

Political Ecology: An Analysis of Peruvian Government Discourses in Support of Road Projects

The Southwestern region of the Amazon rainforest, a large area including the Peruvian department of Ucayali and the Brazilian state of Acre, contains few urban centers and lacks an extensive road infrastructure. These two factors help explain why this part of the world is economically impoverished and somewhat isolated from the globalized world. For several decades, policy makers and leaders from both Brazil and Peru have looked into the possibility of creating road and rail systems in order to increase connectivity between a major regional city in Ucayali, Pucallpa, and an important town on the Brazilian side, Cruzeiro do Sul (Kamp 2002). A transportation corridor would allow for increased interactions between Brazil and Peru, and even other South American countries. But will these roads improve the situation of local peoples? Past experiences in Peru show roads can have harmful effects on local populations, as they enable illicit activities such as drug trafficking. For these road projects to develop, the governments of Brazil and Peru must first perform socioeconomic analyses to determine the feasibility of road construction in the isolated borderlands.

In this paper, I will explore the ways in which the Peruvian government supports road projects through various well-developed arguments. I will look at how authorities present and/or support road projects in different temporal and spatial scales. I will try to answer the following questions:

- 1) How has the Peruvian government's arguments for improved connectivity changed over time?*
- 2) What are the implications of such changes?*

Answering these questions will help explain the government's role and biases regarding economic development in Peru. Furthermore, answers to these questions can help us

understand past positions and predict what the government's position may be in the future. Government discourses regarding road projects are, of course, not limited only to Peru. Other countries in the world with developing regions must face similar decisions. One can apply the Peruvian case to other scenarios across the globe.

I argue authorities in Peru somewhat modify their explanations of road projects when addressing different interest groups, but radically change justifications according to shifting national priorities. Peruvian reports from national-scale institutions recognize similar but still different goals to those of regional-scale institutions. This data suggests the government maintains a relatively stable and consistent discourse across scales, even though there are noteworthy differences. The more radical differences on road discourses are seen in studies of different time scales. In other words, the Peruvian government supports road projects today for very different reasons than it did a few decades ago. The problem is Peru has not been able to come up with comprehensive studies, which consider all pros and cons to road projects. Military and economic factors are prioritized over social and environmental factors. To prove my arguments, I will explore existing government reports and other available literature by using a technique called discourse analysis.

Discourse analysis is a crucial process in this project because it will allow the extraction of meanings from primary and secondary documents. Discourse analysis is commonly used in disciplines like anthropology and history to look beyond the evidence and formulate critical thought. This form of analysis encourages the careful consideration of local norms and cultures before rushing to conclusions. The key characteristic of discourse analysis is the idea of placing the researcher inside the culture and situation of the research topic (Bernard 2006). The careful consideration of the research topic from an unbiased point of view helps yield better and more accurate results.

To better understand the current situation of roads in Peru, I will give a brief history of the country of Peru and the Pucallpa-Cruzeiro do Sul project. In the early 1600's, Spanish explorers arrive to Peru, then the Incan empire. The entire region soon adopted the *encomienda* system, where Spaniards exploited native workers and exported goods back to Spain for profit (Yeager 1995). An independence movement, led by figures such as José de

San Martin and Simón Bolívar, is launched in the early 1800's and Peru attains independence in 1824 (Yeager 1995). Peruvian history since its independence is characterized by consistent territorial disputes with neighboring countries (Milet 2004). Wars drag for decades with Chile, Ecuador and Bolivia. Disputes with Ecuador are finally settled in 1998 with the signing of a treaty. Similarly, Peru signs a territorial agreement with Chile in 1999 (Milet 2004).

During the 1990's, Peruvian policy began to steer away from international conflicts and towards domestic issues (Roberts 1998). Much attention was given to acts of corruption in the government. Later on, presidents Fujimori and Garcia were heavily criticized for human rights violations, drug trafficking, and accepting payoffs. Government policies began to focus around economic development, debt-relief, inflation, standard of living, etc (Foro Nacional Internacional 2010). In other words, national security was no longer a major worry, and domestic economics now became important because of pressures from developed nations and international organizations like the World Bank and the International Monetary Fund. Today, Peru's president is leftist, and policies are shifting even more to address standards of living, poverty relief, and environmental degradation.

