ACTIONS

- WHO continues to provide technical support to regional health departments to strengthen epidemiological surveillance and support emergency management, particularly in the northern and central regions.
- The Directorate of Health Emergencies Operations continues to train emergency response teams (including the Incident Managers) at the regional level. During week 4 620 people were trained in Segou.
- Response interventions to combat the dengue outbreak are ongoing with a focus on the Koulikoro region. The response measures include vector control, epidemiological surveillance, community awareness on disease prevention measures, and coordination.
- The campaign for the distribution of long-lasting insecticide-treated bed nets continues in the northern regions.

Map of Internally Displaced Persons in Mali,
as of 15 November 2019



- The implementation of the HeRAMS survey is ongoing in seven regions, namely: Bamako, Kayes, Koulikoro, Gao, Mopti, Sikasso, and Timbuktu.

SITUATION INTERPRETATION

The humanitarian situation in Mali remains complex and volatile. The number of IDPs continues to rise as a result of the deteriorating security context. Due to its high exposure to risk of conflicts, drought and flood, the country remains particularly vulnerable to humanitarian crises and natural disasters. The humanitarian response, which is based on an overview of humanitarian needs and the humanitarian plan, has been facing challenges in reaching the populations most affected by the crisis. For this reason, WHO and the Health Cluster should undertake an advocacy to improve the analysis of humanitarian needs, particularly in the health sector. Finally, the persistence of the measles outbreak is concerning. In 2018 the Demographic and Health Survey in Mali showed that only 69.8% of children are vaccinated against measles, which is below the coverage required to protect the community. There is a need to establish solid routine immunization systems capable of delivering two doses of measles vaccine to each child.

Summary of major issues, challenges and proposed actions

Major issues and challenges

- A cluster of Lassa fever cases has been confirmed in Sierra Leone, with cases exported to The Netherlands and contacts identified in several countries. The outbreak was primarily amplified by failure to adhere to standard universal precautions and highlights the need for consistently adhering to standard infection prevention and control measures when caring for patients to prevent nosocomial infections. Additionally, this event demonstrates the ease with which infectious diseases can spread across nations and the need for countries to maintain a high level of alert at all times.
- Significant improvement has been made in controlling the EVD outbreak in Democratic Republic of the Congo, with the number of new confirmed cases coming down to single digits after several months. While this trend is encouraging, the outbreak still has the potential to escalate if intervention measures are not sustained, especially in the light of the insecurity and civil unrest seen during the reporting week. It is hoped that the security situation will normalize to allow Ebola responders to reach all parts of remote communities where transmission is still ongoing.

Proposed actions

- The national authorities and partners in Sierra Leone need to conduct in-depth outbreak investigation into this event and implement robust measures to contain this outbreak promptly. Emphasis should be laid on identifying all potential chains of transmission, followed by meticulous contact tracing and monitoring. All countries in the African region should maintain efforts to strengthen measures for outbreak prevention, preparedness and control.
- The national authorities and partners in Democratic Republic of the Congo should continue to implement all aspects of Ebola outbreak control activities. The Government of the Democratic Republic of the Congo, the United Nations and all global stakeholders should enhance efforts to restore peace and security in the country.

