Identity Construction and Maintenance in the North Atlantic c. AD800-1250

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Abstract

This study is a multivalent investigation of Scandinavian identity formation and cultural structures within the north Atlantic that looks specifically at the construction and maintenance of island identities circa AD800-1250. This not only includes consideration of the Norse settlers but also the effects of contact between the emerging island cultural identities and continental Europe. In order to do this zones of settlement have been defined to better compare the expansion of medieval Scandinavian populations in terms of microscale practices and interactions within family groups and the macroscale vectors of social, economic and political change. It employs a wide variety of material that makes use of aspects of both prehistoric and historic sources. The variety of enabling conditions ultimately provided for a time the circumstances necessary for the long-term success of a number of the settlements established during this period. These same conditions allowed another population, the Thule, to eventually come into contact of a semi-periodic nature with the recently settled Norse populations as well, yet is often is considered only as a side note to the decline of the furthest Norse settlements. The evidence is considered in as subjective manner as possible with the sources available.

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Any mistakes found within this work are my own.

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Chapter 1 General Aims and Research Context

1.1 Introduction

The western expansion of Viking Age and Medieval Norse into the north Atlantic has been subject to much academic consideration and publication fuelled by a substantial corpus of both archaeological and written sources. Each of the North Atlantic islands and archipelagos would come to feel the impact of the Norse migrations in their own way as the Norse moved beyond the Scandinavian homelands to first the Northern and Western Isles of Scotland, the Faroe Islands, then, Iceland, Greenland, and, North America. These islands and island groups each have their own unique natural and historical contexts that made unique impacts upon the incoming Norse populations and have helped the subsequent local identities to evolve. This study is intended to be a multivalent investigation of Scandinavian identity formation and cultural structures within the north Atlantic that looks specifically at the construction and maintenance of the island identities within this region, circa AD800-1250. It not only includes consideration of the incoming Norse settlers in rural areas but also the effects of contact between the emerging island cultural identities and continental Europe. This period corresponds with the so-called Viking Age, AD800-1050, and the Medieval, AD1050-1250, and at times is referred to as such within this text.

Humans identify themselves and others through a series of negotiations of similarity and difference that is an important part of identity and how humans interact with the world (Jenkins, 2008). They produce their existence in a wide variety of ways. Indeed this is composed of complex topics such as ethnicity (Bourdieu, 1990, pp. 52-58). Ethnicity is important because it is socially constructed and thus believed to be important to those

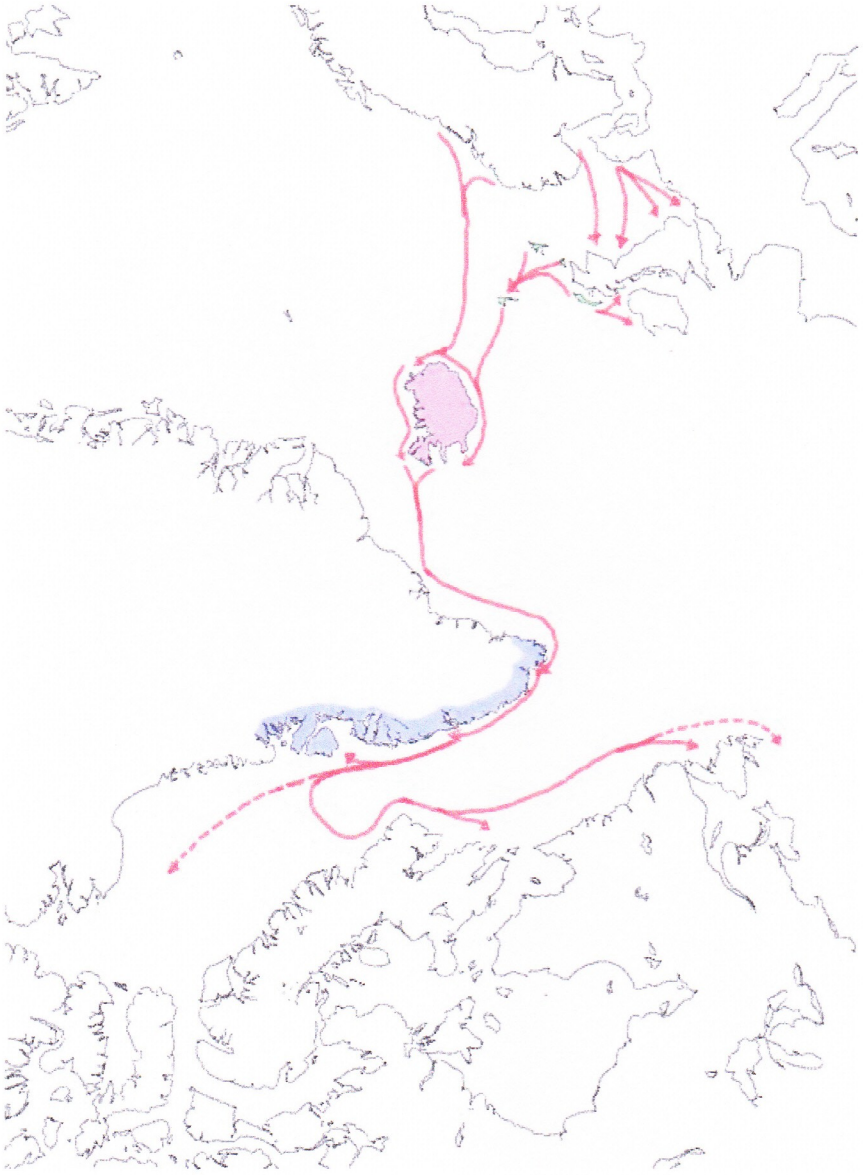
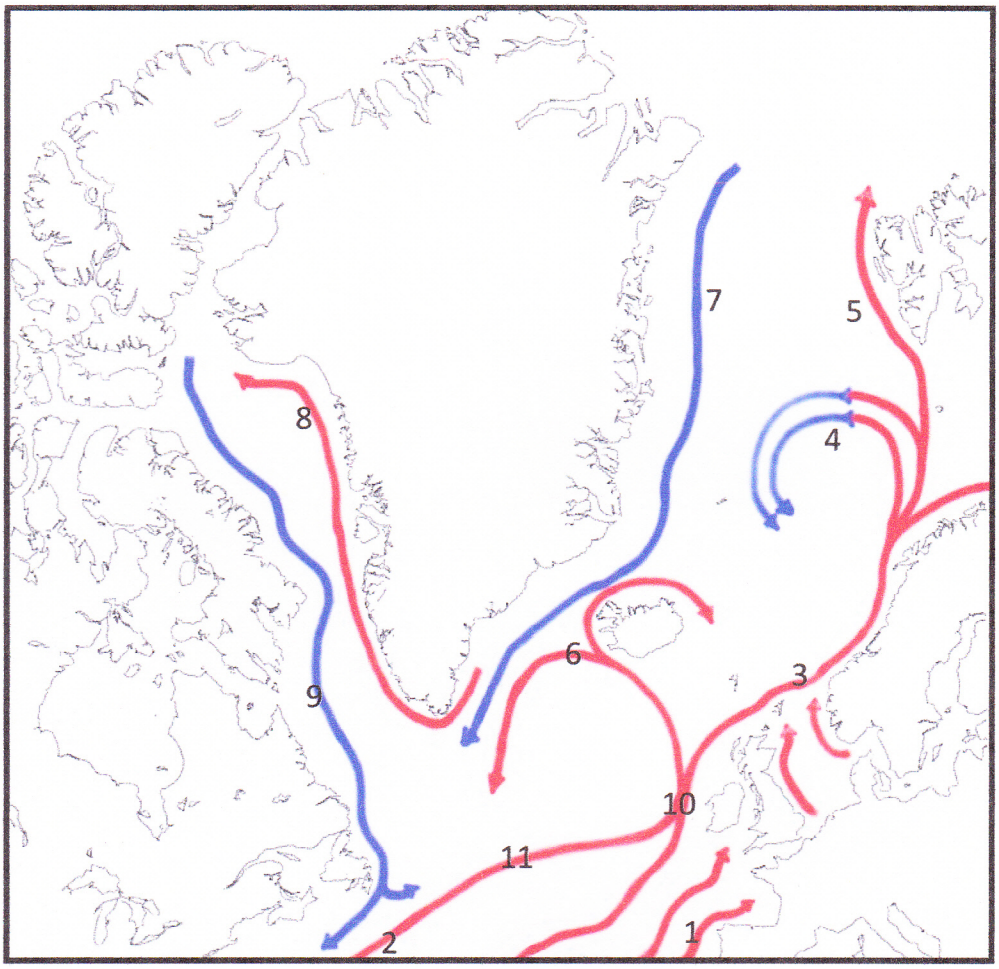


Figure A Northern European expansion across the north Atlantic, shown in red. Zone demarcation utilized throughout the work is also shown. Zone 1 is shown in green, Zone 2 shown in purple while Zone 3 is shown in blue.

who exercise it and so has weight and meaning in the social world. This is similar to concepts religion, history and nationalism. This process leaves varying degrees of physical evidence of its presence from none to magnificent examples of landscape utilization. Identity is determined partially by the context of an individual actor's situation, including whether or not there are other individuals with which to interact (Jenkins, 2008). This study focuses upon the aspects of group identity that were created and maintained in the Norse north Atlantic settlements. This work follows a trend of thought that has its basis in the French Annales School (Bourdieu 1990: 441-6; Jenkins 2010: 16-8). It also follows with some concepts of multivocality as well.

For ease in consideration and presentation within this work, the physical region has been broken into three zones of settlement that all experience a form of Scandinavian *landnám*, 'land taking'. Land naming is a broader reaching concept- it is the initial step of establishing a geographically based identity in a new region, in a similar fashion to the process of how a baby becomes socially human to adults. This process adapts previously utilized naming conventions with new geographic forms in unsettled areas. When the process of landnám occurs on previously inhabited areas there can be connotations of a cultural takeover with only occasional survivals in the maintenance of established names such as Mousa. The term landnám is widely used in Icelandic archaeological publications to discuss the period from AD870 to 1000. In English translations of these sources referred to as the Settlement Period. This is also conveniently the pagan period of Iceland as well as the time when both Iceland and later Greenland were settled. Landnám is also a term utilized by Scandinavian literary specialists in relation to two works associated with the medieval author Ari Þorgilsson. In relation to textual sources, landnám conveys a set of information primarily the period covered by the texts but also



1. Portugal Current
2. North Atlantic Current
3. Norwegian Current
4. North Cape Current
5. Spitsbergen Current
6. Irminger Current
7. East Greenland Current
8. West Greenland Current
9. Labrador Current
10. Shelf Edge Current
11. North Atlantic Drift Current

Figure B Major North Atlantic oceanic currents (after Schmitz 1996: 15, figure 1-10).

the direction of movement west from a coastal western Norwegian origin. The literary implications of landnám will be discussed further in Chapters 7, 10 and 11.

Within this work, landnám is used to designate the initial Norse settlement period in all zones- it is a temporal and culturally biased concept. This is done for consistency and to prevent confusion when discussing physical aspects of archaeological sites. It is also done as the use of the term landnám is used to convey a complex set of information presented in Table A about the migrating Norse population. In the instances when a settlement event has occurred in a zone, i.e. in Iceland, it is referred to as a Landnám event to prevent confusion. This is a feature of settlement particular to areas which are rural in nature.

Case study evidence is presented within this format while the zones themselves will be referred to throughout this work. Zone 1 is composed of the Northern and Western Isles of Scotland and the Faroe Islands- the nearest island groups to the Scandinavian homelands. The more widely studied island archipelagos of Orkney and the Hebrides will be referred to within discussion chapters in Part III due to the more numerous amounts of publications related to this time period as well as the historical importance of these archipelagos in their own right during the medieval period.

Zone 2 is composed of Iceland. Iceland has an incredibly large body of evidence in publication including archaeological reports but also sagas, their related critiques, formalized trade agreements and medieval law codes. This has required sampling of the available material and as a result the southwest of Iceland, which historically received the heaviest Landnám population, and the southeast of Iceland, which is the closest geographically to Zone 1, has been the focus within the case study for Zone 2. In

Zone	Time frame	Names	Geographic area	Cultural assumptions via texts
Zone 1	Pre-AD800 [varies] to 1000	Some assimilation of old names and descriptive	Previous settlement, coastal areas	Networks previously established; pagan population converted fairly quickly
Zone 2	AD870-1000	Initially descriptive	Coastal areas and nearby valleys to the interior	Primarily pagan with some Christians mostly coming via previous settlements in Zone 1
Zone 3	c. AD950-1050	Difficult to comment upon as many Norse place names have been lost- personal name elements is what survives	Coastal portions of the interior fjords	Pagans and Christians with Christian population growth as time passed

Table A Aspects of Landnám associated with each Zone.

addition, this area is best warmed by north Atlantic Currents. The entirety of Iceland is considered within Part III of this study.

Zone 3 is composed of the Eastern Settlement of Greenland as well as the New World Norse site at L'Anse aux Meadows, Newfoundland. This designation is primarily due to differences in available locations for settlement and the effects that this has on the available resources as well as the presence of non-European indigenous inhabitants. The singular confirmed New World and recently announced sites have been included in this Zone as Greenlanders and Icelanders, via Greenland, attempt to settle and conducted any subsequent trading in the region, which implies the presence of a Greenlandic *habitus* rather than a separate New World based Norse identity.

1.2 Ecological Environments of the North Atlantic

Norse settlement of the north Atlantic was successful in no small part to the variety of environments which corresponded to those experienced in the coastal fjords and islands of Scandinavia as well as the early movements into Zone 1, for instance a Shetlandic *voe* is merely a fjord with a land aspect which is much less dramatic. However, island archipelagos create the very real concern of limited future resources for growing populations. Initial landnám populations took the best lands available that were primarily located on the coast or had a coastal element to them (Amorosi, et al., 1997). Lands that are more marginal became places of subsequent secondary and tertiary settlement as the landnám population expanded over generations. With such a large area to consider, certain aspects of location become more influential than others. Ocean currents such as the Irminger Current and the Norwegian Atlantic Current provide warming and cooling effects on land and water masses ranging from continents to small island archipelagos.



Figure C Dyrnaes farm water access. Narsaq, Greenland.

The movements of currents provide catalysts for fish migrations, driftwood systems and greater water transport mobility. Some of the most influential ocean currents that influence the north Atlantic zones are shown in Figure B.

Linked to currents is the global climate, which has been associated with significant impact in north Atlantic settlement. The entirety of the region under consideration is classified as either **Cfb** or **Cfc** according to the Koppen-Geiger climatic designation system which would not have changed overall during the period under consideration. This classification system has been utilized to provide several consistencies within the ecological and climatic data presented in Table A. These are well-established designations that are based upon vegetation types and geologic weathering present within geographic environments (Peel, et al., 2007). Land areas are included in Figure 1.

There were some quite influential global climatic trends at work during the period under consideration. The period which resulted in overall warming of the Northern Hemisphere from circa AD 600 to 1200 is known as the Medieval Warm Period or Optimal (Fagan, 2000, p. 7; Crowley & Lowery, 2000). The terrestrial impact of this can easily been seen in Europe and North America in particular through greater agricultural production, greater areas of associated political and social power consolidation as increased amounts of human migration.

The maritime impact of the Medieval Optimal is much more ephemeral in terms of direct evidence because of the fluid nature of the medium although comparative modern examples exist. The increased temperature conditions resulted in calmer waters for longer periods during the Optimal period (Crowley & Lowery, 2000; Steffensen, et al., 2008). Sea ice, which had developed during the colder winter months, did not form as far

Koppen designation	Common name	Precipitation	Month of warmest average	Number of colder months
Cfb	Maritime Temperate Climate	All months	Warmest average month will be below 22°C	At least 4 months will be above 10°C
Cfc	Maritime subarctic climate	All months	Warmest average month will be below 22°C	Less than 3 months will be above 10°C

Table B Koppen designations for the north Atlantic region explained in brief (Peel, et al., 2007).

south, which resulted in the possibility of more direct and hence shorter voyages to the various north Atlantic islands (Fagan, 2000). This easier period would end earlier in regions above 60°N especially in arctic polar climates with the onset of the Little Ice Age, which would truly affect Europe and North America during the fifteenth century (Steffensen, et al., 2008). In the higher northern latitudes, glacial ice-core samples show that these regions began to experience harsher longer winters centuries earlier than locations to the south (Amorosi, et al., 1997, p. 486; Steffensen, et al., 2008).

Marine regions contain a variety of ecological environments available for exploitation. Of all of these, open water is one of the most difficult to prove due to the nature of the material. The best evidence this environment's exploitation is marine artifacts found on land as well as the physical remains of exploited open water material (McGovern, et al., 1988). This can range from the exploitation of marine fish and mammals to seaweed and littoral zone shellfish. Live marine mammal exploitation in this pre-Modern period, and which continues in areas like the Faroe Islands, consisted of tiring animals to bring them into coastal waters (Bloch, 2007, pp. 11-12; Szabo, 2008, pp. 93-4). Deep sea fishing on greater than subsistence levels would require cooling global temperatures and the proper economic climate on the European national market to grow in importance (Barrett, et al., 2008).

Coastal waters include the water aspects of fjords and any areas where shallower relatively open waters occur. Artifacts found on land evidence this. Evidence includes net weights used to hold down nets used in coastal fishing as well as hooks and line weights. Species exploited here include Gadids and shoaling flatfish as well as available marine mammals such as seals, walrus and porpoise (Barrett, et al., 2008; Lindquist, 1994

[unpublished]; Szabo, 2008). The littoral margins including beaches, the terrestrial aspects of fjords and other immediate coastal areas such as geos provide such material as ecofacts, pollen and other palaeoecological evidence. This is where landing sites and boat nausts were located (Bill, 2010; Stylegar & Grimm, 2005). Shore fishing, shellfish and seaweed collection all occur in this environment. Some marine bird exploitation also would have occurred in these regions (Lindquist, 1994 [unpublished]; Dugmore, et al., 2005, pp. 28-29).

Meadows naturally either occur in the flattish areas near littoral margins or are within terrain that is more mountainous. These are the regions preferred for building construction. The arable lands provided the locations necessary for the infield and outfields (Buckland, et al., 2009, p. 114). Drainage is a major concern across much of this region, particularly for the areas nearest to glaciers, and occurs in the rarer sandy soils of the north Atlantic. Grasslands also provided immediate and future fodder as well (Buckland, et al., 2009). Pastures utilized for animal husbandry will tend to have an available source of fresh water and outbuildings for areas of larger size, and possibly pens for holding animals as well (Mahler, 1995). Haymaking fields on the other hand, will be much more remote and may or may not have outbuildings. Haying was a manual task, is it is in parts of the Faroe Islands to this day (Mahler, 1995).

Marginal areas are those regions that were less directly involved in the production and collection of food and raw resources. These were the locations of secondary and tertiary settlement. This is where wild species exploitation would have occurred. In the areas furthest west, Zone 3, where species such as fox, arctic hare, caribou and musk oxen were exploited to fill the need of protein and raw materials (Keller, 2010). Marginal areas

also include those haymaking pastures whish are too small to support a population of medium to large herbivores yet is still productive enough to contribute to the over-wintering strategy (Mahler, 1995; Albrethsen & Keller, 1986).

Although one is hesitant to ascribe cultural identity development merely to the contextual environment, a trend in theory also known as environmental determinism, it is incredibly hard to deny the impact of environment in this consideration of north Atlantic settlement. This may have something to do with the fact that islands and coastal environments themselves are often quite marginal in nature themselves, with limited carrying capacity in terms of human and domesticated animal populations. The subsistence strategy of any culture prior to the modern period is quite closely tied into the local environments those cultures inhabit and the north Atlantic region during this period is no exception to this.

The available resources show broad similarities amongst certain species and share some of these similarities with the rugged Scandinavian coastlines. The early medieval Norse subsistence strategy was based upon the farm unit outside of trading centers. The farm unit has a series of basic needs only satisfied by certain locations in the north Atlantic. They include a place to keep stock as well as a place for the people required for their care (Albrethsen & Keller, 1986; Sveinbjarnardottir, 1991). A place to gather or grow fodder, especially for the winter, was vital in the higher latitudes (Albrethsen & Keller, 1986; Mahler, 1995; Sveinbjarnardottir, 1991). A means of communication and exchange with other farms was necessary as well as this could be used to obtain materials unable to be locally produced. Because of this early exposure to similar conditions as would be found in the north Atlantic islands the *habitus* of the Landnám era settlers developed in

such as manner as to become specialized generalists as well. Specialized generalists are those groups that specialize in the exploitation of a wide variety of local resources. In the case of the north Atlantic archipelagos, this included the exploitation of marine birds, fish, mollusks, seaweed and marine mammals amongst other species as well as inanimate goods such as driftwood (Malmros, 1991; Lindquist, 1994 [unpublished]). This exploitation was integrated into the local trade and exchange network with interior sites on the islands. The diverse resources would have required somewhat specialized knowledge in certain cases such as knowing when to exploit migrating birds and fish as well as the much larger community task of whale exploitation (Frieman, 2008, pp. 135-136; Lindquist, 1994 [unpublished]).

The overall marginal nature of the archipelagos found within the north Atlantic required the exploitation of every available resource by farm groups just in order to survive the harsh winters. This fact does become part of the laws codes of several of the island archipelagos as time passes and the world climate moved from the Medieval Warm Period onto the cooler Little Ice Age (Fagan, 2000, p. 21). This is reflected in the medieval laws which dictate not only collection rights with regards to coastal resources but also, in the case of Iceland in particular, actually would dictate unaffiliated people to become part of a farm for the year or else to risk being *útlaga* (Finsens, 1974; Durrenberger, 1989). Following the adoption of oðal system during the late Medieval period an effort was made to provide a balanced collection of available island resources so that a greater variety of resources were available to the public farms.

1.3 Research Context of the North Atlantic

The Norse settlement of the north Atlantic occurred at a convergence of major events any of one of which could have potentially resulted in significant changes to society. As

northwestern European peoples began their settlement into sometimes quite marginal quality lands which were increasingly farther from the long-established networks of trade and community in the North and Irish Sea area we also began to see global climatic conditions warm and mellow in general (Fagan, 2000, pp. 3-21). Maritime technologies advanced to the point that long-distance travel over open water became much less of an obstacle than it had in the past- this included masts and the flexible yet strong clinker construction which the ships of Scandinavia became famous for (Bill, 2010; Christiansen, 2002; Crumlin-Pedersen, 1995). Table 1 details the general vessel types found within Scandinavian waters and the north Atlantic. Evidence for such vessels has been found in a variety of locations ranging from defensive scuttles found within Scandinavian harbors, to ship burials to even the boat nausts that once held vessels over winter (Stylegar & Grimm, 2005; Bill, 2010; Crumlin-Pedersen, 1995).

Concurrent to this the Scandinavian homelands began to consolidate into medieval nationalities, the beginnings of modern nations. This consolidation is highlighted in several Icelandic sagas as the primary reason for the Scandinavian Diaspora across the Atlantic. Some relate this to growing interaction and emulation of kingdoms of the Continent while others cite it in relation to a particularly strong period of economics (Barrett, 2008; Bagge, 2010). This process began first in the most southern of the early medieval kingdoms, Denmark, but spread north along with the conversion to Christianity until Sweden was converted by the early twelfth century, much later than the north Atlantic settlements to the west (Barrett, 2008; Bagge, 2010; Sawyer & Sawyer, 2003, p. 39; Derry, 1979, p. 41). Due to the spread of Christianity Latin text was acquired and resulted in a wide variety of textual resources being produced by a people with a previously strong and complex oral tradition (Sigurdsson, 2007, pp. 286, 295; Sorensen,

2000, pp. 26-8; Quinn, 2000, pp. 30-1; Whaley, 2000, pp. 167-9). Increasingly researchers are faced with some form of the text in question related to the actual and perceived liminality of the expanding Scandinavian populations and any impact this may have had in the subsequent descendents.

The expansion of peoples into the North Atlantic has been a topic of much academic consideration and publication over the years, fuelled by a substantial corpus of both archaeological and written sources that are primarily associated with Early Medieval Norse. There have been fewer considerations regarding the peoples aside from this Scandinavian tradition, such as the *Papar* who preceded the Norse in the movements west and the Thule who shared the Greenlandic waves.

1.3.1 Norse

Although there have been several considerations of the entire North Atlantic they have been primarily associated with the Norse movements and resultant human impacted landscapes alone as opposed to a wider variety of cultural vectors (Barrett, 2008; Amorosi, et al., 1997; Dugmore, et al., 2005; McGovern, 1991). North Atlantic settlements have long been a subject of archaeological research as well as more textual based considerations. This interest is linked to the early efforts of antiquarians who had been inspired by saga material and folk legends. In this view, the evidence provided by Icelandic sagas in particular was seen as being a true representation of the past able to be easily corroborated via archaeological excavation (Fríðriksson, 1994, p. 182). The impact of this cannot be underestimated, particularly in Iceland but also in the Faroe Islands as well. By the beginning of the twentieth century, this individual interest was being funded by nationally interested museums and universities, involving the local

infrastructure to a lesser degree (McGovern, 1991, pp. 333-4; Svanberg, 2003, pp. 36-8). One of the most influential of these during this period and even to this day, is the Department of Antiquities and the National Museum of Denmark, which funded much of the earliest excavations in the Faroe Islands and Greenland (Stummann Hansen, 2002; Svanberg, 2003).

Archaeological surveys and excavations which were conducted during the inter-War period and immediately following World War II, too, exhibited the nationalistic influences of the previous decades although not necessarily always from museums and universities (Svanberg, 2003; Fríðriksson, 1994). Due to this, some of the more remote sites of the North Atlantic were found. Other excavations, on the other hand, were conducted under rescue conditions, often due to the effects of coastal erosion that is almost unavoidable when working with maritime and littoral populations. A striking example of this can be seen in Kvívík in the Faroe Islands, where the Viking Age longhouse and stable had partially eroded into the North Atlantic by the time of excavation (Dahl, 1955; Dahl, 1970, p. 67).

Localized considerations became much the standard practice during the mid-twentieth century, with little in the way of cross-regional integration. Each island group were considered to be metaphorical and physical stepping-stones for Norse culture to move *en masse* west across the Atlantic. By the 1970s and early 1980s sites in the Northern and Western Isles of Scotland as well as Caithness began to be excavated which intensively began to change this point of view, however (MacGregor, 1986 [unpublished]; Lane, 1983 [unpublished]). These excavations were the result of rescue work and previous survey and highlighted the fact that this was a region of great

importance in its own right prior to modern times. Contemporaneous to these events archaeological excavations began to be conducted in a much more standardized fashion- a prerequisite for interregional comparisons and considerations. This included systematic and widespread use of fine mesh sieves, sampling, and floatation techniques amongst other things, which has resulted in the standardization of archaeological data in accordance to quantifiable scientific evidence. Theories and ideas based on not only the individual but also societal impacts on site and text construction began to find their way into archaeological thought in. These theories began to provide an ideological framework more suited to the multi-contextual situations found in the north Atlantic and are discussed in detail in Chapter 2 of this work.

As time passed more and more researchers interested in north Atlantic topics began to realize and recognize the high degree of integration found within the region within publication. By the late 1980s the first major conferences, regional considerations and edited volumes began to appear in publication (see McGovern 1991; Bigelow, ed. 1991; Samson, ed. 1991; Morris and Rackham, eds. 1992; Batey, Jesch and Morris, eds. 1993). The idea that the islands were not just peripheries to a continental European power but also held other function within this system spread during this time, in turn influencing up-coming graduate students. This idea became central to subsequent works of the region and recognition of the culture contact that occurred during the Viking Age became more widespread in published considerations.

The peopling of the Atlantic archipelagos is not considered in a similar manner to Pacific archipelagos primarily due to historical precedence with heavy nationalistic overtones indicative of the early modern period. Comments such as these began to help change

this view. International research groups such as the North Atlantic Biocultural Organization [NABO], spread these ideas and concepts further while providing an ever-increasing research network. The early 1990s saw not only the first cross-regional considerations but also wider growing interest in culture contact studies within archaeology and anthropology in general. This was especially evident within former Colonial areas of the world. Whether this is a reflection of the wider multicultural movement found within the social sciences and humanities during this period or a wider need on the part of former occupied lands to determine where the history books told the truth and where they lied is somewhat dependent on the personal context of the researchers at the time. This is important in relation to the north Atlantic as every settlement became colonial in relation to the medieval Scandinavian kingdoms over time.

Alongside this intensification were published works on Greenland and Newfoundland that were more associated with the millennial celebration of Leif Eriksson's landing on the North American continent. In the light of the anniversary the materials which have resulted have focused not only on the context of north-western European movements, such as the Fourteenth Viking Congress held in Torshavn in 2001 which was directly themed "Viking and Norse in the North Atlantic" (Mortensen and Arge, eds, 2005) but also indirect considerations of Vínland and Leif Eriksson.

An example of the latter is the 1999 international colloquium organized by the Sigurður Nordal Institute at the University of Iceland which was themed "*Vester um haf*" the repeated term found within saga evidence which refers to the travel of ships westwards beyond Iceland (Wawm and Sigurðardóttir, eds 2001). Directly translated this term is

'west over sea' and has subsequently become a favoured title reference to pertinent publications (see Ballin Smith, Taylor and Williams, eds 2007 for the most intensive of these). The *Vester um haf* Colloquium proceeding's Preface in particular, as well as other volume introductions from this period, also highlights the heavy involvement of nationally politically-minded institutions however. Myth maintenance being integral to the maintenance of modern ethnic groups has become a particular problem in relation to Scandinavian archaeological and historical research over the centuries (Svanberg, 2003, pp. 111-112; Fríðriksson, 1994, p. 184). Because of this, certain regions in particular are strongly associated with certain saga episodes and sagas while artifacts and sites that do not necessarily promote this view as strongly are given less weight than they would in a more ethnically and/or politically neutral situation. This interest exists in more than just the international researchers based outside of the north Atlantic region do. However, as major museum exhibitions and publications have shown, the Smithsonian's "Viking: The North Atlantic Saga" exhibit not only held a successful place within Washington DC but a smaller travelling exhibition also travelled throughout major American museums for several years. Much of this past decade has been spent continuing the trends towards interdisciplinary international considerations. The publications of the conference proceedings from the late 1990s and early 2000s have largely been completed and published.

International conferences and colloquiums held in recent years seem to have focused upon the contextualization of the new material into the existing Viking Age and medieval North Atlantic corpus as well as more global events. In 2008, the *Maritime Societies of the Viking and Medieval World* Conference was held in Kirkwall, Orkney. The aim of this endeavour was specifically detailed within the title (Barrett *et al* 2008: unpublished

conference information materials). The NABO conference for the same year was associated with the International Polar Year efforts of the global research community. However, as in previous conferences this was also a time to update the NABO international research community and audience on current work in the field. This is a trend that was also expressed in the *New Directions in Medieval Scandinavian Studies Conference* held at Fordham University's Center for Medieval Studies in 2010. This particular conference advocated intense discussion of all aspects and regions of Scandinavian influence (Kowaleski 2010: personal comment).

Thanks in no small part to the efforts and funds of institutions such as NABO and the variety of National Museums, libraries and archives data related to the North Atlantic region there is a wealth of reliable evidence available for modern researchers. The recognition of the necessity of interdisciplinary work within the north Atlantic dominated the 2011 Viking Society for Northern Research Student Symposium where each of the speakers advocated greater interdisciplinary communication between archaeologists and literary specialists (Brink 2011: personal comment; Lee 2011: personal comment; Fríðriksson 2011: personal comment; Hines 2011: personal comment; Jesch 2011: personal comment; Abrams 2011: personal comment). This work attempts to fit within this scheme of multivocality.

1.3.2 Pre-Norse North Atlantic Populations

Although this study is primarily focused upon the Scandinavian related settlements of the north Atlantic it is very important to remember that this is not the only population for which there is evidence for, it just happens to be the population which has the majority of the evidence. There is a long history of folklore and interest in the peoples

who came before, up to and including the incoming Norse populations of the seventh and eighth centuries. Icelanders in particular appear to have held a strong interest in the history of the land and its people and as a result, such topics are the focus of several sagas and informative Scandinavian texts such as the *Historia Norwegiae* (Fríðriksson, 1994, pp. 184-5; Svanberg, 2003, pp. 93-94).

This is a topic with little in the way of solid evidence due to the maritime environment and the organic nature of the material evidence. In fact the earliest voyages would have been undertaken in wooden or hide covered boats that could have easily been drawn up onto shore rather than requiring a proper harbor (Cunliffe, 2001, pp. 66-67; Greenhill & Morrison, 1995, p. 92). Vessels of similar types and their predecessors would have been involved in the early settlement of Orkney, Shetland, the Hebrides and the islands of the Irish Sea. They may originally been following currents, winds or even migrating birds and animals. They would not have left much evidence of this movement visible in the land or seascape. Networks of trade and exchange maintained through hierarchies of social obligation similar to elsewhere in Western Europe would have extended from the Continent to at least the North Sea and Irish Sea regions extending networks to early urban centers in north-western Europe. How far these early voyages actually went is lost to time unfortunately, however, because of their occurrence a particular type of folktale developed: the *immrama* tale. This type of tale also in turn was partially absorbed by Christian tradition. In fact, the Christian element of this earlier maritime population is that which subsequent populations have best remembered. Amongst the contemporary non-Norse sources, particularly Adomnán and Dicuil, are descriptions of hermetic priests who lived on the most remote of those islands and sea-stacks at sites such as the sixth century monastery at Skellig Michael (MacDonald, 2002, p. 15; Dumville, 2002, p. 125).

The other body of evidence, which may or may not be directly linked to these ascetic priests described above, is related to the *Papar* described within Icelandic and Norwegian sources and remembered within the toponymic geography of the north Atlantic.

The *Papar* present a unique situation in terms of this consideration, as they are not equally represented across the various types of evidence available. Migratory populations more often than not leave little in the way of physical evidence must be considered. With relation to considerations of *Papar* the lack of physical evidence has caused a dominance of written and toponymic studies of the topic-, it is easier to find evidence for the *Papar* in these sources than anywhere else is. The Papar, as ecclesiastics and not a biological population are discussed in detail in relation to the Church in Part III.

1.4 Specific Aims of the Thesis

The primary aim of this work is to examine the construction and maintenance of Scandinavian-based identities involved in settlements found within the north Atlantic from AD800-1250 via the utilization of multiple data sets. This has the benefit of not only providing an internal means of crosschecking findings but also highlights the multilayered complexity of the human condition (Blakely, 2008, p. 18). This is an area known to have a high degree of inter-regional homogeneity concerning material culture. As a result, this has necessitated a more interdisciplinary approach that encompasses a wider variety of evidence including archaeological evidence as well as medieval written material. This allows for the utilization of multiple data sets that have the benefit of not only providing an internal means of crosschecking findings but also highlights the multi-layered complexity of the human condition.

In order to study the multi-layered complexity of the north Atlantic situation some breakdown is necessary for analytical reasons (Jenkins, 2010, pp. 37-48). This includes analysis of the cultural structures of society, which affected not only the community and society but also family units (Bourdieu, 1990, pp. 441-442; Jenkins, 2008, pp. 198-199; Jenkins, 2010, pp. 58-64; Jones, 2007; Sahlins, 1985, pp. 144-145). This practice is evidenced by a variety of human impacts and products, some of which are physical in nature and some of which are more ephemeral, and so as a result this investigation must too be multivalent. Although this is not necessarily a new idea in terms of social theory, its application to the North Atlantic as a unit as opposed to a portion of the area is new to research in this Scandinavian settled region. It is important to highlight the strategies that became part of being an inhabitant of any of these island archipelagos including the generalized Norse responses as well as the more localized pragmatic strategies that dictated by the environment. In order to better examine and compare this region has been broken into three zones for consideration.

Another specific aim is to examine what happens when nationalistic elements imposed by colonizers of the north Atlantic impacted cultural identities following the initial settlement period rather than prior and during settlement as experienced in more modern efforts of colonization. This occurred when Norway and the Hansea controlled the north Atlantic trade thus encompassing the informally settled archipelagos in medieval political and economic networks (Sawyer & Sawyer, 2003, p. 163).

Unlike the more widely studied post-AD 1492 movements of Europeans west the nationalistic elements which are found within the vast majority of the written sources from the medieval period through to well into the twentieth century are largely

anachronistic to the onset of the Norse north Atlantic settlement. The impact of modern European nationalism is something that cannot be downplayed when it comes to research in the North Atlantic. There are beneficial aspects to this such as funding for major archaeological excavations such as the Danish Gård under Sandet [GUS] site excavations conducted in northwestern Greenland as well as the means necessary to conserve medieval manuscripts and as such, much acknowledgement must be made. On the other hand, however, the negative impact of nationalism is also felt in the North Atlantic, particularly in publication and has been for quite a long time. Saga research and archaeology in particular have become linked over time through the utilization of pseudo-history as fact. Another specific aim of this work is to examine what happens when those nationalistic elements imposed by other colonizers of the New World impacts cultural identities following the initial settlement period as occurred when Norway and the Hansea controlled the north Atlantic trade networks (Sawyer & Sawyer, 2003, p. 163; Gaimster, 2005, p. 410).

Lastly, the final aim of this work is to utilize written texts for their anthropological insight into Norse north Atlantic identity construction and maintenance. In order to do this personal translation of Old Norse texts and passages has been undertaken. This is not a common technique for modern archaeological considerations outside of Scandinavia (Svanberg, 2003, pp. 111-112). There is a distinct difference in how the study of Norse culture is conducted modernly in comparison to the major late nineteenth century Scandinavian excavators as those modern researchers who study the archaeology of the region and those who study the substantial amount of literary material have imposed a definite distance between themselves. This was not always the case with the earlier studies conducted and to a certain extent some of the sense of an *entire* culture has

been loss as a result. The utilization of such material in this work is to correlate data concerning societal and class structures as opposed to utilization of such material as an infallible written history of events- one of the critiques often imposed on those earlier studies (Fríðriksson, 1994). Internal and external views of identity construction, history and daily domestic life are provided by contemporary written sources. This provides a view not only from within the culture under consideration but also a view of how people not within the group considered the group in question.

1.5 Study Format

Evidence for this consideration of medieval Norse identity construction and maintenance is presented in a manner that highlights both the microscale and macroscale aspects of identity. As the concept of Norse identity, of what it means to be a part of the Norse culture and what other people considered that identity to consist, changes through time and across the space of the region a method of simplification and categorization has been utilized in the format of this work. Part I focuses upon the introduction of the north Atlantic region settled by the Norse as well as the assumptions and theories associated with this study. This consists of Chapters 1, 2 and 3. Part II consists of the case studies designed to present the microscale evidence for identity found within each of the regional Zones of settlement. Each of the three Zone case studies is presented in two chapters- a chapter devoted to the presentation of evidence as well as an analysis chapter presenting aspects of microscale identity. Evidence data is presented in table form within the text of these chapters as well as more completely by site presence and absence tables found within the Appendices. The criteria utilized in the creation of these tables is derived from artifact lists of well excavated and dated maritime Scandinavian farms and settlements and is presented in a manner similar to skeletal presence and

absence charts for ease in consideration. They have also in some cases incorporated textual evidence related to certain regions and farms as well to more directly compare aspects of identity practiced in a variety of media. Part II consists of Chapters 4, 5, 6, 7, 8, and 9. Part III is devoted to the discussion of macroscale elements of identity and evidence as well as the external vectors and drivers of identity present in the north Atlantic. This consists of Chapters 10, 11 and 12. Part IV of this work is composed of the Appendices. Appendix A holds illustrations while the raw data tables compiled during the research for this consideration are within Appendix B. Illustrations and tables included in the appendices' will be designated by Figure and Table numbers while those maps and tables which have been included with the text of this work have been designated by letters. The personally translated medieval Norse text *Grænlendinga Saga* has been included in Appendix C while *Eiríkssaga rauða* has been omitted due to word number constraints.

Chapter 2 Theoretical Approaches

2.1 Introduction

This chapter explores the theoretical concepts behind this consideration of the Viking Age and early Medieval north Atlantic. Some of the background of research that has helped to create this context is discussed. The Norse settlement of the north Atlantic occurred at a convergence of major events any one of which on its own would have formed a major driver and/or vector for change within identity construction and maintenance of the region's populations. Although this topic requires the consideration of a wide variety of evidence, the utilization of a multivalent and fluid concept of identity and ethnicity allows this material to be more efficiently used and considered in light of the development of actor-networks described by Latour and Sindbæk. By doing this the relationships and social obligations of these Atlantic populations, the very drivers and vectors of social change, are highlighted to a greater degree. At the basis of this is an essential perspective that at its most basic culture has been created by groups of people initially to provide humans with a 'blueprint' of how to relate and inter-relate within their environments. Society is not only embedded in the individual actor but is also produced by the actor. In order to do this an explanation of what identity and ethnicity is necessary.

2.2 Identity and Ethnicity

This work relates to the multivariate nature of identity and ethnicity as conceived of by Jenkins (2008; 2010) and its application to the discipline of archaeology (Jones, 2007). As such, definitions for identity and ethnicity need disclosure. These are concepts that have become increasingly more focused upon as the fluid nature of identity and ethnicity is more widely accepted. They recursively compose and direct the concepts of habitus and doxic practice. Identity is the name for the collection of

personal assumptions, beliefs and knowledge utilized in the internal and external identification process which occurs during all individual and group interactions (Jenkins, 2010, pp. 16-18). It has a wide variety of expressions both conscious and unconscious produced- some of these are tangible while others are not. Identity is important because it provides a means of exploring the human experience in the span necessary for study of cultural structures only visible in considerations of the longue durée, which in turn are a portion of the complete culture and group identity (Jenkins, 2010, p. 18). Identity presents most consistently through the examination of choices made (Jenkins, 2010, pp. 200-201). Thus, choice becomes a common denominator of study. In studies of living populations, examination of choice occurs through fieldwork and interview as well as the examination of the intangible and physical residue of such choices (Jenkins, 2010, pp. 158-159). Hence, in fieldwork the choices of who to talk to is considered alongside the physical aspects of what was brought home for dinner.

The environment including the social context of social hierarchy and power networks influence identity (Jenkins, 2010, pp. 35-48). Social theorists including Jenkins and Jones have taken efforts to acknowledge the contextual choices made during the construction and maintenance of identities, both individual identities as well as group. In terms of evidence, this will be reflected in varying degrees to object choice that ultimately results in archaeological assemblages on sites but in a similar manner to the authorial and editing choices made during the construction of written material. Ethnicity is another important factor to consider as in certain frontier situations, such as New Spain, ethnicity was the most important factor in finding position within the peripheral area's economic and social hierarchies (Jones, 2007). Meskell cites there being two levels of operation to social identities- an individual level and a broader social level that relate to each other recursively (2007, p. 24). This

view is quite influential in allowing for a more complete application of Practice Theory to this study. The individual level is the subjective actor who "[...experiences many aspects of identity within a single subjectivity, fluid over the trajectories of life" (Meskell, 2007, p. 24). The individual level is easily collected from living populations rather than archaeological material and as a result is not focused upon in a region where group solidarity equates with survival. The social level, on the other hand, is where "[...] identities are defined by formal associations or mores" (Meskell, 2007, p. 24). These are found within the dialectical tension expressed by Bourdieu concerning Practice Theory. The individual actors experiences and expresses themselves in the subjective world while the broader social level is where occurrences that are more objective take place. This is explored further below.

An individual actor within a group establishes their identity and to a lesser extent their concept of *self* through the utilization of goods and resources in unique methods and combinations which are recognized as 'belonging' to a particular affiliation as well as actions and techniques that are associated in a similar manner. In general, identity is seen as being influenced in some way by childhood events as this provides the means of comparison throughout the rest of one's life, the basis for *habitus* (Jenkins, 2010, pp. 76-81; Bourdieu, 1990, p. 165). There is some conscious choice on the part of the actors as to what the identity is formed from. Perhaps most importantly humans may concurrently hold multiple identities that may or may not be expressed at the same time. These identities may or may not interact with one another themselves. Modern considerations of identity are more likely to consider the individual as a primary subject of interest while archaeologically identity has been more concerned with that of groups (Jenkins, 2008, pp. 169-170; 2010, pp. 200-206; Jones, 2007, pp. 52-53).

Social Field		Individual Field
Structures of objective reality which informs the conditions of existence including modes of economic, social and political production	**Dialectical tension**	Structures of subjective consciousness which are composed of dispositions and habitus of individuals
Interactions between individuals		Aspirations of agents and actors
Conflicting modes of exchange and economy, including reciprocity		Actions of agents and actors
		Subjective demands
		Subjective principles of organization of people

Table C Dialectic tension found within Practice Theory.

Groups may also concurrently hold multiple identities that may or may not be expressed at the same time and which may or may not interact with one another. At this level, we find the impact of wider kin groups as well the impact of relative ratios of gender and age within human populations. The impact of location upon several aspects of identity must also be considered, including but not limited to livelihood, subsistence and habitation. These are groups which are affected by and supporting of similar social norms, morals and ideals. Archaeologically this may be expressed in such ways as certain building construction practices and landscape utilization (Sindbaek, 2008, p. 174; Sindbaek, 2007). Evidence of communal activities must also be included in this as well including certain types of artifact utilization. "[M]aterial culture [... it] plays an active role in the structuring of cultural practices, because the culturally specific meanings with which material culture is endowed as a result of former practices influence successive practices and interpretations" (Jones, 1997, pp. 117-118). This is particularly relevant in the strong kin groups of the north Atlantic that became associated with certain farming regions. In written sources, this often expresses itself in the form of localized recorded place names and the promotion of localized history. Icelandic sagas for instance are regionalized in content and technique, particularly in reference to certain manuscript copies (Lindow 2003: personal comment). This has much to do with the patron of the edition's relationship with the saga-scribe.

Ethnic and national identities build upon this concept, as they are essentially group identities adopted by a wider group often across a larger physical region. These are identities that contain multiple groups and individuals, which share elements of common habitus. The adoption of certain ethnic identities is influential to intrapersonal and intercultural power relationships. This has become an increasingly powerful vector in the north Atlantic as the history becomes more embroiled into

modern politics (Fríðriksson, 1994, pp. 181-182; Jenkins, 2010, pp. 76-81; Jones, 1997, pp. 116-117; Svanberg, 2003, pp. 98-99). Identity has its roots in the anthropological concept of the family, a known form of group identity.

The family in an anthropological sense moves well beyond the biological definition to include all that is inherited by the individual actor otherwise known as the estate (Graburn 2002: personal comment). The symbolic estate of a group is an integral part of their identity and helps to establish the doxic practices described by Giddens and Bourdieu. This includes not only the family name but also their ancestors including the parent generation, family stories and myths. It can include recipes and cooking techniques as well as a wider body of elements as well such as family economic strategy. The symbolic estate of the family is core to their sense of taking in the world as it forms the basis from which to compare and contrast subsequent life experience (Graburn 2002: personal comment).

Ethnicity is a term which is often associated with identity but has a wider impact than an individual actor and so might be equated with a cultural identity which may or may not have a genetic basis (Meskell, 2007, pp. 24-25). According to Jones, "[...] ethnicity is a product of the intersection of the habitus with the conditions prevailing in any particular social and historical context" (Jones, 2007, p. 53). As such, it may be more advantageous for members of an ethnic group to promote their membership over others. Jones goes on to describe it "[as] both a transient construct of repeated acts of interaction and communication, and an aspect of social organization which becomes institutionalized to different degrees, and in different forms, in different societies" (Jones, 2007, p. 53). This is a much more complex process than assimilation or cultural blending as it involves the dynamic and active process of change of ideas amongst diverse fields rather than a perfect mix or cultural domination (Silliman,

2001, pp. 204-205; Silliman, 2001, p. 381). New cultures emerge from diverse elements via the creation and negotiation of cultural identities.

Medieval and prehistoric identities add another layer to this already complex concept, however, as researchers are working within a time period where nascent widespread cultural identities and medieval kingdoms were still consolidating and negotiating their power in the world while individual identity as an idea would not truly begin to arrive in Western thought until the Enlightenment (Bedos-Rezak, 2000). Ethnicity and identity during this time is, if anything in more flux than the modern period as the cultural norms, mores and associations were not firmly defined let alone being imposed. During this period it was much easier to adopt regional identities and affiliations, as it was harder to prove individual identity beyond any doubt. A major influence on this is undoubtedly the impact of economic studies which most often began their consideration with the onset of the modern period as this coincides with the large amounts of continuous written accounts which makes economics studies possible being begun (Braudel, 1981). Because of this lack of formal definition during this period, an actor's ability to assume a secondary identity aside from their childhood identity would have been greatly enhanced.

Archaeology is an ideal method for studying the practices associated with the cultural expression of identities, as mentioned earlier, especially within a localized site which corresponds with the most basic and immediate level of society (Jones, 2007, pp. 45-46; 1997, p. 110; Hodder, 1993). The idea here is that the identity that is displayed via the material evidence of an archaeological site is unique because certain contextual aspects of the site's placement in the physical, social, economic and political landscape are unique. It may not be possible to see the most telling of those unique aspects due to deterioration, subsequent land use or even the fact that some

aspects of the site's unique nature was not physical at all (Jones, 1997, p. 117; Sindbaek, 2008, pp. 172-173). This is equated to the type of information that can be derived from assemblages of human osteological material found on archaeological sites- individuality and unique aspects may have been lost with the flesh (White, 2000). Unfortunately in this case those aspects intangible aspects of identity and ethnicity are lost, however much can be done in spite of this through analysis and correlation of a variety of evidence types which shall be discussed below. There are individual aspects as well as group aspects of identity that co-exist in multiple layers. In relation to this study, north Atlantic identity is subjected to bipartisan consideration at microscale and macroscale levels discussed below. Actor choice and the responses to the context of both the individual and group levels result in a spectrum of responses. In this way the habitus, doxic practice, institutional influence and actor's choice can be seen as co-existing in such a way that the inter-play results in human identity creation and maintenance.

2.3 Levels of Identity

It is important to stress that this division of identity levels is somewhat arbitrary as the nature of the evidence shows that identity is in reality a spectrum ranging from the level of the individual ego (microscale) through to interregional groupings (macroscale). Determining where one designation's space is from another can be difficult and requires the corroboration of a variety of sources of evidence as well as a substantial data set for cross-comparison.

At the basis of these societal levels are individuals for which the physical evidence may be quite ephemeral in nature and the written record is often anachronistic in nature. Because of this consideration of the individual is generally avoided, utilizing family and farm groups instead. Hence, this level consists of many individuals.

Microscale considerations focus upon evidence of the impact of the familial estate of the nuclear and extended family as well as the relative placement within the local hierarchy and exchange networks. Familial estates can include aspects of identity such as occupation, religion and physical location.

The microscale level of identity is the one that presents most often in the daily practice of living populations (Bourdieu, 1990, p. 163; O'Sullivan, 2008). This study examines this through artifact placement diagrams that show space utilization, site maps and photographs as well as relevant written evidence charts when possible. Unfortunately, given the antique nature of the evidence for the north Atlantic settlement some of the greatest difficulties lie in recognizing archaeological material such as artifacts with their original cultural meanings and associations. Written evidence containing ethnohistorical details can be particularly useful for this. What has often occurred in past Norse north Atlantic studies is heavy interregional cross-utilization of archaeological and textual comparisons. This simultaneously reinforces the macroscale presence of a singular Norse culture and hence identity while obscuring the creation and growth of subsequent island identities.

The microscale level of identity in this study includes the evidence of choices and dispositions that relate to the success and decline of a small local population, i.e. that of a farm. Elements of microscale identity are composed of multiple local events and individual interactions that physically occur locally with a shared habitus of kin or employment group. The physical evidence of microscale identity includes artifact choices linked directly to the excavated site. This can be both domestically produced goods and trade imports shown via artifact presence in assemblages as well as evidence of onsite utilization. The interactions within a localized network of sites, as opposed to the wider north Atlantic network, can also influence microscale identity.

Evidence includes those patterns and trends which fluctuate and change within a normal human lifespan. This can be the choice in construction material and architectural forms of buildings serving a local community, which are a direct result of the local environmental demands. These directly result in the adaptations unique to the local environment.

Macroscale considerations are possible due to evidence for long-term and far-reaching patterns best exhibited via continued production and emulation. Evidence for this includes the traditions related to architecture, subsistence and agriculture. These distinctive patterns of utilization and exploitation are passed generationally unchanged over the centuries. This includes the physical evidence of long house, farm format and byre construction. For later sites under consideration, this may include church construction and the overall placement within the available landscape of the north Atlantic as well. In terms of language, macroscale elements can include language structure and format such as syntax and morphology as well. In order to do this presence and absence charts allowing for the more direct comparison of sites, maps of ecclesiastical placement in relation to secular settlements as well as site comparison directly via photographic comparison. The macroscale level of identity consideration includes evidence of broader cultural and at times even national aspects of identity as well as placements within international networks of trade and exchange. Childhood identities and the collective identity of archaeological sites as well as contemporary written evidence provide the final aspects of macroscale study.

Microscale and macroscale elements are not static but rather respond to social drivers and vectors that explored by social theorists. Medieval textual sources are the most applicable to the macroscale level of identity as they made wide use of preceding and contemporary textual and oral sources as a means of both referencing

as well as legitimization on many levels including social and political. In order to study this level of cultural identity presence and absence charts allowing wider site comparison have resulted from the data found within publication. Regional maps, site photographs as well as ecclesiastical maps have been included to better illustrate the specific aspects of identity being discussed. More information regarding the data tables developed and utilized in this study of the Norse north Atlantic is presented in Chapter 3.5.

2.4 Social Agency and Dynamics

Certain social theorists and philosophers have been particularly influential on the approaches and methodology followed in this research on identity. First is Weber who, perhaps most importantly in a consideration of identities, acknowledged the creative agency of individuals and attempted to account for the great diversity of human life without ranking according to a traditional scale of values and norms (Weber, 1949). This attributes the option of personal choice and includes the particularly vital concept that identities themselves are of a fluid and dynamic nature, subject to boundaries of the same nature. This is vital for considerations of medieval identity in particular. Mauss is another who has heavily influenced conceptualizations of exchange and trade and the variety of impacts which may result for relationships between individuals and societies which was discussed at greater length in *The Gift* (Mauss, 2000).

Social relationships and institutions are intimately located in the all-pervasive economy of discourses of power that is inscribed in everyday life according to Foucault. Power in this social system determines different social forms throughout history (Braudel, 1981, p. 562). Culture is emergent from the relations of power and domination as well as being a form of power and domination in and of itself. Culture

and identity are also mediums in which power is both constituted and resisted. This presents in the archaeological records of many sites in the form of high status goods distribution and building construction techniques (Jones, 1997, pp. 111-112; Jones, 2007, p. 45; Earle, 1987, pp. 290-291; Jenkins, 2008, pp. 58-64; Steane, 2001, pp. 251-275). This may also relate to land choice and utilization techniques within the north Atlantic island archipelagos as well. In all instances, there is a high degree of inter-site comparison necessary in order to ascertain that the evidence presented is not a unique occurrence within the archaeological record but is rather more indicative of group identity practice and construction.

These ideas are quite basic to social theory, however, and allow for no true consideration of time and its impact on human society. Although they do highlight the fact that there are dynamic elements to the construction of culture which was a movement well away from the more static theories of the nineteenth century (Trigger, 2009, pp. 166-210). In order to consider the identity construction and maintenance within the north Atlantic more dynamic theory must be utilized. According to Braudel different historical processes known as structures, are at work on different temporal scales in any society (Braudel, 1981, p. 561; Knapp, 1992, p. 11). These are the levels of history where identity is practiced.

Many of the researchers who followed Braudel would and still do continue to use this tripartite breakdown of cultural time- one of the strengths of the approach when applied to living populations. The focus on long dead populations has resulted in a change in application for this work. This work also utilizes this time breakdown and focuses upon two groupings in particular. The relation to the conception of identity construction and maintenance utilized in the study is shown in Figure D. This is a theory that is comparable to water referred to here as the Sea of Human

Consciousness (Braudel, 1981, p. 3). The *longue durée* relates to deep currents in this Sea, for instance. These structures are the stable elements found within a culture transmitted over many generations of society and like deep-water currents; they are fairly firmly set in course over quite long periods. This level of consideration is critiqued as being environmentally deterministic (Braudel, 1981; Knapp, 1992, p. 16).

To continue with the analogy the *conjecture* equate with tides that affect the Sea of Human Consciousness. These are the cycles experienced by cultures, including but not limited to the cyclical rise and fall of prices, politics and parties and other occurrences that are experienced in cycles (Braudel, 1981, pp. 26-27; Knapp, 1992, p. 11). The *événementielle* are the waves or other surface disturbances on the deep currents of the Sea of Human Consciousness. These are the everyday happenings of sociopolitical events (Braudel, 1981, p. 560; Knapp, 1992, p. 2). One of the weaknesses of the Structure and Event approach is that the impact of micro-history, the *événementielle*, is de-emphasized however. This became a focus for theorists following Braudel although many of the basic units and terms utilized in the construction of the subsequent theories remained the same.

A key in the utilization of Structure and Event Theory and one, which is found amongst the strongest ideas following Braudel, is to examine the intersections of structures and temporal scales. Of those subsequent studies, two have particularly influenced this work. The first is the more widely impacting Practice Theory of Bourdieu (1990) and Giddens (1979, pp. 4-5) which focuses on the idea that the cultural structures exist in the mind are only actualized in the moments of practice. The second of these is Actor-Network Theory proposed by Latour (2005) and advocated heavily in the works of Sindbæk (2007; 2008).

Individuals and groups constantly and continually respond to new situations. Sectorial interests outside of personal interaction also are taken into account. In this system, new opportunities and social relationships come from this as a result. Choices are made to make sense of others as well as what best suits the individual's own sectorial interests and so in this way one is able to deal with ambiguity in the world (Sahlins, 1985). In terms of the north Atlantic, this means that each constituent member carries the ability within them to effect the archaeological record by their choices- but just as likely may not.

2.5 Practice Theory

Practice Theory is based on the assumption that structures inherent to culture should be observable in daily practice. Giddens recognized the duality of social structures themselves as well as the dynamics of social structure as well. According to Giddens, structures exist in the process of being but they are also the medium and outcome of social practice itself. The practice of daily life builds structures and can be transformed in turn by encounters (Giddens, 1979, pp. 64-65). Practice Theory is more often associated with Bourdieu rather than Giddens, however. Bourdieu too followed in the tradition of Weber in the assumption and inherent belief that individuals create themselves during daily practice and the repetition of daily routines. Bourdieu has given a nomenclature to studies of cultural structures and practices that is detailed in Table 1.

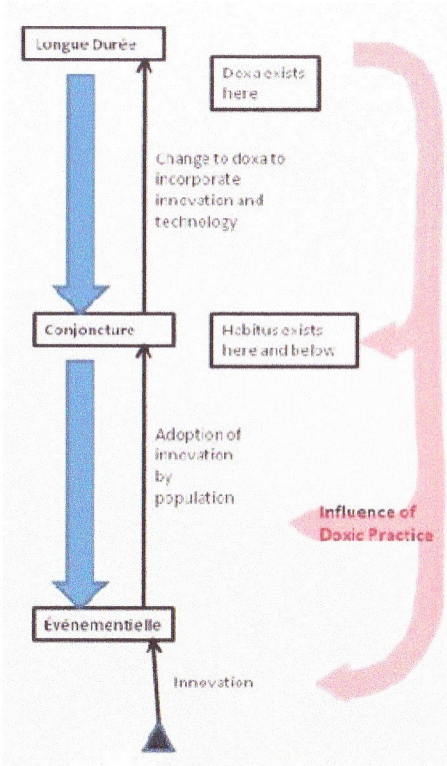
Table C attempts to demonstrate the dialectical tension that is inherent to Practice Theory. There is an emphasis placed on the day-to-day in this theory as this is the place where people play out underlying structures and identities and effectively serves as a microcosm of broader organizational principles (Bourdieu, 1990, pp. 162-163). In relation to the Norse north Atlantic Practice Theory lends some very important concepts. The first is that the individual constituents of a site or region's

population contain a set of individually and culturally specific concepts within them that are expressed in all aspects of daily life from language used within the home to building construction and format to animal preference. Hence, although the populations of Norse and Hiberno-Norse are not the entirety of the Scandinavian population they carry within them the potential to have a very similar spectrum of doxic practices.

Practice Theory is a theory well suited to archaeology as it helps to bridge some of the gaps between consideration of social institutions and individual action. By excavating many types of sites, one can gain insight on the ordering of daily life and cultural constructs (Joyce, 2008, p. 78; Lightfoot, 1995, p. 209).

There are some critiques of its application however, which have resulted in some modification to the Theory of Practice since the works of Giddens and Bourdieu. Silliman poses the concept of practical politics during excavation analysis at Petalumá Adobe to address the fact that some daily practices speak of an outside intentionality and motivation (Silliman, 2001, p. 194; Silliman, 2001, p. 364). Daily practices may become part of political practices through an element of daily negotiation. Practical politics is the negotiation of the politics of social position and identity in daily practices and, importantly, can alter doxic practice.

This assumes two things with reference to traditional identity and culture contact studies: the first that colonial domination includes the control of mundane day-to-day activities. The second is that daily practices of both the indigenous and the incoming population are pathways for exerting social agency (Silliman, 2001, pp. 191-192; Silliman, 2001, p. 380; Lightfoot, 1995, p. 201). In areas of known culture contact, it may be possible to see a reflected view of studied cultures in the actions and choices made. This is not a one-sided application but is rather one that applied



Societal Scales	Scale Expression	Description	Evidence For
Macroscale	Overarching	•Unique adaptations to local/regional environment in terms of architecture, subsistence and agriculture •Language structure and formation and morphology •Sources of variation: climate, including local water knowledge; weather; heat construction and utilization etc which is passed generationally •Interaction between multiple sites occurs here •Trends and fashions in changes in aesthetics of material assemblages but not changes in form, linked to resource and political market •Education externally imposed outside of the childhood hearth •Water becomes as important societally at this level	•Traditional patterns of landscape utilization and architecture •Localized movements during periods •Invariants such as traditional historical words in certain situations such as folklore and poetry •Physical evidence of choices made by a group
Mirrorscale	Extensive aspects	•Local changes to language structure and format which may result in regional dialects •Unique adaptations to the local environment •Unpredictable relating to group success, decline is located here •Water becomes as important societally at this level •Interaction between multiple localities occurs here	•Physical evidence of local choices made by a local group •Architectural trends in material choice •Artifact choice linked to trade •What may be considered to be modern knowledge •Written history, works of poetry, different genres •Patterns and trends which are more likely to fluctuate and change within the human lifespan
	Intensive aspects	•Composed of male, female and individual interactions •Physically occurs locally, often within a shared habitus •The locale consists of many agents •Unpredictable occurring non physical situations located here •Individual innovations in response to the local context and environment	•Domestic site utilization including space •Artifact choice which is linked to the site directly, including both domestic goods and trade imports shown via artifact presence in the assemblage
Individual	No societal aspects present	•The human mind is needs and reactions within the confines of childhood habitus •Basic innovation can occur here to meet these needs and reactions	•Evidence for human subsistence needs of eating, fight or flight reactions (this evidence may actually come in the form of pictures of these) and hence be unpredictable •Epiphenomenalistic

Figure D Practice Theory as utilized in this work.

to both sides and thus enhances a more in-depth understanding of the site in general. The Norse north Atlantic presents a perhaps unconventional presentation of a colonizer in the eyes of modern research. The colonizing process is most often associated with a national colonizer, particularly since the fifteenth century. The primary colonizing base for the north Atlantic was consolidating into national identities at the time of initial settlement however. The majority of the nationalistic overtones found in sources from this region come from subsequent generations.

2.6 Actor-Network Theory

Actor Network Theory is represented in this study by the social theorists such as Latour and Sindbæk who focus upon the integration of such a wide variety of resources. Sindbæk summarizes this in the following way. "*Actor-Networks* are mixed assemblages of heterogeneous material, like pots, people, kingdoms, ships or seascapes. The character of the network cannot be reduced to any one of its properties" (Sindbaek, 2007, p. 120). This theory assumes cultural boundaries to be singular moments within a wider framework of social networking formation and maintenance (Latour, 2005, pp. 131-133; Sindbaek, 2008, p. 172; Sindbaek, 2007, pp. 70-71). It also based on the belief that archaeological artifacts were at some point active participants within cultural practices of the past and as such do more than merely exist in idealized categories (Sindbaek, 2007, pp. 65-66; Sindbaek, 2008, p. 172; Latour, 2005, p. 33).

In this perspective, "[...] a trading-place is not primarily a political or economic structure, but a traffic junction- a point where certain networks of traffic convene. We can be sure that different traffic with different aims produced sites of different character, and that political and economic concern contributed even further to the variation" (Sindbaek, 2007, p. 120). This is a view of particular relevance concerning

the colonization and maintenance of the Scandinavian settlements in the north Atlantic. As the distance involved in this logically resulted in nodal points at certain locations in the north Atlantic- points where the deeper-drafted ocean going vessels of the North Atlantic zone network of communication and commerce connected into the central-place based localized networks. This formed the basis and continuation of exchange via established routes (Sindbaek, 2009, p. 72). These routes were places not only enforced by culture but they also created their own context for culture in and of themselves, rather like aspects of individual and group identity. As Sindbæk has proven in southern Scandinavia and which holds true throughout the Scandinavian settled world of this period nodal points were partially chosen for their utility in transportation and the positive effects this had on long-distance trade networks (2007, p. 128; 2008). This is associated with both physical and textual evidence. It is important to note that the reality of this temporal arrangement has much more in common with a continuum of time rather than clear demarcations. Power relations between varying cultural groups is one of these. The hierarchies and political structures of both the indigenous and incoming populations are considered as they directly and indirectly affect upon the construction of *habitus* and doxic practices (Bourdieu, 1990, p. 445).

2.7 Social Space

It is important to consider the conceptualization of peripheries, frontiers and boundaries, as they are an integral part to not only the theoretical background of this work, but also in much of the source material utilized as evidence. One in particular that must be discussed with reference to this maritime environment of island archipelagos and fjords is the ocean itself. Although the North Atlantic Ocean was an obvious boundary between the islands, it was by no means a barrier. Peripheries and

frontiers, on the other hand, are more associated with the human colonization process (Lightfoot & Martinez, 1995). The traditionalist view of frontiers is that colonists move into open or sparsely populated areas, pushing native populations aside or removing them when found. In this view, the colonists were seen as establishing a periphery for a core that is often portrayed as nationalistic (Lightfoot & Martinez, 1995, p. 473; Rice, 1998, pp. 45-6). The traditional view of this is shown in Figure 5.

There are two concepts that affect this region in particular, although other concepts discussed are more widely influencing to Continental populations. The first of these are islandscapes and the associated concept of 'island-ness' (Frieman, 2008, p. 145). Islandscapes are determined in part by their physical location- islands are land which is in a dominantly aquatic environment, although in the past there have been practical islands conceived which functioned as islands but were not actually islands themselves (Frieman, 2008, p. 145). Islands are often marginal in nature in relation to human habitation due to the reduced variety of species available; they may or may not contain a wide variety of environments. This relates to the effect of the northern latitudes, overall distance from continents for the initial colonization by species and the climate. In spite of all this, what species that represented may actually be quite high in comparison to similar sites on continents. This is due to reduced inter-special competition for resources. Islands inherently have liminal elements to them due to the constant water, air and land interactions. Island mentalities are often related to group identity construction as island locations form a commonality amongst populations of certain group members (Frieman, 2008, p. 144). However, it is also a means of differentiating one's population and is a part of group identity affirmation (Jenkins, 2008, pp. 51-53; Jenkins, 2010, pp. 37-48; Jones, 1997, pp. 92-93; Latour, 2005, p. 33).

The second concept that affects the north Atlantic region particularly strongly is liminality. Liminal refers to threshold areas that may be tangible or intangible in nature. This is often relates to shorelines where there are interactions of air, land and water but liminal actions can also be social and hence less tangible in relation to the archaeological record. Liminality can also exist in the worlds between the spiritual and the secular, between the world of the dead and the world of the living. Coastal areas are the physical interface between bodies of water and land; there are a series of implications associated. Physical implications include erosion, landing place availability and access to natural resources, whether this is through social restriction of goods or restriction through the ecology of the species themselves. The coastal liminal areas provide major resources for subsistence including, but not limited to, fish, marine mammals, seaweed, and birds. Social implications are involved with the fact that liminal areas are areas of forced interactions with more than one environment.

Islands and liminal spaces promote activities that require the inclusion of more than one individual in order to be as successful as possible and hence be of the most benefit to the entire group. At landing sites, this may also be areas of forced interpersonal interaction as well, whether local or long-distance in nature (Sindbaek, 2009, p. 105). Culturally liminal areas are visible within the resultant culture in many ways: relationships between such areas and certain kinship groups may develop which are expressed within cultural practice and localized identity. Social liminality is highlighted in similar fashions. Liminal areas are highlighted through the efforts of cultural practice. They include place names, land utilization techniques, architecture, folk tales and legends as well as festivals, rituals and commemorations. The settling populations of the North Atlantic actively used the liminal nature of their respective island archipelagos to forge their own distinct identities. On the other hand, is this

more of a case of indirect impact- the coastal sites are taken because they offer the most opportunities for subsistence resources and communication? The reality of this situation lies somewhere in the spectrum between these two. Liminality can refer to a particular type of marginality and relates somewhat to the concept of frontiers and boundaries, as it exists in the between space of frontier relationships across mutable boundaries.

The traditional perspective of frontiers and core/periphery interactions tends to be one of domestication. This is heavily influenced by Wallerstein's World Systems Theory (Wallerstein, 1974, p. 38; Wolf, 1984, p. 397), which developed in consideration of the early and more recent modern world, not necessarily core and peripheries of the past (Rice, 1998, p. 478). In this case, however, one must ponder the questions: what occurs when those peripheries and frontiers are located on and around true marine environments? What are the ramifications of forced human interactions within relatively contained spaces over time?

For archaeologists this theory has some recognizable strength including the establishment of a hierarchy with which to examine power relations. This theory makes an accommodation for the study of change over time as well as providing a structure with which to examine boundary situations. However, there are obvious problems with the traditionalist perspective of core/periphery interactions as well.

Frontier boundaries are portrayed as being distinct and the incoming and indigenous populations are often shown as being homogenous. This top-down approach utilizes mechanical models of indigenous acculturation where marginalization of natives occurs. Perhaps the most pressing problem with this theory for archaeologists, however, is that this view of core and periphery encourages macro-scale studies but archaeological sites by their very nature are areas of micro-scale interaction.

A new view began to develop during the 1990s that provided an alternative to the clearly defined traditional view. This alternative promotes frontiers as being comprised of zones of crosscutting over-lapping social networks. These are areas of dynamic multi-ethnic social and economic interactions. There are vectors of individual variation within this as well including but not limited to kin, age, social relations, gender and political relations. Unlike the traditional view on core and periphery interactions in the alternative, neither the incoming nor the indigenous population is homogenous and alliances and identities crosscut between the groups (Rice, 1998, pp. 228-230; Lightfoot & Martinez, 1995, p. 488).

2.8 Assumptions

Some of the major assumptions for this study include perhaps most importantly that this material is well suited to such a consideration (Jones, 1997, pp. 84-85). In the Viking Age and Early Medieval North Atlantic there is a combination of Germanic evidence which is in many cases uniquely well preserved. Archaeological excavations provide artifacts and ecofacts for consideration. Internal and external views of identity construction, history and day-to-day life are provided by contemporary written sources. This provides a view not only from within the culture under consideration but also how people not belonging to the group considered the group in question. In some cases, ethnographic and ethnohistorical information has been considered, particularly with such items of material culture as vertical looms and whaling practices. Another major assumption is that cultural levels, as considered by Braudel and Bourdieu, can be derived from non-living populations, especially across a wider than single site consideration (Bourdieu, 1990, p. 442; Braudel, 1981; Jenkins, 2008, pp. 82-83; Jenkins, 2010, pp. 200-201; Jones, 1997, p. 127). The final assumption concerning the theoretical approach of this work is that the impact of

subsequent centuries does not completely obliterate the extant sources available (Jones, 1997, p. 129). For archaeological sites, this can occur due to site re-usage amongst other things while for written evidence this can be due to scribal error or the subsequent editing and inclusion of anachronistic material.

