Examination of Late 18th and Early 19th Century Identity Through Burial at the Silo of Charlemagne in Roncesvalles, Spain

A Thesis
Presented in Partial Fulfilment of the Requirements for the
Degree of Master of Arts
with a
Major in Anthropology
in the
College of Graduate Studies
University of Idaho
by

Madeleine Philips

Approved by:
Major Professor: Katharine Kolpan, Ph.D.
Committee Members: Mark Warner, Ph.D.; Katrina Eichner, Ph.D.
Department Administrator: Brian Wolf, Ph.D.

May 2022

Abstract

The years around 1800 were a time of turmoil throughout Europe, as the newly created French Republic attempted to enforce republican ideals through warfare across the continent. This thesis examines articulated ossuary burials (n=17) contemporary to the War of the Pyrenees and the Peninsular War in Roncesvalles, Spain, to discuss how burial practice is affected by the confluence of identity and relationships. The themes of cultural expectations surrounding death, and the conflict between those expectations and necessity during times of instability are specifically examined. Previous scholarship suggests that many social hypotheses can be better understood through bioarchaeological analysis, but few sources have looked at sites from this era with the same patterns of use or historical significance. The ossuary is popularly thought to have been specifically constructed on Charlemagne's behalf after his military loss, described in the *Chanson de Roland,* but continues to be used to this day, having been carefully maintained to house the skeletons of pilgrims travelling to Santiago de Compostela since at least the 12th century. To understand how historical context intertwines with an individual's identity to influence their treatment in death, this research examines skeletons dating from this era [~1790-1820] in a region that hosted several military conflicts. Through the examination of the Silo of Roncesvalles, one can view how the conflict between personal relationships and efficiency affected burial practices. In turn, this examination helps to clarify the effects of political instability on cultural and social structures.

Acknowledgements

I would like to acknowledge everyone who helped me along my journey of the development of this thesis. Firstly, I would like to express my deepest appreciation to my committee chair, Dr. Katharine Kolpan. Her patience, careful consideration, and attention to each aspect of the thesis process was invaluable to me. Her conscientious instruction helped me to go above and beyond the foundations of my knowledge of archaeological and anthropological principles, and her incredible work ethic both inspired me, and made certain at each stage that my research and writing was at its best. I am extremely thankful to Fran Valle de Tarazaga and Emma Bonthorne of Aditu Arkeologia, whose generosity, guidance, and friendship over the last several years directly influenced the topic of this thesis, gave me a wealth of practical knowledge over the course of our acquaintance, and made Roncesvalles an incredible site to work at and study. I also wish to thoroughly thank the other members of my committee, Dr. Mark Warner and Dr. Katrina Eichner, whose warm advice, good humor, and patient instruction greatly helped me throughout the completion of my master's program, both inside and outside of the bounds of my thesis work.

I would also like to extend my sincere appreciation to the other faculty members of the University of Idaho's Department of Culture, Society and Justice. As both a student and teaching assistant, I was able to see their genuine regard for their students and their endeavors for academic excellence, and each one became a valuable role model for me as I worked to be a better member of the U of I community.

I gratefully acknowledge my friends and colleagues, especially the other members of my cohort, whose support and counsel carried me through two years of graduate courses and helped to ensure that the thesis could be finished at all. I also extend a special thanks to the

staff of Aditu Arkeologia's 2021 Field School, whose humor, warmth, and wit made me wholeheartedly love the time I spent studying Roncesvalles, both on and off-site.

I would finally like to thank my family for their support. This work would likewise never have been completed without their help, from the logistics of babysitting my dog for months on end, to the emotional comfort given after a particularly frustrating week, to the careful review of every paper written over the course of the completion of this research. I would also like to recognize and dedicate this thesis to two late family members without whom the course of my life would look very different: my namesake, *Tante* Madeleine, whose love ensured that I came to appreciate the Basque Country like a second home, and my *Amatxi*, who inspired my childhood with the "true" story of Roncevaux, and whose influence led me to study Basque archaeology.

Table of Contents

List of Tables and Figures

Chapter 1: Introduction

Death is one of the most ubiquitous topics in modern life, consistently discussed across many disciplines, from pharmaceuticals to English literature. Burial, on the other hand, tends to be an afterthought in Western culture, often consisting of a funeral and the placement of the remains in a cemetery (Tarlow, 2015:27; Anthony, 2015:173). While there are, of course, many exceptions, the separation of burial from the significance of death is a broad departure from the burial culture that is denoted in the archaeological record throughout Europe (Pearson, 1999:41).

The Silo of Charlemagne in Roncesvalles, in northern Navarre, Spain, is an example of a place where complex burial methods of the past intersect with modern European culture. In the present day it is still in use as the local ossuary or charnel house, but the origins of the structure are unclear. Popular folklore claims that the ossuary was constructed at the behest of Charlemagne after the destruction of his army's rear guard, as immortalized in the *Chanson de Roland* (Song of Roland). Dubbed the Silo of Charlemagne after the Frankish emperor of the same name, the ossuary has existed for hundreds of years and continues to be utilized, with remains having been deposited into the ossuary as recently as 2019. Roncesvalles has been a significant site since the medieval period as it is located along the original Roman route through the Pyrenees, and it continues to be the first "stop" on the pilgrimage route to Santiago de Compostela, signified with a symbol of a scallop shell and visited by thousands of pilgrims each year.

Within the ossuary are several articulated skeletons (n=17), that were interred during a relatively contemporary period- contemporary here meaning at some point at the end of the 1700s or the beginning of the 1800s- based on their placement and associated artifacts. The

internment of these individuals within the historic ossuary marks a significant question as to the importance of identity and the meaning of burial, particularly when comparing the careful inhumation of some of these individuals with the haphazard deposition of others from the same general period.

The era encompassing the late 18th and early 19th centuries was a time of epidemic disease and conflict, punctuated by the French Revolutionary and Napoleonic Wars. There is a temptation to view the people who died during such a destructive era monolithically. However, by looking at the burials at Roncesvalles it is possible to view the agency of the living through the graves themselves, a result which is also reflected in the range of burial methods from similar periods at the same site. The variation in burial method shows the changing balance between necessity and dignity, which illuminates the value system of those who buried the remains. While the chaos of wartime can cause burial to become an afterthought, especially when prioritized against actions which can make the difference between life and death, burial is still a crucial social practice. Likewise, warfare and instability can affect the social and cultural structures of a society itself, which informs the method of burial.

Organization of the Thesis

In Chapter II and Chapter III, I discuss the cultural, historical, and political background of Roncesvalles, as well as literature relating to the excavation and analysis of human remains, and how similar sites connect to Roncesvalles, both geographically, and in terms of historical and cultural context. These chapters discuss the significance of

Roncesvalles for the local population of Basques, as well as its larger historical and cultural importance as the setting for the *Chanson de Roland*, and as a pilgrim's hospital along the Way of Saint James. Chapters II and III also describe the events which led to the War of the Pyrenees (1793-1795) and the Peninsular War (1808-1814), as well as how those events played out in the area around Roncesvalles. Furthermore, these chapters explain how the events of this period affected daily life, and death, for the people who were involved in them. These chapters also describe the theories used to connect the aforementioned concepts to the research findings, including the application of agency theories.

Chapter IV is an explanation of the methodology used when studying the Silo of Charlemagne. Most of this methodology borrowed from the practices of Aditu Arkeologia, the archaeological team responsible for excavating the site. The methodological procedures described specifically relate to excavation practices, and the methods used to evaluate the remains uncovered in the ossuary. Chapter V expands on this methodology to describe the data from the Silo, explaining the burial context of the remains uncovered, and their spatial relationship to each other.

In Chapter VI, I discuss my findings and how they relate to the contextual information given in previous chapters. Through the connection of these results and the historical, cultural, and political context of the site, it is possible to attempt to describe who the people buried in the Silo were, and how they came to be buried there. This chapter further explains how these burials fit into broader conversations about how ritual practices change depending on societal context.

Finally, in VII I summarize the thesis and note potential future research that can help elaborate on how the Silo fits into the landscape.

Chapter 2: Cultural and Historical Context

To understand the significance of the burial of the individuals within the Silo of Charlemagne, it is critically important to first understand the context in which these people lived and died. This context includes the cultural, historical, and economic background of Navarre, as well as the greater international circumstances that led to the instability of the period. In order to get a better handle on how the history and politics of Navarre fit in with those of the site, it is likewise important to understand its geographic location as well. Though Roncesvalles is more broadly within Navarre, a part of the Basque region of France and Spain, it is also located adjacent to the two countries' political border. This border was not entirely concrete during the beginning of the 19th century and existed as a place of incredible historical and cultural significance, which contributes to its unique context.

