

# ■ BOOK REVIEWS ■

## ■ Neurobiological Foundations for EMDR Practice, Second Edition

Uri Bergmann. New York, NY: Springer Publishing Company, 2020, 288 pages, \$56.12 (paperback)

Dr. Bergmann's first edition of this book was written in 2012. At that time, it was the first book to comprehensively integrate the most current research in information processing, consciousness, chronic trauma, and autoimmune disorders with implications for the adaptive information processing (AIP) theoretical model and EMDR therapy. The purpose of this second edition is to present new neuroscientific and psychological research related to disorders of attachment, traumatic stress, and information processing, highlighting neuroscience's more contemporary understandings of emotions, the significance of mirror neurons, affective resonance, and the influence of neuroplasticity on the changes in cognition, behavior, and emotion.

Throughout the book, Dr. Bergmann emphasizes the value of understanding the neurobiological foundations that inform our theories of human development, attachment, and information processing. In so doing, we gain greater understanding of our clients' symptoms and their relationship to stress, trauma, and immune function, and can provide a more comprehensive treatment approach utilizing EMDR therapy.

The first chapter, "Introduction to Consciousness and EMDR," lays a foundation to guide the reader through more in-depth explorations that follow in subsequent chapters, covering consciousness, cellular communication, models of information processing, neurobiological perspectives in human development, disorders of consciousness, trauma, and hyperimmune disorders. There are 20 additional immunoinflammatory illness syndromes examined in this edition.

Dr. Bergmann views EMDR's sensory input to the brain as a catalyst to help repair dysfunctional neural circuitry. Each phase of the protocol is described as it relates to a neurobiological understanding presented in previous chapters. A case example was integrated throughout to help the reader understand how a client's neurobiological response showed up in treatment.

The author's writing style is clear and concise, with analogies that bring to life the complex operations of our brain's communication system. For example, when he describes the operating system of the brain like an orchestra creating resonance in its musical expression, the analogy gives a clear, vivid example of how neurobiological resonance is created. The book can seem dense in terms of describing consciousness, brain functions, cellular communication, and immune system functions, to the point where this reader felt the need to re-read certain sections to more fully understand what was being explained. It was apparent the author made efforts at the end of sections to comment on how this information would be addressed and integrated later in the book, which provided the reader with a sense of how sections came together.

This book is not a quick read, yet well worth the time and effort. It provides updated evidence of neuroscience's leanings toward emotions as being biological and complex, right-hemisphere neural networks holding the key to unlocking blocks in communication between the body and mind. The author emphasized how the relational component in the therapeutic alliance can activate a "right brain to right brain transference-countertransference" treatment effect, thus the clinician is an interactive regulator of the client's psychobiological affective states.

Due to Dr. Bergmann's extensive history as an EMDR clinician, his passion to explore more in-depth understandings of consciousness as it relates to the healing potentials of EMDR therapy was evident. The integration of this work into EMDR practice will be useful for EMDR clinicians. The majority of the book provides a meaningful and comprehensive view of our emerging understanding of consciousness and neurobiology in a way that all students of neuroscience and psychology would benefit from it.

REVIEWED BY SARA GILMAN