MISSISSIPPI STATE DEPARTMENT OF HEALTH

This is an official
MS Health Alert Network (HAN) - Advisory

MESSAGE ID: **MSHAN-20251212-00607-ADV (Health Advisory)**
RECIPIENTS: **All Birthing Hospitals, Obstetricians, Pediatricians, Physicians, Hospitals, ERs, ICPs, NPs, PAs, and Healthcare Providers – Statewide**
Friday, December 12, 2025

SUBJECT: **Recommendations for Hepatitis B Screening in Pregnancy and Perinatal Hepatitis B Vaccination**

Dear Colleagues,

In response to the Advisory Committee on Immunization Practices' (ACIP) vote last Friday regarding newborn hepatitis B vaccination recommendations, the Mississippi State Department of Health (MSDH) recommends screening all pregnant women for hepatitis B virus (HBV) at least twice during each pregnancy – in the first trimester (or as soon as the pregnancy is known) and at delivery. False negative hepatitis B surface antigen (HBsAg) test results can occur during pregnancy thus MSDH continues to recommend a birth dose of the hepatitis B vaccine (HepB) for all newborns regardless of the HBV infection status of the mother.

Key Messages

- The universal HepB birth dose has been recommended nationally since 1991, reducing pediatric HBV infections by 99% in the U.S.
- Infants with HBV infection have about a 90% chance of developing chronic HBV infection leading to cirrhosis of the liver or hepatocellular carcinoma.
    - Without identification and intervention, an estimated 25% of infected infants will eventually die from chronic liver disease.
- MSDH recommends HBV screening for all pregnant women **twice** per pregnancy:
    - During the first trimester (or as soon as pregnancy is known) and at delivery
- Due to possible false negative HBsAg results, MSDH continues to recommend the HepB birth dose for all newborns, **regardless** of maternal HBV status.
- Most perinatal infections occur when HBV-infected mothers' infants do not receive HepB and HBIG within 12 hours of birth.
- HBV can survive on surfaces up to 7 days, allowing transmission through contaminated objects.
- The risk of horizontal HBV transmission is especially high among household contacts of individuals who have chronic HBV infection.
- Vaccination is the best way to prevent HBV infection – the HepB vaccine is safe and effective.
- All pregnant women who are at risk for HBV infection and have not been vaccinated previously, should be vaccinated.

Perinatal HBV Infection

The most common cause of perinatal HBV infection is when a pregnant mother with HBV infection gives birth, and the infant does not receive the HepB vaccine birth dose and the hepatitis B immune globulin (HBIG) within 12 hours of birth. An infant can also develop HBV infection through contact with blood or other bodily fluids from a person with HBV infection.

HBV can be transmitted by HBV-positive fathers, who are not routinely tested during pregnancy or at birth, and in group settings such as daycares. HBV can live on surfaces for up to seven (7) days, even on everyday items like shared toothbrushes that may contain traces of blood. The risk of horizontal transmission is especially high for people living in the same household as someone with chronic HBV infection.

HBV infection can occur with or without symptoms, and about half of infected adults do not realize they have the disease. Because of this, adults who are unaware of their infection may unintentionally transmit HBV to infants, children, and immunocompromised individuals. HBV infection in pregnant women and infants can be identified through a confirmed positive HBsAg test result. If an acute hepatitis B infection does not resolve on its own, it can progress to chronic hepatitis, cirrhosis, or hepatocellular carcinoma.

The risk for chronic HBV infection varies according to the age at infection and is greatest among young children. Approximately 90% of infants with HBV infection and 30% of children between ages 1–5 years with HBV infection will develop a chronic HBV infection.

Background and Recommendations

Universal hepatitis B birth dose was first recommended nationally in 1991. Since then, the U.S. has seen a 99% decline in pediatric hepatitis B infections. Universal HBV screening for HBsAg is recommended for all pregnant women during each pregnancy, preferably in the first trimester, regardless of vaccination status or history of testing. Pregnant women with a history of appropriately timed triple panel screening without subsequent risk for exposure to HBV (no new HBV exposures since triple panel screening) only need HBsAg screening.

MSDH recommends screening all pregnant women for HBV at least twice during each pregnancy – in the first trimester (or as soon as the pregnancy is known) and at delivery. MSDH also continues to recommend a birth dose of the HepB vaccine for all newborns regardless of the HBV infection status of the mother.

If the mother is HBsAg-positive, MSDH recommends the HepB vaccine **and** HBIG be given to the newborn within 12 hours of birth to protect them from infection.

