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BEHAVIOR PRINCIPLES IN EVERYDAY LIFE

SECOND
EDITION

Second Edition

BEHAVIOR PRINCIPLES IN EVERYDAY LIFE

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Prentice-Hall Englewood Cliffs, N.J. 07632

Library of Congress Cataloging in Publication Data

BALDWIN, JOHN D. (date)

Behavior principles in everyday life.

Bibliography: p.

Includes indexes.

1. Behaviorism (Psychology) 2. Psychology, Applied.

I. Baldwin, Janice I. II. Title.

BF199.B28 1986 150.19'43 85-9534

ISBN 0-13-074238-4

Editorial/production supervision
and interior design by Eva Jaunzems
Cover design by Ben Santora
Manufacturing buyer: Barbara Kelly Kittle

© 1986, 1981 by Prentice-Hall
A Division of Simon & Schuster, Inc.
Englewood Cliffs, New Jersey 07632

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Printed in the United States of America

20 19 18 17 16 15 14 13 12 11

ISBN 0-13-074238-4 01

Prentice-Hall International (UK) Limited, *London*
Prentice-Hall of Australia Pty. Limited, *Sydney*
Prentice-Hall Canada Inc., *Toronto*
Prentice-Hall Hispanoamericana, S.A., *Mexico*
Prentice-Hall of India Private Limited, *New Delhi*
Prentice-Hall of Japan, Inc., *Tokyo*
Prentice-Hall of Southeast Asia Pte., Ltd., *Singapore*
Editora Prentice-Hall do Brasil, Ltda., *Rio de Janeiro*
Whitehall Books Limited, *Wellington, New Zealand*

***This book is dedicated to B. F. Skinner,
George Homans, Albert Bandura, J. F. Scott,
and the many others who have pioneered in
applying behavior principles to everyday life.***

Preface

The first edition of *Behavior Principles in Everyday Life* was a preliminary attempt to present the basic principles of operant and Pavlovian conditioning, along with social learning theory and cognitive behaviorism, as they apply to everyday life. Four years later, we are fortunate to be given the opportunity to extend and refine the type of behavior analyses begun in the first edition. The new edition contains a larger number of behavior principles than the first edition, and it develops them more clearly and in more subtle detail. There is significantly increased attention to such important topics as the interaction of operant and Pavlovian conditioning, antecedents as predictive stimuli, compound schedules, behavioral contrast, concurrent schedules and choice, reasoning, emotions, intermittent reinforcement, cumulative records, the law of effect, behavior modification, self-control, habituation, recovery effects, vicarious emotions and vicarious conditioning, rehearsal and covert conditioning, internal motivation, learned helplessness, and many other topics. *All the principles are presented in italics to aid the reader in identifying the key material.*

In addition, we have shifted the style of the examples in order to deal with a broader range of everyday life events. The second edition contains a much larger number of short and succinct examples that illustrate the behavior principles quickly and lucidly. We have reduced the number of long examples, especially when their length may have obscured the main points. The shift to shorter examples has allowed us to cover a larger range of topics, which helps students learn more of the behavior principles and apply them to a greater variety of interesting events.

* * * *

The extension of behavior science to everyday life has the potential to advance behavior science in the areas of training, research, therapy, and theory. *First, studying behavior principles in natural settings helps students learn how to apply the principles of behavior to a broad range of different behaviors and different contexts.* When students study behavior principles with examples from laboratory or clinical research, they sometimes fail to learn how the principles apply to all behavior. Although they have acquired a verbal repertoire for describing and analyzing laboratory or clinical examples, their skills may not be applicable to behavior outside the laboratory or clinical setting, and they may fail to understand the applicability of behavior science to all forms of behavior. Studying behavior principles in everyday life facilitates the generalization of analytic skills to a large number of different behaviors and different settings. It also helps students better understand the principles and appreciate their power, utility, and relevance.

Second, both laboratory and clinical research can be broadened and enriched by focusing increased attention on the complex behaviors and controlling variables seen in natural environments. Studying the behavior patterns seen in everyday life raises countless questions about behavior and its multiple controlling variables, which often suggest research topics that are valuable in laboratory and clinical studies. Once students of behavior learn to apply behavior principles to both natural environments and research environments, observations in each type of setting can expand their understanding of behavior in the other environment and stimulate more questions, more hypotheses, and more theories about behavior in general.

