The ITP Support Association Platelet Reprint Series

No. 26 ITP – A diagnosis of

Platelet article reprinted from: **Sept 2012**

Title: **ITP – A diagnosis of exclusion**

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Most of the readers of 'Platelet' know that ITP is a condition where there is decreased number of platelets in the blood circulation. The diagnosis of ITP is however not a straightforward one in all cases. This is mainly because all the other causes of thrombocytopenia need to be excluded before the diagnosis of ITP can be considered.

Since platelet is an important component of the blood, it is not surprising many diseases can affect the platelet count. Some of the common ones are viral infections, including common flu and cold. There is increased recognition of the presence of a bacterium in the stomach called Helicobacter pylori, which can cause acid problems and reflux. Some studies have demonstrated a relationship between the presence of this bacteria and ITP. Although the prevalence of this condition is more common in Japan, in some individuals who may have the above mentioned stomach symptoms, it is well-worth checking for this infection, since eradication of the bacteria with a combination of antibiotics can 'cure' ITP in such cases. ITP can also arise secondary to viruses causing hepatitis C and HIV infections. In these cases, the treatment of the infections can result in remission of ITP.

Since many new tablets can have an effect on the production of platelets from the bone marrow, in an individual who presents with new ITP, it is important to also ensure that the recently commenced drug did not cause the thrombocytopenia. Although there are occasional medications which are well-known to can cause drop in platelet count, any new drug can do this in a particular individual. For this reason, the healthcare professional need to correlate the drop in platelet count to the time of starting the medication. The only way of proving the drug caused the decreased platelet count is by noting that the platelet count increases and goes to normal after discontinuation of the drug.

ITP is observed to be more common especially in the younger age in women. It is also more common in those who have co-existing autoimmune diseases. Autoimmune diseases are conditions where the body's own immune system finds different organs as foreign and fights against them (auto = self). Common autoimmune conditions are underactive thyroid, vitamin B_{12} deficiency, type 1 diabetes, Systemic lupus erythematosis, rheumatoid arthritis, etc. Since immune problems contribute to the development of these conditions, it is possible that ITP may arise in these individuals since it is also immune-mediated.

In the absence of any of the conditions described, a low platelet count with otherwise normal blood tests, the diagnosis of ITP is entertained. There is some debate about the examination of bone marrow for the diagnosis of ITP. Since there are no diagnostic features for ITP on the bone marrow examination, the absence of any other abnormalities in the presence of adequate megakaryocytes, the platelet precursors, ITP diagnosis can be considered. However, bone marrow examination is not always necessary but is often performed if the first-line treatments for ITP have not worked as expected.

One of the criteria sometimes used by physicians for diagnosing ITP is to see how patients have responded to first-line treatments like steroids or intravenous immunoglobulins. If there is a quick and adequate response, it usually suggests ITP.

In summary, the diagnosis if ITP is one of exclusion – excluding other causes for low platelet count.