

# WEEKLY EPIDEMIOLOGY BULLETIN

NATIONAL SURVEILLANCE UNIT, MINISTRY OF HEALTH & WELLNESS, JAMAICA

## Weekly Spotlight

### Menopause



Menopause is one point in a continuum of life stages for women and marks the end of their reproductive years. After menopause, a woman cannot become pregnant, except in rare cases when specialized fertility treatments are used. Menopause is caused by the loss of ovarian follicular function and a decline in circulating blood oestrogen levels.

### Changes associated with menopause

The hormonal changes associated with menopause can affect physical, emotional, mental, and social well-being. The symptoms experienced during and following the menopausal transition vary substantially from person to person. Some have few if any symptoms. For others, symptoms can be severe and affect daily activities and quality of life. Some can experience symptoms for several years.

Symptoms associated with menopause include: hot flashes and night sweats. Hot flashes refer to a sudden feeling of heat in the face, neck and chest, often accompanied by flushing of the skin, perspiration (sweating), palpitations, and acute feelings of physical discomfort which can last several minutes; changes in the regularity and flow of the menstrual cycle, culminating in cessation of menstruation; vaginal dryness, pain during sexual intercourse and incontinence; difficulty sleeping/insomnia; and changes in mood, depression, and/or anxiety.

Body composition and cardiovascular risk can also be affected. Women's advantage over men in terms of cardiovascular disease gradually disappears with the significant decline in oestrogen levels after menopause. Menopause can also result in the weakening of the pelvic support structures, increasing the risk of pelvic organ prolapse. Loss of bone density at menopause is a significant contributor to higher rates of osteoporosis and fractures.

## EPI WEEK 11



Syndromic Surveillance

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SENTINEL SYNDROMIC SURVEILLANCE

Sentinel Surveillance in Jamaica



A syndromic surveillance system is good for early detection of and response to public health events.

Sentinel surveillance occurs when selected health facilities (sentinel sites) form a network that reports on certain health conditions on a regular basis, for example, weekly. Reporting is mandatory whether or not there are cases to report.

Jamaica’s sentinel surveillance system concentrates on visits to sentinel sites for health events and syndromes of national importance which are reported weekly (see pages 2 -4). There are seventy-eight (78) reporting sentinel sites (hospitals and health centres) across Jamaica.

Table showcasing the Timeliness of Weekly Sentinel Surveillance Parish Reports for the Four Most Recent Epidemiological Weeks – 8 to 11 of 2024

Parish health departments submit reports weekly by 3 p.m. on Tuesdays. Reports submitted after 3 p.m. are considered late.

**KEY:**  
**Yellow** - late submission on Tuesday  
**Red** - late submission after Tuesday

Epi week	Kingston and Saint Andrew	Saint Thomas	Saint Catherine	Portland	Saint Mary	Saint Ann	Trelawny	Saint James	Hanover	Westmoreland	Saint Elizabeth	Manchester	Clarendon
2024													
8	On Time	On Time	On Time	Late (T)	On Time	Late (T)	On Time	On Time	On Time	On Time	On Time	On Time	On Time
9	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time
10	On Time	On Time	On Time	On Time	On Time	Late (W)	On Time	On Time	On Time	On Time	On Time	On Time	On Time
11	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time	On Time

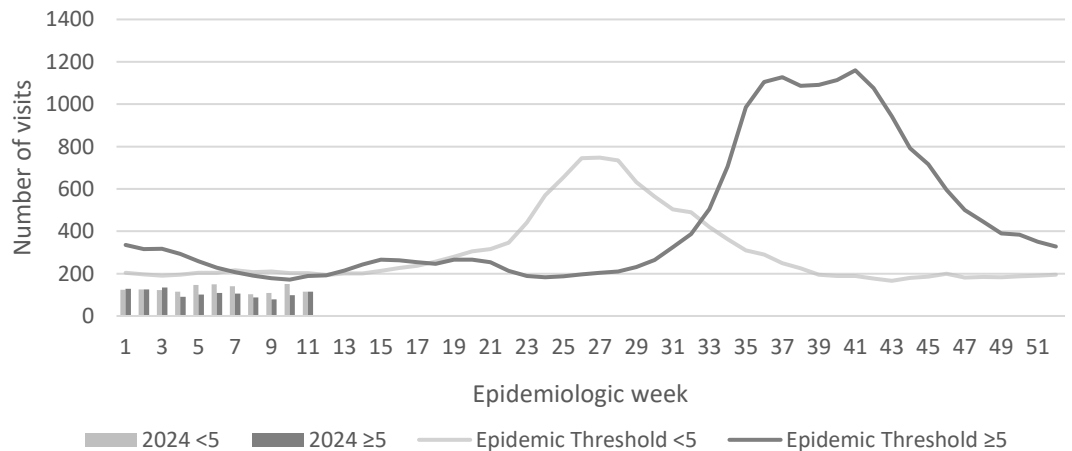
REPORTS FOR SYNDROMIC SURVEILLANCE

UNDIFFERENTIATED FEVER

Temperature of  $>38^{\circ}\text{C}$  /  $100.4^{\circ}\text{F}$  (or recent history of fever) with or without an obvious diagnosis or focus of infection.



