

INTRODUCTION

The world's environment is facing great exploitation and depletion. This has been one global effect of industrialization. Many positive actions are starting to take place mainly in those countries with ample economic resources to reverse the damage. Underdeveloped countries are in many cases following those developed states in their depletion of natural resources and damage of the natural environment, but have less resources to channel into curbing its effects.

International measures for ameliorating the harsh effects on nature are on the increase but are relatively new in underdeveloped countries. Among the many recent international agreements, several stand out including the creation of the United Nations Environment Programme (1972), the Convention on International Trade in Endangered Species of Wild Fauna and Flora (1973), the Conferences of Stockholm (1972) and Rio (1992), the Kyoto and Cartagena Protocols (1992). Also a new generation of green philosophers, thinkers and activists was formed by the end of the 1960s. This generation's aim was to expose the damage done so far and the dire future that awaits the world at large if daily life is not reformulated to include a more balanced attitude toward nature. Key works in this new green wave include Garret Hardin's *The Tragedy of the Commons* (1968), Rachel Carson's *Silent Spring* (1971), Peter Singer's seminal work on *Animal Liberation* (1975) and, more recently, the 'Deep Green' ecocentric approach of Robyn Eckersley's *Environmentalism and Political Theory* (1992) and John Barry's revisionist ideas in *Rethinking Green Politics* (1999). All emphasize rediscovering harmony between the human race and nature. It was not until the end of the 1960s that

many started to cherish the resources of our “blue pearl in space”. According to Norman Myers and others, thanks to the first trips in space we could see how small and fragile our planet looked as part of the universe.

When the first astronauts circled the Earth in their tiny craft, millions of listeners heard them describe the beauty of this planet... and were caught up in a moment of extraordinary human revelation. Since then, much has been written about ‘Spaceship Earth’, on whose finite resources we all depend.¹

By 1945, the earth's human population was two billion. At the beginning of the 21st century it is nearing six billion. “It took hundreds of thousands of years to reach the two billion mark, only 50 years to triple it. This gargantuan rise... has crowded cities, overtaken green spaces and created unprecedented demand for energy, food, and shelter.”² Yet it is often the case that countries with abundant natural resources are also unmindful, sometimes highly wasteful, of them. Such is the case of Mexico.

The total number of species that inhabit Mexico is approximately 64,878,³ placing Mexico as one of the 12 megadiverse countries.⁴ “It has the first place in the world in reptiles (717), the fourth in amphibians (295), the second in mammals (500), the eleventh in birds (1,150) and possibly the fourth in angiosperms.”⁵ Out of all species that inhabit Mexico, 52 percent of the reptiles are endemic (that is, Mexico is their country of origin). 29 percent of mammals, 60 percent of the amphibious and 111 of the birds are also

¹ Norman Myers, *GAIA Atlas of the Planet Management* (New York: Anchor Books, 1993), 10. See also Paul Barry Clarke and E. R. Norman make a similar point in their article on ‘Nature’, *Encyclopedia of Contemporary British Culture*, Michael Storry and Peter Childs, (eds.), (London, Routledge, 1999), 504.

² United States Department of State, “Challenges for the Planet,” *Environmental Diplomacy* (May, 2002), <http://www.state.gov/www/global/oes/earth.html#climate> [cited April 2003].

³ SEMARNAT, “Estadística e Información Ambiental,” *Sistema Nacional de Información y Recursos Naturales* (February, 2004), http://www.semarnat.gob.mx/wps/portal/_pcmd/changePageGroupJSPCommand/_s.155/4064?changePageGroupJSPCommand=%2Fwps%2Fportal%2Fcmd%2Fcs%2Fce%2F155%2Fs%2F3512%2F_s.155%2F4064 [cited April 2004].

⁴ SEMARNAT, “Estadística e Información Ambiental.”

⁵ SEMARNAT, “Estadística e Información Ambiental.”

endemic.⁶ In view of this, it should be in the interest of every Mexican to protect the fauna in order to maintain our privileged place in the world regarding diversity. Yet government research suggests that this is something that Mexicans do not consider a priority to maintain. Consider the following government report, for example.

