Applied Sport Psychology

Personal Growth to Peak Performance

Jean M. Williams, Editor

University of Arizona



Mayfield Publishing Company

Mountain View, California London • Toronto

Copyright © 2001 by Mayfield Publishing Company

All rights reserved. No portion of this book may be reproduced in any form or by any means without written permission of the publisher.

Library of Congress Cataloging-in-Publication Data

 $\label{prop:personal} \textbf{Applied sport psychology: personal growth to peak performance / Jean}$

M. Williams, editor. — 4th ed.

p. cm.

Includes bibliographical references and index.

ISBN 0-7674-1747-X (alk. paper)

1. Sports—Psychological aspects. 2. Coaching (Athletics)

I. Williams, Jean M. (Jean Marie)

GV706.4.A66 2000

796'.01—dc21

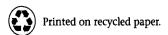
00-064731

Manufactured in the United States of America 10 9 8 7 6 5 4

Mayfield Publishing Company 1280 Villa Street Mountain View, California 94041

Sponsoring editor, Reid Hester; production, Publishing Support Services; manuscript editor, Kay Mikel; cover designer, Jeanne M. Schreiber; illustrator, Joan Carol, Lotus Art; manufacturing manager, Danielle Javier. The text was set in 9/11 Stone Serif by TBH Typecast, Inc., and printed on 45# Baycoat Velvet by Banta Book Group.

Cover photograph © Bob Daemmrich Photo, Inc.



An increasing number of coaches and athletes have turned to applied sport psychology to gain a competitive edge—to learn, among other things, ways to manage competitive stress, control concentration, improve confidence, increase communication skills, and promote team harmony. Not until the 1980s had the level of scientific and experiential knowledge about psychological interventions for enhancing performance become sufficient to warrant books that attempt to translate this knowledge into practical suggestions and exercises.

The first edition of Applied Sport Psychology: Personal Growth to Peak Performance was one of the first books written specifically to introduce coaches and sport psychologists to psychological theories and techniques that could be used to enhance the performance and personal growth of sport participants from youth sport to elite levels. The book focused primarily on three dimensions: (1) techniques for developing and refining psychological skills to enhance performance and personal growth, (2) suggestions for establishing a learning and social environment that would enhance the effectiveness of coaches and maximize the skill and personal growth of athletes, and (3) special issues such as staleness and burnout, psychology of injury and injury rehabilitation, and retirement from athletics.

The second edition continued to have the same focus but was expanded to cover more topics. New chapters were added on training youth sport coaches, improving communication, referring athletes for professional counseling, and drug abuse in sport.

The third edition added a new chapter on exercise psychology, a topic of growing importance to applied sport psychology. This chapter described the psychological benefits and risks of exercise and the psychological and behavioral principles for enhancing exercise adoption and adherence.

Revisions for this fourth edition reflect the latest research and practices in applied sport psychology. Readers will find that important topics have been retained, but the fourth edition has been reorganized into five parts to improve cohesion between chapters. In addition, because earlier editions failed to adequately address motivation theories and their applications, a new chapter has been added to fill this gap. The chapter discusses self-efficacy, attributions, intrinsic motivation, and achievement goals.

Applied Sport Psychology is particularly well suited as a text for classes in applied sport psychology and psychology of coaching. The book will also be a valuable reference for practicing coaches and sport psychologists who did not have the opportunity for such training in their own formal education. Here are some of the reasons the fourth edition continues to be exceptionally well suited for these classes.

Written Specifically for Sport Psychologists and Coaches

The growing body of knowledge and interest in applied sport psychology is perhaps best indicated by the 190-plus books that have been

published on mental skills for peak performance. Most of these books continue to be written primarily for the sport participant. Their coverage is not comprehensive enough for the sport psychologist or coach who must apply psychological constructs across a wide variety of situations and deal with many different sport participants. Books written for sport psychologists and coaches are typically general textbooks that attempt to cover the entire field of sport psychology. Thus their coverage of applied issues—and particularly psychological interventions for enhancing sport performance, personal growth, and exercise participation—is superficial compared to the in-depth coverage provided in this text.

Based on the Latest Research and Practice

The knowledge and experiential base in applied sport psychology has greatly expanded since the initial publication of this book. Each new edition has reflected the latest research and cutting-edge practice in applied sport psychology. Although the primary focus of the fourth edition continues to be on application, each chapter provides theoretical and research foundations when appropriate. When using the book as a textbook for a graduate course, the instructor may want to supplement the book with readings from the research studies cited by the contributors.

Comprehensive Coverage of Topics

No other text in applied sport psychology encompasses the comprehensive approach taken here. The first chapter discusses the past, present, and future of sport psychology. The remainder of the book is divided into five parts.

Part One covers learning, feedback, motivation, and effective leadership. Part Two covers social interactions such as effective groups, communication, and coach-parent relationships. For clarity and simplicity, some of these chapters have been written in the vernacular of the coach. The reader is cautioned, however, not to conclude that these chapters are only useful for coaches. Sport psychologists frequently find it necessary to work with coaches in areas such as improving communication skills, building team rapport, and fostering more effective leadership behaviors. Also, the same principles of learning, motivation, and social interaction that help to increase a coach's effectiveness apply to the sport psychologist teaching mental skills and interacting with athletes. Thus the knowledge and insight gained from reading the chapters in Part Two are equally as appropriate for current and prospective sport psychologists. In those instances where an author refers only to the coach, the reader can expand this to include the sport psychologist as well.

