



# **ENVIRONMENTAL LAW HANDBOOK**

**Sixth Edition**

**J. Gordon Arbuckle, G. William Frick, Marshall Lee Miller,  
Thomas F.P. Sullivan and Timothy A. Vanderver, Jr.**

**Government Institutes, Inc.  
September 1979**

## Notice

This publication is designed to provide accurate and authoritative information with regard to the subject matter covered. It is sold with the understanding that the publisher is not engaged in rendering legal, accounting or other professional service. If legal advice or other expert assistance is required, the services of a competent professional person should be sought — From a Declaration of Principles jointly adopted by a Committee of the American Bar Association and a Committee of Publishers.

Publication of this book does not signify that the contents necessarily reflect the views and policies of Government Institutes, Inc.

**All rights reserved.** No part of this publication may be reproduced, stored in a retrieval system, or transmitted, in any form or by any means, electronic, mechanical, photocopying, recording or otherwise, without the prior written permission of the publisher.

Sixth Edition  
September 1979

Published by

Government Institutes, Inc.  
P.O. Box 5918  
Washington, D.C. 20014  
U.S.A.

Copyright © 1979 by Government Institutes, Inc.  
Library of Congress Catalog No. 76-41637  
Printed and bound in the United States of America

## PREFACE

The environmental law and regulations field has evolved rapidly over the past ten years. This emergence, however, has presented many challenges to those concerned. A key problem has been how to keep abreast of what are the key provisions of the major statutes and the requirements of the various regulations. Government Institutes has endeavored to help satisfy this informational need by publishing the Environmental Law Handbook which is regularly updated to provide information as current as possible. We envision now that the changes will continue but the changes will not be as major as they have been in the past ten years. Major new statutes are not envisioned but there will be amendments. It appears that the major environmental legislation is now in place and the future will see the implementation of these laws through regulations, enforcement programs, and court actions. So, we have undertaken the expense and time to typeset this Sixth Edition.

The growth in the environmental field has necessitated an accompanying growth in the Environmental Law Handbook. With this Sixth Edition, we have decided to publish in a separate book the major environmental statutes. This has been done for several reasons. One is the fact that the statutes themselves are over five hundred pages and, combined with the material in the handbook, it would be an extremely cumbersome book. Second, the statutes will be amended and by having them in a separate book, we can maintain currency more readily. Third, some people already have copies of the statutes and, for them, reproduction herein is a duplication.

We are very proud of our accomplishments in publishing this Sixth Edition. The Environmental Law Handbook has become a respected reference in the environmental field. However, to maintain our leadership position, we must continue our improvements. So, recommendations are solicited on how we can do a better job of informing those concerned with environmental protection about the laws and regulations. Your suggestions and comments on how we can better serve the informational needs of the environmental community would be appreciated. This concern goes beyond the publications field and extends to our educational offerings. Now, we offer on a regular basis two Environmental Law Courses, introductory and master's, the annual Toxics Control Conference, and seminars on RCRA, water pollution and air pollution. In addition, we are conducting special in-plant seminars for various organizations. Suggestions on continuing educational forums are always welcome.

We sincerely hope that our endeavors help to bring about a better understanding of what is needed and what should be done in environmental and health protection.

GOVERNMENT INSTITUTES

Thomas F. P. Sullivan  
President

## ACKNOWLEDGMENTS

Government Institutes is indebted to many people in the continuing development of this Environmental Law Handbook series. Those who have assisted us are too numerous to name individually. However, we would like to single out a few individuals for special recognition because of their significant contributions. These individuals include the authors to whom we are thankful for that extra effort to insure the high quality of the materials. Then, special credit must be given to their secretaries and assistants who aided in the manuscript preparation and proofreading. These are: Nina Dibala, Marion Ferrell, Mickey Kennett, Rene Kennish, and Lucy Stoner. Thanks also go to our summer assistants, Joseph G. Busch, Erwin H. Schuler, and James E. Schuler for their proofreading and indexing. The coordinator of this project, Patricia Rae-Grant, made the timely publication of these materials in a couple of months—an extremely challenging schedule—a reality. To everyone the publishers are truly indebted.

James J. Lombardo  
Publications Manager  
Government Institutes, Inc.

