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‘Nature in League with Man’: Conceptualising and Transforming the Natural World in Eighteenth-Century Scandinavia

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ABSTRACT

This article examines a series of projects and discussions, among the Enlightenment elite in the Danish kingdom, about the need for technological improvement and agricultural reform in Iceland, a distant province of the Danish state in the eighteenth century. One of the most important of these projects was the importation of reindeer from northern Norway to Iceland in the latter half of the eighteenth century, in response to famine conditions and plagues that had decimated the sheep population on the island. These projects and the language that their instigators and supporters used show that the Enlightenment elite sought to re-define Icelandic and Northern nature, reclaim a territory that had been historically viewed as a wilderness, and remodel it into a well-regulated and homogeneous part of the state. Their vision of nature in the North Atlantic was a radical break with previous traditions of describing nature in Iceland and one of the first times that Icelanders sought to establish themselves as authorities about conditions in their country.

KEYWORDS

Enlightenment, Iceland, reindeer, animal husbandry, Denmark

In 1808, the chief Justice of Iceland and one of the leading men of the Icelandic Enlightenment, Magnús Stephensen, published a book in Danish called *Iceland in the Eighteenth Century* (Figures 1 and 2). Here, Stephensen summarised the main events of the political and natural history of the island for the preceding 100 years. Despite his optimistic views and plans for the future of his country,



FIGURE 1. Chief Justice of Iceland Magnús Stephensen in 1808, when he was 46 years old. Reproduced by permission of Myndstef (Visual Art Copyright Association) Iceland.

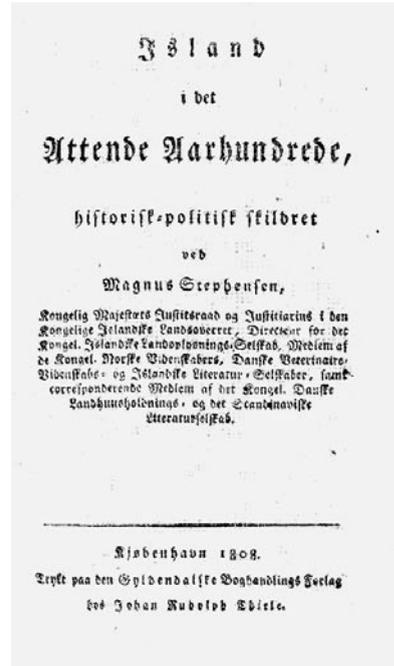


FIGURE 2. The title page of Stephensen's history of eighteenth-century Iceland, which appeared in its Danish edition in 1808. Reproduced by permission of Myndstef.

clearly inspired by the classic Enlightenment faith in progress and possibilities that marked European intellectual life at the end of the eighteenth century, Stephensen found himself obliged in his history to devote many pages to the story of a century marked by natural disasters and economic miscalculations, by volcanic eruptions, earthquakes, famine, plague among the sheep, exceptionally cold winters, fishing boats that were falling into ruin, poorly managed agriculture and animal husbandry. The general impression that the reader of *Iceland in the Eighteenth Century* receives, in fact, is one of conscientious and loyal civil servants struggling tirelessly in a remote province against almost insurmountable odds – the twin forces of nature's cruelty and the recalcitrance of the Icelandic peasantry.¹

In his concern for the state of Iceland at the close of the eighteenth century, Stephensen was certainly not alone, although his account was an exceptionally lengthy and detailed one: themes of disasters and stifled progress permeate the

literature on early-modern Iceland, and these discussions run through many different kinds of texts. Not only in histories, but also in treatises on improvements and applications for entrepreneurial ventures by Danish officials, travelogues by foreign visitors, natural histories written by both natives and foreigners, eighteenth-century Iceland was often portrayed in terms of its deficiencies. In this respect, Stephensen was simply one member of a group of prominent officials, including Hans Christian Bech, one of the directors of Iceland's Danish-owned monopoly trading company; Niels Horrebow, a Danish natural historian sent by the king to write a natural history of the island; and Skúli Magnússon, one of the most active of the eighteenth-century Icelandic agricultural reforming officials, and the first Icelander to assume the post of *landfógeti* (bailiff) within the Danish state bureaucracy of Iceland. These men, members of the elite of the Icelandic-Danish milieu travelling between Reykjavík (which only received a charter as market town from the Danish government in 1786 and had a population of less than 200 at the time) and Copenhagen, found themselves presented with a serious dilemma in the later half of the 1700s. How could they reconcile their Enlightenment-inspired beliefs in human mastery over nature with the intractability of nature in the North Atlantic? How could economic conditions in Iceland – a distant corner of the Danish kingdom since 1380 – be brought to the standards enjoyed in the other provinces of the state?²

Many officials in the Danish service bureaucracy in eighteenth-century Iceland were raised on the island and were familiar from early childhood with the problems besetting Icelandic agriculture and fisheries. By the end of the eighteenth century, the Icelandic population had fallen to its lowest point ever – 38,000, even fewer than had lived there during the island's settlement period in the ninth century. (For purposes of comparison, slightly more than a quarter of a million people live in Iceland today.) The causes for the decline were numerous: there were enormous volcanic eruptions in 1783–84, resulting in the death of 70 percent of the sheep and the destruction of the island's off-shore and inland fisheries, both from fluorine poisoning and the thick layers of ash which covered the grazing land. These volcanic eruptions had been preceded by years of cold winters, famine, a smallpox epidemic, and a plague among the sheep in mid-century. By 1808, when Stephensen's book appeared in Copenhagen, both farming and fishing – the traditional twin pillars upon which Iceland's economy was built – had suffered considerable losses.³ Writing about 100 years after Magnús Stephensen, another Icelandic historian, Jón Stefánsson, commented that during the eighteenth century, 'Nature seemed in league with man to render Iceland uninhabitable'.⁴

But reading the voluminous literature produced by this group of officials, one can not help but be impressed by the proliferation of projects and the creativity of ideas for improving Iceland's economy. Although resources may have been lacking in eighteenth-century Iceland, there was no shortage of commitment on the part of the Danish government nor lack of state investment in the provinces.⁵

Hans Christian Bech, for example, suggested that conditions could improve if only the Icelanders could be persuaded to visit other countries and find out how things were done there, or if people from other regions could be persuaded to come to Iceland. The regions that Bech had in mind – where people understood how to salt meat and fish for preservation, how to spin hemp for fishing lines, and how to cultivate potatoes – were Norway, the Jutland peninsula, and the Shetland Islands. All of the places to which Bech referred in his essay were other provinces of the eighteenth-century Danish kingdom, except for the Shetland Islands. These were formerly part of the Danish state, but had been annexed by Scotland in 1472 as part of an unpaid royal dowry from Christian I to James III upon the marriage of Christian's daughter, Princess Margaret, to James. Thus, Bech suggested looking within the historic Danish kingdom itself for models of economic well-being for the Icelanders to emulate. This was a clever and politically sage move on his part. It placed the focus of concern for Iceland's condition on the island itself, its inhabitants and its nature, and not with Danish management. Furthermore, it also pointed to solutions already existing, put into place elsewhere within the Danish state, and not requiring innovations or foreign importations.⁶

