1

MICROCOPY RESOLUTION TEST CHART
NATIONAL BUREAU OF STANDARDS
STANDARD REFERENCE MATERIAL 1010a
(ANSI and ISO TEST CHART No. 2)

National Library
of Canada

Acquisitions and
Bibliographic Services Branch

395 Wellington Street
Ottawa, Ontario
K1A 0N4

Bibliothèque nationale
du Canada

Direction des acquisitions et
des services bibliographiques

395, rue Wellington
Ottawa (Ontario)
K1A 0N4

Your file - Votre référence

Our file - Notre référence

NOTICE

The quality of this microform is heavily dependent upon the quality of the original thesis submitted for microfilming. Every effort has been made to ensure the highest quality of reproduction possible.

If pages are missing, contact the university which granted the degree.

Some pages may have indistinct print especially if the original pages were typed with a poor typewriter ribbon or if the university sent us an inferior photocopy.

Reproduction in full or in part of this microform is governed by the Canadian Copyright Act, R.S.C. 1970, c. C-30, and subsequent amendments.

AVIS

La qualité de cette microforme dépend grandement de la qualité de la thèse soumise au microfilmage. Nous avons tout fait pour assurer une qualité supérieure de reproduction.

S'il manque des pages, veuillez communiquer avec l'université qui a conféré le grade.

La qualité d'impression de certaines pages peut laisser à désirer, surtout si les pages originales ont été dactylographiées à l'aide d'un ruban usé ou si l'université nous a fait parvenir une photocopie de qualité inférieure.

La reproduction, même partielle, de cette microforme est soumise à la Loi canadienne sur le droit d'auteur, SRC 1970, c. C-30, et ses amendements subséquents.

Canada

TOWARDS ESTABLISHING ENVIRONMENTAL RIGHTS

by

MOIRA CAITLEEN URBANSKI, B.A.

A thesis submitted to

the Faculty of Graduate Studies and Research

in partial fulfilment of

the requirements for the degree of

Master of Arts

Department of Law

Carleton University

Ottawa, Ontario

September 21, 1993

© copyright

1993, Moira Urbanski

National Library
of Canada

Acquisitions and
Bibliographic Services Branch

395 Wellington Street
Ottawa, Ontario
K1A 0N4

Bibliothèque nationale
du Canada

Direction des acquisitions et
des services bibliographiques

395, rue Wellington
Ottawa (Ontario)
K1A 0N4

Your file Votre référence

Our file Notre référence

The author has granted an irrevocable non-exclusive licence allowing the National Library of Canada to reproduce, loan, distribute or sell copies of his/her thesis by any means and in any form or format, making this thesis available to interested persons.

L'auteur a accordé une licence irrévocable et non exclusive permettant à la Bibliothèque nationale du Canada de reproduire, prêter, distribuer ou vendre des copies de sa thèse de quelque manière et sous quelque forme que ce soit pour mettre des exemplaires de cette thèse à la disposition des personnes intéressées.

The author retains ownership of the copyright in his/her thesis. Neither the thesis nor substantial extracts from it may be printed or otherwise reproduced without his/her permission.

L'auteur conserve la propriété du droit d'auteur qui protège sa thèse. Ni la thèse ni des extraits substantiels de celle-ci ne doivent être imprimés ou autrement reproduits sans son autorisation.

ISBN 0-315-89843-7

Canada

Name MURKA PATRICIA URBANSKI

Dissertation Abstracts International is arranged by broad, general subject categories. Please select the one subject which most nearly describes the content of your dissertation. Enter the corresponding four-digit code in the spaces provided.

0348

SUBJECT TERM

SUBJECT CODE

U·M·I

Subject Categories

THE HUMANITIES AND SOCIAL SCIENCES

COMMUNICATIONS AND THE ARTS

Architecture 0729
Art History 0377
Cinema 0900
Dance 0378
Fine Arts 0357
Information Science 0723
Journalism 0391
Library Science 0399
Mass Communications 0708
Music 0413
Speech Communication 0459
Theater 0465

EDUCATION

General 0515
Administration 0514
Adult and Continuing 0516
Agricultural 0517
Art 0273
Bilingual and Multicultural 0282
Business 0688
Community College 0275
Curriculum and Instruction 0727
Early Childhood 0518
Elementary 0524
Finance 0277
Guidance and Counseling 0519
Health 0680
Higher 0745
History of 0520
Home Economics 0278
Industrial 0521
Language and Literature 0279
Mathematics 0280
Music 0522
Philosophy of 0998
Physical 0523

Psychology 0525
Reading 0535
Religious 0527
Sciences 0714
Secondary 0533
Social Sciences 0534
Sociology of 0340
Special 0529
Teacher Training 0530
Technology 0710
Tests and Measurements 0288
Vocational 0747

LANGUAGE, LITERATURE AND LINGUISTICS

Language 0679
General 0289
Ancient 0290
Linguistics 0291
Modern 0401
Literature 0294
General 0295
Classical 0297
Comparative 0298
Medieval 0316
Modern 0591
African 0305
Asian 0352
Canadian (English) 0355
Canadian (French) 0593
English 0311
Germanic 0312
Latin American 0315
Middle Eastern 0313
Romance 0314
Slavic and East European 0314

PHILOSOPHY, RELIGION AND THEOLOGY

Philosophy 0422
Religion 0318
General 0321
Biblical Studies 0319
Clergy 0320
History of 0322
Philosophy of 0409
Theology 0323

SOCIAL SCIENCES

American Studies 0323
Anthropology 0324
Archaeology 0326
Cultural 0327
Physical 0310
Business Administration 0272
General 0770
Accounting 0454
Banking 0338
Management 0385
Canadian Studies 0501
Economics 0503
General 0505
Agricultural 0508
Commerce-Business 0509
Finance 0511
History 0511
Labor 0358
Theory 0366
Folklore 0351
Geography 0578
Gerontology
History
General

Ancient 0579
Medieval 0581
Modern 0582
Black 0328
African 0331
Asia, Australia and Oceania 0332
Canadian 0334
European 0335
Latin American 0336
Middle Eastern 0333
United States 0337
History of Science 0585
Law 0398
Political Science 0615
General 0616
International Law and Relations 0617
Public Administration 0814
Recreation 0452
Social Work 0626
Sociology 0627
General 0938
Criminology and Penology 0631
Demography 0628
Ethnic and Racial Studies 0629
Individual and Family Studies 0630
Industrial and Labor Relations 0700
Public and Social Welfare 0344
Social Structure and Development 0709
Theory and Methods 0999
Transportation 0453
Urban and Regional Planning
Women's Studies

THE SCIENCES AND ENGINEERING

BIOLOGICAL SCIENCES

Agriculture 0473
General 0285
Agronomy 0475
Animal Culture and Nutrition 0476
Animal Pathology 0359
Food Science and Technology 0478
Forestry and Wildlife 0479
Plant Culture 0480
Plant Pathology 0817
Plant Physiology 0777
Range Management 0746
Wood Technology
Biology 0306
General 0287
Anatomy 0308
Biostatistics 0309
Botany 0379
Cell 0329
Ecology 0353
Entomology 0369
Genetics 0793
Limnology 0410
Microbiology 0307
Molecular 0317
Neuroscience 0416
Oceanography 0433
Physiology 0821
Radiation 0778
Veterinary Science 0472
Zoology
Biophysics 0786
General 0760
Medical

EARTH SCIENCES

Biogeochemistry 0425
Geochemistry 0996

Geodesy 0370
Geology 0372
Geophysics 0373
Hydrology 0388
Mineralogy 0411
Paleobotany 0345
Paleoecology 0426
Paleontology 0418
Paleozoology 0985
Palynology 0427
Physical Geography 0368
Physical Oceanography 0415

HEALTH AND ENVIRONMENTAL SCIENCES

Environmental Sciences 0768
Health Sciences 0566
General 0300
Audiology 0992
Chemotherapy 0567
Dentistry 0350
Education 0769
Hospital Management 0758
Human Development 0982
Immunology 0564
Medicine and Surgery 0347
Mental Health 0569
Nursing 0570
Nutrition 0380
Obstetrics and Gynecology 0354
Occupational Health and Therapy 0381
Ophthalmology 0571
Pathology 0419
Pharmacology 0572
Pharmacy 0382
Physical Therapy 0573
Public Health 0574
Radiology 0575
Recreation

Speech Pathology 0460
Toxicology 0383
Home Economics 0386

PHYSICAL SCIENCES

Pure Sciences
Chemistry 0485
General 0749
Agricultural 0486
Analytical 0487
Biochemistry 0488
Inorganic 0738
Nuclear 0490
Organic 0491
Pharmaceutical 0494
Physical 0495
Polymer 0754
Radiation 0405
Mathematics 0605
Physics 0986
General 0606
Acoustics 0608
Astronomy and Astrophysics 0748
Atmospheric Science 0607
Atomic 0798
Electronics and Electricity 0759
Elementary Particles and High Energy 0609
Fluid and Plasma 0610
Molecular 0752
Nuclear 0736
Optics 0611
Radiation 0463
Solid State
Statistics
Applied Sciences
Applied Mechanics 0346
Computer Science 0984

Engineering 0537
General 0538
Aerospace 0539
Agricultural 0540
Automotive 0541
Biomedical 0542
Chemical 0543
Civil 0544
Electronics and Electrical 0348
Heat and Thermodynamics 0545
Hydraulic 0546
Industrial 0547
Marine 0794
Materials Science 0548
Mechanical 0743
Metallurgy 0551
Mining 0552
Nuclear 0549
Packaging 0765
Petroleum 0554
Sanitary and Municipal 0790
System Science 0428
Geotechnology 0796
Operations Research 0795
Plastics Technology 0994
Textile Technology

PSYCHOLOGY

General 0621
Behavioral 0384
Clinical 0622
Developmental 0620
Experimental 0623
Industrial 0624
Personality 0625
Physiological 0989
Psychobiology 0349
Psychometrics 0632
Social 0451

Thesis Acceptance Form

M.A. CANDIDATE

**The undersigned recommend to the Faculty of Graduate Studies
and Research acceptance of the thesis**

**"Towards Establishing Environmental Rights"
submitted by Moira C. Urbanski, B.A. (Hons.)
in partial fulfilment of the requirements for
the degree of Master of Arts**

Thesis Supervisor

Chair, Department of Law

Carleton University
September 17, 1993

ABSTRACT

Nearing the year 2000, concern for the ecosystem is on the rise as humanity begins to recognize it as an integral part of its survival. The threat of ecological disaster has sparked a campaign for forceful legal action that will protect the environment from harmful human activities. Despite common law and legislative avenues, Canadian law in particular, has been unable to adequately protect the environment. Much of its failing is due to the anthropocentric nature of law and the limitations placed on public participation. Environmental rights have been proposed as a means of instituting an ecological ethic into the law and granting greater public access to the environmental legal process. This thesis examines the effectiveness of Canadian nuisance law and legislation in protecting the environment, and evaluates the potential of environmental rights to ameliorate current procedures. To avoid ecological disaster, this thesis concludes by advocating the establishment of international environmental rights.

ACKNOWLEDGEMENTS

To my advisors, Peter Swan and Amy Bartholomew, I am deeply grateful for valuable guidance in the conceptualization of my thesis and helpful criticisms. Their exceptional leadership challenged me to question the realm of traditional legal doctrine, and to seek answers in modern social and legal theory.

Special thanks to my parents who encouraged me to delay law school by a year and earn my Masters of Arts. Without their support, I may not have experienced or learned from the exciting and indispensable world of legal theory.

I am indebted to my fellow colleagues, especially Kim Schrader, Tim Martin and Deanna Sitter, who read endless copies of my work and provided useful criticisms and suggestions. Thanks are also due to my literary specialist, my sister Sheena, who edited my final copies.

Finally, I would like to express special gratitude to my best friend, Mark Jovanovic, who, along with perusing every draft, encouraged me not to quit. His assistance, support, and confidence in me, were all invaluable to my completing this work.

Table of Contents

	Page
Acceptance Sheet	ii
Abstract	iii
Acknowledgements	iv
Table of Contents	v
 INTRODUCTION	 1
 CHAPTER I - NUISANCE LAW AND THE ENVIRONMENT	 13
The Doctrine of Nuisance	15
Traditional Applications of Nuisance Law	18
Changing Conceptions of Nuisance Law	19
Industrialization, the Character of the Locality & Standard of Comfort	20
Causation, Scientific Evidence and the Changing Onus of the Plaintiff	25
Public Nuisance, the Importance of the Industry and the Public Good	28
Remedies	34
Conclusion	40
 CHAPTER II - FEDERAL LEGISLATION AND ECOLOGICAL PROTECTION	 41
The B.N.A. Act and Federal Environmental Legislation	42
Distribution of Powers	43
Reluctance of Federal Government to Regulate Environmental Matters	44
Federal Policy on the Environment	46
Doctrine of Usefulness, late 1800's	46
The Conservation Movement	47
The Commission of Conservation, 1909-1921	48
Development and Exploitation, 1920's	49
The Depression, 1930's	50
The Postwar Years	50
Nationalism and the New Conservation Movement, since mid-1960's	51
Implications of Federal Resource Policy	52
The Politics of Environmental Legislation	53
The Lumber Industry	57
Twentieth-Century Environmental Legislation	63
Water Pollution	64
Air Pollution	66
Toxic Chemicals	67

Problems With Twentieth-Century Legislation	67
In Response to the Problems	70
Conclusion	72
 CHAPTER III - THE CANADIAN ENVIRONMENTAL PROTECTION ACT	74
Overview of the Canadian Environmental Protection Act	75
Evading the Intrinsic Value of the Environment	77
Restrictive Public Participation	80
Conclusion	88
 CHAPTER IV - TOWARDS ESTABLISHING ENVIRONMENTAL RIGHTS	90
Why Environmental Rights?	91
Rights in the Environment	95
What the Right Would Entail	95
Criticisms of this Right	98
Right to Environmental Quality	101
Constitutional Entrenchment of Environmental Rights	102
Environmental Bill of Rights	106
Implementing Environmental Rights	116
Conclusion	119
 CONCLUSION - FOR THE SAKE OF THE EARTH	121
 Notes	130
Appendix A	149
References	151
Case Law References	159

INTRODUCTION

As self-proclaimed rulers of the earth, we have altered the environment to suit our needs. At first, we feared the world around us, seeking protection from wild animals and the hostile wilderness. We eventually learned how to control the environment by taming the animals and creating settlements out of the wilderness. Technology and industrialization further advanced our goals of ruling the earth, as the means by which humanity could finally "assert its complete, rightful, and unchallengeable control over the forces of nature, yoking all of nature to the service of human needs".¹ We have exploited the world's resources, altered the ecosystems, and constructed completely artificial environments to suit our interests. As humans, we have the distinction of being the single, most powerful species affecting the natural environment. Despite the benefits that our activities have provided for the human race, we have damaged the earth in the process, perhaps beyond repair.

Although it was once perceived that the environment had an unlimited capacity to sustain our consumptive practices, we are now realizing that this is not the case. The continually rising human population of the world, along with the by-products of industrialization and technology have placed an incredible strain on the environment, one that is leading to the threat of ecological catastrophe.² Small calamities are happening everyday in different parts of the world. The Rhine River chemical spill, the Chernobyl nuclear disaster, the Bhopal pesticide leakage and the Shetland oil spill are but a few of the environmental disasters that our activities have caused. Each day the ecosystem suffers from the destruction of forests, soil degradation and erosion,

desertification, climatic and ocean changes, habitat and species extinction, air pollution, ground and surface water pollution, acid rain, toxic wastes, nuclear fallout, the greenhouse effect and depletion of the ozone layer.³ For all of these harms, we can take the 'credit/blame'.

It is amazing that one species could cause so much destruction in a world that it needs for its own survival. But what is it that compels us to wreak havoc on the environment around us and not to care about the implications of our actions? What drives us, dates back almost 500 years to a philosophy that we are the only proper objects of moral concern. This anthropocentric morality separated our existence from nature, envisioning all elements of the natural world as mere things to be mastered and controlled by humans.⁴ The development of technology was just an extension of this moral thought, another means by which we could dominate nature and better the world for ourselves. Any by-products of technology were inconsequential because they did not directly affect our human world. Thus, anthropocentric thought has served to rationalize our destructive behaviour, defining any damage to the environment as merely an aesthetic concern, rather than a moral issue.

The problem is compounded by the fact that ethics provide the rational basis for commitments to our ultimate ideals and principles.⁵ What we value as morally correct is invoked as the basis for public policy and laws. Anthropocentrism is entrenched in Canadian legal doctrine with rights that recognize our superiority above nature. In particular, the right to individual freedom is the prescription for environmental destruction. Given the liberty to do anything that did not interfere with the rights of

others, individuals were free to extract natural resources and to pollute the ecosystem. Because the world possessed inexhaustible resources, no one's right was infringed. During the Industrial Revolution, mass production was considered to be for the 'good of society', because it allowed everyone to share in the benefits of the earth. The laws reflected this notion, protecting the interests of industries by preventing legal recourse for anyone who sought to impede this progress. To the detriment of the environment, our anthropocentric legal doctrine sanctioned the growth of industrialization.

A slight paradigm shift was evoked in the late nineteenth-century as a result of the depletion of manufacturable resources and the pollution of air and water, which provided human sustenance. It became imperative to alter our exploitive practices to secure a supply of resources for future human use. A policy of efficient resource conservation and management was enlisted to protect Canada's natural resources. In particular, the *Fisheries Act* governed the granting of licenses to fishing industries and prohibited the deposit of any substances that may have a detrimental effect on fisheries.⁶ Protection of fisheries was not introduced because the fish had a right to live. Instead, the Act was meant to create a maximum sustainable yield of fish to ensure that enough would remain for the subsistence of the fishing industry. Despite provisions prohibiting the dumping of deleterious substances, a complete ban on water pollution was not instituted. Because water resources were used by the lumber industry in transporting their logs and depositing their sawdust refuse, the legislature tried to balance the interests of both industries, by permitting the dumping of sawdust into waterways. Of course, the detriment that such practices may have had on the

environment was not considered to be an issue, so long as our human interests of preserving these two prosperous industries were satisfied. Environmental protection was, therefore, adopted as a means of conserving natural resources for preserving our industries.

The common law took a slightly different approach to the impact of industrialization. Based on the protection of private property interests, the common law could be evoked when the reasonable use of a person's property or health was infringed as a result of another's practices. This would presumably provide protection from the polluting practices of industries. However, the common law doctrine of nuisance, which was employed quite extensively to protect an individual's interest in his/her property, was inconsequential for protecting the environment.⁷ First, civil action was dependent on the individual proving harm to his/her own property, meaning that damage to the environment was defined as an injury to the person's economic interest in the land. The harm had to be some economic loss in the value of the property before it would be actionable. Moreover, an individual could not seek redress for the environment, or property which s/he did not possess. Even when there was a justifiable claim of nuisance before the courts, its stringent rules which originally prohibited practices that were detrimental to another's property, were modified to take into account the effects of industrialization. Essentially, the courts adopted a philosophy that if society wanted to benefit from industrial progress, it would have to bear the costs of decreased standards of living and damage to property caused by pollution. Although some individuals were successful in their actions, environmental protection at common

law referred to the protection of economic interests in property by limiting compensation to monetary damages.

Despite the legal mechanisms available to protect human interests in the environment, degradation of the ecosystem has progressed beyond the damage that was evident in the late nineteenth-century. The emphasis on preserving nature for human purposes is insufficient to prevent further damage to the ecosystem because we will only protect those things that are necessary for our own survival. We have justified the destruction of various species and habitats in the name of human progress. One only need to think about the loss of the Brazilian rainforest, or closer to home, the Temagami wilderness. The continued deterioration of the environment suggests that our anthropocentric ethics are the basis of the problem. Even if we apply more efficient housekeeping, stewardship or trusteeship responsibilities of protecting the environment, it is unlikely to help because "the ethical source of mistreatment of the planet - human species self-centredness - is untouched".⁸ What is required instead, is an environmental ethic that will recognize the intrinsic value of the ecosystem.

Adopting such an environmental ethic would change our perception about our place in the global environment. We cannot continue to think of ourselves as separate from nature, because everything we do ultimately has an effect on the world in which we live. An ecocentric approach would regard humans, as well as flora, fauna and other natural resources, as parts of the whole ecosystem, to be understood in terms of the whole to which they contribute. Humanity would no longer believe that it had a right to rule the earth, but would have to consider its actions in relation to the

consequences it may have on the ecosystem. By recognizing the inherent moral worth of things other than humans, we would invoke a principle that is committed to protecting the world not only for ourselves, but for the sake of the natural objects around us. Valuing the environment for itself does not imply its non-use, nor does it proscribe every form of pollution. Instead, it obliges us to consider the implications of our activities and calls for a reformation of our destructive practices.

It is not enough for a few of us to adopt this philosophy, however. To guarantee a commitment to true environmental protection, we must institute environmental ethics into our laws. By entrenching the inherent right of the natural environment into our legal process, we would acknowledge the importance of protecting the ecosystem, not for its value to the human race, but for its own value and right to survive.⁹ The law would have to uphold the interest of the environment, by enacting legislation to protect it from degradation and deciding cases in favour of ecological preservation. Decision-making would shift from balancing the interests of polluting industries against the interests that other individuals or companies might have in the environment, to balancing the interests of industries vis-à-vis the interests of the environment itself. In this way, claims of damage to the environment are not merely considered to be issues of personal aesthetics, but become matters of moral harm to the ecosystem. Environmental rights would act as a catalyst for the preservation of the ecosystem, by providing a counter-balance to human economic interests in the environment.

Environmental rights would also empower individuals to participate in the process of protecting the ecosystem. Surveys and polls document that Canadians are

concerned about the environment, while the ever growing presence of environmental groups indicates that people are trying to become involved in protecting the ecosystem.¹⁰ Despite the increased concern for nature, most of the general public does not have access to the legal system in order to protect the environment. The law of standing in common law nuisance restricts court actions to propertied individuals who have accrued some damage to their property. No one, except the Attorney General, can sue an industry on behalf of the whole environment. Environmentalists seeking to enjoin the activities of an industry cannot file suit because they have no legally protected interest that has been harmed. They often search for an individual who has the requisite standing to represent the environment, but may not always succeed because the plaintiff must show that the nuisance has caused substantial damage, different in kind than what has been endured by the public. Although the Attorney General has the authority to represent the interests of the public, s/he has not always done so. The reasons for inaction frequently entail a conflict of interest in Cabinet, where one member may have facilitated the industry's activities, and action against the industry would be an embarrassment to the government.¹¹ The effect of standing, is to limit civil litigation in environmental issues to a small number of individuals who may not always seek action because of the costs involved in law suits.

Public participation is not only limited in litigation, but is also restricted in federal legislation dealing with the environment. Our anthropocentric manner of referring to the environment has resulted in policy-making that is driven by industrial imperatives. Because the emphasis has been on the purpose that natural resources serve

for human needs, policy-making has involved those industries responsible for the manufacturing of products. Their input was considered to be relevant since they had direct access to information on how much resources could reasonably be used without depleting stocks, how much pollution citizens could endure, and how much pollution they could abate. Without questioning the partiality of data provided by the industries, the government began a bargaining process with industries to develop legislation that would adequately protect the human environment. The public was excluded from negotiations because their 'interest' of economic growth would be sufficiently represented by the government.

In more recent federal legislation, procedural mechanisms have been included to facilitate public participation. The *Canadian Environmental Protection Act* (CEPA) in particular, sets out procedures to allow for public input into the establishment of regulations and emission standards.¹² However, participation is limited to the opportunity to go before a Board of Review to make representations regarding the proposed regulations. The public is not actually involved in the development of regulations *per se*, but is merely entitled to make a contribution *after* regulations or emission standards have been decided by the government and industries. Additional limits to citizen participation can be found in the *Environmental Assessment Review Process* designed to promote public input into the assessment of proposed federal projects.¹³ Although the process is meant to encourage public participation, its adversarial nature discourages public involvement because of financial and informational burdens that are not easily accessible to the general populace.

Restrictions on information and funds available to the public are in fact limitations on meaningful public participation in the process of protecting the environment.

Public involvement is extremely relevant to environmental preservation. If anything, it would make the courts and legislatures accountable to the public for its inaction in protecting the ecosystem. Environmental groups and the general public would be able to represent the interests of nature, ensuring that legislative or court decisions are not limited to anthropocentric concerns of economic growth. Public participation would expand enforcement mechanisms beyond the realm of the government, so that individuals could seek compliance with regulations by instituting actions against industries failing to meet the standards. Of course, the standards would be more stringent than those currently in place, since the public would have the opportunity to participate in their creation. Essentially, the public would be the means by which environmental ethics could be instituted into our legal system.¹⁴ Given the growing public concern for increased environmental protection, we should have the opportunity to represent the interests of the ecosystem in a process that currently undermines its integrity.

The premise of this thesis is that there is merit in establishing environmental rights to preserve the ecosystem. For the past century, the legal system has failed to adequately protect the environment because of its emphasis on human interests and its exclusion of the general public from decisions that ultimately affect their lives. Environmental rights would ameliorate these deficiencies by recognizing the ecosystem as valuable in itself and empowering citizens to become involved in protecting the

environment. By recognizing environmental ethics and guaranteeing the public access to participation, ecological protection would extend beyond general regulations that were developed in consideration of the impact they may have on economic growth, to provisions that balance the scales in favour of the ecosystem. Environmental rights would be the tool by which the ecosystem can have its interests expressed in matters that concern its death or survival.

A systematic analysis of nuisance cases dealing with some harm to the land, air or water of the environment, and federal enactments dealing with the ecosystem revealed that decisions were neither made in light of the intrinsic value of the environment nor with the participation of the general public. Several authors, including Murray Rankin, Paul Muldoon, John Swaigen and Richard Woods, have contended that a democratic approach which recognizes an environmental ethic is necessary to effectively protect the ecosystem. While it may have been satisfactory for nuisance law and federal legislation to historically exclude these two elements, current measures to preserve environmental quality must acknowledge the importance of environmental integrity and public participation. According to these authors, the absence of such elements in the legal system will continue to allow environmental decision-making to be based on the anthropocentric concerns of the few powerful legal actors, especially polluting industries, who can influence the law in their favour. By instituting environmental ethics and public participation into the legal system, it is hoped that measures to preserve the ecosystem will be based on the interest of the environment as

represented by the public, instead of the biased anthropocentric concerns of industries seeking to protect only the economic value of the ecosystem.

The thesis is divided into four chapters which examine Canada's legal approach to environmental protection. Chapter I provides an historical overview of the use of nuisance law to protect the environment from damage caused by industrialization. An empirical study of the most significant cases brought before the courts, reveals the ineffectiveness of nuisance law for protecting the ecosystem because of its debilitating rules and its emphasis on property damage. Chapter II explores the other side of the coin, by examining the development of federal legislation meant to protect the environment. It provides an overview of federal natural resources policy, the role of politics in creating legislation, and an analysis of environmental legislation that was enacted during the twentieth-century. Chapter III considers the effectiveness of Canada's current approach to protecting the ecosystem, by evaluating the potential of CEPA to expand public participation and acknowledge the intrinsic value of nature. The failure of CEPA to ameliorate these problems leads to the discussion in Chapter IV of what it means to have rights and what theory of environmental rights will best protect the ecosystem. This paper concludes by advocating the establishment of environmental rights, not only in Canada, but internationally, so that the entire ecosystem will receive adequate protection.

More and more people are expressing their concern for the degradation of the environment, but are trapped because our legal system does not recognize it as a serious issue. The deteriorating state of the ecosystem suggests that it is a serious issue,

however, and that our current methods of protecting the environment are inadequate. If we wish to survive, we must change our attitudes and actions toward the ecosystem which grants us our subsistence. It is hoped that this thesis will convince us to value the environment for its own intrinsic worth.

CHAPTER I - NUISANCE LAW AND THE ENVIRONMENT

Since the onslaught of industrialization, individuals have attempted to protect their property from the effects of pollution by seeking redress through the common law. The doctrine of nuisance was the tort most commonly employed by property owners who sought protection from the damage caused by pollution.¹ Although Canadian nuisance law could be utilized to protect the environment from the by-products of industrialization, between the 1850's and the 1940's, it gradually became less effective as a means to protect the ecosystem. Part of the reason can be attributed to the fact that nuisance law was not designed to protect the environment, but was only meant to protect an individual's right to the full enjoyment of the land and its property value. In attempting to balance industrial and private property interests in the environment, the courts weighed the different purposes for which the land was used, rather than its intrinsic value. Because pollution damage was defined in terms of the impact it had on the monetary value of the property, nuisance law could only balance the cost of harm to the individual's property with the expense of abating the pollution. By excluding the cost of damage to the surrounding ecosystem, the doctrine of nuisance forced the courts to decide in favour of industries and their pollution practices, since a small amount of damage or inconvenience for one property owner could not justify the granting of an injunction and the closure of a viable industry.

In addition to excluding the intrinsic value of the environment in determinations, the doctrine of nuisance also had the effect of limiting public participation. Very few individuals brought legal action against those industries which were a source of

pollution, because of the rules of nuisance law. First and foremost, the plaintiff had to show damage to a property interest, limiting civil recourse to propertied individuals who could actually afford to sue an industry. Moreover, the plaintiff was left with the burden of proving that the damage was caused by the defendant industry's activities, deterring individuals who could not prove causation from seeking legal recourse. The task became more cumbersome as industrialization went on, since nuisance law began to be interpreted according to the changes in society. Pollution was becoming an accepted consequence of the increased standard of living, that the courts interpreted nuisance law to accept the decreased quality of the environment and to take into account the importance of the industry in weighing the property interests. Faced with a heavy burden of proof and an award that was often not worth the money spent, plaintiffs were effectively discouraged from seeking redress for pollution.