2.9 The Traditional Norse North Atlantic *Habitus*

The traditional view of the Norse north Atlantic habitus is another important assumption, one with a particularly wide impact, which needs to be disclosed. The Viking Age and Early Medieval Norse have a long history as successful exploiters of maritime environments, both terrestrial and open water. Less often mentioned is the success of these groups with reference to other aspects of maritime environment exploitation. This success was due to an intimate knowledge of maritime and coastal environments ranging from open ocean waters to the littoral zone to the seaside cliffs. It included observations on cloud and wind patterns, experience with localized currents, on the migratory habits of fish and marine birds. The stars, too, provided another means of associating a broader setting while the location of the sun in the sky both provided the means for many maritime cultures throughout history to journey with relative navigational security (Gelsinger, 1970, p. 107; Marcus, 1955, p. 603). All of this knowledge linked intimately into the identities of these maritime inhabitants (Frieman, 2008, pp. 146-147).

As in other parts of the Scandinavian world, "[the sea] was the principle conduit of regional and long-distance communication and social relations, rather than mere political shifts" (Sindbaek, 2009, p. 96). It was the place where truly long-distance routes existed and where the safety of a crew and cargo depended on the social, ecological and geographic knowledge- the social practices- known by at least the helm's man and probably the rest of the crew as well. This formed an integral part of

the internal *habitus* of the crew- every voyage would have been an affirmation of group identity in some way.

Terrestrial environment exploitation leaves the physical utilized by archaeologists as well as elements of identity. The early examples of excavation work conducted in the north Atlantic had also been involved in the major Danish settlements at Vorbasse, Fyrkat and the defensive fortification at Trelleborg- Bruun, Roussell, Brøgger and Shetelig amongst others (Stummann Hansen, 2002; Stummann Hansen, 2001). Indeed cross-comparisons with the well-preserved and widely published longhouses at Vorbasse continued in the nineteenth century holdings of Denmark at archaeological sites in Iceland, Greenland, and the Faroe Islands. When these researchers travelled to the Northern and Western Isles of Scotland, they noted similar longhouse formats at the Brough of Birsay in Orkney and at Jarlshof in Shetland (Roussell, 1934). This became an archaeological affirmation of modern political land claims via the presence of Viking Age physical remains. A lack of known excavated sites and the homogeneity of artifacts found caused the cross-regional comparison early on that has obscured the study of island identity construction and maintenance with a heavy pan-Scandinavian element.

Aside from the physical remains of long house foundations, artifact placement, paleoentomological evidence, geophysical surveys and textual sources provide insight as to how the domestic space of the long house and to a certain extent home farms as well was utilized in a comparative manner. A generalized long house form resulting from this comparison is shown in Figure 6. A long house would have existed within a complex of out buildings to form a farm within a family-based economic network.

Maritime identity construction and maintenance within the Norse north Atlantic presents an interesting situation. At this time, medieval identities were still in flux (Bedos-Rezak, 2000). Due to the nature of their location, maritime identities are inherently in flux themselves although the physical location of sites themselves may often remain the same. No one type of source material presents a complete view of identity construction given the period. The utilization of long- term study allows the evidence considered to add different views and so make the resultant scales of identity more clear. This illuminates cultural considerations in higher detail and highlights their dynamic natures to greater effect. The application of social theory utilized in this study of the north Atlantic as well as the types of evidence under consideration is further detailed in Chapter 3 Methodology.

Chapter 3 Methodology

3.1Introduction

The following chapter lays out how Practice Theory and other social theoretical approaches utilized in the creation of a methodology to achieve the aims outlined in Chapter 1.4. The methodology of this study is a two-scale approach to explore the nature of Norse-influenced island societies in the north Atlantic between c. AD800-1250: examining social identity as expressed in daily social practices of house and farm (microscale); and examining the wider shared social practices that may reflect broader group affiliations (macroscale).

3.1.1 Microscale

Microscale elements of identity in living populations are evidenced via the results of choices made under the influence of childhood and family experience. Results can be both intangible and tangible. Consideration of historic and prehistoric populations limits the evidence available to those that are tangible and have survived the effects of time. Archaeological evidence of daily social practice on the household level as well as that of the farm settlement provides much evidence for Norse microscale identity. These patterns of artifact placement, seasonal resource exploitation as well as midden location and utilization detail how a domestic household would function within the associated farm buildings, local landscape and when possible within the wider local network of associated satellite installations.

Textual evidence varies greatly depending on source type. For instance, sagas are unlikely to discuss domestic tasks such as daily cleaning, as it was a common task performed by women. Contemporaries would have assumed a farmhouse would have cleaning tasks. On the other hand seasonal farm activities were discussed as they provide a time scale for the saga audience. Legal treatises comment upon

standardized concepts of the local farm network system. As such, this material is only used on the microscale level of analysis when the legal treatise in question is from a regional manuscript local to sites under consideration.

3.1.2 Macroscale

Macroscale elements of identity are those that are more broadly shared with a regional population. These are the aspects of identity that are influenced by external vectors such as religion, trade and exchange and socio-political organization. Archaeological evidence for this level of identity includes the physical evidence of formalized religion, artifacts available only via exchange and evidence for hierarchy. During the Viking Age and Medieval periods, most textual evidence is related to macroscale elements of identity. This is primarily due to the nature of authorship during this time as well as the influence of patrons. As textual sources are available, though some intangible evidence both internal and external in relation to the populations can be considered in relation to identity construction and maintenance.

3.2 Forms of evidence

A multi-scalar consideration of identity construction and maintenance such as this work requires input from a wide variety of source material. This includes but is not limited to archaeological material, textual evidence, ecological and climatic evidence as well as ethnographic and ethnohistorical evidence when available. Each of these sources adds their own associated problems as well which adds complications to the consideration. By such a variety of source material discussion and conclusions, concerning socio-cultural levels can be made.

Archaeological excavations and reports for those sites in the north Atlantic that had Norse habitation levels contribute greatly to the evidence for this study. Ideally, these are confirmed with radiocarbon or dendrochronology absolute dating

techniques but in certain areas, this is based on typological and stratigraphic assessments of age. This material often involves viewing maps and site plans that have buildings typologically known to be Norse, including but not limited to bow-sided long houses and straight-sided house and byre combinations. Location choices can be determined from things such as artifact scatter, placement within a regional network and available natural resources. This material provides an excellent and well-established means for the modern researcher to gain a glimpse of the level of individual and site- the microscale and the local identities aspects on the macroscale.

Actually being able to see the physical evidence for a people within their original contexts of social space greatly adds to the amount of information one is able to derive from a site (Joyce, 2008, p. 77; Lightfoot, 1995, p. 199; Parker Pearson & Richards, 1997). Archaeological evidence can span the full range of physical human-impacted material, both direct and indirect, as well as human and animal remains. This includes everything from landscape utilization and household construction to artifacts and ecofacts that provide information concerning the surrounding ecosystems (Parker Pearson & Richards, 1997). The archaeological evidence used within this consideration has come primarily from published works including, but not limited to, books, journal articles and excavation reports. Unpublished reports and personal interviews have been utilized when available. In some cases, personal visits to sites have provided photographic elements to the consideration as well. In those places that have not yet been excavated survey reports can tell of the general architectural format in many cases. Generally, such reports also have some discussion of any surface finds as well. It is also possible to make some consideration of location within networks.

Textual utilization has notorious associations in Viking Age Scandinavian archaeological sites particularly in Iceland (Fríðriksson, 1994; Svanberg, 2003). This

has contributed to modern non-Scandinavian archaeologists largely divorcing themselves from the most contemporary insular historical evidence provided by law-codes and sagas. This work seeks to make use of these sources within reason defined in an anthropological sense. Texts have been chosen based upon their contents as well as reliability and date such as the law-codes *Seyðabrævið* and *Grágas*. Sagas, with widely recognized fantastic medieval elements, have been utilized only within regional contexts.

Here it is important to consider the texts as being social practices themselves for to take such work at face value has proven treacherous previously and distorts views of the past further (Sigurdsson, 2007). It considers texts to be heterocosms of the ideas associated with the culture- written portions of habitus. Thus through this lens the potentially intangible emic aspects of identity may be commented upon. Through these means, texts are able to provide information on difference and similarity in relation to identity, ethnicity and personal interactions. These same values are found within contemporary written texts as well which provide etic views of the cultures under consideration. In some cases where the sources are of a specific ethnohistorical nature it is quite similar to the interviews that take place with living informants. These are qualities in lesser degrees found in all written and oral performance. By maintaining awareness of the existence of these aspects, more informed opinions can be made. References to cultural *habitus* as expressed through practice are looked for including the utilization of space, traditional history and the maintenance of certain ideas concerning contemporary identity. Written evidence provides this consideration of identity construction and maintenance within the north Atlantic a culturally internal perspective for early medieval Scandinavian material. This is the only approach that provides this view on the pre-modern era, as the other available evidence inherently provides culturally external evidence. As

such, it has been included with cautious consideration of the textual histories and contexts themselves.

The majority of the quoted Old Norse evidence included within this consideration of the north Atlantic has been personally translated into English and subsequently submitted to critique by medieval Norse specialists. This was done for several reasons. This allows for cross-textual comparison upon a consistent basis as of comparison as not all material has been translated with little in the way of subsequent editing. This also allows the written evidence to be considered more broadly than merely focusing upon the specific events of the individual people found within. A side benefit to this is the promotion of interdisciplinary research within Scandinavian studies.

Ethnohistorical accounts and ethnographic studies can also be incredibly useful in the reconstruction of identities, especially in areas of higher levels of cultural interaction such as distanced island archipelagos (Sahlins, 1985, p. xi). Ethnohistorical sources are mainly provided by the Norse written evidence that discusses the peoples encountered along the way. Examples which shall subsequently be studied in greater detail include *Grænlendinga Saga* and *Konungsskuggsjá*. Ethnographic evidence, on the other hand, is gathered and made more widely available by trained observers. In certain cases, evidence from indigenous oral traditions is mediated through such source material. This type of evidence is incredibly ephemeral and may change due to context and the impact of subsequent peoples. It is subject to memory loss and story modification of any or all of the storytellers which have transmitted it over the years (Sigurdsson, 2007).

3.3 Geographic Organization of Analysis

In order to compare the changes that occurred in each of the island groups settled by north Atlantic travelling Scandinavians it was necessary to designate zones across the entire region, please refer to Figure 2. These zones were designated on physical location and historical precedence. Notably urban areas, particularly those of Zone 1 such as Dublin and Jorvik have been avoided in this consideration. This has been to focus more closely on the subsistence economy of the north Atlantic farms to better determine exotic market drivers from those that were indigenous to sites. It also allows Hiberno-Norse evidence to be distinguished from evidence which was Scandinavian in origin.

Zone 1 is composed of the Northern and Western Isles of Scotland and the Faroe Islands- the nearest island groups to the Scandinavian homelands within direct sail during the Viking Age. This is the North Sea and Irish Sea region that has been an interconnected web of exchange and power networks since the Neolithic and early Scandinavian interest in the area is unsurprising. As there are several island groups in Zone 1 the case study for this zone utilizes evidence from Shetland and the Faroe Islands. Shetland and the Faroe Islands have been chosen for the Zone 1 case study to gain clarification on the reality of identity construction and maintenance in the island groups. Due to historical precedence during the Middle Ages Orkney and the Hebrides are more widely studied by modern researchers and will be referred to within discussion chapters in Part III comparatively due to the more numerous amounts of publications related to this time period. Excavation plans and environmental studies in particular are more plentiful concerning Orkney and the Hebrides due to British archaeological efforts. There are also direct reliable textual sources simply not available for Shetland and the Faroe Islands that highlights

identities as opposed to Icelandic textual sources only. Shetland and the Faroe Islands on the other hand both remained under the control of Scandinavia for a longer time as well as having received less widespread publication and archaeological survey in the modern era. They shall form the bulk of evidence presented within the case study for Zone 1. Each of these archipelagos is within a direct sailing voyage from the Scandinavian homelands, in particular western Norway, as well as European coastal urban locations such as Dublin. Examination of Shetlandic and Faroese evidence will show a different social, economic and political situation to the more southern affluent and agriculturally viable islands of Orkney and the Hebrides. The islands of Zone 1 also all exhibit evidence of highly restricted wood resources at the time of Norse Landnám whether due to heavy previous human exploitation or a total lack of presence in general due to remote island location from European arboreal populations.

Zone 2 is composed of Iceland. Iceland has an incredibly large body of evidence in publication including archaeological reports but also sagas, their related critiques, formalized trade agreements and medieval law codes. This has required sampling of the available material and as a result the Southern Quarter of Iceland, which historically received the heaviest Landnám population, and the Eastern Quarter of Iceland, which is the closest geographically to Zone 1, has been focused upon within the case study for Zone 2. This is also the area which is best warmed by north Atlantic Currents. As the majority of modern excavations have been conducted in the Northern and Western Quarters of Iceland however certain full farm complexes such those found in Mývatnssveit have been included as well to help provide the more complete data sets provided by modern excavations. Palaeobotanical data and toponymic evidence point to the fact that Iceland was wooded at the time of the initial Norse landnám however both physical evidence and textual evidence support

the fact that subsequent populations caused the forest resources to be exhausted. The entirety of Iceland shall be considered within Part III of this study.

Zone 3 is composed of the Eastern settlement of Greenland as well as the New World Norse site at L'Anse aux Meadows, Newfoundland. This designation is primarily due to differences in available locations for settlement and the effects that this has on the available resources as well as the presence of non-European indigenous inhabitants. The Western Settlement of Greenland is much farther north than the rest of the study area and so is more difficult to include in this sample. Greenlandic Norse farms are known from the areas designated as the Eastern and Western Settlements and so the entirety of Norse Greenland shall be considered in Part III. The singular New World site has been included as Greenlanders and Icelanders, via Greenland, attempt to settle and conducted any subsequent trading in the region that implies the presence of a Greenlandic *habitus*, rather than a separate New World based Norse identity.

3.4 Sampling Strategy

Given the large geographic area in combination with the variety of evidence under consideration for this study sampling has been required. Sites have been chosen as a focus based upon several aspects. The first is that reliable dating evidence is known to exist. The second aspect is that there are complete artifact placement maps and lists, preferably with photographs, in relation to site buildings. The third is that excavations have been conducted to the highest standards possible for the time conducted, ideally with full site survey. These three criteria alone make the north Atlantic collection of viable sites relatively small with certain areas such as Orkney and Iceland being much better represented than others. The utilization of zones also allows for certain textual sources to be considered in relation to the regions,

particularly in the case studies and Part III of this work. The case study for Zone 1 is concerned with the evidence provided by Shetland and the Faroe Islands. In Part III the full zone is considered in relation to macroscale concepts of identity. The case study for Zone 2 is concerned with the evidence provided by the Southern and Eastern Quarters of Iceland as well as any recent excavations in the Northern and Western Quarters of Iceland and Mývatnssveit- the region of the Northern Quarter most extensively excavated and widely published in recent years. These Quarters were established in relation to the regional spring things officially established in AD930 to be held before the Icelandic Alþing during the Icelandic Free State period. In Part III all Quarters of Iceland are considered and evidence from throughout the country is referenced. The case study for Zone 3 is concerned with the Eastern Settlement of Greenland, New World sites on the North American eastern coast as well as the modern excavation of the Farm under the Sand as the site most extensively excavated and widely published in recent years. In Part III both Settlements of Greenland, the New World and the hunting region of Norðsetr are considered.

3.5 Data Creation and Compilation

Data tables have been created which compiles a variety of early Norse farm settlements. This includes both archaeological evidence and textual material. These tables were derived from excavation publications from Borg in the Lofoten Islands, from the Birsay region of Orkney, Sandwick and Sandwick North in Shetland, Toftanes and Argisbrekka in the Faroe Islands, Hofstaðir in Iceland, The Farm Under the Sand in Greenland and L'Anse aux Meadows in Newfoundland. Examined first were site and artifact placement maps and diagrams followed by artifact placement maps and diagrams followed by artifact presence lists and tables. Of subsequent importance is

small finds	
	gold
	silver
	coins
	weights and balances
	weaponry
	horse harness
	high artistic quality
	semi-precious stones
	religious objects
	glass vessels
	copper alloy vessels
	luxury pottery
	production of luxuries
	production of weaponry
	steatite
	bone
	ivory
	wooden objects
	iron
settlement structure	
	large settlement
	large building
	large enclosed yard (> 15m)
	stock pen (< 15m)
	hall house
	cemetary
	wealthy grave
	rune stone
	landing site (shallow,often sandy bay)
	boat house
	fortification
	court site
	infields outfield system
	shieling/ saeter associated in some way
	outbuildings including stables/ byre
	cave utilization
	multi-cellular farm dwelling

landscape setting	
	rich resources
	commanding position
	placed in power landscape
	placed near communication route
	medieval church
	medieval manor
	ready water supply
	whaling area
	relatively flat arable lands for agriculture/ animal husbandry
written sources	
	evidence of royal estate
	evidence of manorial estate
	sacral place name
	organizational place name
	direct mention in saga
	religious written material concerning
	excavation reports
	survey reports

Table D Criteria used in data creation.

associated textual material such as law-codes and sagas. Figure 16 presents the resultant data tables used to analyze data for this bipartite consideration of identity construction and maintenance in the Norse north Atlantic. By seeing elements present on a site quickly in comparison to similar elements on other sites, aspects of what constitutes the Norse maritime farm identity can be highlighted as microscale and macroscale elements.

In order to collect this evidence a variety of techniques has been used. Much of the evidence for this study has been derived from archaeological excavation publications including articles, excavation reports as well as excavation websites where available. All archaeological sources examined have been utilized in the creation of comparative categorizations and tables where all relevant site data is compiled for consideration. This is possible due to the homogenous nature of much of the Norse settlement period material throughout the north Atlantic, particularly about architecture and construction.

Sites were subjected to a two-stage process of tables that are analytically and logistically derived. The first is a qualitative table detailing site directors, excavation years, major publications, and a site description including major details. It is categorized by Zone as well as by archipelago or Quarter. This is mainly a brief list of site material so that information can be found quickly within the evidence. This allows for analysis and comparison to be made in relation to known historical biases on the part of the excavators.

The second table is both qualitative and quantitative in nature and like the first table is site based. This table details key artifact types, structure presence and absence as well as any associated reliable texts. This has been derived from a combination of archaeological excavation and publications of high status farm sites, and localized

Aspects	Small finds (19)	Settlement morphology (17)	Landscape context (10)	Written sources (8)
Poor	0-6	0-5	0-3	0-3
Neutral	7-13	6-12	4-7	4-6
Rich	14-19	13-17	8-10	7-8
Total Point Range	Poor 0-20	Neutral 21-41	Rich 42-54	

Table E Table detailing the relative ranking system applied to site evidence.

regional networks such as Mývatnssveit in Iceland and Birsay in Orkney that provides information on network affiliations and economics as well as burials. It is based on site commonalities but also a range of variation is represented such as the size of stock pens. The table allows for raw material replacement such as iron forms that would be executed in bone. Also included are imports, which provide commentary upon trade and exchange networks. This table provides an equitable means of consideration of a wide variety of source material during analysis.

This also allows a relative ranking of poor, neutral or rich of site information to be made via the assignment of a point to each category ticked per site. This allows for graphs and pie charts to be included on site evidence available and published on all four aspects. These tables have drawn the diverse array of evidence for this consideration of identity construction and maintenance to allow for the more generalized discussion, presentation of evidence and analysis in case study chapters. When relevant portions of the second presence and absence table has been included within the chapter text. The full raw data tables have been included on an accompanying disc in Appendices A and B.

Each of these data sets provides different insights and perceptions of the past. The integration of diverse data sets has been encouraged particularly with reference to identity and social structure reconstruction. The products of such diverse data set analysis inherently are evidence that speaks of differing temporal and spatial scales. A multi-layered framework that employs complementary theories at relevant levels such as Practice Theory requires the direct integration of data sets and in order to keep this a critical analysis there should be separate interrogation of the data sets followed by correlation and comparison. Each source has been considered in terms of the impact of contemporary context, type and, when applicable, in terms of the

author/scribe, theoretical basis and audience. Once the written texts have been excavated and the archaeological data compiled then correlative analysis and corroboration can be accomplished. It is at this stage that evidence on the microscale and macroscale should be the most visible.

3.6 Data Presentation and Analysis

Data has been presented in a manner that highlights both the microscale and macroscale aspects of identity construction and maintenance. As this is something, which changes through time and across the space of the region a method of simplification and categorization has been utilized in the format of this study. Part I of this work is focused upon the introduction of the topic as well as the assumptions and theories associated with this study. This consists of Chapters 1, 2 and 3. Part II is composed of the case studies designed to present the microscale evidence for identity found within each of the regional Zones of settlement. Each of the three Zone case studies is presented in 2 chapters- a presentation of evidence chapter as well as an analysis chapter presenting aspects of microscale identity. Evidence data is presented both in table form within the text of these chapters as well as more completely by site presence and absence tables found within the Appendices. The criteria utilized in the creation of these tables is derived from artifact lists of well excavated and dated maritime Scandinavian farms and settlements and is presented in a manner similar to skeletal presence and absence charts for ease in consideration. They have also in some cases incorporated textual evidence related to certain regions and farms as well to more directly compare aspects of identity practiced in a variety of media. Part II consists of Chapters 4, 5, 6, 7, 8, and 9. Part III is devoted to the discussion of macroscale elements of identity and evidence as well as the external vectors and drivers of identity present in the north Atlantic. This consists of Chapters 10, 11 and 12. Part IV of this work is composed of the

Appendices- the raw data tables as well as personally translated medieval Norse textual material as well as the raw data tables compiled during the research for this consideration.

Chapter 4 Settlement, economy and lifestyles in the Shetland and Faroe Islands c.AD800-1250

4.1 Introduction

The Zone 1 case study archipelagos include Shetland and the Faroe Islands. The entirety of Zone 1 shall be considered within Part III of this work. Unlike Orkney and the Hebrides to the south Shetland and the Faeroes remained under the influence and control of Norway and Denmark for a greater period of time allowing for longer exposure to Scandinavian habitus. Each of the Zone 1 archipelagos is within a direct sailing voyage without layover from Norway and Denmark via the North Sea. The islands of Zone 1 all exhibit evidence of highly restricted wood resources at the time of Norse landnám (Whittington 1996: 99; Johánsen 1985: 93-99). In the Faeroe Islands, the high salinity and reduced growing period have resulted in the lack of timber while further to the east over-exploitation by generations of humans is the cause. Both of these archipelagos are represented inconsistently by modern satellite imagery. Certain areas are as detailed in as much detail as more populated urban regions of the world while others are not represented with as high a resolution. Evidence for this case study has been subjected to collation and consideration within the data tables described in Chapter 3 Methodology. When appropriate, selections from the second table have been included within the text.

4.2 Shetland

Shetland was known as *Hjaltland* during the Norse period. This translates to potentially two place names. The first, Hilt-land, may hint at how these islands looked from the sea. The second, Hjalti's land, may show a social affiliation of the past via the utilization of the personal name Hjalti (Faulkes & Barnes, 2007, p. 104). This island group had been continuously settled for more than four thousand years at the onset of Norse settlement resulting in an anthropogenetically derived landscape



Sites Present

Da Biggins, Papa Stour, Catpund, Jarlshof, Kebister, Upper Scalloway, Old Scatness, Law Ting Holm, Castle of Strom, Sandwick, Hamar, Underhoull, Clibberswick, Norwick, Hesta Ness, Standibrough, Strobister, Kirki Geo, Breckon Cullivoe, St Ninian's Isle, South Whiteness, Ward Hill, Setters, Watlee, Stoora Toft, Soterberg, Gardie

Figure D Shetlandic archaeological sites from the Norse period of occupation.

(Owen & Lowe, 1999, p. 7; MacGregor, 1986 [unpublished]). Areas where specific efforts at improving agricultural viability of settlements were sought as these were known production sites. Examples where this may have occurred include the multi-period sites at Kebister, Old Scatness, Underhoull and Jarlshof. Shetland was subject to the elder law of the Gulating, *Gulatingslova*, from western Norway until the revisions of Magnus Erlingsson [r.1161-84]. Following these revisions, Shetland continued to be subject to the *Gulatingslova* in the form of oðal law exercised in Orkney until the acquisition of the archipelago by Scotland in AD1468 from the kingdom of Denmark (Eithun, et al., 1994, p. 9). The inclusion of *Gulatingslova* provides a further element of evidence for this study. Laws were physically applied to Shetlanders via assemblies known as þings. Evidence for these survives as place names in the landscape. Tingwall on Mainland is the most famous for this island group.

Overall evidence for Shetlandic archaeological sites sits at a neutral position on the relative scale, please see Figure 18. This is linked to the amount of archaeological survey that has been done in the island group. When the rest of Shetland, with 11 known sites, is compared to Unst alone with 30 known sites where more recent archaeological survey has been conducted, it is quickly apparent the impact modern research has had (Stummann Hansen & Waugh, 1998).

4.2.1 Morphology

Shetlandic settlement sites follow a pattern of exploitation of previous settlement and utility. By far the best-known example of this practice occurs at Jarlshof that was excavated intermittently from 1897 but was only published in 1956 by Hamilton. Another example of this occurs at the steatite quarry of Clibberswick (Buttler, 1984 [unpublished]). This was a conscious decision on the part of incoming populations as

these were areas of previous proven utility. At sites such as Mousa the presence of broch ruins and Neolithic landscape features made the sites more prestigious. These were sites that were visible from sea and came to exist as landmarks in the Norse seascape, much as they had for earlier indigenous populations (Frieman, 2008, pp. 137-138). Other Norse sites follow a different pattern of land choice focusing instead on the presence of a shallow sandy beaching area, fresh water and relatively flat lands. Ideally, readily available areas of wild species exploitation are also associated with this. The conjunction of the presence of a landing area with previous regional utilization occurs at Sandwick on Unst, which was excavated from 1978-80 and subsequently published in 1985 (Bigelow, 1995). The choices made in exploitation of wild species and areas is illustrated in Figure 19.

To a certain extent land, choice dictates the type of site found in Shetland. A farm unit requires areas of relatively shallow graded land in order to construct buildings and enclosures upon. This consisted of a longhouse dwelling that was built primarily of turf. Longhouses and byres were aligned down slope in order to facilitate waste drainage and urine collection. As a freshwater source also exists on many farm sites this may have also contributed to the need for site drainage. At Hamar signs of the original drain is present but as of yet is not fully excavated or published (Stummann Hansen & Waugh, 1998; MacGregor, 1986 [unpublished]). The turf used in the construction of these buildings has resulted in many Norse period drains going unrecognized in earlier excavations, however drains were found in the earliest phases of Jarlshof excavated during the 1934-5 excavation seasons by Curle (Hamilton, 1956, pp. 96, 106 facing page).

In the earliest years of settlement, these buildings had bowed long walls and an internal measurement of around 20 meters. Figure 8 shows the longhouse from

Hamar on Unst that highlights the presence of a central long hearth, parallel rows of roof supporting posts and side benches within an end room. This format is also echoed in the slightly smaller longhouse found at Gardie 1 (Stummann Hansen & Waugh, 1998). Byres for the housing of cattle, sheep, goats and pigs were sometimes a portion of the long house. This would have added to the amount of biologically generated heat within a longhouse during the winter resulting in less fuel necessary to warm the human habitation. Other byres were separate buildings and as a result may be included amongst general outbuildings in publication rather than having the specific purpose recognized (Stummann Hansen & Waugh, 1998). Also included in a farm unit are auxiliary out buildings which maybe near the farm unit or away from it at a shieling or boathouse site (MacGregor, 1986 [unpublished]). All buildings would have been constructed utilizing local materials- turf, driftwood or imported timber for the roof and juniper branches also used in roof construction. Stone footings for wall foundations and internal wall facings occur in buildings dating from the late eleventh century on. At this time longhouses being to lose the more organic bow-sided longhouse shape becoming rectilinear in form and somewhat shorter in internal dimensions at circa 15 meters (Stummann Hansen & Waugh, 1998).

Farm sites have associated middens that have developed during the life of the working farm. In early Norse farms which were established in previously occupied areas will often utilize out of use indigenous buildings as middens such as at Underhoull (Small, 1966). In areas where there appears to have been no previous settlement midden deposits are made around the outside of the longhouse. This process of deposition resulted in the heimrust farm mounds under many modern farms of Shetland today (McKenzie, 2007; MacGregor, 1986 [unpublished]).

As initial Norse farms fell out of primary usage as human habitations they were repurposed as animal byres or storage until finally middens were established within the walls. The composted results of the midden process were used by farmers to improve the quality of the more productive infield area (McKenzie, 2007). Early Norse burials were placed near or even cut into indigenous settlement mounds such as at Upper Scalloway and Kebister (Owen & Lowe, 1999; Sharples, 1998; 2002). As time progressed, burials began to be placed on more remote portions of farmland such as at Breckon Sands (Carter & Frasier, 1996). Once Christianity became the religion of the majority of the Norse population, Christian cemeteries such as at Norwick developed (Ballin Smith, 2007).

4.2.2 Space Utilization

The early major excavation of the multi-period site of Jarlshof has heavily influenced consideration of the utilization of space in Shetland. Figure 25 illustrates internal utilization of space. This diagram is based upon artifact location maps generated by modern excavations at Da Biggins, Norwick, Stobister, Sandwick and Catpund (Buttler, 1984 [unpublished]; Crawford & Ballin Smith, 1999; Smith, 2007; Ballin Smith, 2005). It is corroborated when possible with the older excavations of Underhoull, Jarlshof and Clibberswick (Small, 1966; Buttler, 1984 [unpublished]; MacGregor, 1986 [unpublished]; Hamilton, 1956).

Artifacts relating to food preparation can be found near the long hearth of a Shetlandic longhouse. This includes steatite vessels and schist baking plates. Steatite lamps would have been used throughout the building for lighting as windows weaken the wall structure of turf buildings (Moffat & Buttler, 1986, pp. 102-103; Buttler, 1984 [unpublished]). Small finds lost within hearth ashes and floor bedding may also be found around the hearth. Little in the way of artifacts is found on the side

benches of a longhouse- these were for sleeping and sitting on (Stummann Hansen & Waugh, 1998, p. 130; Stummann Hansen, 2000, p. 99). They would have been easy to clear at the end of a longhouse's functional life as human habitation. End areas may produce some evidence of craft specialization such as loom or spindle weights used in wool processing. If the longhouse contained an animal byre in conjunction with human habitation areas, the central long hearth is shifted to the upslope end of the building. In the down slope end, a central drain leads to a sump beyond the exterior wall (Stummann Hansen & Waugh, 1998, pp. 129-130). This as well as stalls may be constructed of local flagstones.

External use of space around a Shetlandic longhouse is based on the wider network of farming outbuildings and associated satellite institutions. It reflects the self-sufficiency required of a Norse farm during this period. It is reflected in the placement of names surrounding settlement areas (Fenton, 1985, pp. 164-168). *Gulatingslova* refers to the maintenance of a house's yard in section 73 (Eithun, et al., 1994, p. 89).

A Shetlandic primary farm of the Norse period would have functioned seasonally. This was necessary due to the need to manage the restricted lands available within the archipelago. Hence, livestock were put to pasture well outside the area of growing crops during the summer months and brought back to the home farm as winter set in (MacGregor, 1986 [unpublished]; Stummann Hansen & Waugh, 1998). Collection areas for grass was necessary to collect winter fodder- the best evidence for this being locations for hay storage and the hand sickles utilized during collection. The relatively low numbers of this type of evidence in combination with the maritime climatic environment shows that this practice became more prevalent. Collection areas for other species were also held by prominent farms (Crawford & Ballin Smith,

1999). This could range from puffin nesting grounds to shoreline littoral zone species of fish and mollusks. It also included the rights to certain portions of any whale beached or landed within the farm's catchment area. *Gulatingslova* refers to fishing and hunting rights in section 93 of the code (Eithun, et al., 1994, p. 89). Although rights pertaining to the exploitation via hunting of wild animal exploitation exist within the code as well as the species named are native to the wooded areas of Norway. Whale claims, on the other hand, occur later in the law code in sections 149 and 150 (Eithun, et al., 1994, pp. 108-109).

4.2.3 Evidence of Lifestyle

Artifact choice as expressed within material assemblages is able to provide insight into microscale aspects of identity. Most are associated with meeting the requirements of daily existence within a remote area. Iron occurs in a wide variety of tool forms ranging from fish hooks to clinker rivets to patches for broken steatite vessels. Steatite occurs naturally in Shetland and those vessels found in Norse occupation layers are carved in a fashion recognizable as being distinct from that of previous populations. Steatite quarries active during the Norse period include Hesta Ness on Fetlar, Catpund at Cunningsburgh on the Mainland and Clibberswick on Unst (Moffat & Buttler, 1986, pp. 102-103; Buttler, 1984 [unpublished]). Because of the local steatite sources as well as readily available Norwegian imports, pottery is traditionally seen as occurring rarely on Shetlandic Norse sites (Ballin Smith, 2007). There is a very distinct possibility that this has been heavily impacted by the more rigid older concepts of what constituted a Norse site (Stummann Hansen & Waugh, 1998). Reassessment of pottery assemblages from these sites throughout Zone 1 has been conducted primarily by Small and Stummann Hansen (Stummann Hansen 2009: personal comment). Subsequently this has become an important way to attempt to date older excavated material found on Shetlandic sites, as a known typological

sequence exists for grass-marked Norse platter style forms (Lane, 1983 [unpublished]). An example is illustrated in Figure 11.

Items of personal adornment so often associated with burials are not known from Shetlandic sites save as midden finds. This is due to the relatively low number of burial excavations conducted in Shetland- many have already been lost to coastal erosion. Items of wood were common during the Norse period but given the organic nature of this material this is something poorly represented within the Shetlandic archaeological corpus. Sources of wood included driftwood recycled wooden objects and imports of timber from the east and south, however wood does not survive particularly well from known Shetlandic excavations (Stummann Hansen, 1996, p. 131).

Biological evidence of lifestyle is heavily dependent upon the overall state of site preservation and the date of excavation as much of this evidence is organic nature. When soil acidity is low on sites bone preservation can tell not only of human health at time of deposition but also the strategy of animal husbandry practiced. Cattle were utilized in a dairy economy while horses were exploited for travel, light traction and as a source of fishing line. During the warmest years of the medieval optimal pigs were raised however, this was later given up due to the detrimental effect pigs have on the fragile north Atlantic maritime eco-systems. Sheep and goats formed the majority of the domestic animal populations maintained by the early Norse. These provided wool, milk and meat and sheep at least still form a major part of the Shetlandic landscape. The amount of fish bone evidence which has been recovered from Shetland has been greatly increased since methods of wet sieving and 4mm dry sieving of soil samples have become standard practice (Barrett, 2007, personal comment). Excavations conducted during this earlier period have as a result

promoted a species exploitation pattern for the Viking Age that is primarily terrestrial in nature. Other forms of biological evidence range from midden material to palaeoloentomological material as well as carbonized food and grain.

4.3 The Faroe Islands

The medieval Norse knew the Faroe Islands as Farøy. There are two reasonable translations for this; the verb form present in the place name may be more than one verb conjugation. The first name, sheep islands, has been linked in the past to the Papar introduction of sheep to the archipelago; however, the Faeroes have maintained a sizeable sheep population since the Norse landnám (Arge, et al., 2009, p. 22; Olsen & Svanberg, 2004, p. 190). If the word *Farøy* is broken down into its elements for consideration, *fé* and *ey*, the name is closer to 'islands of animal-based wealth' not necessarily just sheep. This may refer to the Faroes' available species for exploitation. The translation on the other hand, appears to refer to the length of the voyage necessary to reach the islands' shores. This must be questioned given that there were much further settlements to the west. If the place name elements are derived from the second translation of the word, *far* and *ey*, the name is translated to 'the islands to travel to' which sounds like a marketing ploy.

The Faroe Islands, too, was subject to *Gulatingslova* until AD1274 when Magnus Håkonsson lagabætir introduced the *Landslog* to Norway (Eithun, et al., 1994). This was utilized until 1298 when the *Seyðabrævið* was written, supposedly by Bishop Erlendr at Kirkjubøur if *Færeyinga Saga* is to be believed. This was abandoned when Norway, and hence the Faroe Islands, were claimed by Denmark as part of the Kalmar Union. Laws were enacted and trials carried out on the Tinganes headland in Tórshavn on Streymoy. The modern headland is illustrated in Figure 13.



Sites Shown

I Eingjartoftum, Vid Hanusa, Giljanes, Yviri i Trod,

Nidri i Toft, Kirkjubour, Havgrimsgrov, Tinganes, I Uppistovubeitnum, Toftanes, Argisbrekka, Vid Gjogvara, Nidri vid Hus, Noduri i Forna, Undir Junkarinsflotti, A Sondum, Vid Kirkjugard

Figure E Major sites in the Faroe Islands, shown in red.

The quality of archaeological evidence from the Faroe Islands is poor. It must be stressed that this is not due to poor excavation practice. It is due to the low sample number of excavated sites, both farms and burials. The textual evidence, on the other hand, is relatively poor. The law specific to the Faroe Islands is not instituted until AD1298, subsequent to the period of this study. This source can be utilized for consideration of certain practices of species exploitation, but little else for this work. The saga evidence available for the Faroe Islands is limited to references within Icelandic sagas that were gathered together during the nineteenth century into a single work- the *Færeyinga Saga*.

4.3.1 Morphology

The Faroe Islands are known for the cliffs and sheers sides of the majority of the archipelago. Because of this sandy shallow approach, landing areas protected from the wind have always been the areas of preferred settlement. Faroese farms are never far from the sea due to the nature of the islands themselves. Unlike Shetland, the Faeroes had no previous substantial population in a biological sense. There is some debate concerning the presence of Papar in this island group that shall be discussed further in Chapter 10. What is most relevant here is that the two known Papar-derived place names from the islands, Papurhálsur and Paparókur, designate very remote cliff edges in Saksún and Vestmanna respectively (Ahrónson 2007:9).

Also required for site choice was a fresh water source for domestic and farm use as well as relatively flat lands with a distinct down slope. Figure 34 shows the site of Kirkjubøur on Streymoy where the quality of the landing area, extensive agricultural lands and highly visible location led to the establishment of the Bishopric seat in AD1152-3. This site is illustrated in Figure 14. In later years, a cathedral was also

begun on the site. A series of churches have been associated with this site highlighting the farm's long-term prosperity.

The earliest phases of settlement are known from two sites surrounding the modern village of Sandur on Sandøy. At Undir Junkarínsfløtti a three phase farm mound with radiocarbon dates ranging from the ninth to the thirteenth centuries is currently still under excavation while across the bay is an apparent contemporary settlement site (Arge, et al., 2009, p. 19). Examples of longhouses dating to the tenth century have been found at Toftanes on Eysturoy and Niðri í Toft on Streymoy, and Við Hanusá on Vágar (Stummann Hansen, 2005). Niðri í Toft is illustrated in Figure 15. At these sites bow-sided longhouses have been found with internal measurements of circa 20 meters. Walls were constructed with interior stone faces, earth cores and turf exteriors. Roof supports ran in parallel rows down the centre of the building. Between these rows of posts lay a long central hearth- at Toftanes this feature was 5 meters long. Along the long walls were earth side benches (Stummann Hansen, 2005, pp. 10-13).

Faroese longhouses that also contained an animal byre were aligned down slope to facilitate drainage via internal stone channels and external sumps (Arge, 2005). Byres that existed as outbuildings to a Norse longhouse were also aligned down slope for this reason (Stummann Hansen, 2005). At Niðri í Toft this process in conjunction with close coastal proximity resulted in the erosion and subsequent loss of the lower building ends (Dahl, 1970). Outbuildings constructed of turf with stone foundations accompanied the longhouses and byres. Many of these were used for the storage of fodder, however at Toftanes evidence for craft specialization was found within the farm's outbuildings (Stummann Hansen, 1991, pp. 46-47). As time passed the bowed sides of longhouses became more rectilinear and the use of internal stone facings

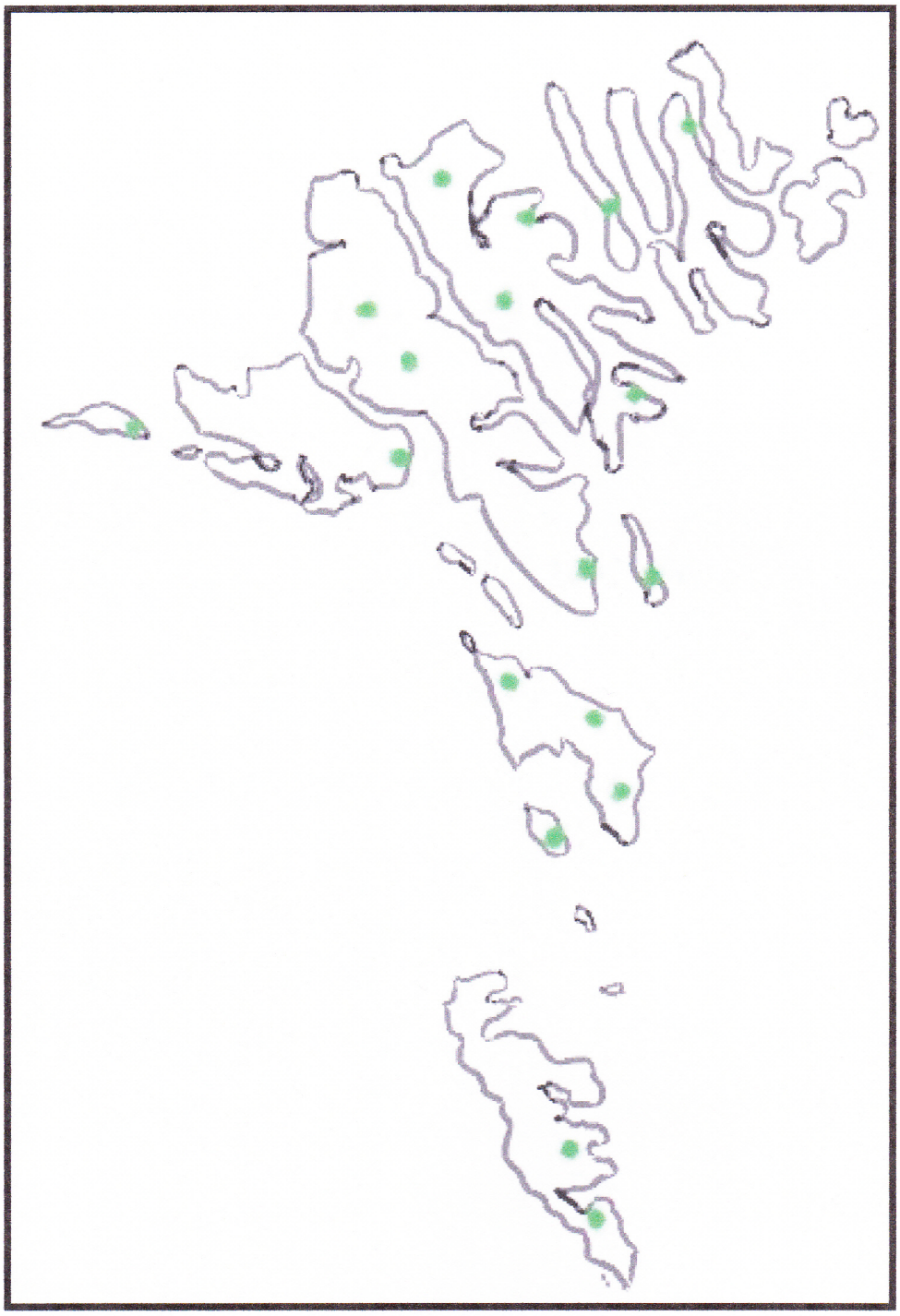


Figure F Shieling sites in the Faroe Islands, shown in green.

more regular. The overall internal length became much reduced- at Norðuri í Forna on Eysturoy as small as 9 meters.

Sites which are not constructed in the coastal areas but rather on the cliff and hilltops of the islands' interiors provide evidence for Faroese farm practice and economy (Mahler, 1995). Outbuilding constructions of turf, clay, sand and gravel as well as the presence of stock pens were utilized seasonally during the spring and summer months to protect the infield crops from hungry farm animals. The best known example of this is Argisbrekka on Eysturoy which was excavated from 1985-7 (Mahler, 1995, p. 489; Mahler, 1991). Other related place names are known, however, which also contain the bastardized Gaelic term *ærgi-* for the Norse practice of sheep and cattle husbandry referred to as shielings (Mahler, 1995, p. 487).

Relatively few middens have been excavated in the Faeroes. The major cause of this is the continued utilization of farm sites into the modern period- modern farm buildings are located on top of the *heimrust* which provides the most reliable evidence (Arge, 2005). The effects of erosion must also not be overlooked. Early burials have only been confirmed at the site of Tjørnuvík on Esturoy (Dahl & Rasmussen, 1956, p. 153; Dahl, 1970, p. 65). The two other suspected burial sites at Giljanes on Vágar and Havgrímsgrøv on Streymoy have not been subjected to modern excavation (Stummann Hansen, 2009, personal comment). A major reason for this is the long-term familial association with burial sites found within the Faroe Islands. Although pride in the historical heritage represented by longhouse remains is great, the potential that the remains of a known great-great-great grandmother being disturbed would offend the modern farm inhabitants is even greater.

4.3.2 Space Utilization

Consideration of space in the Faroe Islands has been heavily influenced by the excavation practices of Sverri Dahl who primarily excavated during the mid-twentieth century. During this period there was a greater focus on the interior of longhouses as being characteristically Norse in nature, rather than how the buildings functioned within the wider farm network and islandscape. In spite of this Dahl's excavations were conducted to a high standard for his day (Stummann Hansen, 2002, pp. 38-40).

The long hearth is a central focus of human activity, particularly domestic, within the Faroese longhouse. The long hearth from Toftanes is illustrated in Figure 16. Around and amongst the hearth ashes finds of broken steatite vessels and schist baking plates have been found. Steatite lamps of a distinctive squared shape burned whale or fish oil for light. Examples are illustrated in Figure 12. Other small finds and items of portable art may be found within the hearth ashes and floor bedding where they were once lost. Few artifacts are found in association with long wall side benches, although palaeoentymological evidence for lice has been discovered (Vickers, et al., 2005). During domestic use, these benches would have been used to sleep and sit on as the time of day dictated. The bedding and any cushions would have held any small finds for easy retrieval well within the primary utilization of the longhouse. End areas may also contain a raised bench area- potentially a prestigious sleeping location or craft area, or even farm storage although no artifacts have resulted from this area and soil samples taken (Stummann Hansen, 1991). A generalized format for Shetland longhouses is found in Figure 10. Drainage is provided for the animal stalls by paving, down slope location and channeling to an external sump (Stummann Hansen, 2005, pp. 11-13; Stummann Hansen, 1991, pp. 47-48).

External use of space surrounding a Faroese longhouse is influenced by island location and is based upon a network of outbuildings for storage and farm activities

as well as sites in other portions of the landscape. This system reflects the diverse ways that settlers in the Faeroes exploited their marginal environment.

A Faroese farm of the Landnám existed within a seasonally dictated physical landscape. Fields were improved when fallow utilizing midden material and seaweed. Crops were planted once the growing season commenced. Household plants such as angelica were grown in close proximity to the main farm complex (Johansen, 1985). During the height of the growing season, the farm's livestock were put on the high pastures to the interior of the island (Thorsteinsson, 2008, pp. 82-84). These shieling sites are often given the Gaelic place name element *ærgi,* i.e. Argisbrekka (Thorsteinsson, 2008, pp. 82-83; Mahler, 1991; 1995; Thomsen, et al., 2005).

Several types exist. Closest to the main farm would be the dairying shielings with both water source and the means of storing dairy products, generally as an outbuilding. A milking pen may also be present. The second type of shieling would be farther from the home farm. This would be where the livestock not being milked were pastured during the summer growing season (Mahler & Malmros, 1990, pp. 12-13; Thomsen, et al., 2005). These sites have a source of water for the animals and only occasionally have an associated outbuilding or natural feature utilized for human/animal shelter during poor weather. The third type of shieling is primarily utilized for the collection of winter fodder and the exploitation of local wild species. This type of shieling does not necessarily have a water source or building but instead may be a place name associated with a remote grassy area (Thorsteinsson, 2008, pp. 89-91; Thomsen, et al., 2005). Other collection areas were associated with farms as well- littoral zones and birding cliffs being particularly important. Without these sources of food, the Faroese population would have been unable to maintain their

numbers let alone their livestock. Because of this, rights to resource collection are closely detailed in the law code (Thomsen, et al., 2005). Choices about wild area exploitation are illustrated in Figure 43.

4.3.3 Evidence of Lifestyle

Certain recent excavations have been able to provide extensive artifact assemblages with good preservation in combination with reliable dating: Toftanes and the sites surrounding the modern village of Sandur on Sandøy (Stummann Hansen, 2005). Iron has been found in fish hooks, farm tools and ship rivets. Fish hooks from Argisbrekka are illustrated in Figure 20.

Steatite is found in forms know from both Norway and Shetland (Dahl, 1955, p. 63). Products of schist, i.e. whetstones, hones and baking stones were imported from Norway to meet the domestic demand (Resi, 1987, p. 95). Some Norse platter-style forms are also known from Argisbrekka, Toftanes and Undir Junkarínsfløtti as well as from re-assessment of excavated material from the earliest excavations. In spite of this ceramic evidence from the Faroe Islands is slight (Mahler, 1991; Stummann Hansen, 1991; MacGregor, 1986 [unpublished]). Steatites vessels are illustrated in Figure 22. An example of this Norse ware is found in Figure 21.

Items of personal adornment and portable art are relatively fewer, however several items stand out. A ring-headed pin was discovered at Niðri í Toft while a portion of a lignite or jet arm ring was discovered during excavations of the longhouse at Toftanes (Dahl, 1970; Stummann Hansen, 2005, pp. 20-22). The ringed pin is illustrated in Figure 23.

There is a substantial corpus of wooden artifacts being discovered in recent excavations of waterlogged sites in the Faroe Islands (Stummann Hansen, 1996, p.

131). Many of these have been conserved and put on display at Forøya Fornminnisavn. From Toftanes there is an array of wooden boxes, tools and even twisted juniper boughs used as cording (Stummann Hansen, 1991, pp. 48-58; Malmros, 1991; Small, 1992, p. 4). Wood requirements would have been initially met by trees indigenous to the Faroe Islands as well as driftwood originating from Siberia and Scandinavia (Malmros, 1991). As time passed, however, Faroese trees were over-exploited to the point of extinction by Landnám and Medieval populations and as a result recycling of wood, importation of timber and unquantifiable amounts of driftwood met this need (Small, 1992, pp. 5-6; Malmros, 1991; Arge, 2005) .

Biological evidence of lifestyle on an early Faroese farm comes from the examination of the *heimrust* of modern farms and palaeoenvironmental sampling of the floor layers (Vickers, et al., 2005). *Heimrust* is the farm mound that has resulted from long-term midden practices (Thorsteinsson, 2008, p. 87). At Undir Junkarínsfløtti an extensive osteological assemblage from the heimrust provided evidence of prolonged pig husbandry as well as the more common sheep and less common cattle (Arge, et al., 2009, p. 20). This and other recent excavations in the Faeroes have produced evidence of early medieval fish exploitation. As time passed farms became more focused upon sheep husbandry for textile production as milk and meat could still be obtained as secondary production. The sheep was well suited to the varieties of the local Faroese island environment. Stuffed versions of this extinct species are found at Forøya Fornminnisavn, see Figure 25.

The exploitation of sheep is evidenced not only directly via osteological material but also via the presence of palaeoentymological evidence- wool parasites- within longhouse soil samples (Vickers, et al., 2005). Indirect evidence of sheep exploitation includes a variety of artifacts from lamb bits to keep them from nursing when

necessary to spindle whorls and loom weights utilized in wool processing (Arge, 1991; Mahler, 1995). Examples of these spindle whorls are found in Figure 24.

4.4 Conclusion

This chapter has presented archaeological evidence from the lesser discussed archipelagos of Zone 1, Shetland and the Faroe Islands. It has looked at both the well-known excavations at Jarlshof and Kvívík but also the less conspicuous sites of Argisbrekka and Setters. It has presented elements of Norse farm settlements- from building and site morphology to the associated auxiliary outbuildings and shieling sites to pagan burial evidence. Full data tables are included in Appendices A and B. In the following chapter, analysis of this evidence is discussed to highlight microscale aspects of identity construction and maintenance in Zone 1. This shall show how the utilization of the artifacts presented within their context can present the evidence of daily practices that reinforced identity.

Chapter 5 Daily social practices of households in the Shetland and Faroe Islands (Zone 1)

5.1 Introduction

The representative island archipelagos of Shetland and the Faroe Islands have had somewhat of a history of consideration within the same publication and study (Stummann Hansen, 1996). Much of this is linked to shared characteristics that the island groups share. These marginal regions with little in the way of agriculturally viable land as well as high relative salinity and shortened growing seasons has developed longer traditions of site reutilization than other areas in the north Atlantic and consequently both groups also share similar species exploitation strategies. By a comparison of the available evidence for the Norse settlement of these islands a more in depth examination of society can be made. This analysis has been assisted by the data tables described in Chapter 3. In particular it has been possible to rate the evidence for the case study of Zone 1 in accordance to the relative scale presented previously. This is taken into consideration in the following analysis of microscale aspects of identity construction and maintenance in Zone 1.

5.2 House and Settlement

Examination of architectural trends expressed in Zone 1 has been impacted by the earlier techniques and practices of excavators. Perhaps the most lasting impact is the misattribution, and at times even complete lack of recognition of ninth and tenth century levels of occupation. This is due to the greater levels of preservation of the subsequent medieval period when the utilization of stone within longhouse construction became more popular. Recent excavation techniques that employ geochemical analysis and ground penetrating radar are increasingly able determine the presence of turf constructions in the landscape. In Figure 48 a brief summary of

Faroe Islands	Shared Characteristics	Shetland
Much of the region's coasts are actually cliffs and as a result settlement occurs dominantly upon the few bays with easy approaches (also good for of the time and for whaling)	Known Norse settlement expressed in the changes found to longhouses and other domestic forms	Confirmed habitation in the region for more than 4,500 years
Favorable layover location for north Atlantic trade and exchange networks (except for larger later vessels headed to Iceland directly from Bergen)	Political and legal structure based on the Gulathing Law as well as the Seyðabreidr	Hilly and mountainous in comparison to Orkney which results in low levels of agriculturally viable land, less son in comparison to other regions.
Proven long reutilization of sites in certain areas	Available trade goods	Much of the region is shallow approach beaches
Seyðabræðr becomes the new law in AD1298	Many wild resources including marine mammals, fish and wild birds	Local steatite and metal ore resources
	Domestic species including cattle, sheep and pigs as well as plant species	Favorable location for North Sea trade networks and North Atlantic, especially from Norway
	Norse 'culture/identity' as a dominant part of population	Complicated geology
	Prolonged period under direct Scandinavian rule	Oðal law derived from the Gulathing Law continues to be used until Scotland gains Shetland in AD1468
Delicate balance between maintained subsistence and the local environment with little in the way of long term agricultural stores on the islands themselves to make starvation less of a concern in difficult years- this is compensated for by expensive and socially obligated food stores from Europe and Britain	Relatively few excavated and published sites most of the earliest of these having been excavated by a handful of Scandinavian archaeologists.	**Delicate balance of the Faroes occurs here as well but there are much closer means of bridging the gaps include Orkney, Ireland, and the Baltic**

Figure H Shared characteristics of Shetland and the Faroe Islands.

the microscale aspects of longhouse format is made for Zone 1 utilizing the evidence produced by Shetlandic and Faroese archaeological sites sampled for Chapter 4.

Case study evidence highlights the generalized nature of Zone 1 house features in terms of construction material, techniques and format noted by others (Fenton, 1985; Roussell, 1934). Farm units throughout Zone 1 had supporting outbuildings both on primary farm sites and at secondary exploitation locations. The marginal environment and reduced growing periods of Zone 1 resulted in a resource strategy for settlements that distinctly integrated into not only the locally expressed seasons but also the natural environment of a variety of island locations secondary to the primary farms. In general, as with many farms prior to the Industrial Revolution there is a pattern of self-sufficiency. This will be later be changed by the Continental economic market demands for fish and wool products in combination with general global cooling which caused the north Atlantic shoals to come closer to archipelagos than they had during the warmer Medieval Optimal.

The generalized farm unit strategy as well as the assimilation of indigenous settlements, ruins and farm mounds into the Zone 1 cultural landscape highlights fluidity concerning the local environment's impact upon the socio-cultural habitus. Microscale elements expressed in farm strategy encompasses the local choices regarding building construction and maintenance that allowed the generalized longhouse and outbuilding constructions to better fit the environmental context. This includes material choice, design in relation to the surrounding landscape and intended primary utilization. Necessity, location, overall economic standing as well as the potential for secondary usage influence maintenance choices. The initial Landnám period expressions of longhouses in Zone 1 directly reflect the presence of first generation settling populations who have not yet learned the most efficient

Viking Age (AD800-1050) Longhouse	Medieval (AD1050-1250) Longhouse
At least 16x4.5m internally	No more than 16x4.5m internally
Long hearth centrally located in human living area	Hearth is no longer centrally located which allows for a more open floor plan
Down-slope alignment of structure to facilitate gravity drainage of animal byre- early excavation techniques may not have recognized the associated signs of drainage at time of excavation and so at times early byres went unrecognized.	Down-slope alignment of structure to facilitate gravity drainage of animal byre- this is assisted with paving of at least the drain sluice within the animal byre but may also be entirely paved. Internal stone stalling does not impede this drainage in anyway.
Turf is used to construct walls- this may be stone-faced internally.	Although turf still occurs in construction more often stone-faced walls with earthen cores are cited in excavation. This may directly related to the highly acidic soils found throughout much of Shetland and the Faroe Islands.
Parallel-aisled roof supports with the exception of the byre-end.	Center-aisled roof supports with the exception of the byre-end.
Outbuilding association with longhouse	Very-close/connected longhouse outbuilding combinations.
Bowed long walls and rounded gable ends.	Straight-sided long walls and squared gable ends
Sleeping benches located along the long walls.	Division of the space human space adds a sleeping room at the non-byre gable end. Byre may also later be entirely removed to an outbuilding.
Benefits: This longhouse reflects more directly the traditional Germanic long house format. The utilization of turf as a building material would have been quick and local to gather as well as being an effective structure for many years although subsequent habitations would have been inevitable for a long-term installation.	**Benefits:** This longhouse is smaller and thus easier to heat as animal heat is more efficiently used. The construction techniques reflect the increased prosperity and technological innovations being introduced via both the Orcadian Jarls and Norway.

Figure I Shared characteristics of Shetland and the Faroe Islands.

adaptations for the local landscape. Also important to consider is the warmer climatic conditions during much of the Viking Age- certain elements of longhouse and farm format seem to highlight the cooling northern world. The reduction in internal length from more than 16 meters to less than 16 meters would require less fuel to heat during winter months. The addition of a connected outbuilding providing storage space or animal housing requires less building material than a separate farm building would, as there is a shared wall.

Identity was expressed in both the practical modifications the Norse farm made to accommodate the limited access to timber resources within Zone 1 as well as the increased diversity in wild species exploitation reflects this. As *Gulatingslog* originated in Norway, littoral zone exploitation is only commented upon in section 93, and then only in relation to land uses fees that would have been due. "Uatn oc veiði stoð skal hver sína hava. sen hann hever at fyrnsku haft. Engi maðr skal gera gilldru a iorð a" (Eithun, et al., 1994, p. 89). This is unsurprising as the larger Norwegian peninsula has greater terrestrial resources available- and indeed greater consideration is made regarding actions such as bear and deer hunting. The reality of this was to tie littoral zone gathering rights and other sources of subsidence to come under the jurisdiction of the local social hierarchy, as is expressed in the *Seyðabrævið* of AD1298 (MacGregor, 1986 [unpublished]).

5.3 Family and Gender Relations

Evidence of family and gender relations is best expressed via three forms of evidence: shape of the farm sleeping arrangements, the division of farm labor, and finally law codices. Not only gender but also overall hierarchy within the extended family influenced sleeping arrangements on the longhouses' benches as well. This is illustrated in Figure 26.

As can be seen in Figure 50 the head of family and their consort(s) would have enjoyed the relative privacy of the upslope end of the longhouse (Stummann Hansen, 2005; Vickers, et al., 2005). Either a raised bench would have demarked this across the house end in a similar manner to the long-wall side benches or an internal partition wall of wood. Here family members would remove parasites from themselves leaving evidence behind of their presence (Vickers, et al., 2005). The most favored of the farm's social hierarchy would have been closest to the head of family while the least would have been farthest from both the hearth and at some times closest to the animal byre- the two heat sources in the cold maritime winter (Roussell, 1934, pp. 50-54). During summer months, some lower members of the farm were sent with the livestock to the shielings. *Gulatingslog* makes provision for the sleeping arrangements of these farm workers in section 100 (Eithun, et al., 1994, p. 91). In this section, responsibility for damage or burning of the shieling building was waived if the proper dimensions were not met resulting in the death of a farm hand by exposure. Infants would have slept with their mothers or wet nurses or else in a re-purposed container made suitable with blankets or raw wool that would have protected the infant's skin. Cradles are not common finds on Viking Age Norse archaeological sites as raw wool fulfilled this need without impacting the archaeological record (S. Crawford 2011: personal comment).

Farm labor can loosely be divided into jobs associated with the internal working of the farmhouse that may at times occur outdoors and those jobs associated with the external working of the farm itself. These jobs all vary in intensity and who performs these actions is often determined by physical capability rather than being purely gender derived. This division is shown in Figure 27. These are divisions of labor found throughout the medieval Norse world and are reinforced by regional law codices as well as mythology. The physical evidence for this practice of farm labor is

both direct and indirect in nature. Direct evidence of food preparation can include physical remains of the edible resources like fish and charred grain available from midden excavations such as at Undir Junkarínsfløtti (Arge, et al., 2009, pp. 19-21). Direct evidence of the gathering of food and fuel comes in the presence of partially burned wood, charcoal and wild food resources within midden and longhouse floor deposits (Malmros, 1991). At Toftanes, Old Scatness, Argisbrekka and Á Sondum this material included evidence of marine fish exploitation (Stummann Hansen, 1991; Mahler, 1991; Arge, 1989). Direct evidence for the exploitation of domestic species such as pig, cattle and sheep comes from the inclusion of skeletal material within midden deposits at sites including Í Uppistovubeitum, Undir Junkarínsfløtti, Norwick, Sandwick and Jarlshof (Arge, et al., 2009; Hamilton, 1956; Ballin Smith, 2007; Stummann Hansen, 1991). Direct evidence for wool processing and textile production can be quite rare- not only is wool organic in nature but any tool which was more enduring would have remained within a cycle of use, maintenance and subsequent metal recycling once the tool was broken or too worn to repair on the farm. Indirect evidence such as sheep lice occurring within soil samples can also hint at wool processing (Vickers, et al., 2005). Direct evidence for agriculture is provided by the presence of field boundary walls in association with Zone 1 farm units. In addition, finds of grain and pollen within midden and floor deposits can highlight a local practice of growing grain crops to add to a farm unit's economy, such as at Toftanes. The onset of this practice is somewhat under debate, particularly in the Faroe Islands; however, by AD900 the practice of grain agriculture is present across Zone 1 (Johansen 1985: 40-44).

Indirect evidence of food preparation includes containers used to store victuals as well as to cook in. Within Zone 1 this need was met by vessels of steatite as well as locally made Norse platter-wares. Both are known from several sites throughout

Zone 1- from Norwick, Catpund, Underhoull, Hesta Ness and Jarlshof in Shetland in Niðri í Toft, Toftanes, Undir Junkarínsfløtti, and Argisbrekka in the Faroe Islands (Lane, 1990; Buttler, 1984 [unpublished]; Forster & Bond, 2004; Small, 1966). Indirect evidence of the gathering of fuel comes from the presence of ash within longhouses as well as the loss of the presence of tree species pollen from the Faroese palynological record (Johansen, 1985, pp. 54-56). The presence of artifacts such as axes also provides evidence for local practices of fuel gathering.

Indirect evidence for the exploitation of domestic species comes from the provision of structures throughout the island landscape for the housing of these animals. Byres occur included in longhouses as well. They are also found as separate out buildings such as at Niðri í Toft, as well as at auxiliary sites to farms such as Argisbrekka. The byre of Niðri í Toft is illustrated in Figure 18. These buildings existed within an internal farm network that supported the maintenance and transhumance of domestic species to make the most efficient utilization of the island landscape. The provisions present within the laws applied to Zone 1 also indirectly evidence domestic species exploitation. Within *Gulatingslog* these include penalties for keeping stock in areas which are not claimed by the farm, for faulty boundaries which do not function properly thus allowing stock to damage crop fields, as well as the provisions necessary for farm workers housed off-farm with the herds at the summer shielings (Eithun, et al., 1994, pp. 78, 91). The gender of these farm workers is alluded to in the parses of the verbs utilized. Sailors and long-term shieling workers/ slaves, i.e. those not affiliated with the dairying herd but rather the meat and wool herd are male. Domestic workers and slaves are more often referred to by feminine verbs and endings (Brink, 2012).

Farm Unit	Feature	Function	Building material used	Species Exploited
Primary longhouse	Human and animal habitation year-round, although this may not actually be the pattern in true day-to-day practice, also secondary outbuildings separate from either the habitation or the byre, which housed a wider variety of activities such as weaving and smithing.	This is public and private at once as it is not only the domestic site for many in this period but also as the local node for trade and exchange in both economic and socially linked goods but also ritual and spiritual elements as well	Stone-faced walls with turf and rubble core; turf; drift wood; peat; rammed earth; stone	Secondary processing would take place here for a wide variety of goods from iron to milk to agricultural products
Daughter longhouse	Essentially the same features as home farm yet will be located quite physically close to the home farm's initial location if not actual structure. Still located within the initial infield.	The multitude of activities which occurred within the home farm can of course occur on a daughter farm but they are more likely to occur in the widest variety of forms in the home farm associated architecture.	Stone-faced walls with turf and rubble core; turf; drift wood; peat; rammed earth; stone	Secondary processing would take place here for a wide variety of goods from iron to milk to agricultural products.
Outfield	Buildings in the outfield depend on the utilization of the space- there must be a need for storage primarily and possibly shelter for animals and humans on a small scale.	These functioned as stations of procurement for the farm buildings, both home and daughter.	Earthen dykes; turf and earth built buildings; stone	Management station for domestically maintained species such as sheep, cattle and fodder fields for the same species for winter. Gathering areas for wild resources of plants, sea birds and eggs amongst other things.
Shieling sites	Buildings beyond the outfield depend on the utilization of the space- there must be a need for storage primarily and possibly shelter for animals and humans on a small scale.	These functioned as stations of procurement for the farm buildings, both home and daughter. This can be of dairy products, hay or even summer grazing to save the winter outfield crops.	Earthen dykes; turf and earth built buildings; naturally occurring caves and rock formations; stone	Gathering areas for wild resources of plants, sea birds and eggs amongst other things. Management station for domestically maintained species such as sheep, cattle over the summer season.
Landing sites	Natural features of shallow sandy bays which are suitable for the easy approach of shallow clinker-built shallow draft vessels.	This was a vial part of the system on a variety of levels. It provided the location for wider communication with the region and world. It provided the location for exchange to occur through. It provided a large number of relatively low-effort species- a vital part of a marginal environment's subsistence pattern.	stone; turf; drift wood; rammed earth	Whales and other sea mammals can be more easily accessed through here. Sea weed for fertilizer and animal fodder can be accessed on the shore as can littoral zone fish and crustaceans. On the land part of the shore marine birds can be found which are another vital portion of protein.
Midden	This will be located within the home farm complex if not within former domesciles themselves.	This was integral for long term farm success in relation to land improvement practices. It was also integral for the short term of success of the farm due to the necessity of the removal of garbage from activity areas for the health and comfort of the farm inhabitants.	Organic and inorganic components of domestic and wider farm origin.	The contents of a farm midden includes anything that can be thrown away can end up in the midden area. Its deposition can be impacted by a wide variety of factors including subsequent redeposition by later site inhabitants.

Figure J Farm Progression.

Indirect evidence of agriculture is provided by the presence of provisions within *Gulatingslog* as well (Eithun, et al., 1994, p. 78). Indirect evidence of physical farms is best represented by the boundaries of fields discussed above as well as tools used in agriculture. Examples of boundaries are known from Gardie while agricultural tools are known from Toftanes and Niðri í Toft (McKenzie, 2007).

What makes this evidence of the microscale level of identity is the expression of these practices within the local environments of Zone 1. Each local situation and combination of people within it would result in a unique distribution of farm jobs. In Zone 1 where archipelagos are a short sail between each other men of certain social standing or wider social connections would have been gone trading, harrying and fishing following the major spring activities of ground preparation, planting and lambing. Once the farm had moved into the stasis pattern of the summer months many activities traditionally seen as men's work was taken up by the women of the farm through necessity. As the weather conditions of fall and winter made sea travel increasingly dangerous voyages abroad would decrease and men would return to their home farms in time for the harvest, fertilizing of the fields and winter animal cull. *Gulatingslog* makes provision for the maintenance of sailor's rights on land in sections 127, 148 and 310-5 (Eithun, et al., 1994, pp. 101, 107, 167-170). This highlights how common men's existence via ship was at the time. The ship became in social practice a farm unit in status, providing men legal security away from their home areas.

5.4 Social Status and Rank

Microscale evidence of identity construction and maintenance in Zone 1 is intrinsically tied into the concept and physical reality of Norse farms. Much of this is quite practical in nature. The location of farms and farm satellites conveyed certain

common elements. These common elements include the close communication offered via a landing place. The farm complex allowed for multiple means of subsistence within the local environment and economy. This included wild and domestic species that were seasonally available. A high status farm would have more easily allowed for self-sufficiency as well as enough surpluses to make trade both possible and profitable. There is some debate as to whether sites were chosen because the founding family was particularly powerful or if the associated family subsequently became powerful due to the attributes of the site and its satellites however.

A high status farm in Zone 1 during the initial Landnám settlement period would have been prominently situated on the shallow gradient areas near landing areas. A long, c. 20 meters, well-appointed longhouse constructed of turf on stone foundations highlights the presence of a wealthy family. Wood paneling may have utilized provide an internal facing to the turf walls. The exterior turf was maintained to continue to provide optimal insulation during primary occupation against the changeable marine climate found throughout the Zone 1 archipelagos. Sites with continued use by several subsequent generations will have secondary longhouses constructed nearby to the primary house. These newer buildings developed as the family expanded and the turf of the original house began to decay beyond easy repair. A separate hall was included on particularly prestigious sites such as Jarlshof (Hamilton, 1956, p. end paper).

At some sites, there is evidence for an overlap in occupation however eventually the human occupation of the primary house would end shifting to the newer focus of the secondary longhouse. The original house would subsequently house animals for a period but finally would contain the farm's midden containing composting efforts for

field improvement. Several outbuildings would have accompanied the longhouse of a high status farm site. This is where storage of the farm's products, surplus and supplies would have been contained (Stummann Hansen, 1991, pp. 46-47). This would have been vital to the wealth and economy of the farm as this would have allowed the stockpiling of not only food and fodder but also products produced during animal processing, such as skins and wool. Outbuildings on high status farms also were used as activity areas themselves with iron working, wool processing and weaving being particularly well evidenced at sites such as Toftanes (Stummann Hansen, 2005, pp. 10-13). In order to make the most efficient use of the islandscapes several satellite sites were linked to a high-status farm. Shieling sites like Argisbrekka form one aspect of this that was primarily associated with the seasonal management of farm stock involving transhumance (Thorsteinsson, 2008, p. 83; Mahler, 1995, p. 487; Mahler & Malmros, 1990, pp. 12-13).

The presence of multiple shielings highlights different elements of the overall animal economy that developed following the initial settlement of the north Atlantic archipelagos. A large, well-equipped dairy shieling implies a farm whose flocks and cattle are potentially very productive provided the size of the herds still within the carrying capacity of the local environment (Mahler, 1995, p. 490). This may be corroborated by the presence of broken and preserved containers and sieve as well as large amounts of animal osteological evidence found within midden assemblages of farms and shieling sites. This highlights the presence of domestic animals maintained for dairy production with a high number of young animals younger than six months in age occurring in the site assemblage (Mahler & Malmros, 1990, pp. 12-13). A substantially sized summer shieling would have maintained the stock not being milked- those animals providing wool and meat, generally older females and neutered males.

