Book abstract –

Each year, millions of people resolve to take better care of their health and almost a billion medical visits take place. Yet as many as half of these visits result in patient nonadherence, and most people who successfully begin necessary health-behavior changes fail to maintain them. Healthcare professionals often struggle to provide their patients with the tools necessary for successful maintenance of healthy behavior.

This book synthesizes the results from an overwhelming number of empirical research articles on adherence and health behavior change, providing simple, powerful, and practical guidance for health professionals. A set of effective, evidence-based strategies for putting long-term health-relevant behavioral changes into practice includes the straightforward, 3-ingredient, Information-Motivation-Strategy model that has been supported by decades of outcomes research. In order to change, individuals must: (1) know what change is necessary (information); (2) desire the change (motivation); and then (3) have the tools to achieve and maintain the change (strategy). Numerous clinical examples illustrate the important practice principles offered.

"Health Behavior Change and Treatment Adherence" brings together major research findings in a succinct, readable, practical, and usable format for making real changes. Written for a wide variety of practitioners and students including those in medicine, chiropractic, osteopathy, nursing, health
education, physician assistant programs, dentistry, clinical and health psychology, marriage and family counseling, social work, school psychology, and care administration. This book is also for anyone who wishes to take an active role in their health.

Keywords: adherence, health, health behavior, behavior change, healthcare

Chapter 1 abstract – Understanding Behavior Change: The Theory Behind Informing, Motivating, and Planning for Health

This chapter reviews theoretical models that have guided thinking and research on health behavior change, providing an historical perspective on major developments in the field. Included in this overview are the Health Belief Model, Theory of Reasoned Action, Theory of Planned Behavior, Transtheoretical Model of Change, Social-Cognitive Models, Precaution-Adoption Process Model, and the Information-Motivation-Strategy Model. The contexts in which these models have been tested are described, along with their effectiveness as demonstrated by the empirical literature. Examples for practical application are also provided, as are caveats and information about contexts in which these models (or portions thereof) are not well supported.

Keywords: behavior change, Health Belief Model, Theory of Reasoned Action, Theory of Planned Behavior, Transtheoretical Model of Change, Precaution-Adoption Process, Information-Motivation-Strategy Model

Chapter 2 abstract – Persuading and Motivating Positive Health Behaviors

This chapter explores the factors that influence people to initially adopt, and then to pursue, a health-related goal. These include things such as social comparisons, emotions (e.g., fear or inspiration), logical reasoning, pressure from others, and a sense of self-efficacy. The most appropriate uses of upward and downward comparisons are examined, and the importance of one’s sense of competence and self-esteem when setting goals is discussed. The elements of persuasive messages (and messengers) are described, along with suggestions for how healthcare providers might make their own communications with patients more compelling. Recognizing teachable moments is important, as is knowing the unique characteristics of the patient in order to target persuasive messages most effectively. Factors that influence perseverance, such as expectations, optimism, self-efficacy, social support, and perceptions of benefits and costs are also evaluated.

Keywords: social comparison, self-efficacy, self-esteem, persuasion, teachable moment, optimism, social support

Chapter 3 abstract – Understanding and Remembering

This chapter begins with an overview of the encoding, storage, and retrieval of memories. Important to the encoding process are attention, focus, understanding, and the agility of working memory. The role of emotion in memory storage is reviewed, with examples of how heightened emotion can enhance memory, or may interfere with it, if the emotion is too strong. Factors that bias our recall (such as cultural and other experiential elements, as well as the tendency toward self-enhancement) are reviewed, along with other characteristics (e.g., age, gender, lack of sleep) that are sometimes thought to be related to memory. Strategies for enhancing memory are given, including: tailoring the information to the patient’s characteristics, considering health literacy; avoiding jargon and information overload; mnemonics and chunking; and multi-media memory aids.