The emphasis on property interests, which excluded considerations of the intrinsic value of nature and restricted the number of plaintiffs who could sue for ecological damage, has caused the doctrine of nuisance to be an ineffective means of protecting the environment. Much of this inadequacy is a result of the rules that were based on anthropocentric notions of the purpose of land. The chapter will begin by examining these rules and how the doctrine of nuisance could be utilized to protect the ecosystem. A quantitative and qualitative study of cases involving ecological harm caused by pollution will demonstrate how both the narrow interpretation of nuisance and considerations which focused on the value of industrialization, undermined its ability to protect the environment from harm. Although the doctrine of nuisance had

the potential to prevent the damaging effects of industrialization, it failed to adequately protect the environment.

THE DOCTRINE OF NUISANCE

The tort of nuisance focuses on the protection of property rights, insisting that no individual has an absolute right to use his/her property in any manner s/he pleases. As a claim of liability, nuisance protects and compensates any physical damage caused to land or persons on property, or for any substantial interference with the use of land.² Nuisance law cannot protect the environment for its own merit, but if the pollution was equated to an unreasonable interference with a person's property interest, a cause of action would be available. The term 'unreasonable' refers to an interference that would not be tolerated by an ordinary occupier. According to the doctrine of nuisance, a property owner is entitled to use his/her property in such a manner that would not unreasonably interfere with the property rights of his neighbour.³ Thus, nuisance should prevent the emission of pollution, which could be defined as an unreasonable interference with the land.

With the advent of industrialization, the traditional procedure of questioning whether the plaintiff's rights were unreasonably interfered with gave way to a more complex application of nuisance law. Since pollution could most often be defined as an unreasonable interference, the doctrine of nuisance began to incorporate additional considerations that would not unduly restrict industrialization. First, for districts where a number of industries were located, the presence of pollution became something which property owners could reasonably expect to endure. An unreasonable interference with

property was, therefore, defined as damage beyond the reasonable amount of pollution that could be tolerated in an industrialized district. Secondly, it was no longer sufficient for the plaintiff to prove that some physical damage or loss of enjoyment had resulted from the nuisance. The plaintiff was required to prove that the cause of the damage was a result of the defendant industry's activities, which often necessitated scientific evidence to support the claim. Third, the possibility of nuisance being defined as a private or public interference with property, obscured its application. If damage to the plaintiff's property interest was no different in kind or degree than damage to other property owners, the nuisance was public in nature and was only actionable by the Attorney General who represented the public's interest.⁴ The ability of pollution to be a public nuisance, had the same effect as defining it to be reasonable if the Attorney General took no action. Finally, as a way to balance two different property interests in the land, the doctrine of nuisance considered the importance of the industry and the effect that abatement would have on the public good, in determining whether to find an action of nuisance and assessing the remedies. This expanded interpretation of nuisance had the effect of condoning the deterioration of the ecosystem and limiting the access of individuals who had an interest in protecting the environment.

The changing application of nuisance law is evident during a seventy-five year period of heightened industrial activity, between 1856 and 1939, when a total of thirty-three nuisance cases involving ecological harm were brought before the Canadian courts. (See Appendix A for a complete list of cases.) All of these cases involved pollution to the environment vis-à-vis damage to someone's property by the operation

of an industry. The industries varied from small scale carpenters, blacksmiths and tanneries, to large scale lumbering, mining, tobacco, gas works, and refineries. Environmental harm included the degradation of the land, air and water due to the accumulation of smoke, soot, or dust on property, the emission of noxious odour or fumes, and the discharge of chemicals, sewage or sawdust into waterways. These cases serve as a basis for determining how the common law treated the environment as a resource to serve human needs, by protecting the property interests of industries, rather than preventing the harm caused to the ecosystem. Although other authors have concluded that the courts were not more favourable to industries, my research indicates that the preservation of the environment was a minor issue in relation to the economics of industrialization.⁵

These cases also illustrate that public participation was limited to those who could demonstrate damage to their property interest and could afford to take legal recourse. Eighteen of the actions were launched by individuals who had an economic interest in preventing pollution, because of the harm it caused to their businesses such as hotels, farms, rental properties, stores, fishing, tanneries and mills. The remaining fifteen actions were brought by private individuals whose property had been damaged or enjoyment had been interfered with, nine of whom seemed to be wealthy.⁶ Plaintiffs who sought protection from pollution were primarily well-to-do and had their own economic reasons for preserving the natural resources of their property. Businesses claimed a loss of profits,⁷ while individuals contended that the property value of their land had depreciated as a result of industrial emissions.⁸ The number of wealthy

property owners who sued for damages suggests that the costs of hiring a lawyer and going to trial may have been too high for the average property owner. Moreover, it would be counter-productive for a lower or middle class person, who may depend on the industry for employment, to bring a suit for an injunction that would close down the industry or damages that would eventually come out of his/her own pocket. It is also possible that the emphasis on damaged property interests, prevented and discouraged those who had a legitimate concern for the ecosystem from suing."

TRADITIONAL APPLICATIONS OF NUISANCE LAW

Initially, the courts were extremely decisive in determining whether or not there was a nuisance. Based on the facts of the case and evidence of an unreasonable interference, judges would find that either a nuisance existed, or that it did not. In order to succeed, the plaintiff need only show that the defendant's activities had caused a nuisance that would not be tolerated by an ordinary individual. The first industrial case brought before the Canadian courts in 1856, *Radenhurst v Coate* is exemplary of this practice.¹⁰ Spragge, VC. determined that offensive vapours and smoke did exist, and that the defendant's action of erecting a very high chimney "implied a consciousness that the smoke and vapour would taint and pollute the air unless carried off".¹¹ Additionally, he adhered to the maxim that the plaintiff was entitled to the free use of the air in its natural unpolluted state and that anything less than that constituted an unreasonable interference with the plaintiff's enjoyment of his property.¹² By way of a motion for decree, the plaintiff was entitled to an injunction that would prevent the continuation of the nuisance. Other cases that followed adhered to the basic rules of

nuisance, by granting injunctions where there was an unreasonable interference, and dismissing the case where none could be found.

If there was any inhibition on behalf of the courts, it was their refusal to find a nuisance if it was 'trifling in nature', if the plaintiff had acquiesced in the nuisance, or if the defendant was not to blame. While *Cartwright v Gray* was decided in favour of the plaintiff, Mowat, VC., noted that the nuisance suffered by the plaintiffs was

more than fanciful, more than one of mere delicacy or fastidiousness, as an inconvenience materially interfering with the ordinary comfort, physically, of human existence.¹³

His specific referral to the character of the nuisance seems to suggest that if it had been a trivial complaint or based on the intrinsic value of nature, the plaintiff would not have succeeded. With respect to an acquiescence, the courts established that it must be active, in order for the defendant to succeed. In *Heenan v Dewar*, Vice Chancellor Mowat determined that the active consent of the plaintiff debarred him from seeking relief for the defendant's emission of odours incident to his tanning operations.¹⁴ In continuing the strict application of nuisance law, the courts refused to grant an injunction where a nuisance existed, but was not a result of the defendant's actions.¹⁵ During the first part of the Industrial Revolution, the Canadian courts followed the basic rules of nuisance law when deciding cases involving pollution. However, as the end of the nineteenth-century neared, nuisance law became more complex.

CHANGING CONCEPTIONS OF NUISANCE LAW

According to the traditional doctrine of nuisance, seeking a claim for environmental degradation would be arduous, given the court's refusal to consider cases

that were 'trivial', or perhaps aesthetic, in nature and the need to show the defendant's responsibility for the damage. The challenge was even greater once Canadian nuisance law began to incorporate rules and techniques used by English and American courts. Considerations of the character of the neighbourhood, the local standard of comfort, the importance of the industry, public nuisance, and the onus on the plaintiff to prove the nuisance, became ever more significant in deciding cases.¹⁶ The role that these factors played in determining nuisance cases shows the extent to which courts were willing to compromise environmental concerns in light of industrialization. More specifically, the emphasis placed on social and economic factors are significant determinations of the way in which a strict common law right of clean air and water can be diminished to a mere convenience in a nation engulfed in industrialization.

Industrialization, the Character of the Locality & Standard of Comfort

Increased industrialization brought with it a change in the characteristics of the neighbourhood and the standard of comfort to which citizens were accustomed. The courts seemed to recognize the need for society to adapt to these new processes, and at times, would require individuals to adjust to the new standards set by industrialization. As one judge noted, "the discomforts arising from the mass of impurities that city smoke produces must also, often being long established conditions of such life, be endured".¹⁷ Nuisance could no longer be determined only on the basis of an unreasonable interference, but needed to consider what impact the character of the neighbourhood and standard of comfort might have on pollution being defined as a nuisance. When considering the locality, the courts took into account the type of

neighbourhood in which the nuisance occurred, whether it was residential or industrial, and the class of citizens residing in the vicinity. Often, the local standard of comfort became consequential to this determination, resulting in a two-pronged reason for the court's decision. In fourteen of the thirty-three cases involving environmental pollution, the judiciary took into account the character of the neighbourhood. Eight of the fourteen cases also considered the local standard of comfort, while only one case based its decision solely on the standard of comfort.

The Canadian judiciary first began to take into consideration the character and standard of the locality in 1888. In the case of *Claude v Weir*, where the plaintiff complained of pollution to the stream on his property and the resulting odour, Dorion, C.J., emphasized the presence of four tanneries in the village, beside that of the defendant, which prevented the water of the stream from ever being used for domestic purposes.¹⁸ Where it was evident that the source of pollution could be the defendant or other industries, the courts were careful not to arbitrarily accuse one polluter over another. In this case, the type of village in which the plaintiff resided and the standard of pollution to which the villagers had become accustomed, were decisive factors for favouring the defendant. In a similar case, *Booth v Ratte*, a riparian owner had initiated an action against sawmill operators who were discharging sawdust into the Ottawa River.¹⁹ Ontario legislation specifically required the judiciary to consider the particular neighbourhood in which the nuisance had occurred, and to limit their finding to damages instead of an injunction.²⁰ Thus, when the case was finally decided in

favour of the plaintiff in 1892, the judge in considering the character of the neighbourhood, limited his judgement to damages.²¹

In Quebec, the Superior Court seemed particularly compelled to urge people to change with industrialization. Where a plaintiff complained of dust coming from coal elevators, the judge adamantly hailed the need to consider all the circumstances.

Adjacent proprietors are obliged to suffer the reasonable inconveniences which result from (the) neighbourhood. Time, place, relation of adjoining properties to each other, quality of population and quantity of annoyance must all be considered. For example, what might be a nuisance on Sherbrooke Street would be none in the undoubtedly industrial district within the bounds of which (the) plaintiff lives.²²

Such a judgement leads to the consequence that no one in an industrial district would be entitled to an actionable nuisance for the resultant environmental harm. In fact, the judge continued by stating, that "if (the) plaintiff is entitled to damages, then, so, too, would be every other proprietor who could prove that he suffers inconvenience from the noise or smoke of the towers".²³ A case in 1902, *Cusson v Galibert*, used a similar determination in assessing the nuisance of thick, black smoke and noxious odours which inconvenienced the plaintiff.²⁴ Since the neighbourhood was commonly referred to as a manufacturing area and many of the tenants resided in the vicinity without complaint, the plaintiff had no cause of action.²⁵ Quebec was undoubtedly an industrial region, and in realizing this, the courts refused to deter industrialization, despite the obvious negative implications it had on the ecosystem. In fact, they seemed to suggest that individuals who wished to live in an area free of industrial pollution could not expect to find it in an urban environment.

Of all the cases that referred to both the character and standard of locale, *Appleby v Erie Tobacco Co.* appears to be the only one that rejected their relevance.²⁶

While the court found that the standard of the locality may be considered, it determined that

though the local standard may be higher in some districts than in others, the question in each case ultimately reduces itself to the fact of nuisance or no nuisance, having regard to all the surrounding circumstances.²⁷

Based on the evidence of other witnesses who attested to the offensive nature of the odours coming from the defendant's factory, Boyd, C. held that all possible allowances for the local standard of the neighbourhood could not warrant the continuance of the nuisance. Nevertheless, the cases that followed *Appleby* reverted back to considering the relevance of the locale and standard of the neighbourhood.

When the Canadian judiciary considered both the character of the neighbourhood and the standard of comfort, it primarily made its judgements in favour of the industry. The courts appeared to follow a rule that if the neighbourhood was predominately industrial, then the citizens who resided in that area had to live by those reduced standards of cleanliness. In *Oakley v Webb*, Hodgins J.A. asserted that, "the character of the neighbourhood is an important element in determining the standard of comfort which may be insisted upon".²⁸ Consequently, the plaintiff living in a manufacturing district could not complain of dust arising from the defendant's works, because it was the standard of comfort to be expected within that area.

A shift in decision-making appeared where the courts only referred to one of these conditions. Indeed, it would be difficult to reduce the standard of comfort to an

industrial limitation, if the area was predominately residential. The doctrine of nuisance protected plaintiffs who resided in a residential area, despite the encroachment of an industry which would lower the standard of comfort. This was evident in the case of *Huston et al. v Lloyd Refineries Ltd.* where the plaintiffs complained of soot coming from the defendant's oil refining plant.²⁹ In finding for the plaintiff, Greene J., maintained that despite the existence of poorer class houses,

the area is not properly described as industrial, and the defendant in locating its plant there had no right to expect greater license in the matter of the objectionable features of its manufacturing processes than it would have in an ordinary residential district.³⁰

This case appears to be the extreme, however, since the court granted the harshest award of \$7000 in damages, plus an injunction. Perhaps, this was due to the judge's sympathy for these plaintiffs who were well-to-do and whose substantial property had been depreciated as a result of the defendant's industrial pollution.³¹

If there was one exception for granting an award in favour of the plaintiff when only deliberating the character of the neighbourhood, it was the court's refusal to take into account a loss of business resulting from the conversion of a business area to an industrial sector. When the courts were compelled to weigh the interests of one enterprise over another, it appears that they favoured the larger industrial interest. In *Yung v Fort Frances Pulp and Paper Co.*, the plaintiff complained of a loss of tenants for her hotel as a result of smoke and soot coming from the defendant's saw mill.³²

The judge stated that

Even if it were established - and it was not - that the operation of the defendants had resulted in a shifting of the business centre of the town, the plaintiff would not, upon the principles of law as they had developed,

be entitled to recover. In such a case that which depreciates the value of property is not the direct action of the person operating works but the result indirectly arising because people think that another part of the town will better suit their purposes.³³

What the judge so obviously ignored in his conclusion, is that people think another part of town is more suitable because there is no pollution of smoke or soot in that area. The plaintiff undoubtedly requires an area which is clean and free of pollution in order to be successful in her hotel business. Hence, the defendant's industry is to blame for reducing that cleanliness and for shifting the business sector.

The additional considerations of the character of the neighbourhood and standard of comfort were ominous obstructions for plaintiffs harmed by industrial pollution. Of the eight cases which referred to both factors, only three were decided in favour of the plaintiff. Although the courts acknowledged the harm to the environment, the damage was justified under the modified rules of nuisance, as something which society must endure. When courts focused on only one of the considerations, plaintiffs succeeded for six of the seven cases. While this may appear to be an accomplishment for environmental protection, an examination of the resulting remedies below will show the achievement to be inconsequential.

Causation, Scientific Evidence and the Changing Onus of the Plaintiff

As neighbourhoods transformed from residential to industrial, it became more difficult for individuals and the courts to determine which industry was actually to blame for the alleged nuisance. Often, more than one company would emit noxious odours or smoke into the surrounding atmosphere, and waterways were commonly used for waste disposal by every individual and business in the vicinity. For such reasons,

the courts could no longer infer that a nuisance automatically resulted from the industry closest to the plaintiff. If the plaintiff were to succeed in an action, s/he would have to demonstrate the cause and effect of the nuisance. Some judges even expected the plaintiff to produce scientific evidence to substantiate his/her claim. Not only can such a requirement be difficult to prove, but it can impose extra costs on the individual who has already been damaged by the pollution and may deter others from suing. A total of twenty-one cases required the plaintiff to prove cause and effect, four of which expected scientific evidence to support the claim.

Individuals who were obliged to establish the cause and effect of the nuisance produced the required proof in eleven of the cases. The burden of proving causation required plaintiffs to prove that the injury they experienced was emitted by and originated from the industry they were suing. As Falconbridge, C.J.K.B. remarked, "the plaintiffs had to prove to the satisfaction of a Judge or jury that the loss which they had suffered was caused by the wrongful acts of the" industry.³⁴ Thus, where a plaintiff alleged that the emission of noxious vapours and substances from the defendant's smelting works caused the death of his bees, Falconbridge concluded that "it was not sufficient to find that the destruction of the bees *might* have been caused by the defendants' works - the question was, whether it had been proved".³⁵ To confirm that death of the bees was a result of the defendant's activities, the judge expected the plaintiff to show scientific evidence of arsenical poisoning in the bee brood.

In *Atchison v Stratford Gas Co.*, the plaintiff sued to restrain the defendants from dumping sewage into the Avon river.³⁶ Despite evidence showing that an

actionable nuisance existed on the plaintiff's farm as a result of the river overflowing, the judge found for the defendants. The plaintiff had failed to prove the defendants' responsibility for the nuisance, by not "connecting effects and alleged causes".³⁷ While the judge could not conclude that the defendants were *not* the cause of the nuisance, neither could he clearly determine that they were to blame. Given the lack of proof, Lennox J. granted a stay of proceedings, allowing the plaintiff to re-open the case if scientific evidence could be produced, which connected the defendants' emission to the cause of the nuisance. While this may be a great allowance by the court in favour of Atchison, it is of little consequence if he is unable to detect scientific evidence proving the defendants' action as a nuisance. This may have been the case, since no further action was taken by the plaintiff.

While the onus of proof that the defendant caused a nuisance always rested with the plaintiff, the task became more arduous once the courts demanded scientific evidence. Because the harmful effects have to be proven beyond the balance of probabilities, a heavy burden is placed on the plaintiff who has neither the information to prove the effects of pollutants nor the financial resources to search for the answers or hire a scientist to establish the causal connection.³⁸ Thus, the process is inherently biased in favour of industries, which only need to show that their actions were reasonable, *if* the plaintiff substantiates his/her claim. As the causes of pollution become more difficult to detect, the burden of proof will limit successful actions to cases in which the harm and causation is obvious, without having to show scientific proof.

Public Nuisance, the Importance of the Industry and the Public Good

As urban communities became reliant on industries for survival, the doctrine of nuisance, in balancing the interests of property owners, was interpreted to include considerations of the importance of industries and their correlation with the public good. The public good was defined in terms of economic security for communities whose mainstay was polluting industries, rather than environmental quality. In their assessment, the courts considered the harm to the community that may result if an industry was closed down because of its polluting tendencies. Moreover, the courts would alter actions to public nuisances, requiring the plaintiff to prove special injury. The effect was to establish a standard of environmental quality, that if the rest of the public could withstand the pollution, so could the plaintiff. Unless there was some particular injury different in kind, the plaintiff had no action. A total of eight cases examined the importance of the industry and four questioned the existence of a special injury in an action of public nuisance.

By altering an action to a public nuisance, the possibility of a successful environmental suit is lessened because the plaintiff must "demonstrate that the injury or damage he has suffered places him in a different position than other members of the public".³⁹ The 1913 case of *Cairns v Canada Refining and Smelting Co.* is exemplary of this rule.⁴⁰ Although the trial judge, Boyd C., recognized that the death of the plaintiff's cow was a special injury, he was unwilling to accept that the harm caused to the premises and vegetables from arsenical dust was more special than that suffered by the surrounding locality.⁴¹ Consequently, he allowed damages only for the loss of

the cow. When the case was heard on appeal, Mulock C.J.Ex. decided that the deposit of arsenic onto the plaintiff's land "does not affect the rights enjoyed by citizens generally, but merely those of the owner of the land".⁴² Fortunately for the plaintiff, Mulock decided the action as a private nuisance, enjoining the defendant from allowing dangerous material to escape from the smelter.

In the case of *Canada Paper Co. v Brown*, the court was extremely favourable to the plaintiff, whose expensive ancestral home had been made uninhabitable as a result of the defendants' emission of sulphate gases.⁴³ Although the nuisance affected the entire neighbouring population, the court found that Brown's injury was sufficiently distinct in character to justify his action. However, Justice Anglin's basis for this distinction appears to be one of upper class preference. He specifically states,

the injury to the plaintiff's property is different in kind from the inconvenience suffered by the inhabitants at large - most of whom, moreover, are so dependent upon the operation of the defendants' mills for their support that they are quite prepared to submit to some personal annoyance rather than jeopardize their means of livelihood.⁴⁴

Such a biased assertion evokes favouritism towards upper class citizens who should not be compelled to endure such squalor. Furthermore, it suggests that the "inhabitants at large", who were working class citizens, would not be able to substantiate a special injury. Although the decision was advantageous for the plaintiff, its underlying implication is that, in order to succeed in a public nuisance action, the plaintiff must be of a higher social class than those in the neighbourhood.

The case of *Fillion v New Brunswick International Paper Co.* also considered a claim of action for public nuisance.⁴⁵ Fillion asserted that the defendant's discharge

of wood fibre and water from the paper mill had inhibited his right to fish and had fouled his nets. In examining the nature of the plaintiff's right to fish in the particular waters damaged by the defendant's company, Justice Baxter determined that Fillion's title resulted from the licenses he obtained from the Department of Marine and Fisheries, which did not grant him a right to fish in a specific location. Since the plaintiff did not have an exclusive right to fish in the river polluted by the defendant, he could only claim an action for public nuisance because his injury was no different than that of the public, who was also inhibited in its right to fish. The fact that Fillion suffered differently in degree as a fisherman, was not enough for him to succeed.⁴⁶ According to these cases, public nuisance has varying criteria for defining what constitutes a private action, resulting in unpredictable outcomes for individuals who seek ecological protection from industries.

Another obstacle encountered by plaintiffs was the emphasis placed on the industry. Generally, when the importance of an industry was considered, it was with respect to what remedy should be awarded. Given the economic benefits that could be achieved from continued industrial activity, any ecological harm that ensued was inconsequential. In *Claude v Weir*, the Court of Queen's Bench reversed a Superior Court judgement which had granted the plaintiff \$500 in damages and an injunction.⁴⁷ Dorion Ch. J. was particularly critical, finding that

the Court below has practically ordered the suppression of the appellant's establishment, the effect of which will be to close all other similar establishments at Cote des Neiges, for, as the witnesses say, without the use of the creek the tanning business cannot be carried on, and if the tanning business is driven away, the village also must go.⁴⁸

The fact that the tanning industry had been well established played a significant role in dismissing the plaintiff's action. Despite the pollution endured by the stream, Dorion C.J. held that the plaintiff could not complain of being deprived of the use of the stream since he never required it or made use of it.⁴⁹ The effect of this judgement is to obstruct any person from suing to protect the environment for its own integrity, because s/he cannot prove a loss to some use in the ecosystem and will not be able to justify the closure of a prominent industry.

Cases which followed *Heir* continued to be sensitive to the needs of the community and the economic interests of the industry. In particular, *Black v Canadian Copper Co.*, which joined several farmers in an action for damages resulting from metallurgical smoke emitted from the defendants' smelter-stacks, Judge Middleton was explicit in his resolution not to unduly harm the defendants' industry.⁵⁰ He stated that

the Court ought not to destroy the mining industry - nickel is of great value to the world - even if a few farms are damaged or destroyed; but in all such cases compensation, liberally estimated, ought to be awarded.⁵¹

While Middleton J. was generous in awarding the plaintiffs a total of \$5500 in damages, a higher court reduced the award to \$845, because of a gross exaggeration of figures by the plaintiffs.⁵² Perhaps the court decided that an assessment of \$5500 would have been unduly harsh on the industry, or that damage to a few farms was not that great of a loss.

The 1935 case of *Bottom v Ontario Leaf Tobacco Co.* followed a similar format in determining what remedy to award.⁵³ Two of the three judges which heard the case explicitly referred to the importance of the industry. Riddell, J.A. concluded

that an injunction would throw out of work a large number of operatives; and this is to be avoided if at all possible. The public good can never be absent from the mind of the Court when dealing with a matter of discretion.⁵⁴

In this case, the public good was equated, not with the prevention of noxious smokes and fumes detrimental to the environment, but with the preservation of the economic base of the community. Macdonnell J.A. emphasized the importance of the industry with respect to the amount of people it employed and the disastrous effect its closure would have on the community. Additionally, he focused on evidence which alluded to the defendant making every effort to minimize the pollution, deciding that "the plaintiff must submit to the discomforts incident to such an industrial community".⁵⁵ In recognition of the great disparity between the advantage to be gained by the plaintiff through an injunction and the "inconvenience and disadvantage which the defendant and others would suffer in consequence thereof", the court limited its award to damages.⁵⁶

In some cases, the courts attempted to balance the interests of both parties. In *Nepisiquit Real Estate and Fishing Co. Ltd. v Canadian Iron Corporation Ltd.*, despite a comment made by the defendant's lawyer that "it would be an unfortunate thing if the law is found such that a large industry has to give way to fishing for sport", the court considered the interests of the plaintiff.⁵⁷ An injunction restraining the defendant from allowing polluted water to enter the Nepisiquit river was granted, but was stayed for three months, due to the importance of the defendant company's works.⁵⁸ The staying of injunctions was a common practice for Canadian courts, if damages would not suffice as compensation for the plaintiff and an injunction would be too harsh for the industry. In *Taylor v Mullen Coal Co.* the judge likewise noted that he

should be careful, on the one hand, that industrial enterprise and the company's business is not unnecessarily obstructed, and, on the other, that the reasonable comfort and enjoyment, quiet and happiness, of the plaintiffs' homes are not unlawfully or wantonly sacrificed or set at naught.⁵⁹

Although damages and an injunction were granted, the injunction was stayed for four months, with a possibility for extension if the company acted "diligently and in good faith".⁶⁰ While appearing to conciliate the plaintiffs' interests, the award ultimately favoured industries, by allowing them to continue their ecologically harmful activities.

By considering the importance of the industry and altering claims to public nuisances, the intrinsic value of the environment was undermined in favour of the economic interests of polluting industries. Although the courts may have realized the harm caused to the environment, the way the doctrine of nuisance was interpreted did little to preserve the ecosystem. The judiciary's explicit regard for the welfare of industries demonstrated how economic interests often entered into the equation of determining how much ecological degradation could be endured by the public. Moreover, the courts decided that the economics of continued employment for the locale was more important and more in tune with the 'public good' than preventing the contamination of the land, air and water of the environment. Altering a private nuisance action to a public nuisance was an additional impediment for plaintiffs, who were left with an increased burden of proving injury different in kind or degree than that of the general public. In addition to undermining the value of the ecosystem, these considerations may have discouraged others from seeking legal recourse for ecological damage. The prospect of the court placing great emphasis on the value of the industry

or the fact that everyone else suffered an injury would lessen an individual's ability to win a case, and thus, may not be worth the time and money spent.

REMEDIES

Canadian courts made it more difficult for a plaintiff to prove a claim of nuisance against industrial pollution. The increased onus on the plaintiff, added considerations of the character and standard of the neighbourhood, the change from private nuisance actions to public nuisance and the importance of the industry to the public good, all played a role in limiting the success of an individual in substantiating a claim for environmental harm resulting from the nuisance of an industry. Of course, the courts could not always favour the interests of industries, especially where there was blatant evidence connecting the alleged nuisance to the defendant. However, while the court does appear to consider the interests of the plaintiffs in some cases, the ultimate test is in the remedy which the court provided. Although the judge may have decided in favour of the plaintiff, the remedy awarded shows an implied preference for the progress of industrialization and a nonchalant attitude toward the environment.

Of the thirty-three cases analyzed, twenty-two were decided in favour of the plaintiff and eleven were dismissed. In a way, finding for the plaintiff in two thirds of the cases is a great achievement because it shows that the courts were concerned about the effects industrialization had on the environment.⁶¹ However, these cases were only nominally in favour of the environment and the plaintiff. When one delves further into the awards of the courts, it becomes evident that they did consider industrial interests when determining the type of remedy the plaintiff deserved. Six of the cases awarded

damages only, another six entitled the plaintiff to an injunction, and the remaining ten granted an award of damages plus an injunction. This seems to suggest that the courts were relatively fair in deciding cases involving environmental harm. However, the figures must be examined more closely.

Although six cases required the industry to compensate the plaintiff for damages, this was merely a slap on the wrist. Where damages are awarded, the courts are allowing the nuisance to continue, subject to future damage suits. Essentially, the courts have permitted the industry to buy out the defendant at a cost that is favourable to the plaintiff. This ultimately leads to the conclusion that the industry can continue to emit pollutants into the ecosystem, so long as the plaintiff is adequately compensated. However, the compensation will not be an immense threat for industries. Since these industries are actually business enterprises, the costs of the damages will be set off in the products they market, so that the public is the one to actually pay for the same environmental harm that it is forced to endure. What the courts may have perceived as adequate compensation, becomes an inconsequential figure to the polluting industry and an open door for the continued degradation of the environment. Additionally, it must be recognized that the plaintiff would have spent much money in pursuing the nuisance action, so that the compensation s/he is awarded may be used to pay for the lawyer's fees or costs of proving the nuisance, rather than to fix the damage incurred.