Shielings primarily used as pasturage would have seasonally been utilized by a high status farm to house the animal stock away from growing crops. This system was maintained by the lower echelons of a Norse Zone 1 farm. These layers of society are discussed in sections 57-64 and 67-77 in *Gulatingslog*. These sections are concerned with slaves and handwomen, freedmen and freedwomen, contract farm workers receiving a wage, þing affiliates, farmers and their families and vagrants (Eithun, et al., 1994, pp. 68-72, 74-79). This evidence shows a hierarchy present on Norse farms in Zone 1 which can be placed in a relative order. Within each of these categories was a spectrum of hierarchy based upon functional utility both socially and economically. This division of labor is illustrated in Figure 27.

As is illustrated in Figure 29 the years of surplus on a farm can be followed years in productivity deficiency linked to the wider environmental and climatic context. On a high status farm surplus can be stored while herd sizes can maintain a living surplus of domesticates. On a lower status farm, on the other hand, such a surplus might not be able to be gathered or stored in great enough quantity for any one of a wide number of reasons. Hence, when the environment and north Atlantic climatic conditions were poor there would be insufficient means to support the farm's family and domesticates. This situation had an array of cultural responses- from an appeal via already established networks of social obligation and hierarchy to the dissolution and selling of farmlands, stock and fodder. The methods of accomplishing this is discussed in sections 41-3 and 72 of *Gulatingslog* (Eithun, et al., 1994, pp. 60-61, 78). As the products provided by these animals, wool and meat, takes full seasons if not years to build up in comparison daily produced milk, the shielings upon which this type of stock was maintained had much less need to be kept in close proximity of the main farm unit (Mahler, 1995). Dairy shielings, on the other hand, were maintained within easy travelling distance to the farm to remove the dairy herd from the area of

growing crops but so that they still would be accessible to provide milk and dairy goods for the farm's subsistence needs (Mahler, 1995).

A high status successful farm potentially may have more than one pasturage site, as this would have allowed utilization to be spread more efficiently. As with other farms throughout the world, one of the best indicators of continued high status is the ongoing management of resources. In the more marginal environments of the north Atlantic, this can mean the difference between life, death and overall economic success. The winter success of a high status farm also depended upon a variety of grass collection points as well- with the maximum possible amount of fodder being collected, dried and stored more stock would be maintained over winter into spring (Thorsteinsson, 2008, p. 85; Mahler, 1995, p. 489).

Early familial burials are also associated with Zone 1 farms. The sample provided by Shetland and the Faroe Islands is quite small with examples dating to the period of Norse settlement having been excavated from Clibberswick, Breckon and Norwick as well as at Yviri i Trød and Niðri við hús (Carter & Frasier, 1996; Ballin Smith, 2007). Following conversion to Christianity, burials no longer were accompanied by distinctive grave goods such as at Clibberswick or distinctive in shape such as the boat-shaped burial excavated at Breckon Sands (Carter & Frasier, 1996). Cemeteries associated with churches increasingly take the place of the farm burials. Examples of these are known from Norwick as well as Yviri i Trød and a later cemetery was excavated at Niðri við hús (Ballin Smith, 2007; Arge, 2005). Although the locations of cemetery and church sites are known several, such as at Við Kirkjugard and Kirkjubær have not been excavated due to continued modern utilization. An illustration of the long house progression is found in Figure 28.

Finally, a high status Zone 1 farm may also have some local association with public spaces such as the sites of churches or those designated for the meeting of the seasonal things. Close proximity to the fields of a wealthy farm implies affiliation, although commonality of name elements between public spaces and farm sites can also highlight a particularly influential family member. A farm that also had affiliated public spaces for the wider island community implies the presence of hierarchy and social obligation on the part of the wider population (Mauss, 2000, pp. 83-84). Public spaces can be seen as obligation gifts to the entire local community in the system of total services. By providing and maintaining the local population with such spaces the family owning the high status farm not only proves they are wealthy enough to do such a thing but also that they mediate access to the social world of religion and the legal system. This is a statement of social power existing within both microscale practice as well as wider macroscale affiliation.

Lower status farms, on the other hand, were not as favorably located within the islandscape initially. This may have been through the availability of choice open to the settling family or even due to the cooling climatic trends associated with the Little Ice Age. These cooling trends would have made farm life within the marginal maritime islandscape extremely difficult. An example of such a site comes from Stobister, dated to the thirteenth century by typological consideration of format as well as the final place name element of *–bister* (Smith, 2007). Without the resources of a larger higher status farm, lower status farms were more subject to the fluctuations of the north Atlantic environment. This means in good years the farm would be maintained, perhaps even buildings up a small surplus of available resources. However, in poor climatic years more marginalized lower status farms did not have sufficient stores to survive several such years in succession. An extended period of harsh or abnormal weather such as a drought or series of summers that

were cooler would have been disastrous to a lower status socially marginal farm unit in Zone 1. When this occurred to a lower status farm, a drastic change in social practices could potentially result. *Gulatingslog* contains provisions for settling debt upon the failure of a farm- many involving the sale or exchange of the farm unit as a whole or part in section 72 (Eithun, et al., 1994, p. 78).

The structures associated with lower status farm sites reflect the reduction in available work force and resources from a higher status site. Longhouses associated with the Landnám period of Zone 1 will still be over 16 meters in internal length however, they rarely exceed more than 20 meters internally. The walls are much less likely to be constructed of stone beyond the wall foundations unless there is a ready source of building stone nearby. The turf of lower status sites, particularly those with evidence of long-term occupation, may be more worn, repaired and dried out from prolonged utilization. This is due to the continued habitation of a building constructed of organic material- in optimal conditions turf constructed buildings, even those incorporating stone material, are still subject to decay. The prolonged habitation reflects the reduction in resources necessary to construct longhouses. The greater amount of degradation present in a longhouse of lower status sites is accompanied by fewer, one or two, outbuildings than its contemporaneous counterparts. As time passed the accompanying outbuildings increasingly became attached to the longhouse itself, such has been excavated at Setters and Hamar in Shetland and Toftanes in the Faroe Islands (Stummann Hansen, 1991; Stummann Hansen & Waugh, 1998). Small finds found with these farm structures are few in number and primarily associated with periods when the structure was used for farm middens. This may indicate that many of these farm structures were utilized for the storage of perishable organic goods such as winter fodder or drying meat.

The associated system of shielings and gathering sites is also reduced in comparison to higher status farms. This can be reflected in farms sharing pasturelands such as at Argisbrekka in the Faroe Islands. This allowed two or three smaller farms to exploit the high pastures that might have otherwise been affiliated with a larger farm complex and provisions for this practice existed within law (Mahler, 1995, p. 490; Mahler & Malmros, 1990, pp. 12-13; Eithun, et al., 1994, p. 91). Elsewhere lower status shielings were located in the more marginal areas where grasses were present but not in the quantities to support a large domestic animal population that would in turn create a surplus of animal product for later farm subsistence. Lower status farms were often more marginally placed in terms of coastal salvage rights, particularly during the medieval period. This may have in part led to such practices as communal division of whales that have continued to be practiced to this day in the Faroe Islands (Bloch, 2007; Lindquist, 1994 [unpublished]).

Within a farm, there was also an existent social hierarchy. Simply put the larger the farm the more human working hours are required to maintain productivity and subsistence. There are three solutions to an increased need for human working hours: enhancement of working efficiency via technology, more people included in the farm unit, or a compromise must be made in the quality of work produced. This process is illustrated in Figure 58. Farms in Zone 1 were associated with extended family units and the auxiliary farm members according to *Gulatingslog*. Higher status farms were able to support greater numbers of both extended kin and their servants who may or may not have been slaves. *Gulatinglog* highlights the legality of slavery within the first centuries of settlement in Zone 1 in sections 57, 61-2, 64 and 67-9 (Eithun, et al., 1994, pp. 68, 71-72, 74-75). The physical presence of slaves on a site is impossible to tell from lower status archaeological evidence in Zone 1. There would have been enough surpluses to support the room and board for auxiliary farm

members who otherwise would have been unpaid. These auxiliary members in turn facilitated a farm's success.

The presence of slavery on Zone 1 Norse north Atlantic farms is difficult to find. Archaeological evidence has a notable lack of items associated with slaves elsewhere in contemporary Europe that makes slaves unable to be discerned from the other landless poor of society. *Gulatingslog* also acknowledges the presence of vagrants within Norse society of Norway and by extension Zone 1 in section 77 (Eithun, et al., 1994, p. 80). The fact this status is given a full description within the law code shows how anathema the concept of living outside the delineated network of Norse culture would have been to many of the early twelfth century. Living outside of the law, for whatever reason, would have been a difficult existence in the marginal environments of Zone 1. The lack of physical evidence hints at either slavery not occurring in the same manner as it did in latitudes to the south or else the evidence itself was not preserved on the sites now known. In relation to farms in Shetland and the Faeroes slavery can be seen as being impractical in the marginal archipelagos for the majority of family farms. Farm slave labor had to be fed out of the farm's produce and stores. Since agriculture is not as productive a utilization of northern island resources as animal husbandry, this would have quickly become a real concern. An exception to this may have been female concubines who also performed domestic duties in the house, as these would have been a sign of status (Mauss, 2000, pp. 6-7). Potentially a concubine might be either slave or free (Brink, 2012). This will be further examined in Chapters 10 and 11 as slavery as both economic and social concept relates to macroscale elements of identity. Lower status farms would have less or potentially no auxiliary members resulting in the extended family taking up the totality of farm work. The actions of the lower levels of this social system are visible on farm sites through Zone 1, however direct evidence aside from that provided from

completed and abandoned tasks for this level of society can be quite difficult to find and must be considered within singular sites at this time as opposed to this regional consideration. This reflects both the long term archaeological practices used throughout Zone 1 as well as the more marginal nature of sites in the north in general as it was increasingly difficult for solitary and extremely poor people to exist successfully without the support of a larger farm particularly as the Little Ice Age advanced.

5.5 Orientation

Microscale evidence for the orientation of identity in Zone 1 highlights a seasonally dictated fluctuation between marine and terrestrial loci. These loci are expressed in a number of practices that are detailed in Table 4. The balance maintained in the spectrum between these two is heavily affected by the availability of day light in combination with available technology, particularly boats.

Between April and September a Zone 1 Norse farm would experience the greatest pressure from marine and terrestrial vectors. There are three practical drivers to the choice of activity on Norse settled islands of Zone 1: the amount of daylight, the type of weather and the tide. Terrestrial activities in this period before electric lights are dictated by daylight and to an extent by poor weather and the tide. These activities include the majority of outdoor work on the farm including ground preparation, building construction, as well as management of farm stock. Littoral activities are dictated by the tide and amount of daylight but the weather also plays a part to a lesser extent as well as this can affect the amount the tide effects access to the littoral zone. Littoral zone activities centre on obtaining coastal marine resources both by collection of shoreline species when exposed during periods of low tide as well as shoreline fishing. Although daylight is useful for marine activities are dictated

by both the weather and the tide. This type of activities includes open water fishing; water assisted trade as well as water born transportation. Figure 31 illustrates the amount of specialty equipment required for relative success in the different areas of a Norse Zone 1 farm.

Gender	Social rank	Outlook	Description
Female	Low/ unfree	Terrestrial, littoral	This level is associated with some of the most unpleasant tasks of the house and littoral zone gathering.
	High/ free	Terrestrial	This is associated with cultural taboos regarding women and marine productivity.
Male	Low/ unfree	Terrestrial, littoral, auxiliary marine	Any job not seen as women's tasks and many that were.
	Mid/once unfree	Seasonal change between marine and terrestrial for some, total marine for others	This level is most dependent upon the local economic context and much effort may be put for to gain profit.
	High/ free	Terrestrial and marine	Both outlooks are necessary to successfully and profitably exist within interregional networks of exchange.

Table F Gender based consideration of identity orientation on Zone 1 Norse farm sites, including data from Gulatingslog.

Another set of identity vectors present on the microscale in Zone 1 is related to economic choice that can affect the marine and terrestrial identity choices made by an actor onsite. This principle works on the idea that there is always a motive towards personal profit of either the group or individual. There are three primary vectors to these choices that are expressed in Table 5. The vectors directly impact microscale elements of identity construction and maintenance via choices made in relation to local exchange. These vectors are also found in the wider context of Atlantic exchange and shall be discussed further in Chapter 10. It is important to

remember that these vectors can influence how the farm unit makes their choices in practices to express as these provide the basis for the greater macroscale network of identity and economics.

The widely accepted view of women's roles on Norse farms are influenced by ethnographic evidence provided by later Icelandic textual sources and Danish longhouse excavations linked to the "triangle of byre, dairy and living quarters" (Jesch, 2001, pp. 40-41). However, when the microscale evidence for identity orientation is considered with reference to gender this view is dramatically changed. This is expressed in Figure 62. As can be seen the littoral zone functions as an intermediary neutral area for identity as well as being a physical intermediary between marine and terrestrial elements of Norse society. The breakdown reflects levels of farm hierarchy including the freeborn, the un-free and the once-un-free. These elements are certainly aspects of identity construction and maintenance in the north Atlantic.

5.6 Conclusion

The analysis of case study evidence from Zone 1 has highlighted a highly practical element to the microscale aspects of identity construction and maintenance present on Norse sites. This element was highly adaptable concerning local environments. This resulted in a reliance on turf and stone construction techniques but also the exploitation of a wide variety of wild species as evidenced at Undir Junkarínsfløtti on Sandøy (Arge, et al., 2009, p. 20). A four-part social hierarchy expressed in Figure 55 maintained this local system. This social hierarchy also expressed and was impacted concurrently occurring macroscale elements of identity construction and maintenance. These wider reaching elements are discussed in detail in Chapters 10 and 11.

Chapter 6 Settlement, economy and lifestyles in Iceland c.AD870-1250

6.1 Introduction

The case study for Zone 2 utilizes evidence from the Easter and Southern Quarters of Iceland in corroboration with the most recent of farm sites from the rest of Iceland. As these Quarters are less well represented by modern excavations, the region of Mývatnssveit located in northern Iceland has been included. This area has been subject to intense archaeological survey, excavation and publication (Lucas, 2009). Much of this work has been widely published well primarily by the international research group NABO. The Quarters were legally established in AD930 as the physical areas for the Spring and other seasonal assemblies. These in turn supported and carried out the decisions made by the national assembly the Alþing held later in the year at Þingvellir (Thorlaksson, 2000). In this fashion, the period of Icelandic medieval independence known as the Free State was able to function as a parliamentary political unit sans a singular ruler within the Continental networks until Iceland's submission to Norway in the 1260s.

Iceland, Zone 2, is physically located over the mid-Atlantic ridge where the North American and European continental plates meet (Sigmundsson & Saemundson, 2008). Because of this, there has been ongoing volcanic activity throughout much of the area. This can be incredibly useful in terms of dating archaeological sites as studies have successfully associated tephra layers with archaeological sites from both Zone 1 and Zone 3 have also utilized this dating sequence as winds cause the pyroclastic clouds to spread beyond Iceland's shores (Thorarinsson, 1981; Dugmore, 1989).

The case study sample for Zone 2 is derived from the Southern and Eastern legal Quarters of jurisdiction in Iceland, which were established during the early tenth

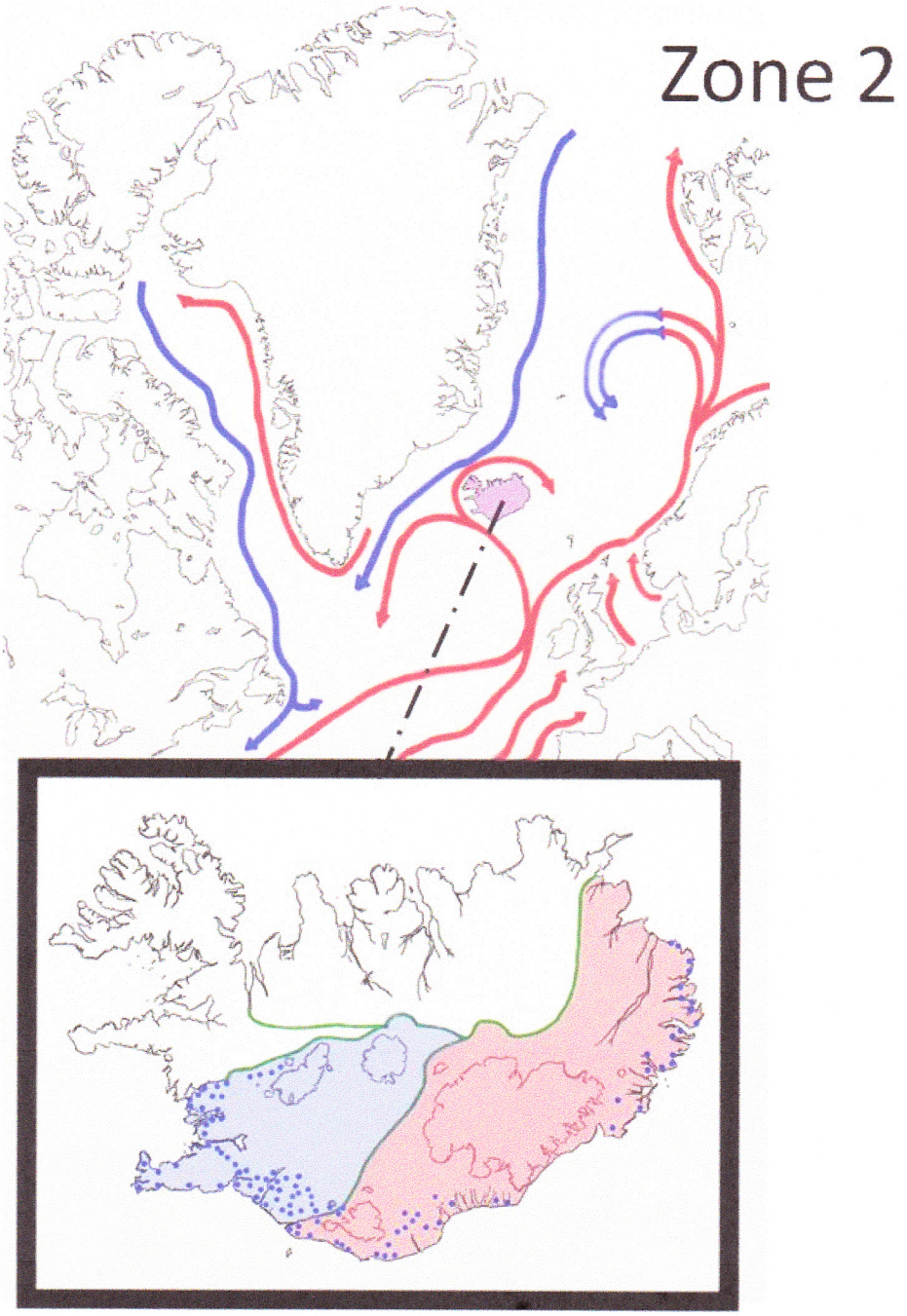


Figure K Zone 2. Warm water currents are shown in red while cold water currents are shown in blue. The Eastern and Southern Quarters are shown in red and blue shading respectively.

century, as well as the modern excavation of a northern local network at Mývatnssveit. This selection, except Mývatnssveit, is warmed by the water currents to the South of Iceland. These currents reduced the impact of sea ice accumulation that influenced areas to the north. This allowed some grain production to occur during the climatic Medieval Optimal that coincided with much of the timeframe under consideration. This warm period also influenced the amount of open and coastal oceanic travel that was able to occur annually.

Zone 2 was known to Atlantic populations prior to the arrival of Norse circa AD870 although whether they were settled is subject to debate (Ahronson, 2002, p. 111; Sveinbjarnardottir, 2002, p. 98). Within contemporary ecclesiastical sources, reference is made to hermetic priests originating in the British Isles inhabiting the remote north Atlantic islands. Their presence in Zone 2 is potentially evidenced by Papar associated place names in the landscape. This is discussed further in Part 3 concerning external vectors of identity change. The corpus of Icelandic textual sources has heavily impacted not only archaeological research in Zone 2 but also in the field of medieval Scandinavian studies in general (Fríðriksson, 1994; Svanberg, 2003). Zone 2 has produced and maintained a substantial body of vernacular written evidence since the medieval period detailing such topics as history, law, religion, politics and economics. This is what other western European political units had been doing for centuries creating a public group history that can be utilized as a social tool. Iceland's peripheral location resulted in a strong adherence to the sagas in particular as nationalistic historical tradition following Norway's acquisition of Iceland in AD1263. This has been recognized in both Icelandic and Scandinavian archaeology (Fríðriksson, 1994; Svanberg, 2003). In spite of this aspect of Icelandic textual sources they allow insight into what day to day actions were associated with living on farms in Zone 2 and how those actions were socially viewed in short a literary snap-

shot of daily life. This can be invaluable for considerations of microscale levels of identity, as the local microscale aspects do not always survive archaeological excavation of the site. Recognized saga sites are illustrated in Figure 32.

Overall, the widest variety, i.e. different types, of evidence has been either discovered or preserved in some way in affiliation with Iceland, Zone 2. This material has influenced not only studies on early Iceland but also the wider field of medieval Scandinavian studies in general by causing a generalization of the elements of identity construction and maintenance resulted in a blending of identity elements. This case study is intended to highlight what elements are present within the Eastern and Southern evidence. Many of the sites in this Zone were excavated during the early twentieth century, which has necessitated the inclusion of Northern Quarter evidence that has been more consistently excavated. This has been drawn from the modern regional surveys and excavations of Mývatnssveit (Lucas, 2009; Ascough, et al., 2007; Brown, 2010 [unpublished]). This area contains well-published evidence for a localized network including coastal and interior valley sites. This material is presented separately from that of the Eastern and Southern Quarters, so that this process of cross-consideration can be critiqued.

6.2 Biases associated with Zone 2

There are several archaeological biases associated with Zone 2. Turf construction techniques are mostly organic in nature that can be difficult to find within a long settled landscape. There has been a heavy reliance upon textual evidence taken as historical fact in the past which was used to locate, name and at times even associate with certain unique historical events. This practice has been recognized and explored more fully in academic research by first Fríðriksson with regards to Iceland (1994) then Svanberg who applied the concepts to the wider Scandinavian world (2003). In

spite of this there continues to be a strong popular association between physical sites in the Icelandic landscape and saga. There was also a heavy antiquarian influence upon site choice in excavations, i.e. burials chosen for excavation over farm sites, the more impressive longhouses chosen over smaller auxiliary buildings (Fríðriksson, 1994; Eldjarn & Fridriksson, 2000). This has resulted in a divorce of the buildings and burials of Norse north Atlantic sites in publication.

The preservation of medieval farms in Zone 2 is dependent upon the effects of erosion, volcanic and Aeolian activity that affects Iceland. Several sites have been subject to subsequent utilization, which may be continuous. Many sites located away from the settled coastal areas were less likely to be found until quite recently. The preservation of turf and soil constructions in particular has added to the difficulty in site location and recognition. Modern technology is somewhat able to compensate for this: soil sampling for palaeoecological evidence as well as less invasive methods of ground-penetrating radar and magnetometry. Ideally, this would be considered in conjunction with satellite imagery from Google Earth and aerial photography provided by Landmælingar Íslands however, the entirety of Zone 2 is not yet available in the same amount of detail due to the presence of cloud cover within the satellite image that obscures the detail. This situation is rapidly changing and will form an easy way to further the number of known sites.

Artifact assemblages are often quite small in comparison to the size of the building and farm complexes although there are certain anomalies to this such as Stöng, Hólmur and Hófstaðir (Lucas, 2009; Einarsson, 2008; Stenberger, 1943). Perhaps unsurprisingly these assemblages are primarily inorganic in nature with stone and iron being present but also organic elements as well such as wood and bone. The small amount of material in combination with the homogenous nature of the

assemblages has contributed to the later focus on farm mound and midden locations that provide greater environmental detail. Textual sources by type are illustrated in Figure 33.The preservation of evidence for identity construction and maintenance is also subject to its own biases. Some locations are represented better than others as certain locally powerful families were the patrons of the medieval authors and scribes. The physical preservation of medieval manuscripts is also a concern. The major medieval legal source *Grágás*, for instance, is only known directly from the manuscripts of *Konungsbók* [c. 1260] and *Staðarhólsbók* [c. 1280], but had been codified in the early twelfth century (Dennis, et al., 1980, pp. 10-13). Two of the main textual sources that discuss the settlement of Iceland- *Islendingabok* and *Landnamabok*- have been linked to the efforts of a single author, Ari Þorgilsson (Thorlaksson, 2007). Other sources are represented only by quotations via later medieval authors, the most famous of these being Snorri Sturlusson. This work does not employ such evidence, however fragments of poetry in particular has survived in this manner and has influenced other researchers in the past.

During the nineteenth century, Icelandic medieval sources were accepted as a true representation of the period from settlement immediately prior to the Reformation (Sawyer & Sawyer, 2003, p. 23; Fríðriksson, 1994). Since the late twentieth century, a trend of focusing less on historical events presented and more upon cultural values and practices represented within saga material in particular (McTurk, 2007). Major excavators have been included in Table 6. Although this is no longer the case the impact of this reasonably accessible corpus of material for speakers of modern Scandinavian languages cannot be underestimated. Sources that discuss the initial period of settlement landnám date from three to four hundred years later than the events they discuss (Sigurdsson, 2007, pp. 286, 295; Sorensen, 2000, pp. 26-28; Quinn, 2000, pp. 30-31; Whaley, 2000, pp. 167-169). For the subsequent

Commonwealth Period the textual evidence of identity construction and maintenance is more often contemporary to the thirteenth and fourteenth century. However, this may have been edited during the subsequent recopying prior to modern printing. These texts also provide a sense of the patron/author relationship, international politics and trade networks. This is a view influenced by the habitus of the writer and previous oral transmission practiced even in works which claim no affiliation other than knowledge and religion.

6.3 Eastern Quarter

The Eastern Quarter of Iceland is located the closest physically to Zone 1. Settlement of this Quarter occurred primarily on the coast, including two island sites at Goðatættur and Hérjólfsdalur. The Eastern Quarter has been subject to fewer farm excavations in the past. This is not a pattern continued with reference to excavated medieval burials, however, as evidenced by the work of Eldjárn which compiled the vast majority of known Icelandic material from throughout the area (Eldjarn & Fridriksson, 2000, pp. 11-19). As much as is possible Eastern adaptations of identity construction and maintenance in practice shall be highlighted. Some of the reasons for this lacuna in evidence will also be considered.

The oldest excavations within this area were conducted on sites now being acknowledged as being late twelfth to thirteenth century in date through reanalysis. This may reflect the nature of preservation with regards to the physical evidence or possibly that these were just the easiest sites to locate. Erosion is the dominant means of finding sites in the Eastern Quarter of Zone 2. Modern construction efforts, particularly road construction have been another major means of locating sites. To a lesser degree field levelling carried out by modern farmers to alleviate some of the effects of glacial runoff, derived erosion has located sites within more marginalized

areas. These archaeological sites are unprotected by farm boundaries and are intensively drained when necessary. Antiquarian efforts of both later farm owners and foreign researchers also discovered a number of sites. In every one of these cases antiquarian efforts were associated with eroded burials found near farms rather than farm sites. The corpus of burial material from throughout Iceland was reconsidered and dated during the late 1990s by Eldjárn and Fríðriksson (2000). Because of this, it is possible to consider a more complete view of medieval Icelandic familial identity, however a discussion on the initial period of settlement is difficult to make due to lack of dated evidence.

Figure 63 illustrates the area of focus for this section as well as site locations utilized as evidence. Several glaciers have resulted in series of glacial moraines dominate the interior of this Quarter and runoff derived rivers. There are also three volcanoes in this Quarter. These features have influenced not only the amount of farms initially established but also the amount of modern excavations conducted, as conditions for travel have been poor.

6.3.1Morphology

Eastern Quarter farm sites are poorly represented within the Zone 2 archaeological record. They can be placed into a relative chronological grouping of early and late sites. Early sites are represented by Hérjólfsdalur, Stóraborg, and Hólmur (Hermanns-Audardottir, 1991; Snaesdottir, 1991). These are also the most recently excavated settlement sites, with the excavation of Hérjólfsdalur being both the oldest and most complete beginning in 1971 and continuing every excavation season until 1983 (Hermanns-Audardottir, 1991, p. 1). There are some commonalities between these three sites, which potentially may be corroborated by greater archaeological survey and excavation in the Eastern Quarter.

Norse settlers exploited a variety of landscapes for the establishment of their farms. Wetland areas were less covered by trees at the onset of settlement that required less land clearing prior to construction of buildings. A variety of food and material resources such as fresh water were nearby. This meant less time had to be spent devoted to resource procurement and more could be devoted to construction efforts. Many of these sites held rights over adjacent shores, highlighting the method of site discovery being via open water marine vessels. This is sometimes alluded to within textual sources as well. Turf constructions of the medieval period were damp places due to a lack of a roof runoff system to cope with the rainy north Atlantic climate. This in combination with damp foundations laid upon wetland areas would have resulted in a damp house more difficult to heat.

Farms were also established on smaller islands as well such as at Hérjólfsdalur on Vestmanna (Hermanns-Audardottir, 1991, p. 1). The site of Hólmur hints at the presence of a low-lying island nearby as well in its place name (Einarsson, 2008). Island and coastal sites are both subject to marine derived erosion. A marine orientation is expressed more often in such areas. Hólmur, dated to the late ninth to tenth century, reflects a descriptive toponymic from nature which means 'low islet'. Hérjólfsdalur, on the other hand, reflects a tenth to eleventh century date with the personal name of Hérjólfr in combination with a natural name element- valley (Faulkes & Barnes, 2007). The early island utilization in combination with the osteological assemblages of these sites highlights the presence of great auk exploitation (Einarsson, 2008). Low lying islands were the preferred location of auk colonies and formed a substantial portion of protein derived from wild sources.

All three of the early sites within the Eastern Quarter of Zone 2 provide evidence of pithouse construction and early utilization. At Stóraborg, this was a quite small area-

en a wattled and turf-covered roof had covered excavated pit of 2.1x2.3 meters. It contained evidence of a small hearth as well (Snaesdottir, 1991, p. 118; Milek, 2006 [unpublished], p. 212). This pithouse was dug into a low-lying hill, perhaps to reduce the effects of a high local water table (Snaesdottir, 1991, p. 119). At Hólmur, another pithouse was excavated in 1999 from another low-lying hill near an abandoned farm. This particular structure was cited as an area of cult focus, a *blóthus* or 'sacrificial-blood house' within site publication (Einarsson, 2008, p. 145). At Hérjólfsdalur a third, pithouse was also discovered dug into a low-lying hill around which a subsequent farm was constructed (Hermanns-Audardottir, 1991, p. 1; Milek, 2006 [unpublished], p. 212). Stóraborg and Hérjólfsdalur both developed farm mounds that were associated with the later farmsteads (Snaesdottir, 1991, p. 118; Einarsson, 2008, pp. 145-146; Hermanns-Audardottir, 1991, p. 1; Bertelsen & Lamb, 1995).

At Stóraborg, a singular longhouse was constructed following this initial phase of pithouse (Snaesdottir, 1991, p. 116; Milek, 2006 [unpublished]). The dimensions of the longhouse were between sixteen and twenty-five meters (Snaesdottir, 1991, p. 119). Unfortunately, subsequent continued site utilization has made it difficult to determine long house details on this site. In the case of Stóraborg, this continued to the modern period and a farm mound developed (Snaesdottir, 1991; Bertelsen & Lamb, 1995; Milek, 2006 [unpublished]). Partial site excavations in combination with older excavations have made discussion of early longhouses other than these much more difficult as turf remained the primary method of construction for settlement and medieval Zone 2. Evidence provided at some sites continues to overlain by modern buildings which has resulted in a reduced amount of evidence for analysis.

At Hérjólfsdalur, on the other hand, two contemporaneously utilized longhouses were built following the pithouse (Hermanns-Audardottir, 1991). At Hólmur a

longhouse and farmyard was discovered some 250 meters away from the presumed *blóthus*- this was excavated in 1997 (Einarsson, 2008, p. 145; Milek, 2006 [unpublished]). Hólmur is illustrated in Figure 35. All of the initial longhouses constructed share the characteristics of bowed sides and longhouse dimensions. At Stóraborg the dimensions of this longhouse were between sixteen and twenty-five meters (Snaesdottir, 1991, p. 119). Unfortunately, subsequent continued site utilization has made it difficult to determine long house details on this site. In the case of Stóraborg, this continued to the modern period and a farm mound developed (Snaesdottir, 1991, p. 1991; Bertelsen & Lamb, 1995). Milek utilizing both morphology and geochemical analysis of microsediments has recently considered transitions of house types over time (2006 [unpublished]).

There are two farm sites that date to the later phase of medieval construction in the Eastern Quarter. The earlier of these is Goðatættur that has been typologically associated with the eleventh and twelfth centuries (Berson, 2002). It consists of a singular longhouse and byre. This site is located on an island, maintaining some continuity with earlier centuries (Berson, 2002). This longhouse has straighter internal sides shown by the presence of stone foundations for the turf walls. The later site of Bergþórshvoll was initially occupied during the twelfth to thirteenth century (Vesteinsson, 2007). This is represented by a byre underlying a later medieval longhouse and associated outbuildings (Berson, 2002, p. 44). A farm mound developed during the subsequent occupation that overlaid the site. Unfortunately, this site has been incompletely recorded over its excavation history. This has made it difficult to consider such topics as space utilization in relation to microscale elements of identity presented in the Eastern Quarter of Zone 2.

6.3.2 Space Utilization

Space utilization within the Eastern Quarter is incredibly difficult to comment upon due to the small sample size- no generalizations can be made because of this. Relatively few internal features can be commented on in any depth. Central hearths are included on site plans indicating a central focus within the longhouses themselves. Hólmur is somewhat of an anomaly to this group (Milek, 2006 [unpublished], p. 212). Although the pithouse here was within 300 meters of an abandoned medieval farm site it was more directly in association with accompanied pagan burials which contributed to the excavator's designation as an area of cult focus (Einarsson, 2008, p. 145). This is a unique site at the moment which potentially highlights the presence of a pagan element to the local population. As there is no way to average such a small sample and have it be considered representative data from other areas of Iceland, in particular the region of Þjórsádalur, are utilized.

The burial evidence from the Eastern Quarter, however, shows what is possible with a greater sample (Eldjarn & Fridriksson, 2000). Located to the outer edges of the outfield to the north and northeast of a farm were placed family burials. This was in association with the main farm unit yet not within the area of heaviest daily utilization. Both accompanied and unaccompanied interments have been excavated from mounds in the landscape (Eldjárn and Fríðriksson 2000). The excavated and documented burials are primarily accompanied by grave goods including items of adornment and practicality. When animals accompany human burials they are primarily horses although evidence of dogs has been found at Brú and Rangá (Eldjarn & Fridriksson, 2000). The burials are often covered with first a mound of stones then earth which accentuated the presence of the low mounds in the landscape. These are not always singular interments as cemeteries have been located and excavated at

Vað, Straumer, Reykjasel and Hrífunes (Eldjarn & Fridriksson, 2000). These sites are located near rivers.

6.3.3 Evidence of Lifestyle

The amount of direct evidence provided by the material culture of an excavated farm site from Iceland is actually quite small in comparison to the physical size of these farms. When this in considered in conjunction with burial evidence however certain elements of microscale identity practice can still be seen. This material is presented first in relation to domestic practices and subsequently wider farm practices.

Fire utilization in the domestic longhouse took place in central hearths; however, evidence from Hólmur shows other forms of fire manipulation. Earth and local stones were utilized within Norse medieval constructions to assist with cooking in daily life. At Hólmur an example of both an oven as well as a cooking pit were excavated (Einarsson, 2008). Both of these constructs allow for the more specific application of heat than was available via the central hearth of the longhouse. The central hearth contributed to the general atmospheric heating and lighting of longhouses (Milek, 2006 [unpublished]). Cooking which required open flame, a vessel or even smoke produced by burning fuel also would involve the central hearth.

Imported steatite was utilized in vessels that were able to withstand the heat of nearby flames, similar to ceramic vessels in later periods in Zone 2. This soft stone is easily carved into a variety of forms including lamps used to light the dark interiors of longhouses and other human habitations. Unlike Norwegian lamp sequences however, north Atlantic steatite forms are less distinct (Buttler, 1984 [unpublished]; Forster & Bond, 2004; Buttler, 1991). At Hérjólfsdalur on Vestmanna off the southern coast of Iceland, steatite was 13% of the assemblage (Hermanns-Audardottir, 1991, p. 6).

Evidence for the smelting of iron is known from Bergþórshvoll where bog iron was converted into iron blooms (Berson, 2002). Iron was also imported both as iron ingots as well as completed products such as knives and fish hooks. The need for iron within Zone 2 was greater than the supply of raw iron in the area that led to a practice of recycling and reuse of iron (Vesteinsson 2000: 169). This method also required much less fuel than the full smelting procedure. This also led to a practice of utilizing animal bone as a replacement material for iron and wood items.

Personal items of adornment from sites such as Hrífunes, Einholt, Ormsstaðir and Ketilsstaðir appear to largely be designated as female- particularly the tortoise brooch (Eldjarn & Fridriksson, 2000). This may be due to several causes- a change in fashion where tortoise brooches no longer held any use save as heirloom, conditions of preservation better suited to non-ferrous metals, and even misidentification of male graves. Six of the recognized thirty-one burials considered for this case study contained evidence for burial with horses and one of those had evidence of dog interment with human as well at Rangá (Eldjarn & Fridriksson, 2000). When ferrous items have been found they range from common knives to axes and strap ends. These are rare due to the conditions of preservation and of excavation. Many of the burials in the Eastern Quarter were discovered over time as land eroded or was moved with human intent.

6.4 Southern Quarter

The Southern Quarter experienced heavy settlement during the initial landnám according to a variety of evidence. Major modern excavation and survey efforts have been conducted at Aðalstræti and regionally at Mosfellssveit (Byock, et al., 2005; Sverrisdottir, 2006). This area also contains the first bishop's seat at Skáholt, which has also been subject to recent archaeological research, as has the site of the

Icelandic National Assembly at Þingvellir. The most famous excavation efforts in Zone 2 were carried out during the early twentieth century in the interior valley of Þjórsádalur at Stöng that have been influential throughout the subsequent studies of the medieval Scandinavian world (Stenberger, 1943). Since that time famous conservation efforts have been undertaken within Reykjavik itself. Figure 34 shows a portion of the wall which was conserved.

This Quarter contains Reykjavik, the modern capital of Iceland. Settlement of this Quarter of Zone 2 occurred initially on the coast, although the rich river valleys of the interior such as Þjórsádalur were being exploited by the mid-tenth century (Vesteinsson, 2007). Erosion as well as road construction is often associated with the discovery of sites in the Southern Quarter. To a lesser degree farm activities, such as field levelling or gardening, have been associated with the discovery of archaeological sites. Antiquarian efforts do appear to play a greater role in the discovery of archaeological material, when considered in light of the higher number of known archaeological sites however the proportion remains similar.

The Southern Quarter has some of the most favourable environmental conditions of Zone 2. These are fewer glaciers and they are farther inland resulting in greater amounts of land being available for settlement exploitation. Glacial runoff figures heavily in the drainage system of the region.

6.4.1 Morphology

Norse settlers exploited a variety of landscapes for the establishment of their farms in the Southern Quarter. Wetland areas were less covered by trees at the onset of settlement that required less land clearing prior to construction of buildings. A variety of food and material resources such as fresh water were nearby. This meant less time had to be spent devoted to resource procurement and more could be

devoted to construction efforts. Examples of this in practice are the sites of modern Reykjavik: Aðalstræti and Suðurgata (Sverrisdottir, 2006). Many of these sites held rights over adjacent shores, highlighting the method of site discovery being via open water marine vessels. This is sometimes alluded to within textual sources as well. Turf constructions of the medieval period were damp places due to a lack of a roof runoff system to cope with the rainy north Atlantic climate. This in combination with damp foundations laid upon wetland areas would have resulted in a damp house more difficult to heat. Sites that existed in such conditions can be incredibly well preserved such as at Aðalstræti (Sverrisdottir, 2006).

The earliest phases of construction in the Southern Quarter are sometimes linked to sunken feature buildings. This does not always hold true however as at Aðalstræti no evidence for one was found, perhaps do to the presence of a spring mistakenly included into the long house walls. At Gjáskógar, the sunken feature-building phase was followed by a longhouse and associated outbuilding (McGovern, et al., 1988). At Bessastaðir, a longhouse was excavated in association with the sunken feature building- both constructions were overlain with more recent constructions of modern Reykjavik (Sverrisdottir, 2006). At Hvítarholt, the five sunken feature buildings were discovered in association with two multiperiod longhouses and outbuildings (Milek, 2006 [unpublished]).

The main building, the longhouse, was constructed next. At Skallakot in Þjórsádalur, the farm's longhouse was 26x5 meters internally at Hvítarholt the longest farm building measured 19x6 meters internally (Stenberger, 1943). Skallakot is illustrated in Figure 36. At Aðalstræti, the initial phase of the longhouse measured 16.7 x 3.7-5.8 meters with a well-defined central hearth (Milek, 2006 [unpublished], p. 159). The

smaller site of Áslakstunga fremri is illustrated in Figure 37, the famous site of Stöng in Figure 38. The later site of Lundur is included in Figure 39.

Interior forest areas also became chosen as time passed, as there was a ready supply of timber, fuel, forage and wild resources (Church, et al., 2007, p. 659). Wooded areas such as Þórsmörk were also sheltered in the landscape from bleak maritime winds and hence were better suited for house establishment (Arnalds, 1987, p. 509; Caseldine, et al., 2004, p. 184; Erlendsson, 2007 [unpublished], p. 12). Land clearing is necessary which reduces the amount of time available to construct buildings. As a result, farm establishment in these areas would have been a multi-year process in particularly densely wooded regions. Interior regions in general were more removed from the direct lines of water-borne communication. In this period before roads had been constructed in Zone 2 internal travel by foot or by horse would have been quite slow and potentially dangerous depending on the number of glacial runoff rivers in between origin and destination. Forest areas were also maintained to provide a source of charcoal necessary for metal working (Church, et al., 2007, p. 660).

Construction material types utilized in Zone 2 are primarily organic in nature. Turf blocks remained a major building material in the rural region from initial settlement past the nineteenth century (Bathurst, et al., 2010, p. 2920). At Hrísbrú diatom analysis has shown that, more robust wetland species of grass were cut for turf blocks to build longhouse walls (Bathurst, et al., 2010, pp. 2920-2922). Dryer meadow species were cut to cover the roof. This was also confirmed via paleoentomological identification at Holt (Buckland, et al., 1991, p. 265).

Timber was also an important construction material utilized in roof supports and internal planking as well as a variety of domestic and farm implements. Initially the need for this material was met by local forests of birch, *Betula pubescens*, evidenced

by pollen, and driftwood (Arnalds, 1987, p. 509; Erlendsson, 2007 [unpublished], pp. 1-4; Eysteinsson & Blondal, 2003, p. 415). This practice continued throughout the Commonwealth period via provisions in law (Dennis, et al., 1980, p. 100). *Grágás* section 199 deals explicitly with ownership of woodland areas. The fact that this section is quite long in comparison to other portions of the land law highlights the importance of this resource within eleventh and twelfth century Iceland (Dennis, et al., 1980, pp. 127-130). The first chapter of *Íslendingabók* also confirms that Iceland was a forested land at the time of settlement (Gronlie, 2006, p. 4). *Grágás also* deals specifically with driftwood and establishing claim upon it in sections 209-11 (Dennis, et al., 1980, pp. 141-142). Timber was also imported later as the woods of Iceland became over-utilized subsequent to the thirteenth century (Dugmore, et al., 2005). Smaller branched woody plants such as dwarf birch were utilized within roof construction. Straw was also a form of construction material, particularly in the south where barley and later lyme grass could be grown (Gudmundsson, 1996, pp. 13-14). This was used as thatch and in rope production for a variety of tasks.

In the Southern Quarter, the Þjórsádalur excavations represent this later period. This inner abandoned region was subject to early antiquarian survey and excavation such as at Undir Lambhófða, Áslakstunga innri, Áslakstunga fremri, and Sámsstaðir (Bruun, 1928). Later immediately prior to World War II, major Scandinavian efforts at Áslakstunga fremri, Stórhóshlið, Snjáleifartóttir, Skallakot, Skeljastaðir and Stöng resulted in *Forntida Gårdar I Island* (Stenberger, 1943; Stummann Hansen, 2001, pp. 120-122). Of all of these Stöng, occupied from the eleventh to the thirteenth century and abandoned because of volcanic activity, is the most famous.

Associated with longhouses were outbuildings that housed farm activities unsuited to storage within the longhouse. These activities include iron-working and weaving

discussed above. These vary in form but include sunken feature buildings and smaller sub-rectangular turf builds. Barns for the storage of fodder indirectly highlight the presence of domestic farm stock as do byres for the housing of cattle (Berson 2002). Outbuildings that are auxiliary to the farm but are removed from the home farm exist in similar forms (Sveinbjarnardottir, 1991, pp. 77-83; Berson, 2002, pp. 60-61). Outbuilding construction continues utilizing turf blocks through time that can make determining the presence of early medieval shielings quite difficult. Although several regions to the interior have been surveyed, no excavation of shielings has provided radiocarbon dates (Sveinbjarnardottir, 1991). Berson published a survey of the medieval evidence for barns in Iceland in 2002.

There are changes to the house format over time, although the use of turf blocks continues. Bow-sided longhouses of varying lengths are the earliest (Milek, 2006 [unpublished], pp. 90-96). As time passed middens and farm mounds began to develop in the landscape a straight-sided form of longhouse became prevalent. At some sites, such as the second phase of Aðalstræti and at Stöng, outbuildings for storage and animal housing are attached to the farm's longhouse. Finally as the world cooled and the thirteenth century ended leading to more of the farm's auxiliary outbuildings being incorporated into the passage house form.

6.4.2 Space Utilization in Zone 2 Farms

Space utilization on a settlement era farm in Zone 2 is generalized in Figure 82. Domestic use of space focused upon the central hearth present in all medieval longhouses known. This is shown in the physical location of the hearth, evidenced by ash deposits, soil samples and charcoal. Examples include Hrísbrú and at Aðalstraeti amongst other sites (Sverrisdottir, 2006). As time passed, the format of the longhouse in particular began to change, incorporating outbuildings onto the

longhouse form. The main structure of the longhouse became straighter along the long walls as well, as illustrated in Figure 83.

At four of the earliest farm sites in the Southern Quarter of Zone 2 sunken feature buildings were discovered which predated or were concurrent with longhouse utilization in the area. At Gjáskógar in Þjórsádalur, an early sunken feature building was associated with iron-working activities. This was a multiphase site that was occupied from the tenth to the thirteenth century when the site was abandoned along with many others in the region (Berson, 2002).

Immediately beyond the environs of the farmyard were the protected infields and domestic gardens. Beyond the inner fields of a home farm, the outfields were located. The use of walls of turf and earthworks to help protect areas from livestock as well as to delineate the physical boundary of the main farm area is known from many sites. One of the best-preserved and conserved examples of this is located at Aðalstræti, see Figure 34 (Sverrisdottir, 2006). The physical delineation of farm boundaries and the manner of having this recognized by the local legal community became incorporated into Icelandic law by the eleventh to twelfth century, being discussed in section 181 of *Grágás*. At this time a "[...] legal wall is five feet thick down at ground level and three at top. From the base it should come up to the shoulder of a man whose arm-size gives valid ells and fathoms" (Dennis, et al., 1980, p. 110). These were required to be maintained by both neighbours in most cases and were walked upon land transactions such as selling and purchase (Dennis, et al., 1980, pp. 103-104).

The burials are often covered with first a mound of stones then earth which accentuated the presence of the low mounds in the landscape. The only fully excavated farm with auxiliary burials is located at Skeljastaðir. This site, shown in

Figure 89, is part of the major early excavations at Þjórsádalur in the Southern Quarter. Cemeteries containing multiple burials have been found located near rivers at Vað, Straumer, Reykjasel and Hrífunes rather than being located to the outer areas of a singular farm (Eldjarn & Fridriksson, 2000). Beyond the main farm unit were auxiliary aspects of the farm that were integral parts of the farm economy. This includes collection areas for wild and natural resources such as shorelines, marine bird nesting areas and fuel wood (Sveinbjarnardottir, et al., 1982; Eysteinsson & Blondal, 2003). These areas are incredibly difficult to find within the landscape, as they do not necessarily require substantial human constructions or land manipulations to exploit. These sorts of sites may be located via ecological survey in combination with legal descriptions of common rights provided by the *Grágás* (Dennis, et al., 1980).

6.4.3 Evidence of Lifestyle

Evidence of lifestyle from Zone 2 is greatest in the Southern Quarter, largely due to the early Þjórsádalur excavations (Stenberger, 1943; Bruun, 1928). However, there have also been modern excavations in the region as well, particularly in and around modern Reykjavik as the city has expanded (Sverrisdottir, 2006). Because this sample includes both modern excavations of waterlogged site as well as those, which were abandoned due to volcanic action the variety of evidence is broader than in other parts of the North Atlantic. The site of Stöng in the Þjórsádalur and its range of artifacts have had the greatest impact on not only North Atlantic sites but also contemporaneous sites in Scandinavia as well (Roussell, 1941). There is a large amount of material that can still only be discussed indirectly as the material is organic in nature, such as textiles. Evidence for a wool-based economy rarely comes in the form of the finished textiles however; loom and spinning weights as well as the remains of the sheep themselves can survive deposition much better. The excellent

conditions provided by the Þjorsa valley allowed the evidence for much of the region's wool economy to be preserved.

Iron finds are most often associated with burials although evidence for the shaping of iron is known. A prosperous farm might have a smithy present to fulfil the need for iron within the material assemblage. Evidence for this was found at Bergþórshvoll as well as at Gjáskógar (Berson, 2002). The past recycling of iron has impacted the amount of evidence known for iron utilization as broken and worn tools were re-shaped (Thorgeirsson, 2004; Durrenberger, 1991).

Wood was much easier to shape into useful forms than many of the materials discussed here, however discussed. Domestic items of wood ranged from the handles of farm tools to entire constructions such as upright looms, illustrated in Figure 41 (Gudjonsson, 1990). A whale bone weaving sword used to tighten the weave is illustrated in Figure 42. Sites and regions which have been waterlogged, such as Aðalstræti, or abandoned due to volcanic action, such as the region of Þjórsádalur, produce some of the best assemblages. Dating this material is most often accomplished typologically due to the variable absolute dates associated with driftwood that has been incorporated into wooden and timber goods (Eysteinsson & Blondal, 2003).

Like Zone 1 finds of steatite are also known from the South Quarter (Buttler, 1991). A major advantage which steatite vessels have over ceramics is the ability to recycle the vessel (Forster & Bond, 2004). If the object can be repaired with a patch and rivet, it continued in its original role- particularly if it is still able to hold fluid. If the object was damaged beyond repair, however the sherds may be reshaped into spindle whorl and loom weights, as illustrated in Figure 40.

timber and turf hall of bow-sided longhouse format and a sunken floor outbuilding (Ascough, et al., 2007; Lucas, 2009).

A sub-rectangular sunken feature building approximately c. 5x3.4x1.1 meters was discovered and excavated by Bruun in 1908 during Iceland's first major archaeological excavation (Fríðriksson & Vesteinsson, 1997, pp. 103-104; Lucas, 2009, p. 93). This feature was later re-excavated, twice, and documented using more modern techniques from 1991-2001 (Lucas, 2009; Brown, 2010 [unpublished]; Milek, 2006 [unpublished]). In the northwest corner of the structure was located a small hearth while access and potential side benches were negatively evidenced during geophysical analysis (Lucas, 2009, p. 96). Subsequent to the sunken feature building's initial utilization once the c. 1 meter high roof had collapsed it became the location of a midden (Lucas, 2009, p. 93; Brown, 2010 [unpublished]; Fríðriksson & Vesteinsson, 1997). Tephrochronological and radiocarbon samples showed the sunken feature building co-existed for a short time twenty years, with the dual phased timber and turf hall of bow-sided longhouse format and a sunken floor outbuilding (Lucas, 2009, pp. 78, Figure 78). The Hofstaðir hall itself consisted of two entrances, four rooms with a central hearth in the largest of these (Lucas, 2009, pp. 78, Figure 78). All of the initial longhouses constructed share the characteristics of bowed sides and longhouse dimensions. The largest of the early Zone 2 longhouses is that at Hófstaðir with internal dimensions c. 38x8 meters (Lucas, 2009).

6.5.2 Space Utilization in Zone 2 Farms

Space utilization on a settlement era farm in Zone 2 is generalized in Figure 82. Domestic use of space focused upon the central hearth present in all medieval longhouses known. This is shown in the physical location of the hearth, evidenced by ash deposits, soil samples and charcoal. Examples came from midden material at

Hofstaðir. Midden material was thrown to the outside of the human and animal habitations contributing to the development of farm mounds. Modern Zone 2 excavations have located and made good use of midden evidence. This evidence is more abundant than other forms of site deposition and material assemblages, particularly on sites excavated previously. Excavation of midden features allow greater in sight and discussion to be made concerning both human patterns of species exploitation and material usage as well as environmental contexts. Mývatnssveit in particular has provided several representatives of middens from not only Hófstaðir's phases but also the less well-known sites of Brenna, Hrísheimar, Selhagi and Steinbogi that have occupations from the ninth to the thirteenth century (McGovern, et al., 2007, p. 31). Any outbuildings that deteriorated to the point of being unsuited to their original purpose may also have been utilized as midden locations or had been dismantled to provide turf fertilizer for the fields (Bolender, 2006 [unpublished]; Brown, 2010 [unpublished]).

Beyond the main farm unit were auxiliary aspects of the farm that were integral parts of the farm economy. This includes collection areas for wild and natural resources such as shorelines, marine bird nesting areas and fuel wood (Eysteinsson & Blondal, 2003). These areas are incredibly difficult to find within the landscape, as they do not necessarily require substantial human constructions or land manipulations to exploit. These sorts of sites may be located via ecological survey in combination with legal descriptions provided by the *Grágás* (Dennis, et al., 1980). The most direct form of archaeological evidence for this practice comes from the excavation of midden as the refuse from wild collection efforts is deposited with the rest of the farm refuse (Adderley, et al., 2008; McGovern, et al., 2007).

6.5.3 Evidence of Lifestyle

Imported steatite was utilized in vessels that were able to withstand the heat of nearby flames, similar to ceramic vessels in later periods in Zone 2 (Lucas, 2009). This soft stone is easily carved into a variety of forms including lamps used to light the dark interiors of longhouses and other human habitations (Buttler, 1991; Forster & Bond, 2004). Steatite is not represented in the same amount of every site. For instance steatite composes some 17% of the total assemblage at Hofstaðir (Lucas, 2009).

There are many provisions for the keeping of animals- in particular sheep but to a lesser extent of horse, cattle and pig as well. Sheep form the basis for the medieval vaðmal industry of Zone 2 (McGovern, et al., 2007). There is physical evidence for their over-wintering in byres and other farm outbuildings. Evidence for the seasonal transhumance of sheep is mostly completely explored at shieling sites (Sveinbjarnardottir, 1991). There are extensive provisions regarding common grazing lands in the *Grágás* (Dennis, et al., 1980). Horses are evidenced not only by the inclusion of their harness fittings in burials but also by inclusions of the horses themselves (Eldjarn & Fridriksson, 2000). Horses would have been vital to rapid transport in the interior of Iceland- the land was too rough and too sparsely settled to warrant the construction of road networks. Indeed horses were used as a primary means of transport throughout Iceland until the twentieth century.

Wild species are also represented within osteological assemblages, highlighting the contributions these resources made to the overall economy of Zone 2 farms. Evidence for marine birds including but not limited to the great auk and puffin have been discovered. Evidence for marine fish has been recovered from both coastal and interior archaeological sites. Eggs were gathered seasonally. Egg shell has been

recovered from midden deposits at Brenna, Hofstaðir, Hrísheimar, Selhagi and Steinbogi whose occupation date from the ninth century to the early thirteenth century (McGovern, et al., 2007, p. 43). This highlights both some of the wild species exploited as well as the results that can be provided by soil processing techniques on modern excavations (Milek, 2006 [unpublished]; Brown, 2010 [unpublished]).

6.6 Conclusion

As has been shown the evidence provided by Zone 2 has been heavily impacted by its history of excavation. The influence of the early twentieth century excavators is felt in lingering patterns of thought concerning settlement as well as directly through their excavation practices. Systematic survey was not the primary means of locating archaeological sites in Zone 2 at this time (Fríðriksson, 1994). Sites were located by farmers who saw burials and farms eroded out of the landscape because of glacial and winter runoff- those sites more exposed to the elements. Field levelling by farmers using modern, i.e. not animal powered, equipment has also led to the discovery of early medieval material in Iceland. Construction of roads such as the Hringvegur has also been linked to site discovery. Major modern excavations, particularly those which focus on regional networks focus upon environmental impact and to a lesser extent than in the past seek a description of the development of a people (Fríðriksson, 1994). Sites which have been discovered since the formation of the Fornleifastofnun Íslands are much more likely to have been discovered via systematic survey. Several sites located by earlier efforts were initially excavated while other sites such as Hofstaðir were re-excavated utilizing modern techniques (Lucas, 2009). The history of excavation practices has greatly impacted the amount of microscale evidence derived- particularly in reference to evidence

immediately outside of longhouses and other buildings (Milek, 2006 [unpublished]; Byock, et al., 2005).

Microscale evidence highlights the arrival and continued presence of a population that had to adjust to several contexts quite quickly. Producing and managing multiple lines of subsistence became imperative in this area removed from established and well-travelled trade networks. Microscale consideration of identity construction and maintenance in Zone 2 follows in Chapter 7. This was accomplished by group interactions at the farm unit level that established and maintained these multiple lines of subsistence within the realm of farm life. This in turn occasionally created a surplus of resources that promoted the economy of the farm unit on a regional scale.

Chapter 7 Daily social practices of households in Iceland (Zone 2)

7.1 Introduction

The sample sites used for the Zone 2 case study come from the south and east of Iceland as well as from Mývatnssveit. Table G presents the major characteristics of these areas. This consideration of microscale identity construction and maintenance has been assisted by the data tables described in Chapter 3. This has allowed commonalities as well as differences within Zone 2 cultural practice to be discussed.

7.2 House and Settlement

Discussion of elements of both the household and settlement of Zone 2 has been heavily impacted by excavation and survey work conducted during the early twentieth century (Svanberg, 2003; Stummann Hansen, 2001). This earlier phase of research focused on quite specific elements of Icelandic existence- namely the internal aspects of longhouses, furnished burials and items of portable art and personal adornment. By focusing on the evidence in this manner, however, a disconnection appeared within consideration and publication of Zone 2 farm sites. Longhouses were not considered in conjunction with any associated burials in spite of the greater presentation numerically of excavated burials (Eldjarn & Fridriksson, 2000). There are only two fully excavated farm burial complexes excavated during this time, Skeljastaðir in Þjórsádalur that was published in 1943 and Hofstaðir in Mývatnssveit that was published in 2009 after a century of periodic excavation (Stenberger, 1943; Lucas, 2009). The excavation of Skeljastaðir was conducted to internationally high standards for its day- the Scandinavian excavators who led these efforts were some of the best known in Europe at the time. At Hofstaðir a modern confluence of regional experts have conducted a re-excavation and assessment of the entirety of the available material assemblage from the site (Lucas, 2009).

Eastern Quarter	Southern Quarter	Mývatnssveit
Gap in farm evidence due to survey practice- a part of the Zone 2 hiatus in evidence	The excavation of Þjórsádalur has resulted in an over-reliance on these farms as type sites, the most famous example being Stöng	Modern excavation and re-excavation of regional network has produced a substantial body of evidence in relation to the local environment
Burial evidence highlights the presence of a larger population	Access to both walrus and auk populations	Represented at the Alþing by the Northern Quarter Court
Trees evidenced via presence onsite, law codes such as *Grágás*, and place names	Trees evidenced via presence onsite, law codes such as *Grágás*, and place names	Trees evidenced via presence onsite, law codes such as *Grágás*, and place names
Coastal access	Coastal access	Lake access
Early antiquarian efforts associated with burials sites	Early antiquarian efforts associated with farm sites	Early antiquarian efforts associated with farm sites
Grain agriculture initially possible	First bishopric established at Skáholt	Direct saga reference
Potential pagan religious element at Hólmur	Several direct saga references	Potential pagan religious element at Hofstaðir
Preceded at the Alþing by 3 local Spring assemblies	Preceded at the Alþing by 3 local Spring assemblies	Reliable radiocarbon and tephrachronology used to dated the site
Relative quality of the evidence is low due to the number of excavated sites available	Relative quality of the evidence is high and has been so for the past 70 years	Relative quality of the archaeological evidence is good, the textual evidence is less so

Table G Major Characteristics of Zone 2.

Buildings on Zone 2 sites were most often constructed from turf with internal wooden supports until the twentieth century (Bruun, 1928). This includes not only the widely known longhouses but also the earlier sunken feature buildings and outbuildings as well. In the past, this fact has been used to promote ideas of a tree-less Iceland that corresponds to the modern environmental condition. However, when considered in light of the climatic nature of the marginal Zone 2 environment the thick turf walls of a medieval longhouse were much more insulative than timber walls alone, if not as impressive within the natural landscape (Bathurst, et al., 2010). Turf blocks were cut and laid in a variety of patterns dependent upon location in the final structure as well as the type of grass species being utilized (Bathurst, et al.,

2010, pp. 2920-2922). Blocks utilized for the lower walls were cut from dense wetland grasses (Bathurst, et al., 2010).

Turf itself was insufficient to maintain the form of a longhouse's roof. For this, internal supports of wood were utilized. This may have been local timber cut for the purpose from local stands of trees, driftwood or even recycled internal supports from earlier buildings following the Settlement period (Eysteinsson & Blondal, 2003). Each portion of this internal support system was given a specific name (Byock, 2001, pp. 365-367; Gordon, 1957). This internal network of timber supported a covering of branches that was subsequently covered by a layer of lighter, drier meadowland turf (Bathurst, et al., 2010, pp. 2920-2921). This allowed less vertical stress to be put onto the roof itself. According to later ethnographic evidence from the area, these turf blocks were cut to a larger size and laid in an over-lapping pattern, producing a roof that is quite similar in pattern to the tegulation found on eleventh and twelfth century hogback sculptures.

As time passed, some farms began to utilize a foundation course of stone and earth within building construction. The earliest phase of Aðalstræti, dated to the mid-tenth century is an early example of this practice (Milek, 2006 [unpublished]). This is not only protected the first courses of turf block from ground damp which would result in more rapid block deterioration but also is much easier to locate within the landscape during later archaeological efforts because the walls are more distinct initially (Sverrisdottir, 2006).These organic construction techniques were employed in most constructions in Zone 2, but are the best recognized in relation to longhouses.

Longhouses did not exist alone in the Zone 2 landscape, nor were they always the first building constructed. Figure 109 details the constituent elements of a farm unit in this area. Initially a Zone 2 farm unit concentrated efforts towards self-sufficiency

in subsistence. This is unsurprising as establishing settlements in wilderness areas by its very nature places a group beyond an area where deficiencies in farm production and collection strategies were alleviated by trade and exchange. The networks have not yet been established to do this. As a result, practices that evidence pragmatic aspects of life are present with the archaeological and textual record. Only by exploiting resources in a general manner rather than focusing on a singular means of specialized subsistence were the settlement populations of Zone 2 able to establish themselves. During the landnám period, the specific niches within the ecology of Zone 2 were not yet known and so species that were exploited were those which were the most recognizable and substantially sized. By exploiting larger species such as walrus and great auk allowed domestic stock to be used for breeding rather than for subsistence. Figure 45 illustrates a fifteenth century depiction of walrus hunting. Table 6 illustrates the seals associated with the north Atlantic in contemporary sources. The gathering of fresh food to eat and store would have been a priority, as would provision for long-term subsistence such as grain production by clearing land and preparing fields for planting in the first spring. Local grasses such as lyme grass may have been gathered at this time to supplement both domestic farm stock and man.

7.3 Family and Gender Relations

In Zone 2, evidence for family and gender relations comes in a variety of forms. This includes microsediment analysis for palaeoentymological evidence, the division of labor and the substantial corpus of textual material. Sleeping arrangements that illustrated some of the microscale relations internal to the farm are described in passing in saga texts- archaeologically evidence comes from environmental analysis of soil samples taken from longhouse and passage house interiors that have

produced concentrations of human lice. Gulatingslog also discusses provisions for the sleeping arrangements of farm workers in section 100- this continues when *Grágás* are adopted following the establishment of the Althing (Dennis, et al., 1980; Eithun, et al., 1994). The format of the Althing is illustrated in Figure 44.

Textual sources, particularly those that are not law codes, record material that is contemporaneous to the time of writing. This means that it is an element of microscale identity that cannot be discussed utilizing textual sources until the twelfth and thirteenth century. By this point *Grágás* stipulate provisions of sleeping arrangements for farm auxiliaries and for shared public space (Dennis, et al., 1980). Sleeping closets with lightly built internal walls of wood line a large room. For many years these views were primarily based upon the finds from Þjórsádalur, with the greatest reliance being on Stöng which was abandoned during the thirteenth century (Stenberger, 1943; Stummann Hansen, 2001).

Another way to examine family and gender relations is to consider farm labour. As in Zone 1 the efforts undertaken by family and gender linked work units can be split into internally oriented house tasks and externally oriented farm tasks. Physical evidence for farm labour exists in the form artefacts and ecofacts on site, in the remains of buildings constructed and lived in. Zone 2 artefact choices are illustrated in Figure 43. Collection of goods, such as eggs, is evidenced by eggshells found within middens in Mývatnssveit but also wood collection in the form of charcoal found in the hearths of Hólmur and Aðalstraeti (McGovern, et al., 2007; Sverrisdottir, 2006). Other evidence for fuel and timber utilization comes from the lack of extensive woodland in modern Iceland in spite of palynological evidence for trees at the onset of Landnám. Provisions existed within the Norwegian Gulatingslog for the process of land naming including taking hold of lands with woods (Eithun, et al., 1994).

Provisions exist within Grágás to protect such areas as valuable natural resources- this is unsurprising given the time when Grágás were first written down, following the establishment of the Althing (Dennis, et al., 1980). Much of the activity linked to natural resource exploitation is initially male in the sagas- the felling of timber for instance being labour intensive. Even collection of large driftwood may have been primarily male and lower status. Once larger pieces of wood had been portioned into sections of more manageable sizes then female members of the family- again probably of lower status due to the low skill needed.

Evidence for wool processing and textile production in general is quite good with many levels of processing being evidenced. Parasites including sheep lice, *Damalinia ovis L*, have been found in concentrations not only from outbuildings but also from within longhouse and conglomerate houses themselves when subjected to microsediment analysis (Sadler, 1991; Milek, 2006 [unpublished]). Loom and spindle weights constructed from broken steatite vessels have been discovered in quantity from Þjórsádalur but also from the rest of Iceland as well. In rare cases samples of textiles produced have survived, particularly vaðmal that was the basis for Icelandic medieval and post-Medieval terrestrial exports. An example of a recreated upright loom has been included in Figure 41.

Zone 2 maintained the marine gender biases with regards to work. This is something that can only be discussed indirectly however as the artefacts themselves are largely gender neutral. A gender bias affiliated marine activities with Zone 2 males. This is expressed indirectly within surviving evidence. Marine activities were primarily group ventures for medieval Norse due to the size of their vessels. No single person vessels aside from auxiliary ship's boats being known. These are only from burials (Eldjarn & Fridriksson, 2000). Marine oriented practices were inherently full of risk yet they had

the potential to be very beneficial to the maintenance of a settlement. Those that undertook these voyages- particularly the trips to Europe- were making a gamble against that risk that the skill and ship belonging to the crew would alleviate the effects. The success of these marine oriented groups translated terrestrial elements across the north Atlantic. The success of this network is evidenced not only by the presence of Zone 2 products on European sites and within collections but also by the very presence of laws which guaranteed landsmen rights to Icelandic sailors landing in Norway. As this was a group venture, the exclusion of females must be considered in light of the reduction of risk. In this sense, the female population were largely untrained in marine tasks such as manoeuvring large, square sails. These open water practices could be potentially deadly if not performed correctly on the open water.

7.4 Social Status and Rank

While Zone 2 was initially settled location became associated with a certain level of rank. Iceland is more than a few days west of Zone 1 and was unsettled by human biological populations (Marcus, 1955). Because of this, any initial status/rank would have been imposed as a part of the Scandinavian habitus carried by the settling populations. Those farms established by high-ranking members of that system had the benefit of a larger amount of physical and social capital from which to establish themselves on new farms. These had faster, larger ships to bring them to Zone 2 that resulted in comparatively earlier arrivals meaning that the richer areas were free to be settled. Some settlement groups appear to have pooled resources to have a greater amount of capital to draw upon- an example of this occurs at Stóraborg where a pithouse was found to precede and coexist in use with two longhouses (Snaesdottir, 1991). Large sized farms required many hands to construct and maintain the buildings as well as the stock that was affiliated. They also had the

resources to support writers and ecclesiastics. Writers were able to take down the local traditions- elements of microscale identity- which promoted the local power interactions occurring in the area in relation to the rest of Zone 2 as well as the wider north Atlantic economic network as well- macroscale statements. The presence of a church on site can also highlight a microscale expression of a macroscale statement.

Another way to determine relative status and rank is to examine affiliated coastal wild resource exploitation areas. There are several sections of *Grágás* that are linked to the negotiation over common held collection areas (Dennis, et al., 1980). There is some concern utilizing just farm size as a determinant of relative rank as phasing and dating is inconsistent on older excavated sites (Ascough, et al., 2007). The ability and necessity for Settlement Period auxiliary unit construction was dictated largely by availability of resources. The need for common lands to the interior of Zone 2 where glaciers and volcanic fields dominate the landscape became more necessary after the land of Iceland had been fully claimed by a century of incoming settlers (Sveinbjarnardottir, 1991; Adderley, et al., 2008). Artefact quality and presence can also be an indicator of social status. Initial presence on site implies either construction of the piece on site or importation. This develops specifically because of the distance inherent to the North Atlantic system. When this is considered in conjunction with the amount of human effort a relative idea of artefact worth sans sentimentality can be made. Artefacts that were initially constructed from high quality resources are costly, and more likely to be afforded by those of higher status. Those artefacts had the potential to be utilized by high status farm units as means of reaffirming social connections (Mauss, 2000). Once obtained some, such as those of iron, entered into a pattern of recycling and reuse. Sites with artefact assemblages composed of worn goods holds a lower status. Those sites that were unable to devote human work hours or capital to farm maintenance were of the lowest status.

7.5 Orientation

The island location of Zone 2 has resulted in the same three primary drivers to activity in this area as in Zone 1: terrestrial, littoral and marine. As Zone 2 is a larger island than previously discussed, these drivers are to a certain extent mediated by site location, particularly on sites in interior valleys (Stenberger, 1943). Sites to the interior might consider local wooded areas and fishing rivers to be amongst a farm's wild collection areas such as at Þórsmörk. Coastal sites, on the other hand, would have considered adjacent drift shores and birding cliffs amongst the subsistence network of the farm. Provisions for access to this material are detailed in *Grágás* (Dennis, et al., 1980). These areas required little in the way of specialty equipment to exploit.

The gender-defined roles on a Zone 2 farm were dependent upon both social statuses within the farm but also in physical relation to the farm itself as was noted in Zone 1. Those tasks that were affiliated with the day-to-day functioning and maintenance of the human habitation were within the realm of women (Jesch, 2001). Those tasks that were more public in their relation to local and international networks were much more likely to be performed by males. Part of this is linked to scale- not all females are large enough to accomplish certain farm yard tasks while not all males know how to perform typically female tasks. The negotiation of this is included in many of the Íslendingasögur as locations framing other more active portions of the story (Durrenberger, 1991; 1989).

