# **Multiple Systemic Infectious Diseases Syndrome**

#### Six Signs to Watch For:

#### 1.You have more than one symptom

- \* Fatique
- \* Joint and muscle pain
- \* Tingling
- \* Numbness and burning
- sensations \* A stiff neck
- \* Headaches
- \* Light and sound sensitivity
- \* Dizziness

#### 2. You have good days and bad days.

A hallmark of Lyme disease is that the symptoms tend to come and go with good and bad days.

#### 3. The pain changes and moves around the body

Another classic trait of Lyme disease is the migratory nature of the pain. The muscle and joint pain, as well as the tingling, numbness and burning sensations often tend to come and go and move around the body. For example, one day the joint pain might be in the knees. Three days later, it's in the shoulders, and two days later it's in the ankles. The same symptoms can happen with Lyme neuropathy, where the bacteria have affected the nerves, and the tingling, numbness and burning sensations migrate to different areas around the body.

#### 4. If you're a woman, your symptoms worsen right around your cycle.

Women will often have a worsening of Lyme symptoms right before, during, or after their menstrual cycle. Lyme disease symptoms are known to change with fluctuating levels of estrogen and progesterone.

#### 5. Your symptoms improve when you're taking medication for other ailments.

Patients taking antibiotics for an unrelated problem (such as upper respiratory infection or urinary tract infection), will often report that their symptoms are much better while taking the antibiotic, and worsen when the antibiotic is stopped. Conversely, some individuals feel much worse on antibiotics, where all of their symptoms are intensified. This is called a Jarish-Herxheimer reaction, where the Lyme bacteria are being killed off, and temporarily worsen the underlying symptoms.

#### 6. Blood tests have confirmed this.

The sixth and final point to determine if your symptoms are due to Lyme disease is to ask your health care provider to run a blood test called a Western Blot through a reliable laboratory, like IgeneX labs in California. There are over 100 different strains of Lyme disease in the US, and 300 strains worldwide, and IgeneX uses several strains to improve their testing.

Although there are several different laboratory tests to diagnose Lyme disease (like an ELISA test, Western Blot, PCR (DNA) test or occasionally a culture), these tests each have their pros and cons, and can miss establishing the diagnosis because they are not sensitive enough to always pick up the presence of the bacteria.

There are, however, five bands (proteins) on the Western Blot that are specific for exposure to Lyme. These proteins (bands) are the 23, 31, 34, 39 and 83/93 kdA bands. Any one of these bands on a Western blot with the above symptoms mentioned (having been properly ruled out for other diseases) is pathognomonic for Lyme disease.

A bullseye rash is also a classic manifestation of Lyme disease, and does not require a positive blood test, but less than 50% of people may get the rash, and it may be located in a part of the body where the rash cannot easily be seen.

Disclaimer: The Horowitz Lyme-MSIDS Questionnaire is not intended to replace the advice of your own physician or other medical professional. You should consult a medical professional in matters relating to health, and individuals are solely responsible for their own health care decisions regarding the use of this questionnaire. It is intended for informational purposes only and not for self-treatment or diagno sis.

tion problems

\* Chest pain with palpitations

\* Psychiatric symptoms such as depression and anxiety

# **MSIDS**

# **Multiple Systemic Infectious Diseases Syndrome**

MSIDS is a symptom complex of Lyme disease and multiple associated tick borne coinfections that encompasses not only infections with Borrelia burgdorferi, the etiological agent of Lyme Disease, but also other bacterial infections, viral infections, parasitic infections, and fungal infections."

Why Can't I Get Better? by Richard I. Horowitz, M.D.

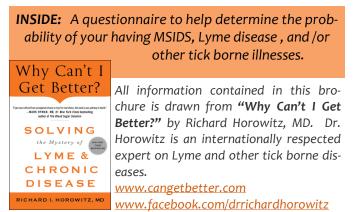
## **MSIDS Symptoms Can Include:**

- Abnormal liver functions
- Allergies
- Autonomic nervous system dysfunction
- Endocrine abnormalities
- Environmental toxicity
- · Enzyme deficiencies
- · Functional medicine abnormalities in biochemical pathways
- · Gastrointestinal abnormalities
- Immune dysfunction
- Inflammation
- Mitochondrial dysfunction

Neuropsychological issues

- Nutritional deficiencies
- POTS
  - Pain issues
- Physical de-conditioning
- Sleep disorders
- · Day sweats, night sweats, chills
- · Shortness of breath with unexplained cough- possibly from babesiosis, a malaria-type parasite contracted through tick bites.