The same consequences can be seen in the ten cases which granted an award of damages plus an injunction. It is interesting to note the courts' willingness to grant a stay of an injunction. Of these ten cases, five industries were given an opportunity to

continue their practices while seeking alternatives to prevent their pollution. But, there is no evidence to suggest that the industries actually changed their practices, or if they continued their nuisance. One might infer that the absence of subsequent cases demonstrates that the industry abated their actions. Alternatively, it is possible that the costs of suing the industry again, inhibited plaintiffs from pursuing this avenue. One might even conclude, as John McLaren has, that the defendant bought out the plaintiff at a price acceptable to the latter⁶² This is entirely possible, since the industry may find it cheaper to pay off an individual than to abate the nuisance. The same effect may be observed in the six cases which granted an injunction only, three of which were stayed in favour of the industry. By examining the cases according to the awards of the court, it is evident that only eight industries were treated harshly. Table I illustrates

Table I - Awards of the Courts

Dismissed - 11	51.5%
Damages only - 6	
Injunction only - 6	48.5%
Damages + injunction - 10	

Stayed Injunctions - 8	24%

Equation:

$[(\text{Dismissed}) + (\text{Damages})] + [(\text{injunction}) + (\text{damages} + \text{injunction})] = 100\%$

$$51.5\% + 48.5\% = 100\%$$

but, half of the injunctions were stayed. Therefore,

$$51.5\% + (48.5\% \div 2) = 75\%$$

the percentage of cases that were favourable to industries causing environmental harm.

The fact that damages can be off set by the industry makes the courts' decision in favour of the plaintiffs somewhat irrelevant because the nuisance is allowed to continue. Consequently, half of the cases can be defined as endorsing the economic benefits of industrialization. While just under half of the remaining cases necessitated that the industry abate their nuisance, the courts showed leniency towards eight by staying the injunction. As stated above, this would allow for the continued infliction of harm on the environment. By adding the courts' leniency in 24% of the cases with the 51.5% of cases that essentially dismissed the plaintiffs' claims, it becomes evident that in a total of 75% of the cases involving environmental degradation, the courts weighed the economic benefits of industrialization. The consequent result of course, is that while the court appeared to express concern for the environment, they were more apt to give preference to the economic interests of the polluting industries.

As noted earlier, the courts would consider the economic interests of the industry when determining its award. While some judges arbitrarily decided whether or not a nuisance justified the compensation of damages in place of an injunction, other courts referred to a general principle of convenience. In *Francklyn v Peoples' Heat and Light Co.*, Ritchie J., rejected the contention made as to the balance of convenience.⁶³ He concluded that the balance of convenience could only be considered when the right of law or fact of violation was doubtful. If it had been allowed, the dispute of facts proving a nuisance would have prevented the court from granting an interim injunction. Nonetheless, Ritchie J., found that the evidence indicated an indisputable interference with the plaintiff's enjoyment of his property, entitling him to an injunction. This view

was also accepted by Justice Townshend, who found that the court, in its discretion, may grant an interim injunction where it is probable that it cannot be successfully attacked at trial.⁶⁴

The case of *Appleby v Erie Tobacco* used an entirely different method of determining the remedy to be awarded. Boyd, J. divided nuisance actions into two classes. Those that interfere with the comfort and enjoyment of the plaintiff's property and those that damage the land, interfering with the value of the property.⁶⁵ Citing the English rule in *Shelfer v City of London Electric Lighting Co.*, he concluded that damages cannot be awarded in lieu of an injunction for cases which interfere with the reasonable enjoyment of the premises, because the inconvenience and annoyance cannot be estimated in money.⁶⁶ This rule is detrimental to cases involving ecological harm, because it stipulates that injunctions will only be granted for actions involving an economic loss, implying that a loss of beauty has no value and cannot justify abatement. Moreover, it puts a monetary value on the environment, assuming that a money award is sufficient to compensate for the destruction of plants, animals and water. Fortunately, this view was overturned on appeal, but no reasoning was given for granting an injunction.

The test that is generally accepted is found in *Canada Paper Co. v Brown*. The Supreme Court of Canada established that

an injunction will not be granted where, having regard to all the circumstances, to grant it would be unjust;...where the injury to the plaintiff's legal rights is small and is capable of being estimated in money, and can be adequately compensated by a money payment,...then although the plaintiff has suffered and is suffering an injury in his legal

rights the court may find...a reason for declining to interfere by exercising its powers in personam.⁶⁷

Essentially, the determination of the proper remedy is broken down into an equation. If the injury is small or can be estimated in money, the award will be damages. However, it does not imply that every other type of damage is automatically entitled to an injunction. For 'having regard to all the circumstances', the courts may consider: the character of the neighbourhood, the local standard of comfort and the importance of the industry, in determining whether an injunction should be granted. The rules that inhibit individuals from establishing a successful claim, are also used against the plaintiff when determining the proper remedy to be awarded and whether an injunction, if granted, should be stayed.

It is the final outcome of the case, damages, an injunction or a stayed injunction, which determines the effectiveness of nuisance law in protecting the environment. Awards that compensate the plaintiff for damage to the property are insufficient to protect the environment from the effects of continued pollution. Moreover, the awards may not be enough to repair the harm and may only cover the costs of going to trial. In granting damages as a remedy, the courts assume that money is enough to compensate for the harm, and literally give industries a licence to continue polluting the environment. An award of damages is insufficient to protect the ecosystem, however, since industries need to be restrained from emitting pollutants. To preserve the environment, injunctions, that are not stayed, need to be awarded to force industries to abate their harmful activities.

CONCLUSION

Although the doctrine of nuisance can be applied to cases involving environmental harm, its ability to protect the ecosystem is extremely limited. Historically, the rules of nuisance have prevented the environment from being considered for its own integrity, requiring that a property interest be attached to the damage to make the nuisance actionable. Moreover, added considerations of the public good, in terms of the benefit bestowed on the community by the industry, and changing standards of comfort, excluded the intrinsic value of the environment and even regarded pollution as something to be accepted. Given the value of industrialization, the public would be discouraged from suing an industry that was the mainstay of the community. The onerous burden of proving causation or supporting a claim with scientific evidence would also deter individuals from spending time and money to protect the environment. Often, it would not be worth the effort, since the courts tended to award a small amount of damages, rather than granting an injunction to prevent the nuisance. Given the impediments faced by individuals seeking to protect the ecosystem and the disregard for the inherent value of nature, nuisance law is an ineffective means of protecting the environment. Where the common law failed, a slim hope remained that public interests in the environment could be articulated by legislation.

CHAPTER II - FEDERAL LEGISLATION AND ECOLOGICAL PROTECTION

While the preceding chapter examined the ineffectiveness of nuisance law for protecting the ecosystem, this chapter will consider the effects of federal environmental policy enacted from the mid 1800's to the 1970's. Throughout this period, legislative policy emphasized the worth of natural resources to Canada's economic development, excluding the intrinsic value of the environment. Since the federal government defined the purpose of legislation as conserving the environment for economic growth and human use, statutes were not meant to undermine economic growth through forceful prohibitions protecting ecological quality. The politics of economic growth played a significant role in the development of environmental legislation, with industries using their political power to influence legislation. So strong was the political clout of industries, that statutes were often watered down in a bargaining process with the government. Moreover, public participation was limited on the assumption that Canadians were concerned with economic growth, rather than environmental preservation, and that the federal government was an appropriate representative of the public.¹ The consequences of this approach cannot be underestimated, since it virtually gave industries a "free ticket" to continue their business in a manner that would achieve the greatest economic benefit, free of serious reprieve by the government for environmental damage.

The failure to include ecological integrity and public participation in the legislative process has caused federal environmental protection to be inadequate.² The chapter will begin by examining the implications of the British North America Act on

the development of federal environmental legislation. This will be followed by an outline of the different policy stages with respect to the protection of Canada's natural resources, and how the belief that the environment simply existed for humanity's use was instituted into legislation. An overview of the role of politics in the development of environmental legislation will explain how the absence of significant public participation further limited the scope of ecological protection. The consequences of federal policy and the politicization of environmental legislation are discussed in the analysis of the sawdust debate; Canada's first incident of ecological degradation. Finally, an examination of the federal government's piecemeal approach to ecological protection, from the early 1900's until the late 1970's, indicates how ecological integrity and public participation were restricted to the detriment of the environment. Over a century of legislation that both regarded the ecosystem as a means to human ends, and hampered significant public participation, has instituted a practice that fails to adequately protect the environment.

THE B.N.A. ACT AND FEDERAL ENVIRONMENTAL LEGISLATION

When Canada became a nation in 1867 by the power of the *British North America Act*, environmental protection was not a political priority. Neither federal nor provincial governments were given sole responsibility for ecological preservation according to the division of powers. Generally, governmental functions were divided so that provinces dealt with local matters, while issues of national or international importance were the responsibility of Parliament.³ This division is problematic, since local matters, like air pollution, may develop into national concerns due to the transient

nature of air. Confusion over which government has control over what aspect of the ecosystem has resulted in an approach to environmental protection that is filled with many gaps.

Distribution of Powers

Federal governmental powers are listed under section 91 which, in addition to certain enumerated powers, authorizes Parliament

to make laws for the peace, order and good government of Canada, in relation to all matters not coming within the classes of subjects by this Act assigned exclusively to the legislatures of the provinces.⁴

Although this sweeping power could be used by the federal government to protect the environment, it has seldom been invoked for reasons that will be considered below. For matters relating to the ecosystem, Parliament has authority over navigation and shipping; sea, coast and inland fisheries; and the regulation of trade and commerce.⁵ The federal government also retains ownership of the northern territories,⁶ "canals, public harbours, rivers and lake improvements, lands set apart for general public purposes",⁷ and interprovincial railroads.⁸ The provincial government has jurisdiction over the management and sale of public lands belonging to the province; local works and undertakings; property and civil rights in the province; and all matters of local or private nature.⁹ Provinces also own mines and minerals contained in provincial crown lands by virtue of section 109. Under section 95, provinces have control over agriculture, with the right of Parliament to make laws in relation to agriculture. Finally, a 1982 amendment to the Constitution gave provinces exclusive authority over the development, conservation, and management of non-renewable resources.¹⁰

Given the complexity of governmental functions, there are several instances when power over ecological matters is undetermined. First, the language describing the allocation of powers is often extremely general, causing an overlap of powers.¹¹ For example, provincial control over timber may be diminished by Parliament's authority to regulate trade and commerce, so that the management of Canada's forests could potentially fall within the jurisdiction of either government. Second, the ability of "either the federal or provincial governments to delegate to each other functions that would normally be within their jurisdiction" allows the governments to 'pass the buck' when it comes to sound environmental management.¹² Finally, federal power over ecological issues varies according to its role as provider of: research, publications and other advisory functions; financial assistance for pollution abatement programs; or direct legislation on the subject.¹³ The federal government is reluctant to use the latter approach because of the uncertainty of its powers in relation to the ecosystem and its unwillingness to take control.

Reluctance of Federal Government to Regulate Environmental Matters

Despite the presence of the 'peace, order and good government' clause, the federal government has been averse to enacting legislation that would protect Canada's environment. Part of this reluctance originates from the "perceived provincial 'sensitivities' concerning federal intrusion into traditional provincial areas."¹⁴ The fear of stepping on provincial toes has fettered constitutional change that would give Parliament exclusive control over ecological matters. If the federal government did go beyond its advisory and financial-supporter status, provinces could seek a judicial

review of the constitutionality of the enactment.¹⁵ Neither level of government, however, wishes to engage in costly and time consuming litigation. Finally, a trade-off factor has limited federal involvement. The need for revenue compelled the federal government to grant provinces power over environmental matters in return for a share in the control of natural resources.¹⁶

In spite of these impediments, the federal government has taken a stronger role in developing environmental policy. With the establishment of Environment Canada, the Minister of the Environment is required to

promote and encourage the institution of practices and conduct leading to the better preservation and enhancement of environmental quality, and cooperate with provincial governments or agencies thereof, or any bodies, organizations or persons in any programs having similar objects...¹⁷

This provision has allowed the federal government to establish standards for pollution and contaminant emissions, as well as providing for the maintenance of positive intergovernmental relations in environmental regulation. Nonetheless, the federal government's power is confined to an advisory status since the provinces are responsible for the implementation of Environment Canada objectives. Given the complexity of environmental issues, the federal government needs to take a stronger role in ecological preservation. Comprehensive federal legislation that institutes and enforces rigorous standards is necessary to prevent further environmental harm. The reluctance of the federal government to do so, has resulted in a piecemeal approach that neither adequately addresses environmental matters, nor provides a strong commitment to ecological preservation. Federal authority should not be limited by a division of

powers over a century ago, that did not, and could not, realize the possibility of national or international environmental degradation. If the federal government continues to be guided by the rules of the past, it may find that there is no future to rule.¹⁸

FEDERAL POLICY ON THE ENVIRONMENT

Due to the division of powers, federal policy on the environment throughout the past century has been extremely narrow. At first, there was no need for any policy because of the belief that Canada had unlimited resources for human use.¹⁹ However, resource depletion caused the federal government to enact legislation to conserve such a vital base for the Canadian economy.²⁰ Pollution, on the other hand, was of little priority before the late 1960's, because it was generally perceived as a private or local matter of interest.²¹ The development of environmental policy is, thus, one of natural resource conservation rather than the ecological preservation.²² Discussed below are seven periods of natural resource policy as characterized by Thomas Burton.

Doctrine of Usefulness, late 1800's

Upon Sir John A. Macdonald's re-election in 1878, the government instituted an economic policy regarded as the 'doctrine of usefulness'.²³ According to this doctrine, the land and its resources were useful in so far as they helped to promote the economic growth of the nation. Although enacted prior to Confederation, the *Fisheries Act* of 1865 was indicative of this policy.²⁴ The usefulness of fisheries to the economy was of such importance, that it needed legislative protection from wastes entering water resources. Under section 18(2), the Act stated that

lime, chemical substances or drugs, poisonous matter (liquid or solid), dead or decaying fish, or any other deleterious substance, shall not be

drawn into, or allowed to pass into, be left or remain in any water frequented by any of the kinds of fish mentioned in this Act; and saw-dust or mill-rubbish shall not be drifted or thrown into any stream frequented by salmon, trout, pickerel or bass, under a penalty not exceeding one hundred dollars.

Because this statute was solely for the purpose of preserving the fishing industry, any environmental protection which ensued was purely incidental. Once the lumber industry became a major source of economic revenue for the nation, the extent of protection for fisheries was qualified.²⁵ Today, the *Fisheries Act* functions as both resource management and water quality control for those waters frequented by fish; an unintended growth of earlier legislation that emphasized only the protection of fish.

The Conservation Movement

The Canadian Conservation Movement was fostered in the 1890's under the influence of its American counterpart, which received respectability during the presidency of Theodore Roosevelt. Conservationists "emphasized developing water resources, making the best use of the benefits of land, and managing forest resources so as to secure adequate supplies of timber for the medium and long-term future".²⁶ Although criticized as being unrealistic purists, the Conservation Movement was primarily made up of business professionals who had an interest in conserving natural resources for future use. This became apparent at the Canadian Forestry Convention of 1906, where delegates met to discuss

the desirability of holding the forests under Crown ownership, of taking measures to protect the forests from fire and insects, of greater forestry education at the professional level, of the adoption of professionally acceptable forestry practices by timber operators, and of an extensive program of tree planting on both private and public lands, including the afforestation of denuded areas around the sources of river systems.²⁷

The emphasis on these issues was not for preserving the pristine quality of forests, but rather, for managing forest resources for the efficient operation of the lumber industry.

Conservation of forests led to discussions over the management of other natural resources at the North American Conservation Conference in 1909. Delegates from Canada, the United States and Mexico drew up a Declaration of Principles in regard to forests, waters, lands, minerals, and wildlife, stressing that "all resources were to be developed, used and conserved for the future, *in the interest of mankind*".²⁸ The declaration made specific proposals with respect to individual resources and proposed that participants to the conference establish a Commission of Conservation in their countries to promote the basic principles of the declaration. Canada followed through on the recommendation, creating the Commission of Conservation in May 1909, under the government of Sir Wilfrid Laurier.²⁹

The Commission of Conservation, 1909-1921

Under the chairmanship of Clifford Sifton, the Commission promoted principles of conservation, rather than protection of natural resources. According to Sifton, economic growth and conservation were complimentary objectives since "the best and most high economic development and exploitation in the interests of the people can only take place by having regard to the principles of conservation".³⁰ Research in the fields of forestry, lands, fish and wildlife, water, minerals, and public health undertaken by the Commission, was for the purpose of determining the extent of conservation necessary for economic development, not ecological preservation.³¹ The Commission

was dissolved in 1921 because it began to resemble a federal government department, interfering with functions of other established departments.³²

During this same period, two important conservation initiatives took place. In 1911, Parliament enacted the *Dominion Forest Reserves and National Parks Act* for the maintenance, protection and reproduction of timber; conservation of minerals, protection of animals, birds, and fish; and the maintenance of conditions favourable to continuous water supply.³³ Read in conjunction with section 17, which provided for the creation of regulations, conservation of natural resources was for the purpose of facilitating the efficient use of timber, mines and lands, while the protection of animals was to preserve gaming resources. In 1917, the *Migratory Birds Convention Act* was passed to protect certain migratory birds in Canada and the United States.³⁴ Yet again, the utilitarian nature of conservation efforts appeared in the preamble, which stated that such birds needed to be protected from extermination because of their "great value as a source of food or in destroying insects which are injurious to forests and forage plants on the public domain, as well as to agricultural crops".³⁵ Under the terms of these acts and the reports of the Commission, conservation of natural resources would only ensue if it was beneficial for human purposes or economic development.

Development and Exploitation, 1920s

For Canada, the 'Roaring Twenties' involved a period of rapid economic growth based primarily on the use of forests. Natural resource policy again focused on the efficient management of forest reserves to promote the most economical exploitation of timber.³⁶ In particular, management discussions entailed the prevention of forest

fires, which were the major cause of depleting forests.³⁷ Public health also became a concern during this period, with the purification of urban drinking water and the extension of solid waste disposal services to reduce the incidence of death resulting from water-borne diseases.³⁸ Policy with respect to exploitation soon came to an end with the stock market crash in 1929 and the Depression.

The Depression, 1930s

The decade following the Wall Street Crash promoted a broadening of natural resource policy to compensate for the slump in world trade. Both the federal and provincial governments were directly involved in resource planning and management to make expansion of resource activity possible.³⁹ Although forest management was still a major priority, efforts were made to expand the agricultural sector of the economy. The *Prairie Farm Rehabilitation Act* of 1935 upgraded the pasture status of marginal agricultural land through irrigation projects to broaden the production of crops away from wheat.⁴⁰ However, diversification policies did not last very long with the coming of the Second World War. From 1939 to 1945, Parliament promoted industrial expansion at any cost, resulting in the exploitation of natural resources to ensure economic efficiency and the successful propagation of the war.⁴¹ Unfortunately, the practice of subordinating natural resources to the pursuit of economic efficiency has been a difficult habit to break.

The Postwar Years

After the War, federal policy continued to emphasize economic growth. The Dominion-Provincial Conference on Reconstruction was created in 1945 to make

recommendations regarding natural resource conservation and agriculture to create employment for demobilized soldiers, sailors, and airmen, and to shift production from a wartime to a peacetime basis.⁴² Additionally, the federal government promoted the exploitation of energy and mineral resources, and the building of transboundary transportation networks.⁴³ Federal policy changed its focus during the 1950's, when it began to establish legislative and administrative mechanisms for the regulation of pollution.⁴⁴ The first steps toward abating pollution were initiated in 1952 with the reenactment of the *National Harbours Board Act*,⁴⁵ the *Navigable Waters Protection Act*,⁴⁶ and the *Canada Shipping Act*.⁴⁷ Each of these acts permitted Cabinet to make regulations with respect to the dumping of substances into Canada's waterways. However, regulations were meant to facilitate navigation for the shipping industry, instead of protecting the quality of water.

Nationalism and the New Conservation Movement, since mid-1960's

The 1960 Resources for Tomorrow Conference held by the federal and provincial resource departments sparked a new beginning for the Conservation Movement. Acutely aware of the need to manage resources to meet the demands of increasing world competition, the federal government emphasized conservation as a means to benefit economic policy.⁴⁸ Pollution also gained political attention at the 1966 Pollution and Our Environment Conference. Prompted by the increasing severity of pollutants and industrial wastes being emitted into the environment, the conference formulated an overview of the state of knowledge with respect to the sources and effects of pollution, and the legislative and technical means for its control.⁴⁹ A major

step forward for the federal government was the creation of the Department of Environment in 1971 to oversee and develop policies with respect to environmental protection.⁵⁰

An era of piecemeal federal legislation to deal with the threats to humanity's environment was instituted during the 1970's. Beginning in 1970, Parliament introduced the *Canada Water Act*,⁵¹ the *Arctic Water Pollution Prevention Act*,⁵² and the *Northern Inland Waters Act* to regulate water pollution.⁵³ Air quality was governed by the *Clean Air Act*⁵⁴ of 1971, while the *Environmental Contaminants Act*⁵⁵ of 1975 regulated the emission of toxic substances. Although the appearance of a vast array of pollution regulation statutes suggests that the federal government was taking greater steps to protect the environment, these legislative policies were instituted for utilitarian purposes: to promote economic growth; to protect navigation; and to safeguard human health.⁵⁶ The implication of such management policies for the environment, is that protection will be provided only to the extent that it is required to protect human interests not those of the ecosystem.

Implications of Federal Resource Policy

The evolution of environmental policy in Canada has been made up of two major forces. Federal legislation has emphasized either the exploitation and development of natural resources to promote economic growth or the conservation of resources for future human needs. The motivation for both variations was the purpose that natural resources served for humanity, rather than their inherent value. Failing to consider ecological integrity in policy-making, however, has caused environmental

protection to be inadequate. Despite conservation and pollution policies, thousands of acres of forests have been destroyed, waterways have disappeared, fisheries have been depleted and pollution has increased. Employing a standard of protection that is sufficient only for human purposes, permits the continued degradation of resources and areas that have not yet been deemed to be of value to humanity. But, aspects of the ecosystem that may not be useful to humans have an inherent value of their own that require protection from destructive human activities. For example, forests are valuable for purposes other than human consumption, including wildlife habitat, photosynthesis and the prevention of land erosion. The conservation of a certain amount of forests only for human purposes, however, neglects these other significant aspects and the damage that may ensue as a result of inadequate human standards of conservation. If federal environmental policy continues to be ruled by anthropocentric ideals, those parts of the ecosystem that require a higher degree of protection may be susceptible to destruction. Despite this failing, there is an additional element of environmental policy-making that is responsible for inadequate protection and the anthropocentric view of the ecosystem. The fact that government was in partnership with industries responsible for ecological degradation, warrants an examination of the role that politics plays in environmental protection.

THE POLITICS OF ENVIRONMENTAL LEGISLATION

Environmental policy-making in Canada has been politicized by the involvement of groups seeking to have their interests legitimized. Dominating the political arena are industries which argue for the disposal of untreated wastes into the environment due to

costly control measures.⁵⁷ Although these industries would prefer to have sole entitlement to the use of the environment, there are other interest groups that have equally valid, but conflicting claims. These include: industries that need the environment in a natural state; health officials; recreationalists; aesthetics; conservationists and preservationists.⁵⁸ Interest in the environment differs for each of these groups according to the purpose it serves for humanity and economic growth.⁵⁹ Although these groups have voiced their concerns, they have not been as successful as polluting industries in gaining political recognition because of their lack of political resources. According to Dahl, political resources are the "means by which one person can influence the behaviour of other persons."⁶⁰ Of significance are: money; information; access to government decision-makers; and public support.⁶¹ Polluting industries have been most successful at influencing environmental legislation because they possess the greatest amount of political resources.

Inadequate and inefficient environmental legislation can, in part, be attributed to the way in which industries have utilized their political resources to influence the public and policy makers. First, they are in the best financial position to pursue their claims because

some of the polluters on which the potential impact of environmental regulation is most significant are firms with hundreds of millions, if not billions, of dollars in sales and assets, which operate on a national, if not a transnational, scale.⁶²

Firms use their financial resources and economic terrorism, by threatening plant shut downs that would result in unemployment and economic loss for the country, to influence legislation in their favour.⁶³ The tendency to use financial pressure has led

to a negotiation process with the government to arrive at a compromise that is beneficial for both parties. Negotiation of environmental legislation is also a result of the government's reliance on industries to provide information regarding pollution processes and abatement potentials. Because the government and other lobbyists do not have the revenue to generate scientific evidence of pollution effects, industries provide the majority of information relied upon for policy-making, some of which may be filtered to sway legislation in their favour⁶⁴ Finally, industries have 'functional relationships' with ministers and departmental officials who act as "powerful allies in intergovernmental debates about the nature, extent, and enforcement of environmental policy".⁶⁵ Government officials have also adopted a policy of forbearance, relying on promises of future compliance to grant present immunity for the non-compliance.⁶⁶ Combined, these political resources give industries a stronghold in environmental policy-making.

The nature of environmental policy-making and enforcement as a bargaining process between government and industry has effectively limited public participation. Most public interest groups do not have the same political resources available to them to support their claims and influence legislators. Moreover, because environmental legislation has been perceived as a matter between industries that pollute the ecosystem and the government that acts as a public representative, there was no need to involve the public.⁶⁷ Issues were confined to the economic costs and benefits for industries and the state, excluding social, health and ecological implications.⁶⁸ The lack of public participation supporting these additional concerns suited industrial purposes,

since environmental legislation could reflect a bias not to inhibit economic growth. However, citizens are increasingly demanding a voice in the political process to ensure the representation, consideration and endorsement of ecological and other social concerns in the decision-making process. This can only be accomplished once citizens and environmental groups obtain political resources equivalent to that of industries. Without public participation, environmental policy-making will continue in secret, with no guarantee that the interests of the environment or public are being protected.

Effective protection of the ecosystem seems doubtful when the process of creating environmental legislation has been dominated by one side of the issue. Given the government's unwillingness to enact statutes that would protect the ecosystem, and the stronghold of industries in the decision-making and enforcement processes, environmental degradation may continue far into the future, free of any significant regulation. Despite the existence of other interest groups and environmental organizations, it is difficult for them to have any meaningful political influence, when they lack the financial and informational resources of industries. Moreover, environmentalists have very little to offer politicians, except a chance at continued human survival, which seems insignificant in comparison to industries' promise to provide immediate economic wealth and continued prosperity for the country. Essentially, environmental policy has reflected the dominant values of society - that of 'economic growth', a value that can only be developed through the direct involvement of those who make this growth possible: polluting industries.

THE LUMBER INDUSTRY

The politicization of environmental policy is a well-founded practice, dating back to the mid-nineteenth century. As Canada's most prominent economic industry, lumbering interests used their political resources to influence legislators not to enact laws that would inhibit its economic growth. For almost forty years, between 1865 and 1903, the Ottawa lumber industry lobbied against legislation that would prohibit the deposit of mill refuse into Canada's waterways. It was a practice of saw mills to drop waste through floor-boards directly into the water, where it would sink to the bottom of the river and obstruct navigation, deplete fish stocks, reduce the quality of drinking water, cause explosions and emit noxious odours.⁶⁹ Despite the seriousness of the ecological harm, the lumber industry succeeded in convincing legislators to delay remedial legislation until it became expedient for lumbermen to save their waste and use it for fuel or pulp and paper production.

Concern for waterways was first elicited by the fishing industry who identified a decline in fish populations as a result of the deteriorating quality of water⁷⁰ Lobbying by this group encouraged the enactment of the 1865 *Fisheries Act*. The Act prevented any deleterious substance from being discharged into waterways and specified that

sawdust or mill rubbish shall not be drifted or thrown into any stream frequented by salmon, trout, pickerel or bass, under a penalty not exceeding one hundred dollars.⁷¹

Despite the prohibition against dumping mill refuse, the lumbermen continued to deposit waste into waterways, claiming that it was impossible to prevent sawdust from

falling through the floors, and that the installation of equipment to collect the it would be greater than the cost of sawing lumber, forcing them to abandon their business.⁷² After hearing the lumber industry's arguments and a proposal for compromise, the government relented, allowing mills to continue dumping sawdust, as long as they discontinued discarding slabs of wood into the water.

While the compromise favoured the lumber industry, it did little to ameliorate the damage to the waterways. Prompted by Liberal M.P Richard Cartwright, the federal government conducted extensive surveys of the major areas of lumber activity in Ontario and Quebec, concluding that mill waste was an agent of deterioration in rivers, which created actual or potential interferences with navigation.⁷³ In light of the threat to navigation, the government enacted the *Navigable Streams and Rivers Act* in 1873, prohibiting mills from dumping sawdust into waterways.⁷⁴ Not wanting to destroy the viable lumber industry, the government gave mill owners the opportunity to apply for an exemption from the Act if they could show that the public interest would not be unjustly affected. Essentially, this acted as an open invitation for the lumbermen to proceed with their polluting practices, since the 'public interest' could be defined as the community's economic reliance on the lumber industry. If the mills were forced to discontinue dumping sawdust, they would be forced to close down, (so they claimed), forcing communities out of work. Such an occurrence could not be viewed as in the interest of the public!

Refusing to comply with the new legislation, the lumber industry exerted pressure on the government for permission to continue sawdust dumping without

penalty. It maintained earlier arguments that sawdust was not an obstruction to navigation, that fish life was of little importance compared to the lumber industry, and that they should be allowed to continue dumping sawdust.⁷⁵ The lumbermen also had citizens, who relied on the lumber industry for their economic livelihood, and parliamentary representatives of other counties to sign petitions supporting their claim.⁷⁶ Despite a government study in 1877 that confirmed the threat to fish life and navigation, mills along the Ottawa River were exempted from the prohibitions against the discharge of sawdust.⁷⁷ By using their status as Canada's most important industry, the lumbermen were able to convince legislators and the public that any regulation of sawdust dumping would threaten the industry, and by implication the economy of Canada. Legislators further depended on the biased information provided by the lumber industry, stating that sawdust had no detrimental effect on navigation or fisheries, rather than their own evidence which demonstrated the contrary. Moreover, the lumbermen used their political ties with ministers to support their interests. All of this lobbying preserved the *status quo* in the debate, permitting sawdust dumping to continue.