The presence of texts directly affiliated with Zone 2 allows for two things- rank can be attributed with them and they can carry evidence for further rank attribution within them. The first idea is tied into the amount of work that is required to create a text (Quinn, 2000). Not only would a text author be effectively taken out of many day-to-

day farm activities in order to make good use of daylight but also they needed to be fed during that time as well. Hence unlike other farm workers under the employ of a higher ranked family unit a writer was a particularly expense to undertake within the local network at the microscale. Their presence in the microscale makes little sense however when considered in relation to the wider macroscale elements of the North Atlantic network. By maintaining an onsite text author a farm unit was able to maintain their version of history and ideas for later generations in a very physical sense (Quinn, 2000). This was something established as being important concurrent to the widespread adoption of Christianity- one of the first things which occurs when writing enters a system is documentation of local oral histories and beliefs. Certain valleys and farms in Iceland are more closely tied to written sources than others- this is not only due to the fact that only some farm networks were able to carry the burden of maintaining a writer but also due to conditions of preservation of the manuscripts themselves.

7.6 Conclusions

The analysis of case study evidence for Zone 2 has highlighted two concepts. The first are the microscale elements of identity that are seemingly unique to each region. An example of this is the use of straw as roofing material on Southern Quarter sites (Gudmundsson, 1996). This was an environmentally linked construction resource, as evidence for other long grasses such as lyme being utilized does not occur in samples from Hofstaðir (Lucas, 2009). Unlike Zone 1, Zone 2 was largely unsettled at the Landnám event that presented a new situation upon the incoming populations. This territory lacks many of the anthropogenic landscape signals developed during the settlement of the first Zone. This forced a greater reliance upon the natural

environment partially evidenced by the natural elements found in place names such as the walrus related names on the Reykjanes coastline (Amorosi, 1991).

The second concept is the large amount of gaps that continues to exist at present due to low numbers of modern excavations. In regions such as Mývatnssveit, the amount of detail is much improved as areas outside of building interiors have been excavated utilizing microscreening and intensive environmental sampling (Lucas, 2009; Ascough, et al., 2007). These gaps appear to be distinct- in relation to other north Atlantic assemblages. However, as these gaps are due to either antiquarian excavation practice or simply lack of excavation the response of the learned public has been incredibly influential on the development of the modern state of knowledge concerning medieval Zone 2 and Scandinavia. They have liberally utilized all cultural evidence as representing a pan-Icelandic/Scandinavian identity at both microscale and macroscale levels. This concept will be discussed further in Part 4.

Chapter 8 Settlement, economy and lifestyles in Greenland and the New World (Zone 3) c.AD1000-1250

8.1 Introduction

The Zone 3 case study region includes the Eastern Settlement of Greenland as well as the few known North American sites. The entirety of Zone 3 including the Western Settlement of Greenland is considered in Part III of this study. The most socially and physically marginal farm sites of the North Atlantic are located in this Zone, which ultimately contributed to the decline of the medieval settlements (McGovern, 1991; McGovern, et al., 1988; Keller, 1989 [unpublished]). Due to the remote nature of Zone 3, supplies and trade-goods were unable to make direct voyages from Continental networks of exchange and as a result, Zone 2 became an integral stop in the exchange voyage. The climate of Zone 3 is heavily influenced by the close proximity of the Inland Ice- the icecap covering the majority of the interior of Greenland itself, see Figure (McGovern, 1991). This not only cools the ground and air making the agricultural practices utilized in Europe, Zone 1 and Zone 2 a gesture in futility but also calves icebergs on a regular basis throughout the year (Buckland, et al., 1996). This causes the Davis Strait between Greenland and the eastern coast of modern Canada to be a much riskier voyage for marine travel than much of the medieval North Atlantic (Morcken, 1968). The Inland Ice is illustrated in Figure 48 while glacial runoff is illustrated i Figure 49. The recognized economic resources of Greenland were closely tied to the available amounts of marine derived goods including walrus products and driftwood (Schledermann & McCullough, 2003). Other sources of subsistence and international economy included the keeping of European domesticates such as cattle and sheep (Albrethsen & Keller, 1986). As experienced in Zone 1 and Zone 2 modern satellite imagery covers the coasts of Greenland with inconsistent detail and resolution. Evidence for the Zone 3 case study has been



Figure L Greenland map. Areas of Norse settlement are shown in red while area of Norse exploitation is illustrated in orange.

subjected to collation and consideration within the data tables previously described. Selections from this are included in the text when appropriate.

8.2 Biases Associated with Zone 3

There are a range of biases associated with Zone 3, some of which are shared in common with Zone 2. Several of the best known and preserved sites of Zone 3 were surveyed and excavated during the early twentieth century, in keeping with other medieval north Atlantic Zones and Scandinavian kingdoms. Many of the same surveyors and excavators who conducted research in sites such as Jarlshof and Kvívík in Zone 1 and in Þjórsádalur in Zone 2 excavated at the major early excavations in Zone 3, in particular Roussell, Bruun and Norlund. Zone 3 sites are more likely to have been subject to post-depositional human scavenging for raw materials by subsequent sub-Arctic inhabitants such as the Thule (Maxwell, 1981). They are also subject to extreme erosion from glacial runoff in a similar fashion to Zone 2 (Ross, 1997 [unpublished]).

The Western Settlement of Greenland contains some of the more modern full archaeological excavations such as Garðr that was conducted to collect the site before total erosion occurred (Buckland, et al., 1996; Ross, 1997 [unpublished]). Zone 3 archaeological sites and regions gained heavy antiquarian influence via connection to Zone 2 written evidence, in particular *Graenlendinga Saga* and *Eiríkssaga Rauða* (Krogh, 1967). These in turn became utilized as evidence of national claims by Norway and Denmark, and continue as accepted links to history. The most famous example of this is the farm sites associated with Qassiarsuk on the Eirikssfjord that may or may not be the site of Brattahlid- the farm of Eirik the Red (Guldager, et al., 2002). Another is the New World site at L'Anse aux Meadows, Newfoundland, which is potentially the site of Leifsbuðr, the initial camp of Leifr

Eiriksson (Ingstad, 1997; Wallace & Fitzhugh, 2000). Written evidence concerning Zone 3 is contained in written texts from Zone 2 and Zone 1. As a result, there is no direct written material aside from isolated finds and thus no direct voice from internal to this population. Ecclesiastical material is contained within the *Diplomaticum Islandicae* (DI, 1876). Figure 47 illustrates textual sources by type.

Site access in Zone 3 can be incredibly remote hence increasing the cost of excavations themselves without consideration of the logistics of publication (Keller, 1989 [unpublished]). Because of this archaeological survey dominates the available evidence (Guldager, et al., 2002; Stenberger, 1943). In spite of these limitations, some excavation of new sites and re-excavation of older excavated sites such as at Qassiarsuk has occurred with the assistance of international research groups such as NABO in recent decades. The sites themselves utilize turf construction, which is likely to deteriorate and become overgrown by dwarf Arctic willow that prefer the richer anthropogenically derived soil deposits. Arctic fox, hare, polar bear or even the action of ice weathering may disturb sites.

A final set of biases is concerned with the divorce of consideration concerning Norse and Indigenous population migration. This has resulted in the native voice of modern Zone 3 inhabitants being largely unacknowledged, thus continuing practices begun during the height of racial hierarchy utilization during the nineteenth and early twentieth century. Views promoted in Mathiasson's 1927 works in association with the Danish Fifth Thule Expedition became unquestioningly accepted during the mid-twentieth century and have continued with some researchers in the region to this day when questioned at conferences (Arneborg 2007: personal comment). Unfortunately, the traditional divide of exotic indigenous prehistory and familiar European history does not accommodate the spectrum of cultural and environmental

8.3 Eastern Settlement

In general, there is a divorce of known names from active memory in the North Atlantic and Scandinavia due to the abandonment of the region during the late medieval period. Because of this, the association of physical sites to medieval literary reference dominated research and publication well into the twentieth century (Svanberg, 2003). Sometimes these efforts have been successful- the best example being the medieval tithing barns associated with the literary descriptions of Garðr (Bruun, 1928). The modern village of Igaliku has since developed in and round this site and indeed is partially constructed from it. Some sites have been influential to research but the modern association of place name and site have been contested such as Bratthlið/ Qassiarsuk (Guldager, et al., 2002).

Eastern Settlement sites occur in the interior fjords of Greenland where they are protected from the variable maritime weather patterns of the North Atlantic. In general, climatic conditions during the initial landnám period were quite good. Although agriculture on a large scale was unable to support the incoming Norse populations and associated domesticates managed natural areas did contribute to the maintenance of the economic system (Albrethsen & Keller, 1986; Buckland, et al., 2009). Unlike Zones 1 and 2 there are no surviving law codes for Greenland due to the Norse population not having established a settlement that survived into the modern era- or at least to a historical period. There is a growing belief as yet to be confirmed by excavation that assembly sites where laws were negotiated in the public sphere (Sanmark, 2010).

8.3.1 Morphology

The Eastern Settlement of Greenland contains the full range of North Atlantic building types. There has been some reconsideration over recent years concerning

building typology and name designations (Hoegsberg, 2009). This shows a progression of skali-style longhouses at the onset of settlement to row houses to conglomerate houses. This process is comparable to that found on urban Norwegian sites such as Trondheim and Bergen (Hoegsberg, 2009). This was largely unrecognized until recently however because earlier excavators had continued to hold firmly to the idea that the skali-style longhouse was the main human habitation for medieval Norse sites. The major problem- and one which occurs over much of Greenland- is that archaeological excavations are less common than archaeological survey (Guldager, et al., 2002). Hence, much of the discussion is based largely on the mapping of surface features rather than commenting on the entire stratigraphic sequence throughout the site. Soil sampling features prominently (Adderley & Simpson, 2006). This is a much more cost effective means of getting basic information about more sites in the area (Guldager, et al., 2002). As with Zone 1 and Zone 2 there are a small collection of early excavations such as at Herjolfsnes and Igaliku where work was funded by national bodies in Denmark and Greenland (Norlund, 1936). These sites came to influence the study of medieval Scandinavian/European identities like few others in the North Atlantic due to the surprising location and the incredible preservation the permafrost of Greenland had provided.

8.3.2 Space Utilization

Relatively few modern excavations have been conducted in the Eastern Settlement. Vatnahverfi and Hvalsey are two of these. The vast majority of sites have only been surface surveyed to determine location. Several of the early excavations, however, have had just as much impact as Stöng of Zone 2. This includes the Episcopal farm complex at Igaliku, the farms of Qassiarsuk and the southern-most farm at Ikigiat. These are closely affiliated with Zone 3 textual sources. The early excavations of the

twentieth century were excavated by the same group of Scandinavian excavators who worked in Thorsadalur in Zone 2- Bruun, Norlund and the architect Roussell amongst others. They uncovered some of the best preserved aspects of the Norse North Atlantic. However, these sites are consistently large enough that it is hard to comment upon the microscale elements of a normal farm. These sites were specifically chosen because the initial survey hinted at stone buildings and a greater potential for diverse material assemblages. In more recent years these sites are being subjected to modern survey with only a small amount being excavated, at times only soil sampling (Guldager, et al., 2002). This is allowing a much more nuanced view of microscale and macroscale landscape utilization to be made. This is closely linked to the fact that the more recent survey work has been conducted by researchers who are more aware of what details can be derived by the natural environment and microscale response to it (Amorosi, et al., 1997; Adderley & Simpson, 2006). Efforts to properly sequence and date these older excavations also occur during more recent survey. It is possible to see a local economy based upon domestic animals housed in a system of saeters extending from coastal farms into the more mountainous interior. Several saeter types have been designated and described by Albrethsen and Keller (1986). Wild animals were exploited when available however, spaces that were more likely to be frequented by desired species were noted and utilized. The common hunting fields of Norðsetr are located far to the north of the Eastern Settlement however a collection of walrus mandibles are known from Igaliku. Other wild species, particularly seasonal migratory birds, have also been found at Vatnahverfi (Smiarowski, 2008). Closer to the main farm unit were located dairy saeter to accommodate the need for fresh dairy (Albrethsen & Keller, 1986). The home fields of the farm provided a nearby source of winter fodder and were maintained by providing irrigation and fertilization when needed (Adderley &

Simpson, 2006). Outbuildings provided sheltered location for activities such as textile production and storage. These were built largely of turf with driftwood providing the timber for roof construction.

The Eastern Settlement farms excavated to date are also affiliated with ecclesiastical settings. The presence of these macroscale drivers that are exotic to this Zonal system effected site utilization by adding a public element that was potentially otherwise seasonal- assembly (Sanmark, 2010). The presence of a church on a particularly productive location such as Igaliku was a macroscale power statement for both local power magnate and the church. This area was prosperous enough to support medieval conventions to the point where a European international power- the Church- was attempting to lay claim to both souls and the rich land they worked. At the microscale Igaliku is a well appointed farm- one powerful enough to control an Episcopal tithe barn. This implies it was at the top of an extended network of regional affiliation as the lands of Greenland are too marginal to produce the number of animals Igaliku would have been able to house. Smaller farms in the area appear from survey to be saeters for the larger Igaliku farm.

The interior region of Vatnahverfi provides greater detail on a local network composed of several farms representing the microscale. There is a church affiliated with this effort as well with a medieval cemetery affiliated with it (Smiarowski, 2008). This network appears in survey to be similar to other north Atlantic regional networks such as the Brough of Birsay in Zone 1 or Mývatnssveit and Thorsadalur in Zone 2. Unfortunately until the re-excavation of the region is complete little more can be said aside from survey has highlighted several series of buildings with affiliated outbuildings. Soil sampling during recent excavation efforts has highlighted the presence of middens in association implying long-term settlement in the area.

8.3.3 Evidence of Lifestyle

Some of the best-preserved evidence of medieval Norse material culture comes from the Eastern Settlement of Zone 3. This is due to the presence of permafrost in Greenland that allowed organic goods such as textiles to survive (Ostergard, 2009). This allows a more complete picture to be presented on elements missing from microscale considerations. The organic material variety has been preserved at some of these sites. Wooden objects ranging from carved trenchers, to scoops and dishes, were discovered most often during the larger excavations of the twentieth century, (Norlund, 1936). Iron goods were acknowledged at the time as being relatively low in number but ranged from small knives to a small spearhead to a small axe-head. Pottery finds were low and largely from identifiable Continental imports. Steatite finds, however, were relatively common. Items ranged from cooking vessels, to lamps, spindle whorls and loom weights. The forms of these are quite similar to those known from other north Atlantic Zones and indeed steatite exportation appears to have contributed to the general economy of Zone 3. At this time the full extent of this macroscale economic network, particularly the microscale elements of production such as quarries and ship's cargo is unknown due to the lack of material and known location. However, Greenlandic soapstone was associated with the medieval construction of Trondheim Cathedral until the seventeenth century (Norlund, 1936; Buttler, 1991).

Microsediment analysis has proven the presence of multiple insect species of European origin. Several are linked to the keeping of sheep for wool production (Smiarowski, 2008; Buckland, et al., 1996). Spectacular examples of liturgical equipment have been removed from the Norse burials of Igaliku. Burials have produced the other best-known artefact type from Zone 3 as well- clothing constructed from the famous vaðmal. This was the end product of a microscale

economic process for many of the Zone 3 farms evidenced by loom weights, saeters and textual reference within contemporary records (Albrethsen & Keller, 1986; DI, 1876; Norlund, 1936). The best known is the collection assembled from the early excavation of the medieval cemetery at Ikigiat. From this collection maintenance of European fashions can be directly seen in the pattern the garments were cut. The garments of a small population were uncovered, which allows certain comments to be made regarding the orientation of daily tasks. Male clothes were designed to provide warmth for active bodies- bodies requiring extended amounts of movement. This is affiliated with the need for work outside of the farmhouse and outbuildings, at both terrestrial and marine activities. Female clothes, on the other hand, were designed to provide terrestrial warmth while performing tasks that required less bodily movement. These clothes are tied to microscale tasks internal to the farmhouse and yard.

8.4 North America

There are small selections of surviving Norse place names which are associated with Norse activities in the New World. These have been studied intensively since the 1850s. *Helluland* [Flat-Rock Land] being modern Baffin Island while *Markland* [Forest Land] was the name given to the extensive forests along Canada's eastern coast (McManis, 1969; Perkins, 1976; Wallace, 1991). Others are much more debated in no small part to a clever hoax whose exposure created a jaded attitude amongst the research community and wider public alike concerning Norse North American material- the infamous Vinland Map (Perkins, 2004). Of these other sites, the two most influential upon archaeological evidence are *Vínland* [Vine/Wine land] and *Leifsbuðr* [Leif's booths {camp}] (Wallace, 2000). These are central to two of the

major textual sources for medieval Norse in the New World- *GS* and *ESR* (Rode, 1993; Sigurdsson, 2000).



Figure M L'Anse aux Meadows site map (after Wallace, 2003 pg 218. Figure 9.3).

Norse North American sites and texts are distinct from other Zonal evidence in that there is evidence for both indigenous inhabitants in the New World, who were not of European origin, and Norse contact with them (Sutherland, 2000). This was a driving vector unique to Zone 3, particularly after Thule Inuit began to arrive in the Davis Strait region circa AD1100-1200 (McGhee, 1981). This is incredibly important as the culture contact evidence can be utilized as another anthropological means of commenting on identity construction and maintenance as illustrated by Silliman at La Purisma, Kirch and Sahlins at Anahulu and Lightfoot and Martinez at Fort Ross (Lightfoot, et al., 1998; Kirch, 1992; Silliman, 2001). Unfortunately, it is unknown

what law applied to the New World sites, if any. This is linked to the external nature of the textual evidence. It may be that family law and blood feud ruled due to the apparent dispersed nature of the sites as is hinted in the textual sources (Miller, 1986). Because of this, it is difficult to comment upon certain aspects of site utilization and orientation that is achieved in both Zone 1 and Zone 2. Like Greenland, this has led to the law codes of these earlier established regions being linked to the region in publication merely on the fact that physically the sites are recognized as being established by medieval Norse.

New World evidence for Norse archaeological sites has recently expanded. Historically evidence from this region has been much contested due to the difficulties of corroborating place names from medieval sources and the physical reality of the rugged Canadian coast. There is another huge problem with as well- the indigenous Dorset peoples also utilized a form of longhouse that can be mistaken for Norse concurrent to the Norse presence (Friesen, 2007). However, when these sites were excavated by Maxwell during the 1960-70s they were designated as Late Phase Dorset (Maxwell, 1980). Because of this excavation techniques, theories and conclusions are all reflective of a Pre-Contact- and hence prehistoric- indigenous site rather than leaving room for interpretation. This has been highlighted by the recent confirmation by re-excavation and re-analysis of a further 4 sites which contain strata affiliated with both cultures (Pringle, 2012). However, even these are contested at the time of writing as the professional lives of the site directors over shadow the strength of the evidence, which is mysteriously poorly published.

8.4.1 Morphology

New World settlement sites follow a pattern that appears to be closely linked to water-borne communication. The classic example for this is L'Anse aux Meadows

[LAM] the Norse site up until recently to be the only medieval outpost on Newfoundland prior to the Frobisher expeditions of the sixteenth century. Since the re-analysis of Tanefield, Nunguvik, Willows Island and Avayalik Islands aspects of LAM can be considered within a wider context with more reliability than previously possible (Pringle, 2012). This was a conscious decision as even more so than Greenland the regions explored to maintain a means of quick and economic retreat back east into the European Atlantic long distance networks of trade and exchange.

Once again, there is evidence for self-sufficiency of the site. Adjacent to the site is a source of flowing fresh water (Wallace, 1991). This helped to drain the rest of the site. Thick grasses with substantial root mats provided insulative turf for construction were located in nearby or even adjacent meadows. Unfortunately, for the state of clarity concerning Norse and Native archaeological sequences in eastern Canada Late Phase Dorset also utilize these to make seasonal use of nearby littoral areas for food collection (Friesen, 2007). At LAM and at Tanefield excavations exposed constructions of turf blocks laid on shaped stone foundations with long walls more than 12 meters (Wallace, 1991; Ingstad, 1997; Pringle, 2012). Previously Dorset sites averaged buildings much smaller with both sub-rectangular and sub-circular formats (Friesen, 2007). Re-excavation of Tanefield showed provisions for drainage and a recognizable latrine- both architectural inclusions unknown from indigenous arctic and sub-arctic sites (Pringle, 2012).

8.4.2 Space Utilization

Space utilization on New World sites other than LAM is very difficult to discuss currently, as although Tanefield, Nunguvik, Willows Island and the Avayalik Islands sites have been re-excavated and analyzed they have not yet been fully published at the time of this writing. LAM is illustrated in Figure M. As can be seen there is a fresh

water source through the site. An outbuilding for iron extraction using a forge lined in kaolinite clay was constructed to the north beyond the water source- perhaps even the original outfield for a site which seems to have had no need for one (Wallace, 1991; Wallace, 2009). This building may have been located closer to sources of bog iron that had collected around root nodules of marshy plants (Davis, et al., 1988). There are larger constructions with the infield with long sides and internal walls that were substantially constructed of turf blocks (Davis, et al., 1988). Entrances to these buildings are located to the east and south in order to maximize upon available natural sunlight and heat (Wallace, 1991). There are two exceptions to this, Hall A and Hall B, which open upon Epaves Bay and Black Duck Brook (Wallace, 1991). Each of these larger constructions has affiliated outbuildings. These larger buildings have well defined walls that directed the overall flow of rooms (Wallace, 2000). The excavation of LAM expanded beyond the walls of the structures to consider the wider landing area of the site, including across the water feature of Black Duck Brook. Because of this and much more rigorous excavation practices over the course of the site applied by the Ingestads and Wallace usage of the site as a unit can be discussed. Excavators suggest three foci of human effort- one for each of the hall buildings, but notably no provisions for animal accommodation ad maintenance within the landscape (Davis, et al., 1988). There are large concentrations of iron slag and rivets, and even more of worked wood (Wallace, 1991). These are concentrations known from other sites in Zone 1 and Zone 2 where boats and ships underwent servicing and repairs. The biggest concentration of clipped rivets and boat nails occurred in Hall F (Wallace, 2000, p. 211).

Unlike Zone 1 and 2 sites, LAM in particular has a lack of accumulated evidence signifying long-term occupation- middens are small and no cemetery is known (Davis, et al., 1988). In general, the evidence of cultural deposits is quite slight. There is

evidence for both male and female work areas on site. Although halls and outbuildings exist, other aspects of Zone 3 farms are not present, such as field delineations, *saeters* and byre. In short, instead of a terrestrially oriented farm there is a marine oriented terrestrial base that enabled exploration and potentially exploitation of the local area by water (Wallace, 2009; Wallace, 2000). The open location on a small peninsula made a visible statement in the landscape. For those travelling over land a boundary separating the non-affiliated lands from the Norse site existed in Black Duck Brook. For a short time, at least LAM appears to be the Norse outpost of the New World serving as a base of Norse maritime functionality and identity via practice. LAM later was definitively abandoned and two halls subsequently set on fire (Wallace, 1991). In this case, it is possible to say that the burning fully ended the Norse phase of the site.

8.4.3 Evidence of Lifestyle

Material culture has been heavily relied upon by Zone 3 researchers to determine excavated Norse assemblages from indigenous peoples both prior and subsequent to the medieval period. Unfortunately, New World sites only give a limited sample of what is affiliated with others in the North Atlantic. This is largely due to two things: 1) very low number of excavations published and 2) sites which were closed, rather than a disaster occurring or continuance of site habitation. Zone 3 artefact decisions are illustrated in Figure 53.

Once again, LAM provides the best-detailed published evidence for the New World. Famously a Hiberno-Norse hexagonal pin was discovered on site (Wallace, 2000). This is the only item of personal adornment known from the time currently at this location. Other famous finds include butternut shells which were exotic to the site and the buildings themselves (Davis, et al., 1988; Ingstad, 1997). Discussed less often

are the scatters of iron rivets, clipped rovings and wood scrap found between the long house structures themselves (Wallace, 1991). The presence of the rivets and rovings has been linked to terrestrial based ship maintenance (Wallace, 2009). This would have been incredibly important as for a short time at least the vessels that carried the settlers and maintained the North Atlantic networks were serviced from the western periphery. This required a source of iron- either local or brought in- and subsequently shaped on site. LAM was placed near a local source of bog iron, which was collected and processed in the outbuildings across Black Duck Brook (Davis, et al., 1988). It is suspected that an unknown amount of iron robbing has taken place on Norse and indigenous sites alike which effects the amount of iron within Canadian assemblages dated to this period (Rowlett, 1982). This took place in the form of iron recycling by Norse populations when tools and iron fastenings wore out but also robbing by subsequent site occupants. There is little evidence for the accumulation of midden material implying that at LAM at least medieval European occupation was actually quite short (Wallace, 1991). Soapstone vessels were discovered within the turf tumble. This is illustrated in Figure 52.

Turf shovels were used to help cut the turf blocks used in construction. There are other types of material evidence that provides insight into life in the Norse New World but also have been recently used to help acknowledge a further four sites on Baffin Island from a selection of sites previously assumed to be solely Late Phase Dorset which had exotic anomalies. The first of these is the presence of twisted arctic hare fibers- evidence of at least indirect contact with Europeans as neither the Dorset who were present upon Norse arrival nor the Thule Inuit how arrived subsequently utilized animal fiber textiles during this time (Pringle, 2012). Re-excavation of Tanefield/Nanook in particular was linked to realization of this fact and what it might imply. Whetstones from these sites- some thirty from Tanefield alone-

as well as from LAM are comparable to whetstones throughout the Norse North Atlantic (Pringle, 2012). Unfortunately, in shape they are also similar to those utilized by both Dorset and Thule Inuit that contributed to the attribution of Tanefield, Avayalik, Nunguvik and Willows Island as being solely indigenous (Renouf & Bell, 2008; Pringle, 2012). These whetstones bore wear grooves from sharpening metal blades. They were subjected to energy dispersive spectroscopy and it was discovered that copper alloys unknown to the North American arctic were present (Pringle, 2012). This corroborated the arctic hare fiber yarn evidence. Re-excavation of the newly acknowledged sites also has wood above the arctic tree line (Pringle, 2012). These have only been described as being potential tally sticks or perhaps spindles used in fiber processing. Also found was wood scrap with iron staining around square holes. This was radiocarbon dated to the fourteenth century, although at this time only the results from this .

Biological evidence of lifestyle is remarkably detailed in the New World primarily for two reasons. The first is that the excavations are reasonably modern and have been subjected to more rigorous modern archaeological procedure (Wallace, 1991; Davis, et al., 1988). The second is the conditions of preservation are remarkably good due to consistently cool, moist conditions (Davis, et al., 1988). Because of this sediment samples recently analyzed from Tanefield contained evidence for pelt remains of rat species originating in the Old World. A latrine was also discovered (Pringle, 2012).

Perhaps what is the most diagnostic form of evidence for medieval Norse, however is what is not present on New World Norse sites: skeletal evidence for domesticated animal exploitation such as known from other Zones of the North Atlantic (Wallace, 1991). What is found instead is a greater reliance on local wild species for exploitation. This includes terrestrial, marine and littoral species (Davis, et al., 1988).

Other forms of subsistence such as ships provisions may have also contributed to the diet of Norse settlers however left little evidence within archaeological assemblages due to their organic nature.

8.5 The Farm Under the Sand

Given the very low number of full modern site excavations the well known modern excavation near Nipiatsoq in Norse Greenland's Western Settlement has been included to provide comparative evidence to the Zone 3 case study sample. This site, first located in 1990, was given the name of Gård Under Sandet [GUS] due to the conditions of excavation which was heavily impacted by glacial runoff from the nearby Inland Ice (Berglund, 2000). Rescue excavation efforts of an international group of specialists by the Greenland National Museum and Archive located in nearby Nuuk to salvage the turf and earth construction from the permafrost (Berglund, 2000).

8.5.1Morphology

Due to the rescue nature of the excavation, GUS was fully excavated (Ross, 1997 [unpublished]). This showed the presence of a partial longhouse and large farm complex that was actively being affected by erosion (Hoegsberg, 2009). A three-aisled longhouse that was occupied over the course of eight phases had internal dimensions of 12x5 meters (Berglund, 2000; Panagiotakopulu, 2004). The eastern long wall of the house was quite thick at 1.8 meters (Albrethson, 2003). This is illustrated in Figure 51. Conditions of preservation were so good under the meter of frozen river sands that the process of laying out the hall with sticks into the well-drained soil of the region (Albrethson, 2003; Ross, 1997 [unpublished]). Walls were then constructed of turf blocks while the turf was stripped from the interior. The extent format is illustrated in Figure 51. A paved entrance brought the inhabitants

into an entrance area that protected the dwelling room with central hearth from direct drafts. Here there was also evidence of a small cooking pit as well as a storage vessel (Berglund, 2000). The hall also contained a room for work activities and storage (Albrethson, 2003; Hoegsberg, 2009). Floors were prepared using insulative peat, wood chip and twigs (Buckland, et al., 1994). This created a layer between daily microscale use of the house and the permafrost associated with the Western Settlement's sub-arctic location (Buckland, et al., 1994).

8.5.2 Space Utilization at GUS

The rescue efforts of the 1990s at GUS uncovered a small Norse farm with approximately 30 rooms under threat (Berglund, 2000). The first phase of utilization established a three-aisled longhouse with living area, storage and a protected entryway (Panagiotakopulu, 2004). Blocks were laid out in a format designated by sticks inserted into the ground before hand (Berglund, 2000). Within the center aisle was a long hearth that would later degrade into multiple hearths in a line prior to the secondary function of the longhouse began (Hoegsberg, 2009). The internal walls of this initial phase of human utilization were constructed from thinner pieces of wood however; the external load bearing walls were thickly constructed from local turf (Berglund, 2000). Although the interior walls are not completely marked it is possible to see the accommodations made into the turf walls to fit them. GUS proved to be an excellent site to sample for palaeoecological and paleoentomological analysis and the results from this work has highlighted some of daily practices undertaken by the original inhabitants and the local environment they undertaken in (Ross, 1997 [unpublished]). There are very few Norse excavations in Greenland that actually conducted environmental sampling in conjunction with the archaeological excavation itself. GUS is one of these (Ross, 1997 [unpublished]). Areas that were kept warmer such as the dwelling room allowed colonies of houseflies to be maintained

(Panagiotakopulu, 2004). Human lice were found in areas where people seem to have slept, or at least spent a lot of time de-lousing. Sheep lice and keds were found in areas where wool was stored and animals were kept respectively (Buckland, et al., 1994).

The early phases of the farm site had affiliated outbuildings that helped to contribute to the total number of rooms discovered. Within one of these was discovered evidence for textile creation- a vertical loom known from other North Atlantic Zones (Berglund, 2000). A small corner hearth was included in the turf building to provide warmth for the weaver. Small scraps of textiles were found throughout the site due to the waterlogged and permafrost conditions (Ostergard, 2009).

Later phases of the longhouse occupation highlight a shift of human habitation away from the longhouse. The entranceway and barrel storage was removed and animals were housed in the longhouse (Berglund, 2000). The house was abandoned subsequent to the thirteenth century (Panagiotakopulu, 2004). Feral sheep and goats used the derelict buildings as shelter until their final collapse (Buckland, et al., 1994). Later Thule Inuit hunters would use the area to camp and their fires caused part of the constructions to burn (Berglund, 2000).

8.5.3 Evidence of Lifestyle

Evidence for microscale identity practice from the initial period of human occupation largely comes from the protective floor layer. These were largely items lost at the sides of the hall (Buckland, et al., 1994). Carved wooden bowls And Trenchers made from imported wood rather than driftwood were perfectly preserved by the permafrost and glacial sands (Berglund, 2000). Textile remains of homespun cloth highlight the presence of a local wool economy (Ostergard, 2009). This is also evidenced by a wooden vertical loom that had been part of the initial site discovery

(Berglund, 2000). This was housed in one of the few rooms to be assigned a function. Other finds included horn spoons, wooden devotional crosses and even a shoe last (Berglund, 2000). Rooms with barrel holes once provided storage for the farm. Those with small corner hearths, such as the textile room, provided sheltered places to undertake crafts (Ross, 1997 [unpublished]). To this extent, GUS has produced a variety of tools for working in soapstone, wood, iron, bone and horn.

The farm was later abandoned by the medieval Norse although there is evidence for continued use of the centralized farm complex by feral sheep until the collapse of the turf walls (Berglund, 2000; Buckland, et al., 1994).

8.6 Conclusion

Until recently, the tale of the medieval Norse in North America is one that was hinted at in literature in typical medieval form and one attached to more extreme political views. There are associated hoaxes such as the Kensington Rune Stone and the Vinland Map (Wallace & Fitzhugh, 2000). Increasingly at the base of this is a growing corpus of recognized Norse archaeological characteristics. There is a single fully recognized and reliably published site- L'Anse aux Meadows, Newfoundland, which is sometimes associated with Leifsbuðr of the sagas (Wallace, 2000; Wallace, 2000). In October of 2012, however it was publicized to the archaeological community that a further four sites on Baffin Island previously considered to be Late Dorset contained within them layers of Norse occupation (Pringle, 2012). The newly recognized sites, such as Tanefield, are within sheltered valleys with fresh water, nearby being coastal access. There are longhouse layers with affiliated Norse materials and longhouses with solely indigenous Dorset material (Pringle, 2012).

This chapter presented archaeological evidence from the furthest western settlements of the Norse expansion into the North Atlantic that has been designated

as Zone 3 for this work. It has considered the site of Garðr, the famous sites of Herjolfsnes and L'Anse aux Meadows as well as the newly recognized sites of Baffin Island such as Tanefield. It has presented elements of medieval Norse culture from space utilization to burial evidence to landscape exploitation. Full data tables are included in Appendices A and B. In the subsequent chapters, this evidence is analyzed to highlight microlevel aspects of identity construction and maintenance in Zone 3. This considers evidence for the daily practice of identity.

Chapter 9 Daily social practices of households in Greenland and the New World (Zone 3)

9.1 Introduction

The sites of Greenland and the Canadian eastern coast have been closely affiliated in texts since the medieval period. This is corroborated by archaeological evidence from both sides of the Davis Strait. Many of these similarities are due to shared physical characteristics. Although marginal in terms of crop-based agriculture parts of Zone 3 had abundant natural resources available for exploitation that were less dependent upon short growing seasons. As with previous case studies evidence quality for Zone 3 has been rated in accordance to overall quality. This quality rating has been taken into consideration in the following analysis of microscale aspects of identity construction and maintenance in Zone 3. Intercontinental cultural contact occurred in Zone 3: initially between incoming Norse populations and indigenous Dorset but later on between Norse and incoming Thule populations from Alaska (Sutherland, 2000; Rowlett, 1982).

9.2 House and Settlement

As with other North Atlantic Zones, the early excavations of the late nineteenth and early twentieth century have heavily influenced the views of subsequent excavators and the public. There are several aspects to this that have been particularly influential as Zone 3 does not have the number of full excavations that other Zones of the North Atlantic. The first is an early focus on building interiors in Greenland. This means that the recognizable human habitations were considered without benefit of their wider farm context. The second was designation of ruin groups as being longhouse types when in fact the actual floor plans reflect other building types. In Zone 3 this has resulted in reanalysis in recent years of not only the Greenlandic building evidence but also reanalysis of indigenous Dorset longhouses on New World

sites (Hoegsberg, 2009; Pringle, 2012). In Table I a summary of the house styles and characteristics found in Zone 3 are presented.

House Type	Description	Dimensions	Date	Examples
Skali longhouse	Early examples have curved long walls, later have straight long walls, central hearth, benches, potentially end room portioned with light wall	12x5 internally	10-11th century	Ø17a Narsaq early phase, Ø29 Qassiarsuk, V51 GUS earliest phase
Row-house	Row of rooms with substantial interior walls that has one room or more located to the back	c. 23 meters long	12-13th century (onset is unclear)	Ø20, Ø47, Ø71, Ø17 Narsaq last phase, V51 last phase
Conglomerate house	House with rooms that has one room or more connected by passages	c. 20 meters	Late 12th-14th century (onset is unclear)	Ø2, Ø29 ruin 18, Ø83, Ø52a, Ø16, V53c and d

Table H House styles and characteristics in Zone 3.

Zone 3 is the most marginal of the North Atlantic settlement regions due to latitude and location. As a result, the combination of agriculture, animal husbandry and wild resource exploitation that was developed in Northern Europe is adapted to accommodate (Adderley & Simpson, 2006). This is reflected in the format which settlement farms take in Zone 3.

This generalized farm unit strategy was utilized to translate incoming European cultural practices to the new environments of Zone 3. Microscale elements are expressed in these strategies visible within the current corpus of excavated sites. This includes the choices in building material made from available resources during initial construction, to those made to maintain the farm system physically within the landscape (Albrethsen & Keller, 1986; Hoegsberg, 2009; Wallace, 2000).

Identity was initially expressed in Zone 3 in the accommodations settling populations made in terms of co-existence with indigenous populations, reduction of timber availability and those affiliated with climatic conditions. Zone 3 was inhabited prior to Norse arrival by descendents of the Maritime Archaic Tool Tradition- the Dorset. Although southern Greenland appears to have been abandoned by the Dorset prior to the Norse arrival the episode of discovery described in *GS* and *ESR* may allude to an initial sighting in the New World (Rowlett, 1982). As the Dorset exploited the more exposed coastal portions of fjords and Norse preference for settlement areas was for the more sheltered interior areas actual competition and site reutilization expressed by Norse populations is low in Greenland. It is unknown whether this will hold true for Canadian sub-Arctic and Arctic sites at this time.

Changes over time to the styles of human habitations can be linked to wider North Atlantic trends (Hoegsberg, 2009). The early *skali* longhouse gains distinct rooms, losing the centralized hearth and aisle while gaining greater heating efficiency and floor space. This became more similar to the row-houses of urban Norwegian towns (Hoegsberg, 2009). These maintained the presence of straight long walls found in the later *skali* sites but added room divisions in the interior that were made from thick walls of earth and turf. This resulted in a drastic change in how the roofs of turf constructions were supported. Previously a system of crossbeams and a floor mounted parallel posts which lent *skali* the familiar tri-aisled format was utilized- this is what is known from the earliest phases of Zones 1 and 2. This required a certain amount of timber of a usable size. By converting to a row-house format, the need for longer timber was reduced. The internal turf walls were able to carry the weight of the roof without the internal aisle because timbers of shorter lengths could be utilized. Roof timbers were supplied both by driftwood and by short voyages across

the Davis Strait to the rich old growth forests of the eastern Canadian coast (McGovern, 1980).

Another way identity was expressed environmental pressures on choices made is by heavy reliance upon wild resources to make up for the calories, protein and prestige normally derived from agriculture. This is well evidenced on recent excavations that employ modern bioarchaeological sampling and processing techniques such as at V51 the Farm under Sand. This required a more nuanced utilization of wild species by season.

9.3 Family and Gender Relations

Evidence for family and gender relations in Zone 3 is actually fairly slim. This is due to several factors which have resulted in several biases for this evidence. Although early excavations of settlement sites focused largely on the internal features of assumed longhouses many details were lost via a lack of sieving and other practical elements of archaeological practice during the late nineteenth and early twentieth century. As a result modern excavations have subsequently focused heavily on the environment present within the structure and commented upon features present more in passing. In spite of this full excavations such as at V51 and at L'Anse aux Meadows have provided a small amount of insight into microscale elements of family and gender relations in Zone 3. Another factor heavily influencing this evidence is linked to the divorce between the Greenlandic past and the later North Atlantic populations. Because Zone 3 did not establish a population which continued into the modern period medieval textual sources that concern the Zone have not been internally maintained. This is important as such practical elements of cohabitation provide valuable information on family and gender relations. In the case of Zone 3 textual sources, with the exception of short runic texts and legal papers which were

originally made in multiple copies, are all actually Zone 2 in origin and maintenance. This presents a serious problem in terms of analysis of evidence for family and gender relations as the physical evidence is restricted to only a few sites. In fact, without use of textual sources from Zone 2 it is difficult to comment which members of a farm unit are accomplishing tasks. It is easier to comment upon mariners who were primarily male. Not only does this reflect the wider European tradition but it also evidenced in the masculine verb tenses utilized in provisions in law codes from Norway and Iceland.

9.4 Social Rank and Status

Evidence for social status and rank at the local microscale of Zone 3 has been based on three areas. The first is the overall quality of the archaeological material. This is closely tied to the practical requirements of Norse settlements that both fulfills needs with the environment and culture and create more needs of their own. The location of home farms in relation to their affiliated outbuildings and resource exploitation areas contain commonalities. Some of these are linked to location in the wider landscape- mountain farms sacrifice ease of travel and communication to make greater use of secluded *saeter* sites. Commonalities throughout Zone 3 include utilization of a variety of resources and land management strategies to maintain itself in the more marginal upper latitudes. A farm of higher rank would have access to the more favorable conditions or at least more sites in general- both quantity and quality of site being desired. This would allow for greater self-sufficiency and quicker accumulation of capital in the form of secondary animal products.

A high status farm in Zone 3 during the Landnám phase was located on the well drained sloped of inner fjords where they were protected to a degree from the full effects of the North Atlantic (Keller, 1989 [unpublished]; Roussell, 1941; Norlund,

1936). They were set back from shore in Greenland- perhaps an adaptation to accommodate the development of pack ice during the winter. Early on humans were housed in *skali* longhouses that internally were 12-15m long and around 5 meters wide such as at Ø17a in modern Narsaq, Ø29 at Qassiarsuk, the early phases of V51, at L'Anse aux Meadows and at Tanefield (Davis, et al., 1988; Guldager, et al., 2002; Wallace, 1991; Pringle, 2012). This style was utilized during the tenth and eleventh centuries. During the twelfth and thirteenth centuries row-house buildings are found on some sites. Concurrent to this on other sites conglomerate style buildings are found. This tradition was utilized until the complete collapse of the medieval European Zone 3 settlements (McGovern, 1980). Farmhouses were accompanied by outbuildings that served as storage and as locations for specialized activities such as iron-working (Albrethsen & Keller, 1986; Davis, et al., 1988). Domesticated animals were housed both separate from humans over winter and within human habitation. If they were not housed with humans over winter, they were housed within an outbuilding. The presence of domesticated animals necessitated the establishment of outfields distinct in the landscape to provide some fodder for the stock during the year. These fields were well managed- evidence for irrigation has occurred at sites such as Garðr (Buckland, et al., 2009). Another form of evidence is the palynological record as managed fields such as at Vatnahverfi have elevated levels of meadow grasses during the period of Norse occupation (Ross, 1997 [unpublished]). Similar levels were associated with all areas managed as grass-hay fields for fodder.

High status farms had access to landing places early on however once deeper drafted ships became adopted control over a harbor was another element of a high status site. This allowed high status sites to more directly control trade and exchange with the wider North Atlantic network. Away from the farm sites further managed domesticate stock in areas which were provisioned with water, meadow areas and

turf outbuildings (Albrethsen & Keller, 1986). Other areas that were accessed by Norse for wild resource exploitation may have been commonly shared. A good example of this is driftwood exploitation. It is difficult to comment on the general progression of buildings in Zone 3 due to the low number of full modern excavations in relation to a high number of surveyed sites. This is a topic that has been recently approached by Hoegsberg however who highlighted the fact that Roussell's designations may have been false (2009; Roussell, 1941; Norlund, 1936).

High status sites can also be signaled by the presence of public accommodations. Potential assembly sites have been suggested for the well-known sites of Igaliku and Qassiarsuk (Sanmark, 2010; Berlin, 1932). Another microscale on-site accommodation for the wider public also includes churches (Gjerland & Keller, 2010). The inclusion of these local ties to a macroscale vector were another way for higher status farm units to exert power over the local system by providing religious service (Abrams, 2009). This requires the upkeep of a priest. Only the very largest sites might have had the capital to support a full-time priest, or even multiple such as at the Episcopal seat of Garðr at modern Igaliku (Norlund, 1936; Gjerland & Keller, 2010). Although it is a process which appears to have occurred within a Christian population this is a microscale element of religious provision which is also implied at pagan sites in Zones 1 and 2 (Andren, 2007; Gjerland & Keller, 2010).

Another way to determine high status site is by literary affiliation where sites have been described and only rarely named. Two of the major sources that discuss Zone 3 discovery and settlement- *GS* and *ESR*- mention sites such as Garðr and Herjolfsnes. These sources are also affiliated with an extended kin group that later returned to the Borgarfjord region of northwestern Iceland who were attempting to manufacture a creation myth explaining their social/ economic control over Zone 3 and the

western extension to the North Atlantic network (Krogh, 1967). Whether this was the actual reality of the situation is unknown as the extent sources are related to one another in terms of content (Sigurdsson, 2000). Unlike Zones 1 and 2 high status site affiliation with public space appears to be linked only with church sites in Greenland, some of which also have affiliated assembly sites, and potentially not at all in the New World in the European sense (Sanmark, 2010; Gjerland & Keller, 2010).

Lower status farms are difficult to determine from the extent corpus of Zone 3 excavations. However, in general lower status farms can be assumed to have less of the available resources and space which high status sites might have control over. They may have commonly shared some of the wild resource exploitation areas of even *saeter* areas in an effort to pool economic and social capital (Albrethsen & Keller, 1986). It may have also alleviated some of the demand for human working hours that a farm network might generate. This demand is illustrated in Figure 30. This demand is also linked to microscale farm social hierarchy. Farms in Zone 3 were associated with extended family units and auxiliary farm members as demonstrated in *GS, ESR* and *Íslendingabók.* Unlike Zone 1 and Zone 2, slaves for the most part do not appear as a regular part of archaeological assemblages and literary sources (Arneborg, 2003). An exception to this may be the Southerner Tyrkir who accompanies Leif Eiriksson. Within *ESR* he is referred ambiguously as either a long term servant or slave (Faulkes & Barnes, 2007). This lack of conclusive evidence for slavery is relative proof it was not a constituent of Zone 3 Norse society (Arneborg, 2003). Had law codes and other textual evidence survived for direct transmission to subsequent populations this would be more conclusive. Slavery was not practical in Zone 3 as there was no agriculture to quickly provide bulk stores from which to feed slaves from. Changing the state of evidence in Zone 3 will require full excavations of

farm sites. The actions of the lower elements of society are present in the form of physical tasks completed on site.

9.5 Orientation

As with Zone 1 and 2 microscale evidence for the orientation of identity in Zone 3 expresses seasonally dictated fluctuation between terrestrial and marine loci. A balance between these loci is affected by available light, available technology for resource exploitation, and economic drivers in the form of available markets for exports. The amount of available light was particularly limiting given the high latitude location of Zone 3 as the sun is simply not present in the sky for months on end. This effect is reduced on the southern sites of Zone 3, producing similar practical on activities as evidenced in Zone 2. In spite of this the warmer period from late April to early September, when the sun makes an appearance, are those which are packed with the greatest amount of outdoor activities. These activities are determined by need for action in combination with driving conditions. Terrestrial activities on coastal sites are chosen when the tide and weather makes littoral and marine activities to be high-risk ventures. Marine activities are most dependent upon favorable weather and tide conditions. When conditions are not favorable, marine activities become high risk and are less likely to be chosen to be accomplished. Littoral activities are the highest risk during high tide although poor weather and light can also influence choice in performance of activities.

Another vector to choice in microscale identity is closely tied into economics. This has been presented in Figure 61- as stated previously this is a concept this is a concept that is based upon economic fitness of individuals and groups. At the microscale of analysis these are tied into the choices affiliated with local trade and exchange and

are assumed to be largely selfish in nature. These vectors also form the local extension of trans-Atlantic networks as shall be explored in Chapters 10 and 11.

Consideration of gender in Zone 3 is a similar situation to that of Zone 1 due to the heavy influence of Iceland upon the medieval textual sources that contain ethnographic evidence (Krogh, 1967). Also similar to Zone 1 is the heavy influence of early archaeological excavations of Danish longhouses upon the corpus of evidence in the past (Bruun, 1928; Norlund, 1936; Roussell, 1941). Perhaps the greatest change occurs with the levels of farm hierarchy. Greenland was settled immediately prior to the formal Conversion of Iceland that occurred circa AD1000 (Abrams, 2009; Strombeck, 1997) (Strombeck [1974] 1997, Abrams 2009). This is important for local hierarchical breakdown as there is little evidence for the hierarchies being linked with slavery (Arneborg, 2003). Slavery was simply too expensive to maintain throughout the population. It was increasingly socially unacceptable due to the adoption of Christian belief. There is no archaeological evidence from Zone 3 that can solely be attributed to the presence of slaves (Arneborg, 2003). An exception to this in terms of textual sources comes from *ESR*- Tyrkir the German and the Hebridean slaves brought on the voyages of Leif and Eirik within Zone 3. This source appears to make use of slaves as a literary trope for later Icelandic generations who fully recognized that slavery was only possible if the owner(s) were wealthy enough to offset their cost of upkeep. Zone 3 appears to utilize hierarchies based upon levels of economic dependence. Daily activities were determined by a negotiation of physical capability and skill, social propriety, subsistence, and social obligation. As the region, furthest west the working population of Zone 3 was proportionately reduced leaving a potential hole in a farm's subsistence strategy. There was a choice available- either call in more labor locally or from other Zones, the tasks needed go unperformed or

else those not normally affiliated with such activities become more proficient in them. Because of this it is more difficult to affiliate task and social status.

9.6 Conclusion

As with Zone 1 and Zone 2 analysis of Zone 3 case study evidence has shown a dominance of practicality in the microscale elements of identity construction and maintenance present on Norse archaeological excavations. Local construction materials were utilized from Sandnaes to the Farm under Sand in the patterns developed in Europe and Zone 1. The marginal climate of Zone 3 resulted in a need for greater reliance on local wild resources and resources external to the Zone to provide subsistence than attempting true agriculture. Hierarchies based upon levels of indebtedness maintained this local system. These hierarchies also expressed and influenced macroscale elements of identity construction and maintenance. This process is discussed in detail in Part 3.

Chapter 10 Trade and Economics

10.1 Introduction

The daily domestic elements of North Atlantic island identities during the medieval period did not exist within a static social environment internally or externally. This chapter considers an important central common vector and driver of identity construction and maintenance externally linked at this time- trade and exchange. It shall first consider the prerequisites for this early trade, moving on to the changes that occurred as early trade networks expanded across the North Atlantic. Finally, the networks are discussed in relation to trade's circumnavigation of the globe- when the Old World met the New and maintained contact for economic reasons. The impact that trade and exchange had on North Atlantic identity must not be underestimated in more marginal periphery where externally imposed vectors of cultural change were reduced in number because of location. Trade provided an influx of new cultural trends such as religion and fashions- contextual stimuli from European markets of the continent (Oka & Kusimba, 2008). It subconsciously replicated cultural practices via the choice in vessel, crew and cargo constituents. Trade offered an economic productivity. It also blended elements of marine and terrestrial exploitation in the form of goods but also indirect elements such as trading place location and transportation type (Oka & Kusimba, 2008). The littoral zone was where the marine transportation met terrestrial places and a ship was laid ashore to off load cargo. General elements of trade and exchange are illustrated in Figure 54. North Atlantic trade during the AD800-1250 period undoubtedly has its basis in the late Iron Age trade networks of north-western Europe, in some cases these networks were even older than that dating back to inter-island networks of the Neolithic (Cunliffe, 2001). They consist of the North Sea Zone, the Irish Sea Zone and to a lesser extent the Baltic Sea Zone. Prior to the consolidation of socio-political power

from chieftainships which were unlinked and maintained via individual prowess and largess into early medieval monarchies tied into geographic locations and control of economic outlets trade and exchange occurred between locations on familial and affine networks (Sindbaek, 2009). Much of this is dependent upon the lack of available natural resources of Continental Europe- control over what was available had long ago been established. New sources of materials were increasingly needed as the population of Europe increased. Nucleated settlements increased in size and diversity, in some instances outstripping the ability of the local hinterland to support the human and animal populations (Sindbaek, 2009). Island groups located along the maritime trade routes, which existed in the North Sea, Irish Sea and the Baltic, were excellent locations from which integration and exploitation of these trade networks took place (Sindbaek, 2007; Sindbaek, 2009). By the ninth century, several island groups within Zone 1 functioned in this capacity including Orkney, Shetland, and the Hebrides and later in the century the Faroe Islands as well.

10.2 Context of Early North Atlantic Trade

This system functioned both economically and socially (Oka & Kusimba, 2008). Economically this allowed local demand for external supply to be met by the exchange of demanded goods for those materials in locally abundant supply- trade and barter. Depending on how well equipped for a trade journey someone was the round trip voyage between localized trading areas such as coastal *wics* would be quite large. Trade over land and water was dependent on transport to carry items in bulk. Transport options for trade during this period are illustrated in Figure 55.

Water transport was the most relevant form of cargo movement across the North Atlantic. This allow low value bulk trade goods as well as smaller high value luxury goods to be considered viable options for trade within the wider European economic

system (Bill, 2010). The modern versions of these vessels continue to be utilized throughout the North Atlantic. This is illustrated in Figure 56. The most valuable form of open water transport from the initial period of settlement until the fourteenth century was the *knórr*. This vessel is best known archaeologically from Denmark (Crumlin-Pedersen, 1995). An example of a *knórr* is illustrated in Figure 58. Like other Norse vessels *knórr* are clinker-built however, the open water utilization of these vessels is shown via the deeper draft these vessels had in comparison to the glorified *langskip* that certainly was coastally utilized. *Knórr* were primarily driven by sail power as opposed to oars that freed up space for cargo (Bill, 2010; Crumlin-Pedersen, 1995). This is evidenced via the presence of substantial mast fittings on these vessels.

Method of transport	Capability	Greatest profit	Seasonal
Coastal vessel	Greater cargo amounts with range only limited by shore access and boat, boat required but small crew	Luxury and bulk goods in combination	Less restricted by seasons due to the protection provided by location
Ocean vessel	Greatest cargo amounts with range limited only by the stores, boat required but a larger crew	Bulk goods with a smaller amount of luxury goods	Spring to mid-Autumn
Walking	Low cargo, limited range but low overhead cost	Luxury	No restriction
Riding/pack animals	More cargo transported with greater range and speed but upkeep required for the animal(s)	Luxury	No restriction
Wagon	Greater cargo and range at higher speed but requires wagon, animals, roads/smoother land to roll upon and either peace or protection to travel with	Bulk and luxury goods	Summer
Skiing	Low cargo, greater range at speed, skill and skis required	Luxury	Winter
Skating	Low cargo carried at a greater range potentially, requires frozen rivers or waterways and so may have been used in combination with other methods	Luxury	Winter
Sledging	Greater amount of cargo carried with greater range at higher speed, requires a sledge or sleigh and an animal to pull it, smoother travel conditions provided by snow	Bulk and luxury goods	Winter

Figure N Transport descriptions relevant to this period.

The boat type most heavily associated with both Viking Age Scandinavian trade as well as the North Atlantic colonies was the stoutly built *knórr* (Greenhill & Morrison, 1995; Bill, 2010). The deeper draft of this vessel type allowed for not only a greater cargo capacity than its more recognized 'cousin' but also the deeper draft allowed the ship to ride the rough waters of open North Atlantic with a higher degree of safety (Westerdahl, 2008).

An archaeological example of this includes Skuledev 1- the finely preserved eleventh century large cargo vessel scuttled long ago in defense of a Viking Age settlement on the Roskilde fjord (Westerdahl, 2008; Crumlin-Pedersen, 1995). This vessel was primarily sail-powered, rather than being oar-driven like the vessels used in coastal and river waters, as the overall design of the ship left few areas for rowers (Westerdahl, 2008). Other evidence for this comes in the form of the 'tree-knee', the engineering feat that allowed the force of the mind to travel from the mast to the body of the ship through the keel. This is a feature not found in clinker-built ships prior to the ninth century (Westerdahl, 2008). The stouter *knórr* would also have had at least one ship's boat known as a *færing* or four-oared boat. This smaller vessel would have been used to approach those parts of the coast which a *knórr*'s deeper draft would prevent a closer advance. When not in use it would have been towed behind the larger vessel or brought up onto the larger knórr deck and stored overturned. This also would provide an element of protection for the goods stowed under the ship's boat (Westerdahl, 2008).

The deeper draft and overall design of *knórr*-type ships allowed for a greater amount of space to be devoted to cargo drayage with less actual human-power being required to man the rigging (Bill, 2010). The *knórr* vessel type was quite strongly associated with trade in medieval Scandinavian and Icelandic sources (Bill, 2010).

Given the size of the vessels in question their utilization with the medieval Scandinavian trading system in the North Atlantic most likely would at both the local regional market economy and the international market economy levels (Unger, 1980). The local regional market is considered here to have consisted of the trade conducted between those settlements sharing a common coastline. This would have equated to short trading voyages of up to several days (Morcken, 1968). The stouter hull and deeper draft of the *knórr* made it ideal for the more exposed rugged coastlines of the North Atlantic archipelagos just as the more slender and streamlined *langskip* was much better suited to the more sheltered coastline of the Scandinavian fjords (Bill, 2010; Westerdahl, 2008). A Norse landing area from the Isles of Lewis illustrates a preferred location, see Figure 57.

Within the wider picture of the international market system, the *knórr* functioned as the workhorse of the North Atlantic. They served to bring the goods of contemporary European life to the western-most reaches of the Norse world, such as fine cloth, raw materials for everyday domestic goods like iron blooms and food items which were otherwise unavailable, such as grain (Unger, 1980; McGovern, et al., 2007). The *knórr* would have taken luxury goods such as polar bear pelts, sealskins and oil, and, perhaps most famously, walrus ivory (Roesdahl, 2005; Seaver, 1996). Live animals would also have been included, particularly fine hunting falcons that fetched exorbitant prices in the markets of medieval Europe (Miller, 2008).

In the contemporary literary sources, mentions of *knórr* vessels are normally found in reference to two topics. Greenland, where the stout sides and deeper draft combined with the flexibility of the clinker-built ships proved an excellent combination in the rough iceberg-laden waters on the western Greenlandic coasts (Seaver, 1996; Bill, 2010). The other topics are merchant vessels, which would have

been able to afford long voyages through the wide North Atlantic to various ports in the known world. Sometimes the references include aspects of both. It is important to remember that the views on ships express a view both contemporary to its time of translation into written text during the twelfth through thirteenth centuries but also one that expresses the view held in the earlier Viking Age past that was verbally transmitted down through time (Quinn, 2000). The following quote comes from Kapituli 2 of *Graenlendinga Saga* (Sveinsson & Þórðarson, 1935).

> Herjólf farmed first at Drepstokk. Þorgerð was his woman called, and Bjarni their son, who was a very promising man. He had been eager while young to sail abroad; he got himself both wealth and good standing amongst men, and spent his winters alternately in other lands and with his father. Bjarni soon had a ship for himself.

Like many peoples of the late Migration Era through to the Medieval Period, trade and exchange formed a method of wealth accumulation available to much of the population, even those who were lower status. What limits the range of this system's impact into the amount of capital the individual can put into this system. The cargo carrying ability of the *knórr*-type vessels here was utilized for a variety of goods of varying size along their voyages, thus breaking down the voyage into shorter sections as well as maximizing the amount of product turnover (Unger, 1980). Hence, a greater amount of accumulated personal wealth in the form of material goods and renewed mercantile contacts would have been accumulated. This is the capital necessary to extend influence further into the international long-distance trade networks.

Travel to and beyond the Faroe Islands required a certain size of ship, although the majority of Zone 1 could be served by smaller vessels discussed below. Not only does

open water require a deeper draft to ride out the ocean swells but also the longer voyages necessitated room for the supply of the crew amongst the cargo (Bill, 2010). In light of this, ships such as the *knórr* were designed to require less crew to operate in relation to the amount of cargo volume able to be carried. These vessels required a substantial amount of social and economic capital to construct and maintain, let alone outfit for a trading voyage (Westerdahl, 2008). Because of this, only a certain economic level of society would have been able to express their identity in this way. Lower status levels simply would not have the economic capital necessary to do this. Construction of vessels were expressions of local microscale just as much as a longhouse on land, but with a distinctive marine orientation and often much more active acknowledgement of use in practice. However, as lower status men were able to be employed as crew on these voyages they also not only maintained this bulk exchange system but also were provided the opportunity for trade and exchange themselves on a much smaller scale (Unger, 1980).

In coastal water voyages of short duration, smaller vessels similar to the *faering* in format and construction were utilized. The amount of cargo able to be carried by a smaller vessel would limit the amount of exchange able to be undertaken per voyage. This may have been utilized in conjunction with a local base of operations to more fully integrate the long distance voyages undertaken via *knórr* into local networks of trade and exchange while contributing to local economy by the facilitation of local resource exploitation. These smaller vessels have modern survivals because of their extreme utility in the North Atlantic marine environment. A sample of these from the modern Faroe Islands are shown in Figure 56. These were utilized around the island archipelago but were too small to be economically viable for longer open ocean voyages. These vessels allowed a more complete translation of human maritime needs and aspirations to the changeable maritime environment. The

further from the centralized Continental markets a trading voyage began, the greater the risks were in association for the voyage. Because of this, the likelihood that economic travel was utilized was correspondingly greater. The cost of this is indirectly reflected in later medieval Norwegian law regarding a guaranteed yearly ship (McGovern, 1980). This was to guarantee an economic influx and outlet for the area.

The faering, on the other hand, would have been utilized on a more local scale, not only the internal trade played out in gift exchange and reciprocity but also the collection of marine derived goods and the drayage of victuals. This is the role that ships' boats and other small coastal vessels have played since it was discovered that coastal water travel could be less time consuming than travel over land with much less effort (Greenhill & Morrison, 1995).

Networks of trade and exchange provided the physical means of maintaining social ties across an ocean. Whether these networks also initialized these social ties by making settlement of islands beyond northwest Europe is difficult to ascertain from the surviving evidence. Whether or not these networks were initialized and utilized by Papar, or other hermetic Christians, is also unknown. Early medieval sources allude to the presence of earlier inhabitants and their nautical practices however, the only archaeological evidence for this group occurs on various Zone 1 islands (MacDonald, 2002; Dumville, 2002; Ahronson, 2002).

10.3 Establishment of the North Atlantic Trade Network

The establishment of trade networks across the North Atlantic settlement Zones was a multistage process rather than the result of a singular planning event. This has been broken into six separate phases for ease in consideration however, it is important to remember that this was not adopted at the same pace across the

region. As this system grew with the settlement of the area it supplied the goods, people and skills that were necessary to not only maintain the existing network but to expand it as well.

Phase 1 corresponds with trade occurring concurrently to the settlement voyage and conducted via exchange of goods and services to meet demand with supply. The presence of some of these goods is contingent upon the intended destination market- i.e. in Zone 1 islands such as Orkney, Shetland and the Hebrides foundation domesticated farm stock was not as necessary due to the established presence of domesticated farm animals prior to the Norse arrival. From the Faroe Islands west, however, farm stock and seed would have been amongst initial cargos of those who could afford the risk. This allowed the practices of animal husbandry known from sites to be developed and refined once breeding populations were established. The associated risks of the shipping of livestock are somewhat alleviated by species and breed choice. The open water voyage in unenclosed vessels potentially would have resulted in seasick livestock. With the exception of horses, all farm stock evidenced within the archaeological records of the north Atlantic Zones are from species with the ability to vomit. This is not normally a concern when shipping stock long distances in modern conditions (Dr D Gray, DVM: personal comment). The fact that horses would have been more difficult to safely ship is something which may have contributed to the overall value of the species within each Zone. The greater risk is actually from shipping sickness. This is an umbrella term for primarily respiratory infections such as bovine pneumonia that continue to effect modern stock populations when transported long distances(Dr D Gray, DVM: personal comment). Another concern for the shipping of stock is the effect on joints of uneven standing surfaces during transport. The stress of shipping was reduced by off-loading the livestock during re-supply/trade stops at islands along the way. This process allowed

joints to relax from the changeable positions and any weight being lost to be supplemented by fresh fodder that would also raise the corresponding amounts of fresh vitamins maintaining animal health. This bears implications for how the cargo was actually loaded onto the ship- it would be impractical to unload the entire ship for a few days to let the stock relax from shipping stresses. However, loading the ship so that only a partial unloading is required- which potentially may have been done anyways during the course of trade and exchange- would make this concession feasible. At this early phase, this may have occurred at locations affiliated with the voyage sponsor and crewmembers including kin and extended affine relations. This is similar to the process occurring in Continental Europe (Sindbaek, 2009). If individuals and groups sponsored Phase 1 voyages based in the Scandinavian core, then the cost of returning the profits of the voyage must be considered because of the lack of initial exports at the peripheral settlements (Lightfoot & Martinez, 1995).

There are differing priorities in accordance to the choices being made in import cargo constituents. At a basic microscale level there is a practical priority- the material needed to make a profitable voyage with the least amount of risk and then potentially establish a farm quickly. This priority considers practical aspects of settlement cargos in the order that it is needed. A priority of settlement is also expressed in Phase 1. This priority is the material necessary to make a trip to establish a settlement in a location foreign to the core region. This is a terrestrial view of a farm package exported from Europe. A maritime priority included the material needed to make the trip safely over open ocean. It might include local knowledge of weather and shores as well as how to weather storms at seas. This is a self-contained and self-maintained maritime view of a ship voyage the amount of risk experienced was reduced by greater numbers of ships undertaking the voyage. The following quotation comes from the *Konungskuggsjá* [The King's Mirror] and is

concerned with the proper provisioning of a merchant's ship. This mid-thirteenth century source is written in a didactic format that reflects the growing impact of Continental influences in the Scandinavian homelands (Larson, 1917; Grove, 2009). It also heavily reflects the influence of the patron's social status and thus literary needs, upon the text's author.

> Always buy shares in good vessels or in none at all. Keep your ship attractive, for then capable men will join you and it will be well manned. Be sure to have your ship ready when summer begins and do your travelling while the season is best. Keep reliable tackle on shipboard at all times, and never remain out at sea in late autumn, if you can avoid it (Larson, 1917, pp. 83-4).

Another priority is economic in nature. This is the material necessary to make the trip to a guaranteed market. This priority is considered to be economic precisely because it exploits the needs generated by other priorities while simulating the choices associated with those priorities. Certain risks, if undertaken, would have proven very lucrative however. An example of this is the transoceanic transportation of domesticated farm stock. There is no existent evidence promoting the establishment of new identity aside from making the decision to settle a foreign area. However, a subconscious priority of the preservation of previous identity is expressed during Phase 1. Identity was practiced in the choices of what to include in the cargo. *Habitus* would have made much of this common- the 'obvious' choice. This process was mediated by the availability of supply when loading cargo as well as the practicality of the material on the open voyage. This included the material needed to make the voyage while maintaining the culture known to the crew and passengers. This considers those elements that were practices earliest in the voyage.

What distinguishes Phase 1 from Phase 2 of this process is the delay to exports from the newly settled areas. Some collection time would have been necessary to have enough exports to be a full cargo. If this were done at several points on the voyage the amount necessary from each spot would have been much less and hence faster to accumulate. Another reason for this delay may have been linked to the length of the voyage. If a ship under sail left Scandinavia, at the beginning of the sailing season in spring by the time it arrived at Zone 2 or even Zone 3 the safe sailing period was well underway (Gelsinger, 1970; Bill, 2010). This does not count any layovers experienced at island archipelagos on the way. Because of the distance and the time necessary to make the trip if a ship were to make a return voyage that year cargo would have needed to be waiting to be loaded when the ship arrived at its landing location.

Phase 2 farms are in the earliest phases of establishment although in the period before reliable returns on the animal stock. The trade goods that were transported in the North Atlantic trade network are the same as with Phase 1. The transition from Phase 1 to Phase 2 was not even across the region. In some areas Phase 1 is ongoing and people continued to be a substantial addition to cargo. Priorities exhibited in the choices made in import cargo are illustrated in Figure 59. There is little change to the ordering of priorities with changes to settlement priorities, economic priorities and the preservation of identity that is subconsciously expressed. As the North Atlantic network extended information and heirlooms from kin networks was added as a ship transported import in settlement priority as well as the preservation of previous identity. Information such as ideas, fashions and current European events would have also held a place within the economic priority. The shipping of livestock was increasingly a high risk venture which was not met by the high return needed animals once brought. The established farm animals of Phase 2

farms meant the need for animals would have been lessened. The delay in export collection experienced during Phase 1 is no longer evident- there has been time to collect wild resources for some amount of export cargo to be stockpiled. Exports during Phase 2 are primarily derived from food collection already developed in an incipient fashion during Phase 1. Onsite production of domesticated animal products is not great enough at this time for it to be a major contribution aside from basic farm subsistence. Hence a return voyage or the continuation of a multistep trade voyage into the safe sailing season. Any stop on an open water voyage is potentially a period to re-supply and repair the vessel as well.

By Phase 3 farms are established and experiencing returns from animal stock within an expanding network of land exploitation. In some areas Phase 2 was still in effect, while in Zone 3 Phase 1 had begun. There is some change associated with imports linked to the North Atlantic import network. There is no longer any need for animals or seed to be sent from Scandinavia as intra-network sources are available for settlements farther west to make use of (Dugmore, et al., 2005). Priorities are unchanged with the exception of stock and seed being removed as an import cargo option. Trade goods are beginning to be driven by other vectors at both the microscale and the macroscale (Unger, 1980; Seaver, 1996). Exports are surplus derived from food collection in a system that is well developed and increasingly managed because of an ongoing presence in the region. On site, production of material with a surplus had begun while in certain areas there is local extinction as wild resources of species such as walrus and auk are over-exploited (Vesteinsson, 2007). Trade voyages are beginning to be initialized by Zone inhabitants who have both capital and contacts in Europe (Durrenberger, 1991). Voyages sponsored from Europe also continue to occur. Although no conscious priority of previous identity

maintenance being practiced as farms begin to be able to exert more control over the system the opportunity for change begins as more choices become available.

By the onset of Phase 4 farms are established and all productive land is claimed. Social stratification of the population of this terrestrial system are also established. Phase 3 continues in some areas while in Zone 3 Phase 2 is still found. Differing priorities are little changed from Phase 3. Trade goods are demanded and supplied by markets within Zone and within markets in northwest Europe (Bill, 2010; Seaver, 1996). Trips are initialized by both core and Zone inhabitants as a means to gain wealth and prestige locally and in international courts in a similar fashion to the earlier motivations of warriors during the Late Antique period (Mauss, 2000). A priority to establish unique island and North Atlantic identities is being exerted via the influence on local and international markets. This is evidenced by the presence of trade goods being supplied by foreign markets on sites in the North Atlantic and in Europe. There are choices being exerted for this to occur. Walrus ivory in European collections is the most famous example but much of this would have been organic and less durable in nature such as textiles, skin rope and preserved foods (Roesdahl, 2005; Seaver, 1996). Written material also begins to outline designated Zone identities as well.

Phase 5 is differentiated from Phase 4 by the power consolidation of elites being at its height there is little other change. In the western reaches of Zone 3 Phase 4 is underway. Across the north Atlantic Zones, European influential power bases such as churches were being established (Gjerland & Keller, 2010). These collected the goods of the wider local region on the microscale and acted as both facilitator and intermediary to transfer the collected capital into the long-distance trade network maintained. Trips were initialized by both core and Zone inhabitants as a means to

gain wealth and prestige locally and international courts. This system is much larger by Phase 5 as the greater amount of capitol offered by Crown-backed voyages an eventual takeover of the North Atlantic system was inevitable as the climatic downturn began to influence the Zones more heavily (McGovern, et al., 1988). This is generalized and illustrated in Figure 60.

By Phase 6 North Atlantic Zone farms are being directly impacted by the Little Ice Age resulting in reduced production and in some places reduced physical access to open water trade routes (Fagan, 2000). As with Phase 5, there is little change to import choice prioritizing. Trips are being instigated by continental political vectors in Europe- a change in economic context (Unger, 1980; Vesteinsson, 2007). Not only is there an identity priority being actively pursued by North Atlantic Zone inhabitants but it is increasingly important to differentiate island populations in these Zones as being distinct in comparison to the imposed demands and influences of European courts and markets. This is linked to the flourishing of writing concerned with the Settlement Period- a medieval example of nationalistic manipulation of the past (Quinn, 2000).

