Linking National Parks with its gateway communities for tourism development in Central America: Nindiri, Nicaragua, Bagazit, Costa Rica and Portobelo, Panama

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Abstract: Protected areas and national parks are becoming one of the most important forms of land use in Central America. All the projections made by the World Tourism Organization seems to agree that by 2010 Central America, maybe receiving between eight and ten millions tourists, a figure that is almost twice what the region is receiving today. A study was conducted base on 369 direct field surveys conducted in three Central American communities: Bagazit gateway community to Palo Verde National Park, Costa Rica, Nindiri, gateway community to Volcan Masaya National Park, Nicaragua and Portobelo, gateway community to Portobelo National Park, Panama. The study found that relative to the socio-demographic variables, that there were no significance differences at the 95% probability level in all four variables, age, sex, education and monthly income of the family. Educational level seems to be the socio-demographic variables affecting more the state of relations. The perception variable being has taken into account in the decision that affects the communities and responsibility to help with community problems are present in two of the three models. The perception variables related to tourism, feel trained to take care of the tourist and existence of businesses that can caters to tourist seem to be key elements in the community perception about the state of relation. Tourism related economic activities and community participation in park decisions are today and will be in the future essential elements in the shaping of community/park relations in Central America as tourism becomes a major economic sector in the region economy.
Keywords: National Parks; Communities; Participation; Tourism; Costa Rica; Panama; Nicaragua; Central America.

Resumen: Los parques nacionales y las áreas protegidas se han convertido en una de las formas de uso de la tierra más importantes en la America Central en anos recientes. Si las proyecciones de crecimiento del turismo de la Organización Mundial de Turismo son correctas, para el ano 2010, la America Central estaria recibiendo entre 8 y 10 millones de turistas, numero que representa el doble de lo que la region recibe en la actualidad. El estudio que se reporta en este trabajo consistio de 390 encuestas en tres comunidades aledanas a tres importante parques nacionales de la region. Bagazit, aledaña al Parque Nacional Palo Verde en Costa Rica, Portobelo comunidad aledañá al Parque Nacional Portobelo en Panamá y Nindiri comunidad aledaña al Parque Nacional Volcán Masaya en Nicaragua. El estudio encontró que no había diferencias significativas al nivel de 95% entre las variables socio-demográficas: edad, sexo, educación, e ingreso mensual entre las tres comunidades. El nivel educativo del entrevistado fue identificado como las variables que al parecer mas afectaba, la opinión sobre el estado de las relaciones al tercer presente en dos de los tres modelos estandarizados estimados. Las variables que median, si el trabajo desempeñado por el entrevistado estaba relacionado o no con el turismo y si en la comunidad había suficientes negocios o no que podían servir a los turistas parecen ser elemento claves, en la determinación del nivel de percepción sobre el estado de las relaciones. El turismo y las actividades económicas relacionadas a esta actividad será en el futuro inmediato elementos esenciales en el desarrollo de las relaciones comunidades / parque en la región, en la medida que la actividad se convierta en elemento clave del desarrollo económico de la América Central.
Palabras clave: Parques Nacionales; Comunidades; Participación; Turismo; Costa Rica; Panamá; Nicaragua; América Central.

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Introduction

Protected areas and national parks are becoming one of the most important forms of land use forms in Central America, as can be observed in table 0. This is without question the result of what is normally accepted a combination of three forces. One, the international pressures for more space covered by forest to better preserve the environment. Second, the agricultural crisis of the region major exports crops. Three, the growing interest particularly in the United States for destinations that are near "home" and risk reduce, in comparison with others part of the world. All the projections made by the World Tourism Organization seems to agree that by 2010 Central America, maybe receiving between eight and ten millions tourists, a figure

development of sustainable ecotourism in the region.

The purpose of this paper is to compare the state of relations among three national parks and its gateway communities in Panama, Nicaragua and Costa Rica and identify the issues and variables affecting, the condition of the relations, with the idea of providing protected areas administrators and policy makers with technical information that maybe useful in the design of strategies to maintain the best relations possible, between protected areas and the people surrounding the parks, a condition necessary for sustainable management of ecotourism in Central America.

Country	TA Total Area	TPA Total Protected Areas	TANP Total Area National Parks	% TPA/TA	% TANP/TA
Costa Rica	50900	22514	4631	44	9
Belize	22965	7977	1119	35	5
Guatemala	108889	17817	7684	16	7
Honduras	112088	24888	5948	22	5
Nicaragua	139000	26594	253	19	0
Panama	75517	30046	13596	40	18
Total	509359	129838	33233	25	7

Table 0. Protected Areas and National Parks Surface in Central America.Source: IUCN

that is almost twice what the region is receiving today.

An additional element that brings, protected areas to the forefront of world biodiversity conservation is the Mesoamerican Biological Corridor, a corridor of protected areas that will connects all the protected areas of the region, to guarantee the elimination of many of the "biological" island that irresponsible human behavior have created over the past 50 years. If tourism growth predicted materialize and the "Mesoamerican Biological Corridor" becomes a reality in the next two or three decades, "good" relations between protected areas and its surrounding communities will be essential for the preservation of the region biodiversity and particularly for the

Objectives of the Study.

The objectives of the study were:
- To determine the socio-demographic and perception variables that may be affecting the state of the relations between the national parks and the communities,
- To identify possible differences among the three countries and how those differences maybe affecting the way the communities related to their neighbouring parks,
- To determine the possible role of tourist related economic activities in shaping the perceptions that community members may have currently, about the conditions of the state of the relations and the impact of tourism in the local com-

munities social organization.

General Working Hypotheses.

The guiding hypotheses of the study were:

- Socio-economic differences among the three communities exist, differences that are impacting profoundly the state of the relations currently,
- Community participation in park decisions or to be taken into account by the park in important decisions that affect the community, is the most important element shaping community/park relations currently.
- Tourism development is impacting similarly each of the communities.

Methods and Size of Sample

The same questionnaire was used in all three sites. The information requested from members of the communities interviewed, included the following socio-demographic characteristic: age, gender, education level (degree equivalent) and monthly family income from all sources in the local currency converted later in the office to the equivalent dollars using the average exchange rate of the period during which the studies were conducted.