Legislative opposition to the harmful practices of lumbering began to develop when Senator Francis Clemow brought a motion in 1888 to enforce the *Fisheries Act*.⁷⁸ However, the influence of one concerned senator was not enough to compel the legislature to alter its partiality toward the lumbermen. Even the death of a child and near fatal explosions caused by the refuse did not sway the legislature to enforce compliance with the Act.⁷⁹ But, some senators were becoming aware of the political clout held by the lumber industry, especially Senator McClellan who noted that

it seems almost impossible for the Government...to enforce the regulations arising, not from an increase of the number of lumbermen, but mainly because their political influence is more concentrated and they are better able to bring it to bear on the Government, the consequence being that the interest of the lumbermen is better served in that way than the interest of the people.⁸⁰

Despite the recognition that the political industry was in control of legislative measures affecting its interests, the Senate continued to dismiss the severity of the sawdust problem.

A decade passed before the federal government decided to take strong remedial action requiring mills to abate their polluting practices. Any exemptions for sawdust dumping that had been previously granted under the *Fisheries Act* were not to be extended beyond January 1, 1899.⁸¹ However, this was not a defeat by the federal government. The lumber industry had realized that their future depended on the conservation of forests, and began utilizing mill waste for fuel or pulp and paper production, or simply installed burners to dispose of the sawdust.⁸² By 1903, sawdust emissions were eliminated. But, the price of protecting Canada's waterways was not without costs. In addition to the great length of time it took to enforce anti-dumping statutes, the burning of mill refuse only led to the pollution of the air. Moreover, the change to pulp and paper production continued the abuse to waterways, as a result of chemical wastes.

Legislation that was finally enacted to protect Canada's waterways was not meant to preserve their intrinsic value. The campaign for strict compliance of anti-dumping legislation was led by shipping and fishing industries who had an economic interest in maintaining the Ottawa River in its natural, clean state, rather than a concern

for its intrinsic value.⁸³ However, their efforts were insignificant compared to the political clout of the lumbermen who were assured that the government would do nothing to harm its most prestigious industry. There was no need for compliance, when the lumber industry could claim that remedial measures were too costly, would cause the industry to close down, and would result in economic disaster for communities that depended on it for survival. Of course, the threat was not so real. The lumbermen refused to comply because of the added expense they would incur on the cost of doing business, a sum that would hardly cause economic ruin. By employing experts to disprove the claims of harm that sawdust caused to navigation and fishing, the lumber industry was able to use this evidence to further convince legislators not to prohibit sawdust dumping. Moreover, the relationship that the lumbermen had with ministers helped to advance their interests and cause legislators to be sympathetic to their needs. Combined together, all of these political resources worked in the lumber industry's favour, by impeding effective protection of Canada's waterways.

In comparison to the lumbermen's resources, fishing and navigation interests had little hope. First, their industries were not as important to Canada's economic prosperity and the federal government had difficulty justifying the subordination of one large industry in favour of two lesser ones. Given the inferior status of these industries, they had fewer political supporters, which made it arduous to enact statutes supporting their interests. Moreover, these groups lacked information, and depended on the government to produce findings that confirmed the harm to fishing and navigation caused by sawdust. But even with evidence that supported their claims, the government

relented in favour of the lumbermen. Stringent enforcement of sawdust legislation did not occur until public health and safety became an issue in the late nineteenth century. But even then, it took a decade before compliance was actually achieved.

While other economic interests may have found it arduous to compete, both economically and politically, the sawdust issue also had grave repercussions for public participation in environmental legislation. The scare tactics employed by the lumbermen were useful in gathering the support of people not wishing to suffer the consequences of industry closing. Fearful of economic demise, communities would rather tolerate the harm caused to the environment than initiate legal action that could potentially cost them their jobs. Unfortunately, the federal government used the lack of public dissent, both in suing the lumber industry for its nuisance and in writing petitions demanding stricter legislation, as an excuse not to enact prohibitive legislation due to the population's apparent acceptance of the sawdust problem.⁴⁴ Public participation that demonstrated concern for the environment was, therefore, extremely limited and was meaningless due to the political lobbying of the lumber industry.

Given the difficulty experienced by competing economic interests and the general public to end sawdust dumping, one can imagine the problems a group interested in preserving ecological integrity might have. The protection of waterways for their own value could not possibly justify the economic ruination of the lumber industry, if the economic interests of other industries were barely enough to evoke change. By the titles themselves, the *Fisheries Act* and the *Navigable Waters Protection Act*, it is obvious that the underlying purpose of these statutes was to protect

the fish and waters for human interests, not the value they possessed in themselves. But, the anthropocentric emphasis was insufficient to protect Canada's waterways, which still suffer from the effects of sawdust.⁸⁵ Nonetheless, we have yet to learn from our past, since environmental legislation continues to emphasize protection for human purposes.

TWENTIETH-CENTURY ENVIRONMENTAL LEGISLATION

Immediately after the sawdust issue, there was very little federal legislation dealing with the environment. This can be attributed to the federal government's policy on developing and managing resources for the economic prosperity of the nation. During an era with two World Wars, it is not surprising that the government emphasized economic growth, ignoring the consequences it might have on the environment. Even at the provincial level, which had the authority to manage its own properties and resources, legislation with respect to the environment was minimal.⁸⁶ Federal environmental policy did not become prominent until the 1950's, when it began to evolve in stages until the 1980's. Water pollution continued to be a major concern, because of humanity's dependency on a safe water supply for survival. In the 1960's and early 1970's, air pollution and the emission of toxic chemicals were recognized as serious problems requiring a federal response.⁸⁷ Despite the enactment of legislation specifically dealing with ecological degradation, regulation of pollution continued to be dominated by anthropocentric concerns. Environmental protection was still incidental to the preservation of quality for human uses. Moreover, industries' continued

stronghold in the political arena restricted public participation. Federal environmental legislation during this era continued to be inadequate.

Water Pollution

When federal policy on water pollution began to develop in the 1950's, the primary purpose was to preserve fisheries and ensure safe navigation. The National Harbours Board By-law passed in 1954 under the authority of the *National Harbours Act*, prohibited anyone from throwing anything into water or harbours which may cause obstruction or danger to navigation, damage to vessels or property, cause any nuisance, or endanger life or health.⁸⁸ An amendment to the *Canada Shipping Act* in 1956 enacted the provisions of the International Convention for Prevention of Pollution of the Sea by Oil, prohibiting the discharge of a certain density of oil into Canadian and other waters within 100 miles of land.⁸⁹ In the event that some discharge of oil needed to be made, it was to be done "as far from land as practicable".⁹⁰ The regulation of oil pollution only within an area harmful to humanity neglects the transient nature of water, in addition to the impact it has on aquatic life, regardless of where the oil is discharged.

Amendments to earlier legislation dealing with water quality continued in the 1960's. The *Fisheries Act* was still the most significant federal legislation with respect to water pollution, because of its applicability to any waters inhabited by fish. An amendment in 1970 provided a prohibition against the deposit of any waste in any place where the waste may enter water frequented by fish, thereby expanding the application of the Act and increasing water protection.⁹¹ Also amended was the *Navigable Waters*

Protection Act. The amendment regulated the dumping of substances in navigable waters to areas with more than 20 fathoms of water, unless Cabinet declared those waters to be exempt from provisions.⁹² According to these amendments, dumping regulations were still for the purpose of protecting navigation and the fishing industry.

In 1970, the federal government enacted a series of statutes specific to the protection of water. The *Canada Water Act* was introduced in light of the rapid increase in threats to the health, well-being and prosperity of people caused by water pollution, and the need for research and planning for the conservation, development and utilization of water to ensure its optimum use for the benefit of all Canadians.⁹³

Accordingly, the Act prohibited the dumping of

any substance that, if added to any waters, would degrade or alter or form part of a process of degradation or alteration of the quality of those waters to an extent that is detrimental to their use by man or by any animal, fish or plant that is useful to man.⁹⁴

Waste may only be discharged upon payment of an effluent discharge fee specifying the quantity and conditions of the discharge. The *Northern Inland Waters Act* also prohibited the dumping of waste causing detriment to humanity's use of water, unless the waste was discharged in accordance with conditions of a license or authorized by regulations.⁹⁵ Similarly, the *Arctic Waters Pollution Prevention Act* regulated arctic water pollution, in recognition of the exploitation of natural resources in the arctic area that are of potentially great significance to international trade and commerce and to the Canadian economy.⁹⁶ Despite the claim to be protecting the public's interests, the only opportunity for public participation was found in the *Canada Water Act* which

provided public information regarding the conservation, development or utilization of water resources.⁹⁷

The final statute relevant to water quality is the *Ocean Dumping Control Act* of 1974. This Act provided for the same regulations as the 1970 statutes, prohibiting the dumping of waste into oceans by any aircraft or ship, except in accordance with the terms and conditions of a permit. Factors considered in the granting of a permit were the nature, frequency and site of the substance being discharged.⁹⁸ Unlike its predecessors, the *Ocean Dumping Control Act* permitted the public to present complaints regarding the granting or terms of a permit before a Board.⁹⁹ This Act was the last statute to be enacted, providing a "comprehensive" approach to protecting all of Canada's waters from pollution.

Air Pollution

Federal legislation dealing with air pollution was first developed in 1964. Under the authority of the *Canada Shipping Act*, Cabinet introduced air pollution regulations prohibiting the emission of smoke by ships, in a greater density than the maximum density authorized, within one mile of land.¹⁰⁰ Other than these regulations, there was no other legislation dealing with the protection of air quality until the enactment of the *Clean Air Act* in 1971. By virtue of this Act, the federal government had the authority to set national air quality objectives and emission standards to prevent air pollution from endangering the health of persons and animal life, interfering with the normal enjoyment of life or property, or causing damage to plant life or property.¹⁰¹ To facilitate the formulation, coordination and implementation of policies designed for the

control and abatement of air pollution, the federal government could enter into agreements with the provinces.¹⁰²

Toxic Chemicals

Toxic chemicals first became a concern of the federal government after learning of the detrimental effects of pesticide use. While the *Pest Control Products Act* of 1969 governs the manufacture, control and use of all pesticides in Canada,¹⁰³ it was not until 1975 that the federal government took actions to manage toxic chemicals. The *Environmental Contaminants Act* was deemed to be Canada's main approach to protecting public health and the environment from toxic substances. According to regulations, no release of substances was to occur in a quantity or concentration that exceeded the maximum quantity.¹⁰⁴ However, only five toxic substances were regulated, perhaps as a result of negotiations held with industry representatives on two drafts of the Act.¹⁰⁵ The public was given an opportunity to participate at a Board of Review, which inquires into the threat of a substance.¹⁰⁶ Although this Act was the main approach to protecting the environment from contaminants, it had a limited scope in both protection and public participation.

Problems With Twentieth-Century Legislation

Despite efforts by the federal government to enact environmental legislation, its piecemeal regulatory approach is inadequate to protect the ecosystem. First, with the exception of the *Environmental Contaminants Act* that refers to the protection of the environment, all other statutes have been enacted to protect the human interests in the environment. Pollution legislation is only meant to protect air and water quality to the

extent that is sufficient for human survival or needs, excluding the possibility that other animal and plant species may not be able to survive on the standard endurable by humanity. In particular, water pollution legislation aims to protect only those species which are useful to humans, implying that anything with no value to humanity will not be protected by more stringent standards.

Beyond the lack of care for the environment itself, the legislation does not provide enough protection for human concerns in the ecosystem. The language used to stipulate the responsibilities of the Minister of Environment are enabling in character, meaning that the Minister is given the power, but is not required, to enact regulations.¹⁰⁷ Effective protection of the environment, however, cannot be guaranteed if the Minister has no clear responsibility to develop legislation. Even if the Minister used his/her power to create stringent regulations, their enforcement could not be guaranteed. Due to the B.N.A. Act, most of these federal provisions operate only as guidelines and are not legally enforceable, except to the extent that they are incorporated into provincial legislation.¹⁰⁸ Without the cooperation of the provinces, strict guidelines and regulations will be of little use in the protection of the environment.

Paul Emond has identified several other problems with respect to the 'residual control legislation' used to protect the ecosystem. According to him, these statutes are reactive, regulatory and work on a case-by-case basis in dealing with environmental degradation.¹⁰⁹ Federal environmental legislation is reactive because it is designed to respond to existing pollution issues by correcting problems after they have arisen,

rather than anticipating ecological problems that might occur.¹¹⁰ Only once the damage is realized, often several years after it began, is legislation enacted to protect utilitarian interests in the environment. But this legislation is simply meant to remedy the problem through regulation or abatement, instead of preventing the problem.¹¹¹ The use of licenses or effluent fees exemplifies this, by allowing industries to pay for their pollution, instead of looking for ways to deter pollution practices. Even more problematic is the tendency of legislation to deal with pollution on a case-by-case basis of the specific problem, narrowly reacting to air pollution, for example, as a single issue, excluding its interrelationship with solid waste disposal or water pollution.¹¹²

In theory, this residual control legislation could be effective in protecting the environment if it had strict regulations dealing with every aspect of the problem. Such is not the case, however, when policy-making and enforcement of regulations are negotiated with industries. A study conducted by Andrew Thompson in 1981 concluded that bargaining and negotiation characterized the regulatory process.¹¹³ He noted a pattern of repeated extension and renegotiation of compliance deadlines for pollution abatement, allowing months and years to pass before regulations are met. Moreover, the Ministry responsible for regulation enforcement appears to go to any length to avoid confrontation with industries not in compliance with regulations.¹¹⁴ This leads to a delay in environmental protection and allows industries to maintain an upper hand in the process. Given the tendency of the government to conduct private consultations with the affected firms, the public is effectively precluded from contributing to the decision-making and enforcement process.¹¹⁵ Since public

hearings are based on an adversarial process, social and ecological concerns are submerged by the need to make technical arguments on the scientific nature of pollution.¹¹⁶ The public is not considered to have contributed anything valuable to the process, and is generally only consulted after regulations and enforcement have been agreed upon by industries and the government. In light of these problems, the federal government took steps to develop measures that were pro-active and anticipatory in nature.

In Response to the Problems

Environmental impact assessment was heralded in the mid 1970's as the essence of enlightened environmental legislation for the future.¹¹⁷ In 1973, the Federal Environmental Assessment and Review Office (FEARO) was established to assess the impact of federal works and undertakings. Because FEARO had no legislative basis, the federal government was not required to conduct an assessment of all its undertakings, and guidelines were developed in 1984 under the Environmental Assessment and Review Process (EARP) to clarify the assessment procedure.¹¹⁸ EARP was designed to enable the government and public to participate in the planning and developing process, by becoming involved in assessing both the potential impact and the environmental, social and economic desirability of a proposed undertaking.¹¹⁹ But, a formal review and public hearing into the matter only takes place if the initial screening process indicates that the potential environmental impacts are significant.¹²⁰ Based on the review, the panel may then recommend that the project proceed with or without recommendations, or that the project not proceed at all.

While the process has the potential to be effective in preventing ecological damage, it has several problems that limit its power. First, environmental impact assessment is limited to federal projects, excluding the public sector which is primarily responsible for ecological harm, unless federal funds are provided. Secondly, assessment is dependent on the department promoting the project to initiate the process.¹²¹ Because EARP is a set of guidelines and not legislated, the federal government could exempt undertakings from the process. This changed in 1989 and 1990, however, as a result of two Federal Court of Canada decisions which obligated the federal government to conduct an assessment of all its undertakings, because EARP procedures were set out in regulations.¹²² Despite these rulings, public hearings under EARP are purely advisory, imposing few firm obligations on anyone.¹²³ Although the process has some potential to provide a systematic review of the environmental consequences of an undertaking, these inefficiencies result in a procedure that is sporadic and not necessarily obligated to environmental protection.

The final factor which may be responsible for the ineffectiveness of environmental impact assessment is the poor quality of public hearings. Although the process was designed to facilitate public participation in environmental decision-making, it is adversarial in nature.¹²⁴ Public hearings are formal and in the control of lawyers and expert witnesses who sway discussions toward scientific issues, excluding the social and ecological issues the process was meant to address. The process continues to be dominated by a 'win-lose' characteristic, so that economic interests assert their claims through extensive financial and informational efforts to establish the minimal impact

of the undertaking. Due to the financial limitations of the public and the lack of scientific evidence for social or environmental concerns, the public and the environment are often on the losing side of the battle, with inadequate proposals being recommended. Despite the recent enactment of the *Canadian Environmental Assessment Act*, public access to decision-making is still restricted.¹²⁵ Although the public is given both access, and the opportunity, "to comment on draft guidelines, codes of practice agreements, arrangements, criteria or orders",¹²⁶ as well as to participate in the screening and report of a project,¹²⁷ no provisions are made for public funding in the process. But, without funding, the public is unable to hire the requisite lawyers and expert witnesses needed for the process, and is therefore, unable to truly participate.

Given the problems of both the remedial control legislation and the environmental impact assessment process, the federal government has taken one final step to develop environmental legislation. The 1988 *Canadian Environmental Protection Act* (CEPA) was a 'comprehensive' effort by the federal government to provide protection from the effects of air, water and toxic chemical pollution.¹²⁸ In conjunction with EARP, the public was to be given ample opportunity to become involved in environmental decision-making, allowing for a more effective approach to ecological protection. The following chapter will illustrate, that not unlike its predecessors, CEPA provides no greater opportunity for significant public participation or for substantive ecological protection. Despite recognition during the 1960's of the severity of ecological degradation, the federal government has not taken adequate steps to prevent continued damage to the ecosystem.

CONCLUSION

Within a century, federal legislation dealing with the environment has undergone very little change. Preambles for statutes enacted during the past twenty years, indicate that environmental statutes are for the purpose of preserving either the economic or health interests humanity has in establishing a standard of environmental quality. However, the level that is determined is based on negotiations with industries which are more concerned with the harm strict legislation may have on their economic interests, than with the detrimental effects of their polluting practices. Because of their political resources, industries have been extremely influential in developing legislation that suits their needs. The same tactics used by industries and recognized by the government in the late nineteenth century, continue to be employed. The federal government has failed to take an authoritative role in protecting the environment, perhaps because of its own interests in developing the national economy. And throughout this period, the public has been denied access to the decision-making process because of its lack of economic or informational resources to present a claim for ecological preservation. One cannot help thinking that the process itself was designed to give the impression of being concerned with environmental protection, without having to develop any policies that would provide substantive ecological preservation.

CHAPTER III - THE CANADIAN ENVIRONMENTAL PROTECTION ACT

In an effort to intensify and consolidate federal environmental legislation, the government passed the *Canadian Environmental Protection Act* (CEPA) in 1988.¹ To date, CEPA is the most comprehensive of federal regulations devised to protect the environment and health of Canadians from toxic substances. The Act is meant to ameliorate previous statutes, by requiring the government to take both preventative and remedial measures to protect the ecosystem.² Unlike earlier legislation, CEPA is also meant to facilitate public participation in the making of decisions regarding the environment.³ While the Act is an improvement, it is also a disappointment to many citizens and environmental groups who believe that CEPA does not effectively protect the ecosystem or permit sufficient public participation in the process.⁴ Again, the same problems that were evident in earlier statutes and in the common law are present in CEPA; it does not value the inherent worth of the environment, nor does it truly provide public access to environmental decision-making.

Despite arguments by environmental groups that recognizing the value of the environment and permitting greater public participation in policy-making was important for protecting the ecosystem, CEPA did not institute the degree of value and participation requested by these people. The chapter will begin with a general overview of CEPA's purpose and developments with respect to environmental protection. An analysis of specific clauses will demonstrate how protection of the environment is still considered to be for human purposes, limiting the extent of protection available to the ecosystem. This will be followed by an examination of avenues available to the public

to participate in the process of protecting the environment from harmful activities. Although CEPA expands the realm of participation beyond that of earlier legislation, it does not completely open up the process to the public. Given these impediments, CEPA does not have the full potential to protect the environment to standards necessary for ecological survival.

OVERVIEW OF THE CANADIAN ENVIRONMENTAL PROTECTION ACT

As an 'all encompassing' environmental statute CEPA is designed to deal with the threat of toxic substances to the ecosystem and to authorize restrictions at any stage of a substance's life cycle. Regulatory measures are directed at detecting and controlling, if not preventing, any environmental and health hazards arising from new and 'man-made' chemical substances. In order to protect the entire ecosystem, CEPA adopted and replaced the *Clean Air Act*, the *Environmental Contaminants Act*, the *Ocean Dumping Control Act*, and Part III of the *Canada Water Act*.⁵ The incorporation of these statutes into CEPA was supposed to facilitate the formation of a well-rounded and comprehensive federal act to protect the environment. Unfortunately, this was more of a paper shuffle than an attempt to add any greater substance to environmental protection.

If anything substantial was added to CEPA, it was the policy on enforcement and compliance. The Act requires inspectors to investigate industries to verify compliance with the law to obtain evidence of violations, and to direct remedial measures or recommend prosecution for non-compliance.⁶ Included in the policy is a series of graduated enforcement responses, ranging from written warnings to injunctions

and prosecutions, depending on the seriousness of the violation. CEPA has also increased the maximum penalty to \$1,000,000 or 5 years imprisonment, allowing the offender to be convicted of a separate offence for each day the offence is committed or continued.⁷ In addition to violations of the Act, CEPA establishes offences for intentionally or recklessly causing a disaster that results in a loss of the use of the environment, or showing wanton or reckless disregard for the lives or safety of other persons.⁸ The Act also permits courts, upon conviction of a CEPA offence, to make additional orders, including directions for the offender to remedy the harm to the environment and to pay for research into the ecological use and disposal of the substance in question.⁹ In terms of compliance with the Act, CEPA is an improvement because it attempts to prevent violations through inspections, and to remedy the harm to the environment caused by non-compliance.

In spite of these developments, CEPA has the same major weaknesses as earlier legislation. Perhaps the failure of including the intrinsic value of nature and significant public participation in the process can be attributed to CEPA's origination as a paper change. Legislators may not have perceived a need to expand the realm of value or participation, despite arguments presented by environmental groups that their inclusion was necessary. Alternatively, the politics of industry may have played a important role, especially in the case of restricting public involvement. Although CEPA attempts to crack down on industrial waste emissions, the federal government incorporated a greater number of industrial demands in the legislation, frustrating the efforts of public interest groups to have the Act resemble an Environmental Bill of Rights. While the public

may be moving in an environmentally conscious direction, the federal government still appears to be driven by directives important to industries.

EVADING THE INTRINSIC VALUE OF THE ENVIRONMENT

Although the title of CEPA insinuates that its purpose is to protect the environment, preservation is once again in terms of what is necessary for human survival. In its preamble, the Act declares that "the protection of the environment is essential to the well-being of Canada".¹⁰ Depending on the way in which 'the well-being of Canada' is interpreted, protection may be for human purposes, rather than for the intrinsic value of the ecosystem. Well-being refers to "a state characterized by health, happiness, and prosperity",¹¹ things that are generally attributed to human welfare. Accordingly, the protection of the environment would be for the purpose of ensuring that Canadians can maintain their health, happiness and economic security. Unless 'Canada' is interpreted as including both citizens and the natural environment, protection is not extended to preserving the intrinsic value of the ecosystem. But, it is doubtful that 'the well-being of Canada' was meant to include the intrinsic value of the environment, since the declaration qualifies the protection *for* some other purpose, instead of stating that the protection of the environment is essential and necessary in itself.

Beyond the declaration, specific clauses in the Act reveal that its purpose is to protect the environment for human interests. This is evident in the interpretation of air pollution, toxic substances, and nutrients. Air pollution refers to any air contaminants that: "endangers the health, safety or welfare of persons; interferes with the normal

enjoyment of life or property; endangers the health of animal life; or causes damage to plant life or to property".¹² A substance is defined as toxic if it constitutes "an immediate or long-term harmful effect on the environment; a danger to the environment on which human life depends; or a danger in Canada to human life or health".¹³ Finally, a nutrient is a substance, that if added to water, will interfere with or degrade the use of aquatic vegetation used by human beings or by any animal, fish or plant that is useful to human beings.¹⁴ This latter definition completely ignores the relevance of protecting the intrinsic value of the environment by referring only to the interests that humanity has in the use of aquatic vegetation, or animals that feed on it, which are useful to humans. While the former definitions do refer to the environment as something that can be damaged in itself, the fact that protection of human health or use of the environment to humanity is also included seems to diminish the relevance of protecting the environment for itself. Although the federal government may have included human interests to make the Act all encompassing, it was not necessary since the protection of human health and welfare presupposes the protection of the environment.

The final aspect regarding the emphasis given to the protection of the environment for itself, is the limitations placed on protection. First, CEIA does not protect the environment from any kind of harm, since the establishment of regulations are restricted to only those substances that are covered by the Act.¹⁵ Thus, if there is a substance which is detrimental to the ecosystem but not governed by CEIA, like pesticides, the regulation and protection of the environment from toxic substances is not

all inclusive. Given that the regulations do not include all harmful activities to the environment, the offences, likewise, only refer to non-compliance with CEPA regulations. Even the clause which makes it an offence to cause reckless or intentional damage to the environment, limits liability to actions which contravene the Act.¹⁶ The penalties would, therefore, not apply to ecologically damaging actions unrelated to CEPA or that involve contraventions of other federal legislation. As recognized by the Canadian Environmental Advisory Council (CEAC), "this severely limits its (CEPA's) purpose of making all major crimes against the environment serious criminal offences".¹⁷ It is questionable how CEPA can be said to protect the environment, when it neither regulates nor provides remedies for all activities that are detrimental to the ecosystem.

By including human interests in the domain of ecological protection and limiting protection to only those activities governed by CEPA, the Act cannot be expected to preserve the environment to standards sufficient for the survival of the ecosystem. As earlier legislation has illustrated, environmental degradation has steadily progressed despite legal mechanisms to protect human interests in the ecosystem. It is possible that the connection of preserving the environment and protecting human health and welfare may undermine the capacity of CEPA to protect the intrinsic value of nature, because it has not truly altered the emphasis of legislation. This is further exemplified by the government's failure to make all serious damage to the environment a criminal offence. It implies that some detrimental activities can actually be justified. To really be an 'environmental protection' Act, CEPA should regulate all activities detrimental to the

environment, rather than a few which have been determined to be injurious to human interests in the ecosystem. In actuality, nothing which seriously damages the environment, regardless of the injury to human interests should be justified. Unfortunately, CEPA fails to acknowledge this.

RESTRICTIVE PUBLIC PARTICIPATION

There are several components of public participation that have been criticized in CEPA. These include limitations of public involvement in decision-making, restrictions regarding public access to information and the qualifications for seeking recourse for infringements of the Act. Despite provisions in the Preamble which encourage public participation in protecting the environment, CEPA does not facilitate as much public involvement as originally anticipated. Part of the reason is reflected in the arguments of industries who were adamant about not involving the public in a process that was strictly between the government and industries. The lack of public participation can also be attributed to the government's reluctance to grant rights to the public, which if improperly interpreted by the courts, could usurp the power of the legislature.

During the House of Commons Proceedings of the Legislative Committee on Bill C-74 (CEPA), several representations were made regarding the issue of public participation in the environmental decision-making process. Proponents of public participation asserted that the government had an obligation to give the public who is directly affected by environmental decisions, the opportunity to be heard and involved in the process of decision-making.¹⁸ To facilitate this involvement, the public would

require both access to environmental information, and funding to support the costs of participating in the process.¹⁹ Access to information and funding, resources that the public lacks, are prerequisites for meaningful participation and for influencing the legislature to accept and institute one's interests and concerns into law. Environmental groups argue, that through the provision of these resources, the government would in part fulfil its obligation to involve the public.

Industrial representatives on the other hand, steadfastly argued against public involvement within the legislative process. According to one spokesperson, Claude Forget, litigation or disputation in the process of deciding legislation and regulations "opens the door to the strengthening of the adversarial process in determining environmental policy", making the attainment of consensus more arduous.²⁰ By involving the public in policy-making, the realm of considerations would expand beyond economic issues. According to Forget, public participation

is not in keeping with our parliamentary tradition. It is not in keeping with the normal site of responsibility in our political system. It will lead to an argument or requests for amendments to the bill. The process becomes ever more one of confrontation between groups of citizens and involves parties, presumably the industry, on the other side.²¹

In other words, it lessens the power of industries to control legislation and regulation in their favour, since the government would be required to consider the interests of the public. Other representatives argued against the right of citizens to become involved in the enforcement of regulations, because of the invitation it gave people to attack others on mere suspicions of illegal behaviour.²²

Of greatest concern for industries, was preventing public access to confidential information. Representatives contended that drafts of the bill contained too many provisions that would make industrial type information available, jeopardizing Canadian competition.²³ There seemed to be a general fear, that the release of environmental information to the public would disclose trade secrets and valuable technical information regarding substances, that would be detrimental to business interests. Realistically, it is doubtful that the public would want information about the intricacies of a product, but would rather have data on the detrimental effects of chemicals. It appears that the industries did not want the public to have access to the possible harms of their products, nor the existence of deficiencies in their processes.

