



Sudan Health Emergency

Situation Report No. 4
15 December 2023



World Health
Organization

REGIONAL OFFICE FOR THE Eastern Mediterranean

Highlights

- Eight months of conflict in Sudan has stretched the health system to its limits with displacement, disease outbreaks, war injuries, non-communicable diseases and needs for maternal and child health rising in the face of declining capacity to meet these needs.
- We are closely monitoring the situation in Al Jazirah state after conflict spread to the outskirts of the State Capital Wad Madani on 15 December. WHO has a major operations hub in Wad Madani, where 700 000 of Al Jazirah's estimated 5.9 million population live. The state hosts nearly half a million people displaced since 15 April, 86 400 of whom are in Wad Medani ([OCHA – Sudan: Clashes in Wad Madani between SAF and RSF Flash Update No. 1](#)). There is an ongoing cholera outbreak in Al Jazirah state with over 1,600 cases 26 deaths as of 10 December.
- 24.7 million people need humanitarian aid, and 18.1 million people have been targeted for humanitarian aid as per the revised Humanitarian Response Plan launched in May 2023.
- 11 million people are in need of urgent health assistance, and 7.6 million of these have been targeted for response.
- The conflict in Sudan has displaced 6.88 million people over 5.42 million of whom have sought safety within Sudan and over 1.45 million have fled to neighbouring countries ([IOM DTM Sudan - Weekly Displacement Snapshot 13](#)).
- The war has caused 12 501 deaths according to the Armed Conflict Location & Event Data Project ([ACLED](#)) data of 12 December 2023, and 26 051 injuries according to Federal Ministry of Health data of 08 December 2023.
- Since 15 April 2023, WHO has verified 60 attacks on health care resulting in 34 deaths and 38 injuries.
- According to the latest projection update of the [Integrated Food Security Phase Classification \(IPC\)](#), 17.7 million people across Sudan (37% of the analysed population) have fallen into high levels of acute food insecurity between October 2023 and February 2024 driven by intense conflict, organized violence, and the continued economic decline in the country. About 4.9 million people (10% of the analysed population) are in IPC Phase 4 (Emergency), and almost 12.8 million are in IPC Phase 3 (Crisis).
- Outbreaks of infectious diseases are reported from several states, including:
 - Cholera: 6939 cases and 200 deaths from 9 states;
 - Measles: 4557 cases and 105 deaths from 11 states; and
 - Dengue: 6371 cases and 60 deaths from 10 states.
- An oral cholera vaccination campaign was conducted in Gedaref and Al Jazirah states in November targeting 2.26 million persons aged one year and older and achieving an overall 98% coverage.

KEY FACTS AND FIGURES

24.7 million
people in need of
humanitarian aid in 2023

11 million
people in need of urgent
health assistance

60
attacks on health care
verified by WHO

17.7 million
in high levels of acute food
insecurity

4.9 million
on the brink of famine

9000+
people in need of dialysis
services

6.88 million
people displaced within and
outside Sudan since 15 April

6939
cases of cholera

>3.1 million
people at risk of cholera

Situation

Overall needs

- As per the revised Humanitarian Response Plan (HRP) for 2023, 24.7 million people – more than half the population of Sudan – are in need of humanitarian support.
- An estimated 11 million people in Sudan need urgent health assistance.
- About 6.88 million people displaced within Sudan and into neighbouring countries are facing limited access to food, water, sanitation and health care as well as heightened risks of violence and disease outbreaks.
- The situation in Darfur is especially worrying with escalations of violence and limitations of humanitarian access.
- The spread of clashes to the outskirts of Wad Madani, Al Jazirah State, on 15 December is a concerning development. We are closely monitoring the situation and stand by to support the health system.