Weekly Visits to Sentinel Sites for Undifferentiated Fever All ages: Jamaica, Weekly Threshold vs Cases 2024



2 NOTIFICATIONS- All clinical sites



INVESTIGATION REPORTS- Detailed Follow up for all Class One Events



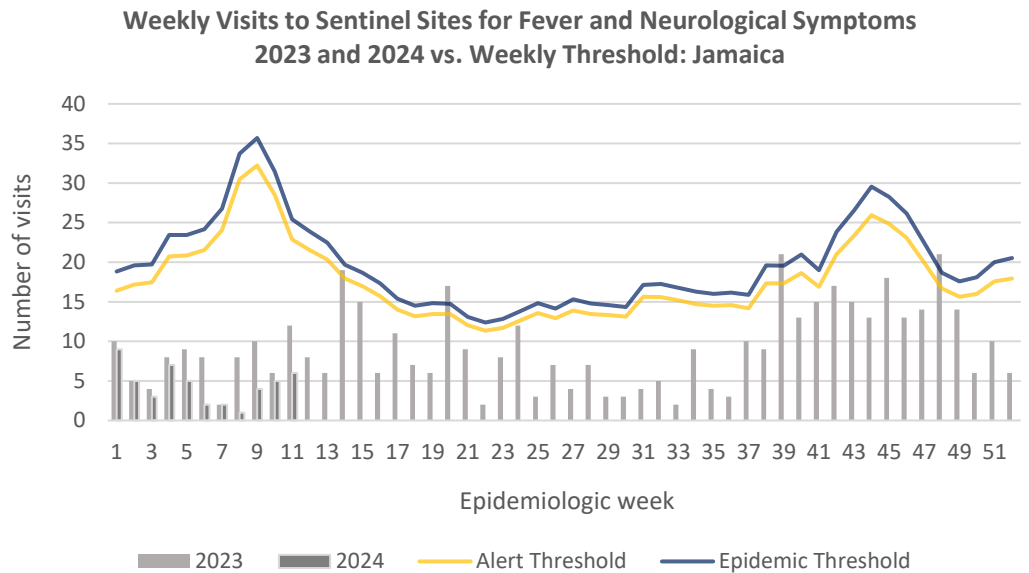
HOSPITAL ACTIVE SURVEILLANCE- 30 sites. Actively pursued



SENTINEL REPORT- 78 sites. Automatic reporting

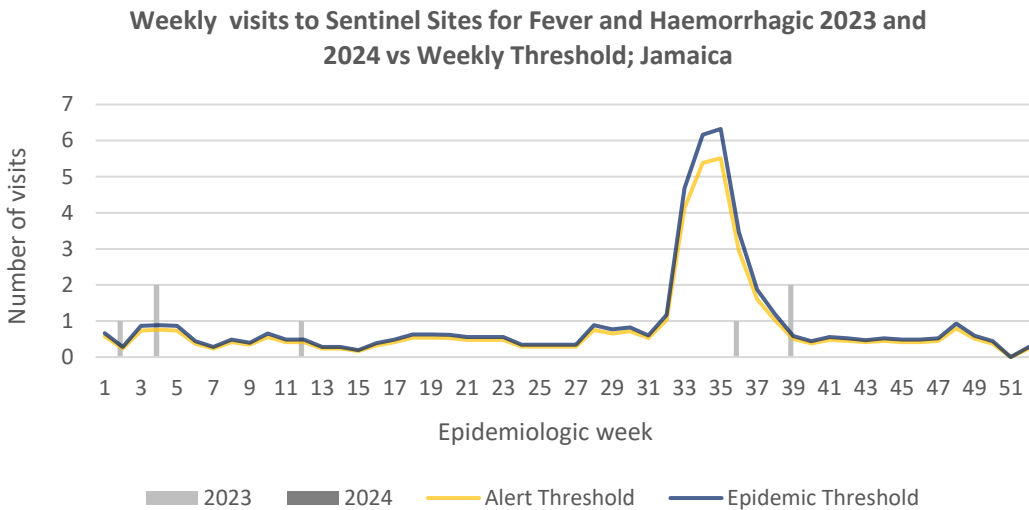
**FEVER AND NEUROLOGICAL**

Temperature of  $>38^{\circ}\text{C}$  /  $100.4^{\circ}\text{F}$  (or recent history of fever) in a previously healthy person with or without headache and vomiting. The person must also have meningeal irritation, convulsions, altered consciousness, altered sensory manifestations or paralysis (except AFP).