People and Place

The Basques and the Pyrenean Region

The Basque Country, known in the Basque language as *Euskal Herria*, is a unique region made up of seven territories now located in France and Spain, which straddle the Pyrenees mountains and border the Atlantic Bay of Biscay to the west. Four of the territories are located on the south side of the mountain range in Spain: Bizkaia, Gipuzkoa, Alava, and Navarre. Geopolitically within modern Spain, the first three make up a territory that is also known as the Basque Country, politically referred to as the Basque Autonomous Community,

while the latter, Navarre, remains as a separate province (see Figure 1).[1] In France, Lapurdi, Zuberoa, and Lower Navarre (named for its elevation) are the Basque territories which sit along the northern foothills of the Pyrenees, though they currently have no political recognition or autonomy (Veyrin, 2011). Furthermore, these territories were not described collectively until 1643, when a French Basque parish priest listed the names of the seven Basque territories in his literary work, *Gero* (Mees, 2018:466). Even so, the creation of names for the Basque territories indicates that Basques had begun to become aware of a shared ethnic identity by the end of the 17th century.

Part of this feeling of unity sprang from the shared Basque language, *Euskera*. A language isolate, not belonging to the Indo-European family of languages, and unrelated to any other, *Euskera* has helped to identify the Basques as culturally distinct from their neighbors. Even the name for the region, *Euskal Herria*, means land of the Basque speakers (Veyrin, 2011). Despite this feeling of commonality, since Roman times the provinces have never been administratively united. They were unique among other European regions during the period in that each of them also largely self-governed through *fueros* (charters) which were respected by France and Spain in exchange for Basque loyalty (Mees, 2018:465). These *fueros* were respected until the latter half of the 19th century and were singularly grounded in a "historical ethno-cultural particularism" (Mees, 2018:465). The Basque political systems had a notably non-Indo-European language at their core, alongside a population that was still closely socially connected to its Catholic ecclesiastics in comparison to the rest of Europe, which was highly unusual in an era where Protestantism was at its peak. Likewise,

[1] It is necessary to note that the entire Basque region as a whole, encompassing land in both France and Spain, is called "The Basque Country" concurrently with the political territory in Spain, made up of Bizkaia, Gipuzkoa, and Alava.

contemporary sources also describe the Basques to be culturally and politically disparate from their French and Spanish neighbors, with a particular emphasis on the differences of Basque governance and its language. For example, in 1780, long before his time as president of the United States, John Adams rode through the Basque Country on his way to Paris. He wrote,

> . . . the high and independent spirit of the people, so essentially different from the other provinces, that a traveller perceives it even in their countenances, their dress, their air, and ordinary manner of speech, has induced the Spanish Nation and their kings to respect the ancient liberties of these people, so far that each monarch, at his accession to the throne, has taken an oath, to observe the Laws of Biscay" (as cited in Mees, 2018:467).

One of the provisions enforced by the *fueros* was the Basque concept of inheritance. Traditionally the eldest child, regardless of sex, would inherit all property and it was the responsibility of the younger siblings to find a life outside the family farm, or *baserri* (Tone, 1994:28). French reforms radically altered this system, requiring all male children to inherit equally (Arrizabalaga, 2005:271). While primogeniture was a well-established form of inheritance in Europe, the equality accorded to both men and women through this system of inheritance was one piece of what separated Basques so dramatically from other Europeans. Likewise, a pride in traditions helped to support the Basque sense of community and ethnic identity. In 1799 and 1801, German scientist Wilhelm von Humboldt came to the Basque Country to study the language. He observed "... an 'undeniable national similarity' between Basques on French and Spanish soil," and noted that "the Basques lived with an 'enthusiastic pride' attached to their fatherland" (as cited in Mees, 2018:467-468).

Like the rest of the Basque Country, Navarrese pride in the fatherland was not limited to an appreciation for the customs of its people, but also a respect for the landscape itself. As hinted at in the description of its northern counterpart, much of Navarre is high and mountainous, though it tapers into the plains of the Ebro River Valley in the south. Even in

ancient times, Navarre was considered to be the gateway of the Pyrenees, as its many mountain passes and valleys allowed the Romans and the Franks to travel in and out of the Iberian Peninsula, as well as traders, merchants, and the locals who lived there (Berdah, 2009; Jusué Simonena et al., 2010). In the 17th and 18th centuries, the route across the Pyrenees began to be more frequented as trade increased between France and Spain; this was supplemented by smuggling operations, as many of the tracks across the range were known only by locals (Berdah, 2009:166). The main path across the mountains ran directly through Roncesvalles during this period, up until 1761 when the royal highway opened along the Atlantic coast, connecting the Spanish Basque village of Irun to the French Basque village of Hendaye.

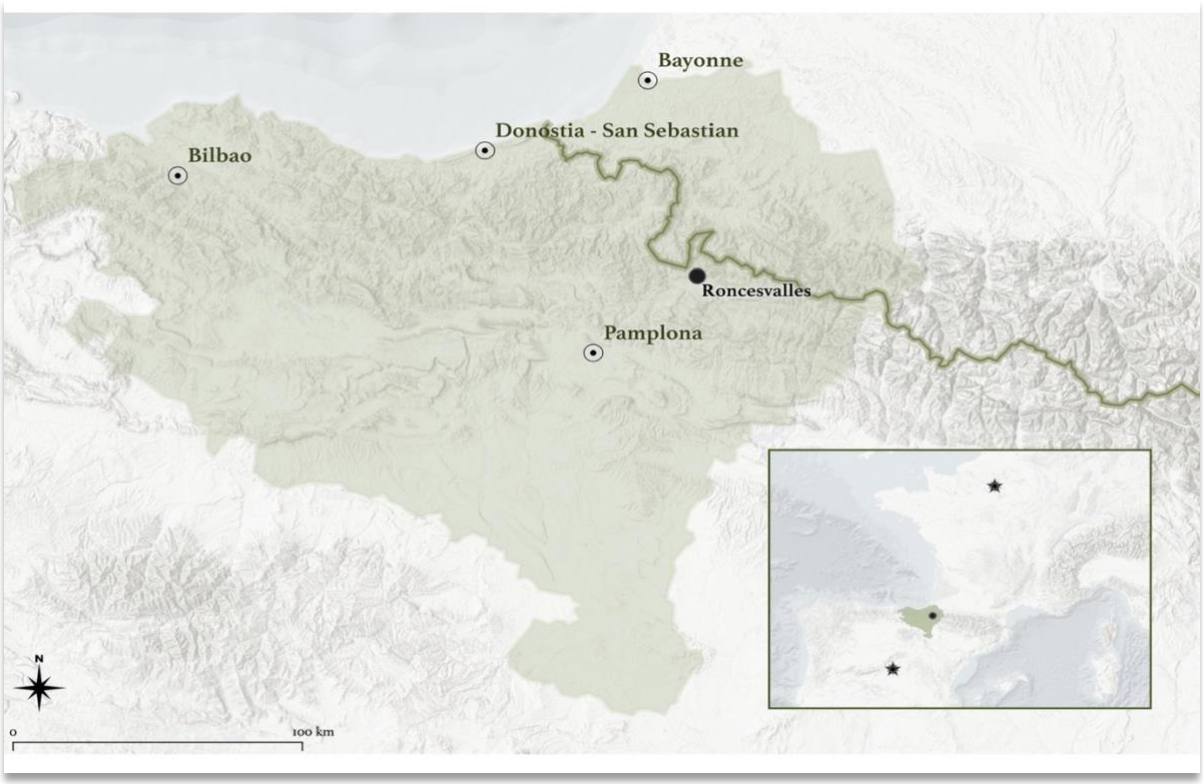

Figure 1. A Map Highlighting Roncesvalles and the Basque Country within Western Europe.

In 1779 the innkeeper at Roncesvalles reported monetary losses "... for that reason, carts and coaches no longer travel on this road, and the passage of travelers and mule drivers has notably diminished" (as cited in Andrés-Gallego, 2012:145). Despite the importance of these routes connecting the Iberian Peninsula to the rest of Europe, there was no clearly defined border in the Pyrenees until the 17th century and there continued to be border disputes into the mid-1800s (Berdah, 2009).

While nations continued to have political disputes over the Basque lands, the Basques themselves continued to work, travel, and interact with the landscape in the same ways that they always had. In 1942, Basque historian Philippe Veyrin wrote,

> There is not a hump in this "humpbacked" land, to use the words of a fine seventeenth-century observer, that does not have a name in Euskara. For the Basque peasant, every corner of his mountains is as clearly labeled as are the streets of a town for the town dweller. To eyes less familiar with the region, these hills, dense and entangled, several of which are massive rather than clearly outlined, are not at first sight as distinctive as the neighboring depressions (21-22).