Outbreaks

- Sudan declared a cholera outbreak in Gedaref State on 26 September. As of 10 December, there were 6939 suspected cholera cases and 200 associated deaths in 9 states (CFR: 2.88%).
 - Gedaref: 1898 cases and 48 associated deaths
 - Khartoum: 508 cases and 26 associated deaths
 - Al Jazirah: 1687 cases and 26 associated deaths
 - Kassala: 71 cases and 3 deaths
 - Sennar: 102 cases and 4 deaths
 - Red Sea: 1509 cases and 59 deaths
 - White Nile: 815 cases and 26 deaths
 - Blue Nile: 3 cases
 - South Kordofan: 346 suspected cases and 8 associated deaths (cases haven't been reported from the state since end-July).
- More than 3.1 million people are estimated to be at risk of cholera between July and December 2023.
- Reports of measles, malaria, dengue and other diseases are also being received from several states. As of 10 December:
 - 4557 suspected cases of measles with 105 associated deaths reported from 11 states (CFR 2.30%)
 - 6371 suspected cases of dengue with 60 associated deaths reported from 10 states (CFR 0.94%)
 - 1 055 831 clinical malaria cases and 136 deaths from 14 states (CFR 0.013%)
 - 271 AFP cases
 - 108 277 other acute diarrhea cases
- Confirmation of cases is challenging in the absence of functional public health laboratories in most states. Samples are transported to the State Public Health Laboratory in Port Sudan for confirmation. The laboratory has been upgraded with WHO support with equipment, supplies and training to provide national referencing service in place of the National Public Health Laboratory in Khartoum.
- WHO is working with state ministries of health to revitalize and strengthen surveillance.
- WHO supported the Federal Ministry of Health (FMOH) in rolling out the electronic Early Warning and Response System (EWARS) for early detection of and rapid response to epidemic-prone disease outbreaks, and electronic EWARS data is now being received from nine states.

- WHO is co-chairing the National Cholera Task Force with the Federal Ministry of Health and is supporting the response through provision of equipment and supplies, training of health personnel, strengthening surveillance, and facilitating and supporting oral cholera vaccination campaigns.
- Oral cholera vaccination campaigns were conducted in Gedaref and Al Jazirah states on 20-25 November 2023 targeting 2.26 million persons aged 1 year and older. The campaign overall registered 98% achievement with 97% coverage in Gedaref and 99% coverage in Al Jazirah. WHO supported the campaign with expert advice, supportive supervision, and operations and logistics.

Reproductive health

- Lack of access to safe and clean deliveries is a major concern in Sudan, especially for women who have complications during their pregnancy, as more women will be forced to deliver at home.
- An estimated 4.2 million women and children are at risk of gender-based violence in Sudan.

Non-communicable diseases

- Sudan has a high burden of non-communicable diseases (NCD) which accounted for 51% of all death even prior to the conflict. Lack of access to treatment will further compound the burden and complications from NCDs such as diabetes mellitus, hypertension and cancer, which require regular follow up and medication.
- There is a severe shortage of medications for diabetes and hypertension. Paediatric insulin that was in storage is no longer useable.
- Only 3 of 8 major heart centres which used to serve more than 80% of patients are currently functional.
- An oncology centre in Khartoum, which used to previously serve over 60% of patients, is now out of service. Two other centres in Khartoum and Darfur have also ceased service.
- Public radiotherapy service is no longer available.
- The disruption of dialysis services due to shortage of supplies continues to have devastating impacts on the survival of over 9000 patients who need dialysis due to kidney failure. WHO provided supplies for 6,000 dialysis sessions in August 2023 and supplies for 30 000 sessions in December; and is working to secure additional supplies to support this lifesaving service.

Nutrition

- Due to intense conflict, organized violence, and the continued economic decline in the country 17.7 million people across Sudan (37% of the analysed population) have fallen into high levels of acute food insecurity between October 2023 and February 2024. About 4.9 million people (10% of the analysed population) are in IPC Phase 4 (Emergency), and almost 12.8 million are in IPC Phase 3 (Crisis) per the latest update of the [Integrated Food Security Phase Classification \(IPC\)](#).
- About 3.4 million children under five are acutely malnourished with over 690 000 of them severely malnourished and over 100 000 suffering from severe acute malnutrition (SAM) with medical complications in need of inpatient management in the stabilization centers.