Part Three of the book discusses mental training for enhancing performance. This section begins with a chapter on the psychological characteristics of peak performance; other chapters discuss identifying ideal performance states, setting and achieving goals, managing stress and energy levels, training in imagery, identifying optimal attentional styles, controlling concentration, and building confidence. Part Four deals with implementing training programs. The first chapter provides suggestions for the integration and implementation of a psychological skills training program. The second chapter provides guidance on how to conduct sport psychology training programs with coaches.

Part Five addresses the referral of sport competitors for professional counseling, drug abuse in sport, staleness and burnout, injury risk and rehabilitation, termination from sport competition, and psychology of exercise. No sport psychology book has dealt with all of these issues, even though they are crucial to sport performance, personal development, and the enhancement of exercise participation and benefits.

The appropriateness of these chapters for certain courses will depend on the students' backgrounds and interests. The book was planned to provide complete coverage of psychological theories, techniques, and issues relevant to the enhancement of personal growth and sport and exercise participation and performance. Instructors may select those chapters that are appropriate for their courses. For example, chapters 2 and 3 concern motor skills learning

and principles of reinforcement and feedback; this material might be redundant if the reader already has a thorough background in motor learning. Chapter 10, on coach-parent relationships, may interest only those individuals who are working, or plan to work, in a setting where sport participants are still living with their parents; whereas chapter 26, on termination from sport competition, may interest only individuals who work with athletes who are nearing retirement or dropping out of sport competition.

Written by Leading Experts in Sport Psychology

The contributors to this volume are leading scholars and practitioners in sport and exercise psychology. They work with sport participants from youth sport to Olympic and professional levels, and most have illustrious backgrounds as elite athletes or coaches.

Integrated Organization and Writing Style

The book has the major advantage of drawing on the diverse expertise and perspectives of 39 sport and exercise psychologists and two motor learning experts, but it avoids the common disadvantage of disparate coverage and diverse writing styles frequently found in edited textbooks. The content and sequencing of chapters has been carefully coordinated to assure comprehensive coverage and progressive development of concepts while eliminating undesirable overlap and inconsistency in terminology. Writing focus, styles, and organization have been standardized as much as possible. Each chapter cites appropriate research and theory, makes application to the world of sport and exercise, and provides examples and intervention exercises whenever appropriate. Each chapter also begins with an introduction that highlights the content of the chapter and ends with a conclusion or summary of the major psychological constructs and skills and study questions for students.

Application Examples

The numerous examples given throughout the book greatly facilitate the translation of psychological theory and constructs into everyday practice. Many of these examples involve well-known professional and amateur sportspeople. The examples cut across more than 40 sports and provide important anecdotal evidence that can be used to motivate individuals to develop psychological and behavioral skills for their sport and exercise participation. These real-life examples are frequently supplemented with hypothetical examples created by the authors to clarify appropriate applications.

Applied Sport Psychology **Provides Many Benefits**

The rewards are many for those who choose to dedicate themselves to the pursuit of excellence and personal growth through use of the theories and techniques of applied sport and exercise psychology. Coaches and sport participants acknowledge the importance of mental factors in sport development and performance, yet the time individuals actually spend practicing mental skills belies this view. In publishing this book, we have made a serious effort to help abolish that inconsistency by supplying the knowledge necessary for providing a salutary psychological climate. The benefits that can be derived from this text will arise not just in sport performance but in overall performance outside of sport and, perhaps most important, in general personal growth and increased physical and mental health.

Acknowledgments

I wish to thank all the contributors who participated in this project and thus shared their vast expertise with the readers. The high acceptance given to earlier editions of this book was due primarily to their efforts, and I am greatly indebted to them. Whatever contribution this book continues to make to applied sport and exercise psychology will be in large measure a consequence of their efforts.

Thanks are also due to John B. Bartholomew, University of Texas at Austin; Nicole Damarjian, University of Connecticut; Gib Darden, Radford University; David M. Furst, San Jose State University; Jolynn S. Kuhlman, Indiana State University; Steven J. Petruzzello, University of Illinois at Urbana-Champaign; Richard Stratton, Virginia Tech; and Joe Walsh, Minnesota State University, Mankato, for their insightful reviews of this edition.

I am also indebted to the fine editorial staff at Mayfield Publishing Company, most particularly Serina Beauparlant, Michele Sardi, Kara Indelli, and April Wells-Hayes, for their support and skill. I also wish to thank Kay Mikel for her excellent copyediting and Vicki Moran of Publishing Support Services for her efficiency and thoroughness in overseeing the production process for this edition.

Iean M. Williams

Jean M. Williams is a professor in the Department of Psychology at the University of Arizona. She teaches courses in stress and coping and psychology of excellence. Dr. Williams has done extensive consulting with intercollegiate athletes, teams, and coaches and some consulting with top amateur and professional athletes. She has more than 10 years of coaching experience in men's and women's fencing, including coaching nationally ranked teams. Dr. Williams has edited two books in sport psychology and written more than 100 published research and professional articles. She is a past president of AAASP and past chair of the AAHPERD Sport Psychology Academy.

