



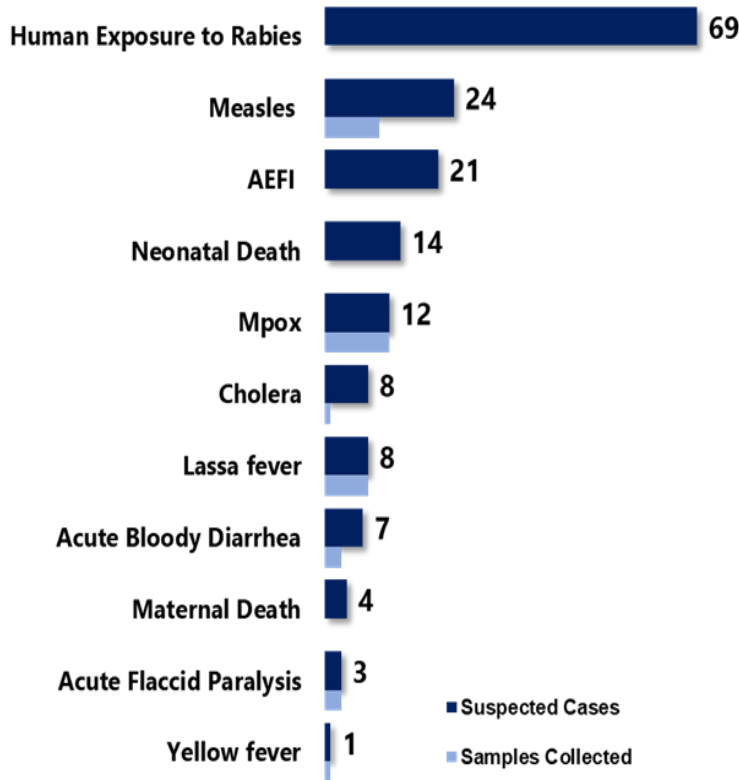
Liberia IDSR Epidemiology Bulletin

Epi-week 48 (November 27-Dec 3, 2023)

Country Population: 5,104,413 | Volume 19 Issue 48 | November 27-Dec 3, 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 **171 events** of public health importance including **19 deaths** reported
- ◆ **Completeness and timeliness** of health facility reports were both **97%**
- ◆ **Ongoing Lassa fever outbreak** in 3 Counties
- ◆ **Ongoing Measles outbreak** in 3 Counties
- ◆ **Ongoing Mpox outbreak** in 2 Counties

Adverse Events Following Immunization/Adverse Drug Reaction (AEFI)

Reporting Coverage

Table 1: Health Facility Weekly IDSR Reporting Coverage, Liberia, Epi-week 48, 2023

County	Expected Reports From HF*	Reports Received	Received on Time	Completeness (%)	Timeliness (%)
Bomi	28	28	28	100	100
Bong	67	67	67	100	100
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	63	63	95	95
Maryland	28	25	25	89	89
Montserrado	418	393	392	94	94
Nimba	92	92	92	99	100
Rivercess	21	21	21	100	100
River Gee	20	20	20	100	100
Sinoe	41	41	41	100	100
Liberia	978	949	945	97	97

947(97%)
Health facilities reported IDSR data

97(99%)
Health districts reported IDSR data

947 (97%)
Health facilities reported timely IDSR data

- ◆ The national target for weekly IDSR reporting is 80%. Health facility timeliness is monitored at the health district level
- ◆ All counties reported on time to the national level

Legend:

≥80

<80

Vaccine-Preventable Diseases

Measles

- ☞ Twenty-four (24) suspected cases were reported from 7 counties
- ☞ Ten (10) specimens were collected and pending testing
- ☞ Sixteen (16) persons were vaccinated

Table 2: Distribution of Measles cases per county and epi-classification, Liberia, Epi week 1-48, 2023