The history of road and rail in Peru is fascinating for different reasons. Because Peruvian history is plagued by territorial conflicts, roads in the past were mainly built to ensure national sovereignty and insure safety. Later in this paper I will prove this was the case by analyzing government publications. Recently, however, literature has been focusing on the economics of road and social issues. The main objective of the Pucallpa-Cruzeiro do Sul road is to facilitate the commercial exchange between Peru and Brazil by creating a road between Pucallpa and Cruzeiro do Sul (ICAA 2006). Figure 1 shows the area in the Brazil-Peru borderlands where the road will be built. The main concern for Peru with the Pucallpa-Cruzeiro do Sul project is the road would have to go through the Sierra del Divisor Ecological Reserve and the Isconahua Indigenous Reserve. Around twenty indigenous groups live in this area of the borderlands and several other non-indigenous peoples would also be affected by the rapid changes brought by the road (ICAA 2006). This region is also one of the richest ones in the world, with more than three thousand plant species, three hundred and sixty five

bird species, one hundred and nine fish species, and thirty eight mammals (ICAA 2006). Officials estimate the project will cost around 128 million US dollars (ICAA 2006).

Kamp (2002) wrote a book about the topic of roads and connectivity between Peru and Brazil, and explains both Peru and Brazil could benefit greatly from increased interactions. Pucallpa could offer Cruzeiro do Sul products like vegetables, beer, and oil. In exchange, Cruzeiro do Sul has large supplies of beef that can be exported to Peru (Kamp 2002). From a broader national scale, Peru could better supply Brazil with hydroelectric power, minerals like zinc, copper, silver, and a direct path to Asian markets (Kamp 2002). A new road would cause other changes besides the purely economic ones. For example, drug trafficking could increase after greater connectivity, government management of these remote areas improve, and increased cultural exchanges (Kamp 2002)..

The Pucallpa-Cruzeiro do Sul road is today at the center of attention because the project is being implemented right now. But road projects in Peru are growing in popularity due to the South American Initiative for Regional Integration, an international effort to increase connectivity in the continent. IIRSA was created in 2000, when leaders of the twelve South American countries signed an agreement to integrate their peoples and markets (IIRSA.org). As a result, Peru built two interoceanic highways; the northern highway and the southern highway (Amancio 2010). The central interoceanic highway was approved in 2010, and is being built today (Amancio 2010). In reality, a sizable portion of this project was already completed before they even started building because the project will simply extend existing roads and add paved segments to complete the highway (Amancio 2010). The goal is to connect the port of Callao near Lima to the city of Cruzeiro do Sul in Brazil.

I will focus my project not on the whole central interoceanic highway, but only on the segment between Pucallpa and Cruzeiro do Sul. This piece of highway is particularly interesting because the area includes a protected forest and an indigenous reserve (Amancio 2010). An official government study of social, environmental, and economic impacts of the Pucallpa-Cruzeiro do Sul segment is still pending. There is reason to be wary because roads can many times facilitate illegal and dangerous activities. In fact, the southern transoceanic highway has caused illegal logging, drug trafficking, informal mining, and other illicit

activities to grow along the road (Amancio 2010). Furthermore, many even question whether the roads are bringing any benefits to locals. Miguel Vega Alvear, president of the Peru-Brazil Binational Chamber of Commerce and Integration (Capebras), argues local/regional development projects are not being promoted in areas where new highways are built (Amancio 2010). Vega Alvear explains tourism and conservation have grown as a result of the creation of the Peruvian transoceanic roads, but development is still a challenge. The bottom line is Peru must create a study, which carefully details benefits and problems with the Pucallpa-Cruzeiro do Sul road in order to make an informed decision about how to proceed.