All events currently being monitored by WHO AFRO

Country	Event	Grade	Date notified to WHO	Start of reporting period	End of reporting period	Total cases	Cases Confirmed	Deaths	CFR
New Events									
Sierra Leone	Lassa fever	Ungraded	20-Nov-19	30-Oct-19	24-Nov-19	8	3	3	37.50%
Full update given above.									
Ongoing Events									
Angola	Poliomyelitis (cVDPV2)	Grade 2	8-May-19	5-Apr-19	13-Nov-19	41	41	0	0.00%
Three new cases of cVDPV2 were reported this week from Huambo (1), Uige (1), and Moxico (1) provinces. The onsets of paralysis were between 23 September and 1 October 2019. There are now 41 cVDPV2 cases from seven outbreaks reported in 2019.									
Benin	Dengue fever	Ungraded	13-May-19	10-May-19	17-Oct-19	19	11	2	10.50%
Between 10 May and 17 October 2019, a total of 19 suspected cases of dengue fever, including two deaths, were reported from Atlantique, Littoral, Ouémé and Couffo Departments. Cumulatively, 11 cases from Atlantique Department (4 cases), Littoral Department (4 cases) and Ouémé Department (3 cases) were confirmed by serology and PCR at the Benin National VHF Laboratory. Two deaths, one of which occurred in a dengue haemorrhagic fever case, were notified among the confirmed cases (CFR 18%).									
Benin	Poliomyelitis (cVDPV2)	Grade 2	8-Aug-19	8-Aug-19	13-Nov-19	2	2	0	0.00%
No case of circulating vaccine-derived poliovirus type 2 (cVDPV2) was reported this week. There are two cVDPV2 cases in 2019 linked to the Jigawa outbreak in Nigeria.									
Burkina Faso	Humanitarian crisis	Grade 2	1-Jan-19	1-Jan-19	24-Nov-19	-	-	-	-
Since 2015, the security situation initially in the regions of the Sahel and later in the East of Burkina Faso has gradually deteriorated as a result of attacks by armed groups. This has resulted in mass displacement leading to a total of 486 360 internally displaced persons registered as of 8 October 2019 in all 13 regions in the country. The regions of North, Boucle du Mouhoun, East and Centre are the most affected. Health services are severely affected and as of 27 September 2019, Ministry of Health figures show that 69 health facilities in six regions have closed as a result of insecurity; 28% in the Sahel Region and 12% in North Central Region. Morbidity due to epidemic-prone diseases remains high.									
Burundi	Cholera	Ungraded	5-Jun-19	1-Jun-19	5-Nov-19	1 064	288	6	0.60%
From 1 June to 5 November 2019, a total of 1 064 cases with six deaths (CFR 0.6%) were reported from 11 health districts. The most affected health districts are Bujumbura North (328 cases), Bujumbura Centre (144 cases) and Bujumbura South (125 cases) in Bujumbura Mairie, Isale (155 cases) in Bujumbura rural province, Cibitoke (194 cases) in Cibitoke province. Of 383 samples tested, 288 (75%) were positive for <i>Vibrio cholerae</i> Ogawa. The most affected age-group is 5 to 50 years representing more than 70% of cases. Males and females are equally affected with a male to female ratio of 1.									
Burundi	Malaria	Grade 2		1-Jan-19	27-Oct-19	7 392 429		2 823	0.00%
Since week 48 of 2018 (week ending 2 December 2018), there has been a progressive increase in the number of malaria cases reported across the 46 districts of Burundi, with the epidemic threshold surpassed in week 18 of 2019 (week ending 5 May 2019). In week 43 (week ending 27 October 2019), 150 083 cases including 66 deaths have been reported. There is a 54 % increase in the number of cases reported in week 43 of 2019 compared to the same period in 2018.									
Cameroon	Humanitarian crisis (Far North, North, Adamawa & East)	Protracted 2	31-Dec-13	27-Jun-17	27-Sep-19	-	-	-	-
Cameroon continues to face a humanitarian crisis in the Far North Region linked to the terrorist attacks by Boko Haram group, with significant population displacement. Since the beginning of September 2019, there have been 23 attacks, including pure criminal activity, with 22 deaths and 17 injuries reported. Population displacement is ongoing, with spontaneous arrival of Nigerian refugees in the Minawao Camp, Mokolo Health District. As of 13 September 2019, the camp population was 59 456, mainly Nigerian refugees, with 356 new arrivals monthly, severely straining the camp infrastructure. Recently, the Nigerian government started repatriation of refugees, with around 400 people repatriated.									
Cameroon	Humanitarian crisis (NW & SW)	Grade 2	1-Oct-16	27-Jun-18	27-Sep-19	-	-	-	-
The humanitarian situation in the Northwest and Southwest (NW & SW) of Cameroon continues to deteriorate with serious protection incidents reported. Humanitarian access to persons in need continues to be a challenge with armed groups often blocking access as well as threatening humanitarian personnel. This unrest continues to affect access to basic services including healthcare, education, shelter, food security and WASH. As of 27 September 2019, the total number of internally displaced persons is estimated at 437 000 persons and the population in need of humanitarian assistance is estimated at 594 000 persons. An estimated 39 000 people have fled to the Littoral and Western regions, and 20 291 people (of which 80% women and children) have crossed into neighbouring Nigeria.									
Cameroon	Cholera	Ungraded	1-Mar-19	1-Mar-19	21-Nov-19	1 850	208	101	5.50%
The cholera outbreak in Cameroon is ongoing in the North, Far North and South West regions. In week 46 (week ending 15 November 2019), 100 cases of suspected cholera were reported in the three regions. As of 21 November 2019, 1 850 cases and 101 deaths were recorded (CFR 5.5%). Of the 305 stool samples tested for <i>Vibrio cholerae</i> , 208 tested positive.									
Cameroon	Measles	Ungraded	2-Apr-19	1-Jan-19	11-Aug-19	1 170	269	6	0%
A measles outbreak is ongoing in Cameroon. Since the beginning of 2019, a total of 1 170 suspected cases have been reported. Of these, 269 were confirmed as IgM-positive. The outbreak is currently affecting 33 districts, namely, Kousséri, Mada, Gouffey, Makary, Kolofata, Koza, Ngaoundéré rural, Bangoué, Guider, Figuil, Ngong, Mora, Maroua 3, Vélé, Pitoa, Maroua 1, Bourha, Touboro, Mogodé, Bibémi, Garoua 1, Garoua 2, Lagdo, Tcholliré, Guidiguiss, Moutourwa, Mokolo, Cité verte, Djoungolo, Nkolindongo, Limbé, Garoua Boulai, Ngaoundéré Urbain.									

