

Contents

Chapter 1. Introduction	1
Chapter 2. Preliminaries	9
Chapter 3. Slice Hyperholomorphic Functions	11
Chapter 4. The S-Functional Calculus	17
Chapter 5. The Spectral Theorem for Normal Operators	25
Chapter 6. Intrinsic S-Functional Calculus on One-Sided Banach Spaces	31
Chapter 7. Spectral Integration in the Quaternionic Setting	41
Chapter 8. On the Different Approaches to Spectral Integration	59
Chapter 9. Bounded Quaternionic Spectral Operators	65
Chapter 10. Canonical Reduction and Intrinsic S-Functional Calculus for Quaternionic Spectral Operators	83
Chapter 11. Concluding Remarks	93
Bibliography	97
List of Symbols	99
Index	101