Platelet Antibody Screen and Identification

*Testing Performed at the Springfield laboratory ONLY.*

Useful for refractory patients or for those patients that are not responding to platelet transfusions.

- HPA and HLA antibody screen performed by ELISA method.
  - PakPlus - Detects and differentiates between HLA class I and platelet specific antibodies.
    - Cannot definitively ID antibodies to HPA antigens.
    - Further testing required IF HLA antibody presence is detected.

- HLA antibody ID performed with a bead based immunoassay on the Luminex instrument.
  - LifeCodes Class I ID - Detects and identifies IgG antibodies to HLA class I antigens. Also provides PRA (Percent Reactive Antibody)

Molecular HPA / HLA phenotypes are performed based on the presence of HLA or HPA antibodies.
Compatible Platelet Products

*Testing Performed at the Springfield laboratory ONLY.*

Platelet Crossmatching:

- Performed with Immucor’s Capture-P test method
  - Solid phase adherence testing used to detect antibodies to donor platelets.
  - Relatively quick and easy test to perform.
  - Crossmatch compatible product is available for patient use quickly.
- Routinely perform crossmatching on day shift with platelet samples provided by Davenport processing lab. Tested on products collected previous day.
  - Products are available after infectious disease testing and BacT sampling is completed.
- Crossmatching is not performed on Sunday or Monday.

HLA / HPA Matched Platelet Products:

- Search from MVRBC’s HLA / HPA donor database to locate matched platelet products.
- May require several days notice to call in a compatible donor.
- NOT available for return / credit to the blood center if not transfused.