Third, the study of behavior principles in everyday life can increase the effectiveness of behavior therapy. A primary goal of therapy is to produce behavioral gains that persist in the client's natural environment. However, generalization is often inadequate—especially when therapists focus primarily on behavior change in the therapeutic setting and neglect differences between that setting and the client's natural environment. The generalization and maintenance of behavior change must be programmed—not left to chance.¹ In order to increase generalization, behavior therapists must be knowledgeable about behavioral variables in natural environments and design programs that bridge the gap between therapeutic and natural settings. For example, treatment gains that are produced with artificial reinforcement, contrived models, or unnatural rules are not likely to generalize to natural environments unless behavior is gradually shifted to more natural forms of reinforcement, models, and rules. This book will make it easier for counselors and therapists to identify behavior variables in natural contexts and design the steps needed to ensure generalization.

Fourth, continued efforts at making careful, objective, scientific observations of everyday behavior will provide naturalistic data that can expand both the theoretical and applied branches of behavior science. Data on the complicated events seen in the natural environment are valuable in understanding complex behavior patterns and solving the types of problems found outside the laboratory and clinic—for example, in family relations, education, business, industry, complex organizations, community and local government, politics, social welfare, juvenile delinquency, crime, and so forth. By expanding

¹Birnbaum (1976); Goldstein and Kanfer (1979); Goetz et al. (1979, 1981); Costello (1983).

behavior science to deal with the complexities of natural environments, it should be possible to develop increasingly effective means of applying behavior principles to important problems at the individual and societal levels.²

Fifth, the careful extension of behavior principles to the natural environment can benefit all the academic disciplines that study human behavior—psychology, sociology, anthropology, political science, business, education, history, etc. For people in disciplines that deal with naturally occurring behavior, behavior science is more relevant, more easily learned, and more readily applied when presented with examples from everyday life than with examples from laboratory and clinical research.³ In addition, the type of analysis presented in this book may help in developing an empirically grounded theory that can unify the work done in the different academic disciplines that deal with human behavior in natural environments. Each discipline has developed specialized theories for dealing with its own core subject matter; but few have produced theories with as much potential for unifying all the disciplines as has behavior science. The behavioral analysis of everyday life can facilitate the broader use of behavior science because it fuses experimental research and observations in natural environments. It deals equally well with both individual behavior and social behavior. It includes both overt actions and private events—thoughts, feelings, emotions. And it is well suited to explaining the interaction of behavior and societal-ecological factors, tracing changes in both behavior and environments as each component of the interactive system evolves and changes over time.⁴

* * * *

Much of the inspiration for writing and improving the book has come from teaching bright and inquisitive students whose intellectual curiosity has stimulated our own thought and study. We thank all those students for their questions, suggestions, and enthusiasm. We also thank Professor Jay Alperson of Palomar College, Professor Thomas E. Billimek of San Antonio College, Professor David C. Meissner of Alfred University, and Professor Kenneth N. Wildman of Ohio Northern University for their careful reading of this text in manuscript and for their helpful comments and criticism. Finally, we would like to express our gratitude to Ed Stanford and John Isley for their willingness to publish a book that attempts to advance behavior science in a new direction.

J. D. B.

J. I. B.

²Mead (1934), Skinner (1953), Staats (1975) and other behaviorists have shown considerable interest in applying behavior science to both individual and societal problems.

³Psychodynamic theory has been applied to several fields, in part because it deals with human behavior and has been easily accessible to students and scholars in many disciplines.

⁴Staats (1975); Baldwin (in press).

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1

Science and Human Behavior

- *In this chapter you will learn about behavior science: its main goals, its origins in laboratory research, and the benefits of extending behavior science to deal with everyday life.*

People have always been curious about their own behavior, their relationships with others, and the countless intricacies of everyday life. Given the enormous complexity of human behavior and social interactions, it can be very difficult to identify the basic principles that explain everyday behavior if one works only from the data of daily experience. The main premise of this book is that the basic behavior principles developed through the experimental analysis of behavior can be of great assistance in understanding and explaining human behavior in natural settings. Our goal here is to explain these principles in a way that is easy to grasp and useful in understanding much of everyday life.