# TABLE OF CONTENTS

<b>CHAPTER 1 — FUNDAMENTALS OF ENVIRONMENTAL LAW .....</b>	<b>1</b>
Introduction .....	1
Lawyers and Laymen.....	1
United States Courts .....	2
Environmental Law and the Courts.....	2
Role of the Courts.....	2
States and United States Court Systems.....	3
Cases Which the United States Courts can Decide .....	3
United States Court System .....	5
Courts in Practical Perspective.....	6
Common Law.....	6
Case Law.....	8
Obiter Dicta .....	8
Torts.....	8
Nuisance .....	9
Private or Public Nuisances.....	9
Noise Nuisance .....	11
Other Nuisances.....	12
Some Defenses to Nuisance Actions .....	14
Coming to a Nuisance.....	15
Trespass.....	16
Negligence.....	17
Res Ipsa Loquitur.....	18
Violation of a Statute or Ordinance .....	19
Keeping a Dangerous Substance on the Land—Strict Liability ..	20
Defenses to an Action for Negligence .....	20
Contributory Negligence.....	20
Assumption of Risk .....	21
Proving Negligence .....	21
Sovereign Immunity and Torts .....	21
Constitutional Law.....	22
Constitutional Basis for Federal Environmental Laws .....	22
Limits on Governmental Action .....	23
Search Warrants and the Fourth Amendment .....	23

## Table of Contents

Prohibitions Against Self-Incrimination: The Fifth Amendment . . . . .	25
Due Process, the Fifth and Fourteenth Amendments . . . . .	26
Police Power and Due Process . . . . .	27
Prohibition Against Taking Property Without Compensation . . . . .	28
Commerce Clause Limitations . . . . .	29
Equal Protection of the Laws . . . . .	30
Constitutional Protection of the Environment . . . . .	31
Defenses . . . . .	33
Generally . . . . .	33
Laches . . . . .	34
Contractual Authorization . . . . .	35
Public Authorization . . . . .	35
Vagueness . . . . .	36
Unreasonableness and Impossibility of Performance . . . . .	36
Parties . . . . .	38
Standing, Or Who May Sue . . . . .	38
Class Actions . . . . .	40
Evidence . . . . .	40
Burden of Proof . . . . .	40
Judicial Notice . . . . .	41
Presumptions . . . . .	41
Admissions . . . . .	41
Questions of Law and Fact . . . . .	41
Relevant and Material . . . . .	41
Res Inter Alios Acta . . . . .	42
Hearsay . . . . .	42
Opinion Evidence . . . . .	42
Best Evidence Rule . . . . .	43
Parol Evidence Rule . . . . .	43
Witnesses . . . . .	43
Privileged Communications . . . . .	43
Your Own Reports as Evidence Against You . . . . .	44
Samples or Physical Evidence . . . . .	45
Evidence Collection and Constitutional Rights . . . . .	45
Administrative Law . . . . .	46
Generally . . . . .	46
Powers of Governmental Agencies . . . . .	46

## Table of Contents

Procedures . . . . .	47
Evidence in Administrative Law . . . . .	47
Hearings . . . . .	48
Judicial Review . . . . .	48
Attorneys' Fees—New Concepts . . . . .	50
Criminal and Civil Liability . . . . .	50

### **CHAPTER 2 — NATIONAL ENVIRONMENTAL POLICY ACT . . . . . 55**

Introduction . . . . .	55
Relationship of NEPA to Other Federal Laws . . . . .	56
National Environmental Policy and Goals and Their Enforceability . . . . .	60
Council on Environmental Quality . . . . .	61
Environmental Impact Statements . . . . .	62
Background . . . . .	62
Proposed Actions Requiring an EIS . . . . .	64
Procedure and Time of Required Issuance . . . . .	67
Who Can Prepare the EIS and the Lead Agency System Contents . . . . .	68
Contents . . . . .	70
“International” Environmental Statements . . . . .	71
Seven Other “Action-Forcing” Provisions . . . . .	71
Applicant’s Environmental Reports . . . . .	76
Who Can Sue for Alleged Violations of NEPA . . . . .	77

### **CHAPTER 3 — WATER POLLUTION CONTROL . . . . . 79**

Introduction — The Historical Perspective . . . . .	79
Water Quality Standards . . . . .	79
Effluent Criteria Under the Refuse Act . . . . .	80
The Need for New Authority . . . . .	81
The Clean Water Act . . . . .	81
Federal-State Water Pollution Control Program—Overview . . . . .	81
Goals and Objectives . . . . .	82
Mechanisms for Achieving Goals and Objectives . . . . .	82
Permitting Under the National Pollutant Discharge Elimination System . . . . .	83
Program Scope and Applicability . . . . .	83



