

## Chronic Fatigue Syndrome, Pregnancy, and Addison Disease

Schacterle and Komaroff<sup>1</sup> found that the rate of spontaneous abortions was nearly 4 times higher (30% vs 8%) in the pregnancies that occurred after the onset of chronic fatigue syndrome (CFS) compared with those that occurred before its onset. In light of the results of a Danish survey<sup>2</sup> that reported an increased risk of spontaneous abortion with increasing maternal age, Schacterle and Komaroff<sup>1</sup> argue that their findings could be explained by the fact that the mean  $\pm$  SD age of those who became pregnant before the onset of CFS was 24.8  $\pm$  4.3 years, whereas it was 33.0  $\pm$  4.5 years for those who became pregnant after that onset. However, if we compare these ranges of maternal ages with similar ranges (25-29 years and 35-39 years) found in the Danish study,<sup>2</sup> it is clear that the nearly 4-fold higher rate mentioned above is significantly greater than the approximate 2-fold higher rate (24.6% vs 11.9%) of spontaneous abortions reported in older Danish women.<sup>2</sup>

Considering that CFS shares 42 clinical features with Addison disease,<sup>3</sup> including all the diagnostic criteria for CFS, hypocortisolism, reduced adrenal gland size, and other adrenal abnormalities,<sup>3</sup> it is reasonable to suggest that the higher rate of spontaneous abortions that occurred after the onset of CFS<sup>1</sup> is partly due to the well-recognized mild hypocortisolism that characterizes CFS.<sup>3,4</sup> The rate of spontaneous abortions is also abnormally high in women with Addison disease<sup>5</sup>; therefore, it may well be regarded as the 43rd feature that CFS shares with Addison disease.<sup>3</sup>

Schacterle and Komaroff<sup>1</sup> also found that developmental delays or learning disabilities were reported more often in the offspring of women who became pregnant after (vs before) the onset of CFS. These adverse outcomes in offspring of women with CFS may represent an additional consequence of their hypocortisolism because "maternal cortisol secretion is of great importance to maintain fetal growth, development and well-being."<sup>5</sup>

In healthy pregnant women, cortisol levels rise progressively and so remarkably as to triple by midgestation.<sup>5</sup> In contrast, pregnant women with Addison disease are unable to increase their cortisol secretion.<sup>5</sup> Their serum cortisol level can be normal but inappropriately low for the gestational period and, consequently, they need hydrocortisone more than ever.<sup>5</sup> Likewise, in view of the 43 features that CFS shares with Addison disease,<sup>1,3,5</sup> especially pregnant women with CFS and their fetuses could benefit from low doses of hydrocortisone, which proved safe and substantially beneficial for general patients with CFS.<sup>4</sup>

Riccardo Baschetti, MD

Correspondence: Dr Baschetti, CP 671, 60001-970 Fortaleza (CE), Brazil (baschetti@baydenet.com.br).

Dr Baschetti is a retired medical inspector of the Italian State Railways.

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## Don't Forget to Prescribe Exercise for Your Older Patients

We are writing in response to the recent Special Article by Manson et al<sup>1</sup> regarding the clinicians' role in "combating the epidemic of excess weight and physical inactivity." The National Institute on Aging (NIA) has been working for some time to promote the importance of exercise and physical activity, particularly for older adults.

Low rates of physician counseling have been linked to a number of barriers, including limited availability of materials to aid both the patient and the physician.<sup>2</sup> In addition to the resource *Exercise and Your Heart*<sup>3</sup> recommended by Manson et al,<sup>1</sup> we would also like to let your readers know about *Exercise: A Guide From the National Institute on Aging*.<sup>4</sup>

Working with a panel of experts on the topic of exercise for older adults, the NIA created this patient education material, which tells older adults which exercises to do and demonstrates how to do them safely. It includes endurance, strength, balance, and flexibility exercises, as well as information on healthy lifestyles and tips for developing and maintaining an exercise habit. Free copies of this 80-page guide are available in English and Spanish by calling 1-800-222-2225 or online at [www.niapublications.org](http://www.niapublications.org). A companion video is also available.

The NIA supports the recommendations put forth by Manson et al.<sup>1</sup> We encourage physicians to prescribe exercise and to go one step further by giving their older patients an evidence-based tool to help them get started.

Richard J. Hodes, MD  
Chhanda Dutta, PhD  
Karen M. Pocinki, MA

Correspondence: Ms Pocinki, Professional Education and Health Communications, National Institute on Aging, 31 Center Dr, MSC 2292, Bethesda, MD 20892-2292 (pocinkik@nia.nih.gov).