Originally, a total of 150 surveys were planned in all three sites; however the lack of tradition of the communities with this type of surveys, created circumstances that made refusal to certain questions common, therefore incomplete surveys were discarded. The numbers survey reported below refers to the final usable surveys in each community. The material was collected for Costa Rica in Bagazit, gateway community to Palo Verde National Park, in the province of Guanacaste, during the January of 2003 and 2004 by the author of the paper. For Nicaragua in Nindiri, gateway community to Volcan Masaya National Park, in Masaya, during the spring of 2004, by a group of students from the School for Field Studies. For Panama in Portobelo, gateway community to Portobelo National Park, in province of Colon, during the Fall of 2004, by a group of students of the School for Field Studies. In Bagazit a total 125 usable randomly selected interviews were con-

ducted, in Nindiri a total of 141 and for Portobelo a total of 103. The questions used as an answer, a "likert" type scale with five levels that permitted gradation in the answers, e.g., from total agreement to total disagreement or from total satisfaction to total dissatisfaction, whatever the case may be. The final set of questions used in all three locations is presented below:

Question 1: When was the last time you visited park?
Question 2: to what extent are you related to activities in the park?
Question 3: To what extent is your job related to tourism?
Question 4: To what extent do you feel capable of attending to visitors to the park?
Question 5: In the last ten years, have improvements in the community been related with the existence of the park?
Question 6: Do you think park visitors have contributed to improvements in the economic conditions of the community?
Question 7: Do you feel the park is part of the community?
Question 8: Who receives the most benefits from the presence of the park?
Question 9. Was the creation of the park the best use that could have been given to the land?
Question 10. Is their businesses near the community to serve tourists going to the park?
Question 11: Do the foreigners and locals who visit the park respect the community?
Question 12: When the park makes decisions that affect the community does the park takes into account the opinions of the community?
Question 13: Of the benefits generated by tourism, which is the most important?
Question 14: Do you know of any conflict, past or present between the community and the park?
Question 15: What are the three most important problems of the community?
Question 16: Should the park help to solve said problems?
Question 17: What is the most important natural resource that the park offers to the community?
Question 18: How do you rate the relations between the community and the park?
Question 19: What would you like the personnel and administration of the park to do to improve relations with the community?
Question 20: Do you have any additional comments about the present state of community/park relations?

The statistical analysis conducted consisted of the following steps: selection of the key dependent variable, in all three case the answer for question 18, development of comparative histograms, analysis of variance for all variables that permitted such

an analysis, standardizing the variables an estimating a stepwise multiple regression model with standardized variables, to mean zero and variance one, Since the data, use a "modify" likert type scale with five levels, a direct estimation using was possible using a standardized stepwise ordinary least squares process as suggested by Kachigan to establish the relative importance of the independent variables in explaining the variation in the dependent variable using version No 12 of the computer program Minitab (Kachigan ,1991). The last step was the verification of the models using the experience gained during the survey. The rationale of the modelling results were evaluated and confronted with the analysis of variance and the histograms results.

Review of the Literature.

The importance of good relations among protected areas , tourist and communities has been clearly recognized in 2004 in a study of the World Wildlife Fund, that investigated the state of the management of protected areas around the world and concluded that: "One depressingly consistent problem is a failure to manage relations with people. Problems are evident both in terms of relations with local communities and indigenous people ,the management of tourism, the provision of visitors facilities and the access to commercial tourism facilities …..." WWF, (2004) situation which seems to perpetuate despite all efforts , declarations and good wishes.

Ecotourism and Community Sustainability

Rural communities seeking to improve the quality of life for their residents often turn to tourism as a means to improve their economic position. Even though the existing evidence shows that there are no statistically significant differences in how involved versus noninvolved citizens evaluate the potential impacts of tourism, differences in the support each group showed for the development of cultural tourism infrastructure has been identified , therefore the views of the involved citizens are important to decision makers because the involved citizens are the ones most likely to influence public policy. (Jurowski and Brown, 2001)

Sustaining the resource base on which tourism depends must be the central focus of any discussion surrounding sustainable tourism development. To date, this debate has focused narrowly on controlling the adverse impacts of tourism development itself. Yet, the applications of the conflicting interpretations of sustainable development and ecologically sustainable development may pose an even greater threat to the future of tourism, especially outside urban areas.(McKercher, 1993)It is legitimate to ask whether and in what form tourism might contribute to sustainable development. This is not the same as sustainable tourism which, as a single-sector approach to development, may overlook important linkages with other sectors. If tourism is to contribute to sustainable development, then it must be economically viable, ecologically sensitive and culturally appropriate. (Wall,1977) Tourism can be a far-reaching agent of change, yet too often planning for the industry is based solely on isolated economic criteria. For the industry and the destination community to benefit a mutually symbiotic relationship should be developed, a relationship modelled on an ecosystem framework. (Murphy, 1993) Community solidarity is considered a definitive quality of many rural towns and one that could be dramatically influenced by accommodating tourism development. Previous research shows that tourism brings people from different cultural backgrounds into a community. In this exploratory study, evidence indicates that tourism development changes residents' relationships to one another and to their community. (Huang, 1996)

Finally, rural tourism planners have called for more consideration to be given to potential social and environmental costs associated with tourism development. (Holland and Crotts, 1992). Many rural communities view tourism as an economic development strategy. The existing evidence shows that communities differ with respect to residents' support for specific tourism development options and attitudes toward tourism. There is a general relationship

between attitudes and support for tourism development, although the nature of the relationship is different for each community (Andereck and Vogt, 2000). That evidence advocates for great care and careful evaluation of conditions before embarking in uncontrolled and rapid tourist development.

Tourism and Change in Costa Rica.

In 1951, in Monteverde and later in Santa Elena, what started as a conservation adventure with scientific underpinnings (Burlingame,2000), by 2005 is in a collision course with the social and economic realities of the 21st century where the conservation models of only biological orientation that have governed and still do govern the activities in many parks and reserves in Central America, are not providing satisfactory solutions for many of the new problems created by the business of outdoor recreation and the new macroeconomic realities .The major outcome of this evident collision is that the "Monteverde-Santa Elena Area" maybe turning touristically speaking unsustainably because everybody seems to be more concern about agriculture and ecological sustainability of the area while the "environment" is fastly deterioration by what seems to be "poor" tourist management and poor urban planning.

In a study conducted in Costa Rica, many pressure groups were identified in the Manuel Antonio and Quepos area that were affecting in one way or another the management of Manuel Antonio National Park making the working together of the many groups very difficult. The groups identified were: illegal hunters and plant gatherers, park administrators, park personnel from outside the community, local hotel owners, foreign hotel owners, park personnel from the area, subsistence farmers, foreign and local scientists, tourism operators, craft salespeople at the park gates, municipal officials and authorities, local politicians and Ministry of Energy and the Environment and the National System of Conservation Areas personnel. (Aguirre, 2000),

On the other hand, for Costa Rica, many nature base tourism and ecotourism related businesses have received substantial tax exemptions in order to import the goods and services needed to develop as well as hefty income tax exemption on profits and investment,   nevertheless   many   small communities receive very little in terms of economic benefits or simply have been left out. (Damon and Vaughn, 1993).The gateway community Poasito to Volcan Poas National Park residents, complain that many tourists do not stop in their community on their way to the Volcan Poas National Parks, situation that is far better than the one experienced at the beginning of the decade of the nineties in the Carara National Park, where only 1% of the income generated by the tourists visiting the area, remained in the area because many tour operators buses loaded with tourists visiting the national park refuse to stop in the area businesses while for Poasito, many buses stop at the strawberry and cheese shops along the highway leading to the park. (Heisterkamp, et al, 2001), (Fouche et all, 2001).