Like the land, the rivers of the Basque country are uninviting to non-locals. Barely navigable, most have steep slopes, rocky beds, and a variable flow subject to sudden floods, which led them to only be used to float lumber during the winter months (Veyrin, 2011:24). These things are true of the area surrounding Roncesvalles as well. Despite the long history of use of the surrounding road, many of the paths around the hamlet are narrow and trace through inhospitable terrain. While in ancient and historical times, the route was one of the easiest pathways through the mountains, travelers still needed to use caution when following the narrow trails (Jusué Simonena et al., 2010:199).

Roncesvalles and the Chanson de Roland *(The Song of Roland)*

The treacherous landscape became internationally known through the 11th century *Chanson de Roland*, an epic poem describing the defeat of Charlemagne's army and the death of his beloved nephew, Roland, due to the treachery of the emperor's Muslim enemies (*The Song of Roland*, 1996). The poem is based on a real battle which occurred somewhere in the mountains above Roncesvalles in 778, and it was wildly popular throughout Europe during the Middle Ages (Redman, 1991). The story, as depicted in the epic poem, proposes that after seven years of Frankish fighting in Spain, the king of the last Saracen stronghold of Saragossa feared the Frankish emperor and offered Charlemagne his unconditional surrender. Charlemagne's nephew, Roland, nominated his stepfather Ganelon to go to the court in Saragossa to accept the offer of peace. Ganelon, believing that Roland hoped that the Muslims would kill him, decided in Saragossa to betray the Franks, and informed the Muslim army of a way to defeat Roland and the rear guard of the army as they travelled back through the mountain passes. The Saracens ambushed the Franks at Roncesvalles, and while Charlemagne's other paladins pleaded with Roland to blow his horn to call for help, Roland refused until the last moment, believing that calling for aid in the middle of battle would be cowardly. Though Charlemagne heard his nephew's horn and raced back to the pass, he did not return in time to save most of the army. In an act of revenge, Roland once again blew the horn so hard that his temples burst, killing him as a martyr. Enraged, Charlemagne chased the Muslims to the Ebro River where they drowned, and then proceeded to conquer Saragossa. Afterward, Ganelon was put on trial, where a friend fought a trial by combat on the traitor's behalf, but lost due to divine intervention, leading to Ganelon being brutally executed (*The Song of Roland*, 1996).

Although the *Chanson de Roland* was famous throughout Western Europe, it was also written during a time of severe anti-Muslim sentiment, contemporaneous with the first calls to crusade the Holy Land. Many Basque locals, however, likely knew the "true" story of Charlemagne's defeat at Roncesvalles. In 778, when Charlemagne was in the middle of laying siege to Zaragoza during the Frankish campaign into Muslim Spain, he heard of a Saxon uprising which caused him to return to Francia. Unfortunately for the Basques, this report reached the emperor just as they had closed the gates of Pamplona to him, refusing to allow him to quarter there for the winter. In his anger, still raging from his embarrassment in Zaragoza, Charlemagne's troops sacked Pamplona, destroying it (Lewis, 2008:249). As his army returned to Francia through the pass at Roncesvalles, the Basques took their revenge by ambushing the rear guard in a narrow valley, killing them to the last man, before taking all the plunder of Charlemagne's campaign in Hispania (Lewis, 2008:253; Veyrin, 2011:119). It was the Basques, not the Saracens, who destroyed Charlemagne's army.

While this fact has been known historically ever since the time of the battle thanks to the contemporary Frankish chronicler, Einhard, it is difficult to know to what extent the real story of Charlemagne's defeat would have been understood over time by the people of Roncesvalles, or even the Basques as a whole (Lewis, 2008). Even so, legends from different landmarks across the northern Basque Country described Roland as a sort of folk hero, who cleared the landscape of giants called *mairiak* (Duhourcau, 1999:152). Other French Pyreneans viewed Roland as a national hero for his role in the Battle of Roncevaux, with the citizens of nearby Bigorre undertaking pilgrimages to Roncesvalles into the nineteenth century, believing it to be Roland's final resting place, and poets from neighboring Bearn continually retelling stories of Roland's defeat (Redman, 1991:21, 23-24.) Likewise, pilgrims

to Navarre, travelling along the route to Santiago de Compostela, would have considered Charlemagne's own journey through Roncesvalles when retracing his path, and landmarks associated with Roland were shown to pilgrims even in the 17th century (Jusué-Simonena et al., 2010:197; Duhourcau, 1999:169).

History of Roncesvalles

Roncesvalles and its Historic Hospital

After the events of 778, the area around Roncesvalles continued to be frequented by travelers, but it was not until several hundred years later, in the 12th century, that people began living there permanently. A hospital was established at the southern base of the mountains to service the pilgrims headed to Santiago de Compostela via the pilgrimage route known as the *Camino de Santiago*, or Way of Saint James (see Figure 2). This complex was only fifteen minutes' walk from a smaller, older hostel at the Pass of Ibañeta, through which the old Roman road used to connect Hispania to the rest of the continent, and where tradition dictates that the actual Battle of Roncevaux took place (Andrés-Gallego, 2012:122-123; Jusué Simonena et al., 2010:202). By this point, the *Chanson de Roland* had spread the name of Roncesvalles throughout Europe, and travelers flocked to Roncesvalles not only out of convenience, but also with a religious fervor, imagining Charlemagne as a pilgrim as well as the champion of the Spanish reconquest (Jusué Simonena et al., 2010:197).

While Roncesvalles itself was not technically a town, or even a hamlet, a small settlement consequently sprang up around the hospital of Roncesvalles, based around the new collegiate church complex, known as the *Colegiata*, which was predominantly populated

by Catholic canons (Andrés-Gallego, 2012:125). While many people continued to pass through Roncesvalles without taking advantage of the hospital's services, the intention of the hospital was to serve as charity for those who lacked resources (Andrés-Gallego, 2012:124). Eventually, Roncesvalles started to appear as a miniature city, possessing a tiny population but still being complex enough to meet its own needs and those of the itinerant pilgrims (Andrés-Gallego, 2012:125).

Once crossing the Pyrenees, presumably from Saint Jean Pied-de-Port on the French side, travelers would arrive, eat, and rest for one or two nights at most before resuming their journey, though the sick were able to stay indefinitely. Therefore, the population of Roncesvalles was relatively constant, despite being perpetually replaced (Andrés-Gallego, 2012:125-126). Most of the pilgrims were French, though there were also commonly Flemish, Germans, and Italians (Andrés-Gallego, 2012:139-140). To accommodate the influx of foreigners, the hospital even had multilingual assistants to work with patients during their stay (Jusué-Simonena et al., 2010:199). Unfortunately, the high-profile nature of the hospital meant that it was subject to various conflicts over the centuries. Many wars were fought in the region during the hospital's tenure, and Roncesvalles was frequently ravaged by armies roving the mountains (Ibarra, 1934:393; Andrés-Gallego, 2012:136). Likewise, the pilgrims themselves tended to cause trouble, and in 1618 hospitallers noted that "... 'deaths, woundings and quarrels with wayfarers and pilgrims who were making their way to Santiago' often occurred within the confines of the Royal House" (as cited in Andrés-Gallego, 2012:139).

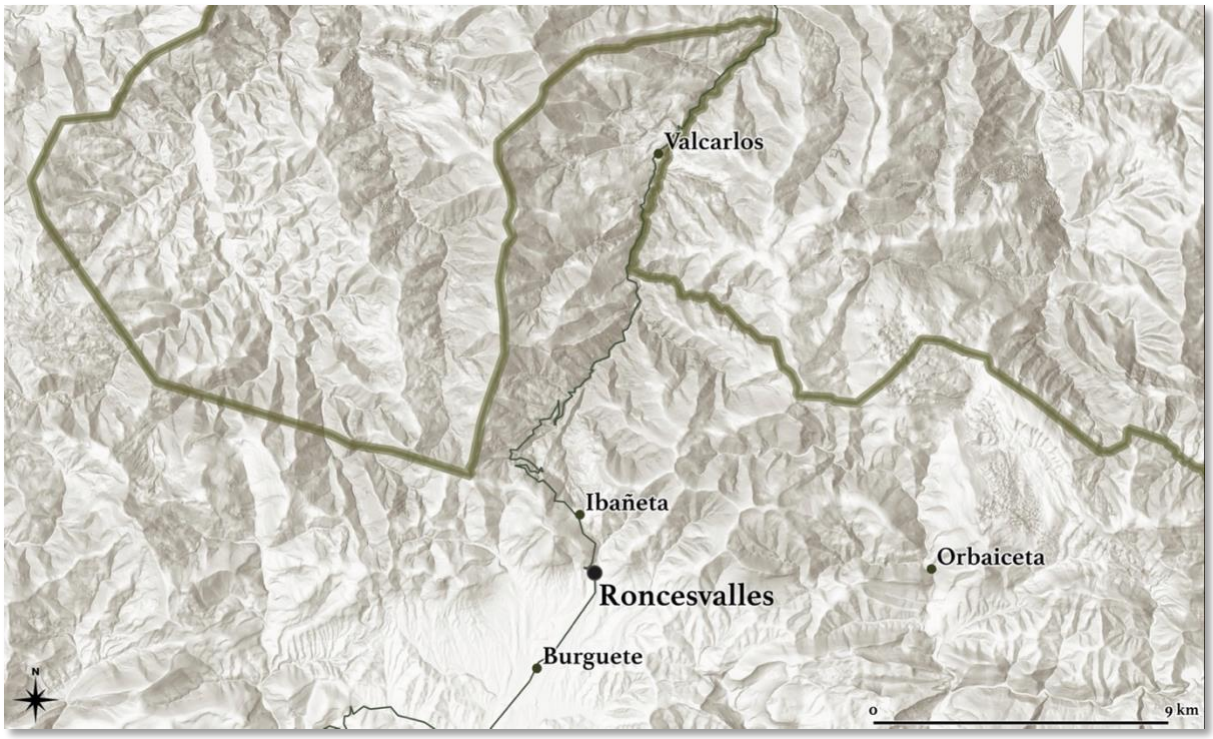

Figure 2. A Map of the Local Area Around Roncesvalles.