COUNTY	CUMULATIVE # SUSPECTED CASES	CUMULATIVE # CONFIRMED CASES	CLASSIFICATION OF CONFIRMED CASES			DEATHS	CFR (%)	# CONFIRMED CASES WEEK 47	# CONFIRMED CASES WEEK 48	% CHANGE
			Lab confirmed	Epi Linked	Clinically Compatible					
Bomi	80	68	2	13	53	0	0.0	0	0	0
Bong	210	210	3	6	201	1	0.5	1	0	0
Gbarpolu	42	41	0	0	41	0	0.0	0	0	0
Grand Bassa	179	176	0	0	176	0	0.0	0	1	0
Grand Cape Mount	77	69	1	2	66	0	0.0	0	0	0
Grand Gedeh	441	397	6	27	364	0	0.0	3	3	0
Grand Kru	747	741	10	72	659	2	0.3	4	1	-75
Lofa	142	134	0	0	134	0	0.0	2	1	-50
Margibi	201	199	1	8	190	0	0.0	0	0	0
Maryland	775	773	0	0	773	0	0.0	7	9	29
Montserrado	1106	1098	4	53	1041	2	0.2	2	0	-100
Nimba	377	367	2	33	332	3	0.8	1	0	-100
River Gee	146	120	1	0	119	0	0.0	0	1	0
Rivercess	37	32	1	0	31	0	0.0	1	0	-100
Sinoe	160	140	6	11	123	0	0.0	1	8	700

Table 3: Vaccination Status of Measles Cases, Liberia, Epi-week 48, 2023

County	Vaccinated	Number of Doses Received		
		One Dose	Two Doses	Doses Not Indicated
Bomi	0	0	0	0
Bong	0	0	0	0
Gbarpolu	0	0	0	0
Grand Bassa	0	0	0	0
Grand Cape Mount	0	0	0	0
Grand Gedeh	2	1	0	1
Grand Kru	1	1	0	0
Lofa	1	1	0	0
Margibi	0	0	0	0
Maryland	4	1	2	1
Montserrado	0	0	0	0
Nimba	0	0	0	0
River Gee	0	0	0	0
Rivercess	0	0	0	0
Sinoe	8	7	1	0
National	16	11	3	2