Other officials also saw the potential attraction and advantages of such an approach. For example, the idea of transforming Iceland into a 'second Norway' was quite powerful and appealing to the Danish administration. This metaphor was used successfully by Skúli Magnússon when he applied for funds in 1752 to establish the 'Nye Innretninger' – a joint-stock company that founded the first textiles factory in Iceland. With his eye turned towards tactically advantageous political rhetoric, Skúli claimed in his application to the Danish crown:

although the country is poorer and less productive than other countries ... this [application] is an accurate description of the condition of the country, wherein it can be seen, that the country does not lack the products and requirements to make its inhabitants happy, or its monarch the lord of a great country, which could become another Norway ... the prevailing poverty could be improved by procuring the means so that the country's potential could be used better than it has been, by establishing manufacturing, in order to increase the country's natural products, and finally by giving the country the profit of its produce and wares, as the other provinces and territories of the monarchy enjoy, with free and voluntary trade.⁷

The prospect of transforming Iceland in this way must have appealed to the Danish king and council; Skúli received more money for his project than he had asked for, and the company was launched the following year with the investment and participation of most of the leading men of eighteenth-century Iceland, including the most wealthy landholders and church officials. Clearly, the *landfógti* had shaped his rhetoric well to his audience.

Bech, Skúli, and Magnús Stephenson aimed their treatises, applications, and histories towards the class of Danish administrative officials, the responsible

parties who could bring the condition of Iceland up to the standards enjoyed in other parts of the kingdom. According to the model of enlightened cameralism, the dominant political-economic system of central and northern Europe in the eighteenth century, education should be directed from the centre of the kingdom to the provinces and from the top down. The Danish state had a responsibility to provide education and resources; the Icelanders themselves had a responsibility to utilise them – and much frustration was expressed by officials about the difficulties and stubbornness of the natives in this respect. But what models of ‘improvement’ should be recommended to Icelanders? What was Iceland like and what could Icelandic nature become? The models that reformers like Bech, Skúli, and Magnús recommended to improve impoverished eighteenth-century Iceland spoke volumes about what kind of place they considered Iceland to be, and what sort of nature they thought could be found there. Although their plans did not involve large numbers of people, and they worked in marginalised and scantily-populated regions of Europe, the implications of their projects for the state were far-reaching. By assuming that there was a single, relatively homogeneous ‘Northern nature’, of which Iceland was simply a part, civil authorities rendered all of the northern dependencies of the Danish state manageable. The eighteenth-century reforming projects had at best mixed results, but the idea behind them – to regulate and manage Icelandic nature and to transform a marginalised, wild frontier into a normal and ordinary province of the state – became the dominant mode of writing about Iceland, and the other provinces of the kingdom, by the end of the eighteenth century.

These improvement projects and the new way of writing natural histories that emerged in the eighteenth century constituted a sharp break with previous traditions of writing about Iceland and the other northernmost provinces of the Danish state. At the same time that treatises on agricultural and other reforms of the island’s economy were written, a new theme in the natural histories of Iceland emerged. Starting in the mid-eighteenth century, natural historians began to argue that Iceland’s nature was unlike the claims of previous accounts. Rather than being an ungovernable wilderness of ‘fire and ice’, inhabited by monsters and savages, as medieval and Renaissance sailors’ stories had claimed, the island was not in fact very different from the neighbouring provinces of the kingdom – Norway, Greenland, or the Faeroe Islands. In this essay, I trace the development of this new conception of Northern nature in natural histories to the same milieu and intellectual influences that spurred the agricultural reformers. Both groups of writers – who frequently belonged to the same social circles and literary clubs – had, I argue, a common image of Iceland and a desire to establish their image as a definitive break with the past. In the context of investigations of state power and the role of states in shaping the natural landscape, it is worth tracing how and why such a change was brought about. Whose interests were served, and what were the resulting arrangements of power?⁸

MANAGING THE STATE AND NATURE IN EIGHTEENTH AND NINETEENTH-CENTURY EUROPE

Turning to another example of an eighteenth-century cameralist Scandinavian state, Lisbet Koerner has argued that Linnaeus's concerns with political economy and Sweden's negative trade balance underpinned his scientific programme. Ordering the natural world was but a first step towards managing it for the benefit of the country. For Linnaeus, knowledge of natural history 'guarded the nation against both foreign dominance and indigenous barbarism'.⁹ If Swedish scientists could apply their botanical knowledge to useful projects, such as the elaborate plans for cultivating tea in Sweden designed by Linnaeus, then not only would the state of botanical knowledge improve, but so would the economy of a nation no longer dependent on foreign imports. In his experiments, Linnaeus proposed that plants could be transferred between the tropical and temperate zones, and that it would be possible to grow tropical plants in Sweden by acclimatising them in gradual moves and by using greenhouses. As his efforts over the tea plants failed repeatedly throughout the 1740s and 1750s, he lost faith in this belief, finally concluding that plants are native to specific climates. But the failure of Linnaeus's experiments did not mean that the scientific community abandoned the principle of acclimatisation. Michael A. Osborne has argued that the acclimatisation of plants and animals was an important element of the ideology of French colonialism in the nineteenth century. The projects of the *Société zoologique d'acclimatation* to raise alpacas, silkworms, and llamas in France were conceived both as evidence of the expanse of power of the French Empire and as solutions to economic needs of the country for new resources and products. The directors of the Society, Isidore and Geoffroy Saint-Hilaire, drew upon the theories of the Comte de Buffon and Jean-Baptiste Lamarck about adaptation of living form according to the demands of the environment, and contested George Cuvier's belief in the 'fixity' of species. According to Lamarck, species could change in response to newly established conditions, which gave rise to new needs. These needs in turn stimulated the creation of new behaviours and structures, which turned the animal away from its original path towards perfection of its form. The directors of the French acclimatisation society (who were father and son) modified Lamarck's ideas of a drive towards perfection and deviation from that path. Instead, Isidore Saint-Hilaire believed that an idealised type of a species acted as a 'common centre' around which variation of the species 'played'. This became known as the 'limited-variability-of-type' theory: species could be 'pushed' to adapt to local climates just enough in one direction or another to allow for silk to be spun in Paris instead of China.¹⁰

By comparison to Linnaeus's plans and the French visions of empire, Danish projects in their North Atlantic provinces can be described as modest, and driven by practical considerations in response to specific environmental and economic considerations rather than theories about biological form and devel-

opments. Danes did not pursue such elaborate schemes as trying to grow sugar cane or raise yaks in Copenhagen. Clearly, however, the activities and projects of natural historians and administrators in the Danish kingdom demonstrate that they shared a belief in climatic zones and the importance of climate in determining the characteristics of plants and animals. As in other regions, these ideas had economic as well as scientific implications. For example, reindeer were moved from northern Norway (from the northernmost province of Finnmark) to Iceland in the eighteenth century in response to famine conditions on the island. Sheep were also brought from the British Isles after a plague decimated the Icelandic flocks in the mid-eighteenth century – sheep that were unfortunately susceptible to illness just like the Icelandic variety. There was no actual 'acclimatisation' practice behind these projects, merely a theory of climate. Their promoters seem to have assumed that these animals already belonged in the same climatic zone, and therefore it was possible to relocate them without any sort of acclimatisation. By having such a broad conception of the extent of this Northern climatic zone, however, the projects tended to elide substantial differences in environment and climate within this zone – failing to recognise, for example, that the marshlands of Jutland might support different crops than the volcanic, acid soil of Iceland.

