Hummock Point Nature Reserve Management Plan 2025-2030

Contents

Introduction

Introduction

Ascension Island

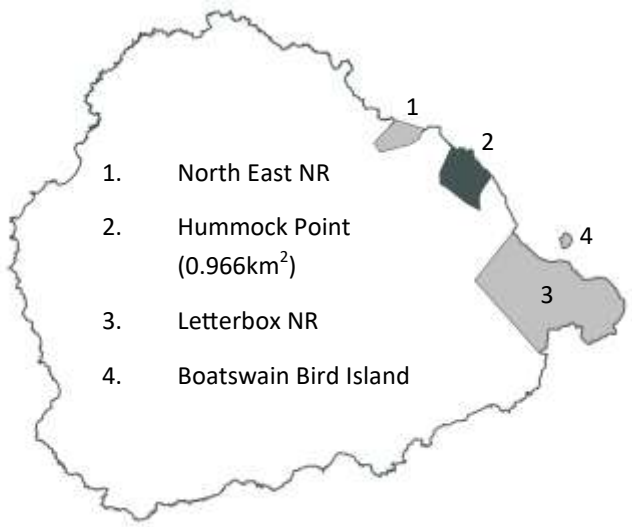
Ascension Island is a remote overseas territory of the United Kingdom (UKOT) located at the centre of the Atlantic Ocean. Ascension is a young volcanic island 97km^2 in size, lying 1504km from the coast of Africa and 2232km from Brazil.

7°56'S, 14°22'W

Though small, Ascension supports globally-important biodiversity including 67 endemic species found nowhere else in the world. It is a nesting site for over half a million seabirds and the second largest turtle rookery in the Atlantic.

Protecting biodiversity is one of the Ascension Island Government (AIG)'s strategic objectives and a commitment under the Convention on Biological Diversity. The island's Protected Areas are central to meeting this commitment and achieving Target 3 of the post-2020 Global Biodiversity Framework. All of the Protected Areas have legal status and are underpinned by management plans. This plan covers the newly designated Hummock Point Nature Reserve.

The Hummock Point Nature Reserve (NR) was designated in Feb 2025 under the National Protected Areas (Amendment) Order, 2025. It was created primarily to protect the Critically Endangered Ascension Spurge (*Euphorbia origanoides*) plants which thrive here. Green turtles (*Chelonia mydas*) nest on the beach and invertebrates such as land crabs (*Johngarthia lagostoma)* and the endemic Ascension scaly cricket *(Discophallus adsensionis)* also utilise the reserve.



The reserve is surrounded in the north by the North-East Bay NR and to the south by the Letterbox NR. All wildlife protected areas on Ascension Island are managed by the Ascension Island Government Conservation and Fisheries Directorate (AIGCFD).

The reserve consists of trachyte cliffs, superficial volcanic deposits, scree and a basalt lava flow which is approximately 0.5 million years old. The Hummock Point NR boundary lines perpendicular to the coastline indicate the high ground to the west and east that mark the hydrological boundaries of the site. The reserve follows the coastline and extends around 900m inland, protecting a niche habitat which is important to the Ascension spurge. This lowland distribution of Ascension spurge can be found growing on loose scoria, lavas, shingle beaches or sand amongst coastal rock. This stretch of coastline is particularly important to this species as invasive non-native vegetation is not yet abundant in this area though is beginning to encroach in some areas of the NR.

The Hummock Point NR also protects several beaches (Hannay's, Pebbly West and Pebbly East) which are important nesting habitat for green turtles and spawning sites for the native land crab.

Hummock Point NR

The Hummock Point Nature Reserve covers a number of unique habitats described below that support a range of important biodiversity.

Lava flows: This is prime habitat for a genetically distinct form of Ascension Island spurge and the Ascension Island sedge. The coastline of these lava flows are potential habitat for the endemic *Discophallus* scaly crickets though further research for this cryptic species is required.

Beach: Hannay's beach is an important nesting habitat for the endangered green turtle and spawning land crabs. This beach features a blowhole which emits water with each tidal surge to create dramatic scenes. Pebbly beach is also a popular site for spawning land crabs which are native to Ascension.

Coastline: On entry to Hannay's Beach is a sea-carved pool and blowhole. The coastline of the NR is a popular fishing location for octopus (*Octopus vulgaris*) and larger predatory fish such as jacks (*Carangidae*) and rockhind grouper (*Epinephelus adsensionis*). Pantropical dolphins (*Stenella attenuate*) and humpback whales (*Megaptera novaeangliae*) are regularly seen offshore in the surrounding Ascension Island Marine Protected Area. This stretch of coastline is a highway regularly used by native seabirds as they migrate from nearby Boatswain Bird Island to offshore fishing grounds.

The Hummock Point NR is only accessible on foot. A footpath begins at the Ariane site towards Hannay's beach. Beyond the beach, a path leads to a popular hiking trail named Boatswain Bird View. There are no visitor facilities on the reserve however the barren environment makes for an enjoyable hike.

Strategic and Operational Objectives

Protect and conserve the critically endangered Ascension spurge (*Euphorbia origanoides).*

- The population of the Ascension spurge is maintained or increased.

Conserve the natural features of the beach

- The size of the breeding green turtle (*Chelonia mydas*) and land crab (*Johngarthia lagostoma*) populations are maintained or increased
- The area of suitable beach habitat is maintained in the face of climate change impacts and litter.

Conserve Ascension's endemic invertebrates including *Discophallus* scaly crickets and pseudoscorpions.

- Scaly cricket population remains stable and where possible they extend their range into suitable surrounding habitat.

Conserve Ascension's native land crab (*Johngarthia lagostoma*)

- Land crab population remains stable and increased where achievable.

Facilitate natural ecosystem functions and processes within the reserve.

- Invasive flora controlled in critical habitats within the NR to reduce impact on the Ascension spurge.
- Non-native predators are controlled to a level in which they have no significant impact on the Ascension spurge or green turtle population.