Trauma and injuries

- According to [ACLED](#) data of 12 December, 12 501 people have died due to the conflict in Sudan, and according to the Federal Ministry of Health's report of 08 December, 26,051 people have been injured.

Heavy rain and floods

- Heavy rain destroyed hundreds of houses, causing more internal displacement, and increasing the risk of transmission of diseases. According to [OCHA Sudan Floods Dashboard](#) of 05 November, 89 000 people have been affected by heavy rains and flooding across nine states.

Access to health care

- About 70% of health facilities in conflict-affected states areas are non-functional or only partially functional, and the few functional health facilities are overwhelmed due to the high demand for health services.

- Shortages of medicines and medical supplies, including laboratory reagents and treatment for chronic diseases continue to persist. Provisions of supplies by WHO and health partners are ongoing but are not meeting the rising demands due to delays caused by insecurity and bureaucratic hurdles impeding on efficient delivery of supplies.
- Health care workers have not been paid for eight months in many places across Sudan.

WHO response

Leadership and coordination

- WHO is coordinating the health response and continues to lead the Health Cluster for national and sub-national-level response to the health crisis, including disease outbreaks.
- WHO is coordinating the response to the cholera outbreak with the Federal Ministry of Health, state ministries of health, UNICEF and other health partners.
- Between 24th July and 8 December, the WHO participated in more than thirteen cross-border UN interagency assessment and program monitoring missions to Central and West Darfur.

Response to the cholera outbreak

- Under the leadership of the Federal and State Ministries of Health, WHO is coordinating the response to a cholera outbreak in the nine affected states: Gedaref, Al Jazirah, Khartoum, Kassala, Sennar, Red Sea, Blue Nile, White Nile and South Kordofan.
- WHO has trained over 1266 health workers in surveillance and standard case management for cholera and other communicable diseases.
- Electronic EWARS data is being received on cholera and other outbreak-prone diseases.
- Fifty-five doctors and nurses in four states have been trained in infection prevention and control.
- WHO has trained over 30 rapid response teams and covered operational costs for their deployment into affected localities.
- Cholera kits, medicines, laboratory supplies and equipment such as cholera beds have been dispatched to cholera-affected localities in addition to supplies for the diagnosis and management of other illnesses.
- WHO is directly supporting ten cholera treatment centres in Gedaref, Al Jazirah, Khartoum, Kassala and Sennar with equipment, supplies and operational costs, including fuel for generator, and providing supplies to cholera treatment centres and treatment units operated by state health authorities and health partners.
- WHO is supporting the Ministry of Health to transfer samples of suspected cholera cases to the Public Health Laboratory in Port Sudan, a facility capacitated by WHO to provide a national reference service. Surveillance is ongoing in affected and high-risk areas to identify and address risk factors.
- WHO continues to strengthen the Public Health Laboratory in Port Sudan with the provision of equipment and supplies as well as capacity building of leadership and staff.
- With support from WHO and health partners, the Ministry of Health is coordinating efforts to scale up access to clean water and sanitation facilities, as well as ensuring affected and at-risk communities are aware of transmission risks and proper hygiene practices to reduce contamination risks and prevent further spread of the outbreak.
- WHO provided technical, operational and logistical support to the oral cholera vaccination (OCV) campaign which was conducted in Gedaref and Al Jazirah states on 20-25 November 2023 targeting over 2.26 million persons aged one year and older. The campaign overall registered 98% achievement with 97% coverage in Gedaref and 99% coverage in Al Jazirah. WHO also supported the Federal Ministry of Health with the application to the International Group on Vaccine Provision (IGV) for the required doses of vaccines.

