

South Sudan

Integrated Disease Surveillance and Response (IDSR)

Annexes W37 2018 (Sep 10 – Sep 16)



**World Health
Organization**
South Sudan



Ministry of Health
Republic of South Sudan

Access and Utilisation

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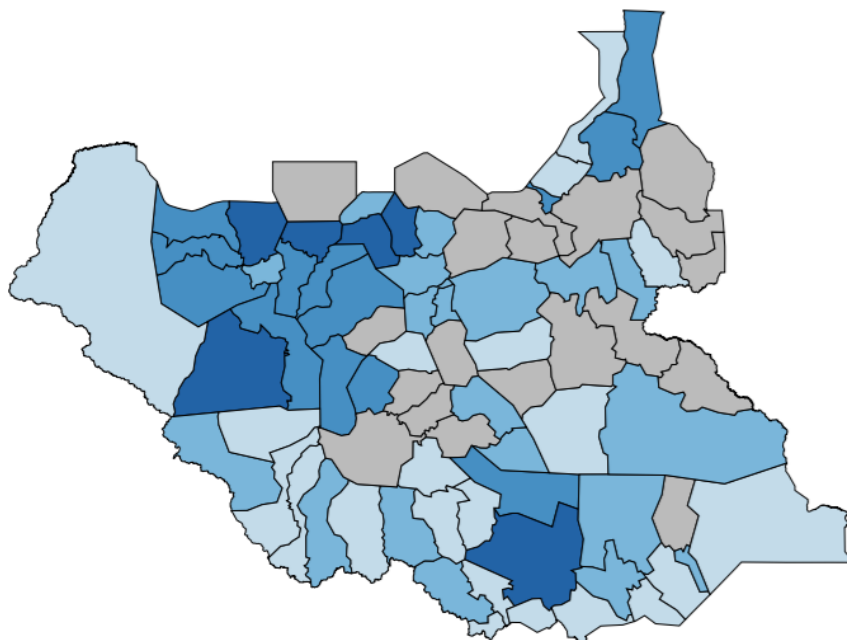
Slide 13 **Measles maps and alert management**

Sources of data

1. Weekly IDSR Reporting Form
2. Weekly EWARS Reporting Form

Access and Utilization | Map of consultations by county

Map 1 | Map of total consultations by county (W37 2018)

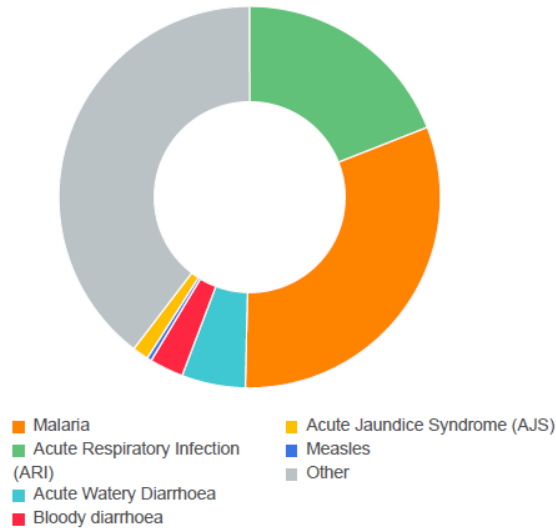


Hub	W37	2018
Aweil	25,025	489,785
Bentiu	19,762	594,292
Bor	4,148	396,084
Juba	15,226	448,485
Kwajok	25,417	962,584
Malakal	11,509	562,751
Rumbek	7,445	651,770
Torit	6,875	234,824
Wau	13,624	344,880
Yambio	9,057	426,334
South Sudan	138,088	5,111,789

The total consultation in the country since week 1 of 2018 is 5,111,789 by hub, Kwajok registered the highest number of consultations as indicated in the table above. The total number of consultations by county is shown in the map above. See the key for more information.

Proportional mortality

Figure 1 | Proportional mortality (2018)

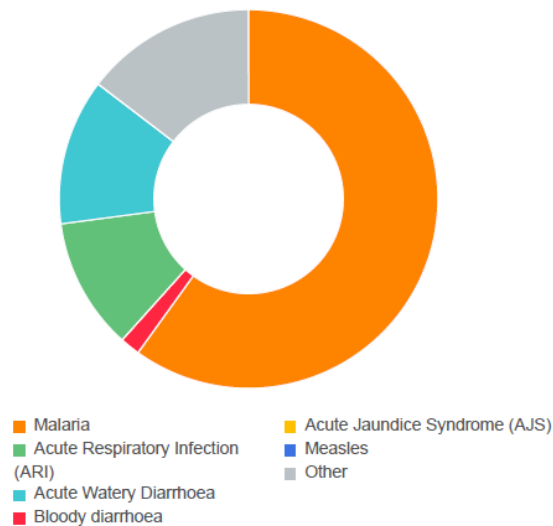


Syndrome	W37		2018	
	# deaths	% mortality	# deaths	% mortality
Malaria	17	58.6%	250	31.3%
ARI	1	3.4%	152	19.0%
AWD	11	37.9%	43	5.4%
Bloody diarrhoea	0	0.0%	23	2.9%
AJS	0	0.0%	11	1.4%
Measles	0	0.0%	3	0.4%
Other	0	0.0%	316	39.6%
Total deaths	29	100%	798	100%

Figure 1, above shows the proportional mortality for 2018, with malaria being the main cause of mortality accounting for 31.3% of the deaths since week 1 of 2018, followed by acute respiratory infection, bloody acute watery diarrhoea diarrhoea.