Mark B. Andersen is a licensed psychologist and associate professor at Victoria University in Melbourne, Australia. He is the head of research studies in the School of Human Movement and coordinates the master of applied psychology degree (sport and exercise psychology emphasis) in the Department of Psychology. He received his doctorate from the University of Arizona in 1988 and immigrated to Australia in 1994. His areas of research interest include the psychology of injury and rehabilitation, the training and supervision of graduate students, exercise and quality of life for those with chronic diseases, and the practice of sport psychology service delivery. He is the first and current editor of the Professional Practice section of The Sport Psychologist. In 1994, he received the Dorothy V. Harris Memorial Award for excellence as a young scholar/practitioner

from the Association for the Advancement of Applied Sport Psychology. Dr. Andersen has worked for many years counseling athletes ranging from 10-year-old juniors to American and Australian Olympians.

Mark H. Anshel is a Performance Counselor at LGE Performance Systems, a private sports medicine clinic in Orlando, Florida. Formerly, he was a professor of sport and exercise psychology in higher education. He received his master's degree and Ph.D. at McGill University (Montreal) and Florida State University, respectively. His primary research interests include examining the antecedents and causes of drug use in sport, and coping with acute stress in sport settings. In addition to his published research articles and book chapters, he has written the textbooks Sport Psychology: From Theory to Practice (3rd ed.), Aerobics For Fitness (5th ed.), and is the editor of the Dictionary of the Exercise and Sport Sciences. He has consulted with several university and professional sports teams and individual athletes over the years in the United States, Australia, Korea, China, and Singapore. Dr. Anshel is a member of the American Psychological Association (Division 47 Executive Board), Association for the Advancement of Applied Sport Psychology, among other organizations, and consults with selected athletes of all ages and skill levels.

Shawn M. Arent is a doctoral student in the Department of Exercise Science and Physical Education at Arizona State University. Mr. Arent

earned his B.A. in psychology from the University of Virginia and his M.S. in Exercise Science at Arizona State University. His research interests focus on performance enhancement and on the arousal-performance relationship. Mr. Arent's experiences as an intercollegiate athlete have also led him to the competitive arena for bodybuilding. He has worked as an assistant strength and conditioning coach at the University of Virginia, where he was involved with many highly-ranked and national championship teams. Mr. Arent, a Certified Conditioning Specialist, has also worked with other high-level amateur and professional athletes on an individual basis as a strength and performance enhancement coach.

Janet Buckworth is an assistant professor in Sport and Exercise Science at The Ohio State University, where she conducts research and teaches classes in physical activity behavior change. Dr. Buckworth completed her Ph.D. with Rod Dishman at the University of Georgia in 1993, where she studied physiological mechanisms for modification in stress responsiveness from exercise training. Her academic and professional background also includes masters' degrees in clinical social work and health education. Dr. Buckworth's diverse educational and occupational experiences have helped to shape her psychobiological orientation to studying exercise behavior and her interest in women's health and exercise. Other research involves application of the transtheoretical model of behavior change to exercise in college students, self-concept and exercise, and psychological stress and athletic injury. Dr. Buckworth has written a chapter on behavior modification for the fourth edition of the Health/Fitness Instructors' Handbook and is coauthoring a textbook of exercise psychology with Dr. Dishman. Dr. Buckworth has been involved with the American College of Sports Medicine since 1989 and was named an ACSM Fellow in 1998.

Linda K. Bunker is director of the motor learning laboratory and professor of kinesiology at the University of Virginia where she is the Parrish Professor of Education. She is a certified sport psychology consultant (AAASP) and has worked extensively with professional golfers and tennis

players. Dr. Bunker is a well-known scholar in the areas of applied motor learning and sport psychology and was selected as the 2000–2001 Alliance Scholar for the American Alliance of Health, Physical Education, Recreation and Dance. She has written more than 100 articles and authored 15 books, including Motivating Kids Through Play, Parenting Your Superstar, Golf: Steps to Success, and Mind Mastery for Winning Golf. Her involvement in sport has been both active and scholastic. She is on the Advisory Board of the Womens Sports Foundation, SHAPE magazine, and the Melpomene Institute and was a nationally ranked tennis player and four-sport athlete at the University of Illinois.

Albert V. Carron is a professor in the Faculty of Health Sciences at the University of Western Ontario, where his primary area of research is group dynamics, with a specific focus on group cohesion. In addition to more than 100 research articles, he has written five books. He has been active in the sport sciences in Canada and the United States—as a president of the Canadian Association of Sport Sciences; a member of the Sports Medicine Council of Canada; a section editor for the Canadian Journal of Sport Sciences and the Journal of Applied Sport Psychology (he is currently the editor); an editorial board member for the Journal of Sport and Exercise Psychology; and a guest editor for the International Journal of Sport Psychology. He is also a fellow in the Canadian Association for Psychomotor Learning and Sport Psychology, the Association for the Advancement of Applied Sport Psychology, and an international fellow of the American Academy for Kinesiology and Physical Education.

Packianathan (Chella) Chelladurai is currently a professor of sport management in the School of Physical Activity and Educational Services at The Ohio State University. He is a frequent reviewer for the Journal of Sport and Exercise Psychology and the Journal of Applied Sport Psychology. He is a former editor of the Journal of Sport Management. He was honored by the North American Society for Sport Management as the first recipient of its prestigious Earle F. Zeigler Award. He received his doctorate from the University of Waterloo. He conducts research in the areas of organization

theory and organizational behavior, including leadership in sports. Dr. Chelladurai is the author of Sport Management: Macro Perspectives and Management of Human Resources in Sport and Recreation and coauthor of monographs titled Leadership and Group Cohesion and Sport. His third book, titled Management of Sport Delivery Systems, will be published in 2000. He was a national basketball player, referee, and coach in India.