Encourage recreational use of the Nature Reserve- compatible with conservation objectives- to promote the health and wellbeing of people of Ascension.

- There is a high level of awareness about the importance of the Hummock NR for the Ascension spurge.
- The Hummock NR is a source of pride for Ascension islanders.

Natural features of the Nature Reserve

Species of Hummock Point Nature Reserve

Ascension spurge (*Euphorbia origanoides*)

This perennial, dwarf shrub forms low hemispherical domes up to 1m in diameter and 40cm high. Endemic to Ascension, this species is classified by the IUCN as Critically Endangered. The Ascension spurge has reddish, dichotomously branched stems with oval, olive green leaves and creamish-white flowers.

The Ascension spurge population fluctuates annually depending on rainfall. Once widespread across the Hummock Point NR, the local population is limited to several fragmented populations. A census in March 2024 recorded 1788 plants within the NR. This includes populations from Hummock Point, and in rocky lava fields towards Boatswain Bird View and Echo Canyon.

The Ascension spurge survives on the arid lava flows and loose scoria as the plants can lay dormant in a seed bank for up to many years (5+) while it waits for adequate rainfall, rapidly germinating in favourable conditions. Seed dispersal is predominantly via wind, but water may be also an important dispersal agent following heavy deluges. Populations that survive longer drought periods are often found in small crevices and gullies where evapotranspiration rates are lower and have increased water availability compared to exposed sites.

The Ascension spurge was once prevalent in the low lying areas of the island, but it is estimated that changes in distribution have led to a 50% reduction in the areas occupied. The majority of plants are around Mars Bay, but other populations are scattered across the island. There is evidence of genetic divergence between east and west coast populations, potentially linked to a dispersal barrier to seeds and pollinators caused by the prevailing south-easterly trade winds. The closest relative is believed to be *E. trinervia* which is native to coastal regions of tropical West Africa. Native associates include *Aristida* ascensionis (grass), *Cyperus appendiculatus* (sedge) and *Portulaca oleracea* (purslane).

Species of Hummock Point Nature Reserve

Ascension sedge (*Cyperus appendiculatus*)

This perennial, tufted sedge varies considerably in size and development across Ascension, most likely a cause of local adaptation. Leaves can be around 7-20cm long x 1-2.4mm wide, tapering gradually to a point. Flowering culms are numerous, usually exceeding the length of the foliage. Spikelets are merged into a dense, globular head approximately 4cm in size (right).

This near-endemic sedge was recorded in 1829 likely encountered on Green Mountain. It is still the most abundant of Ascension's unique regional taxa but the range and genetic diversity is probably much diminished. The Hummock Point plateau is a stronghold for the species (right below), it is sparse across other barren, lowland sites. The Ascension sedge favours rocky, stony or sandy substrate in open, arid places.

This species is often ignored by sheep and rabbits though will be grazed during periods of drought when food availability is limited. A series of dry summers has taken its toll on this species with die-back between 2017 and 2019 however the seed bank resurged in recent years following adequate rainfall. A large population similar to that found at Hummock NR died-back in the same time frame on the sandy basin near the firing range at North East. This population has not yet recovered, making it unclear how resilient the species may be to repeated crashes.

Globally, there are three far-flung populations of *C. appendiculatus* which are all dissimilar though related to *C. alvesii* from the Brazilian coasts. The variety *appendiculatus* is endemic to Ascension and the most variable in stature. The species flowers year-round though is little studied and further research is needed (Lambdon *et al.* 2023).

Species of Hummock Point Nature Reserve

Green turtle (*Chelonia mydas)*

Green turtles nest on Hannay's beach which forms part of the Hummock Point NR. Found in tropical and subtropical areas worldwide, Ascension hosts the second largest nesting population of green turtles in the Atlantic. Ascension turtles spend most of their lives in feeding grounds off the coast of Brazil (Hays *et al.* 2002) and undertake breeding migrations to Ascension every 3-4 years (Mortimer and Carr 1987).

Turtles return to the beach where they hatched to breed as adults which results in isolation and genetic divergence between populations. Ascension green turtles are genetically distinct from other Atlantic populations (Brown et al. 1992).

Green turtles reach maturity at 17-35 years old and can live for over 70 years (Hirth 1997). Breeding occurs in coastal waters around Ascension between November and March and females come ashore to nest between November and June with a peak in March. Females lay an average of six nests within the season containing 100-120eggs. Hatchlings emerge 45-60 days after laying and make their way to the ocean.

Green turtles require beaches with at least 1m depth of sand to nest in. They are vulnerable to disturbance during nesting, making Hannay's beach a safe haven for this species. In 2024, a census was performed on this beach and recorded 166 emerging turtles. Only 27 nests were verified, making Hannay's the seventh most popular nesting beach on island. The smaller beaches of Pebbly West has 61 emergences with only 2 nests. Pebbly East had 36 emergences with 6 nests recorded. These beaches have a firmer substrate and are less favourable conditions for nesting turtles but nonetheless are protected through this NR.

Species of Hummock Point Nature Reserve

Land crab (*Johngarthia lagostoma*)

The Ascension land crab is regularly observed on the NR. This species is only found on Ascension and three small Brazilian islands in the western Atlantic (Trindade, Fernando de Noronha and Atol das Rocas) though the Ascension population is genetically distinct from the other islands. A range of colour morphs from yellow to dark purple can be found on Ascension.

Land crabs are found at their highest densities on the mid and upper slopes of Green Mountain for most of the year but are present throughout the island (Hartnoll *et al.* 2016). Land crabs spawn in several locations found within the Hummock Point NR (below). Spawning occurs around ten days after the full moon between January and May with females producing 72,000 eggs. Eggs are released into the water, developing through a number of planktonic larval phases over the course of three weeks. The final megalops larval stage emerges onto land and moults into small crabs to make their way higher in the island. Land crabs can live for between 40 and 50 years, making multiple spawning migrations in that time.

Species of Hummock Point Nature Reserve

Ascension scaly crickets (*Discophallus* spp.)

