

Survival as a strategy for increasing adventure tourism in Ecuador

La supervivencia como estrategia para el incremento del turismo de aventura en el Ecuador

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ABSTRACT

Surviving in nature has become a key element in tourism activities related to risks. Unfavorable events in visits to various places in Ecuador have caused insecurity when considering the country as a destination for adventure and extreme sports. Through a recount of incidents, the difficulties that have been reported in the last decade due to the deficiency of knowing how to resist unusual environments are evidenced, as well as the need to include the survival technique among the actors of nature tourism. With the support of a qualitative, bibliographic, descriptive, critical approach methodology, and applying surveys to tourists or hikers who arrived in Bucay, as an example of a zone of high vegetation, it is shown that inserting practices of this technique through training for participants in tourist activities is key to attract tourism. It is expected that training will reduce the risk when visiting new habitats; guides, operators, and even the same tourist, would achieve a synergy between motivation and security when they wish to visit them, and that survival is the necessary basis to strengthen the preference of knowing natural areas and diversifying adventure tourism in Ecuador.

Keywords: Survival, Nature, Tourism, Adventure, Ecuador.

RESUMEN

Sobrevivir en la naturaleza, se ha convertido en un elemento clave dentro de las actividades turísticas relacionadas con riesgos; acontecimientos desfavorables en visitas a varios espacios del Ecuador, han provocado inseguridad al momento de considerar al país como un destino de aventura y deportes extremos. A través de un recuento de incidentes, se evidencian las dificultades que se han reportado en la última década por la deficiencia de conocer como resistir en ambientes no habituales, así como la necesidad de incluir la técnica de supervivencia entre los actores del turismo de naturaleza. Con el apoyo de una metodología de enfoque cualitativo, bibliográfico, descriptivo, crítico, y aplicando encuestas a turistas o excursionistas que arribaron a Bucay, como ejemplo de zona de vegetación alta, se demuestra que insertar prácticas de esta técnica mediante capacitaciones para los participantes en actividades turísticas es clave para atraer turismo. Se espera que al capacitar se disminuya el riesgo al recorrer nuevos hábitats; guías, operadores, incluso al mismo turista, lograría una sinergia entre motivación y seguridad cuando deseen visitarlos, y que la supervivencia sea base necesaria para que se fortalezca la preferencia de conocer áreas naturales y diversificar el turismo de Aventura en el Ecuador.

Palabras clave: Supervivencia, Naturaleza, Turismo, Aventura, Ecuador

INTRODUCTION

Safety has become a fundamental axis the moment of managing tourist activity worldwide, in Ecuador in the last years, it is a strategy more and more committed to the enjoyment of the tourists since motivated by the natural areas that the country possesses, many of the visitors and/or tourists face security difficulties at the moment of entering these areas. Many of them are not aware of the need to request accompaniment or a guide who becomes the mediator or support of external activities in nature despite not having the necessary knowledge about actions to coexist with the environment in harmony and without affecting its biodiversity. The lack of knowledge of survival techniques for adventure tourists or hikers and service providers threatens the country's already deficient tourism operations.

The problem is compounded by the fact that tourism professionals are not taking their knowledge to the vast majority of the country's continental sectors, since in the places they visit they do not have the guidance of trained people or an accompaniment with basic knowledge that would allow them to educate or give visitors a brief training. Service providers are very conformist with what is offered to those seeking recreational activities in these natural areas, which limits new alternatives or trends in tourism.

It is important to analyze the impact on tourism of learning survival techniques for nature activities. In the case of overnight stays in these areas, which are often dangerous for the hiker. Also for those who visit the place motivated by adventure and who do not master the displacement in open lands with lush vegetation or biomes that confuse the visitor who does not know these spaces.

Therefore, this study aims to identify the activities preferred by adventure hikers in coastal and highland forest sectors to determine survival techniques.

BACKGROUND

According to Wiseman (2001), man in the course of his evolution has sought different ways to survive either by developing tools for construction or protection, using elements provided by nature; being the human mind that allows it to adapt to different situations and begins to form groups with an orientation to survive; taking advantage of

research to develop tools in the technical and scientific field (page 12).