To effectively analyze the role of the Peruvian government in the construction of the Pucallpa-Cruzeiro do Sul road, one must first choose a theoretical approach to complete the endeavor. There are abundant approaches available for scholars and researchers to direct their work. Narrowing down choices is no easy task because one could tackle the challenge from a variety of perspectives and picking the right one is almost impossible. For a critical analysis of the Pucallpa-Cruzeiro do Sul road, a Land Change Science lens would allow for objective observation, but would also limit the scope of the analysis to scientific data. A comprehensive research project on the development of a major road must address science, but also government, economics, and society. For this reason, Land Change Science is not an ideal perspective for studying road projects. Road Ecology is another perspective, which helps researchers explore the physical changes and environmental effects associated with roads. But again, this framework would center the Pucallpa-Cruzeiro do Sul study to the positivism and simplicity of science. A strong research project on the topic of roads needs to be comprehensive in order to effectively integrate the complex political economic factors shaping government discourses and decisions. For the project to be comprehensive, the project's theoretical approach must be broad as well. For this reason, I chose to use the approach of Political Ecology as the main foci of my research.

Political Ecology, as an interdisciplinary field of investigation, traces its origin to the 1970's, when analysts became uncomfortable with apolitical explanations of environmental degradation (Peet *et. al* 2011). Until the 1970's, scholars saw environmental problems as reflections of population growth, inappropriate technologies, and poor management (Blaikie

1985). Some environmentalists, who later became a part of the Deep Ecology movement, believed a better stewardship of the Earth and improved ethics would lead to better care of the environment (Naess 1973). But for Political Ecology, self-realization and bio-spherical egalitarianism prove inadequate to slow the pattern of human destruction of the environment. Political Ecology believes the political economy and the system of capitalism to be responsible for reckless consumption and the resulting environmental degradation. In order to properly deal with environmental degradation, the change in humanity must not only be ethical but also material (Peet *et. al* 2011).

Political Ecology promises to clarify how the Peruvian government responds to short-term trends and current events in the political economy to adjust their projects. Peruvian state goals such as national security, political decentralization, and economic development often drive government decision-making. Political Ecology provides a practical lens to analyze how these different concerns affect government decisions and programs regarding the road to Cruzeiro do Sul. A Political Ecology approach may help to determine if the government may stoke public fears and desires to manipulate the public into accepting their programs. This paper will attempt to employ the Political Ecology approach in order to explore the nature of the Peruvian decision-making system and attitudes towards the environment.

Recent research in Political Ecology has explored three main ideas: power, knowledge and science (Peet *et. al* 2011). Scholars are first interested in the various ways power can be exercised to rule and govern. The various methods employed by the powerful in society to steer important decisions are hegemonic rule, social control, normative ideology and governmentality. Hegemonic control of knowledge about environmental crises is the second area of interest for Political Ecology because it helps researchers understand trends in power and decision making. Finally, science has recently become a topic of much criticism because it can be highly partial, reductionist, simplistic, and instrumental for maintaining political control over nature (Peet *et. al* 2011). Political Ecology now seeks to encompass much more than just science.

Many scholars and critics have embraced the Political Ecology lens for their own research. For example, Michael Goldman's *Imperial Nature* (2005) criticizes the World Bank

for increasing inequality and exacerbating negative social impacts in developing regions of the world. The World Bank has a history of financing and promoting infrastructure projects including road and rail. Goldman analyzes the use of power and global capitalism to attack the World Bank and argue for change. I will use Political Ecology in a similar way, as I will stress the Peruvian government is behaving in ways that are not beneficial to its peoples, but beneficial to investors and foreigners. The basic premise is broader political and international forces are driving development, whereas instead, the needs and preferences of Peruvians should be the major factor in the decision-making process.

Another research project that uses the Political Ecology approach is Wilson's (2004) study of road projects in Peru's Andean region. In the post-conflict, neoliberal Peru of today, distant villages in Peru's Andean region that used to value their isolation are now trying to join the road matrix and improve connectivity with the rest of the country and the world. Wilson (2004) argues major changes in the country's political economy are pushing small towns to join the trend of globalization, even if this is hurting their autonomy. Wilson's (2004) paper is important and relevant to a study of the Pucallpa-Cruzeiro do Sul road because it is the same neoliberal and capitalist global pressures, which are pushing for the road construction. Thought must be put into the effectiveness and viability of these projects in order to protect the interests of local peoples around the Amazonian border area.