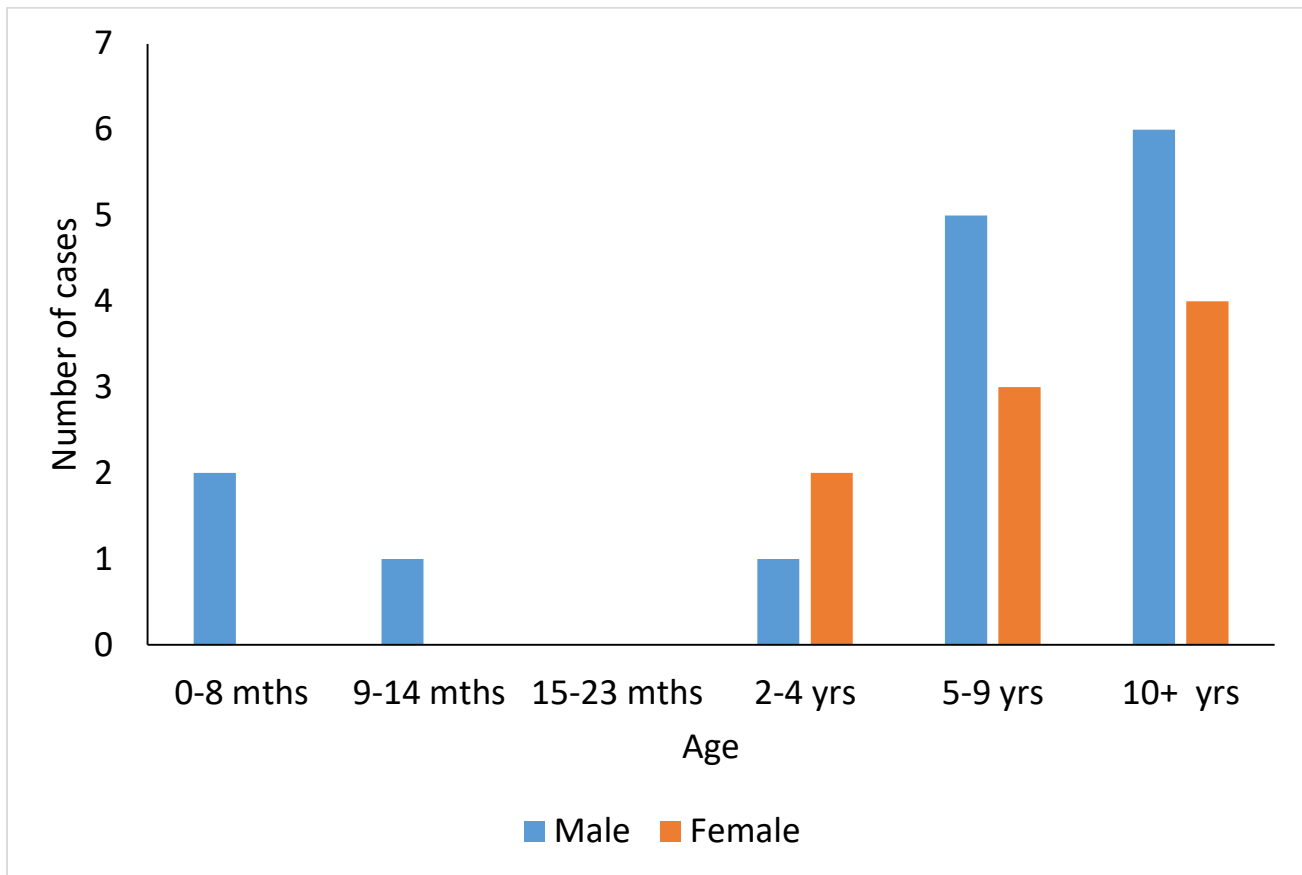


Figure 2: Distribution of Measles Cases by Age Group and Sex, Liberia Epi Week 48, 2023