The Ecuadorian man has evidenced with the passage of history the use of survival techniques, times in which they settled in newly known areas, sectors that favored their existence, such as the inter-Andean alleys and the coast of Santa Elena; they understood that their resistance in unknown lands depended on strategies to stay safe from what the outside world possessed and the dangers they faced; managing to learn about the construction of camps that protected them from the weather, animals and any danger of a little-known world. "In order to make the weapons and instruments necessary for their survival, they later had to restrict their nomadism and even establish workshop camps (as in the case of El Inga)" (Mejia, 1975, p. 13). Little by little they discovered the art of designing and manufacturing tools that facilitated the use and manipulation of the resources provided by nature; they also understood that acting in groups and protecting each other offered them greater control over the situations they faced, and without realizing it, they began to use tools and techniques to survive. "Skilled men carvers of obsidian stone, basalt, and flint that were obtained from the Antisana, by men of the Inga who built: scrapers, knives, drills and many tools necessary for woodworking" (Mejia, 1975, p. 12).

Among the evidence found by historians, the Saraguros that settled between mountains, Jibaros or Shuar that settled in the East and/or in the limits of coast and highlands, the Cañaris of the highlands and the Shuar of the East, all of them through history have strengthened their survival techniques with the knowledge of their natural spaces, and of the flora and fauna that each place possesses.

"Technical study and formal training in survival, tracking and orienteering began in the Armed Forces at the end of the 19th century, and was refined during the 20th century, because of the world wars that exposed military and civilians to extreme situations." (Pleticha, 2009).

In the current XXI century, in tourist activity, survival has become a recreational activity, but it is still not very important, due to the lack of awareness of many visitors who, without knowing these techniques, risk facing danger eager to experience the contact with adrenaline, costing in many cases imminent death. Unfortunately, humanity

has forgotten that instinct to survive, because technology has distanced them from contact with nature, their new motives for adventure are linked to the simulated danger of video games and do not allow them to take seriously the moments of travel through natural areas, even risking to spend the night in places of little known nature, where their knowledge becomes inadequate or scarce to participate in those activities (Barahona, 2015).

City dwellers take their days off as the opportune time for outdoor activities, just like many tourists between nationals and foreigners, they usually go on excursions and walks in couples or groups of friends, they decide to visit mountains or open spaces for their distraction, unfortunately, these activities are complicated because they face unexpected weather conditions, either due to lack of knowledge of the site, the weather conditions and in most cases due to lack of foresight, since as hikers they do not have the experience or advice of a specialist, who could surely inform them of the actions to be taken before, during and after these tours, the appropriate elements, clothing, hiking techniques, or survival for these activities; In any case, a guide or specialist could avoid inconveniences that year after year are evidenced in the news, and that have repercussions on the quality of adventure tourism.

In this way, Saldaña (2014), mentioned in Carvache-Franco, Carvache-Franco, Carvache-Franco, Carvache-Franco, & Xavier (2018), points out that the elements that would identify the technical quality in different regions where adventure tourism is developed which are: Safety, environment, entity, client, human resources, activity and material resources; considering that the parameter that most should take into account would be safety, since protocols should be managed during the realization of activities and not when accidents happen for tourism companies and operators along with their suppliers.

In Ecuador, there are many places that offer adventure tourism, especially in climbing activities, which are poles of attraction for tourists many Ecuadorians seek to climb, but without taking the proper precautions, the vast majority of lost tourists are rescued safe and returned to their places of origin, although some do not have the same luck.

The present document intends to demonstrate the significant importance of knowledge and/or learning of survival techniques, when linked to the practice of activities

in nature or adventure tourism in Ecuador in little-known places or with a level of danger for hikers, considering it a priority at present to offer to cover these shortcomings to those who demand this type of tourism, "who do not master the displacement in open terrain with lush vegetation" as mentioned by Barahona (2015), and that day by day increases more since it becomes striking to spend the night in these areas, which are often extremely dangerous places if the terrain, its climate, and its physical or geographical instability are unknown.

Table 1 shows a summary of the latest problems that have occurred due to the lack of knowledge of survival techniques of hikers who have faced serious situations in some parts of the country.

Table 1: Eventualities faced by tourists or hikers in Ecuador in the last decade. In the country's National Parks.

Year	Eventuality	Place
2012	Hiker disappears, body found four days later.	Cotopaxi National Park
2012	14 hikers lost their way, but after an intense search.	Pasochoa Wildlife Reserve
2013	7 hikers went to see the place, but unfortunately, they got lost in the fog, thanks to the firemen and their cartographic knowledge they were found.	Garupamba Forest
2013	7 scouts went astray in the Toreadora and Burines Lagoon, they were not found.	Cajas National Park
2014	Elderly man went astray and was found disoriented and with signs of dehydration.	Toreadora y Burines Lagoon
2016	Two Ecuadorian tourists were rescued after two hours astray	Cayambe Coca National Park High Zone

