# Contents

1 Climate Change at Universities: Results of a World Survey  
Walter Leal Filho ........................................................ 1

2 Path to the Future for Climate Change Education:  
A University Project Approach  
Maruf Sanni, James O. Adejuwon, Idowu Ologeh,  
and William O. Siyanbola ......................................... 21

3 Australian Universities, Government Research and the Application of Climate Change Knowledge in Australian Coastal Zone Management  
Laura Stocker, Bob Pokrant, David Wood, Nicholas Harvey,  
Marcus Haward, Kevin O’Toole, and Tim Smith .................. 31

4 The Impact of Universities on the Climate Change Process  
Javier Benayyas, Inmaculada Alonso, David Alba, and Luis Pertierria  
................................ 47

5 University of Minnesota Water-Based Nitrogen Budget  
Erica K. Schram and Jim A. Perry  
........................................ 67

6 Sustainable Literacy and Climate Change: Engagement, Partnerships, Projects  
Julie Matthews and Peter Waterman .................................. 83

7 Getting to the Heart of Climate Change Through Stories  
Scott Carlin ........................................... 89
8 Climate Change Education in the Curricula of Technical and Classical Universities ............................................... 99
Dagnija Blumberga and Maris Klavins

9 Interdisciplinary and Interfaculty Approaches in Higher Education Capable of Permeating the Complexity of Climate Change ...................................................... 107
Roland Hergert, Volker Barth, and Thomas Klenke

10 The Campus as a Classroom: Integrating People, Place, and Performance for Communicating Climate Change ............. 117
Millie Rooney and Jennifer McMillin

11 How to Educate for a Healthy Climate at a University? An Intergenerational Cooperation (A Case Study from Slovakia) …… 137
Alexander Fehér, Martin Hauptvogl, Petra Trangošová, and Lucia Svetlanská

12 Targeting a Low-Carbon University: A Greenhouse Gas Reduction Target for the Australian Technology Network of Universities ............................................................. 151
Chris Riedy and Jane Daly

13 Malaysian University Students’ Awareness of Geographic Information Systems ................................................................. 163
Nor Rasidah Hashim and Mohd Fazlin Nazli

14 Lifestyle Changes: Significant Contribution to GHG Emission Reduction Efforts ............................................................... 167
Dalia Streimikiene and Remigijus Ciegis

15 Universities as Learning Organizations for Sustainability? The Task of Climate Protection ................................................. 179
Florian Lüdeke-Freund and Simon Burandt

16 Using a Spare Time University for Climate Change Education ......................................................................................... 193
Michael H. Glantz and Ilan Kelman

17 Embracing the Future: The Ball State University Geothermal Project ............................................................... 205
James W. Lowe, Robert J. Koester, and Philip J. Sachtleben
18 Engaged Learning for Climate Change: The Perils and Potentials of Collaborative Partnerships and Projects ........ 221
Julie Matthews

19 Learning for Climate Responsibility: Via Consciousness to Action ................................................................. 231
Anne Virtanen

20 CO₂ Emissions Impact of Sustainable Food Procurement: Informing University Policy ............................................ 241
Esther E. Bowen and Pamela A. Martin

21 Graduate Studies of Global Change at the University of Latvia .... 259
Arnolds Ubelis, Janis Abolins, Dina Berzina, Janis Blahins, and Gunars Bajars

About the Authors ........................................................... 271

Index ............................................................... 281
Universities and Climate Change
Introducing Climate Change to University Programmes
Leal Filho, W. (Ed.)
2010, IX, 283 p. 36 illus., Hardcover
ISBN: 978-3-642-10750-4