The hospital was a well-established local presence, even though in most instances locals had little reason to interact with it. Despite its importance as a waypoint between Iberia and the rest of Europe, the Basque region was relatively isolated, and life was simple for the majority of people who lived around Roncesvalles. In the 18th and 19th century, most of the locals around Roncesvalles were independent agriculturists, who practiced either farming or forestry (Pérez de Villarreal, 1989; Veyrin, 2011). Some also worked as mule-drivers to help transport people and goods across the mountains during the time of year when the passes were not impassible due to snow (Andrés-Gallego, 2012:141). The people who lived year-round in these remote areas consequently found it necessary to cooperate with each other to go about daily life.

Consequently, collegiate community of Roncesvalles' connection with their neighbors persisted even into the 19th and 20th centuries, such as when the whole *Colegiata*

was in danger of burning down in 1864. The entire population of Burguete, the next town over, assembled to help the people of Roncesvalles to put out the fire, by first carrying water by hand until two fire pumps could be used (Irigaray, 2021:136). Other fires in 1919 and 1935 were similarly extinguished with the help of the people of Burguete (Irigaray, 2021:137). Beyond a sense of neighborly affinity for Roncesvalles, the people of Burguete were also historically dependent on it, as the hospital was home to the only medical professionals in the remote area (Andrés-Gallego, 2012:141).

Prelude to War

Despite the sense of community held by the people of mountainous Navarre, a lack of clarity regarding the border between France and Spain was a source of conflict, particularly in the 18th century as inhabitants of Lower Navarre began to encroach on Spanish Navarrese pasture areas (Berdah, 2009:170). In 1785, the French and Spanish Caro-Ornano Commission established a treaty that delineated a proper border, however it disregarded traditional jurisdictions. As a result, shepherds on both sides of the mountains continued to resolve border conflicts within their own local assemblies until the beginning of the French Revolution (Berdah, 2009:171). The Revolution likewise caused a dramatic upheaval in the Navarrese population that had not been seen since the exodus caused by the Spanish Inquisition (Berdah, 2009:165). During the revolutionary period, around 7,000 priests and at least as many aristocrats fled France and took shelter in Northern Spain (Berdah, 2009:173).

Many studies follow the “Frenchification” of Spanish culture during this period, as France was enjoying the Enlightenment. Among the provincial elites, the writings of French philosophers were able to bypass Spanish censors through different channels, and so in the

Basque Country, French books brought a sense of cultural and political "modernization" (Lara Lopez, 2016:247). Likewise, the notoriety of intellectuals and artists began to transcend national borders, which led to a sort of cultural homogenization of the enlightened elites (Lara Lopez, 2016:247). While Spanish and Navarrese elites were taking advantage of Enlightenment ideas, the appreciation for them was soon countered by other French exiles during the period between 1789 and 1795. Due to the revolutionary fervor in France, a large part of the French Basque diocese of Bayonne fled to the Spanish Basque lands due to kinship ties and the shared language (Lara Lopez, 2016:259). Despite the influx of enlightenment literature, the embittered immigrant clerics instilled a sense of antipathy towards the revolutionaries, railing against French-style fashion and cosmetics, as well as dances, theater, luxury, and anything which contributed to the "spirit of debauchery" (Lara Lopez, 2016:249). Meanwhile, many other French emigrants fled to Spanish cities along the Way of Saint James, such as Roncesvalles, where there were resources to allocate to the poor (Andrés-Gallego, 2012:124).

The French Revolution and War of the Pyrenees

To understand the period of unrest that marked the end of the 1700s and the beginning of the following century, it is necessary to first understand the circumstances that led to the Revolution in France and how it is connected to the wars in Spain. The same enlightenment principles which had enchanted the Spanish elites created problems for monarchies throughout Europe, sparking revolutions across the Atlantic, such as in the American colonies and Haiti (Hobsbawm, 1962). The concept of individual freedoms and republicanism were at odds with the monarchic traditions of countries such as Spain and

France. Finally, at the end of the 18th century, a frenzied French populace engaged in a brutal revolution that culminated in the execution of King Louis XVI, alongside many other French nobles and elites. This action had grave repercussions. The French Revolutionary Wars began, fought by several European nations who were angered by the actions of the new French Republic, and the French themselves, who were upset with the mistreatment of French nationals in other countries and simultaneously trying to install republicanism elsewhere (Hobsbawm, 1962; Berdah, 2009:171). By 1794, revolutionary France had occupied parts of several surrounding countries, including northern Navarre (Hobsbawm, 1962). This period of conflict, often known as the War of the Pyrenees (1793-1795), saw intense fighting between France and Spain on both sides of the border.

While the war did not officially start until 1793, the Viceroy of Spain wrote to Roncesvalles on September 27, 1792, stating that the king wanted to station at least one hundred soldiers within the *Colegiata*, to which the Town Council replied immediately, offering the use of their buildings and supplies to the government, while also transferring a large part of the village's material wealth to Pamplona (Ibarra, 1934:810). On March 20, 1793, the town finally received a statement from General Ventura Caro, the leader of the troops stationed in the western Pyrenees, who wrote,

> For the defense of the border of this Kingdom, which His Majesty has deigned to take care of, I need to establish my troops in the district of this Royal House and Hospital, and this being extremely urgent, and that its delay could result in irreparable damage... For the good of the State, I beg you to leave without loss of time all the Canons and others occupying the buildings and houses, leaving them unencumbered for this purpose (as cited in Ibarra, 1934:810-811).

Although anguished about having to abandon their hospital, the inhabitants of Roncesvalles nonetheless left the town to the Spanish army and found refuge far to the south in the towns of Agoitz and Lumbier (Ibarra, 1934:811). The first battles in the area began at the end of

April, coinciding with the melting mountain snow. By the end of May, Spaniards occupied the entire area, including the village of Valcarlos on the opposite side of the pass from Roncesvalles. The Spanish troops also included a legion of nearly 4,000 French emigrants, who were stationed near Burguete. While they added to the mélange of local soldiers fighting over the Pyrenees, they were viewed as traitors of France and many were later taken prisoner and executed (Colas, 1912:154).

Meanwhile, the French Basque *Chasseur* regiment fought diligently for the Republic. At one point, the French decided that in order take the posts back from Spain it would be necessary to transport cannons across the mountain passes, even though the more experienced officers believed it would be impossible (Colas, 1912:150-151). The *Chasseurs* offered to take on the task due to their familiarity with the territory. The field marshal, General Pierre François Lambert Lamoreux de la Genetière, wrote, "... the astonishing Basques lower the piece of cannon by making the chain, one hand to a rock, the other to the cannon to prevent it from falling from a thousand *toises* [2,000 meters]; the piece arrives safe and sound in a place where only the devil or the Basques are able to place it" (as cited in Colas, 1912:151). Surprised by the cannonade, the Spanish retreated all the way back to Roncesvalles (Colas, 1912:151).

The skirmishes continued throughout the mountains, and the Spanish did well, as the French were low on provisions. One French soldier wrote, "... The division is going barefoot; it is absolutely barefoot; this expression is not figured, it is a truth. In addition, cans, pots, mess tins, tents, we lack everything..." (as cited in Colas, 1912:153). Regardless, the skirmishes continued, with the French stationed on the north side of the mountains at Saint Jean Pied-de-Port and the Spanish at Roncesvalles and Burguete. Despite the organization

and energy of the Spanish army, they continued to be repelled by the French. Finally, in October, the Spanish general found it impossible to continue to maintain his position, and so he evacuated the area (Colas, 1912:182). As the French began to descend into Roncesvalles, they arrived at the Ibañeta monument to Roland, which they demolished, replacing it with a "Tree of Liberty." They also razed the buildings at the pass to "make amends," for the destruction of the Carolingian rear guard (Jusué Simonena et al., 2010:203). The French soldiers likewise destroyed masses of weapons and other relics held in high regard by Roncesvalles' pilgrims, and the entire affair was celebrated as a great victory for France (Colas, 1912:183; Irigaray Gil, 2021:136; Arraiza Frauca, 1996:5).