The final draft of the Act appears to have favoured the interests of industries. At first glance, citizens seem to have ample opportunity to partake in the process of protecting the environment. They may file notices of objection to proposed deletions of substances from the Priority Substances List and for the Minister's failure to assess a substance after five years.²⁴ Additionally, citizens may object to regulatory decisions concerning such matters as: the lists of toxic substances including those under export and import controls and fuels; nutrients; international air pollution; federal lands; and ocean dumping or the issuance of permits.²⁵ Section 89 sets out the general process by which the Minister of Environment may establish a Board of Review to inquire into the nature and extent of the danger posed by a substance or complaints regarding regulations of a substance. The Board of Review Proceedings are to give any person

a reasonable opportunity to appear before it, present evidence and make representations.²⁶

Despite the opportunity to participate in the establishment of lists and regulations, public involvement is greatly limited. While it is important to have the ability to appeal to the Board of Review, this is an 'after-the-fact' right of participation. As recognized by the CEAC, this procedure "puts the public in the position of criticizing a draft order or regulation, rather than making a contribution at the drafting stage".²⁷ The public is not given the opportunity to express their views or make recommendations regarding regulations or enforcement, leaving, once again, the setting of standards and compliance with the Act to negotiations between the government and industries. Beyond this, the right of access to the Board of Review is dependent on the Minister deciding it is advisable to have one, and on the public receiving adequate notification of the review. As recognized by William Andrews, "notice in the Canada Gazette totally fails to achieve the purpose of public notification",²⁸ because it is not as readily available or accessible as media such as the local newspaper or television. Consequently, those persons who may be affected by proposals under CEPA may not be aware of them and will not have the opportunity to participate by criticizing proposed regulations.

With respect to the disclosure of information that would make public participation in the process more meaningful, the federal government balanced its final decision in favour of the industry's right to protect confidential business information. Section 19 of the Act, allows a person who submits information to the Minister to

request that it be treated as confidential. While some protection of this type may be justified, there is the potential for industries to abuse this privilege. As noted by several environmentalists, industries have a tendency to mark even the most innocuous pieces of information as secret or confidential.²⁹ But some regard must be given to the purpose that this information may serve in protecting the environment or the public's right to know what harmful substances it may be exposed to. By permitting industries to request confidentiality, CEBA allows relevant information to remain in the hands of one interest, leaving the public in the dark about things which may possibly affect its survival.

In trying to balance the interests of industries and the public, the Act does set out conditions when information may be revealed to the public. Section 20(6) provides for the disclosure of information where the public interest clearly outweighs any financial loss or prejudice to the competitive position of the person who provided the information. But, it is difficult to conceive of a situation in which the Minister would find it desirable to refuse to disclose information where the public interest does outweigh any commercial prejudice. If a substance is harmful to the environment and the information of the company verifies this, *the public has a right to know*, regardless of the economic damage which may ensue as a result of disclosure. Moreover, the public should have the right to use this information to demand that its use be prohibited and that the industry be prosecuted. Nonetheless, the fact that the drafters of CEBA were compelled to include this provision, suggests that there may be several times when the public interest *does not* outweigh business interests. It is not clear, however, on

what basis these two interests are weighed. As a result, citizens may doubt both the ability of CEBA to protect the environment due to its concern for economic interests, and their ability to effectively participate without all the necessary data.

Not only is public participation limited vis-à-vis access to information, but it is impeded because of lack of funding. The CEAC admitted that "without funding, members of the public are not in a position to participate on an equal basis with other interests".³⁰ This would include not only a citizen's ability to participate in the Board of Review process, but also his/her ability to gather information or to test data and views submitted by others.³¹ Some provisions for funding are made for the Board of Review proceedings, for the award of costs of, and incidental to the proceedings on a final or interim basis.³² However, to be truly effective in promoting public participation, funds should be made in advance of the proceedings so that the person may be able to gather the required data or hire expert witnesses to support his/her claim. This is especially relevant, given the limitations on access to information, forcing the public to find another means of acquiring evidence to proceed with its argument. If funds are not distributed early in the process, citizens may otherwise feel inhibited in their power to efficiently present their argument, or may fear the possibility of not being remunerated, and may not participate in the proceedings at all.

With respect to citizen involvement in the enforcement of regulations, concessions were made to the interests of both environmental groups and industries. Although industrial representatives were against public involvement in seeking compliance with the Act, any two residents of Canada over the age of eighteen who

believe that an offence has been committed, are empowered to apply to the Minister for an investigation of the alleged offence.³³ This is important, since it allows the general public to act as a 'watchdog' for the government which is not always available to know the daily activities of an industry. Beyond this ability to request an investigation, the citizen cannot seek further action for the enforcement of regulations. Thus, the government is left with the discretion to administer remedial measures for non-compliance, giving industries the opportunity to bargain with the government over what measure would be appropriate for the infringement. By excluding the ability of the public to initiate citizen suits, industries are not threatened by increased incidents of indictment and the government is less likely to be accused of failing to execute its responsibility to enforce legislation, in comparison to environmental groups who may have initiated several prosecutions.

The only opportunity that the public has to take an industry to court, is for damages resulting from any infringements of the Act. CEPA entitles "any person who suffered loss or damage as a result of conduct that is contrary to any provision" of the Act to seek legal remedy to compensate for the loss or damage, or to obtain an injunction.³⁴ However, this provision is just as restrictive as the common law since it requires that the person accrue some loss or damage, rather than allowing an action for injury to the environment itself. Individuals and environmental groups seeking to protect the ecosystem are still left with the burden of finding someone that has the requisite standing to sue the industry. But, even if they are successful at finding a candidate, the civil suit is only beneficial if an injunction is granted, since damages

would go towards the costs of remedying the plaintiff and not the environment. It should be noted, that in addition to limiting the participation of those that can seek legal remedies, this provision also has the effect of defining the damage in terms of loss to human interests, ignoring the intrinsic value of the ecosystem. Despite arguments by environmental groups that a civil cause of action should permit recourse for loss or damage to the environment itself,³⁵ the government refused to incorporate an action that was not based on injury to human interests.

In spite of appeals by environmental groups to increase the realm of public participation beyond consultation over pre-arranged regulations, the federal government did little to ameliorate the process. The public is still entitled only to criticize decisions after they have been made in consultation with industries. Access to information is restricted in the interest of preserving confidential business information, and public funding is available during or after the Board of Review proceedings, limiting the potential of the public to gather information for its arguments. Since the same limitations exist, concern must arise as to who the main actors are in issues regarding the environment. Given the authority of the Minister to consult with representatives of industry and labour, any person interested in the quality of the environment, and other governmental authorities,³⁶ and given the financial resources available to each of these parties, it seems likely that those primarily involved in creating regulations to protect the environment are industries and the government. As a result, CEPA is no different than any other federal environmental statute that had industries and the government negotiating between economic interests and other human interests in the environment,

for appropriate standards. Although it may be argued that the public and environmental groups were given ample opportunity to voice their opinions and suggestions regarding the enactment of CEPA, I would suggest that this was merely to pacify them, rather than to evoke participation. The fact that very few of their recommendations, especially those permitting public participation, were enacted, emphasizes the strength of the comment. Consequently, industries still retain much of their political clout in environmental decision-making.

CONCLUSION

The enactment of the *Canadian Environmental Protection Act* is a step forward for the federal government who has been reluctant to take control over environmental issues. Unfortunately, CEPA does not go far enough to protect the ecosystem from hazardous substances. Protection of the environment still appears to be for the purpose of safeguarding human interests, regulating only a limited number of activities that have qualified as injurious to human welfare. But even in protecting the public interest, CEPA does not facilitate a satisfactory level of participation in the process which determines the extent of ecological protection to which the public is entitled. Industries may have had some influence in restricting public access, by demanding that the political process maintain its traditional practice of excluding the public, and claiming that the disclosure of information would undermine business interests. However, the government was also responsible for limiting public participation.

As part of their arguments, environmental groups claimed that effective protection of the ecosystem and meaningful public participation necessitated the

2 of/de 2

MICROCOPY RESOLUTION TEST CHART
NATIONAL BUREAU OF STANDARDS
STANDARD REFERENCE MATERIAL 1010a
(ANSI and ISO TEST CHART No. 2)

establishment of an Environmental Bill of Rights. An Environmental Bill of Rights would grant citizens the right to a healthy environment, recognizing the intrinsic value of nature, allowing the public to participate in decision-making processes, and permitting the public to seek declarations or injunctions for damage to the environment caused by a breach of the Act.³⁷ Accordingly, these rights would alleviate the impediments present in the Act. The government, especially Environment Minister Tom McMillan, refused to include an Environmental Bill of Rights in the Act, claiming that the rights would be open to broad interpretation by the courts, making CEPA ineffective.³⁸ McMillan further argued that it would not be in the environment's interest to have the law unduly made by judges who cannot be held accountable at the ballot box, which could undermine the capacity of the elected to represent the public's interest.³⁹ According to McMillan, CEPA gave ample opportunity for the public to participate, and was adequate to protect the ecosystem, without recognizing an Environmental Bill of Rights. Environmentalists and other members of public beg to differ, however, since they are still urging the government to establish environmental rights.

CHAPTER IV - TOWARDS ESTABLISHING ENVIRONMENTAL RIGHTS

Degradation of the environment has persisted in spite of the legal remedies available in common law and legislation. Concerned individuals are finding it increasingly difficult to protect the ecosystem from industrial pollution because of a number of legal obstacles. Nuisance law restricts actions to persons who have suffered physical damage to either their property or health, preventing anyone from defending the environment for its own sake. Even if individuals are successful at establishing their standing to sue, they have an onerous burden to prove the link between the polluter and the harm. Moreover, considerations of the local standard of comfort and the importance of the industry to the community make it difficult to establish a case of nuisance in an industrialized nation. The legislative ambit of the law provides little amelioration for ecological preservation when the polluter bargains with the government over the setting and enforcement of emission standards. Due to the lack of information and political resources available to public interest groups seeking to protect the environment, public participation is limited to an after-the-fact consultation that rarely allows for challenges to the negotiated agreement. Interest groups that are concerned with protecting the ecosystem, are now seeking greater access to a legal process that otherwise favours industrialization and environmental degradation.

The proposed solution for recognizing value in the environment and permitting greater public participation is to provide a legal remedy that accounts for these problems; the establishment of environmental rights. Environmental rights legislation would introduce a new era of ecological protection, one that emphasizes the

preservation of the integrity of the ecosystem for its own sake, rather than its conservation for human purposes. Two proposals for recognizing environmental rights have been developed. The first attempts to overcome the deficiencies in current legal remedies by recognizing a right of the environment itself to survival. The second proposes to resolve the same issues by vesting every citizen with a substantive right to environmental quality in either the Constitution or an Environmental Bill of Rights. Each of these theories will be examined for their potential to ameliorate ecological protection by acknowledging the intrinsic value of the ecosystem and promoting public participation.

WHY ENVIRONMENTAL RIGHTS?

Humans have always shared an interminable relationship with the environment, depending on it for survival. At first, nature was revered as the giver of life, belonging to everyone and to be shared with other animals.¹ This ancient view gave way to the European-Christian belief that the land and its resources were entrusted to humans in a stewardship, to be maintained and cared for in the interest of future generations.² Somewhere in between ancient religion and modern philosophy, however, nature and all non-human creatures lost their intrinsic value when humanity assumed its dominion over the earth. Flora and fauna are now regarded as separate from human beings, to be harnessed and exploited for the sole purpose of satisfying our demands. Our human laws reinforced this supremacy by recognizing ownership in property for the purpose of protecting an individual's economic interest in the benefits of the land. With the onslaught of industrialization, legal doctrine favoured those who made efficient use of

land and water that both profited the owner and benefitted the public, by restricting the power of any owner to obstruct the most efficient allocation of natural resources.' An individual's right in the land gave him/her authority to make the most efficient use of it, even if it meant the exploitation or pollution of resources.

The language of rights has been significant in defining our relationship with the environment. Rights protect a person's sphere of self-interest by securing duties on the part of others not to impede that right.⁴ To grant someone a right is to recognize that person's "claim, to which some special importance is to be attached",⁵ empowering the right-holder vis-à-vis all others who do not possess a similar right. The right is "seen as a weapon, a strength, an advantage one should seek to have";⁶ a powerful tool by which environmental degradation can ensue. Property rights, therefore, protect an industry's interest in the land by recognizing its value to economic growth and requiring others not to impede that progress. While other property owners also possess a right to their land, this right is only sufficient for protecting interests in their own property, and not the entire ecosystem. For those entities without rights, such as the environment, they are powerless against individuals that possess rights.

Past practice has demonstrated that property rights not attached to an economic claim have had little success against industrial rights. But, this is not to say that rights have no importance for ecological issues. In the same way that rights act as a source of power for industries, securing a right for environmental concerns can become a comparable force. By recognizing an environmental right, we would be attaching a value to the ecosystem. In claiming this right, the environment would be considered

in light of its own intrinsic value, its right to be protected from detrimental human activity. According to Joel Feinberg, the activity of claiming a right also "makes for self-respect and respect for others, [and] gives a sense to the notion of personal dignity".⁷ Recognizing and claiming an environmental right would, therefore, elicit respect and dignity for an entity that currently receives no such treatment because of its rightless nature.

In addition to attaching value to its holder, rights enable participation in public discourse. According to Habermas, rights are guarantees of equal opportunity participation in the political process, access to which is ensured by the state.⁸ A party that has no recognized rights, has no claim or interest to protect, and therefore, no right to participate in a process that does not involve him/her. Thus, the ecosystem as a rightless entity is not entitled to participate in the political process involving environmental issues, because it has no legally defined interest that is being affected in decision-making. But, if an environmental right were to be recognized, vested in citizens to assert it, the state would have to guarantee the participation of those persons representing that right. Participation would not be limited to consultation with the public, but would include arguments for the advancement and legitimation of the environment's interest. Through discourse, individuals concerned with the preservation of the ecosystem would be able to defend environmental interests and develop legislation that is more in tune with ecological concerns.

The effect of this dual nature of rights - valuing the claim and enabling participation in the political process - is to devise a tool that is a powerful counter-

balance to industrial property rights. In the same way that right-holders protect their claims by securing duties on others, an environmental right would require, at the least, that industries and individuals alter their practices so as not to detrimentally affect the ecosystem. Moreover, the judiciary and administrative tribunals would no longer be restricted to considerations of industrial property rights, but would in fact have a duty to protect the environment through decisions that acknowledge and protect ecological integrity. By using the language of rights, the environment would have a recognizable and enforceable legal claim that would allow it to compete in a system that otherwise only values and protects the interests of industries, the only current right-holders. To equally compete and have a legitimate chance at protection, the environment must have a tool similar to that which empowers industries, a right that is equivalent to property rights.

While proponents for the environment generally agree that rights are needed to protect the ecosystem, they do not concur on what form such rights should assume. There are questions over who should be vested with the right, what content it would entail, how it would operate, would it be substantive or procedural, who would be its beneficiaries, and how would they benefit.⁹ The two most notable suggestions are those that invest a right in the environment itself and those that entrust every citizen with a right to a quality environment. Both of these rights facilitate the recognition of ecological integrity and citizen participation, but have differing effects in protecting the ecosystem. Whatever form environmental rights take, it is necessary that they function effectively in the legal system, so that the environment is given substantial protection.

RIGHTS IN THE ENVIRONMENT

In response to the inadequate protection of the ecosystem, Christopher Stone proposed that the law allocate rights to the environment itself, to recognize its inherent value and to establish *de jure* standing in the courts and administrative tribunals.¹⁰ The reason for investing forests, oceans, rivers and other natural entities with legal rights is to amend our failing to recognize their moral worth in themselves. The destruction of the ecosystem can be attributed to this failing, because "until the rightless thing receives its rights, we cannot see it as anything but a 'thing' for the use of 'us' - those who are holding rights at the time".¹¹ And the only thing that prevents us from vesting the environment with rights is our unwillingness to value it for itself. According to Stone, our moral progression toward extending rights to blacks, women and children, individuals that were once objects of rightlessness and considered to be the property of their owners, should progress further by vesting plants and inanimate objects with rights.¹² Given the personification of corporations, it is not unthinkable to grant rights to entities that are not human.

What the Right Would Entail

Although Stone advocates the granting of rights to the environment, he does not propose that they include every right imaginable or be the same as those possessed by humans.¹³ Instead, as a holder of rights, the environment should be entitled to four legal-operational advantages that would recognize its inherent worth and dignity, thereby providing for its effective protection.¹⁴ To have substance, the right must be subject to a public authoritative body that will review any actions that are inconsistent

with or threaten that right.¹⁵ Without an opportunity for review, the right itself cannot be guaranteed if there is no authoritative body to enforce the corresponding duties or forbearance of others. While this aspect is necessary for any right, Stone sets out three additional criteria that would specifically acknowledge ecological integrity.

Current legal doctrine inhibits standing for the environment to challenge a polluter's actions, because it is unable to show an invasion of its rights. But, if a right were recognized in nature itself, this requirement would automatically be fulfilled once damage has occurred. As the possessor of rights, the environment would have its own actionable harm without being dependent on humans to indicate that some economic interest of theirs had been injured.¹⁶ According to Stone, the legal problems of the environment could be handled by guardians in the same way that legal incompetents are represented.¹⁷ 'Friends' of the environment, such as environmental groups, could apply for guardianship of natural objects to represent their interests in both court cases and legislative hearings regarding the setting of quality standards. The benefits of such an approach are threefold for Stone - guardianship would provide the natural object with continuous supervision, would secure an effective voice for environmental concerns, and would prevent a flood of litigation, by appointing one group to represent the environment's interests.¹⁸

Since its own injuries would be actionable, vesting natural objects with rights would consider the actual harm to the ecosystem. Instead of balancing the economic hardships of one property owner to abate the pollution vis-à-vis the economic hardships of continued pollution on another property owner, the cost to the ecosystem would be

estimated.¹⁹ The polluter would have to internalize the cost of pollution not only in terms of the damage caused to other property owners, but in terms of the harm caused to the environment. The guardian would simply present any injuries before the courts, seeking compensation for the harm caused to the environment. According to Stone, the monetary value of the loss of species or wilderness can be determined by equating them with copyrighted works or patented inventions, making the violation of rights in natural objects a cost, by declaring the 'pirating' of them to be the invasion of a property interest.²⁰ Reparations for the pirating of natural objects would be measured by the cost of making the environment whole. This would include the expense of repairing, reseeding and replacing flora, and the cost of healing and restocking wildlife, either in its original habitat or some other location.²¹ Although this is equivalent to asking for a 'freeze' on environmental quality, Stone does not view this as problematic because we should be cleaning up the ecosystem, instead of merely preserving the current standard of environmental quality.²²

The final advantage of investing the environment with rights is the capacity they would bestow on it to be its own beneficiary in litigation. As a recognized interest in lawsuits, the court would have to consider the damages to the ecosystem in granting injunctions and money awards. Stone claims that forcing the court to consider the interests of natural objects will prevent the ecosystem "from being 'sold out' in a negotiation among private litigants who agree not to enforce rights that have been established among themselves".²³ As its own beneficiary, money awards would be deposited into a trust fund administered by the natural object's guardian for the purpose

of repairing damage, encouraging research to prevent future ecological harm, and financing the cost of litigation.²⁴ Stone also suggests that as a right-holder, the environment might have to bear the liabilities of harm imposed on other right-holders as a result of natural disasters, but does not define the extent of liability.²⁵

For Stone, the purpose of recognizing rights in the environment is to have its interests "taken into account in subtler, more procedural ways".²⁶ He cites the National Environmental Policy Act (NEPA), which establishes procedures for environmental impact assessment, as an example of how rights of the environment would be protected. His proposal is to expand the application of NEPA beyond assessments of federal undertakings, to evaluations of private industries whose actions may have a significant impact on the ecosystem.²⁷ Also, courts should be compelled to show how they calculated and weighed findings with respect to ecological harm.²⁸ Beyond procedural protection, Stone suggests that "some (relatively) absolute rights be defined for the environment by setting up a constitutional list of 'preferred objects'".²⁹ Accordingly, proposals threatening the environment with irreparable damage would be enjoined absolutely, whereas repairable damage might be balanced and weighed in light of the degree of damage. With procedural rights and constitutional recognition, Stone expects a shift in the way judges interpret rules and the way legislators develop environmental quality standards, to a manner that is more akin to ecological interests.

Criticisms of this Right

Although Stone's idea of granting rights to the environment is extremely compelling, its ability to better protect the environment by recognizing ecological

integrity and public participation may not be as fruitful as he expects. While it is possible that investing rights in the environment would instill a recognition in the minds of humans that natural objects have their own value, this may not always ensue. Several authors are critical of bestowing rights on the ecosystem, because rights do not set out to do what Stone expects them to do.³⁰ According to John Livingston, rights are a human concept built on dominance hierarchies and power relationships, that if extended to the environment, would move it into the realm of human control.³¹ But this would go too far for Stone, since the anthropomorphization of the earth would ultimately exclude the unique qualities of natural objects, defining its relationship with humanity in terms of domination, and not value. Moreover, Goldstein argues that ascribing rights to natural objects allows us to "pursue our own autonomous interests without regard for the intrinsic value of the environment and our relation to it".³² In other words, investing the environment with rights is essentially for the purpose of allowing humans to better pursue their interests, under the conviction that we are representing the environment's concerns.

Not only is giving rights to the environment an 'overkill' on our intentions to value it, but these rights would be difficult to use in our legal institutions. While the law may have been averse to recognizing rights in persons other than men, it was not such a huge leap because blacks, women and children are in fact persons worthy of dignity and value. Even the application of rights to corporations was not so far fetched since they were made up of people, and actually designed for human purposes and interests. But, investing rights in the environment would be something entirely new to

a legal system that addresses only human concerns brought before it by human actors.³³ The courts and legislatures may be reluctant to recognize a right, that taken to extremes, could advocate a return to the Stone Age in the interest of preserving ecological integrity.

Even if the right were to remain in perspective, there are problems with granting guardianship. According to Stone's explanation, guardians would be limited to environmental groups, implying that lay citizens have no role to play in the process. Yet, individuals may have more success than environmental groups in presenting arguments in favour of ecological protection, because they may not be stigmatized as being so radical and out of touch with reality. Even more troubling, however, is the possibility that governments, industries and environmental groups may spend needless time and money litigating over who shall be named as guardian in order to give their own content to the environmental right.³⁴ There may also be a great financial burden involved in supporting a system of separate representation for the ecosystem, which might create a backlash against environmental concerns.³⁵

Despite these philosophical problems, the legal-operational advantages that such a right would provide are valuable. It makes sense to give automatic standing for any environmental harm, to calculate that harm in terms of damages to the ecosystem, and to repair the environment with monetary awards. But somewhere in outlining the purpose of such rights, Stone staggers from a substantive role to a procedural one, lessening the quality of these environmental rights. He seems to suggest that it is enough to require the consideration of any environmental impact that a project may

have, forcing the industry to "really *think* about what it is doing",³⁶ and to have courts explain how they arrived at their decision, whatever it may be. However, if this is the only purpose environmental rights are meant to serve, ensuring a heavier weighting of environmental criteria can be accomplished through other legal courses. It is possible to legislate environmental criteria that would need to be considered, to guarantee public interest groups access to decision-making, and to set up procedures for environmental impact assessment and litigation involving ecological concerns without recognizing rights in the environment.³⁷ But even then, if procedures are set out by the legislature or according to this type of environmental right, it is doubtful that it would provide any significant difference in the protection of the environment. To give substance to ecological preservation, we must go beyond procedural rights, to a substantive right that would invest individuals with a right to environmental quality.

RIGHTS TO ENVIRONMENTAL QUALITY

Given the problems of investing a right in natural objects, other writers have proposed that individuals be entitled to a right to environmental quality. Entrusting citizens with such a right would still promote an environmental ethic, since the ecosystem is the object of value that is being protected.³⁸ This form of rights is more beneficial than Stone's proposal, since it would better facilitate public participation in the protection of the environment. Citizens would be both invested with the right and subject to any corresponding duties or forbearance to safeguard that right. By ascribing the populace as a whole with a right to environmental quality, participation would not be limited to governments, industries or the propertied class, but would include all

individuals who have an interest in preserving the environment.³⁹ The protective potential of environmental rights vested in citizens, however, is dependent on the form they take. First, there is a question of whether the rights should be entrenched in the Constitution or should be incorporated into an Environmental Bill of Rights. There is also the issue of what structure the rights will take as either procedural or substantive rights. The form that these environmental rights will assume will make the difference in the quality of protection that is to be given to the ecosystem.

Constitutional Entrenchment of Environmental Rights

A constitutional approach to recognizing environmental rights has been proposed as one solution for the failure of current legal methods to protect the environment. As the supreme law of the nation, environmental provisions in the Constitution would achieve the highest authority over statutes, administration and court decisions.⁴⁰ Moreover, environmental protection would be more firmly rooted in the legal order, since constitutional provisions may only be amended or repealed in accordance with elaborate procedures.⁴¹ The entrenchment of environmental rights is expected to institute three criteria that would benefit ecological preservation. By recognizing the fundamental value of the environment, the role of the public and government, and the concurrent jurisdiction of federal and provincial authorities,⁴² the ecosystem is expected to receive the ultimate form of protection.

Instituting environmental protection in the Constitution can be accomplished one of two ways: a fundamental right or a statement of policy.⁴³ Most proposals have suggested establishing a fundamental right that gives each individual an enforceable,

subjective right to a healthful environment, and participation in administrative or judicial proceedings concerning the protection of that right.⁴⁴ In this way, the Constitution would represent the needs of all Canadians and would give them the tools to protect their environment. The federal government has been averse to instituting such rights, however, proposing only a statement of policy that would recognize "the importance of the land, the air and the water and our responsibility to preserve and protect the environment for future generations".⁴⁵ But, this is not as effective as a fundamental right, because it is only a directive and guideline for governmental action that cannot be individually invoked. The force of a constitutional environmental right is determined by the form it takes, of which a policy statement would provide little, if any, increase in ecological preservation.

Assuming that a fundamental right is instituted, proponents advocate that it have two main components. First, it would vest citizens with a

right to a healthful environment...empowering Canadians to participate more effectively in environmental decision making, to challenge inappropriate governmental decisions and, in appropriate circumstances, to enforce environmental laws.⁴⁶

Secondly, the imposition of governmental duties to protect natural resources in trust for present and future generations would ensure the management and use of the environment in a manner that promotes sustainability.⁴⁷ This is considered to be an improvement beyond current legal methods for environmental protection because it delegates the clear responsibility, rather than the mere authority, of the government to protect the ecosystem. And if the government fails to execute its duties, the right of citizens to participate and enforce laws would compel the government to take

appropriate action. It is expected that the entrenchment of environmental rights would foster a greater level of environmental awareness in society, legislatures and the courts, assigning more emphasis to ecological issues in the development of legislation and the determination of cases.⁴⁸

The final aspect of constitutional environmental rights is the clarification of the federal and provincial governments' functions in environmental protection. Given the fragmentation of responsibilities, ecological preservation has been inadequate because the governments are uncertain of their jurisdictions and citizens are unsure about which level is accountable for what aspect of ecological protection.⁴⁹ Since neither government is willing to take full authority for environmental issues, activists have proposed that the Constitution address the matter. It has not been suggested to do away with the division of powers, but rather to assign control in a manner that "facilitates effective anticipation and prevention as well as reaction to environmental problems".⁵⁰ Advocates argue that both levels of government should be responsible for the protection of all aspects of the ecosystem. Environmental powers would be allocated concurrently, with the federal government maintaining its role in the regulation of pollution standards and resource conservation.⁵¹ By sharing the responsibility, it is hoped that a stronger, more comprehensive approach to environmental protection will develop.

Constitutional environmental rights would help improve environmental protection. At the least, they would develop an environmental ethic by acknowledging that preserving the ecosystem is just as important as protecting every citizen's right to life, liberty and security of the person. Citizens would be empowered to go to court on

behalf of the ecosystem, seeking action or compliance with the right by the government. Along with citizen participation, the duty to preserve the environment in public trust is expected to compel the governments to take forceful measures to protect Canada's ecosystem. The substantive character of these rights, in terms of being recognized as an inherent right of citizens, is expected to create an awareness in society, legislatures and courts, that the protection of nature is to be taken seriously and to be considered in every project that may have an impact on the ecosystem.

While these rights would ameliorate current efforts to protect the environment, they have a few weaknesses. The greatest problem is that constitutional rights are only effective against the government, and not the private sector, which is primarily responsible for environmental degradation.⁵² A claim of environmental protection would be of little effect against industries that may impede that right, since citizens have no recourse against them.⁵³ A constitutional right to a healthful environment has minimal use if it does not apply to more than governmental enterprises. But even if industries were constrained by the right, the extent of protection under the right is inconclusive. The right to a 'healthful environment' is ambiguous, leaving open the degree of protection available to the ecosystem. As criticized by John Swaigen and Richard Woods, it is not clear whether a 'healthful environment' refers to the promotion of human health or also to the health of flora and fauna, and the maintenance of ecological balance.⁵⁴ The open-endedness of this right does not secure a certain standard of environmental quality, bringing into doubt its effectiveness.

The final deficiency of such a right is the limitation it places on public participation. Granted, the right does guarantee citizens access to environmental decision-making and review for infringement of their right to a healthful environment. But what good is that right if citizens have neither the financial or informational means to establish their claim? A constitutional right that provides neither a funding programme nor access to environmental information cannot be viewed as empowering. With the exception that citizens are given automatic standing, constitutional environmental rights provide no more public participation than what is already available. Perhaps the court may grant a monetary remedy for the infringement of an individual's right, but what does this do for the ecosystem? No provision is set out to determine whether the infringement of the right to a healthful environment would personally remedy the individual(s) whose right has been encroached, or whether the environment itself would benefit from financial awards. While citizens may be entitled to an award for costs, a constitutional right would be of little use if citizens are the beneficiaries of remedies. Given the impediments associated with a constitutional right and the government's reluctance to entrench one, an Environmental Bill of Rights has been enlisted as another means to protect the environment.