Proportional morbidity

Figure 2 | Proportional morbidity (2018)

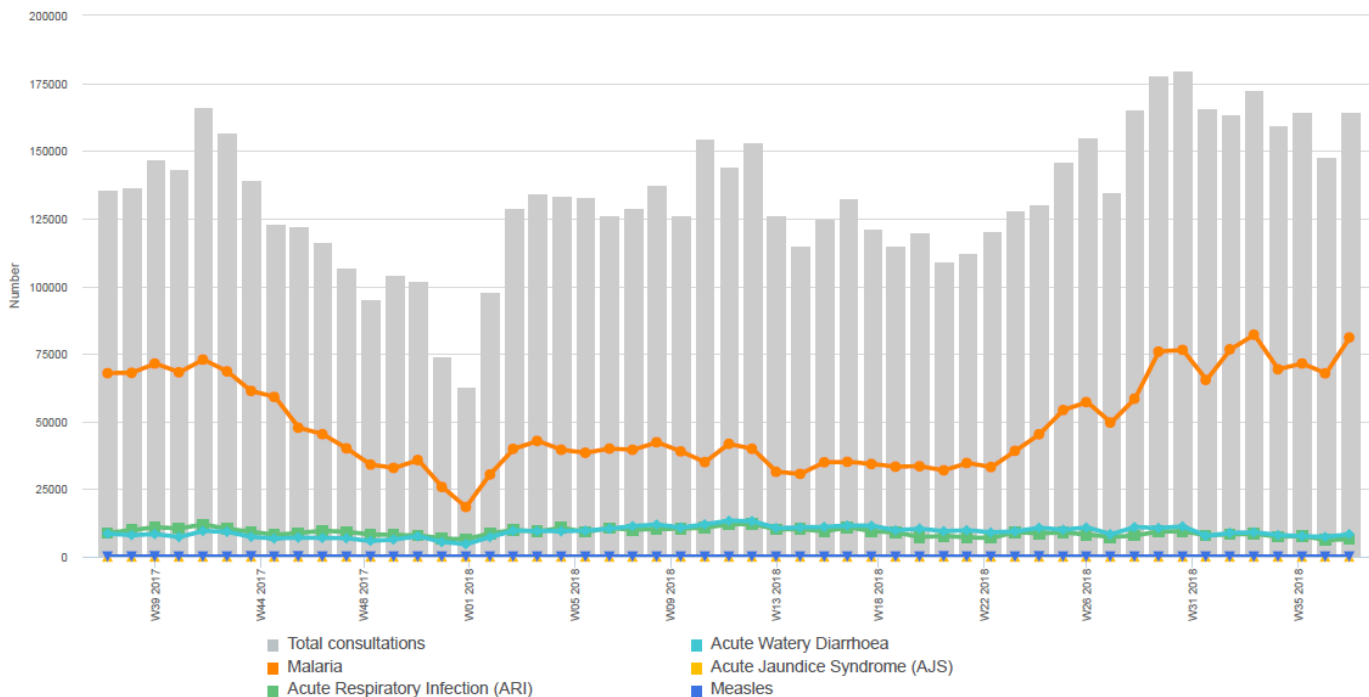


Syndrome	W37		2018	
	# cases	% morbidity	# cases	% morbidity
Malaria	80,956	61.5%	1,782,977	59.9%
ARI	6,471	4.9%	334,818	11.3%
AWD	8,275	6.3%	371,340	12.5%
Bloody diarrhoea	985	0.7%	51,069	1.7%
AJS	2	0.0%	198	0.0%
Measles	4	0.0%	408	0.0%
Other	35,033	26.6%	434,218	14.6%
Total cases	131,726	100%	2,975,028	100%

Figure 2, indicates the top causes of morbidity in the country, with malaria being the leading cause of morbidity 1,782,977 (59.9%) followed by AWD, ARI and ABD respectively since week 1 of 2018. refer to the figure above for more information.

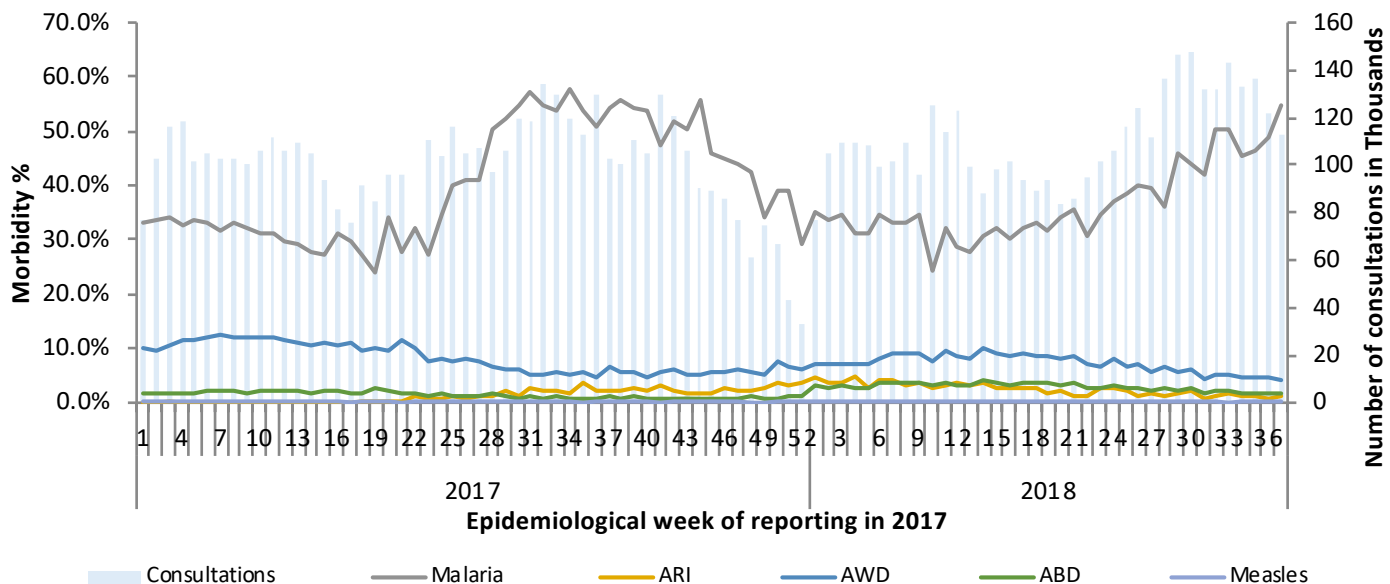
Trend in consultations and key diseases

Figure 3 | Trend in total consultations and key diseases (W37)



