

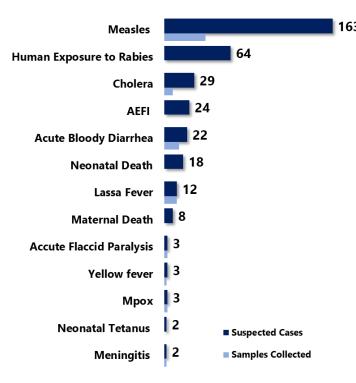
Epi-week 12 (March 20-26, 2023)

OCountry Population: 5,104,413 | Volume 18 Issue 12 | March 20-26, 2023

Data Source: CSOs from 15 Counties and Laboratory

Highlights

Figure 1: Public Health Events Reported



Keynotes and Events of Public Health Significance

- A total of 353 events of public health importance including 29 deaths reported
- **Completeness and timeliness** of health facility reports were both 99%
- Ongoing Lassa fever outbreak in 4 Counties
- **Ongoing Measles** outbreak in 15 Counties
- Ongoing Mpox outbreak in 3 Counties

Adverse Events Following Immunization/Adverse Drug Reaction

Reporting Coverage

Table 1: Health Facility Weekly IDSR Reporting Coverage, Liberia, Epi-week 12, 2023

County	Expected Reports From HF*	Reports Received	Received on Time	Completeness (%)	Timeliness (%)
Bomi	28	28	28	100	100
Bong	67	65	65	97	97
Gbarpolu	18	18	18	100	100
Grand Bassa	37	37	37	100	100
Grand Cape Mount	34	34	34	100	100
Grand Gedeh	24	24	24	100	100
Grand Kru	24	24	24	100	100
Lofa	60	60	60	100	100
Margibi	66	66	66	100	100
Maryland	28	28	28	100	100
Montserrado	418	413	413	99	99
Nimba	91	91	91	100	100
Rivercess	21	21	21	100	100
River Gee	20	20	20	100	100
Sinoe	41	41	41	100	100
Liberia	977	970	970	99	99

The national target for weekly IDSR reporting is 80%. Health facility timeliness is monitored at the health district level

Legend: ≥80 <80 970 (99%)

970 (99%)



Epi-week 12 (March 20-26, 2023)

Vaccine-Preventable Diseases

Measles

- One hundred sixty-three (163 including one death) suspected cases were reported from 15 Counties (see distribution in table 2)
- Forty (40) specimens collected and pending testing
- Ninety-six (96) were vaccinated (see distribution in table 3)

Table 2: Distribution of Measles cases per county and epi-classification, Liberia, Epi week 12, 2023

COUNTY	CASES WEEK	Lab	CLASSIFICA	ATION OF C	CONFIRMED	DEATUS	CED (0()	CUMULATIVE # SUSPECTED	CUMULATIVE #
COUNTY	12	confirmed	Lab confirmed	Epi Linked	Clinically Compatible	DEATHS	CFR (%)	CASES	CASES
Bomi	0	0	2	29	4	0 0 35			35
Bong	11	0	2	99	14	1	0.9	115	115
Gbarpolu	1	0	0	14	12	0	0	27	26
Grand Bassa	12	0	0	96	0	0	0	96	96
Grand Cape Mount	9	0	1	32	5 0 0		44	38	
Grand Gedeh	17	0	1	33	51	0	0	104	85
Grand Kru	24	0	2	436	1	2	0.5	439	439
Lofa	2	0	0	23	11	0	0	38	34
Margibi	12	0	1	107	1	0	0	111	109
Maryland	21	0	0	296	5	0	0	303	301
Montserrado	23	0	4	381	2	0	0	392	387
Nimba	15	0	1	154	0	2	1.3	157	155
River Gee	9	0	0	19	18	0	0	48	37
Rivercess	5	0	0	10	12	0	0	25	22
Sinoe	2	0	2	13	27	0	0	47	42
Grand Total	163	0	16	1742	163	5	2.7	1981	1921