## Table of Contents

Permitting Procedures .....	85
Permit Conditions .....	88
Establishing the Limitations for Inclusion in the Permit —	
Technology and Water Quality-Based Limits .....	92
Pollutants to be Addressed .....	93
Required Level of Treatment—Technology-Based Limits for	
“Existing” Direct Discharges .....	98
Required Level of Treatment—Technology-Based Limits for	
“New Source” Direct Discharges .....	101
Required Level of Treatment—Technology-Based Limits for	
Indirect Discharges (Pre-Treatment) .....	103
Technology-Based Treatment Standards for Industrial	
Discharges Dealing with Process Variability .....	106
Technology-Based Treatment Standards—Publicly Owned	
Treatment Works .....	109
More Stringent Treatment Required to Meet Water Quality-	
Related Effluent Limitations .....	111
Controlling Non-Process-Related Waste Discharges .....	115
Controlling Area-Wide Non-Point Source Pollution —	
Section 208 Planning .....	115
Stormwater Discharges and Best Management Practices .....	117
Oil and Hazardous Substances .....	120
Oil .....	120
Hazardous Substances .....	122
Other Critical Elements of the Water Act Program .....	124
Abatement Actions and Sanctions .....	124
Citizen Suits .....	128
Provisions Having Special Applicability .....	128
Discharge to Ground Waters .....	128
Dredged or Fill Material .....	130
Ocean Discharge Criteria .....	132
Thermal Discharges .....	132
EPA Construction Grants Program .....	133
The Cost Recovery Program .....	134
User Charges .....	136
Cost Effectiveness and Eligibility .....	139
Construction Grants—Summary .....	141
Pollution Control Planning in the Current Regulatory Climate ....	141
EPA Standards Development Programs .....	141

## Table of Contents

Negotiation of Permit Conditions .....	142
Discussions with Regional Office and State Officials .....	143
State and Local Planning Activities .....	143
Conclusion .....	143

## **CHAPTER 4 — AIR POLLUTION CONTROL..... 147**

Introduction.....	147
History.....	148
Establishment of Air Quality Standards .....	149
Air Quality Criteria.....	149
National Ambient Air Quality Standards .....	150
Air Quality Control Regions .....	152
State Implementation Plans (SIP's) .....	152
Content of (SIP's) .....	152
Role of Technology and Economics.....	155
Use of Dispersion Techniques.....	156
Transportation Control Plans .....	157
Maintenance of Ambient Air Quality Standards .....	158
Indirect Source Review.....	159
Variances.....	160
New Source Review in Non Attainment Areas .....	161
Prevention of Significant Deterioration (PSD).....	163
Energy Related Authority.....	166
Conversions to Coal .....	166
Energy Emergency Provisions.....	167
National Stationary Source Emission Standards .....	167
New Source Performance Standards .....	168
Hazardous Emission Standards.....	169
Information Gathering Authority .....	171
Enforcement Authority .....	171
Compliance Orders and Noncompliance Penalties .....	173
Emergency Authority .....	174
Ozone Protection .....	174
Motor Vehicle Emission Control.....	175
Introduction.....	175
Statutory Standards and Suspension .....	175
Certification .....	177
Compliance by Production Vehicles.....	178

Table of Contents

Assembly Line Testing .....	178
Warranties .....	179
Recall .....	180
Vehicle Inspection .....	180
Enforcement .....	181
Fuel and Fuel Additive Provisions .....	181
Registration .....	181
Regulatory Authority .....	182
Aircraft Emission Control .....	183
Citizens Suits .....	184
Judicial Review .....	185

**CHAPTER 5 — LAND USE: MAJOR ISSUES IN THE  
CONTROL OF INDUSTRIAL  
DEVELOPMENT .....** 187

Introduction .....	187
Background and Nature of the Problem .....	188
Siting Problems .....	190
Local Issues .....	191
State Law Requirements .....	192
State and Federal-State Planning .....	194
Statewide Land Use Planning .....	195
Land Use Planning for Specific Areas .....	195
Planning for Achievement of Categorical Pollution Control Objectives .....	197
Other Planning Requirements .....	201
Specific Federal Authorizations .....	201
Lead Agency Proceedings .....	203
Federal-State Coordination .....	203
“Third Party” Contracts .....	204
Legislated Procedures .....	204
Approach Under Existing Law .....	205
Participate in the Land Use Planning Process .....	205
Select Sites and Formulate Plans Based on a Detailed Understanding of the Siting Process .....	205
Structure the Procedure and Climate in Which the Siting Decision Will Be Made .....	206