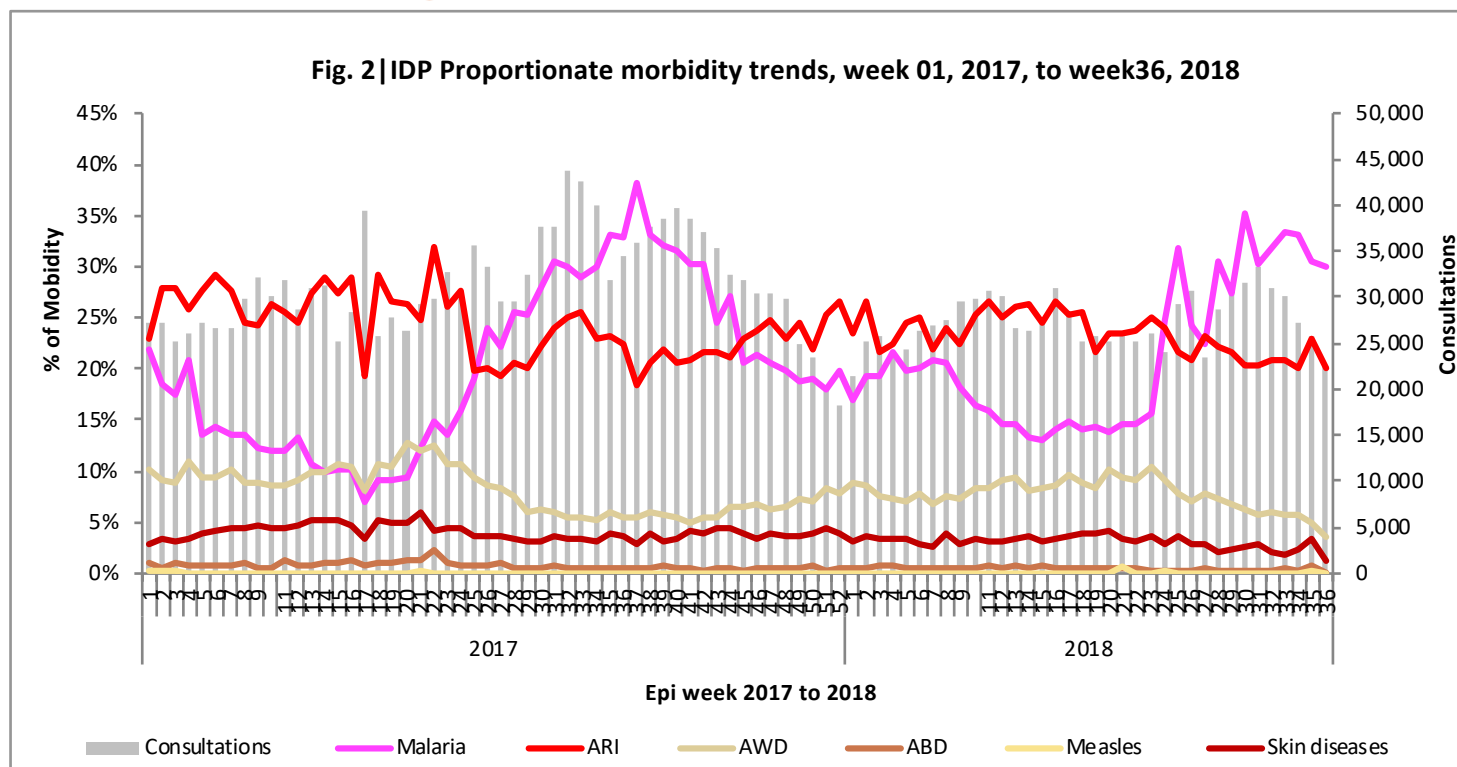
IDSr Proportionate morbidity trends - in relatively stable states

