Lab Dept: Transfusion Services

Test Name: PLATELET CROSSMATCH

**General Information**

Lab Order Codes: PLTX - Memorial Blood Center, PCPA-platelet compatibility panel, with initial testing-MBC)

Synonyms: Platelet Crossmatching; Platelet compatibility testing

CPT Codes: 86022 – Platelet antibodies

Test Includes: Crossmatching of potential donor apheresis platelets against patient’s serum to detect in vitro incompatibility.

**Note:** Memorial Blood Center performs a platelet compatibility panel the first time the patient is tested for a platelet crossmatch.

**Logistics**

Test Indications: Platelet crossmatching is indicated for patients with a poor response to platelet transfusions due to recipient HLA or platelet reactive antibodies. Alloimmunization can be a result of previous blood transfusions and/or pregnancy. Refractoriness (poor response) could be caused by an antibody to either HLA-A, HLA-B, or platelet specific antigens.

Lab Testing Sections: Transfusion Service - Sendouts

Referred to: Memorial Blood Center-Minneapolis

Phone Numbers: MIN Lab: 612-813-6824

STP Lab: 651-220-6558

Test Availability: Monday – Friday, Products are available on weekends if testing is done by Friday.

Turnaround Time: Product will be available the next working day after the receipt of sample.

Special Instructions: Complete reference laboratory request form. A new patient specimen is required every 7 days.

**Specimen**

Specimen Type: Whole blood
Container: Lavender top tube (EDTA)

Draw Volume: 5 – 7 mL blood

Collection: All specimens submitted to the Transfusion Service must be appropriately labeled at bedside with the time and date of collection, and the signature of the individual collecting the specimen. A completed order, either through the HIS or general requisition must accompany each specimen. It is not always necessary to collect a new sample prior to the provision of blood for patients. Consult with the Transfusion Service prior to collecting additional samples if status unknown.

Special Processing: Lab Staff: Samples that cannot be shipped immediately should be refrigerated at 2-8°C for no longer than 48 hours. Plasma should be separated from the red cells if not shipped immediately.

Patient Preparation: Refer to Collection of Patient Specimens for full details. The patient must be positively identified when the specimen is collected. The label on the blood specimen must correspond with the identification on the patient’s Medical Records band (or ED ID) and on the physician’s/practitioner’s orders. The specimen must be timed, dated and signed by the phlebotomist at bedside.

Sample Rejection: Gross hemolysis, sample placed in a serum separator tube; specimen tube not properly labeled; over 48 hours old

Interpretive

Reference Range: Compatible

Methodology: Detection of antibodies using solid phase red cell adherence assay (Capture-P Solid Phase System). Detects antibodies to platelet antigens and HLA antigens found in patient sera. Up to 12 apheresis donor platelets are serologically tested with each patient’s serum to identify a compatible platelet product.

Contraindications: Patients with adequate response to platelet transfusions.

References: Reference Laboratory, Memorial Blood Center, Minneapolis, MN