The reserves and parks can stimulate the local economies when the money that they generate is put back in circulation in the surrounding areas. The type I and II multiplier effects in jobs, investment, expenditures in materials, have been well documented in Costa Rica. In the area of Quepos, for example in the hotel industry, it was identified that over 90% of the people employed in second and third level jobs came from the area,   while the executive jobs were filled by foreigners or from people from other areas of Costa Rica, using the excuse that in Quepos it was hard to find people to fill top managerial positions. At the same time profound social and cultural changes have taken place in the   community, something that was recognized by about 97% of those inteview during the survey. (Aguirre, 2000).

In the case of paid jobs, it is very hard for people to recognize the benefits to the local communities because the employment and the salaries earned seem to be more difficult to associate with the existence of the parks or reserves (Wells, 1992). This situation has been established in studies conducted in the Manuel Antonio and Quepos area, where the neighbors interviewed associated their jobs with the

businesses where they were employed, but not with the capacity of the park to attract tourists (Aguirre, 2000).

In Costa Rica, a study conducted found, mixed feelings regarding ecotourism's effectiveness as a conservation and community development tool. The paper concludes by recognising that ecotourism would be most effective as a component of a broader conservation strategy and offers suggestions to improve ecotourism's potential. (Stem et al, 2003). In Gandoca, Costa Rica, using a grounded-theory analysis of interviews conducted with project staff, ecotourist, park guards, and cabin owners reveal a broadly shared view of ecotourism that incorporates both the 'nature' and 'people' discourses, and stands in contrast to the nationally dominant 'profit/nature' view (Gray, 2003). In Ostional, Costa Rica, while most residents had a positive attitudes toward tourism, they had limited awareness of employment or investment opportunities. Lack of awareness, along with increased activity by outside investors, suggests that, without formalized planning or intervention, the possibilities for the community to further benefit from tourism development will be limited (Campbell, 1999). In Tortuguero, Costa Rica a study was conducted, that focused on the establishment of Tortuguero National Park and its impact on a neighbouring population. Park-based tourism has become important to the local economy; yet few of the villagers neither are aware of the economic value of the park, nor are there any systematic attempt to promote nature-based tourism as a development strategy (Place, 1991). In Isla Venado, Costa Rica a study found that the potential impacts on local sustainable development would come from the development of the community, new consumption patterns, additional pressure to the island's basic infrastructure plus limited profiteers, will have direct effects on the environment and society. Necessary infrastructure improvements would include the zoning of the land and capacity building for ecotourism employment and other opportunities (Beeker, 2000).

In a recent study conduceted in the gateway communities of Guayabo and Santa Cruz de Turrialba, gatway communities to Guayabo Archaelogical Monument National Park, in Costa Rica central plateau, the evidence collected indicates that tourism is look in both communities as a real alternative source of income and jobs, irrespectively of the potentially adverse effects that unrestricted tourist development may have in the communities. At the same time the park is expected to be a major catalytic agent for the communities tourism development efforts (Aguirre, 2006b).

Some Examples from Around the World.

In developing countries

In Belize, studies conducted showed, that if the community shares in the benefits of ecotourism brought by the protected areas, they will get involved in the protection of the areas and facilitate its activities. When the sharing does not occur, the results are the opposite and negative changes in the protected areas and communities may appear (Lindberg and Enriquez, 1994). In Brazil, a study acknowledges that in order for all participants to benefit from ecotourism attention needs to be given towards the perceptions and understandings of the participants, taking into account the level of community involvement and the social impacts of such involvement. (Nelson, 2000). In Cyprus a study of the perceptions of Greek and Turkish Cypriot residents of coastal on tourism development found that will be an inverse relationship between the level of tourism development and perceived impacts for the worse on the social, economic and environmental status of the host community (Akis et al, 1996). In Turkey, a study concludes that formulating and carrying out a participatory tourism development approach requires a total change in socio-political, legal, administrative and economic structure of many of the countries and hard political choices and logical decisions based on cumbersome social, economic and environmental trade-offs are sine qua non alongside deliberate help, collaboration and co-operation of major international donor agencies, NGOs, international tour operators and multinational companies (Cevat, 2000)

In the Dominican Republic found that in national parks, hiking and trekking oppor-

tunities attract both national and international tourists to the park, and community members benefit from employment as tour guides and providing mule rentals. At the same time, tourism activities also present continuing challenges related to: (1) the distribution of tourism benefits between local people and outsiders, and within the local community, (2) maintaining the local economic benefits of tourism while protecting park resources, and (3) developing park- or conservation-related economic opportunities to complement tourism (Shellas, et al., 2002). In Bhutan, the authors examine the relationship betweentourism, development, Bhutanese culture and environment, suggest that Bhutan's tourism's policyhas been effective to date in limiting environmental and cultural impact fromWestern tourism. But as tourism demand is rapidly growing, an assessment of the country's carrying capacity is necessaryif Bhutan's 'middle path' policy of high yield, low impact tourism if it is to continue to be effective, special political agreement between India and Bhutan, which amongst other things allow unlimited numbers of Indian touriststo enter Bhutan, will pose amajor challenge in achieving an effective cultural and environmental (Brunet et al, 2001) .

In Uganda, a study found that the impact of tourism in Bigodi, suggest that tourism dependency is not a direct result of tourism but instead of a perceived external locus of control. In other words, residents believe they have little control over what happens in there lives. This perception is rooted in historical, political and economic forces and creates a social psychological environment in which tourism encourages dependency. Thus, in the future, locus of control should be considered an important variable for successful tourism-based development (Lepp, 2004). In Namibia the experience in Namibia highlights the importance of three facts which sound obvious but havechallenging implications. First, that summarising the development impact of tourism as 'jobs andcash' is an over-simplification. Local people have a complex livelihood strategies, based on múltiple land-uses, and diversification of risk across several activities. These are affected by tourism in manydifferent ways,

positively and negatively, directly and indirectly. Secondly, differenttypes of community tourism ventures have different types of livelihood impacts. And thirdly, different people have different livelihood priorities..(Asheley, 2000). In Kenya,a study gives a historical evaluation of western environmental values and how these values influence wildlife conservation and the development of nature-based tourism in Kenya and contrast are established between western environmental values and rural peasants' environmental perceptions. (Akama, 1996)

In develop countries.