2016	Two Austrians and an Ecuadorian woman, those who were lost were rescued safe and sound near this capital city.	Guagua Pichincha volcano mountain massif	2021	Three tourists were lost due to the weather and the fog was found.	El Ángel Ecological Reserve
2017	Twelve Ecuadorian tourists were rescued	From Cerro Ungüi, in the southwest of the Ecuadorian capital	2022	Two lost foreign tourists were rescued by the Laguna del Quilotoa (Cotopaxi) fire department	Quilotoa Lagoon (Cotopaxi)
2017	Two tourists were reported missing in Santa Cruz Island were found by park rangers and firefighters knowledgeable about the area's	Galapagos Province	2022	Three tourists were lost due to weather conditions were rescued the following day	Cerro Puntas, at Pichincha Province
2018	Five tourists went astray while on an unguided Tour managed to be rescued.	Podocarpus National Park	2022	Two foreigners and fifteen tourists got rescued after 24 hours of searching.	Cayambe Coca National Park
2019	Two mountaineers and 3 foreign tourists lost and rescued	Llanganates National Park	2022	Seven people were rescued after being lost for several hours.	Ilaó Volcano, in the Guango polo sector , at Valle de Los Chilllos
2019	Two lost tourists are rescued	Pululahua Vulcano	Source: Compiled from several sources		
2020	A group of 16 tourists went astray when starting a tour without a guide, they were located, but one of them died.	Seven waterfalls in the rural parish of Alluriquín, in Santo Domingo de los Tsáchilas	<p>Within the tourism activity in the present century, many changes have been evidenced, one of them being the new tourism products that along with the sun and beach tourism have come to stay, among them the so-called "Nature Tourism". This, in turn, has been broken down into very notable byproducts that day by day is gaining space in our Ecuadorian territory since it offers an "approach to the natural environment and knowledge of ecosystems, increased environmental awareness among the population or the creation of new markets for local and national economies" as mentioned by Donaire, 2002; Espejo, 2011; Luque, 2003; Muñoz, 2008 and which has been cited in (Ballesteros Pelegrín, 2014).</p>		
2020	Eleven hikers were rescued after several hours of straying	Santospamba waterfalls from Atacazo	<p>Protected areas are not only attractive for their nature, biodiversity, and flora and fauna, but also for hikers, as stated by Ballesteros Pelegrín (2014, p. 34), who identifies a new group of nature consumers as those who enjoy "Nature as an adventure. Nature is a challenge for tourists; that is why they practice risk sports".</p>		
2021	Ten lost tourists were rescued after 14 hours	Altar Volcano	<p>Ecuador is an attractive country for offering spaces to practice adventure tourism since, to its biodiversity and richness of climates and landscapes, it is accompanied by its famous attractive volcanoes such as the Ilinizas, Cotopaxi, Cayambe, and Chimborazo; spaces that attract locals and strangers to hike, and try to reach the snowy peaks of the Ecuadorian Andes (Carrasco Ruano, 2018).</p>		
2021	Five tourists lost and later rescued	Chimborazo Volcano			
2021	Five tourists were lost for nine days and managed to be located by using the strategy of creating a visible clearing in the vegetation.	Quijos Valley, of Orellana Province			

Nature tourism has become one of the favorite options for tourists who are motivated to visit our country "Ecuador" because its natural spaces have unique and special features for adventure sports, hiking, and activities such as hiking, mountaineering, caving, mountain biking, and horseback riding routes that are attractive to perform activities within natural spaces without causing any damage to nature and man. (García Cebrian & Olmos Juarez, 2011).

Ballesteros Pelegrín (2014), mentions that sports activities are those elements that make a tourist destination more attractive compared to another that does not have the capacity to host the practice of sports. (...) Sports activities, as a tourist product, are capable of attracting a certain type of tourist and, in addition, as a complement when choosing other products (p. 38). Returning to risk is a key element that distinguishes the aforementioned outdoor adventure activities.

There is little research on survival techniques that should be considered useful when planning to venture into adventure activities that involve risks, so it is of great importance to raise awareness of the need to strengthen knowledge as an indispensable tool for the practice of these sports activities. The preparation to carry out these activities does not only imply strength and physical capacity, it is also fundamental to instruct on the domain of territories in the open field and knowledge in survival techniques within the adventure sports to protect the tourist or visitor in case of getting lost or facing any situation that causes insecurity or extreme risk.

METHODOLOGY

For the present investigation, it was considered to use the design with a qualitative, bibliographic, descriptive, and critical approach; by means of the synthetic analytical method, the analysis of the knowledge of the need to include the survival technique as an indispensable element within the relationship between the environment and the human being, in the key moments of the practice of adventure tourism in mountainous or forest areas, so that the synthesis provides a vision of the causal factors that show why hikers face risks of incidents in their tours and frustrate their satisfaction when visiting Ecuador.

