

## HDL-SAA (HDL Serum Amyloid A)

**Analyte:** HDL-Serum Amyloid A

**Specimen Type:** Serum, Inquire for additional option(s)

**Optimum Volume:** 0.5 mL

**Stability:**

2-8 Degrees C	-20 Degrees C	-70 Degrees C
8 days	1 year	4.5 years

**Reporting Units:** mg/dL

**Method:** Precipitation & ELISA

**Biological or Clinical Significance:**

Serum Amyloid A (SAA) is an acute-phase protein. During acute events, the rise in SAA levels is one of the most rapid and intense increases of all acute phase proteins. When elevated above normal levels SAA is almost exclusively bound to High Density Lipoproteins (HDL). SAA circulates at trace levels (1-5 µg/mL) during normal conditions; however 4-6 hours after inflammatory stimulus, SAA levels can increase by as much as 1000 fold thus making SAA a sensitive marker of inflammatory response.

High levels of SAA can be seen in patients with acute and chronic inflammation. Secondary amyloidosis may develop as a result prolonged or repeated inflammatory conditions in which SAA levels remain elevated.

Measuring SAA levels may be a useful indicator of degree of inflammation and response to therapy. Inflammatory disorders such as rheumatoid arthritis, juvenile arthritis, ankylosing spondylitis, familial Mediterranean fever, progressive sclerosis as well as chronic infections such as tuberculosis and osteomyelitis are predisposed to developing amyloidosis.

**Principle of Test Method:**

The HDL SAA assay is a two part assay. First a supernate is prepared from serum by Polyethylene Glycol Precipitation (PEG). This is followed by measurement of SAA in the supernate by solid-phase ELISA. The ELISA assay employs the quantitative sandwich enzyme immunoassay principle.