Table 3: Vaccination Status of Measles Cases, Liberia, Epi week 12, 2023

			Number of Do	ses Received
County	Vaccinated	One-Dose	Two Doses	Doses Not Indicated
Bong	5	4	0	1
Gbarpolu	1	1	0	0
Grand Bassa	8	0	0	8
Grand Cape Mount	9	8	1	0
Grand Gedeh	12	9	2	1
Grand Kru	7	4	3	0
Lofa	2	1	0	1
Margibi	8	8	0	0
Maryland	2	2	0	0
Montserrado	19	13	5	1
Nimba	10	5	0	5
River Gee	8	1	3	4
Rivercess	3	2	1	0
Sinoe	2	0	0	2
Grand Total	96	58	15	23



Epi-week 12 (March 20-26, 2023)

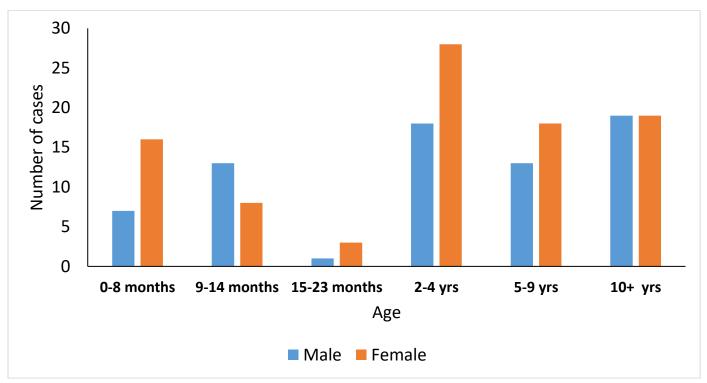


Figure 2: Distribution of Measles Cases by Sex, Liberia Epi Week 12, 2023

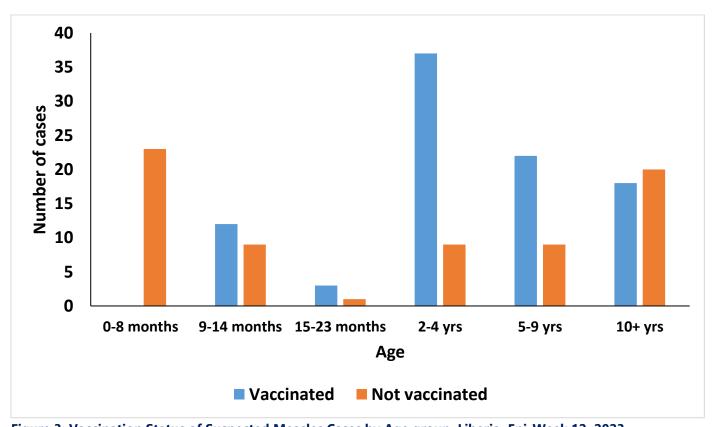


Figure 3: Vaccination Status of Suspected Measles Cases by Age group, Liberia, Epi-Week 12, 2023



Epi-week 12 (March 20-26, 2023)

Outbreak Section

Table 4: Summary Distribution of Measles Cases and Deaths, December 13, 2021- March 26, 2023