There are 170 countries in the world, and in only in 12 of them (Australia, Brazil, China, Colombia, Ecuador, India, Indonesia, Madagascar, Mexico, Peru, the Democratic Republic of Congo, and the United States), in which 70 percent of the planets biodiversity is found... But Mexico is also known for its rapid environmental deterioration, high rates of extinction of species and a accelerated destruction of the natural ecosystems.⁷

Approximately 1560 of Mexican plant and animal species are endangered.⁸ In 1995, John Ross identified that “34 percent of the mammal population now faces extinction due to the pressures of development, pollution, hunting and animal traffickers.”⁹ This is affecting the sustainable development of the future of us all, given that animal species, vegetation and humans are ineluctably interdependent.¹⁰

Nature provides us with a steady supply of the basic requirements for life. We need energy for heat and mobility, wood for housing and paper products, and nutritious food and clean water for healthy living. Through photosynthesis green plants convert sunlight, carbon dioxide (CO₂), nutrients and water into chemical energy (such as fruit and vegetables), and all the food chains that support animal life – including our own – are based on this plant material. Nature also absorbs our wastes and provides life-support services such as climate stability and protection from ultra violet radiation.¹¹

Different factors contribute to environmental depletion in Mexico. These include lack of economic or technological means, lack of awareness or respect for environmental

⁶Greenpeace México, “Logros,” *Greenpeace México* (June 2004), http://www.greenpeace.org.mx/php/gp.php?target=%2Fphp%2Fdoc.php%3Ff%3Dgp_logros_mx.xml [cited March 2004].

⁷SEMARNAT, “Estadística e Información Ambiental.”

⁸ Soberón Mainero, Jorge. “Conservación y uso de la biodiversidad,” *Animales en Peligro Edición Especial* (February 2004): 5.

⁹ John Ross, “Mexico’s Deadliest Predator?” *Earth Island Journal* vol. 11, issue 1 (Winter 1995): 15.

¹⁰ Mathis Wackernagel and William E. Rees, *Our Ecological Footprint Reducing Human Impact on the Earth* (Gabriola Island: New Society Publishers, 1996), 7.

¹¹ Wackernagel and Rees. *Our Ecological Footprint*, 7.

concerns and the interdependence of ecosystems, the low priority of environmental concerns on the political and social agenda, geographical and communications restrictions, disparity of population density and a host of other reasons stressed in the small amount of literature that discusses the Mexican case specifically.¹² Most of these works discuss the state of Mexican ecology as a whole which, in view of the interdependent nature of ecosystems, seems both warranted and commendable. However, such studies focus on description at the expense of prescription and, as with any research that emphasizes scope rather than selectivity, lack detail in many areas. It is in these two areas that I hope to make a useful contribution to the literature. By significantly limiting the scope of the subject matter of this thesis to the domestic and wild animals that inhabit Mexican territory, I attempt to provide a study that is more up-to-date and more detailed in this area than is currently published.

Of the many factors that contribute to the current lack of adequate protection of Mexican fauna, I wish to narrow the focus in this thesis to two areas that I consider to be the most important and the most remediable, though I do not wish to imply that any remedies will be easy. One concerns the role of the state, the other the role of civil society. The first is that existing laws for animal protection are currently not being enforced adequately. The second is an absence of public awareness of either these laws or of the need to treat Mexican fauna with respect. This is a result of many years of seeing nature as an everlasting resource, to serve the necessities of Mexicans without worrying about the fate of future generations. In general, human beings still understand and perceive themselves as something separate from, not ineluctably bound to, our

¹² See Edgar J. González Gaudiano, *Elementos Estratégicos para el desarrollo de la educación ambiental en México* (México, D.F.: Secretaría de Desarrollo Social e Instituto Nacional de Ecología, 1994), 35, for a discussion of how these factors affect developing countries in general and Mexico in particular.

environment. This perception not only leads us to see ourselves as more important than the non-human environment, it also appears to justify our indiscriminate use of that environment for our own, short-term ends. Although in many ways it is not too late to act, in others it is almost impossible to save many species from extinction.

Improvement in the general treatment of Mexican fauna would avoid the extinction of species that are already endangered and would prevent others from falling into that category. Since the extinction of species alters the course of nature, the fewer species we have, the fewer resources we have to interact with the environment. It is for this reason that enforcing animal protection in contemporary Mexico should be considered a primary political and social concern, not only for the sake of the fauna involved, but for our own sakes.