The seemingly endless back-and-forth of the French and Spanish armies was finally brought to a close in the beginning of 1795 with the Treaty of Basel (also referred to as the Peace of Basel). France was granted the western half of the island of Hispaniola in exchange for returning the Basque province of Gipuzkoa—which had used its self-rule to join the French Republic during the conflict—to Spain (Pinto Tortosa, 2013; Tone, 1994). The scars of the War of the Pyrenees were still visible on the landscape though, especially in Roncesvalles and Burguete, which had been ruined by the French armies (Andrés-Gallego, 2012:146-147). The Royal House of Roncesvalles had been operated and used as a General Hospital for the military, and after the war it was left with damaged floors, windows, fireplaces, and doors. The four canonical houses were set on fire and destroyed, and some of the complex's offices appeared to have been shaved in half, from the ground to the roof (Ibarra, 1934:822). Hundreds of houses and structures in nearby Valcarlos and Burguete were razed, and the residents of Valcarlos had to rely on aid from the *Colegiata* of Roncesvalles to

pay 30,000 *reales* for reconstruction of their church (Ibarra, 1934:822). Javier Ibarra, canon of Roncesvalles in the early 20th century wrote:

> For the charity of Roncesvalles, for the millennial Hospital, there was no distinction between the Spanish, between the Navarrese and the French, between the friend and the enemy, between the good and the bad, between the underdog and the powerful, all were welcomed with the same charity with which the Divine Redeemer died for all men... The fact is that the French of the French Revolution were different from the brave and Christian French of previous times, and what they always respected, those of today, disbelief, that is, those of the revolution, would not have stopped before the looting, burning and sacrilegious murder. Those who did not respect the ancient and venerable Cross of Roland, dedicated precisely to the most sublime hero who has sung with the greatest lyricism the precious stanzas of the famous Turold in the Middle Ages, to the most illustrious of the French, to the model of knights, they would have stopped before some defenseless priests, who by being so alone, would provoke without a doubt, their savage anti-Christian phobias. In this fatal war nothing deserved respect from those jackals... Those who called themselves professionals and lovers of the slogans 'justice, fraternity and equality' (Ibarra, 1934:812).

Ironically, the French during this period did in fact have a healthy respect for Charlemagne and the heroics of Roland. Two weeks after the writing of the *Marseillaise*, the revolutionary song of France, Claude Joseph Rouget de Lisle penned *Roland a Roncevaux*, a song reminding soldiers of revolutionary France that the country was a producer of great heroes (and martyrs). Likewise, in 1793, composer Michel Sedaine wrote a "Chanson de Roland," affirming the heroic and sacrificial nature of the figure and reinforcing his virtues to the people of France (Redman, 1991:29). Later, at the beginning of the 19th century, a play about William the Conqueror was written by Alexandre Duval, who added to the play the idea that the Norman king called for a version of the *Chanson de Roland* to be recited for his men the night before the famous Battle of Hastings. The purpose of Duval's play was to encourage the French to invade England, and so the tone of the ancient poem is patriotic, showing Roland as a valiant hero (Redman, 1991:34). With so much French appreciation for their historic champion, it is possible to wonder at the intentions of the soldiers who destroyed Roland's cross at the pass of Ibañeta. If, however, the French saw the cross as a commemoration of the Carolingian defeat, rather than a memorial to the heroism of Roland

himself, it might be more understandable as to what might have driven them to their irreverent acts.

Life During the Peninsular War

After the French razed the area, the people of Roncesvalles and Burguete had little more than a decade to rebuild, though fewer and fewer pilgrims returned to the hospital. Meanwhile, on the other side of the border, French Basques continued to experience political upheaval. Though the era of Basque self-government managed through the *fueros* came to an end immediately prior to the beginning of the French Revolution, Napoleonic reforms further put pressure on French Basque traditional lifeways, ending the traditional system of primogeniture inheritance in favor of a partition system, where all children inherited equally (Arrizabalaga, 2005:94).

While the French Basques continued to struggle under Napoleonic actions, difficulties began to arise in Spain as well. In 1808, after his sweeping subjugation of Europe (in part thanks to an alliance with Spain), Napoleon installed his brother Joseph Bonaparte on the Spanish throne, forcing the abdication of Charles IV and his popular son Ferdinand VI. Sending his Marshal, Joachim Murat, to oversee the occupation of the capital city, Napoleon drew the ire of the Spanish people. Murat entered Madrid with enormous fanfare, in what looked to many like a victory march, and then refused to recognize the beloved Ferdinand, working only with his father, Charles. He took the hated counselor Godoy under French protection, and he commandeered a treasured national trophy, a sword which had been captured hundreds of years before from the French king, Francis I (Glover, 1974:50).

On May 2, the people of Madrid retaliated against the military occupation and various insults by murdering French soldiers in the streets and attacking their barracks. Murat quickly restored order, but to teach the Spanish a lesson he executed a hundred citizens chosen randomly from the crowd (Glover, 1974:51). At that moment, the Peninsular War (1808-1814) began as rebellions arose across the country in revolt against French control. Likewise, a desperate Britain and allied Portugal joined with the Spanish to help repel the French empire (Glover, 1974).

Roncesvalles, thanks to its strategic location, was again subject to warfare. This time however, the war began with French occupation of the village. Javier Ibarra lamented,

> ... more depressing were the humiliations and the moral decline to which the Council had to descend on several occasions, such as having to ring the bells to celebrate a French military triumph, having to swear in a Constitution imposed by the tyrant and usurper, and having to celebrate with the greatest solemnity the feast of Saint Napoleon, being the Emperor's name day, and other lowliness to which he forced the ecclesiastics (Ibarra, 1934:846).

Finally, in May of 1813, the French began to retreat back over the mountains, with the English and Portuguese close at their heels. The prior and canons of Roncesvalles, fearful of the repercussions of hosting the French to that point, greeted the Allied generals entreating them that through their capacity as doctors and clerics they felt bound to help everyone, including their enemies (Ibarra, 1934:846). At the time, the clergymen had thirteen sick and wounded people in the Hospital, of which nine were French, and they begged for mercy for all of them. The British general John Byng and the Spanish brigadier Pablo Murillo agreed to the requests of the canons and allowed them to continue to operate their hospital independently.

The people of Roncesvalles were relieved to be rid of the French, as the wake of their army often resembled that of a plague of locusts; while the British imported their supplies and carried them as they travelled, the French were forced to plunder each new place they

came across (Glover, 1974). When the Allied army finally moved north to invade Basque France, the British general Arthur Wellesley, Duke of Wellington, worried that the inhabitants would raise a rebellion against him as the Spaniards had done against the French. Instead, he reported that "... the natives of this part of the country are not only reconciled to the invasion, but wish us success, afford us all the supplies in their power and exert themselves to get us intelligence" (as cited in Glover, 1974:39).

After holding Roncesvalles for a few months, the Allies were threatened by an invasion over the mountains led by the Marshal General Jean-de-Dieu Soult. There was a pursuit, but little fighting until July 25th, when the Allies were caught by the French along the heights of Roncesvalles (Steevens, 1878:99). The two armies met at the crest of the hill and were obliged to fight in close combat, which resulted in many soldiers being bayoneted. Mountain combat was difficult and dangerous for the musket-laden soldiers, who were used to fighting on open plains. Of one battle, a British soldier wrote,

> We overlooked the enemy at a stone's throw and from the edge of a tremendous precipice. The river separated us, but the French were wedged in a narrow road with inaccessible rocks on one side and the river on the other. Confusion impossible to describe followed; the wounded were thrown down in the rush and trampled upon; the cavalry drew their swords and endeavored to charge up the pass of Echelar (the only opening on their right flank) but the infantry beat them back and several of them, horses and all, were precipitated into the river (as cited in Glover, 1974:258).

After fighting above the village, the Allies found that the French army had much larger numbers, and so after the loss of several officers, the former considered retreat (Steevens, 1878:100). British general Sir Galbraith Lowry Cole, who had been ordered by his superior, the Duke of Wellington, to hold his ground, began to get nervous when a thick fog rolled in during the late afternoon. Worried by the sound of the firing behind his right flank, which it would later be discovered was merely a demonstration of the National Guards, Cole decided to retreat (Glover, 1974:252). The next morning, July 26th, the mist remained, and the

departure of the Allied forces was not discovered by Soult until dawn. A unit was sent in pursuit of the British, but it did not come upon the rear guard until 4 o'clock that afternoon. Another French unit had even worse luck, as Soult decided to send them towards a different pass by goat track to try to head the British off. Marching single file in the fog, they had local Basque guides, but the language barrier caused communication issues. After hiking in circles for several hours, the corps found its way back to the main road, ending up behind the first unit that had been sent (Glover, 1974:253-254).

