Focus On Labs

Living Healthy. Living Well.

Ask yourself these questions:

- Do I understand all of my lab results?
- Can I determine how I am doing with my treatment plan from my lab results?
- Do I know what can be done to improve my lab results?

If you are not sure or do not know the answers to these questions,

READ ON!

Your physician will routinely order laboratory tests to determine how well your treatment plan is working. If you understand the reasons behinf each test, you can use the results to determine how well you are doing with your treatment plan.

Some of the laboratory tests include:

• <u>Potassium</u>

Potassium is necessary for normal body functions, but too much or too little of it can be harmful. This level should be kept in normal range.

Normal range: 3.5-5.5 mEq/L.

A potassium level over 6 mEq/L may cause muscle or heart problems, and even death.

Potassium levels are influenced by the foods you eat. Your dietician can help you choose the appropriate foods to avoid getting too much potassium.

• <u>Calcium:</u>

Calcium is important for bone growth and formation, and for normal functioning of the body. Kidneys that are not healthy are not able to use calcium properly. *Normal range:* 8.5-10.5 mg/100 ml.

Calcium levels are influenced by the food you eat, some medications, and the dialysate used during your dialysis treatment. Your healthcare team will evaluate your diet, medications, and treatment plan to help maintain your calcium levels within normal range.

• <u>Phosphorus:</u>

Phosphorus is necessary for the bones, but levels of phosphorus may become too high in kidney failure. This can cause severe itching. A combination of too much phosphorus and too little calcium causes weak, brittle bones. *Normal range: 3.5-5.5 mg/dl.*

Phosphorus levels are influenced by the foods you eat and the amount of phosphorus binder you take. Your dietician can help you choose the appropriate foods to avoid getting too much phosphorus. Your physician will prescribe the appropriate phosphorus binders. It is very important that you take your phosphorus binders with all food.

• <u>Albumin:</u>

Albumin is a protein made by the body to hold fluid in the blood vessels. Protein is needed the keep muscles strong, your immune system in tip-top shape, and your overall body healthy.

Normal range: 4.0-5.5 mg/dl.

Your dietician can help you choose appropriate high protein foods to maintain your albumin level within normal range.

• <u>Hemoglobin:</u>

Hemoglobin is the part of the red blood cell that carries oxygen from the lungs to the rest of the body.

Normal range: 10.0-12.0 (for dialysis patients).

Dialysis patients are prone to lower hemoglobin levels due to the inability of diseased kidneys to stimulate red blood cell production. Lower hemoglobin levels cause anemia. Symptoms of anemia include: tiredness, weakness, and shortness of breath. Your physician may prescribe a drug to replace the loss of your kidneys ability to stimulate red bloodcell production. This drug is called EPOGEN. Exercise may also help to keep your hemoglobin levels up within nornal range.

• <u>Urea Reduction Ratio (URR):</u>

URR measures the adequacy of your dialysis treatment. It is a calculation of how much waste product is removed during dialysis. Inadequate (not enough) dialysis is measured as a URR (urea reduction ratio) less than 65%. Adequate (enough) dialysis is measured as a URR of 65% or higher. A low URR (<65%) is associated with a high rate of infections and increased hospital time. A high URR (>65%) is associated with better energy and fewer health problems.

Your healthe care team will adjust your dialysis prescription to achieve adequate dialysis. This may involve longer dialysis time, a bigger dialyzer, or assessment of your blood access (fistula, graft, catheter) to see if it is working properly.

Please take a moment to answer these True/False questions with your primary nurse.			
1.	Eating foods high in potassium could cause my heart to stop beating.	TRUE	FALSE
2.	High phosphorus levels are good for my bones.	TRUE	FALSE
3.	Phosphorus binders should be taken when food is still in my stomach.	TRUE	FALSE
4.	Low hemoglobin could cause me to feel weak or tired.	TRUE	FALSE
5.	Cutting my dialysis treatments short will not affect Urea Reduction Ratio.	TRUE	FALSE
6.	My URR needs to be $>65\%$.	TRUE	FALSE