European theories of the centrality of climate in determining biological form and function even extended as far as people, as the nineteenth-century discussions about the ability of white colonial officials to survive in the tropical colonies indicates. For example, during Danish settlement in Greenland in the early eighteenth century, the 1729 land commission proposed that Icelanders would make the best settlers since they were already accustomed to the climate and the way of life there. Although there had been two Viking-Age Icelandic settlements in Greenland around 985 which perished several centuries later, the notion of moving eighteenth-century Icelanders to Greenland glossed over the differences between the settled agricultural practices of the Icelanders and the nomadic hunting lifestyle of the Inuit of Greenland. From the point of view of the Danish administration, however, both Icelanders and Greenlanders were people who lived in the coldest, wildest, and most remote parts of the kingdom, and therefore they must be similar in character. The author of this suggestion is believed to have been Hans Egede, a Lutheran minister who laboured for many years towards the Danish 're-colonisation' of Greenland and the conversion of the Inuit. Probably the administrators on the 1729 commission also assumed that the Icelanders could provide a link between the Danes and Inuit by teaching the Inuit European agricultural practices. A list of 166 Icelanders willing to immigrate to Greenland was drawn up, and preparations were made to supply them with building materials at Napisene. Before the arrival of the new colonialists, however, Dutch traders, who wanted to prevent further Danish footholds on the island, destroyed the buildings and the attempt was given up. In 1731, the Danish king gave instructions to abandon the attempt to settle Greenland, so many of the

supporting officials left, although Egede and his family exercised their option to remain. Ultimately, the Danish colonies in Greenland proved to be more stable after the establishment of the royal monopoly of Greenlandic trade in 1774 (Den konglige grønlandske Handel) improved their economic position.¹¹

There were other population relocation projects within the Danish state: following the volcanic eruptions in Iceland in 1783–4, some officials considered moving Icelanders from their island – which had clearly proved to be uninhabitable from the point of view of Copenhagen – to barren and wild Jutland, another marginal region of the Danish kingdom. This move would also have alleviated the problem of the eighteenth-century depopulation of the Jutland peninsula, where the landscape was also being dramatically altered by sand storms and soil erosion.¹² Only 800 people made plans to move, but the 1785 land commission on Iceland rejected the proposal as being unlikely to recoup the cost of resettlement, and this project was also never realised.¹³ Another, much smaller, population relocation project was undertaken, this one with the sponsorship of Skúli Magnússon's company: the transportation of ten farming families from Norway and Jutland to Iceland in 1752 seems to have been based on the idea that crops grown in Norway and Jutland would thrive with the same techniques in Iceland, and the only step necessary was to bring foreign teachers to instruct the natives, in the way that Bech would later recommend. But this project also has to be counted among the eighteenth-century failures, in the sense that crop yields did not increase and the Icelanders did not adopt new methods of farming. Unfortunately, there is not enough evidence to pinpoint why the scheme did not expand more broadly and involve larger numbers of people. The report of the sheriff Bjarni Halldórsson, who hosted two of the families from Jutland, gives a mixed and not completely conclusive picture. Bjarni says that one of the newly-arrived families was ambitious, but the other required instruction and supervision. According to him, the newcomers maintained that their duties should be limited to working in the fields, and that they had the right to have the same food and drink to which they were accustomed in Denmark. There seem to have been at least as many cultural, and possibly linguistic, differences and problems as agricultural ones. The attempt lasted 10 years, but the last of the foreign farmers returned home, at company expense, in 1762.¹⁴

THE ICELANDIC REINDEER: A FOREIGN IMPORT OR NATURAL IMPLANT?

None of these reform projects were ever described as fully 'successful' by their promoters, but at least one did have a lasting impact on the landscape of Iceland that continues to this day: the importation of reindeer to the island from Finnmark in Norway (Figure 3). In some respects, this project could even be described as 'too much of a good thing'. Taking a closer look at the history of reindeer in



FIGURE 3. Reindeer in Iceland. Reproduced by permission of Skarphéðinn G. Þórisson.

Iceland provides insight into the Enlightenment visions of the 'improvement' of the island.¹⁵ The first proposal to buy reindeer in Norway and transport them to Iceland was in 1751.¹⁶ This idea did not come to fruition, however, and the first animals did not actually arrive in Iceland until 1771. The years between 1751 and 1771 were particularly hard ones for the island: there was a famine from 1751 to 1758, and in 1761 an outbreak of scabies and lung disease among the English sheep that had come to Iceland, which lasted until 1770. The resumption of the plans to transport reindeer in 1771 after the twenty-year hiatus can probably be attributed to the worsening conditions and the perceived need for a particularly hardy animal to replace the sheep population, which had declined by 60% in the last nine years. In general the requests and inquiries for shipments of reindeer were made with reference to the specific hardships of the Icelandic eighteenth century. For example, another shipment of animals was sent by an Icelandic priest living in Norway when he heard the news of the volcanic eruptions in Iceland in 1783.¹⁷

In 1771 a group of 13 or 14 reindeer arrived in the country, in response to a request by the Danish governor of Iceland, L. A. Thodal, and were sent to the Westman Islands off the southern coast of Iceland. This first attempt did not augur well for the future of reindeer in Iceland: of this group, about half or more of the animals died the following winter of unknown causes.¹⁸ Another group of seven animals was released in southern Iceland, but they disappeared as well. This was followed by larger shipments of 30–35 animals in 1777, 1784, and 1787, which were settled both on the Reykjanes peninsula and in the north-eastern districts of the country (Figure 4). Their mortality rate during the ship-board journey from Norway was rather high, and in these transports almost one-third of the animals were lost before their arrival to the island. Once they reached their destination, however, the later-arrivals seem generally to have thrived. In 1781,