COUNTY	CUMULAT IVE SUSPECTE	CUMULATIVE CONFIRMED	CLASSIFICATION OF CONFIRMED CASES				SSIFICATIO FIRMED D		CUMULAT IVE DEATHS	CFR (%)	# CONFIRM ED CASES	# CONFIRM ED CASES WEEK 11	% CHANG E	Outbreak Status
	D CASES	CASES	Lab confirme d	Epi Linke d	Clinically Compatib le	Lab confirme d	Epi Linke d	Clinically Compatib le	DEATHS		WEEK 10		ь	
Montserr ado	4, 760	4,698	141	4,403	154	3	61	3	67	1.6	47	23	-51	Ongoing
Nimba	929	901	37	826	38	0	0	2	3	0.1	21	15	29	Ongoing
Margibi	711	690	33	649	8	0	1	1	1	0	15	12	-20	Ongoing
Grand Bassa	856	819	40	677	102	1	6	0	7	1	3	0	-100	Ongoing
Lofa	271	211	32	140	39	0	0	0	0	0	1	0	-100	Ongoing
Bong	488	468	19	404	45	0	1	2	3	0.6	3	11	267	Ongoing
Maryland	674	666	22	625	19	0	0	0	0	0	18	17	-6	Ongoing
Grand Gedeh	354	241	30	113	98	0	0	0	0	0	10	13	30	Ongoing
Sinoe	199	161	33	58	70	0	0	0	0	0	0	0	-	Ongoing
Bomi	145	120	33	71	16	1	2	2	5	7.4	1	0	-100	Ongoing
Grd Cape Mt	179	159	16	116	27	0	2	1	3	2.7	2	4	100	Ongoing
Grand Kru	683	657	16	635	6	0	2	0	2	0	34	24	-29	Ongoing
Gbarpolu	84	70	5	60	5	0	0	0	0	0	0	0	-	Ongoing
Rivercess	102	83	22	54	7	0	1	0	1	1.3	0			Ongoing
River Gee	25	15	3	0	12	0	0	0	0	0	0	6	-	Ongoing
Total	10,460	9,959	482	8,831	646	5	76	11	92	1.5	155	125		

Public Health Response

I Coordination

o Response efforts have been coordinated by CHTs with support from partners

II. Epidemiological Surveillance

- Surveillance activities have been intensified at all levels in affected counties (Margibi, Gbarpolu, Grand Kru, Maryland, Nimba, and Grand Bassa).
- Active case search
- Line listing of cases

III. Case Management

 Symptomatic treatment administered for patients at the health facility and sent for home-based isolation and management (Bong, Grand Gedeh, Grand Bassa, Maryland, Grand Kru, Lofa, Grand Cape Mount, Montserrado Margibi, and Nimba.

IV. Laboratory

 Specimens were collected from 14 districts in 5 counties for testing (GCM-Garwula, Tewor. Porkpa and Commonwealth, Grand Gedeh-Gbao B'HAI, Putu, Cavalla and Konobo, Lofa-Foya, Grand Kru-Jroah and Trehn, Rivercess- Central C, Doedian, and Timbo, and Sinoe-Greenville).



Epi-week 12 (March 20-26, 2023)

V. Immunization

- Routine measles vaccine activities ongoing in all affected counties
- o Margibi county distributed vaccine supplies to various facilities

VI. Risk Communication and Community Engagement

- o Community engagement with stakeholders is ongoing in Montserrado, Grand Gedeh, Maryland and Nimba Counties
- Conducted awareness and health education in affected and surrounding communities in Grand Bassa, Grand Cape
 Mount and Grand Gedeh Counties

Acute Flaccid Paralysis (AFP)

- Three (3) cases were reported from Lofa (2), and Gbarpolu (1) Counties
- Specimens were collected and shipped
- Cumulatively, fourteen (14) cases were reported

Neonatal Tetanus

- Two (2 including 1 death) cases were reported from Montserrado and Grand Kru Counties
- Cumulatively, nineteen (19) cases including 3 deaths reported

Influenza-Like Illnesses

Coronavirus Disease (COVID-19)

Outbreak

- No new confirmed cases reported
- Cumulatively, eight thousand, twenty-two (8,022) confirmed cases, including 294 deaths
 - o 601 healthcare workers
- A total of 17,827 contacts have been generated
 - 1.772 healthcare workers

Public Health Actions

- IMS coordination meeting ongoing.
- Surveillance activities including active case search and case investigation ongoing in the affected counties using WHO interim guidelines
- o Case management ongoing for confirmed cases
- Compulsory testing among outgoing travelers as required by the country of destination ongoing

Viral Hemorrhagic Diseases

Lassa fever

- Twelve (12) suspected cases were reported from Bong (5), Montserrado (3), Nimba (3 including 1 death), and River Gee (1) Counties
- Twelve (12) specimens were collected; 9 tested negative and 3 pending arrival at the lab
- Cumulatively eighty-two (82) suspected cases reported
 - Proportion of suspected cases with a sample collected (72/82) 88%
 - o Proportion of suspected cases with sample tested (67/72) 93%