Fig. 1 | IDSr Proportionate morbidity trends, week 1, 2017 to 37, 2018



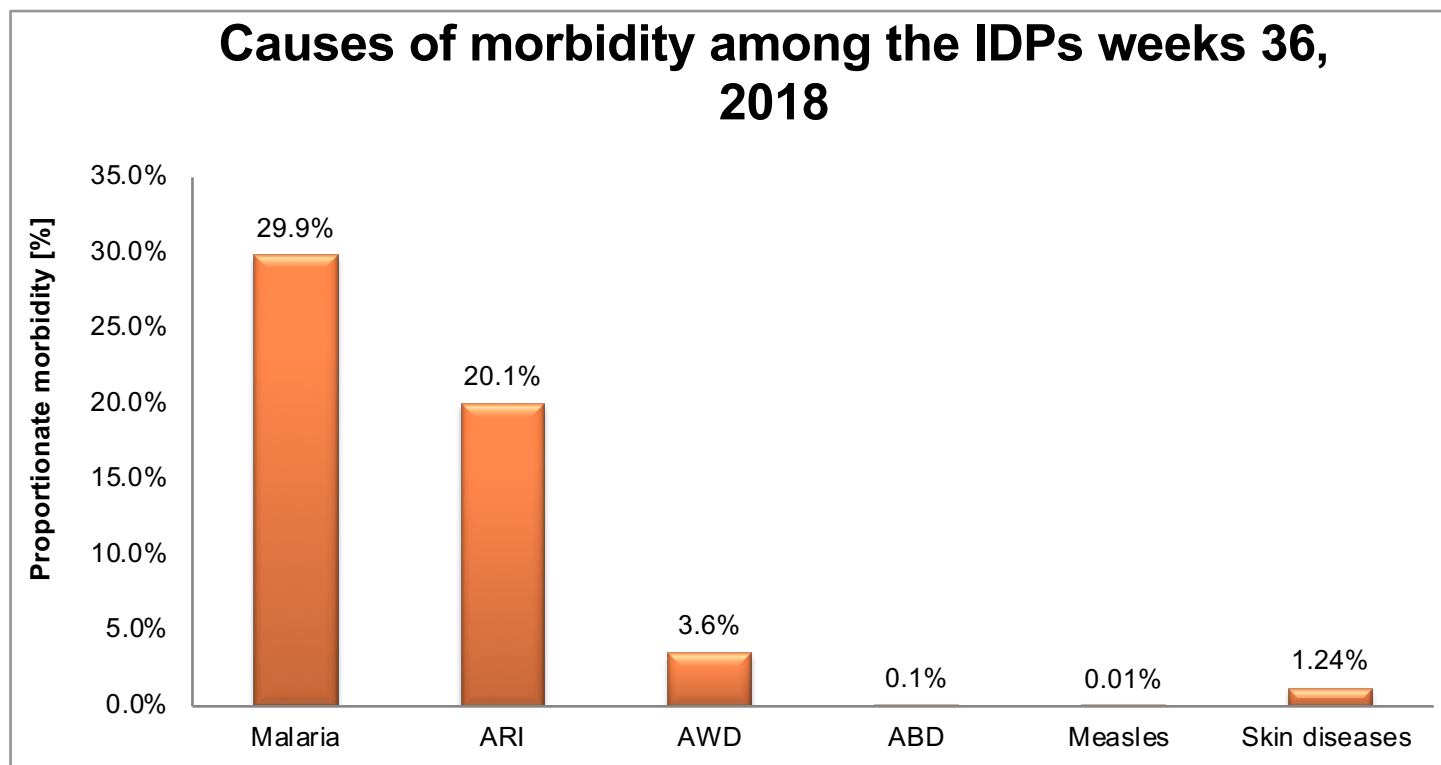
In the relatively stable states, malaria is the top cause of morbidity accounting for 59.9% of the consultations in week 37 (representing an increase from 48.9% in week 36).

IDP Proportionate morbidity trends - in displaced population



Among the IDPs, Malaria and ARI accounted for 29.9% and 20.1% of the consultations in week 36. The other significant causes of morbidity in the IDPs includes AWD, Skin diseases, and Measles.

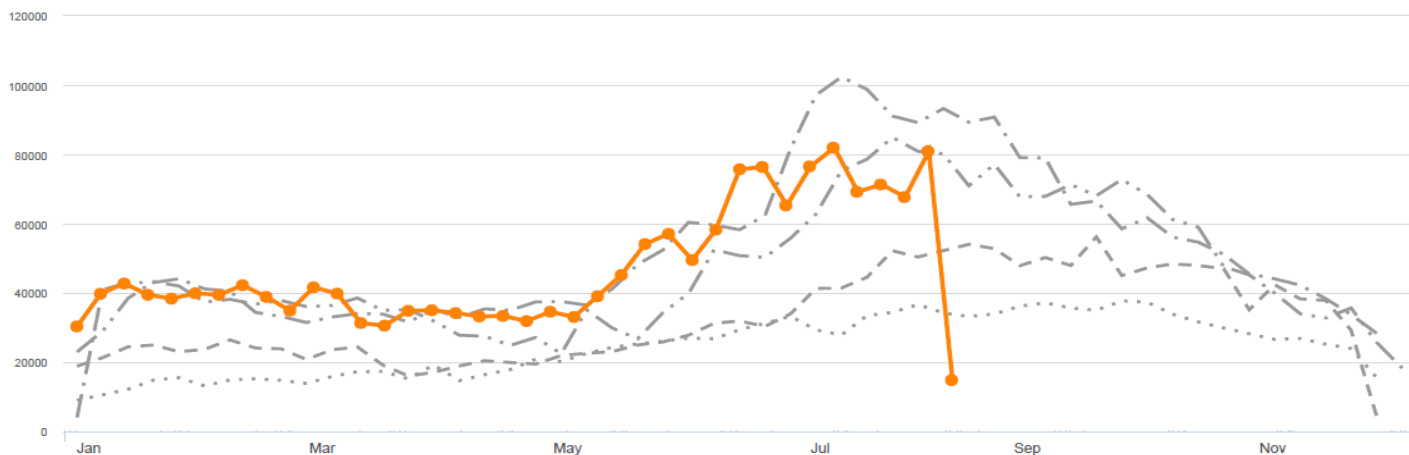
IDSR Proportionate morbidity trends - in displaced population



The top causes of morbidity in the IDPs in 2018 include ARI, Malaria, AWD, Skin diseases, and ABD.

Malaria | Trends over time

Figure 4a | Trend in number of cases over time (South Sudan)



Graph legend

- 2018
- - - 2017
- · - · - 2016
- - - - 2015
- 2014

Key malaria indicators (2018)

1,782,977 **250** **109**
 Cases Deaths Alerts

Figure 4b | % morbidity

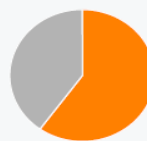
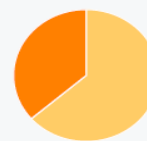