The *Discophallus* genus of scaly crickets (family: *Mogoplistidae*) are endemic to Ascension Island and likely arrived via rafting (Ashmole & Ashmole 2000; Gorochov 2009). The Ascension scaly cricket is nocturnal, growing to around 12-15mm in body length and are covered in minute translucent scales (right).

Originally believed to consist of five sister species (*D. ascension, D. amplus, D. myrtleae, D. pallidus and D. .phillipi*), the taxonomy of this genus has been called into question. An ongoing genomic analysis may determine that all other species in the genus are in fact a single species of *D. ascension.* This species and it's synonyms, following the outcome of the taxonomic assessment, have been assessed as Critically Endangered under category B1ab(iii) by the International Union for Conservation of Nature (IUCN) given their limited distributions and that much of their suitable habitat has been degraded by non-native plants and invertebrates.

The Ascension scaly crickets are generalist scavengers and research from the DPLUS135: From Pseudoscorpions to crickets: securing Ascension Island's unique invertebrates (2023) described the Hummock Point NR coastline as 'very high' in habitat quality for this species. Ascension scaly crickets are common on the North East NR to the west of this reserve so there is potential of species expansion into this site following conservation efforts.

Ascension endemic pseudoscorpions

Ascension has a renowned population of pseudoscorpions which are notably large in comparison to pseudoscorpions worldwide. Ascension's pseudoscorpion species are thought to have reached the island via phoresy, that is the process of "hitchhiking" on larger organisms (likely seabirds).

Pseudoscorpion species would naturally occupy large areas of the Ascension mainland but introduced species have greatly reduced their populations through competition. Ascension's pseudoscorpions are active nocturnal predators of invertebrates found on bird guano. Little is known of their ecology but they are most abundant along barren coastlines such as the Hummock Point NR.

Endemic Ascension scaly cricket (*Discophallus spp.*)

Ellick's pseudoscorpion (*Garypus ellickae*)

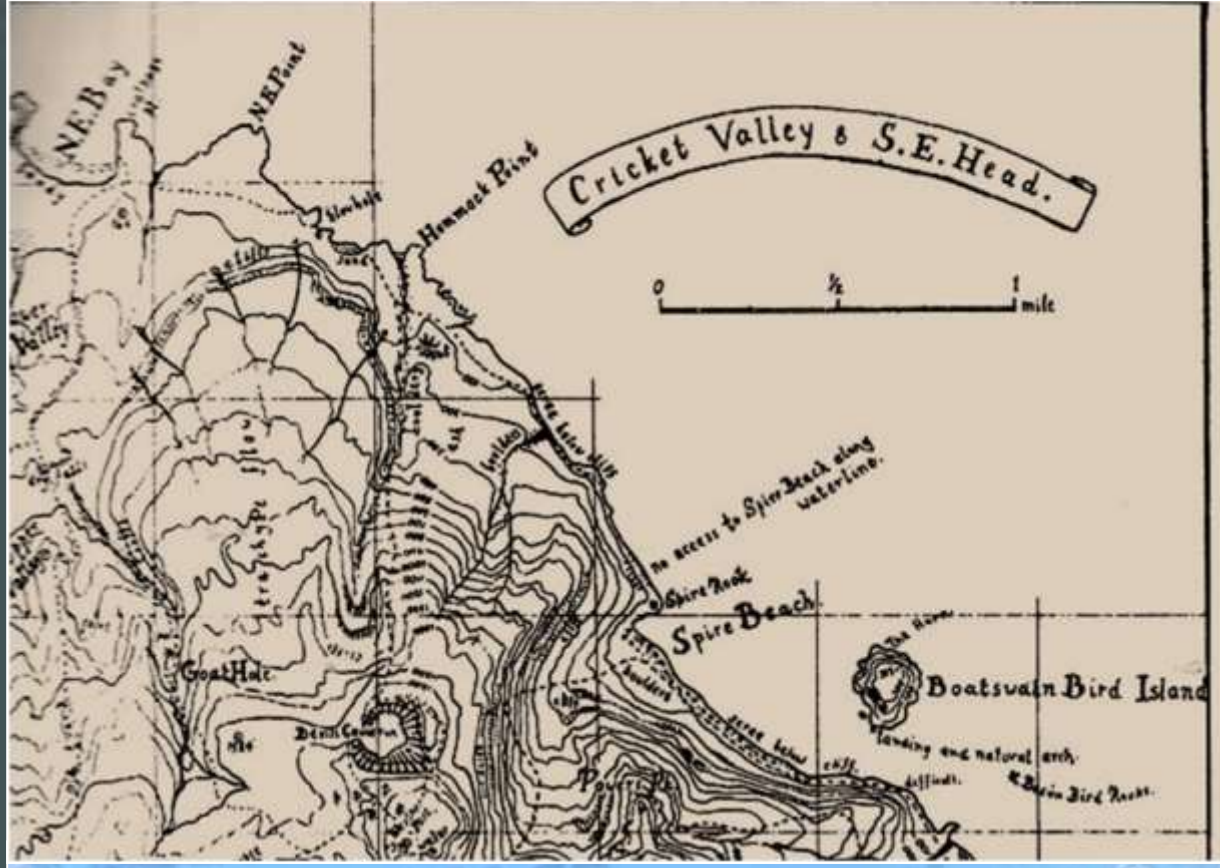
Historical and recreational use of reserve

Historical and current recreational use of the reserve

There is limited literature available on Ascension's history with most focusing on the human use of the island through it's military interest.

Much literature about this stretch of coastline focuses on the European Space Agency (ESA) Ariane Site which sits just outside the Nature Reserve Boundary and is still operational today, providing international support for launches and space exploration.

In 1968, Packer described Ascension Island in detail, producing geological drawings (right) and accumulating historical records to create a concise guide of the island. The NR has no features of human interest and thus the area was not described other than the map shown.



Hiking

Ascension Island has 42 designated walks spread across the island with hikers seeking a stamp found in a letterbox at the end of each walk as a reward. Hikers follow guidance provided through the Letterbox Walks book, last updated in 2020, with one of the toughest walks– Boatswain Bird View– traversing through the reserve.