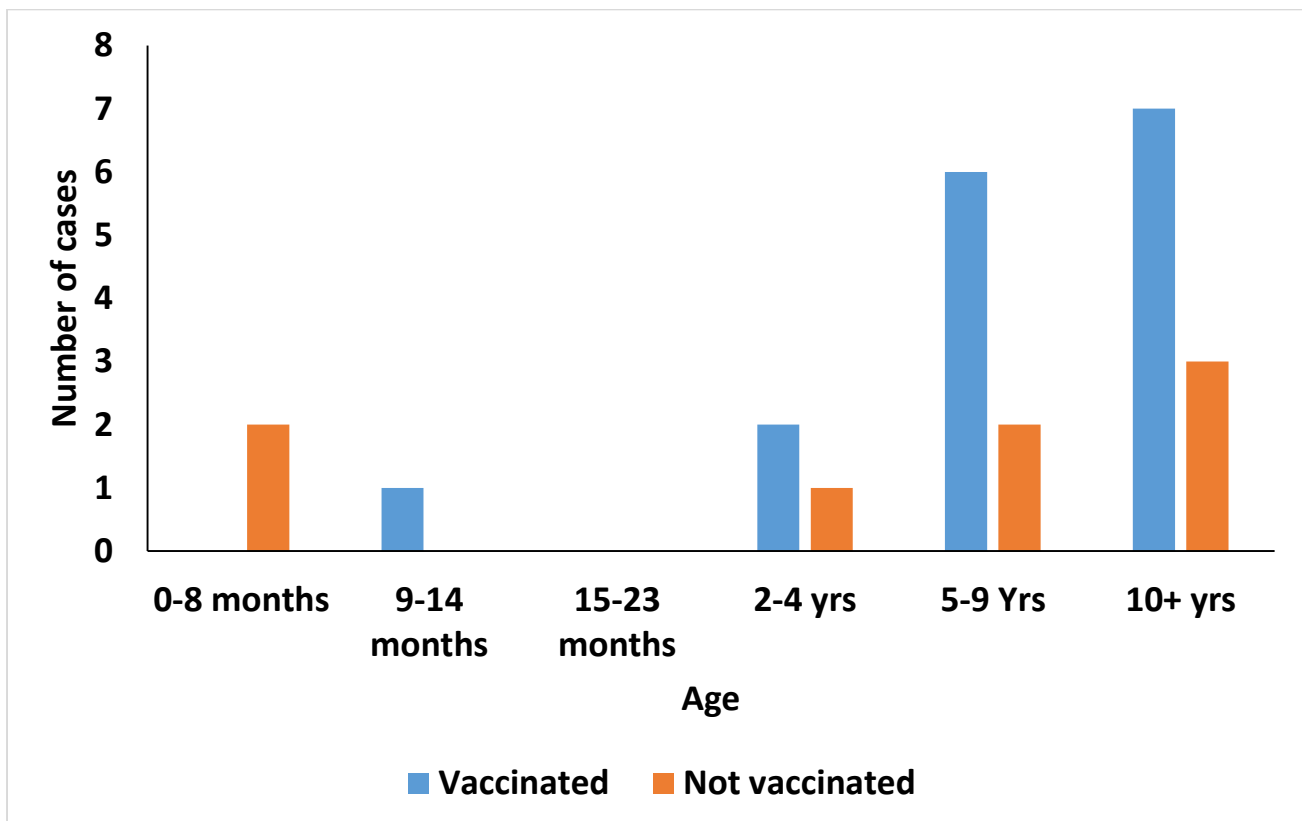


Figure 3: Vaccination Status of Suspected Measles Cases by Age Group, Liberia, Epi-Week 48, 2023

Outbreak Section

Table 4: Status of Confirmed Measles Cases by County, Liberia, December 13, 2021 – December 3, 2023

County	Total Cases	Active	Recovery	Deaths	# of Districts
Montserrado	5,371	0	5,302	69	3/7
Nimba	1,110	0	1,106	4	3/6
Grand Bassa	924	0	917	7	0/8
Margibi	803	0	802	1	0/4
Bong	578	0	575	3	0/9
Maryland	1106	5	1101	0	2/6
Lofa	284	0	284	0	0/6
Grand Kru	965	0	963	2	0/5
Grand Cape Mount	187	0	184	3	0/5
Bomi	147	0	142	5	0/4
Rivercess	84	0	83	1	0/6
Gbarpolu	46	0	46	0	0/5
Grand Gedeh	508	0	508	0	0/6
River Gee	79	0	79	0	0/6
Sinoe	231	0	231	0	0/10
Total	12,423	5	12,323	95	8/98

Table 5: Cumulative Distribution of Measles Cases and Deaths, December 13, 2021- Dec 3, 2023

COUNTY	CUMULATIVE SUSPECTED CASES	CUMULATIVE CONFIRMED CASES	CLASSIFICATION OF CONFIRMED CASES			CLASSIFICATION OF CONFIRMED DEATHS			CUMULATIVE DEATHS	CFR (%)	# CONFIRMED CASES WEEK 46	# CONFIRMED CASES WEEK 47	% CHANGE	Outbreak Status
			Lab confirmed	Epi Linked	Clinically Compatible	Lab confirmed	Epi Linked	Clinically Compatible						
Montserrado	5,454	5,371	145	1658	3,568	3	61	5	69	1.3	1	2	100	Ongoing
Nimba	1,137	1110	37	187	886	0	1	3	4	0.4	0	1	-	Ongoing
Margibi	827	803	34	136	633	0	0	1	1	0.1	0	0	-	Ended
Grand Bassa	962	924	40	212	672	1	0	6	7	0.9	0	0	-	Ended
Lofa	353	284	32	66	186	0	0	0	0	0	0	0	-	Ended
Bong	603	578	22	21	535	0	1	2	3	0.5	0	0	-	Ended
Maryland	1121	1101	24	308	769	0	0	0	0	0	3	5	67	Ongoing
Grand Gedeh	652	508	34	48	426	0	0	0	0	0	0	0	-	Ongoing
Sinoe	284	231	36	84	111	0	0	0	0	0	0	0	-	Ended
Bomi	183	147	34	27	86	1	2	2	5	3	0	0	-	Ended
Grand Cape Mt	215	187	17	18	152	0	2	1	3	1.6	0	0	-	Ended
Grand Kru	994	965	22	106	837	0	0	2	2	0.2	1	0	-	Ongoing
Gbarpolu	67	46	4	2	40	0	0	0	0	0	0	0	-	Ended
Rivercess	112	84	23	54	7	0	1	0	1	1.1	0	0	-	Ended
River Gee	103	79	0	0	79	0	0	0	0	0	0	0	-	Ended
Total	13,067	12,418	504	2,927	8,987	5	68	22	95	7.8	5	8		

Public Health Response

I. Coordination

- ☞ IMS meetings are being held for coordination and mobilization of resources in response counties

II. Epidemiological Surveillance

- ☞ Active case search and contact tracing ongoing in Grand Kru County

III. Case management

- ☞ Case management ongoing in affected counties

IV. Immunization

- ☞ 70% of the cases reported were vaccinated
- ☞ Routine immunization ongoing in affected counties

