

Book Notes

The Musician's Hand: A Clinical Guide

Edited by Ian Winspur and Christopher B. Wynn Parry; Foreword by Raoul Tubiana (London, Martin Dunitz, 1998, 196 pp, \$99.95)

The editors of *The Musician's Hand* have put together an extremely informative guide to the clinical care of musicians with hand injuries, and they and their colleagues are to be commended for their thorough and sensitive review of the issues. Drawing on their experiences in the hand clinic in the Devonshire Hospital in London and their work in the British Association of Performing Arts Medicine, these physicians have provided a well-constructed analysis of the most common hand and upper-extremity complaints of musicians. They have integrated the various factors that can influence any individual musician's hand mechanics: the ergonomics of the demands of a specific instrument in addition to a more general discussion of the psychology of music making and the unique stresses in the life of the performer.

In the first chapter, Hellmut Stern and Ian Winspur describe sympathetically the perspectives of an orchestral musician and a pop/rock musician, respectively. It allows the reader a succinct and elegant introduction into the psychological and physical stresses associated with the performance of these two types of music.

The bulk of the book is devoted to the hand and arm complaints prevalent among instrumentalists ranging from string players and guitarists to keyboardists and woodwind players. A fairly thorough discussion of the unique physical demands associated with playing these instruments is included. The reader is provided with results from a 1997 study by Winspur and Wynn Parry in Britain in which the upper-limb problems of musicians are divided into categories. We learn that in only 41% of cases was there a clear medical diagnosis, 40% appeared due to technical problems, and 19% seemed to have at their root emotional or psychological causes. The study initially included 300 musicians and has been extrapolated to more than 600 musicians attending a performing arts clinic. These results seem to reflect the individual experiences of those of us who care for injured musicians; technical and emotional problems account for a significant percentage of the physical complaints with which they present. The physical symptomatology is very real; it just is frequently difficult or impossible to separate from the technical and emotional mechanisms.

Several chapters deal in more detail with the diagnosis and management of some of the specific medical diagnoses that were prominent in the study. These include, among others, symptomatic hypermobility syndrome, tenosynovitis, and rotator cuff injury, thoracic outlet syndrome, carpal tunnel syndrome, and low back pain. I appreciated the way in which the psychological and emotional demands of performance are consistently addressed through each step of the author's descriptions. The book shares survey results in which musicians cite performance anxiety, incompatibility among orchestral/ensemble members, change in performing environment (acoustics), inadequate conservatory/training emphasis on sensible performing habits, and delay in seeking proper medical treatment as just a few of the factors that contribute to their levels of stress and risk for chronic injury.

In a chapter titled "The Interface," the reader learns about the relevance of player/instrument physical compatibility and some of the problems associated with correct woodwind, string, guitar, and keyboard playing. It includes good notes also on the role of visualization, mental practice, and conscious vs autonomic control. I again appreciated the attention given to the mental demands placed on the musician if he or she is to achieve efficient and pain-free playing.

Wynn Parry's chapter on misuse and overuse reminds us of the critical point that these two entities are not synonymous. If the instrument is played correctly and with the necessary mental calm and sensible lifestyle, there is no reason to believe that frequent playing in and of itself will result in injury. In my opinion, most knowledgeable performing arts medicine practitioners agree that it is erroneous and misleading to attribute a variety of upper-limb pain syndromes to simple overuse. Intense and protracted playing alone will not cause injury unless there's a pre-existing injury or illness that disrupts normal play. We're reminded that under healthy and proper conditions, the musician needn't emerge physically wounded by his or her career.

In a discussion about the role of a surgical evaluation, we're told that the primary indication for this type of intervention is acute trauma and that exploratory surgery or surgery for tenuous reasons is very hazardous to a musician. Dr. Amadio presents a very commonsensical and conservative approach to the surgical management of musicians and I much appreciated his analysis. The neuromuscular balance required for fast and fine fingering is such that any possible distortion of it should be considered very, very cautiously. Amadio wisely warns against surgery except in extremely clear-cut situations and reminds us that the musician's social and emotional milieu must be well appreciated by the practitioner as a pervasive and strong influence on the patient's physical symptomatology.