**FEVER AND HAEMORRHAGIC**

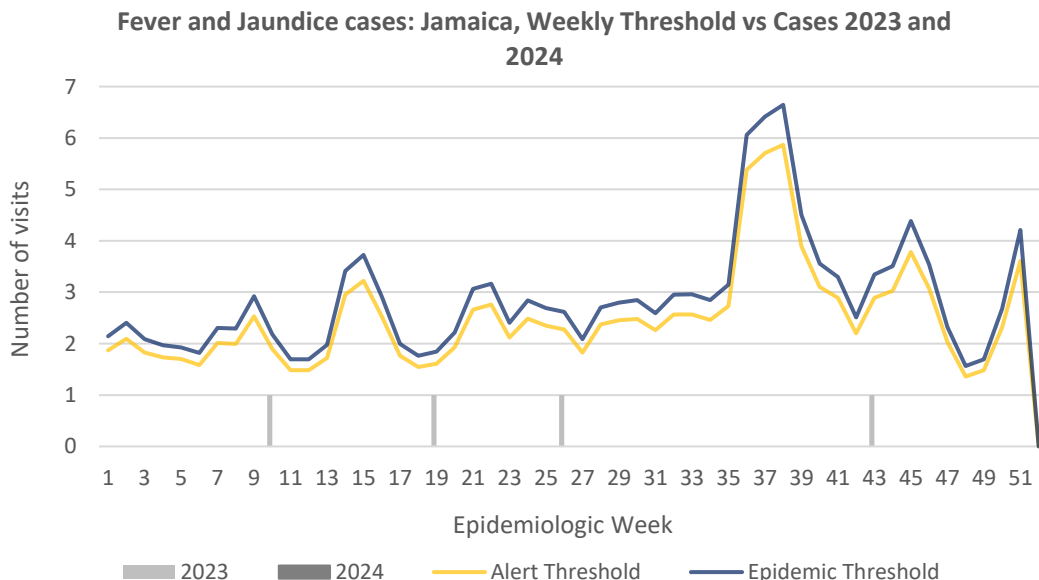
Temperature of  $>38^{\circ}\text{C}$  /  $100.4^{\circ}\text{F}$  (or recent history of fever) in a previously healthy person presenting with at least one haemorrhagic (bleeding) manifestation with or without jaundice.



**FEVER AND JAUNDICE**

Temperature of  $>38^{\circ}\text{C}$  /  $100.4^{\circ}\text{F}$  (or recent history of fever) in a previously healthy person presenting with jaundice.

The epidemic threshold is used to confirm the emergence of an epidemic in order to implement control measures. It is calculated using the mean reported cases per week plus 2 standard deviations.



**3 NOTIFICATIONS-**  
All clinical sites



**INVESTIGATION REPORTS-** Detailed Follow up for all Class One Events



**HOSPITAL ACTIVE SURVEILLANCE-** 30 sites. Actively pursued

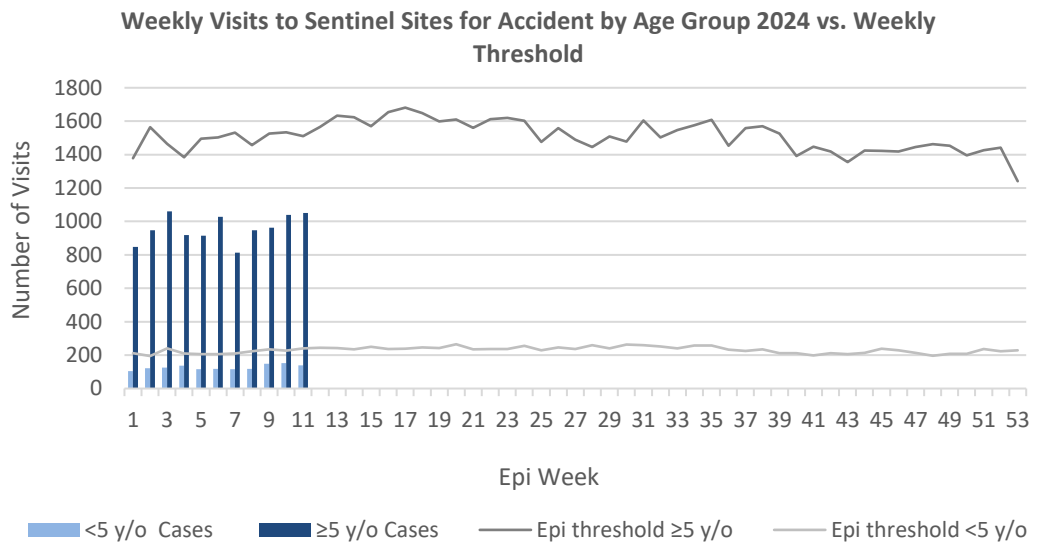


**SENTINEL REPORT-** 78 sites. Automatic reporting



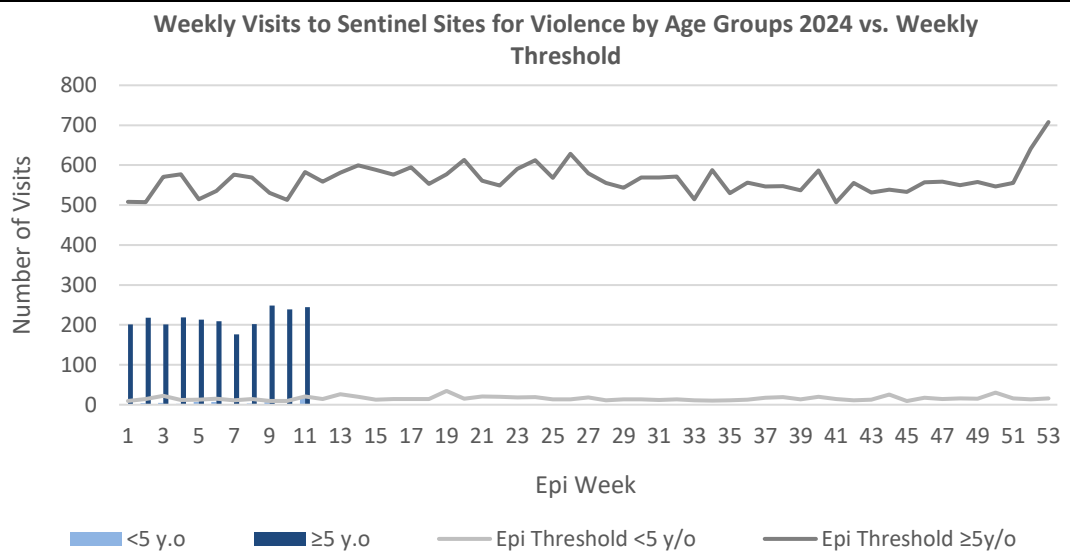
**ACCIDENTS**

Any injury for which the cause is unintentional, e.g. motor vehicle, falls, burns, etc.



