



# Mississippi Morbidity Report

## Updates to the Mississippi State Department of Health *List of Reportable Diseases and Conditions*

### Key Messages:

- The Mississippi State Department of Health (MSDH) maintains a list of mandatorily *Reportable Diseases and Conditions* for providers and laboratories, with different categories of reporting based on the urgency of response.
- In July 2015 Class 1 Diseases were divided into Class 1A (immediately reportable) and Class 1B (reportable by next business day).
- Carbapenem-Resistant *Enterobacteriaceae* (CRE) was added as a Class 3 Condition, and histoplasmosis and blastomycosis were removed from the list.
- Other recent changes include the addition of Healthcare Associated Infections (HAI's), HIV infection during pregnancy, CD4 count and HIV viral load, and all positive TB skin tests and Interferon Gamma Release Assay results.

### Background:

The Mississippi State Department of Health (MSDH), as a component of the public health statute, maintains an official list of *Reportable Diseases and Conditions* of public health importance that providers and laboratories must report to MSDH. The list is divided into Class 1 through 4 disease categories based on the urgency of the required public health response. Periodically, changes are made to align the list with the appropriate level of public health response or to add a new or emerging infection. A summary of the recent changes to the list are outlined below. For a complete list of Mississippi's *Reportable Diseases and Conditions*, please visit: <http://msdh.ms.gov/msdhsite/static/resources/877.pdf>.

### Summary of Changes, July 2015:

- **Reclassification of Class 1 Reportable Diseases and Conditions:**  
Class 1 Reportable Conditions, for which telephone reporting is required within 24 hours of first knowledge or suspicion, are diseases of major public health importance necessitating an immediate public health response. To better align reporting timeframes with the urgency of the public health response, **Class 1 conditions have been separated into Class 1A and Class 1B**, consistent with designations in other states. Class 1A conditions will still require immediate notification, 24 hours a day, consistent with current procedures. Examples of Class 1A conditions include Pertussis, *Neisseria meningitidis* Invasive Disease, all potential bioterrorism agents, and any suspected outbreak. Class 1B conditions require individual case investigation, but not an immediate public health response and therefore are to be reported by telephone within one business day after first knowledge or suspicion. Examples of Class 1B diseases include Arboviral diseases (including West Nile virus), HIV infection including AIDS, and Syphilis.
- **Addition to Class 3 Condition—CRE:**  
The Mississippi State Board of Health approved the **addition of Carbapenem Resistant *Enterobacteriaceae* (CRE) as a Class 3** reportable condition, reportable by laboratories only. CRE, as defined by the Council of State and Territorial Epidemiologists, consist of *E. coli*, *Klebsiella* species, and *Enterobacter* species that are resistant to carbapenem antibiotics such as meropenem and ertapenem. CRE are frequently associated with carbapenemases, such as KPC and NDM

metallo-beta-lactamases that make the bacteria resistant to almost all classes of antibiotics, and are virtually untreatable. CRE bloodstream infections can have a mortality rate as high as 50%. A recent CRE outbreak at the National Institutes of Health and CRE outbreaks associated with duodenoscopes (ERCP) have demonstrated the explosive potential of these organisms to disrupt healthcare delivery. In a voluntary survey conducted by MSDH and the University of Mississippi Medical Center in 2014 and 2015, CRE was identified in eleven Mississippi counties in 2014. Twelve of 78 responding acute care hospitals reported CRE. This number is likely a vast underestimate. Surveillance for CRE will allow MSDH to communicate information to Mississippi healthcare providers, and identify and respond to outbreaks.

- **Additional Modifications to the List of Reportable Diseases and Conditions:**

- **Legionellosis and Noncholera *Vibrio* disease** have been reclassified from Class 2 to Class 1B conditions to facilitate an appropriate public health response;
- **Dengue** has been reclassified from Class 2 to Class 1B under Arboviral Infections for consistency;
- **Creutzfeldt-Jakob** disease, including new variant, has been reclassified from a Class 1 to a Class 2 reportable condition, requiring reporting within one week of diagnosis;
- **Salmonellosis and Shigellosis** have been moved from Class 2 to Class 3, requiring laboratory reporting within one week of diagnosis;
- **All blood lead** levels for children  $\leq 6$  years are reportable as Class 3 conditions and elevated levels ( $\geq 5\mu\text{g/dL}$ ) for children  $\leq 6$  are reportable as poisonings (Class 2);
- **Histoplasmosis and Blastomycosis** have been removed from the reportable diseases list due to a lack of public health involvement in these diseases.