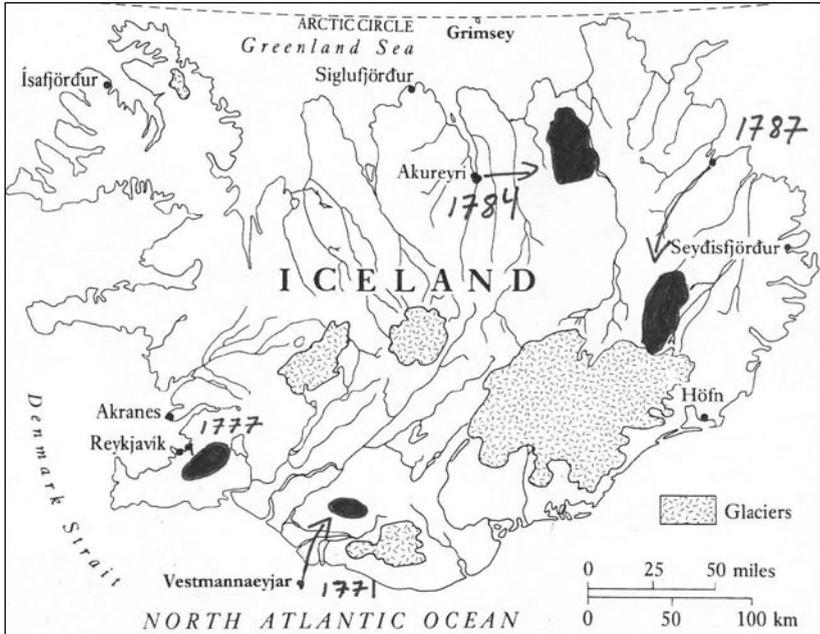


FIGURE 4. Map of Iceland, showing the sites where reindeer from Norway were released in 1771, 1777, 1784, and 1787 and their main pasture areas. Map drawn after Skarphéðinn G. Þórisson, *Hreindýranannsóknir 1979–1981*.

local farmers reported seeing a herd of at least 70 reindeer in an area where a small group of animals had been released.¹⁹ Other sources claim that there were herds of several hundred reindeer in Iceland by the 1790s.²⁰

The lack of precise accounting for the increases and apparent lack of knowledge about the general health of Icelandic reindeer, however, reveals something peculiar about the reindeer project from the outset. Reindeer are, and were, domesticated animals in Norway, raised by the Saami people living in northern Norway, Sweden, and Finland. When the animals came to Iceland, there was apparently little interest in keeping them as domestic animals, and the groups were simply released into the wild. This practice is puzzling for several reasons: contemporaneous sources suggest that the reindeer were intended by the officials to become herding animals to replace the sheep which had died during the plague. In 1786, the governor suggested that some Saami families should be brought to Iceland to teach the Icelanders how to keep reindeer.²¹ This was never done, although it would have been consistent with Bech's recommendations and with the other reform projects. However, the idea of bringing Saami families to Iceland was dropped because the governor of Finnmark reported

that the Saami nomadic lifestyle required wild meadows with large amounts of lichens and brushes in which they could find food for their animals and erect tents. Since these were clearly not part of the landscape of Iceland, the government was convinced that it would have been unsuitable to bring these people to Iceland along with their animals.²²

Whatever the reasons were for the lack of a serious effort to establish reindeer husbandry in Iceland, however, the results of the policy are clear, and constitute a familiar story to environmental historians. Left to themselves, the reindeers ate lichens which the Icelanders also used as food, and competed with the remaining sheep for the pasture land.²³ The farmers began to complain, and by 1794 they were already requesting permission to hunt the reindeer. At this time, there were an estimated 300–400 reindeer in the northern district. The request was granted, but limited for three years and to the northern district, also with restrictions on the number, age, and sex of the animals. The quota set seemed to be inadequate to control the population, however, because a further demand in 1798 to hunt reindeer resulted in the removal of all the geographical restrictions.²⁴ In 1810, a local sheriff in northeast Iceland reported that because the reindeer were still ruining the sheep pastures there, the animals had been more of a plague than a benefit, and recommended not only that permission to hunt them should be extended indefinitely, but that the government should distribute free bullets to the farmers for this purpose!²⁵ Efforts to bring the reindeer population under control proceeded slowly during the nineteenth century, but by 1882 they had disappeared from many places where they had been introduced. Today, they are hunted under a quota system, with fines levied for violation of the quotas. Culturally, a certain perception of these animals as 'foreign' to Iceland, despite their now 200-year-long history there, persists to some degree. The idea of eliminating the animals from Iceland continues to be raised now and then, although it is not really considered seriously by the Icelandic Ministry for the Environment, which is in charge of managing the reindeer population and issuing hunting licenses.²⁶

SCIENCE IN THE SERVICE OF THE STATE: WRITING NATURAL HISTORIES IN EIGHTEENTH-CENTURY SCANDINAVIA

The experience with the reindeer in Iceland suggests that while officials may have found it unproblematic to transform and transplant the flora and fauna of the North, these ideas did not play out so simply, nor did local farmers necessarily agree with their concepts of the homogeneity of 'Northern nature'. But the official position that certain types of animals, plants, and people possessed qualities particular to the Northern region of the kingdom, and that this region was a relatively homogeneous one, was, despite these experiences, very persistent.²⁷ Although the Danish projects conceived along these lines were often interpreted

as having ‘failed’ by their instigators, this does not mean that these plans were ill-conceived, groundless, or useless. The idea of looking to neighbouring regions as models and appropriating animals, plants, or people from them can be seen as part of the Enlightenment bureaucratic principle of seeking thorough knowledge of a governed territory. Thorough, accurate, and scientific knowledge of a place was the basis upon which its transformation could be envisioned. This approach combined the Enlightenment interest in science, collection, and encyclopaedic knowledge with the ideal of state service, as Linneaus advocated. The practice of royal scientific societies commissioning natural histories for regions within the boundaries of the state – as well as from more exotic realms like the Americas, the Near East, and the South Pacific – was common throughout Western Europe in the eighteenth century. Niels Horrebow’s *Tilforladelige efterretninger om Island* (*Natural History of Iceland*), Eggert Ólafsson’s and Bjarni Pálsson’s *Reise igiennem Island* (*Travels through Iceland*), Erich Pontoppidan’s *Det første forsøg paa Norges naturlige historie* (*A First Natural History of Norway*), and Olavius’s *Oeconomisk Reyse igiennem de nordvestige, nordlige, og nordostlige Kanter af Island* (*Journey through the North, Northwest, and Northeast Coast of Iceland*) were examples of such large, state-funded natural histories written in the encyclopaedic style in the Scandinavian countries.²⁸

Complete and accurate natural histories of Iceland were understood as the basis upon which reformers could build. One of the main themes in these mid-eighteenth century natural histories of Iceland is the predictability and regularity of nature on the island. These texts point out that there have been many exaggerated stories about Icelandic nature in previous travel accounts, claims that nature in Iceland was exotic and unlike anything that was known in Europe. For example, medieval and Renaissance books told stories about fabulous monsters living in Iceland and claimed that the Icelandic climate was either perpetually hot or perpetually cold.²⁹ It was these stories to which Arngrímur Jónsson objected when he complained in 1592 of the ‘strangers’ whom ‘it hath pleased by false rumors to deface, and by manifold reproches to injurie my sayd countrey, making it a by-word, and a laughing-stocke to all other nations’.³⁰ Contrary to what readers had been told by others, Arngrímur informed them that Mount Hekla is not the mouth of Hell, Iceland is not perpetually surrounded by ice, and Icelanders do not hold their wives in common. In addition, he added, there are neither horses that can run twenty leagues at one stretch in Iceland, nor whales as large as mountains.