Paul W. Dennis is the development coach for the Toronto Maple Leafs of the National Hockey League, a position that requires technical and applied sport psychology expertise. His primary responsibility with the Maple Leafs is to assist team members and potential prospects with their psychological skills development. His main research interest is in the area of group dynamics. He received his doctorate from the University of Western Ontario under the supervision of Dr. Albert V. Carron.

Rod K. Dishman is director of the exercise psychology laboratory and professor of exercise science at the University of Georgia in Athens, where he advises exercise science graduate students studying behavioral and biopsychological aspects of exercise and physical activity. Dr. Dishman received his Ph.D. in sport psychology at the University of Wisconsin-Madison and has focused much of his research and writing on the mental health outcomes associated with physical activity and on behavioral determinants of habitual exercise. Dr. Dishman is a fellow of the American College of Sports Medicine, the American Psychological Association, the American Academy of Kinesiology and Physical Education, and the New York Academy of Sciences. Dr. Dishman has served as a consultant on exercise behavior to the National Institute of Mental Health, the National Heart, Lung, and Blood Institute, the Study Section on Chronic Disease and Epidemiology of the National Institutes of Health, the Sports Medicine Council for the United States Olympic Committee, and the Medical Commission of the International Olympic Committee.

Joan L. Duda is a professor of sport psychology in the School of Sport and Exercise Sciences at

The University of Birmingham in the U.K. and an adjunct professor in the psychological sciences at Purdue University. She received her Ph.D. at the University of Illinois at Urbana-Champaign. Dr. Duda is currently President-Elect of the Association for the Advancement of Applied Sport Psychology and has also been a member of the executive boards of the North American Society for the Psychology of Sport and Physical Activity, the Sport Psychology Academy, and the International Society for Sport Psychology. She was editor of the Journal of Applied Sport Psychology and is on the editorial boards of the Journal of Sport and Exercise Psychology, the International Journal of Sport Psychology, and the Sport and Exercise Psychology Journal. Dr. Duda has more than 110 scientific publications focused on the topic of sport motivation and the psychological dimensions of sport and exercise behavior. She is the editor of Advances in Sport and Exercise Psychology Measurement (1998). Dr. Duda is certified as a Sport Psychology Consultant by the Association for the Advancement of Applied Sport Psychology and is listed on the U.S. Olympic Registry. As a sport psychology consultant, she has worked with athletes and coaches from youth sport through Olympic levels.

Mark G. Fischman is a professor in the Department of Health and Human Performance at Auburn University. He received his doctorate in motor learning from Pennsylvania State University. Dr. Fischman is associated with the Motor Behavior Center at Auburn, where he conducts research on theories of response programming, scheduling of feedback in skill learning, and factors that constrain grip selection in humans. Dr. Fischman is a former collegiate swimmer and has coached collegiate and age-group swimming.

Daniel Gould is the Bank of America Excellence professor in the Department of Exercise and Sport Science at the University of North Carolina at Greensboro. A specialist in applied sport psychology, he focuses his research on competitive stress and coping, athlete motivation, and the effectiveness of psychological skills training interventions for coaches and athletes. He is also heavily involved in coaching education and children's sports. Dr. Gould has been a consultant to

elite international athletes in a wide variety of sports ranging from figure skating and dressage to wrestling and baseball. Formerly a wrestler and football and baseball player, he remains an avid fitness enthusiast. Dr. Gould was the founding co-editor of *The Sport Psychologist*. He served as president of the AAASP, chaired the U.S.A. Wrestling Science and Medicine Committee, served on the U.S. Olympic Coaching Development Committee, and presently cochairs the U.S. Olympic Sport Science and Technology Committee.

Christy A. Greenleaf received her B.A. in psychology from Bowling Green State University and her M.S. degree in sport studies from Miami University. Ms. Greenleaf is now a doctoral candidate in the Department of Exercise and Sport Science at the University of North Carolina at Greensboro. She has served as the UNCG sport and exercise psychology lab director and had supervised several large-scale research projects. Her research interests include performance enhancement, body image and physique concerns, and disordered eating. Her sport involvement includes amateur and professional figure skating.

Dorothy V. Harris, now deceased, was a professor and coordinator of the graduate program in sport psychology at Pennsylvania State University. She was a world-renowned educational sport psychologist, past president of NASPSPA, a member of the Managing Council of the International Society of Sport Psychology, ISSP treasurer, and editor of the ISSP Newsletter. Dr. Harris was a prolific author who wrote two books, edited five, and contributed to numerous others. She was also an accomplished speaker. She spent a sabbatical at the Olympic Training Center in 1980 and continued to work with numerous Olympic and national teams and athletes.

Keith P. Henschen is a professor in the Department of Exercise and Sport Science at the University of Utah and director of the sport psychology graduate program. He has published numerous research articles and has spoken extensively on the practical applications of sport psychology. His research interests include intervention strategies,

athlete performance assessment, and performance psychology for the handicapped. Dr. Henschen is a consultant for numerous college and professional sport teams. He is currently vice president of the Managing Council of the International Society of Sport Psychology (ISSP). He has also served as president of the American Alliance of Health, Physical Education, Recreation, and Dance (1997–98).