10.4 Regional Markets

The economics of the North Atlantic during this time was not only tied into the existing market economy of northwest Europe but also utilized the wide variety of natural resources available in coastal environments. Within this network the local market economy is that which is the immediate region to the farm unit. In Zone 2, for instance, this would correspond with the commerce network of localized farms but also might occur in relation to þing gatherings (Hastrup, 1989). This is expressed in practice as both economic exchanges fulfilling demand with supply but also in networks of local gift exchange as well. Local gift exchange networks were

reinforcements of social stratification and hierarchy via the exchange of goods as gifts that held associated obligations of reciprocity of labour or goods later (Mauss, 2000). This might have occurred between the farm holder and a local chieftain. The regional market economy occurs across an entire archipelago or Zone. This involves inter-island, or inter-Quarter, transport of goods economically exchanged fulfilling demand with supply but also in networks of local gift exchange.

Zone 1 is dominated by an anthropogenetically derived landscape that is treeless in nature (Fojut, 1996). The Northern and Western Isles in particular are far enough south in latitude that grain agriculture was considered a viable means of farm subsistence (Challinor, 2004). This contributed to the rise of Orkney with the medieval balance of power of North and Irish Sea trade networks. Shetland, on the other hand, was exploited for steatite at sites such as Clibberswick and Hesta Ness (Buttler, 1984 [unpublished]). Animals such as sheep and the products that they are raised to produce contribute to not only farm economy but also wider exchange (Challinor, 2004). This allowed a textile driven economy to develop in relation to Zone 1 farms. The islands in this region are located within the North and Irish Sea networks of exchange. Shetland and the Faroe Islands were also increasingly involved in north Atlantic trade and exchange networks following the settlement of Zones 2 and 3 because of their locations between these Zones and the European continent (Cunliffe, 2001).

Zone 2 is the most geologically recent of the archipelagos considered during this study. At the time of initial settlement of a forest of trees, primarily *Betula spp* covered the Zone. Since this time, over-utilization of marginal lands by both humans and human introduced sheep has resulted in a landscape that is ovigenic in nature (Buckland, et al., 1991). The location of Zone 2 between the confluence of the warm

Irminger Current and the cold East Greenlandic and East Icelandic Currents has resulted in a rich supply of fish in the Zone 2 waters (Barrett, et al., 2008). This rich fish and mollusc source attracted both marine mammal and marine bird populations. The presence and migrations of such species from Zone 1 to Zone 2 would have provided a natural route to other remote islands in the north Atlantic for open water sailors. The exploitation of this type of knowledge was a constituent of a European marine *habitus* (Farr, 2006).

Zone 3 was composed of sites located along interior fjords such as Qassiarsuk and Narsarsuaq along the Eiriksfjord as well as the northern hunting fields of Norðsetr. The Narsarsuaq site is illustrated in Figure 50. With the exception of L'Anse aux Meadows, this strategy reduces some of the climatic and environmental effects associated with the nearby confluence of West Greenlandic and Labrador Currents. Interior locations subjected settlements to the effects of Greenland's inland ice, however. Because of this, grain agriculture was largely impossible and increasingly so as the effects of the Little Ice Age became more apparent (McGovern, 1980). Animal husbandry became the primary form of economy present in Zone 3 as transhumance remained the most efficient means of exploiting the marginal lands of Zone 3 domestically. Domestic sheep were managed to provide the wool necessary for textiles (Ostergard, 2009). Wild species increasingly satisfied much of the dietary needs for protein by the inhabitants of the Zone while also providing the material for long distance exchange (Arneborg, 2003).

Walrus and seal hunting, at least for the Norse of the North Atlantic, occurred on a primarily opportunistic basis if the prey was around it would most likely be hunted (Keller, 2010). Within Norðsetr, walrus exploitation would have occurred during the spring, when walruses would move in closer to shore for breeding and birthing

purposes. The literary sources concerning this species' exploitation are not at all clear, however. Much of this is this may be attributed to medieval source material. The fairly reliable post- medieval Olavus Magnus gives a very fanciful description of walrus exploitation off the Norwegian coast (Magnus, 1998; Szabo, 2008). The walrus in question scaled some of the steep fjord walls and was subsequently brought down by skinning the walrus as it was pulled down from the rocks. This action was supposed to have caused the walrus to bleed to death and was thus easier to dispatch (Magnus, 1998). Seals, on the other hand, were exploited both on shore as well as while they surfaced through the pack ice. As seal exploitation was quite well known to the Norse North Atlantic settlers, the father figure didactically narrating the *Konungsskuggsjá* has a number of things to say about Greenlandic seal resources which implies that the author's sources were quite familiar with the variety of species found in the region (Larson, 1917).

Temporary settlements were probably constructed for usage during the procurement period, unlike the experienced Thule ice-walkers these settlements were probably not on the ice itself (Doyle, 2008; Magnus, 1998). For both walrus and seals, attempts at clubbing females on the pupping beaches may have provided a somewhat safer opportunity for procurement. This is especially important with reference to walruses as hunting beasts like that is a good way to sink a smaller boat and crew. Other walrus and seals were taken from the waters of Norðsetr by harpooning from ice flows as portrayed by Olavus Magnus in the mid-sixteenth century (Magnus, 1998; Keller, 2010).

For the Norse seals and walrus represented two different types of utility- seals being taken for their subsistence value and walruses being exploited for their economic/social utility. They could be exploited using much smaller hunting groups

due to their smaller size. Seals from the cold waters of Norðsetr provided the Norse settlers of Greenland with not only meat for eating and blubber for oil rendering (Buckland, et al., 1996). Their water repellent skins were turned into boots and shoes while softer-tanned were turned into clothing for some.

Other sealskins were turned into twisted skin rope, an occurrence also known from the earlier travels of Ohthere when discussing what he received from the *Finnas* (Englert, 2007). Walrus, as stated previously, represented a valuable economic resource, primarily because of their ivory tusks, for the Norse of Greenland as well as those of the North Atlantic back to the Scandinavian homelands, and had been for some time (Roesdahl, 2005). This is one of the more famous of the Greenlandic commodities as for a time the ivory of Europe was supplied not by elephant ivory, but rather by walrus (Roesdahl, 2005; Roesdahl, 2010; Keller, 2010).

Walrus skin, perhaps twisted into stout, utilitarian rope also formed part of Greenland's economic basis within the world market (Keller, 2010). Unfortunately the organic nature of twisted skin rope leaves physical proof somewhat lacking. In spite of this, however, sources such as thirteenth century ecclesiastical tithing lists, telling of goods received by the Archbishopric of Niðaros from the Greenlandic settlements, hint at the amount of economic worth to be found in a walrus's hide (DI, 1876).

10.5 Trade and Exchange within the North Atlantic System

Trade in the Viking Age is traditionally associated with the exchange of luxury items rather than in bulk goods. This practice was linked to the associated prestige an item potentially carried when it came to be considered a luxury good. This could be linked to local scarcity, high artisanship, or even the resource material itself. This type of small bulk/ high social exchange facilitated the gift exchange networks upon which

northwestern European chieftainships established and maintained themselves (Mauss, 2000). Within early Norse poetic references the men who did this were known as 'ring-givers' who gifted their affiliates with riches or weaponry (Page, 1998). This practice is indirectly reflected in the shape of pre-Viking Age and early Viking Age vessels. These vessels were shallow-drafted allowing them to be drawn up on shores easily with a sizeable crew (Bill, 2010). There was no enclosed hold location to keep commodities safely on these vessels in bulk- smaller, higher value goods were preferred. As time passed the chieftainships of the north consolidated into medieval kingdoms. This began first in Denmark due to affiliations with Merovingian and Carolingian Frankia as well as the growing influence of the medieval church (Sindbaek, 2007). Trade derived revenue gained via power over public trading areas in combination with growing dependent populations resulted in a shift in trading practice patterns. Although luxury goods still has a place within this system of economically driven exchange bulk commodities that supplied a population began to be desired more. By having sufficient surplus of stores, a population was then able to free laborers from tasks associated with subsistence for those associated with artisanal activity. Political power consolidated socially via the maintenance and control of the spaces where public trading occurred. This practice was exerted via economic interactions and taxation/rent. As this process occurred within the North Sea Zone drafts began to increase in clinker ship design and sail power became the dominate means of propulsion. A large vessel was able to be manned by a smaller crew thus increasing the amount of cargo to be carried via technological efficiency. This is illustrated in Figure 59.

Trading voyages became recognized by power magnates local to Zone 1, 2 and 3 as a viable means of maintaining not only local power but also to maintain an international presence within Scandinavian political networks. Simply put the trading

voyages and the associated wealth of holding on in combination with the potential wealth to be gained began to supersede the earlier raiding voyages and military efforts present during the consolidation of the Scandinavian kingdoms. By utilizing the practice of gift exchange based on social obligation and reciprocity Scandinavian political powers were able to integrate themselves into this system and so directly benefits from the wealth generated (Mauss, 2000).

Trading voyages were multileveled events that carried with them physical and intangible elements. Early on, this would have occurred concurrently to settlement voyages- tradable items brought along with the goods necessary to establish a new farm on wild land. There may have been a surplus of the same goods, preserved food, or even textiles traded for re-supply access to fresh foods on extended ocean voyages. If the sagas are to be believed, slaves might also be considered with this lot (Brink, 2012). Aside from physical goods, however, trading voyages provided an influx of news, ideas, technology and new people into the north Atlantic networks, thus making them incredibly powerful drivers of identity construction and maintenance in their own right at the macroscale. The actual practice of seafaring by each crew can be considered as microscale aspects of this marine oriented system (Farr, 2006). Each crew had their own distinct habitus based upon their own context, which in effect makes them as individual and unique as each of the farm unit constituents.

Socially the concept of a trader was changing during this period- taking on socio-political aspects held by warrior supporters of Scandinavian chieftains. The trading vessel itself was equated with a farm in terms of sailors' rights within *Gulatingslog*, *Grágás* and even the later *Seyðabrævið* and Norwegian *Jónsbok* adopted during the later thirteenth century (Eithun, et al., 1994; Dennis, et al., 1980; DI, 1876). These

provisions prevented sailors being outside the local law when they landed. These voyages existed at the juxtaposition of local and international networks of exchange.

The demand for commodities change over time as does the nature of the trading unit itself. Although trading voyages continue and are mediated via traders and crew of the vessel the cost of long distance shipping bulk goods of lower value per individual unit over high value, low bulk goods becomes prohibitive for all but the wealthiest of society or those groups whose pooled capital allow them to function at that level economically. In Zones 2 and 3 textual references, it is possible to see this association in contemporary practice (Durrenberger, 1991).

It was in this economic environment that the settlement of the north Atlantic Zones took place. The deeper-drafted *knórr* was much better suited to the open water journeys required for the establishment of farm units in distant lands than the shallow-drafted coastal vessels of earlier centuries. These ships also were able to carry enough supplies on board to provide time for the construction of shelter- in smaller vessels this space had been utilized for carrying crew and their provisions. The new established populations provided new locations with which to trade and initially in Zone 1, at least the choice of expansion into the indigenously settled areas such as the Northern and Western Isles occurs in economically strategic locations in the landscape. Not only was this a statement of social power being exerted over previous inhabitants such as the Picts inhabiting the Birsay Bay local area but it was also a wider statement of local change in power to the regional trade networks (Barrett, 2007). This process was particularly successful in Orkney where strategic archipelago location as well as a comparatively rich agricultural economy developed the local power magnates into the powerful Orcadian Jarls who established themselves over Shetland and Fair Isle as well (Barrett & Slater, 2009).

As this consolidation of capital by regional elites occurred in the wider north Atlantic Zone, a change began to occur within trading patterns. As land resources became the legal property of fewer and fewer land owners more sites became affiliates via rent paid in farm product or animals and social obligation practiced in trade and exchange. An extended kin group of such a landowner would result own considerably more farm product than could be produced on a single farm unit (Sindbaek, 2009). This is a pre-condition for sustainable international trade as an economic practice: there must be a surplus in supply of goods with which to exchange. Local exchange increasingly would have been informal and incorporated as part of the seasonal practice of these wider farm conglomerates consisting of several farm unit networks under the legal ownership of one kin group. These groups collected bulk items as land rents (Williams, 1996 [unpublished]). Luxury goods and raw materials were collected this way. Once enough goods were collected that a sizeable profit would be made from the sale of the ship's cargo a voyage east to the markets of Zone 1, Scandinavia and the Continent was made once the time of year was favorable for the journey (Bill, 2010).

Landowners intent on establishing themselves on a level greater than their own zone needed to be able to make their presence known beyond the Zone. Location alone made a ship and crew a vital aspect of this. In this time before the ease of mass communication, a voyage undertaken just to get from point A to point B was incredibly impractical in terms of economics, labor and personal risk. Voyages conducted for a wider variety of reasons, such as trade, communication and to maintain a personal presence in foreign courts and markets, resulted in enough prestige and potential economic gain to outweigh the risk inherent to medieval ocean travel.

Between Zone 2 and Zone 3 trade networks had to be established in areas which had not previously had large-scale trade and exchange with medieval Europe. Initial trade was carried via family networks and affiliation networks of settlement. This provided a guaranteed market as well as a tailored supply for expanding north Atlantic trade networks. Within this context, those farms that were established early in the settlement period and developed a connection to the wider North Atlantic trade and exchange early became very powerful by the twelfth and thirteenth century. Particularly in Zone 3 these more powerful areas became affiliated with Church and cathedrals. Examples include Qassiarsuk and Igaliku discussed in Chapter 11. The cathedrals at both of these are dedicated to St Nicholas, rather than St Olaf of Norway or St Magnus of Orkney who were contemporaneous and popular in Scandinavia.

As governments became intermediaries in this system via levies and personal representatives this begins to change. The demand for luxury resource is more directly tied into international economic networks. Resources included walrus ivory, arctic furs, and live animals such as polar bears and hunting falcons. When African networks with less associated risk than long distance open water meet the demand for ivory voyages the change is swift. By this time, there is no ritual reason to maintain the amount of prestige associated with goods made from walrus ivory and the aesthetics were affiliated more with choice and overall cost. The demand for exotic arctic live animals such as polar bears may have continued- this is evidenced not only by direct literacy practice such as the tale of Auðun Vestfiska and within copies of the *Grágás* law code (Miller, 2008; Dennis, et al., 1980).

Furs and skins may have also been a continued resource with some market value. Continued exploitation of fur bearing species is difficult to date as hunting traps are

not often recognized in ruinous conditions and as a result as rarely excavated (Keller, 2010). Osteological material of fur bearing species showing evidence of skinning is another way to determine this however evidence of this practice in Zone 2 and Zone 3 is slights. This lack of evidence may hint at skinning activities away from the home farm unit, differential preservation or even as of yet undiscovered sites. Walrus skin prepared as twisted skin rope also may have continued as a community within the north Atlantic sailing routes until cheaper forms of stout rope material such as hemp or jute was widely available.

This provides a view of a very changeable point in north Atlantic identity construction- the social rise of the merchant as the social decline of warriors less necessary for daily defense in the wider medieval Scandinavian world. In a way, these are similar function of macroscale male identity in the north Atlantic. The ability of a chieftain to maintain and arm skilled warriors also precluded enough capital for weaponry; travel to and from battle, room and board but also luxury gifts to maintain social obligations. The ability to conduct ship-scale trade over open ocean precluded enough capital for ship, crew, cargo, steersman and foreign duty fees.

Chapter 11 Religion

11. 1 Religion and the Church

An important cultural vector external to the North Atlantic settlement population that heavily influenced subsequent regional society was religion. This was initially carried via the trade networks discussed in Chapter 10 as parts of the *habitus* of included human passengers and potentially crews, of these voyages. This chapter considers the external macroscale vector of religion. It begins with the pagan religious context of the North Atlantic settling populations. It then moves on to the initial Christian religious context of the settling populations and the developing Christian network of North Atlantic Zone sites. Finally, the social aspects of religion are discussed. The impact which religion had on identity is difficult to quantify because of its nature- belief is part of *habitus* and as a result is directly evidenced in practice and indirectly evidenced by the physical remains of social and economic interactions. Religion provides a worldview that places the local familial reality within a universal context. It provides a context for cultural values, norms and morals- it assists with the spiritual contemplations of life and death as well as right and wrong. Religion can potentially provide a longer held view of familial *habitus* provided conversion has not interrupted this familial link. The initial context of religion in the north Atlantic is obscured by biased sources in combination with unknown influences of religious syncretism. Religion indirectly influenced the social interactions of inhabitants providing potential links to the social hierarchy. Later this would be most evident as the medieval Christian Church became a powerful social, economic and political force. Religion was another element of wider commonality for populations and a way to express a similar identity on the macroscale.

11.2 Pagan Religious Context of the North Atlantic

Although the exact nature of Norse pagan religion is unknown, particular via archaeological evidence, a medieval mythological base which was linked to practices of oral history present in not only the Norse settlements of the north Atlantic but in the Scandinavian homelands as well. The later medieval writers in Iceland heavily impacted the modern concept of early medieval Norse pagan religion (Andersson, 2008). During the pagan period, the structure of family present on the farm replicated the centrally focused universe structure noted from mythological references found primarily in medieval Norse poetry. In this view the longhouse central long hearth and its range of activities corresponds with Yggdrasil the world tree that forms the centre of the universe and upholds the levels of existence within its boughs. This format considers the fact that physical domestic rituals that occurred within the longhouse- the center of this social space utilization- would be incorporated within domestic deposits. This results in physical evidence of religion being indistinguishable from material of purely domestic activities. The location contributes to their effectiveness as a practice of non-Christian religion. This view is based upon a reorientation of the traditional format of the construction of the Norse pagan universe.

This is illustrated in the top left portion of Figure Table 7. This view attempts to maintain the figure of the World Tree in relation to the worlds described in its branches and roots rather than viewing it as a central figure shown in the top portion of the same Figure. This is known because of the common poetic corpus referenced by medieval writers in not only Zone 2 but also from Zone 1 and Norway as well. The complex cross-referencing nature of medieval Norse poetics required an intense knowledge of the mythological corpus. Sources such as *Skaldskarpismal* written by

Snorri Sturlusson detail this in brief- possibly because such knowledge was no longer as common following the Conversion of Zone 2 to Christianity c. AD1000 (Andersson, 2008; Quinn, 2000). Hence, Sturlusson references not only the forms of verse via examples of earlier poetry but also lists names and mythological cross-references. Based on this apparent mythological base of the practice of oral history and poetry a few elements of a remembered religion can be discussed. This is utilized in the construction of not only the traditional view of Norse universe format but also the proposed view as well. The use of this remembered religion shall be discussed in Chapter 12.

The modern concept of early medieval Norse pagan religion is heavily impacted by the later medieval writers in Iceland (Quinn, 2000). During the pagan period, the structure of family present on the farm replicated the centrally focused universe structure noted from mythological references found primarily in medieval Norse poetry (Andren, 2007). In this view the longhouse central long hearth and its range of activities corresponds with Yggdrasil the world tree that forms the centre of the universe and upholds the levels of existence within its boughs. This format considers the fact that physical domestic rituals that occurred within the longhouse- the center of this social space utilization- would be incorporated within domestic deposits. This results in physical evidence of religion being indistinguishable from material of purely domestic activities. The location contributes to their effectiveness as a practice of non-Christian religion. This view is based upon a reorientation of the traditional format of the construction of the Norse pagan universe. This is illustrated in Figure 61.

According to these remembered sources the male head of family functioned as the male representative in rituals with designated females as priestesses. This format is

alluded to with some saga references as well as *Heimskringla* and *Voluspä*. It is important to question whether or not this is oral tradition contributing to the portrayal of pagan ritual reality or if this is the view of the authors. The medieval authors were most often Christian trained clerics, highlighting female involvement as being perverse in relation to religious *vitae* that contributed to the knowledge base utilized in saga creation or if this is actually another set of evidence from which a spectrum of possibilities is available and dependent upon the context of each text.

Aside from rarely found votive gods and Þórr's hammer amulets there is no range of artifacts on sites which can be attributed to a purely pagan religious function (Andren, 2007). Organic materials such as wood may have been used for this purpose however so an absence of evidence in this case may not actually indicate that no pagan ritual equipment was associated with Norse north Atlantic settlements (Schjodt, 2008). Contemporary Continental histories regarding Scandinavian home lands refer to sacrifices such as the references of Adam of Bremen related to the pagan practices at the Uppsala Temple (Lucas & McGovern, 2007). This ties into an early practice of sacrifice in association with ritual known from Germanic tribes of North-west Europe prior to the Viking Age. This practice is corroborated by accompanying burial goods and animals known from excavated burials found within Zone 1 and particularly in Zone 2 (Andren, 2007; Eldjarn & Fridriksson, 2000).

Of animals included within burial assemblages horses are the most common (Eldjarn & Fridriksson, 2000). The evidence is numerically dominant in Zone 2 in particular where horses are the most common recognized followed by dog. It is unknown from the available evidence whether these animals were included for religious or non-religious reasons. However, in mythological writings these are both animals associated with transition over boundaries (Lund, 2005). In mythological references

written down as orally transmitted folklore following the Conversion to Christianity the most famous mythological horse was Slepnir, the eight-legged steed of Oðinn (Quinn, 2000; Lindow, 2001). This horse had the ability to cross between the realms of the dead, the living, the gods and the chaotic lands of the giants. Horses also allude to another macroscale element of pagan religious practice: the importance of travel. Dogs, on the other hand, signal a transitional period within the extent texts. One of the most famous of these is Garm, the hound of Hel who swallows the moon at the onset of Ragnarök (Lindow, 2001). The practice of making transitional areas distinct is one known elsewhere archaeologically at places such as Jarlabanka's Bridge in Sweden, which mark the public gift of a bridge/walkway as well within the mythology (Lund, 2005).

Ships are another form of sacrifice known from pagan North Atlantic which are associated both with travel and the transition of boundaries. Boat burials involving the interment of water conveyance as well as votive boats outlined by stones around interments are known from Zone 1, Zone 2 as well as much more famously from the Scandinavian sites of Oseberg, Gokstad and Tune (Eldjarn & Fridriksson, 2000; Carter & Frasier, 1996). It appears to be a practice that was not brought to Norse Greenland by the initial settlers. Boat burials that involve actual boats are known from Scar, Pierowall and at Breckon Sands (Carter & Frasier, 1996; Owen & Dalland, 1994). These burials are always accompanied with other goods. They are located in prominent locations that have subsequently been damaged by erosion- a statement within the microscale landscape no longer immediately recognized. Within textual references boats and ships are often mentioned practically however episodes such as Þórr fishing for the Midgaard Serpent with the head of an ox show ships to be a viable means to transverse the chaos of the waves. In this view, ships represent enclaves of human order over the chaos. Men were preferred crew because of this

as women would not be able to control their inherently chaotic nature that would be potentially deadly in the environment. Order was required to undertake the long distance open water voyage necessary to maintain inter-Zonal networks. The best evidence for the necessity of order on board ship is known from the source *Konungsskuggsjá,* from the thirteenth century (Larson, 1917). This source is quite explicit in what to take on board, routes to take and even what to expect from each of the stops along the way. According to this, a single steersman was the leader and his choices held control over life and death of those on-board. Female gender roles are obscure concerning the religious concept of the ship and function primarily as a literary trope within texts that may be related to the biases of male Christian clerics involved in ethnohistorical data transmission.

11.3 Christian Religious Context of the North Atlantic

The religious men recognized by incoming Norse populations to the west were known as *'Papar'*. Toponyms, or place names, related to the *Papar* are found throughout Zones 1 and 2 in the North Atlantic Zone (Ahronson, 2007). This is best evidenced by *Pap*-names and the presence of other certain name elements in place names that have been included into a table for consideration, please refer to Figure 1. For instance in the Northern and Western Isles, as well as other sites around the British Isles, quite often have associated chapel sites or carved stones near sometimes quite good agricultural land (Ahronson, 2007; MacDonald, 2002). It is very important to remember in Zone 1 there was previous habitation prior to the Norse arrival. This consisted of not only the *Papar* but also Pictish populations who formed part of the Kingdom of Pictland based in Scotland (Knight, 2007 [unpublished]. Realistically this is the area of overlap between not only the "Atlantic Zone" of cultural influence and the "Scandinavian Zone" (Cunliffe, 2001) but also the

proposed "North Atlantic Zone" as well. By the location of the British Isles alone within this historical confluence, it is apparent that this would have been a quite dynamic region.

In the Faroe Islands, on the other hand, there are only two place names that have been associated with the *Papar* which are much more remotely located near the shear basalt cliffs that also hold the steep "Celtic fields" (Ahronson, 2007). The pre-Norse occupation of the Faroe Islands has been contested over time however, so these sites have formed a point of contention for many researchers in the past (Arge, 1991; Debes, 1995). Iceland has a handful of *Pap*-related names, although some of the exact locations have been lost over time (Ahronson, 2007; Ahronson, 2002). The majority of these are located on the northwestern and southeastern coast where some sagas cite land taking by Hiberno-Norse settlers (Ahronson, 2007; Ahronson, 2002; Sveinbjarnardottir, 2002). Like the Faroe Island sites the *Pap*-names in Iceland are somewhat contested due to the heavy reliance upon saga literature and references as historical fact (Fríðriksson, 1994). Zone 3 has no known *Pap*-related names, although it may have during the initial Norse occupation for which evidence has since been lost.

The extent archaeological evidence for the *Papar* in the North Atlantic represents a differential distribution much in the manner of the toponymic evidence discussed above. Around the British Isles, in particular we find evidence for contemporary existence of the *Papar* with both the Pictish and the Irish indigenous population that can cause some difficulty in differentiating the cultural groups (Knight, 2007 [unpublished]). In the Northern and Western Isles *Pap*-named sites often have associated chapels or carved stones but there remains little else on the ground (MacDonald, 2002). There is little in the remains of physical evidence that can be

undeniably attributed to the *Papar* as a cultural group, especially in an area that has another more widely known and better-attested contemporary occupation- the Picts (Knight, 2007 [unpublished]). At sites in the Irish Sea region such as on Iona, on Church Island in Co. Kerry and on the Dingle Peninsula of Ireland are located beehive cells known as *clochán.* These sites further point to the presence of an ascetic hermit population in the region (Fisher, 2002; Cunliffe, 2001).

In the Faroe Islands, there are no confirmed excavated constructions for the *Papar* unless the 'Celtic Field Theory' holds true. There are long standing debates in the history of Faroese archaeological research that are associated not only with proving, or disproving, the pre-Norse presence of Celtic ascetic priests but also in terms of the validity of the *Færeyinga Saga* as a historical resource (Arge, 1991; Debes, 1995). The modern form of the saga has undeniably been subject to the work of later editors as it did not exist in a collected work until the publication of Rafn's work in 1832 (Arge, 2005; 1991; Debes, 1995). Prior to this time the chapters of *Færeyinga Saga* existed as side stories and details found in several Icelandic sagas, including *Heimskringla*. In spite of this there are several sites which local tradition have associated with the Irish Sea priests in the past, although few have been confirmed with full excavation. The site of Bónhústoftin is considered by some to be the proof necessary, although Sandøy has been suspected in the past (Stummann Hansen & Sheehan, 2006).

In Iceland, there have been some crosses found in cave sites in the south, however, and sagas directly mention *Papar* leaving behind the tripartite trope of bells, books and crosiers (Sveinbjarnardottir, 2002; Ahronson, 2002). As in the Faroe Islands, these cave sites have spawned much debate over their validity, particularly as several of the Icelandic Sagas mention direct interaction between the *Landnám* population and the *Papar.* This is, however, merely another aspect of the history of

archaeological research in Iceland, where a heavy reliance upon saga-evidence existed well into the 1990s (Svanberg, 2003; Fríðriksson, 1994). With particular regard to the *Papar* related cave sites Ahrónson cites the crosses which were found within some of the sandstone caves as being proof positive of an early Christian ascetic presence on primarily stylistic considerations (2002). Sveinbjarnardóttir, on the other hand, highlights the location of the sites and their subsequent re-usage following the initial site occupation (2002). Aside from the cave sites found in Iceland the only other potential physical evidence for *Papar* presence in Zone 2 would have to reside in the material assemblages found during proper archaeological excavation. There is in certain cases an undeniable British influence to the ecclesiastical elements of the assemblages in publication, however this is far more likely to be in relation to the Hiberno-Norse portion of the *Landnám* population than the influence of hermitic monks (Helgason, et al., 2001). Zone 3 of the North Atlantic, Greenland and the New World, to date has no known *Pap*-name sites (Ahronson, 2007). In spite of this, some researchers link the *Papar* to Greenland at least, via chapel sites, in particular the contested chapel-site of Bónhústoftin in the Faroe Islands (Stummann Hansen & Sheehan, 2006). In this case, these sub-circular chapel sites are cited as being non-Norse, and hence by default *Papar* related, due to the format of the site itself (Stummann Hansen and Sheehan 2006). Not often highlighted in such comparisons are the local geological and drainage features or the effect of degrading turf block which degrading turf blocks might have (Stummann Hansen & Sheehan, 2006).

The Norse written evidence of the Papar, on the other hand, captures a view on place name origins and site relations that has been impacted by the context and location of each unique text. In general, as the majority of the sagas date from the twelfth or thirteenth century, they are subject to anachronistic inclusions concerning the past. There are three references to *Papar* that are particularly relevant for this

consideration. The two earlier references can be directly attributed to Ari Þorgilsson, noted early Icelandic historian, please see Table 8.

The later reference comes from a Norwegian source of the thirteenth century the *Historia Norwegiae*. MacDonald highlights the fact that there is a common source for all three sources (MacDonald, 2002, p. 19). This source is quite fantastic in its inclusion and so can only confirm a presence in the Scandinavian North Atlantic. For instance, the Northern and Western Isles needed explanations for the ruins of obvious chapel sites. In this region, there is also an added element of indigenous cultural memories concerning certain physical features of the landscape. Due to this are there is mention not only of the *Papar* but also the small-statured ground inhabiting Picts, referred to by *Peti*-related names in the landscape (Dumville, 2002). In the Faroe Islands and Iceland, however, the settlers themselves were not only from the Scandinavian homelands but also from the more recently settled lands in and around the British Isles and so as a result there may be added elements of cultural memories being applied to the landscape features of a *Papar*-linked world (Ahronson, 2007). Figure 63 illustrates a medieval Norse chapel dedicated to St Boniface which was founded on Papa Westray in Orkney. Figure 64 illustrates a hogback from the same site, implying a local statement of affiliation to a macroscale practice from further to the south. Figure 65 illustrates the known Papar site names.

The conversion from a naturally oriented kin-linked religion whose universal structure was replicated in the traditional longhouse to the medieval Christian Church resulted in a corresponding change within space utilization in the island landscapes of the North Atlantic. This process took place concurrently to the settlement of the north Atlantic Zones, the diversification and intensification of the northern European marine trade networks and the consolidation of political power

into medieval Kingdoms in Scandinavia. Although there is commonality in this import of Christian religion, how the conversion process occurred in practice was dependent upon the context of Zone identity and physical environment (Strombeck, 1997). The conversion was also important in terms of textual sources as well as the adoption of the Latin alphabet in Norse vernacular resulted in a script with which it was much easier to write complex ideas in the medium of books (Quinn, 2000).

By AD800 Norse settlement of Zone 1 had already begun to occur as part of the wider 'Viking' expansion during the early medieval period which resulted in male Scandinavians west, east and south of the their homelands. During this period not only were Christian missionaries being sent to the North to convert pagan populations but also those Scandinavians who ventured beyond their homelands came into contact with Christian populations. Zone 1 archipelagos in particular held indigenous Christians as well as a previously established system of religious architecture and cult foci such as the Brough of Birsay (Morris, 1995).

Many North Atlantic ecclesiastical sites are of turf wall construction, sometimes with a footing of stone and inner walls and roof architecture of wood, as were the contemporary secular buildings (Abrams, 2009; Strombeck, 1997). This is a reflection of the available building materials. When compared to sites such as St Columcille's Chapel at Beefan in County Donegal we do find some similarity of form with that of Bónhústoftin and Inoqquassaq (Stummann Hansen & Sheehan, 2006). This presents two levels of hierarchy concerning Christian burial placement- for the family who sponsored the construction and maintenance there would be little change in the location of burials from the more marginal areas of the farm. For the farm families who were members of this church, however, burials were removed from prominent

yet marginal areas in the landscape that were associated with the farm (Eldjarn & Fridriksson, 2000). The site of Bónhústoftin is illustrated in Figure 62.

As the inter-farm Christian network was established Christian burial practices of unaccompanied interments in a consecrated cemetery, a religious focus was adopted. This process involved not only the newly dead following the AD1000 conversion to Christianity but also the translation and re-internment of familial ancestors to maintain familial continuity in place of burial (Eldjarn & Fridriksson, 2000). Zone 2 textual evidence provides several levels of insight into the local impact of the conversion to Christianity. These later medieval sources highlight that many settlers and slaves who were included in such works arrived in unsettled Iceland as Christians already, particularly those from Zone 1 archipelagos (Gronlie, 2006). The sources also detail a conversion that was only secondarily religious in strategy to establish Iceland were firmly within the international networks of trade-based economics and power of contemporary Europe (Bagge, 2010).

11.4 Christianity in the North Atlantic

Christianity became both assimilated and acculturated in the north Atlantic over a relatively rapid period in relation to the Late Antique conversion of southern Europe. By the time, that Christianity began to make a serious impact at the political macroscale in northwestern Europe it was already well established in Southern Europe and the Mediterranean region. The build-up of capital and human resources had already occurred at this point in these regions. In the Scandinavian medieval kingdoms, the upper echelons of macroscale society have adopted Christianity partially due to the inherent reinforcement of the divine right of Christian kings such as developed in medieval England and France (Derry, 1979; Sawyer & Sawyer, 2003). This process allowed a missionary element to be developed and maintained. In this

view pagan Scandinavia represented the closest pagan "wild" in relation to the relative Christian safety of the southern European Continent in the late ninth and tenth centuries (Solli, 1996). This is the process of the establishment of Church rights as Continental archbishoprics were able to establish spiritual affiliation over wider areas via the conversion efforts of their missionaries (Graslund, 1987). There are only a few directly associated with early Conversion efforts in the north Atlantic. During the ninth through eleventh centuries, conversion efforts began to occur internally within Scandinavia, centering on converted elites and their familial and client affiliates (Solli, 1996). A series of homegrown saints became recognized not only by the Roman Church but also by the lucrative medieval pilgrim network (Antonsson, 2007).

Archaeologically the onset of this process is difficult to determine, highlighting several aspects of this macroscale identity vector. The first, and perhaps most, importantly, the Conversion in religious outlook was a change in theological philosophy- religious thought including the shape of the Universe and humanity's place within it. The method of transmission from learned Christians to heathen populations was initially verbal and created no physical evidence. These events are sometimes remembered as episodes retained within regional oral histories and later remembered strategically within written texts. An example of this is *Krístní saga*, which documents the Conversion process in Zone 2 (Gronlie, 2006). Wide-spread literacy follows Conversion in the North-Atlantic (Quinn, 2000). The people who provided the means of transmission of these incoming microscale concepts were transported via open water ships. Whether this is the only job which these idea-bearers performed on board or is they were performing other tasks as well is a question unable to be answered by the existent evidence. Performing tasks on board would be more efficient than being a passenger. Physical evidence for Conversion

does not become visible of population levels until the adoption of Christianity as part of a wider north Atlantic community statement of identity linked status as well as a statement of personal piety. This is linked with a strengthening of pagan burial traditions in comparison to earlier periods which is eventually superseded by unaccompanied oriented burials (Eldjarn & Fridriksson, 2000).

Shortly following the conversion to Christianity by Zone 2, the Norse discovery and settlement of Greenland began. Both *Graenlendinga Saga* and *Eiríkssaga Rauða* to Eirik's Christian wife with holding her sexual favors from her pagan husband until he had a chapel constructed on the new farm site (Sveinsson & Þórðarson, 1935). There is some debate as to the exact location of this well-documented chapel, although it is accepted that it was on the Eirikssfjord of southern modern Greenland (Arneborg, 2003; Guldager, et al., 2002). Qassiarsuk has long been seen as the site of the Brattahlíð home farm begun by Eirik the Red. Indeed this is the location of not only an early medieval turf chapel, two Norse farms, a late Norse cathedral dedicated to St Nicholas and the modern reconstruction of a Norse longhouse and chapel but also a series of seventeenth and eighteenth century Thule winter houses (Norlund, 1936). Qassiarsuk is illustrated in Figure 66. The second proposed site is less well known at Qinngua. This site corresponds with textual descriptions to a higher degree (Guldager, et al., 2002). This same group of surveyors promote the presence of a distinct round form of turf built chapels attributed to Irish ascetic priests across the north Atlantic- examples being from Bónhústoftin, and an as of yet undisclosed southern Greenlandic location (Stummann Hansen, 2009: personal comment). No full modern excavation has been conducted on any of these sites to either confirm or deny this association (Stummann Hansen & Sheehan, 2006; Guldager, et al., 2002). Another location which is unexcavated in spite of several indication of continued utilization is Kirkjubøur, illustrated in Figure 67.

The physical evidence provided by chapel locations in Greenland illustrates that chapels were integrated within the inter-farm networks present on the marginal Zone 3 landscape (Abrams, 2009). The majority of these localized chapels were constructed of turf with a front wall of wood- the same materials utilized within a Zone 3 longhouse and outbuilding construction. The front wall of wood made for a distinct building in relation to its secular neighbors. Chapels were surrounded by a round or sub-rectangular wall of turf and earthworks (Guldager, et al., 2002).

Burials have been traditionally seen as the most immediately recognizable evidence for this transitional period however, there are many difficulties in utilizing this material due to unanswerable questions concerning the reasoning of body placement, following certain funerary rites and respecting the dead. In zone I, earliest Norse burials were affiliated with farm mounds and prominent rises in the landscape. As the pagan population converted, we begin to find evidence for interments placed within the boundaries of medieval church cemeteries such as at Yviri I Troð in the Faroes. Unlike the earlier pagan familial cemeteries as known from Pierowall in Orkney and Breckon Sands in Shetland, these interments contain only those goods attached to clothing while the bodies themselves are oriented around a church yard focus.

11.5 Social Aspects of religion

Conversion to Christianity began the process of removing familial immediacy present in the pagan religious practice as the Church via local representatives became integrated into the north Atlantic settlements. These representatives mediated contact with spiritual maintenance via use of local liturgical equipment and the local mass. This provided standardization concerning incoming ritual practice as

Christianity, in essence, had a far wider reaching 'familial' network to draw upon than the numerically smaller kin oriented practices which were replaced.

The shift to an externally focused Christian network is facilitated by the Christian "family" of the medieval Church (Solli, 1996). This pyramid of power became reflected in the structure of political power in the secular kingdoms of northwest Europe (Bagge, 2010). In the more environmentally marginal north Atlantic region the majority of local islandscapes were not conducive to the development of kingdoms in the European sense due to a lack of supply to support a larger population including those who did not work the land or tend animals directly to earn their way within the local economic networks.

Christianity became the means to connect to the wider known European world on a spiritual macroscale level. This adoption was an effort to reduce the insular nature island life induces and was conducted in terms of becoming part of a larger family. This transcended worldly constraints and borders. It also suggests that religion- the act of having it- was included within the medieval north Atlantic populations' familial *habitus* during the Conversion period. By adopting the Christian concept of patriarchal power on Earth and in Heaven, an already culturally familiar internal network of extended kin was maintained and potentially extended. The European kingdoms paid for the initial missionary efforts officially as a part of a proto-colonization effort in which there was no initial official sanction to the onset of settlement in order to assist in the collection of church dues and payment in kind of raw materials (Bagge, 2010; Sawyer & Sawyer, 2003). This was an economic choice on the parts of the political powers of Norway and Denmark, one concerning the economics of the spirit.

Christianity supported the consolidation of power that mediated access to God via control of the sacrament. This provided a widespread and increasingly international system of legitimacy that is closely linked to inheritance not only in the north Atlantic settlements but in Continental Europe as well. In this new system, God, via His representatives, made births, deaths and marriages legitimate and thus subject to the benefits of the local law. This replaced the earlier process of public acknowledgement via family heads and the local community. The Conversion allowed the North Atlantic populations to be able to prove their legal identity to the wider world while simultaneously belonging to a much larger extended kin group.

The widespread Conversion to Christianity reflected the consolidation of local socio-political power occurring during the early medieval period across the North Atlantic Zones (Bagge, 2010). The personal power of the family head became one more firmly socio-economic in nature although physical expression of this was not restricted from ecclesiastical constructions and foundations. These were social obligation gifts to the wider public (Mauss, 2000). A family which was able to afford to maintain a priest to say the Mass and perform sacraments for a community, the liturgical equipment and a devoted location is one who's farm(s) and economic choices are sound or at least is well connected by socio-political networks, for instance the medieval Scandinavian kingdoms. As in North-West Europe, the North Atlantic Church became co-dependent upon existent social hierarchy in this fashion. As time passed, Church representatives were gifted with lands both by parishioners and by their own extended kin. This allowed the Church to be established not only physically and functionally as well when Church farms became established. These farms were top farms- social obligation gifts to God via the mediation of the Church. An example from Zone 1 is Kirkjubøur on Streymoy, shown in Figure 67. Examples

from Zone 2 include the Episcopal seats of Skáholt and Holar. Examples from Zone 3 include the Episcopal farm at Garðr, modern Igaliku, shown in Figures 68, 69 and 70.

11.6 Discussion

The relatively brief period was incredibly changeable on a variety of levels thus creating the preconditions not only for the reinforcement of traditional and new practices of identity. This is most evident from burial evidence that is numerically abundant in Zone 2 as well as a similar process in literature production, which is also best represented in Zone 2. Because of this only Zone 2 is truly able to be considered and as a result has been heavily relied upon as source material regarding the Conversion process across not only the north Atlantic region but Scandinavia as well (Strombeck, 1997). Burial evidence becomes more distinctly pagan or Christian in nature during the period immediately preceding and following the official Conversion of Iceland (Eldjarn & Fridriksson, 2000).

The process as evidenced by literary material is linked to the oral history and folklore of a society first being written down when the new medium arrives (Quinn, 2000). This process was first seen locally as a means of continuing memory of events and practices that were being lost via the transition from traditional pagan practices such as accompanied interments to the incoming ideas and practices of the medieval Christian Church (Solli, 1996). At least in Zone 2 this evidence highlights the presence of populations who were aware of this process of change and importantly were active participants within this exchange of ideas. These populations utilized the Conversion process being officially offered from Episcopal seats in Continental European kingdoms to reinforce macroscale concepts of identities within this medieval international milieu. As texts were created within the newly converted North Atlantic Zones heirlooms of local oral history and remembered 'traditional'

pagan practice were embedded within (Quinn, 2000). This fusion of traditional and Christian elements was desirable to medieval Scandinavian kingdoms in particular and it is unsurprising that North Atlantic poets were desired at Court (Quinn, 2000). This luxury export of Zone 1 and Zone 2 was externally recognized and utilized as a tie to the period prior to kingdom consolidation when practices of gift exchange and adoration of leaders via battle prowess and generosity as a means of establishing and maintaining power with the chieftainship network of the Late Antique and Early Viking Age circa AD0-1000 (Mauss, 2000).

Chapter 12 Building and Maintaining Identities in the North Atlantic- a material perspective

12.1 Introduction

This chapter attempts to bring together the thoughts on North Atlantic identity development and maintenance during the Norse medieval period. It begins with consideration of the contexts present at onset of settlement. It then moves on to consider the potential drivers that may have contributed to the migration and how that influenced identity practice via the prioritization of cargos sent from Scandinavia westwards. It compares the domestic practice evidence of microscale identity from all Atlantic Zones and subsequently comments upon the overarching networks of trade and common religion in light of the impact this wider context has upon macroscale identity construction and maintenance. It goes on to critique the use of comparative identity methodology and its capability to clarify homogeneous archaeological assemblages in the north Atlantic.

12.2 Identity and the Preconditions for Norse Expansion West

Unless fleeing persecution and bodily harm no major move such as that undertaken by North Atlantic settling populations is undertaken by humans unless some degree of success is guaranteed at both microscale- survival- and macroscale- network- success. This is evidenced via the variety of priorities evidenced in settling, and subsequent trade, voyages. There is no singular cause of settlement in the North Atlantic but rather a collection of preconditions that are evidenced by their subsequent responses. This includes climatic optimal which occurred during the Medieval period resulted in calmer seas with less dangerous sea ice being present on the ocean currents providing much of

the trade routes across the North Atlantic(Bill, 2010). Because of this, more socially peripheral and climatically marginal regions such as Zone 3 and northern Zone 2 were able to be accessed directly by sailing vessels and land on beaches such as that illustrated in Figure 71. Another impact of the Medieval Optimal is the effect upon the long distance migration routes of sub-arctic and Arctic species such as the North Atlantic walrus(Ogilvie, et al., 2009).

Socio-political pressures linked to the contemporary consolidation of north-western European chieftainships into medieval kingdoms such as Denmark and Norway as well as principalities such as Orkney(Sigurdsson, 2007; Bagge, 2010). This is anachronistically cited in later medieval textual sources however, the increasing social and political intrigue may have provided some driver towards migration(Seibert, 2008). Population pressures have been casually linked in the past; however, there is little evidence for this archaeologically in the North Atlantic. Was there a desire for freedom of a group from the context of the Scandinavian world? The reality of this situation is difficult to discuss. Again- this is anachronistically alluded to in thirteenth century Icelandic sources. Internal and external group elements found in this system are illustrated in Table I.

The concurrent Conversion process is also important to consider as a majority vector. This process began due to efforts from the South with missionary efforts being staged from England and Germany. Economics became tied in as well as acceptance of the Sign of the Cross became a prerequisite for medieval trade in north-western Europe. The power structures of medieval European kingdoms were supported by ideas found within Christian doctrine and Church practice. Christianity applied the kin-based format known to the North on an international scale- hence it was acceptable to most of the

population. Those people who were unable to cope with the change were able to retreat west becoming effectively beyond the law of the wider population and maintained their preferred pagan practices. For these groups individuals rather than national bodies dictated local religious practice. Pagan religion was kin-linked with the locus of activity being local and reinforcing social hierarchy. Kin-units ran farms and only consolidated power after some negotiation. The same kin-units established the networks of exchange and maintained them as long as it was convenient to the wider family unit. Once the local power at the periphery of the North Atlantic consolidated it began to exert power over access to the kin-originated international trade networks. This process in turn reinforced the power of the core over the network. Hence the maintenance of medieval Scandinavian kingdoms was possible in part due to this process. The local networks became associated with maintaining their part in the international bulk trade.

12.3 North Atlantic Identity Development

Early in the period identity can be visualized as having these key components which are used to answer specific needs identification inside. This is illustrated by Figure N. All of these components are impacted by spatial and temporal element of the contextual environment. When considered together this results in the fluidity and spectrum of identities present on site and the wider network. This is how people were able to identify themselves during the medieval period- by who they were, what they did and what they had the potential to do.

Distinct preservation of previous identity is made initially in regions with prior inhabitants. This is best evidenced by the placement of Norse farms and burials in relation to older settlements and prominent places in Shetland and Orkney. In these

Time Frame	Overt expression of identity evidenced by existing material	Orientation of local population	Why?	Continental Context	How do we know?
Settlement AD800- 950	No. There is not much new identity although the subconscious and conscious expression of previously held group European identity, however.	Inward- kin and affine	Practicality as establishing farms in new areas	Continental kingdoms solidifying, while in Scandinavia this process occurred concurrently with conversion to Christianity. As a result random violent acts present at the beginning of the period increasingly no longer having a place in society. Hence some horror associated with initial Zone 1 movements.	Archaeology, contemporary history, oral history and poetry later textualized
Conversion AD950- 1050	In regards to religious identity yes as burials which are accompanied are better represented for this period- the last vestiges of a familial statement of religion. Also the first statements of new familial religion as Christianity is adopted	Inward however Christianity creates the context for this to change.	Kin and affine alike struggle to establish local hierarchies.	Medieval kingdoms- diversification and development of bulk trade networks which are at times politically maintained by violence. This directly impacts trade networks.	Archaeology, contemporary history, oral history and poetry later textualized
Free State AD1050-1150	Yes, as influences of the continent increases this becomes more important to establish a foreign other yet when convenient economically, socially and politically claiming Continental ties.	Inward and outward as there is a diversification of place such as island groups being recognized as distinct populations.	Local hierarchies interact in power negotiations politically and socially while economically this occurs with some diversification as this is a further method of establishing a place in the world.	Increasing influence of the Continent in social and political networks of the North Atlantic. This is essentially the control of a guaranteed market.	Archaeology, contemporary history, of emic and etic nature oral history and poetry later textualized
Sturlung Period AD1150-1264	Yes, as the continental domination of the network is achieved this becomes more important to establish a foreign other yet when convenient economically, socially and politically claiming Continental ties.	Outward projection of a remembered national past which is important to establish. This is increasingly important following AD1264.	The previous context results in fewer and fewer elite families who have greater power. This is done in socially acceptable ways of the Continent.	Increasing influence of the Continent in social and political networks of the North Atlantic. This is essentially the control of a guaranteed market.	Diversification of archaeological and textual evidence

Table G North Atlantic identity orientation in context.

areas not only were soils more suitable for agriculture present but also networks of exploitation were already established including wild species collection, social hierarchy and trade. This does not occur in the Faroe Islands or Zone 2 until the eleventh and twelfth centuries due to increased North Atlantic presence politically, socially and economically within Scandinavian networks and vice versa. The settlers trying to establish themselves are promoting no new identity. The importance of maintaining common family connections and practices is maintained- good examples of this exist as burial evidence from throughout the region. In Zone 2 in particular the amount of available burials shows practices present in both Scandinavia as well as in Zone 1. This hints at some attempts to maintain a family identity that was emic in nature. This does not necessarily imply a strictly Scandinavian identity, however. This is expressed by farm inheritance. These farm sites were being chosen because they were seemingly familiar to areas known elsewhere in the settler's life experience. These were areas where the methods of construction, land exploitation and the diversity of farm economic scheme would be more likely to work. Hence, this would be a reduction of the risk inherent to moving to foreign areas. Oral histories later recorded rely on use of these connections as the means of information referencing in medievally collected sources(Quinn, 2000).

At the beginning of the settlement process trading in northwestern Europe was dominated by exotic luxuries which were low in bulk. This allowed traders to integrate themselves as middlemen within sociopolitical networks of power and prestige on a scale that was larger than that of their immediate locale. Settlement may have been initiated to find new resource areas for markets in medieval Europe. The best-known example of this is walrus ivory(Roesdahl, 2005). Following the twilight and fall of the Western Roman Empire the trade networks that had brought elephant ivory to northern

European artisans failed, creating a void and unfulfilled need(Keller, 2010). This supply was met from the sixth through the eleventh centuries by another source of ivory- walrus tusk.

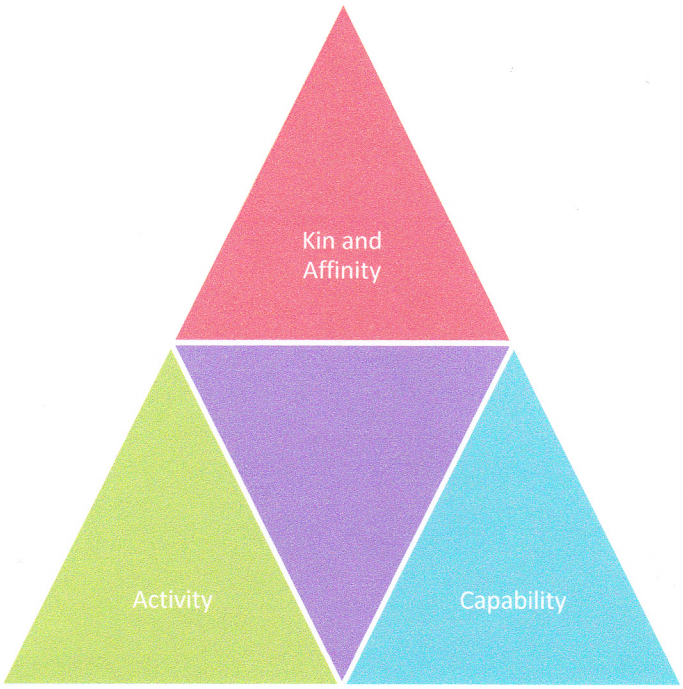


Figure O Components of identity circa the ninth and tenth centuries.

Walrus are found in sub-arctic and arctic areas where they spend much of their existence feeding on molluscs and sunning on pack ice. They have not existed in Continental European waters for millennia. However, the northern most coasts of Norway, the White Sea and Svalbard all maintained walrus breeding populations. The hunting techniques that procured the animals were parts of a male habitus due to the inherent risk. The exploitation of populations in the White Sea region is known from contemporary text sources as well such as the account of Ohthere made in the court of Alfred the Great(Roesdahl, 2010). Walrus evidence has been found amongst early Zone 2 assemblages such as at Aðalstræti(Sverrisdottir, 2006). Walrus evidence is also known from several Zone 3 sites, most spectacularly arranged at Igaliku (McGovern, 1980). This

was able to be collected as a by-product of subsistence hunting as well as via intensified specialized hunting to supply ivory needs at a higher profit. Once reliable trade was re-established with Africa elephant ivory returned to the European market. As elephant ivory is more desirable to carve than walrus tusk due to size and the thickness of the enamel layer to the tooth, the demand for walrus ivory declined(Roesdahl, 2010; Dugmore, et al., 2007). Associated with this economically driven need to expand resource networks may have been one driven by human curiosity and fuelled by knowledge of earlier voyages later remembered as being affiliated with early medieval priests from the Irish Sea and North Sea Region(MacDonald, 2002). By exploring lands further west, new resource regions could be claimed and existing trade networks could be infiltrated.

Archaeologically the North Atlantic can be placed economically and to a certain extent even ideologically in the medieval world. This is not without some difficultly however as site assemblages across the region are notoriously homogenous in nature. This is due to a variety of reasons. The geologic basement rocks of these island archipelagos have created some diversification to what types of economy supported the farms. There are also influences on the types of plants available as well. This includes latitude-linked temperatures, the maritime effects of salinity and the types of trees and woody-stemmed plants.

Another influence of homogenous site assemblages in the North Atlantic is long distance economic exchange. The presence of trade goods both mediated and heavily skewed the availability of regional specialization evidence concerning identity. Trade goods in this period were chosen due to market need and demand. They ranged from food stuffs-

grain, spices and animal stock- to woollen textiles to animal by-products such as walrus-skin rope. Trade goods may have also included information as well. The evidence of exchange comes from the presence of exotic material within both north Atlantic and Continental medieval archaeological assemblages. For this region domesticated animals, grain and current fashions of culture and thought would have been exotic imports. Exports appear as desired exotics but also as incredibly practical textiles. The amount of available evidence is linked to preservation- the inorganic elements of trade cargos exchanged into farm unit networks over time are what survived. Market demand may have also later suppressed a variety of organic material production. Organic goods such as textiles may well have been an example of regional specialization linked to the visual expression of identity in the North Atlantic. The process of diversification is prolonged with the physical evidence because of the distances that had to be travelled between the archipelagos. In spite of this maintenance of identity via trade became a specialized maritime assisted activity due to the environmental pressures in a similar fashion to the Thule Inuit populations which began to migrate into Zone 3 during the eleventh century.

Socially only Zone 2 is able to be discussed both in terms of what was practiced internally in conjunction with external presentations of practice, and even then only in an detail subsequent to the Settlement period. This is due to the wealth of literary evidence that survives in Iceland and in Scandinavian libraries(Svanberg, 2003). Sources such as these were utilized to provide a historically linked social context for several excavated sites in Zone 2, in a nationalistic writing or archaeological history(Fríðriksson, 1994; Svanberg, 2003). By utilizing Zone 2 material this expression of identity can be compared in relation to the rest of medieval European identities being concurrently expressed.

The international trade in the Early Middle Ages focused on portable luxury goods which were exotic in origin. This type of good is easily utilized within networks of gift exchange. By exchanging such items an individual's trader and middle-man identity in both the local and the international network was maintained and potentially built higher. This network integrated several drivers of North Atlantic life and identity- economic, political and social- and allowed physical goods to effect the non-physical medieval social hierarchy.

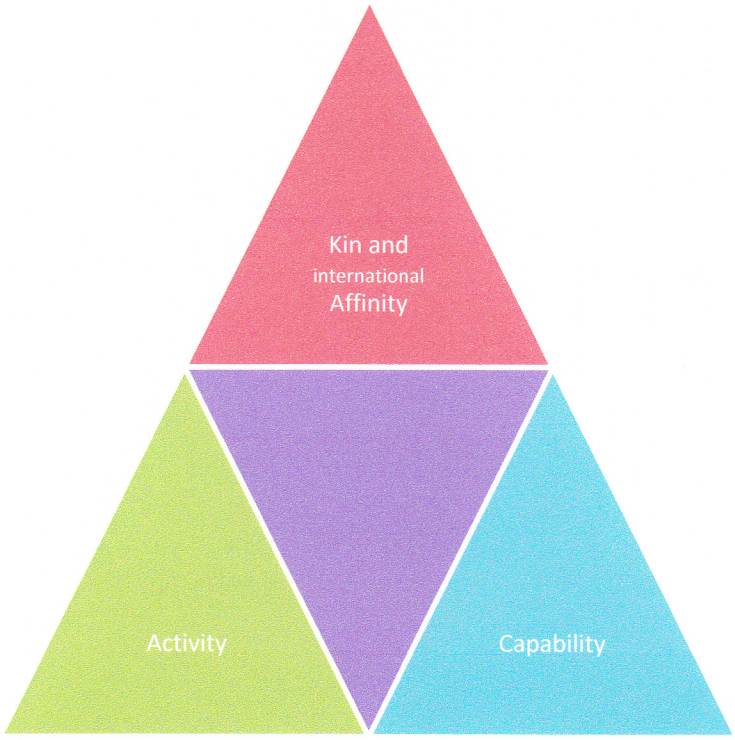


Figure P Components of identity circa eleventh century.

However, this begins to change during the 11th century with kin and affiliation in particular changing overtime as national groups established themselves over the network. This process can be viewed in Figure O. This process is best known and discussed relationship consolidation of the continent kingdoms. It begins early with proto-emporia establishing in the North Sea region. Power was exerted by local magnates who control over trading locations. It was negotiated to trade in social gift

exchange. The international trade of the later Middle Ages focused on high bulk goods where a trader's money was made by the sale of a full cargo. Ships were larger and more costly to run however the potential economic gain was much higher. Market demand shifted from small luxuries for use within gift exchange networks to being more dominated by bulk goods such as grain. This was possible due to changes in ship technology which were costly in terms of enacting. For the north Atlantic settlements, particularly that furthest west, extended networks based on siblings and cousins formed a means of entering the increasingly nationally dominated networks. Instead of fleets, ships were able to set sail on a much smaller scale while still interacting with the wider international medieval market of continental Europe. This type of voyage is costly but has a high potential gain for the financial backer of the voyage. Because of this, this type of shipping is increasingly associated with national sized bank rolls, international trading groups and the Church. Later networks became associated with maintaining their part in the international bulk trade.

The final stage of the effect this process had on north Atlantic identity is illustrated in Figure P. By this point national influences are exerted on the extended network taking dominance over kin and affine networks. This is maintained by economic service experience. Once the national bodies make policy decisions over international trade the heavy kin influence which maintained the earlier network is obsolete.

There are broad generalities in domestic site interactions. Common sites were initially chosen which reflect the practical elements of living on an island. Certain jobs are affiliated with a farm unit and the basic necessities of human and beast- everyone needs to eat and shelter is necessary in the North Atlantic region much of the year. Feed for

both needed to be collected and prepared. Fuel needed to be collected. Building construction and maintenance had to occur and fencing where needed. Animals needed access to food and water via seasonal movement through the local landscape. In harsh winters, animals would need to be over-wintered in shelter. Assistance or intervention is necessary during some births(Oma, 2010). These are distinctly terrestrially oriented aspects of social practice for the North Atlantic populations. Finally, any over abundance of product that could be spared from the long-term stores required for subsistence was exchanged for goods not locally available.

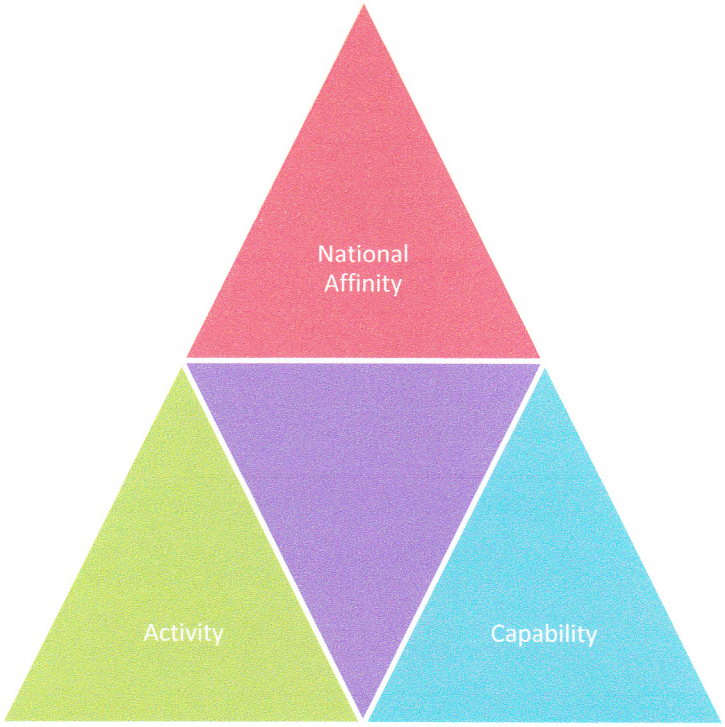


Figure Q Components of identity circa twelfth and thirteenth centuries.

The impact of considering material at this level is linked to the fact that most often internal local evidence is displayed on site and hence has no context for modern study. This is dominated by practicalities because of the marginal environment. The annual cycle of diurnal extremes somewhat mediates this. Also important to consider is the fact

amongst a local population overt expression of identity may not have been necessary as their family on the farm units knew individuals and the animals did not care.

The case study of Zone 1 represented by Shetland and the Faroe Islands shows several commonalities to site usage in comparison to Orkney and the Hebrides. This is expressed in the format of longhouses as well as similarities in an animal and land exploitation scheme(Stummann Hansen, 1996). Similar trajectory and placement in economic networks occurred concerning Scandinavia and North Atlantic interactions. The major difference comes in the presence of inhabitants, their religion and the continued utilization of sites. In the Faroe Islands, the populations were establishing themselves in a less known and exploited environment. Shetland, on the other hand, had previously established networks and regional affiliations. There has been a skewing of physical evidence concerning the overt expression of identity that is linked to the nature of preservation, as discussed in Chapters 4 and 5. The Later Norse constructions utilized more durable stone in their constructions that is linked to practical adaptations to the local environment as well as the height of island prosperity. Intensive modern archaeological survey has been undertaken on Unst has shown that a variety of constructions and a social hierarchy of sites constructed of turf exist(Stummann Hansen & Waugh, 1998). Some of this is linked to the subsequent history of the region from the medieval period- some areas were abandoned prior to the adaptation of modern farming techniques such as deep ploughing. The subconscious practice of a *habitus* in the form of farm networks occur which is evidenced along Scandinavian coasts and affiliated islands.

The case study of Zone 2, Iceland, shows broad regional generalities in site utilization. Iceland is by far the most intensively studied of the North Atlantic archipelagos due to the quality of its oral traditions and literature. In fact this skill became a viable export to Europe for a time. The Western Quarter of Iceland, in contrast to the Southern Quarter, is both more extensively settled and more extensively studied than other parts of Zone 2. This is linked to both geologic structure of the landscape as well as the presence of sheltered bays that were rich in littoral species like walrus and auk. These species exploited the same oceanic currents the medieval North Atlantic populations travelled on.

As with Zone 1, overt expression of identity is difficult to ascertain due to the practicalities of life in a largely unsettled region. Upon death the deceased's family, or affiliates, had the option of presenting elements of identity via funerary activities and burial deposits. Affiliations present accompanied burials sometimes allude to a previous family identity via the inclusion of heirlooms. As time passed and the Zone became firmly established within North Atlantic economic networks identity display became more important. This was done not only to express placement within local hierarchy displayed at gatherings such as at assemblies and the Alþing. As familial ties back to Scandinavia were stretched by time while concurrently economic ties were maintained it became more important to establish an outwardly recognized identity. This was linked to the change in the orientation of the population.

The case study of Zone 3, the Eastern Settlement of Greenland and L'Anse aux Meadows, shows generalities in domestic site utilization as well in comparison to the Western Settlement. In the marginal environment of Zone 3, a working farm was a farm that

continued to exist- to feed its humans and livestock and to survive winter(McGovern, et al., 2007). The format of the sites highlights the need of insulation in the thickness of the turf walls. Animals were brought into houses to both protect them and to provide a source of heat that did not require a separate source of fuel. They also highlight the greater need to manage stock in these areas in extended saeter networks(Albrethsen & Keller, 1986). Zone 3 more than other Zones was subject to the effect of timing in the most marginal of areas- in terms of religion, economy, and identity.

12.4 Macroscale External Vectors

The basis of the kin-linked farm unit is tied to the previous identity and familial *habitus* expressed prior to settlement. External vectors to this domestic system include trade and economics- the means of maintaining ties between Scandinavia and the North Atlantic. Another vector that was internally replicated yet externally derived in relation to this region was religion. Pagan religion formed a portion of the original *habitus* of settlers to Zone 1 and Zone 2. Christianity, on the other hand, was not only part of Zone 2 and Zone 3 *habitus* but was also part of the wider conversion process of Europe.

Each of the three vectors correspondingly answers identifying questions for the individual and wider group. This is illustrated in Table N. The early settlers of the North Atlantic experienced a shift in how they were able to establish the credibility and hence identity in the Western European system. North Atlantic populations described their claims over their new lands by expressing the local establishment history in contemporary accepted terms in relation to the Continental European network. At this time activity and capability established individuals as well as groups with affiliation being less important and more directly related to bloodlines. As time passed affiliation became

the important catalyst in this extended system providing opportunity to apply capabilities and directed activity. An example of this is the increasing amount of pressure placed on Iceland and Greenland by the medieval kingdom of Norway and the Archbishopric of Trondheim/Nidaros.

Marine technology became well adapted to exploration voyages during the seventh and eighth centuries(Farr, 2006). Its use became further integrated into the coastal northern European habitus in practice. There are several which are relevant to the North Atlantic. Clinker construction created a hull that was flexible, strong and shallow drafted in comparison to the amount and cargo potential(Bill, 2010). This was ideal for extended open water voyages that ended by laying the ship over on land to off load cargo. Another development in marine technology important to the settlement of the North Atlantic during the medieval period was the adoption of the sail as a means of propulsion(Cooke, et al., 2002). A rowing crew and their provisions had previously taken this freed space onboard. Efficiency in travel choice is diagrammed in Figure 72. The final important development was the utilization of the *knórr* format that has been discussed previously. This vessel represented long distance travel but not always to foreign lands.

The medieval kingdom of Norway was ultimately able to use the familial ties of high status families to take control of the north Atlantic network. With Zone 1 in particular the line of the jarls of More in the more prosperous lands of southern Norway became linked by descent to the Isle lords of Orkney and the Inner Hebrides. This connection was also stressed in Zone 2 textual sources via a collateral line as a reason for contemporary medieval success within the north Atlantic economic network. The spiritual care over the

western-most portions of the network were also maintained by Norwegian bodies- the Archbishopric of Nidaros/Trondheim.

Medieval identity is expressed as negotiations and choices existing between localized individuals who function in extended networks of exchange. At its earliest stages identity was still incredibly fluid responding to the context of social needs of the individual and group in accordance Practice Theory. In the North Atlantic this is reflected by a lack of identity specific evidence within the first generation population of immigrants. Choices to reduce risk here were those associated with subsistence. This prioritizes an identity based upon life and its maintenance. The methods utilized to exploit the environment are reflections of the more commonly held North Atlantic habitus of the medieval period. This is expressed in settlement locations and species excluded which are considered viable as well as who was considered to belong in the extended family network.

Another reason why North Atlantic networks developed may be linked to the desire to gain social prestige in relation to Scandinavian and European socio-political hierarchies. Evidence from Zone 1 shows that these hierarchies did not necessarily have to be previously affiliated Scandinavian networks themselves. Hierarchical interaction is illustrated in Figure 74. There were changing social priorities as early on movements that were sometimes violent expanded into already inhabited areas brought an influx of luxury wealth to Scandinavian social networks. Once available these goods were utilized in gift exchange interactions that established and maintained relationships dependent upon social obligation. Concurrent to this process raiding and harrying was also increasingly not acceptable for long term economic interactions with a largely Christian

Europe, although it too had its merits in a similar fashion to collecting coup. If long-term economic stability and potential prosperity were to occur for northern populations, it would have to be via another route, both literally and figuratively. The social merit once associated with more violent acquisition of high value goods- a risky venture- become associated with long distance trade- another risky venture.

Socially only Zone 2 is able to be discussed both in terms of what was practiced internally in conjunction with external presentations of practice, and even then only in an detail subsequent to the Settlement period. This is due to the wealth of literary evidence that survives in Iceland and in Scandinavian libraries(Svanberg, 2003). Sources such as these were utilized to provide a historically linked social context for several excavated sites in Zone 2, in a nationalistic writing or archaeological history(Fríðriksson, 1994; Svanberg, 2003). By utilizing Zone 2 material this expression of identity can be compared in relation to the rest of medieval European identities being concurrently expressed.

This status quo maintained until the wider economic and social context of North Atlantic began to change with consolidation of the Scandinavian kingdoms and further development of medieval European economic markets. This process began to occur prior to the onset of the Viking Age. This shift parallels the adoption of Christianity by the Northern European population. Trade, as discussed previously, takes the place of the more violent warrior elite concept. This process is facilitated by the contemporary European context- socially warring factions increasingly had no place. The position of the medieval Catholic Church which strengthened subsequent to the 11th century also contributed to this shift. The bodily risk affiliated with long-distance maritime trade

began to be acknowledged in the same manner as the bodily risk associated with the earlier violence.

Any one, or combination, of these drivers may have potentially provided impetus to leave Scandinavia for the more sparsely settled resource rich west. This is an internal view from the perspective of a prioritization of choices can be made. A maritime priority is evident because of the location- islands are affected by the medium surrounding it. The priority is indirectly expressed by the vessel, route, crew and pilot. A terrestrial priority is also expressed. This is accomplished by packing cargos which facilitated the exploitation of little known areas. This includes the farm unit elements needed to fully translate a farming system, a land and animal exploitation scheme of tools, livestock, land choice, timing and ideas on how to use it all.

The process of settlement- translation of identity via population migration- can also be considered in terms of orientation of microscale voyages between the origin point and north Atlantic Zones that would necessitate the practice of marine oriented identity the terrestrial needs of the domesticated species had to be heavily considered and potentially manipulated. This necessitated the practice of terrestrial oriented aspects of identity in order to reduce the risk to stock while reducing the amount of time needed to establish stock post voyage once the farm unit began to be settled. For instance, males were potentially shipped while young so as to be easier to handle on board for the longest amount of time and were thus a reduction of risk to ship. Neutered males would not benefit the establishment of farms subsequent to arrival and hence were less likely to have been brought save as a food source. In order to be at a young age during the time of voyage the pregnancies of mothers would have needed to be timed. This

ensures smaller animals that are easier to manage, requiring less feed per animal. Thus more animals or a greater amount of non-living cargo could be sent on a voyage. Less male animals would have been brought as mammalian domesticated livestock species are herd animals- monogamous male/female relations are not required in order to provide offspring.

There are two options for shipping female livestock. The first is young, as potential breeding stock with the same constraints mentioned with reference to males. More profits would have been possible if females were shipped as mothers. By shipping pregnant females who were proven to have few complications during their terms meant within the first year the number of stock on the ground could potentially greatly increase. The safest time to ship pregnant females is during the second trimester as the risks of self-abortion due to shipping stresses (Dr D Gray, DVM: personal comment). In order to time the second trimester with the onset of the sailing season two types of knowledge are evidenced- a terrestrially oriented demonstration of animal husbandry and a marine oriented knowledge of the season's relations to the seas. If pregnant females were shipped on board the immediate needs for fodder upon landing and during re-supply may have been greater than a cargo of non-pregnant livestock.