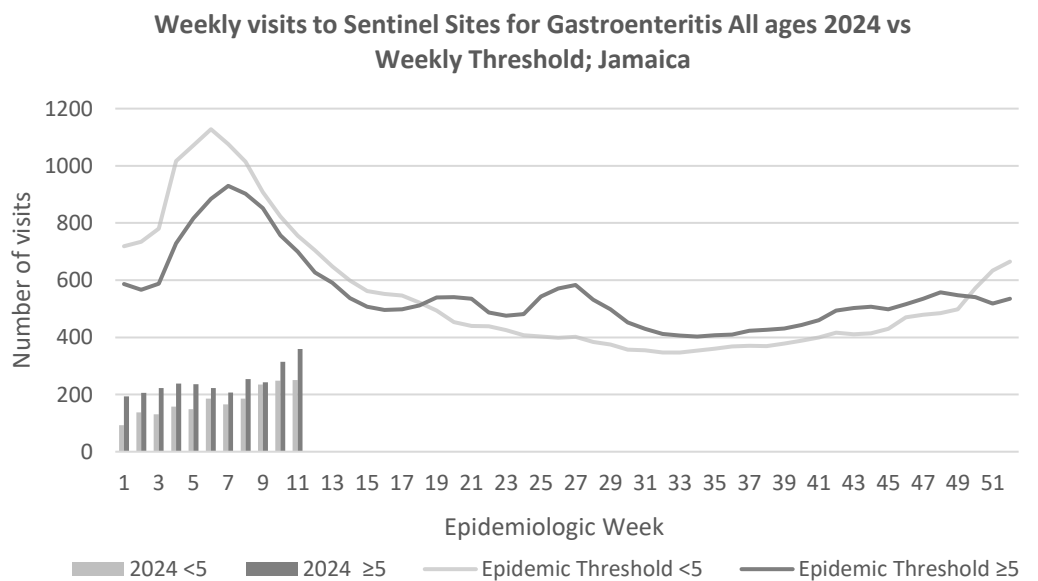
**VIOLENCE**

Any injury for which the cause is intentional, e.g. gunshot wounds, stab wounds, etc.



**GASTROENTERITIS**

Inflammation of the stomach and intestines, typically resulting from bacterial toxins or viral infection and causing vomiting and diarrhoea.



4 NOTIFICATIONS- All clinical sites



INVESTIGATION REPORTS- Detailed Follow up for all Class One Events



HOSPITAL ACTIVE SURVEILLANCE- 30 sites. Actively pursued



SENTINEL REPORT- 78 sites. Automatic reporting



CLASS ONE NOTIFIABLE EVENTS				Comments	
	CLASS 1 EVENTS	Confirmed YTD <sup>α</sup>		AFP Field Guides from WHO indicate that for an effective surveillance system, detection rates for AFP should be 1/100,000 population under 15 years old (6 to 7) cases annually.	
		CURRENT YEAR 2024	PREVIOUS YEAR 2023		
NATIONAL /INTERNATIONAL INTEREST	Accidental Poisoning	63 <sup>β</sup>	68 <sup>β</sup>	Pertussis-like syndrome and Tetanus are clinically confirmed classifications.  <sup>γ</sup> Dengue Hemorrhagic Fever data include Dengue related deaths;  <sup>δ</sup> Figures include all deaths associated with pregnancy reported for the period.	
	Cholera	0	0		
	Dengue Hemorrhagic Fever <sup>γ</sup>	See Dengue page below	See Dengue page below		
	COVID-19 (SARS-CoV-2)	153	1669		
	Hansen’s Disease (Leprosy)	0	0		
	Hepatitis B	0	19		
	Hepatitis C	0	6		
	HIV/AIDS	NA	NA		
	Malaria (Imported)	0	0		
	Meningitis	5	11		
	Monkeypox	0	3		
EXOTIC/ UNUSUAL	Plague	0	0	<sup>ε</sup> CHIKV IgM positive cases <sup>θ</sup> Zika PCR positive cases <sup>β</sup> Updates made to prior weeks.  <sup>α</sup> Figures are cumulative totals for all epidemiological weeks year to date.	
HIGH MORBIDITY/ MORTALITY	Meningococcal Meningitis	0	0		
	Neonatal Tetanus	0	0		
	Typhoid Fever	0	0		
	Meningitis H/Flu	0	0		
SPECIAL PROGRAMMES	AFP/Polio	0	0		
	Congenital Rubella Syndrome	0	0		
	Congenital Syphilis	0	0		
	Fever and Rash	Measles	0		0
		Rubella	0		0
	Maternal Deaths <sup>δ</sup>	9	8		
	Ophthalmia Neonatorum	21	33		
	Pertussis-like syndrome	0	0		
	Rheumatic Fever	0	0		
	Tetanus	0	0		
	Tuberculosis	1	19		
	Yellow Fever	0	0		
Chikungunya <sup>ε</sup>	0	0			
Zika Virus <sup>θ</sup>	0	0			