Environmental Bill of Rights

Under current proposals, an Environmental Bill of Rights (EBR) would go one step further than a constitutional entrenchment. In addition to creating an awareness in society of ecological integrity, an EBR may vest citizens with a substantive right that would dictate decisions in favour of environmental protection for both court decisions

and the development of legislation. In combination with procedural rights designed to overcome common law and statutory obstacles, this substantive right to environmental quality acts as a powerful catalyst for ecological protection. An EBR has three main components: the right to civil remedy; the right to participate in legislative decision-making; and the establishment of an environmental public trust. Essentially, an EBR combines elements of Stone's rights with respect to remedies, components from the constitutional environmental rights, and its own additions, to create legislation that values the ecosystem and truly empowers citizens to participate in decisions affecting their lives. The central feature of an EBR is the substantive right it provides for environmental damage. Substantive law is purposive in nature, implemented through principles, standards and regulations that are "designed to achieve specific goals in concrete situations".⁵⁵ Like the constitutional entrenchment, an EBR would vest each person with a right to sue in civil courts for the infringement of their rights and a right to participate in environmental decision-making.⁵⁶ But it is proposed that such rights go much further in securing environmental protection. A substantive right to environmental quality would dictate a decision in favour of environmental protection.⁵⁷ Thus, an individual seeking to enjoin an activity would be entitled to succeed once it is established that substantial damage to the environment may ensue. Substantive environmental rights would not only give the public standing in court proceedings, but they would establish a clear right of environmental quality that is equivalent to property rights. As a result, the courts would have to uphold this environmental right in the absence of competing private rights or seek a balance in the presence of a competing

substantive right.⁵⁸ An EBR that established a true substantive right would create equality between the powerful property rights of polluting industries and the right of the public to ecological preservation.

An EBR is comprised of several elements that would secure a substantive right to ecological protection. First and foremost, it would decree a substantive, inalienable right of every citizen to environmental quality.⁵⁹ In determining the extent of environmental quality, reference could be made to the definition of 'environment', which has been submitted to include the air, land, water, plant and animal life, and ecological systems.⁶⁰ According to this definition, the right of environmental quality would not be limited to human purposes, as would the right to a healthful environment. The ecosystem itself would be regarded as the thing of value to be protected. While it is possible that this right would still be evoked to protect underlying human interests, as in our survival, the right could also be asserted to protect endangered species or the Antarctica wilderness, things not directly necessary for human survival. The right is expected to educate people that ecological continuance is equally as important as human survival, regardless of the benefits it may have for humans. If people learn through these rights that nature should be protected for its inherent worth, it is hoped that they will assert these rights to protect the intrinsic value of the ecosystem.

A substantive right would also secure the *prima facie* weight of a property right that is needed to counter-balance the property rights of polluting industries, and to act as a fetter on government discretion which permits environmentally harmful activities.⁶¹ While it may be argued that this right would not be as forceful as a

constitutional right, provisions could be made to designate the paramountcy of the EBR over other legislation.⁶² The EBR could contain a proviso stating that it would prevail in the event that one of its provisions conflicted with provisions set out in other statutes. With such a clause, the EBR would attain the highest authority over other legislation, entrenching the value of environmental protection into all aspects of the legal system.

Investing the public with a right to environmental quality would open the doors to civil litigation protecting the ecosystem. The EBR would grant any member of the public standing to sue, without having to demonstrate any personal, pecuniary or proprietary damage.⁶³ Ecological protection would no longer be dependent on a propertied individual or the Attorney General to bring an action against industries that have caused some detriment to the 'human' environment. Instead, the EBR would create a civil cause of action that could be invoked for a breach of the environmental right.⁶⁴ In the event that the ecosystem was harmed in some manner, the injury itself would establish an action without any requisite that the plaintiff demonstrate personal or property damage.

To make the cause of action easier for the plaintiff, procedural mechanisms have been proposed to lessen the onus of proof that currently restricts environmental litigation. Proponents of the EBR have argued that a provision should address the problem of establishing a causal relationship between the activities of the defendant and the actual harm. Rather than requiring the plaintiff to prove scientific evidence of causation, the plaintiff should only have to establish that the damage may have occurred from the kind of activities undertaken by the defendant on the balance of

probabilities.⁶⁵ Once the plaintiff is able to support his/her claim, the onus of proof would then shift to the defendant to prove that the harm did not originate from its activities. In the event that the damage was caused by the defendant's activities, s/he would be entitled to show that there was no feasible or prudent alternative, or that there was statutory approval for the activity, developed in accordance with public participation processes defined by the EBR.⁶⁶

If an individual is successful at establishing a cause of action for harm to the environment, an EBR would define the scope of remedies. Like Stone's right, the environment would be the beneficiary of awards, because it is the entity that has actually suffered the harm. Damages would be awarded for past and future injury in light of the restoration and replacement costs to the environment, and its economic value in terms of the ecosystem's intrinsic value and its use to humanity.⁶⁷ Injunctions would also be available once the Court balanced all relevant factors, "including the public interest in the protection of the environment, the impact on the defendant, and the social and economic consequences of granting an injunction as opposed to damages".⁶⁸ Regardless of the remedy awarded, the harm done to the environment itself is the determinative factor, as opposed to the detriment such harm may cause to humanity and the need to remedy human interests in the ecosystem.

In addition to improving civil litigation, an EBR is expected to encourage public participation in the legislative process. A substantive right to environmental quality would entitle any individual to participate in the setting or enforcement of environmental legislation.⁶⁹ Unlike other legislative provisions that permit public

participation near the end of the process, an EBR would necessitate the opportunity for citizens to express their views and make recommendations as early as possible in the process. Given the universal nature of the ecosystem, everyone should be entitled to participate in discussions and decisions that affect their lives, based on the ecological risks they are willing to bear. While public participation would introduce an array of perspectives into the process, it would also demonstrate that the public is not merely interested in the economic benefits of natural objects. The increased involvement of the public is expected to force governments to be responsible to the public, by developing purposive environmental legislation that is not hindered by economic interests.

Although a substantive right to environmental quality would empower citizens to take part in legislative decision-making, a few procedural mechanisms have been proposed to guarantee this involvement. First, an EBR would set out procedures for the notification of the public regarding proposals for legislation or regulations.⁷⁰ Notice should not be limited to government documents like the Canada Gazette, however, but should include media more accessible to the public, such as television, newspaper and radio advertisements. The public would also be given the opportunity to trigger a review of the development of legislation, without having to depend on the government to initiate proceedings.⁷¹ Once notification of prospective legislation has been made, the public would be entitled to comment and make recommendations on the proposals in the manner of public meetings or more formal public hearings.⁷² To make the process accountable to public concerns, proponents have recommended that the EBR

require decision-makers to provide written reasons for their decisions.⁷³ The public would then know if environmental interests were given due consideration. If this was not the case, the written reasons would provide grounds for recourse to judicial review

As part of its power to be involved in the administrative process, the public would also be entitled to initiate investigations and private prosecutions to enforce environmental legislation. Similar to provisions outlined in CEPA, the EBR could impose an obligation on relevant ministers to conduct an investigation into an alleged environmental offence.⁷⁴ Individuals would have a statutory right to initiate private prosecutions to enforce compliance with the EBR.⁷⁵ Private prosecutions would shift the emphasis of enforcement from a purely governmental responsibility, to one that can be overseen by the public. Enforcement of environmental regulations would thereby be altered from its current status as a bargaining process with industries, to one that makes the government and polluting firms accountable to the public for their actions. Although the Attorney General has the inherent power to exercise its control over a private prosecution through intervention, proponents of the EBR have argued that this ability should be fettered, to prevent citizens from becoming discouraged from initiating prosecutions.⁷⁶ The purpose of private prosecutions is to introduce other actors into the enforcement process, actors who may not be as easily influenced by industrial cajoling and whose power should not be undermined by governmental supremacy.

Proposals for an EBR have included additional procedural rights that are meant to help citizens exercise their substantive rights and to participate in the legislative and administrative processes. To ensure effective public involvement in the protection of

the environment, an EBR must remove the obstacles that currently impede public participation: lack of access to information and financial resources. Environmentalists have long realized that public access to information is vital if citizens are to participate more effectively in decisions concerning the environment.⁷⁷ Currently, relevant information is withheld by the government for reasons of law enforcement, protecting an individual's privacy, and preserving confidential business information.⁷⁸ While there may be some justification in restricting information, interests of law enforcement, personal privacy and trade secrets, should not completely prohibit the release of data that may be relevant to environmental preservation. By entitling citizens with a right of access to information, government data would be freely available to the public, unrestricted by broad exemptions that could be easily curtailed by balancing the environmental benefits of disclosure against the detriment to the individual or business. With such information, citizens would be able to substantiate a claim of ecological harm or present arguments for increased protection of the environment.

An EBR would also make provisions for those individuals who may have access to information regarding violations of the law, but are reluctant to disclose it, because of the threat to their employment. A 'whistle blowers' law would give such people the opportunity to report the polluting activities of the employer.⁷⁹ Incorporated into the EBR, employees would receive statutory protection for 'blowing the whistle' on their employers. Accordingly, employers would be prohibited from dismissing, penalizing, disciplining or intimidating an employee who has released information or sought enforcement of environmental legislation.⁸⁰ Such a provision would encourage greater

protection of the environment, by protecting those persons who would know first-hand about the threat that an industry may be causing to the ecosystem.

Equally important to public participation is the right to defend or represent environmental interests at a reasonable cost. Given the limited financial resources of private individuals to initiate legal action against wealthy polluting industries, environmental rights would be of little use if they did not ensure the financial means of the public to participate. Since damages are awarded to the ecosystem itself, EBR proponents have recommended a provision that would allow the court to award costs for lawyer's fees and factual evidence.⁸¹ To fund public participation in the legislative process, proposals have been made to establish intervenor funding.⁸² Although it may be expensive to set up a system that finances public participation, it should not be refused because of the added costs. Formerly disenfranchised interests have a legitimate claim in environmental decision-making and should not be excluded from the process, simply because it would cost too much to fund public participation. Ecological protection has been thus far undermined because of the costs to industries, it should not be further hindered in consequence of the expense participation may create.

The final aspect of an EBR is its public trust doctrine. According to this doctrine, the government would hold all natural resources in trust for the people, with a duty to manage and protect the environment from degradation.⁸³ The public trust would apply to common property resources, as well as lands vested in the Crown. Given the government's obligation to protect the ecosystem, any legislation that is to be made regarding public resources would have to be exercised in a manner that is

consistent with the public trust. In other words, the government would not be able to succumb to industrial demands for lenient legislation if it undermined the public's interest in having its trust protected. In cases of ambiguity with other legislation, the public trust would create a presumption in favour of the environment, so that other statutes would be interpreted according to the intent to promote ecological preservation.⁸⁴ The recognition of a public trust in the ecosystem would also permit the courts to compel the government to protect the trust property, by refusing to allow the creation of projects that would be detrimental to the environment.⁸⁵ Finally, the appointment of an environmental auditor has been proposed to ensure that the public trust is adequately protected.⁸⁶ This person would be assigned to conduct investigations and studies to ensure that industries are complying with the law and that the government is taking steps to adequately protect the environment.

Given the diverse elements of an Environmental Bill of Rights, it is expected to be the most effective method of protecting the ecosystem and ensuring public participation in the process. Unlike the constitutional environmental right, the EBR applies to all individuals, industries and governments, making everyone accountable for the preservation of the ecosystem. However, without a paramountcy clause, the EBR is not as authoritative as a constitutional entrenchment. Despite this one failing, an EBR would provide individuals with substantive and procedural rights, empowering them to initiate legal action for the preservation of the environment. In theory, an EBR is capable of removing the obstacles that currently prevent the adequate protection of

the environment and significant public participation. Its potential in reality, however, is dependent on the form it takes once developed and enacted by the legislature.

IMPLEMENTING ENVIRONMENTAL RIGHTS

Although environmentalists and public interest groups have advocated the enactment of environmental rights, the federal government has been unwilling to do so. Some of this reluctance may arise from the preconceived notion that the recognition of environmental rights would flood the court system and administrative tribunals with "cases ranging from frivolous neighbourhood disputes to academic debates on esoteric aesthetic values".⁸⁷ While it is true that the number of cases and hearings would increase, environmental rights are designed to introduce issues that were not previously considered. Nonetheless, the experience of other jurisdictions which have introduced similar legislation indicates that there was an increase, but not a flood, of cases and hearings.⁸⁸ The government may have also been fearful of their legislative power being usurped by the courts and administrative tribunals.⁸⁹ However, the role of these institutions would be no different than they are now, requiring them to refer matters back to the legislature when new laws should be made. Perhaps its fear of a flood of cases and usurped power, was the reason for the government's refusal to recognize environmental rights during constitutional talks.

As a result of the federal government's reluctance to recognize a right of citizens to environmental quality, some provinces have taken it upon themselves to enact their own environmental rights. In 1990, the Northwest Territories passed the *Environmental Rights Act*,⁹⁰ granting several of the substantive and procedural rights outlined above.

Following suit, Ontario has recently passed its first reading of an *Environmental Bill of Rights*.⁹¹ Unfortunately, the actual provisions of the Ontario Bill do not incorporate all the proposals that were suggested by environmentalists, lessening its ability to protect the environment.

Before any criticisms can be made, the Ontario government must be commended for finally taking steps to ensure some form of environmental preservation.⁹² Bill 26 sets out procedural mechanism for public participation in the decision-making of environmentally significant proposals for policies, Acts, and regulations,⁹³ and provides substantive and procedural rights for civil actions that have caused injury to the environment.⁹⁴ If successful, provisions are made for the award of damages to be used for restoration purposes, including the possibility of the defendant providing money for environmental research and education, or transferring property to assist in the restoration of the environment.⁹⁵ The public is also given the opportunity to seek applications for review of any policies, Acts or regulations regarding the environment,⁹⁶ and to apply for investigations of those institutions that are believed to have contravened any Act or regulation.⁹⁷ In the event that the individual is actually a whistle blower, provisions are set out to protect the employee from employer reprisals.⁹⁸ Finally, the Bill provides for the appointment of an Environmental Commissioner to review both the requirements of the Bill and any recourse for the rights provided by the Bill.⁹⁹

If this Bill is enacted it should help to improve environmental protection. However, it is missing several important aspects that could limit its effectiveness. First,

it does not specifically grant citizens of Ontario a substantive right to environmental quality. The Bill merely provides a statement of policy in the preamble that the public has a right to a healthful environment in recognition of its inherent value. The acknowledgment of such a right in the preamble, however, does not accord as much weight as would a clause that clearly sets out that right in the statute. In its current state, the right may not guarantee a decision in favour of the environment or act as a *prima facie* weight against the property interests of industries. This may in fact undermine the whole purpose of enacting an EBR, if it does not set out to do what it was intended to accomplish. The strength of the Bill is further undermined because it lacks a paramountcy clause that would acknowledge its authority over all other legislation.

There are also limitations with respect to public participation in the process. Although the Bill sets out clear guidelines for the facilitation of public involvement, it has no provisions for the right of access to information. The Bill clearly left out one of the most significant procedural mechanisms for participation, unless the public has access to information vis-à-vis the Environmental Commissioner's function to develop annual reports.¹⁰⁰ Additionally, with the exception of costs that may be awarded by the court for civil actions, the Bill does not set out any provisions for an intervenor fund to assist the public in the expense of conducting a review or participating in the decision-making process. The two most important procedural rights that are necessary to ensure the meaningful participation of the public have been omitted from the Bill.

Finally, some point should be made to the fact that participation is restricted to those individuals that are from Ontario. While it is significant that they be included, people outside of the province may also have an interest in seeking legal action or becoming involved in decision-making regarding regulations that could affect their environment. More specifically, the Bill does not consider the transient nature of pollution, and that the environment outside of Ontario may be damaged. Should not individuals that are affected by activities originating from a different province have legal recourse or the right to participate in the decision-making of legislation that directly affects their environment? Perhaps, this is not an imperfection of the Ontario government itself, but rather a failing of the federal government to take responsibility in the development of legislation to protect all of Canada.

CONCLUSION

The effort of Ontario, the Yukon and the NorthWest Territories to enact environmental rights legislation demonstrates that there is a concern for more effective protection of the ecosystem. Despite the benefits that can be derived from such legislation in preserving the environment, the federal government has failed to take an active role in developing environmental rights. Clearly, there is a need for such legislation at a national level to alleviate environmental harm, to give the public a voice in the matter, and to limit the discretion of governments in appeasing industrial interests. Entrenching a right of citizens to environmental quality in the Constitution would be necessary to ensure the recognition of environmental concerns. Moreover, a Canadian Environmental Bill of Rights that would apply to industries and the

government should be enacted to expand the degree of protection available to the environment. Given the constraints of the Constitution, a Canadian EBR could also set out all the procedural rights that are necessary to ensure meaningful participation of the public. If the federal government were to entrench environmental rights in both the Constitution and an EBR, Canadians would be empowered to protect their ecosystem for its intrinsic value.

CONCLUSION - FOR THE SAKE OF THE EARTH

Traditional law has proven to be inadequate as a means to protect Canada's environment. Ancient forests in British Columbia continue to be depleted by the lumber industry, toxic wastes are emitted daily into the Great Lakes, and the Atlantic fishery stocks are nearing extinction due to over-fishing. But, the deteriorating quality of the environment is not limited to Canada. Across the world, the ecosystem is suffering from resource exploitation and contamination from toxic wastes and other forms of pollution, some of which is from our own activities. Because of the interrelated nature of the ecosystem, effects of human activities on one side of the world will also be felt on the other side.¹ The degradation of the environment can no longer be considered a problem of one particular nation, but must be approached in a manner that acknowledges its global impact. If we are to save the entire ecosystem from destruction, *everyone* must become involved in its preservation.

As a nation with a high standard of living, Canada's approach to preserving the environment has been rather unsophisticated and epitomizes the need for a global strategy for protecting the ecosystem. Canadian nuisance law limits protection to segments of the environment that are actually owned by an individual. But, preservation of even these segments of the environment is not guaranteed, because of the way in which the doctrine has been interpreted. First, it places a heavy burden on the plaintiff to prove that the harm was a result of the defendant industry's activities. Moreover, the courts have construed the doctrine to safeguard only property that has been damaged beyond the standard of the locality. Industrialization has in fact

decreased the standard of environmental quality, forcing individuals to accept the presence of pollution. Because industries are often the mainstay of communities, the courts are unwilling to decide cases in favour of private individuals, where it may force the industry to close down. Under an anthropocentric law that tries to balance the interests of two property owners, it makes sense to save an industry over some 'piddling' amount of individual property damage. By focusing only on the interests of the property owners, however, nuisance law avoids the issue of damage to the environment itself, making it an ineffective means of protecting the ecosystem.

This is further exemplified by the court's assessment of remedies. As a reactive measure, nuisance law does not prevent the harm from occurring, except in cases where an injunction has been granted to thwart further damage. But, the courts are more apt to give money awards for the loss in the retail value of the land or loss in business, which would not be as great a cost to the industry as would an injunction that may cause a closure. However, the award may not be enough to repair the damage, and is not guaranteed to be used to restore the environment to its original state. The harm to the environment itself is not considered to be the issue of the case, since there is no requirement to protect the ecosystem or to ensure that efforts are made to restore it. As long as amends have been granted for any damage to the plaintiff's property interests, nuisance law has accomplished its objective.

Not unlike the common law approach, Canadian legislation has ignored the intrinsic value of nature, protecting resources only for the purpose of preserving human interests in them. Despite increasing evidence of the harm that human activities cause

to the environment, the federal government has continued to enact legislation that merely regulates the exploitation and pollution of resources. No effort is made to prohibit practices that are harmful to the environment, because it is not conducive to business interests or the national economy. In fact, much of the legislation has stated its purpose as the protection of the environment to promote the national economy. This anthropocentric approach cannot be interpreted as protecting the environment, because it is only a practice of management that is supposed to make the ecosystem better serve our needs. But even the management practices are faulty, when the federal government bargains with industries over the enforcement of standards that were originally decided upon through negotiation with the same industries. The politics of policy-making has played a decisive role in the development of environmental legislation, excluding public participation in the process and limiting the quality of protection.

Perhaps if the public were given the opportunity to become involved in the process of developing and enforcing environmental legislation, standards would be more stringent and frequently enforced. Despite the appeals for greater public participation, the federal government in its most recent environmental statute, CEPA, refused to expand the realm of public involvement. Although not specifically stated, the refusal to grant meaningful public involvement implies that ecological protection will continue to be a negotiation process between industries that may have no desire to protect the ecosystem, and the government. Even as the 'most comprehensive approach' to environmental preservation, CEPA does not provide any substantially greater protection than previous legislation. The federal government's unwillingness to include an

Environmental Bill of Rights in CEPA, prevented an approach that would recognize the intrinsic value of nature and would allow the public to use its rights to evoke greater protection for the ecosystem. Environmental rights, however, *are* necessary to preserve the ecosystem.

In light of the problems associated with the common law of nuisance and legislative attempts to regulate the use of nature, environmental rights offer a new approach that may be more effective in preserving the ecosphere. First, they recognize the intrinsic value of the ecosystem by specifically granting protection for environmental quality. Preservation would no longer be dependent on individuals claiming damage to their property interests, or limited to a standard of quality that is only sufficient for human survival. A standard that is necessary for the subsistence of the entire ecosystem would be set, and when industries, governments or individuals breach that standard, legal remedy would be automatically available for the environment. Secondly, in setting, administering and enforcing standards of environmental quality, anyone would be entitled to participate. The involvement of the general public through their vested environmental rights would expand the number of people able to defend the ecosystem beyond those who have a property interest in the matter or those who have substantial political clout in the legislative assembly. As an issue that affects everyone's lives, the entire populace should have an opportunity to be involved in the process of environmental protection, to guarantee its accountability to both ecological and human survival.

Environmental rights could be beneficial not only in Canada, but for other nations which have similar problems with their current legal approach to ecological preservation. Other industrialized nations like the United States and several European countries, which had similar legal procedures as Canada to protect the environment, have adopted an environmental right in their constitutions.² These countries realized that traditional anthropocentric laws could not, and did not, provide adequate protection for the environment. While their efforts are commendable, it is still not enough to have a few industrialized nations grant their citizens a right to some standard of environmental quality, because the emphasis is on protecting the environment of the nation-state, rather than the entire world. Although it may be possible for citizens of a 'protected' nation-state to argue that their right to environmental quality includes protection from any detrimental activity in the world because of the transboundary effect of ecological damage, it may be arduous to enforce this claim. The government of a nation that does not provide its citizens with a similar right, may not appreciate interference into its affairs. Alternatively, the people and the environment of a nation not invested with a right to environmental quality would have no recourse of their own and would be dependent on citizens of other countries, who may not be concerned with environmental protection outside of their nation. Because of the disparate ecological preservation that would result with only a few countries establishing environmental rights, international rights to environmental quality must be recognized in order to protect the entire ecosystem.

Some international instruments have recognized an emerging right to environmental quality that brings us closer to global ecological preservation. The 1972 *Stockholm Declaration* identifies the fundamental right of man "to freedom, equality and adequate conditions of life, in an environment of a quality that permits a life of dignity and well-being".³ More recently, the Legal Experts Group of the World Commission on Environment and Development compiled a list of general principles concerning the environment, one of which was the fundamental right of all human beings to "an environment adequate for their health and well-being".⁴ Although there is recognition on the international front of the need for an environmental right, these rights do not guarantee the standard of protection that would be available with a substantive right.

With the exception of developing a global approach to protecting the environment, these international principles provide no greater protection than current legal methods. The greatest problem is that they act as directives to the participating States, of what should be done to protect the environment for future human purposes. The States retain the primary responsibility for protecting the environment in the determination and enforcement of standards, allowing for the continued use of politics in the development of environmental policy. Although the right of individuals to an environment that can sustain their needs is recognized, the principles limit participation to those persons who may be affected by a harmful activity and exclude the intrinsic value of the ecosystem. The ecosystem is still considered as separate from humanity, only to be protected and managed in such a way that ensures its maximum sustainable

yield to present generations and maintains its potential for future human needs and purposes.⁵ As mentioned earlier, such an anthropocentric policy will not adequately protect the ecosystem because it allows us to justify the non-protection of resources that have no apparent use for humanity.

For the sake of the earth, substantive environmental rights recognizing the intrinsic value of the ecosystem and the right of all individuals to participate in its protection must be internationally entrenched. Several authors and international institutions have proposed the establishment of environmental protection as a human right, because the goal of environmental protection is to enhance and preserve the quality of human life.⁶ While such an approach would place environmental protection in the international arena, it may not ensure a better quality of preservation. By designating the environment as a human right, humanity is still regarded as separate and superior to other parts of the ecosystem. Protection of the environment would, therefore, be enlisted only for the purpose of enhancing human dignity, minimizing the quality of protection to standards sufficient for human survival.

For the purpose of preserving the entire ecosystem and not just those aspects that are important to human survival, international environmental rights should stand on their own. The United Nations could enact an International Environmental Bill of Rights, in the same way that it has established principles for the protection of the ozone layer or the sea.⁷ The Bill should embody all of the elements of a substantive right to environmental quality, which acknowledge the intrinsic value of nature and demand that the environment be considered in any decisions that could be detrimental to it. Such

an environmental right would vest every one with the right to seek legal recourse for an infringement or to become involved in the establishment and enforcement of environmental standards. Additionally, individuals or environmental groups would not be restricted to issues that concern their nation, but could participate in matters that may not have adequate public representation, due to low population levels or an unawareness of the gravity of the situation. The effect of an international Environmental Bill of Rights, would be to entrust every individual, in every nation with a legally enforceable right to global environmental quality. Such an approach is necessary, given the complexity of environmental issues and the unwillingness of some nations to provide appropriate legal policies for preserving the ecosystem.

There are several advantages that could be gained by recognizing an international environmental right. First, it would entrust every nation with the obligation to protect the environment in trust for the future. Every nation would have to abide by a set standard of environmental quality, diminishing the possibility of countries not caring about the effects their activities may have on other nations. This would also prevent certain areas from becoming 'dumping havens' due to their lax environmental laws. To lessen the burden of developing nations, an international fund, made up of collections from court awards and fines, could be set up to pay for the costs of environmental protection, or for repairing or replacing any damage to the ecosystem. In this way, every nation would be entitled to a quality environment, rather than a few industrialized nations which can afford to repair environmental damage. Ultimately, international environmental rights would provide a comprehensive approach to the

global preservation of the ecosystem, rather than a piecemeal method based on diverse standards set by various nations.

While ecological preservation is a prerequisite for human survival, our approach to saving the ecosystem need not entail this anthropocentric philosophy. To secure global environmental protection, the world must adopt an environmental ethic that acknowledges the intrinsic value of nature and allows significant public participation in the process. Even if Canada were to entrench environmental rights on its own initiative, which it should do, protection of the entire ecosystem would not be guaranteed. National efforts will only protect the national environment, and does not prevent the detrimental effects that may occur as a result of activities on the other side of the world. Somehow, every country must be convinced to come together, to prevent the continued degradation of the ecosystem. The entrenchment of international environmental rights would obligate every nation to develop and employ ecologically sound practices, and to ensure that there is legal recourse available for any failure to comply with the entrenched environmental ethic. International institutions should seriously consider the benefits that environmental rights would bestow on the ecosystem, and the public should lobby for their entrenchment. If the ecosystem is to survive and enable our subsistence, we must amend our failing anthropocentric legal system by establishing an international right to environmental quality.