A third and final project which framed its research on Political Ecology is *Advancing a Political Ecology of Global Environmental Discourses* by Adger *et. al* (2002). This paper argues some of the major environmental issues are framed as global issues, which need to be solved at large scales (Adger *et. al* 2002). The problem is policymakers have detached from local scale realities and patterns of consumption, and so many environmental issues cannot be dealt with effectively. Discourses in studies about deforestation, desertification, biodiversity use and climate change all center blame of degradation on global trends and changes. Their final remark is the global managerial view of environmental degradation cannot explain or solve environmental issues at local scales (Adger *et al.* 2002). For the Pucallpa-Cruzeiro do Sul road project, one must consider local stakeholders and effects of the construction

independent of global effects of roads. Government policies and decisions must be based on these realities instead of on technocratic views of the world.

Now that I have introduced my political ecology framework, I still need to introduce the method of discourse analysis. Discourse analysis is the close study and interpretation on naturally occurring interactions (Bernard 2006). When analyzing the various government documents and publications regarding the Pucallpa-Cruzeiro do Sul road, one must carefully study patterns and processes in the literature and interpret their meanings. In the field of Anthropology, researchers depend on discourse analysis to learn about cultural norms and unique behaviors. In my research, I will use this same concept to explore the “culture” of the Peruvian government and interpret how road projects are conceptualized in the Amazon region.

Analyzing government positions and learning how the Peruvian State justifies road projects requires a close reading of government publications. In this paper, I will use several government, and government paid consultant, documents to track the progress of road development in Peru. A thorough discourse analysis will accompany each one of these documents in order to support the argument Peruvian authorities change their discourses at different scales and time periods. The analysis of each one of these publications will contribute to the final conclusion of this work.

Working directly with government sources will allow the analysis of this paper to be original. When analyzing secondary sources such as newspapers and academic papers, one will always encounter biases and data manipulation. I use secondary sources only to explore background information on the topic and frame my research. But this next section will focus strictly on primary sources of information. The downside of this strategy is relevant primary documents are hard to find. The road from Pucallpa to Cruzeiro do Sul has not yet been built and official studies are still pending. Fortunately, the project has been an idea for several years now, and this means Peruvian authorities have written about the project. In any case, there is plenty of useful literature available about other road projects. I will use some of these sources and then apply them to the Pucallpa-Cruzeiro do Sul road.

Political ecology, the approach I chose for this paper, will fit in well with the analysis I intend to perform because of the closeness to government policy. A discourse analysis of government documents from a political ecology approach will allow for a comprehensive understanding of why the Peruvian government acts the way it does. Political ecology is special in the sense it acknowledges the complexity and subjectivity of government behavior towards the environment. My analysis will show the diverse reasons for road development Peru has given over history and at different government scales. This is not a scientific paper, which can help solve some of the technical matters of road building in the borderlands. I will not offer an ideal route for the Pucallpa-Cruzeiro do Sul road or discuss in detail the biological implications of road building in the southwestern Amazon. The political ecology lens will steer my analysis to a more comprehensive study of Peruvian policy and environmental literature.

The best way to compare government discourses in road development projects is to first explore the traditional government justifications. In a 1981 rural settlement project report by the Ministry of War, project objectives are listed and include: reaffirmation of national sovereignty and national security in the area, sustainable economic development, poverty alleviation, decentralization of power and populations, national productivity, and national economic integration (Peruvian Ministry of War 1981). But when one explores the publication further, evidence shows the main reason the project was launched was to complete the first stated objective: reaffirmation of national sovereignty and national security in the area. The booklet details how Peru will gain in power and recognition from establishing presence in the border area, but hardly mentions economic/social benefits. The section on “Problems” briefly mentions poverty and unsustainable practices, but the body of the literature focuses on the issue of Brazilian land invasions and the presence of Brazilian military forces. The Ministry of War wants the region of Ucayali to develop economically and encourage the spread of people to the remote eastern border because this will help efforts to establish Peruvian sovereignty. The simple fact the Ministry of War is spearheading a development project indicates the dominant motivation for the government is not an economic one, but a military one. As soon as these first settlement projects in the border area

proved successful and national sovereignty assured, government discourse in support of road and rail began to shift.