Current Outbreak

Lassa fever disease

- No new confirmed cases were reported
- Seventy (70) contacts under 21 days' follow-up
- Cumulatively, sixty-eight (68) laboratory-confirmed cases including 18 deaths reported (CFR=26%)



Epi-week 12 (March 20-26, 2023)

Table 5: Summary of Lassa fever Outbreak, Liberia, Jan 6, 2022-March 26, 2023

County	Outbreak Dates	District of Outbreak	Total suspected cases	Total confirmed cases	Total confirmed cases in HCWs	Total Deaths	CFR %	Total contacts	Total HCWs contacts	Total contact completed	Total contacts under follow-up
Bong	Jan. 6, 2022, to date	Suakoko	108	38	8	9	24	366	200	366	0
Nimba	Feb. 6, 2023 to date	Sanniquell ie-Mah & Tappita	6	3	0	1	33	79	52	60	19
Grand Bassa	Sept. 9, 2022 to date	District #3 A&B	47	24	0	6	25	128	22	121	7
Mont	Feb 13, 2023 to date	Central Monrovia	5	3	0	2	67	46	15	10	36
	Total	4	166	68	8	18	26	619	289	557	62

Public Health Measures

NPHIL continues to provide technical support to the affected counties

I. Surveillance:

- Heightened case detection and reporting in affected communities and districts
- Situational reports are produced and shared regularly at the National Level
- Daily follow-up/monitoring of contacts

II. RCCE

- Ongoing health Education in affected and surrounding communities
- Health workers and visitors are encouraged to enhance IPC practices by regular washing of hands

III. Case Management

o Cases isolated and ribavirin treatment administered

IV. IPC

 Affected communities were empowered with the WASH package to enable them to undertake short-term interventions that will improve the sanitation situation in each community thereby helping in Lassa fever prevention and control

Yellow fever

- Three (3) cases were reported from Grand Kru, Grand Gedeh, and River Gee Counties
- Two (2) specimens were collected and pending testing
 - Cumulatively twenty-four (24) suspected cases reported
 - Proportion of suspected cases with samples collected (23/24) 96%
 - Three samples were collected but not transported (Epi week 5 from Grand Gedeh, River Gee, and Grand Grand Kru Counties)
 - Proportion of samples collected and tested (11/23) 48%
 - Negative- 11
 - Pending testing -9

Ebola Virus Disease

Zero suspected cases reported



Epi-week 12 (March 20-26, 2023)

Diarrheal Diseases

Acute Bloody Diarrhea (Suspected Shigellosis)

- Twenty-two (22) cases were reported from Lofa (8), Grand Gedeh (3), Grand Kru (3), Bong (2), Maryland (2), Sinoe (2), Margibi (1), and River Gee (1) Counties
- Fourteen (14) specimens were collected
 - o 7 specimens were rejected at the county level
 - 7 specimens received by NPHRL
 - 1 negative
 - 4 pending testing
 - 2 rejected
- Cumulatively, one hundred thirty-eight (138) cases were reported
 - o Forty-two (44) specimens were collected and receive by NPHRL:
 - 27 negatives
 - 7 specimens rejected
 - 6 not transported
 - 4 pending

Severe Acute Watery Diarrhea (Suspected Cholera)

- Twenty-nine (29) cases were reported from Bong (5), Nimba (5), Maryland (5), Lofa (4), Grand Kru (3), River Gee (3), Montserrado (2), and Grand Bassa (2) Counties
- Eight (8) specimens were collected and 5 received by NPHRL
 - o 3 tested negative and 2 pending
- Cumulatively, one hundred ninety (190) suspected cases reported
 - Thirty-six specimens collected and received by NPHRL
 - 18 tested negative
 - o 7 rejected
 - 9 not transported
 - o 2 pending