Reserve visitors should use the designated parking outside of the Ariane site. Small cairns lead the way down a well established but narrow footpath to Hannay's beach. Across the beach, more cairns indicate the remaining path East with regular views of Boatswain Bird Island during the walk. At the end of the path is a deep gully and then there is a hard climb on compacted lava dust towards the 1000ft contour. The hike finishes along an exposed ridge which may concern vertigo sufferers but provides spectacular views of Spire Beach, the Letterbox plateau, Powers Peak and Boatswain Bird Island.

Threats to the Nature Reserve

Threats to the Hummock Point Nature Reserve

Invasive flora

A number of Invasive Non-Native Species (INNS) can be found encroaching onto the Hummock Point NR. INNS out-compete native wildlife for resources such as water, nutrients and available habitat and can also introduce diseases and support other INNS, further exacerbating the threat to native flora and fauna.

Whistling pine (***Casuarinaceae)*** is becoming a problem on the eastern side of the NR, invading Ascension spurge sites (right). Some Mexican thorn (*Neltuma juliflora),* tree tobacco (*Nicotiana glauca*) and guava (*Psidium guajava*) are also present here. A study by Chin *et al.* 2024 found that invasive vegetation facilitates the increased competitive pressure from non-native species such as rats and introduced insects.

Whistling pine*, Casuarina equisetifolia*

Whistling pine is an introduced tree with pine-like needles. This environmental engineer modifies the local ecosystem, creating a dense carpet of needles which suppresses the growth of endemic and native plants that favour an arid, rocky environment. Whistling pine also greatly alters the landscape, turning barren rocky terrain into a forested monoculture.

Mexican Thorn, *Neltuma juliflora*

Mexican thorn is identified as a major threat in Ascension's National Biodiversity Strategy and Action Plan. The pressing need to control thorn is highlighted in a specific Species Action Plan for Mexican thorn, reflecting its widespread impacts on species, habitats and landscapes. Mexican thorn is a dryland specialist, growing in arid lava and ash plains across the island. They have extensive lateral root systems (up to 30m) allowing them to survive prolonged drought by accessing the water table.

Threats to the Hummock Point NR

Introduced Fauna

A number of non–native animal species have been introduced to Ascension that are detrimental to the species found on the Hummock Point NR.

Sheep (*Ovia aries*)

Cattle, sheep and pigs were brought to the island in 1830's as part of the farming ventures on Green Mountain. The farm was finally abandoned in 1980's and sheep were allowed to roam free.

Sheep are versatile foragers and will graze on any available grasses, plants, legumes or forbs. They are found through the island and have been recorded feeding on the Ascension spurge. In 2023-2024, an electrical fence was installed around some of the Ascension spurge growing at Hummock Point NR to protect the plants from non-native grazing pressures (see below).

Rabbits

Initially introduced in 1820's to provide sport to the resident garrison, rabbits quickly established and spread around the island.

Rabbits enjoy a varied diet of fibrous grasses and other plants, preferring fresh plants over all else as they usually have a higher water content. They will graze on seeds, flowers and stems and can quickly uproot small plants.

Overgrazing is a real threat to the Ascension spurge which is already struggling to survive in marginal conditions. A site on the Hummock Point NR has been fenced off for a number of years to protect plants from rabbits and sheep (below). In 2023-2024, an electrical fence added additional support to the plants found here.

Threats to the Hummock Point NR

Introduced Fauna

A number of non–native animal species have been introduced to Ascension that are detrimental to the wildlife found on the Hummock Point NR.

Rodents:

Rodents were introduced via passing ships, sometime before 1701. Black rats (*Rattus rattus*) and house mice (*Mus musculus*) can be found throughout the island. These highly adaptable species forage on fruit, seeds, plants and will predate small animals and eggs. Rodents have a high fecundity and short generation times allowing populations to grow rapidly in favourable conditions.

Mice and rats graze on the Ascension spurge found on the Hummock Point NR (right above). They feed on the seeds, flowers and stems of the plant with their sharp teeth making light work of gnawing through this fragile plant. Regular grazing can kill the plant or stunt its growth. Rodents will also feed on turtle eggs and hatchlings, having a negative impact on the local population. Their interactions with native land crabs have been observed across the NR, they will feed on small and weak crabs, ousting them from temporary burrows which the crabs require to prevent drying out while on migration. Rodents also impact native invertebrate populations through predation as well as reducing food availability.

Non-native invertebrates

A number of non-native invertebrate species can be found across the island which are detrimental to the Ascension spurge. Ants farm aphids, mealybugs, scale and whiteflies, which damage the plant and can cause disease.

Native invertebrates are vulnerable to predation from introduced pests such as ants, scorpions and spiders. The introduced tropical house cricket (*Gryllodes sigillatus)* and American cockroach (*Periplaneta Americana)* outcompetes endemic scaly crickets, further fragmenting their populations in marginal native habitat.

Threats to the Hummock Point Nature Reserve

Climate Change

The global climate is changing at an unprecedented rate due to the increased levels of carbon dioxide in the atmosphere produced by the burning of fossil fuels. The following changes are predicted for Ascension by the end of the 21st century:

- Air temperatures will rise by between 0.7 And 2.4°C depending on global CO_2 emission reductions (Intergovernmental Panel on Climate Change)
- The ocean will become warmer and more acidic with temperatures increasing by between 0.6 And 1.4 °C and pH decreasing by between 0.006 and 0.11 depending on global CO_2 emission reductions.
- Sea levels will rise by between 0.3 and 0.6m (Intergovernmental Panel on Climate Change).
- Storm events and high swells will become more frequent and more severe

This will have a profound effect on Ascension's biodiversity if species are unable to evolve quickly enough to cope with the changing conditions.