Country	Event	Grade	Date notified to WHO	Start of reporting period	End of reporting period	Total cases	Cases Confirmed	Deaths	CFR
Cameroon	Monkeypox	Ungraded	27-Sep-19	18-Sep-19	27-Sep-19	1	0	0	0.00%
A case of monkeypox was confirmed in Ekondo-Titi health district in the South West region of Cameroon on the 18 of September 2019. All supportive measures for case management were put in place and community- based surveillance has been stepped up in this area.									
Cameroon	Poliomyelitis (cVDPV2)	Grade 2	23-May-19	23-May-19	13-Nov-19	-	-	-	-
No case of cVDPV2 was reported in the past week. On 23 May 2019, WHO received notification through the Global Polio Laboratory Network (GPLN) of the detection of circulating vaccine-derived poliovirus type 2 (cVDPV2) from an environmental sample collected on 20 April 2019 in the Northern Province of Cameroon which borders Borno State in Nigeria and Chad. There are no associated cases of paralysis detected so far.									
Central African Republic	Humanitarian crisis	Protracted 2	11-Dec-13	11-Dec-13	12-Nov-19	-	-	-	-
Civil unrest and food insecurity in most parts of the country including major cities are continuing to cause a complex humanitarian situation. The city of Birao has been relatively calm after the last clashes between the armed groups on 14 September 2019. The latest assessment according to MINUSCA reported 38 killed and 17 wounded in this latest wave of violence, bringing the total of deaths to 62 and injuries to 36 since the beginning of the violence. OCHA estimates the total of 23 000 IDPs in Birao since the beginning of the crisis.									
Central African Republic	Measles	Ungraded	15-Mar-19	11-Feb-19	14-Oct-19	1 638	98	40	2.40%
As of week 41 (week ending on 13 October 2019), a total of 1 638 measles cases including 98 confirmed cases and 40 deaths have been reported in five districts: Batafango, Bocaranga-Koui, Nana-Gribizi, Paoua and Vakaga. The outbreaks have been controlled in Paoua and Vakaga.									
Central African Republic	Poliomyelitis (cVDPV2)	Grade 2	24-May-19	24-May-19	13-Nov-19	14	14	0	0.00%
No case of circulating vaccine-derived poliovirus type 2 (cVDPV2) was reported this week. There are 14 reported cases in 2019 from six different outbreaks of cVDPV2 in 2019.									
Chad	Measles	Ungraded	24-May-18	1-Jan-19	17-Nov-19	25 596	203	255	1.00%
In week 46 (week ending 17 November 2019), 132 suspected cases with 12 associated deaths were reported. 18 districts were in the epidemic phase in week 46. Since the beginning of the year, a total of 25 596 suspected cases and 255 deaths (CFR 1.0%) have been reported with Am Timan, N'Djamena East, N'Djamena South, Bongor, Moundou, Bousso and N'Djamena Centre districts all exceeding 1 000 suspected cases. Among the 1 770 cases investigated, 203 were IgM-positive, 79% were not vaccinated, and 47% were aged between 1 and 4 years old.									
Chad	Poliomyelitis (cVDPV2)	Grade 2	18-Oct-19	9-Sep-19	13-Nov-19	1	1	0	0.00%
No new case of circulating vaccine-derived poliovirus type 2 (cVDPV2) was reported this week. One case has been reported so far this year from Mandelia in Chari-Baguirmi province. The onset of paralysis was 9 September 2019. This is the first cVDPV2 case in the country and it is linked to the Jigawa outbreak in Nigeria.									
Comoros	Measles	Ungraded	26-May-19	20-May-19	20-Oct-19	144	58	0	0.00%
As of 20 October 2019, a total of 144 suspected cases with zero deaths have been reported from health facilities in Grande Comore Island. Of these, 58 cases have been confirmed (39 laboratory-confirmed and 19 by epidemiological link). IgM-positive cases were reported in five districts of Grande Comore, namely, Moroni (28), Mitsamiouli (6), Mbeni (3), Oichili (1) and Mitsoudjé (1). The 19 epi-linked cases are from Moroni district.									
Congo	Floods	Ungraded	22-Nov-19	3-Oct-19	4-Nov-19	-	-	-	-
On 3 October, heavy rains resulted in floods in the department of Likouala. As a result of the floods, homes and public infrastructures (schools, health centres, water points, latrines, etc.) have been destroyed leaving the affected population in precarious living conditions and with limited access to health care. Furthermore, the floods have caused significant damage to the agricultural and farming sectors thus posing a threat to food security. As of 4 November 2019, 17 353 people were affected and 3 913 homes were destroyed. The villages of Liboko, Eboko and Ikpebele were the most affected. Some of the displaced people have moved towards the Democratic Republic of the Congo.									
Congo	Chikungunya	Grade 1	22-Jan-19	7-Jan-19	29-Sep-19	11 434	148	0	0.00%
In week 39 (from 23 to 29 September 2019), a total of 9 new chikungunya cases were reported across the country against 56 cases in week 38 and 15 cases in week 37. The hotspots are the departments of Plateaux and Bouenza, accounting for 64% and 14% of cases reported from week 37 to week 39, respectively. Since the beginning of the outbreak, a total of 11 434 cases have been reported in 44 out of the 52 health districts of the country. The affected areas include densely populated zones such as Brazzaville and Pointe-Noire.									
Côte d'Ivoire	Poliomyelitis (cVDPV2)	Ungraded	29-Oct-19	29-Oct-19	29-Oct-19	-	-	-	-
On 28 October 2019, a cVDPV2 was isolated from an environmental sample collected on 24 September 2019 from Jacob city, Abidjan, Cote d'Ivoire. The isolated cVDPV2 is linked to a virus detected in Niger in 2018 that belongs to the Jigawa emergence group, which has previously also been detected in Cameroon, Chad, Niger, Benin, Ghana, and Togo. Moreover, the isolated virus has undergone 17 nucleotide changes. The area has not been participating in previous mOPV2 response campaign.									
Democratic Republic of the Congo	Humanitarian crisis	Grade 3	20-Dec-16	17-Apr-17	18-Nov-19	-	-	-	-
The Democratic Republic of the Congo continues to experience a complex humanitarian crisis involving armed conflicts and inter-community tension resulting in large number of people in need of humanitarian assistance. Populations movement due to armed clashes continue to be reported in North-Kivu, Ituri and South-Kivu provinces. In Ituri, an estimated 227 000 internally displaced persons (IDPs) are living in 87 sites and 315 families have been repatriated from Uganda. In North-Kivu, more than 100 000 IDPs have been registered in Kamango health zone in Beni territory and Mweso health zone in Masisi territory. In South Kivu, clashes between armed groups, led to population displacement with an estimated 263 252 IDPs in Itombwe, Fizi, Nundu and Minembwe. In Kasai central, at least 790 people who were expelled from Angola (including 129 women and 73 children) were registered in Kamako between 6 and 12 October 2019.									

