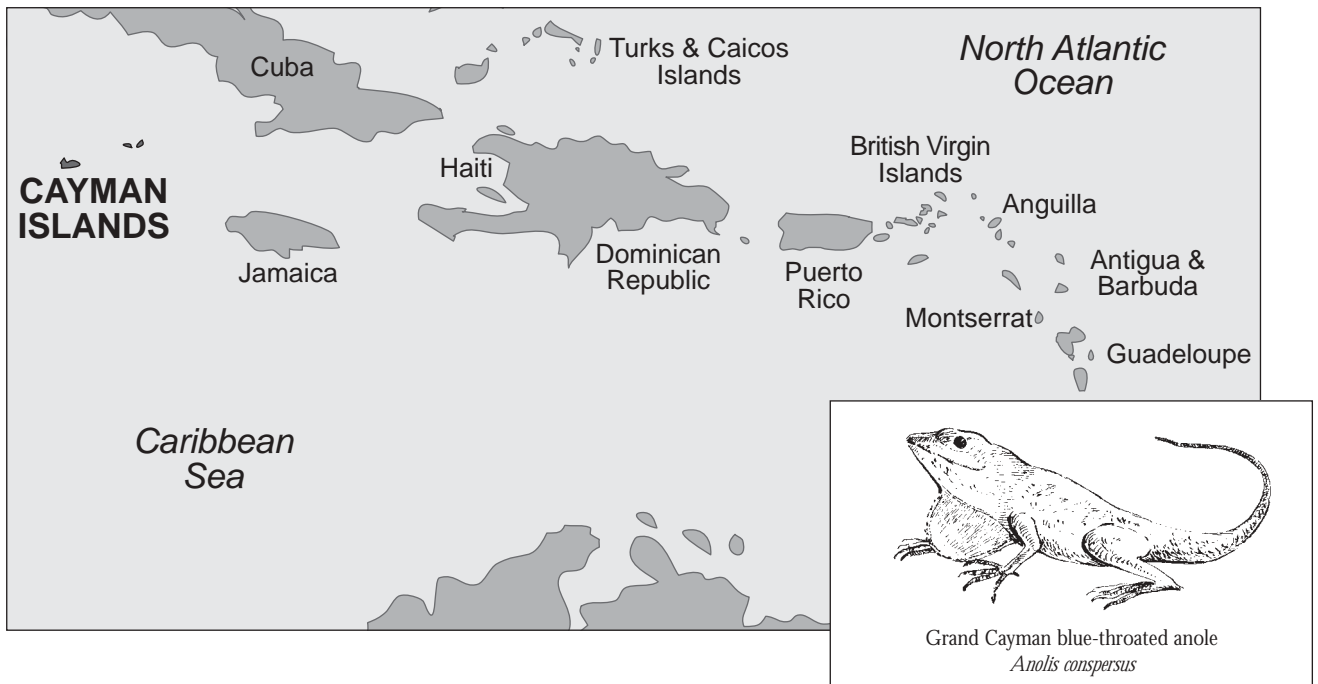


## 8: The Cayman Islands



### Introduction

The three Cayman Islands are situated at the western end of the Greater Antilles in the Caribbean. Their combined land area is 259 km<sup>2</sup>. The largest of the islands is Grand Cayman with an area of 197 km<sup>2</sup>. The population of the islands in 1990 was recorded as 25,355. The economy is based on tourism and the offshore finance industry. Most of the population of the Caymans lives on Grand Cayman where rapid development has transformed the island's environment. Development pressures on the island, and on Cayman Brac, continue to be the main threat to biodiversity. Little Cayman with a population of less than 100, has until recently remained relatively little disturbed. The number of buildings has, however, doubled in the past few years.