Another consideration that must be made is what combination of sexes would contribute to the cargo. Females of or near sexual maturity could only be sent with other females or non-sexually mature males. Pregnant females, however, could share a voyage. Cargos of only males would be less successful for establishing a farm aside from being potentially difficult to control. Once farms were established an influx of new blood may have been desired and more males brought. Economic priorities include sourcing new

areas and maintaining long distance networks has been discussed in Chapter 10. Both sexes are potentially able to be determined as foreign within archaeological assemblages containing a variety of animal-derived osteological material by utilizing strontium isotope analysis on sampled dental enamel. This should determine the origin location of these individuals from those who were bred and born on site subsequent to the initial settlement population.

12.5 Critique of Methodology

This consideration of the north Atlantic utilized a multi-layered consideration of a variety of source material in an effort to move past the homogenous nature of many site assemblages within the study region. Certain aspects fit well with the largely archaeological nature of this study- in particular the elements of group identity. Others, such as the individual level are much more difficult to find archaeologically and hence textual sources were utilized to provide insight into the more elusive evidence. There has been an over-reliance on textual sources within the north Atlantic and Scandinavia to provide the "truth" of the settlement process which has made archaeologists naturally hesitant and at times even fully opposed to. This work attempted to sort the fact from fiction by considering how textual sources express the view of a group via the medium of an individual with their own needs and desires which play out in identity.

This study has been heavily impacted by the differences in evidence gathered over time and place. This has been unavoidable due to the low number of fully excavated and published sites across the North Atlantic region in combination with conditions of preservation inherent to studies of the past. Lacunae within the archaeological and textual assemblages have been unavoidable because of this. This context has

necessitated an approach that considers material historiographically in relation to evidence of identity. Logistically this study has made heavy use of computer assistance in order to organize and analyze this body of material. In spite of this it is still important to undertake this type of approach as this allows the researcher to consider how identity was perceived and remembered by the past both internal to the population and in the wider European public. At the onset of early medieval Norse expansion prior to an inclusive of AD800 populations had no real social and political context requiring them to consider themselves in relation to a national population. As European continental national groupings tied to physical locations were still in the process of consolidation at this time migratory populations moved without a national negotiation for colonization. Identity was composed of the population, by the population and was utilized for the population's perceived benefit. For the modern researcher the overlap between the material record examined by archaeologists and the textual record exists in the generator of both are human populations. Divorce of one from the other inherently results in a much-reduced consideration of cultural context as discovered during Contact Era studies of the Pacific archipelagos including Hawai'i (Kirch, 1992).

Over the history of Old Norse and Viking studies in general these lacunae in the record have been utilized as opportunities to present cross-regional comparison and referencing. This resulted in a homogenous concept of medieval Norse culture existing from Scandinavia to the New World being exported en masse. As this study has shown the reality of this expansion is that island identities were fluid in nature and developed in a similar fashion to medieval identities being expressed on the Continent. These island identities were adopted by groups at will and when convenient as dictated by external contexts. A recent change to this in modern research is that these previously perceived

lacunae are now being explored by modern survey and research. Modern techniques are allowing more sites to be found such as at Unst in Shetland(Stummann Hansen & Waugh, 1998).

As mentioned previously textual evidence provided by Iceland has allowed identity to be more fully discussed in Zone 2 while simultaneously mediating textual evidence of other Zones via the context of Zone 2. Archaeologically this has been expressed in an allowance of certain sites to be named, where affiliation with sites described in saga texts in particular. The site of Qassiarsuk has been attributed as being Brattahlíð, the farm of Eirik the Red, and subject to the creation of a site monument consisting of reconstructions of the church and farm on site as well as the erection of a statue of Leif Eriksson.

The importance of named sites is tied into the ability to attribute individual and group action to a specific place. These perform a function of legitimization within a wider consideration of the world past. Named sites became site archetypes in the North Atlantic nationally and internationally funded excavations continually referenced cross-regionally to consolidate the idea of a singular unified Norse culture.

The story of the settlement of the North Atlantic has been a national identity debate since the medieval period. Local island populations present at this time began to consider themselves as distinct from Scandinavia. However, populations who belonged to neither group saw the only real difference being the physical location of origin. As time passed, it became increasingly important to North Atlantic populations to establish themselves overtly as distinct. As social and political powers based in Europe began to establish themselves within economic networks this became reflected in textual

evidence as references to an anachronistically national colonization of the North Atlantic were imposed to strengthen an increasingly modern nationalistic view. A physical representation of this colonization of history is the Leif Eriksson statue gifted from Norway to Greenland and mounted overlooking Qassiarsuk during the 1960s. This is illustrated in Figure 75.

The settlement of the North Atlantic provides a unique situation for the modern researcher as upon initial inspection this appears to be another example of imperialistic archaeology being applied across colonial area. This is due to the major early excavations of the Norse north Atlantic being conducted under the needs of the late nineteenth and early twentieth century public. However, the colonization of this region was not initially driven by a national political body- a macroscale driver for identity and migration. This is claimed only after the initial settlement phase by Norway during the 1260s when Zone 2 is incorporated formally into the region. This occurred concurrent to the creation of the written texts as cultural artefacts, statements of prestige in and of themselves, which became another way for macroscale ideas to be presented to North Atlantic populations. This use of texts as cultural artefacts is in keeping with wider macroscale European practices. This resulted in the texts which were written within this context of social and political negotiations being taken as historical fact by subsequent generations when these North Atlantic texts and their affiliated farm sites became included in modern historical research. The role of these texts changed.

The corpus of evidence was rediscovered and added to by nineteenth century European researchers who were intent upon confirming nationalistic/imperialistic elements of a common Scandinavian past both physically on archaeological sites and within written

works perceived as history. Zone 2 microscale efforts of establishing a recognizable European identity- an inherently macroscale statement. These statements existed within larger collections enclosed in manuscripts. This initial process is diagrammed in Figures 76 and 77. This format is quite similar to the breakdown of the system of trade and exchange which consolidated integration into the international network. In this view, manuscripts can be seen as intermediaries of ideas, identities and ideas about identities which are both emic and etic in nature. Table 10 places North Atlantic identity orientations in context.

The settlement of the North Atlantic is one that does not appear to be initially planned by a government- one of the last to occur in Western civilization prior to the exploration efforts of the Renaissance. It is important to consider that these populations previously familiar with maritime environments may have known some resources. Certain migratory species of marine birds as well as mammals and fish may have been followed the knowledge of their migratory nature being exploited as a practice of marine oriented practice. Previous exploration occurred prior to settlement in Zone 3 and it is not unreasonable to assume that a similar process occurred in Zone 2 and in Zone 1 as well(Sveinsson & Þórðarson, 1935). Once farms were established and making an impact upon economic networks European-based desires to control or at least profit from this lengthy network began in earnest. Once the European powers, such as the Church, are established in the region, it became more important to link identity to the official efforts of colonization- a national colonization of history.

12.6 Conclusions

Identity and its constituents were not solely consciously defined by those experiencing them, nor are they in modern populations. There is inherent difficulty in defining typological differences with a combination of tangible and intangible evidence. Because of this, the situational context of the identity under construction is incredibly important in order to define what contributes to identity and what existed as separate and thus distinct. Material culture, landscape utilization, physical attributes, the choices made in relation to these as well as the intangible aspects such as mores, norms, values, traditions and history interact and modify each other via humans themselves resulting in a cultural tapestry which occurs internal and external to populations. In the multivalent approach utilized by this work a singular approach is inherently unable to comment upon populations exhibiting similar cultural habitus. The cross-referencing of material properly applied is able to reduce effects of bias inherent to the evidence and its manner of collection that facilitates a more complex view of north Atlantic migration and settlement. This is a view that will benefit from greater amounts of modern excavations as they are published to help counteract the amount of early excavations that continue to be utilized as cultural references throughout the north Atlantic. Only in this way can the homogenous view of north Atlantic settlement be surpassed.

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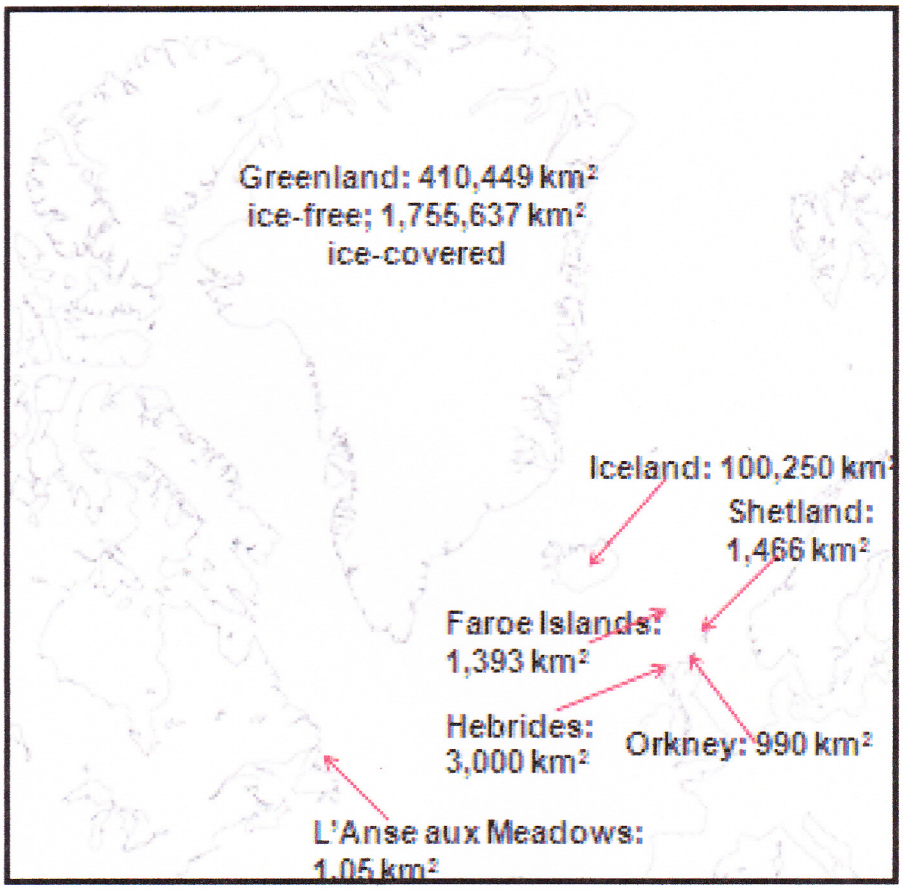


Figure 1 Land areas of the north Atlantic region (data from CIA World Factbook, accessed 21/12/2010).

Island groups	Koppen Designation	Modern Annual Rainfall	Basement Rock	Arability
Orkney	Cfb	948mm	Old Devonian Red Sandstone	80%
Shetland	Cfb	1003mm	Complex: Old Devonian red Sandstone but also Lewisian, Dalradian and Moine metamorphic outcrops in a confluence of several fold and fault axes in accordance to the various plates.	35%
Hebrides	Cfb	1297mm	Primarily Lewisian gneiss.	47%
Faroe Islands	Cfc	1433mm	Basalt- the remnants of an ancient continent.	2.14%
Iceland	Cfc	779mm	Primarily basalts and other minerals of volcanic origin which are subject to active glaciers in some areas.	0.07%
Greenland	Cfc, Ef	526mm	Crystalline granites of the Laurentian Shield which are in close proximity to active glaciers.	0%
L'Anse aux Meadows	Cfb/c	1514mm	Primarily granites and marine sedimentary rocks to the south	0%

Table 1 Island geographic data from Koppen designations (Peel, et al., 2007).

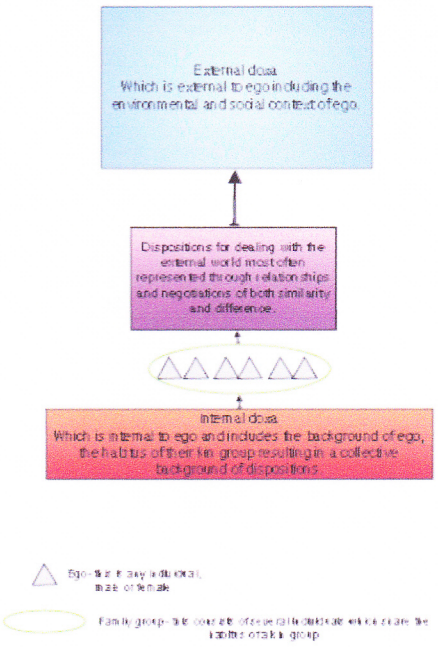


Figure 2 Schematic of individual interaction (Bourdieu, 1990).

Term	Definition	Comments
Dispositions	The transposable habitual tendencies of individuals to act and react in certain ways.	The dispositions that are available to an individual or group will depend upon the constituent elements of the habitus.
Habitus	The embodied dispositions that are the domain of habit, which is at once individual and collective.	The individual habitus is dependent upon the collective habitus of the wider population to which they belong.
Doxa	The elements of culture which appear to be obviously self-evident and unchanging, essentially the known cultural world.	This is composed of the habitus and what is possible to be known.
Doxic Practice	The collective dispositions and choices that result from the habitus interacting with cultural doxa.	This functions upon the premise that habitus and doxa are recreated and reinforced through the dispositions of the individual and group.

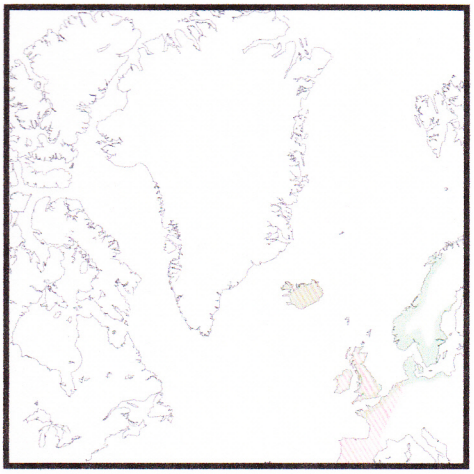
Table 2 Key terms associated with the Annales School(Bourdieu, 1990; Braudel, 1981; Farr, 2006; Jenkins, 2008; 2010).

Norse Vessel	Dimensions	Example		Notes
Ship's boat	7.25m x 2m	Scar burial vessel	Coastal usage; funerary usage in certain north Atlantic sites	Ship's boats are primarily coastal, short distance vessels used for a variety of jobs that other vessels were too large to do
Small cargo vessels	14m x 3.6m; 4.5 tons of cargo	Skuludev 3; c. 10th-11th century	Quite a versatile ship size which would have been able to carry a substantial cargo while still being able to be easily beached	Smaller trade vessels would have formed at least part of the north Atlantic trade network between the island archipelagos
Large cargo vessels (early)	14.3m x 4.5m; 24 tons of cargo	Skuludev 1; c. 10th-11th century	More efficient than coastal vessels taking less crew to maintain and hence being able carry more cargo	The deeper draft of cargo vessels in general allowed goods to be brought more efficiently and safely across increasingly longer distances
Large cargo vessels (later)	25m x 5.7m; 45 tons of cargo	Hedeby 3; c. late 11th century	These long distance vessels made the movement of bulk goods and settlement much easier across open oceans	Utilization is reflected by changes in docking practices, movements away from shallow landing beaches and towards deeper harbors ; these vessels were later replaced by cogs

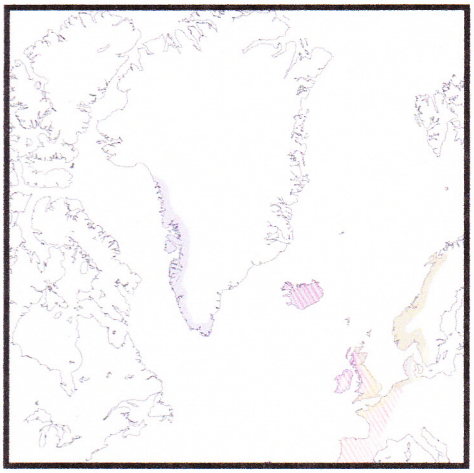
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A) The European Atlantic Zone of the Sixth-Seventh Century, shown in red (after Cunliffe 2001).



B) The North Atlantic of the Ninth Century. The European Atlantic Zone is shown in red, while the Scandinavian Zone is shown in green.



C) The North Atlantic Zone of the Twelfth Century, shown in purple. The Continental Atlantic Zone is shown in red. The North Sea Zone is shown in yellow.

Figure 3 The Atlantic Zone and its Changes over time (after Cunliffe 2001).

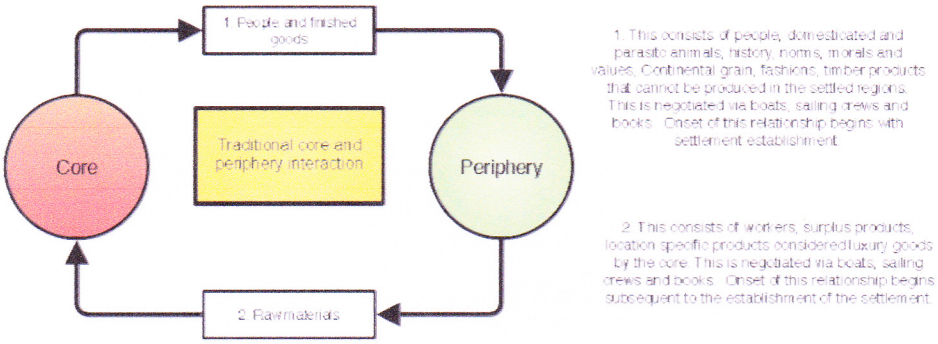


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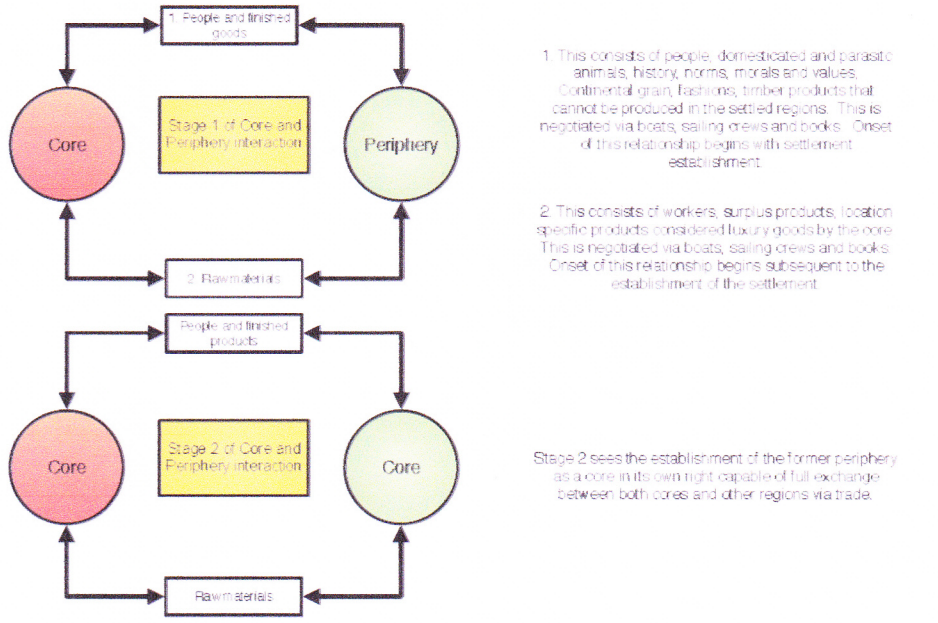


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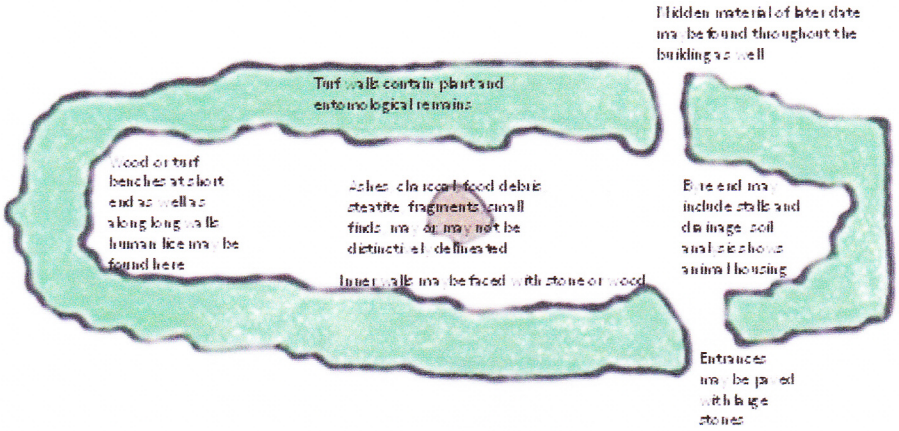


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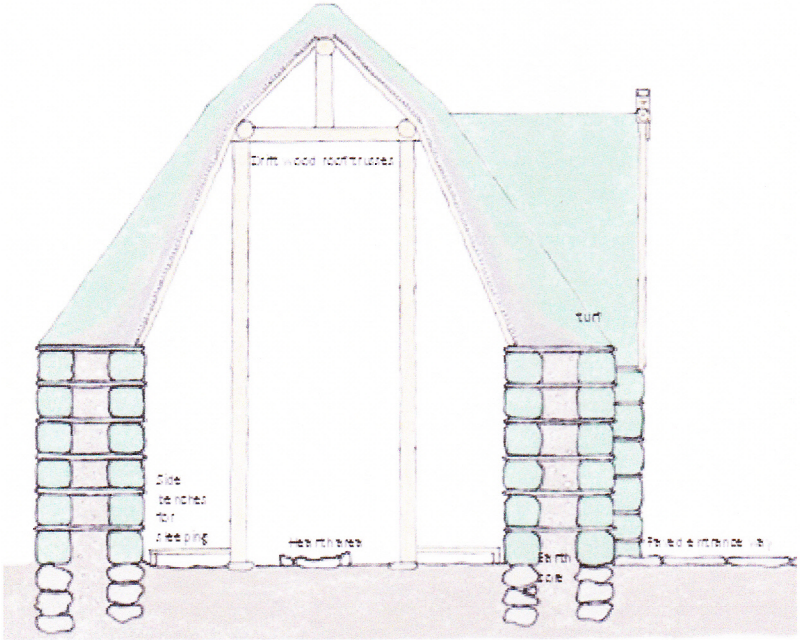


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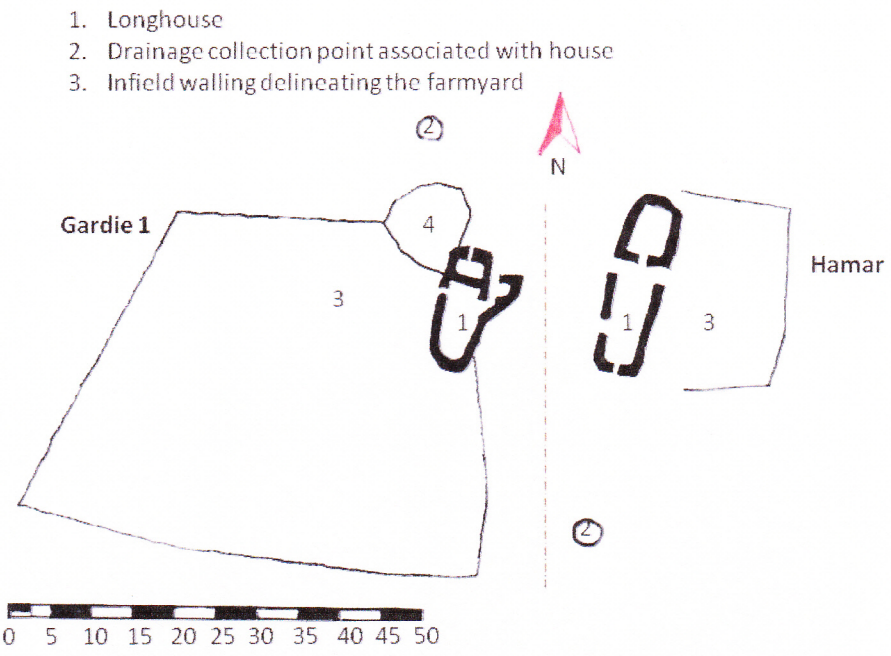


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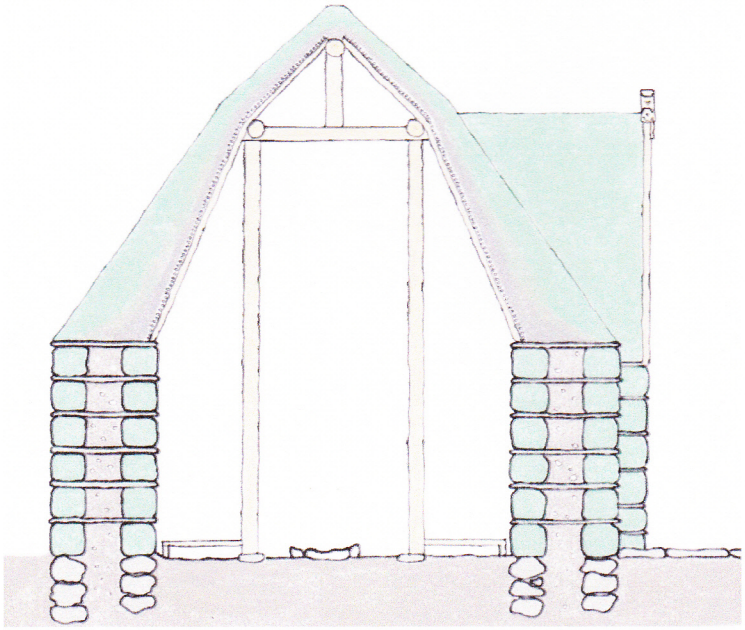


Figure 9 End view of a settlement period turf-built longhouse showing layering of roof material.

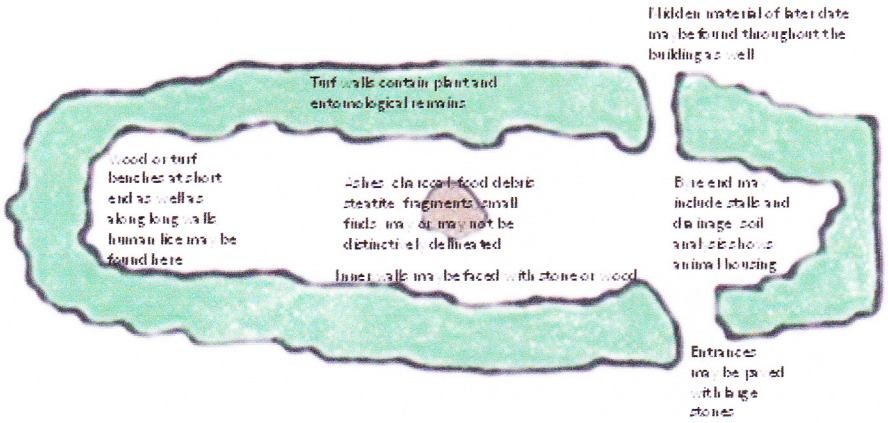


Figure 10 Generalized longhouse plan for Shetland.

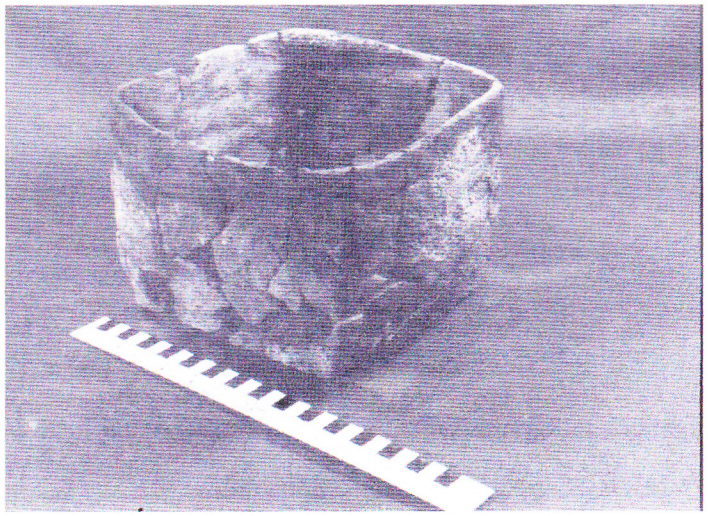


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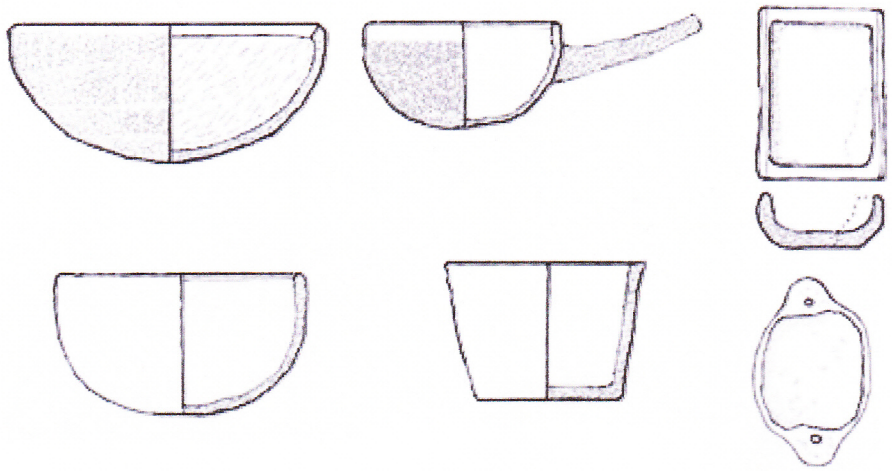


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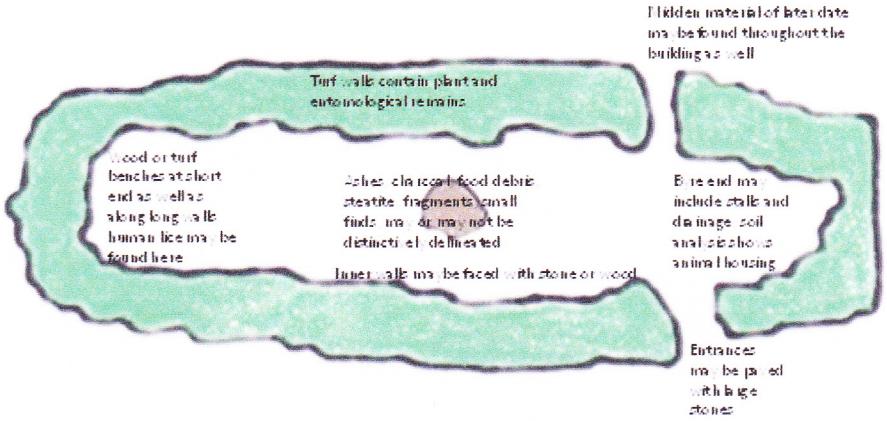


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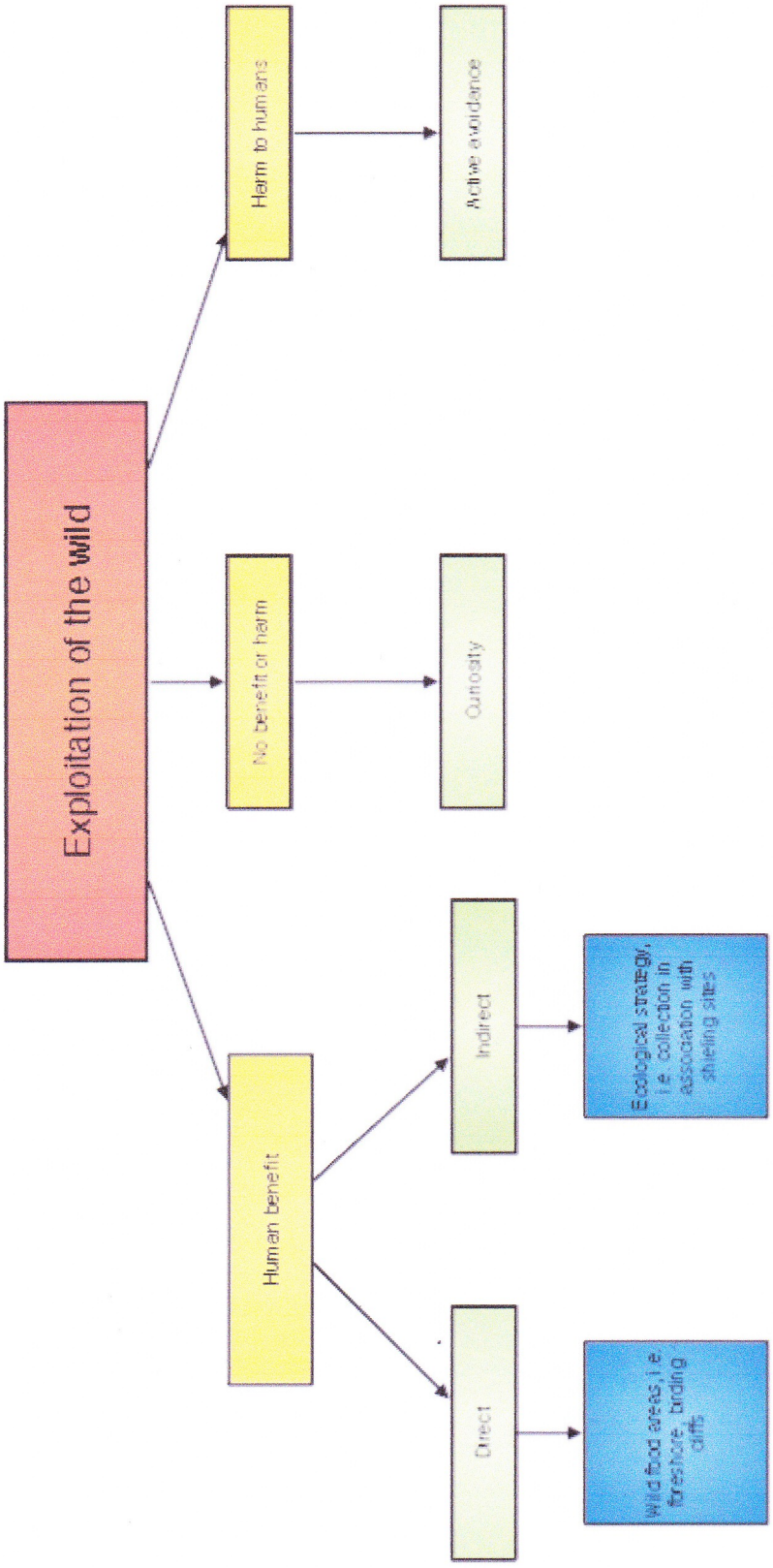


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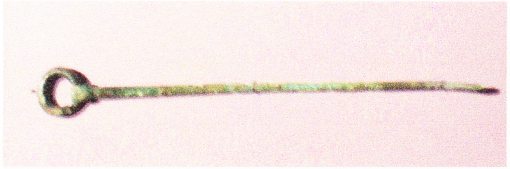


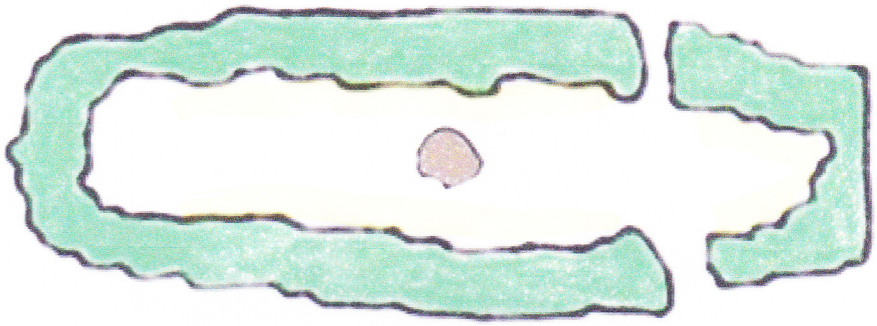
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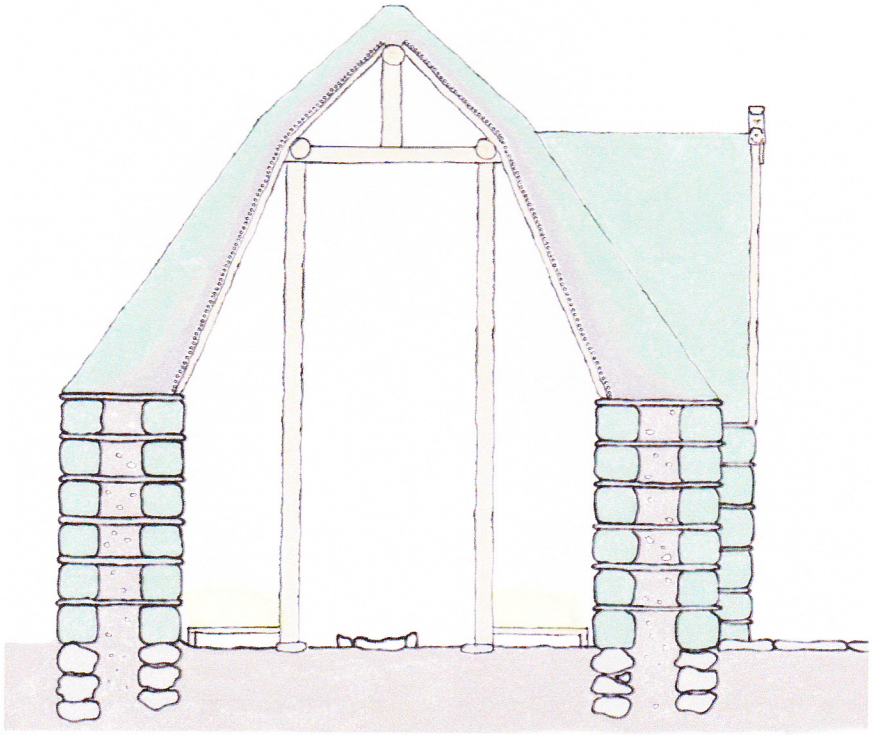


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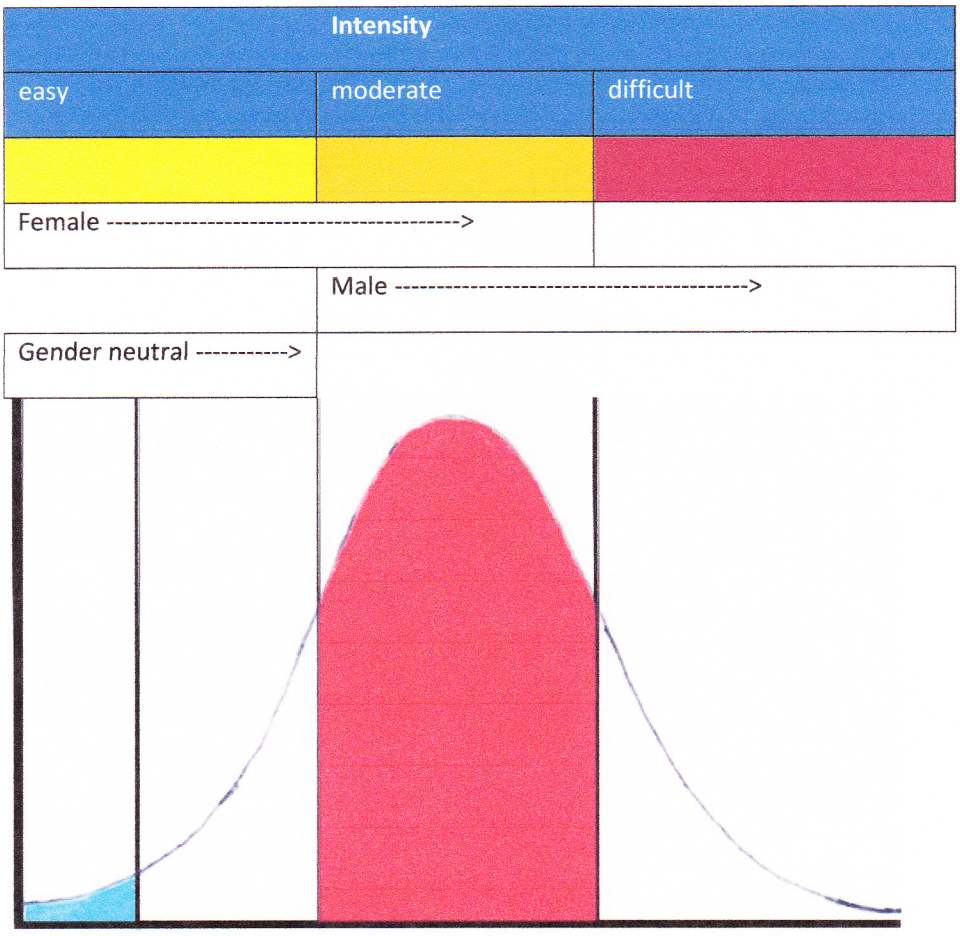


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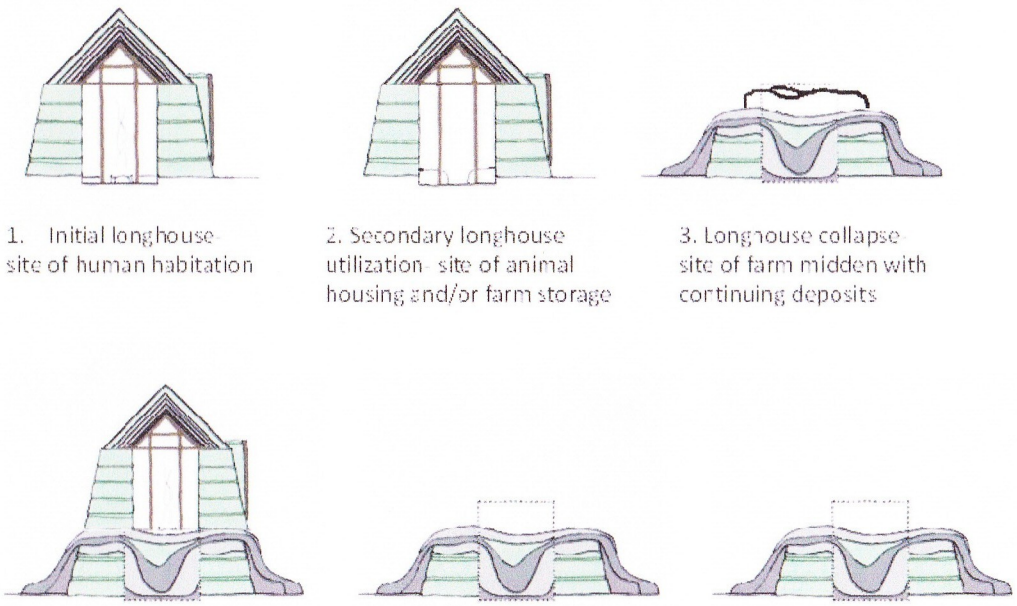


Figure 28 General life of turf built longhouses in the North Atlantic.

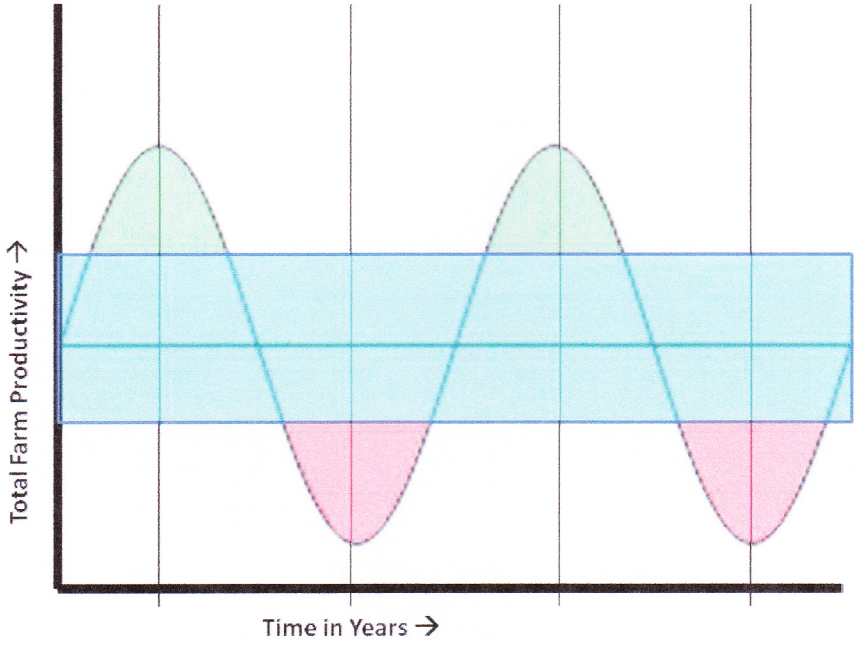


Figure 29 Farm productivity cycles presented chronologically.

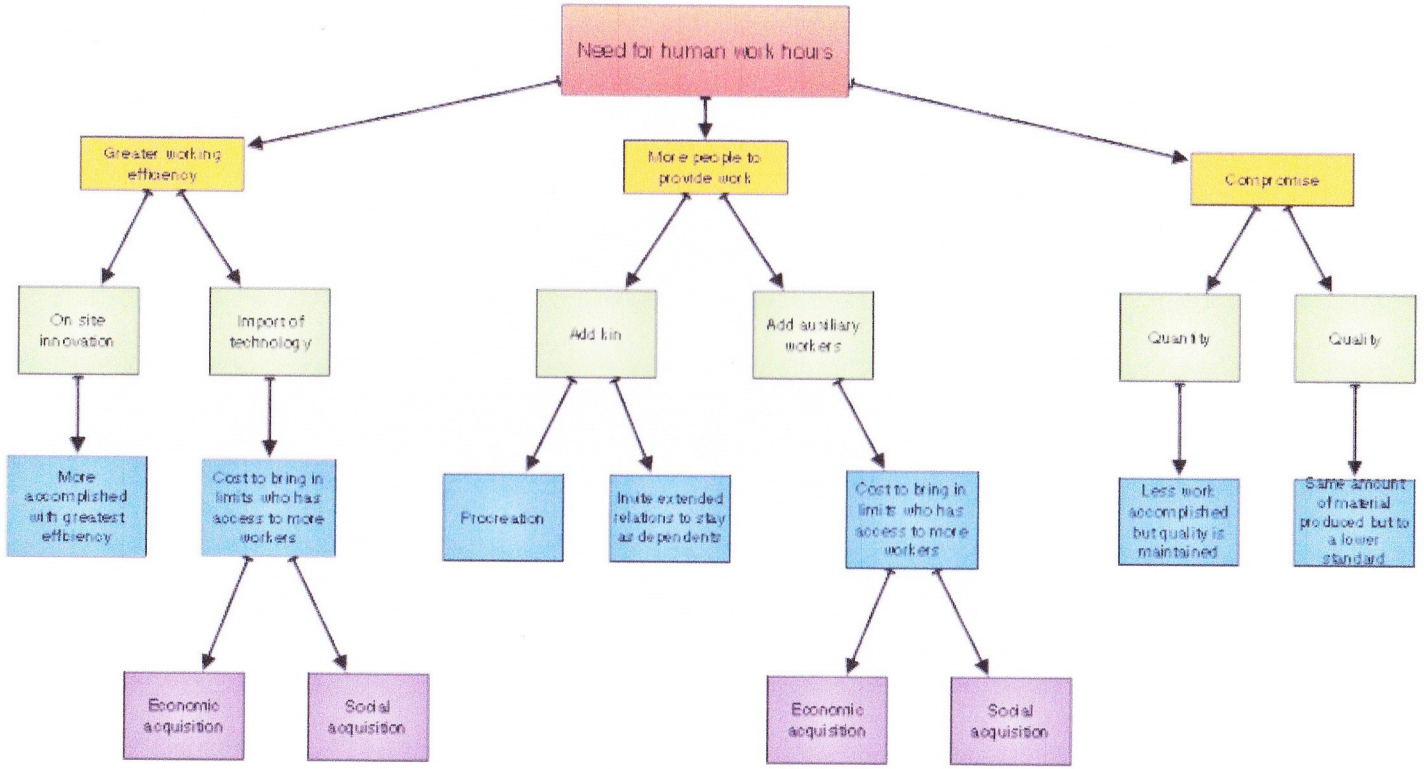


Figure 30 Need for human work diagram.

Orientation	Designation	Description
Terrestrial	A	Represented by active outdoor farm life
Marine	B	Represented by activities on water
Littoral	C	Represented by shoreline activities

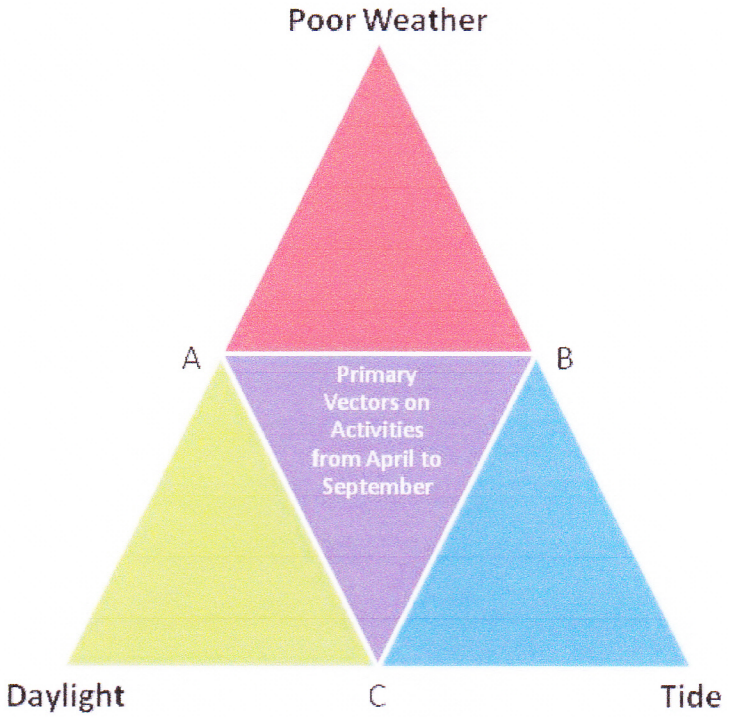


Table 4 Influences upon choices of marine and terrestrial cultural practices.

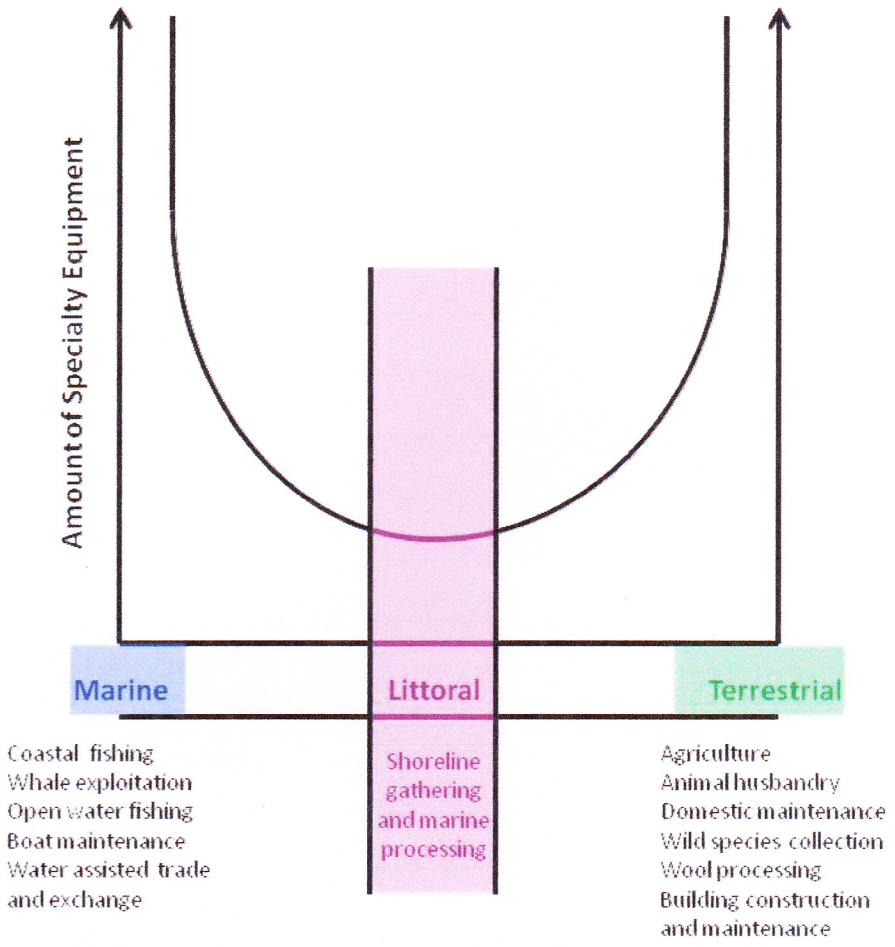
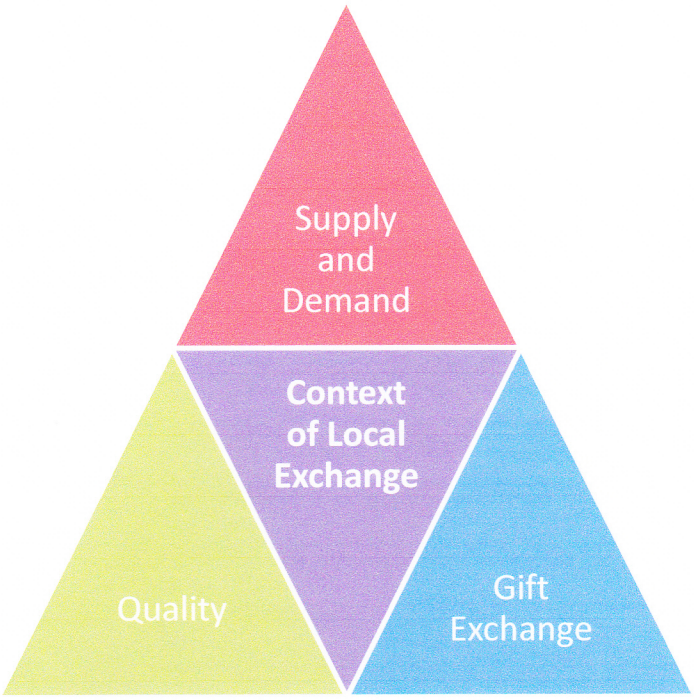


Figure 31 The amount of specialty equipment required for exploitation in relation to productivity of marine, littoral and terrestrial areas.



Type	Description	Example
Supply and Demand	Exchange based upon the principle of supply and demand	Butter produced by one farm being exchanged for grain from another
Quality	Exchange based upon quality	Goods that you can make on site but someone else can make easier or better
Gift Exchange	Exchange of goods as gifts for the maintenance of social structure and hierarchy via social obligation	The exchange of luxury goods to maintain social obligation is documented in *Orkneyinga Saga*

Table 5 Vectors on choice in the context of local exchange.



Figure 32 Zone 2 saga sites (Thorsson 2000: 726).

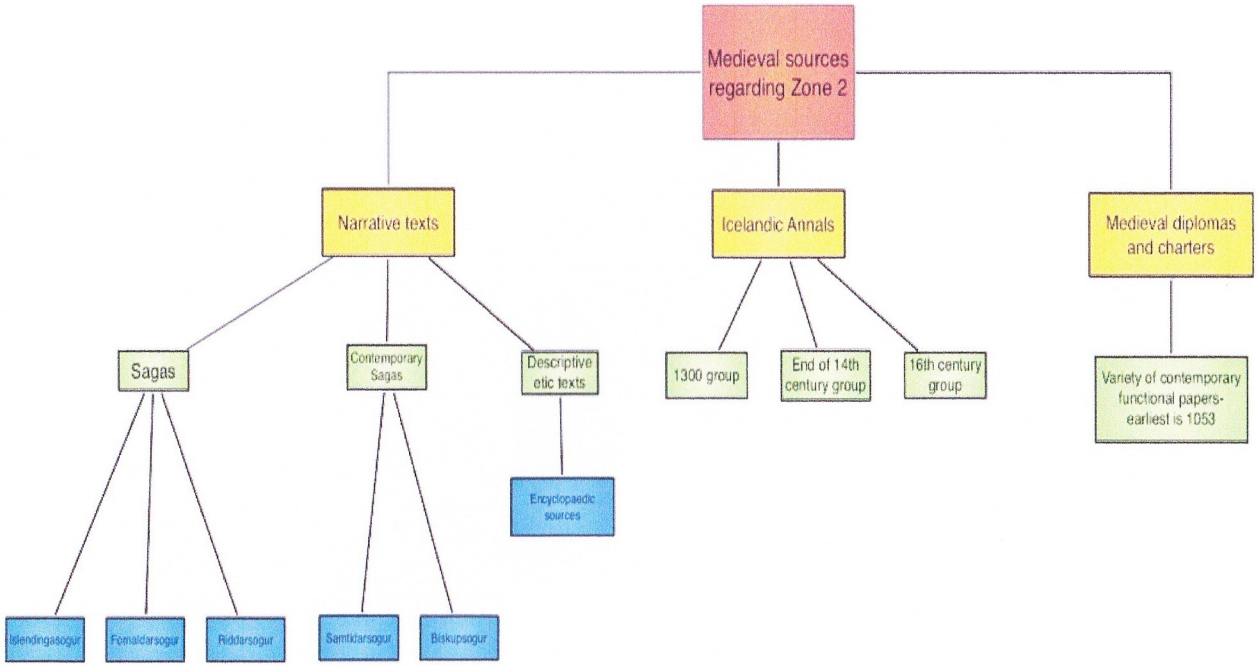


Figure 33 Zone 2 textual sources by type.

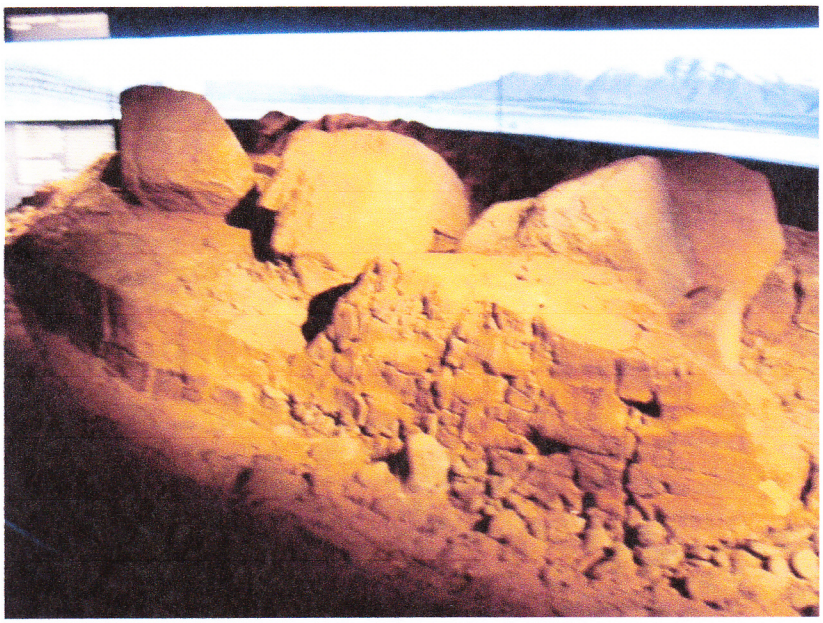


Figure 34 Portion of well preserved turf walling excavated at Aðalstræti and which is now part of the 871±2 Exhibition

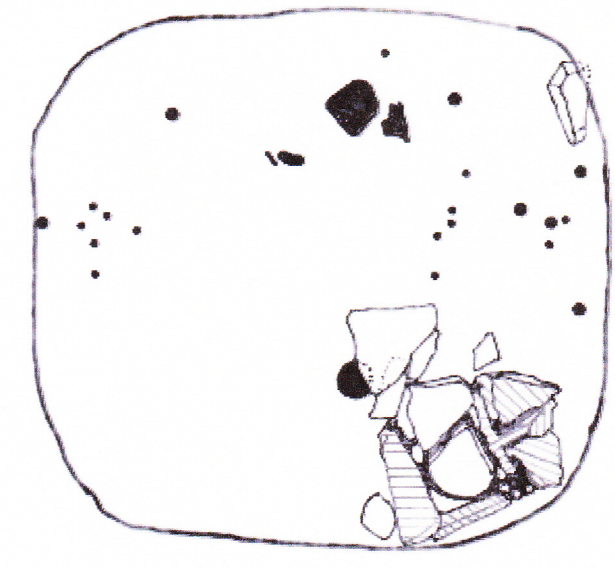


Figure 35 Holmur sunken feature building (Einarsson, 2008).

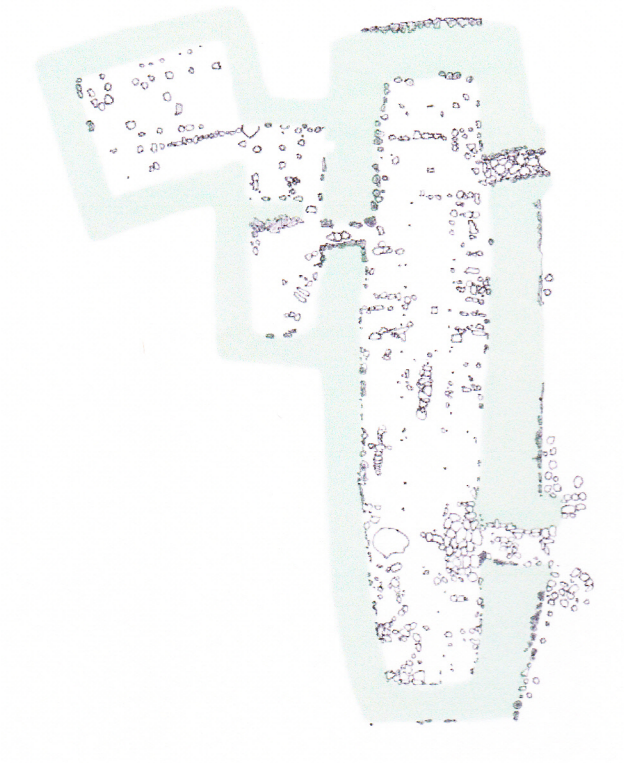


Figure 36 Skallakot (Stenberger, 1943).

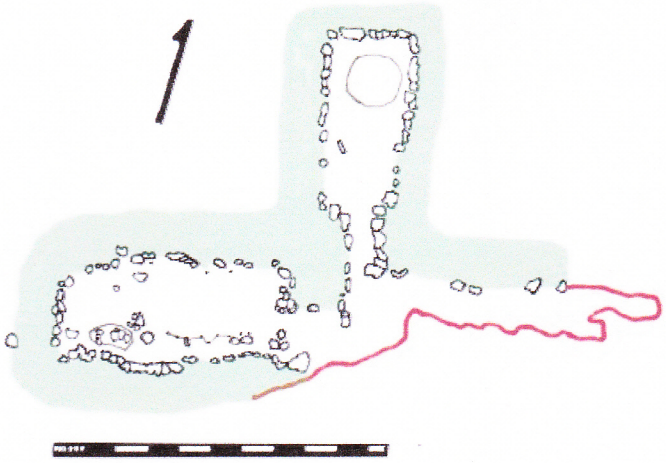


Figure 37 Aslakstunga fremri (Stenberger, 1943)

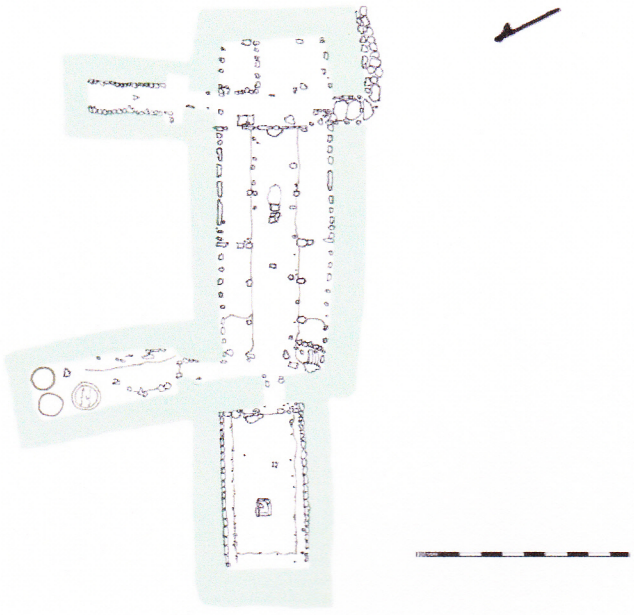


Figure 38 Stong (Stenberger, 1943).

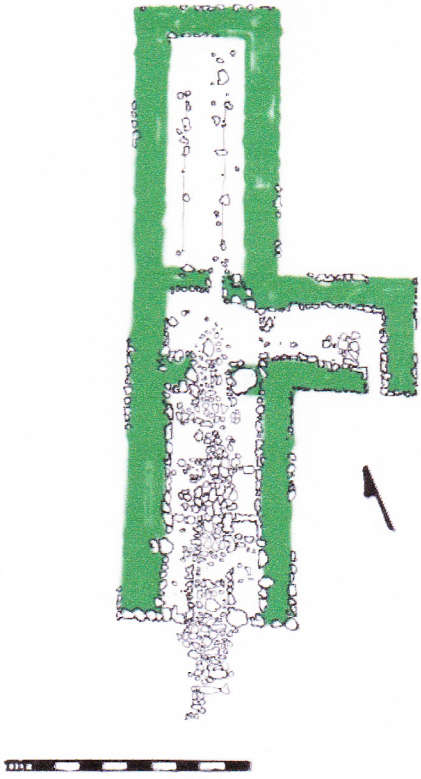


Figure 39 Lundur (Stenberger, 1943)..

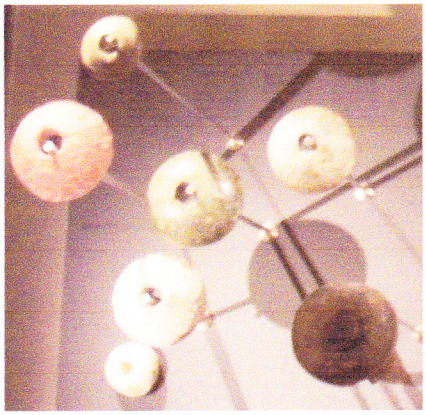


Figure 40 Spindle whorl weights from Þjóðminjasafn Íslands.

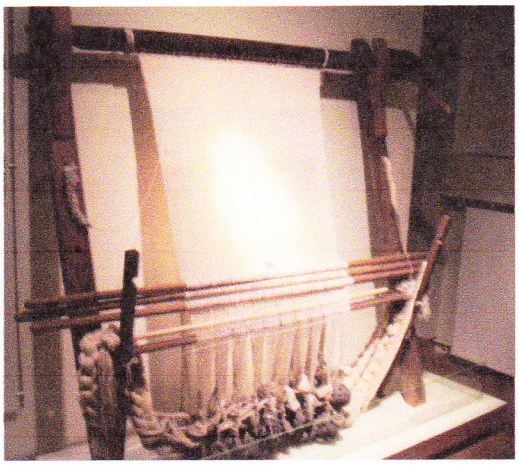


Figure 41 Reconstruction of vertical loom utilized in the weaving of vaðmal from Þjóðminjasafn Íslands. Reconstruction made utilizing ethnographic and archaeological evidence from throughout Zone 2.



Figure 42 Whale bone weaving sword utilized in the weaving of vaðmal from Þjóðminjasafn Íslands.

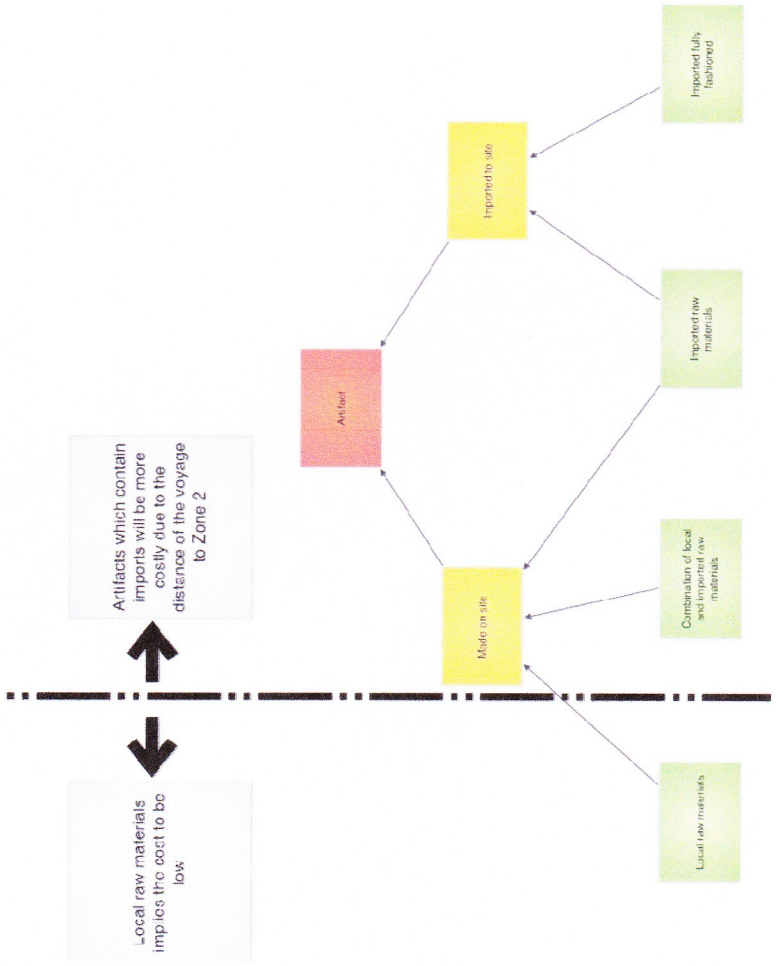


Figure 43 Zone 2 artifact choices.

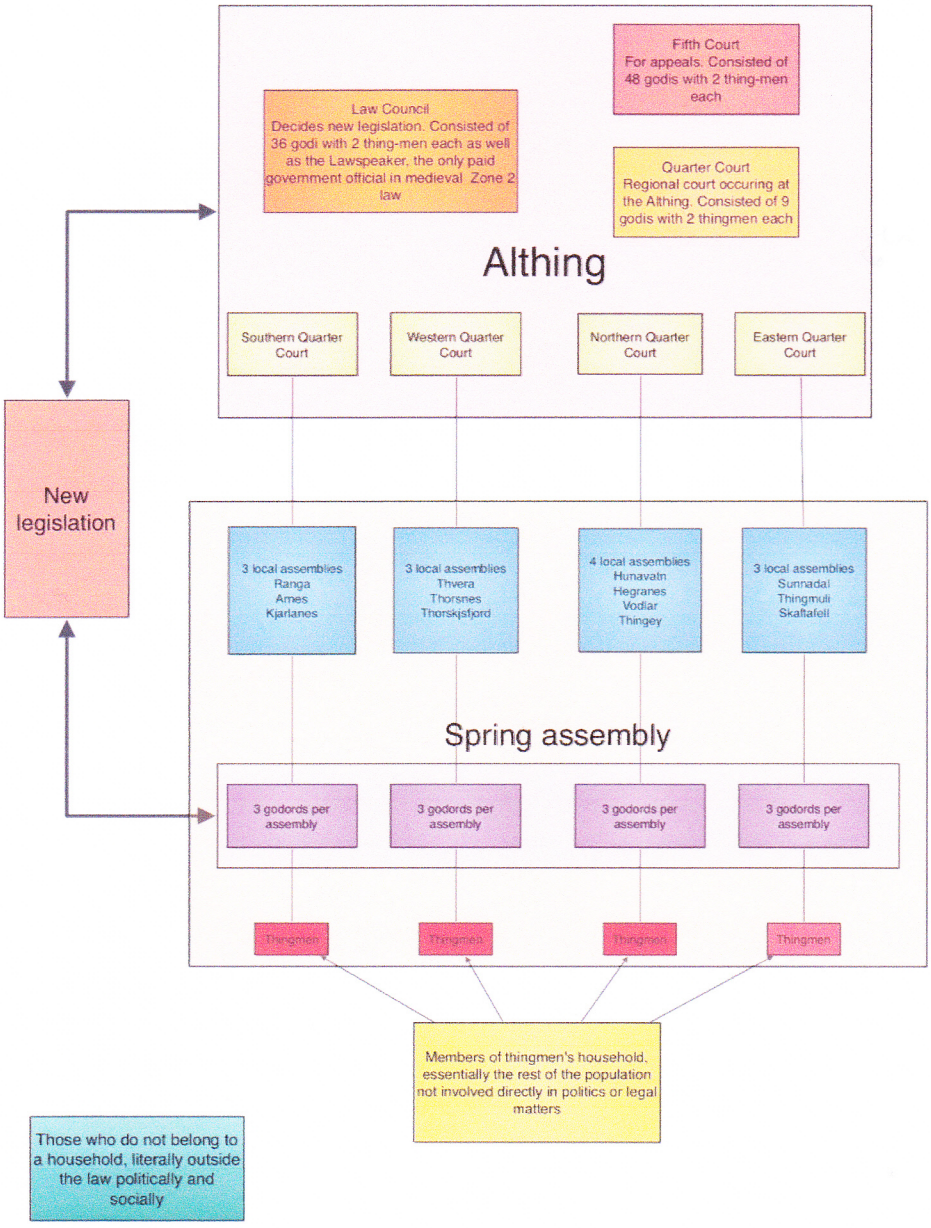


Figure 44 Format of the Althing (after Thorrson 2000).