In Canada, a structured survey of the people of Alberta, was carried out to developing a methodology capable of providing an operational basis for tourism consensus policy formulation, and of identifying significant differences within the host population. Comprehensive results providing an insight into the residents' view on all aspects of local tourism was obtained. (Ritchie, 1988). In Norway and Denmark, , in one of the first comparative studies of its kind into the socioeconomic impacts of tourism in Scandinavia, three host communities, Hemsedal in Norway, Sälen in Sweden and Blokhus in Denmark, were studied. All the communities, once dominated by farming and small scale industry and now the recipients of mass tourism on varying scales, were questioned on the economic, social and cultural impacts of tourism. Negative attitudes towards tourism were found to be strongest from those engaged in more traditional occupations and to be directly related to the level of tourism development (Haukeland, 1984). In Australia, in the rainforest region of the New England/Dorhgo National Parks. found that rainforest-generated tourism had a significant impact on the local economy and suggested that a rainforest parks marketing strategy should be prepared, funded jointly by the Parks Service and local business (Wearing and Parsons, 1991). In Australia, a cluster analysis involving 1,244 visitors to six popular recreational sites in the hinterland of Australia's Gold Coast revealed diverse attitudes toward tourism development and product integration in this urban-rural

fringe, although biocentric tendencies and a desire to maintain the hinterland in its present condition were dominant in all clusters. These results indicate distinct dynamics in the urban-rural fringe and will potentially help the sustainable tourism and recreation development of such areas (Weaver and Lawton. 2004) . In New Zealand, an article discusses resident attitudes to tourism development. There was general support for this plan, but the community was not homogeneous in its views. Perceived positive impacts were the provision of a community facility, job creation, and the promotion of the area for tourism. Perceived negative impacts included more drunken driving, traffic problems, and increased noise (Mason, 2000)

In the United States, in Williams, Arizona, it was found that the fast pace of tourism development causes community attitudes toward tourism to decline over time (Davis and Morais, 2004) .In the United Sates , a study examined the factors predicting attitudes toward tourism of residents from a dozen communities in Arizona, Findings showed that in general, personal characteristics did not predict attitudes toward tourism, but community dependence on tourism was a predictor. As expected, the existence of personal benefit from tourism was not a significant predictor of support for tourism planning.(Andereck and McGehee, 2004). In the United States, Rocky Mountain West, one group of studies suggests a direct relationship between the level of tourism development in a community and the presence of negative resident attitudes toward it. and suggest a typology of rural communities experiencing tourism growth that includes tourism-saturated, tourism-realized, and tourism-hungry community types (Smith and Krannick, 1998). In the United States a study investigated the impacts of tourism on the Amish of Illinois. A paradox is taking place, which will not be easily resolved or remedied without involvement by each party, the tourist promoters and the Amish community. Overall, the implications of this research show that more careful attention needs to be focused on respect for the private lifestyle of the Amish, interpretative programs to inform tourists about the community, a search for a balance between

gains for the entire local community, and a desire to maintain the historically rural and basic way of life for the Amish (Schuett, 1993). In the United States in Colorado, a study determines which of the seven dimensions of community life was more important: public services, economics, environment, medical services, citizen involvement, formal education, and recreation services found that the relationship between tourism development and satisfaction or importance of community dimensions are generally non-linear with citizen involvement, public services, and the environment being most sensitive to tourism development (Allen et al, 1998).

In Japon, a case study of a Japanese mountain village demonstrates how tourist hosting may be marked by a double tension: first, with respect to the different definitions of tourism within the tourism sector; and secondly, relative to the social divide between the existing sector and those outside of it (Knight, 1996)

Results.

The results presented in this section have been organized in three area, one for the socio-demographics of the sample and perceptions about the issues related to park management and community and perception about tourism comparison of each of three parks. This section is base on descriptive histograms. A second section covering the results of the analysis of variance, on the means of each variable to determine the basic differences among the three parks. A stepwise regression analysis pseudo modeling to determine using standardized variables, which variables of those quantify through the survey have more influence on the key dependent variables in each of the communities. The data will be discuss referring to countries, with the following correspondence: Bigamist (Costa Rica), Nindiri (Nicaragua) and Portobelo (Panama)

Socio Demographics Features

Tables 1, 2 and 3 present the results of the socio-demographics characteristics in each of the three locations: age, sex, education level and income. Relative to the age distribution in all three cases most the per-

son's survey, place between the ages of 20 and 40 years, with Panama and Costa Rica having a large percentage over the age of 65. Relative to sex, the sample in all three locations was almost evenly split 50/50 with Costa Rica including little more females. In the case of education, Nicaragua reported 17% with no education, some of the persons interview reported that they did not knew how to read and write. Primary education in all three locations was the predominant, reporting Nicaragua 40%, Costa Rica 60% and Panama 46.6%. The survey reported very similar university level education for all the sites. The results must be remembered referred to those having some education in the last level reported, not necessarily that they have completed the level.

Relative to the income reported the variation was very large in all three locations with cases like Nicaragua with an average income of the equivalent to US$300 a month for an average family of six members, Costa Rica with an average monthly income reported US$158 for an average family of 4.5 members and Panama reporting an average monthly income per family of six members of US$274 a month. For Nicaragua two persons in the sample reported income that was found to be very high for the country average, of around US$ between 125 to 175 per family of six, when this two cases were excluded form the calculation the average for the group came down to US$187 dollars per month. It was interesting to note that Panama family monthly income was the highest of the three and Costa Rica the lowest.

The results presented by the socio-demographic histograms for all three sites shows that the three communities appear to be somewhat similar, which is what was expected, observation that was validated by the results of the one way analysis of variance as it will be seen in the corresponding section.

Perceptions related to Issues about Park-Community Relations

Tables 4, 5 and 6 present the results related to the perception on park issues associated directly with the relations between the national park and the community and the perception related to tourism and its role in development of the community.

In relation with the degree of involvement of the community members with the park its is important to point out , that Bagazit is the most involved with 36% of those surveyed reporting that they are involved , on the other extreme of the spectrum in Nindiri only 4% reported being involved with the park. Another element review was the opinion that they have about the community improvement that has taken place over the past ten years and what role had the park played. For Nindiri, 64% said that it has nothing to do, 44% in Bagazit said the same and in Portobelo the opinions were more spread out over the scale range.

Nindiri ,Nicaragua		
Age		
Years	*Frequency*	*%*
10	0	0.0
20	21	14.9
30	42	29.8
40	30	21.3
50	27	19.1
60	18	12.8
70	3	2.1
Sex		
Sex	*Frequency*	*%*
Female	84	60
Males	57	40
Education		
Level	*Frequency*	*%*
None	24	17
Primary	57	40
Seconday	39	28
University	21	15
Monthly Income		
Level	*Frequency*	*%*
100	0	0
250	3	2
500	9	6
1000	17	12
2000	51	36
3000	30	21
4000	6	4
5000	12	9
6000	4	3
10000	3	2
15000	3	2
50000	3	2
n=141 for sociodemogarphics features.		