### International obligations relevant to nature conservation

Cayman Islands are included in the UK's ratification of the following international agreements:

- Convention Concerning the Protection of the World Cultural and Natural Heritage (World Heritage Convention)
- Convention on Wetlands of International Importance especially as Waterfowl Habitat (Ramsar Convention)
- Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES)

- Convention on the Conservation of Migratory Species of Wild Animals (Bonn Convention)
- Convention on Biological Diversity (CBD)
- International Convention on the Regulation of Whaling
- Convention for the Protection and Development of the Marine Environment of the Wider Caribbean Region (Cartagena Convention)— Protocol on Specially Protected Areas and Wildlife

## Implementation

**Ramsar:** Booby Pond and Rookery, Little Cayman was declared a Ramsar site in 1994. A second site, Little Sound on Grand Cayman, is under consideration for designation by the Government.

**CITES:** enabling legislation for CITES is the Endangered Species Protection and Propagation Law 1978. The legislation does not have a mechanism for incorporating updated appendices to CITES other than by specific amendment. A wide range of CITES species occurs in the Caymans including orchids, cacti, both endemic subspecies of the Cuban parrot *Amazona leucocephala*, marine turtles and ground iguana (*Cyclura*) species.

## Protected areas

Legislation has been enacted in the Caymans to protect marine areas and sites important for the conservation of animal species. Approximately 5.5% of the land area is now protected. This includes 138 ha protected as animal sanctuaries and approximately 656 ha of National Trust properties.

- **Marine Conservation Law 1978:** this legislation allowed for the designation of restricted marine areas, for the purposes of research and development, and for marine parks.

- **Marine Conservation (Marine Parks) Regulations 1986:** enabling legislation for the designation of marine protected areas. Three categories of marine parks are specified with different restrictions applied to each. The categories are:

Environmental zone: in which prohibited activities include the removal of any form of marine life, the use of anchors, entry into the water and exceeding a speed of five knots.

Replenishment zone: where the removal of conch and lobster is prohibited and fishing methods restricted.

Marine park zone: in which marine life is protected and anchoring forbidden, except in certain circumstances.

The mangrove swamps bordering Little Sound, Grand Cayman are scheduled as an environmental zone. This includes part of Grand Cayman's central swamp.

- **Marine Conservation (Marine Parks) (Amendment) Regulations 1986:** designates marine protected areas on Cayman Brac and Little Cayman.
- **Animals Law No. 8 1976:** provides for the protection of iguanas and bird species (see below) and also allows for the designation of animal sanctuaries. Two such areas are designated on Grand Cayman: Meagre Bay Pond and Colliers Bay Pond. Under this law it is an offence to disturb any natural feature or any vegetable or animal life. Hunting is prohibited. The areas protected at Meagre Bay Pond and Colliers Bay Pond include a 100 m perimeter beyond the high water mark of the ponds.
- **Animal (Sanctuaries) Regulations 1980 (Cayman Brac):** Westerly Ponds, an area of swamp between the ponds, and Salt Water Pond in Cayman Brac West were designated as animal sanctuaries under this legislation. The protected

status of two of these sites was subsequently removed in 1988 by amended land registration.

- **Animal (Sanctuaries) Regulations 1982 (Little Cayman):** the pond and marshy area known as the Rookery, on Little Cayman, is designated an animal sanctuary.

Other relevant legislation includes:

- **National Trust for the Cayman Islands Law 1987:** the National Trust for the Cayman Islands was established by this law which specified the objectives of the Trust and enabled it to buy, lease, sell, hold or deal in property of any nature. The Trust maintains several areas of land for wildlife conservation. These include a 277 ha site in the north east of Grand Cayman, the Salina Nature Reserve, which incorporates about 125 ha of swamp. In December 1991 ownership of a 40 ha woodland site on Cayman Brac, important as a nesting area for the Cayman Brac parrot *Amazona leucocephala hesternae*, was transferred to the National Trust by the Nature Conservancy and is now titled Brac Parrot Reserve. The site will form the basis for a larger reserve on Cayman Brac.

