# JURISDICTION PROJECT



## **Galapagos**

#### Overview:

The Galapagos islands are an archipelago about 1,000 km (620 miles) west of Ecuador, in the Pacific Ocean.

## Territory:

The Galapagos islands are an archipelago consisting of 13 main islands, 6 smaller islands, and about 107 islets and rocks. They are volcanic in origin and the landscape is relatively barren. Several of the islands in the west of the archipelago are still active. The highest point in the volcanic chain is Volcan Wolf on Isabela island and is 1,707m (5,600ft) tall. Only five of the islands are inhabited, three containing the majority of the population.

#### Location:

About 1,000 km (620 miles) west of Ecuador, in the Pacific Ocean.

## Latitude and Longitude:

Between 89 and 92 degrees W, and 1 degree 40Â' N and 1 degree 36Â' S.

## Time Zone:

GMT-6

## **Total Land Area:**

8000

EEZ:

#### Climate:

January through March constitute the hot, wet season, March being the hottest month of the year. July through September is the cooler, drier season.

#### **Natural Resources:**

The Galapagos are one of the few remaining archipelagos in the world with an ecosystem that is almost completely intact as it was before humans settled the islands. It is estimated that the islands still possess 95% of the species that lived on them when human beings first settled there. The islands have many endemic species. The high degree of endemism led to the Galapagos being given the status of a separate biogeographical province. 42% of their vascular plants are endemic, 67% of land vertebrates, 20% of their coastal fish, marine algae and marine invertebrates. The Galapagos have 14 distinct forms of giant tortoise, marine iguanas, land iguanas, lava lizards, geckos and snakes. They have only two terrestrial mammals, rats and two species of bat. They have 13 species of finches, and endemic hawks, flycatchers, rails and four species of mockingbirds. Also on the islands are the flightless cormorant, two species of gulls, the only penguin species which lives in tropical waters, the waved albatross, blue-footed, red-footed, masked boobies, frigate birds, sea lions, fur seals, dolphins, whales, sea turtles, over 300 species of fish, at least 1,600 species of insects, eighty spiders, 300 beetles, 150 mites, eighty land snails, 650 sea shells and other mollusks, 200 starfishes and urchins, 120 crabs and many other smaller animals. Plants are many and diverse. In the highlands there are many species of endemic Scalesia, as well as tree ferns, bromeliads, and orchids. Along the coastal areas the giant prickly pear grows, and candelabra cacti. On the shores, morning glories, and sesuvium. The islands also have their own endemic species of cotton, tomato, pepper, guava, and passion flower. The Charles Darwin Foundation was founded in 1959 under the auspices of UNESCO and the International Union for Conservation of Nature and Natural Resources. It is dedicated to the conservation of the Galapagos ecosystems and marine reserve. It operated the Charles Darwin Research Station to conduct scientific research and promote environmental education in the interests of conservation. It currently has over 200 scientists, educators, volunteers, research students and support staff. It collaborates with the Galapagos National Park Service (the executive branch of the national Ministry of the Environment, charged with defining environmental policies on the islands and coordinating their implementation) to develop and implement effective management schemes for the islands that integrate economic development with preservation of the local ecosystems.

## **ECONOMY:**

| Total GDP: |                   |
|------------|-------------------|
| 1999       | 96,000,000.00 USD |

| Per Capita GDP: |              |
|-----------------|--------------|
| 1999            | 2,674.00 USD |

| % of GDP per Sector: |         |           |          |  |
|----------------------|---------|-----------|----------|--|
|                      | Primary | Secondary | Tertiary |  |
| 2001                 | 13%     | 7.5%      | 79.5%    |  |

| % of Population Employed by Sector |     |           |          |  |
|------------------------------------|-----|-----------|----------|--|
| Primary                            |     | Secondary | Tertiary |  |
| 2001                               | 17% | 13%       | 68%      |  |

## **External Aid/Remittances:**

## Growth:

| Labour Force: |       |
|---------------|-------|
| 2001          | 8,772 |

Unemployment
Year: Unemployment Rate (% of pop.)
%

#### Industry:

Main Imports: Fossil fuel, food products. Main Exports: Coffee is produced on San Cristobal, and small amounts are exported.