NOTES

INTRODUCTION

1. William Leiss, Under Technology's Thumb, (Montreal: McGill-Queen's University Press, 1990) p. 9-10
2. For a detailed analysis of the impacts of population growth and technological advancement refer to The World Commission on Environment and Development, Our Common Future, (Oxford: Oxford University Press, 1987)
3. For a documented discussion of the current state of the environment, see Lester R. Brown, The State of the World 1992 (New York: W. W. Norton and Co., 1992)
4. See Alan Drengson, "Protecting the Environment, Protecting Ourselves: Reflections on the Philosophical Dimension" in Raymond Bradley and Stephen Duguid eds., Environmental Ethics, (Burnaby, B.C: Institute for the Humanities, Simon Fraser University, 1989) pp. 36-43 for an historical overview of the development of humanity's relationship with Nature. According to him, the writings of Descartes and Bacon stated the orientation that increasingly came to dominate Western thought and attitudes toward Nature.
5. Philip Hanson, "What Environmental Ethics Can Do For You", in Raymond Bradley and Stephen Duguid eds., Environmental Ethics, (Burnaby, B.C: Institute for the Humanities, Simon Fraser University, 1989) p. 20
6. *Fisheries Act*, (1867-68) S.C. ch. 60
7. See John McLaren, "Nuisance in Canada" in A. Linden ed., Studies in Canadian Tort Law, (Toronto: Butterworths, 1978) p. 320
8. Stan Rowe, "Crimes Against the Ecosphere", in Raymond Bradley and Stephen Duguid eds., Environmental Ethics, (Burnaby, B.C: Institute for the Humanities, Simon Fraser University, 1989) p. 100
9. See generally, John Swaigen and Richard Woods, "A Substantive Right to Environmental Quality" in John Swaigen, ed. Environmental Rights in Canada, (Toronto: Butterworths, 1981) p. 199
10. Barbara Rutherford and Paul Muldoon, "Environment and the Constitution", Submission to the House of Commons Standing Committee on the Environment, (Toronto: Canadian Environmental Law Association, 1991) p. 5 and accompanying notes.
11. Paul Emond, "Environmental Law and Policy: A Retrospective Examination of the Canadian Experience" in Ivan Bernier and Andree Lajoie eds., Consumer Protection, Environmental Law and Corporate Power, (Toronto: University of Toronto Press, 1985) p. 106
12. *Canadian Environmental Protection Act*, (1988) S.C. ch. 22, s. 91
13. Ted Schrecker, "Of Invisible Beasts and the Public Interest" in Robert Boardman ed., Canadian Environmental Policy: Ecosystems, Politics and Process (Don Mills, Ontario: Oxford University Press, 1992) p. 96

14. This is, of course, assuming that the public believes in such an ethic.

CHAPTER I

1. John McLaren, "The Common Law Nuisance Actions and the Environmental Battle -- Well-Tempered Swords or Broken Reeds?" (1972) 10 Osgoode Hall Law Journal 507
2. Linden, Allan, Canadian Tort Law (Toronto, Ontario: Butterworths, 1982), p. 493
3. Ibid.
4. Ibid., p. 495-498
5. See Jennifer Nedelsky, "Judicial Conservatism in an Age of Innovation: Comparative Perspectives on Canadian Nuisance Law 1880-1930" in D. Flaherty, ed. Essays in the History of Canadian Law Vol. 1 (Toronto, Ontario: Osgoode Society, 1984) pp. 281-322 and John McLaren, "Nuisance Law and the Industrial Revolution - Some Lessons from Social History" (1983) 3 Oxford Journal of Legal Studies 155-221. Both authors write compelling arguments illustrating that the courts were not advocating the rights of economic industrial interests in favour of smaller private interests. By focusing on the courts' interpretation of nuisance law with regard to environmental harm and their final decisions, including the type of award granted, my approach differs from these authors who emphasized the judgements in favour of private individuals, without considering the actual remedy. While the courts may have decided the majority of cases against industrial interests, a remedy that grants a nominal amount of money can neither be said to be a deterrent for industries or favourable for the environment. An emphasis on the final impact of decisions on the ecosystem demonstrates that the courts were not concerned with ecological degradation and did favour economic interests in the environment. See *Remedies* for a more detailed discussion.
6. In reading the cases, some judges made reference to the wealth of the plaintiffs. Where it was stated that the plaintiffs owned 'substantial homes', summer residences, or more than one plot of land, it can be alluded that these plaintiffs were wealthy and more capable of bringing nuisance actions because they had money to do so. Where at all possible, Appendix A notes the interest that the plaintiff was attempting to protect, in addition to the type of industry that was causing the harm.
7. See *Heenan v. Dewar*, (1870) 17 Grant's Chancery Reports (hereafter Gr) 638, *Swan v. Adams* (1876) 23 Gr 220, *Booth v. Ratte* (1892) 221 Supreme Court of Reports (hereafter SCR) 637, *Robins v. Dominion Coal Co.* (1899) 195 Quebec Law Reports - Superior Court (hereafter QRSC) 195, *Appleby v. Erie Tobacco Co.* (1910) 22 Ontario Law Reports (hereafter OLR) 533, *Danforth Glebe Estates Ltd v. Harris & Co.* (1918) 15 Ontario Weekly Notes (hereafter OWN) 21, *Young v. Fort 7.2 Frances Pulp and Paper Co.* (1919) 16 OWN 6, *Avenue Theatre Ltd. v. Vancouver Gas Company* (1928) 40 British Columbia Reports (hereafter BCR) 275

8. See *Francklyn v. People's Heat and Light Co.* (1899) 32 Nova Scotia Reports (hereafter NSR) 44, *Cairns v. Canada Refining and Smelting Co.* (1914) 6 OWN 562, *Taylor v. Mullen Coal Co.* (1915) 21 Dominion Law Reports (hereafter DLR) 841, *Smith v. Coutts Machinery Co. Ltd.* (1926) 3 Western Weekly Reports (hereafter WWR) 326, *Huston et al. v. Lloyd Refineries Ltd.* (1937) 37 OWN 53, *Godfrey v. Good Rich Refining Co. Ltd. et al.* (1939) 29 OWN 121
9. The cases themselves do not provide sufficient evidence of whether individuals were concerned with ecological degradation. While this is speculation on my behalf, reference to archival sources may confirm my argument. Given the limitations of this paper, I refrained from substantiating this claim, but suggest it as a possibility.
10. *Radenhurst v. Coate*, (1856) 6 Gr. 139
11. *Ibid.*, p. 141
12. *Ibid.*, p. 143
13. *Cartwright v. Gray*, (1866), 12 Gr. 402
14. *Heenan v. Dewar*, (1870) 17 Gr. 643 However, Mowat, V.C. did advise the defendant that he should seek a remedy for the odours for the sake of others whom it may affect.
15. *Swan v. Adams*, (1876) 23 Gr. 228-229
16. It is interesting to note that these factors began to first achieve recognition at the approximate time when the Canadian Industrial Revolution began to reach its peak growth.
17. *Canada Paper Co. v. Brown*, (1921) 63 SCR 247
18. *Claude v. Weir*, (1888) 4 Montreal Law Reports (hereafter MLR) 205-207
19. *Booth v. Ratte*, (1886) 10 OR 351. This case will be discussed in further detail when examining the effect that legislation had on environmental protection.
20. *An Act Respecting Sawmills on the Ottawa River*, Statutes of Ontario (hereafter S.O.) 1885, ch. 21, s.1
21. *Booth v. Ratte*, (1892) 21 SCR 637. The significance of the court's decision and the Ontario legislation limiting judgements of nuisance to damages will be discussed in detail under **REMEDIES**. Briefly, damages were not an impediment to polluting industries and did little to prevent further degradation of the environment.
22. *Robins v. The Dominion Coal Co.*, (1899) 16 QRSC 200
23. *Ibid.*, p. 201
24. *Cusson v. Galibert*, (1902) 22 QRSC 494
25. *Ibid.*, p. 495

26. *Appleby v. Erie Tobacco Co.*, (1910) 22 OLR 533
27. *Ibid.*, p. 536
28. *Oakley v. Webb*, (1916) 38 OLR 157
29. *Huston et al. v. Lloyd Refineries Ltd.*, (1937) 37 OWN 53
30. *Ibid.*, p. 55
31. See Nedelsky, *supra* note 6, p. 289, where she suggests that judges displayed a particular sympathy for well-to-do plaintiffs.
32. *Young v. Fort Frances Pulp and Paper Co.*, (1919) 17 OWN 6
33. *Ibid.*, p. 7
34. *Newhouse v. Coniagas Reduction Co.*, (1917) 12 OWN 136
35. *Ibid.*, p. 137, my emphasis
36. *Atchison v. Stratford Gas Co.*, (1922) 22 OWN 147
37. *Ibid.*, p. 148
38. Paul Emond, "Environmental Law and Policy: A Retrospective Examination of the Canadian Experience" in Ivan Bernier and Andree Lajoie, Consumer Protection, Environmental Law and Corporate Power, (Toronto: University of Toronto Press, 1985) p. 104
39. Linden, *supra* note 2, p. 497
40. *Cairns v. Canada Refining and Smelting Co.*, (1913) 3 OWN 423
41. *Ibid.*, p. 425
42. (1914) 6 OWN 564
43. *Canada Paper Co. v. Brown*, (1921) 63 SCR 243
44. *Ibid.*, p. 256
45. *Fillion v. New Brunswick International Paper Co.*, (1934) 3 DLR 22
46. *Ibid.*, p. 26
47. *Claude v. Weir*, (1888) 4 MLR 197
48. *Ibid.*, p. 220-221
49. *Ibid.*, p. 208
50. *Black v. Canadian Copper Co.*, (1917) 12 OWN 243
51. *Ibid.*, p. 244
52. *Lindala v. Canadian Copper Co.*, (1920) 47 OLR 29

53. *Bottom v. Ontario Leaf Tobacco Co.*, (1935) 2 DLR 699
54. *Ibid.*, p. 700
55. *Ibid.*, p. 703
56. *Ibid.*, p. 704
57. *Nepisiquit Real Estate and Fishing Co. Ltd. v. Canadian Iron Corporation Ltd.*, (1913) 42 New Brunswick Reports 390
58. *Ibid.*, p. 395
59. *Taylor v. Mullen Coal Co.*, (1915) 21 DLR 841-842
60. *Ibid.*, p. 845
61. On this point, both McLaren and Nedelsky, *supra* note 5, would agree. On the basis of decisions in favour of the plaintiff, they concluded that the courts did not favour industrial interests.
62. John McLaren, "Nuisance in Canada" in A. Linden ed. *Studies in Canadian Tort Law*, (Toronto, Ontario: Butterworths, 1978) p. 354 at note 125
63. *Francklyn v. People's Heat and Light Co.*, (1899) 32 NSR 59
64. *Ibid.*, p. 63
65. *Appleby v. Erie Tobacco Co.*, (1910) 22 OLR 538
66. *Ibid.*, p. 538
67. *Canada Paper Co. v. Brown*, (1922) 63 SCR 252

CHAPTER II

1. Much of the 'environmental' policy introduced during the early twentieth century referred to economic development and exploitation as an interest of the public. See in particular *The Conservation Movement* and *The Commission of Conservation* below.
2. Federal legislation is emphasized because environmental protection requires a comprehensive approach applicable to the entire country.
3. Alastair Lucas, "Harmonization of Federal and Provincial Environmental Policies: The Changing Legal and Policy Framework" in Owen Sanders, ed. *Managing Natural Resources in a Federal State*, (Toronto: Carswell, 1985) p. 33
4. *British North America Act*, (1867) 30 & 31 Vict. ch. 3, s. 91 (hereafter B.N.A. Act)
5. *Ibid.*, s. 91 (10), (12) & (2)

6. The northern territories are not considered to be the property of any province, and therefore, by virtue of the peace, order and good government clause, the federal government retains jurisdiction. For further discussion, see Dale Gibson, "Constitutional Jurisdiction Over Environmental Management" (1973) 23 University of Toronto Law Journal 54
7. B.N.A. Act, supra note 4, s. 108 provides for a Third Schedule enumerating the public works and property of each province.
8. Ibid., s. 92(10)
9. Ibid., s. 92(5), (10), (13) & (16)
10. Constitution Act, (1982) S.C. ch. 11, s. 92A(1)
11. Dale Gibson, supra note 6, p. 55
12. Ibid., p. 55-56. See also Toby Vigod, "The Law and the Toxic Blob" (1986) 13 Alternatives 24, which demonstrates how governments disclaim authority for environmental problems by alleging it was within the other government's jurisdiction.
13. Gibson, supra note 6, p. 57
14. Lucas, supra note 3, p. 34
15. Refer to Lucas, Ibid. for a complete discussion regarding the constitutional conflict arising from the federal government's intrusion into provincial matters.
16. Lucas, supra note 3, p.34
17. Government Organization Act, (1970) R.S.C. ch.14 (2nd supp.) s. 6(b)
18. This appears to be the direction that the federal government is headed. The Charlottetown Accord delegated exclusive jurisdiction over forestry, mining, tourism, recreation, municipal and urban affairs, and regional development, to provinces. Apparently, the governments are still guided by a ancient division of powers, to such an extent that the issue of environmental protection as a whole was completely ignored. For further reference see Consensus Report on the Constitution - Final Text, Charlottetown, August 28, 1992, (Ottawa: Ministry of Supply and Services, 1992) Part III
19. Tullio Caputo, "Political Economy, Law and Environmental Protection: Introduction" in Tullio Caputo ed, Law and Society: A Critical Perspective, (Toronto: Harcourt Brace Jovanovich, 1989) p. 162
20. Thomas Burton, Natural Resources Policy in Canada: Issues and Perspectives, (Toronto: McClelland and Stewart Ltd., 1972) p. 12
21. Brian Woodrow, "Resources and Environmental Policy-Making at the National Level: The Search for Focus" in D.P. Dwivedi ed., Resources and the Environment: Policy Perspectives for Canada, (Toronto: McClelland and Stewart, 1980) p. 25

22. "Resource conservation" refers to policies that manage and develop natural resources to ensure sustainability for present and future human use. Alternatively, "ecological preservation" is concerned with protecting the state of the environment because of its inherent value in its own right, regardless of any utility it may have for humanity. See Doug Macdonald, The Politics of Pollution: Why Canadians Are Failing Their Environment, (Toronto: McClelland and Stewart Inc., 1991) p. 31
23. R.C. Brown, "The Doctrine of Usefulness: Natural Resource and National Park Policy in Canada, 1887-1914", in J.G. Nelson ed., Canadian Parks in Perspective, (Toronto: Harvest House, 1969), pp. 46-62
24. *An Act to amend Ch. 62 of the Consolidated Statutes of Canada to provide for the better regulation of Fishing and Protection of Fisheries*, (1865) 29 Vict. ch. 11
25. *An Act for the Regulation of Fisheries and Protection of Fisheries* (1868) 31 Vict. ch. 60, s. 14(2) gave the Minister of Fisheries the power to exempt any streams in which the enforcement of sawdust dumping was not requisite for the public interest. This can be seen as an effort by the federal government to promote the usefulness of both resources.
26. Burton, supra note 20, p. 25
27. F.J. Thorpe, "Historical Perspective on the Resources For Tomorrow Conference", Resources For Tomorrow Conference Background Papers, v. 1, (Ottawa: Department of Northern Affairs and Natural Resources, 1961) p. 3
28. Burton, supra note 20, p. 30, emphasis added
29. Ibid., p. 30 & Macdonald, supra note 22, p. 81
30. Thorpe, supra note 27, p. 4
31. Macdonald, supra note 22, p. 81
32. Thorpe, supra note 27, p. 6
33. *Dominion Forest Reserves and National Parks Act*, (1911) S.C. ch. 10, s. 3
34. *Migratory Birds Convention Act*, (1917) S.C. ch. 18
35. Ibid., Schedule A
36. Burton, supra note 20, p. 34
37. Ibid.
38. Woodrow, supra note 21, p. 29. It must be noted that public health concerns were regulated by the provincial and municipal governments, explaining the lack of federal policy on the issue.
39. Burton, supra note 20, p. 35

40. *Prairie Farm Rehabilitation Act*, (1935) S.C. ch. 23
41. Burton, supra note 20, p. 37
42. Ibid., p. 37 & Thorpe, supra note 27, p. 10
43. Burton, supra note 20, p. 38
44. Macdonald, supra note 22, p. 133
45. *National Harbours Board Act*, (1952) R.S.C. ch. 187
46. *Navigable Waters Protection Act*, (1952) R.S.C. ch. 193
47. *Canada Shipping Act*, (1952) R.S.C. ch. 29
48. Thorpe, supra note 27, p. 1
49. Macdonald, supra note 22, p. 96
50. Carol Anne Rolf and Andrew Thompson, "Environmental Protection Alternatives in the 1980's" in Constance Hunt et al. eds., Environmental Protection and Resource Development: Convergence for Today, (University of Calgary Press, 1985) p. 79
51. *Canada Water Act*, (1970) R.S.C. ch. 5 (1st supp.)
52. *Arctic Waters Pollution Prevention Act*, (1969-70) S.C. ch. 47
53. *Northern Inland Waters Act*, (1970) R.S.C. ch. 28 (1st supp.)
54. *Clean Air Act*, (1970-71-72) S.C. ch. 47
55. *Environmental Contaminants Act*, (1974-75-76) S.C. ch. 72
56. See for example J.J. Greene, "Policy on the Environment", (1971) 21 University of Toronto Law Journal 244 who notes that the principle of the *Canada Water Act* was to administer river basins as resources, "to encourage, rather than stifle, economic development of the region, while maintaining its amenities and capacity to service other human needs".
57. Ted Schrecker, "The Political Context and Content of Environmental Law" in Tullio Caputo et al. eds., Law and Society: A Critical Perspective, (Toronto: Harcourt Brace Jovanovich, 1989) p. 173
58. Erick Schmidt, "The Social Aspects of Pollution" in Richard Abbott ed., Readings on the Law of Environmental Quality, (Canadian Council of Resource Ministers, 1971) p. I-59
59. See Schmidt, Ibid., for a complete discussion of the concerns held by each of these interests groups.
60. R. A. Dahl, Modern Political Analysis 4th ed. (Englewood Cliffs, NJ: Prentice-Hall, 1984) p. 31
61. Schmidt, supra note 58, pp. I 60-61; Schrecker, supra note 57, pp. 178-83; and Macdonald, supra note 22, pp. 41-45

62. Schrecker, supra note 57, p. 179
63. Ted Schrecker, "The Mobilization of Bias in Closed Systems: Environmental Regulation in Canada" (1984) 14 Journal of Business Administration 50
64. Ibid., p. 49
65. Schrecker, supra note 57, p. 179
66. Ibid., p. 180
67. David Anderson, "Government and the Environment: A Need for Public Participation" (1971) 6 University of British Columbia Law Review 111
68. Ibid., pp. 111-112
69. Sessional Papers, (1890) No. 65, *Report of Mr. Henry Gray*, p. 12-13
70. Peter Gillis, "Rivers of Sawdust: The Battle Over Industrial Pollution in Canada, 1865-1903" (1986) 21 Journal of Canadian Studies 86
71. *An Act to amend Ch. 62 of Consolidated Statutes of Canada to provide for better regulation of Fishing and protection of Fisheries*, (1865) 29 Vict., ch. 11
72. John McLaren, "The Tribulations of Antoine Ratte: A Case Study of the Environmental Regulation of the Canadian Lumbering Industry in the Nineteenth Century" (1984) 33 University of New Brunswick Law Journal 216
73. Journal of the House of Commons, (1871) 65 March 10, *Report of the Commission on Navigable Streams*, 12-15
74. *An Act for the better protection of Navigable Streams and Rivers*, (1873) 19 S.C. ch. 65
75. Gillis, supra note 70, p. 91
76. McLaren, supra note 72, p. 223
77. Ibid.
78. *Senate Debates*, Comments of Hon. Francis Clemow, (May 7, 1888) p. 560
79. *Senate Debates*, Comments of Hon. Francis Clemow, (June 25, 1891), p. 129
80. Ibid., p. 131
81. *Senate Debates*, (June 10, 1898) pp. 1266-1267
82. Gillis, supra note 70, p. 99
83. *Senate Debates*, Comments of Hon. Mr. Scott, (June 27, 1895) p. 484

84. *Senate Debates*, Comments of Hon. Mr. Scott, (July 2, 1895) pp. 504-506
85. McLaren, supra note 72, p. 251
86. Legislation at the provincial level was virtually a reflection of federal statutes already in place. The provinces were also concerned with regulating water pollution, but for the necessity of a safe water supply and sewage treatment facilities for public purposes. *Public Health Acts* prohibiting the dumping of wastes that were "likely to become dangerous to health or to become a nuisance as to impair the safety, palatability, or portability of the water supply" were enacted in each province. See David Estrin, "Annual Survey of Canadian Law - Part II, Environmental Law" (1975) 7 Ottawa Law Review 399
87. Macdonald, supra note 22, p. 32
88. National Harbour Board By-Law A-1, (1955) S.O.R. Vol III, p. 2253, s.4
89. Oil Pollution Prevention Regulations, (S.O.R. 68/434) s. 4 & 6, Schedule A, s. 1. This prohibition was subject to the exceptions of saving a life or ship, or an unavoidable leakage.
90. Ibid., s. 8(1)(b)
91. *Fisheries Act*, (1969-70) S.C. ch. 63, s. 33(2)
92. *Navigable Waters Protection Act*, (1968-69) R.S.C. ch. 15, s. 11, 12 & 14
93. *Canada Water Act*, supra note 51, preamble
94. Ibid., definition of "waste"
95. *Northern Inland Waters Act*, supra note 53, s.6(1)
96. *Arctic Waters Pollution Prevention Act*, supra note 52, preamble
97. *Canada Water Act*, supra note 51, s. 27
98. *Ocean Dumping Control Act*, (1974-75) S.C. ch. 55, s. 10(2)(a), (b), (d)
99. Ibid., s.12(3) & (5)
100. *Air Pollution Regulations*, (1964) S.O.R. 64-97 s. 3 & 5
101. *Clean Air Act*, supra note 54, s. 3, 4, & 5
102. Ibid., s. 19
103. *Pest Control Products Act*, (1969) S.C. ch. 50, s. 5
104. *Environmental Contaminants Act*, supra note 55, s. 8
105. Schrecker, supra note 57, pp. 175-176

106. *Environmental Contaminants Act*, supra note 55, s. 6
107. Schrecker, supra note 57, p. 174
108. Rolf and Thompson, supra note 50, p. 81
109. Paul Emond, "Environmental Law and Policy: A Retrospective Examination of the Canadian Experience" in Ivan Bernier and Andree Lajoie, eds., Consumer Protection, Environmental Law and Corporate Power, (Toronto: University of Toronto Press, 1985) p. 118
110. Alastair Lucas and Peter Finkle, Environmental Law in the 1980's: A New Beginning, (Canadian Institute of Resources Law, 1982) p. viii
111. Emond, supra note 109, p. 121
112. Ibid., pp. 122-124
113. Andrew Thompson, "Bargaining With the Environment: The Limits of Legal Regulation", in A. Brannigan and S. Goldenburg, eds., Social Responses to Technological Change (Connecticut: Greenwood, 1985) pp. 41-42
114. Schrecker, supra note 63, p. 178
115. Paul Emond, "Environmental Law at the Limits of Incremental Development" in supra note 110, p. 8
116. Rolf and Thompson, supra note 50, p. 82
117. Lucas and Finkle, supra note 110, p. viii
118. Ted Schrecker, "Of Invisible Beasts and the Public Interest" in Robert Boardman ed., Canadian Environmental Policy: Ecosystems, Politics and Process (Don Mills, Ontario: Oxford University Press, 1992) p. 96
119. Emond, supra note 115, p. 3
120. Philip Elder, "Environmental Impact Assessment in Canada: The Slave River Project" (1986) 24 Alberta Law Review 210
121. Schrecker, supra note 118, p. 96
122. Consult *Canadian Wildlife Federation Inc. v. Canada (Minister of Environment)*, (1989) 4 Canadian Environmental Law Reports (New Series) 201 and *Friends of the Oldman River Society v. Canada (Minister of Transport)*, (1990) 5 Canadian Environmental Law Reports (New Series) 227 for the complete decisions of the court.
123. Schrecker, supra note 118, p. 96 and Emond, supra note 115, p. 126
124. Emond, supra note 115, p. 126
125. Bill C-13, *The Canadian Environmental Assessment Act*, (proclaimed on March 19, 1992) to come into force later this year.

126. Ibid., s. 53(3) & (4)

127. Ibid., s. 18(3) & s. 22(1)

128. Canadian Environmental Protection Act, (1988) S.C. ch. 22

CHAPTER III

1. The Canadian Environmental Protection Act, (1988) S.C., ch. 22, hereafter CEPA

2. Ibid., s. 2(a)

3. Ibid., s. 2(d)

4. Cynthia McGovern, "McMillan's New Environmental Protection Act Disappoints Environmentalists" (1987) 15 Alternatives 57

5. The Canadian Environmental Advisory Council, Review of the Proposed Environmental Protection Act, (Ottawa: Environment Canada, 1987) pp. 55-57, hereafter CEAC

6. CEPA, supra note 1, s. 104-110

7. Ibid., s. 113 & 118

8. Ibid., s. 115

9. Ibid., s. 130

10. Ibid., declaration

11. Random House Webster's College Dictionary, (New York: Random House Inc., 1992) p. 1512

12. CEPA, supra note 1, s. 3(1)

13. Ibid., s. 11

14. Ibid., s. 50(1)

15. Ibid., s. 87

16. Ibid., s. 115, where it states, "Every person who, in contravention of this Act, intentionally or recklessly..." (emphasis added)

17. CEAC, supra note 5, p. 34. Given the implications of the wording in section 115 of CEPA, the CEAC recommended that it be changed, and proposed the incorporation of a wider provision in the Criminal Code. Based on recommendations by the Law Reform Commission of Canada, the CEAC urged that the Criminal Code offence be framed in terms of "damaging or endangering the environment" so that all major crimes against the environment are deemed as criminal offences. As of yet, this has not been enacted.

18. *Minutes of Proceedings*, Comments of Paul Muldoon, Counsel for Energy Probe, in House of Commons Legislative Committee on Bill C-74, (December 10, 1987) 5:6, (hereafter Muldoon)

19. *Minutes of Proceedings*, Comments of William Andrews, Secretary of the National Environmental Law Section of the Canadian Bar Association, in House of Commons Legislative Committee on Bill C-74, (January 21, 1988) 11:47, (hereafter Andrews)
20. *Minutes of Proceedings*, Comments of Claude Forget, President of Asbestos Institute, in House of Commons Legislative Committee on Bill C-74, (December 3, 1987) 3:6
21. *Ibid.*, 3:12
22. *Minutes of Proceedings*, Representative of Quebec Metals Mining Association Inc., in House of Commons Legislative Committee on Bill C-74, (December 15, 1987) 6:25
23. *Minutes of Proceedings*, Comments of Michel Magnant, Analyst for Conseil du patronat du Quebec, in House of Commons Legislative Committee on Bill C-74, (December 16, 1987) 7:15
24. CEPA, *supra* note 1, s. 13(2) & 14
25. *Ibid.*, s. 48(2), 51(2), 62(2), 55(2), & 86(4) respectively
26. *Ibid.*, s. 91
27. CEAC, *supra* note 5, p. 26
28. Andrews, *supra* note 19, p. 11:49
29. McGovern, *supra* note 4, p. 60
30. CEAC, *supra* note 5, p. 30
31. *Ibid.*
32. CEPA, *supra* note 1, s. 94
33. *Ibid.*, s. 108
34. *Ibid.*, s. 136
35. *Minutes of Proceedings*, Written Submission by Toby Vigod, Counsel for the Canadian Environmental Law Association, in House of Commons Legislative Committee on Bill C-74, (January 1, 1988), Appendix C-74/3, 9A:26-27
36. CEPA, *supra* note 1, s. 8(3)
37. *Minutes of Proceedings*, Comments of Toby Vigod, Counsel for the Canadian Environmental law Association, in the House of Commons Legislative Committee on Bill C-74, (January 19, 1988) 9:5 and Muldoon, *supra* note 18, p. 5:6. The components and relevance of an Environmental Bill of Rights will be discussed in the following chapter.
38. *Minutes of Proceedings*, Comments of Honourable Tom McMillan, Minister of the Environment, in House of Commons Legislative Committee on Bill C-74, (February 3, 1988) 14:14

39. Ibid., 14:15

CHAPTER IV

1. Herman Daly and John Cobb, For the Common Good: Redirecting the Economy Toward Community, the Environment, and a Sustainable Future, (Boston: Beacon Press, 1989) p. 100
2. Ibid., p. 102
3. Martin Horwitz, The Transformation of American Law: 1780-1860, (Cambridge, Massachusetts: Harvard University Press, 1977) p. 31
4. Ulrich Preuss, "The Concept of Rights and the Welfare State" in Gunther Teubner ed., Dilemmas of Law in the Welfare State, (New York: De Gruyter, 1989) p. 159
5. Albert Weale, Political Theory and Social Policy, (London: MacMillan, 1983) p. 123
6. Francois Ewald, "The Concept of Social Law", in Gunther Teubner ed., Dilemmas of Law in the Welfare State, (New York: De Gruyter, 1988) p. 46
7. Joel Feinberg, Rights, Justice and the Bounds of Liberty, (Princeton, New Jersey: Princeton University Press, 1980) p. 155
8. Jurgen Habermas, The Structural Transformation of the Public Sphere, (Cambridge, Massachusetts: MIT Press, 1989) pp. 223-227
9. See John Swaigen and Richard E. Woods, "A Substantive Right to Environmental Quality" in John Swaigen, ed. Environmental Rights in Canada, (Toronto: Butterworths, 1981) p. 202 for the debate over what form environmental rights should take.
10. Christopher Stone, "Should Trees Have Standing? - Toward Legal Rights for Natural Objects" (1972) Southern California Law Review 450, See also his more recent work, Earth and Other Ethics, (New York: Harper and Row, 1987), especially pp. 43-109 where he discusses the implications of recognizing the intrinsic value of Things that currently have no moral worth or legal value in our society. For purposes of this paper, I will only refer to his first article.
11. Ibid., p. 455
12. Ibid., pp. 450-457
13. Ibid., p. 457
14. Ibid., p. 458
15. Ibid.
16. Ibid., p. 466
17. Ibid., p. 464

18. Ibid., pp. 470-471, For Stone, it is no objection to say that the guardian could not judge the needs of the natural object, or that it would be no different than the current system that recognizes the Attorney General as the guardian of the environment. According to him, natural objects communicate their needs to us through their appearance, for example, of lawn being dry and yellow, and therefore, in need of water. While Stone does acknowledge that the Attorney General acts as a guardian, protection of the environment is insufficient because its statutory powers are limited and the Attorney General must exercise discretion in advancing a variety of social goals, often leaving little resources for the protection of the environment.
19. Ibid., pp. 461 & 473-474
20. Ibid., p. 476
21. Ibid., pp. 462 & 476-478
22. Ibid., p. 477
23. Ibid., p. 480
24. Ibid., pp. 480-481, Stone also suggests that criminal fines be deposited into the trust fund, instead of going to the general treasuries.
25. Ibid., p. 481
26. Ibid., p. 483
27. Ibid., p. 484
28. Ibid., p. 485
29. Ibid., p. 486
30. See in particular John Livingston, "Rightness or Rights?" (1984) 22 Osgoode Hall Law Journal 309, Goldstein, "Law Reform or World Reform" (1990) 35 McGill Law Journal 360 and Philip Elder, "Legal Rights for Nature - The Wrong Answer to the Right(s) Question" (1984) 22 Osgoode Hall Law Journal 285
31. Livingston, supra note 3[^], p. 320
32. Goldstein, supra note 30, p. 367
33. Elder, supra note 30, p. 291
34. Ibid., p. 289
35. Swaigen and Woods, supra note 9, p. 212
36. Stone, supra note 10, p. 484 (emphasis in original)
37. See Elder, supra note 30, p. 291 for a list of procedures that are possible without the extension of Stone's environmental right.

