Number 13 March 28, 1977

## **Citation Classics**

**Selye H.** The general adaptation syndrome and the diseases of adaptation. *Journal of Clinical Endocrinology* **6:**117-231, 1946.

The general adaptation syndrome is defined as the sum of all non-specific, systemic reactions of the body which ensue upon long continued exposure to stress. The paper calls attention to the possible connection between the adaptation syndrome and various diseases. If this linkage can be proven, the author contends, then it follows that some of the most common fatal diseases of man are due to a breakdown of the hormonal adaptation mechanism. [The  $SCI^{®}$  indicates that this paper was cited 167 times in the period 1961-1975.]

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November 22, 1976 that my 1946 article

"It is gratifying to learn that my 1946 article has been so frequently cited, but it is even more encouraging to consider the progress in stress research since then. This article represented an attempt to review the status of the stress concept at the time. As such, it was both a continuation of my first tentative essays on this topic and a springboard for my later publications on the implications of stress in health and disease...

"I could not answer why it was this article, among the 1600 papers and 33 books I have published, that attracted the most attention. I suppose it might be because it gave the first holistic survey and description of the diseases of adaptation (or 'stress diseases'). Undoubtedly, it was also very helpful that an entire issue of The journal of Clinical Endocrinology was devoted to my article, thanks to the editorial decision of Kenneth Thompson to print my paper as a whole. This was not my first nor, in my opinion, my most important publication; I would say that my book The Stress of Life<sup>1</sup> would be my most popular volume, having been written in 1956 and kept continuously in print unrevised-and translated into sixteen languages--until an updated edition was completed in 1976. But perhaps the success met by this 1946 article can be explained by the fact that it was the first attempt to survey the field

of stress in its entirety and, although much has been learned since then, every word in the paper still applies today.

"I wrote *The Stress of Life* in the belief that because the general public was becoming keenly aware of the role played by stress in their own lives, they would like to understand just what stress is and what it does to us. At the end of that volume I inserted a few philosophical musings on a code of behavior designed to meet and constructively deal with the stress of life...

"I went on to write another volume. Stress Without Distress.2 in which I expanded what I had called a 'philosophy of gratitude' into a code of behavior named 'altruistic egoism' and based on the conviction that by earning our neighbor's love and becoming necessary to him, we can satisfy our own selfish needs while helping others. In this way we avoid creating interpersonal stress situations, and instead can make stress work for us. Looking back at the most cited 1946 article, I can see that the ideas that inspired this philosophy were already implied in it. Towards the end of that essay I wrote: 'Adaptation to our surroundings is one of the most important physiologic reactions in life; one might even go so far as to say that the capacity of adjustment to external stimuli is the most characteristic feature of live matter.'

"On a more personal note, it amuses me to see that even with all this progress since 1946 I am, in some ways, right back where I started. When I wrote that article I had just left McGill University to accept a position as Director of the University of Montreal's new Institute of Experimental Medicine and Surgery. I was putting together a documentation service and a laboratory, secretarial, and administrative staff that was to serve me well for the next thirty years in the same location. Today I am once again in the position of a beginner organizing a research, teaching, and library center, having just created the International Institute of Stress. But this time my scope is larger; I envision a network of institutions around the world to be affiliated with the Montreal headquarters. Still, my goals are the same: to help in the art of healing or, better, preventing disease, at the same time satisfying my insatiable curiosity about the mysteries of life and happiness."

- 1. Selye H. The stress of life. New York:McGraw-Hill, 1956.
- 2. ----- Stress without distress. Philadelphia: Lippincott Co., 1974.