#### Niche Industry:

Mainland Owned Cruise ships: 46% Locally based cruise ships: 17% Fishing: 8% Commerce: 7.5% Farming: 5%

#### Tourism:

Tourism fuels the economy of the Galapagos despite the fact that it is estimated that only 7.6% of tourist expenditures actually enter the local economy. 90% of profits are absorbed directly into the two airlines serving the islands and the cruise ships which are mainly owned by mainlanders. Tourists from the mainland tend to stay in hotels on the islands, eating at local restaurants and purchasing more local products. Foreign tourists more often come on mainland-owned cruises that are called Â'floating hotelsÂ" by the locals, thereby contributing most of their expenditures to the mainland economy. Foreign tourists also contribute significantly to the mainland economy in the form of accommodations both before and after their visit to the islands, and the airlines connecting the outside world to mainland Ecuador, so it is in the governmentÂ's best interest to promote preservation of the islands. In 2000 there were 68,856 tourists on the islands. In 2001 this figure rose to 77,570; in 2002 it rose again to 82,226; and in 2003 there were 90,533 tourists, 62,896 of whom were foreign and 27,637 of whom were Ecuadorian. The main tourist activities on the islands are snorkeling, scuba-diving, sea kayaking, horse-back riding, biking, bird-watching, and trekking. The government has put quotas on the number of visitors that can be on the island at any given time, and all visitors pay an entrance fee which is divided up among various local public entities. All tourists visiting the island must be accompanied by a certified guide, and can only visit designated areas of the islands which have been determined by the National Park Service in cooperation with the Charles Darwin Research Foundation.

| Imports and Exports:  |         |  |
|-----------------------|---------|--|
|                       |         |  |
|                       |         |  |
| Tot. Value of Imports | 0.00 () |  |
| From Eu:              |         |  |
| Import Partners (EU:) |         |  |
| Partners Outside EU:  |         |  |
| Import Partners:      |         |  |
| Tot. Value of Exports | ()      |  |
| To Eu:                |         |  |
| Export Partners:      |         |  |
| Partners Outside EU:: |         |  |
| Export Partners:      |         |  |
| Main Imports:         |         |  |
| Main Exports:         |         |  |

## TRANSPORTATION/ACCESS

## External:

## Number of Airports: 2

There are two airports connecting the islands to the mainland, one on Baltra Island just next to Santa Cruz, and the other in Puerto Baquerizo Moreno on San Cristobal Island. There are flights from Guayaquil and Quito to both airports on a regular basis.

## Number of Main Ports: 3

The three main ports are Puerto Baquerizo Moreno on San Cristobal, Puerto Ayora on Santa Cruz, and Puerto Villamil on Isabela.

## Internal:

## Air

## Road:

There are cars, mopeds and roads on the main islands. The remaining islands are uninhabited.

## Sea:

Travel by boat is most common for tourists visiting the islands. Many of the cruises are floating hotels as well as means of transport, and the majority of these are owned by mainlanders or foreign entities.

## Other Forms of Transportation:

## **Economic Zones:**

## **Energy Policy:**

The electricity used by the inhabitants of the Galapagos is produced by diesel-fueled generators. In 2003, more than 5 million litres of fossil fuel was sent to the Galapagos. The process of transporting it is expensive and occasional spills threaten the fragile island ecosystem (Jessica spill in 2001). There is a project in Floreana bringing solar energy to its 100 inhabitants. A solar energy project is being implemented on San Cristobal as well. It is the

islandsÂ' goal to no longer be dependent on fossil fuels by 2012.

|  |  | Туре |                     |                |                                      | S                 | ector               |                            |                   |                             |
|--|--|------|---------------------|----------------|--------------------------------------|-------------------|---------------------|----------------------------|-------------------|-----------------------------|
|  | Total<br>Energy<br>Production<br>(Mwh) |      | Geothermic<br>(Mwh) | Other<br>(Mwh) | Total Energy<br>Consumption<br>(Mwh) | Domestic<br>(Mwh) | Commercial<br>(Mwh) | Public<br>Service<br>(Mwh) | Industry<br>(Mwh) | Public<br>Lighting<br>(Mwh) |