Despite their bad luck, the French again managed to take control of Roncesvalles. Faced with the influx of people, all activities of the *Colegiata* had to be suspended to focus on treating the sick and wounded, and many clergymen were forced to leave (Ibarra, 1934:846; Andrés-Gallego, 2012:147). By September, however, the Allies had regained control of the hamlet and its nearby passes (Glover, 1974:281). The Basques on both sides of the border were set on aiding the Allies to defeat the French, and regularly helped guide them to the detriment of Soult (Glover, 1974:283). Finally, on September 3, 1813, the Spanish colonel who occupied Roncesvalles gave the people news that General Wellington had entirely repulsed the enemy from Spain. One week later, the English general Viscount Rowland Hill remained, collecting food to return to the *Colegiata*, and clearing the town of the accumulated muck left by horses and artillery (Ibarra, 1934:847). Though the war would not officially be over for another year, peace had returned to Roncesvalles at last.

From 1792 until the end of 1813, the region around Roncesvalles existed in a state of turmoil due to ongoing warfare and its consequences. At the start of the revolutionary period, Pyrenean Frenchmen had little interest in sacrificing their lives for the new republic and conscription was entirely unsuccessful there in 1792 and 1793, with sanctions needing to be

imposed on those who were guilty of helping deserters (Berdah, 2009:172). Still bitter from the removal of their freedom of self-government, the Basques continued to resist the new French order, which considered the Basques a stronghold of the *Ancien Régime* (Berdah, 2009:172). During the War of the Pyrenees, the revolutionary government began deporting and executing thousands of Basques who had been charged with collaborating with the Spanish, and took measures against the Basque language, which they viewed as a clerical and aristocratic vehicle for indoctrinating the populace against republicanism (Mees, 2018:469). Though the Spanish Basques had more national support, the government of Navarre was likewise afraid of being used as a pawn for the national government, like the Basque province of Gipuzkoa had been treated at the end of the War of the Pyrenees (Rodríguez Garraza, 1990:116).

Beyond political struggles, Basques also suffered from severe illness during the period. The influx of people, both refugees and soldiers, spread pestilence quickly throughout the landscape. During the War of the Pyrenees, a typhus epidemic ravaged the area, causing the region to lose approximately 10% of its population, leading to the first of a series of mortality crises which extended into the early 19th century (Garcia-Sanze Marcotegui and Zabalza Cruchaga, 1983:63-64). The typhus was highly contagious and affected the regions invaded by the French, as the soldiers brought it into local areas and hospitals. In fact, the century's most severe period of epidemic typhus took place during this time, beginning with the French Revolution, travelling across Europe with the French military, and only coming to an end with the downfall of the Napoleonic empire (Rose, 1913:37). In Navarre, the surgeon of the town of Betelu and the abbot of nearby Lecumberri wrote to each other, describing the illness:

> I certify, as in the named village since the month of November of the last year of [17]94, follows a constellation of putrid, inflammatory, verminous fever, very contagious and of such malignancy that since the month referred to in such a small town. As it is, at least 80 people have ended their lives, finding themselves in the day (17 April 1795), contagious vice at its peak. And without any calm that they are afflicted and entire families, lacking almost all assistance, fearing infection... (as cited in Garcia-Sanze Marcotegui and Zabalza Cruchaga, 1983:81).

As pestilence travelled alongside the invading armies, so did famine, and floods of refugees. Because the French armies were dependent on raiding each place, they visited to procure enough supplies to sustain themselves, locals laid waste the land in front of the French advance, slaughtering animals and destroying mills and ovens to impede them (Glover, 1974:208). Fearing the French, the new refugees would march alongside the Allied armies, fleeing areas of active combat, and one soldier reported,

> Old people, lame and sick people, women just risen from childbed, children, and whole families with all their belongings packed either on bullock carts, mules, horses or donkeys, were to be seen mixed up with all kinds of beasts, among which pigs, owing to their unruliness and horrible cries, were the most conspicuous. Now and again the cry would arise that the French were coming, and then the young girls would implore all those who were riding to help them upon the saddle with them. Ladies who, according to the custom of the country, had never perhaps left their homes except to go to Mass, could be seen walking along, three in a row, wearing silk shoes and their heads and shoulders covered only with thin scarves (as cited in Glover, 1974:139).

Unsurprisingly, agricultural prices continued to rise during this period of instability, and costs continued to increase in the Pyrenean region all through the French revolutionary period, including after the Peninsular War (Lana Berasain, 2011:77). Finally, in 1817 the economy had begun to return to normal and accounts were again kept in Roncesvalles. Described as “a small hospital of pilgrims and charity,” Roncesvalles was home to eight servants and the families of a doctor, a shoemaker, a postman, a miller, a mason, and a man who worked as both a veterinarian and a smith (as cited in Andrés-Gallego, 2012:147-148). The upswing in economic activity after the war resulted in more mass emigration however,

as communities could not absorb the extra population due to their limited economic resources and small-scale agricultural activities (Arrizabalaga, 2005:93).

Though life as a civilian was difficult during this period, life as a solider was doubly so. Few soldiers had the privilege of being local to the areas in which they were fighting. Of 18,000 Spanish soldiers who fought in the western Pyrenees in 1793, about 1,600 of them were from the region (Rodríguez Garraza, 1990:115). Many of them, unsurprisingly, were unwilling participants in the war and desertion proved to be a serious problem. For example, in November of 1793, a total of 80 men guarding a cannon foundry at Orbaiceta, only a few miles from Roncesvalles, deserted for the winter, as did 600 men from the valleys of Santesteban and Bertiz-Arana the previous summer (see Figure 2). Evidently, these people were only interested defending their homes and crops, as is highlighted by the general enlistment of fewer than 300 men from the town of Roncal, due solely to the threat of the French taking their cattle (Rodríguez Garraza, 1990:115).

Adding to the difficulties of attrition, armies were generally slow and inefficient, and this fact was compounded by the small and ill-maintained roads throughout Spain, but especially in rugged Navarre (Glover, 1974:27). Walking in the Basque mountains, one British soldier wrote, "... the hill with which we were faced was the steepest I ever climbed. The ground over which we had to pass had been intersected for months with incessant labor and French resource; every five yards exposed to us a new crossfire and deep cuts, which furnished graves for many a gallant soldier" (as cited in Glover, 1974:292).

The weather conditions also made travel difficult for soldiers. In October of 1813, during the Peninsular War, soldiers camped at Roncesvalles had to frequently dig themselves out of the snow each morning, and one soldier wrote, "[Even on the lower slopes] it was

certainly beginning to be exceedingly cold, with frequent storms of hail and rain. Our tents, from the tremendous gusts of wind which suddenly and frequently assailed them, were torn and often rendered useless" (as cited in Glover, 1974:288). Bad weather, especially after marching for hundreds of miles for days on end, greatly damaged the morale of both sides' armies, foot soldiers and officers alike (Steevens, 1878:99). In the midst of the long days of marches, many of the soldiers died of thirst, and during the Peninsular War, French and British soldiers could be seen mingling together at muddy water sources out of desperation (Glover, 1974:109, 208). The soldiers who survived the marches were described as, "... the funniest cripples you ever saw, in uncommon pain, our toes feeling as if they were always out of bed on a cold night, and the foot had all kinds of *aitches* in it" (as cited in Glover, 1974:221).

To take their minds off the misery of military life, many soldiers would engage in debauchery, and one witness in Villafranca noted,

> ... parties of drunken soldiers were committing all kinds of enormities; several houses were in flames. The gutters were flowing with rum, a number of puncheons having been staved in the street and a promiscuous rabble were drinking and filling bottles in the street. Numbers of the stragglers were so drunk that all out efforts to drive them on were fruitless, and we were obliged to leave them to their fate. They were soon overtaken by the French *chasseurs* who treated them most unmercifully, cutting to their left and right, and sparing none who came in reach of their swords. One of them who escaped and rejoined the army presented the most shocking sight I ever beheld. It was impossible to distinguish a single feature. The flesh of his cheeks and lips were hanging in collops; his nose was split and his ears were cut off (as cited in Glover, 1974:80).

Injury and illness, two of the primary killers of soldiers during this period, likewise followed the armies wherever they went. The same typhus epidemic that devastated the local population likewise wrought havoc on the French and Spanish armies during the War of the Pyrenees. In a 1794 letter, the Marchioness of Lozoya wrote, "... All the towns that the French have left have left them plagued so that the general does not want to join the troops

until some precautions are taken" (as cited in Garcia-Sanze Marcotegui and Zabalza Cruchaga, 1983:80). The same soldiers were also affected by other illnesses such as dysentery, which was often compounded by an already severe lack of food and water (Garcia-Sanze Marcotegui and Zabalza Cruchaga, 1983:81).