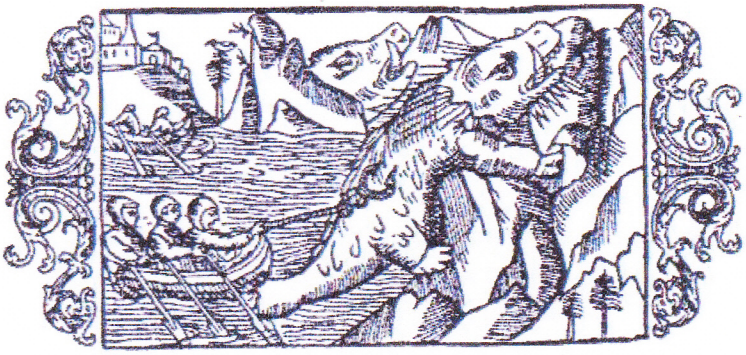


Figure 45 Olaus Magnus's depiction of a Norwegian walrus being exploited from his 1555 Description of the Northern Peoples (1998).

Name	Length	Other Information
'corse' seal	< 4 ells	-
'erken' seal	5-6 ells	-
'flett' seal	4-5 ells	-
'bearded' seal	6-7 ells	-
'saddleback' seal	<4 ells	Swims on back or side
'short' seal	2 ells	Can blow through ice 4-5 ells thick

Figure 46 Seals described in Konungsskuggsjá (Larsen, trans. 1917, pp. 140-1).

Excavator	Nationality	Major excavation involved with in Zone 2	Excavation locations outside of Zone 2
D. Bruun (1856-1931)	Danish	Hofstaðir	Denmark, Faroe Islands, Greenland
A. Roussell (1901-1972)	Danish	Skallakot, Stöng	Greenland, Denmark, Orkney, Shetland
Þ Erlingsson (1858-1914)	Icelandic	Hofstaðir	
M Stenberger (1898-1973)	Swedish	Isleifsstaðir, Israudarstaðir, Snjaleifartottir, Aslakstungafremri	Sweden, Greenland
M Þórðarson (1877-1961)	Icelandic	Skeljastaðir	
J Voionmaa (1912-1991)	Finnish	Storholfshlið	Finland
K Eldjárn (1916-1982)	Icelandic	Skallakot, Stöng	Denmark, Greenland

Table 6 Late Nineteenth and early Twentieth Century excavators of Zone 2.

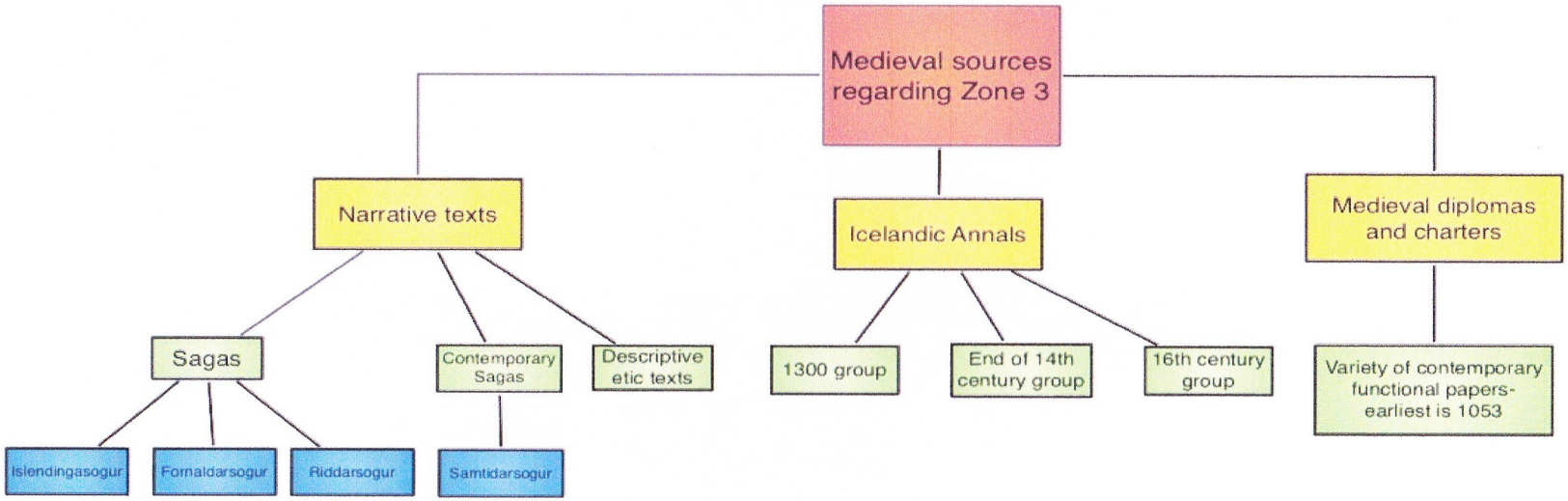


Figure 47 Zone 3 Textual sources by type.



Figure 48 The Inland Ice of Greenland, as viewed from an airplane.



Figure 49 Glacial runoff leading to the Eiriksfjord, as seen from Signal Hill, Narsarsuaq.



Figure 50 Narsarsuaq house site overgrown with dwarf Arctic willow.

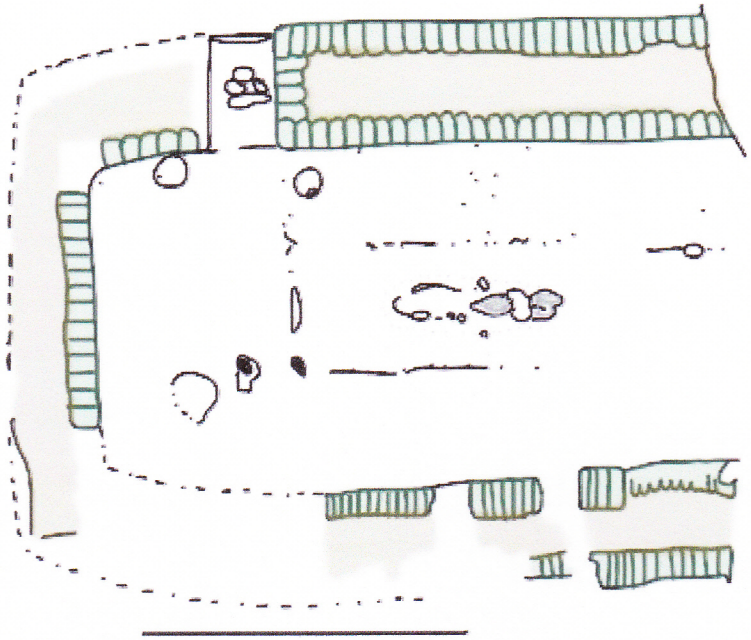


Figure 51 The Farm Under the Sand longhouse (Albrethson, 2003, pg 106).



Figure 52 Soapstone lamp found at L'Anse aux Meadows (Wallace, 2000, p. 216).

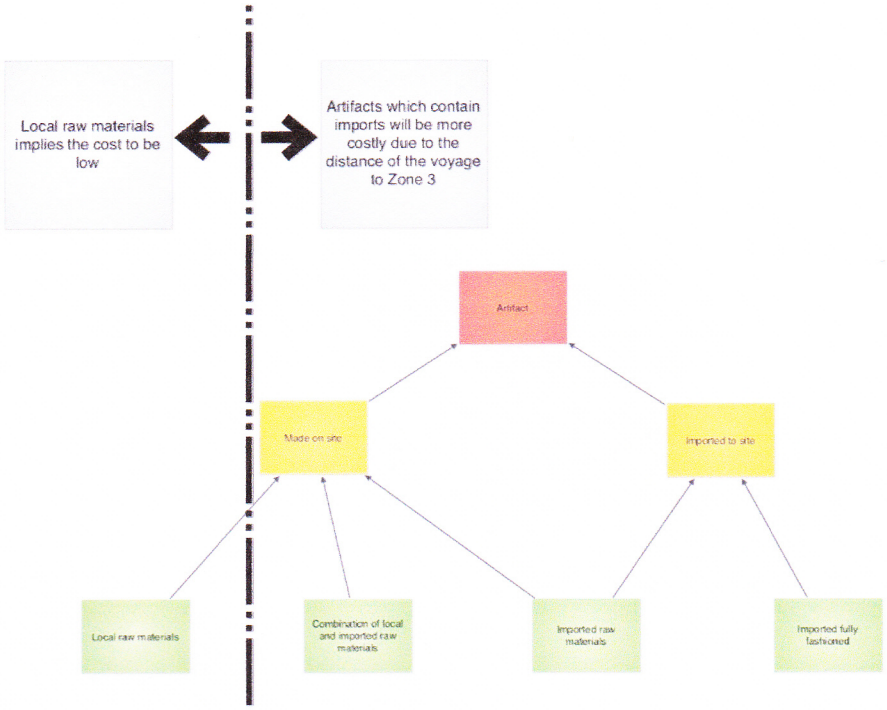


Figure 53 Zone 3 artifact decision diagram.

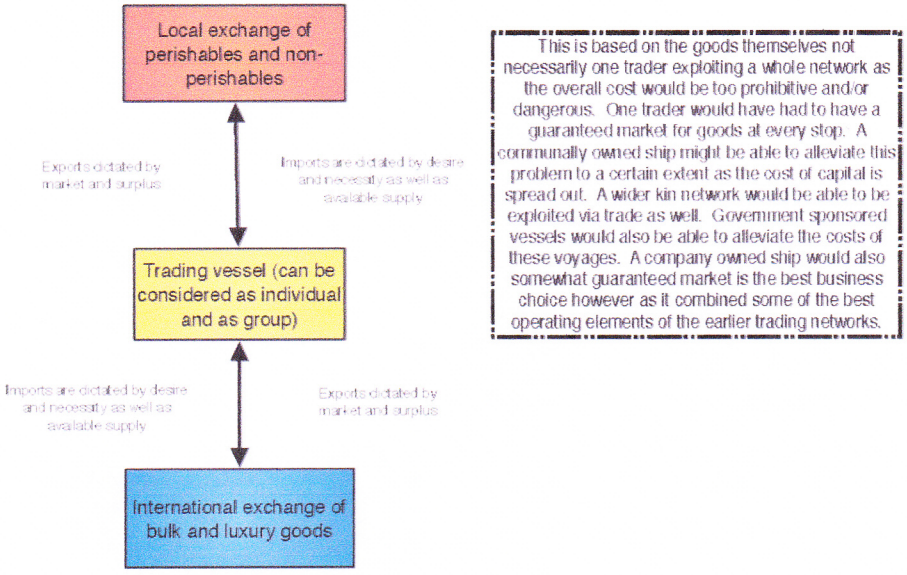


Figure 54 Trade and exchange via merchant intermediaries (Braudel, 1981).

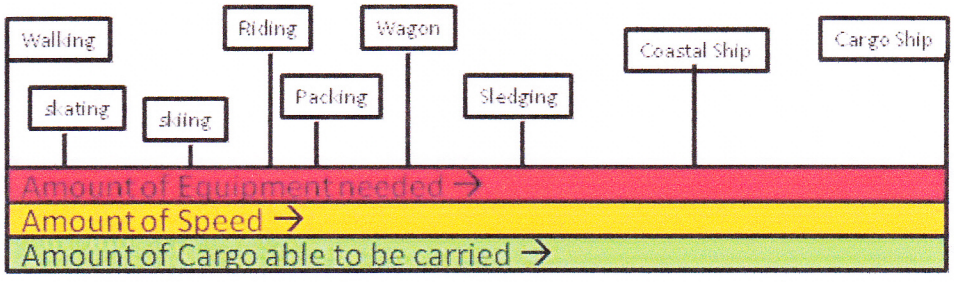


Figure 55 Diagram relating transportation to equipment, speed and cargo capacity.

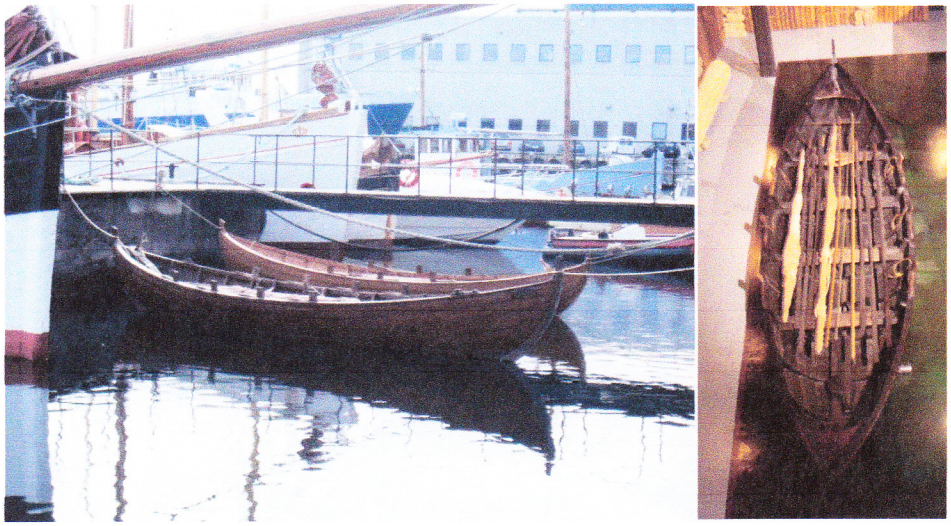


Figure 56 On left are modern rowing vessels from Torshavn, Faroe Islands. On the right is a similar vessel once used for fishing during the nineteenth century but is now within the Faroese National Museum.



Figure 57 Norse landing area and medieval pier, Isle of Lewis. Photo taken by Dr R Lenfert.

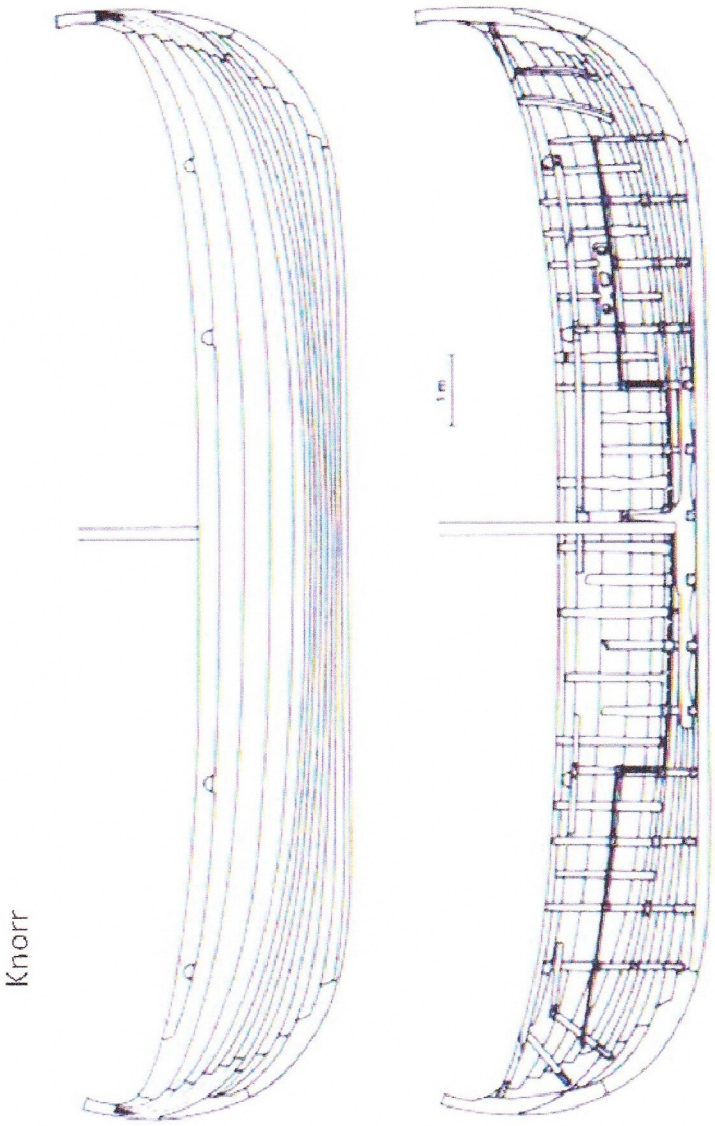


Figure 58 Knorr (Crumlin-Pedersen, 1995).

Figure 59 Efficiency in long distance travel.

Some local areas, particularly those which are closer to the markets of the medieval continent, may actually include proto-towns and markets. This allows greater variety in choice of middleman to broker goods through.

Control over production areas and exchange networks results in social and political power being exerted and reinforced. Continental kingdoms are able to do this via direct establishment and control over the trade centers themselves. When the distance covered by the network is too great for this however control is exerted on/ via middlemen. This is done via socially obligatory gift exchange and title distribution on the part of governmental bodies.

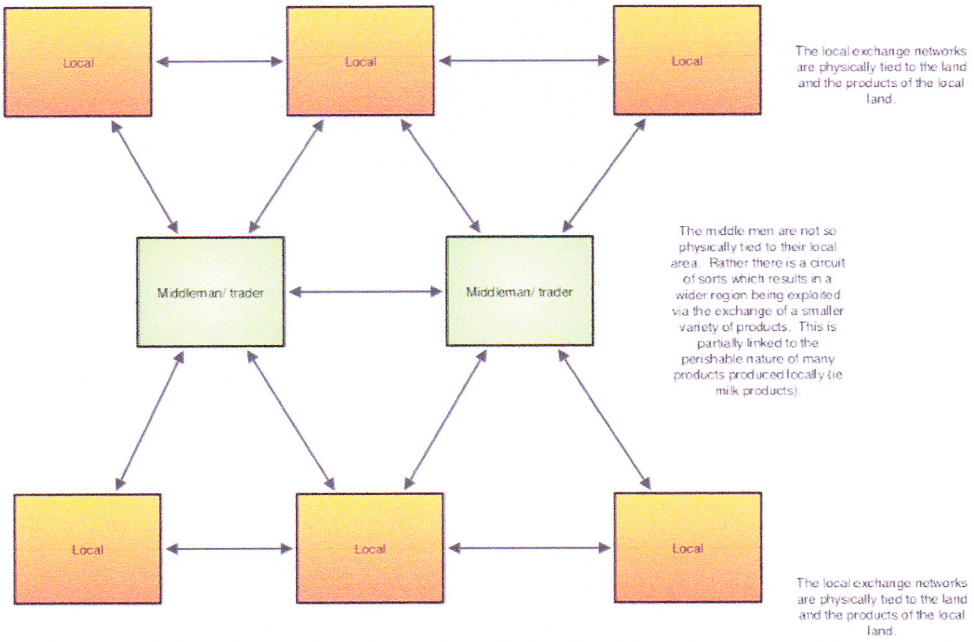
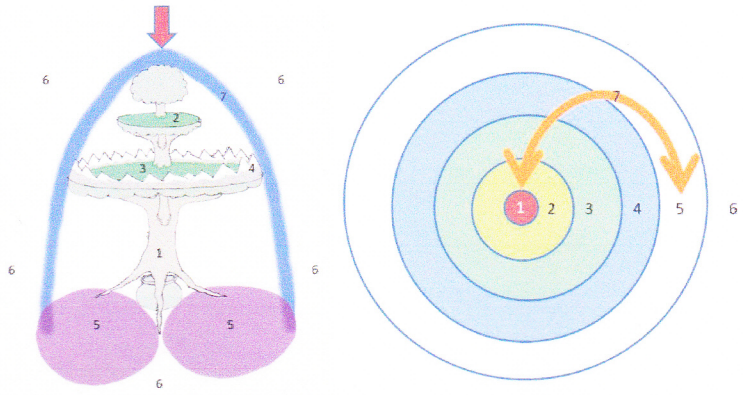


Figure 60 Intermediary networks.



Number	Name	Definition	Comments
1	World Tree	Center of the universe	This motif is normally portrayed with associated animals who are active on the tree itself.
2	Asgard	Home of the Gods	This is where roles are most defined by the extent mythological evidence.
3	Midgard	Home of Men	The affiliated areas of the everyday world. The closer to the center this is the more defined it is.
4	Jotunheim	Home of the Giants	The unaffiliated chaotic areas of the everyday world which may be beneficial at a cost.
5	Underworld	Exists in two extremes- ice and fire	These are the same two environmental extremes as known from Zone 2.
6	Undefined nothing	Essentially chaos	This must exist in order to define where there are defined places.
7	Bifrost Bridge	The Rainbow Bridge which is the road between worlds	This element exists to provide a transition between the levels.

Table 7 (Top Left) Traditional portrayal of the World Tree remembered in Norse pagan mythology. The red arrow indicates the view point from which the image at top right is seen. (Top Right) Generalized view of the construction of the Norse pagan universe.

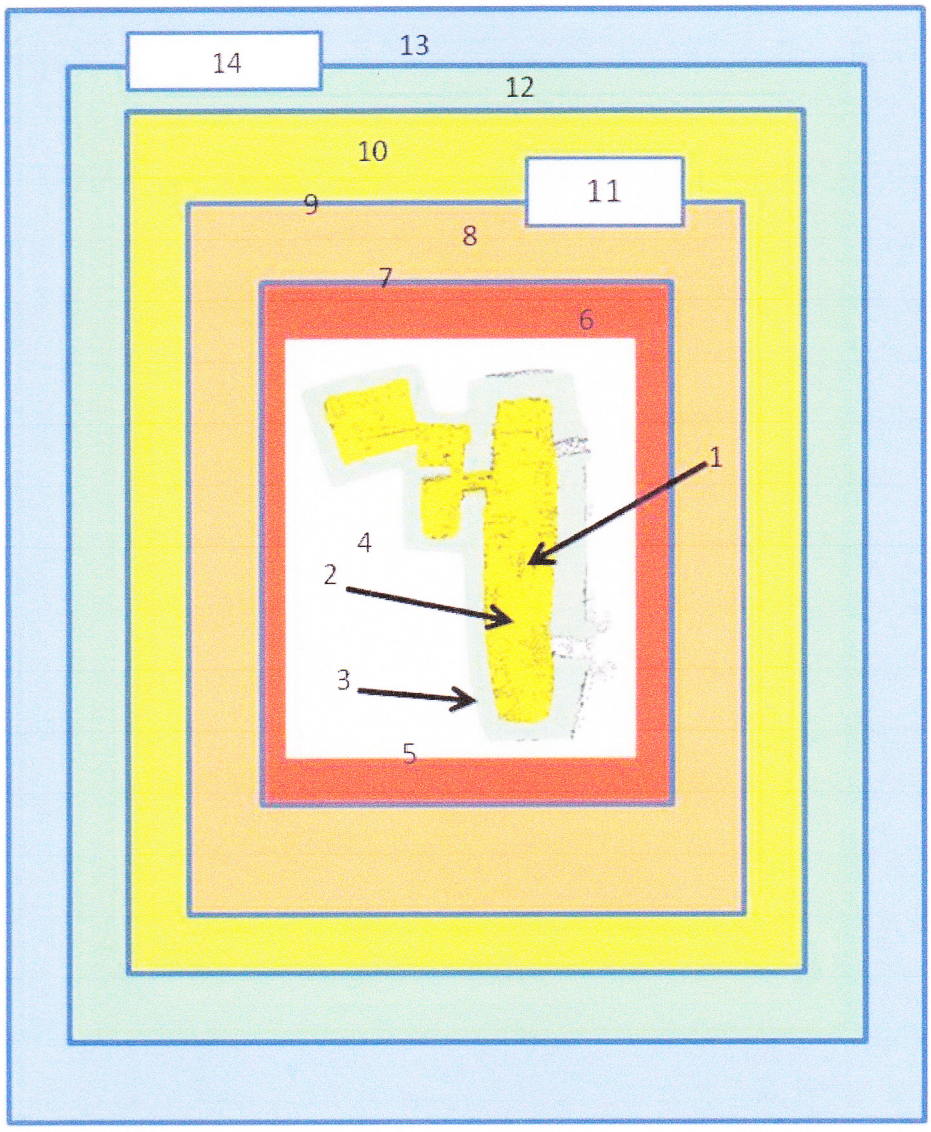


Figure 61 Generalized Social Space conception of Norse farms in the North Atlantic. Table explaining is on the following page. Also includes following page.

Number	Detail	Function	Comments
1	Central hearth	Heat, light	
2	Domestic area (shaded)	Low light activities which may or may not require heat to accomplish including but not limited to food preparation, handicrafts, sleeping.	Familial and auxiliary interactions occur here.
3	Turf wall	Domestic boundary as well as structural wall.	
4	Home farmyard	Potentially high skill activities and the site of most physical of human and animal interactions within animal husbandry cycle.	Smithy, byre, barn, weaving house, midden, kitchen garden all may be located within this region
5	Home farmyard boundary		
6	Infield area	Tended managed crops maintained on intentionally improved lands.	An example of crops would be barley.
7	Infield/outfield transition	Potentially a boundary is used to delineate this otherwise field practices is the best indication of use.	This practice is mentioned in *Gragas*.
8	Outfield area	Tended crops requiring less maintenance.	An example of crops here would be oat.
9	Outer farm boundaries of the home farm unit	Delineated by walls in areas where multiple home farm units were abutting, according to *Gragas*.	To the interior of this boundary is where the defined gender roles of male, female and age-defined neutral apply. To the exterior of this boundary is where the roles are more ambiguous.
10	Area of farm held lands	Farm affiliated lands within the wider world which are separate from the home farm unit.	Examples include shielings, birding cliffs, fishing rivers, lakes and coasts, littoral zones, woods.
11	Familial burial area	Located in the furthest extent of home farm near the boundary of the outside world.	The family members are still nearby yet are not being obtrusive in everyday existence.
12	Common access areas	Areas where there is common access to the resources of the wider world which is unmediated by direct farm affiliation	Examples include Open water fishing, ocean travel. There is a chaotic element to this due to the lack of mediation.
13	Natural world without human influence	Area where survival dominates over cultural roles and practices.	
14	Interactions with other family farm units are here	This assumes the units are separate, not related by blood or marriage nor do they have any social affiliation beyond being a local neighbour.	



Figure 62 Bónhústoftin chapel site, taken within the site enclosure.

	Íslendingabók	Landnámabók
Norse	Í þann tið vas Ísland viði vaxit á miðli fjalls ok fjoru. Þá váru hér men kristnir, þeir es Norðmenn kalla papa, en þeir fóru síðan á braut, af því at þeir vildu eigi vesa hér við heiðna men, ok letú eptir boekr írskar and bjollur and bagla; af því mátti skilja, at þeir váru men írskir. [page 5]	En áðr Ísland byggðisk af Nóregi, váru þar þeir men, er Norðmenn kalla papa; þeir váru men kristner, ok hyggja men, at þeir hafi verit vestan um haf, því at fundusk eptir þeim boeker írskar, bjollur ok baglar ok enn fleiri hlutir, þeir er þat mátti skilja, at þeir váru Vestmenn. ([**Hauksbók and Skarðsárbók**] þat fannsk í Papey austr ok í Papýli.) Enn er ok þess getit á bókum enskum, at í þann tíma var farit milli landanna. [page 31]
English Translation	In those times was Iceland with trees between mountains and the fore-shores. Then were here men Christian, those who Northmen call *papar*, they journeyed shortly afterwards away, because they desired not to be here with heathen men, and left after books Irish and bells and bags; because of this it was believed, that they were men Irish.	Even though Iceland was settled from Norway, were there those men, who Northmen call papar; they were men Christian, and thought men, that they had been west across the sea, because they found after them books Irish, and bells and bags, that they were Westerners. ([**Hauksbók and Skarðsárbók**] These were found in Papey to the east and on Papýli). But this was got from books English, which at this time was found in the middle of the land.
Comments	This work is primarily a history of Iceland and the inclusion of the *Papar* and their reasons for leaving is made to that effect.	This work is a history of Icelandic settlement and in this case the inclusion of the *Papar's* location is more relevant. This also includes the focus of some of the later scribing inclusions, particularly in the Hauksbók and Skarðsárbók versions.

Table 8 A comparison of the major works of Ari Þorgilsson (Norse text from Benediktsson, ed 1968).



Figure 63 Chapel dedicated to St Boniface on Papa Westray, Orkney.



Figure 64 Hog back from St Boniface chapel.

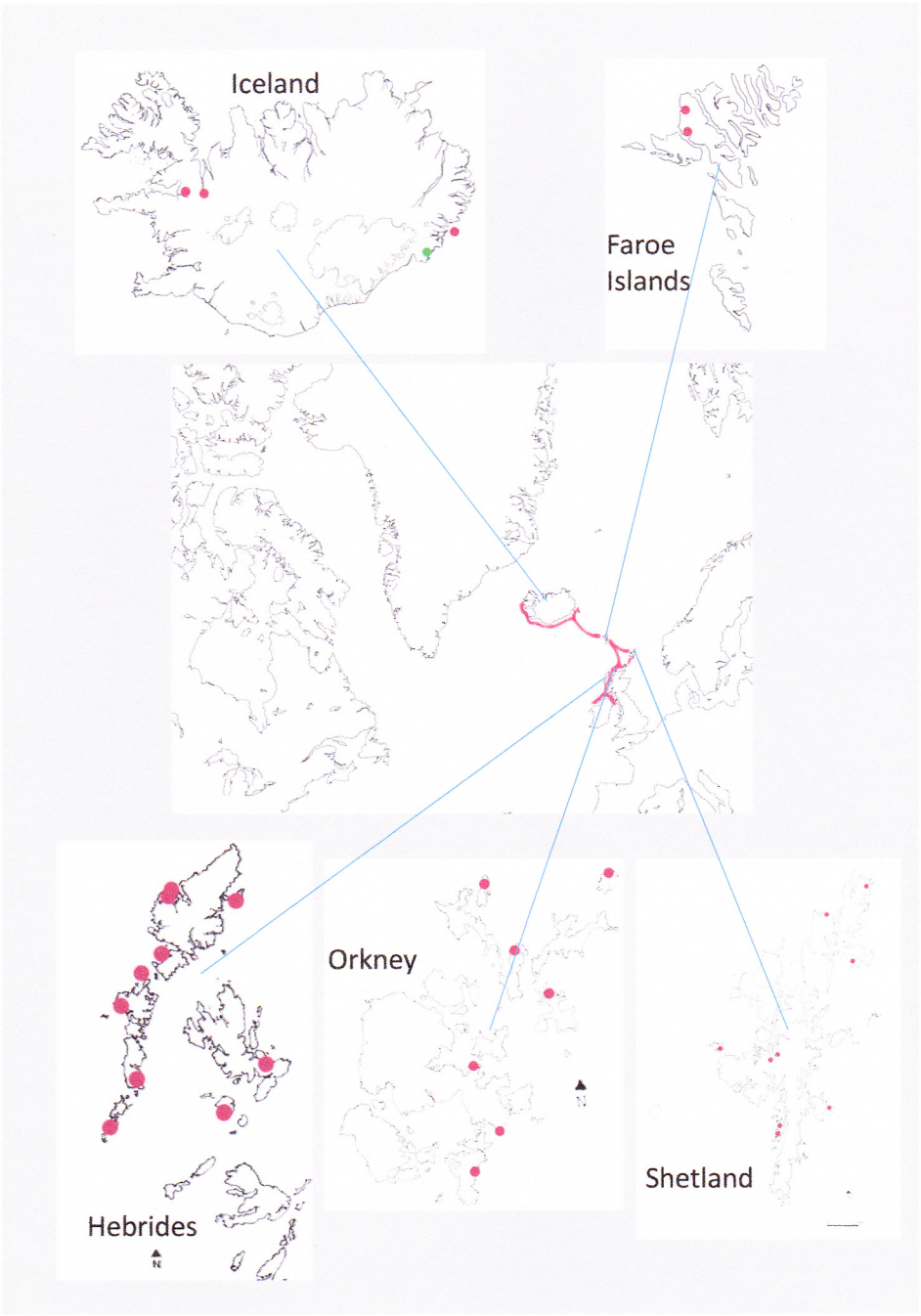
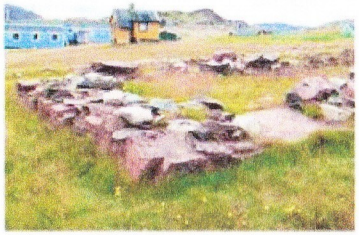


Figure 65 Papar place name locations and movement map (after Ahrónson 2007; MacDonald 2002; Sveinbjarnardóttir 2002). Red is utilized to mark confirmed sites while green is for unconfirmed regional usage.

Figure 66 Qassiarsuk



1. Above are the ruins of turf church.
Below is a reconstruction of this turf church.



2. Cathedral ruins.

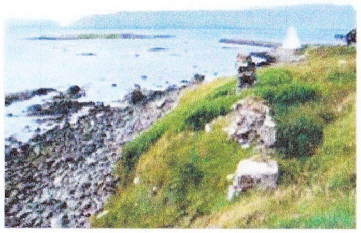




3. Ruins assumed to be Brattahlíð.



4. Ruins of two farms at this site, shown by arrows.

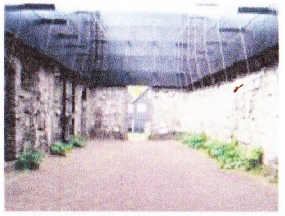


1. Wall of the early stone church in the foreground.



2. Later medieval church.







3. Múrurin





5. Later farmhouse constructed on Bishop's Palace foundations.



4. Panoramic view of farming area. Church is shown by arrow.

Figure 67 Kirkjubøur, Faroe Islands.

1. From harbour head. Ruins shown by arrow.

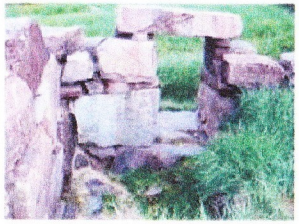




2. From the mountains behind the valley. Ruins shown by arrow.

3. Farther pasture lands. Site located just beyond the ridge in the mid ground of the shot.





5. Tithe barn ruins.





4. Local stone and grass resources.

Figure 68 Igaliku, Greenland.



Figure 69 Tithe barn entrance, Igaliku, Greenland.

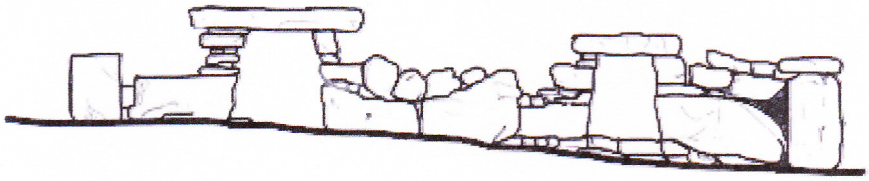


Figure 70 Igaliku tithe barn front (after Norlund, 1936, pg 63).



Figure 71 Beach near Bornais, west coast South Uist. Photo taken by Dr R Lenfert.

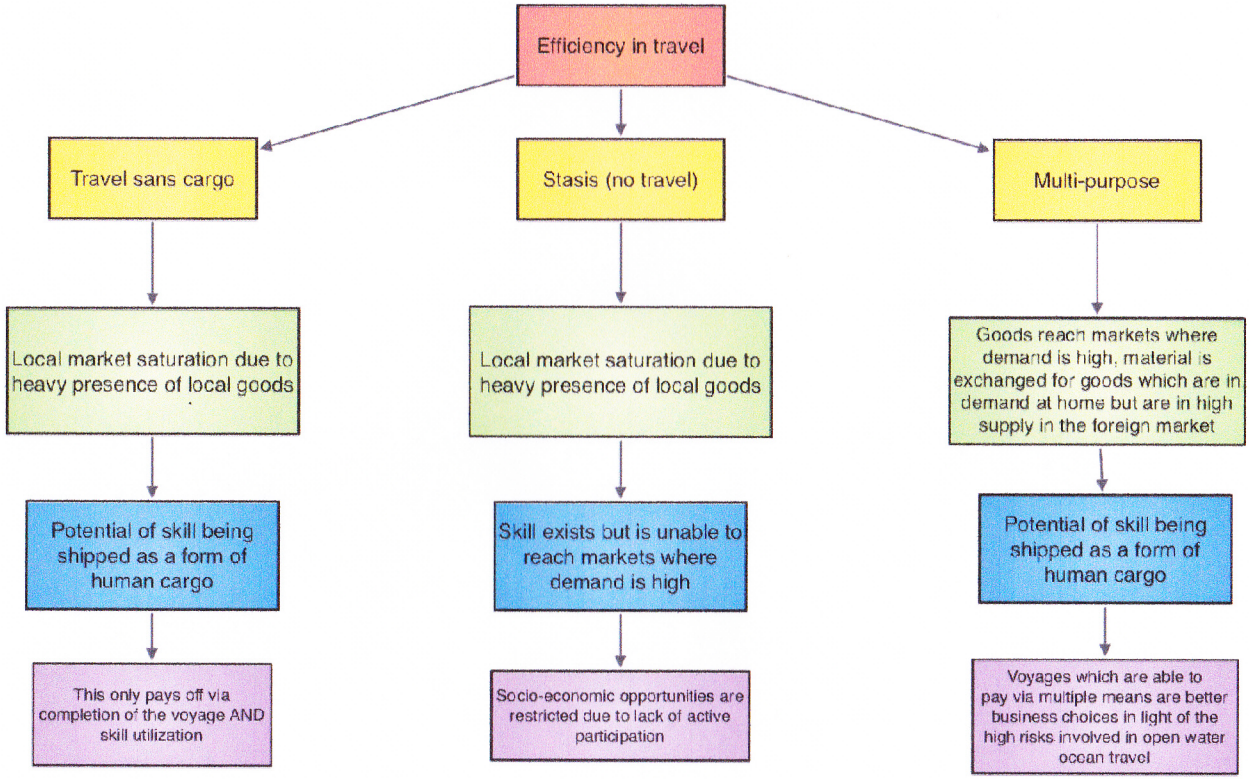


Figure 72 Efficiency in Travel.

Internal	External	In between area
On ship	Those not undertaking the voyage	Affiliated contacts which directly impact success of voyage
Settlement Farm	Those not part of the farm unit- essentially kin	Those hired to work, traders, extended kin
Free State Farm	Within farm networks [locally, socially etc]	Those hired to work, traders, extended kin, priests
	Within local commune network [economically etic]	Those hired to work, traders, extended kin, priests
	Within Zone, as occurred during Assembly meetings [legally, wider social implications]	Those hired to work, traders, extended kin, priests
	Within the Christian world [religiously]	Those hired to work, traders, extended kin, priests
Medieval Farm	Within farm networks [locally, socially etc]	Those hired to work, traders, extended kin, priests
	Within local commune network [economically etic]	Those hired to work, traders, extended kin, priests
	Within Zone, as occurred during Assembly meetings [legally, wider social implications]	Those hired to work, traders, extended kin, priests
	Within the Christian world [religiously]	Those hired to work, traders, extended kin, priests

Figure 73 Designation of internal and external group elements.

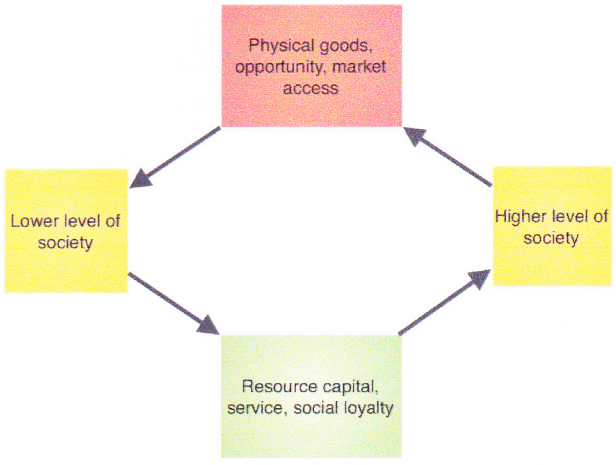


Figure 74 Hierarchal interaction applicable to both microscale and macroscale levels of identity.



Figure 75 Leif Eriksson statue at Qassiarsuk, Greenland.

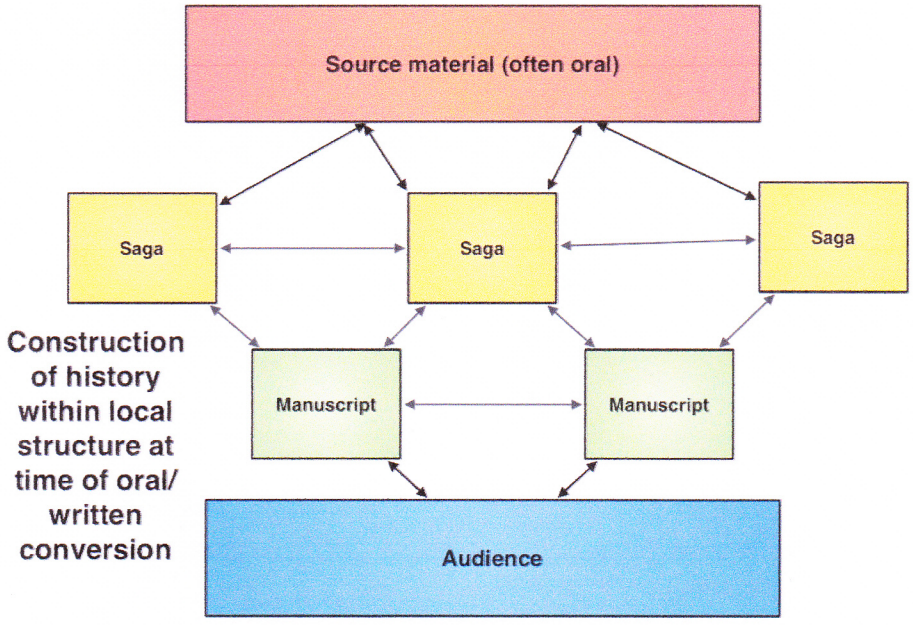


Figure 76 Initial construction of history.

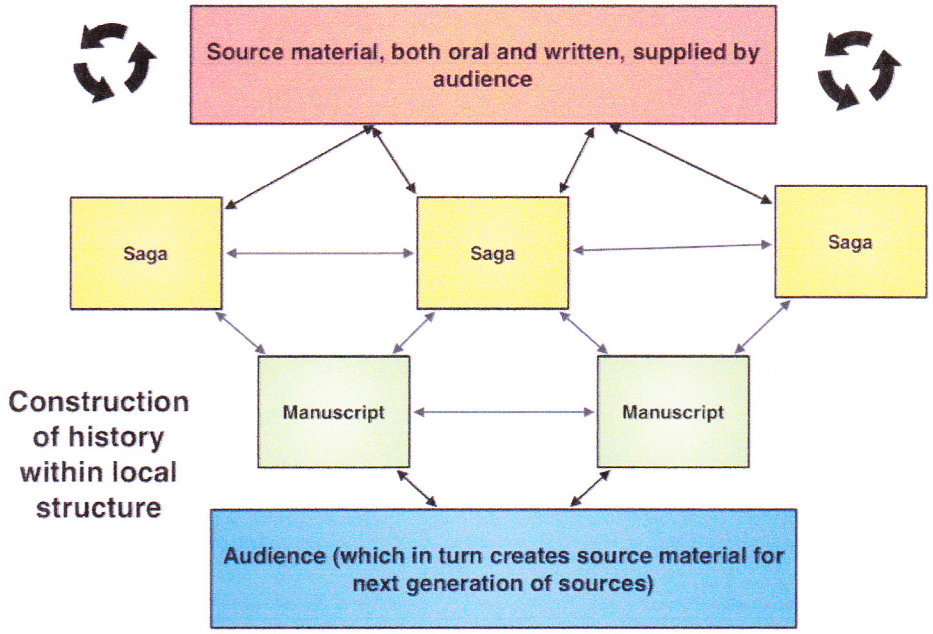


Figure 77 Maintenance of history.

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site name	Old Norse Name	location	island	director	excavation years	published	notes
Clibberswick			Unst		19th century excavation [1863]		Burials with an associated steatite source used during the Norse period. For instance this site may have supplied Norwick. Best documented burial found in Shetland.
Norwick	*Norr* [north] *vik* [bay]	Norwick	Unst	Ballin Smith	2003-5	Ballin Smith, ed 2007; Ballin Smith 2007	The excavation of a medieval graveyard exposed a multiple phase site beginning in the Iron Age. The Norse phase of this has been radiocarbon dted to 660-950AD ±2σ using carbonized grain and food. There is a high percentage of Norwegian steatite goods and local pottery which also help to date this phase.
Hesta Ness	*Hestr-Nes* [horse headland]		Fetlar				steatite quarry used during Viking Age and Late Norse period
Standibrough			Fetlar				potential monastic site of Late Norse date
Stobister	*Stova* [wooden house] *bustaðir* [secondary farm]		Bressay	Smith and Simpson, survey		discussed in Smith 2007	This is a wilderness settlement of a small house of 2 squared rooms with an associated yard. This is assumed to have had later Norse occupation, of the 13th century due to the ending of the place name and the shape of the buildings. This appears to be a permenent deserted settlement from the medieval period.
Kirki Geo			Fair Isle				Located on the vitual bridge between Orkney and Shetland.
Breckon Cullivoe			Yell	CEU	1983		Norse/ medieval; boat shaped setting of slabs
St Ninian's Isle				O'Dell	1955-7		early medieval, etc; single steatite hogback in the same chapel yard where St Ninian's Isle horde was found
South Whiteness		South Whiteness Churchyard	Mainland			Stummann Hansen 2000	1938- a gravedigger finds an iron axe in a stone lined grave
Ward Hill		Sumburgh	Mainland			Stummann Hansen 2000	bronze tortoise brooch found while digging WW2 trenches- dates to a disturbed 9th century female burial
Setters			Unst	Larsen and Stummann Hansen	1996	Stummann Hansen 2000	House 1 is a longhouse c. 23x5m and of a similar format to that at Hamar; format of house and artefact typology suggest a Viking Age date for this site
Watlee			Unst	Larsen and Stummann Hansen	mapped 1999	Stummann Hansen 2000	House 1 is a longhouse c.14x4.5m and of a similar format to that at Hamar; format of house house length suggest a Medieval date for this material
Stoora Toft			Unst	Larsen and Stummann Hansen	surveyed 1995	Stummann Hansen 2000	5 structures on steep slope outside of later infields- House 1 is a classic longhouse with Structure 4 as an associated building
Soterberg		Haroldswick	Unst	Larsen and Stummann Hansen	mapped 1995, local excavations 1970s, trial excavation 1997	Stummann Hansen 2000	multiperiod site with Iron Age and Norse material; the Scandinavian house is similar in size and format to those at Hamar and Setters
Gardie		Haroldswick	Unst	Larsen and Stummann Hansen	trial excavation 1995	Stummann Hansen 2000	main structure is a longhouse with curved walls 14x4.5m; there were no finds as excavation was trial only but size of building and format suggests a Medieval date of construction

site name	Old Norse Name	location	island	director	excavation years	published	notes
Da Biggins		Biggins	Papa Stour	Crawford	1980-90	Crawford 1985; Crawford and Ballin Smith 1999	Norse farm located on rich land with continuous utilization since the late Norse period
Papa Stour	*Papa øy* [Priest island]		Papa Stour	Allen	1980-3	archived but unpublished	Chapel site (surveyed)
Catpund	*cat* [cat] *pund* [animal enclosure]	Cunningsburgh	Mainland	Smith, Carter, Turner	1988	Ballin Smith 2005	Steatite/ house; steatite quarries on either side of the Burn
Jarlshof		Sumburgh	Mainland	Hamilton	from 1897	Curle 1935, 1936, 1954; Hamilton 1956	Multiperiod site which is arguably the most famous of the Shetlandic sites this site's excavations were paused by World War 2. Seven phases of Norse settlement were found including 3 farmsteads and associated outbuildings. The original long house was 21m x 6m with bowed walls that were 1.5m thick; this is the typesite for much of the north Atlantic
Kebister	*keipr* [rowlock] *bustaðir* [secondary farm]	Kebister	Mainland	Owen	1983-7	Owen and Lowe 1999	Multiperiod site with a broch. No Norse farm was actually found to be located at the time of publication but toponymic evidence and Norse steatite forms hint at a nearby Norse settlement that is as of yet unfound. Also 2 Christian burials dating to the 10th century
Upper Scalloway	Skálarvagr [bay of huts]	Scalloway	Mainland	Sharples		Sharples 1998	The rescue excavation of this broch site uncovered a midden radiocarbon dated to the Norse period in Final Phase 3 of the site. No settlement was located at the time of publication. Heavy modern impact was found to have occurred on the upper strata levels. The modern village is related to the booth site for the Shetlandic Alþing
Old Scatness		Dunrossness	Mainland	Dockrill and Bond	1983, 1995- now	partially- ongoing, Carter, McCullagh and MacSween 1995	Extensive multiperiod site with Norse occupation layers.
Law Ting Holm	*þing-holm* [assembly-island]	Tingwall	Mainland				meeting place for legal and political matters; traces of the stone enclosure for the þing as well as a causeway
Castle of Strom		island in the Loch of Strom	Mainland				unconfirmed but likely late Norse fortification
Quendale			Mainland				silver horde deposited AD991-1000 found in the early 19th century [now lost]
Sandwick		Sandwick	Unst	Bigelow	1978-80	Bigelow 1985	Norse farm/ Pict grave
Underhoull			Unst	Small	1962-5	Small 1967, 1968	Pictish/Norse houses; full sequence unknown
Hamar			Unst	Larsen and Stummann Hansen	1995	Stummann Hansen 2000	23x5m long house with bowed sides and byre similar to early phases at the Brough of Birsay

Zone 1 Central Places Table: Shetland

	Sites -->	St Ninian's Isle	South Whiteness	Ward Hill	Setters	Watlee	Stoora Toft	Soterberg	Gardie
Small finds									
	gold								
	silver								
	coins								
	weights and balances								
	weaponry		x						
	horse harness								
	high artistic quality			x					
	(semi)precious stones								
	religious objects								
	glass vessels								
	copper alloy vessels			x					
	luxury pottery								
	production of luxuries								
	production of weaponry								
	steatite production								
	steatite				x		x	x	
	bone								
	beads								
	ivory								
	antler								
	textiles								
	production of textiles								
	wooden objects								
	grass-marked pottery						x		
	production of iron								
	iron		x		x		x		
	sculpture								
Settlement structure									
	large settlement								
	large building								
	large enclosed yard [> 15m]					x			
	enclosed farmyard [<15m]				x		x	x	x
	stock pen [<15m]								
	hall house				x	x	x	x	x
	cemetary		x?						
	wealthy grave		x	x					
	rune stone								
	landing site (shallow,often sandy bay)								
	boat house								
	fortification								
	court site								
	infields/outfield system				x	x	x		x
	midden								
	shieling/ saeter associated in some way								
	outbuildings (generally including stables/byre but not always)				x	x	x	x	x
	multi-cellular farm dwelling				x	x		x	x
Landscape setting									
	rich resources				x	x	x	x	x
	commanding position					x		x	
	placed in power landscape							x	
	placed near communication route				x	x		x	
	church/ chapel								
	medieval manor							x	
	ready water supply				x	x	x	x	x
	remote location						x		x
	whaling area								
	alignment downslope				x	x	x	x	x
	relatively flat arable lands for agriculture/ animal husbandry				x			x	x
Written sources									
	evidence of royal estate								
	evidence of manorial estate								
	sacral place name								
	organizational place name								
	direct mention in saga								
	religious written material concerning								
	historic mention								
	excavation reports								
	survey reports				x	x	x	x	x

	Sites -->	Clibberswick	Norwick	Hesta Ness	Standibrough	Stobister	Kirki Geo	Breckon Cullivoe
Small finds								
	gold							
	silver	x						
	coins							
	weights and balances							
	weaponry							
	horse harness							
	high artistic quality	x						
	(semi)precious stones							
	religious objects							
	glass vessels							
	copper alloy vessels	x						
	luxury pottery							
	production of luxuries							
	production of weaponry							
	steatite production	x		x				
	steatite	x	x	x				
	bone							
	beads	x						
	ivory							
	antler							
	textiles							
	production of textiles							
	wooden objects							
	grass-marked pottery		x					
	production of iron							
	iron	x	x					
	sculpture							
Settlement structure								
	large settlement							
	large building				x			
	large enclosed yard [> 15m]							
	enclosed farmyard [<15m]					x		
	stock pen [<15m]							
	hall house							
	cemetary	x	x					
	wealthy grave	x						x
	rune stone							
	landing site (shallow,often sandy bay)							
	boat house							
	fortification							
	court site							
	infields/outfield system							
	midden							
	shieling/ saeter associated in some way							
	outbuildings [generally including stables/byre but not always]			x				
	multi-cellular farm dwelling					x		
Landscape setting								
	rich resources	x		x				
	commanding position							
	placed in power landscape	x		x				
	placed near communication route							
	church/ chapel				x			
	medieval manor							
	ready water supply							
	remote location							
	whaling area							
	alignment downslope					x		
	relatively flat arable lands for agriculture/ animal husbandry							
Written sources								
	evidence of royal estate							
	evidence of manorial estate							
	sacral place name						x	
	organizational place name							
	direct mention in saga							
	religious written material concerning							
	historic mention							
	excavation reports	x	x					x
	survey reports	x	x					x

	Sites -->	Upper Scalloway	Old Scatness	Law Ting Holm	Castle of Strom	Quendale	Sandwick	Underhoull	Hamar
Small finds									
	gold								
	silver					x			
	coins					x			
	weights and balances								
	weaponry								
	horse harness								
	high artistic quality						x		
	(semi)precious stones								
	religious objects								
	glass vessels								
	copper alloy vessels						x		
	luxury pottery								
	production of luxuries								
	production of weaponry								
	steatite production								
	steatite	x	x				x	x	x
	bone	x	x				x	x	
	beads								
	ivory								
	antler						x		
	textiles								
	production of textiles	x					x	x	
	wooden objects								
	grass-marked pottery	x	x				x	x	
	production of iron								
	iron	x	x				x	x	
	sculpture								
Settlement structure									
	large settlement		x				x	x	
	large building						x	x	
	large enclosed yard [> 15m]								
	enclosed farmyard [<15m]						x	x	x
	stock pen [<15m]								
	hall house						x	x	x
	cemetary								
	wealthy grave								
	rune stone								
	landing site (shallow,often sandy bay)			x					
	boat house			x					
	fortification				x?				
	court site			x					
	infields/outfield system							x	x
	midden	x	x				x	x	
	shieling/ saeter associated in some way								
	outbuildings [generally including stables/byre but not always]						x	x	x
	multi-cellular farm dwelling		x				x	x	x
Landscape setting									
	rich resources	x	x				x	x	x
	commanding position	x	x	x			x	x	
	placed in power landscape	x	x	x			x	x	
	placed near communication route	x	x	x			x	x	x
	church/ chapel								
	medieval manor	x							
	ready water supply	x	x				x	x	x
	remote location								
	whaling area								
	alignment downslope	x	x				x	x	x
	relatively flat arable lands for agriculture/ animal husbandry	x	x				x	x	x
Written sources									
	evidence of royal estate								
	evidence of manorial estate								
	sacral place name			x					
	organizational place name			x					
	direct mention in saga								
	religious written material concerning								
	historic mention			x					
	excavation reports	x	x				x	x	
	survey reports	x	x				x	x	x

	Sites -->	Da Biggins	Papa Stour	Catpund	Jarlshof	Kebister
Small finds						
	gold					
	silver		x			
	coins		x			
	weights and balances					
	weaponry					
	horse harness					
	high artistic quality	x	x			
	(semi)precious stones					
	religious objects		x			
	glass vessels					
	copper alloy vessels					
	luxury pottery					
	production of luxuries					
	production of weaponry					
	steatite production			x		
	steatite	x		x	x	x
	bone	x			x	x
	beads					
	ivory					
	antler				x	
	textiles	x				
	production of textiles	x			x	x
	wooden objects	x			x	
	grass-marked pottery	x			x	
	production of iron					
	iron	x			x	
	sculpture		x	x		
Settlement structure						
	large settlement				x	
	large building	x			x	
	large enclosed yard (> 15m)	x			x	
	enclosed farmyard (<15m)					
	stock pen (<15m)					
	hall house	x		x	x	
	cemetary		x			x
	wealthy grave		x			
	rune stone			x		
	landing site (shallow,often sandy bay)				x	
	boat house					
	fortification					
	court site					
	infields/outfield system				x	
	midden	x			x	
	shieling/ saeter associated in some way					
	outbuildings (generally including stables/byre but not always)	x			x	
	multi-cellular farm dwelling	x			x	
Landscape setting						
	rich resources	x		x	x	x
	commanding position	x			x	x
	placed in power landscape	x		x	x	
	placed near communication route	x			x	x
	church/ chapel		x			x
	medieval manor				x	x
	ready water supply	x			x	x
	remote location					
	whaling area					
	alignment downslope	x			x	
	relatively flat arable lands for agriculture/ animal husbandry	x			x	x
Written sources						
	evidence of royal estate	x				
	evidence of manorial estate					
	sacral place name		x			
	organizational place name			x		x
	direct mention in saga					
	religious written material concerning					
	historic mention	x				
	excavation reports	x	x	x	x	x
	survey reports	x	x	x	x	x

Zone 1 Sites: Faroe Islands

Site	Location	Island	excavation	notes
Í Eingjartoftum	Sandavágur	Vágar	1956	settlement located high in the old infield; medieval due to lack of longhouses and inclusion of proper fire places in several of the houses
Við Hanusá	Sørvágur	Vágar	1957	farm complex located high in the cultivated infield which has resulted in a quite disturbed site; longhouse 17.75m x 6.7m; the oldest longhouse is 20.75m with a central fireplace 3.7m long with 2 parallel rows of posts
	Giljanes	Vágar		unexcavated; suspected burial mound
Yviri í Trøð	Tjørnuvík	Streymoy	1940	12 Christian graves present that were dated to post-1000AD
Niðri í Toft	Kvívik	Streymoy	1941	20m longhouse and byre, both partially eroded; the house contains a central long hearth, earth built benches on the long walls, stone walls with an earthen core, 2 parallel rows of posts to support the roof; the byre contains small stalls and a paved central drain; the byre is 1-2m shorter at the preserved end
Kirkjubøur	Kirkjubøur	Streymoy		site under continual utilization; majority of site is unexcavated with the exception of the current church; the establishment of a cathedral in combination with the excellent location are strong evidence for a previous successful Viking Age farm; this was the Bishopric seat for the entirity of the Faroe Islands under the Archbishopric of Niðaros by 1152-3AD
Havgrímsgrøv	Hov	Streymoy		burial mound (?) excavated in 1835 by the local farm; stone ringed burial with burial mound constructed over; supposed burial goods from the pagan period as well
Tinganes	Tórshavn	Streymoy		Þing-site for the Faroes established during the post-Viking Age; headland is located between substantial harbors to either side
Í Uppistovubeitnum	Leirvík	Eysturoy	1987-1999	Norse settlement located in the old infield- substantial amounts of animal bones found
Toftanes	Leirvík	Eysturoy	1982-7, 1987-99	20m x 5m longhouse dated to 900AD; stonewalls with earthen core covered with turf; long hearth 5m long; 5 pairs of roof supports; side wall benches; the eastern end may have held a byre as drainage is present; accompanying outbuildings located to the north and south with wooden inner walls with outer walls of stone, earth and peat
Argisbrekka	Eiði	Eysturoy	1985-7	18 buildings were uncovered, 17 of these dated to the Viking Age within 6-7 phases indicating a long period of use within the shieling economy; buildings were constructed of turf, sand, clay and gravel; 2 settlement areas each with 7-10 buildings were found with concurrent utilization during the 10th century
Við Gjógvará	Fuglafjørður	Eysturoy	1958	longhouse and byre in the heimrust excavated during the 1950s
Niðri við hús	Suðrugøta	Eysturoy	1940	remains of a cemetary found and two graves found; no grave goods found and presumed to be medieval
Norðuri í Forna	Suðrugøta	Eysturoy	1950	long house site located in the infield; internally 9mx 2.5m
Undir Junkarínsfløtti	Sandur	Sandoy	2000- present	largest zooarchaeological assemblage associated with the Faroes found; 2.5m thick cultural deposits associated with the heimrust farm mound; neutral soil pH; 3 phased site from 9th to 13th century; pigs present until the medieval period
Á Sondum	Sandur	Sandoy	2000	located across the bay from Junkarinsflottur; Viking and Norse period settlement
Við Kirkjugard	Sandur	Sandoy	1969	5 phases of church from the eleventh century; also an associated coin hoard of 98 silver coins ranging from 1000-1090AD found on site during the mid-nineteenth century

Zone 1 Central Places Table: Faroe Islands

Sites -->	Eiðisstorfur	Við Hamrar	Gillanes	Tvørá Tjørn	Nólsoy Tjørn	Kirkjubøur	Hestvíkarnes	Tórsanes	Undirvatnið	Tjørnes	Argisbreiða	Við Gilsbrekku	Nólsoy Við Nes	Norðuri Horna	Undir Lambamýrlatið	Á Sondum	Við Kirkjuvág
gold																	
silver																	x
coins																	x
weights and balances																	
weaponry																	
horse harness																	
high artistic quality						x											x
(semi-)precious stones																	
religious objects						x											x
glass vessels						x											x
copper alloy vessels				x		x				x							
luxury pottery																	
production of luxuries																	
production of weaponry																	
plaster production																	
steatite					x	x			x	x	x	x			x	x	x
bone				x	x	x			x	x	x	x			x	x	x
beads					x												
ivory										x							
antler										x							
textiles																	
production of textiles										x	x				x	x	
wooden objects					x	x				x	x	x			x	x	x
grass-marked pottery										x	x	x			x	x	
production of iron											x						
iron				x	x	x				x	x	x				x	x
sculpture						x											x
large settlement	x					x					x					x	x
large building					x	x				x					x	x	x
large enclosed yard (> 15m)						x				x	x	x			x		x
enclosed farmyard (<15m)		x														x	
stock pen (<15m)						x					x						
hall house	x	x			x	x			x	x		x	x	x	x	x	
cemetery				x										x			x
wealthy grave			x?					x?									
rune stone																	
landing site (shallow often sandy bay)					x	x				x		x			x	x	x
boat house																	
fortification																	
court site								x									
infields/outfield system	x	x				x			x	x		x		x		x	x
middens									x	x	x				x	x	x
shieling/ saeter associated in some way									x	x							
outbuildings (generally including																	
shielings/byre but not always)	x	x			x				x	x	x	x			x	x	x
multi-cellular farm dwelling		x			x	x			x	x		x		x	x	x	
rich resources	x	x			x	x		x	x	x	x	x		x	x	x	x
commanding position	x				x	x		x		x		x			x	x	x
placed in power landscape				x	x	x		x		x		x			x	x	x
placed near communication route	x	x		x	x	x		x	x	x		x		x	x	x	x
church/ chapel				x		x									x		x
medieval manor						x									x		x
ready water supply	x	x			x	x		x	x	x	x	x		x	x	x	x
remote location		x		x					x		x		x				
whaling area					x	x		x		x		x			x	x	x
allanvent downstone	x	x			x	x			x	x	x	x		x	x	x	
relatively flat arable lands for agriculture/ animal husbandry	x	x		x	x	x		x	x	x		x		x	x	x	x
evidence of royal estate																	
evidence of manorial estate						x									x		x
sacral place name						x		x									
orrganizational place name						x		x									
direct mention in skra						x											
religious written material concerning						x											
historic mention						x		x									
excavation reports	x	x		x	x	x				x	x	x	x	x	x	x	x
survey reports	x	x		x	x	x			x	x	x	x	x	x	x	x	x

site name	location	date	excavation years	publication	notes				
Bergþórshvoll		12th-13thc	1926-8, 1931, 1950	Eldjárn and Gestsson	byre present under a later long house and associated outbuildings, incompletely recorded				
Goðatættur	island	11th-12thc	1969, 1971	Eldjárn 1989	a long house with singular outbuilding				
Herjólfsdalur	Vestmanneyar	10th-11thc	1971-83	Hermanss-Auðardóttir 1989, 1991	2 long houses with a combined 6 outbuildings between them				
Hólmur		late 9th-10thc	1996-7, 1999-2001	Einarsson 2000, 2002, 2003	long house, with associated pithouse and 2 outbuildings, only partially excavated				
Stóraborg		late 9th-10thc	1985	Snæsdóttir 1992	singular pithouse found				
Aðalstræti	Reykjavík	late 9th-10thc	1971-5, 2001-3, 2009-?	Nordahl 1988; Roberts 2004; Roberts et al 2002, 2003; Sveinbjarnardóttir et al 2004; Sverrisdóttir, ed 2006	turf built wall predates Landnam tephra, 2 phase long house first constructed just after this eruption; recent excavations have uncovered 10+ meters of corduroy walk and evidence of metal working				
Suðurgata	Reykjavík	10thc	1971-5	Nordahl 1988, Sigurðardóttir 1987	long house with attached smithy partially damaged by more recent construction, a secondary long house may be located close by; site is also an easy walk from Aðalstræti				
Bessastaðir	Reykjavík	10th-early 11thc	1986-96	Nelson and Takahashi 1999; Hreiðarsdóttir 2005	long house with associated pithouse, both of which are partially covered by tephra from the 1230 eruption as well as modern buildings				
Hofsstaðir	Garðabær, Reykjavík	10th-12thc	1994-2000	Traustadóttir 2005	fairly poorly preserved long house suffering from more recent construction				
Viðey	Reykjavík	11thc	1986-94	Hallgrímsdóttir 1989, 1991; Kristjansdóttir 1995	long house, partially excavated				
Þingnes	Reykjavík	late 9th-10thc	1981	Ólafsson 1987	long house, partially excavated				
Hjálmsstaðir		late 9th-11thc	1983-5	Ólafsson 1992	pithouse with 2 phases				
Hvítárholt		late 9th-11thc	1963-7	Hreiðarsdóttir 2005; Magnusson 1973; Tauber 1968	multiphase site ranging throughout the period, two multiperiod long houses with 5 associated pithouses and 2 outbuildings				
Laugar		12th-13thc	1895, 1897, 1945	Bruun 1928; Eldjárn 1949; Erlingsson 1899	long house which was excavated quite early				
Þórarinsstaðir		11-13thc	1945	Eldjárn 1949	long house and 4 outbuildings				
Undir Lambhöfða	Þjórsádalur	11-13thc	1895	Bruun 1928; Erlingsson 1899	long house with 2 associated outbuildings suffering from erosion				
Áslákstunga innri	Þjórsádalur	<13thc	1895	Bruun 1928; Erlingsson 1899	long house with 3 associated outbuildings				
Áslákstunga fremri	Þjórsádalur	<13thc	1895, 1939	Erlingsson 1899; Stenberger 1943a	long house with 2 associated outbuildings suffering from erosion to the east				
Stórhólshlið	Þjórsádalur	<13thc	1939	Voionmaa 1943	long house site with 2 associated outbuildings				
Snjáleifartóttir	Þjórsádalur	10th-11thc	1939	Stenberger 1943d	long house site with 2 associated outbuildings				
Skallakot	Þjórsádalur	10th-11thc	1939, 2001	Gestsdóttir 2002; Roussell 1943a	long house site superceded by a sheephouse				
Sámsstaðir	Þjórsádalur	late 9th-early 10thc, 11th-12th	1895, 1971-2	Erlingsson 1899; Rafnsson 1977	multiperiod site with apparent break in utilization, early phases have 1 long house with 2 associated outbuildings while later phases only a long house has been found				
Skeljastaðir	Þjórsádalur	11th-13thc	1939	Erlingsson 1899; Þórðarson 1943	3 long houses and 2 outbuildings of uncertain relationship				
Stöng	Þjórsádalur	11th-13thc	1939, 1983-6	Eldjárn 1971; Roussell 1943b; Vilhjálmsson 1989b	earliest period long house only partially excavated, the later long house with 3 associated outbuildings were abandoned and preserved by volcanic activity during the mid-13th century				
Gjáskógar	Þjórsádalur	10th-13thc	1949, 1952, 1960	Eldjárn 1961a	early pithouse with associated smithying activity discovered, later phases have a long house and associated outbuilding; the tephra layer here may have been redeposited on this site				

Zone 2 Central Places Tables: Iceland

	A	B	W	X	Y	Z	AA	AB
1		Sites -->	Skallakot	Sámsstaðir	Skeljastaðir	Stöng	Gláskógar	Hofstaðir
2	**Small finds**							
3		gold						
4		silver						
5		coins						
6		weights and balances						
7		weaponry						
8		horse harness	x			x		x
9		high artistic quality						
10		(semi)precious stones						
11		religious objects						
12		*glass vessels*						
13		copper alloy vessels						
14		luxury pottery						
15		production of luxuries						
16		production of weaponry						
17		steatite production						
18		steatite				x		x
19		bone				x		x
20		beads				x		x
21		ivory				x		x
22		antler						
23		textiles				x		x
24		production of textiles				x		x
25		wooden objects	x			x		x
26		grass-marked pottery						
27		production of iron				x		x
28		iron				x		x
29		sculpture						
30	**Settlement structure**							
31		large settlement						
32		large building				x		x
33		large enclosed yard [> 15m]						
34		enclosed farmyard [<15m]						
35		stock pen [<15m]						
36		hall house	x	x	x	x	x	x
37		cemetary						
38		wealthy grave						
39		*rune stone*						
40		landing site (shallow,often sandy bay)						
41		boat house						
42		fortification						
43		court site						
44		infields/outfield system	x					
45		midden		x				
46		shieling/ saeter associated in some way	x		x	x	x	x
47		outbuildings [generally including stables/byre but not always]	x	x	x	x	x	x
48		multi-cellular farm dwelling		x		x		x
49	Landscape setting							
50		rich resources						
51		commanding position						
52		placed in power landscape						
53		placed near communication route						
54		church/ chapel						
55		medieval manor						
56		ready water supply	x	x	x	x	x	x
57		remote location						
58		*whaling area*						
59		alignment downslope						
60		relatively flat arable lands for agriculture/ animal husbandry	x			x		x
61	**Written sources**							
62		evidence of royal estate						
63		evidence of manorial estate						
64		sacral place name						
65		organizational place name						
66		direct mention in saga						
67		religious written material concerning						
68		historic mention						
69		excavation reports	x	x		x		x
70		survey reports	x	x		x		x

	A	B	R	S	T	U	V
1		Sites -->	Undir Lambhöfða	Áslákstunga innri	Áslákstunga fremri	Stórhólshlíð	Snjáleifartóttir
2	**Small finds**						
3		gold					
4		silver					
5		coins					
6		weights and balances					
7		weaponry					
8		horse harness					
9		high artistic quality					
10		(semi)precious stones					
11		religious objects					
12		glass vessels					
13		copper alloy vessels					
14		luxury pottery					
15		production of luxuries					
16		production of weaponry					
17		steatite production					
18		steatite			x	x	x
19		bone			x	x	x
20		beads					
21		ivory					
22		antler					
23		textiles					
24		production of textiles			x	x	
25		wooden objects					
26		grass-marked pottery					
27		production of iron					
28		iron					
29		sculpture					
30	**Settlement structure**						
31		large settlement					
32		large building					
33		large enclosed yard [> 15m]					
34		enclosed farmyard [<15m]					
35		stock pen [<15m]					
36		hall house	x	x	x	x	x
37		cemetary					
38		wealthy grave					
39		rune stone					
40		landing site (shallow,often sandy bay)					
41		boat house					
42		fortification					
43		court site					
44		infields/outfield system					
45		midden					
46		shieling/ saeter associated in some way					
47		outbuildings [generally including stables/byre but not always]	x	x	x	x	x
48		multi-cellular farm dwelling					
49	Landscape setting						
50		rich resources	x				x
51		commanding position					
52		placed in power landscape					x
53		placed near communication route					x
54		church/ chapel					
55		medieval manor					
56		ready water supply	x	x	x	x	x
57		remote location				x	
58		whaling area					
59		alignment downslope					
60		relatively flat arable lands for agriculture/ animal husbandry			x	x	x
61	**Written sources**						
62		evidence of royal estate					
63		evidence of manorial estate					
64		sacral place name					
65		organizational place name					
66		direct mention in saga					
67		religious written material concerning					
68		historic mention					
69		excavation reports	x	x	x	x	x
70		survey reports					