Official Currency: U.S. Dollar

## **Banking and Insurance:**

Number of Banks and Credit Unions: Number of Agricultural Credit Unions: Number of Insurance Companies:

**Financial Services:** 

Communications/E-Commerce:

**Public Ownership:** 

#### Land Use:

In recognition of the biodiversity of the islands, in 1959 the Ecuadorian government designated 97% of the land area as a National Park. In 1986 the Galapagos Marine Resources Reserve was established Â- protecting the waters around the archipelago. In 1998 the Galapagos Marine Reserve was created by the Special Law for the Conservation and Sustainable Use of the Galapagos Province. The reserve covers 138,000 square kilometers. In 1978 UNESCO recognized the islands as a World Heritage Site. In 2001 this recognition was extended to include the Marine Reserve.

## Agriculture/Forestry:

AgricultureÂ's contribution to the economy is relatively insignificant, but it is an important source of employment on San Cristobal (11%). On Santa Cruz only 5% of the economically active population is employed in agriculture, and on Isabela this number drops to only 3%. Subsistence plots were set aside by the provincial government for agriculture and animal husbandry but much of this land is abandoned as it is not currently profitable. Imported food from the mainland is cheaper. The amount of land available is not large enough for profitable commercial farming, and water availability for irrigation is also a constraint. The Special Law for the Galapagos encourages local farmers to satisfy local demand so that imports can be reduced, thereby also cutting back on the introduction of species, but thus far there has been no local initiative to do this. There is currently 24,533 hectares dedicated to agriculture and livestock production, divided between Santa Cruz, San Cristobal, Isabela and Floreana, representing 3.8% of the landmass of the archipelago. Coffee is the main cash crop, followed by maize, fruit trees, casaba, vegetables, and tomatoes. Livestock production is dominated by cattle, but there is also some raising of chickens and goats. Most of the production takes place on San Cristobal and Santa Cruz.

## Marine Activity:

## Fishing:

Most of the fishing done on the Galapagos is of coastal water species such as lobster and cod, which represent 73-75% of the total fishing output on San Cristobal and Santa Cruz, and 95% of output on Isabela. The focus on the coastal fishery is a reflection both of demand and of the lack of available capital to exploit the deep-water fisheries. Isabela is the main fishing island, but the fishing community on all three of the main islands belong to fishing cooperatives which are represented in the provincial government council. On Isabela, the percentage of immigrants born off the island involved in fishing (27%) far exceeds the number of islanders native to the island involved in the fishery (13%).

## Marine Life:

## **Critical Issues:**

Some of the problems being encountered on the islands are the introduction of species which overrun the endemic plant and animal species (in 1971 there were 77 introduced species on the islands – today there are 260); and the illegal fishing of sharks, lobsters, and sea cucumbers by local, mainland and foreign fishing vessels.

## JURISDICTIONAL RESOURCES

## Capital:

Puerto Baquerizo Moreno on San Cristobal Island

## Political System:

The Galapagos are one of EcuadorÂ's 22 provinces. The governing body of the Galapagos is the National Institution of the Galapagos, or Instituto Nacional Galapagos (INGALA). It has a large degree of administrative and financial autonomy but operates under the president of the Republic of Ecuador. INGALA is composed of the Council of INGALA and the Technical Secretary. INGALA is the technical organ of the Galapagos institutions. It is also the planning and coordinating body at the regional level in the province of the Galapagos. INGALA formulates political policy and conservation planning for the sustainable development of the inhabited areas of the islands. It promotes and manages environmental and social issues and problems and coordinates with the local scientific, academic, governmental and non-governmental entities. Specifically, some of its responsibilities are the provision of public services, the promotion of the well-being of the community, the development of tourism that is in compliance with the provinceA's framework of sustainable development, natural resource exploitation, organization of human resources whose services are required in the province, the management of resident status and immigration, promotion of economic activities, the coordination of investigations to improve the regulate natural resource use, marine and land activities, and surface and groundwater supply and use. It is also in charge of managing agricultural policy, sanitation, and fishing. The council also coordinates with state entities in the preparation and implementation of Environmental Impact Statements (EIS) for development projects in the province. The council is composed of the following: 1. The Minister of the Environment 2. The Minister of Public Finance and Credit 3. The Minister of National Defense 4. The Minister of Tourism 5. The Minister of External Commerce, Industry and Fishing 6. The Director General of INEFAN or his delegate 7. The Provincial Prefect (Prefecto Provincial) of the Galapagos 8. A representative of the Association of the Municipalities of the Province of the Galapagos. 9. The President of the Provincial Tourism Association 10. A representative of the Artisanal Fishing Cooperative of the Galapagos (CAPTURGAL) 11. The President of the Ecuadorian Committee for the Defense of Nature and the Environment (CEDENMA). 12. A representative of the Agriculture and Livestock Producers of the Province of the Galapagos elected by the Association of Producers of Agricultural and Livestock Products 13. The Governor of the Galapagos 14. The Charles Darwin Foundation sits in on the council with only an advisory voice The Technical Secretary executes the decisions of the council. The Secretary is under the Manager who is appointed and removed by