Keywords: memory, emotion, culture, self-enhancement bias, age, health literacy, jargon, mnemonic, tailored messages
Chapter 4 abstract – Improving Health Through the Development and Management of Habits

The ways in which healthy habits are formed and maintained over time, as well as the ways in which health-harmful habits can be extinguished, are the topics of this chapter. The principles of classical conditioning as they relate to health behaviors are reviewed. Then, following the operant conditioning framework, the important elements of reward (and punishment) are discussed, along with the advantages and limitations of various schedules of reinforcement. Included in this section are many practical suggestions for incorporating habit-changing tools into one's daily routine, and a discussion of common barriers encountered by those attempting to change their habits—and how to overcome these barriers. The utility of external commitments (e.g., behavioral contracts and contingency contracts) are reviewed, along with the potential risks associated with external techniques (such as the reduction of intrinsic motivation). The importance of social support, choosing supportive environments, self-monitoring, and being mindful are highlighted.

Keywords: habits, mindfulness, classical conditioning, operant conditioning, reward, reinforcement, behavioral contract, contingency contract, intrinsic motivation, social support, self-monitoring

Chapter 5 abstract – Evaluation of Risks, Decision-Making, and Outcomes

Few people conduct a truly thorough and thoughtful evaluation of the evidence before they make a health-related decision. This chapter describes and evaluates strategies for making decisions based on empirical evidence. It then overviews the elements that are needed in order to understand health and medical risk information (e.g., Bayesian methods, odds ratios, risk ratios, survival analyses and hazard ratios) as that information is typically presented in medical journals, scientific articles, news reports, and advertisements. The relative power of aggregated data (through meta-analysis) is also discussed. Evidence supporting the crucial role of the patient in decision-making is reviewed, and specific tools that can be used in decision-making are presented (e.g., decision trees, PREPARE™).

Keywords: decision-making, Bayesian, odds ratio, risk ratio, survival analysis, hazard ratio, meta-analysis, decision tree, PREPARE™

Chapter 6 abstract – Relationships and Communication Between Caregivers and Patients

This chapter reviews four basic models for understanding the patient-practitioner relationship: paternalistic, expert, consumerist, and mutual. While some aspects of communication are well-predicted by factors such as patient age and socioeconomic status, other elements are highly individualized within each dyad. The quality and content of communication is influenced by many factors, including the physical environment (e.g., light, toys, plants) in which the communication occurs; aspects of the verbalizations (e.g., open-ended questions, interruptions, jargon), and nonverbal factors (e.g., facial expressions, posture, body movements). Both verbal and nonverbal channels are used to communicate distress, pain, and the desire for active partnership in the healthcare process, as well as to convey empathy.

Keywords: paternalism, expert, consumerist, mutuality, physical environment, open-ended questions, interruption, jargon, nonverbal, distress, partnership, empathy

Chapter 7 abstract – Effective Collaboration with Patients – On a Tight Schedule

Brief office visits pose a clear challenge to the delivery of effective healthcare. Keeping the information-motivation-strategy model in mind, this chapter reviews how a division of labor among members of the healthcare team and the utilization of technology can help make the most of medical interactions. It is not
enough to simply have appropriate staffing; well-defined goals for individual team members, adequate training, and effective communication are all crucial to the efficient functioning of the healthcare team. A productive medical encounter can be promoted with pre-appointment counseling and a careful setting of the agenda for the visit. Interactive health communication systems (such as for obtaining test results or modifying appointments) along with things such as electronic medical records can dramatically increase the efficiency of the medical interaction. Technology can also be used to create virtual support groups, to provide follow-up, and to encourage adherence; some of the benefits and hazards associated with these technologies are reviewed.

Keywords: healthcare team, technology, pre-appointment counseling, agenda-setting, interactive health communication, electronic medical record

Chapter 8 abstract – Partnering for Adherence in the Healthcare System

Successful adherence is influenced by many factors, including disease type, the complexity of the regimen, patient resources, system-level barriers, the clinician-patient relationship itself, and various cultural beliefs and experiences. Approximately one fourth of patients fail to follow their prescribed treatment regimens, and the focus of this chapter is on understanding the barriers to adherence, with an eye toward strategies that promote adherence (e.g., simpler regimens, clear explanations, accurate understandings of likely side effects, strong social support networks, fostering patient autonomy and self-efficacy, partnering with patients, ensuring access to care). Multifaceted interventions to improve adherence are most effective.

Keywords: regimen complexity, system-level barriers, adherence, barriers to adherence, social support, autonomy, self-efficacy, access to care