

## The CLL Bloodline

August 2017

## **MONTHLY QUIZ:**

The cancerous B lymphocytes cause our CLL to proliferate in all the following areas of the body except:

- 1: The lymph nodes
- 2: The blood stream
- 3: The bone marrow
- 4: The spleen

**The correct answer is #2**. It is true that CLL is a leukemia and that the clonal cancer cells accumulate in the blood stream causing the high white count, but they don't grow there. CLL is also a lymphoma or a cancer of the lymphocytes, specifically B lymphocytes. Those cells only proliferate in the nodes, bone marrow and the spleen, not the blood.

## **BASICS: Response to Therapy**

In order to be consistent, doctors and researchers have agreed on standard ways to describe response to therapy. The definitions are actually quite technical and are changing. This is a simplified version. We start with the worst and work towards the best.

**Progressive disease (PD):** As the name suggests, the cancer continues to grow despite the treatment. This is not good news.

**Stable disease (SD):** The cancer neither progresses nor recedes. This can be a durable and quite an OK circumstance, especially if the CLL is not causing problems.

**Partial Remission (PR):** The cancer has been knocked back, but there are still cancer cells to be found in the blood or marrow or nodes. PR requires at least a 50% reduction in the size of lymph nodes and in the number of lymphocytes in the peripheral blood stream.

**Complete Remission (CR):** The absence of clonal lymphocytes in the blood is one of the major criteria. All lymph nodes need to be normal size (<1.5 cm). In a clinical trial, the confirmation of a CR usually requires a bone marrow biopsy that shows no CLL.

Minimal Residual Disease (MRD)-Negative: This is the best news with the longest durations of response. Special tests can be used to find a single CLL cell hiding among 10.000 or more cells in the blood or bone marrow. If no cells are found, you are MRD-, a very good thing. Just to confuse things, it is possible to be MRD- and be in a PR if your nodes are still enlarged. This may happen when nodes are still enlarged, but are cancer free.

## WORD OF THE MONTH

**Flow Cytometry** is a powerful blood test that looks at cellular surface markers. It can confirm the diagnosis of CLL by identifying the typical clonal population of cells. It can also find CLL cells when there is only one cancer cell in 10,000 or more lymphocytes.

If the CLL Society has helped you or a loved one, please consider making a contribution