Impacts of climate change on the Ascension spurge:

The impact of climate change on the Ascension spurge could be complex and difficult to predict. Ascension spurge evolved on the low arid environments of Ascension and requires rain to stimulate seed germination. The seeds are viable for approximately five to ten years, but climate change could result in prolonged drought conditions that exceed this period. Even small reductions in the frequency or quantity of rainfall could have significant impacts on spurge populations already growing in marginal environments and facing other threats such as non-native pests.

Conversely, climate change may increase the frequency of storms and rainfall. The Ascension spurge undergoes a cyclical boom following heavy winter rains (normally every 5 years). An increase in annual rainfall as a result of climate change may allow this species to thrive, allowing seed dispersal to other suitable habitat.

Threats to the Hummock Point Nature Reserve

Impacts of climate change on Ascension endemic invertebrates:

The preferred habitat of the Ascension scaly cricket is a marginal strip along the South Coast where they have access to their preferred diet of fish and crabs. Increases in storms may affected the food availability for this species and may inundated this fragile habitat.

Impacts of climate change on land crabs:

Land crabs will be at increased risk of desiccation if air temperatures rise. Any alteration to the pattern of ocean currents around the island that could reduce larval retention and recruitment rates.

Impacts of climate change on the beach habitat and green turtle populations:

Rising sea levels and increased storm events will result in a loss of beach habitat, especially if there are barriers to the beaches migrating landward such as the steep cliffs at the back of Hannay's Beach. This will reduce the available habitat for nesting turtles and endemic invertebrates.

Hannay's Beach is predominantly made from shell sand. Ocean acidification will reduce the survival of shelled animals and over time reduce the material available to create beaches.

Green turtle populations are vulnerable to increases in air temperature. The sex of hatchlings is determined by temperature and if nests are above 28.7°C in the middle third of the incubation period, then all hatchlings will be female (Tilley *et al.* 2019). The sex ratio of Ascension hatchlings is already thought to be 90% female and this will rise as temperatures increase (Tilley *et al.* 2019). Above 35°C there is significant egg and hatchling mortality (Howard *et al.* 2014). Increased swells and storm events will also result in higher incidences of nest wash out.

Threats to the Hummock Point Nature Reserve

Litter

Oceanic currents wash driftwood, plastic and other waste onto the shores of the Hummock Point NR where it accumulates on the lower shores, particularly around Pebbly East beach (right).

Green turtles are particularly sensitive to beach conditions. Encountering anthropogenic litter on beaches while digging nests may cause them to abandon the nesting attempt, wasting significant energy for the animal.

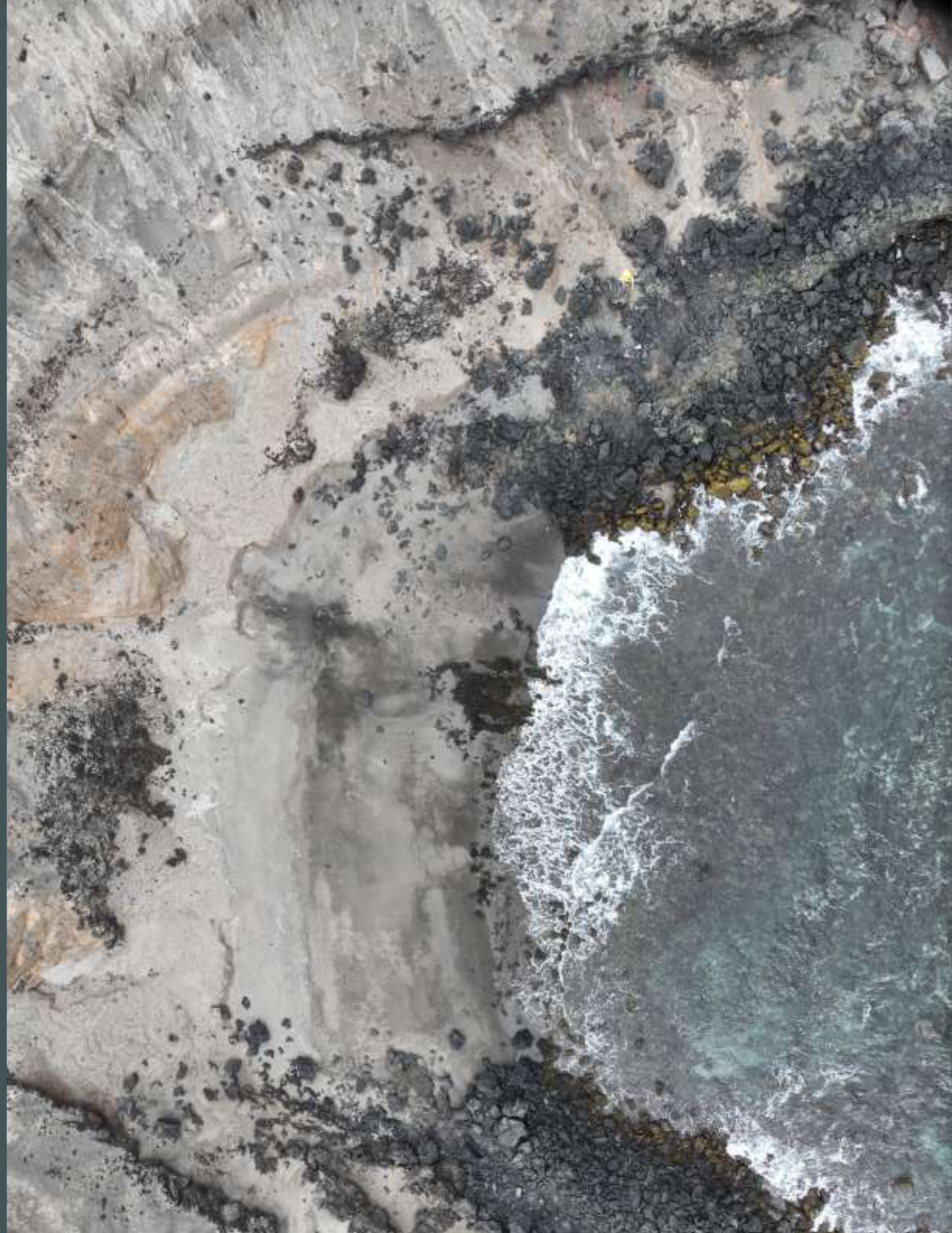
An analysis of the litter in 2022-2023 showed that most items originated from afar. Fishing equipment and fresh plastic bottles which are not used locally suggests the litter originates from large-scale fishing vessels which are not permitted within 200NM of the island.