Consulting groups, backed by the Peruvian government, began developing feasibility studies to determine the economic potential of building roads. In 1993, the regional government of Ucayali hired Consultac to formulate a study for the purpose of detailing a potential road project from Pucallpa to Cruzeiro do Sul. This report is much different from the Ministry of War report in that it does not mention national security/sovereignty at all. In fact, Consultac offers a cost-benefit analysis, where costs are mainly the construction of the road and benefits extend to local populations and the greater economy in many ways (Consultac 1993). The study concludes the Pucallpa-Cruzeiro do Sul road to be highly economically feasible and with compounding benefits (Consultac 1993). Clearly, this report approved in 1993 is very different from the one published in 1981. The priority is no longer national security; the priority is development and economic efficiency. One could argue the differences between these two reports stems from either distinct years or distinct authors. Indeed, the Consultac study is a more recent one from the Ucayali region, whereas the Ministry of War study is an older study from a broader national scale perspective. How can we know whether these two studies are different because of temporal scale differences or spatial scale differences? This can be answered by looking at discourses from a third publication, a national-level publication from the year 2001.

MultiModal Alca, a large consulting/construction firm, completed an economic feasibility study in 2001 to convince the President of Peru to hire MultiModal and start the road project. This study does discuss macroeconomic benefits that result from trade more than it does microeconomic benefits. Nevertheless, this study is similar to the Consultac study in that they both emphasize economic development as a priority. It is still important to highlight differences between a broad national level report and a more specific regional publication. The MultiModal paper discusses how Peruvian farmers all around could benefit from selling products to the Brazilian markets if a road were built. There is mention of traditional larger patterns of trade and the supply of products from Sao Paulo and the Mercosur to the far Brazilian Amazonia (MultiModal Alca2001). The main focus of this publication is to show

how a road from Pucallpa to Cruzeiro do Sul could alter trade patterns in the region and help economies as a whole. In contrast, the Consultac report was more concerned with regional and local benefits associated with a new road. Clearly, the MultiModal and Consultac reports have notable differences, but are also quite similar as they are both based on economics and trade. All this proves discourses at different spatial scales vary but not as much as reports from different temporal scales.

Even more recent reports indicate a slight objective transition from conventional development to sustainable development and conservation. Much of these recent changes can be attributed to pressures from international Non-Governmental Organizations (INGO's) and other "green" organizations. For example, a consulting feasibility study of the year 2011 showed considerable concern for the health of the natural environment. Consulting engineer, Jose Saito, argues the increased connectivity between Pucallpa and Cruzeiro do Sul would result in loss of biodiversity, loss of local culture, and resource depletion (Saito 2011). The main purpose of this publication is not to promote growth, but to manage it in order to protect environmental and social interests. As is common in many publications on the matter today, this study was funded and supported by an INGO, in this case The Nature Conservancy. The regional government of Ucayali published an extensive publication about the Pucallpa-Cruzeiro do Sul road, which outlined basic information such as history, climate, conditions, etc, but more importantly, demonstrates much interest in mitigating environmental and social impacts. The main interest in the department of Ucayali may still be economic development, but there is a much greater sensitivity to problems that may arise as secondary effects (Department of Ucayali 2005).

I have already attributed the transition from conventional development strategies to greener strategies to increased international influence, especially from developed countries. Governments from Europe and North America are supporting INGO's in their endeavors to halt the unsustainable extraction of Amazonian resources. But more important than international pressures, we are seeing today more and more Peruvian interest groups pushing for conservation and social justice. Several Peruvian organizations and interest groups united forces and sent a public letter to the President of Peru to protest the lack of participation in

road building decisions. The various authors argue there is no democracy in the process of hiring consulting groups for the construction of road projects (Public Letter 2010). They demand the national government to allow local stakeholders and organizations to have a say regarding the way road projects are developed in the Peruvian Amazon.

In 2009, the regional government of Ucayali presented a participatory development initiative for roads in Ucayali. The detailed study outlines regional strategies for the development of various different roads in the region. Among the prioritized roads are Campo Verde, Nueva Requena, Neshuya, and a few others (Ucayali Regional Government 2008) . Roads in the vicinity of Pucallpa were also mentioned and the increased connectivity with neighboring Brazil considered a goal. This initiative was different from past initiatives in that it clearly states government priorities in developing the road with careful consideration for environmental and social justice. Interestingly enough, USAID and DEVIDA agreed to finance Ucayali's stages of development with the condition that the regional government of Ucayali meet certain environmental and social standards. This information shows Peru depends on foreign funding, and thus must adapt national discourses to foreign ones. However, it also indicates there is hope funding will be available for road projects to develop in an organized and sustainable way.

