

# Blood transfusions



In recent years, blood transfusions have saved countless lives; however, it requires a lot of prep. There are several steps involved in a blood transfusion including; Donation, screening, blood typing, informed consent, administration, and monitoring.

When someone goes in to donate blood they must fill out a questionnaire, if their lifestyle shows risk of STI's or other infections, they cannot even donate. Once they are allowed to donate their blood is tested to determine the type. Next the donor is allowed to donate. Usually the blood is collected as a whole, some is kept for testing for severe bacterial and viral infections; the rest is separated into different components. Since blood is made up of several different components, it can be broken down into red blood cells, plasma, platelets, albumin protein, cryoprecipitate, fibrinogen and immunoglobins. All of the components are labeled and can always be traced back to the donor, just in case there is risk for blood from a contaminated donor.

There are several different blood types including A, B, AB, and O. Each Blood type is either Rh positive or Rh negative. It is vitally important to know who can receive each blood type. Any patient can receive a blood type O. If you have blood type A, you can receive blood type A or blood type O. If you have blood type B, you can only receive B or O type blood. If someone had AB blood they can receive A, B, AB, or O type blood. If the patient is blood type O, the patient can only receive O type blood. You also must be aware of the Rh factor. Rh is an antigen that is sometimes present on the surface of the red blood cells. If a patient is Rh positive, they can receive Rh negative or

positive blood, but if a patient has Rh negative blood they can only receive Rh negative blood.

As much as we want to do what we think is best to save a patient, before a patient can receive a blood transfusion, they must sign an informed consent and be aware of the benefits and risks. Some risks involving blood transfusions include risk for infection, light headedness, fainting, hematoma, excessive bleeding, risk for infection, or adverse reaction or rejection to the blood. Some people refuse to sign the informed consent due to culture or religion.

Every hospital and Doctor is different; however, several sources have said that a blood transfuse on is usually ordered if the hemoglobin gets below 7. Although a RN is responsible administering the blood transfusion, a LPN is still responsible for monitoring the patient during the procedure. The transfusion is usually started at 1 ml/hr for the first fifteen minutes. After the first fifteen minutes the patient is assessed for vital signs and any signs of adverse reactions or rejection. Once the patient is assessed, thee flow rate can be increased.

During the transfusion, the LPN should monitor patients for rash, fever, and hives. If any signs of reaction were noticed, the LPN should stop the transfusion, continue running saline and alert the doctor and RN. The tubing and blood should be saved for further evaluation.