

The purpose of this brochure is to give patients and their family's information about donated blood. We have attempted to answer the most common questions.

If you would like more information, please contact your healthcare provider or visit the Canadian Blood Services website at [www.cbs.ca](http://www.cbs.ca)

**Q. What do you receive during a transfusion?**

**A.** You receive one or more of the components or parts of the donated blood. That is, blood is separated into red cells, plasma, platelets, cryoprecipitate and plasma derivatives. As each part of blood has a different function, separating the blood allows patients to receive only that component that is needed.

**Q. Where does the donated blood come from?**

**A.** The Canadian Blood Services collects blood from people who are screened and determined to be in good health. Some plasma fractions are imported.

**Q. How is the donated blood tested?**

**A.** Every blood donation is tested to see if any viruses are present. Donated blood found to have viruses is not used.

Some of the testing includes:

- ◆ Hepatitis B
- ◆ Hepatitis C
- ◆ West Nile Virus
- ◆ HIV 1 & 2 (Human immunodeficiency virus the cause of AIDS)

Once the testing is done, the blood components and plasma are shipped to the hospital transfusion laboratory where they are carefully stored until required.

**Q. Are blood products treated to kill or inactivate viruses?**

**A.** At present, it is not possible to inactivate viruses in cellular blood components (red cells and platelets). Every blood donation is processed to remove white blood cells which may carry viruses and bacteria. During

processing, different chemical or heat processes are used which are effective in inactivation of many viruses.

**Q. What happens if I need a blood product?**








**A.** Your healthcare provider will decide the type of blood product you need and the Transfusion Laboratory will carefully select and prepare the component(s) that has been ordered for you.

**Q. What reactions may occur during my transfusion?**

**A.** During your transfusion, you will be watched closely and your vital signs will be monitored. Some patients do have a mild reaction such as a skin rash, fever or feeling cold. Rarely, a reaction causes red cells to be destroyed; this is called a hemolytic reaction which is more serious.

**Q. What are the risks of a blood transfusion?**

**A.** Canada has one of the most comprehensive blood transfusions services available today. Although the risks associated with blood transfusion are low, they are not entirely risk free. The most recent estimates \* suggest that the risk for each unit of blood transfused in Canada is approximately:

 Hives	1:100
 Fever	1:300
 Lung injury	1:10,000
 Hepatitis B	1:153,000
 West Nile Virus	<1:1,000,000
 Hepatitis C	1:2,300,000
 HIV	1:7,800,000

\*Clinical Guide to Transfusion. Canadian Blood Services. Blood Easy 3. 3<sup>rd</sup> edition 2011. A guide to Transfusion Medicine.

In discussion with your physician, you must decide if the risks associated with having a blood transfusion are higher than the

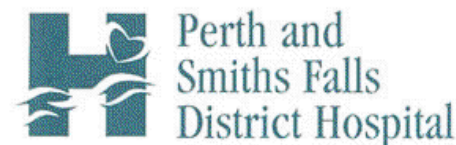
possible results of not having a blood transfusion.

**Q. What are the alternatives to using donated blood?**

**A.** If you are having an elective or scheduled surgical procedure that will probably require a blood transfusion, it may be possible for you to donate your own blood. This is called an “autologous donation”.

If you are interested in donating your own blood, please talk to your surgeon at least six weeks prior to surgery. He/she will determine if this is possible for you and can explain the procedure further.

Family members sometimes ask if they can donate blood for a relative. This is called a “directed donation.” Directed donations may be available in special circumstances. Please check with your physician if you want more information.



**Knowing More About Blood Transfusions**



**Information for Patients and Family**