Table 1. Socio-demographic Features. Nindiri, Nicaragua

Age Levels	Frequency	%
15	0	0
20	15	12
25	15	12
30	5	4
35	30	24
40	30	24
45	5	4
50	5	4
55	5	4
60	10	8
65	0	0
70	0	0
75	0	0
80	5	4
85	0	0
90		
Sex	Frequency	%
Female	60	48
Males	65	52
Education	Frequency	%
Primary	75	60
Secondary	30	24
University	15	12
Other	5	4
Income	Frequency	%
40000	10	8
50000	20	16
60000	30	24
70000	15	12
80000	15	12
90000	20	16
100000	5	4
110000	0	0
120000	10	8
n= 125 for all features		

Table 2. Socio-demographics Features, Bagazit. Costa Rica.

Another important perception evaluated was, if the park was perceived part of community or not. For Nindiri the responses were approximately distributed over the range, in Bagazit 60% was emphatic a gave a five as an answer for the question and in Portobelo 92% responded with an one which meant no. Related to the above the community was ask if they considered the park creation as the best land use decision that could have been made with the land that today conforms the park. The responses for Nindiri and Portobelo were distributed over the answer spectrum and in Bagazit 100% answered with a five

meaning an excellent idea. Together with the above statements the communities were requested to express the opinion about the responsibility that the park authorities had in helping the community in the solution of all the communal problems. For Nindiri the opinions were distributed, in Bagazit 60% said that they have no responsibility and 32% imply that they should, but that they do not really have to.

Age Levels	Frequency	%
15	2	1.9
20	10	9.7
25	14	13.6
30	16	15.5
35	15	14.6
40	7	6.8
45	9	8.7
50	11	10.7
55	7	6.8
60	4	3.9
65	1	1.0
70	1	1.0
75	2	1.9
80	2	1.9
85	1	1.0
90	1	1.0
Sex	Frequency	%
Male	48	46.6
Female	55	53.4
Education	Frequency	%
None	8	7.8
Primary	48	46.6
Seconday	29	28.2
University	17	16.5
Graduate	1	1.0
Average Monthly Income		
Level	Frequency	%
0	38	36.9
100	8	7.8
200	17	16.5
300	20	19.4
400	9	8.7
500	5	4.9
600	0	0.0
700	2	1.9
800	1	1.0
900	0	0.0
1000	2	1.9
1500	1	1.0
n= 103 for all socio-demoghraphics		

Table 3. Socio-demographics Features, Portobelo, Panama

One interesting element in this section was the perception related to whether or not the community was consulted, when the park made decisions that affected them directly. In Nindiri 62% said that they were never consulted, in Bagazit 60% express that they were consulted and in Panama 73% said that they were consulted some (three and 4) in a scale of 5.

Perception Related to Tourism Issues in the Community.

One interesting observation made during the surveys was the importance that tourism activities were already having in the economy of the three communities. The results related to tourism issues confirm sometimes the observation and in other cases raise very interesting issues.

The first issue asks for in the perception was whether or not the visitors respected the community or nor. In Nindiri, 78% gave answer between four and five meaning therefore that visitor respected the community, in Bagazit 100% gave an answer of five and in Portobelo 73% gave an answer of four or five. In general them everybody was happy with the visitor's behavior.

For Nindiri 79%, Bagazit 68% and Portobelo 57% of those interviewed said that their work has nothings to do or was related to tourism in any way. At the same time with the question whether or not they felt trained to take care of the visiting tourist, for Nindiri the answer was distributed over the possible spectrum, in Bagazit 44% said that they did not felt themselves trained to care for tourist and in Portobelo 37% said the same.

The perception related to the visitor's contribution to the economic development of the community was interesting, since in Nindiri 47%, in Bagazit 44% and in Portobelo 37% said that they made no contribution to the economic development of the community. In a way this previous answer is reaffirm some what by the answer to the question whether in the community existed business capable of taking care of the visitor needs. In Nindiri 49% said that business did not exist in the community that could serve visitors properly, in Bagazit 92% said that business existed and in Portobelo 73% gave answer between four and

five meaning therefore that business existed.

Involved with the Park,			Work Related to Tourism,		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	87	62	1	111	79
2	21	15	2	15	11
3	24	17	3	6	4
4	3	2	4	6	4
5	6	4	5	3	2
Community Impro D to Park			Feel Trained to Care for Tourist		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	90	64	1	30	21
2	15	11	2	15	11
3	12	9	3	33	24
4	6	4	4	42	30
5	18	13	5	21	15
Park Part of Community			Visitors Contribute to ED		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	18	13	1	66	47
2	24	17	2	18	13
3	33	23	3	9	6
4	33	23	4	27	19
5	33	23	5	21	15
Park Creation Best Land Use			Business Exist		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	3	2	1	69	49
2	15	11	2	36	26
3	33	23	3	33	23
4	57	40	4	3	2
5	33	23	5	0	0
Community Taken into Account			Visitors Respect Community		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	87	62	1	0	0
2	9	6	2	9	6
3	12	9	3	21	15
4	15	11	4	57	40
5	18	13	5	54	38
Park Help with Problems			State of Relations		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	39	28	1	60	43
2	24	17	2	27	19
3	24	17	3	9	6
4	18	13	4	24	17
5	36	26	5	21	15
n= 141					

Table 4. Nindiri, Perception About Main Park-Community. Issues in Relations and Park and Tourism.

State of the Relations.

Finally if one looks at the answer gave to the question in which they were ask to rank the states of the relations level, it was interesting to find that it depended on the site. For Nindiri , the situation was polarized 42% of the answer gave felt between one to two and 39% gave an answer falling between four to five.In the case Bagazit 76% gave answer falling between four to five and in Portobelo the answer was distributed over the range.

Analysis of Variance and Standardized Regression Modeling Analysis.

Table 7, presents the analysis of variance results. The results indicate that there are no significance differences at the 95% probability level, between age, sex, education level and income levels, results verify by the Tukey's test. The preliminary overall result indicates that one is dealing with very similar people in all three sites.

However, when one observed in detail the results of the analysis of variance analysis for the means in each of the perception questions. The results indicate that in the question related to: feel trained to take care of tourist and if the community is taken into account or not when decisions affecting them are made no significant were detected at the 95% probability level, in other words there seems to be agreement in the major participation issues, among the three sites. This finding is interesting if one looks at the rating given to the taken into account question, 2,3 in Portobelo, 1,8 in Bagazit and 1.2 in Nindiri.

The results indicate that on the question about: the park creation being the best land use decision, about the existence of businesses to take care of tourist, visitors respect for the community and in the perception of the state of the relations were significance difference was detected among the three sites in all other variables the differences depended on the site in other world it appear to be agreement in the differences. This finding is particularly interesting again if one looks at the average mean value for the three sites: 3 for Portobelo, 4 for Bagazit and 2.4 in Nindiri.