In the mid-eighteenth century, at about the same time as the improvement and transformation projects were getting underway, Horrebow, Eggert Ólafsson, Bjarni Pálsson, and Olavius also took up the idea of writing natural histories with the intention of correcting existing false stories about Iceland. Horrebow’s book pointed out that his natural history was founded on ‘what he himself’ had ‘seen and experienced’ during the two years he spent on the island.³¹ Thus, his book promised to be a more valid source of knowledge than the 1746 *Nach-*

richten von Island, Grönland, und der Strasse Davis of Johann Anderson, the mayor of Hamburg, who had based his account only on sailors' reports.³² Among many other points, Horrebow disputed Anderson's claim that there are pools of burning water surrounding Mount Hekla that ignite spontaneously for fourteen days every year. There is no reason, argued the Danish naturalist, to think that water and fire in Iceland behave differently than in other countries – 'two opposite elements will not unite in this country any more than in any other'.³³ Such pools have never existed in Iceland, since it is contrary to any experience to imagine that water can burn. If Anderson had visited Iceland, and not relied on far-fetched tales spread by casual visitors, Horrebow implied, he would have realised the mistake. He then went on to explain Anderson's many other errors: that foxes in Iceland are also red, as in Norway and Denmark, and not black, and that domesticated horses also exist on the island, not just the wild and savage varieties.

After spending two years in Iceland, Horrebow was recalled to Denmark (there appears to have been some royal dissatisfaction with his services, but the exact nature of this is unclear). Two Icelanders, the poet and legal scholar Eggert Ólafsson and Bjarni Pálsson, a physician, were sent by the Royal Danish Scientific Society to take his place and to write a natural history of the entire country.³⁴ Their trip around Iceland in 1752–57 produced two large volumes that were translated into the major European languages. In their account Eggert and Bjarni explicitly attempted to discredit many of the old tales about Icelandic nature. In the section on the eastern districts of Iceland, they mentioned the reports of monstrous snakes or worms living in lakes and rivers there. Since their readers were certainly too learned to believe such tales, the authors tried to pose some explanation for the existence of these stories. There are no other animals large enough in Iceland to have been confused for monsters of this size, therefore the large waves and disturbances of the water attributed to monsters must be caused by winds and storms that are characteristics of the eastern part of the island, and the bodies of monsters must be shadows or reflections. Eggert and Bjarni's explanation – while unlikely to persuade anyone who did believe in the existence of Icelandic sea monsters – showed a methodical approach to the establishment of truth and authority about the natural world during the Enlightenment; and a commitment to confronting the 'false stories' and attempting to replace them with reliable explanations based on regular laws and principles of nature.³⁵ While Olavius did not counter the 'false stories' point by point in this way, he complained of the many authors, including Anderson, who wrote about Iceland but 'have not even the most basic knowledge of the circumstances of the country'.³⁶ The correction of such deficiencies in knowledge through accurate natural histories was, according to him, an important step in the project of improvement of the country, since it was exactly this lack of knowledge and falsehoods that had caused many people to believe that the condition of Iceland was especially impoverished and hopeless. While Olavius recognised the many

natural resources that the island lacked, he concluded, with typical Enlightenment optimism that the reformers discussed in the first part of this paper shared, that 'other countries have just as many deficiencies in resources as Iceland'.³⁷

Icelandic and Danish naturalists during the Enlightenment attempted to use their position of authority and privileged knowledge about the island, as natives or as long-term visitors, to counter the romantic and wild claims of more distant writers. In the context of writing natural history in a period of European discovery of the globe the trope of 'exotic nature' of a place seems to have been very often linked with the idea of 'savage primitivism' of the inhabitants that these authorities wanted to dismiss. In Arngrímur's opinion, the 'strangers' who believed that the Icelandic waters were inhabited by monsters were also likely to believe that Icelanders held their wives in common, and this reasoning had led to the poor reputation of the islanders in other countries. His is an early example of the belief, widespread in the eighteenth century, that the moral character of people was determined by their natural and cultural surroundings. Arngrímur's concern was not completely unfounded: Anderson, who repeated stories about strange Icelandic creatures, also had a very low opinion of the inhabitants of the island, considering them to be little better than animals themselves.³⁸ Thus, the Icelandic and Danish elite had an interest in discounting this exoticism, which separated the island from the civilised world, and argued instead in their natural histories that Iceland was just like any place that the reader might live himself. Because the mid-eighteenth-century natural histories of Iceland were translated into the major European languages, their wide readership could gain a correct and reassuring – although perhaps less exciting – picture of the island.

THE MANAGED NORTH: A CONSENSUS BETWEEN NATURAL HISTORIANS AND AGRICULTURAL REFORMERS

Armed with the knowledge that nature in Iceland is like anywhere else, writers who were interested in improving Icelandic natural resources and economy could therefore be filled with optimism and ambition. If Iceland were a very strange place, where monsters lived and where the laws of physics operated differently than elsewhere, the prospect of trying to transform or improve such a territory would have been very daunting, if not impossible. But since the latest and most authoritative scientific investigations, appearing at the same time that new agricultural and animal husbandry projects were being launched in Iceland, showed that Icelandic nature was ordinary, just less developed than other regions of the North Atlantic, the path to the Icelandic future was clear. Improvement projects assumed that the basic condition and raw materials of nature were homogeneous throughout the North. Sending Icelanders to the Shetlands to learn how to cure fish, bringing farming families to Iceland from Norway and Jutland to promote good agricultural practices, sending reindeer

from Norway, and even transporting Icelanders to Greenland to start farms were therefore thoroughly rational and scientific projects that would help to shape a more homogenous and more productive North. If nature was everywhere the same throughout the North, only education and technology were needed to bring the margins of the kingdom up to the standards enjoyed in the centre. It is not really possible to determine whether writers on improvements borrowed their notion of Icelandic nature from the natural historians, or whether they both developed it at the same time, since it suited both their interests so well. Since both natural historians and administrative officials travelled within the same social and political circles, and belonged to the same associations, this new conception of Icelandic nature and the proper method to establish knowledge of a territory through direct personal observation were part of a shared set of assumptions within this group. One region was held up as an example for the other; one region could be transformed into another. The whole North was treated as though it was composed of the same basic material. Since everything and everyone in a region stretching from Copenhagen to Greenland shared a common Norse heritage from the days of the Viking-age settlers, they could all share a common modernisation and a common future.