	A	B	M	N	O	P	Q
1		Sites -->	Þingnes	Hjálmsstaðir	Hvítárholt	Laugar	Þórarinsstaðir
2	Small finds						
3		gold					
4		silver					
5		coins					
6		weights and balances					
7		weaponry					
8		horse harness					
9		high artistic quality					
10		(semi)precious stones					
11		religious objects					
12		glass vessels					
13		copper alloy vessels					
14		luxury pottery					
15		production of luxuries					
16		production of weaponry					
17		steatite production					
18		steatite	x	x	x	x	x
19		bone	x	x	x	x	x
20		beads					
21		ivory					
22		antler					
23		textiles			x		
24		production of textiles	x	x	x		x
25		wooden objects			x		
26		grass-marked pottery					
27		production of iron			x		
28		iron		x	x		
29		sculpture					
30	Settlement structure						
31		large settlement					
32		large building			x		
33		large enclosed yard [> 15m]					
34		enclosed farmyard [<15m]					x
35		stock pen [<15m]			x		
36		hall house	x		x	x	x
37		cemetary					
38		wealthy grave					
39		rune stone					
40		landing site (shallow,often sandy bay)	x				
41		boat house					
42		fortification					
43		court site					
44		infields/outfield system			x		
45		midden	x		x		
46		shieling/ saeter associated in some way	x		x		x
47		outbuildings [generally including stables/byre but not always]		x	x		x
48		multi-cellular farm dwelling			x		
49	Landscape setting						
50		rich resources	x	x	x	x	
51		commanding position			x		
52		placed in power landscape			x		
53		placed near communication route	x		x	x	
54		church/ chapel					
55		medieval manor					
56		ready water supply	x	x	x	x	x
57		remote location					
58		whaling area					
59		alignment downslope			x		
60		relatively flat arable lands for agriculture/ animal husbandry	x		x	x	x
61	Written sources						
62		evidence of royal estate					
63		evidence of manorial estate					
64		sacral place name					
65		organizational place name	x		x		
66		direct mention in saga	x		x	x	
67		religious written material concerning			x		
68		historic mention	x		x		
69		excavation reports	x	x	x	x	x
70		survey reports			x	x	

	A	B	G	H	I	J	K	L
1		Sites -->	Störaborg	Aðalstræti	Suðurgata	Bessastaðir	Hofsstaðir	Viðey
2	Small finds							
3		gold						
4		silver						
5		coins						
6		weights and balances						
7		weaponry						
8		horse harness						
9		high artistic quality						
10		(semi)precious stones						
11		religious objects						
12		glass vessels						
13		copper alloy vessels						
14		luxury pottery						
15		production of luxuries						
16		production of weaponry						
17		steatite production						
18		steatite	x	x		x		x
19		bone	x	x	x	x		
20		beads						
21		ivory		x				
22		antler						
23		textiles		x		x		x
24		production of textiles		x	x	x		
25		wooden objects	x	x	x	x		
26		grass-marked pottery						
27		production of iron			x			
28		iron	x	x	x	x		
29		sculpture						
30	Settlement structure							
31		large settlement			x			
32		large building						
33		large enclosed yard [> 15m]		x				
34		enclosed farmyard [<15m]						
35		stock pen [<15m]				x		
36		hall house		x			x	x
37		cemetary						
38		wealthy grave						
39		rune stone						
40		landing site (shallow,often sandy bay)		x				
41		boat house						
42		fortification						
43		court site						
44		infields/outfield system		x		x		
45		midden	x	x		x		
46		shieling/ saeter associated in some way				x		x
47		outbuildings [generally including stables/byre but not always]	x		x	x		
48		multi-cellular farm dwelling						
49	Landscape setting							
50		rich resources	x	x	x			x
51		commanding position			x			
52		placed in power landscape			x			
53		placed near communication route	x	x	x			
54		church/ chapel						
55		medieval manor			x			x
56		ready water supply	x	x		x	x	
57		remote location					x	
58		whaling area	x		x			
59		alignment downslope		x				
60		relatively flat arable lands for agriculture/ animal husbandry		x			x	x
61	Written sources							
62		evidence of royal estate						
63		evidence of manorial estate						
64		sacral place name						
65		organizational place name			x			
66		direct mention in saga	x				x	x
67		religious written material concerning						x
68		historic mention			x		x	
69		excavation reports	x	x	x	x	x	x
70		survey reports	x	x	x			x

	A	B	C	D	E	F
1		Sites -->	Bergþórshvoll	Goðatærttur	Herjólfsdalur	Hólmur
2	**Small finds**					
3		gold				
4		silver				
5		coins				
6		weights and balances				
7		weaponry				
8		horse harness				
9		high artistic quality				
10		(semi)precious stones				
11		religious objects				
12		glass vessels				
13		copper alloy vessels				
14		luxury pottery				
15		production of luxuries				
16		production of weaponry				
17		steatite production				
18		steatite				
19		bone	x			
20		beads				
21		ivory				
22		antler				
23		textiles				
24		production of textiles	x			
25		wooden objects	x			
26		grass-marked pottery				
27		production of iron				
28		iron				
29		sculpture				
30	**Settlement structure**					
31		large settlement				
32		large building				
33		large enclosed yard [> 15m]				
34		enclosed farmyard [<15m]				
35		stock pen [<15m]				
36		hall house	x	x	x	x
37		cemetary				
38		wealthy grave				
39		rune stone				
40		landing site (shallow,often sandy bay)		x		
41		boat house				
42		fortification				
43		court site				
44		infields/outfield system			x	
45		midden	x		x	
46		shieling/ saeter associated in some way	x	x	x	x
47		outbuildings [generally including stables/byre but not always]	x	x	x	x
48		multi-cellular farm dwelling				
49	Landscape setting					
50		rich resources		x	x	
51		commanding position		x		
52		placed in power landscape		x		
53		placed near communication route				
54		church/ chapel				
55		medieval manor				
56		ready water supply	x	x	x	x
57		remote location	x	x		
58		whaling area				
59		alignment downslope				
60		relatively flat arable lands for agriculture/ animal husbandry	x			
61	**Written sources**					
62		evidence of royal estate				
63		evidence of manorial estate				
64		sacral place name				
65		organizational place name				
66		direct mention in saga	x		x	
67		religious written material concerning	x			
68		historic mention	x		x	
69		excavation reports	x	x		
70		survey reports				x

site name	location	date	excavation years	publication	notes
L'Anse aux Meadows	New World	late 10th century	since 1960	Wallace 1991, 2009	three longhouses and associated outbuildings found, including iron processing, with short occupation
Gard Under Sand	Western Settlement	11-13th century	1990-2000	Albrethsen 2003	rescue excavation of small farm network preserved under alluvially deposited glacial sands

Zone 3 Central Places Table: LAM

	Sites -->	L'Anse aux Meadows
small finds		
	gold	
	silver	
	coins	
	weights and balances	
	weaponry	
	horse harness	
	high artistic quality	x
	(semi)precious stones	
	religious objects	
	glass vessels	
	copper alloy vessels	x
	luxury pottery	
	production of luxuries	
	production of weaponry	
	steatite	x
	bone	x
	ivory	
	wooden objects	x
	iron	x
settlement structure		
	large settlement	
	large building	
	large enclosed yard [> 15m]	
	stock pen [<15m]	
	hall house	x
	cemetary	
	wealthy grave	
	rune stone	
	landing site (shallow,often sandy bay)	x
	boat house	
	fortification	
	court site	
	infields/outfield system	
	shieling/ saeter associated in some way	
	outbuildings including stables/byre	x
	multi-cellular farm dwelling	
landscape setting		
	rich resources	x
	commanding position	x
	placed in power landscape	
	placed near communication route	x
	medieval church	
	medieval manor	
	ready water supply	x
	whaling area	x
	relatively flat arable lands for agriculture/ animal husbandry	
written sources		
	evidence of royal estate	
	evidence of manorial estate	
	sacral place name	
	organizational place name	?x
	direct mention in saga	?x
	religious written material concerning	
	excavation reports	x
	survey reports	x

site name	location	date	excavation years	publication	notes
Herjolfnes	Ikigiat	early 20th century	1920s	Hovgaard 1925	One of the most famous efforts of conservation associated with excavation of medieval church and yard
Hvalsey	Tasiusaq	antiquarian efforts with modern re-excavation	2000's	Arneborg, Larsen and Clemmsen	stone built church which largely is intact, also affiliated nearby farms
Gardr	Igaliku	antiquarian efforts with modern re-excavation	1975-80s	Norlund 1936; smaller articles	Episcopal seat for Greenland, large farm complex, evidence for cathedral, tithe barns and cemetary
Brattahlid	Qassiarsuk	antiquarian efforts with modern re-excavation	2000s	Norlund 1936; smaller articles	large settlement on the Eiriksfjord with two farm units, outbuildings, small stone cathedral to St Nicholas

Zone 3 Central Places Table: Eastern Settlement [Excavated]

	Sites -->					
place name: Inuit		Qassiarsuk	Igaliku	Ikigiat	Tasiusaq	
site name: Norse		?Brattahlid	Gardr	Herjolfnes	Hvalsey	
site name: other						GUS
small finds						
	gold		x			
	silver		x			
	coins					
	weights and balances					
	weaponry					
	horse harness					
	high artistic quality		x	x	x	
	(semi)precious stones					
	religious objects	x	x	x	x	
	glass vessels					
	copper alloy vessels		x			
	luxury pottery		x			
	production of luxuries		x	x	x	
	production of weaponry					
	steatite	x	x	x	x	x
	bone	x	x	x	x	x
	ivory		x	x	x	x
	wooden objects	x	x	x	x	x
	iron	x	x	x	x	x
settlement structure						
	large settlement		x			
	large building	x	x			
	large enclosed yard [> 15m]		x			
	stock pen [<15m]	x	x			
	hall house	x	x	x	x	x
	cemetary	x	x	x	x	
	wealthy grave		x	x	x	
	rune stone					
	landing site (shallow,often sandy bay)	x	x	x	x	
	boat house					
	fortification					
	court site	?x	?x			
	infields/outfield system	x	x			x
	shieling/ saeter associated in some way	x	x			
	outbuildings including stables/byre	x	x	x	x	x
	cave utilization					
	multi-cellular farm dwelling	x	x			x
landscape setting						
	rich resources	x	x	x	x	x
	commanding position	x	x	x	x	
	placed in power landscape	x	x	x	x	
	placed near communication route	x	x	x	x	x
	medieval church	x	x	x	x	
	medieval manor		?x			
	ready water supply	x	x	x	x	x
	whaling area					
	relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x
written sources						
	evidence of royal estate					
	evidence of manorial estate		x			
	sacral place name					
	organizational place name		?x	x		
	direct mention in saga	x	x	x	x	
	religious written material concerning	x	x	x	x	
	excavation reports	x	x	x	x	x
	survey reports	x	x	x	x	x

Zone 3 Central Places Table: Eastern Settlement [Surveyed]

Sites -->	566	00-9	561	578	00-8	562	558	559	560	567
place name: Inuit	Sillisit	Sillisit South, Tunulliarfik Fiord	Sillisit South, Tunulliarfik Fiord	Sillisit Itinnera	Sillisit Itinnera		Iliorsuakut	Kangerlua	Nuussaq, Kaneerlua	Karra, Tunulliarfik Fiord
site name: Norse	ardsteinsberg									
site name: other										
small finds										
gold										
silver										
coins										
weights and balances										
weaponry										
horse harness										
high artistic quality										
(semi)precious stones										
religious objects										
glass vessels										
copper alloy vessels										
luxury pottery										
production of luxuries										
production of weaponry										
steatite										
bone										
ivory										
wooden objects										
iron										
settlement structure										
large settlement	x							x		x
large building	x		x	x			x	x	x	x
large enclosed yard (> 15m)	x		x	x		?x		x	x	
stock pen (<15m)	x	x	x	x	x		x	x	x	x
hall house									x	?x
cemetary										
wealthy grave										
rune stone										
landing site (shallow,often sandy bay)	x				x			x	x	x
boat house	?x				?x				?x	?x
fortification										
court site										
infields/outfield system			x					x		
shieling/ saeter associated in some way	x	x	x	x	x	x	x	x	x	x
outbuildings including stables/byre	x	x	x	x		x	x	x	x	x
cave utilisation		x	x	x						
multi-cellular farm dwelling	x		x	x			x	x	x	x
landscape setting										
rich resources	x	x	x	x	x	x	x	x	x	x
commanding position	x							x	x	x
placed in power landscape	x									
placed near communication route	x							x		x
medieval church	x									
medieval manor										
ready water supply	x		x	x	x	x	x	x	x	x
whaling area	x									
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x	x	x	x
written sources										
evidence of royal estate										
evidence of manorial estate										
sacral place name										
organizational place name	x									
direct mention in saga	x									
religious written material concerning	x									
excavation reports										
survey reports	x	x	x	x	x	x	x	x	x	x

Sites -->	00-4	S63	S64	00-6	S57	00-7	S65
place name: Inuit	Ivigaqarfik Qaqqaa	Issormiut Qaqqaa	Maajuut	Issormiut North	Sillisit Itinnera	Sillisit Itinnera	Issormiut
site name: Norse							
site name: other					Wolfe's Farm		
small finds							
gold							
silver							
coins							
weights and balances							
weaponry							
horse harness							
high artistic quality							
(semi)precious stones							
religious objects							
glass vessels							
copper alloy vessels							
luxury pottery							
production of luxuries							
production of weaponry							
steatite							
bone							
ivory							
wooden objects							
iron							
settlement structure							
large settlement							
large building	x	x			x		x
large enclosed yard (> 15m)	x	x					x
stock pen (<15m)	x	x	x		x	x	x
hall house			x				?X
cemetary							
wealthy grave							
rune stone							
landing site (shallow,often sandy bay)				x			x
boat house							
fortification							
court site							
infields/outfield system	x		x				x
shieling/ saeter associated in some way		x	x		x	x	x
outbuildings including stables/byre	x	x	x	x	x		x
cave utilization							x
multi-cellular farm dwelling	x	x			x		x
landscape setting							
rich resources	x	x	x	x	x	x	x
commanding position					x		x
placed in power landscape							
placed near communication route							x
medieval church							
medieval manor							
ready water supply	x	x	x	x	x	x	x
whaling area							x
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x
written sources							
evidence of royal estate							
evidence of manorial estate							
sacral place name							
organizational place name							
direct mention in saga							
religious written material concerning							
excavation reports							
survey reports	x	x	x	x	x	x	x

Sites -->	548	553	549	551	550	552	554	555	00-5	556
place name: Inuit	Ammassivik	Ammassiviup Qaqqaa	Tasersuasik	Ipiutaq	Innarsuup Karra	Sivingarnersuaq, Sermilik	Ivisassat	Innerulialik	Qaarsuarsuk	Ivigaqarfik
site name: Norse										
site name: other										
small finds										
gold										
silver										
coins										
weights and balances										
weaponry										
horse harness										
high artistic quality										
(semi)precious stones										
religious objects										
glass vessels										
copper alloy vessels										
luxury pottery										
production of luxuries										
production of weaponry										
steatite										
bone										
ivory										
wooden objects										
iron										
settlement structure										
large settlement						x				x
large building			x	x		x		x		x
large enclosed yard (> 15m)										x
stock pen (<15m)	x	x	x	x	x	x	x	x	x	x
hall house						x				
cemetary										
wealthy grave										
rune stone										
landing site (shallow,often sandy bay)				x	x	x	x	x		x
boat house						?x				
fortification										
court site										
infields/outfield system			x					x		x
shieling/ saeter associated in some way	x	x		x	x			x	x	x
outbuildings including stables/byre	x		x	x		x	x	x		x
cave utilization										
multi-cellular farm dwelling			x	x		x	x	x		x
landscape setting										
rich resources	x		x	x	x	x	x	x	x	x
commanding position				x		x		x		x
placed in power landscape										
placed near communication route				x	x	x		x		x
medieval church										
medieval manor										
ready water supply	x		x	x			x	x	x	x
whaling area				x				x		x
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x	x		x
written sources										
evidence of royal estate										
evidence of manorial estate										
sacral place name										
organizational place name										
direct mention in saga										
religious written material concerning										
excavation reports										
survey reports	x	x	x	x	x	x	x	x	x	x

Sites -->	542	538	539	528	540	541a	541	543	544	545	546	547
place name: Inuit	Tasersuaq	Qassiarsuk	Qassiarsuk	Sammisoq	Qassiarsuk	Qassiarsuk	Qassiarsuk South	Nunakullak	Arfiorfik	Nunataaq	Inussuerineq	Qaqqarsuatsiaq
site name: Norse			?Brattahlid							?Gardanes		
site name: other		Fjeldbygden			Elvgaarden							
small finds												
gold												
silver												
coins												
weights and balances												
weaponry												
horse harness												
high artistic quality												
(semi)precious stones												
religious objects												
glass vessels												
copper alloy vessels												
luxury pottery												
production of luxuries												
production of weaponry												
steatite												
bone												
ivory												
wooden objects												
iron												
settlement structure												
large settlement			x		x					x		
large building	x	x	x		x	x	x	x	x	x	x	x
large enclosed yard (> 15m)			x	x	x	x	x	x		x	x	
stock pen (<15m)	x	x	x	x	x		x	x	x	x	x	
hall house			x			x					x	x
cemetary			x									
wealthy grave												
rune stone												
landing site (shallow,often sandy bay)	x		x	x	x	x	x		x	x		
boat house				?x								
fortification												
court site												
infields/outfield system	x		x		x	x	x	x		x	x	
shieling/ saeter associated in some way	x	x	x	x			x				x	
outbuildings including stables/byre	x	x	x	x	x	x	x	x	x	x	x	x
cave utilization												
multi-cellular farm dwelling	x		x		x	x	x	x	x	x	x	x
landscape setting												
rich resources	x	x	x	x	x	x	x	x	x	x	x	x
commanding position			x		x	x	x		x	x		
placed in power landscape		x	x		x					x		
placed near communication route	x		x	x	x	x	x		x	x		
medieval church			x							x		
medieval manor												
ready water supply	x	x	x	x	x	x	x	x	x	x	x	x
whaling area			x		x	x	x			x		
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x	x	x	x	x	x
written sources												
evidence of royal estate												
evidence of manorial estate			x									
sacral place name										x		
organizational place name			x									
direct mention in saga										x		
religious written material concerning			x							x		
excavation reports			x		x	x	x					
survey reports	x	x	x	x	x	x	x	x	x	x	x	x

Sites -->	S33	S37	S32	S34	00-2	S35	S36	00-3
place name: Inuit	Qorlortup Itinnera	Sammisoq Timaa	Sammisoq Timaa	Qorlortup Itinnera, Tasiusaq	Qorlortup Itinnera Qaqqaa	Tasiusaq	Tasiusaq	Tasiusaq, Sammisoq Timaa
site name: Norse								
site name: other								
small finds								
gold								
silver								
coins								
weights and balances								
weaponry								
horse harness								
high artistic quality								
(semi)precious stones								
religious objects								
glass vessels								
copper alloy vessels								
luxury pottery								
production of luxuries								
production of weaponry								
steatite								
bone								
ivory								
wooden objects								
iron								
settlement structure								
large settlement							x	
large building				x		x	x	
large enclosed yard (> 15m)				x	x	x	x	x
stock pen (<15m)	x	x	x	x		x	x	
hall house								
cemetary				x				
wealthy grave								
rune stone								
landing site (shallow,often sandy bay)				x		x	x	
boat house								
fortification								
court site								
infields/outfield system				x		x	x	
shieling/ saeter associated in some way	x	x	x	x	x	x	x	x
outbuildings including stables/byre	x	x		x	x	x	x	
cave utilization								
multi-cellular farm dwelling		x		x		x	x	
landscape setting								
rich resources	x			x	x		x	x
commanding position	x			x	x			
placed in power landscape								
placed near communication route				x			x	
medieval church				x				
medieval manor								
ready water supply	x	x	x	x	x	x	x	x
whaling area								
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x	
written sources								
evidence of royal estate								
evidence of manorial estate								
sacral place name								
organizational place name								
direct mention in saga								
religious written material concerning								
excavation reports				x			x	
survey reports	x	x	x	x		x	x	x

Sites -->	S29	S74	S75	S30	S77	S31	S76
place name: Inuit	Qorlortup itinnera	Qorlortup itinnera Qaqqaa	Qorlortup itinnera Qaqqaa	Qorlortup itinnera	Qorlortup itinnera Qaqqaa	Qorlortup itinnera	Qorlortup itinnera Qaqqaa
site name: Norse							
site name: other							
small finds							
gold							
silver							
coins							
weights and balances							
weaponry							
horse harness							
high artistic quality							
(semi)precious stones							
religious objects							
glass vessels							
copper alloy vessels							
luxury pottery							
production of luxuries							
production of weaponry							
steatite							
bone							
ivory							
wooden objects							
iron							
settlement structure							
large settlement	x						
large building	x			x		x	
large enclosed yard (> 15m)		x		x		x	x
stock pen (<15m)	x		x	x	x	x	x
hall house							
cemetary							
wealthy grave							
rune stone							
landing site (shallow,often sandy bay)							
boat house							
fortification							
court site							
infields/outfield system				x		x	
shieling/ saeter associated in some way	??	??	x	x	x		x
outbuildings including stables/byre	x	x	x	x	x	x	x
cave utilization							
multi-cellular farm dwelling	x			x		x	
landscape setting							
rich resources	x	x	x			x	x
commanding position							
placed in power landscape							
placed near communication route							
medieval church							
medieval manor							
ready water supply	x	x	x	x	x	x	x
whaling area							
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x
written sources							
evidence of roval estate							
evidence of manorial estate							
sacral place name							
organizational place name							
direct mention in saga							
religious written material concerning							
excavation reports							
survey reports	x	x	x	x	x	x	x

Sites -->	S19	S20	S22	S23	S21	S24a	S24b	S25	S27
place name: Inuit	Qajuuttaq	Qinngua	Qorlortoq	Qorlortoq Qaqqaa	Paratiksip Kuua	Qimarnguffik	Qimarnguffik	Qorlortup Itinnera	Sammisoq Timaa
site name: Norse		?Brattahlid							
site name: other									
small finds									
gold									
silver									
coins									
weights and balances									
weaponry									
horse harness									
high artistic quality									
(semi)precious stones									
religious objects									
glass vessels									
copper alloy vessels									
luxury pottery									
production of luxuries									
production of weaponry									
steatite									
bone	x							x	
ivory									
wooden objects								x	
iron									
settlement structure									
large settlement		x	x			x	x		
large building	x	x	x	x		x	x	x	
large enclosed yard (> 15m)		x	x			x	x		
stock pen (<15m)	x	x	x	x		x	x	x	x
hall house									
cemetary									
wealthy grave									
rune stone									
landing site (shallow,often sandy bay)			x			x	x		
boat house									
fortification									
court site									
infields/outfield system									
shieling/ saeter associated in some way		x	x	x	x	x	x	x	x
outbuildings including stables/byre	x	x	x	x	x	x	x	x	
cave utilization									
multi-cellular farm dwelling	x	x	x	x		x	x	x	
landscape setting									
rich resources	x	x	x	x	x			x	x
commanding position		x				x	x		
placed in power landscape		x							
placed near communication route		x	x			x	x		
medieval church		x	x						
medieval manor									
reads water supply	x	x	x	x		x	x	x	x
whaling area		x							
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x	x	x
written sources									
evidence of royal estate									
evidence of manorial estate		??							
sacral place name									
organizational place name		??							
direct mention in saga		??							
religious written material concernine		??							
excavation reports	x					x	x	x	
survey reports	x	x	x	x	x	x	x	x	x

Sites -->	S11	S14	S83	S15	S16	00-1	S18	S17
place name: Inuit	Annaninguit	Qanassiassat	Qoornup Kuua	Qinngua Kangilleq	Qinngua Kangilleq	Qinnguata Timaa	Qajuuttap Itinnera	Qajuuttap Itinnera
site name: Norse							Nordbodalen/Nordbovizen	
site name: other								
small finds								
gold								
silver								
coins								
weights and balances								
weaponry								
horse harness								
high artistic quality								
(semi)precious stones								
religious objects								
glass vessels								
copper alloy vessels								
luxury pottery								
production of luxuries								
production of weaponry								
steatite								
bone								
ivory								
wooden objects								
iron								
settlement structure								
large settlement								
large building		x		x			x	
large enclosed yard (> 15m)		x		x			x	
stock pen (<15m)	x	x	x	x	x		x	
hall house								
cemetary								
wealthy grave								
rune stone								
landing site (shallow,often sandy bay)	x	x						
boat house								
fortification								
court site								
infields/outfield system		x						
shieling/ saeter associated in some way	x	x	x	x	x	x	x	x
outbuildings including stables/byre	x	x	x	x	x	x	x	x
cave utilization								
multi-cellular farm dwelling	x			x			x	
landscape setting								
rich resources	x	x	x	x	x	x	x	x
commanding position								
placed in power landscape								
placed near communication route	x	x		x				
medieval church								
medieval manor								
ready water supply	x	x	x	x	x	x	x	
whaling area		x						
relatively flat arable lands for agriculture/ animal husbandry	x	x	x	x	x	x	x	
written sources								
evidence of royal estate								
evidence of manorial estate								
sacral place name								
organizational place name								
direct mention in saga								
religious written material concerning								
excavation reports								
survey reports	x	x	x	x	x	x	x	x

Sites -->	505	506	507	508	585	584	509	513	510	512
place name: Inuit	Qinnaq	Narsarsuaq	Kiattuut	Kiattuut	Kiattuut Qaqqaa	Kiattuut Qaqqaa	Kiattuut Qaqqaa	Kiattuut Qaqqaa	Annannguit Iterlieq	Annannguit Iterlieq Qaqqaa
site name: Norse										
site name: other										
small finds										
gold										
silver										
coins										
weights and balances										
weaponry										
horse harness										
high artistic quality										
(semi)precious stones										
religious objects										
glass vessels										
copper alloy vessels										
luxury pottery										
production of luxuries										
production of weaponry										
steatite										
bone										
ivory										
wooden objects										
iron										
settlement structure										
large settlement				x						
large building		x	x	x					x	
large enclosed yard (> 15m)										x
stock pen (<15m)	x	x	x				x	x	x	
hall house		x								
cemetary										
wealthy grave										
rune stone										
landing site (shallow,often sandy bay)		x	x	x					x	
boat house										
fortification										
court site										
infields/outfield system										
shieling/ saeter associated in some way	x	x		x	x	x	x	x	x	x
outbuildings including stables/byre	x	x	x	x			x	x	x	
cave utilization										
multi-cellular farm dwelling			x	x					x	
landscape setting										
rich resources	x	x	x	x	x	x	x	x	x	x
commanding position				x						
placed in power landscape				x						
placed near communication route	x	x	x	x					x	
medieval church										
medieval manor										
ready water supply	x	x	x	x		x	x	x	x	x
whaling area		x							x	
relatively flat arable lands for aericulture/ animal husbandry	x	x	x	x	x	x	x	x		x
written sources										
evidence of royal estate										
evidence of manorial estate										
sacral place name										
orgamizational place name										
direct mention in saga										
religious written material concerning										
excavation reports										
survey reports	x	x	x	x	x	x	x	x	x	x

Island Group	Island	Site Name	ON Name	Gaelic Name	Feature	Location	Post-Norse Origin	Excavation	Sources	Comments
	Unst	Papil/ Papal			settlement	Unst			Ahrónson 2007; MacDonald 2002	chapel site, also croft house present
Scotland										
	Caithness	Papel			tidal rock	Canisbay			Ahrónson 2007; MacDonald 2002	located off of the Kirkstyle
	Caithness	Papigeo			creek and district	Wick			Ahrónson 2007; MacDonald 2002	narrow channel of some length but also a district with several dwellings
	Moray	Papies Holm			settlement	Duffus Parish			Ahrónson 2007; MacDonald 2002	
	Dumfries	?Papy Ha'				Minnigaff, Kirkcudbright			Ahrónson 2007; MacDonald 2002; Maxwell 1930	
	Galloway	?Papcastle			settlement	Cumberland			Ahrónson 2007; MacDonald 2002; Armstrong et al 1950	another name for the Roman fort Derventio

Island Group	Island	Site Name	ON Name	Gaelic Name	Feature	Location	Post-Norse Origin	Excavation	Sources	Comments
	Rhum	Papadil			islets	Rhum			Ahrónson 2007; Crawford 2005; MacDonald 2002	no recorded site present
	Mull	Kilphobull	*Papabýli	Cill [cell, church]		Kilninian and Kilmore Parish, Mull			Ahrónson 2007; Crawford 2005; MacDonald 2002; Gammeltoft 2001	
Man										
		?Glenfaba				Peel			Ahrónson 2007; Crawford 2005; MacDonald 2002	
Orkney										
	Stronsay	Papa Stronsay			island	Stronsay			Ahrónson 2007; MacDonald 2002	at least 2 chapel sites are known on Stronsay- St Nicholas's Chapel and St Bride's Chapel as well as a third which has yet to be located
	Westray	Papa Westray			island	Westray			Ahrónson 2007; MacDonald 2002	several church/chapel sites- St Boniface's (pics of); St Tredwall's Chapel; Kirk of Howe; Binnas Kirk as well as another unattributed chapel site
	Mainland	Papdale			settlement	Kirkwall and St Ola			Ahrónson 2007; MacDonald 2002	farmhouse, St Magnus's Cathedral, remains of St Ola's Church, later mansion house
	South Ronaldsay	Papley			district and settlement	South Ronaldsay			Ahrónson 2007; MacDonald 2002	smaller district composed of several farms with the presence of St Peter's Church
	Eday	Papleyhouse			settlement	Eday	x		Ahrónson 2007; MacDonald 2002	no recorded site present, more recent farmhouse
	Mainland	Ward of Papley			mound	Holm			Ahrónson 2007; MacDonald 2002	mound on top of a natural hill; St Nicholas's Church and cemetery located nearby
	North Ronaldsay	?Steeven o' Papy			sea-rock	Cross and Burness			Ahrónson 2007; MacDonald 2002; Wainwright 1962; Radford 1962; Marwick 1923	an off-shore sea rock whose name may refer to an alternative name for North Ronaldsay which has several church/chapel sites including the Broch of Burrian
Shetland										
	Aithsting	Papa Geo			creek	Aithsting			Ahrónson 2007; MacDonald 2002	coastal creek but no recorded site present
	Aithsting	Papa Little			Island	Aithsting			Ahrónson 2007; MacDonald 2002	no recorded site present
	Sandness	Papa Stour			island	Sandness			Ahrónson 2007; MacDonald 2002; Cant 1975	chapel site
	Burra	Papa			island	Burra			Ahrónson 2007; MacDonald 2002	no recorded site present
	Noss	Papil Geo			creek	Noss			Ahrónson 2007; MacDonald 2002	chapel site with small creek present
	Fetlar	Papil Water			loch	Fetlar			Ahrónson 2007; MacDonald 2002; Jakobsen 1936	sizeable fresh water loch also known as Loch of Velzie or Loch o' Tresta
	Burra	Papil			settlement	Burra			Ahrónson 2007; MacDonald 2002	church and monastic site with dwelling houses present
	North Yell	Papil			settlement	North Yell			Ahrónson 2007; MacDonald 2002	chapel site, also house present

Island Group	Island	Site Name	ON Name	Gaelic Name	Feature	Location	Post-Norse Origin	Excavation	Sources	Comments
Iceland										
		Papey			island	S- Múlassýsla			Ahrónson 2007; Sveinbjarnardóttir 2002	off of the eastern coast; supposedly a place where bells, books and croziers were left behind (14th century)
		Papafjörður			firth	A- Skaftafellssýsla			Ahrónson 2007; Sveinbjarnardóttir 2002	located in the south-east of Iceland; near Papatættur and Papýli
		Papós/ *Papafjarðarós			confluence	A- Skaftafellssýsla			Ahrónson 2007; Sveinbjarnardóttir 2002	located in the south-east of Iceland; near Papatættur and Papýli
		Papýli			lost settlement	unknown			Ahrónson 2007; Sveinbjarnardóttir 2002	no recorded site present; supposedly a place where bells, books and croziers were left behind (14th century)
		Papi			deep pool in the river Laxa				Ahrónson 2007; Sveinbjarnardóttir 2002	located in western Iceland
		Papafell			mountain	Strandssýsla			Ahrónson 2007; Sveinbjarnardóttir 2002	located in the north-west of Iceland
	Vestmannaeyjar	Papakröss			cliff-face carving	Hetta	x		Ahrónson 2007	
		Papahellir			cave	A- Rangivallasýsla	x		Ahrónson 2007	
		Papatættur			ruins	A- Skaftafellssýsla			Ahrónson 2007; Sveinbjarnardóttir 2002	supposed Papar remains, unconfirmed
Faroe Islands										
		Paparókur			cliff-ledges	Vestmanna			Ahrónson 2007	check photos for cliff pictures
		?Papurshálsur	*Papýlishálsur		cliff-ledge	Saksun			Ahrónson 2007; Matras 1934	
Hebrides										
	Lewis	Bayble/Paibal			settlement	Stornoway			Ahrónson 2007; Crawford 2005; MacDonald 2002	no recorded site present although Teampull site located on foreshore near Chicken Head- Rubha an Teampuill
	Lewis	Pabanish			rocky hill	Uig			Ahrónson 2007; Crawford 2005; MacDonald 2002	fence enclosed rocky hill with nearby church sites- St Donnan's and St Michael's and graveyard; also a nearby Teampull site- Beinn an Teampuill on Little Bernara
	Skye	Pabay			island	Strath			Ahrónson 2007; Crawford 2005; MacDonald 2002	Teampull evidence
	Lewis	Pabay Beag			island	Uig			Ahrónson 2007; Crawford 2005; MacDonald 2002	no recorded site present
	Lewis	Pabay Mór			island	Uig			Ahrónson 2007; Crawford 2005; MacDonald 2002	ruins of St Peter's Church near Cnoc na Cille and Sgeir na Cille
	Barra	Pabbay			island	Barra			Ahrónson 2007; Crawford 2005; MacDonald 2002	chapel site with both cross-slabs and symbol stone
	Harris	Pabbay			island	Harris			Ahrónson 2007; Crawford 2005; MacDonald 2002	3 apparent church/chapel sites in area: Teampull Mhóire; Bailenacille; Teampull Beag [dedicated to St Moluag
	South Uist	Pabbay			2 islands (adjacent)	South Uist			Ahrónson 2007; Crawford 2005; MacDonald 2002	no recorded site present
	North Uist	Paible			chapel and settlement	North Uist			Ahrónson 2007; Crawford 2005; MacDonald 2002	possible chapel site at Loch na Cille
	Taransay	Paible			chapel and settlement	Balranald House			Ahrónson 2007; Crawford 2005; MacDonald 2002	2 chapel sites- St Taran's and St Keith's

Appendix C *Grænlendinga Saga*

This translation was created during research into north Atlantic identity construction and maintenance. It is based upon the *Fornrit* edition beginning Volume 4 page 241.

Chapter 1

Þorvald was a man called, the son of Asvald, son of Úlf, son of Oxen-Þórir. Þorvald and Eirík the Red, his son, travelled from Jaðri[1] to Iceland due to a killing[2]. Then was well settled Iceland. They settled first at Drangr in Hornstrands. There died Þorvald. Eirík married then Þjóðhilð[3], daughter of Jorund Úlfsson the son of Þorbjorg the Ship-Breasted, who at that time was married to Þorbjorn of Haukadale. Travelled Eirík then north and farmed at Eiríksstaðir near Vatnshorn. The son of Eirík and Þjóðhilð was named Leif. But after the killing of Eyjólf Saurs[4] and Dueller-Hrafn was Eirík sent away from Haukadale. Travelled he then west to Breiðafjord and farmed in Øxney, at Eiríksstaðir. He lent Þorgest of Breiðabólstaðir [his] bench boards and [they were] returned not when he requested them. Thence after it was quarrels and fights with Þorgest, same as is said in Eiríksaga[5]. Styrr Þorgrimson supported Eirík in his lawsuit and Eyjólf of Svíney and the sons of Þorbrand of Álptafjord and Þorbjorn Vífilsson. But Þorgest was supported by the sons of Þorðr Bellower and Þorgeir of Hítardale. Eirík was outlawed at Þórness þing; prepared Eirík then his ship to sail forth from Eirík's Bay. And when he was ready, accompanied Styrr and the others with him out beyond the islands which Gunnbjorn, son of Úlf Crow, had seen, when he was driven

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[1] Jæderen, Norway
[2] They were outlawed for murder.
[3] Literally 'obtained'
[4] This could be related to 'leacherous' or being from a western Icelandic settlement named Saurbœr.
[5] This is direct acknowledgement by the saga-author that **this** portion of the source material at least **post-dates** Eiríksaga.

west over sea, there where he found Gunnbjorn's Skerries[6]; he declared he would return to seek his friends, if he found this land. Eiríkr sailed out past Snæfell glacier[7]. He found land and came there where he called Middle glacier, but is now called Blue-shirt[8].



Figure 1 Icebergs in the waters of Narsaq, Greenland. The blue tones exhibited become quite a bit deeper in brighter sunlight.

He travelled thence to the south with land in sight, seeing if it was suitable for settlement. He spent the first winter at Eiríkr's Island[9], near the middle of the Eastern Settlement. The following spring travelled he to Eiríksfjord and established there his farm[10]. He travelled that summer in the unsettled lands to the west [of his settlement] and extensively gave names. He was another winter on Eiríkr's Islets near Hvarf's Peak[11]; but in the third summer travelled he up north to Snæfell and into Hrafnsfjord[12]. Then he declared to himself that he had come in further inland than Eiríksfjord. Then he turned back and was the third winter on Eiríkr's Island before the mouth of Eiríksfjord. The following summer travelled he to Iceland and brought his ship into Breiðafjord. He called that land which he had found Greenland because he declared that many more men should go thence if the land was named well. Eiríkr was in Iceland for a winter, but the summer after travelled he to the settled land. He

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[6] A group of small islands located between north-western Iceland and eastern Greenland.
[7] A glacier in western Greenland.
[8] A glacier in western Greenland most likely named due to the vivid colors found in Greenland's glaciers (see photograph).
[9] Modern Igdlotalik.
[10] Literally 'took there his farm'.
[11] Small islands off the coast of Cape Farewell, Greenland.
[12] Modern Agdluitsok.

farmed at Brattahlíð on Eiríksfjord[13]. So Say learned men, that the same summer that Eirík the Red travelled to settle Greenland, then twenty-five ships sailed from Breiðafjord and Borgarfjord, but only fourteen came out thence; some had been driven back but some had been lost. That was fifteen winters before Christianity was taken as law in Iceland. And it was also the same summer that Frederick Bishop and Þorvald Koðránsson travelled abroad[14].

These men named land in Greenland, who had travelled out with Eirík: Herjólf at Herjólfsfjord[15]; he farmed at Herjólfnes[16]; Ketil at Ketilsfjord[17]; Hrafn at Hrafnsfjord[18]; Solvi at Solvadale[19]; Helgi Þorbrandsson at Álptafjord[20]; Þorbjorn glóra at Siglufjord[21]; Einar at Einarsfjord[22]; Hafgrímm at Hafgrimsfjord[23] and [the] Lake District; Arnlaug at Arnlaugsfjord; but some travelled onto the Western Settlement.

Chapter 2

Herjólf was the son of Bard, son of Herjólf. He was kin of Ingólf the First Settler[24]. Herjólf's family[25] had been given by Ingólf land between Vog and Reykjaness. Herjólf farmed first at Drepstokk. Þorgerð was his woman called, and Bjarni their son, who was a very promising man. He had been eager while young to sail abroad; he got himself both wealth and good standing amongst men, and spent his winters alternately in other lands and with his father. Bjarni soon had a ship for himself; and

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[13] Possibly Qassiarsuk, Greenland.
[14] This passage gives important contextual information for the discovery and settlement of Greenland.
[15] Modern Amitsuarssuk.
[16] Modern Ikigiat.
[17] Modern Tasermiut.
[18] Modern Agdluitsok.
[19] At the head of the Kangikitsok fjord.
[20] Modern Sermilik.
[21] Modern Unartok.
[22] Modern Igaliku.
[23] Modern Ekaluit.
[24] Ingólf Arnarsson, the first settler of Iceland.
[25] Literally 'those of Herjólf'.

the last winter, which he was in Norway, then Herjólf sold his farm and moved to Greenland with Eirík. With Herjólf on ship was a Hebridean man, Christian, who created the 'Disturbed Waters Poem'. This is its refrain:

I bid the sinless tester of monks
To lend a hand on my journeys;
May the Lord of the High World's Halls
Hold his hand over me.

Herjólf farmed at Herjólfnes; he was a man of good standing.

Eirík the Red farmed at Brattahlíð. He was there with highest honors, and all looked to him. These were the children of Eirík: Leif, Þorvald and Þorstein, and Freydís was called his daughter; she was given to a man, who Þorvard was called, and farmed they at Garðar, then where is now the Bishop's seat[26]. She was a greatly haughty woman, but Þorvard was little-minded; she had married mostly for money.



Figure 2 Modern Igaliku, Garðar that was, as seen from the peaks above the settlement.

Heathen were people in Greenland at this time. That same summer came Bjarni's ship in Eyrar, when his father had sailed forth that spring past. About this news thought Bjarni greatly and wished nothing to be taken from his ship. Then asked his crew, what he had in mind; and he replied, that he intended to keep his tradition and over-winter with his father, 'so I will sail my ship to Greenland, if you are willing to come with me.' All replied to him that they would follow his will. Then replied Bjarni: 'Ignorant this journey will seem, as none of us have ever travelled the

[26] Note the present tense- this text was written at the time of **living** Greenlandic settlements, or at least the saga-author believes so. Greenland existed in the eyes of the Church long after the settlements themselves actually failed.

Greenland Sea.' However, they set out to sea, once they were readied, and sailed for three days, until the land was hidden by water, and then the fair wind failed and laid in northern winds and fog, and knew they not where they travelled, and sailed thus for many days. After that saw they the sun and made their bearings. Then sail was raised and they sailed a day after which they sighted land, and discussed amongst themselves, what land this might be, but Bjarni declared that he didn't think it could be Greenland. They [the crew] asked whether he would sail to this land or not. Bjarni answered: 'This is my council, to sail in close to land.' They did thus and soon could see that land was without mountains and greatly wooded, and with small hills, and they lay on with land to the backboard and lay on from land once more[27]. Following this they sailed two more days, and they then saw another land. They [the crew] asked, whether Bjarni believed this [land] to be Greenland. He replied that he did not think this to be Greenland anymore than the first- 'because there are said to be great glaciers in Greenland.' They brought themselves close to that land and saw that it was flat and widely wooded[28]. The wind left them then. Then the crew advised that they thought it advisable to take to that land; but Bjarni desired that not. They [the crew] claimed themselves to need both wood and water. "You have a shortage of neither," said Bjarni; later though he was criticized for this action by his crew. He bid them to raise sails, and so it was done, and set out over sea from that land and sailed over the sea to the southwest for three days and saw then land for a third time; and that land was high and mountainous and full of glaciers[29]; they [the crew] asked then, if Bjarni desired to land on this particular land, but he replied to

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[27] This can be taken one of two ways. 1) Bjarni and the crew actually make landfall at some unknown location in North America, perhaps along the shores of Labrador. 2) Bjarni and crew sail in as close as possible to the shore, but **do not actually get off of the ship**, rather getting close enough to see what exists on the land but still being able to make a reasonably quick getaway should the unknown situation turn dangerous.

[28] This appears to be a description of the coast of southern Baffin Island or Labrador.

[29] This appears most likely to be a description of the coast of northern Baffin Island or another of the northern arctic islands.

desire that not,- 'because it seems to me that this land is without worth. Now they did not lower their sails, following the land around and saw, that it was an island; once more the stern was set to land and held themselves before the same good wind. But the weather became an ox in the hand[30], and bade Bjarni then to shorten sail and not press the ship and the rigging. They sailed now for four days. Then saw they land a fourth time. They [the crew] asked Bjarni, whether he believed this [land] to be Greenland or not. Bjarni replied, "This is like most what has been said to me of Greenland, and here we shall land." So they did thus and took to land on a particular promontory[31] at the end of the day, was there a boat on the shore. And there farmed Herjólf, the father of Bjarni, on that promontory, and because of this the promontory was ever after called Herjólfnes. Existed Bjarni now with his father and halted sailing and stayed with his father, while Herjólf lived, and afterwards farmed he there after his father.

Chapter 3

Sometime later Bjarni Herjólfsson came east from Greenland to visit Eiríks Jarls[32], and the Jarl was well taken with him. Said Bjarni the tale of his journeys an d the lands he had seen, but thought people that he was lacking in curious spirit, because he had no knowledge of those lands, and he was criticized for this. Bjarni was made hirð man of the Jarl and travelled back to Greenland for the summer after. [There] was now great discussion of land looking. Leif, the son of Eiríks the Red of Brattahlíð, travelled to visit Bjarni Herjólfsson and bought the ship from him and raised a crew, so that there were 35 men on board. Leif asked his father Eiríks to be the first to be on these

[30] A storm at sea, from the description a very strong ones. This could also imply that Bjarni had made a crossing between Iceland and Greenland late in the safe sailing season and so was caught by stiff north Atlantic storms.
[31] Cape Farewell, Greenland.
[32] Jarl in Norway, AD1000-1014.

journeys[33]. Eirík was reluctant, declaring to be too old and said he could endure less than he once did. Leif declared he should still command more luck than his other kin. And this caused Eirík to let Leif have his way and rode home there where they were prepared, the way was short to travel to the ship. The horse stumbled, that which Eirík rode, and fell he from the back, and injured his leg. Then swore Eirík: "It seems to me I am not intended to find lands other than this, which we now inhabit; we shall no longer travel together." Travelled Eirík home to Brattahlíð, but Leif readied his ship and his crew with him, the thirty-five men. There was a single Southern[34] man in the group, who was called Tyrkir.



Figure 3 The reconstructed Viking Age longhouse located at Qassiarsuk, Greenland.

Now prepared they the ship and sailed out to sea, and left when they were ready, and visited then that land first, where Bjarni had visited. There sailed they to that land and cast anchor and shot the boat[35] and travelled the land and saw there was no grass. Great glaciers were all over, but between all seemed to be one great stone all

[33] Leif has requested Eirík to lead the expedition.
[34] From the Continent- in this respect the Norse of the north Atlantic were still utilizing a system of referencing based upon their Scandinavian homelands as the continent of Europe is physically located to the south for someone who is in Scandinavia.
[35] Launched the ship's boat- Bjarni's (now Leif's) ship must have been fairly deep drafted, making beaching the vessel to unload the cargo much more difficult. As this was supposed to have been a long distance trading vessel, or knórr, this is unsurprising.

with glaciers from the sea, and it appeared to them that land to be worthless. Then declared Leif: "Now we have that which Bjarni has not as far this land is concerned, we have actually landed on it. Now must I give a name to this land and call it Helluland[36]." Afterwards they went back to the ship. After this they sailed over sea and found another land, sailed into land and cast anchor, after that they shot the boat and walked on the land. That land was flat and greatly wooded, and wide white sands where they travelled, and gentle slopes down the beaches. Then declared Leif: "This land shall be named after its gifts and called Markland[37]." They travelled quickly back to the ship then.



Figure 4 Location map for the site of L'Anse aux Meadows, shown in red on the island of Newfoundland (after Wallace 1991: 169, figure 1).

Now sailed they thence over sea on a north-eastern wind and were out for two days, until they saw land, and sailed towards the land coming to an island[38], which lay to the north of the land, and walked there out and saw about themselves good weather and found that, there was dew on the grass and the thing they did first, they took in

[36] Modern Baffin Island.
[37] Modern Labrador.
[38] Modern Belle Isle.

their hands some of the dew, and brought it to their mouths and they knew it to be the sweetest thing, that there was. Then they went back to their ship and sailed into that sound which lay between the island and the promontory which was north from the land; they steered to the west of the promontory. There were extensive shallows so that at low tide their ship was left up [out of the water]. But they were so greatly impatient to go to land that they could not wait, for the tide to re-raise their ship, and ran to land there where a river fell from a lake; and once the tide came back under their ship, then took they the boat and rowed to the ship and sailed that up a river, and after a lake; and cast there the anchor and bore from the ships their skin bedding and put up booths; they then decided, that they would over winter there and built in that place houses great. There was no lack of salmon in the rivers or the lakes, and bigger salmon than they before had seen. There was such good land gifts, that it seemed to them there should be no stock fodder needed for over winter; thence comes no frost in the winter, and little withering to the grass. Here there were more even days than in Greenland or Iceland; the sun was up by 9am and set after 3pm. Once they had finished their house building, then declared Leif to his crew: "Now will I split our group into two, as I wish to know the lay of this land, and shall one group be with our homes, but the other group shall explore the land and go out no longer than they are able to come home at night and separate not. So it went thus with them for a time. Leif took turns himself, that he should travel with them or was home at the halls. Leif was a tall man and strong, and very impressive to view, a shrewd man and moderate in all his behavior.

Chapter 4

One particular night there came news, that one man was missing from their group and was that Tyrkir the Southern man. Leif took this knowledge poorly, because

Tyrkir had long been with his family and devoted great was Leif as a child. Leif told his family and devoted great was Leif as a child. Leif told his men off greatly and made ready to search himself and 12 men with him. But when they were shortly come from the halls, then came Tyrkir towards them, and was he well acknowledged. Leif realized quickly that his foster-father[39] was in very good humor. He was broad-headed and shifty-eyed, but not much to look at, little-statured and puny-looking, but a clever man in all his hands produced. Then spoke Leif to him: "Why are you so late, foster-father mine, and how did you break from your group?" He spoke at first for a time in German and shot his eyes all around and made faces, but they understood not, what he had said. He spoke then in Norse, and told the group: "I was not much farther than you. I have some news to tell you, I found vines and grapes." "Is that true, foster-father mine?" said Leif. "Of course is that true," said he, "because there where I was born, there are lots of vines and grapes." Now slept they then that night, but in the morning spoke Leif with his crew: "Now shall there be two tasks before us, and shall we on alternate days, gather grapes and cut vines as well as fell trees, so that there will be cargo for my ship." And this was the council taken. So it is said, that their boat was full of grapes. Now was the cut wood cargo on board ship. And in the spring, then prepared themselves to sail forth, and gave Leif a name to the land after its gifts and called it Vínland. Sailed they at this point over sea, and got good winds, there until they saw Greenland and the mountains under glaciers.



Figure 5 The Eiríksfjord, looking towards Qassiarsuk in the right of the shot.

[39] Literally 'foster-er.'

Then spoke one man of the crew with Leif: "Why steer you our ship so close to the wind?" Leif replied: "I am watching my steering, but even though still watch something else; don't you see something?" They [the crew] replied to see nothing, there where something should be. "I am not sure" said Leif, "whether I see a ship or a skerry." Now saw they [the crew] and declared it to be a skerry. His sight was better than theirs, so that he saw men on the skerry. "Now will I take the boat close under the wind" said Leif, "so that we can reach them, if the men are in need of us we are bound to give it, but if they are hostile, then the advantage is with our men, there shall not, be cost to us, but none on theirs." Now they approached the skerry and lowered their sail, cast the anchor and shot a little boat, which they had brought with them. Then asked Tyrkir, who there led the group. A man declared himself to be called Þórir and was a Norwegian man by birth: "But what is your name?" Leif replied this in return. "Are you the son of Eiríк the Red of Brattahlíð?" said he. Leif declared to be so. "Now will I" said Leif, "bid you all onto my ship and their goods with them, which my ship will take." They accepted this and sailed then to Eiríksfjord with the goods there until they came to Brattahlíð; emptied the goods from the ship. Afterwards bade Leif Þórir to visit with him and Guðríð, his woman and three other men and found lodgings for the crew, both Þórir's and his own group. Leif took 15 men from the skerry. He was there after called Leif the Lucky. Leif gained now both in wealth and in worth of men. That winter came a great illness in Þórir's crew, and Þórir himself died from it and many of his men as well. That winter died Eiríк the Red as well.

Now there was discussion great about the Vínland journey of Leif, and thought Þorvald, his brother, that this land was not known enough. Then spoke Leif with Þorvald: "You shall journey with my ship, brother, if you will, to Vinland, and will I,

though the ship must first go after that wood, which Þórir had left on the skerry."

And thus it went.

Chapter 5

Now prepared Þorvald for voyage with a crew of thirty men as well as the council of Leif, his brother. Once the ship was prepared they set off over sea, and there were no tales of their journey until they came to Vínland, to Leif's Booths, and prepared there their ship, and sat it for the winter and caught fish to feed themselves. But the following spring spoke Þorvald, that they should prepare their ship and the ship's boat [as well] and a group of men with will travel west along the coast[40] and explore there during the summer. They found the land to be attractive and wooded nearly to the shore with white sands. There were islands many and shallows great. They found no evidence of men's lodgings or animals; but on one western island where found they a 'grain-helmet' of wood. That they found was the only work of men and travelled [they] after until they came to Leif's Booths in autumn. But the summer after travelled Þorvald first east with his trade ship and then north before the land. Then a great storm came before them from a headland and were driven then there up, and broke the keel and [they] were held there long and repaired their ship. Then spoke Þorvald with his crew men: "Now will I, raise here up the keel on the headland and name it 'Kjarlarnes'[41]. And so they did this. Afterwards sailed they thence away east before the land and then between fjord mouths where there was a headland, and onto that head, they there went forth. It was all wooded greatly. Then lay their ship alongside and shot the gangway onto land, and walked Þorvald there up the shore with all of his crewmen. He spoke then: "Here it is beautiful, and here will I raise my farm." After that they walked back to the ship and saw before them three

[40] Literally 'before the land'
[41] Literally 'Keel- headland'

humps and travelled further and saw there skin boats three and three men [were] under each. Then split they[42] their force and took them all in hand, except for one who got himself away with his boat. They killed the other eight and walked then back to the headland and viewed there around and saw in the fjord other humps, and believed they this to be settlements. Following that came a great sleepiness, so that they could not remain awake, and slept they all. Then came a call over at that point, so that they all woke up; thus spoke the voice: "Wake you, Þorvald, and all your journey-crew, if you will have life and get you to your ship, and all thine men, and travel from the land like a shot." Then travelled out of the fjord and uncounted number of hide boats and lay at them[43]. Þorvald spoke then: "We shall construct defenses on the boards[44] and defend ourselves as seems best, but fight [back] as little as possible." So went they, but the Skrælings[45] shot out then for a time, and then flew away as hard as they could, who could [go] as fast. Then asked Þorvald his men, if they had been wounded; they declared themselves wounded not to be. "I have gotten a wound under my arm" said he. "Flew an arrow between the ship-boards and shields under my arm, and is here the arrow, but for me will this to my death lead. Now council I, that you could prepare your group to fly back that way, but you should take me to that headland, where it seemed to me to be home-worthy, true that to be, that I should there settle for a time; there and set a cross at my head and feet, and call that Krossanes[46] ever after." (Greenland was then Christian, even though died Eirík the Red before Christianity [was accepted].) Now died Þorvald, and they did all that had been explained, same as he had spoken of,

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[42] Þorvald's crew.
[43] Advanced to attack.
[44] Set shields on the gunwales of the ship.
[45] Indigenous peoples of North America and Greenland.
[46] Literally 'Cross-headland'.

and travelled after and rejoined there their expedition[47], and told there all of their tidings that was known, and prepared there that winter and collected [themselves] grapes and vines for the sip. Now they prepared themselves for the spring after to [go to] Greenland and came their ship into Eiríksfjord and knew many tidings to tell Leif.

Chapter 6

Those tidings were occurring while in Greenland, Þorstein of Eiríksfjord had married and obtained Guðrið daughter of Þorbjorn, who had had[48] Þórir the Eastman[49], who before was told of.

Now desired Þorstein Eiríkson to journey back to Vínland after the form of Þorvald, his brother, and prepared the same ship and chose he a crew strong and in shape and had with himself twenty-five men and Guðríð, his woman, and sailed over sea, once they were ready and were out of sight of land. It went for them thus all summer that they were at the whim of the weather, and knew not, where they travelled. And one week was it before winter, then they took to land in Lysufjord in Greenland in the Western Settlement. Þorstein searched for lodgings for them and got lodgings for all of his crew, but he and his woman were without lodgings. Now were they back on the ship for another two nights. Then was Christianity young in Greenland. That was one day, that men came to their tent early; they asked, who before them was, and how many in the tent? "Two men," said he, "but who asks that?" "Þorstein called am I, and am I called Þorstein the black; I have come to bid both you and your wife to lodge at mine." Þorstein declared himself to desire the counsel of his woman, but she bade him to decide, and now accepted he this. "Then

[47] Þorvald had split the crew into two groups during the spring to explore further inland.
[48] Had been married to.
[49] Norwegian.

shall I come after you in the morning with a cart, there is no shortage of goods to provide for your lodgings, but you will find it boring with me because there are only two, me and my wife, and I am greatly of single thought; another faith have I, from that of you have, although believe I yours the better, which you have." Now came he after them in the morning with the cart, and travelled they with Þorstein the black to lodge, and entertained he them well.

Guðríð was an imposing woman to view and a knowledgeable woman, and knew well how to be with unknown men.

That was early winter, that illness came to the people of Þorstein Eiríksson, and died there many of his crew. Þorstein bade be built coffins for their bodies, who had died, and put them on the ship and bear them back- "because I will lay all of their forms at Eiríksfjord in the summer." Now shortly after this was bidden, that illness came into the home of Þorstein, and took his woman ill first, who was called Grímhild; she was great in size and strong as a man, but the illness brought her under. And quickly after that took ill Þorstein Eiríksson, and lay then both for a bit, but died Grímhild, woman of Þorstein the black. But when she was dead, then went Þorstein from the house after a board to lay the body on. Guðríð spoke then: "Be away a short time, Þorstein my [friend]," said she. He declared to be back shortly. Then spoke Þorstein Eiríksson: "Strangely acting is now the housewife, because she just now raised herself up with an elbow and is sticking her feet from the bench[50] and is searching for her shoes." At that point came Þorstein her husband [Grimhíld's] in, and quickly laid Grímhild down, so that creaked every wooden beam in the room. Now built Þorstein a coffin for the body of Grímhild, and placed her out [on it] and bore [it all] away. He was both a big man and strong, and he needed this all, so he could bear her from the house. Now

[50] The bed where she had died.

worsened the illness of Þorstein Eiríksson, and he died. Guðríð, his woman, was grieved [at this]. Then were they all in the room. Guðríð had been sitting on a stool before the bench, where he had lay, Þorstein, her husband. Then took Þorstein the farmer from the stool into his arms and set himself on the bench opposite with her, before the body of Þorstein, and [he] attempted to console and comfort her and he promised thus that he should travel with her to Eiríksfjord with the body of Þorstein, her husband, and his crew. "And also shall I take on more servants," said he, "for your comfort and pleasure." She thanked him. Þorstein Eiríksson sat then up and spoke: "Where is Guðríð?" Three times spoke he this, but she was silent; then spoke she with Þorstein the farmer: "What shall I do answer his words or not?" He bade her to swear nothing. Then went Þorstein the farmer across the un-boarded middle floor and sat on the stool, but Guðríð sat on his knee; and then spoke Þorstein the farmer: "What is your will, namesake?" said he. He answered after a time; "Anxious am I to do this, to tell Guðríð her fortune, so that she know then [it is] better my death, because I have come to a place of good rest. But I have this to tell you, Guðríð, it is your grace to be married to an Icelandic man, and long shall you be together, and many men shall from you come, shall you be together, and many men shall from you come, vigorous, bright and excellent, sweet and scented well. Shall you travel from Greenland to Norway and thence on to Iceland and will farm in Iceland; there shall you settle, and shall you have longer life than him. You shall journey out and go south and come back after to Iceland to your farm, and shall there a church raised be, and shall you there be and take nun's consecration, and there shall you die." But then fell Þorstein back, and was prepared his body and taken to the ship. Þorstein the farmer fulfilled well with Guðríð all that, which he had sworn. He sold in the spring all his land and farm animals and travelled by ship with Guðríð and all her [possessions], prepared the ship and obtained men and then

travelled to Eiríksfjord. Were now the bodies interred at the church. Guðríð went to Leif at Brattahlíð, but Þorstein the black made his farm in Eiríksfjord and settled there, for the rest of his life, and [was] thought to be a clever man.

Chapter 7

That same summer came a ship from Norway to Greenland. A man was called Þorfinn karlsefni[51], who was the ship's captain. He was the son of Þórð Horse-Head, son of Snorri, son of Þórð of Hofði. Þorfinn Karlsefni was greatly endowed with wealth and was a winter at Brattahlíð with Leif Eiríksson. Quickly felt he compassion[52] for Guðríð and asked her[53], but she turned to Leif to answer for her. Afterwards was she fastened to him[54] and were they married the following winter.

Same was the discussion of Vínland journeys as before, and encouraged men Karlsefni to lead a group, both Guðríð and other men. Thus was caused his journey, and readied he the ship crew, six tens of men and five women. Karlsefni created an agreement[55] with his oarsmen, that evenly should they have all that, which they obtained with good fortune. They took with themselves all kinds of domestic animals, because they desired to settle the land, if they could accomplish that. Karlsefni bade Leif for the houses in Vínland, but he declared to lend the houses, but to give not. Afterwards steered they over sea the ships and came to Leif's Booth's both safety and heartiness and bore there up their hide-boxes[56]. Quickly brought at hand to them were great provisions and good, because a rorqual was there up driven, both big and good; travelled then and scored the whale; then there was no

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[51] Literally 'man-makings.'
[52] Fell in love.
[53] Asked her to marry.
[54] Betrothed.
[55] Literally 'settlement'.
[56] Some translate this as hammocks.

food shortage. The animals went there to the land, but that was the way, that the male stock were riled up and difficult it became with them. They had brought with them a bull. Karlsefni caused to be felled wood to fill his ship and lay the wood on a rock for driving. They had all used the land's resources, those that there were, both grapes and kinds of hunting game and goods. After that winter had come to summer; then encountered they the Skræling, when travelled there out of the room a great flock of men. There were nearby their stock, but the bull took to bellowing and yelled so greatly, that it frightened the Skræling and [they] lay out from there with their loads, and that was furs and sables and all kinds of skins, and headed for the buildings of Karlsefni and attempted there to get in the houses; but Karlsefni ordered the doors barred. Neither could understand the other's words. Then took the Skrælings off their packs and opened [them] and offered goods to them but desired weapons in exchange at first; but Karlsefni banned them from selling weapons. And now the council came into his head, he bade the women to bear out milk at them; but once they saw the milk, then wished they to purchase that and naught else. Now was the trade journey of the Skrælings, that they bore away their goods in their stomachs, but Karlsefni and his crew held after their packs and skins; travelled they to a position away. From this point it is said, that Karlsefni caused to be built a palisade well-built around his farm, and settled themselves there in. Around this time birthed Guðrið a boy child, the woman of Karlsefni, and called the boy Snorri. It was early the following winter, then came the Skrælings back near then and were in a greater flock than before and had with them the same goods as before. Then spoke Karlsefni with the women: "Now shall you bear out the same goods, same as before was demanded, but naught else." But when they saw that, then cast they their packs in over the palisade. But Guðrið sat in the doorway with the cradle of Snorri her son, then bore a shadow across the doorway, and then went there in a

woman in a black close-kirtle, rather short and had a band around the head and bright in hair, pale and greatly eyed, so that never had bigger eyes been set in a man's head. She went there, where Guðrið sat, and spoke: "What are you called?" said she. "I am called Guðrið; but what are you called?" "I am called Guðrið," said she. Then motioned Guðrið the housewife her hand towards her, so that she would sit next to her, but at the same moment, then heard Guðrið a noise great, and was then the woman gone, and was that when killed a Skræling was by a man of Karlsefni, because he had attempted to take their weapon. And went now away quickly, but clothing theirs lay there after and trade goods. No man had this woman seen, except for Guðrið alone. "Now must we come up with a council to take," said Karlsefni, "because I expect, that they shall visit us a third time with un-peace and more men. Now shall we take this council, ten men will go forth on the headland and there make themselves seen, but the rest of the group shall go into the trees and hew there a clearing out for our stock, when the group comes from the woods. We shall take the bull restrained and have him go before us." It was there intended, to have their fight, a lake was on the one side while wooded the other way. Now were these councils had, where Karlsefni had laid in. Now came the Skrælings to that place, where Karlsefni had chosen to fight. Now was there fighting, and fell there many forms of Skrælings. One man was greatly tall and handsome amongst the group of Skrælings, and thought Karlsefni, that he must be their chieftain. Now had one of those Skrælings taken up an axe and looked at it for a time and swung at his group and hewed he; so fell [one] then dead. Then took the big man possession of the axe and looked at it for a bit and threw it far into the sea, far as he could; but afterwards flew they into the woods, travelling quick and stopped [57] there now their dealings. Were they and Karlsefni there that winter all; but it was, then announced

[57] Literally 'locked'.

Karlsefni, that he willed to not be there longer and wished to travel to Greenland. Now prepared they for their journey and had much good fortune in vines and grapes and fur skins. Now sailed they over sea and came to Eiríksfjord their ship safe and were there a winter.

Chapter 8

At this point discussion resumed about Vínland travels, because these travels commanded both fame and worth. That same summer came a ship from Norway to Greenland when Karlsefni came from Vínland. That ship was steered by two brothers, Helgi and Finnbogi, and were there a winter in Greenland. Those brothers were Icelandic by birth and came from the East fjords.

Then it occurred, that Freydís Eiríksdaughter went forth from her home at Garðar and travelled to meet with those brothers. Helgi and Finnbogi, and bid then, that they travel to Vínland with her conveyance, and had a good share of all with her, those there that might be obtained. Now agreed they to this. Then travelled she to meet with Leif, her brother, and asked, if he would give her those houses, which he had built and lay in Vínland. But he responded the same manner, declaring he shall lend the houses, but give not. So made an agreement between those brothers and Freydís, that each should have three tens of men on the ship and women as well. But Freydís broke from this early on and had five men extra and aid them, and aware the brothers were not before they had come to Vínland.

Now did lay they over sea and had before agreed, that they should have a flotilla if it was so possible, and there was a little space [between the ships], but came the brothers shortly before and had up born their goods. Then spoke Freydís: "why bore your goods in here?" "Because we had believed," said they, "that the agreement

should be an-honored between us." "To me lent Leif these houses," said she, "but not you." Then spoke Helgi: "match not us brothers in meanness with you." Bore now out their goods and built themselves a hall inland from a lake's edge, and settled well there. But Freydís ordered felled wood for her ship.

That was one morning early, that Freydís stood up inner space and dressed herself except for her foot-clothes; the weather was so that it happened that dew had fallen greatly. She took the cloak of her husband and went out, immediately went she to the hall of the brothers and to the door. A man had out gone a little before and locked the door after unevenly. She opened up the door and stood in the opening for a time then and without speech; but Finnbogi lay the furthest in the hall and was awake; he spoke: " What are you at, Freydís?" She answered: " I wish that you stand up and go out with me, and will I talk with you." He did thus. They went out to a tree, which lay near the house walls, and set themselves there down. "How are you liking things?" said she. He answered: "Good think I this land's resources, but ill it seems to me this, that is between us, because I can find no cause of it." "That you say is correct," said she, "and so it seems to me, but that reason I have visited you, because I desire to trade ships with you brothers, because you have the bigger ship than I, and desire I to go away hence." "That shall I allow to occur," said he, "if you like that well." Now they parted with that; went she home, and Finnbogi went to his bed space. She took the path and came to the room with cold feet, and awoke Þorvarð with that and asked why she was so cold and wet; she replied with great resentment: "I was walking," said she, "to those brothers to offer to purchase their ship, and wished I to buy a bigger ship; but this sat with them so ill-ly, that they beat me and [was] roughly handled; but you miserable man, would avenge neither my disgrace nor thine, and must I that now discover, that I am away from Greenland, but shall I get split from you; unless, you avenge this." And now he could stand the jibes

from her no more and bade the men to stand up quickly and take their weapons, and so did they and went they to the hall of the brothers and went in while they slept and took them and bound their feet and dragged thus out, and bound were; but Freydís ordered killed each, as out [they] came. Now were there all the men killed, but the women were left after, and wished none to them kill. Then spoke Freydís: "Find me a hand-axe." So that was done. After killed she those women five, who there were, and thus they went to death. Now went they back to their hall after those ill-works, and obvious that was, that Freydís thought herself having had good council and spoke with her group: "If words of this is heard to come to Greenland," said she, "then shall I take the life of any who speak out these actions. Now shall we say this, that here after [they] settled, then when we had went away."

Now prepared they the ship early in the spring, that which those brothers had owned, with all the goods, amounts as much as the ship could bear; thereafter sailed over sea and went well the journey until came into Eiríksfjord the ship in early summer. There was Karlsefni [from] before, and had completely prepared his ship for sea and waited for good wind, but it is spoken of by men, that [there was] no other richly laden ship that went over sea from Greenland than that, which he steered

Chapter 9

Freydís travelled now back to her farm[58], which had flourished while she was gone. She gave great wealth to all of her journey-crew, because she wished to keep her misdeeds secret. Settled she now on her farm. But her crew was not all word-holding to say nothing of these ill-deeds, and keep them from being known. Now

[58] At Garðar.

came this information before Leif her brother, and thought he this tale the worst[59]. Then took Leif three men from the group of Freydís and the tortured them into telling the events [they had] committed together, and each spoke the same tale. "Not willing am I" said Leif, "to do that which Freydís, my sister, seems to deserve, but I predict this, that those who come from her shall never have worth." And from that time, no one thought anything of her and hers but ill.

Now it is said at this time, that Karlsefni prepared his ship and sailed over sea. He travelled well and came to Norway both safe and hale and stayed there a winter and sold his goods and had there good overturning and then he and his woman were lauded by the noblest of men in Norway, but the spring after prepared the ship for Iceland. And when he was all-ready and his ship lay ready to set out before the jetty, then came there at him a Southern man, by birth from Bremen, in Saxland[60]. He offered to buy the gable-end of Karlsefni. "I will not sell," said he. "I shall give you a half mark of gold," said the Southern man. Karlsefni thought this was a good deal, and afterwards the bargain was made. Travelled the Southern man away with the gable-end, but Karlsefni knew not, what kind of tree it was, but that was hard-wood[61], which came from Vínland.

Now sailed Karlsefni over sea and came the ship before northern lands, in Skagafjord, and up there set his ship over winter. The following spring purchased he lands in Glaumby and built a farm there, and settled for the rest of his life and was considered a noble man, and were many men come from him and Guðríð, his woman, and were goodly descendents. And when Karlsefni died, took Guðríð over the farming and Snorri, her son, who was born in Vínland. And when Snorri was

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[59] Literally 'all-ill'.
[60] In Saxony.
[61] E.V. Gordon lists this as being maple wood.

married, then travelled Guðríð east and went to the south[62] and came back after to the farm of Snorri, her son, and had he by then built a church at Glaumby. Afterwards was Guðríð a nun and anchoress and was there the rest of her life.

Snorri was descended [from] thusly by his son, who was Þórgeir called; he was the father of Yngvild, the mother of Brand the Bishop. The daughter of Snorri Karlsefnisson was called Hallfrið; she was the woman of Runólf, father of Þorlák the Bishop. Bjorn was called the [other] son of Karlsefni and Guðríð, he was the father of Þorunn, the mother of Bjarni the Bishop. Many men have come from Karlsefni, and has he become the kin-ancestor of a strong line. And it was Karlsefni who told men all of the events of these voyages all, which now here some words have come.

[62] Guðríð appears to have gone first to Norway then on pilgrimage in Continental Europe. Jerusalem would had been named specifically had she made her pilgrimage there.