Genetically Engineered Crops
Interim Policies, Uncertain Legislation

Iain E. P. Taylor, PhD
Editor

Haworth Food & Agricultural Products Press™
An Imprint of The Haworth Press, Inc.
New York
Chapter 7. Next Challenges for Crop GE: Maturing of Governance and Moves Beyond Food Issues

Iain E. P. Taylor

Introduction 111
What Can Plants Do for Us? 113
The Environmental Future 117
The Industrial Incentive 118
The Regulatory Future 121
Aquaculture 124
Forestry 125
Environmental Remediation 126

PART II: ISSUES IN CURRENT GOVERNANCE

Chapter 8. A Precautionary Framework for Biotechnology

Katherine Barrett
Conrad G. Brunk

Introduction 133
The Debate About the Precautionary Principle 135
Burden of Proof 138
Standards of Safety 144
Conclusion 148

Chapter 9. The Precautionary Principle and Biotechnology: Guiding a Public Interest Research Agenda

Carolyn Raffensperger

Introduction 153
The Precautionary Principle 155
Ethics 156
Precautionary Research: A New Social Contract 158
Public Money for Private Interest 159
Public Interest Research 162

Elisabeth A. Abergel

Regulatory and Economic Uncertainty
Market Disputes
Canada’s Risk-based Approach
Herbicide-tolerant Canola
Scientific Uncertainty and the Canadian Regulatory Framework
International Trade and Regulatory Harmonization
Smart Regulations
Precaution and Science-based Regulations
Conclusion

Chapter 11. Principles Driving U.S. Governance of Agbiotech

Kathleen A. Merrigan

Principle 1: No “Special Treatment”
Principle 2: Invest in Research and Education
Principle 3: Strong Property Rights
Future Governance
Conclusion

Chapter 12. Biotechnology Policy in the European Union

Armin Spök

Introduction
Europe versus the European Union
The Limited Importance of EE R&D Policy
Overall Regulatory Approach
Risk Assessment and Decision Making
Directive 90/220/EEC—The Shortcomings of a Harmonization Tool
Diverging Framings in GEO Risk Assessments
PART III: CHALLENGES TO CIVIL SOCIETY

Chapter 16. Public Spheres Pushing for Change: Public Participation in the Governance of GE Crops

Simon Joss

Introduction
Genealogy of Public Debate
Participation As Governance
Institutional Arenas of Participatory Governance
Extrainstitutional Arenas of Participatory Governance
Conclusions

Chapter 17. Risky Delusions: Misunderstanding Science and Misperforming Publics in the GE Crops Issue

Brian Wynne

Introduction
Objects of Confusion—and Provocation
Risk Assessment and Excluded Dimensions of “Uncertainty”
From “Unknown Unknowns” to Known Uncertainties:
A Tacit Culture of Control
Confusions of Meaning: Constructing the Public by “Listening” to It
Constructed Risk: Performing “Publics” and Externalizing Responsibility
Conclusions: A Learning Science?

Index