In March 1992 the Council of the National Trust for the Cayman Islands re-examined the Trust's role and mission. It emerged with a primary commitment to establishing a system of reserves, designed scientifically to preserve as far as possible the biodiversity of the islands, and the integrity of their critical natural systems. A Scientific Advisory Council was established. On the recommendations of this group, the Trust has established as top priority the acquisition of a core reserve in an area of central Grand Cayman known as 'The Mountain'. Other priorities include the acquisition of reserve lands in the centre of Little Cayman and building on the existing core reserve on Cayman Brac (Burton 1992).

The Queen Elizabeth II Botanic Park was officially opened by the Queen in 1994. It covers

24 ha and is jointly owned by the Government and the National Trust. The park has been developed as a botanic garden, with woodlands preserved in their natural state.

## Habitats of major significance

The three Cayman Islands are flat, low-lying limestone islands with extensive reef systems. The two dominant terrestrial ecosystems occurring naturally in the Cayman Islands are mangrove swamp formations, which occupy two thirds of Grand Cayman and a third of Little Cayman, and dry evergreen woodlands and thickets, which occupy the limestone and dolomite karst terrain above sea level. The vegetation of the Cayman Islands is described in Brunt & Davies (1994).

The dry woodlands of Grand Cayman and Cayman Brac have suffered a long history of disturbance for agriculture and timber extraction. The evergreen hardwoods that dominate this habitat are extremely slow growing and effects of logging in the early part of this century are still clearly visible. In central and eastern Grand Cayman and on Cayman Brac, the woodlands form a complex mosaic of secondary growth at various stages. Primary vegetation is restricted to the most inaccessible areas. Little Cayman is still dominated by primary vegetation (Burton 1992). The low elevation dry woodlands on all three islands of the Caymans are of regional importance for biodiversity conservation.

A survey of important wetland sites on the Cayman Islands was carried out as a contribution to the IUCN/IWRB Directory of Neotropical wetlands. The directory gives information on 15 wetland sites (Scott & Carbonell 1986).

Wetlands in the Caymans comprise primarily mangrove swamps which cover more than 50% of Grand Cayman and a significant area of Little Cayman. Cayman Brac, dominated by a major Tertiary Bluff Formation outcrop, has very limited mangrove areas (Brunt & Davies 1994). The extensive mangrove swamp of Grand Cayman is

the largest area of inland mangrove in the Caribbean; it is also unique within the region in terms of its geomorphology and vegetation zonation patterns. The integrity of the central mangrove swamp is considered crucial to a whole range of natural processes on Grand Cayman, including the rainfall pattern, the viability of North Sound, and retention of freshwater tables in surrounding agricultural land. The main threat to wetlands in the Caymans is the demand for land for development.

Other important wetland sites on Grand Cayman include: Malportas Pond (probably the most important of all the brackish ponds on Grand Cayman), and the Head of Barkers wetlands, both of which are very valuable for birds; South Sound Swamp and Half Way Pond; Buttonwood Swamp from Matilda Ponds to the swamp behind Bodden Town, Bowse Land Mangrove, Grapetree Pond and Betty Bay Pond. The mangrove swamps of Little Cayman, Tarpon Lake and Eastern Wetlands, are also of priority conservation importance (Hepburn *et al.* 1992).

In 1995–1996 a biological assessment of saline coastal ponds was carried out to provide information needed in management planning for the Ramsar site on Little Cayman and other protected ponds on the islands. The coral reefs and marine biology of the Caymans are described in the UNEP/IUCN Directory of coral reefs (UNEP/IUCN 1988).

## Species of major significance

### Biodiversity assessment

The species biodiversity of the Caymans has been relatively well documented. Comprehensive accounts of different species groups are given in Brunt and Davies (1994).

Extensive baseline studies of the oceanography and biology of the shallow marine environments of Grand Cayman have been carried out by the Cayman Island Government's Department of Environment (and its predecessors). Recent marine

research has focused on ecotourism and development impacts on coral reefs, and fishing impacts on Nassau grouper *Epinephelus striatus*, spiny lobster *Panulirus argus*, and queen conch *Strombus gigas*.

