

Tackling the problem of feral livestock on Montserrat

Invasive species have had a devastating impact on island biodiversity around the world and are one of the main drivers of species extinction on islands. In the Caribbean, pigs and feral grazing animals such as goats, sheep and cattle pose a severe threat to island environments of which Montserrat is one such island. Feral livestock numbers have risen sharply since the volcanic eruptions of 1996/97 which destroyed an estimated 60% of Montserrat's natural forest cover. This is due in part to the release of livestock following the evacuation of the southern part of the island, along with the common practice of keeping loose livestock from which many animals are recruited annually to feral populations. The **Centre Hills**, a designated Important Bird Area, contains the majority of Montserrat's remaining forest and is the last viable enclave for the Critically Endangered **Montserrat Oriole** *Icterus oberi* as well as several other restricted range species of the Lesser Antillean Endemic Bird Area, including the Vulnerable **Forest Thrush** *Turdus lherminieri*. In addition they are home to a host of other endemic and threatened species, including the world's second largest frog the mountain chicken *Leptodactylus fallax* (CR) and Montserrat galliwasp *Diploglossus montisserrati* (CR). Previous projects have identified the threat posed by feral livestock to Montserrat's natural environment and in particular the Centre Hills. In an ecosystem that has evolved in the absence of mammalian herbivores large numbers of goats, sheep and cattle predate many native plants, reduce forest regeneration rates and exacerbate soil erosion on the mountainous terrain. This includes destruction of the native *Heliconia caribea* which is the preferred nesting plant for the Montserrat Oriole. Pigs are especially destructive in rooting up vegetation and predated on many native species including endangered sea turtle eggs and hatchlings. In addition, an increasing feral livestock population is expected to have socio-economic impacts, for example through the transmission of livestock diseases; to pose a threat to people from attacks and traffic collisions; and to contribute to pollution of watercourses.



Pigs rooting up turtle nests on Rendezvous beach (DOE, Montserrat)

Since July 2009 the Government of Montserrat has been assessing feral livestock activity in and around the Centre Hills by means of a network of infra-red game cameras. These have identified areas of high activity in order to guide a management strategy incorporating both control using locally trained hunters and improved livestock rearing, tagging and registration schemes. The camera network is currently being used to assess the effectiveness of these measures. A final project workshop in March 2011 aims to finalise a plan for the management of feral livestock, not only for Montserrat but for the Caribbean region as a whole. The project entitled 'Reducing the impact of feral livestock in and around the Centre Hills' is supported by the UK Government and funded through the Darwin Initiative. Author: Jeff Dawson, Project Coordinator; Department of Environment; Ministry of Agriculture, Lands, Housing & Environment; Montserrat