Involved with Park Activities			Work Related to Tourism		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	65	52	None	85	68
2	0	0	2	0	0
3	5	4	3	5	4
4	10	8	4	0	0
5	45	36	5	35	28
Improvement due to Park			Feel Train to Serve Tourist		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	55	44	None	55	44
2	10	8	2	0	0
3	20	16	3	5	4
4	25	20	4	0	0
5	15	12	5	65	52
Park Part of Community			Visitors Contribute to Economic		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	15	12	None	55	44
2	15	12	2	10	8
3	15	12	3	20	16
4	5	4	4	25	20
5	75	60	5	15	12
Park Best Land Use Decision			Business Exist to Serve Tourist		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	0	0	None	5	4
2	0	0	2	0	0
3	0	0	3	0	0
4	0	0	4	5	4
5	125	100	5	115	92
Help with Problems			Visitors Respect Community		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	20	16	None	0	0
2	15	12	2	0	0
3	15	12	3	0	0
4	5	4	4	0	0
5	70	56	5	125	100
Community Taken into Account			State of Relations		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	75	60	None	10	8
2	0	0	2	10	8
3	10	8	3	10	8
4	5	4	4	25	20
5	35	28	5	70	56
n= 125					

Table 5. Bagazit, perceptions about main park community. issues in relations and park and tourism.

Involved with the Park			Work Related to Tourism		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	59	57	1	59	57
2	19	18	2	10	10
3	8	8	3	10	10
4	2	2	4	10	10
5	15	15	5	14	14
Improvement in Com Due to Park			Feel Trained to Care for Tourist		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	25	24	1	26	25
2	22	21	2	12	12
3	25	24	3	21	20
4	14	14	4	22	21
5	17	17	5	22	21
Park Part of Community			Visitor Contribute to Economic Develop		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	95	92	1	38	37
2	6	6	2	33	32
3	0	0	3	11	11
4	1	1	4	10	10
5	1	1	5	11	11
Park Best Land Use Decision			Business Exist in Commmunity		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	7	7	1	12	12
2	14	14	2	29	28
3	21	20	3	26	25
4	50	49	4	30	29
5	11	11	5	6	6
Community Taken into Account			Visitors Respct the Community		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	2	2	1	2	2
2	8	8	2	8	8
3	19	18	3	19	18
4	57	55	4	57	55
5	17	17	5	17	17
Help with Problems			State of Relations		
Level	*Frequency*	*%*	*Level*	*Frequency*	*%*
1	19	18	1	11	11
2	13	13	2	31	30
3	18	17	3	18	17
4	20	19	4	28	27
5	33	32	5	15	15
n=103 for all perceptions questions					

Table 6. Portobelo, Perception About Main Park Community . Issues in Relations and Park Tourism.

NSD non significant and SD significant.							
				Tukey's Family Error Test			
	Portobelo	Bagazit	Nindiri	P/B	P/N	N/B	F	P
Socio-Demog Var							
Age Years	37.8	36.8	35.7	NSD	NSD	NSD	0.68	0.509
Sex	0.53	0.52	0.4	NSD	NSD	NSD	2.64	0.073
Education	2	2	2	NSD	NSD	NSD	2.62	0.074
Income	274	158	300	NSD	NSD	NSD	0.85	0.43
Perceptions Var							
Last timeVisit P	3.4	4.7	2.7	SD	NSD	SD	21.35	0.000
Involved w Park	2.0	2.3	1.7	NSD	NSD	SD	4.20	0.016
Work R Tourism	2.1	1.5	1.4	SD	SD	NSD	7.01	0.001
Feel Trained w T	3.0	2.7	2.7	NSD	NSD	NSD	1.80	0.250
Impro D to Park	2.7	2.1	1.9	SD	SD	NSD	7.94	0.000
Visitors C.to E.D	2.2	2.4	2.4	SD	NSD	SD	19.22	0.000
Park Part of Com	1.0	3.5	3.3	SD	SD	NSD	125.15	0.000
Park Best Land U	3.4	4.9	3.7	SD	SD	SD	92.16	0.000
Exist Business	2.9	4.5	1.7	SD	SD	SD	255.96	0.000
Visitors Respect C	3.7	4.6	4.1	SD	SD	SD	23.48	0.000
Take Account C	2.3	1.8	2.1	NSD	NSD	NSD	1.91	0.149
Know of Problems	0.55	0.24	0.19	SD	SD	NSD	12.82	0.000
P Help w Problems	3.3	4.8	2.9	SD	NSD	SD	67.50	0.000
State of Relations	**3.0**	**4.0**	**2.4**	**SD**	**SD**	**SD**	**45.59**	**0.000**

Table 7.Results of the ANOVA Analysis Among Communities for Key Socio Demographics and Perception Variables.

Table 8, summarized the standardized rank order stepwise regression models derived. In interpreting this result one needs to remember that the *absolute* values of the beta coefficients provide information on the rank order or relative order of importance of the independent variables with respect to the dependent variable, and no information on the absolute contribution is provided or assume. (Kachigan, 1999)

For Nindiri, the results indicate that nine variables account for 42, 9% of the variation (R2), with all the coefficients significant at the 95% probability level, with p values between 0.046 and 0.000. For Nindiri the most important variables are: taken into account with an absolute value for the coefficient of 0.37542, T = 5.59 and p= 0.000. For Bagazit the most important variable is the existence of businesses in the community that can take of tourist needs with an absolute value of the coefficient of 0.35364, a T= 7.76 and a P=0.000. For Bagazit the most important variable is education level of the person with an absolute value of the coefficient of 0.76890, with a T=6.00 and a P= 0.000.

It is important to indicate that being took into account appears in the model identify in the cases of Nindiri and Portobelo and that for Nindiri this variable is the most important of all, and for Portobelo is the second in importance with an absolute value of the coefficient of 0.26533, with a T= 6.19 and a P= 0.000.

Who Benefits and Types of Benefits.

One remaining issue is the benefits from tourism, who gets them and what are they, in the eyes of the community. The results are presented in Tables 9 and 10. The results in table nine are clear, in 60% of the benefits as perceived by the community goes to the government and the park, even with the good relations that seem to exist, only 4% of those survey said that the town is benefiting from tourism. For Portobelo, 56% said that benefits go to the government and the park and for Nindiri, 86% said the same thing.

In relation with what kind of benefits they perceived as the most important, table 10 numbers are very interesting. In Bagazit, 32% sees employment and income, with visitors arrivals to the community as important. For Portobelo, 39% sees employment and income as key con-

tributions and 21% sees tourist visits. However in Portobelo 20% mention that the community received no benefits. For Nindiri, 40% talks about income and em-

ployment as the two most important contribution but 36% said that the community received no benefits.