Country	Event	Grade	Date notified to WHO	Start of reporting period	End of reporting period	Total cases	Cases Confirmed	Deaths	CFR
Democratic Republic of the Congo	Cholera	Grade 3	16-Jan-15	1-Jan-19	3-Nov-19	25 001	-	445	1.80%
During week 44 (week ending 3 November 2019), a total of 610 suspected cases of cholera and 7 deaths (CFR 1.1%) were notified from 59 health zones in 16 provinces. The endemic provinces of North-Kivu, South-Kivu, Haut-Lomami, Haut-Katanga and Tanganyika account for 94% of cases reported during week 44. Between week 1 and week 44 of 2019, a total of 25 001 cases including 445 deaths (CFR 1.8%) have been notified from 23 out of 26 provinces. Compared to the same period in 2018 (week 1-44), there is a 5.6% increase in the number of reported cases and a 49% decrease in the number of deaths.									
Democratic Republic of the Congo	Ebola virus disease	Grade 3	31-Jul-18	11-May-18	23-Nov-19	3 301	3 183	2 198	66.70%
Detailed update given above.									
Democratic Republic of the Congo	Measles	Grade 2	10-Jan-17	1-Jan-19	3-Nov-19	250 270	6 304	5 110	2.00%
In week 44 (week ending 3 November 2019), 7 559 measles cases including 172 deaths (CFR 2.3%) were reported across the country, with four newly affected health zones. During this week, the case fatality rate was higher in the provinces of Bas-Uele (9.0%), Haut-Lomami (6.8%), Maniema (5.1%) and Tanganyika (4.6%). Since the beginning of 2019, 250 270 measles cases including 5 110 deaths (CFR 2.0%) have been recorded. In total, 238 (46%) of the 519 health zones across the 26 provinces of the country have reported a confirmed measles outbreak.									
Democratic Republic of the Congo	Monkeypox	Ungraded	n/a	1-Jan-19	3-Nov-19	4 614	-	95	2.10%
Since the beginning of 2019, a cumulative total of 4 614 monkeypox cases, including 95 deaths (CFR 1.8%) were reported from 16 provinces. In week 44 (week ending 3 November 2019), 104 cases and no death were reported nationally.									
Democratic Republic of the Congo	Plague	Ungraded	12-Mar-19	28-Feb-19	3-Nov-19	38	-	8	21.10%
Since the beginning of the year, a total of 38 cases of bubonic plague including eight deaths have been reported in the province of Ituri. The first five cases were reported during week 10 in the Aungba endemic health zone. Two other cases were reported during week 13 (Aru health zone) and 14 (Aungba health zone). The latest cluster of cases was reported between week 39 (7 cases and 3 deaths) and 40 (14 cases) were reported from Aru health zone in Ituri Province. No new cases were reported in week 44.									
Democratic Republic of the Congo	Poliomyelitis (cVDPV2)	Grade 2	15-Feb-18	1-Jan-18	15-Nov-19	72	72	0	0.00%
Ten new cases of cVDPV2 were reported this week from Haut Lomami (4), Kwilu (4), and Kwango (2) provinces. There are 52 cVDPV2 cases in 2019 reported from Sakuru (19), Haut Lomami (15), Kasai (8), Kwilu (6), Kwango (2), Haut Katanga (1), Tshuapa (1), and Kasai Oriental (1) provinces. There were 20 cases of cVDPV2 reported in 2018.									
Ethiopia	Chikungunya	Ungraded	25-Jul-19	27-May-19	10-Nov-19	53 238	29	0	0.00%
Chikungunya cases have reported from Ethiopia since week 31 (week ending 30 July 2019). As of 10 November 2019, 53 238 suspected cases were reported from Dire Dawa City Administrative City and Araf regions									
Ethiopia	Cholera	Ungraded	14-May-19	12-May-19	17-Nov-19	1 960	60	21	1.10%
Detailed update given above.									
Ethiopia	Dengue	Ungraded	3-Nov-19	9-Sep-19	10-Nov-19	1 001	6	0	0.00%
Between week 37 and week 45 in 2019, a total of 1 001 suspected cases and 6 confirmed cases of dengue fever were reported from Afar region. The peak of the outbreak was observed in week 38 when more than 300 suspected cases were reported.									
Ethiopia	Measles	Ungraded	14-Jan-17	1-Jan-19	17-Nov-19	9 031	59	-	-
As of week 46 (week ending 17 November 2019), the measles outbreak is still ongoing with a total of 9 031 suspected measles cases reported from Oromia (5 382), Somali (2 340), Amhara (703) and Afar (548) regions. Children aged less than five years are the most affected accounting for 50.14% of the total cases followed by age group 15-44 years (25.43%). Seventy-two percent of the reported measles cases were not previously vaccinated.									
Ethiopia	Poliomyelitis (cVDPV2)	Ungraded	24-Jun-19	20-May-19	13-Nov-19	3	3	0	0.00%
No case of circulating vaccine-derived poliovirus type 2 (cVDPV2) was reported this week. There are three cVDPV2 cases reported in Ethiopia in 2019, all linked to the outbreak in neighbouring Somalia.									
Ghana	Poliomyelitis (cVDPV2)	Ungraded	9-Jul-19	8-Jul-19	13-Nov-19	5	5	0	0.00%
No case of circulating vaccine-derived poliovirus type 2 (cVDPV2) was reported this week. There are five cVDPV2 cases in 2019 linked to the Jigawa outbreak in Nigeria.									
Guinea	Measles	Ungraded	9-May-18	1-Jan-19	3-Nov-19	4 690	1 091	18	0.30%
During week 44 (week ending 3 November 2019), 127 suspected cases of measles were reported. From week 1 to 44 (1 January – 3 November 2019), a total of 4 690 suspected cases including 18 deaths (CFR 0.4%) have been reported. Of the 4 690 suspected cases, 1 773 were sampled, of which 1 091 tested positive for measles by serology. Three localities in three health districts are in the epidemic phase, namely, Wanindara in Ratoma health district, Dounet in Mamou health district and Soumpoura in Tougue health district.									