Litter also provides habitat and refuge for invasive rats and reduces the aesthetic value of this coastline.

Trampling

Ascension spurge and sedge plants, particularly young seedlings, are vulnerable to being tread on if reserve visitors stray from the beaten tracks. The plants can be well camouflaged in the arid lava flows, growing between rocks which makes them difficult for hikers to spot.

Introduced sheep also cause significant damage through treading on these fragile plants. Even minor crushing can cause plant death as the individuals struggle to cope with other environmental challenges.



Legislation

Legislation and Policy

The designation and management of Nature Reserves is an important part of Ascension's approach to protecting its biodiversity and meeting its commitments under international agreements and strategies.

International agreements and strategies

The Convention on Biological Diversity (CBD) has been extended to Ascension and provides the overarching context for biodiversity protection on the island. Target 3 of the CBD Post-2020 Global Biodiversity Framework reads:

Ensure and enable that by 2030 at least 30 per cent of terrestrial, inland water, and of coastal and marine areas, especially areas of particular importance for biodiversity and ecosystem functions and services, are effectively conserved and managed through ecologically representative, well-connected and equitably governed systems of protected areas and other effective area-based conservation measures, recognizing indigenous and traditional territories, where applicable, and integrated into wider landscapes, seascapes and the ocean, while ensuring that any sustainable use, where appropriate in such areas, is fully consistent with conservation outcomes, recognizing and respecting the rights of indigenous peoples and local communities, including over their traditional territories.

The need for well-managed area-based protection is also a foundation of the UK Overseas Territories Biodiversity Strategy and fulfills Ascension's obligations to protect habitats and species under the Ascension Environmental Charter signed in 2001. The Hummock Point Nature Reserve forms part of a network of protected areas on Ascension. Local legislation provides the legal basis for the establishment and management of the Nature Reserves.

Ascension protected areas legislation

The National Protected Areas (Amendment) Ordinance, 2025 provides the Governor with powers to designate Nature Reserves 'protecting native biodiversity and the habitats, ecosystems and natural processes that support it.' It also limits the type of development that can be permitted within a Nature Reserve and allows the restriction of activities that could be harmful to a Nature Reserve. The Ordinance also provides powers to introduce regulations to protect Nature Reserves and to appoint Reserve Wardens to enforce these regulations.

The Hummock Point NR was designated in Feb 2025 under the National Protected Areas (Amendment) Order, 2025. The boundary is shown on page 5 of this management plan.

The National Protected Areas (Amendment) Regulations, 2025, prohibits a list of potentially harmful activities on the Nature Reserve without prior permission from the Administrator or Reserve Warden (see overleaf). They also provide powers for the Administrator to close all or part of a nature reserve for the purposes of management, wildlife protection or public safety.

Other relevant Ascension legislation

Under the Wildlife Protection Ordinance, 2013, it is an offence to willfully take, kill, trade or molest any of 40 species listed in the ordinance. The Ascension spurge, green turtles and land crabs are listed in the ordinance alongside several invertebrates which are found on the Hummock Point NR.

The Biosecurity Ordinance, 2020 introduced import control measures and powers to inspect and treat cargo, vessels and aircraft arriving on Ascension with the aim of reducing the likelihood of introducing new non-native species to the island. This is particularly important with respect to invasive invertebrates.

The Ascension Island Marine Protected Area was designated in 2019 under the National Protected Areas Ordinance. The MPA covers 100% of Ascension's Exclusive Economic Zone (EEZ), an area of over 445,000km^2. Within the MPA, large-scale commercial fishing and mineral extraction is prohibited. The MPA protects the inshore marine environment along the coastal edges of the reserve to the high tide mark.

The National Protected Areas Regulations

All or any of the following are prohibited within Hummock Point Nature Reserve if done without the prior permission of the Administrator or Reserve Warden:

- any development;
- the improving or altering of any existing structure;
- the removal of sand, soil or rock;
- the intentional or reckless disturbance to, or damage or injury to, any protected species;
- the dumping of refuse, chemicals, abandoned vehicles, scrap metal, mining spoils, toxic or other wastes, bilges, oil and other petroleum products, pesticides and other items harmful to animals or plants, or unsightly items;
- the driving or riding of motor vehicles other than on a designated road or track
- parking a vehicle, except in a signed parking zone;
- the making of fires without a permit other than in a portable stove or grill, or in designated fire pits;
- playing any musical instrument, radio, sound system, television or other item which produces or reproduces music, to the annoyance of other persons;
- the use or possession by any person, other than a Warden acting in the course of his or her duties, of any type of firearm, air gun, cross bow, bow and arrow or slingshot;
- the occupation of beach huts after 9:00p.m. during turtle season;
- the lighting of beach huts after 9:00p.m. during turtle season;
- allowing of unaccompanied dogs;
- allowing dogs off their leash between sunset and sunrise;
- the driving or parking of any motor vehicle on the beach;
- water skiing and the operating of jet skis during turtle season;
- pitching or erecting any tent on the beach during turtle season;
- camping, except in a designated campsite
- the installation of artificial lighting fixtures that are directly visible from the beach, or which indirectly illuminate the beach.