the President of the Republic.

#### **Political Parties:**

#### Important Legislation:

The Galapagos Islands are governed by the Special Law for the Galapagos which outlines all areas of government and development policy. All decisions made on the islands must be consistent with the islandsÂ' primary goal which is the conservation of ecosystems that have been deemed nationally and internationally unique. The presence of the Charles Darwin Research Centre on the islands affords the Galapagos a greater degree of autonomy than they would otherwise possess given their primary importance as a tourist destination and research centre and the authority that the Foundation wields in furthering this purpose. As long as the community exercises its jurisdiction within the framework of conservation of the environment from which its economy, and perhaps more importantly, the mainlandÂ's economy and international business entities are benefiting, the islands possess a great deal of autonomy. If however their economic interests clash with the internationally accepted purpose of the islands as a laboratory for biodiversity preservation, this autonomy is quickly taken out of local hands.

## **Principal Taxes:**

## **Associated Power:**

Republic of Ecuador

## Citizenship:

Permanent and temporary residents on the island receive a 50% discount in all airfare and marine fare between the islands and the mainland. They also have the possibility of getting a 30% discount on tariffs for maritime cargo transportation on a case-by-case basis.

#### Paradiplomacy:

## **HUMAN RESOURCES**

Population on the islands increased at an annual rate of 5.9% between 1982 and 1990. The population of the three main islands (Santa Cruz, San Cristobal, and Isabela) grew by almost 70%, 55%, and 34% respectively in the 1980Â's, and these islandsÂ' combined populations nearly doubled in the 1990Â's to just over 16,000. In 1999, almost 70% of the islandsÂ' inhabitants were migrant from other areas of Ecuador. There have been recent policy measures introduced to restrict demographic growth. Currently 3/4 of the population was not born on the islands. 88% of Santa Cruz residents were not born there, 60% of San CristobalsÂ' residents were born off the island, and 41% of IsabelaÂ's population are from off the island. 80% of these immigrants are from mainland Ecuador. There is very little migration between the islands.

| Island | Area (km sq.) | Population | % of Total Population |
|--------|---------------|------------|-----------------------|

The Galapagos Islands are one of EcuadorÂ's 22 provinces. The population lives on only 3% of the archipelago. Only five of the islands are inhabited: Santa Cruz, San Cristobal and Isabela, Floreana, and Baltra. The islands have experienced a population boom because the wages on the island are much higher than average wages along the eastern coast of mainland Ecuador. 86% of the population lives in the urban areas of the three main districts: Puerto Baquerizo Moreno on San Cristobal, Puerto Ayora on Santa Cruz, and Puerto Villamil on Isabela. The remaining 14% live in rural areas around these settlements and in Floreana. A small military community lives on Baltra in order to manage the airport and tour boat operations.

| Population: |         |              |       |       |       |      |
|-------------|---------|--------------|-------|-------|-------|------|
| Year        | Resider | t Population |       |       |       |      |
|             |         |              |       |       | _,    |      |
| 1           | 4.      | 0.44         | 45.04 | 05.40 | 50.04 | 05 1 |

| Age of Population: | 0-14 | 15-24 | 25-49 | 50-64 | 65 and up |
|--------------------|------|-------|-------|-------|-----------|
|--------------------|------|-------|-------|-------|-----------|

