

YUKIO YAMORI: SCIENTIST AND MASTER IN FOOD CULTURE OF LONGEVITY



World Health Organization (WHO) data clearly demonstrate that Japanese are enjoying the longest life-span, women living average 86 years, and men 79 years. Impressively, more than 28 395 centenarians are at present living in Japan, whereas their number was approximately 200 in 1963. The applicability of dietary control of hypertension and stroke to humans has been supported by epidemiological studies in Japan as well as by the WHO cardiovascular diseases and alimentary comparison (CARDIAC) study.

These findings are extending new horizons in medicine, where the main medical activity should be focused on the prediction of diseases by detecting genetic disposition as well as on the prevention by the control of environmental factors.

In a large part this Japanese contribution to food culture in cardiovascular health and in longevity is due to basic, epidemiological and translational studies performed by Professor Yukio Yamori, a leading scientist in cardiovascular nutrition-targeted preventology, and a great scholar and beloved friend.

Born on July 29, 1937 in Kyoto, Yukio Yamori graduated *summa cum laude* from the Kyoto University Faculty of Medicine in 1962. He obtained his PhD Degree in 1967 at his *Alma mater*. Ten years later he became Professor of Pathology at the Shimane Medical University in Izumo (1977-1991). There he directed the Japan Stroke Prevention Center. Dr Yamori duplicated his professorship in 1992 when being elected Professor of Environmental Medicine at the Kyoto University Graduate School of Human and Environmental Studies. From 1983 to 1999 Dr Yamori was Director of WHO Collaborating Center for Research on Primary Prevention of Cardiovascular Diseases. Since then he is member of WHO Expert Advisory Panel on Cardiovascular Diseases. In 2006 he was elected Director of the Institute for World Health Development at Mukogawa Women's University.



Chou-ju (in Japanese, The longevity is a good thing), a calligraph by Professor Hiroshi Yamamoto, Dean of the Institute of Medical, Pharmaceutical and Health Sciences, Kanazawa University, Kanazawa, Japan.

Yamori's exceptional talent and most rigorous training in pathology, genetics and nutrition provide him with an ideal background to tackle one of the major and global health problem: the prevention of cardiovascular diseases. Major research interests of Dr Yamori include (i) pathogenesis of hypertension, stroke and atherosclerosis, (ii) gene analyses of cardiovascular diseases, (iii) prevention of cardiovascular diseases, and (iv) development of models for cardiovascular and metabolic diseases, among them spontaneously hypertensive rats (SHR), SHR-stroke prone (SHRSP), SHR-stroke resistant (SHRSR), and SHRSP fatty (*fa/fa*) rats, a new animal model of the metabolic syndrome established by crossing SHRSP rats of the Izumo strain (SHRSP/Izm) to Zucker fatty (*fa/fa*) rats.

The development of genetic models for research on hypertension, stroke, and metabolic syndrome have contributed not only to the elucidation of the pathogenesis of hyperten-

sion-related cardiometabolic diseases but also to their prediction and prevention. To reach the important conclusion that cardiovascular risk factors and cardiovascular health are not only regulated by genetic factors, but that the impact of lifestyle (mainly diet) can be large enough to modulate the expression of genes (1-8).

Dr Yamori was awarded many prizes including CIBA Award for Hypertension Research from American Heart Association (1982), Gold Medal from Bulgarian Society of Scientific Workers (1987), Doctor Honoris Causa from Claude Bernard University, Lyon, France (1991), The Order of Purple Ribbon from Japanese Government (1998), Doctor Honoris Causa from Medical University, Varna, Bulgaria (2008).

Yamori and I first began to work together 22 year ago in the Shimane Medical University in Izumo (9-11).

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