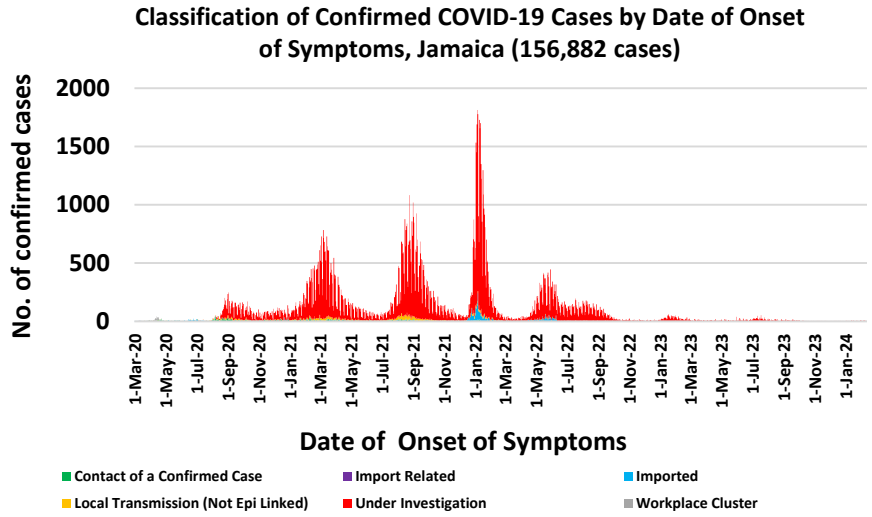
NA- Not Available

 <p><b>5 NOTIFICATIONS-</b> All clinical sites</p>	 <p><b>INVESTIGATION REPORTS-</b> Detailed Follow up for all Class One Events</p>	 <p><b>HOSPITAL ACTIVE SURVEILLANCE-</b> 30 sites. Actively pursued</p>	 <p><b>SENTINEL REPORT-</b> 78 sites. Automatic reporting</p>
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# COVID-19 Surveillance Update

CASES	EW 11	Total
Confirmed	3	156882
Females	2	90411
Males	1	66468
Age Range	34 years to 69 years	1 day to 108 years

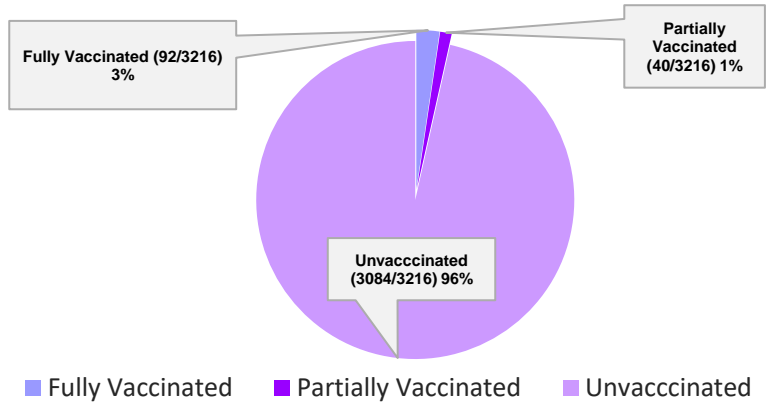
\* 3 positive cases had no gender specification  
 \* PCR or Antigen tests are used to confirm cases  
 \* Total represents all cases confirmed from 10 Mar 2020 to the current Epi-Week.



## COVID-19 Outcomes

Outcomes	EW 11	Total
ACTIVE *2 weeks*		9
DIED – COVID Related	0	3775
Died - NON COVID	0	366
Died - Under Investigation	0	222
Recovered and discharged	0	103226
Repatriated	0	93
Total		156882

## 3216 COVID-19 Related Deaths since March 1, 2021 – YTD Vaccination Status among COVID-19 Deaths



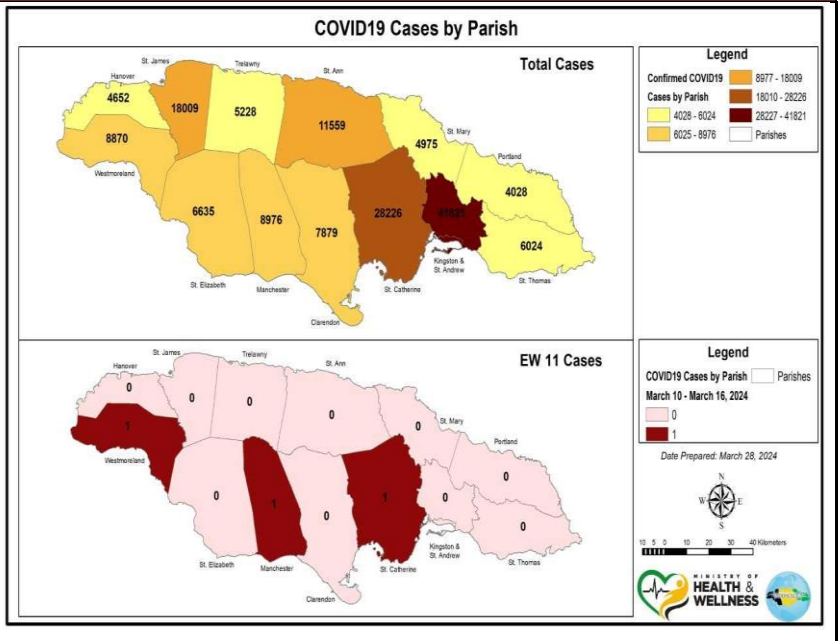
\*Vaccination programme March 2021 – YTD  
 \* Total as at current Epi week