After the first two decades of the nineteenth century, there were no longer any large-scale economic or technological reform projects in Iceland. Since the reforming impetus seems to have fizzled out by the 1820s and the projects were individually dismissed as failures by their instigators, historians have usually assumed that they had little long-term effect. Gunnar Karlsson, for example, calls the projects 'distressingly unsuccessful' and Harald Gustafsson also judges them as essentially failures.³⁹ I would argue, however, that despite their lack of results considered individually, these efforts did not disappear without a trace. Iceland in the nineteenth century had become less isolated and more connected to Europe in many ways – culturally, economically, and intellectually – than it had been previously. The appearance of natural histories on Iceland in the mid-eighteenth century, and especially their translation into the major European languages, certainly played a role in shortening the perceived distance between Iceland and Europe. Although some natural historians still wrote about 'exotic' nature and 'primitive' people in Iceland, at least nature and culture were described and investigated according to scientific principles that Europeans held to be objective and rational. Eighteenth-century treatises on improvements reached a much smaller audience than the readers of natural histories. These were not printed and were intended to be read only by the officials to whom they were addressed, and would not have held much general appeal. However, they too aimed to use rational and scientific principles to describe the situation in Iceland. Both sets of writers used a single language, and one principle of this language assumed the homogeneity of nature throughout the North Atlantic.

In conclusion, it is important to note that this new language was not mere rhetoric in natural histories read by a European elite or by a few Danish of-

ficials, but had practical results and impact on the lives of people in the Danish kingdom. It shaped practice that changed the lives of the lower classes, as the experience of farmers with the reindeer in Iceland illustrates. The idea of moving animals around the northern provinces was based upon the assumption of homogenous and regular nature throughout the region. While this new idea about Northern and Icelandic nature replaced earlier beliefs in Iceland's exotic qualities, it also established a new basis for the authority of an author: in order to know Iceland after the mid-eighteenth century, one must have lived there. Second-hand reports or short visits were not sufficient. The Enlightenment emphasis on rationality and science, which was manifesting itself all over Europe, had the effect of transforming Iceland into an ordinary place, one that could be managed and regulated like any other region of the Danish kingdom. The political implications of this change in the scientific culture are clear. Even though changes in bureaucratic practices could not arise solely from writing natural histories, and natural histories were not shaped by the needs of the state alone, these two activities complemented and reinforced each other in Enlightenment Europe. Even while many nineteenth-century foreign writers, influenced by Romanticism, tried to make Iceland into an exotic place again, the role of the Icelanders as the voices of authority about their own country, established in the eighteenth-century, could not be diminished later. The new view of Northern nature was not solely imposed by Danish bureaucrats from above: rather the powerful Icelandic elite, the 'big fish in a small pond' such as Skúli Magnússon and Magnús Stephensen, recognised that it could also be a tool that served their own interests. This was the ironic result of managing nature in eighteenth-century Scandinavia: in establishing themselves as the special authorities about nature in Iceland, native Icelanders were forced to transform their country into an 'ordinary' place, like any other province of the Danish kingdom.

NOTES

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¹ Magnús Stephensen, *Island i det attenende Aarhundrede* (Copenhagen: Gyldenalske Boghandling, 1808). An Icelandic version of the book had been published by Stephensen's own press at Leirá in Iceland two years earlier, but Stephensen reworked the text for the

Danish edition. Ingi Sigurðsson's biography of Stephensen, *Hugmyndaheimur Magnúsar Stephensens* (*The Conceptual World of Magnús Stephensen*; Reykjavík: Hið íslenska bókmenntafélag 1996), provides useful insight into Stephensen's background and intentions in writing the book, esp. 149–160. See also *Upplýsingin á Ísland: Tíu ritgerðir*, ed. Ingi Sigurðsson (Reykjavík: Hið íslenska bókmenntafélag, 1990).

² Many other treatises of this type were produced, most only available in Icelandic and Danish archives; examples are Hans Christian Bech, 'Om Handel paa Island', MS from Landsbókasáfn Íslands (National Library of Iceland), JS 37, 1, and Niels Horrebow, *Relatio og Betænkning om Islands Oeconomie og nærværende Tilstand og hvorledes Landet kan komme ud i Stand*, in Det Konglige Bibliotek (Royal Library of Copenhagen) Otto Thott collection, 1742 4to.

Published examples are Skúli Magnússon's essays on conditions in Iceland and agricultural reform, which were submitted for competitions of De danske Landhusholdings-selskab (Danish Society for Farming Households): *Beskrivelse af Gullbringu og Kjósar Sýslur, Bibliotheca Arnarnagna* 4, ed. Jón Helgason (Copenhagen: Einar Munksgaard, 1944) and *Forsøg til en Kort Beskrivelse af Island, Bibliotheca Arnarnagna* 5, ed. Jón Helgason (Copenhagen: Einar Munksgaard, 1944). For a study of the Icelandic administrative bureaucracy, social networks, and their political influence see Einar Hreinsson, 'En stat, en förvaltning, två nätverk. Den danske förvaltningen på Island 1770–1870', in *Att Synliggöra det Osynliga: Sex uppsatser om socialt handlande och sociala nätverk*, ed. Tomas Nilson (Gothenberg: Institute for History, 2000), 114–39.

³ For details on conditions in eighteenth-century Iceland, see Gísli Gunnarsson, *Monopoly Trade and Economic Stagnation: Studies in the Foreign Trade of Iceland 1602–1787* (Lund: Ekonomisk-historiska föreningen, 1983), and the extremely valuable collection of essays and sources, *Skaftréldar 1783–1784: Ritgerðir og Heimildir*, ed. Gísli Ágúst Gunnlaugsson, Gylfi Már Guðbergsson, Sigurður Þórarinnsson, Sveinbjörn Rafnsson, and Þorleifur Einarsson (Reykjavík: Mál og menning, 1984). Gunnar Karlsson's recent book, *Iceland's 1100 Years: The History of a Marginal Society* (Reykjavík: Mál og menning, 2000) also gives a good overview of the period. Kirsten Hastrup looks at the problems of the Icelandic economy from an anthropological viewpoint in *Nature and Policy in Iceland 1400–1800: An Anthropological Analysis of History and Mentality* (Oxford: Oxford University Press, 1990).

⁴ Jón Stefánsson, 'Iceland: Its History and Inhabitants', *Journal of the Transactions of the Victoria Institute, or Philosophical Society of Great Britain* 1902, vol. 38, 63.