Rationale

Errors or delays in testing, reporting, and documenting perinatal HBsAg status can and do occur; therefore, administering the first dose of HepB vaccine soon after birth to **all** infants acts as a safety net, reducing the risk for perinatal transmission when the HBsAg status of the mother is either unknown or incorrectly documented at delivery. Also, initiating the HepB vaccine series at birth has been shown to increase a child's likelihood of completing the vaccine series on schedule.

Vaccination is the best way to prevent HBV infection. Hepatitis B vaccination produces seroprotection in 98% of healthy term infants (the vaccine response can be lower in low-birth-

weight infants). The HepB vaccine is safe and effective, and all pregnant women who are at risk for HBV infection and have not been vaccinated previously, should be vaccinated. Universal newborn vaccination closes screening gaps, prevents both perinatal and horizontal transmission, and lowers chronic HBV burden.

Reporting Requirements

Hepatitis B in pregnancy is a Class 2 reportable condition in Mississippi and must be reported to MSDH within one week of diagnosis. This includes HBsAg-positive results in pregnancy. The reports can be made by mail, telephone, fax or by electronic laboratory reporting (ELR).

Additional Resources

- Clinical Overview of Perinatal Hepatitis B: https://www.cdc.gov/hepatitis-b/hcp/perinatal-provider-overview/index.html#cdc_generic_section_10-testing-screening-and-diagnosis
- Hepatitis B Perinatal Vaccine Information: https://www.cdc.gov/hepatitis-b/hcp/perinatal-provider-overview/vaccine-administration.html
- Clinical Testing and Diagnosis for Hepatitis B: https://www.cdc.gov/hepatitis-b/hcp/diagnosis-testing/index.html
- Clinical Signs and Symptoms of Hepatitis B: https://www.cdc.gov/hepatitis-b/hcp/clinical-signs/index.html#:~:text=Most%20infants%20and%20children%20younger,i.e.%2C%20primary%20liver%20cancer)

Regards,

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MISSISSIPPI STATE DEPARTMENT OF HEALTH

Alerting Message Specification Settings

Originating Agency:	Mississippi State Department of Health
Alerting Program:	**MS Health Alert Network (MS HAN)**
Message Identifier:	MSHAN-20251212-00607-**ADV**
Program (HAN) Type:	**Health Alert Update**
Status (Type):	Actual ()
Message Type:	Update
Reference:	MSHAN-00597
Severity:	Unknown
Acknowledgement:	No
Sensitive:	Not Sensitive
Message Expiration:	Undetermined
Urgency:	Undetermined
Delivery Time:	600 minutes

Definition of Alerting Vocabulary and Message Specification Settings

Originating Agency: A unique identifier for the agency originating the alert.

Alerting Program: The program sending the alert or engaging in alerts and communications using PHIN Communication and Alerting (PCA) as a vehicle for their delivery.

Message Identifier: A unique alert identifier that is generated upon alert activation (MSHAN-yyymmdd-hhmm-TTT **(ALT=Health Alert, ADV=Health Advisory, UPD=Health Update, MSG/INFO=Message/Info Service**).

Program (HAN) Type: Categories of Health Alert Messages**.**

Health Alert: Conveys the highest level of importance; warrants immediate action or attention.

Health Advisory: Provides important information for a specific incident or situation; may not require immediate action.

Health Update: Provides updated information regarding an incident or situation; unlikely to require immediate action.

Health Info Service: Provides Message / Notification of general public health information; unlikely to require immediate action.

Status (Type):

- Actual: Communication or alert refers to a live event
- Exercise: Designated recipients must respond to the communication or alert
- Test: Communication or alert is related to a technical, system test and should be disregarded

Message Type:

- Alert: Indicates an original Alert
- Update: Indicates prior alert has been Updated and/or superseded
- Cancel: Indicates prior alert has been cancelled

Reference: For a communication or alert with a Message Type of "Update" or "Cancel", this attribute contains the unique Message Identifier of the original communication or alert being updated or cancelled. "n/a" = Not Applicable.

Severity:

Extreme: Extraordinary threat to life or property
Severe: Significant threat to life or property
Moderate: Possible threat to life or property
Minor: Minimal threat to life or property
Unknown: Unknown threat to life or property

Acknowledgement: Indicates whether an acknowledgement on the part of the recipient is required to confirm that the alert was received, and the timeframe in which a response is required (Yes or No).

Sensitive:

Sensitive: Indicates the alert contains sensitive content
Not Sensitive: Indicates non-sensitive content

Message Expiration: Undetermined.

Urgency: Undetermined. Responsive action should be taken immediately.

Delivery Time: Indicates the timeframe for delivery of the alert (15, 60, 1440, 4320 minutes (.25, 1, 24, 72 hours)).