Contents

Foreword v
Preface vii
Contributors xi
Acknowledgements xii
Dedication xii

Section 1: Introduction

1 History of dermatopathology 1
Gregory A. Hosler

2 Hematoxylin and eosin 23
Gregory A. Hosler

Section 2: Special stains

3 Special stains: background 29
Ryan W. Hick

4 Applications in dermatopathology 47
Ryan W. Hick

Section 3: Immunohistochemistry

5 Immunohistochemistry: background 55
Marc R. Lewin, Robert Oliai

6 Immunohistochemical markers 61
Marc R. Lewin

7 Common immunohistochemical panels 103
Marc R. Lewin

Section 4: Point of care testing

8 Dermatological point of care tests 107
Travis Vandergriff

Section 5: Immunofluorescence

9 Immunofluorescence: principles **121**
Robert M. Law

10 Immunofluorescence: applications in dermatopathology **135**
Robert M. Law

Section 6: Electron microscopy

11 Electron microscopy: background **151**
Matthew Lewin

12 Electron microscopy: applications **155**
Gregory A. Hosler

Section 7: Molecular testing

13 In situ hybridization (non-FISH) **171**
Pamela M. Aubert

14 Fluorescence in situ hybridization **183**
Pamela M. Aubert

15 T/B gene rearrangement assays **205**
Gregory A. Hosler

16 PCR, sequencing, and gene expression profiling **233**
Gregory A. Hosler

Section 8: Conclusion

17 Final thoughts **247**
Gregory A. Hosler

Index **253**