

PREFACE

This volume is more than just a biography of a remarkable physician and biological scientist who lived to see most of the 20th century. It is also a story of 20th century America (see Chronology). This is an account that parallels the emergence of America as a world power. While the 20th century was a period of unparalleled scientific accomplishments and technological inventions, it was also one of the most barbarous ones given the Jewish holocaust. Yet America was also a shining beacon attracting immigrants largely from Europe. This is an account of how one immigrant family, with hard work, attained success against considerable odds. It is a narrative of a child born in Chicago to immigrant parents of modest means from Eastern Europe. It delineates the struggle of being a Jew while trying to achieve his desired twin goals of becoming a plastic surgeon and a biological scientist.

Dr. Bernard Sarnat, or Bernie to his friends, is a world famous plastic surgeon and research scientist from Beverly Hills, California. He retired from surgical practice in 1991. However, at the same time that he was active in his practice of plastic surgery, he was also an internationally known biological researcher with appointments in the UCLA Schools of Dentistry and Medicine.

Bernard G. Sarnat S.B., M.D., M.S., D.D.S., F.A.C.S., was born in 1912 in Chicago, a child of immigrant parents from Belarus, Russia, where his two older siblings were born. He was raised on the Northwest side, a predominantly Jewish neighborhood and on the Southside of a largely Protestant/Catholic section of Chicago.

He was an honor student in grammar school and high school and was awarded early admission to the undergraduate college of the University of Chicago with advanced college credit for a number of high school courses. At the end of his junior year he took an undergraduate honors research course in physiology and did exceptionally well. Although his goal was to subsequently obtain a dental degree and specialize in oral and plastic surgery, a result of the influence of his older brother, a dentist, he seriously considered obtaining a Ph.D. in physiology. However, he continued to pursue his studies in medicine. His grades were probably somewhat above average in college but adequate enough to be admitted to the University of Chicago School of Medicine.

During his first six years as a University of Chicago student, this being the years of the Great Depression of the 1930's, it was necessary for him to work in his father's drugstore just off the University of Chicago campus 30 hours a week to make ends meet. He asked to be relieved from work in the drugstore during his seventh and last year in medical school to be able to devote full-time to his studies.

After graduation from Medical School he took an internship at the Los Angeles County General Hospital. He stayed long enough in Los Angeles to take and pass the California Medical State Board examination. He then returned to Chicago and enrolled in the University of Illinois College of Dentistry and graduate school, to conduct research under Dr. Issac Schour. At this time he was also appointed as a junior faculty member. After three years of highly intensive work, Bernie was awarded M.S. and D.D.S. degrees in 1940. In particular, the three years with Dr. Schour were very important formative years for Bernie and provided the basis for serious research programs over the next 60 or more years. Thus, those three years played a major influence for the rest of his life.

Research projects were initiated not only at the University of Illinois but also at the Rush Medical College and the University of Chicago. Significant research of major public health aspects in the relationship of teeth to systemic disease resulted in him receiving a major prize from the Institute of Medicine of Chicago, the first of numerous ones he received throughout his career.

In pursuing his goal of becoming a plastic surgeon he devoted one year as a resident at Cook County Hospital in oral and plastic surgery and a subsequent year in general surgery at University Hospital, also in Chicago. This was followed by another three very busy years learning the art and science of general plastic and reconstructive surgery in St. Louis as a full-time assistant to the internationally famous doctors Vilnay P. Blair and Louis T. Byars.

Bernie's clinical appointments were not only in the private practice office but also in the Department of Surgery at Washington University School of Medicine and Barnes Hospital. Subsequently, he was appointed full professor and head of the Department of Oral and Plastic surgery at St. Louis University School of Dentistry. After three further important developmental years, Bernie returned to Chicago and established his private practice of plastic and reconstructive surgery. At this time he also became professor and Head of the then Department of Oral and Plastic Surgery in the College of Dentistry and also a professor in Plastic Surgery in the Medical School and also the Graduate School. He now had the opportunity to further pursue his basic research program and this also included graduate students. In the ensuing 10 years, significant research was carried out in the general field of bone and craniofacial biology. With this research the Department of Oral and Plastic Surgery established both a national and international reputation.

By 1955 Bernie found that as head of the department he was devoting more and more time to administration and less and less to research. Because of this and health factors, he resigned from all his appointments, closed his office of the private practice of plastic and reconstructive surgery and moved the family to Los Angeles in December of 1955 to start life anew.

Bernie now established his home and private practice office in Beverly Hills and continued his research at Cedars-Sinai Medical Center and at UCLA where he was on the faculties of both the medical and dental schools.

Bernie has more than 220 scientific articles in refereed journals, books and chapters in books. He has lectured extensively, locally, nationally and internationally at many universities and professional societies. As a result he has received more than 25 local, national and international honorary awards.

The author first met Bernie in 1976 when they were colleagues in the section of orthodontics, UCLA School of Dentistry. There the author was exposed to Bernie's broad research interests. This eventually led to a series of joint publications on the shape of the turtle carapace^{1,2} and the shape of the rabbit orbit.³⁻⁵ Another aspect of Bernie's considerable abilities not generally known, of which the author has had first-hand experience, has been his organizational abilities as seen at numerous international conferences. His admiration for Bernie has deepened over the years.

In 1987 Bernie received the Distinguished Service Alumni Award from the University Of Chicago Pritzker School Of Medicine and returned for a visit in 1988 (Fig. 48). At that presentation, Thomas Krizek, M.D. Professor and Chairman of the Division of Plastic and Reconstructive Surgery stated the following: "That I should introduce a plastic surgeon from Beverly Hills, California is not a matter of particular surprise; that I should introduce a plastic surgeon-scientist from Beverly Hills sounds more like an oxymoron. Dr. Sarnat, however, is both a distinguished plastic surgeon and a distinguished scientist who, for more than half a century has brought honor to himself, to those of us in Plastic Surgery and to the University of Chicago". Dr. Krizek went on to state that "In 1940 he published his first work on teeth, hypoplasia, growth and development. Forty-seven determined years and more than 200 papers, books, monographs and chapters later. ... That work years ago seemed obscure and without application has now, in the years since..., proved to be without emendation, the basis of what

we now understand. He was a scientist in craniofacial surgery when there were no others.”

This biography then delineates Bernie’s life. It starts with a historical background leading to the emigration of his parents from Belarus to Chicago in 1907, his early childhood years in the 1920’s, his formative education, his undergraduate days at the University of Chicago, his graduate degrees received from the University of Illinois and his start in his research career and as a plastic surgeon. In sum, this is a biography of an extraordinary biological scientist and plastic surgeon as well as a warm and affectionate human being. This is then his story.

Finally, I wish to acknowledge my debt to Bernie Sarnat for the many afternoon sessions that extended over some seven years during which I transcribed his recollections and entered them into my laptop. I wish to thank Jascha Hoffman, formerly on the staff of the New York Review of Books, Charles Wolfe and Meredith Bodt for their review of earlier versions of the biography and to Michelle Van Vliet for her photography skills. I also want to thank Hasan Zaidi for his artwork of Figures 1, 2, 4 and 6. Lastly, I owe a debt of gratitude to Sook-Cheng Lim, Scientific Editor at World Scientific Publishing for her guidance during the publishing process. Any errors of omission as well as inaccuracies in interpretation that may have accumulated are solely my own.

Pete E. Lestrel
Van Nuys, California