A survey was considered a useful tool to obtain information from tourists and hikers visiting high vegetation zones such as Bucay, coastal areas, mountainous areas such as Quito, and inter-Andean areas. According to figures from MINTUR

(2021), 434,620 tourists arrived in Ecuador by air, propitious dates were specified as the November holiday of 2021, yielding according to Quito in figures, the data of 69,984 arrivals to the capital, also inquired about the projections of visit in the sector of Bucay province of Guayas, by Mr. Roberto Bustamante, representative of the Ecuadorian Tourism Ministry. Roberto Bustamante, a representative of the "Dulce Aventura Association" owner of the Casa de Piedra Inn and Tourist Complex, mentioned that the place maintains an average of 150 visitors per month. Therefore, an infinite formula was applied to try to cover a representative sample group for the research, dividing the instruments into two groups, within a calculated population of 365 individuals, of which 60% were assigned to visitors and tourists from the Bucay sector and 40% to visitors and tourists from the capital.

RESULTS

Se realiza una investigación de recopilación de eventos A compilation research of events occurred through a documented review of various journalistic sources over a period of 10 years to the current 2022, surveys were conducted on tourists from the coast and mountains, whose analysis allowed us to determine the preferences of practicing adventure tourism in our country, and what would be the survival techniques demanding and timely in these activities.

As can be seen in Table 2:

Table 2: Categorías de análisis de los requerimientos y eventualidades de los turistas y excursionistas en el estudio.

Analysis categories	Affirmative response percentage	Negative response percentage	Total percentage consulted
Adventure preference	0.53	0.47	1.00
Need of knowledge of survival	0.93	0.07	1.00
Knowledge of survival in natural areas	0.99	0.01	1.00
Need for guides	0.99	0.01	1.00
Acceptance for training	0.95	0.05	1.00
With knowledge they can practice adventure	0.98	0.02	1.00

Source: Primary compilation

The results showed that 53% of those surveyed want to venture into the adventure of visiting natural areas such as forests and trails, while 37% do want to go on adventures when visiting mountainous areas in the highlands.

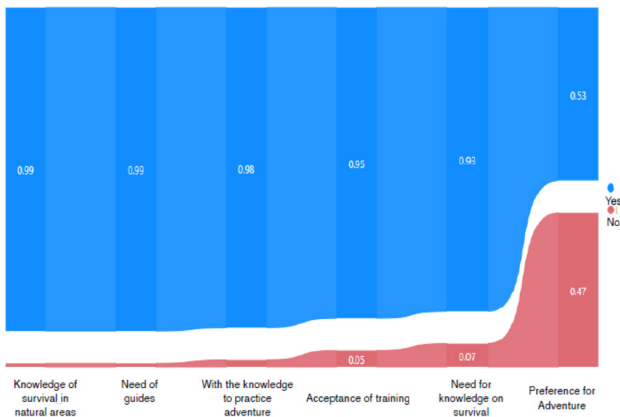
Also, 93% of the respondents accepted that it is necessary to have knowledge of survival techniques for the practice of excursions, whether on the coast or in the mountains, mountains, or vegetation.

Seventy-three percent totally agree that it is necessary to have knowledge of these techniques when participating in activities in nature; in addition to this result, 26% consider that they partially agree with the techniques, so it is understood that they consider the knowledge of these techniques a priority for 99%.

In addition, 99% said that there is a great need for guides to provide advice on survival techniques; and 95% said that there should be a place with equipment where theoretical and practical survival courses are given to visitors, at least the basic elements.

Finally, 98% of the tourists surveyed agreed that if they were trained in survival techniques, they would be able to practice any adventure sport, whether in the vegetation or in the mountains. Results are presented in Figure #1.

Figure 1. Statistical data of the respondents



Own elaboration based on the data collected.

Similarly, when considering a strategy to provide training courses to all key actors in the tourism activity, tourists or hikers were asked about what they consider to be the priority topics to include in possible training, obtaining as results the topics related to first aid (99%), elements rela-

ted to safety (95%) and the use of navigation instruments (90%), In a second point of importance, they also consider valuable to have basic knowledge about the handling of emergency signals (85%), construction of shelters (82%), obtaining food and water in nature (81%), use or handling of environmental elements (80%), and finally, reading signs (72%), as shown in Table 3 and represented in Figure 2.