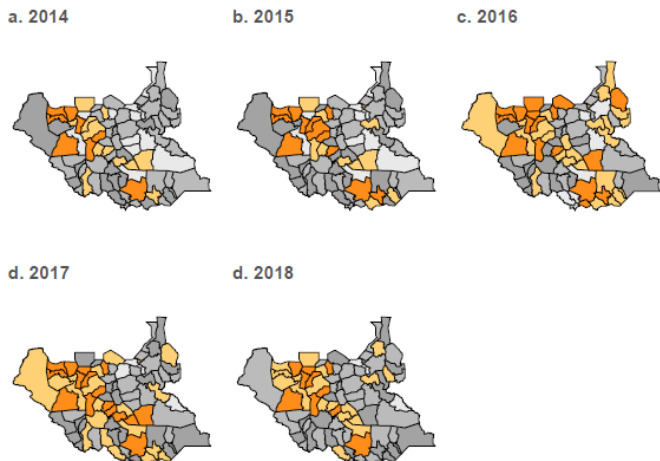
Figure 4c | Age breakdown



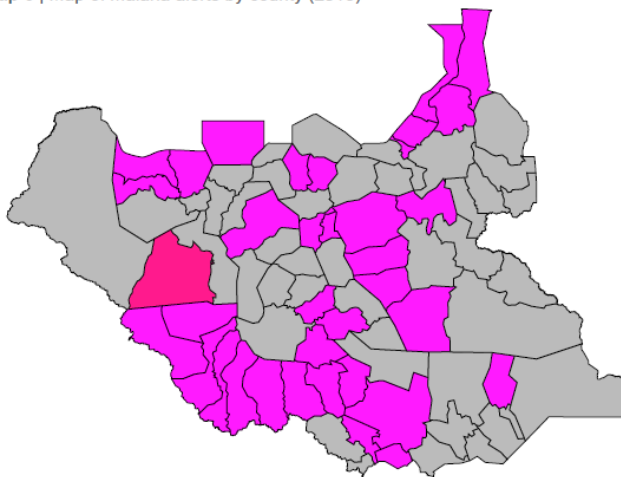
Malaria is the top course of Morbidity in the country, a total of 1,782,977 cases with 250 deaths registered since week 1 of 2018. malaria trend for week 37 of 2018 is below 2014, and 2015 as shown in the figure 4a, above.

Malaria | Maps and Alert Management

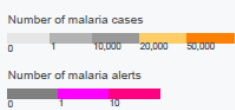
Map 2 | Map of malaria cases by county (2018)



Map 3 | Map of malaria alerts by county (2018)



Map legend



109 Alerts
73 Verified

Risk Assessment



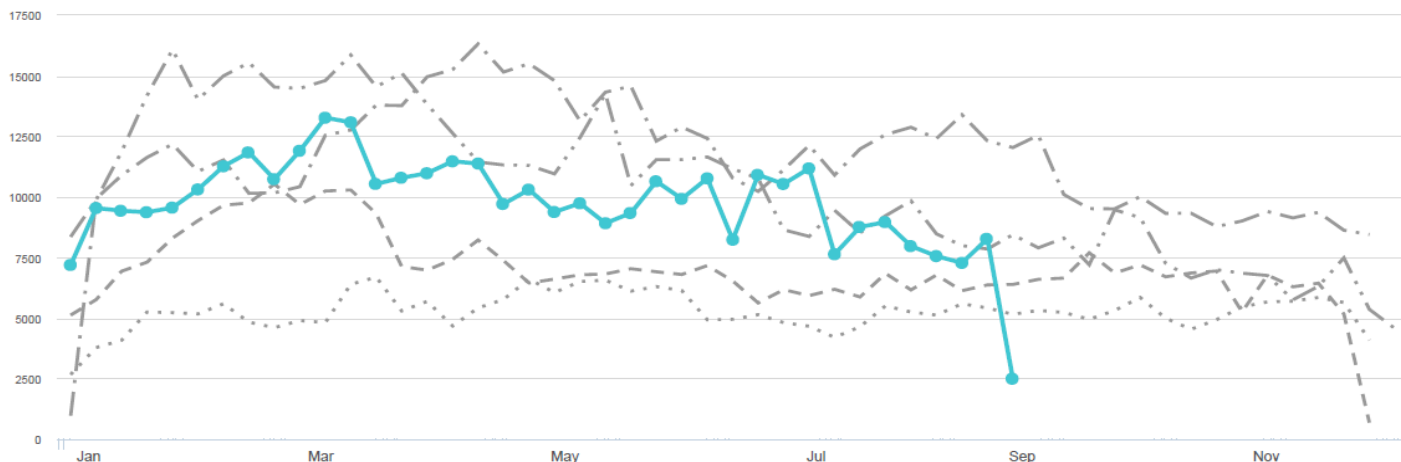
Alert threshold

Twice the average number of cases over the past 3 weeks. Source: IDSR

Since the beginning of the year, a total of 109 malaria alerts have been triggered, 73 of those were verified. The Maps above indicate the location reporting malaria alerts from 2014, 2015, 2016, 2017, and 2018.

Acute Watery Diarrhoea | Trends over time

Figure 5a | Trend in AWD cases over time (South Sudan)



Graph legend

- 2018
- - - 2017
- - - 2016
- - - 2015
- 2014

Key AWD indicators (2018)