Other Reportable Diseases

Animal bite (Human Exposure to Rabies)

Sixty-four (64 including one death) animal bite cases were reported:

Table 7: Distribution of Animal bite cases and PEP administration per county, Liberia, Epi week 12, 2023

Counties	Cases	Person receiving PEP	PEP doses administered	Cumulative cases (Wk 1-12)	Cumulative PEP administere d (Wk 1-12)
Bomi	1	1	1	15	6
Bong	10	3	3	47	18
Gbarpolu	0	0	0	9	0
Grand Bassa	3	2	0	57	5
Grand Cape Mount	2	0	2	24	9
Grand Gedeh	2	0	0	28	1
Grand Kru	2	0	0	69	15
Lofa	10	3	0	60	13
Margibi	5	0	3	49	26
Maryland	2	9	0	22	18
Montserrado	15	3	5	130	68
Nimba	6	0	3	80	0
Rivercess	1	2	2	12	2
River Gee	3	0	0	26	5
Sinoe	2	0	0	23	1
Total	64	23 (36%)	19	651	187

Legend 1-2 doses 3-4 doses 5 doses



Epi-week 12 (March 20-26, 2023)

Public Health Actions

Ongoing monitoring and follow-up of cases

Meningitis

- Two (2 including one death) cases were reported from Lofa and River Gee Counties
- Specimen was collected and pending testing
- Cumulatively, ten (10) suspected cases reported
 - o Proportion of suspected cases with samples collected (8/10) 80%
 - o Proportion of sample tested (7/8) 88%

Mpox

- Three (3) cases were reported from Grand Kru, Maryland, and River Gee Counties
- Three (3) specimens were collected; 2 tested negative and 1 pending arrival
- Cumulatively, thirty-six (36) suspected cases reported
- Five confirmed: Rivercess (2), Grand Cape Mount (2), and Gbarpolu (1)

Outbreak

Mpox:

- One (1) new confirmed case reported from Gbarpolu County
- Total confirmed cases reported: 8
- Total contacts under follow-up: 7
- Counties currently in outbreak: 3

Table 8: Summary of Mpox Outbreak, Liberia, Dec 5, 2022-March 26 2023

County	Outbreak Start Date	Outbreak Districts	Total suspected cases	Total confirmed cases	Total Deaths	(H K 1/2	Total Contacts	# HCW contacts	Contacts under follow up	Contacts completed
SSe		Central "C"	3	2	0	0	16	2	0	16
Rivercess	Dec 5 to date	Jo-River	1	1	0	0	6	2	0	6
Grand Cape Mt	Feb 24 to date	Garwula	2	2	0	0	6	0	0	6
Gbarpolu	March 17, 2023 to date	Belle	2	1	0	0	7	0	7	0
Total		4	8	6	0	0	35	4	7	28

Public Health Measures

I. Coordination

 National Public Health Institute of Liberia (NPHIL) and the Ministry of Health (MOH) along with partners are providing technical and financial support to affected counties

II. Epidemiological Surveillance

- Active case search, case investigation, and contact tracing ongoing in the affected and neighboring communities and districts
- Development and dissemination of Sitrep by affected county and national



Epi-week 12 (March 20-26, 2023)

III. Case management and IPC

- Symptomatic treatment of the suspected case initiated
- IPC measures instituted in affected communities and schools

IV. Risk Communication and Community Engagement

 Community engagement and awareness with local leaders and community health development committees in the affected community and surrounding towns ongoing

Key Challenges

- No support from county-based partners for response activities
- Limited IPC materials for response activities
- Limited copies of Mpox standard case definitions

Events of Public Health Importance

Maternal Mortality

- Eight (8) deaths were reported from Montserrado (6), Bong (1), and Nimba (1) Counties Reported causes: PPH (4), Sepsis (2), Obstructed labor (1), and Unsafe abortion (1)
- Reported sites:
 - o Health facility: 8/8 (100%)
- Cumulatively, sixty-six (66) deaths reported
 - Proportion of death reviewed (23/66) 35%
 - o Proportion of community death (11/66)17%