Since a deep respect of animals is not part of Mexico's cultural and historical inheritance, this is indeed a long term project that can be expected to take generations to come to fruition. There will be no 'quick-fix' answers and there will always be arguments that limited resources from both civil society and government would be better used in other areas, such as combating poverty. My hope is merely to provide a justification for why we ought to embark on such a project now before any more irreparable damage is done and to suggest ways in which it could be promoted. If, as I argue, Mexico does lack the cultural mechanisms through which individuals and groups can modify their own behavior toward animals, it becomes all the more important to create, maintain and properly enforce laws that prohibit the abuse and promote the welfare of animals. This is not only true of how we treat wild species in danger of extinction - which is the most usual subject of arguments in favor of ecological respect. I want to suggest here that it is

also the case with the domestic animals that we come into closer contact with. In fact, one argument presented in this thesis suggests that a way of attempting to cultivate a deeper respect of wildlife can be approached through altering the way in which we perceive and treat those animals closest to us, whether they are in danger of extinction or not. For, as the following example concerning the use of the carcinogenic pesticide DDT (Dichloro-diphenyl-trichloroethane) makes clear, the interdependence of the environment is not merely restricted to ecosystems in the wild.

The accumulation of certain insecticides in tissues of plants and animals has been fully proved. The path was: the insecticide was spread to the foliage of the crops, was dissolved by the rain and fell into the ground. Later it was absorbed by the worms, these stored the DDT in their organism without being apparently intoxicated. But the birds that ate them died poisoned the next spring. A parallel case is that of the numerous insecticides dissolved by the rain that later go to lakes and ponds used in the aquaculture, accumulating "in the plankton and the food for fish... salmon and trout are particularly sensitive to these toxins." By a synergetic effect it has been observed that: when a cow, for example, eats the herb that has been treated with DDT, it accumulates in the fat and appears in the milk. The fabrication of condensed milk increases the concentration... and once this contaminated food enters the digestive system of a human, the toxic multiplied effect can be grave. The use of DDT also affected loim fauna as well, that is the case of the Antarctic penguins which accumulated the DDT in their fat.¹³

It is important to understand why both wild and domestic animals demand our attention, and should be protected together. There are philosophical reasons to why this should be the case. One, as provided by Peter Singer, and which I comply with, is because they are 'all' sentient beings. Just like humans, despite our race and gender we are 'all' able to feel. The other reason I would like to suggest is because it is in our interest, as humans, to preserve those endangered species to assure our sustainability. But it is also in our interest to treat well and preserve those animals not in danger of extinction, that are used for consumption (the better they are treated, the higher meat quality is obtained), those used for labor such as guide and police dogs, beasts of burden, among others (the better

¹³ González, *Elementos Estratégicos para la educación*, 23.

they are treated, the better they do their ‘job’), and those used as companions (to aid in our moral values, kindness and respect for nature).

Central Arguments and Structure

The central argument in this thesis runs as follows. While concrete laws for animal protection exist in Mexico, wild Mexican fauna is still depleting at an alarming rate and domestic animals in Mexico lack significant protection in practice. I will show that four interconnected problems contribute significantly to this situation. The first is that existing laws are formally fairly comprehensive, but lack adequate enforcement. The second is that existing laws are highly complicated and, together with the lack of enforcement, the public remains insufficiently aware of them. The third is that Mexicans lack adequate environmental education. The fourth is that the fulfillment of international agreements is suffering from the same symptom of lack of enforcement as on the national internal stage.

The central hypothesis, therefore, to be defended here is that *having comprehensive laws concerning animal protection on paper, as Mexico has, is not enough if they are inadequately enforced in practice or unenforceable in the practical context for which they have been developed*. Having comprehensive laws on paper is not enough for saving endangered species, and for preventing others from reaching the point of extinction, not enough for protecting farm animals from negligent inhumane and non-sanitary practices and it is also not enough for fulfilling the needs of labor and companion animals and for treating ‘all’ animals with respect. It is also insufficient for Mexico to consider itself fully developed. Substance must follow form.