Thelma Sternberg Horn received her doctoral degree from Michigan State University and is currently an associate professor and coordinator of graduate studies in the Department of Physical Education, Health, and Sport Studies at Miami University in Ohio. Her research interests center around children's perceptions of their physical competence and the influence of teacher, coach, and parent behavior on children's psychosocial growth. She is also working on an interdisciplinary project designed to examine the relationship between exercise and stress reactivity in adolescents and young children. Dr. Horn is a former editor of the Journal of Sport and Exercise Psychology and is currently editing the second edition of Advances in Sport Psychology. Prior to her graduate work in sport psychology, Dr. Horn taught physical education and English at the high school level in Michigan and Colorado. She has had extensive coaching experience at both interscholastic and intercollegiate levels and continues to work as a consultant and clinician with coaches and teachers in youth sport and interscholastic programs.

Vikki Krane is an associate professor with the School of Human Movement, Sport, and Leisure Studies at Bowling Green State University. She completed her doctorate in exercise and sport science at the University of North Carolina at Greensboro. Her main research interests concern the relationship between competitive anxiety and athletic performance and feminist examination of body image and heterosexism in sport. Dr. Krane is a Certified Consultant, Association for the Advancement of Applied Sport Psychology, and has consulted with a variety of athletes at the elite youth sport, high school, and college levels. She is the editor of The Sport Psychologist and is on the editorial board of the Journal of Applied Sport Psychology.

Francisco (Paco) Labrador received a bachelor's degree in psychology and exercise science from Hiram College in Ohio and a master's degree in Sport Studies from Miami University. Mr. Labrador is currently an assistant coach for the women's intercollegiate volleyball team at Miami University. His research interests include the study of coaching leadership styles and behaviors and their relationship to athletes' level of motivation and sport commitment. Mr. Labrador played 4 years' of intercollegiate volleyball at Hiram College and also served as the assistant coach for the Hiram College women's intercollegiate volleyball team.

Daniel M. Landers is a regents' professor of exercise science and physical education at Arizona State University. He was the founding editor of the Journal of Sport and Exercise Psychology. Dr. Landers also served as president of the Research Consortium of AAHPERD, the Division of Exercise and Sport Psychology of the American Psychological Association, and the North American Society for the Psychology of Sport and Physical Activity (NASPSPA). In 1995, he received the Distinguished Scholar Award, which is the highest award offered by NASPSPA. Dr. Landers has been a member of an ad hoc National Academy of Science committee, a member of the Sport Psychology and Sport Science and Technology Committees of the U.S. Olympic Committee, a founding member of the IOC Olympic Academy of Sport Sciences Committee, and a member of the Prize Selection Committee of the International Olympic Committee. His research has focused on the arousal-performance relationship, including attention/concentration and stressreducing coping strategies. He has served as a sport psychologist for collegiate teams, professional teams, and national Olympic teams in the United States, Canada, and Korea.

Curt L. Lox received his master's degree from Miami University (Ohio) and his doctoral degree from the University of Illinois at Urbana-Champaign and is currently an associate professor and graduate coordinator at Southern Illinois University at Edwardsville, where he directs the coaching program and codirects the sport and exercise psychology program. His research inter-

ests center broadly around the psychological and emotional aspects of exercise and sport behavior. Dr. Lox has coached at the youth and high school levels and continues to serve as a sport psychology consultant to players and coaches at the junior-elite, interscholastic, and intercollegiate levels.

Betty L. Mann received her doctorate from Springfield College, where she is a professor of Physical Education. She is the Acting Dean of the School of Graduate Studies and serves as the coordinator for graduate studies in physical education. Her areas of expertise are sport psychology, sport law, and administration. Dr. Mann has made numerous presentations on leadership and has written articles about that topic. She has coached women's basketball at the college and high school levels and taught middle school physical education.

Mimi C. Murray is a professor of Physical Education at Springfield College. Dr. Murray has been a very successful gymnastics coach: Her teams at Springfield College won three Division I National Championships; she was selected to coach the U.S. team for the World University Games and was named "Coach of the Year." She authored Gymnastics for Women: The Spectator, Gymnast, Coach and Teacher. She has been a television sports commentator. As a sport psychology consultant, Dr. Murray has published many articles and lectured throughout the world and has worked with Olympic and professional athletes. including the U.S. equestrian team and the 1996 U.S. field hockey team. She is listed on the U.S. Olympic Committee's Sport Psychology Registry, is past-president of NAGWS, AAHPERD and is currently president of ICHPER-SD.

Robert M. Nideffer has been a professor on the faculties of the University of Rochester, the California School of Professional Psychology, and California State University at San Diego. He has been involved in sport psychology since 1969 and is the chief executive officer and founder of Enhanced Performance Systems. Dr. Nideffer has published extensively in the sport psychology and stress management areas, with 10 books and more than 100 articles to his credit. He has

worked with Olympic-level and professional athletes in a wide variety of sports and has been a member of policy-setting committees in the United States, Canada, and Australia.

Bruce C. Ogilvie is professor emeritus in the Department of Psychology at California State University at San Jose. Dr. Ogilvie is a world-renowned pioneer in applied sport psychology; he has researched, consulted, and published in the area of performance and the high-performance person since 1955. He has contributed more than 150 publications on issues including children in sport. identification of psychological factors that contribute to performance success, and the development of performance-enhancing strategies. Dr. Ogilvie has served as team psychological consultant for numerous U.S. Olympic teams as well as professional football, basketball, baseball, hockey, and soccer teams. He has also been a private-practice consultant for elite athletes from various sports.