371,340

Cases

43

Deaths

111

Alerts

Figure 5b | % morbidity

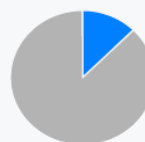


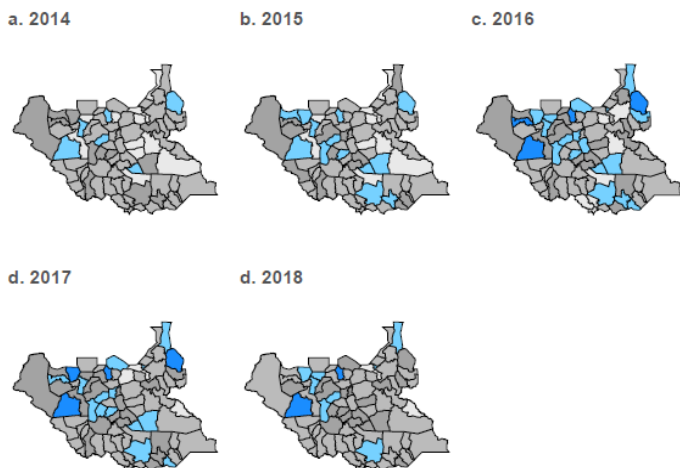
Figure 5c | Age breakdown



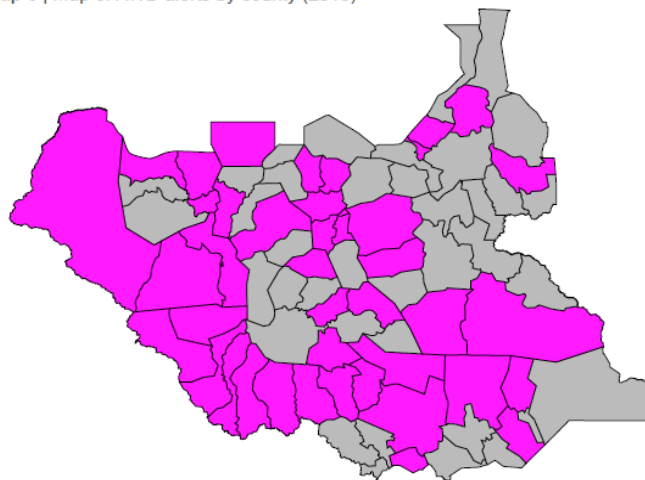
AWD is one of the top causes of morbidity in the country with 371,340 cases reported since week 1 of 2018 including 43 deaths. AWD trend for week 37 of 2018, is below 2016 and 2017, as shown in figure 5a, above.

Acute Watery Diarrhoea | Maps and Alert Management

Map 4 | Map of AWD cases by county (2018)



Map 5 | Map of AWD alerts by county (2018)



Map legend



111

Alerts

76

Verified

Risk Assessment



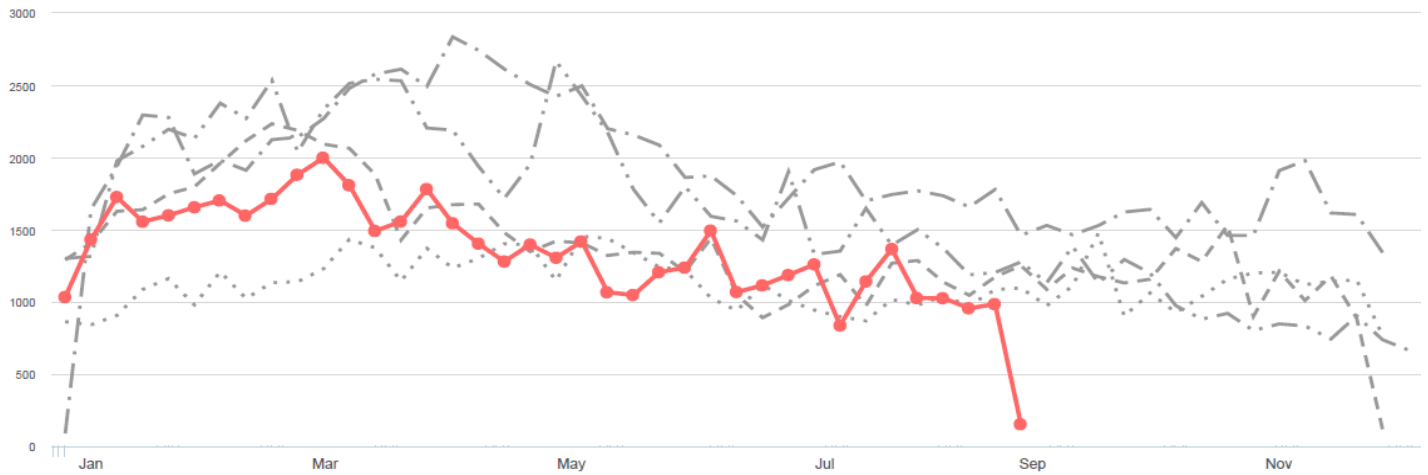
Alert threshold

Twice the average number of cases over the past 3 weeks. Source: IDSR

The number of AWD alerts triggered since week 1 of 2018 is 111, out of which 76 were verified. Maps above highlight the areas reporting AWD alerts from 2014 to 2018.

Acute Bloody Diarrhoea | Trends over time

Figure 6a | Trend in bloody diarrhoea cases over time (South Sudan)