Country	Event	Grade	Date notified to WHO	Start of reporting period	End of reporting period	Total cases	Cases Confirmed	Deaths	CFR
Kenya	Cholera	Ungraded	21-Jan-19	2-Jan-19	10-Nov-19	4 708	221	37	0.80%
In week 45 (week ending 10 November 2019), 31 new suspected cases were reported from Nairobi (22 cases), Wajir (6 cases), Garissa (3 cases). Since January 2019, twelve of the 47 Counties of Kenya reported cholera cases, namely: Embu, Garissa, Kajiado, Kisumu, Machakos, Makueni, Mandera, Mombasa, Nairobi, Narok, Turkana and Wajir Counties. The outbreak remains active in three counties: Garissa, Nairobi and Wajir.									
Kenya	Leishmaniasis	Ungraded	31-Mar-19	1-Jan-19	10-Nov-19	2 776	1 174	34	1.20%
In week 45 (week ending 10 November 2019), no new cases were reported. Since the beginning of the outbreak, suspected and confirmed cases of leishmaniasis have been reported from Mandera, Marsabit, Wajir and Garissa counties.									
Lesotho	Measles	Ungraded	26-Oct-19	25-Oct-19	16-Nov-19	59	4	0	0.00%
The measles outbreak in Lesotho is ongoing in Qacha's Nek district. As of 15 November, a total of 59 suspected cases have been reported, 4 of which are laboratory confirmed. No associated deaths have been reported. The coverage of measles vaccine in the affected area is 65%. The outbreak has affected more females with a M:F ratio of 1:2									
Liberia	Lassa fever	Ungraded	23-Jan-19	1-Jan-19	10-Nov-19	70	39	13	18.60%
During week 45 (week ending 10 November 2019), seven new suspected cases were reported across the country, of which four tested positive. From 1 January - 10 November 2019, a total of 137 suspected cases have been reported across the country. Of samples tested from 107 of the suspected cases at the National Public Health Reference Laboratory of Liberia, 39 were confirmed by RT-PCR and 67 were discarded due to negative test results. The case fatality ratio among confirmed cases is 33.3% (13/39).									
Liberia	Measles	Ungraded	24-Sep-17	1-Jan-19	17-Nov-19	1 569	237	5	0.30%
In week 46 (week ending on 17 November 2019), 43 suspected cases were reported from 7 out of 15 counties across the country. Since the beginning of 2019, 1 569 cases have been reported across the country, of which 237 are laboratory-confirmed, 109 are epi-linked, and 784 are clinically confirmed.									
Mali	Humanitarian crisis	Protracted 1	n/a	n/a	30-Oct-19	-	-	-	-
Detailed update given above.									
Mali	Measles	Ungraded	20-Feb-18	1-Jan-19	17-Nov-19	1 164	338	0	0.00%
As of week 46 (week ending on 17 November 2019), 1 164 suspected cases of measles have been reported from 49 districts in the country. Of these, 338 were confirmed IgM-positive.									
Mozambique	Poliomyelitis (cVDPV2)	Grade 2	7-Dec-18	7-Dec-18	13-Nov-19	1	1	0	0.00%
No case of circulating vaccine-derived poliovirus type 2 (cVDPV2) outbreak has been reported this week. There was one case reported in 2018.									
Namibia	Hepatitis E	Grade 1	18-Dec-17	8-Sep-17	20-Oct-19	6 604	1 608	56	0.80%
In weeks 41 and 42 (week ending 20 October 2019), 70 cases were reported from 11 regions of Namibia with the majority (36 cases) from Khomas region. There was an increase in the number of cases reported in the last two weeks compared to weeks 39 and 40. As of 20 October 2019, a cumulative total of 1 608 laboratory-confirmed, 4 141 epidemiologically linked, and 855 suspected have been reported countrywide. A cumulative number of 56 deaths have been reported nationally (CFR 0.8%), of which 24 (43%) occurred in pregnant or post-partum women. Cases have been reported from 12 out of 14 regions of Namibia, namely, Khomas, Omusati, Erongo, Oshana, Oshikoto, Kavango, Ohangwena, Omaheke, Hardap, Karas, Otjozondjupa, and Kunene regions.									
Niger	Humanitarian crisis	Protracted 1	1-Feb-15	1-Feb-15	19-Sep-19	-	-	-	-
The security situation continues to worsen in Niger following Boko Haram attacks in the region. A total of 70 000 people is displaced in Tillaberi, Maradi and Tahoua and more than 150 civilians were killed following the upsurge of armed attacks in 2019. As of 12 September 2019, the security and humanitarian situations remain worrying in areas bordering Burkina Faso, Mali and Nigeria, where Tillaberi, Tahoua, Diffa and Maradi regions are targets of armed groups operating on both sides of the border, as well as of reprisals by jihadists after G5 Sahel operations. In weeks 36 and 37 (week ending 14 September 2019) Tillaberi and Maradi have been particularly badly affected, with attacks on humanitarian vehicles near Tillaberi. In Maradi, more than 35 000 refugees from Sokoto, Zamfara and Katsina states have arrived, 70% of whom are under the age of 18 and more than 50% are women.									
Niger	Measles	Ungraded	10-May-19	1-Jan-19	19-Nov-19	9 969		54	0.50%
As of week 45 (week ending 19 November 2019), 9 969 suspected measles cases have been reported from eight regions the country. The cases have been reported in Maradi (3 571 cases including 8 deaths), Tahoua (1 909 including 25 deaths), Zinder (1 399 including 10 deaths), Niamey (1 271 with 1 death), Tillaberi (635 including 3 deaths), Agadez (519 including 3 death), Diffa (311 with no deaths) and Dosso (324 cases including 4 deaths). Since the peak of the outbreak in week 12, the case incidence has been on a continuous decline.									
Niger	Poliomyelitis (cVDPV2)	Grade 2	8-Jul-18	8-Jul-18	13-Nov-19	11	11	1	9.10%
No new cVDPV2 was reported in this week. Since the beginning of 2019 there has been one case reported from Bosso health district, Diffa region on 3 June 2019. A total of ten cVDPV2 cases were reported in 2018 in Niger, which were genetically linked to a cVDPV2 case in Jigawa and Katsina states, Nigeria.									
Nigeria	Humanitarian crisis	Protracted 3	10-Oct-16	n/a	31-Oct-19	-	-	-	-
The humanitarian crisis in the North-eastern part of Nigeria persists with continued population displacement from security compromised areas characterized by overcrowded populations in many camps in the region. Due to shrinking humanitarian space health partners are facing challenges in delivery of timely and urgent life-saving assistance as access challenges are impacting movement of mobile medical teams, ambulances, immunization staff and medical cargo in many locations across Borno state. The cholera outbreak in Adamawa state is ongoing, though the number of cases being reported is showing a downward trend.									