Neonatal Mortality

Eighteen (18) deaths were reported: Montserrado (14), Nimba (2), Bong (1), and Grand Bassa (1) Counties

- Reported causes: Birth Asphyxia (10), Sepsis (4), Preterm (3), and Neonatal tetanus (1)
- Reporting sites:
 - Health facility: 18/18 (100%)
- Cumulatively, one hundred sixty (160) deaths reported

Adverse Events Following Immunization (AEFI)/Adverse Drug Reaction (ADR)

- Twenty-four (24) cases were reported from Lofa (9), Grand Kru (5), Grand Gedeh (4), Bomi (3), and Grand Bassa (2), and Rivercess (1) counties
- All reported cases were non-serious
- Related vaccine:
 - o COVID-19/J&J (7/24) 29%
 - o Penta (5/24) 21%
 - o Measles (5/24) 21%
 - o Td (2/24) 8%
 - o Others (5/24) 21%
- Cumulatively, one hundred thirty (130) events were reported and COVID-19 accounted for (68/130) 52%



Epi-week 12 (March 20-26, 2023)

Border Surveillance Update

A total of 6229 travelers were recorded for the week with incoming travelers accounting for 48% (2,999/6,229)

Table 9: Border activity at the PoE for Incoming and Outgoing Travelers, Liberia, Epi week 12, 2023

			1			<u> </u>	1		•	· ·	
								Travelers			
								Vaccinate			
								d against			Evidence of
					Total	Yellow		YF &	Alerts		COVID-19
		Weekly			traverlers	Book	Card	Issued	detected/	COVID-19	vaccination
Type of Ports	Point of Entry	total	Arrival	Departure	with YB	Damage	Replaced	book	Verified	Reactive	card/certificate
	James S. Paynes	54	15	39	0	0	0	0	0	0	0
Airport	Robert Int'l	4824	2347	2477	4766	58	0	36	0	0	4754
	Airport	4024	2341	2411	4700	50	U	30	O	U	4734
	Freeport of	118	59	59	118	0	0	0	0	0	118
Seaport	Monrovia	110	39	39	110	U		U	U	U	110
	Buchanan Port	86	43	43	86	0	0	0	0	0	86
	Bo Water Side	772	344	428	764	0	0	8	0	0	756
Land Crossing	Ganta	218	95	123	115	0	0	0	0	0	84
Lanu Crossing	Yekepa	54	40	14	29	0	0	0	0	0	36
	Loguatuo	103	56	47	84	0	0	0	0	0	67
Tatol		6,229	2,999	3,230	5,962	58	0	44	0	0	5,901

Note: Yellow book issue for both arrival and departure; Vaccination coverage for both arrival and departure

Public Health Measures

National level

- © Completed health facility spot-check in Bushrod, Central Monrovia, and Commonwealth Districts, Montserrado County
- IDSR data harmonization ongoing in all 15 Counties

County-level

Coordination

- o Ongoing IMS meetings in outbreak counties
- o Partner coordination and resource mapping

Surveillance

- Publication of situational reports
- Active case search ongoing in affected and surrounding communities