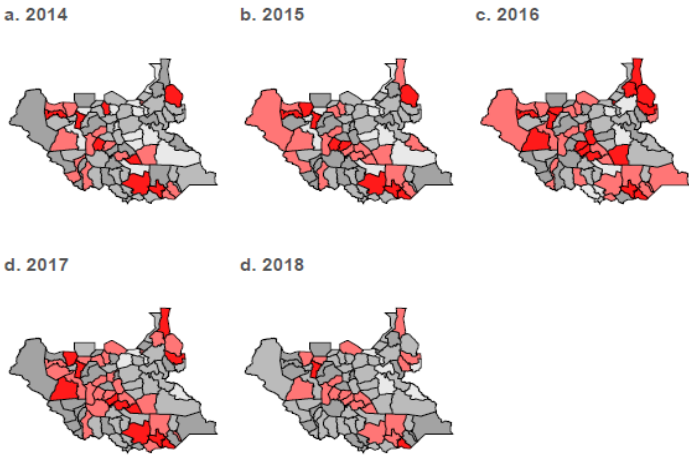


Graph legend — 2018 - - - 2017 - - - 2016 - - - 2015 2014	Key bloody diarrhoea indicators (2018) 51,069 Cases 23 Deaths 139 Alerts	Figure 6b % morbidity 	Figure 6c Age breakdown
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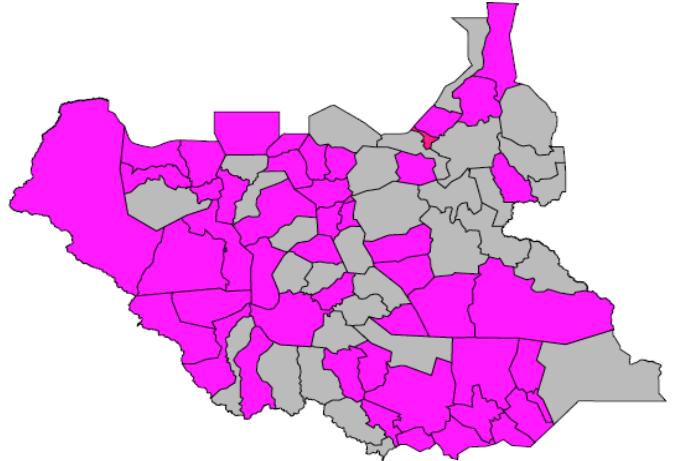
Since week 1 of 2018, a total of 51,069 cases of ABD have been reported country wide including 23 death. ABD trend for 2018 is below 2014, 2015, 2016, and 2017 respectively. Refer to figure 6a, above.

Acute Bloody Diarrhoea | Maps and Alert Management

Map 6 | Map of bloody diarrhoea cases by county (2018)



Map 7 | Map of bloody diarrhoea alerts by county (2018)



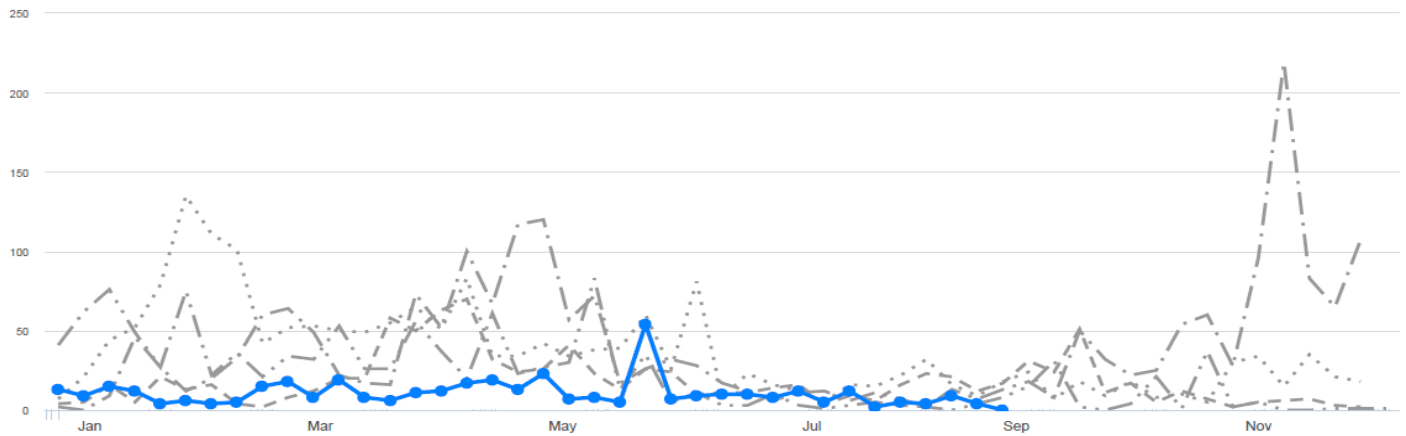
Map legend Number of bloody diarrhoea cases 0 500 1,000 2,000 Number of alerts 0 1 10	139 Alerts 96 Verified	Risk Assessment 1 Low Risk 0 Moderate Risk 0 High Risk 0 Very High Risk
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Alert threshold
 Twice the average number of cases over the past 3 weeks. Source: IDSR

Total of 139 alerts were generated since week 1 of 2018, of which 96 were verified by the county surveillance team. Maps indicating areas triggering alerts since 2014 to 2018 are shown above.

Measles | Trends over time

Figure 7a | Trend in number of cases over time (South Sudan)



Graph legend
 — 2018
 2017
 - - - - 2016
 - . - . 2015
 2014

Key measles indicators (2018)

408 Cases
3 Deaths
113 Alerts

Figure 7b | % morbidity



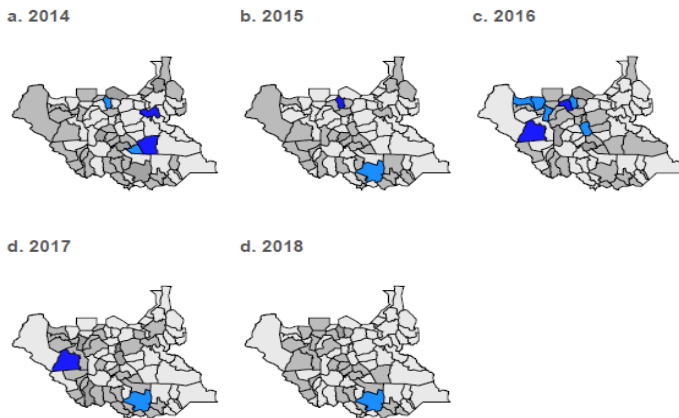
Figure 7c | Age breakdown



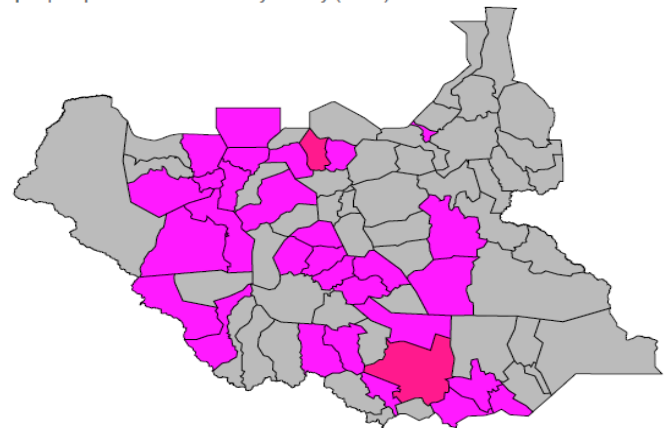
Since the beginning of 2018, at least 408 suspect measles cases including 3 death (CFR 0.74%) have been reported. . Of these, 292 suspect cases have undergone measles case-based laboratory-backed investigation with 245 samples collected out of which 26 measles IgM positive cases; 63 clinically confirmed cases; and 34 cases confirmed by epidemiological linkage.