File the Application.....	206
Make the Reviewing Agencies Do It Right.....	206
Make Sure That Actual Construction is in Accordance With Your Authorization and the Final EIS.....	207
Prospects for Change: Specific Siting Legislation .....	207
Deepwater Port Example .....	208
Time Limitation .....	208
Single Coordinated Procedure.....	208
One Environmental Impact Statement Based on Identified Criteria.....	209
Problems With the Deepwater Port Act Approach.....	211
Specific Legislation Begets Stringent Criteria.....	211
“Time Limits” Can Be Illusory .....	211
It is Difficult to Enforce the “One Window” Concept.....	211
The “One Environmental Impact Statement” Concept Failed.....	212
Future of the Deepwater Port Approach.....	212
Conclusion.....	213

## **CHAPTER 6 — FEDERAL REGULATION OF PESTICIDES .....**

219

Background to the Federal Regulation of Pesticides .....	219
Early Efforts at Pesticide Regulations .....	219
Creation of the Environmental Protection Agency .....	221
Pesticide Statute.....	222
Key Provision of the Federal Insecticide, Fungicide and Rodenticide Act.....	222
Registration Procedures .....	222
Federal Control over Pesticide Use .....	223
Cancellation .....	225
Suspension .....	226
Balancing Test in FIFRA .....	227
1972 Amendments to FIFRA.....	228
Intrastate Registrations .....	228
Indemnities .....	229
Scientific Advisory Committees .....	230
Standing for Registration, Appeals and Subpoenas .....	231
Judicial Appeals.....	232

## Table of Contents

Exports .....	233
“Featherbedding” and Essentiality in Registration .....	234
Disposal and Recall .....	235
Trade Secrets .....	236
Experimental Use Permits .....	236
1975 Amendments to FIFRA .....	237
Need for FIFRA Renewal .....	237
Controversy Over USDA’s Veto of EPA .....	238
Requirement of Consultation by EPA with USDA .....	239
Scientific Advisory Committees .....	240
Economic Impact on Agriculture Statement .....	241
Self-Certification of Private Applicators .....	241
Amendments 1978 to FIFRA (S. 1678) .....	243
Conditional Registration .....	243
Generic Pesticide Review .....	243
Greater State Authority .....	244
Compensation and Confidentiality .....	244
Efficacy .....	244
Legal Cases .....	245
Basic Cases .....	245
Legal Restrictions: Theory and Practice .....	247
Administrator’s Flexibility .....	249
Concerning the Scientific Advisory Committee .....	249
Concerning the Administrative Law Judge .....	250
National Environmental Policy Act .....	251
Pesticide Regulation Under other Federal Statutes .....	251
Pesticides Under the Food, Drug and Cosmetic Act .....	252
Clean Air Act of 1970 .....	254
Federal Water Pollution Control Act of 1972 .....	254
Solid Waste Disposal Acts .....	255
Occupational Safety and Health Act .....	255
Federal Hazardous Substances Act .....	256
Federal Pesticide Monitoring Programs .....	256
RPAR Process .....	257

## CHAPTER 7 — TOXIC SUBSTANCES .....

Introduction .....	259
Problem of Unregulated Chemicals .....	259

## Table of Contents

The Need for a Toxic Substances Control Act .....	261
Legislative Background .....	261
Toxic Substances Control Act of 1976 (TSCA) .....	263
Premarket Notification .....	263
Inventory List .....	266
Priority Listing .....	268
Testing Requirements .....	269
Testing Reimbursement .....	271
Substantial Risk Notification .....	271
EPA's Enforcement Role .....	272
Confidentiality .....	274
Citizen Enforcement and Legal Fees .....	276
Relationship of TSCA to other Federal Laws .....	277
Existing Toxic Substances Laws .....	277
Clean Air Act .....	278
Water Pollution Act .....	278
Occupational Safety and Health Administration .....	279
Consumer Product Safety Commission .....	280
The Proposed Federal Cancer Policy .....	280
Goals of Proposed Federal Cancer Policy .....	281
Background of the Policy .....	281
Scientific Principles of the Cancer Policy .....	281
Implementation Regulations of the Cancer Policy .....	283
Feasibility .....	284
Prognosis for the Cancer Policy .....	285
Conclusion .....	285
 <b>CHAPTER 8 — NOISE</b> .....	 287
Introduction .....	287
Characteristics of Sound .....	287
Biological Effects of Noise .....	289
Physical Effects .....	289
Physiological Effects .....	290
OSHA Regulation of Noise .....	292
Present OSHA Standard .....	292
Enforcement .....	294
OSHA Noise Hearings .....	294
Economic and Technical Feasibility .....	296