Case Management

- o Administration of PEP and ribavirin
- Management of measles cases ongoing

Appendix						****			F	-4-	lava (
Summary	of Immediately Reportable D	JISE	ase	s, C	ona	ITIO	ns, a	ana 	Eve	nts	Бу (Loui	nty							
0			Bomi	Bong	Gbarpolu	Grand Bassa	Grand Cape Mount	Grand Gedeh	Grand Kru	Lofa	Margibi	Maryland	Montserrado	Nimba	Rivercess	River Gee	Sinoe	Total Weekly	Cumulative Reported	Cumulative Lab-confirmed
	ted Health District		4	9	5	8	5	6	5	6	4	6	7	6	6	6	10	93		
	District Reported		4	9	5	8	5	6	5	6	4	6	7	6	6	6	10	93		
Diseas	Acute Flaccid Paralysis (Suspected Polio)	A D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3 0	14 0	0
entable	Measles	A D	0	11 0	0	12 0	9	17 0	0	0	12 0	21 0	0	14 1	9	5 0	0	162 1	1,981 0	16 0
e Preve	Neonatal Tetanus	A D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	16 3	0
Vaccin	Yellow fever	A D	0	0	0	0	0	1 0	1	0	0	0	0	0	0	1	0	3	24 0	0
agic Fe	Dengue fever	A D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Viral Hemorrhagic Fe Vaccine Preventable Diseas	Ebola Virus Disease	A 0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Viral H	Lassa fever	A D	0	5	0	0	0	0	0	0	0	0	3	2	0	0	0	11 1	69 13	17 8
za-Like	COVID-19	A D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Influen	Influenza Like Illnesses	A D	0	0	0	0	0	0 0	0	0	0	0	0	0	0	0	0	0	0	0
al Disea	Acute Bloody Diarrhoea (Shigellosis)	A D	0	2	0	0	0	3	3	8	0	2	0	0	0	1	2	22 0	138 0	0
Diarrheal Dise; Influenza-Like	Severe Acute Watery Diarrhoea (Cholera)	A D	0	5	0	2	0	0	3	4	0	5	2	5	0	3	0	29 0	190 0	0
	Maternal Mortality	D	0	1	0	0	0	0	0	0	0	0	6	1	0	0	0	8	66	
Public Health	Neonatal Mortality AEFI	D A	3	0	0	2	0	0 4	5	9	0	0	0	0	0	0	0	18 24	0	0
Events of	Unexplained Cluster of Health Events/Disease	D A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
<u> </u>	<u>'</u>	D A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	36	0
seases	Mpox	D A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Other Reportable Diseases	Tuberculosis	D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0 650	0
Report	Human Exposure to Rabies (Suspected Huma D		0	0	0	0	0	0	1 0	0	0	0	0	0	0	0	0	1	1 9	0
Other			0	0	0	0	0	0	0	1 0	0	0	0	0	0	0	0	1	1 0	0
Ě	Unexplained Cluster of deaths D		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Neglected Tr	Buruli Ulcer D		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Neg				0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	ТО	TAL	4	35	2	20	0	27	0	36	0	31	0	32	0	16	6	353	3370	25

D = Dead **A** = Alive

Notes

- **Completeness** refers to the proportion of expected weekly IDSR reports received (target: ≥80%)
- Timeliness refers to the proportion of expected weekly IDSR reports received by the next level on time (target: ≥80%). The time requirement for weekly IDSR reports:
 - Health facility required on or before 5:00 pm every Saturday to the district level
 - Health district required on or before 5:00 pm every Sunday to the county level
 - County required on or before 5:00 pm every Monday to the national level
- Non-polio AFP rate is the proportion of non-polio AFP cases per 100,000 among the estimated population under 15 years of age in 2017 (annual target: ≥2/100,000)
- Non-measles febrile rash illness rate refers to the proportion of Negative measles cases per 100,000 population
- Annualized maternal mortality rate refers to the maternal mortality rate of a given period of less than one year and it is the number of maternal deaths per 100,000 live births
- Annualized neonatal mortality rate refers to the neonatal mortality ratio of a given period of less than one year and it is the number of neonatal deaths per 1,000 live births
- **Epi-linked** refers to any suspected case that has not had a specimen taken for serologic confirmation but is linked to a laboratory-confirmed case
- **Confirmed case** refers to a case whose specimen has been tested positive or reactive upon laboratory testing, or has been classified as confirmed by either epidemiologic linkage with a confirmed case or clinical compatibility with the disease or condition

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For comments or questions, please contact

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To prevent and control public health threats by promoting healthy outcomes and serving as a source of knowledge

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Data sources

Data and information is provided by the fifteen County Surveillance Officers and National Public Health Reference Laboratory via regular weekly reports, telephone calls and email exchanges. Situations are evolving and dynamic therefore numbers stated are subject to change.