The two main reasons for applying behavior principles to everyday life are increased understanding and practical benefits. First, the inquisitive individual finds life full of intriguing questions. “Why do I feel happy one day and sad the next?” “Why are some people creative or cheerful, whereas others are not?” “Why do some parents do so much better than others in raising their children?” There are countless other important issues that come up every day throughout life. Questions about human behavior have probably occupied people’s attention more than questions about the sun, stars, weather, plants, or animals; but the answers have been slower in coming. Because the sciences of physics, chemistry, and

biology developed before the behavior sciences, most people know more scientific information about the physical and biological world than they do about behavior. The behavior sciences have only begun to blossom in the present century, and most people still do not know the basic behavior principles that have been well documented in the past several decades. However, in recent years, things have been changing. Now that the behavior sciences have developed a body of well-established principles, they too are beginning to have an influence beyond the laboratory. Behavior principles are being used increasingly in therapy, education, child rearing, marital counseling, self-control, business, and government. Behavior science is coming of age. This book extends the range of behavioral applications to include everyday life. It will allow the inquisitive individual to use scientific guidelines to help answer the questions that have always been the most interesting: "Why do we behave the way we do?"

Second, there are practical benefits for applying behavior principles to everyday life. As people gain information about their own behavior, they are in a better position to direct their own lives, change things they do not like, and accomplish things that otherwise might have been beyond their reach. In addition, an increased knowledge of behavior principles as they operate in social interactions can allow people to develop greater sensitivity to others, learn to improve the quality of their behavior in interactions, and create more rewarding relationships. The behavior principles discussed in this book can also help people become more playful and creative, convert aversive social interactions into positive ones, gain greater control over their own thoughts and actions, and much more. Behavior science is pushing back the shroud of mystery that has long surrounded much of human behavior, enabling ever more people to benefit from improving the quality of their own behavior and their social relations.

Human behavior is, for the most part, learned behavior. Most people learn only a small portion of the skills, talents, and sensitivities that they could learn. They develop only a fraction of their human potential. If they knew more about the basic principles of learning, they could develop considerably more of their capacities. The principles presented in this book explain how behavior is learned and modified. Knowledge about the behavior principles can help people learn new behavior faster, more easily, and in a more rewarding manner than is otherwise possible. For this reason alone, behavioral science is one of the most important of the sciences: It gives people the intellectual tools they need to make learning and developing their human potential a rewarding and fulfilling experience.

A GROWING SCIENCE

Behavior science is concerned with all of human behavior: talking, making love, eating submarine sandwiches on summer picnics, painting canvases, selling real estate, learning new things, forgetting old things. Everything that we do—even thinking and fantasizing—is behavior,¹ and behavior science provides powerful tools for explaining why we behave as we do.

¹Mead (1934), Skinner (1969; 1974), Mahoney (1974), Meichenbaum (1977), and many other behaviorists include thinking as a behavior that must be analyzed in any comprehensive theory of human behavior. "An adequate science of behavior must consider events taking place within the skin of the organism, not as physiological mediators of behavior, but as part of behavior itself" (Skinner, 1969:228).

We are surrounded by and involved with behavior all the time; yet few people attain a good grasp of the fundamental principles that explain behavior. We are so close to behavior at all times that we often cannot see the forest for the trees. We know individuals and their idiosyncrasies so well that we often fail to see the broad patterns that underlie all behavior. To understand the universal principles of human behavior, it has been useful to draw upon laboratory research based on the experimental analysis of behavior.

Behavioral science emerged in the early 1900s as a reaction to the unscientific, introspective psychological theories of the times. *From the beginning, the main goal of behavior science has been to develop an empirical study of behavior based on objective observations of both behavior and its controlling variables.* Much of the early behavioral work was conducted in the laboratory where accurate, reliable experimental research could be done under controlled conditions. In order to locate the basic principles, simple behavior patterns were selected and studied under simplified environmental conditions. Over the decades, increasingly more complex laboratory experiments became possible and the original behavior principles were elaborated and extended to cover increasingly complex behavior patterns. As the behavior principles became better understood, it was possible to extend learning theory beyond the laboratory to clinical applications and to the natural environment. The *Journal of Applied Behavior Analysis* was established in 1968 to publish the results of applied research in natural settings, and its success is evidence of the utility of extending behavior analysis to everyday life. Ethology—the European school of animal behavior research—has also stimulated much interest in the study of behavior in natural contexts.