Country	Event	Grade	Date notified to WHO	Start of reporting period	End of reporting period	Total cases	Cases Confirmed	Deaths	CFR
Nigeria	Cholera	Ungraded	19-Jun-19	15-May-19	8-Nov-19	818	189	4	0.50%
Ten new cases of cholera were reported in Adamawa State between 31 October and 8 November 2019 from Yola North (5), Yola South (4), and Girei (1) Local Government Areas. From 15 May to 8 November 2019, a cumulative total of 818 cases with four deaths have been reported from four LGAs: Yola North (499 cases with two deaths), Girei (197 cases with one death), Yola South (121 cases with one death), and Song (1 case with zero deaths). Of 440 stool specimens collected and analysed at the state specialist hospital, 189 cultured <i>Vibrio cholerae</i> as the causative agent.									
Nigeria	Lassa fever	Ungraded	24-Mar-15	1-Jan-19	3-Nov-19	773	754	177	22.90%
During week 44 (week ending 3 November 2019), 11 new confirmed cases with one death were reported from Edo (5 cases with one death), and Ondo (6 cases) states. Eighty-six Local Government Areas (LGAs) across 23 states have reported at least one confirmed case since the beginning of 2019. Nineteen (19) health care workers across 10 states have been infected since the beginning of 2019. A total of 356 contacts are currently being followed.									
Nigeria	Measles	Ungraded	25-Sep-17	1-Jan-19	30-Sep-19	55 476	2 150	275	0.50%
Between epi weeks 35 - 39 (week ending 30 September 2019), a total of 1 544 suspected cases of measles were reported from 36 states including 3 deaths (CFR 0.2%). Katsina (309), Borno (219), Kano (309), Yobe (91), Ekiti (65), Lagos (65) and Sokoto (65) account for 59% of all the cases reported in the time period. Between epi week 1 and 39, a total of 55 476 suspected cases have been recorded from 754 LGAs in 36 states and FCT with 257 deaths (CFR 0.5%). Of the 10 236 samples tested, 2 150 were IgM positive for measles.									
Nigeria	Poliomyelitis (cVDPV2)	Grade 2	1-Jun-18	1-Jan-18	13-Nov-19	51	51	0	0.00%
One case of circulating vaccine-derived poliovirus type 2 (cVDPV2) was reported this week from Olamaboro in Kogi province. The onset of paralysis was on 2 October 2019. There are 17 cVDPV2 cases reported in 2019. There were 34 cVDPV2 cases in 2018.									
Nigeria	Yellow fever	Ungraded	14-Sep-2017	1-Jan-2019	31-Oct-2019	3 620	72	150	4.1%
In October 2019, between weeks 40 and 44, a total of 839 suspected cases were reported from all the 36 states and the FCT including 35 presumptive positive samples (IgM positive). Of these, 72 cases were confirmed positive for yellow fever by RT-PCR at two laboratories including the WHO reference laboratory, Institut Pasteur Dakar (IPD), (41 cases) and the NCDC National Reference Laboratory (NRL) in Abuja (31 cases). During this month, two new states (Plateau and Taraba) recorded confirmed cases of yellow fever.									
Senegal	Dengue fever	Ungraded	17-Sep-19	15-Aug-19	13-Sep-19	1	1	0	0.00%
A case of dengue fever from Kaolack, in the centre of the country, with symptom onset on 15 August 2019 was confirmed by PCR at Institut Pasteur Dakar on 13 September 2019.									
South Sudan	Humanitarian crisis	Protracted 3	15-Aug-16	n/a	30-Oct-19	-	-	-	-
The humanitarian situation has been largely calm but unpredictable in most of the states. The number of internally displaced people (IDPs) in South Sudan was estimated at 1.47 million. Malnutrition continues to be a problem in the country as more than 6.35 million people are reported to be severely food insecure in South Sudan. Communicable disease burden remains high with ten counties reporting malaria cases above their epidemic thresholds and measles cases being reported from 16 counties (Abyei, Mayom, Melut, Aweil South, Aweil East, Tonj North, Juba, Wau, Aweil West, Gogrial West, Gogrial East, Renk, Tonj South, Jur River, Pibor and Yambio) and four protection of civilian sites (Juba, Bentiu, Malakal and Wau).									
South Sudan	Hepatitis E	Ungraded	-	3-Jan-18	3-Nov-19	104		2	1.90%
The current outbreak in Bentiu POC continues. In week 44 (week ending 03 November 2019), six new suspected cases of Hepatitis E were reported. As of reporting date, a total of 104 cases and two deaths have been recorded from Bentiu POC and a total of 12 suspected cases including 4 confirmed cases in Lankein. The last cases in Lankein were reported in week 25 (week ending on 23 June 2019).									
South Sudan	Measles	Ungraded	24-Nov-18	1-Jan-19	30-Sep-19	3 632	163	23	0.60%
Between week 1 to week 40 of 2019, a total of 3 477 suspected cases of measles which 163 laboratory-confirmed and 23 deaths (CFR 0.6%) have been reported. The outbreak has affected 16 counties and 4 Protection of Civilians Sites POCs (Juba, Bentiu, Malakal and Wau). Measles cases continue to rise in 2019 with an average of 75 cases reported per week compared to 12 cases reported at the same period in 2018.									
Togo	Poliomyelitis (cVDPV2)	Grade 2	18-Oct-19	13-Sep-19	13-Nov-19	1	1	0	0.00%
No new case of circulating vaccine-derived poliovirus type 2 (cVDPV2) was reported this week. One case has been reported so far this year from East Mono in Plateaux province. The onset of paralysis was 13 September 2019. This is the first cVDPV2 case in the country and is linked to Jigawa outbreak in Nigeria.									
Uganda	Humanitarian crisis - refugee	Ungraded	20-Jul-17	n/a	31-Oct-19	-	-	-	-
Between 1 and 31 October 2019, a total of 6 623 new refugee arrivals crossed into Uganda from the Democratic Republic of the Congo (4 016), South Sudan (2 167) and Burundi (440). Uganda hosted 1 362 269 asylum seekers as of 31 October 2019, with 95% living in settlements in 11 of Uganda's 128 districts and in Kampala. The majority of refugees are from South Sudan (62.9%), the Democratic Republic of the Congo (28.5%) and Burundi (3.3%). Most are women within the age group 18 - 59 years.									
Zambia	Poliomyelitis (cVDPV2)	Grade 2	17-Oct-19	16-Jul-19	13-Nov-19	1	1	0	0.00%
No new case of cVDPV2 was reported this week. One case of circulating vaccine-derived poliovirus type 2 (cVDPV2) has been reported so far this year from Chiengi in Luapula province. The onset of paralysis was 16 July 2019.									