Joseph B. Oxendine is currently chancellor emeritus of The University at North Carolina at Pembroke where he served as chancellor from 1989 until 1999. After competing in three sports at the college level, he played professional baseball for 3 years in the Pittsburgh Pirate minor league system. Dr. Oxendine served for 30 years at Temple University as professor, department chairman, and founding dean of the College of Health, Physical Education, Recreation and Dance. He has conducted research on practice conditions, information feedback, and the role of arousal on motor performance. He has written three books, including *Psychology of Motor Learning* and *American Indian Sports Heritage*.

Erik Peper is professor and director of the Institute for Holistic Healing Studies at San Francisco State University and is the director of the Biofeedback and Family Therapy Institute. His research focuses on biofeedback and applied psychophysiology to enhance optimal performance. He has published numerous books and articles, including Mind/Body Integration, From the Inside Out: A Self-Teaching and Laboratory Manual for Biofeedback, and Creating Wholeness: A Self-Healing Workbook Using Dynamic Relaxation, Images and

Thoughts. Dr. Peper is a consultant to musicians, artists, and athletes. He was a consultant to the U.S. rhythmic gymnastics team. He is past president of the Biofeedback Society of America.

Kenneth Ravizza is a professor in the Department of Kinesiology and Health Promotion at California State University at Fullerton. His research examines the nature of peak performance in a variety of domains. He has developed and implemented performance-enhancement programs for business groups, health care and school staffs, cancer patients, police officers, and physicians. He has worked with the Cal State Fullerton baseball, softball, and gymnastics teams for the past 15 years. Most recently, he worked with the U.S. baseball and water polo teams in the 1996 Olympics, and he currently is working with the U.S. softball team for the 2000 Olympics. He has been the sport psychology consultant for the Anaheim Angels for 12 years. He spent 3 years (1986-1988) working with the University of Nebraska football team, and he worked with the New York Jets between 1993 and 1995. The past 8 years he has done extensive work with Olympic-level figure skaters. He also has consulted with numerous athletic departments in the area of coaching effectiveness (UCLA, Texas, L.S.U., Harvard).

Robert J. Rotella is the former director of the sport psychology program at the University of Virginia. Dr. Rotella was named twice to "Outstanding College Athletes of America" and was awarded all-American honors in lacrosse. He has also coached high school basketball and college lacrosse teams. His research interests have focused on stress, anxiety, and self-confidence and sport performance. Dr. Rotella has written numerous books and articles on applied sport psychology; his books include Mind Mastery for Winning Golf, Scientific Foundations of Coaching, and Golf Is Not a Game of Perfect, Golf Is a Game of Confidence. He has also published numerous tapes and served as consultant for the University of Virginia athletic teams and professional athletes from football, basketball, baseball, and golf.

Marc-Simon Sagal is the chief operating officer of Enhanced Performance Systems. A Phi Beta

Kappa philosophy graduate from The Colorado College, Mr. Sagal received his graduate degree in sport psychology from San Diego State University. He holds a United States Soccer Federation A-level coaching license and has a wide range of international experience as both a professional player and coach. He has presented papers in the area of sport psychology and philosophy at international congresses and is the author of several publications covering both theoretical and practical issues in sport psychology. Mr. Sagal has recently coauthored a book applying the coaching model to parenting and has a work in progress with Dr. Robert Nideffer on assessment in sport psychology.

Carrie B. Scherzer is a doctoral student in clinical psychology at the University of Arizona. Ms. Scherzer received her B.A. in psychology from Concordia University and her M.S. in athletic counseling at Springfield College. Her research interests include rehabilitation from injury, stress and coping, and eating disorders. She is currently a regional student representative for AAASP.

Andrea B. Schmid is professor emeritis of kinesiology at San Francisco State University. A twotime Olympian, she received gold, silver, and bronze medals in gymnastics. She coached the 1975 U.S. world championship team and judged 13 world championships and 3 Olympic Games in rhythmic gymnastics. She has published books and articles and given lectures on sport psychology at national and international conferences. Her research focuses on optimal performance. She is a member of the Federation of International Gymnastics and is the international consultant to the U.S. Gymnastics Federation. Dr. Schmid has served as sport psychology consultant to several college athletes and the U.S. Olympic rhythmic gymnasts and synchronized swimmers.

Ronald E. Smith is a professor of psychology at the University of Washington. He received his Ph.D. in clinical psychology from Southern Illinois University. His major research interests are in personality, stress and coping, and in sport psychology research and intervention. From 1986 to 1996 he directed a psychological skills training program for the Houston Astros and has also served as a consultant to the Oakland Athletics and as team counselor for the Seattle Mariners. He is currently a training consultant to major league soccer. Dr. Smith is a fellow of the American Psychological Association and a past president of the Association for the Advancement of Applied Sport Psychology. He is the recipient of a Distinguished Alumnus Award from the UCLA Neuropsychiatric Institute for his contributions to the field of mental health. At Washington, he has served as director of clinical psychology training, as head of the social psychology and personality area, and as codirector of the sport psychology graduate training program. Dr. Smith has authored more than 100 scientific articles and book chapters, and he has authored or coauthored 15 books. Recent sport books include Children and Youth in Sport: A Biopsychosocial Perspective, Way to Go, Coach: A Scientifically-Proven Approach to Coaching Effectiveness, and Coaches Who Never Lose: A 30-Minute Primer for Coaching Effectiveness.