#### Other recent changes:

- **HIV in Pregnancy, November 2014:**

In collaboration with the University of Mississippi Medical Center (UMMC), MSDH actively monitors all pregnant women infected with the HIV virus in order to prevent transmission to the unborn child. Without specific treatment, about one-third of babies born to infected mothers will become infected themselves. Antiretroviral regimens, safe to mother and baby, can reduce the risk of transmission to  $<1\%$ . The success of this collaboration is evident; since 2010 MSDH and UMMC have monitored 289 pregnancies with one transmission event (from a woman diagnosed with HIV at the time of delivery). Antiretroviral treatment in pregnancy requires intense case management, medication compliance, and specific treatments during labor. In order to ensure that all Mississippi mothers and babies can benefit from these interventions, the MSDH Board of Health approved *HIV Infection in Pregnancy* as a Class 2 Reportable Condition in September 2014. Any physician aware of *HIV in pregnancy* must notify the MSDH Office of STD/HIV 601 576-7723 within one week.

- **Chikungunya virus, November 2014:**

Due to an emerging outbreak of Chikungunya virus in the Caribbean and Central and South America, which ultimately lead to several imported cases among Mississippi residents, **Chikungunya virus was added as a Class 1 (now Class 1B) Reportable Condition** under the subsection *Arboviral Infections*.

- **Healthcare Associated Infections (HAIs), January 2014:**

In January 2014, the MSDH Board of Health approved **adding HAIs** to the Rules and Regulations Governing Reportable Diseases and Conditions. Collectively, HAI's are a leading cause of preventable death in the U.S., accounting for approximately 75,000 deaths annually and over \$35 billion in direct medical expenditures. The National Healthcare Safety Network (NHSN) is a centralized data reporting system for HAI's maintained by the Centers for Disease Control and Prevention (CDC). Since 2011, the Centers of Medicare and Medicaid Services (CMS) has mandated that certain healthcare facilities receiving CMS funding must report specified HAI's via NHSN as a condition of reimbursement. Acute care hospitals (excluding critical access hospitals) must currently

report Central Line Associated Bloodstream Infections (CLABSIs), Catheter Associated Urinary Tract Infections (CAUTIs), Surgical Site Infections (SSIs), and infections with Methicillin-Resistant *Staphylococcus aureus* (MRSA) and *Clostridium difficile*. Summary data is displayed, by hospital, for public use at [www.medicare.gov/hospitalcompare](http://www.medicare.gov/hospitalcompare). Various HAIs must be reported by other CMS funded facilities such as dialysis centers, long-term care centers, long-term acute care hospitals (LTACs), and outpatient surgical centers. For additional information on CMS reporting requirements please visit <http://www.cdc.gov/nhsn/PDFs/CMS/CMS-Reporting-Requirements.pdf> .

MSDH collects HAI data directly from NHSN, obviating any additional burdens on facility infection control staff. HAI surveillance enables MSDH to identify and respond to outbreaks, to monitor trends, and to provide timely information to providers and facilities state-wide for the purpose of reducing HAIs in Mississippi. For additional information on HAIs in Mississippi, please visit [www.healthys.com/hai](http://www.healthys.com/hai) .

- Positive TB skin tests and Interferon Gamma Release Assays (IGRAs), January 2014:**  
Following infection with tuberculosis (TB) approximately 10% will go on to develop active disease, often decades later. People with HIV and other immunocompromising conditions, diabetics, and smokers are at a higher risk of developing active disease. Effective treatment of this asymptomatic infected state (TB infection or TBI) can drastically reduce the risk of developing active disease. MSDH, through county health clinics, offers treatment of TBI statewide. A recently added treatment option, once weekly isoniazid and rifapentine (3HP) given by direct observation only, can be completed in 12 weeks. MSDH has been using 3HP since 2011 with a remarkable 83% completion rate. In order to maintain surveillance of TBI and to ensure access to effective treatment, the MSDH Board of Health approved all positive **TB skin tests and IGRAs as Class 2 Reportable Conditions** in January 2014.
- CD4 and HIV Viral Load Reporting, January 2013:**  
As a strategy for HIV prevention, MSDH actively supports linkage and retention in care for People Living with HIV/AIDS (PLWHA). Public health efforts in other states have determined that CD4 cell count and HIV viral load monitoring are effective ways to ensure that PLWHA are engaged in care and adequately treated. In January 2013, the MSDH Board of Health approved **CD4 cell counts and HIV viral loads as Class 3 Reportable Conditions**. CD4 and HIV viral load, as demonstrated elsewhere, will help MSDH link PLWHA to needed health services.