38. Swaigen and Woods, supra note 9, p. 203. Rights involve someone being vested with a legally enforceable object. In the case of environmental rights entrusted to citizens, the environment is the thing to which the right refers, the thing that is being valued as worthy of legal protection.
39. Ibid.
40. Ernest Brandl and Hartwin Bungert, "Constitutional Entrenchment of Environmental Protection: A Comparative Analysis of Experiences Abroad" (1992) 16 Harvard Environmental Law Review 4
41. Swaigen and Woods, supra note 9, p. 221
42. Barbara Rutherford and Paul Muldoon, "Designing an Environmentally Responsible Constitution" (1992) 18 Alternatives 26-27
43. Brandl and Bungert, supra note 40, p. 8
44. Barbara Rutherford and Paul Muldoon, "Environment and the Constitution", *Submission to the House of Commons Standing Committee on Environment* (Toronto: Canadian Environmental Law Association, 1992) p. 7
45. Government of Canada, Shaping Canada's Future Together: Proposals, (Ottawa: Supply and Services, 1991), p. iii
46. Rutherford and Muldoon, supra note 42, p. 28
47. Ibid.
48. Colin Stevenson, "A New Perspective on Environmental Rights After the Charter" (1983) 21 Osgoode Hall Law Journal 398
49. Rutherford and Muldoon, supra note 42, p. 30
50. Ibid.
51. Ibid. and Rutherford and Muldoon, supra note 44, pp. 23-24
52. Dale Gibson, "Constitutional Entrenchment of Environmental Rights" and William Andrews, "The Environment and the Canadian Charter" in Nicole Duple, ed., Le droit à la qualité de l'environnement: un droit en devenir, un droit à définir, (Montreal: Editions Québec/Amérique, 1988) pp. 284 & 265, respectively
53. The only cause of action that citizens may have available to them, is to claim that the government had failed to uphold their environmental rights by instituting legislation that did not effectively prevent pollution or harm to the environment.
54. Swaigen and Woods, supra note 9, p. 224
55. Gunther Teubner, "Substantive and Reflexive Elements in Modern Law" (1983) 17 Law and Society Review pp. 240 & 254. It must be noted that Teubner does not endorse substantive law because of its problematic nature of increasing state regulation and intervention into market structures. While this may be true, his theory of

reflexive law which seeks to regulate processes, organization, and the distribution of rights and competencies through procedural norms will not advance environmental interests. It may restructure power by requiring corporations to be sensitive to their outside effects, but it does not guarantee that citizens can participate, nor that the environment will be given actual protection.

56. Paul Muldoon, "The Fight for and Environmental Bill of Rights" (1988) 15 Alternatives 35
57. Swaigen and Woods, supra note 9, p. 200
58. Ibid., p. 204
59. David Estrin and John Swaigen, Environment On Trial, (Toronto: Canadian Environmental Law Association, 1978) p. 311
60. "An Overview to the Essential Principles of an Environmental Bill of Rights", A Briefing Document to the Minister of the Environment on a Proposed Environmental Bill of Rights, March 20, 1991, p. 9 (hereinafter Briefing Document)
61. Swaigen and Woods, supra note 9, pp. 196 & 204, by recognizing environmental quality as a legitimate claim to be protected by the law, individuals would in essence hold a property right to a clean ecosystem that would be balanced against industrial property rights to pollute the environment. This is distinguished from current methods of protecting the environment, since the general public does not have any right in the entire ecosystem, but only in land that is owned individually. A substantive right would secure protection for the whole environment, and not merely those tracts of land protected by a few individuals who can afford to sue industries.
62. Murray Rankin, "An Environmental Bill of Rights for Ontario: Reflections and Recommendations, A Discussion Paper" (1991) p. 22
63. Ibid., p. 31
64. Briefing Document, supra note 60, p. 17
65. Ibid., p. 15 & Swaigen and Woods, supra note 9, p. 204
66. Ibid., p. 16 & Rankin, supra note 62, p. 32
67. Ontario Law Reform Commission, Report on Damages for Environmental Harm (1990)
68. Rankin, supra note 62, p. 32
69. Estrin and Swaigen, supra note 59, p. 312
70. Briefing Document, supra note 60, p. 19
71. Rankin, supra note 62, p. 35
72. Briefing Document, supra note 60, pp. 19-20. Public meetings are informal forums that allow individuals to make comments and presentations regarding certain issues. Alternatively, public

hearings take the form of an adjudicative procedure, wherein evidence and documentation can be introduced to support a claim.

73. Rankin, supra note 62, p. 35
74. Ibid., p. 42
75. Ibid.
76. Ibid., pp. 42-43
77. Estrin and Swaigen, supra note 59, p. 318
78. See Rankin, supra note 62, p. 24, for further details with respect to the justifications employed by the government to restrict public access to information.
79. Briefing Document, supra note 60, p. 21
80. See the Ontario Environmental Protection Act, (1983) S.O. ch. 52, s. 134(b) which contains a whistle blower's provision.
81. Estrin and Swaigen, supra note 59, p. 322
82. Rankin, supra note 62, p. 44
83. Briefing Document, supra note 60, p. 11
84. Rankin, supra note 62, p. 23
85. Ibid., pp. 36-37
86. Rankin, supra note 62, p. 38
87. Muldoon, supra note 56, p. 36
88. See for example Daniel K. Slone, "The Michigan Environmental Protection Act: Bringing Citizen-Initiated Environmental Suits into the 1980's" (1985) 12 Ecology Law Quarterly 271. In his studies, he found that a total of 185 actions had been filed for the period between its enactment in 1970 and April 1, 1983. His conclusion was that the floodgates theory did not hold any water.
89. Briefing Document, supra note 60, p. 7
90. *Environmental Rights Act*, Bill 17, proclaimed on June 11, 1990
91. Bill 26, *An Act respecting the Environmental Bill of Rights*, 1st reading May 31, 1993
92. Private member's bills were repeatedly introduced during the 1980's with little success. See Ted Schrecker, "Of Invisible Beasts and the Public Interest" in Robert Boardman, ed., Canadian Environmental Policy: Ecosystems, Politics and Process, (Don Mills, Ontario: Oxford University Press, 1992) pp. 98-102
93. Bill 26, supra note 91, s. 3-48

94. Ibid., s. 82-90
95. Ibid., s. 92-98, see especially s.95(3) which provides for additional obligations that may be imposed on the defendant.
96. Ibid., s. 61-73
97. Ibid., s. 74-81
98. Ibid., s. 104-116
99. Ibid., s. 49-60
100. Ibid., s. 58(2). This section provides for a report by the Environmental Commissioner to establish the progress and co-operation of the ministers with requests by the Commissioner for information.

CONCLUSION

1. See World Commission on Environment and Development, Our Common Future, (Oxford: Oxford University Press, 1987) p. 4-8 regarding the interlocking crises of the environment, economy and society.
2. Barbara Rutherford and Paul Muldoon, "Environment and the Constitution", Submission to the House of Commons Standing Committee on the Environment, (Toronto: Canadian Environmental Law Association, 1991) p. 14
3. *Declaration of the United Nations conference on the Human Environment*, June 16, 1972, Principle 1
4. Experts Group of the World Commission on Environment and Development, "Legal Principles for Environmental Protection and Sustainable Development" in Environmental Protection and Sustainable Development: Legal Principles and Recommendations (Norwell, MA: Graham and Trotman, 1987) Article 1, p. 38
5. Ibid., p. 38
6. See for example, Melissa Thorne, "Establishing Environment As a Human Right" (1991) 19 Denver Journal of International Law and Policy 301, Dinah Shelton, "Human Rights, Environmental Rights, and the Right to Environment" (1991) 28 Stanford Journal of International Law 103 and supra note 3.
7. See *Montreal Protocol on Substances that Deplete the Ozone Layer*, Montreal (September 16, 1987) and *United Nations Convention on the Law of the Sea* (1982)

Appendix A:

Appendix A:		Interests Involved	Type of Pollution	Considerations of the Court	Onus of Plaintiff	Award of the Court
Case Name	Year	Private v. Industry Business v. Industry	Land (soot & dust) Air (noxious odor) Water	Character of Locality Local Standard of Comfort Importance of Industry Special Injury Property Damage	Proof of Cause & Effect Proof Shown Scientific Evidence Change in Standard of Care	Damages Injunction Stay of Injunction
Radenhurst v. Coale (2 plots) v. (soap factory)	1856	*	*	*		*
Cartwright v. Gray (3 houses) v. (carpenter)	1866	*	*		*	*
Heenan v. Dewar (store) v. (tannery)	1870	*	*			
Swan v. Adams (tannery) v. (oil refinery)	1876	*	*		*	
Claude v. Weir (tannery) v. (cottage)	1888	*	*	*	*	
Booth v. Ratle (mill owner) v. (boal owner)	1892	*	*	*	*	\$3000
Francklyn v. People's Heat... (estate) v. (coke works)	1899	*	*	*	*	*
Robins v. Dominion Coal (landlord) v. (coal towers)	1899	*	*	*		
Cusson v. Galibert (ex-slaughterer) v. (tannery)	1902	*	*	*		
Mont. St. Ry. v. Boudreau (powerhouse) v. (landlord)	1905	*	*	*	*	\$300
Smith v. Consolidated Mine (orchard) v. (smelter)	1909	*	*		*	\$1928.50
Appleby v. Erie Tobacco (business) v. (tobacco co.)	1910	*	*	*		*
Hunter v. Richards (mill owner) v. (mill owner)	1913	*	*			\$200
Nepisiquit Fish v. Cdn. Iron (fishing co.) v. (smelter)	1913	*	*	*	*	*
Cairns v. Canada Refining (refinery)	1914	*	*	*	*	\$80
Taylor v. Mullen Coal (1 plaintiff) v. (coal co.)	1915	*	*	*		\$1000
Beamish v. Glenn (blacksmith)	1915	*	*	*		\$25
Oakley v. Webb (stonecutter)	1916	*	*	*	*	

Case Name	Year	Interests Involved		Type of Pollution	Considerations of the Court					Onus of Plaintiff	Award of the Court							
		Private v. Industry	Business v. Industry		Land (soot & dust)	Air (noxious odour)	Water	Character of Locality	Local Standard of Comfort		Importance of Industry	Special Injury	Property Damage	Proof of Cause & Effect	Proof Shown	Scientific Evidence	Change in Standard of Care	Damages
Black v. Canadian Copper (farms) v. (refinery)	1917	*	*	*			*		*	*	*					\$845		
Newhouse v. Coniagas Co. (bee owner) v. (smelter)	1917		*	*						*	*	*	*					
Danforth Glebe v. Harris Co. (property owners) v. (factory)	1919		*	*			*			*	*	*				\$2000	*	6 mos
Young v. Ft. Francis Pulp (hotel) v. (pulp & paper mill)	1919		*	*		*			*	*	*					\$50		
Canada Paper Co. v. Brown (pulp & paper mill) v. (collage)	1921	*		*		*	*	*	*								*	+
McCormick v. King Bros. (tannery)	1922	*		*	*	*			*							\$150	*	6 mos
Alchison v. Stratford Gas (farm) v. (gas co.)	1922		*			*				*	*	*						
Smith v. Coult's Machinery (estate) v. (machinery)	1926	*		*		*				*	*					\$100	*	
Avenue Theatre v. Vancouver (theatre) v. (gas co.)	1928		*	*		*				*								
Trillion v. New Brunswick Paper (fisher) v. (pulp & paper mill)	1934		*		*			*		*	*	*						
Bottom v. Ont. Leaf Tobacco (tobacco co.)	1935	*		*	*	*	*	*	*	*	*	*				*		
Huston v. Lloyd Refineries (estate) v. (oil refinery)	1937	*		*	*	*		*		*	*	*				\$7000	*	
McNiven v. Crawford (farm) v. (brick-maker)	1939		*	*		*				*	*	*				\$5500	*	
Godfrey v. Good Rich... (country estate) v. (refinery)	1939	*		*	*	*				*	*						for odour	
Cox v. Warne (hotel) v. (sawmill)	1939	*		*		*	*											

+ Possibility of the Industry receiving time/additional time in the staying of an injunction

N.B. Under 'Award of the Court', where there are no dots, the case was decided in favour of the defendant industry, & the action was dismissed.

REFERENCES

- An Act to amend Ch. 62 of the Consolidated Statutes of Canada to provide for the better regulation of Fishing and Protection of Fisheries*, (1865) 29 Vict. ch. 11
- An Act for the better protection of Navigable Streams and Rivers*, (1873) 19 S.C. ch. 65
- An Act for the Regulation of Fisheries and Protection of Fisheries* (1868) 31 Vict. ch. 60
- Anderson, David, "Government and the Environment: A Need for Public Participation" (1971) 6 University of British Columbia Law Review 111-114
- Andrews, William, "The Environment and the Canadian Charter" in ed. Duple, Nicole, Le droit à la qualité de l'environnement: un droit en devenir, un droit à définir, (Montreal: Éditions Québec/Amérique, 1988)
- Arctic Waters Pollution Prevention Act*, (1969-70) S.C. ch. 47
- Bill 17, *Environmental Rights Act*, Northwest Territories, (proclaimed June 11, 1990)
- Bill 26, *An Act respecting the Environmental Bill of Rights*, (1st reading May 31, 1993)
- Bill C-13, *The Canadian Environmental Assessment Act*, (proclaimed on March 19, 1992)
- Brandl, Ernest & Bungert, Hartwin, "Constitutional Entrenchment of Environmental Protection: A Comparative Analysis of Experiences Abroad" (1992) 16 Harvard Environmental Law Review 1-100
- British North America Act*, (1867) 30 & 31 Vict. ch. 3
- Brown, Lester R., The State of the World 1992 (New York: W W Norton and Co., 1992)
- Brown, R. C., "The Doctrine of Usefulness: Natural Resource and National Park Policy in Canada, 1887-1914", in ed Nelson, J.G., Canadian Parks in Perspective, (Toronto: Harvest House, 1969)
- Burton, Thomas, Natural Resources Policy in Canada: Issues and Perspectives, (Toronto: McClelland and Stewart Ltd., 1972)
- Canada Shipping Act*, (1952) R.S.C. ch. 29

- Canada Water Act*, (1970) R.S.C. c. 5 (1st supp.)
- Canadian Environmental Advisory Council, Review of the Proposed Environmental Protection Act, (Ottawa: Environment Canada, 1987)
- Canadian Environmental Protection Act*, (1988) S.C., ch. 22
- Caputo, Tullio, "Political Economy, Law and Environmental Protection: Introduction" in ed. Caputo, Tullio, Law and Society: A Critical Perspective, (Toronto: Harcourt Brace Jovanovich, 1989)
- Clean Air Act*, (1970-71-72) S.C. ch. 47
- Consensus Report on the Constitution - Final Text, Charlottetown, August 28, 1992*, (Ottawa: Ministry of Supply and Services, 1992)
- Constitution Act*, (1982) S.C. ch. 11
- Dahl, R. A., Modern Political Analysis 4th ed. (Englewood Cliffs, NJ: Prentice-Hall, 1984)
- Daly, Herman & Cobb, John, For the Common Good: Redirecting the Economy Toward Community, the Environment, and a Sustainable Future, (Boston: Beacon Press, 1989)
- Declaration of the United Nations conference on the Human Environment*, June 16, 1972
- Dominion Forest Reserves and National Parks Act*, (1911) S.C. ch. 10
- Drengson, Alan, "Protecting the Environment, Protecting Ourselves: Reflections on the Philosophical Dimension" in eds., Bradley, Raymond & Duguid, Stephen, Environmental Ethics, (Burnaby, B.C: Institute for the Humanities, Simon Fraser University, 1989)
- Elder, Philip, "Legal Rights for Nature - The Wrong Answer to the Right(s) Question" (1984) 22 Osgoode Hall Law Journal 285-295
- , "Environmental Impact Assessment in Canada: The Slave River Project" (1986) 24 Alberta Law Review 205-233
- Emond, Paul, "Environmental Law at the Limits of Incremental Development" in eds., Lucas, Alastair & Finkle, Peter, Environmental Law in the 1980's: A New Beginning, (Canadian Institute of Resources Law 1982)

----, "Environmental Law and Policy: A Retrospective Examination of the Canadian Experience" in eds., Bernier, Ivan and Lajoie, Andree, Consumer Protection, Environmental Law and Corporate Power, (Toronto: University of Toronto Press, 1985)

Environmental Contaminants Act, (1974-75-76) S.C. ch. 72

Environmental Protection Act, (1983) S.O. ch. 52

Estrin, David, "Annual Survey of Canadian Law - Part II, Environmental Law" (1975) 7 Ottawa Law Review 399-440

Estrin, David & Swaigen, John, Environment On Trial, (Toronto: Canadian Environmental Law Association, 1978)

Ewald, Francois, "The Concept of Social Law" in ed., Teubner, Gunther Dilemmas of Law in the Welfare State, (New York: De Gruyter, 1988)

Experts Group of the World Commission on Environment and Development, "Legal Principles for Environmental Protection and Sustainable Development" in Environmental Protection and Sustainable Development: Legal Principles and Recommendations (Norwell, MA: Graham and Trotman, 1987)

Feinberg, Joel, Rights, Justice and the Bounds of Liberty, (Princeton, New Jersey: Princeton University Press, 1980)

Fisheries Act, (1867-68) S.C. ch. 60, (1969-70) S.C. ch. 63

Gibson, Dale, "Constitutional Jurisdiction Over Environmental Management" (1973) 23 University of Toronto Law Journal 54-87

Gibson, Dale, "Constitutional Entrenchment of Environmental Rights" in ed. Duple, Nicole, Le droit à la qualité de l'environnement: un droit en devenir, un droit à définir, (Montreal: Editions Québec/ Amérique, 1988)

Gillis, Peter, "Rivers of Sawdust: The Battle Over Industrial Pollution in Canada, 1865-1903" (1986) 21 Journal of Canadian Studies 84-101

Goldstein, "Law Reform or World Reform" (1990) 35 McGill Law Journal 346-386

Government of Canada, Shaping Canada's Future Together: Proposals (Ottawa: Supply and Services, 1991)

Government Organization Act, (1970) R.S.C. ch.14 (2nd supp.)

- Greene, J. J., "Policy on the Environment", (1971) 21 University of Toronto Law Journal 241-246
- Habermas, Jurgen, The Structural Transformation of the Public Sphere, (Cambridge, Massachusetts: MIT Press, 1989)
- Hanson, Philip, "What Environmental Ethics Can Do For You", in eds., Bradley, Raymond & Duguid, Stephen, Environmental Ethics, (Burnaby, B.C: Institute for the Humanities, Simon Fraser University, 1989)
- Horwitz, Martin, The Transformation of American Law: 1780-1860, (Cambridge, Massachusetts: Harvard University Press, 1977)
- Journal of the House of Commons, (1871) 65 March 10, *Report of the Commission on Navigable Streams*
- Leiss, William, Under Technology's Thumb, (Montreal: McGill-Queen's University Press, 1990)
- Linden, Allan, Canadian Tort Law (Toronto: Butterworths, 1982)
- Livingston, John, "Rightness or Rights?" (1984) 22 Osgoode Hall Law Journal 309-321
- Lucas, Alastair, "Harmonization of Federal and Provincial Environmental Policies: The Changing Legal and Policy Framework" in ed. Saunders, Owen, Managing Natural Resources in a Federal State, (Toronto: Carswell, 1985)
- Lucas, Alastair & Finkle, Peter, Environmental Law in the 1980's: A New Beginning, (Canadian Institute of Resources Law 1982)
- Macdonald, Doug, The Politics of Pollution: Why Canadians Are Failing Their Environment, (Toronto: McClelland and Stewart Inc., 1991)
- McGovern, Cynthia, "McMillan's New Environmental Protection Act Disappoints Environmentalists" (1987) Alternatives 57-62
- McLaren, John, "The Common Law Nuisance Actions and the Environmental Battle -- Well-Tempered Swords or Broken Reeds?" (1972) 10 Osgoode Hall Law Journal 505-561
- , "Nuisance in Canada" in A. Linden ed., Studies in Canadian Tort Law, (Toronto: Butterworths, 1978)

----, "Nuisance Law and the Industrial Revolution - Some Lessons from Social History" (1983) 3 Oxford Journal of Legal Studies 155-221

----, "The Tribulations of Antoine Ratte: A Case Study of the Environmental Regulation of the Canadian Lumbering Industry in the Nineteenth Century" (1984) 33 University of New Brunswick Law Journal 203-259

Migratory Birds Convention Act, (1917) S.C. ch. 18

Minutes of Proceedings 3, Comments of Claude Forget, President of Asbestos Institute, in House of Commons Legislative Committee on Bill C-74, (December 3, 1987)

Minutes of Proceedings 5, Comments of Paul Muldoon, Counsel for Energy Probe, in House of Commons Legislative Committee on Bill C-74, (December 10, 1987)

Minutes of Proceedings 6, Representative of Quebec Metals Mining Association Inc., in House of Commons Legislative Committee on Bill C-74, (December 15, 1987)

Minutes of Proceedings 7, Comments of Michel Magnant, Analyst for Conseil du patronat du Quebec, in House of Commons Legislative Committee on Bill C-74, (December 16, 1987)

Minutes of Proceedings 9, Comments and Written Submission of Ebby Vigod, Counsel for the Canadian Environmental Law Association, in House of Commons Legislative Committee on Bill C-74, (January 1, 1988)

Minutes of Proceedings 11, Comments of William Andrews, Secretary of the National Environmental Law Section of the Canadian Bar Association, in House of Commons Legislative Committee on Bill C-74, (January 21, 1988)

Minutes of Proceedings 14, Comments of Honourable Tom McMillan, Minister of the Environment, in House of Commons Legislative Committee on Bill C-74, (February 3, 1988)

Montreal Protocol on Substances that Deplete the Ozone Layer - Montreal (September 16, 1987)

Muldoon, Paul, "The Fight for an Environmental Bill of Rights" (1988) 15 Alternatives 33-38

National Harbours Board Act, (1952) R.S.C. ch. 187

National Harbour Board By-Law A-1. (1955) S.O.R. VI III, p. 2253

Navigable Waters Protection Act, (1952) R.S.C. ch. 193, (1968-69) R.S.C. ch. 15

Nedelsky, Jennifer, "Judicial Conservatism in an Age of Innovation: Comparative Perspectives on Canadian Nuisance Law 1880-1930" in ed. Flaherty, D., Essays in the History of Canadian Law Vol. 1 (Toronto: Osgoode Society, 1984)

Northern Inland Waters Act, (1970) R.S.C. ch. 28 (1st supp.)

Oil Pollution Prevention Regulations, (S.O.R. 68/434)

Ontario Law Reform Commission, Report on Damages for Environmental Harm (1990)

"Overview to the Essential Principles of an Environmental Bill of Rights", *A Briefing Document to the Minister of the Environment on a Proposed Environmental Bill of Rights*, March 20, 1991

Pest Control Products Act, (1969) S.C. ch. 50

Prairie Farm Rehabilitation Act, (1935) S.C. ch. 23

Preuss, Ulrich, "The Concept of Rights and the Welfare State" in ed. Teubner, Gunther, Dilemmas of Law in the Welfare State, (New York: De Gruyter, 1989)

Rankin, Murray, "An Environmental Bill of Rights for Ontario: Reflections and Recommendations, A Discussion Paper" (1991)

Rolf, Carol Anne & Thompson, Andrew, "Environmental Protection Alternatives in the 1980's" in eds. Hunt, Constance et al., Environmental Protection and Resource Development: Convergence for Today, (University of Calgary Press, 1985)

Rowe, Stan, "Crimes Against the Ecosphere", in eds. Bradley, Raymond & Duguid, Stephen, Environmental Ethics, (Burnaby, B.C: Institute for the Humanities, Simon Fraser University, 1989)

Rutherford, Barbara & Muldoon, Paul, "Designing an Environmentally Responsible Constitution" (1992) 18 Alternatives 26-27

----, "Environment and the Constitution", Submission to the House of Commons Standing Committee on Environment (Toronto: Canadian Environmental Law Association, 1992)

Schmidt, Erick, "The Social Aspects of Pollution" in ed. Abbott, Richard, Readings on the Law of Environmental Quality, (Canadian Council of Resource Ministers, 1971)

Schrecker, Ted, "The Mobilization of Bias in Closed Systems: Environmental Regulation in Canada" (1984) 14 Journal of Business Administration 43-58

----, "The Political Context and Content of Environmental Law" in ed. Caputo, Tullio, et al., Law and Society: A Critical Perspective, (Toronto: Harcourt Brace Jovanovich, 1989)

----, "Of Invisible Beasts and the Public Interest" in ed., Boardman, Robert, Canadian Environmental Policy: Ecosystems, Politics and Process, (Don Mills, Ontario: Oxford University Press, 1992)

Senate Debates, Comments of Hon. Francis Clemow, (May 7, 1888)

Senate Debates, Comments of Hon. Francis Clemow, (June 25, 1891)

Senate Debates, Comments of Hon. Mr Scott, (June 27, 1895)

Senate Debates, Comments of Hon. Mr Scott, (July 2, 1895)

Senate Debates, (June 10, 1898)

Sessional Papers, (1890) No. 65, *Report of Mr Henry Gray*

Shelton, Dinah, "Human Rights, Environmental Rights, and the Right to Environment" (1991) 28 Stanford Journal of International Law 103-138

Slone, Daniel K., "The Michigan Environmental Protection Act: Bringing Citizen-Initiated Environmental Suits into the 1980's" (1985) 12 Ecology Law Quarterly 271-328

Stevenson, Colin, "A New Perspective on Environmental Rights After the Charter" (1983) 21 Osgoode Hall Law Journal 390-421

Stone, Christopher, "Should Trees Have Standing? - Toward Legal Rights for Natural Objects: (1972) Southern California Law Review 450-501

Stone, Christopher, Earth and Other Ethics, (New York: Harper and Row, 1987)

Swaigen, John & Woods, Richard E., "A Substantive Right to Environmental Quality" in ed. Swaigen, John, Environmental Rights in Canada, (Toronto: Butterworths, 1981)

Teubner, Gunther, "Substantive and Reflexive Elements in Modern Law" (1983) 17 Law and Society Review 239-281

- Thompson, Andrew, "Bargaining With the Environment: The Limits of Legal Regulation", in eds. Brannigan, A. & Goldenburg, S., Social Responses to Technological Change (Connecticut: Greenwood, 1985)
- Thorne, Melissa, "Establishing Environment As a Human Right" (1991) 19 Denver Journal of International Law and Policy 301-342
- Thorpe, F J., "Historical Perspective on the Resources For Tomorrow Conference", Resources For Tomorrow Conference Background Papers, V 1, (Ottawa: Department of Northern Affairs and Natural Resources, 1961)
- United Nations Convention on the Law of the Sea* (1982)
- Vigod, Toby, "The Law and the Toxic Blob" (1986) 13 Alternatives 24-28
- Weale, Albert, Political Theory and Social Policy, (London: MacMillan, 1983)
- Woodrow, Brian, "Resources and Environmental Policy-Making at the National Level: The Search for Focus" in ed. Dwivedi, D.P, Resources and the Environment: Policy Perspectives for Canada, (Toronto: McClelland and Stewart, 1980)
- World Commission on Environment and Development, Our Common Future, (Oxford: Oxford University Press, 1987)

CASE LAW REFERENCES

- Appleby v Erie Tobacco Co., (1910) 22 OLR 533**
- Atchison v Stratford Gas Co., (1922) 22 OWN 147**
- Avenue Theatre Ltd. v Vancouver Gas Co., (1928) 40 BCR 275**
- Beamish v Glenn, (1915) 9 OWN 199**
- Black v Canadian Copper Co., (1917) 12 OWN 243**
- Booth v Ratte, (1892) 21 SCR 637**
- Bottom v Ontario Leaf Tobacco Co., (1935) 2 DLR 699**
- Cairns v Canada Refining and Smelting Co., (1913) 5 OWN 423, (1914) 6 OWN 562**
- Canada Paper Co., v Brown, (1921) 63 SCR 243**
- Canadian Wildlife Federation Inc. v Canada (Minister of Environment), (1989) 4 CELR (New Series) 201**
- Cartwright v Gray (1866) 12 Gr 399**
- Claude v Weir, (1888) 4 MLR 197, (1889) 16 SCR 575**
- Cox v Warne, (1939) 1 DLR 718**
- Cusson v Galibert, (1902) 22 QRSC 493**
- Danforth Glebe Estates Ltd., v Harris & Co., (1918) 15 OWN 21, (1919) 16 OWN 41**
- Fillion v New Brunswick International Paper Co., (1934) 3 DLR 22**
- Francklyn v People's Heat and Light Co., (1899) 32 NSR 44**
- Friends of the Oldman River Society v Canada (Minster of Transport), (1990) 5 CELR (New Series) 227**
- Godfrey v Good Rich Refining Co. Ltd. et al., (1939) 39 OWN 121**

Heenan v Dewar, (1870) 17 Gr 639

Hunter v Richards, (1913) 12 DLR 503

Huston et al., v Lloyd Refineries Ltd., (1937) 37 OWN 53

Lindala v Canadian Copper Co., (1920) 47 OLR 28

McCormick v King Bros. Co. Ltd., (1922) 23 OWN 424

McNiven et al. v Crawford, (1939) 39 OWN 414

Montreal Street Railway Co., v Boudreau, (1905) 36 SCR 329

Nepisiquit Real Estate and Fishing Co. Ltd., v Canadian Iron Corporation, (1913) 42
NBR 387

Newhouse v Coniagas Reduction Co., (1917) 12 OWN 136

Oakley v Webb, (1916) 38 OLR 151

Radenhurst v Coate, (1856) 6 Gr 139

Robins v The Dominion Coal Co., (1899) 16 QRSC 195

Smith v Consolidated Mining and Smelting Co. of Canada, (1909) 11 WLR 488

Smith v Coutts Machinery Co. Ltd., (1926) 3 WWR 326

Swan v Adams, (1876) 23 Gr 220

Taylor v Mullen Coal Co., (1915) 21 DLR 841

Yung v Fort Frances Pulp and Paper Co., (1919) 16 OWN 6, (1920) 17 OWN
466

END

'20-07-94

FIN