Predictor	Coef	StDev	T	P
Constant	0.00000	0.06581	0.00	1.000
STDAGE	0.29047	0.07971	3.64	0.000
STDGEND	-0.31448	0.07152	-4.40	0.000
STDEDULE	0.31791	0.07544	4.21	0.000
STDLAST	-0.15564	0.07504	-2.07	0.040
STDINVOL	-0.22665	0.08055	-2.81	0.006
STDCIdT	-0.24637	0.07373	-3.34	0.001
STDVCEI	0.16305	0.07366	2.21	0.029
STDVIRES	-0.21820	0.07616	-2.86	0.005
STDTAC	0.37542	0.06720	5.59	0.000

S = 0.7814   R-Sq = 42.9%   R-Sq(adj) = 38.9%

Analysis of Variance

Source	DF	SS	MS	F	P
Regression	9	60.0101	6.6678	10.92	0.000
Residual Error	131	79.9899	0.6106		
Total	140	140.0000			

Portobelo Standardized Regression Analysis

Predictor	Coef	StDev	T	P
Constant	0.00000	0.04073	0.00	1.000
STDGEN	-0.15640	0.04107	-3.81	0.000
STDTRAIN	0.08663	0.04339	2.00	0.047
STDIMPRO	-0.15380	0.04305	-3.57	0.000
STDBLU	0.23116	0.04526	5.11	0.000
STDEBUSS	0.35364	0.04558	7.76	0.000
STDTAC	0.26533	0.04288	6.19	0.000
STDHwP	0.10997	0.04606	2.39	0.017

S = 0.7824   R-Sq = 40.0%   R-Sq(adj) = 38.8%

Analysis of Variance

Source	DF	SS	MS	F	P
Regression	7	147.018	21.003	34.31	0.000
Residual Error	361	220.982	0.612		
Total	368	368.000			

Bagazit Standardized Regression Analysis

Predictor	Coef	StDev	T	P
Constant	-0.00000	0.05968	-0.00	1.000
STDEDL	0.7689	0.1281	6.00	0.000
STDLAST	-0.17937	0.07668	-2.34	0.021
STDWRT	-0.29126	0.09092	-3.20	0.002
STDTRAIN	0.42943	0.07635	5.62	0.000
STDBLU	0.47902	0.08790	5.45	0.000
STDEBUSS	0.49495	0.06430	7.70	0.000
STDVRESP	-0.19653	0.07402	-2.66	0.009
STDHwP	0.5880	0.1660	3.54	0.001

S = 0.6672   R-Sq = 58.4%   R-Sq(adj) = 55.5%

Analysis of Variance

Source	DF	SS	MS	F	P
Regression	8	72.3610	9.0451	20.32	0.000
Residual Error	116	51.6390	0.4452		
Total	124	124.0000			

Table 8. Standardized Regression Analysis: Nindiri, Portobelo and Bagazit, 2005. Nindiri Standardized Regression Analysis

Bagazit		
Institution	*Frequency*	%
MINAE	35	28
Park Personnel	40	32
Town	5	4
Visitors	20	16
Country	20	16
Others	5	4
Portobelo		
Institution	*Frequency*	%
ANAM/Gov	47	46
Park Personnel	10	10
Town	13	13
Visitors	21	20
Country	10	10
Others	2	2
Nindiri		
Institutions	*Frequency*	%
Government	84	60
Park Personnel	36	26
Town	0	0
Visitors	15	11
Country	6	4
Others	0	0

Table 9 Who Benefits from the Park

Bagazit		
Type of Benefits	Frequency	%
Employment	20	16
Income	20	16
New Businesses	10	8
C Exchange	30	24
Visitors	40	32
Others	5	4
Portobelo		
Type of Benefit	Frequency	%
Employment	26	25
Income	14	14
New Businesses	13	13
C Exchange	7	7
Tourist Visits	22	21
No Benefits	21	20
Nindiri		
Type of Benefit	Frequency	%
Employment	30	21
Income	27	19
New Businesses	9	6
C Exchange	15	11
T Visits	9	6
No Benefits	51	36

Table 10. Type of Benefits for Community.

Discussion.

It is important to remember the basic idea of this paper stated in the introduction is to compare and contrast conditions, on how park community relations work in communities that are gateway to three national parks, in three different countries that are well known for their different ethnic compositions, approach to economic and social development and particularly in their historical background. Nicaragua among the poorest Latin American countries, a "mixed" white/indian population, depending on agricultural exports for their development with a rather limited institutional structure for the protection of protected areas. Panama a commerce, banking and trade base economy, at the crossroads of the Americas, with a heavy African heritage, with a fairly large number of protected areas around the Old Panama canal area, trying to develop an efficient system of protected areas management. Costa Rica, mostly white, highly educate and "modern" with some of the best human development indicators of the isthmus and without question, the most advance institutional arrangement for protected areas management in Central America. It is against this background that one needs to interpret these results.

As it was said before, the three communities socio-demographically the three communities, share some common features: small, located at the gateway of important national parks, inhabited by rural residents very concern with jobs and income betterment and looking to the tourist as a form of "life saver". Even thought the results in terms of the three basic socio-demographic indicators collected, age, level of education and income were quite similar. However if one walks thru these communities, accepting the major country differences, the three sites appear to be similar.

The similarity/differences dichotomy is important, because of what it could mean for the development of regional strategies, for protected areas management so fashionable these days. Even Nicaragua, with all of its basic human related needs seem to be similar when the community Nindiri, is dealing with the issue of "vicinity to national parks". Perhaps the only element that is in need of attention is the educational levels in Nindiri, meaning perhaps that some of the more traditional written information and educational techniques may not work as good in Nicaragua as they would in Costa Rica and Panama with higher overall educational level than Nicaragua.

The differences among communities begin to emerge as one move into the perception area. The study clearly show, that Bagazit of the three communities is the one with better relations with the 40% of the community neighbors have some involvement with the park, 60% feels the park is part of the community, 100% thinks that the park creation was the best land use decision, 52% feel train to serve tourist,100% that visitor respect the community and even thought 60% does not feel they as a group ate taken into account in park decisions, there ranking for the state of relations shows that 76% give the relations a rating between 4 and 5. This is a community that seems to be content with the relations with the park.

This is very interesting since; Bagazit is a product of a land invasion, of the cattle ranch that was confiscated to create the park, roughly some 20 years ago. However, for several "utilitarian" reasons, the park decided to allow grazing in the park ,during the dry season for the cattle of the community, help with irrigation water for the community from the park aquifers, and for the women of the community to extract cat-tail plants for making souvenir to be sold to the tourist to the park, in return for help during the dry season to put down forest fires, so common in the pacific slopes of Central America during the dry season, this went along with the creation of a permanent park-community committee as part of the park strategy to improve relations. The community at large may not be informed but the park/community committee certainly is, and that help works out tension

and misconceptions. The results are "good" relations, that need improvement but that certainly are not bad as those of Nindiri in Nicaragua.