Frank L. Smoll is a professor in the Department of Psychology at the University of Washington (UW), where he teaches courses in the areas of sport psychology and motor development. His research focuses on coaching behaviors in youth sports and on the psychological effects of competition on children and adolescents. Dr. Smoll is codirector (with Ronald Smith) of the sport psychology graduate program, and from 1993 to 1999 he codirected a psychological skills training program for UW athletes (Husky Sport Psychology Services). Dr. Smoll is a fellow of the American Psychological Association, the Association for the Advancement of Applied Sport Psychology, and the American Academy of Kinesiology and Physical Education. While attending Ripon College, he played on championship basketball and baseball teams. Dr. Smoll is a Certified Sport Consultant (AAASP) and has extensive experience conducting psychologically oriented coaching clinics and workshops for parents of young athletes. He is actively involved as a consultant to numerous youth sport organizations.

William F. Straub is president of Sport Science International and Coordinator of Research and Special Projects, Life University, International

Sports Training Institute, Marietta, Georgia. He is actively involved in helping athletes improve their individual and team performances. A former professor of biomechanics and sport psychology, Dr. Straub spent 14 years teaching physical education and coaching interscholastic teams. He played professional baseball in the St. Louis Cardinal farm system and was a three-sport athlete in college. Straub has published extensively in scholarly journals and has edited two books. He chaired AAHPERD's Sport Psychology Academy and is a fellow of the American College of Sports Medicine, the AAASP, and the American Psychological Society. As a consultant, Dr. Straub has worked for Colgate University, Life University, Cornell University, SUNY-Cortland, the Washington Redskins, Adirondack Red Wings, the Philadelphia Eagles, and the Syracuse Crunch.

Jim Taylor has been a consultant to the U.S. and Japanese ski teams, the U.S. Tennis Association, and the American Water Ski Association. He has worked with many recreational, junior-elite, collegiate, world-class, and professional athletes in tennis, skiing, golf, football, baseball, hockey, track and field, swimming, volleyball, water skiing, and other sports. His clients include athletes from the NFL, NBA, MLB, PGA, ATP, and WTA. Jim received his bachelor's degree from Middlebury College and earned his M.A. and Ph.D. in psychology from the University of Colorado. He is a former associate professor and director of sport psychology in the School of Psychology at Nova University in Ft. Lauderdale. A former alpine ski racer who held a top-20 national ranking and competed internationally, Jim is a United States Professional Tennis Association certified teaching professional, and a second degree black belt and certified instructor in karate. He is also a marathon runner and squash player. Jim has published more than 220 articles in popular and professional publications and has given more than 300 workshops and presentations throughout the United States, Canada, and Europe. He is also the author of seven books including the Mental Edge book series, Psychology of Dance, and Psychological Approaches for Sports Injury Rehabilitation.

Galen Trail is an assistant professor of sport management in the Health and Human Performance Department at Iowa State University. One of his areas of research is organizational behavior, specifically the impact of leadership on team dynamics and outcomes. Dr. Trail earned his Ph.D. in Sport Management at The Ohio State University where he also taught classes in coaching theory and skill development. He has coached four different sports (volleyball, basketball, baseball, and soccer) at a variety of different levels from youth leagues to intercollegiate athletics.

Darren Treasure is an associate professor of sport and exercise psychology in the Department of Exercise Science and Physical Education at Arizona State University. He received his Ph.D. in Kinesiology in 1993 at the University of Illinois at Urbana-Champaign. Dr. Treasure has published more than 30 scientific articles and book chapters focused on the topic of motivation in sport and exercise. He is currently a consultant with Arizona State University Department of Intercollegiate Athletics and a number of Olympic and professional athletes in a wide range of sports. Darren is also the national coordinator for the sport psychology component of the United States Soccer Federation coaching education licenses. Dr. Treasure currently serves on the editorial board of The Sport Psychologist.

Robin S. Vealey is a professor in the Department of Physical Education, Health, and Sport Studies at Miami University in Ohio. Dr. Vealey's research interests include competitive activation and burnout; self-confidence in sport; coaching behavior; and mental skills training. She has served as a sport psychology consultant for the U.S. Nordic ski team, conducted clinics for U.S. field hockey, and is involved in psychological skills training with athletes and teams at Miami University and in the Cincinnati area. Dr. Vealey is a fellow, certified consultant, and pastpresident of AAASP, past editor of The Sport Psychologist, and a national instructor for the American Sport Education Program. A former collegiate basketball player and coach, she now enjoys the mental challenge of golf.

Robert S. Weinberg is a professor in the Department of Physical Education, Health, and Sport Studies at Miami University in Ohio. He has published more than 125 journal articles as well as 6 books and 18 book chapters. He serves on the editorial boards of several sport psychology journals, including the Journal of Sport and Exercise Psychology and the International Journal of Sport Psychology. In addition, he is currently editor-inchief of the Journal of Applied Sport Psychology. He has served as president of AAASP and NASPSPA and chair of the AAHPERD Sport Psychology Academy. He is a certified consultant of AAASP and a member of the U.S. Olympic Committee's Sport Psychology Registry. He has worked extensively with young athletes developing psychological skills in a variety of individual and team sports. He has been a varsity athlete in tennis, football, and basketball and has coached these three sports.

Vietta E. "Sue" Wilson is a professor at York University who teaches sport psychology at the undergraduate and graduate level as well as self-regulation and counseling courses. She is a certified biofeedback therapist and neurotherapist. Her current research is on EEG of imagery of elite athletes. She has worked with a variety of sports and from the level of novice to Olympic and world champions. Sue delivers performance enhancement services to corporations, counseling, and medical clinics. She was an athlete and coach in three sports, taught courses for the Canadian Government Coaching Certification Program, and remains active helping amateur athletes on the local level.