Co-ordination of biodiversity research is now effectively managed by the National Trust for the Cayman Islands, which maintains biological information and organises survey work. Since 1991 the Trust has been running a visiting scientists programme, which focuses partly on biodiversity assessments. Specialists from the UK, USA, Canada and Cuba have worked collaboratively with the Trust, resulting in establishment of a herbarium and insect collection in the country. Studies have focused on vascular plants, selected insect groups, the fauna of brackish and saline ponds, and the status of selected flagship species such as endemic parrots, ground iguanas and the large red-footed booby *Sula sula* nesting colony on Cayman (Burton *in litt.* 1997).

## Plants

A comprehensive flora was published in 1984 and includes a floristic description of the different vegetation types (Proctor 1984). The plant collection assembled during preparation of the flora forms the basis for a herbarium maintained by the National Trust. Since publication of the flora, 53 additional species have been discovered in the Caymans. A recent assessment of the conservation status of wild plants of the Caymans shows that, out of the 24 endemic vascular plant taxa, eight are vulnerable or endangered and one is presumed extinct.

The flora of the Cayman Islands includes 20 species of orchids, five of which are endemic. Some species have been subject to collecting pressures. Eleven taxa of cacti are currently recorded from the Islands. An undescribed variety of *Epiphyllum phyllanthus* and new taxa of *Harrisia* and *Pilosocereus* occur in the Bluff area of Cayman Brac which is a priority site for the conservation of cacti and succulents in a regional context (Areces-Mallea 1997). All orchids and cacti of the Caymans

are included in Appendix II of CITES. Other CITES plant species occurring in the Caymans are the succulent *Euphorbia cassythoides* (Euphorbiaceae), currently not threatened in a regional context (Areces-Mallea 1997), cycads *Zamia integrifolia* and *Zamia sp. nov.* (Zamiaceae), and Caribbean mahogany *Swietenia mahogani*. The following trees and shrubs, endemic to the Caymans, have been assessed in *The world list of threatened trees* (Oldfield, Lusty & MacKinven 1998).

*Chionanthus caymanensis* var. *caymanensis* (Oleaceae; VU): confined to Cayman Brac and Little Cayman, the species occurs in dry evergreen woodland on dolomite karst. Populations are stable and there are extensive primary stands of the habitat remaining.

*Chionanthus caymanensis* var. *longipetala* (Oleaceae; EN): endemic to the Cayman Islands, occurring in dry evergreen woodland on dolomite karst, this variety is confined to Grand Cayman, where in the west the habitat has been 95% destroyed.

*Cordia sebestena* var. *caymanensis* (Boraginaceae; LRnt): endemic to the three islands of Cayman, occurring in all dry habitats on all three islands, the variety is widespread and well represented in protected areas. There is potential for hybridisation to occur with the type variety, which is being brought onto the islands for landscaping. Import restrictions and the growing interest in the propagation of native trees may help to avoid the problem.

## Terrestrial invertebrates

Knowledge of Cayman Island terrestrial invertebrates is limited by the lack of research and collections. Some 133 species have been recorded; a third of these species are snails, which have been thoroughly studied, and another third spiders (Hounscome 1994). The world population of the globally threatened snail *Cerion nanus* (CR) is confined to a 300 m<sup>2</sup> area on the western end of Little Cayman where it can be found on one species of plant (Hounscome & Askew 1980). It is thought that there may be up to 30 endemic land snails

(Burton 1992). The first annelid specimens *Pontodrilus littoralis* were found in 1985 at Furtherland Farm in George Town and at the southern end of South Sound swamp where they were likely to have been introduced living in soil attached to imported garden plants and vegetables from the USA. As there are no native mammals, except bats, crabs often fill niches which would otherwise be filled by mammals, and are sometimes regarded as pests due to their scavenging nature. The large edible crab *Cardisoma guanhumis* is becoming gradually rarer on the Caymans due to increased road traffic and development. Because of its cultural importance some believe it worthy of protection; it performs a similar ecological function to rabbits, although it is more omnivorous (Davies 1994).

