

## **Babesia**

- This is a malaria-like parasite that infects red blood cells.
- It is sometimes referred to as a "Lyme co-infection," but in our opinion, it is sometimes the primary infection. It can make Lyme disease (Borreliosis) harder to treat and more difficult to eradicate.
- It is usually acquired from a tick bite, but many patients who are found to have Babesia do not recall a tick bite.
- The testing for Babesia sucks. If Babesia does not show up on a test, that does not mean that you don't have it. It can be difficult to diagnose. However, if your test is positive, then you have Babesia. There are no false-positive tests.
- Begins with a flu-like syndrome
- Symptoms may not emerge until long after a tick bite.
- Often symptoms occur when someone's immune system is weakened by stress or other illness. It can lay dormant for years and get triggered by a physical or emotional stress.
- The most common symptoms are:
  - Night sweats
  - Shortness of breath or "air hunger" or the sensation that you cannot catch your breath, even though your measured oxygen saturation is normal.
  - Fatigue
  - Frontal headaches or frontal pressure
  - Extreme cognitive dysfunction
  - Intense psychological symptoms. Patients may be misdiagnosed with depression, anxiety, bipolar disorder, schizoaffective disorder or schizophrenia. These psychological symptoms do not respond to psychiatric medications and they get better once the infection is treated.



- A disconnection between the intention to perform an action and the ability to do so. Accomplishing simple everyday actions requires extreme focus.
- Babesia can affect the spleen, the liver and any endothelial tissue (this is the lining in the body, such as the lining of the blood vessels or sinus cavities).
- Babesia can cause stagnation in the capillaries and veins, leading to blood clots or a thrombus.
- Babesia can stimulate your immune system to a Th2 dominance.
  Th1 dominance is needed to clear Babesia. Th2 dominance is associated with certain autoimmune diseases, such as Lupus.
- Do not donate blood if you have a Babesia infection
- Elevating NO (nitric oxide) in the blood helps to fight Babesia. You can elevated NO by the following:
  - o **Exercise** helps to dilate capillaries and stimulates NO.
  - Arginine supplementation (be careful of herpes/cold sore outbreaks with arginine supplementation)
- Antibiotics for Babesia:
  - o Atovaquone
  - Clindamycin
  - Azithromycin
- Herbs that can help Babesia:
  - Sida acuta protects the red blood cells and is an herbal broadspectrum antibacterial
  - o Cryptolepis is a strong anti-Babesial herb
  - Dan shen (Salvia miltiorrhiza) is a Chinese herb that helps to stimulate NO and invigorates the blood (natural mild blood thinner). It also helps to protect the spleen
  - o Milk thistle helps to protect the liver
  - Several other herbs can be combined and custom-tailored to each individual's symptoms