## COVID-19 Parish Distribution and Global Statistics

### COVID-19 Virus Structure

**SARS-CoV-2**

- Spike (S)
- Nucleocapsid (N)
- Membrane (M)
- Envelope (E)
- RNA viral genome



### COVID-19 WHO Global Statistics EW 8-11, 2024

Epi Week	Confirmed Cases	Deaths
8	86,400	1,800
9	72,300	1,500
10	67,500	1,300
11	48,000	948
<b>Total (4weeks)</b>	<b>274,200</b>	<b>5,548</b>

**6 NOTIFICATIONS-**  
All clinical sites

**INVESTIGATION REPORTS-** Detailed Follow up for all Class One Events

**HOSPITAL ACTIVE SURVEILLANCE-** 30 sites. Actively pursued

**SENTINEL REPORT-** 78 sites. Automatic reporting

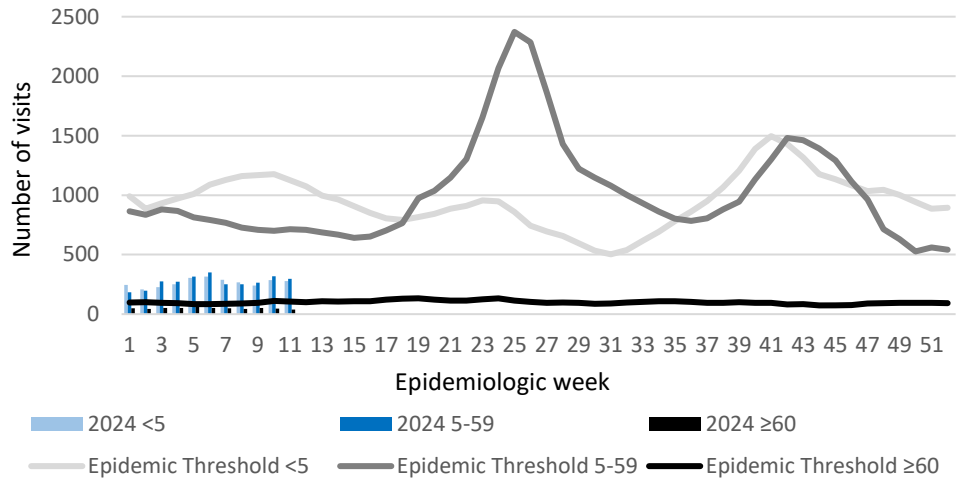
# NATIONAL SURVEILLANCE UNIT INFLUENZA REPORT

*EW 11*

March 10, 2024 – March 16, 2024 Epidemiological Week 11

	<i>EW 11</i>	<i>YTD</i>
SARI cases	10	84
<b>Total Influenza positive Samples</b>	<b>0</b>	<b>35</b>
<b>Influenza A</b>	<b>0</b>	<b>35</b>
H3N2	0	10
H1N1pdm09	0	25
Not subtyped	0	0
<b>Influenza B</b>	<b>0</b>	<b>0</b>
B lineage not determined	0	0
B Victoria	0	0
<b>Parainfluenza</b>	<b>0</b>	<b>0</b>
<b>Adenovirus</b>	<b>0</b>	<b>0</b>
<b>RSV</b>	<b>0</b>	<b>15</b>

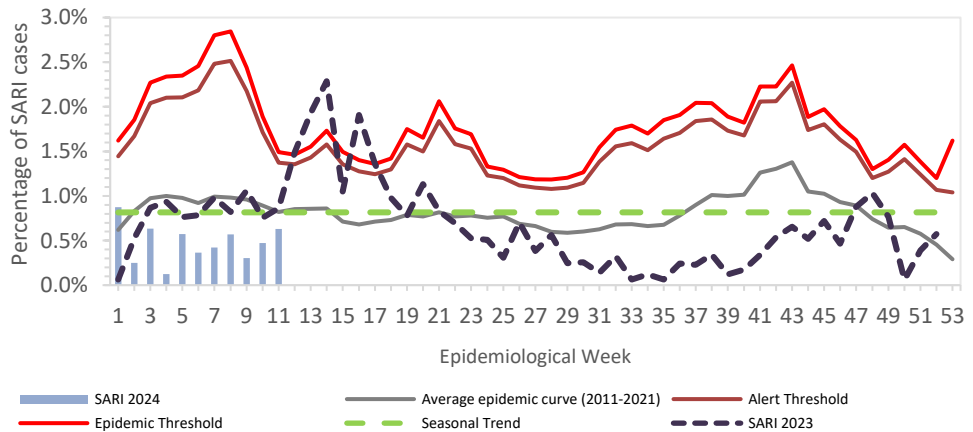
**Weekly visits to Sentinel Sites for Influenza-like Illness (ILI) All ages 2024 vs Weekly Threshold; Jamaica**



**Epi Week Summary**

During EW 11, ten (10) SARI admissions were reported.