The varied insect fauna of the Cayman Islands comprises a small number of species. It is thought that there are over 30 endemic species, but they are not yet all described (Burton 1992). Knowledge of these species is inconsistent, some species being studied in depth and others neglected.

There are currently 48 taxa of butterfly known from the Cayman Islands, of which four subspecies are endemic; *Anaea echemus daneliana*, *Hemiargus ammon erembis*, *Brephidium exilis thompsoni* and *Papilio andraemon taylori* (Askew 1994).

Each island has an endemic cicada: *Diceroprocta cleavesi* of Grand Cayman, *Diceroprocta caymanensis* of Little Cayman, and *Diceroprocta ovata* of Cayman Brac.

Dragonflies are very abundant, and common species can be observed, as larvae, in brackish ponds and lagoons, while rarer species may inhabit smaller collections of rain water.

There are a great many invertebrate species that remain unidentified. Much more research is required before any definitive statements on environmental and geographical distributions of the invertebrate fauna of the Cayman Islands can be made.

## Reptiles and amphibians

The herpetofauna of the Caymans is described by Seidal & Franz (1994). Twenty-one taxa of reptiles and amphibians are endemic. They include:

Grand Cayman blue-throated anole *Anolis conspersus*: an arboreal lizard endemic to, and widely distributed across, Grand Cayman. It occurs in brushy open areas, or mangroves and is rarely found in deep forest. There are two subspecies: *A. conspersus lewisi* inhabiting the east of the island and *A. conspersus conspersus* the western half.

An anole *Anolis maynardi*: a native arboreal lizard of Little Cayman, collections have most commonly been made from abandoned buildings and tree trunks near South Town.

*Anolis sagrei luteosignifer*: an endemic subspecies of this widespread Caribbean anole.

Ground iguana *Cyclura nubila*: there are three subspecies of this iguana, two of which are endemic to the Cayman Islands and are legally protected.

Cayman Islands ground iguana *C. nubila caymenensis* (EN): this subspecies occurs on Cayman Brac and Little Cayman; surveys have revealed that this subspecies has become seriously depleted on Cayman Brac, but is doing well on Little Cayman. There have been introductions to Grand Cayman. The preferred habitat of this lizard is sandy substrates with rocks nearby.

Cayman Islands ground iguana *C. nubila lewisi* (CR): this subspecies has become restricted to remote areas on the eastern side of Grand Cayman (Seidal & Franz 1994). Fossils in peat deposits and cave sediments suggest that it was once widespread across the island before colonisation by Europeans. Grant (1941) reported that it was doubted that more than a dozen individuals still existed. Since that initial

survey very few have been reported. The National Trust currently has a conservation programme for *Cyclura nubila lewisi*. The long-term possibility of establishing a population in the Salina Nature Reserve is being considered.

A lizard *Leiocephalus carinatus*: two subspecies of this xerophilic, diurnal lizard are:

*L. carinatus granti*: a native of Cayman Brac, possibly Little Cayman, it has been introduced to Swan Island (Schwartz & Thomas 1975); it apparently requires open beach with direct sunlight.

*L. carinatus varius*: this subspecies, native to Grand Cayman, was previously widespread on the surrounding coastal platform but many colonies are now feared eradicated as a result of beach front developments. Colonies observed in 1986–1987 were along isolated beach.

A gecko *Sphaerodactylus argivus*: a native species of the Cayman Islands which consists of three subspecies. The species is mesophilic to xerophilic:

*S. argivus argivus*: confined to the northern and southern coastal platforms of Cayman Brac (Seidal & Franz 1994).

*S. argivus bartschi*: found only on Little Cayman and Owen Island. Although likely to be widely distributed across the island it has largely been collected near the beach at South Town and Tarpon lake (Seidal & Franz 1994).

*S. argivus lewisi*: confined to Grand Cayman and is likely to be widely distributed, although the majority of collections have been made in the west (Seidal & Franz 1994).