Response to other outbreaks and malnutrition

- WHO is supporting state health authorities in the response to outbreaks of measles, dengue and malaria through strengthening disease surveillance, supporting the launching of electronic EWARS, and deployment of rapid response teams.



The Cholera Treatment Centre (CTC) in Gadarif on 23 October 2023. The centre admits an average of 46 cases per day. The CTC also includes a laboratory and a pharmacy that supports the operation.

- WHO is providing expert advice, supplies and oversight to stabilization centres for the management of severe acute malnutrition, and is covering the operational cost of 20 stabilization centres, and has trained volunteers to conduct malnutrition screening at IDP gathering sites in Gedaref.
- Measles samples are being transported to Port Sudan for confirmation using the pathway for transportation of samples from acute flaccid paralysis cases. WHO provided the diagnostic kits and hired the services of a laboratory technician who performed the tests on the samples.
- WHO is involved in coordination of reactive measles vaccination campaigns and provided technical support to reactive integrated measles vaccination campaigns in Blue and White Nile states in August 2023. The campaigns targeted over 11 300 under-five children in Blue Nile and about 42 400 9 to 59-month-olds in White Nile together with vitamin A administration, nutrition assessment and distribution of hygiene items.

Distribution of supplies

- Since the start of the war in Sudan, WHO has dispatched over 1190 metric tons of medicines, medical supplies and equipment to WHO hubs in Sudan, and has distributed over 390 metric tons of supplies to partners and health facilities for their lifesaving operations and to support primary health care. The supplies include cholera kits, supplies for the treatment of pediatric severe acute malnutrition, trauma kits, blood bags, medicines for chronic diseases and infectious diseases, diagnostic kits, lab equipment, cold-chain equipment and incinerators.
- Overcoming access challenges, WHO delivered medicines and medical supplies making the first humanitarian delivery via El Fasher to hard-to-reach localities in West and Central Darfur, including Zalingei & El Geneina.
- Insecurity and operational hurdles continue to pose a challenge to the timely delivery of supplies and services. Nevertheless, WHO remains committed to collaborating with partners and local authorities to explore alternative approaches to ensure the delivery of healthcare services and vital medical supplies to where they are needed. Continuous efforts are being made to overcome the challenges and extend support to healthcare facilities.

Addressing information gaps

- WHO is collaborating with health officials and partners to address gaps in essential health data, including disease surveillance.

- WHO is supporting Sudanese health authorities to conduct Health Services and Resources Availability Monitoring System – HeRAMS.
- Data is being received from nine states through the electronic Early Warning and Response System (EWARS) which was launched in August 2023. In addition to capacity building of health workers through a training of trainers (ToT), WHO is also conducting assessments with the Federal Ministry of Health to monitor implementation of EWARS.

Healthcare services, trauma care and case management

- WHO launched 21 mobile clinics in eight states to provide essential health services, including management of chronic diseases, communicable diseases, and services to survivors of gender-based violence in the hotspots and states receiving large numbers of displaced populations.
- WHO has been conducting weekly online trainings on case management since the start of the conflict; these sessions have been conducted by more than 14 000 health care workers to date despite internet connectivity challenges, a display of the commitment and resilience of Sudanese health workers.
- WHO has deployed emergency and trauma experts to five states to support the health emergency response.
- Over 120 health care workers, including doctors, psychologists and volunteers were trained in psychological first aid, problem management plus (PM+) and MhGAP Humanitarian Intervention Guide to strengthen mental health and psychosocial support services for displaced people.



Sawsan manages supplies at the pharmacy which is part of the Barakat School mobile health centre in Wad Madani on 22 October 2023. The mobile clinic in Barakat School, which is supported by WHO, serves the 85 IDP families who live in the school and hundreds of families who live in neighbouring IDP sites, as well as the host community.

For more information, contact:

Dr Mohammed Dauod Altaf
Lead, WHO Sudan Health Emergency Programme
altafm@who.int

Mrs Loza Mesfin Tesfaye
Communications Officer, WHO Sudan
tesfayel@who.int