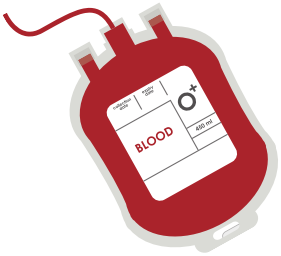
Blood Disorders

LIMMER EDUCATION

Hematological disorders are rare in the prehospital arena; however, it is important to understand the physiology behind these disease states. Increased knowledge will enable healthcare providers to conduct an improved assessment and better understand treatment for those patients.



Anemia

Anemia is not a disease but rather a symptom of an underlying disease process. It is a condition in which a patient does not have enough red blood cells (low hematocrit) or when their red blood cells do not function properly.

- **Iron-deficiency anemia**
- **Vitamin-deficiency anemia**
- **Aplastic anemia**
- **Hemolytic anemia**
- **Polycythemia**

White Blood Cell Disorders

Leukopenia

A decrease in white blood cells, which can be caused by cells being destroyed or by not enough cells being made.

Leukocytosis

An increase in white blood cells, which can be a normal response of the immune system but also caused by certain cancerous or non-cancerous diseases.

Platelet Disorders

Thrombocytopenia

Lower than normal amount of circulating platelets.

Thrombocytosis

Higher than normal amount of circulating platelets.

Hemophilia

Hemophilia is typically an inherited bleeding disorder in which the blood does not clot properly. This can lead to spontaneous bleeding as well as bleeding following injuries or surgery. The blood contains many proteins called clotting factors that can help to stop bleeding.

Von Willebrand disease

Von Willebrand disease (VWD) is the most common blood disorder, affecting 0.6 percent to 1.3 percent of the general population. It is a bleeding disorder that results from a protein deficiency in the blood. When a person has VWD, the clot might take longer to form or form incorrectly, and bleeding might take longer to stop.