

Notes and References

INTRODUCTION

1. I tried to make the terms “reason,” “rationality,” and “decision making” as unambiguous as possible, but I must caution that their meanings are often problematic, as discussed at the beginning of Chapter 8. This is not just my problem or the reader’s. A contemporary dictionary of philosophy has this to say about reason: “In English the word “reason” has long had, and still has, a large number and a wide variety of senses and uses, related to one another in ways that are often complicated and often not clear. . .” (*Encyclopedia of Philosophy*, P. Edwards, ed., 1967, New York: Macmillan Publishing Company and the Free Press.)

Be that as it may, the reader will probably find my use of the terms reason and rationality quite conventional. I generally use reason as the ability to think and make inferences in an orderly, logical manner; and rationality as the quality of thought and behavior that comes from adapting reason to a personal and social context. I do not use reasoning and decision making interchangeably since not all reasoning processes are followed by a decision.

As the reader will also discover, I do not use emotion and feeling interchangeably either. In general, I use emotion for a collection of changes occurring in both brain and body, usually prompted by a particular mental content. Feeling is the perception of those changes. A discussion of this distinction appears in Chapter 7.

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CHAPTER 1

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4. See note 3 above (Bigelow).
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CHAPTER 2

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CHAPTER 3

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CHAPTER 5

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18. The substrate of the rapid and dramatic changes in circuit design that seem to occur, include the wealth of synapses to which I previously alluded, enriched by the variety of neurotransmitters and receptors available at each synapse. The characterization of this plastic process is outside the scope of this text, but the account provided here is compatible with the idea that it largely occurs by selection of circuitries at synaptic level. The application of the notion of selection to the nervous system was first suggested by Niels Jerne and J. Z. Young and used by Jean Pierre Changeux. Gerald Edelman has championed the idea and built a comprehensive theory of mind and brain around it.

CHAPTER 6

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CHAPTER 7

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CHAPTER 8

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