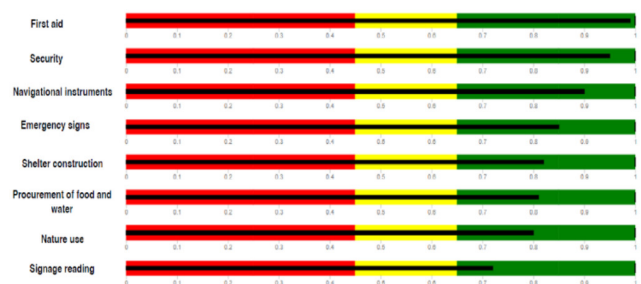
Table 3: Priority themes established by tourists and hikers.

Topic of interest per tourist	Percentage of requests	Percentage of no requests	Total
First aid	0.99	0.01	1.00
Security	0.95	0.05	1.00
Navigational instruments	0.90	0.10	1.00
Emergency signs	0.85	0.15	1.00
Shelter construction	0.82	0.18	1.00
Procurement of food and water	0.81	0.19	1.00
Nature use	0.80	0.20	1.00
Signage reading	0.72	0.28	1.00

Source: Primary compilation

Tourists or hikers who have preferred to visit these forest areas definitely expect to be included in activities related to survival training, since 97% would be willing to return to the place, get involved in the training, and put into practice the knowledge received to achieve the satisfaction of feeling safe when visiting these areas, not only in Ecuador but also in other countries with the same biome characteristics.

Figure 2. Preferred topics to be included in the training



Own elaboration based on collected data.

CONCLUSIONS

It is concluded that knowledge of survival techniques has a significant influence on visitors, tourists, or hikers to motivate them to visit little-known places with high vegetation or in the mountains, thus increasing the demand for nature tourism activities.

It is necessary to offer training on survival techniques so that this type of activity can be practiced in a basic or more specialized way, as appropriate, to reduce the number of incidents, losses, or possible human losses, thus preventing tourism, who are fearful of the insecurity of spaces or equipment, would prefer not to go or practice adventure activities in nature.

It is considered a topic of great value, so this knowledge is distributed as a key, vital, and basic element in many parts of the country, not only in the mountains but in other types of biomes in different regions of the country, especially considering that Ecuador has a great diversity of environments where you can practice variants of nature activities on the coast, highlands, east and island region.

Finally, the weakness of mountain adventure spaces was reflected, as well as the needs of hikers, who, despite the various fortuitous events that have occurred in the country in the last decade, however, are still motivated to visit our natural spaces and want to generate adrenaline by going into these places full of biological and climatic virtues.

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REFERENCES

Ballesteros Pelegrín, G. A. (2014). Nature tourism in natural spaces. the case of the regional park of Salinas y Arenales de San Pedro del Pinatar. Cuadernos de Turismo(34), 33-51. From <https://www.redalyc.org/pdf/398/39831596002.pdf>

Barahona, M. (2015, March). The survival technique as a strategy for the increase of adventure tourism in the Bucay Wetlands. Thesis prior to the degree of Licenciado en Turismo y Hotelería. Guayaquil, Guayas, Ecuador: Universidad de Guayaquil.

Carrasco Ruano, Y. (2018). Adventure tourism as a socioeconomic impact in the canton La Mana. *Conciencia Digital*, 1(4), 24-33. From <https://doi.org/10.33262/concienciadigital.v1i4.904>

Carvache-Franco, W., Carvache-Franco, M., Carvache-Franco, O., & Xavier, R.-L. (2018). Preferences for adventure tourism in the development of a tourism package: Santa Elena case, Ecuador. *Inter-American Journal of Environment and Tourism*, 14(1), 43-51.

García Cebrian, R., & Olmos Juarez, L. (2011). Structure of the tourism market. Madrid: International Thomson Editore.

Mejia, L. (1975). THE ECONOMY OF THE "PRIMITIVE" ECUADORIAN SOCIETY. In L.

Mejia, F. Velasco, J. Moncada, A. Moreano, A. Cueva, & R. B+aez, Ecuador, pasado y presente (p. 273). Quito: Editorial Universitaria: Universidad Central.

MINTUR. (2021). Ecuador in figures. Ministry of Tourism. Quito: National Government of Ecuador.

Pleticha, P. (2009, June). Aire libre digit(Q). com . From Revista de turismo, aventura y naturaleza: <http://www.airelibredigital.com/nota/una-tendencia-que-crece>

Saldaña, L. (2014). Technical quality in tourism. *Apunts. Physical Education and Sports*, 2(116), 80-86.

Wiseman, J. (2001). Manual de supervivencia (Third ed.) (R. d. Flor, Ed., & G. d. Masso, Trans.) Barcelona, Spain: Editorial Acanto. Retrieved 2022