## Table of Contents

Hearing Protection Devices .....	298
Feasibility and Balancing Debate .....	298
Anticipated OSHA Noise Standard .....	301
Environmental Protection Agency Authority .....	302
Noise Act of 1970.....	302
Noise Control Act of 1972 .....	303
Noise Sources and Criteria .....	304
Setting of Noise Emission Standards .....	305
Federal-State and Jurisdiction Under Section 6.....	306
Warranties.....	307
Advertising Restrictions .....	308
Labeling.....	308
Development of Low-Emission Products.....	309
Prohibitions and Penalties .....	309
Control of Transportation Noise.....	310
Aviation Noise .....	310
Railroad and Motor Carrier Noise Standards.....	312
EPA's Coordination Role within the Federal Government ...	313
Quiet Communities Act of 1978.....	314
Current Regulatory Actions on Noise .....	315
Regulatory Activity Concerning Noise in the Aviation	
Industry .....	315
Retrofit of Existing Aircraft.....	316
Airports and Aircraft Operating Procedures.....	317
DOT's Concorde Decision.....	319
Major Sources of Noise .....	321
Air Compressors .....	323
Trucks .....	324
Power Mowers .....	325
Garbage Truck Compactors .....	326
Wheel and Crawler Tractors .....	326
Buses .....	326
Snowmobiles.....	327
Motorcycles .....	327
EPA Motor Carrier Regulations .....	327
EPA Noise Standard for Railroads .....	328

## **CHAPTER 9 — RESOURCE CONSERVATION AND RECOVERY ACT: SOLID AND HAZARDOUS WASTES ..... 331**

Resource Recovery, Solid Waste and the Law.....	331
Solid Waste Disposal and Resource Recovery Act.....	332
Resource Conservation and Recovery Act of 1976 (RCRA)....	333
General Provisions and Objectives.....	334
Office of Solid Waste .....	335
Hazardous Waste Management.....	336
Proposed Hazardous Waste Characteristics and List .....	337
Regulations Applicable to Generators of Hazardous Waste.....	338
Regulation of Transporters of Hazardous Waste.....	339
Requirements Applicable to Treatment, Storage and Disposal of Hazardous Waste.....	340
State or Regional Solid Waste Plans .....	342
Role of the Department of Commerce .....	343
Federal Responsibilities .....	344
Citizen Participation and Other Provisions .....	344
Research, Development, Demonstration and Information ....	344
Implementation of the Resource Conservation and Recovery Act .....	345
Enforcement of the Resource Conservation and Recovery Act ....	346
State and Local Activity.....	347
Interstate Commerce and Solid Wastes.....	347
“Bottle-Bills” .....	348
Solid Waste Facility Siting .....	349
Prospectus .....	349



## Chapter 1

# FUNDAMENTALS OF ENVIRONMENTAL LAW

*Thomas F. P. Sullivan*  
*Attorney*  
*Washington, D.C.*

### 1.0 Introduction

The primary objective of this book is to satisfy, in part, the need for current information on environmental laws and regulations to those concerned with protecting public health and the environment.

The attainment of this objective is a very difficult and challenging task, because our reading audience includes a broad spectrum of educational backgrounds and degrees of experience. Some readers will have little exposure to environmental law, while others will be experienced practitioners of the law. This first chapter is designed primarily for readers without legal training; however, lawyers may find it to be an interesting review. This chapter will provide the major fundamentals underlying and complementing the environmental laws and regulations. This book is not intended to be another erudite tome but a useful text that will help those with responsibilities for environmental protection to comply with both the letter and the spirit of the law.

### 2.0 Lawyers and Laymen

Attorneys are professionally trained to provide advice on “legal matters.” However, some knowledge of environmental laws and regulations is necessary for those non-lawyers who control the operations and installations that are involved in environmental protection.

A basic understanding of legal principles is also beneficial to environmental managers when the need arises to work with legal counsel. Also, non-lawyers who have environmental responsibilities should know something about environmental law to better enable them to understand an environmental attorney’s advice regarding prevention