Country	Event	Grade	Date notified to WHO	Start of reporting period	End of reporting period	Total cases	Cases Confirmed	Deaths	CFR
Closed Events									
Central African Republic	Hepatitis E	Ungraded	2-Oct-18	10-Sep-18	3-Nov-19	192	147	1	0.50%
No new cases have been confirmed in the last 20 epidemiological weeks 25-44 (17 June - 3 November 2019). As of 3 November 2019, a total of 192 cases of acute jaundice syndrome, of which 147 were confirmed for viral hepatitis E, have been recorded from Bocaranga-Koui and Ngaoundaye. Ngaoundaye health district has reported seven cases of viral hepatitis E (6 confirmed and 1 probable) since the beginning of the epidemic. The last case was reported in week 24 (week ending 16 June 2019).									
Côte d'Ivoire	Dengue Fever	Ungraded	15-Feb-19	1-Jan-19	22-Oct-19	3 235	289	2	0.10%
As of 22 October 2019, a total of 3 235 suspected cases including two deaths attributed to dengue fever have been reported. No new confirmed case has been reported since week 36. Since the peak in week 25 (week ending on 23 June 2019), there has been a gradual decline in the weekly number of suspected cases. As of reporting date, 289 cases have been confirmed with DENV 1 (131 samples) and DENV 2 (40 samples) as the main circulating serotypes. Forty-five out of 86 districts across the 16 health regions have reported at least one case. Cocody Bingerville District in Abidjan remains the epi centre of the outbreak.									
Tanzania, United Republic of	Dengue fever	Ungraded	31-Jan-19	1-Aug-18	27-Oct-19	6 917	6 917	13	0.20%
As of week 46 (week ending on 17 November 2019), no new dengue cases were reported. The last case reported in week 40. The total confirmed cases reported since the beginning of the outbreak was 6 917 cases including 13 deaths. Since the beginning of the outbreak, 11 Regions have been affected: Arusha, Dar es salaam, Dodoma, Kagera, Kilimanjaro, Lindi, Morogoro, Pwani, Ruvuma, Singida and Tanga.									
Uganda	Measles	Ungraded	8-Aug-17	1-Jan-19	30-Oct-19	1 688	847	5	0.30%
As of 30 October 2019, a total of 1 688 suspected measles cases have been reported across the country, of which 577 are laboratory-confirmed, 204 are epi-linked, and 66 are clinically confirmed. Confirmed cases have been reported in 32 different districts in the country.									