## Migration:

Salaries on the Galapagos are higher than they are in the eastern coastal regions of mainland Ecuador which has led to there being a high immigration rate to the island. In order to prevent the population exceeding the carrying capacity of the islands, strict immigration policies have been put in place which limit immigration thus also limiting unemployment as worker supply is limited.

| Crude Birth Rate: |   |
|-------------------|---|
|                   | % |

## Life Expedctancy:

Number of Births: 2001: 12,386;

| Crude Death Rate: |
|-------------------|
|-------------------|

## Ethnicity:

There has been no confirmed proof of there ever having been an indigenous population on the islands. The current population are all descendants of mainland Ecuadorians.

## Class Division:

## Languages:

Spanish

## Religion:

The main religion is Roman Catholicism but there are small numbers of other Christian denominations.

## Literacy

In 2001, 2.3% of the economically active population was illiterate. In the population from the age of five and up, 1.7% had no education, 0.3% had a preschool level education, 38.7% had an elementary level education, 33.5% had a middle-school level education, 14% had completed high school, and 11.7% did not answer the question. The average number of years of education was 8.4.

## **Education System:**

In 2001, 2.3% of the economically active population was illiterate. There is currently one university on the islands (a branch of Universidad San Francisco de Quito, called GAIAS, or the Galapagos Academic Institute for the Arts and Sciences), which opened in 2002. It is located in Puerto Baquerizo Moreno on San Cristobal. The university specializes in marine studies, biology, ecology, international relations, environmental economics, and natural resource policy and planning. It has an internationally-trained, highly qualified faculty, and an experiential foundation to its classes. The Charles Darwin Research Centre on the islands is also furthering community education and research on issues of conservation and sustainable development. It has a community of about 200 national and international resident scientists and students, and works with the National Park Service to plan the best way to manage the islands.

| Total Pre-schools:()       |  |
|----------------------------|--|
| Total Primary Schools      |  |
| First Level:               |  |
| Second Level:              |  |
| Third Level:               |  |
| Total Secondary Schools:   |  |
| Total Professional Schools |  |
| Universities:              |  |

| Number of Schools per Island: |            |      |            |   |             |     |       |      |        |      |
|-------------------------------|------------|------|------------|---|-------------|-----|-------|------|--------|------|
|                               | Pre-school |      | Elementary |   | High-school |     | Prof. | Univ | ersity |      |
|                               | Pub        | Priv | 1          | 2 | 3           | Pub | Priv  |      | Pub    | Priv |

| Students Enrolled: |            |            |             |       |            |  |  |  |
|--------------------|------------|------------|-------------|-------|------------|--|--|--|
| Year:              | Pre-School | Elementary | High-school | Prof. | University |  |  |  |

| Teachers        |            |            |   |   |             |       |            |  |
|-----------------|------------|------------|---|---|-------------|-------|------------|--|
| Year Pre-School |            | Elementary |   |   | High Cohool | Prof. | University |  |
| rear            | Pre-School | 1          | 2 | 3 | High-School | Pioi. | University |  |

## **Medical Services:**

The islands have one public healthcare facility with overnight facilities and six with no overnight capacity. They have 11.8 doctors per 10,000 inhabitants, and there are a total of 22 doctors on the islands. They have 10 dentists (5.4 per 10,000 population), 6 nurses (3.2 per 10,000 population), 2 obstetricians (1.1 per 10,000 population), and 21 infirmary assistants (11.3 per 10,000 population). There has been some effort on the part of NGOÂ's to highlight the need to improve healthcare on the islands.