During the Peninsular Wars, disease was also a great fear, highlighted by the fact that the British army lost 8,889 men in battle and 24,930 from illness (Glover, 1974:37). During that time, the primary killer was malaria, and doctors were unfamiliar with effective treatment methods. A surgeon who was suffering from it was bled and then "... they carried me into the yard, placed me erect and poured four or five and twenty buckets of cold well water over me from a third story window," while another soldier was seen by an old Portuguese army doctor, and prescribed "... the best of living and at least two bottles of *Madeira* per diem" (as cited in Glover, 1974:37). A British soldier recovering from malaria described the hospital he was staying in as "... a long bomb-proof room; no ventilation except by the door and chimney; twenty patients of whom eighteen died" (as cited in Glover, 1974:37).

Illnesses and injuries were treated with a similar lack of medical knowledge. In the case of immediate, severe injury, nursing staff were completely incapable of providing sufficient warmth and fluids, let alone a peaceful environment, and surgeries were carried out without any anesthesia. Infection was common, and often fatal (Horáčková and Benešová, 1997:284-285). Hygiene was almost nonexistent as a rule in the field, and the injured were placed alongside people suffering from infectious diseases (Horáčková and Benešová, 1997:288). In a normal Napoleonic battle, emergency care was usually administered in the open air, and while staff carried dressings and surgical instruments, each soldier would have

his own dressing material as well. Minor injuries were treated only provisionally, and the injured were usually transported to more permanent facilities away from the battlefield, though severely injured soldiers were treated in field hospitals due to the urgency (Horáčková and Benešová, 1997:289). That said, one doctor admitted that "... to several a simple inspection of their wounds, with a few words of consolation, or perhaps a little opium, was all that could be recommended. Of these brave men the balls had pierced their organs connected with life; and in such cases, prudence equally forbids... the useless indulgence of deceptive hope" (as cited in Glover, 1974:36-37).

The aftermath of these conflicts was often unimaginably gruesome. After one Peninsular War battle, a British solider wrote, "... our highlanders lay dead in heaps, while the other regiments, though less remarkable in dress, were scarcely so in the numbers of their slain. The French grenadiers, with their immense caps and gaudy plumes, lay in piles of twenty and thirty together- some dead, others wounded with barely strength to move" (as cited in Glover, 1974:154). Another described a frightening sight, stating,

> In the main breach there lay a frightful heap of thirteen or fifteen hundred British soldiers, many dead but still warm, mixed with the desperately wounded, to whom no assistance could yet be given. There lay the burned or blackened corpses of those who had perished by the explosions, mixed with those that were torn to pieces by round shot or grape, and killed by musketry, stiffening in the gore, body piled upon body, involved and intertwined into one mass of carnage. The smell of burning flesh was shockingly strong and disgusting (as cited in Glover, 1974:187).

While these gruesome circumstances were difficult just to bear witness to, the practicalities of such carnage meant that disease was even more of a concern.

The Influence of Miasma Theory and Disease on Death and Burial Practices

As much as illness, injury, and medical treatment were inherent parts of warfare, so was death and burial. During the late 18th and early 19th century, many Europeans had a fear

of “miasma” or bad air as a cause of disease, due to the belief that bad scents could introduce decay into the bodies of those who breathed it (Thorsheim, 2011:40). While the concept of “miasma” was new to the 18th century, the idea of poisoned air being a cause of disease had been a common theme throughout the early modern period (Kinzelbach, 2006:376). Renée Bourgeois, a physician who treated Napoleonic soldiers in Russia wrote that, “... on the march to Russia during the sultry weather the many cadavers of horses putrefy rapidly, filling the air with miasms, and that this caused much disease” and it was noted that, “the great number of the sick, crowded together in unfit quarters; the stench of the innumerable unburied and putrefying cadavers of men and animals in the streets of Moscow... had finally developed into a pest-like typhus” (Rose, 1913:37, 75-76). The blight of death brought on by the warfare during this period also brought fears of miasma with it. The aftermath of one particularly gruesome battle called for, “Soldiers, Westphalians as well as Russian prisoners... [to] remove the corpses from the houses and the streets, and then a recleansing of the whole town was necessary before it could be occupied by the troops” (Rose, 1913:32-34). The armies of the era were highly conscious of the importance of proper burial for their own wellbeing, though the enormous scale of death made this impossible in most circumstances.

Burial of soldiers often had to be done hurriedly to prevent the spread of disease because the circumstances surrounding warfare were often urgent, and resources were scarce (Vymazalová et al., 2020:144). High levels of mortality and a need for additional burial space meant that soldiers were likewise rarely buried in traditional cemeteries, but rather improvised mass graves, many of which were located in nearby military field hospitals (v. Grumbkow et al., 2012:2-3; Vymazalová et al., 2020:150). Corpses were often put in earth-cut burials, meaning they were simply placed in holes dug into the ground and then covered

with earth. A general lack of organization is characteristic of these mass graves, such as in Kaliningrad, Prussia, where some skeletons were placed along a North/South axis and others in a foot-to-foot position, or in Le Mans, France, where individuals were conversely deposited “head-to-foot” (Countinho Nogueira et al., 2019:192-193; Thèves et al., 2015:30). If a burial could not be completed, whether due to a lack of time or resources, soldiers would have to resort to more drastic measures. In Vilnius, Lithuania, it was reported that, “Heaps of cadavers were burnt and when this was found to be too expensive, thrown into the [Neris],” however, “few of the higher officers were laid at rest in the cemetery...” (Rose, 1913:113).

Other military units attempted to provide preferential treatment for officers during the Peninsular Wars. This is evident in the description of the death of Lieutenant General John Moore, whose body was wrapped in his cloak and then buried on the ramparts of Coruña in a grave dug by some of his corps (Glover, 1974:86).

In the cases where more traditional burials could be completed, fears of miasma still drove the actions of the gravediggers. One way to combat this was with the addition of lime or quicklime to a grave. In Greek and Roman times, it was believed that lime could enhance the speed of decay and reduce the odor of decomposition, thereby “disinfecting” a burial (Schotsmans et al., 2017:498). Though this belief was technically mistaken, lime was still used up until the modern era to prevent the unpleasantness of putrefaction from escaping a grave. This practice was particularly common from the 16th to 18th centuries, as periods of plague necessitated the use of lime on burials to protect against infection (Bianucci et al., 2009:616). During the War of the Pyrenees, one mass graveyard in Le Mans, France had lime covering eight out of nine total mass graves, showing the importance of lime for burial, even in chaotic circumstances (Thèves et al., 2015:32). Even after the Napoleonic wars ended,

villages in Spain still used lime during animal disposal to improve hygiene, and in 1849, a local mandate stated that the undertaker of one cemetery should apply lime to graves to presumably accelerate decay, also indicating that the cemetery itself would have stored lime (Schotsmans et al., 2017:506-507).

In Spain during this time, lime was a fairly abundant resource. Community lime kilns were present throughout the country, including the area around Roncesvalles, and villagers would work together to produce lime for the entire community (Schotsmans et al., 2017:506-507; Pérez de Villarreal, 1989:378). Apart from burial, lime was commonly used in Spain for amending soil in corn fields, or whitewashing the walls of buildings, and so its various uses also meant that it was commonly available (Schotsmans et al., 2017:506-507; Pérez de Villarreal, 1989:378). This meant that even during wartime periods of hyper-efficiency, some locales were able to provide enough resources to ensure that "miasma" would not be a risk to the living.

Burial Practices and the Silo of Charlemagne

Wartime burial practices should likewise be expected at Roncesvalles during this period, which prior to the wars had already existed as the final resting place of canons, pilgrims, and local villagers. During the late 18th and early 19th century, Roncesvalles was also believed to be the gravesite of Roland and his companions, which contributed to its status as a sort of proto-tourist attraction (Redman, 1991:76). The chapel of Sancti Spiritus, a square-shaped structure oriented downhill from the collegiate structures of the village, houses the "Silo of Charlemagne," which was popularly believed to have been constructed to house the bodies of Roland and the other paladins after the battle in 778. Though the Romanesque

Silo itself was likely constructed at some point during the 12th century, it nonetheless functioned as an ossuary throughout its history, broadly known as the burial place for deceased pilgrims (Jusué Simonena et al., 2010:203; Ibarra, 1934:60). Between 1200 and 1215, a local priest known as Father Fita wrote a poem to Roncesvalles, in which he described a square-shaped *carnario*, or temple to receive the dead, complete with an oratory and an overhead orbicular vault (Ibarra, 1934:60). In the early modern period to which most sources describing the structure date, the main purpose of the chapel and Silo was to serve as an ossuary as well as a place to pray for the deceased, both travelers and locals. Domingo Laffi, a pilgrim in Roncesvalles in the 1670s wrote,

> This tomb is like a small square chapel, about twenty feet on a side, with a beautiful pyramidal dome, finished in a beautiful cross; on the inside, the tomb is equally square; hardly a person can walk between the tomb and the wall. It is also said that the other heroes are here buried with Roland. On the four fronts (of the silo) are painted all the wars that took place in this place, as well as the betrayal; everything is painted in chiaroscuro. At the foot of the door of this grave is the stone that Roland broke next to the fountain; it is cut in half.... (as cited in Ibarra, 1934:58).