†Grading is an internal WHO process, based on the Emergency Response Framework. For further information, please see the Emergency Response Framework: <http://www.who.int/hac/about/erf/en/>.

Data are taken from the most recently available situation reports sent to WHO AFRO. Numbers are subject to change as the situations are dynamic.

© WHO Regional Office for Africa

This is not an official publication of the World Health Organization.

Correspondence on this publication may be directed to:

Dr Benido Impouma

Programme Area Manager, Health Information & Risk Assessment

WHO Health Emergencies Programme

WHO Regional Office for Africa

P O Box. 06 Cité du Djoué, Brazzaville, Congo

Email: afrooutbreak@who.int

Requests for permission to reproduce or translate this publication – whether for sale or for non-commercial distribution – should be sent to the same address.

The designations employed and the presentation of the material in this publication do not imply the expression of any opinion whatsoever on the part of the World Health Organization concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries. Dotted lines on maps represent approximate borderlines for which there may not yet be full agreement.

All reasonable precautions have been taken by the World Health Organization to verify the information contained in this publication. However, the published material is being distributed without warranty of any kind, either express or implied. The responsibility for the interpretation and use of the material lies with the reader. In no event shall the World Health Organization or its Regional Office for Africa be liable for damages arising from its use.

Contributors

V. Tugumizemu (Ethiopia)
B. Mbodj (Mali)
R. Nansseu (Democratic Republic of the Congo).

Graphic design

A. Moussongo

Editorial Team

B. Impouma
C. Okot
E. Hamblion
B. Farham
G. Williams
Z. Kassamali
P. Ndumbi
J. Kimenyi
E. Kibangou
O. Ogundiran
T. Lee

Production Team

A. Bukhari
T. Mlanda
R. Ngom
F. Moussana

Editorial Advisory Group

Z. Yoti, *Regional Emergency Director* at
B. Impouma
Y. Ali Ahmed
M. Yao
M. Djingarey

Data sources

Data and information is provided by Member States through WHO Country Offices via regular situation reports, teleconferences and email exchanges. Situations are evolving and dynamic therefore numbers stated are subject to change.