

Rotary -TTK Blood Bank

As human cells live on Oxygen, the importance of the vital fluid that carries it to every single cell in the human body cannot be undermined. Blood not only carries the raw material required for metabolism, it also carries the waste generated as the result of metabolism. Blood, after passing through the kidney, purges our body of all the toxics. If any tissue is deprived of blood for a longer duration, tissue may weaken or even die. This is the reason why blood clots or hemorrhages may sometimes prove to be fatal.

Blood, as the only transporter of Oxygen in the body, is crucial in saving lives. Shortage of required blood group can stop certain operations/treatments. Getting the right blood group at the right time is the greatest challenge. Blood banks are our only hope under such circumstances. Blood banks constantly trawl for voluntary blood donors and collect blood. They also take up the responsibility of certifying that the blood stored and supplied by them is pure and safe, free of any life threatening bacteria or virus. Voluntary Donation is the only way through which the supplies at a blood bank is replenished. Blood of a voluntary donor is safer and better than that of a person who donates blood for money. Blood banks do not pay any donors. But they charge money for every unit of blood they supply. This is to cover the cost of collection, testing, storage and other overheads involved (like rent of the building, electricity charges, staff salary). On 25th Feb 2006, Mukta visited Rotary TTK Blood bank at Tippasandra, Bangalore. We met Mrs.Lakshmi Ravichandran & Dr.Latha, voluntary members of the Blood Bank. We were walked through the various procedures of blood collection, component separation and storage. Blood is collected in units of 350ml. Shelf life of blood and its components is very short. Components are stored between -75 and -35 degree centigrade. Shelf life if some of the components is as below (after following stringent storage guidelines)

- Platelet Concentrate - 5 days
- Platelet Apherises - 5 days
- Platelet Rich Plasma - 5 days
- Packed Cells - 35 days
- Fresh Frozen Plasma - 1 year
- Cryo Anti Hemophilic Factor - 1 year
- Cryo Poor Plasma - 5 Years

Few components are separated with the help of centrifugal force. If a component is not utilized within the period specified above, it may get wasted. Under such circumstances, blood is it is sent for fractionation (further splitting of blood components) to countries like Korea and Australia. Injections are manufactured from the separated components. Blood bank has most of the basic equipments required: one walk-in refrigerator (another of higher capacity is being set up), 2 machines to separate blood components, two Aphaeresis machines. (Aphaeresis is a procedure during which the blood goes to the aphaeresis machine, which removes the selected blood components/cells. The rest of the blood is returned back to the donor.) Blood bank has a special lab, the First-of-its-kind in India, for 'Dual Kinetic Assays' to test for Sexually Transmissible Diseases. It was set up at a cost of Rs.35 lakhs by Family Health International. This lab will study the prevalence of incidence of sexually transmissible infections (STI) in the Southern States as a part of their HIV / AIDS Project. Only two other such labs will be coming up in India, one in Hyderabad and the other at National AIDS Research Institute (NARI), Pune. Bank's blood collection in the year 2005 is around 15500 units compared to 12500 units in 2004. The number of voluntary blood donation camps held in 2005 were 220 compared to 188 in 2004. Blood bank was awarded the first by the Karnataka State Blood Transfusion Council for the highest collection of blood from voluntary donors for the year 2004 (third consecutive year). Charges for blood donation are as follows:

For private hospital

- Whole blood Rs. 700/-
- Components Rs. 600/- For Government Hospital
- Whole Blood Rs. 400/-
- Components Rs. 400/-

Currently, blood bank needs help with maintaining 2 of its websites

(<http://bangaloremedical.org/> and <http://centre4youth.org/>). Same has been assigned to WMT. Visit Blood Donation FAQ page for blood donation trivia. Priya Kadam

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