
Lab Dept: Serology

Test Name: HEPATITIS Bs ANTIGEN (HBsAg) REFLEX

General Information

Lab Order Codes: HBAG (Reflex to HBNE when appropriate with additional charge)

Synonyms: Hepatitis B Surface Ag; HAA; Australian Antigen; HbsAG

CPT Codes: 87340 - Infectious agent antigen detection by enzyme immunoassay technique. Qualitative or semiquantitative multiple step method; hepatitis B surface antigen
87341 – Hepatitis B surface antigen (HbsAg) neutralization (if appropriate).
[See Hepatitis Bs Antigen Neutralization \(Confirmation\).](#)

Test Includes: Hepatitis B Surface Antigen and confirmation by neutralization will be reflexed when appropriate at an additional charge.

Logistics

Test Indications: Diagnosis of acute, recent, or chronic hepatitis B infection. Determination of chronic hepatitis B carriage.

Hepatitis B surface antigen (HbsAg) is the first serological marker appearing in the serum at 6 to 16 weeks following exposure to Hepatitis B Virus. In acute infection, HbsAg usually disappears in 1 to 2 months after the onset of symptoms. Persistence of HbsAg for more than 6 months in duration indicates development of either a chronic carrier state or Hepatitis B Viral infection.

Lab Testing Sections: Serology - Sendouts

Referred to: Mayo Medical Laboratories (Test: HBAG)

Phone Numbers: MIN Lab: 612-813-6280

STP Lab: 651-220-6550

Test Availability: Daily, 24 hours

Turnaround Time: 1 – 2 days

Special Instructions: N/A

Specimen

Specimen Type: Blood

Container:	SST (Gold or Marble) tube
Draw Volume:	6 mL (Minimum: 1.5 mL) blood
Processed Volume:	2 mL (Minimum: 0.5 mL) serum
Collection:	Routine venipuncture
Special Processing:	Lab Staff: Centrifuge specimen within 24 hours, remove serum aliquot into a screw-capped round bottom plastic vial. Store and ship at frozen temperatures. Forward promptly.
Patient Preparation:	None
Sample Rejection:	Specimens other than serum; hemolysis; lipemia; icteric; mislabeled or unlabeled specimens

Interpretive

Reference Range: Negative (reported as negative or positive).
If HbsAg is positive, then HbsAg neutralization (confirmation) is performed at an additional charge.

Critical Values: N/A

Limitations: Not useful during “window period” of acute HBV infection, i.e., after disappearance of HbsAg and prior to appearance of anti-HBs. Testing for acute HBV infection should also include anti-HBc IgM antibody.

Positive results (S/CO>5.00) without need for confirmation testing should be interpreted in conjunction with test results of other HBV serologic markers (e.g., anti-HBs antibody, anti-HBc total antibody, anti-HBc IgM antibody).

Not suitable as a stand-alone prenatal screening test of HbsAg status in pregnant women.

Positive HbsAg test results should be reported by the health care provider to the State Department of Health, as required by law in some states.

Individuals, especially neonates and children, who recently received hepatitis B vaccination may have transient positive HbsAg test results because of the large dose of HbsAg used in the vaccine relative to the individual's body mass.

Performance characteristics have not been established for the following characteristics:

- Grossly icteric (total bilirubin level of >20 mg/dL)
- Grossly lipemic (trilein level of >3,000 mg/dL)
- Grossly hemolyzed (hemoglobin level >500 mg/dL)
- Containing particulate matter

- Cadaveric specimens

Methodology: Chemiluminescence Immunoassay (EIA), confirmation of positives by Neutralization

References: [Mayo Medical Laboratories Web](#) October 2014

Updates:
4/6/2004: Test moved from Memorial Blood Center of Minneapolis to Mayo Medical Laboratories.
11/1/2005: Method previously listed at Enzyme Immunoassay (EIA).
2/6/2007: Plasma specimens are no longer acceptable as per Ortho, the kit manufacturer.
7/22/2008: Minimum volume draw/serum decreased. Previously 4.5/1.5 mL.
1/16/2017: Update to SST.