The Blood Safety Surveillance among People with Blood Disorders project was funded by the CDC to collect data to describe the epidemiologic characteristics of people with hematological disorders who receive blood transfusions. The project was conducted at four large academic medical centers with comprehensive hemoglobinopathy programs for SCD and TDT in the United States (January 2013 to December 2014).

Demographics, diagnosis, red cell transfusion history, iron overload diagnosis and treatment, and vaccination history were obtained by direct patient interview and medical record abstraction at time of study enrollment and approximately one year later. Characteristics of enrollees are reported by age and diagnosis. Patients aged <18 years at the last study visit were classified as children/adolescents, and patients aged ≥18 years at the last study visit were classified as adults. Concordance with preventive service recommendations was assessed based on data obtained at enrollment and/or follow-up visits.

Concordance Definitions

Patients were considered concordant with recommendations if iron assessment was conducted by measuring liver iron content via biopsy, magnetic resonance imaging (MRI), or superconducting quantum interference devices (SQUID) at least once in the year before enrollment or during the 2-year study follow-up period.

Patients were considered to be concordant with hepatitis A vaccination recommendations if: (1) having received the complete HepA series was recorded for patients over the age of 2 years and 6 months, (2) having received the complete or partial HepA series was recorded for patients less than or equal to 2 years and 6 months of age but older than 1 year of age, or (3) having received the partial HepA series or no HepA vaccine was recorded for patients less than 1 year of age, per the ACIP recommendations for use of HepA vaccine at the time the participant was enrolled (2013).

Patients were considered to be concordant with HepB vaccination recommendations if: (1) having received the complete HepB series was recorded for patients over the age of 15 months, (2) having received the complete or partial HepB series was recorded for patients less than or equal to 15 months of age, or (3) if the patient had serologic evidence of vaccine-type response, per the ACIP recommendations at the time the patient was enrolled (2013). Serologic evidence of vaccine-type response was defined based on serology performed on serum specimens that were collected from patients at enrollment and approximately 1 year later via serum separator tubes at the respective sites and shipped to the CDC for centralized testing. Antibody to hepatitis B surface and core proteins and hepatitis B surface antigen was measured on the Abbott Architect using chemiluminescent microparticle immunoassays. Specimens testing positive for antibody to surface proteins but negative for core protein were considered to be exhibiting a vaccine-type response.

**Reference**

(2013) Advisory Committee on Immunization Practices (ACIP). ACIP Vaccine Recommendations and Guidelines. Centers for Disease Control and Prevention (CDC).