



ADRENAL

The Myth of Adrenal Fatigue

BY ERIC SEABORG | SEP 2017

When patients present claiming that stress has worn out their adrenal glands, it can be easy to discount their belief in "adrenal fatigue" — but they often have real symptoms that require treatment.

If more proof is needed that the Internet provides a wealth of information and misinformation, endocrinologists need to look no further than the increasing number of patients who claim a diagnosis of "adrenal fatigue."

Although current medical science recognizes no such condition, physicians need to take the complaints and symptoms of these patients seriously, according to Endocrine Society President Lynnette Nieman, MD, who is a senior investigator at the National Institute of Diabetes and Digestive and Kidney Diseases: "Our role is to be good active listeners to determine if there is a true medical disorder lurking among the complaints. It is very important to take the person seriously, not to brush them off and say there is no [such thing as] adrenal fatigue. These people are suffering from something, so we need to take the suffering seriously."

The patient may have already been to see a naturopath who promotes the condition, so may be taking supplements of unknown formulations to treat it.

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investigator, National Institute of Diabetes and Digestive and Kidney Diseases, Bethesda, Md.

What is Adrenal Fatigue?

The idea underlying the condition is that constant stress puts an undue burden on the adrenal glands to produce hormones — especially cortisol — and the glands burn out. The lack of adrenal hormones leads to a host of generalized symptoms, including tiredness, trouble falling asleep or waking up, and a need for stimulants like caffeine to get through the day. With the fast-paced demands of modern life making many people feel consistently stressed out and sleep-deprived, it's easy to understand the appeal of a diagnosis that promises an explanation — and treatment to counteract their feelings of fatigue.

The fallacy of this logic is that there is no evidence that the stress of day-to-day life could have any such effect on the adrenals. "Endocrinologists believe — correctly — that under stress your adrenals work harder and make more cortisol, not less," says Theodore C. Friedman, MD, PhD, chief of the division of endocrinology, metabolism, and molecular medicine at Charles R. Drew University of Medicine and Science in Los Angeles. Friedman says that the patients may be given the diagnosis by naturopaths, chiropractors, functional medicine doctors, and anti-aging doctors.

At A Glance

- "Adrenal fatigue" is a diagnosis that patients are finding on the Internet or being given by alternative medicine practitioners, even though medical science recognizes no such condition.
- Endocrinologists might be tempted to dismiss a patient's claim of adrenal fatigue, but should take seriously the patient's symptoms and complaints, which are often caused by treatable conditions.
- Physicians may need to steer patients away from taking unregulated supplements and other formulations recommended by alternative practitioners.

Origins of the Myth

The website of chiropractor and naturopath James L. Wilson, DC, ND, PhD, says that he coined the term adrenal fatigue in 1998 "to identify below optimal adrenal function resulting from stress and distinguish it from Addison's disease." As many other naturopaths have taken up the diagnosis, it has spread widely across the Internet. Wilson's website notes that "conventional medicine does not yet recognize it as a distinct syndrome."

That rather understates the attitude of conventional medicine. A literature review published last year in *BMC Endocrine Disorders* found "no substantiation that 'adrenal fatigue' is an actual medical condition. Therefore, adrenal fatigue is still a myth."

Adrenal fatigue is not recognized by the Endocrine Society or any other endocrinology society, but adrenal insufficiency is. One glaring problem for the adrenal fatigue concept is that the reported symptoms don't match those from adrenal insufficiency, although there is some overlap. The adrenal fatigue symptoms are "mostly nonspecific" including being tired or fatigued to the point of having trouble getting out of bed; experiencing poor sleep; feeling anxious, nervous, or rundown; craving salty and sweet snacks; and having "gut problems," says Nieman. For the most part, these do not match symptoms of chronic adrenal insufficiency, which is characterized by weight loss, joint pain, anorexia, nausea, vomiting, diarrhea, dry skin, low blood pressure, and fatigue.

Treatable Symptoms

Just the same, the symptoms should be taken seriously, Friedman and Nieman agree. Both explain to patients that they are open to complementary medicine, but the adrenal fatigue explanation does not fit their understanding of how the adrenal glands work.

Nieman recommends taking a careful history and investigating the causes of each symptom or group of symptoms. "I suggest that we work with the patient's primary-care person to exclude potential disorders such as anemia, obstructive sleep apnea, irritable bowel syndrome, depression or anxiety, diabetes, other systemic illness, poor diet, stress at work or home, or overtraining."

Resources

Dr. Lynnette Nieman will speak at the Endocrine Society's Clinical Endocrinology Update 2017 on "Adrenal Fatigue Is Not Adrenal Insufficiency" on Sept. 25 in Chicago. Information is available at: www.endocrine.org/ceu.

The Hormone Health Network has published a fact sheet on adrenal fatigue written on a level appropriate for patients. It can be found at: www.hormone.org/diseases-

and-conditions/adrenal/adrenal-fatigue

To see some of the "alternative facts" your patients may be reading, visit James L. Wilson's website: www.AdrenalFatigue.org

Testing can be an important part of the process. The patients have often been given saliva tests for cortisol, so Nieman tells her patients that saliva tests are not considered reliable. She explains that the standard test is the corticotropin (ACTH) stimulation test — and that if the adrenal glands can

respond to the stimulation by releasing cortisol, it disproves that theory that the glands are burned out.

Friedman says that often the naturopaths have focused so narrowly on cortisol and the adrenal fatigue hypothesis that they overlook real problems — these patients can suffer from conditions including mild anemia, thyroid problems, growth hormone deficiency, and menopausal issues.

For example, some symptoms highlighted on adrenal fatigue websites — dizziness on standing, light-headedness, brain fog, and salt craving — may be related to low aldosterone. So Friedman often checks their aldosterone and renin, and the results might lead him to have the patients take in more salt or to consider the need to further treatment.

Couch Potato Syndrome

But Nieman says that many of these patients with generalized symptoms have "what I call 'couch potato syndrome,' meaning that people get deconditioned if they don't exercise. [Others have] a disorder of modern life that could be called the 'life is hard syndrome.'" Many people are in fact stressed to the point of not taking care of themselves. For these patients, the recommendations of naturopaths have value when they emphasize adopting a better lifestyle, such as eating a healthier diet, taking vitamins, getting enough rest, exercising, and eliminating some negative things from their lives.

Questionable Supplements

But often the naturopaths have recommended supplements or worse. Wilson's website sells "Dr. Wilson's Original Formulations" adrenal supplements. The "Adrenal Fatigue Quartet" costs about \$200 for a 30-day supply at the minimum recommended doses. The website notes in large print that the products are "formulated by Dr. James L. Wilson for people experiencing stress-related adrenal fatigue." But the website is dotted with asterisks that lead the determined reader to a small-print notice: "This statement has not been evaluated by the Food and Drug Administration. This product is not intended to diagnose, treat, cure, or prevent any disease."

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Nieman says that because these supplements are not regulated or approved by the Food and Drug Administration, there is no way to know what is in them, so she recommends that patients stop taking

them. Sometimes patients are taking ground up bovine adrenal glands, and Friedman has even seen patients who have been given hydrocortisone.

Friedman says that he sees these encounters as an opportunity to "optimize the patient's health." Some of the problems result from bad diets, not exercising, and poor sleep habits. "You can help with some of these complaints with lifestyle changes," he says.

Nieman adds that even when patients come in "hell bent on having this diagnosis, when I listen to everything they have to say and validate the symptoms, but tell them, 'I really don't think your adrenal is actually failing, but I think some of your problems are reversible,' I find that they accept [my point of view], and can give up on this adrenal fatigue diagnosis."

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