This is broken down into two subhypotheses. Sub-hypothesis one is that *current animal protection laws are comprehensive but are inadequately enforced in Mexico*. Sub-hypothesis two is that *Mexico lacks both a deep culture of respect toward animals in general and lacks awareness of the content of existing animal protection laws and of the pressing nature of the problems facing treatment of domestic and wild animals, which both exacerbates law enforcement problems and places animal welfare in a low sphere of the political and public agendas*. In defending these hypotheses I also argue that enforcement of the animal protection laws in Mexico is not merely in the short term interest of non-human animals, it is in the long term interest of us all. The main conclusion I draw from this is that by enforcing and publicizing current federal and state animal laws, by enforcing current environmental plans and by adopting successful measures created by foreign governments and non-governmental organizations, it may be possible to both improve animal protection in Mexico and reduce serious environmental problems that will undoubtedly impact upon the lives of present and future human generations.

Although engaging in the green debate and in trying to find plausible answers to these problems might not be new in many developed countries, in Mexico it is, especially in matters of animal protection. My thesis contribution operates on several levels. In the first place it is directed toward recent academic discussions on Mexican environmental issues. It is intended to engage with, complement, expand and update existing academic literature, primarily the work of Edgar González Gaudiano (1993), Federico Ruanova (1999), and Karen L. Smith (2001). In the second place, it gathers together in one place up-to-date data and information on current laws and practices concerning animal

treatment in Mexico published in a variety of different areas. This is augmented by independent research, field work and interviews which, taken together, are used to verify or falsify existing governmental data and academic arguments as well as provide original data on the subject. In this respect this thesis is intended to be of use for further research by academics, governmental agencies or non-governmental organizations seeking fresh material or alternative interpretations in the area. In the third place, it offers modest prescriptions for implementation on a practical level for state and municipal government policy consideration and analysis. In the fourth place, since one of the main problems identified in this thesis concerns lack of awareness of animal protection laws and institutions and of the precarious situation of animals in Mexico, it is hoped that this dissertation and the research activities carried out to construct it¹⁴ will contribute toward raising the profile of animal protection both in civil society organizations and in the public awareness as a whole.

The differences between the position developed in this thesis and the academic literature it responds to are marked. While the three central authors I mention above discuss animal laws to some extent, none focus in this area. All, however, are in general agreement that corruption and lack of enforcement are real problems in addressing environmental issues though none actually explore these problems in depth. This thesis explores and reinforces the same view in more detail.

González, for example, argues that he provides a successful solution to the question of lack of cultural respect towards the environment through his proposal for creating an ‘environmental education’ that is comprehensive and rigorous. Education

¹⁴ I have, for example, shared information gathered from my research about the different institutions I have visited between the following institutions: local animal charities and NGOs, local government agencies, local schools and universities.

clearly features in the arguments in this thesis and forms one of the prescriptions I develop in chapter four. However, while important, I am not entirely persuaded by González's inference that education alone provides the most advantageous strategy for addressing environmental issues in general or animal issues in particular. Education takes time, meanwhile animals are suffering. Education is not entirely feasible without being complemented by adequate enforcement of the legal framework which I argue might well help to increase the very public awareness of animal welfare that González's arguments require. González does discuss the shortcomings of the environmental legal framework in Mexico, but he emphasizes education as the most feasible solution. González's solution therefore needs to be complemented by exploring political and administrative problems, which are indeed very difficult to deal with. These problems require addressing even if it is difficult to find a plausible answer to them.

Ruanova's more recent work on the functioning of environmental laws in Mexico similarly identifies lack of law enforcement as the main problem. His conclusion seems to be that far more government resources need to be allocated to enforce existing laws and that this is not likely to occur. Although Ruanova's work is informative of the recent legal situation, it remains purely descriptive with few if any suggestions for areas of future improvement.

The most recent research is offered by Smith's focus on the 1997 North American Environmental agreement and how various institutions throughout North America are failing to adequately monitor and implement some major aspects of this agreement. Her most serious criticisms are directed at failures in trilateral efforts and in her brief analysis of the Mexican part she also mentions in passing the lack of law enforcement. Her

arguments are plausible, perceptive and on the whole I am in perfect agreement with them. In particular, she highlights the international context in which environmental problems are based and shows how important it is for international collaboration in this area – arguments that I explore and take further particularly regarding Mexico in chapters three and four.