The situation turned sour for the regional government of Ucayali in 2010 because the central government of Lima took control of the Pucallpa-Cruzeiro do Sul project. Jorge Velasquez Portocarrero, then president of the Ucayali region, wrote a letter to Alan Garcia, then president of Peru, to outline a series of concerns, which resulted from the political centralization of the project. First, Velasquez Portocarrero argued Lima had already begun plans to build a conventional road, and prematurely dismissed other options such as railroads (Velasquez Portocarrero 2010). Second, the region of Ucayali expressed concern because the path Lima had chosen for the road was not a good one. This specific path would not only cause huge environmental damages, but would also hurt various indigenous groups. Ucayali wants a more important say in the process of choosing specific routes for the road. The letter to Garcia also called for the creation of a borderland development strategy in order to maximize the benefits of road construction and mitigate social issues and environmental

degradation. The central government at Lima is clearly not able to efficiently manage and see this road project through.

In June of 2011, the Peruvian government decides to sign with a consulting firm in order to begin the road to Cruzeiro do Sul (MTC 2011). Provias Nacional, the office within the Ministry of Transportation and Commerce that deals with road projects, chose to give the rights to build to Consultor de Ingenieria Civil S.A Sucursal del Peru y Andreico S.A.C. The contract states the consulting group will be in charge of building the road from Pucallpa to the border with Brazil. This said, both the Brazilian and Peruvian governments will coordinate to ensure the road connects at the border without major inconveniences. The Peruvian consulting group is one based in Lima, which suggests the central government continues to have most of the power and say in the development of the road. The Ministry of Transportation and Commerce hired the consulting group for 1,163,858.20 Soles, or about 437,040 US dollars (MTC 2011).

In conclusion, evidence shows government discourses vary at different governmental scales but even more at temporal scales. Regional government publications tend to restrict objectives and justifications to local and regional benefits associated with road projects. In contrast, national government publications encompass broader economic and social interests. Papers show government discourse in support of road projects used to focus around national sovereignty, then transitioned to economic development, and is now beginning to pay attention to conservation and social awareness. In any case, the Peruvian government has a long history of supporting road projects even though many of them were prolonged or never implemented due to financial difficulties or bureaucratic inefficiency. Before supporting the Pucallpa-Cruzeiro do Sul road project, Peru must first complete a thorough and comprehensive study in order to assess the implications of road construction in this specific area. Although evidence shows Peruvians are slowly transitioning to a more critical view of roads, the government needs to start considering negative effects before supporting projects.

Is the Pucallpa-Cruzeiro do Sul road going to help Peruvians in the region, or will it forever transform their lifestyles by facilitating the introduction of loggers, traffickers, and hunters? What can studies tell us about environmental effects of a road penetrating the core of

Amazonia? Will trade and commerce increase and stimulate the economies of both countries as much as people say? Are there better alternatives to building the road? All of these are questions the Peruvian government must answer before making the decision to support the road to Cruzeiro do Sul.

In this project I learned Peru is making progress in its road policies. The government no longer rushes to support infrastructure projects, but now is starting to consider negative implications of roads. Pressures from international organizations and initiatives like IIRSA and USAID are becoming more important in domestic Peruvian policies. The future of road building is participatory management, where locals get a chance to voice opinions and concerns. Commerce and development will always be major factors in the development of roads, but socio-environmental factors are growing in importance. Changes in justifications for road projects hint at a growing appreciation for the environment and peoples of Peru. Decentralization of government is another key political strategy, which leads to more efficient forms of management. In the case of the Pucallpa-Cruzeiro do Sul road, the government must ensure a detailed analysis is undertaken to determine whether the project is feasible or not.

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Figure 1. Dotted black line shows road planned Pucallpa-Cruzeiro do Sul road. *Source: ICAA 2006*