**Jamaica: Percentage of Hospital Admissions for Severe Acute Respiratory Illness (SARI 2024) (compared with 2011-2023)**

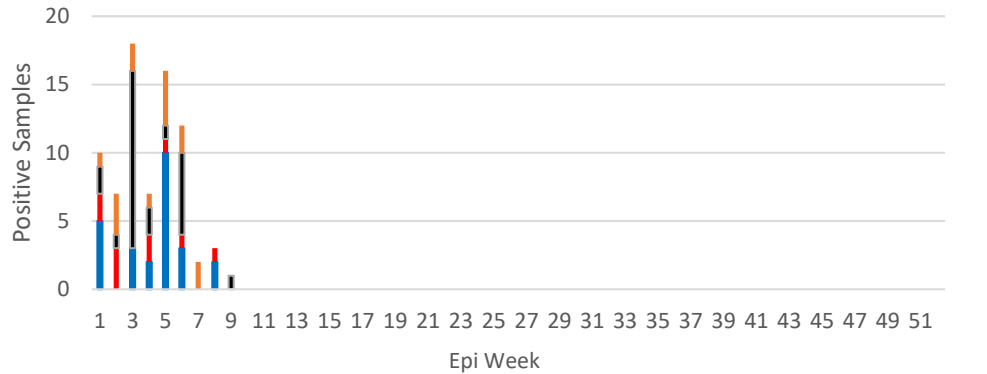


**Caribbean Update EW 11**

**Caribbean:** Following a previous increase, ILI cases have markedly decreased over the past four weeks, primarily attributed to influenza. SARI cases have continued to decline, with most positive cases associated with influenza. Influenza activity has decreased over the past four EWs, reaching low circulation levels. Predominant viruses during this period have been influenza A(H1N1) pdm09, with concurrent circulation of A(H3N2) and B/Victoria to a lesser extent. RSV activity has remained low, and SARS-CoV activity has also declined to low levels. By countries: Increased influenza activity has been observed in Suriname and the Cayman Islands. Elevated SARS-CoV-2 activity has been observed in Dominica, Saint Lucia, Guyana, and Saint Vincent and the Grenadines.

(taken from PAHO Respiratory viruses weekly report) <https://www.paho.org/en/influenza-situation-report>

**Distribution of Influenza and Other Respiratory Viruses Under Surveillance by EW, Jamaica - 2024**



**7 NOTIFICATIONS-**  
All clinical sites

**INVESTIGATION REPORTS-** Detailed Follow up for all Class One Events

**HOSPITAL ACTIVE SURVEILLANCE-** 30 sites. Actively pursued

**SENTINEL REPORT-** 78 sites. Automatic reporting

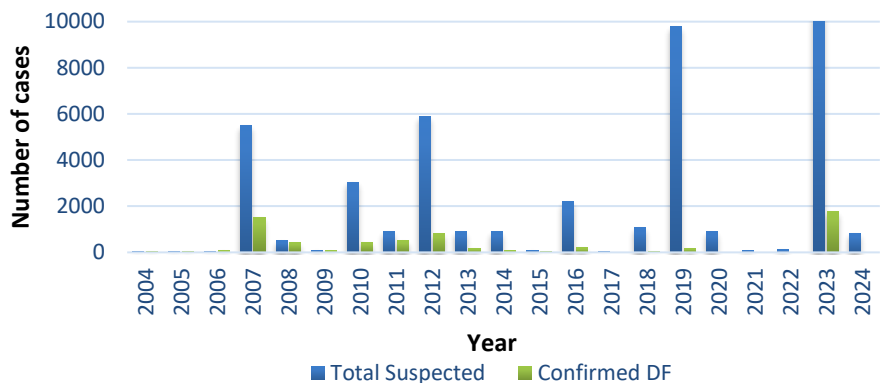
# Dengue Bulletin

March 10, 2024 – March 16, 2024 Epidemiological Week 11


Epidemiological Week 11



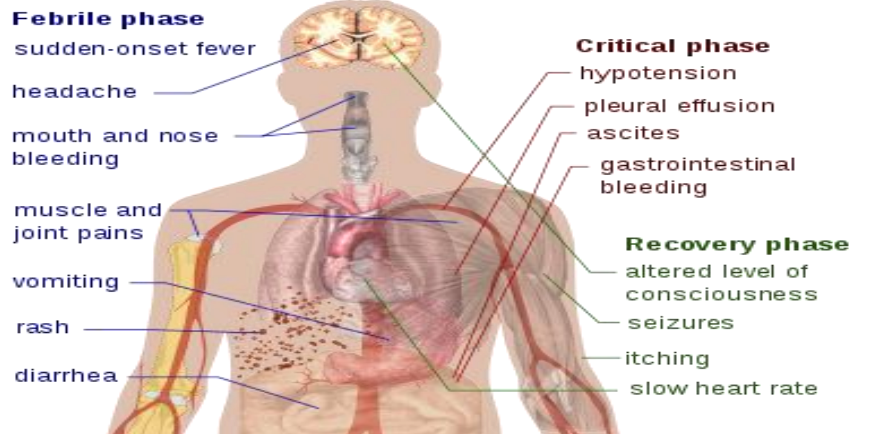
Dengue Cases by Year: 2004-2024, Jamaica