V. Laboratory

- ☞ Five hundred seven (507) cases have been confirmed by the National Public Health Reference Laboratory from December 13, 2021 – November 15, 2023

VI. Risk Communication and Community Engagement

- ☞ Community engagement health education ongoing

VII. Challenges

- ☞ Limited support for response in affected counties

Acute Flaccid Paralysis (AFP)

- ☞ Three (3) cases were reported from Lofa (1), Sinoe (1), and River Gee (1) Counties
- ☞ Specimens were collected; pending shipment
- ☞ Cumulatively, sixty-six (66) cases were reported
 - Thirty-six (36) tested negative
 - Thirty (30) pending

Neonatal Tetanus

- ☞ Zero case was reported
- ☞ Cumulatively, fifty-two (52) cases including 7 deaths reported

Influenza-Like Illnesses

Coronavirus Disease (COVID-19)

- ☞ Zero suspected cases were reported
- ☞ Cumulatively, Ninety-five (95) cases have been reported

Influenza

- ☞ Zero suspected cases were reported
- ☞ Cumulatively, one hundred fifty-four (154) suspected cases reported
 - Proportion cases with sample collected (149/154) 97%
 - Proportion of cases with sample tested (64/149) 43% and all negative

Viral Hemorrhagic Diseases

Lassa fever

- ☞ Eight (8) suspected cases were reported from Bong (4), and Nimba (4 including 1 dead) Counties
- ☞ Specimens were collected; 7 tested negative and 1 pending
- ☞ Cumulatively, two hundred twenty-four (224) suspected cases reported
 - Proportion of suspected cases with a sample collected (208/224) 93%
 - Proportion of suspected cases with sample tested (206/208) 99% (confirmed 63, negative 143)
 - Death in Confirmed cases 20 (CFR=31.7%)

Current Outbreak

Table 6: Summary of Lassa fever Outbreak, Liberia, January 6, 2022- December 7, 2023

County	Outbreak Districts	Outbreak Start Date	Total suspected cases	Total confirmed cases	Deaths in HCWs	Total Deaths	CFR %	Total Contacts	# HCW contacts	Contacts became cases	HCW became confirmed case	Contacts under follow up	Contacts completed	Days in countdown	Outbreak Status
Montserrado	Bushrod	13-Feb-23	15	2	0	1	50%	29	21	0	0	0	29	Completed	Over
	Central Monrovia	3-Mar-23	29	1	0	1	100%	28	27	0	0	0	28	Completed	Over
Bong	Suakoko	21-Apr-23	155	45	2	9	20%	473	191	6	18	44	366	Active	Ongoing
	Sanoyea	19-Sep-23	2	2	0	1	50%	36	18	0	0	0	37	Active	Ongoing
	Kokoya	3-Oct-23	1	1	0	0	0%	5	0	0	0	5	0	Active	Ongoing
	Jorquelleh	15-Oct-23	12	13	1	3	23%	121	86	3	3	41	128	Active	Ongoing
Grand Bassa	District 3A&B	21-Aug-23	86	32	0	9	28%	177	40	40	0	0	159	Completed	Over
	Buchanan	11-Aug-23	2	1	0	1	100%	4	2	0	0	0	0	Completed	Over
Nimba	Sanniquellie-Mah	6-Feb-23	42	2	0	0	0%	43	35	8	0	0	43	Completed	Over
	Tappita	20-Nov-23	14	3	0	3	100%	58	29	4	0	22	36	Active	Ongoing
	Yarwin Mehsonnoh	5-Dec-23	1	1	0	1	100%	14		0	0	14	0	Active	Ongoing
	Bain-Garr	1-Jun-23	10	3	0	3	100%	61	25	0	0	0	31	Completed	Over
Montserrado	Central Monrovia	27-Nov-23	1	1	0	0	0%	49	0	0	0	49	0	Active	Ongoing
Total			370	107	3	32	30%	1098	474	61	21	175	857		

Nimba County Confirmed Lassa fever case update

An 80-year old female (LB), a resident of Gbalah Town, Buu-Yao District presented to the Ganta United Methodist Hospital on the 2nd of December 2023 with fever $>38.5^{\circ}\text{C}$, headache, abdominal pain, weakness, bleeding from mouth and IV sites, vomiting, swollen face, and red eyes with onset being the 24th of November 2023. Upon arrival at the Ganta United Methodist Hospital, the clinician associate suspected Lassa fever disease and immediately isolated the case. Sample was collected and sent to NRL on 3 December 2023. Anti-rabies viral drug was administered upon detection. On 3 December 2023, the patient expired in the isolation while receiving care. With the nature of the case, the hospital conducted safe and dignified burial for the deceased on the same day. About 14 contacts have been generated so far and monitoring is ongoing.