Implementation policy

The restrictions are designed to prevent activities that might harm the natural features of the Nature Reserve or reduce people's enjoyment of the areas. There is a presumption against these activities taking place in the Nature Reserve, but the Administrator and Reserve Warden have discretion to permit them on a case by case basis. When deciding whether to permit an activity, the Administrator or Reserve Warden must consult the Director of Conservation and Fisheries and will consider the following:

- Whether an activity is consistent with the objectives of this management plan. The onus will be on the person proposing the activity to demonstrate that it will not conflict with the objectives. Activities that would have a significant negative impact on the Nature Reserve objectives will not be permitted.
- Whether the activity will have a significant and/or long-term impact on the natural features of the Nature Reserve. Activities that would have a significant or long-term impact on the natural features of the Nature Reserve will not be permitted. Decisions of this nature must be referred to the Administrator and cannot be made by a Reserve Warden.
- Whether the activity is necessary for the island's military mission or critical functions. Such activities can be permitted if all other alternatives have been exhausted and all available mitigations have been put in place. Decisions of this nature must be referred to the Administrator and cannot be made by a Reserve Warden.
- Where there is doubt or lack of evidence about an activity's impact, the precautionary principle will be applied and the activity will not be permitted.
- Restrictions on public access to the Nature Reserve will only be authorised by the Administrator where it is necessary to prevent the risk of significant disturbance or trampling of the natural features or where there is a risk to public safety. Restrictions will be in place for the shortest time period and over the minimum area possible.

Enforcement

Education and awareness raising are the preferred methods to ensure compliance, and proportionate enforcement action will only be taken when this approach has been exhausted. The maximum penalty for an offence under the National Protected Areas Ordinance or Regulations is a fine of £20,000 or imprisonment for 12 months. All warranted Reserve Wardens, Fishery Protection Officers and Police Officers are able to take enforcement action.

Action Plan

Action plan

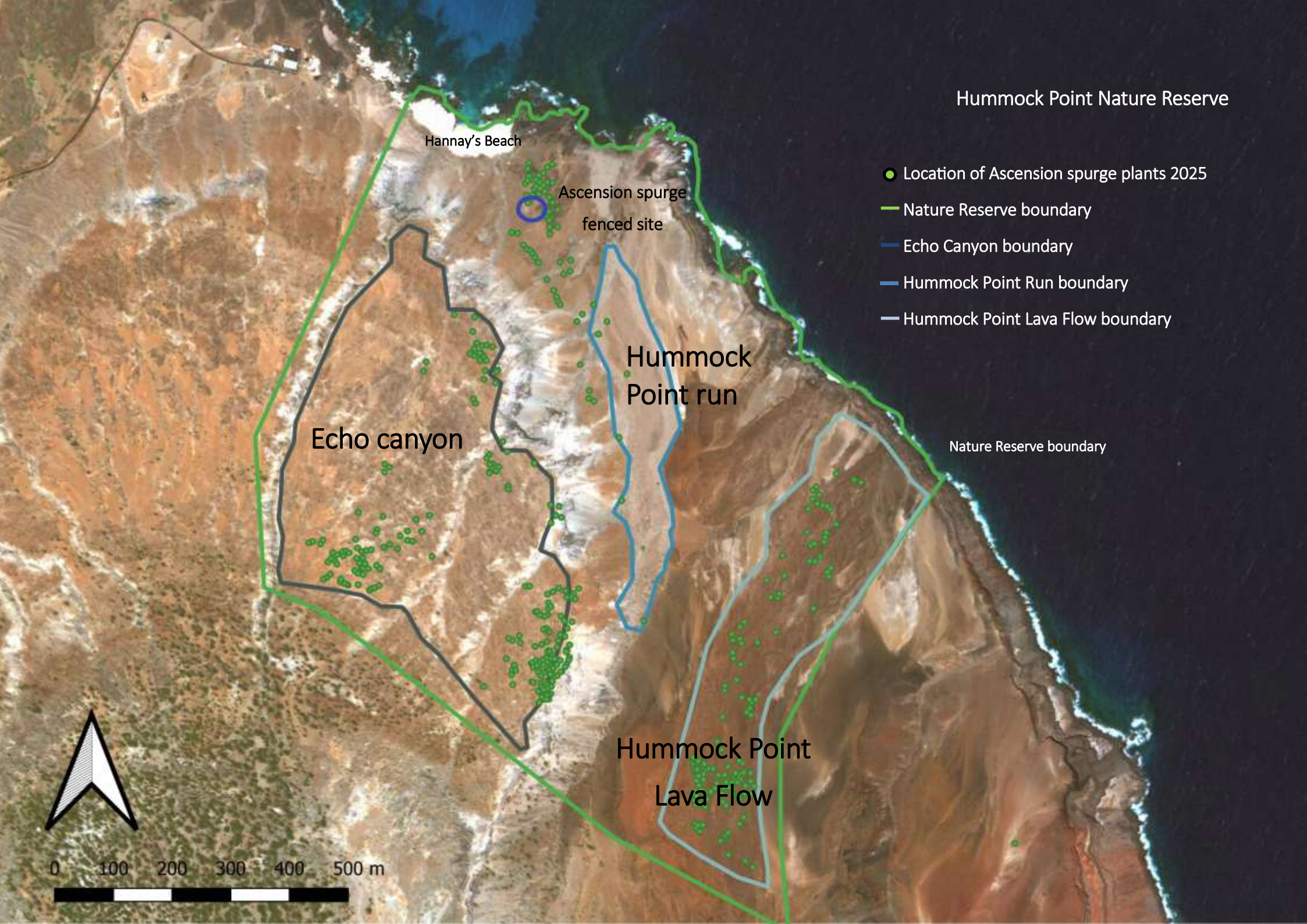
The following section describes a number of actions to be achieved in the next five years. Actions are prioritised (High, Medium or Low) according to the positive changes they will make to the reserve and its protected species. Actions are arranged according to the threats which they address. Each is numbered for identification with clear targets and suggested timeframes to measure success.