Much of the book is technical; specific interventions are described in a chapter titled "Surgical Indications, Planning and Technique," and specific conditions are described such as Dupuytren's contracture, nerve compression syndromes, and the management of hand trauma. This reading is obviously especially useful to those practitioners who actually perform the surgery, although any physician involved in surgical follow-up or any physical therapist engaged in rehabilitation will find it very valuable. The chapter titled "The Physical Therapist's Contribution" is particularly excellent in this regard.

I especially enjoyed the chapters on the musical temperament, performance psychology and the musician's hand, and medications and stage fright, because they addressed those aspects of the musician as patient that traditional medical practitioners may find especially hard to grasp and yet are essential to the correct diagnosis and management of performers' medical complaints. These issues are sensitively discussed by Wynn Parry, Evans, and James and remind us of those sometimes abstract but nonetheless real features of illness and injury, the correct recognition of which can make all the difference between inadequate and successful treatment.

SUSAN B. ARJMAND, M.D.
*University Family Physicians—Lincoln Park
Rush—Presbyterian—St. Luke's Medical Center
Chicago, Illinois*

Biomechanics of Musculoskeletal Injury

By William C. Whiting and Ronald F. Zernicke. Champaign, Illinois, Human Kinetics Press, 1998, hardback, 296 pp, \$49)

This highly readable and visually appealing text is a real treasure trove for arts medicine practitioners as well as for performing artists. Although covering both basic science and clinical material, the text is remarkably clear, devoid of jargon and unnecessary technical language, and conveniently divided so that readers can decide just how much, or how little, they want to learn from each chapter. The book is also abundantly and helpfully illustrated with drawings and photographs. The authors, Drs. Whiting and Zernicke, are, respectively, a director of a biomechanics laboratory and kinesiologist at California State University, and an engineer with joint appointments in the University of Calgary's departments of orthopaedics, mechanical and civil engineering, and kinesiology. It is clear that both are experienced teachers and familiar with sports and dance injuries, as well as with the important precipitants, including stress, of overuse injuries in general, and with appropriate methods for conditioning and prevention of injuries. Representative chapter headings include Introduction to Injury, Tissue Biomechanics and Adaptation, Mechanisms of Injury, Lower-Extremity Injuries, and Upper-Extremity Injuries. Rarely have I found a book that provides such a wealth of accessible information to deal with the everyday musculoskeletal problems that constitute a performing arts practice.

Alice G. Brandfonbrener, M.D.
Editor



The Hand

By Frank R. Wilson. (New York, Pantheon Books, 1998, hardcover, 397 pp, \$30)

Reviewing this book is a complicated task, in part because it is not clear whether to regard this as a technical book, an anthropological essay, a treatise on educational philosophy, or a hybrid of all of the above. Much of this book is well written, although at times the author's cleverness in turning a phrase doesn't simply entertain, but serves to increase the confusion as to the book's real purpose. Even the chapter headings, for example, "The Arm We Brought Down from the Tree" and "Tough, Tender, and Tenacious," add to the ambiguous presentation of the book, i.e., is it a "beach book" or a reference text? On the side of textbook is that the documentation and annotation are scrupulous. In fact, I found the extensive footnotes to be excessive and, when read thoroughly, often caused me to lose the main drift of the original text. While the book's purpose remains an enigma, at least for me, it is evident that an impressive amount of time was spent in both researching and writing this book. However, while Dr. Wilson is a neurologist with wide clinical experience and great interest in function and dysfunction of the musical hand, this was not a book about the neurology of the hand, but can be more accurately described as an exposition of investigations by anthropologists, archaeologists, geneticists, and developmental and educational psychologists. As a physician caring for injured musicians, I am not sure that I feel any more informed about the musical hand, healthy or diseased, than I was prior to reading *The Hand*. The conclusions drawn by Dr. Wilson might more properly have come from scholars in the appropriate fields than from a physician. In spite of these negative remarks, I do congratulate Dr. Wilson on the completion of what was clearly both a difficult task and, even more obviously, a labor of love.

Alice G. Brandfonbrener, M.D.
Editor