⁵ In 1770 the Danish government appointed a land commission consisting of three officials and a secretary (two Danes and two Icelanders) to investigate conditions in Iceland. This was a far-reaching project, which received letters from almost one percent of the Icelandic population, and presented a final bill of over 7,924 riksdaler (a cow cost about 7 riksdaler in Iceland at this time). The commission travelled throughout the southern and western areas of Iceland during the following year, and an Icelandic natural historian, Olavius (discussed later in this essay), was appointed to write about the northern and eastern regions of the country. In 1785, following the Laki volcanic eruptions in southern Iceland, another land commission was sent to Iceland. The recommendations of this body led to a relaxation of the Danish monopoly trade restrictions in Iceland. Thus, it seems clear that, even though Iceland might have appeared distant from concerns in Copenhagen, the state was willing to invest considerable sums in investigating and trying to improve conditions there. On the 1770 land commission, see Harald Gustafsson's *Mellan kung*

och allmoge: ämbetsmän, beslutsprocess och inflytande på 1700-talets Island (Stockholm: Almqvist & Wiksell, 1985).

⁶ Bech, 'Om Handel paa Island'.

⁷ MS from Þjóðskálasafn Íslands (National Archives of Iceland), Rtk, 32.20 Isl. Journ. A. Nr. 1528. On the 'Nye Innretninger', see also Hrefna Róbertsdóttir's article, 'Áætlun um allherjarviðreisn Íslands 1751–1752', in *Landnám Ingólfs: Nýtt safn til sögu þess* (Reykjavík: Félagið Ingólfur, 1996): 29–88, and her *Landsins forbetran: Innréttingar og verkþekking í ullarvefsmiðjum átjándu aldar* (Reykjavík: Háskóli Íslands, 2001). Skúli Magnússon and the Innretninger have been the subjects of considerable research by Icelandic historians: see Jón Jónsson, *Skúli Magnússon landfógeti 1711–1911* (Reykjavík: Sigurður Kristjánsson, 1911); Lýður Björnsson, 'Ágrip af sögu Innréttinganna', in *Reykjavík í 1100 ár*, ed. Helgi Þorláksson (Reykjavík: Sögufelað, 1974), 117–145, and his *Íslands hlutafélag: Rekstrarsaga Innréttinganna* (Reykjavík: Hið íslenska bókmenntafélag, 1998); in English, Gísli Ágúst Gunnlaugsson, 'The Granting of Privileges to Industry in Eighteenth Century Iceland', *Scandinavian Journal of History* 7,3(1982): 195–204.

⁸ The literature on the role of states in shaping natural environments is vast, but some important contributions are James C. Scott, *Seeing Like a State: How Certain Schemes to Improve the Human Condition Have Failed* (New Haven: Yale University Press, 1998), James Fairhead and Melissa Leach, *Misreading the African Landscape: Society and Ecology in a Forest-Savanna Mosaic* (Cambridge: Cambridge University Press, 1996), and Richard Drayton, *Nature's Government: Science, Imperial Britain, and the 'Improvement' of the World* (New Haven: Yale University Press, 2000).

⁹ Lisbet Koerner, 'Purposes of Linnaean Travel: A Preliminary Research Report', in *Visions of Empire: Voyages, Botany, and the Representation of Nature*, ed. David Phillip Miller and Peter Hanns Reill (Cambridge: Cambridge University, 1996), 125. Her *Linnaeus: Nature and Nation* (Cambridge, MA: Harvard University, 1999) goes into more detail about Linnaeus's acclimatisation experiments and the importance of the frontier region of Lapland in constructing his visions of the possibilities of Scandinavian nature. On the role of mercantilism within Denmark, see Kristof Glamann and Erik Oxenbøll, *Studier i dansk merkantilisme: Omkring tekster af Otto Thott* (Copenhagen: University of Copenhagen, Akademisk Forlag, 1983).

¹⁰ Michael A. Osborne, *Nature, the Exotic, and the Science of French Colonialism* (Indianapolis: University of Indiana, 1994), esp. 62–97 and 145–71. The title of this book promises rather more than it delivers; it is in fact mostly a history of the Society with some broad claims about French colonialism. See also Eugene Cittadino, *Nature as the Laboratory: Darwinian Plant Ecology in the German Empire* (Cambridge: Cambridge University, 1990), which focuses on the intellectual rather than economic aspects of this practice. On the history of the acclimatisation in colonial contexts, see Osborne, 'Acclimatizing the World: A History of the Paradigmatic Colonial Science', *Osiris* vol. 15(2000), 135–51.

¹¹ See Louis Bobé, 'Hans Egede, Grønlands Missionær og Kolonisor', *Meddelelser om Grønland* vol. 129 (Copenhagen: 1944): 1–344, esp. 68–72. For a general history of the Danish settlements in Greenland, see Mads Lidegaard, *Grønlands historie* (Copenhagen: A. Busck, 1991); Finn Gad, *Grønland* (Copenhagen: Politiken, 1984), Henning Bro, *Grønland: Kilder til en dansk kolonihistorie* (Copenhagen: Det Grønlandske Selskab, 1993); in English, Gad, *A History of Greenland* (trans. Ernst Dupont, London: C. Hurst, 1970). See also Clarence J. Glacken, *Traces on the Rhodian Shore: Nature and Culture in Western*

Thought from Ancient Times to the End of the Eighteenth Century (Berkeley: University of California, 1967) about eighteenth-century theories relating people and climate.

¹² For the details of the environmental history of Jutland, see the discussion in Thorkild Kjærgaard, *The Danish Revolution, 1500–1800: An Ecohistorical Interpretation*, trans. David Hohnen (Cambridge: Cambridge University Press, 1994).

¹³ Anna Agnarsdóttir, 'Ráðabruigg á dulmáli: Hugleiðingar um skjal frá 1785', *Ný Saga. Tímarit Sögufélags* 6 (1993): 28–41.

¹⁴ Þjóðskálasafn Íslands, Skjalasafn Stíftamtmanns III 95, 'Iutska folked'. This document is also reproduced in Lýður Björnsson, *Íslands hlutafélag*, 55–7.

¹⁵ The introduction of reindeer into new territories to replace other herding animals is in fact frequent practice which has taken place in Alaska, Greenland, and South Georgia Island, among others, although the Icelandic experiment was among the earliest – if not the very first – such attempt, occurring nearly 150 years before similar projects. For some general comparative history of reindeer introduction, see N. Leader-Williams, *Reindeer on South Georgia* (Cambridge: Cambridge University Press, 1988), esp. 3–52.

¹⁶ *Lovsamling for Island* (a collection of laws concerning Iceland), ed. Óddgeir Stephensen and Jón Sigurðsson (Copenhagen: Universitets Boghandler Andr. Fred. Höst, 1853–9), vol. 3, 63.

¹⁷ The most complete history of the reindeer in Iceland is Ólafur Þorvaldsson, *Hreindýr á Íslandi 1771–1960* (Reykjavík: Bókaútgáfa Menningarsjóðs, 1960). Other useful sources include Skarphéðinn G. Þórisson, *Hreindýranannsoknir 1979–1981* (Reykjavík: Orkustofun, 1983), 13–21, Helgi Valtýsson, *Á hreindýraslóðum: Örafatöfrar Íslands* (Akureyri: Bókaútgáfan Norðri, 1945), 111–228, and Guðmundur Þorláksson, 'Af Rendyrets Saga i Island', *Grønland* (1956), 173–78. The reindeer project is also mentioned by Magnús Stephensen in his *Island i det attenede aarhundrede*, 75–6.

