

Kidney function blood tests



Albumin. A protein in the blood. It helps keep blood pressure normal. It also keeps fluid in the blood stream. If the level is too low, fluid may go from the blood to the body tissues. This may cause the body to be puffy or swollen (edematous).

Low albumin levels may mean that too much protein is being lost in the urine. It could also mean that there are not enough calories in the diet.

Bicarbonate (CO₂). An electrolyte that helps the body keep the right blood pH, which is important for health. A low CO₂ level means the blood has too much acid in it. This can cause the bones to get weak. It can also affect the growth of your child.

Blood Urea Nitrogen (BUN). A waste product that is normally removed (excreted) by the kidney. The BUN level tells us how well the kidneys are working. As kidney function gets worse (decreases), the BUN level gets higher. A diet high in protein may also cause the BUN to be higher. Dehydration can also cause the BUN to be high.

Calcium. A mineral that is important for the growth of cells and bone. A calcium supplement may be needed to keep the calcium level from being too low.

Cholesterol. A fatty substance that comes in part from certain foods that are eaten. Too much cholesterol in the body can lead to problems with the heart and blood vessels.

Complete blood count (CBC). This test includes the red and white blood cell counts, hemoglobin, hematocrit and platelets.

Creatinine. Tests kidney function. As kidney function gets worse, the creatinine level gets higher.

Electrolytes. Checks the amount of sodium, potassium, and bicarbonate in the blood.

Glomerular Filtration Rate (GFR). Measures kidney function. It is based on a formula using height and the creatinine level. The GFR gets lower as kidney function gets worse.

Hematocrit. The level of red blood cells in the blood. A low hematocrit means you are anemic. Severe anemia may lower a person's energy level.

Hemoglobin. The part of the red blood cell that carries oxygen. A low hemoglobin level means you are anemic.

PTH (Parathyroid Hormone). PTH keeps the body's calcium in a normal range. When blood calcium levels are too low, the level of PTH gets higher.

Iron, Total Iron Binding Capacity (TIBC), and Ferritin. These are measures of iron in the body. Iron helps the body make red blood cells. If these numbers are too low, an iron supplement may be needed.

Phosphate (Phosphorus). Phosphate works with calcium to help keep bones healthy. Extra phosphate is removed (excreted) by the kidneys. If the kidneys are not working, the phosphate level may be too high.

Platelets. Blood cells that help the blood clot.

Potassium. An electrolyte that helps the muscles and heart work. The kidneys help to keep a normal level of potassium in the blood. Potassium levels that are too high or too low can be dangerous.

Sodium. An electrolyte that is found in all body fluids. The kidneys control how much sodium is in the body. If the kidneys aren't working right, the sodium level may be too high or too low. Sodium usually comes from the salt in the diet.

White Blood Cells (WBC). White blood cells help the body fight infections.

ALERT: Call your child's doctor, nurse, or clinic if you have any questions or concerns or if your child has special health care needs that were not covered by this information.

This sheet was created to help you care for your child or family member. It does not take the place of medical care. Talk with your healthcare provider for diagnosis, treatment and follow-up.