## Contents

### Part I  General Considerations

1. **The History of Local and Regional Anesthesia** ..................................................... 3  
   Brendan T. Finucane

2. **Regional Anesthesia Safety** ...................................................................................... 15  
   John W.R. McIntyre and Brendan T. Finucane

3. **Local Anesthetic Toxicity: Prevention and Management** ..................................... 41  
   Derek Dillane

4. **Outcome Studies Comparing Regional and General Anesthesia** ....................... 55  
   Brian O’Donnell and Michael O’Sullivan

### Part II  Special Considerations

5. **Nerve Injury Resulting from Intraneural Injection When Performing Peripheral Nerve Block** .................................................................................................................... 67  
   Rakesh V. Sondekoppam and Ban C.H. Tsui

6. **Regional Anesthesia in the Presence of Neurologic Disease** ................................. 103  
   John Shepler, Andrea Kattula, and George Arndt

7. **Evaluation of Neurologic Injury Following Regional Anesthesia** ....................... 113  
   Quinn Hogan, Keith McCollister, Matthew Harmelink, Laura Kohl, and Michael Collins

8. **Regional Anesthesia and Anticoagulation** .............................................................. 139  
   Robert B. Bolash and Richard W. Rosenquist

9. **Infection in Association with Local and Regional Anesthesia** .............................. 149  
   Terese T. Horlocker, Denise J. Wedel, and Adam D. Niesen

10. **Continuous Peripheral Nerve Blocks Safe Practice and Management** .......... 167  
    Geert-Jan van Geffen and Jörgen Bruhn

### Part III  Specific Regional Blocks: Safe Practice and Management of Adverse Events

11. **Complications of Regional Anesthesia: Upper and Lower Extremity Blockade** ......................................................................................................................... 189  
    Stephen Choi, Patrick B.Y. Wong, Kristen Gadbois, and Colin J.L. McCartney

12. **Complications of Thoracic Wall Regional Anesthesia and Analgesia** .......... 199  
    Christine Lee and F. Michael Ferrante
13  Abdominal Wall Blocks: Safe Practice and Management of Adverse Events.... 219
    James D. Griffiths and Peter D. Hebbard

14  Epidural Blockade: Safe Practice and Management of Adverse Events .......... 227
    Steven J. Gaff

15  Spinal Anesthesia: Safe Practice and Management of Adverse Events .......... 245
    Pekka Tarkkila

Part IV  Specific Patient Populations: Safe Practice and Management
          of Adverse Events

16  Complications of Regional Anesthesia in Chronic Pain Therapy......................... 261
    David Flamer, Rachael Seib, and Philip W.H. Peng

17  Local and Regional Anesthesia in the Elderly........................................ 287
    Ferrante S. Gragasin and Ban C.H. Tsui

18  Local and Regional Analgesia for Labor and Delivery ................................ 303
    Yoo Kuen Chan and Peng Chiong Tan

19  Local and Regional Anesthesia in the Obese Patients .................................. 319
    Hendrikus J.M. Lemmens

20  Local and Regional Anesthesia in Pediatrics............................................. 327
    Belen De Jose Maria

Part V  Special Environments: Safe Practice and Management
          of Adverse Events

21  Local and Regional Anesthesia in Dental and Oral Surgery ......................... 341
    Stanley F. Malamed, Kenneth L. Reed, Amanda Okundaye, and Andrea Fonner

22  Local and Regional Anesthesia in the Emergency Room ............................... 359
    Andrew A. Herring

23  Recognizing and Mitigating Risk of Ophthalmic Regional Anesthesia .............. 369
    Brad Wakeman, Robert William Andrew Machuk, Rizwan Somani,
    Dean Y. Mah, and Ian M. MacDonald

24  Local Infiltration Analgesia for Orthopedic Joint Surgery .......................... 381
    Sugantha Ganapathy, James L. Howard, and Rakesh V. Sondekoppam

25  Local and Regional Anesthesia in Plastic Surgery: Safety Considerations
          and Management of Adverse Events.................................................. 399
    John Mesa, Don Lalonde, and Luis O. Vasconez

Part VI  Morbidity Studies: International Perspective

26  Development and Methodology of a Registry of Regional Anaesthesia .............. 413
    Michael J. Barrington

27  Australia: Results of a Multicenter Registry of Regional Anesthesia .............. 421
    Michael J. Barrington

28  Canada: Medical Legal Aspects of Regional Anesthesia Practice ........................ 429
    Kari G. Smedstad and Brendan T. Finucane
<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>29 France: Regional Anesthesia Morbidity Study</td>
<td>435</td>
</tr>
<tr>
<td>Dan Benhamou</td>
<td></td>
</tr>
<tr>
<td>30 Nordic Countries: Principles of Safe Practice in Local and Regional Anesthesia</td>
<td>441</td>
</tr>
<tr>
<td>Mikko T. Pitkänen</td>
<td></td>
</tr>
<tr>
<td>31 United Kingdom: Recent Advances in the Safety and Prevention of Regional Anesthesia Complications</td>
<td>445</td>
</tr>
<tr>
<td>Graeme A. McLeod</td>
<td></td>
</tr>
<tr>
<td>32 United States: Complications Associated with Regional Anesthesia (An American Society of Anesthesiologists’ Closed Claims Analysis)</td>
<td>451</td>
</tr>
<tr>
<td>33 United States: Chronic Pain Management (American Society of Anesthesiologists’ Closed Claims Project)</td>
<td>463</td>
</tr>
<tr>
<td>Albert H. Santora</td>
<td></td>
</tr>
<tr>
<td>Part VII Medical Legal Aspects</td>
<td></td>
</tr>
<tr>
<td>34 Medical Legal Aspects of Regional Anesthesia: Physician Perspective</td>
<td>473</td>
</tr>
<tr>
<td>Albert H. Santora</td>
<td></td>
</tr>
<tr>
<td>35 Medical Legal Aspects of Regional Anesthesia: Legal Perspective</td>
<td>483</td>
</tr>
<tr>
<td>Bridgette Toy-Cronin and Kelly Byrne</td>
<td></td>
</tr>
<tr>
<td>Index</td>
<td>489</td>
</tr>
</tbody>
</table>
Complications of Regional Anesthesia
Principles of Safe Practice in Local and Regional Anesthesia
Finucane, B.; Tsui, B.C.H. (Eds.)
2017, XVIII, 501 p. 134 illus., 103 illus. in color., Hardcover
ISBN: 978-3-319-49384-8