David P. Yukelson is the coordinator of applied sport psychology services for all 29 intercollegiate athletic teams at Penn State University. A mental training specialist interested in the psychology of excellence, he provides counseling and support to coaches and athletes in the areas of mental preparation strategies for training and

competition, motivation and self-confidence, goal setting, visualization techniques, concentration focusing skills, and how to remain mentally tough and poised under pressure. Dave also offers support and assistance to individuals having difficulty coping with athletic injury, managing time or stress effectively, making the transition from high school to college smoothly. or balancing academic, athletic, and personal needs effectively. In addition to individual counseling he also offers educational programs for teams in the areas of group cohesion and team building, group motivation and team leadership. how to communicate more effectively, and mental training strategies for peak performance in sport. A fellow and certified consultant of AAASP, he has published numerous articles and serves on the editorial boards of several sport psychology journals, including the Journal of Sport and Exercise Psychology and the Journal of Applied Sport Psychology. His research interests include group cohesion and team building, individual and group motivation, goal setting, issues that affect student-athlete welfare, and psychosocial considerations and the injured athlete.

Nate Zinsser is director of the Performance Enhancement Program for the Center for Enhanced Performance at the United States Military Academy. He supervises a team of sport psychology trainers and conducts team and individual training for 600 cadet-athletes each year. Dr. Zinsser also provides sport psychology services to the U.S. Army's world class athlete program. He is an AAASP certified consultant and member of the USOC Sport Psychology Registry. Dr. Zinsser is the author of Dear Dr Psych, the first sport psychology guidebook for youth sport participants, and he contributed a sport psychology advice column to Sports Illustrated for Kids for 5 years. His formal training in sport psychology from the University of Virginia is complemented by his experience as a state wrestling champion, worldclass mountaineer, and third degree black belt in karate.

Preface xi Contributors xv

1 Sport Psychology: Past, Present, Future 1

Jean M. Williams, William F. Straub

History of Sport Psychology in North America 2 History of Sport Psychology in Eastern Europe 6 Future Directions in North American Applied Sport Psychology 7

PART ONE—LEARNING, MOTIVATION, AND EFFECTIVE LEADERSHIP

2 Motor Skill Learning for Effective Coaching and Performance 13 Mark G. Fischman, Joseph B. Oxendine

Motor Learning Defined 13
Phases of Motor Skill Learning 14
Practice Considerations 17
Feedback: Its Functions and Use in Skill Learning and Performance 21

3 Positive Reinforcement, Performance Feedback, and Performance Enhancement 29

Ronald E. Smith

The ABCs of Behavior Control 30
Positive and Aversive Approaches to Influencing Behavior 31

Positive Reinforcement: Getting Good Things to Happen 33

Performance Feedback 38

4 Toward Optimal Motivation in Sport: Fostering Athletes' Competence and Sense of Control 43

Joan L. Duda, Darren C. Treasure

Believing That One Can: The Construct of Self-Efficacy 44

Explaining Our Sport Successes and Failures: The Importance of Attributions 47

Doing It for the Joy: The Determinants of Intrinsic Motivation 49

Achievement Goals: The Importance of How We Judge Our Competence 52

5 The Self-Fulfilling Prophecy Theory: When Coaches' Expectations Become Reality 63

Thelma Sternberg Horn, Curt L. Lox, Francisco Labrador

The Expectation–Performance Process 64

Sport Applications 71

Behavioral Recommendations for Coaches 77

6 Leadership Effectiveness 82

Mimi C. Murray, Betty L. Mann

What Is Leadership? 83
Leadership Theories and Implication 83
Women in Sport 94
How Leaders Can Increase Their Influence or Power 97
Developing Leadership Within the Team 99
Developing Morale Within the Team 100
Ethical Leadership 101

7 Styles of Decision Making in Coaching 107

P. Chelladurai, Galen Trail

Decision-Making Processes 107
Confounding Factors 108
Participative Decision Making 109
A Normative Model of Decision Styles in
Coaching 111
Research on Decision Styles in Coaching 112
Future Research 116

PART TWO—SOCIAL INTERACTIONS

8 The Sport Team as an Effective Group 120

Albert V. Carron, Paul W. Dennis

The Nature of Groups 121 Group Cohesion 123

Developing a Team Concept: Correlates of Cohesion 124 Team Building 130

9 Communicating Effectively 135

David P. Yukelson

Communication Defined 135
Communication in Sport 137
Communication and Groups 139
The Sport Psychologist as a Skilled Helper 144

10 Coach-Parent Relationships in Youth Sports: Increasing Harmony and Minimizing Hassle 150

Frank L. Smoll

Developmental Versus Professional Models of Sport 151 Objectives of Youth Sports 151 Parents' Responsibilities and Challenges 152 Two-Way Communication 154 The Coach–Parent Meeting 156

PART THREE—MENTAL TRAINING FOR PERFORMANCE ENHANCEMENT

11 Psychological Characteristics of Peak Performance 162

Jean M. Williams, Vikki Krane

Overview of Peak Performance 163 The Peak Performance Psychological Profile 163 Limitations of Peak Performance Research 173

12 Increasing Awareness for Sport Performance 179

Kenneth Ravizza

The Importance of Awareness in Athletics 180 Awareness as It Relates to Skill Development 180