On 5 December 2023, the National Reference Laboratory released RT-PCR Positive result for Lassa fever to the Nimba County Health Team about 3:30PM. The County Surveillance unit has notified the DSO to inform the health facility and family members about the laboratory result. Surveillance is ongoing at all levels.

Montserrado County

- No new confirm case reported today
- Negative Lassa fever Lab result received for the probable dead case
- The confirmed case left the facility and is currently in the community
- A total of forty-seven (47) contacts under follow up
- One lost to follow up
- Cumulative Case Fatality Rate (CFR): 0% (0/1)
- One (1) Health District is currently in outbreak

Public Health Measures

- The National Public Health Institute of Liberia (NPHIL) and the Ministry of Health (MOH) are providing technical and logistical support to County Health Teams with support from partners.

I. Surveillance

- Active case search and contact tracing ongoing in affected communities and districts
- Development and dissemination of weekly sit-reps by affected counties

II. Laboratory

- The National Public Health Reference Laboratory continues testing of Lassa fever samples
- A total of 96 Lassa fever cases have been confirmed since this outbreak

III. Case management and IPC

- Cases isolated and managed at designated facilities

Environmental and Vector Control

- Ongoing clean-up campaigns and rodent control measures in Grand Bassa County

Risk Communication and Community Engagement

- Risk communication and community engagement ongoing in affected and surrounding communities
- Airing of jingles on Lassa fever prevention and control in Bong and Grand Bassa Counties

Yellow fever

- ☞ One (1) case was reported from Rivercess County
- ☞ Specimen was collected and pending testing
- ☞ Cumulatively one hundred five (105) suspected cases were reported
 - Three (3) samples (3/86) 4% not transported (Epi week 5 from Grand Gedeh, River Gee, and Grand Kru Counties)
 - Proportion of suspected cases with samples collected (87/105) 83%
 - The proportion of samples tested is (71/87) 82%
 - The proportion of samples pending testing is (13/87) 15%

Dengue Fever

- ☞ Zero cases were reported

Ebola Virus Disease

- ☞ Zero cases were reported

Diarrheal Diseases

Acute Bloody Diarrhea (Suspected Shigellosis)

- ☞ Seven (7) cases were reported from Grand Gedeh (2) Rivercess (1), Bong (1), Lofa (1), Sinoe (1), and Gbarpolu (1) Counties
- ☞ Three (3) specimens were collected and pending testing
- ☞ Cumulatively, six hundred ninety-seven (697) cases reported
 - Two hundred seventy-two (272) specimens were collected
 - 160 tested negative
 - 3 Confirmed
 - 26 specimens rejected by NPHRL
 - 83 not tested

Severe Acute Watery Diarrhea (Suspected Cholera)

- ☞ Eight (8) suspected cases were reported from Lofa (3), Grand Kru (2), Grand Gedeh (1), Margibi (1), and Sinoe (1) Counties
- ☞ One (1) specimen was collected and pending testing
- ☞ Cumulatively, eight hundred seventy (870) cases reported
 - Two hundred eighty-six (286) specimens were collected
 - 117 tested negative
 - 12 specimens rejected by NPHRL
 - 157 not tested

Other Reportable Diseases

Animal bite (Human Exposure to Rabies)

☞ Sixty-nine (69) animal bites were reported

Table 6: Distribution of Animal Bite Cases and PEP Administration per County, Liberia, Epi week 48, 2023

Counties	Cases	Person receiving PEP	PEP doses administered	Cumulative cases (Wk 1-48)	Cumulative PEP administered (Wk 1-48)
Bomi	0	0	0	65	33
Bong	5	1	3	211	90
Gbarpolu	1	0	0	34	1
Grand Bassa	5	0	0	271	30
Grand Cape Mount	1	0	1	71	42
Grand Gedeh	2	0	0	114	15
Grand Kru	4	0	0	265	15
Lofa	1	0	0	228	89
Margibi	4	3	3	196	82
Maryland	7	2	2	200	74
Montserrado	15	3	3	984	254
Nimba	21	6	6	600	162
Rivercess	2	0	0	127	63
River Gee	0	0	0	49	0
Sinoe	1	0	0	143	6
Total	69	15	18	3558	956

