

# The Health of the Naturopath: Vitamin Supplementation and Psychologic State

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## Introduction

It is generally agreed that ageing is associated with impaired immune responses and increased infection-related morbidity. In 1992, an eminent immunologist from Newfoundland, Canada and Johns Hopkins assessed the effect of physiologic amounts of vitamins and trace elements on immunocompetence and occurrence of infection-related illness.<sup>1</sup> He assigned 96 independently living ambulatory healthy elderly individuals to receive either routine daily maintenance vitamin supplementation or placebo. Nutrient status and immunologic variables were assessed at baseline and at 12 months, and the frequency of illness due to infection was ascertained.

Subjects in the supplemented group had higher numbers of certain T-cell subsets and natural killer cells, enhanced proliferation response to mitogen, increased interleukin-2 production, and higher antibody response and natural killer cell activity. These subjects were less likely than those in the placebo group to have illness due to infections (23 versus 48 days per year). He concluded that supplementation with a modest physiologic amount of micronutrients improved immunity and decreased the risk of infection in old age.

In a subsequent double-blind, placebo-controlled study, 35 additional healthy, noninstitutionalized elderly subjects were once again supplied with multivitamin versus placebo supplementation.<sup>2</sup> Pike and Chandra note that giving micronutrients can play a crucial role in the maintenance of normal immune function in the elderly. This piece of work received very little attention because of its lack of drama. After all, these were just ordinary healthy elderly people given a simple multivitamin-trace mineral tablet!

It is interesting, in the light of these Newfoundland studies, that a recent USDA survey of food intake, reported only 1% of Americans meet the minimum standards for dietary adequacy.<sup>3</sup>

## A Naturopathic Study

In a continuing study of male naturopaths (n=70) who are graduates of the Clayton College of Natural Health, we supplied them with the Cornell Medical Index Health Questionnaire (CMI). The CMI has been timetested by allopaths for approximately 50 years. It contains over 200 questions in informal language. The answers are expressed as A-L (organic findings) and M-R (psychologic symptoms and signs). One of the queries (#169 for males) ask the question, "Do you use vitamins regularly?" Our survey revealed that 87% of these men took a vitamin/mineral supplement on a daily basis.

## Results

Our study disclosed three additional findings. The total number of CMI complaints was not significantly different in those who did or did not take vitamins (21.0 versus 21.3). Secondly, the most statistically significant point was the total number of psychologic complaints in those who took vitamins daily (3.1) compared to those who did not (5.6). Specifically, those taking vitamins showed a reduction in inadequacy (.6 as against 1.4), depression (.2 in contrast to .4), sensitivity (.7 versus .9), anger (.5 balanced against 1.2) and tension (.5 compared to 1.0).

## Discussion

It is obvious that multivitamin/trace mineral supplementation alters psychologic state significantly. It is also apparent that there are other positive and negative

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lifestyles. For example, in answer to the question, "Do you get regular (daily) exercise?", 50 or 74% responded affirmatively. These will be discussed in a later paper.<sup>4</sup>

There are still other factors which enter into this picture. Some of the samples are too small to measure since very few of the naturopaths smoke, consume alcohol or drink coffee/tea.

### Summary and Conclusions

There are many positive and negative lifestyle factors to be considered. The Newfoundland group has shown the reduction in annual number of doctor visits (for infection) from 48 to 23 days by routine vitamin supplementation. For the first time, the Clayton group emphasizes the role of

vitamins on psychologic state. Specifically, there is a reduction in inadequacy, depression, sensitivity, anger and tension. Other lifestyle characteristics will be pursued in papers to follow.

### References

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