These multiple influences have expanded modern behavioral science beyond its original emphasis on laboratory research. The study of everyday life is one of the newer branches of the discipline. All behavior scientists share a deep commitment to conducting accurate, objective analyses of behavior. The major change resulting from the new emphasis on observing behavior in natural settings has been an increased attention to complex behavior patterns along with the process of behavioral development and socialization through which these patterns are learned.

The natural environment is considerably more complex than laboratory environments.² Multiple factors operate simultaneously and produce numerous interaction effects that are usually not created or studied in the laboratory. It is true that studying behavior in natural contexts forces the observer to relinquish the experimental control and simplified conditions that make laboratory studies so powerful. *However, the extension of behavioral science to the natural environment is essential for understanding how the behavior principles apply to everyday events and how they can be used most effectively to solve problems at both the individual and societal levels.* Skinner, Homans, Bandura, Scott, Wolf, Burgess, Kunkle, Baer, Mahoney, Meichenbaum, Akers, and many others provide models for extending behavior analyses to real world problems in government, education, therapy, aggression, crime, self-control, moral behavior, and so forth. If there is a loss of laboratory control, there is a compensating gain in relevance.

In one sense, the behavioral analysis of everyday life parallels astronomy, while

²To some, the problems of studying behavior in the natural environment appear so formidable that they would not attempt it themselves. However, both laboratory and field studies have their strong points, and each can complement the other nicely to provide a better overall understanding of behavior (Bandura and Walters, 1963:39f; Mason, 1968).

laboratory forms of behavioral science parallel laboratory physics.³ Both astronomy and laboratory physics study the physical world and their theories dovetail nicely. But astronomy relies on careful observation of the remote skies and natural experiments rather than on experimental manipulation of carefully controlled variables in the laboratory. In spite of the absence of laboratory control, astronomy has flourished. It was the first of the modern sciences to blossom during the Renaissance, and careful observations of the stars continue to yield data that shape the development of theory in contemporary physics. The behavioral study of everyday life—based on careful observation and natural experiments—has the potential to yield valuable information on complex natural behavior patterns and to hasten the development of the behavioral sciences.

Louis Pasteur—the French scientist who applied his knowledge of chemistry and biology to many everyday problems—said, “In the fields of observation, chance favors only the mind that is prepared.” The world around us provides a constant source of interesting examples of natural behavior. Yet most people are not prepared to “see” the intriguing principles that are operating constantly, right before their eyes. The behavior principles derived from laboratory research prepare us for making sensitive observations of everyday life.

This book is designed to make the basic principles of behavior science easy to understand and easy to apply to all types of daily events. Hundreds of examples have been selected from everyday life to illustrate the various principles. The book builds from the most basic of the behavior principles in early chapters to encompass ever more subtle considerations. Because the basic principles in the first several chapters provide the foundations on which all later principles are constructed, the reader will immediately see in the early chapters some of the most powerful of generalizations about behavior along with their applications to meaningful daily events. The later chapters develop the additional empirical generalizations needed to understand the full range of human experience. The final chapters provide information of special importance in making life more positive and giving people better control over their own thoughts and actions. To help the reader identify and master the key ideas, all the important principles are accentuated by the use of bold or italic print. We have attempted to make the book both sensitive and scientific, based on the belief that science can be one of the most useful and humanistic ways of understanding and dealing with the complexities of the world in which we live.⁴

³Comparing the behavioral study of everyday life with astronomy (because neither has access to laboratory controls) is not an excuse for not making careful, scientific observations. Astronomy has flourished *because* of its detailed observations, precision, and willingness to interface with laboratory data in multiple areas. When controls and natural experiments are available, astronomers are eager to use them; however, astronomers do not give up their work merely because they cannot obtain the control possible in the laboratory. The special data and insights available from the natural environment are worth the extra effort needed to make naturalistic observations, even when the controls of laboratory experiments are not possible.

⁴Bronowski (1965; 1977).

CONCLUSION

The purpose of this book is to present the principles of behavior in a manner that will facilitate their application to everyday life. Knowledge of the behavior principles as they operate in everyday life can help people understand more of their own lives and help them improve the quality of their behavior and social relationships. The behavioral analysis of everyday life is a natural outgrowth of a science that began with laboratory research, then was extended to clinical applications, and more recently has been expanded to applied behavioral research in natural settings. Continuing this line of development to include the behavioral analysis of everyday life can potentially advance behavior science and other academic disciplines dealing with human behavior.