## **HISTORY AND CULTURE**

## History

There has been no concrete proof that the Galapagos had any indigenous peoples. They were officially "discovered" by Tomas de Berlanga (Bishop of Panama) when his ship was carried there by currents. In the 17th and 18th centuries, the islands were used by pirates and buccaneers as a base camp. In the 19th century whalers and fur sealers exploited the islands. Ecuador annexed the Galapagos islands on February 12, 1832. During the next century the islands were inhabited by a few settlers, and used as a penal colony, the last of which closed in 1959 when the archipelago became a national park. The islands are protected by strict laws limiting where visitors are allowed to go and stating that all visitors must be accompanied by a certified naturalist tour guide trained by the national park service. Most of the current-day inhabitants moved to the islands from the Ecuadorian mainland during the last twenty years. Until the Special Law for the Galapagos was passed, the population was increasing at more than 8% annually. Charles Darwin visited the islands in 1835 and made a collection of plants and animals, which served as the foundation for his theory of evolution by natural selection.

## Referenda:

**Recent Significant Events:** 

Music, Dance, Handicraft and Patrimony:

## Sources:

DARWIN FOUNDATION. http://www.darwinfoundation.org GAIAS (The Galapagos Academic Institute for the Arts and Sciences). http://www.usfq.edu.ec/GAIAS/ Accessed January 15, 2005. GALAPAGOS.ORG. http://www.galapagos.org/ Accessed January 7, 2005. GALAPAGUIDE. http://www.galapaguide.com Accessed January 8, 2005. INEC (INSTITUTO NACIONAL DE ESTADISTICA Y CENSOS). http://www.inec.gov.ec/ Accessed January 5, 2005. KERR, S., SUSANA C., JOANNA H. (2004), Migration and the Environment in the Galapagos: An Analysis of Economic and Policy Incentives Driving Migration, Potential Impacts from Migration Control, and Potential Policies to reduce Migration Pressure. Motu Working Paper 03-17. Motu Economic and Public Policy Research. econwpa.wustl.edu/eps/othr/papers/0403/0403001.pdf Accessed January 12, 2005. LA LEY REGIMEN ESPECIAL PARA LA CONSERVACION Y DESAROLLO SUSTENABLE DE LA PROVINCIA DE GALAPAGOS. 1998. Congreso Nacional. http://www.elaw.org/resources/text.asp?id=2420 Accessed January 15, 2005. LONELY PLANET.

http://www.lonelyplanet.com/destinations/south\_america/ecuador\_a nd\_the Galapagos\_islands/index/htm Accessed January 7, 2005. MPA NEWS. In Galapagos, Clashes Between Fishers and Managers Jeopardize Conservation Efforts. Vol. 2, No. 6. December 2000 Ŗ January 2001. SCIENCE DAILY. http://www.sciencedaily.com/encyclopedia/galapagos\_islands Accessed January 7, 2005. T., J.E. (2001), Microeconomics of Globalization: Evidence from Mexico, China, El Salvador, and the Galapagos Islands. Report to the Latin American and Caribbean Office of the World Bank. www.agecon.ucdavis.edu/facultypages/taylor/print/taylorworking.htm Accessed January 15, 2005. T., J.E., ANTONIO Y.N., JAVIER B., GEORGE D.L., MARIA M.H., MARA R., MICKI S. (Julio 1999), Estudio Economico de Galapagos. Documento de Trabajo, Banco Interamericano de Desarollo, Washington, D.C. www.iga.ucdavis.edu/Anexos1a3y4b.doc Accessed January 15, 2005. T., J.E., ANTONIO N., GEORGE A.D., MICKI S., SERGIO A. (2002), The Economics Of "Eco-Tourism:" A Galapagos Island Economy-Wide Perspective. www.reap.ucdavis.edu/working\_papers/jet-galapagos.pdf Accessed January 15, 2005. UNDP. (2000), Ecuador: Control of Invasive Species in the Galapagos Archipelago. WORLD FACTBOOK. http://www.cia.gov/cia/publications/factbook/geos/ec.html Accessed January 5, 2005. WWF. (2004), Ecuador Rethinks Agreement with Fishermen in the Galapagos. http://passport.panda.org/campaigns/success.cfm?uNC=36180277&uYear=2004 Accessed January 10, 2005.



Useful Links: IslandStudies.ca www.upei.ca www.google.ca Please address queries to: Institute of Island Studies University of Prince Edward Island (UPEI) 550 University Ave Charlottetown, PE, Canada, C1A 4P3

Copyright 2007. Institute of Island Studies, UPEI. Educational and Non-Commercial Use Only