1. Conservation of the Ascension spurge

	Description	Targets	Priority
1a	Maintain fenced sites in the NR to prevent extinction of the Hummock Point population from grazing pressures.	Self sustaining wild population of Ascension spurge in the Hummock Point NR	HIGH PRIORITY Ongoing
1b	Control the pest invertebrates found on Ascension spurge within fenced sites. This involves examining individual plants and treating with a species specific insecticide. Individual pests may be carefully removed and killed on site. During periods of high mealy bug infestation, station ant bait traps strategically around the Ascension spurge sites.	Reduce plant death caused by non-native invertebrates	HIGH PRIORITY Ongoing
1c	Maintain a viable stock of cultivated plants at Kew and on Ascension Island. Each nursery should hold 120 plants, 30 specimens from each sub-population. These will provide a potential source for restoration work.	30 Hummock Point spurge plants held in a nursery on Ascension Island. 30 Hummock Point plants at Kew	HIGH PRIORITY Ongoing
1d	Maintain a viable, ex-situ seed bank at Kew's Millennium Seed Bank and on Ascension Island. Collect, clean, dry and bank seed from all wild Ascension spurge populations.	Viable seed bank of Hummock Point spurge kept on island and at Kew	HIGH PRIORITY Ongoing
1e	Ensure all island organisations are familiar with and adhere to strict biosecurity control measures. All importations should be suitably cleaned and treated to prevent entry of non-native flora and fauna. All non-native species should be destroyed on entry to the island to prevent colonisation.	No new established populations of non-native species	HIGH PRIORITY Ongoing

2. Invasive species control

	Description	Targets	Priority
2a	Trial electrical fence to control predator access (sheep, rabbits and rats) to the Ascension spurge. (DPL002). Maintain the fencing as required.	Self sustaining wild population of Ascension spurge in the Hummock	HIGH PRIORITY Ongoing
2b	During times of excessive rodent predation, distribute bait in stations and traps around Ascension spurge fenced sites.	No signs of Ascension spurge death as a result of over-grazing from rodents	HIGH PRIORITY When required
2c	Remove encroaching whistling pine and other invasive species from the Hummock Point lava flow (see overleaf)	No mature whistling pine in lava flow	HIGH PRIORITY Completed by Year 5
2d	Monitor the Echo Canyon (see overleaf) area for new recruits of whistling pine. Visit previously marked trees to check for regrowth. Where necessary, cut and treat with herbicide mix. All saplings removed.	Echo canyon area clear of whistling pine	HIGH PRIORITY Annually
2e	Treatment of mature Mexican thorn in the critical Ascension spurge habitat within the NR (see overleaf, green dots highlight spurge plants recorded in Sept 2024)	No Mexican thorn in NR	HIGH PRIORITY Completed by Year 5
2f	Removal of tree tobacco in the Echo Canyon section of the NR (see overleaf)	No tree tobacco in Echo Canyon area of NR	HIGH PRIORITY Completed by Year 5
2g	Removal of all invasive flora encroaching onto Hannay's Beach	No invasive flora on Hannay's Beach	HIGH PRIORITY Annually


Hummock Point Nature Reserve
Hannay's Beach
Ascension spurge
fenced site
Location of Ascension spurge plants 2025
Nature Reserve boundary
Echo Canyon boundary
Hummock Point Run boundary
Hummock Point Lava Flow boundary
Hummock
Point run
Echo canyon
Nature Reserve boundary
Hummock Point
Lava Flow
0 100 200 300 400 500 m

3. Public engagement

	Description	Targets	Priority
3a	Create videos, posters, islander articles and social media posts regarding the Hummock Point NR and the ecosystems found there.	Minimum of 10 items on social media regarding Hummock Point NR	HIGH PRIORITY Annually
3b	Develop wildlife watching guidelines for visitors to the protected areas to minimise disturbance.	Wildlife watching guidelines created and distributed. Guidelines made available on government website for visitors to the area.	HIGH PRIORITY Completed by year 2
3c	Improved signage on the reserve.	New welcome sign ordered and erected as soon as possible.	MEDIUM PRIORITY Year 1
3d	Volunteer opportunities with AIGCFD within NR.	Minimum of 10 people engaged.	HIGH PRIORITY Annually
3e	Beach clean to remove litter	Minimum of 10 people engaged	HIGH PRIORITY Annually

Monitoring and research

Monitoring and research

To assess the success of the Nature Reserve and the species found there are being protected, regular species monitoring will take place. This monitoring will ensure that management actions set in this document are accomplished and that they make a positive contribution towards environmental protection through achieving the Management Plan objectives (page 6).

Monitoring will be assessed in two approaches:

1. Monitoring Management Plan actions - Have management actions been completed and outputs achieved?
2. Performance Monitoring —are the Management Plan objectives being achieved?

Separating these types of monitoring will allow a distinction to be drawn between a) missing objectives because actions were not carried out properly or b) actions were completed, but were insufficient to achieve the objectives. This will guide future management responses, determining if more effort is required to deliver planned actions or if new actions need to be established. These will be reviewed annually by AIGCFD .

Each monitoring and research action in the proceeding pages is linked to the Management Plan objectives using the objective icons. A brief description of what is monitored , methodology and target is provided. Monitoring will be delivered by the AIGCFD alongside volunteers and external partners.

	Monitoring	Details	Objective	
A	Biannual Ascension spurge census	Census of Ascension spurge population in differing seasons (March and September). Record size of plant and mature: seedling ratio.		• Understand the health of the local spurge population. • Uncover annual trends in the species population.
B	Estimate the number of turtles nesting on Hannay's beach.	Every five years as part of the island-wide census, rake the beach clear of turtle tracks and count fresh tracks the following morning throughout the entire turtle nesting season.		• Record number of emerging green turtle females on the NR. • Record the number of nesting attempts on the NR. • Understand the health of Ascension's nesting turtle population.

	Research	Details	Objective	
A	Climate change impacts on native land crabs	Scientific modelling on particle tracking scenarios to understand the distribution of larvae during the first 3 weeks after spawning.		• Understand how changing currents may impact the distribution of land crab larvae and the potential impacts this may have on population recruitment.
B	Understand the distribution of the Ascension endemic scaly cricket	AIGCFD will perform invertebrate surveys on the Hummock Point coastline to determine if the species may be found there.		• Understand the complete distribution of this endemic species.

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