A snake *Typhlops epactia*: an endemic mesophilic snake of Cayman Brac found only along the northern and southern coastal platforms.

A snake *Typhlops caymenensis*: a xerophilic snake

endemic to Grand Cayman, this species is found in dense *Coccoloba* and *Terminalia* woods, sandy beach scrub, under rocks and under termite infested wood (Schwartz & Henderson 1991).

Cayman islands dwarf boa *Trophidopsis caymenensi*: a native ground dwelling species of the Cayman Islands consisting of three subspecies. A xerophilic to mesophylic species with a wide range of habitats (Schwartz & Henderson 1991):

*T. caymenensis caymenensi*: restricted to central and eastern Grand Cayman.

*T. caymenensis parkeri*: restricted to Little Cayman.

*T. caymenensis schwartz*: restricted to Cayman Brac, reported only to occur on the northern and western coastal platforms.

A snake *Alsophis cantherigerus*: three subspecies of this diurnal snake are endemic to the Cayman Islands; they inhabit mangrove swamps, scrubby logwood areas, old fields, evergreen woods, brackish ponds (Seidal & Franz 1994):

*A. cantherigerus caymanu*: restricted to Grand Cayman where it is common and widespread.

*A. cantherigerus fuscicauda*: confined to the north and south coastal platforms, and the cross island road on the Bluff of Cayman Brac.

*A. cantherigerus rutyi*: restricted to Little Cayman, collections have been made from South Town and in the vicinity of the airport.

A 'water snake' *Tretanorhinus variabilis lewisi*: an endemic of Grand Cayman occurring along the rocky or muddy edges of freshwater and slightly brackish ponds, they are also often found in 'cow wells' (Seidal & Franz 1994).

The hawksbill turtle *Eretmochelys imbricata* (CR) and loggerhead turtle *Caretta caretta* (EN) occur only in limited numbers around the Caymans. A

small number of wild green turtles *Chelonia mydas* (EN) are found in the shallow sounds surrounding the islands, particularly the Little Sound area of North Sound and in Frank's Sound. Nesting has been observed along Barker's Beach, the northern portion of West Bay Beach, Beach Bay and at beaches on Little Cayman and Cayman Brac. Young green turtles feed on invertebrates associated with the roots of red mangrove *Rhizophora mangle*. The Cayman Island Farm Ltd. owned by the Cayman Islands Government commercially raises the green turtle. The farm annually produces 1,800 turtles for local consumption; in addition to this several thousands of turtles have been released from the farm as part of a re-establishment programme (Wood & Wood 1994).

## Birds

A field guide to the 181 bird species of the Caymans was published by Bradley (1985) and an overview of the avifauna is provided by Bradley (1994). There are 21 families of breeding birds represented by 38 genera and 46 species in the Cayman islands, 17 subspecies of which are endemic (Bradley 1994). Grand Cayman thrush *Turdus ravidus*, the only endemic full species, is now extinct. Assessment and monitoring of bird populations and study of the life cycles of indigenous species is undertaken by the bird club, formed in 1990. Field work has shown that several migrants are more frequent than had previously been thought but that numbers of some resident species may be declining, probably because of habitat destruction. The status of the West Indian whistling duck *Dendrocygna arborea* (VU) on Grand Cayman is of particular concern. This species, confined to the Caribbean, is considered to be vulnerable as a result of wetland drainage and hunting pressure throughout its range (Collar et al. 1994). In the Caymans it has declined significantly over the past 50 years and became extinct in Cayman Brac by the late 1980s. The Grand Cayman and Little Cayman populations have been increasing in number since 1990 (Bradley 1994).

Notes on the endemic landbirds, based on Bradley (1994) are provided below. Thirteen of these endemic subspecies breed on Grand Cayman, nine of which occur exclusively. The close proximity of Little Cayman and Cayman Brac has meant that some endemic subspecies are shared by both islands.

A subspecies of the Caribbean dove *Leptotila jamaicensis collaris*. found only in the central and eastern parts of Grand Cayman where it breeds in dense thicket on exposed limestone.