## Reported suspected, probable and confirmed dengue with symptom onset in week 11 of 2024

	2024*	
	EW 11	YTD
 Total Suspected , Probable & Confirmed Dengue Cases	1	832
Lab Confirmed Dengue cases	0	0
CONFIRMED Dengue Related Deaths	0	0

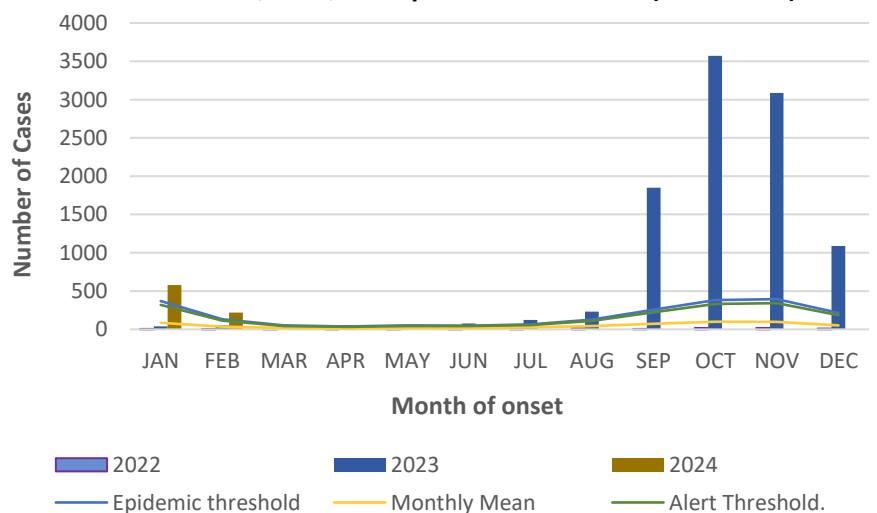
## Symptoms of Dengue fever



### Points to note:

- Dengue deaths are reported based on date of death.
- \*Figure as at March 27, 2024
- Only PCR positive dengue cases are reported as confirmed.
- IgM positive cases are classified as presumed dengue.

Suspected dengue cases for 2022 - 2024 versus monthly mean, alert, and epidemic thresholds (2007-2022)



8 NOTIFICATIONS- All clinical sites



INVESTIGATION REPORTS- Detailed Follow up for all Class One Events



HOSPITAL ACTIVE SURVEILLANCE- 30 sites. Actively pursued



SENTINEL REPORT- 78 sites. Automatic reporting



# RESEARCH PAPER

## Abstract

### Barriers to Adherence of Nurses and Patient Care Assistants to Hand Hygiene Practices and Equipment Decontamination Policy at an Urban Hospital in Jamaica

Feron Brown Hamilton<sup>1</sup>, Antoinette Barton-Gooden<sup>2</sup>

**Aim:** To determine the barriers to adherence of Nurses and Patient Care Assistants to hand hygiene practices and Equipment Decontamination Policy.

**Methods:** Cross-sectional study design was utilized among 109 Registered Nurses and 26 Patient Care Assistants (PCAs) who were conveniently sampled from the Medical and Surgical Departments. A 54 item self-administered Behaviours and Levers to hand hygiene instrument and the Infection Control Policy Audit Tool. Data was analyzed using Statistical Package for the Social Sciences (SPSS) version 20. Descriptive statistics included ANOVA and chi-squared test.

**Results:** Response rate was 68% with nurses (109/135) and PCAs (26/37). Most of the respondents were female (97%), age range 20-30 years (54.4%) and had 0-4 years' experience (63%). Self-reported adherence to appropriate hand hygiene practices were high: 84% reported 81-100% adherence. Barriers identified were: Social influences ( $\bar{x}$  3.24,  $\pm 1.67$ ), knowledge of decontamination of equipment policy ( $\bar{x}$  4.18,  $\pm 2.01$ ), environment context and resources ( $\bar{x}$  4.64  $\pm 1.48$ ) and action planning ( $\bar{x}$  4.96  $\pm 1.59$ ). There were no statistical significant relationship between socio-demographic characteristics: age ( $\chi^2$  4.684;  $p > .05$ ); job title ( $\chi^2$  1.709;  $p > .05$ ); years of service ( $\chi^2$  1.237,  $p > .05$ ); unit assigned ( $\chi^2$  4.684;  $p > 0.05$ ) and adherence. While participants who were 31 years and older were more knowledge of equipment decontamination policy ( $\bar{x}$  5.71  $\pm 2.01$ ;  $p < 0.05$ ). PCAs had greater knowledge of the equipment decontamination policy ( $\bar{x}$  5.41,  $\pm 1.75$ ;  $p < 0.05$ ) when compared to Enrolled Assistant Nurses ( $\bar{x}$  4.09  $\pm 1.90$ ) and Registered Nurses ( $\bar{x}$  3.85  $\pm 1.58$ ).

**Conclusion:** Nurse and PCAs reported high hand hygiene adherence. Barriers were knowledge of the equipment decontamination policy, environment context and resources.



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9 NOTIFICATIONS-  
All clinical  
sites



INVESTIGATION  
REPORTS- Detailed Follow  
up for all Class One Events



HOSPITAL  
ACTIVE  
SURVEILLANCE-  
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SENTINEL  
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Automatic reporting