Public Health Actions

☞ Ongoing monitoring and follow-up of cases

Meningitis

☞ Zero suspected cases were reported

☞ Cumulatively, thirty-nine (39) suspected cases reported

- Proportion of suspected cases with samples collected (32/39) 82%
- Proportion of sample tested (28/32) 88%
- 24 negative and 4 positive (Streptococcal-3 & Hemophilus Influenza)

Mpox

☞ Twelve (12) suspected cases reported from Grand Kru (10), and River Gee (2) Counties

☞ Twelve (12) specimens were collected and pending testing

☞ Cumulatively, one hundred fifty-six (156) suspected cases reported

- Twenty-one (21) confirmed

Unexplained cluster of deaths

☞ Zero cases reported

Events of Public Health Importance

Maternal Mortality

☞ Four (4) deaths were reported from Montserrado (3), and Nimba (1), Counties

☞ Reported causes: Eclampsia (2), and PPH (2)

☞ Reporting Site:

- Health Facility (3) 75%
- Communities (1) 25 %

- ☞ Cumulatively, two hundred eighty-six (286) deaths reported
 - Proportion of death reviewed (73/286) 26%
 - Proportion of community death (32/73) 44%

Neonatal Mortality

- ☞ Fourteen (14) deaths were reported from Montserrado (12), Rivercess (1), and Grand Cape Mount (1) Counties
- ☞ Reported causes: Birth Asphyxia (9), Sepsis (4), and Disseminated Intravascular Coagulopathy (1)
- ☞ Reporting site:
 - Health facility: (14) 100%
- ☞ Cumulatively, seven hundred twenty-one (721) deaths reported

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

- ☞ Twenty-one (21) cases were reported: Montserrado (7), Sinoe (4), Grand Cape Mount (3), River Gee (2), Grand Gedeh (2), Bomi (2), and Maryland (1) Counties
- ☞ All reported cases were classified as non-serious
- ☞ Related vaccine:
 - Penta (7/21) 33%
 - BCG (4/21) 19%
 - Others (9/21) 43%
- ☞ Cumulatively, nine hundred eighty-one (981) events were reported and COVID-19 accounted for (238/981) 24%

Neglected Tropical Diseases

YAWS

- ☞ Zero cases were reported
- ☞ Cumulatively, two hundred fifty-six (256) cases have been reported

3Buruli Ulcer

- ☞ Zero cases were reported
- ☞ Cumulatively, one hundred seventy-one (171) cases have been reported

Border Surveillance Update

A total of 2629 travelers were recorded for the week with incoming travelers accounting for 47% (1234/2629)

Table 7: Border activity at the PoE for incoming and outgoing travelers, Liberia, Epi week 48, 2023

Type of Ports	Point of Entry	Weekly total	Arrival	Departure	Total travelers with YB	Yellow Book Damage	Card Replaced	Travelers Vaccinated against YF & Issued book	Alerts detected/ Verified	COVID-19 Reactive	Evidence of COVID-19 vaccination card/certificate
Airport	James S. Paynes	172	77	95	60	0	0	0	0	0	50
	Robert Int'l Airport	1549	771	778	3817	0	0	0	0	0	3771
Seaport	Freeport of Monrovia	88	44	44	88	0	0	0	0	0	88
	Buchanan Port	48	24	24	84	0	0	0	0	0	84
Land Crossing	Bo Water Side	468	141	327	441	0	7	20	0	0	422
	Ganta	118	76	42	65	8	8	18	0	0	51
	Yekepa	76	38	38	27	0	0	0	0	0	34
	Loguatu	110	63	47	95	0	0	0	0	0	22
Total		2,629	1,234	1,395	4,677	8	15	38	0	0	4,522

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

Public Health Measures

National level

- ☞ Continue to distribute surveillance weekly ledgers and triplicate Lab alert and submission forms to the counties
- ☞ Providing remote technical and operational support to counties
- ☞ Produced and disseminated situation reports (Lassa fever, Measles, and Mpox outbreaks)