Cuban parrot *Amazona leucocephala*. There are two subspecies of Cuban parrot occurring in the Cayman Islands:

Grand Cayman parrot *A. leucocephala subsp. Caymanensis*. an endemic of Grand Cayman where it is fairly common.

Cayman Brac parrot *A. leucocephala subsp. hesternae*. a rare endemic of Cayman Brac. The Cayman endemic parrots have received particular conservation attention as 'flagship species'.

Cayman woodpecker *Melanerpes superciliosus caymanensis*. a common endemic of Grand Cayman.

Cayman flicker *Colaptes auratus gundlachi*. a common endemic of Grand Cayman.

Cayman elaenia *Elaenia martinica caymanensis*. this endemic flycatcher is found in all habitats on all the Cayman Islands, although preference is given to arid woodland.

A subspecies of the loggerhead kingbird *Tyrannus caudifasciatus caymanensis*. a common species breeding in all major habitats on Grand Cayman, it also occurs on Cayman Brac.

Red-legged thrush *Turdus plumbeus coryi*. confined to Cayman Brac, it inhabits forest and mixed woodland, gardens and coastal woodland. This subspecies is fairly common in the breeding season, from March to September.

Cayman vireo *Vireo magister caymanensis*. a common but shy sub-species of the Yucatan vireo confined to mangrove, mixed woodland and limestone forest in Grand Cayman.

A subspecies of the thick-billed vireo *Vireo crassirostris alleni*. known from Cayman Brac and Grand Cayman, this species is common in dry bushland and woodland.

A subspecies of the vitelline warbler *Dendroica vitellina vitellina*. known only from Grand Cayman where it is common in arid mixed woodland, logwood and coastal woodland.

A subspecies of the vitelline warbler *Dendroica vitellina crawfordi*. known only from Little Cayman, where it inhabits low scrub woodland, and on Cayman Brac, bluff paths; this is the most common species of warbler on the islands.

A subspecies of the bananaquit *Coereba flaveola sharpei*. this endemic of the Cayman Islands is known from all three islands and is very common in all habitats.

A subspecies of the stripe-headed tanager *Spindalis zena salvini*. known only from Grand Cayman, this subspecies is fairly common in logwood, limestone forest and mixed woodland.

A subspecies of the Cuban bullfinch *Melopyrrha nigra taylori*. known only from Grand Cayman, this species is common in mature mangroves, woodland and forest.

A subspecies of the Greater Antillean grackle *Quiscalus niger caymanensis*. known only from Grand Cayman, this subspecies can be found in all habitats, especially mangroves.

A subspecies of the Greater Antillean grackle *Quiscalus niger bangsi*. known from Little Cayman and Cayman Brac, this subspecies can be found in all habitats, especially mangroves; it has been absent from Cayman Brac in recent years.

## Mammals

The bats of the Caymans with notes from Morgan (1994) include:

A subspecies of Pallas' bat *Molossus molossus tropidorhynchus*: the most abundant bat of the Caymans, this subspecies commonly roosts in buildings.

Waterhouse's leaf-nosed bat *Macrotus waterhousii minor*: this subspecies is restricted to Cuba, Isle of Pines, the three Cayman Islands and the northern Bahamas. On the Caymans, it roosts in caves and abandoned buildings.

A subspecies of the Jamaican fruit-eating bat *Artibeus jamaicensis parvipes*: this sub species is found in Cuba, the southern Bahamas, Providenciales (TCI) and the three Cayman Islands. On the Caymans it is the second most abundant bat. It roosts primarily in small caves.

Cuban fruit-eating bat *Phyllops falcatus* (LRnt): this species is restricted to Cuba, Grand Cayman and Cayman Brac. The only Cayman Islands' record is a single skin of a male specimen, collected in 1938.

A subspecies of the Cuban fruit-eating bat *Brachyphylla nana nana* this subspecies is known from Cuba, Isle of Pines, Grand Cayman, Hispaniola and middle Caicos. It is cave dwelling but roosts have not yet been found on Grand Cayman. At the species level, the IUCN category is LRnt.