"The ILADS guidelines stress the importance of a doctor's clinical judgment in making the diagnosis, because the scientific literature has found that the existing testing is unreliable. The IDSA narrowly restricts the diagnosis to include the CDC criteria. However, many doctors in the United States do not follow IDSA guidelines. Instead, my model allows Lyme to be redefined as MSIDS: a clinical syndrome that encompasses multiple overlapping factors that keep patients chronically ill." Richard Horowitz, MD



### **SECTION 1: SYMPTOM FREQUENCY SCORE**

#### 0 = None 1 = Mild 2 = Moderate 3 = Severe . . . . .. . . . ...

V	Write in a 0,1,2 , or 3 on the line to the right of the symp	tom
1	Unexplained fevers, sweats, chills, or flushing	
2	Unexplained weight change; loss or gain	
3	Fatigue, tiredness	
4	Unexplained hair loss	
5	Swollen glands	
6	Sore throat	
7	Testicular or pelvic pain	
8	Unexplained menstrual irregularity	
9	Unexplained breast milk production; breast pain	
10	Irritable bladder or bladder dysfunction	
11	Sexual dysfunction or loss of libido	
12	Upset stomach	
13	Change in bowel function (constipation or diarrhea)	
14	Chest pain or rib soreness	
15	Shortness of breath or cough	
16	Heart palpitations, pulse skips, heart block	
17	History of a heart murmur or valve prolapse	
18	Joint pain or swelling	
19	Stiffness of the neck or back	
20	Muscle pain or cramps	
21	Twitching of the face or other muscles	
22	Headaches	
23	Neck cracks or neck stiffness	
24	Tingling, numbness, burning, or stabbing sensations	
25	Facial paralysis (Bell's palsy)	
26	Eyes/vision: double, blurry	
27	Ears/hearing: buzzing, ringing, ear pain	
28	Increased motion sickness, vertigo	
29	Light-headedness, poor balance, difficulty walking	
30	Tremors	
31	Confusion, difficulty thinking	
32	Difficulty with concentration or reading	
33	Forgetfulness, poor short-term memory	
34	Disorientation: getting lost; going to wrong places	
35	Difficulty with speech or writing	
36	Mood swings, irritability, depression	
37	Disturbed sleep: too much, too little, early awakening	
38	Exaggerated symptoms or worse hangover from alcohol	
	Total Section 1	
S	ECTION 2: MOST COMMON LYME SYMPTOMS SCO	DRE
	ou rated a "3" in Section 1 for <u>each of the following</u> symptoms, rself 5 additional points:	give

#### **SECTION 3: LYME INCIDENCE SCORE**

Now apply the points for each of the following statements you can agree with:

1 You have had a tick bite with no rash or flulike symptoms.

	3 points			
2	You have had a tick bite, an erythema migrans, or an undefined rash, followed by flulike symptoms. <b>5 points</b>			
3	You live in what is considered a Lyme-endemic area. <b>2 points</b>			
4	You have a family member who has been diagnosed with Lyme and/or other tick-borne infections. <i>1 point</i>			
5	You experience migratory muscle pain. 4 points			
6	You experience migratory joint pain. <i>4 points</i>			
7	You experience tingling/burning/numbness that migrates and/or comes and goes. <i>4 points</i>			
8	You have received a prior diagnosis of chronic fatigue syndrome or fibromyalgia. <i>3 points</i>			
9	You have received a prior diagnosis of a specific autoim- mune disorder (lupus, MS, or rheumatoid arthritis), or of a nonspecific autoimmune disorder. <i>3 points</i>			
10	You have had a positive Lyme test (IFA, ELISA, Western blot, PCR, and/or borrelia culture). <b>5</b> points			
	Total - Section 3			
SECTION 4: OVERALL HEALTH SCORE				
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1	Thinking about your overall physical health, for how many of the past thirty days was your physical health not good? days			
	Award yourself the following points based on the total number of days:			
	0 – 5 days 🛛 = 1 point			
	6 - 12 days = 2 points			
	13 - 20 days = 3 points			
	21 – 30 days = 4 points			
2	Thinking about your overall mental health, for how many days during the past thirty days was your mental health not good?			
	Award yourself the following points based on the total number			
	of days:			
	of days:			
	0 – 5 days = 1 point			
	0 – 5 days = 1 point 6 – 12 days = 2 points			
	0 – 5 days = 1 point 6 – 12 days = 2 points 13 – 20 days = 3 points			
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	0-5 days = 1 point 6-12 days = 2 points 13-20 days = 3 points 21-30 days = 4 points			
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toget If yo eas	0 – 5 days = 1 point 6 – 12 days = 2 points 13 – 20 days = 3 points 21 – 30 days = 4 points Total Section 4 wher to achieve your final score but scored 63 or more, you have a high probability of a tick-borne d	is-		

If you scored under 21 you are not likely to have a tick-borne disorder.

DISCLAIMER: The Lyme Action Network is not a medical organization and does not purport to provide medical advice. The information herein is provided for general information purposes only. We do not make any warranties about the infor-mation contained herein, and will not be liable for any losses or damages in connection with the use of our informationa

https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5590688/

· Joint pain or swelling

Fatigue

• Tingling, numbness, burning, or stabbing sensations

Forgetfulness, poor short-term memory

• Disturbed sleep: too much, too little, early awakening

Total Section 2 (enter either "5" or "0") .....