I hope this thesis can go some way toward addressing the gap in the existing literature addressing in more detail than is usually the case the legal dimensions of the problem and making some attempt, however small, at prescribing for the future. The proposals offered in chapter four of this thesis are not intended to be a full solution. They are also likely to involve government expenditure that may be difficult to come by. However, they are intended to identify areas in which improvements could start, or more modestly, help to move the discussion more fully toward the kind of practical and prescriptive arena from which feasible solutions could emerge in the future. At the very least, this thesis attempts to provide a plausible justification for why the government should raise the question of animal protection on the national agenda, even if they are not prepared to devote significant funds to it in the near future. The problems identified briefly by González and Ruanova are the ones that my thesis also experienced: poverty, corruption, bureaucracy and lack of money arguments. While my thesis may not answer these problems adequately, I hope it will not be charged with the weakness of leaving them undiscussed.

I will verify my hypothesis throughout three chapters and in chapter four I will give suggestions for how can animal protection policy improve and how can a culture of respect toward animals start to be built. In chapter one I will detail the main aspects of the

most important laws, norms and legal institutions at the federal and state level in Mexico dealing with animal protection. Here I argue that these laws, while formally comprehensive, do *not* lead to the level of animal protection to Mexican wild and domestic animals that the spirit of these laws promises. This is mostly due to the fact that the enforcement of these laws is seriously lacking which is sub-hypothesis one of this thesis. Consequently, there is much evidence of illegal practices in Mexico today under the auspices of resolving poverty. I argue here that animal welfare needs practical and substantive protection not mere formal protection if it is to get better. Having comprehensive laws is no good if they are not enforced enough.

In chapter two I mention that a deeper knowledge of the origins of a lack of law enforcement can lead us to discover efficient solutions. In chapter two I establish and defend sub-hypothesis two. I identify two main problems which contribute to the low place of animals in the political and public agendas. First, a lack of respect towards animals exists in Mexico, as it does in many other nations. Second, I argue that the problems fauna faces in Mexico are also exacerbated by a lack of awareness of the content of animal protection laws and about what constitutes illegal practices regarding fauna. It therefore follows that enhancement of public awareness of animal protection laws, and a concerted attempt to increase respect for animals in general should be an important aim not only of the government but of civil society if adequate animal protection is to be forthcoming. Nevertheless, in the absence of an inbuilt cultural respect for animal welfare, it seems that the adequate enforcement of laws protecting animals is absolutely crucial if endangered species are to be protected and if domestic species are to be treated humanely.

Chapter three reinforces the central hypothesis that having comprehensive animal protection laws on paper is not enough if they are inadequately enforced in practice. Here I show that while measures have been initiated to address the problems, the successes of these measures are in fact rather limited. I argue that increased legal enforcement is being practiced in certain areas and by certain bodies, some international. This suggests that the need for adequate animal protection law enforcement is gradually becoming more recognized. Yet, there is also evidence that such success is being obstructed by, again, poor enforcement, bureaucracy and corruption. The advances are promising, but if they remained at the current level, it would take a very long time to educate the population sufficiently before several species become extinct. Signing international treaties creates the same responsibility as having comprehensive laws; they should be enforced in order to work. If this is correct, it seems that more emphasis needs to be placed on raising awareness and respect.

In chapter four I detail my contribution to the animal protection field. I outline several suggestions that address both lack of law enforcement and lack of publicization of laws for animal protection in Mexico. These suggestions attempt to address both the lack of adequate law enforcement (sub-hypothesis one) and the current lack of awareness of the importance of animal issues (sub-hypothesis two). Drawing from the legal treatment of both Great Britain and Germany to support my case, I show that adopting a similar approach in Mexico is not entirely unfeasible. While many of my suggestions relate to governmental measures to enhance animal protection, I also argue that civil society can and ought to play a significant role in the issue.

My suggestions are clearly not ‘the only solutions.’ They do, however, suggest a few possible starting points in this project. The main conclusion to be established in this thesis is that following both lines (civil society and governmental efforts) would simultaneously reinforce each other. If animal protection laws were better enforced, this would contribute toward an increase in publicization. It follows that civil society could become much more aware of the fauna situation and the content of the laws designed to protect it. As part of a wider policy drive, it is hoped that such a situation would, in the future, contribute somewhat toward creating a society that is more respectful to animals and more prepared to support and even demand a higher priority on the political and national agenda to animal and environmental issues. However, proper protection needs to be achieved as an initial stage and feasible ways for achieving this protection is what my thesis intends to offer.