

Matthias Ruffert · Sebastian Steinecke

The Global Administrative Law of Science

Table of Contents

Introduction: Science as a Field of Research for International Law	1
A. The Concept of Science	5
I. Preliminaries	5
II. Science in Context	6
1. Thought, Philosophy, Method.....	6
2. Technology	10
3. Scholarship?.....	11
III. Scientific Revolutions and the Scientific Community	12
IV. Science and the Law	13
V. A Tentative Definition	14
B. Global Administrative Law	15
I. An Emerging Concept for the Legal Analysis of the Governance of Science	15
II. Conceptualisation	17
1. Public International Law and Global Administrative Law.....	17
2. Terminology: International, Transnational, Global	18
3. Global Administrative Law and Global Governance	22
4. Global Administrative Law and Global (Multilevel) Constitutionalism	24
III. Conclusion	27
C. Constitutional Basis: The Freedom of Science.....	29
I. A Fundamental Right as a Constitutional Basis.....	29
II. Freedom of Science in International Law.....	30
1. Universal Human Rights Instruments	30
2. Regional Human Rights Treaties	33
3. Further Binding Instruments	35
4. Instruments of International Organisations	39
5. Instruments of Non-Governmental Organisations	41

6. Contents and Effective Potential of the International Standard	41
III. Freedom of Science in National Constitutions	42
1. Methodological Remarks	42
2. Constitutional Provisions.....	43
a) Categorisation.....	43
b) Overall Guarantee	43
c) Academic Freedom and the Freedom of Speech.....	48
d) Absence of Constitutional Protection	51
3. Common Constitutional Elements	52
IV. A Constitutional Point of Orientation	52
 D. Institutional Design	 55
I. Global Administrative Law and Institutional Thinking	55
II. States	55
III. International Organisations	58
1. Universal Organisations and their Activity in Science	58
a) Basic Notions.....	58
b) UNESCO	59
c) Other Organisations within the Framework of the UN	61
aa) International Atomic Energy Agency (IAEA).....	61
bb) Commission on Sustainable Development (CSD)....	62
cc) Food and Agricultural Organisation (FAO)	63
d) Organisation for Economic Co-Operation and Development (OECD)	63
2. Supranational Institutions of Research: The European Union	65
a) The EU as a Supranational Organisation in the International Field of Research	65
b) The European Research Area.....	67
c) The Institutional Framework	68
aa) The Commission.....	68
bb) Organised Co-operation between Member States	70
cc) Special Agencies	71
(1) European Research Council (ERC).....	71
(2) European Institute of Innovation and Technology (EIT).....	73
(3) European University Institute (EUI)	75
dd) Institutional Structures of Governance outside the Treaties.....	75

Table of Contents	VII
IV. Networks.....	77
1. Networks of Universities.....	77
a) University Co-Operation.....	77
b) The United Nations University	79
2. Networks of Research Institutions other than Universities.....	80
a) Institutions Involved.....	80
b) The International Council for Science (ICSU)	80
aa) Creation and Membership	80
bb) Activities.....	81
cc) Structure	84
dd) ICSU, InterAcademy Panel on International Issues (IAP) International Academy Council (IAC).....	84
ee) InterAcademy Medical Panel (IAMP)	84
3. Professional Bodies.....	85
a) International Council of Academies of Engineering and Technological Sciences (CAETS).....	85
b) World Medical Association (WMA).....	86
V. Other Non-State Actors	86
VI. Results	87
 E. Governance Mechanisms.....	89
I. Rulemaking, Implementation and Management	89
II. Governance Purposes in the Global Administrative Law of Science	91
1. Ethical Standards for Research and Their Implementation I: Sound Scientific Practice.....	91
2. Ethical Standards for Research II: Bioethics.....	94
3. The Promotion of Research and the Position of the Researcher.....	101
III. Rulemaking and Standard-Setting	101
1. Consensual Rulemaking	101
2. Institutional Rulemaking.....	103
a) Rulemaking by International Organisations.....	103
b) Supranational Rulemaking.....	105
c) Private Transnational Rulemaking.....	107
IV. Implementation and Management.....	108
1. Implementation of Rules.....	108
2. Reporting and Benchmarking	108
3. Management by Contract.....	111

F. The Global Administrative Law of Science Revisited	113
I. The Global Governance of Science and Global Administrative Law.....	113
II. From Sources to Rules and Standards.....	113
III. From Effective Governance to Legitimate Administration	115
IV. Conclusive Remarks.....	117
Literature	119