Measles | Maps and Alert Management

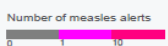
Map 7 | Map of measles cases by county (2018)



Map 8 | Map of measles alerts by county (2018)



Map legend



Alert threshold

1 case.
 Source: IDSR

113 Alerts
94 Verified

Risk Assessment



Since week 1 of 2018, 113 alerts of measles were triggered and 94 of those have been verified at county level. Maps of areas raising alerts from 2014 to 2018 are shown above.

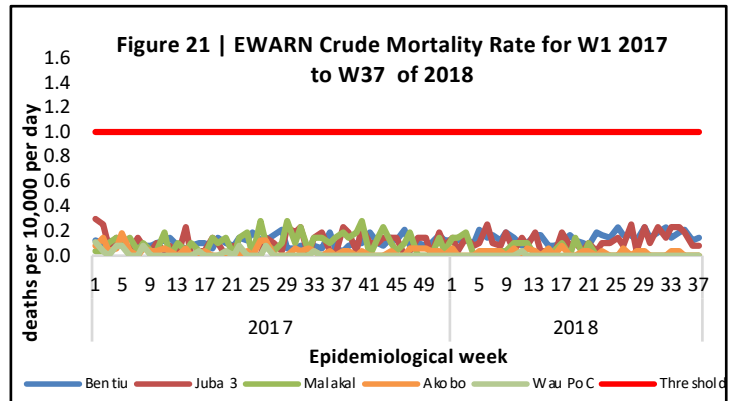
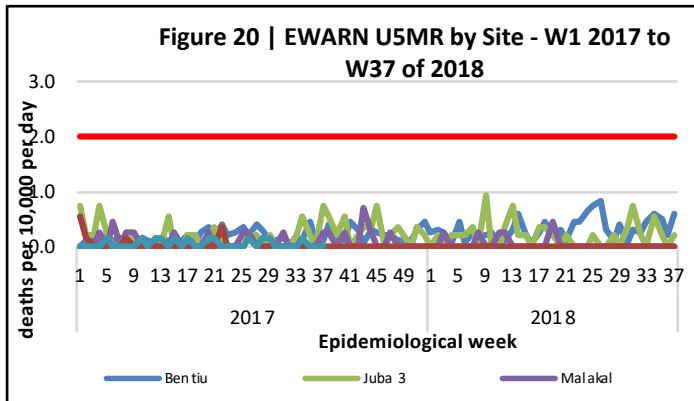
Table 6 | Proportional mortality by cause of death in IDPs W37 2018

Cause of Death by IDP site	Bentiu		Juba 3		Total deaths
	<5yrs	≥5yrs	<5yrs	≥5yrs	
malaria	2				2
pneumonia	1		1		2
SAM	1				1
Sepsis		1			1
Septic shock	1				1
TB		1			1
Unkown				1	1
Asphyxia	1				1
Anaemia	1				1
Drown in Water	1				1
Asphyxion	1				1
Total deaths	9	2	1	1	13

Among the IDPs, mortality data was received Bentiu PoC and UN House PoC in week 37. (Table 6). **A total of 13** deaths were reported during the week. Bentiu PoC reported 11 (85%) in the week. During the week, 10 (77%) deaths were recorded among children <5 years in (Table 6).

The causes of death during week 37 are shown in Table 6.

Mortality in the IDPs - Crude and Under five mortality rates



The U5MR in all the IDP sites that submitted mortality data in week 37 of 2018 is below the emergency threshold of 2 deaths per 10,000 per day (Fig. 20).

The Crude Mortality Rates [CMR] in all the IDP sites that submitted mortality data in week 37 of 2018 were below the emergency threshold of 1 death per 10,000 per day (Fig. 21).

Mortality in the IDPs - Overall mortality in 2018

Table 7 | Mortality by IDP site and cause of death as of W37, 2018

IDP site	acute watery diarrhoea	cancer	GSW	Heart Failure	Kala-Azar	malaria	Meningitis	perinatal death	pneumonia	Rabies	SAM	Sepsis	TB/HIV/AIDS	Trauma	HIV/AIDS	TB	Others	Grand Total
Bentiu	7	1	8	1	2	45	3	27	12	1	18	21	13	1	22	7	239	428
Juba 3	1	1		5		11			6		3		1		6	7	79	120
Malakal		1		3	1			1	1							2	17	26
Akobo			1		2	4			2		2	2	1	1			10	25
Wau PoC						1											0	1
Grand Total	8	3	9	9	5	61	3	28	21	1	23	23	15	2	28	16	345	600
Proportionate mortality [%]	1%	1%	2%	2%	1%	##	1%	5%	4%	0%	4%	4%	3%	0%	5%	3%	58%	100%

A total of 600 deaths have been reported from the IDP sites in 2018 [Table 7](#).

The top causes of mortality in the IDPs in 2018 are shown in [Table 7](#).

**This bulletin is produced by the Ministry of Health with
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Notes

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The data has been collected with support from the EWARS project. This is an initiative to strengthen early warning, alert and response in emergencies. It includes an online, desktop and mobile application that can be rapidly configured and deployed in the field. It is designed with frontline users in mind, and built to work in difficult and remote operating environments. This bulletin has been automatically published from the EWARS application.

More information can be found at <http://ewars-project.org>