A subspecies of the buffy flower bat *Erophylla sezekorni syops*: an obligate cave dweller, this subspecies is restricted to Jamaica, Grand Cayman and Cayman Brac.

Big brown bat *Eptesicus fuscus*: a widespread species; the Grand Cayman specimens are the smallest representatives and are considered to form a new subspecies.

A subspecies of the Brazilian free-tailed bat *Tadarida brasiliensis muscula*: a widespread species

occurring on most of the Caribbean islands. One roost is known from the Cayman Islands. At the species level, the IUCN category is LRnt.

The only cetacean of global conservation concern recorded from the Cayman Islands is the sperm whale *Physeter catadon* (VU) (Morgan 1994). It is probable that other species occur in Cayman waters, and these may include sei whales *Balaenoptera borealis* (EN), blue whales *Balaenoptera musculus* (EN), fin whales *Balaenoptera physalus* (EN), and humpback whales *Megaptera novaeangliae* (VU) (Morgan 1994).

## Species protection

- **The Marine Conservation Law 1978:** gives protection to certain marine species.
- **The Marine Conservation (Turtle Protection) Regulations 1978:** gives protection to marine turtles.
- **Animals Law No. 8 1976:** this protected iguanas and all non-domestic birds, except those listed as game birds, from hunting, collection and egg-taking.
- **Animals (Protection) Regulations 1989:** this legislation significantly amended the above. It reduced the list of game species to three—the white-winged dove, *Zenaida asiatica*, white-crowned pigeon *Columba leucocephala*, and the blue-winged teal *Anas discors*—and established a closed season from 1 February–31 July. The Regulations removed the two races of the Cuban parrot, Grand Cayman parrot and Cayman Brac parrot, from the game list.
- **Development and Planning Law 1978:** under Part III of this law, the central planning authority may make a tree preservation order for individual trees, tree groups or woodlands.

## Acknowledgements

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Department of Environment, PO Box 486, George Town, Grand Cayman. Tel: 345 949 8469; fax: 345 949 4020.

The Chief Agriculture and Veterinary Officer (CITES Authority), Department of Agriculture, PO Box 459 GT, Lower Valley, Grand Cayman.

National Trust for the Cayman Islands, PO Box 31116 SMB, Grand Cayman. Tel: 345 949 0121; fax: 345 949 7494; e-mail: ntrust@candw.ky; web site: <http://www.caymans.com/trust.htm>.

## Conservation agencies

In the Cayman Islands the Government agency with responsibility for conservation is the Ministry of Agriculture, Environment and Communications. This Ministry has an overview of all environmental matters and is responsible for international Conventions. The Department of Environment, a department of this Ministry, has responsibility for environmental monitoring, administration of marine parks and environmental issues relating to development. The Department of Environment is also responsible for the section of the Animals Law that refers to animal sanctuaries. The Department has three Enforcement Officers on Grand Cayman and one each on Cayman Brac and Little Cayman.

The responsibilities of the the Ministry of Agriculture, Environment and Communications include the Water Authority, Lands and Surveys. The Planning Department falls under the Ministry of Education, Aviation and Planning and is responsible for producing and updating Develop-

ment Plans, and for controlling the development process. Various other departments, authorities and boards have statutory conservation obligations.

The National Trust for the Cayman Islands, a statutory non-governmental organisation (NGO), was established in 1987 to preserve the historic, natural and maritime heritage of the islands. Its activities include the acquisition and management of land for conservation purposes, the management of species conservation projects and the provision of advice on conservation matters.

Enforcement of conservation legislation is the responsibility of the police and, in cases of marine issues, of the marine enforcement officers who are employed by the Natural Resources Unit and have full constabulary powers. At present there are two marine enforcement officers on Grand Cayman and one on Little Cayman and Cayman Brac. A number of volunteer fisheries officers also assist with the enforcement of marine conservation legislation.

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