County-level

☞ Surveillance

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

☞ Case Management

- Administration of PEP
- Management of measles and Lassa fever cases ongoing in affected counties

Appendix

Summary of Immediately Reportable Diseases, Conditions, and Events by County

		Bomi	Bong	Gbarpolu	Grand Bassa	Grand Cape Mount	Grand Gedeh	Grand Kru	Lofa	Margibi	Maryland	Montserrado	Nimba	Rivercess	River Gee	Since	Total Weekly	Cumulative Reported	Cumulative Lab-confirmed	
No. of Expected Health District		4	9	5	8	5	6	5	6	4	6	7	11	6	6	10	98			
No. of Health District Reported		4	9	5	8	5	6	5	6	4	6	7	11	6	6	10	98			
Vaccine Preventable Disease	Acute Flaccid Paralysis (Suspected Polio)	A	0	0	0	0	0	0	1	0	0	0	0	0	1	1	3	30	0	
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Measles	A	0	0	0	1	0	3	1	1	0	9			1	8	24	4,720	37	
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	2
	Neonatal Tetanus	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	52	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6	0
	Yellow fever	A	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	105	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Viral Hemorrhagic Disease	Dengue fever	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Ebola Virus Disease	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Lassa fever	A	0	4	0	0	0	0	0	0	0	0	0	4	0	0	0	8	186	43
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	38	19
Influenza-Lik	COVID-19	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Influenza Like Illnesses	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	154	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Diarrheal Disease	Acute Bloody Diarrhoea (Shigellosis)	A	0	1	1	0	0	2	0	1	0	0	0	0	1	0	1	7	869	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Severe Acute Watery Diarrhoea (Cholera)	A	0	0	0	0	0	1	2	3	1	0	0	0	0	0	1	8	870	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Events of Public Health Interest	Maternal Mortality	D	0	0	0	0	0	0	0	0	0	3	1	0	0	0	4	286		
	Neonatal Mortality	D	0	0	0	0	1	0	0	0	0	12	0	1	0	0	14	721		
	AEFI	A	2	0	0	0	3	2	0	0	0	1	7	0	0	2	4	21	981	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unexplained Cluster of Health Events/Disease	D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Other Reportable Diseases	Mpox	A	0	0	0	0	0	10	0	0	0	0	0	0	2	0	12	156	14	
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	Tuberculosis	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Human Exposure to Rabies (Suspected Human)	A	0	5	1	5	1	2	4	1	4	7	15	21	2	0	1	69	3,558	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Meningitis	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	39	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Unexplained Cluster of deaths	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	
Neglected Tropical Diseases	Buruli Ulcer	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	119	0
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Yaws	A	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	241	4
		D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
TOTAL		2	10	2	6	0	10	0	7	0	17	0	26	0	6	16	171	13153	80	

D = Dead **A** = Alive

Notes

- Completeness** refers to the proportion of expected weekly IDSR reports received (target: $\geq 80\%$)
- ☞ **Timeliness** refers to the proportion of expected weekly IDSR reports received by the next level on time (target: $\geq 80\%$). 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: $\geq 2/100,000$)
- ☞ **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

Epidemiological bulletin published with support from WHO and CDC

For comments or questions, please contact

Ralph W. Jetoh, MD, MPH
Director

Infectious Disease and Epidemiology Division
National Public Health Institute of Liberia
Republic of Liberia

Email: ralphica2000@gmail.com
Phone: +231 886526388/777372655
Website: www.nphil.gov.lr

National Public Health Institute of Liberia (NPHIL)

MISSION

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

VISION

A center of excellence to create health outcomes for Liberians through a strong preventive health system and expertise

EDITORIAL TEAM

DIDE / NPHIL

A. N. Mianah
T. O. Yeabah
J. S. Kokro
E. Dwalu
A.B. Corvah
G. B. Williams
S. K. Zayzay
L. W. Colee
M. Tegli
T. L. Hall
S. L. Flomo
M. S. Quiah
J. O. Abel
P. J. Thomas
H. M. Sherman
M.D. Vaye
N. K. Dovillie
A. Coker
S. Nuwolo
N. Sesay
L. Maximore

Ministry of Health
WHO Liberia Office
US CDC Liberia Office
AFENET Liberia

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.