¹⁸ The figures differ slightly in different sources; I have given some general estimates and averages here.

¹⁹ *Lovsamling for Island*, vol. 4, 588–9.

²⁰ *Ibid.*, vol. 5, 683.

²¹ *Ibid.*, 393–4.

²² *Ibid.*

²³ The phenomenon of 'ungulate irruption' of introduced reindeer and other herbivores is well-known worldwide and is described by Leader-Williams, *Reindeer on South Georgia*. Several cases of the environmental effects of these irruptions, which occur when ungulates (herbivores with large, horny hooves) increase exponentially in response to an excess of food, overshooting the capacity of the plant communities to sustain them, are described by Elinor G. K. Melville, *A Plague of Sheep: Environmental Consequences of the Conquest of Mexico* (Cambridge: Cambridge University Press, 1994).

²⁴ *Lovsamling for Island*, vol. 6, 177–78, and 349–50.

²⁵ Quoted in Guðmundur Þorláksson, 'Af Rendyrets Saga i Island', 176.

²⁶ The hydroelectric dam currently being built at Karahnjúkar in east Iceland, which has been the subject of considerable environmental concern, threatens the grazing pastures of the reindeer living there. Some species of birds, fish, insects, and mosses are also endangered by the project. For a discussion of the politics and environmental impact of

the dam, see Mark Lynas, 'Damned Nation', *The Ecologist*, December 2003/January 2004 and Susan De Muth, 'Power Driven', *The Guardian*, November 29, 2003.

²⁷ Kristján Sveinsson's account of the import of bison from Greenland to Iceland in 1929 and 1930 shows some interesting parallels with the reindeer's story. The idea did not originate in Iceland, but with a group in Denmark that was concerned about the preservation of Northern Nature, since the animals were threatened in Greenland by over-hunting. The Icelandic Parliament agreed to bring the animals to Iceland, which would serve as a 'nature reserve' for them, but they died of illness. The project was undertaken against the advice of zoologists consulted by the Danish group, and seems to have been supported by no scientific evidence stronger than the desire to believe that animals originating in Greenland 'naturally' would flourish in Iceland. See Kristján Sveinsson, 'Íslensk sauðnautasaga, 1905–1931', *Ný Saga: tímarit sögufélags* 10 (1998), 85–102.

²⁸ Niels Horrebow's *Tilforladelige efterretninger om Island* (Copenhagen, 1752), Eggert Ólafsson and Bjarni Pálsson, *Vice-lavmand Eggert Olafsens og Land-physici Biarne Povelsens Reise igiennem Island, foranstaltet af Videnskaberne Selskab i Kiøbenhavn* (Sorø: Jonas Lindgren, 1772), and Erich Pontoppidan's *Det første forsøg paa Norges naturlige historie* (Copenhagen: Berlingske Arvingers Bogtrykkerie, 1752–3). Jón Eiríks-son, 'Forberedelse' to Olavius, *Oeconomisk Reyse igiennem de nordvestige, nordlige, og nordostlige Kanter af Island* (Copenhagen: 1780), i–ccxx. On the activities of scientific societies, see James E. McClellan III, *Science Reorganized: Scientific Societies in the Eighteenth Century* (New York: Columbia University Press, 1985). Jacques Revel argues that collecting statistics and drawing maps were similar techniques to writing natural histories in defining a territory in the case of the French state in his 'Knowledge of the Territory', *Science in Context* 4,1 (1991): 131–61.

²⁹ These are discussed by Sumarliði R. Ísleifsson in his *Ísland: Framandi land* (Reykjavík: Mál og menning, 1996), 11–71. He argues that there was a change in the mid-eighteenth century in the picture of Iceland in travel books along similar lines as I see here.

³⁰ Arngrimus Jonas (as he was called in English), *Brevis commentarius de Islandia in The Principal Navigations, Voyages, Traffiques and Discoveries of the English Nation*. Edited by Richard Hakluyt (Glasgow: 1903), Volume 4, 8.

³¹ Horrebow, *Tilforladelige efterretninger om Island*. This quotation is from the English translation, *The Natural History of Iceland* (London, 1758), vii

³² Johann Anderson's *Nachrichten von Island, Grönland, und der Strasse Davis* (Hamburg, 1746) was translated into Danish in 1748, with some of the sections most critical of the Danish monopoly of trade in the North Atlantic omitted.

³³ Horrebow, *Natural History*, 19–20.

³⁴ The Royal Danish Scientific Society, unlike its British counterpart, was closely tied to royal favour in the eighteenth century: it had no general allowance until 1774, but was forced to apply to the crown for grants for individual projects. Christian IV's royal letter to Johan Ludvig Holstein and Hans Gram, the founders of the Society, in 1743 instructed them that 'first and foremost you must pay attention to anything that is in any way connected with the histories of Our realms and countries'. Olaf Pedersen, *Lovers of Learning: A History of the Royal Danish Academy of Science and Letters 1742–1992* (Copenhagen: Det Kongelige Danske Videnskabernes Selskab, 1992), 41. Horrebow's trip, unlike Eggert's and Bjarni's, was not directed through the Society, but funded by

the King, although Horrebow's reports were read at the Society's meetings in 1750 (Pedersen, *Lovers of Learning*, 70).

³⁵ Ólafsson and Pálsson, *Reise igiennem Island*, book 2, section 788, 95–6.

³⁶ Olavius, *Oeconomisk Reyse*, 1. Olavius, who travelled in Iceland during the summers 1775–1777, was assigned the task of writing about the northern and eastern regions of Iceland, since these areas of the island had not been investigated by the land commission in 1770–1771.

³⁷ *Ibid.*, 5.

³⁸ Although this was not necessarily the case; Friedrich August Ludwig Thienemann, who went to Iceland in 1820–21, believed that Icelandic nature was unique and different from the rest of the Northern countries, and that the Icelandic mouse was a different species than its European cousin. At the same time, he also had a very high opinion of the Icelandic people. Indeed, the argument could be equally well made (and was made, especially in the nineteenth century, as other cultural connections between Europe and Iceland developed) in the opposite direction, that people living in a unique nature would naturally be a superior people. Friedrich August Ludwig Thienemann, *Reise im Norden Europa's, vorzüglich in Island, in den Jahren 1820 bis 1821* (Leipzig, 1827). According to Thienemann, by 1820 large herds of reindeer were fending for themselves in the uninhabited, desert interior of Iceland.

³⁹ Karlsson, *Iceland's 1100 Years*, 175; Harald Gustafsson, *Political Interaction in the Old Regime: Central Power and Local Society in the Eighteenth-Century Nordic States*. Translation by Alan Crozier (Lund: Studentlitteratur, 1994), 43.