Portobelo, on the other hand, is a community that as site of Panama, most important catholic sanctuary housing the "Black Christ of Portobelo" is perhaps the one community, of the three, more aware of what tourism is, since it is literally taken over for almost three days by the "pilgrims" coming from all over Panama once a year. What is interesting is, if one looks at the results of table 6, is that almost all the perception variables seem to be approximately distributed somewhat even among the (1 to 5) categories, in terms of what the "Portobelians" seem to believe about the park relations with the community are, what they should be and what tourism cans do for them and may not be doing at this time.

However is interesting to note three things: the park is not seen as part of the community, 92 % of those interviewed said so, 57% are not involved with the park, and 57% said that their work is not related to tourism. These findings are somewhat of a contradiction, since the town is one of Panama, most historic communities and receives tourist all year round. However when the final tally is made, 45% rate the relations with a four or a five, which means that they are not happy like Bagazit but not unhappy like Nindiri.

Nindiri is the extreme case, with 62% of those interviewed giving to the community park relations a ranking of one or two, this send a clear message of unhappiness to the park authorities. The unhappiness maybe summarized by: 74% believe that community improvement over the past decade have little or nothing to do with the park actions, 77% has little or no involvement with the park, 79% reported that their work has little to do with tourism, 49% that businesses do not exist to care for the tourist and 60% said that visitor to the park does not contribute to the economic development of the community, and 62% said, that relations are almost non existent.

The problem is, that the park main entrance is almost "across the street" from the town entrance. Nevertheless, they still seem to think that the park is part of the community, that its creation was a good idea, that whatever visitors they receive of those visiting the park, in general respect the community. The impression they gave the author during the survey was that the community was, waiting for the park to do something toward the betterment of the relations, what, they were not sure, but they expected something.

The overall message verifies in each of the three sites when the stepwise standardized modeling is analyzed was more participation, along with more tourist due to the fact that in Portobelo the most important variable in explaining the state of the relations, was the existence in the community of businesses that can takes care of visiting tourist properly followed in a second place by the opinion that communities have about the level the community is taken into account.

If one looks at Nindiri it is logical for them, to ask to be taken into account in the decisions the park makes that affect them, today all the evidence gather is that, they are outside the park even thought they are located across the street. The second variable in importance is the level of education. In Nindiri, survey observations indicated that community members, with better schooling wanted the park, to ask them for some sort of participation in park activities.

If one looks at Bagazit, the most important variable is the level of education, in a country like Costa Rica; this results should not be surprising. Higher level of education seems to be a positive "platform" for better relations. However in community already having good relations with a park, and collaborating with the park, the second variable in importance, desire for the park to help with the community problem is a logical results. Bagazit wants more help in their critical development needs. One interesting thing about Bagazit, is the idea that they want the park to help with training of the community members, in how take care of tourist.

The lesson from Bagazit, in comparison with what one gets from Nindiri and

Portobelo is that good relations, seem to have some common denominators: like being taken into account, a functioning committee, common interest, mutual benefits, support by the park in concrete things of mutual benefit, and tourism appears currently to be a good element to coordinate and develop good relations around.

Curiously, the government and the park personnels are perceived as the key beneficiaries by all three communities. In the case of Nindiri this findings is even more dramatic, since nobody said that the community benefits, as if the people survey recapitulated in one comments all the previous findings. In the case of Bagazit, all the park has done, appears to be diminish in impact, in the eyes of the common person, with four percent of those surveyed, seen the community as a beneficiary. Why?. This is something that the park needs to look into seriously, since it seems that what is being done is not filtering down to the common person. The committee is probably not communicating to the rest of the community what the park seems to be doing. This is easy to fix, more information and communication appears to be needed.

Finally, what the common person seems to perceive as what they maybe be getting out of all this tourism development taking place are income and employment and in communities with the level of unemployment and recurrent economic crisis this numbers should come as no surprise. The real problem is that in Portobelo and Nindiri over 20 percent of the people seem to think that the community is not getting any benefits is something to be concern about, because that perception may evolved into a feeling of neglect, and neglect may lead to the idea of getting even, and that feeling is not a good one for the safeguard of the park integrity.

Perhaps one last comment is in order. As we close this discussion, comes to our minds what WWF said in 2004, "One depressingly consistent problem is a failure to manage relations with people…" (WWF, 2004). Therfore, the overall conclusion of this three studies , maybe that :What is needes is less talk,

and real desire to joint efforts for the sake of the future generations and that goes for all the three sites and maybe everywhere.

Conclusions.

- The relations among the three communities seem to be at this time, in the case of Bagazit appropriate, Portobelo with definite need for improvement and Nindiri somewhat antagonistic.
- The study found in relation to the socio-demographic variables, that there were no significance differences at the 95% probability level in all four variables, age, sex, education and monthly income of the family.
- Level of education enter into the final standardized stepwise regression models estimated in the case of Nindiri, and Bagazit. From the findings reported educational level seem to be the socio-demographic variables affecting more the state of relations.
- The perception variable being taken into account in the decision that affect the communities and responsibility to help with community problems are present in two of the three models, in the case of Bagazit and Portobelo, not in the case of Nindiri a community that seems to have the lowest level of relations with its neighbouring park.
- The perception variables related to tourism, feel trained to take care of the tourist and existence of businesses that can cater to tourist are present in the model estimated for Portobelo and Bagazit and not in Nindiri the community that basically has no relations with the park or feels that receives benefit form tourism visiting the park at this time.
- Nindiri, first and foremost seem to want participation and be involved in park activities, hoping perhaps that through these two mechanism, they can go on to better things and more benefits from the tourist that comes to the park.
- Tourism related economic activities appear to be playing today and in the years to come a crucial role in the

shaping of the park/community relations and that seems to be the perceptions that all three community members seem to have currently about the conditions of the state of the relations and the impact of tourism in the local communities social organization.

- Socio-economic differences between the three communities probably exist, but at this time do not seem to be impacting profoundly the state of the relations, the hypothesis on socio-economic differences at this time is being rejected
- Community participation in park decisions or to be taken into account by the park in important decisions that affect the community, is a very important element shaping community/park relations at this time, hypothesis related to participation was accepted base on the total results of the three analysis conducted.
- The economic health of the tourism related activities seems to be essential in shaping the futures of the communities/park relations in all three sites confirming the hypothesis on that issue.

As in the previous studies reported by the author, participation in decisions and the economic health tourism related activities in small farming communities seem to play a key role in determining the "health" of the relations between the protected areas and its surrounding gateway communities as one would expected. However what is interesting is that such conclusion may apply as well, to other Central American countries with different cultures, ethnic composition and economic base.

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