### **Updated FDA Guidance for Reprocessing ERCP Endoscopes (Duodenoscopes)**

Outbreaks of bacterial infection associated with duodenoscopes (ERCP endoscopes) have been attributed to inadequate reprocessing. However, recent outbreaks of Carbapenem-Resistant Enterobacteriaceae (CRE) have been associated with persistently contaminated duodenoscopes for which no breaches in reprocessing were identified. To address these risks, the Food and Drug Administration (FDA) has proposed supplemental measures in addition to manufacturer recommendations for facilities to consider.

The Mississippi State Department of Health recommends that all facilities performing duodenoscopy (ERCP endoscopy) take the following actions:

- Review the updated FDA guidance at <http://www.fda.gov/MedicalDevices/Safety/AlertsandNotices/ucm454766.htm> ;
- Ensure that departments and staff responsible for reprocessing duodenoscopes review these recommendations and;
- Ensure that reprocessing protocols are sufficient to assure sterility.



# Mississippi

## Provisional Reportable Disease Statistics

July 2015

		Public Health District									State Totals*			
		I	II	III	IV	V	VI	VII	VIII	IX	July 2015	July 2014	YTD 2015	YTD 2014
Sexually Transmitted Diseases	Primary & Secondary Syphilis	0	0	2	1	6	1	0	1	2	<b>13</b>	14	110	105
	Early Latent Syphilis	0	2	3	1	15	1	0	1	5	<b>28</b>	29	228	203
	Gonorrhea	-	-	-	-	-	-	-	-	-	†	†	†	†
	Chlamydia	-	-	-	-	-	-	-	-	-	†	†	†	†
	HIV Disease	8	3	2	6	25	6	2	9	4	<b>65</b>	39	353	291
Mycobacterial Diseases	Pulmonary Tuberculosis (TB)	0	0	3	0	2	0	0	0	1	<b>6</b>	9	33	39
	Extrapulmonary TB	0	0	0	0	0	0	0	0	0	<b>0</b>	2	5	4
	Mycobacteria Other Than TB	1	1	2	2	7	1	2	5	7	<b>28</b>	16	277	218
Vaccine Preventable Diseases	Diphtheria	0	0	0	0	0	0	0	0	0	<b>0</b>	0	0	0
	Pertussis	0	0	0	0	0	0	0	0	0	<b>0</b>	6	8	51
	Tetanus	0	0	0	0	0	0	0	0	0	<b>0</b>	0	0	0
	Poliomyelitis	0	0	0	0	0	0	0	0	0	<b>0</b>	0	0	0
	Measles	0	0	0	0	0	0	0	0	0	<b>0</b>	0	0	0
	Mumps	0	0	0	0	0	0	0	0	0	<b>0</b>	0	0	0
	Hepatitis B (acute)	1	1	0	0	0	0	0	1	0	<b>3</b>	3	30	24
	Invasive <i>H. influenzae</i> disease	0	0	0	0	0	0	0	0	1	<b>1</b>	5	26	17
	Invasive Meningococcal disease	0	0	0	0	0	0	0	0	0	<b>0</b>	1	0	1
Enteric Diseases	Hepatitis A (acute)	0	0	0	0	0	0	0	0	0	<b>0</b>	1	0	2
	Salmonellosis	15	23	4	9	29	11	12	12	14	<b>129</b>	148	483	409
	Shigellosis	1	1	0	2	5	0	0	0	0	<b>9</b>	17	61	137
	Campylobacteriosis	3	4	0	0	1	0	2	9	3	<b>22</b>	13	100	59
	<i>E. coli</i> O157:H7/STEC/HUS	0	1	0	0	1	2	0	1	0	<b>5</b>	7	16	22
Zoonotic Diseases	Animal Rabies (bats)	0	0	0	0	0	0	0	0	0	<b>0</b>	0	0	0
	Lyme disease	0	0	0	0	0	0	0	0	0	<b>0</b>	1	0	1
	Rocky Mountain spotted fever	0	0	0	2	0	0	0	0	0	<b>2</b>	10	21	26
	West Nile virus	0	0	0	0	3	0	1	2	0	<b>6</b>	4	6	5

\*Totals include reports from Department of Corrections and those not reported from a specific District.

†Data not available.