Given that Laffi describes the overhead vault as "pyramidal," the structure must have been renovated at some point after the 13th century (Ibarra, 1934:61). During the 16th century, the chapel was built in relation to the ossuary, which is supported by a 1587 inventory of the Silo that mentions that there was an altar with an ancient altarpiece and twelve chairs for the canons (Ibarra, 1934:61; Martinez de Aguirre et al., 2012:82-83). These facts support later reports which note that it was customary to inter any pilgrim who died in the hospital of Roncesvalles with a celebrated mass (Martinez de Aguirre et al., 2012:82-83).

A French priest known as Father Daniel, while composing a history of France, visited the Silo in the early 18th century and described it as such:

> About three hundred steps from the Abbey of Roncesvalles there is a chapel in the form of a quadrilateral. It is sixty feet long on the outside by forty-five in width and a little more in height, at the top of the ground floor. In the middle of this chapel there is an opening two feet

> wide and three feet high, which serves to go down to the cave, deep, about thirty feet, well closed, and whose capacity is equal to that of the chapel... with a light [I] was able to discover some bones at the bottom. Around the chapel there is a cloister... [which] does not receive light except through small open windows in the arcades, through which thirty large but simple tombs can be seen outside. They have an elevation of four feet and are made of large stones, without any inscription. The exterior wall of the chapel, at the height of the tombs, is painted in fresco, and the painting represents the story of Roncesvalles (as cited in Ibarra, 1934:58-59).

Aware of the folkloric history of the structure, many used the site to honor the memory of those killed in 778, and even took bones from the ossuary as "a pious remembrance of their ancestors" (Martinez de Aguirre et al., 2012:80). One sacristan was even reported to be selling bones for five *pesetas* each, though the veracity of this claim is subject to some doubt (Sorbet Ayanz, 1965:60).

The Silo continued to be used undisturbed as a pilgrim's cemetery, and though Roncesvalles began to see fewer and fewer travelers in the 18th century, it still acted as a busy hospital. In 1792, Roncesvalles saw only 222 pilgrims, but had nearly three times as many patients (Andrés-Gallego, 2012:145). There were no pilgrims at all in 1793, during the War of the Pyrenees, when the canons were forced to evacuate Roncesvalles. When they returned, they noted that the Silo had been "almost completely ruined," much like many of the other structures in the village (Ibarra, 1934:822). Even so, pilgrims and patients began to return to the hospital in the years between the aforementioned war and the Peninsular War in the early 1800s, though each year there were generally almost twice as many sick patients being treated at the hospital as pilgrims to host (Andrés-Gallego, 2012:146-147). With the Peninsular War, the canons and people of Roncesvalles stopped keeping track of the town until 1817, but by that point the *Colegiata* was nearly ruined by the destruction and expenses caused by the war and royal confiscations; the hospital remained closed until the mid-20th

century, and the pilgrims were presumably no longer interred in the Silo (Andrés-Gallego, 2012:148).

By 1934, during Javier Ibarra's tenure, the Silo was active only as the burial place for canons and locals of Roncesvalles, who were buried within the tombs located at ground-level within the chapel of Sancti Spiritus (Ibarra, 1934:60). This is supported by researchers in 1981 who interviewed the complex's sacristan and one 90-year-old local woman, both of whom attested that they had not known of people to have been buried in within the Silo during their lifetimes (Iriarte and Igartua, 1981). That said, it is known that excavations and renovations of the surrounding area led to skeletal remains being deposited into the ossuary in the 20th century, likely during renovations to the nearby church in 1941 and following road construction at Ibañeta in the 1960s (Iriarte and Igartua, 1981; Jusué Simonena et al., 2010). It likewise appears that for most of the 20th century, the colonnade of the chapel of Sancti Spiritus functioned as a primary burial place for canons and locals to Roncesvalles, whose skeletonized remains were also redeposited into the Silo after a lengthy period to make room for new ones. This practice has continued into the 21st century, and the most recent deposition of remains into the pit of the Silo occurred in 2019 during the ongoing archaeological excavations.

Chapter 3: Understanding Death and Burial

This chapter aims to describe the anthropological basis for understanding death and burial. It includes a description of the practices seen at nearby sites dating to similar periods, other ossuaries, and other war burials contemporaneous to those of the Silo of Charlemagne. Though historical and cultural context plays a large part in the way that people are buried, as will be discussed below, there are also many concepts that are universal in burial rituals across the world. This chapter will further use these concepts to explain the methodology of bioarchaeologists when trying to understand the lives of deceased individuals, as well as how their deaths can help to make sense of the lives of the larger population. Finally, the chapter will describe previous archaeological study in the area, including studies also currently being carried out at the Silo of Charlemagne.

Life, Death, and Anthropology

In the Basque Country, as in other parts of the world, death is a significant event which connects communities together by reinforcing social relationships. Basque funerary rituals are particularly important for reinforcing community ties, as they activate a wide range of social relationships (Douglass, 1969:212). Generally, the village cemetery is placed just at the edge of the town's nucleus. In the Bizkaian village of Murélaga—the location of an ethnographic study undertaken by William Douglass in the 1960s—the cemetery plots were not allocated according to household. In burial practices akin to those at Roncesvalles, when an individual died, gravediggers would exhume a person who had been previously buried, deposit the bones in the town's ossuary, and then bury the newly deceased. Because

of the constant movement of remains after death, little attention was paid to where the individual was buried, and family members would allow the plot to become overgrown and visibly neglected (Douglass, 1969:72-73). That said, Douglass noted that "... this impression of neglect is illusory, for, in fact, the cemetery is held in great respect. Stories of witchcraft and apparitions of deceased individuals are often set in the cemetery. Furthermore, the cemetery is felt to be a place of religious importance rivalled only by the church itself" (1969:73).

The cemetery of Murélaga, like others in the Basque Country, was specifically organized and structured. The main section was designated as part of the blessed land known as *campo santo*. One corner of the cemetery for "non-Christians" was unblessed and walled away from the rest of the cemetery. Douglass noted that those who were perceived to be non-Christians could be anyone not clearly be identified as Catholic, specifically strangers to the village (Douglass, 1969:74). The ethnographer added,

> This problem arose in another Basque village (Echelar, Navarre) studied by this investigator. The body of a Portuguese laborer, who died while trying to cross the border into France, was found in the mountains pertaining to the village. He was brought to the village nucleus and prepared for burial. However, the priest was undecided as to whether the man could be interred in the *campo santo* because he might not be a Catholic. It was finally decided to go ahead and bury him in holy ground on the grounds that he was wearing a scapular medal (Douglass, 1969:74).

Clearly, the placement of a body in space was significant to these small Basque towns, both for religious and cultural reasons. The placement of a body in *campo santo* was only brought up if an unknown corpse was given to the church, however. This was uncommon, as unbaptized people lack social personality, and therefore their deaths were not societally important. Instead, the usual procedure throughout the Basque Country was to bury unfamiliar corpses in the household garden without ceremony (Douglass, 1969:74).

The rituality of burial itself was significant to Basques in Murélaga, as well as those in other villages, as ritual was an emblem of spiritual predictability. Douglass noted, "Deviation from expected custom produces insecurity. Strict compliance to traditionally defined ritual is not solely an expression of solidarity in the face of death but also a way of ensuring the deceased individual's orderly entrance into the realm of the dead" (Douglass, 1969:75-76). That said, there was often a disconnect between the townspeople, who were responsible for the relationships with the dead and the rituals themselves, and the clergy who were responsible for the spiritual meaning that the rituals were meant to symbolize. While priests were willing to substitute ritual acts to preserve religious meaning, locals would rarely allow for deviations in their standard practices, and many believed that the dead would not be able to rest properly without them (Douglass, 1969:77; Barandiarán, 2007:82).

These beliefs in the importance of repetitive acts arise from a sense of obligation, based on the necessity of the living to aid to the deceased. Catholic doctrine determines that souls left in Purgatory can be helped into heaven through the intercession of the living, and so adhering to proper ritual is necessary to reinforce the correct relationships between the living and the dead (Douglass, 1969:79). José Miguel de Barandiarán, a well-known Basque ethnographer, did a similar study in the French Basque village of Sare, and found that the connection between the living, the dead, and the *baserri* were closely intertwined, and a family's ancestors were to be taken on alongside the family home (2007:215). The ethnographer noted, "A few days before a wedding is to take place, the families of the bride and groom arrange for a mass to be sung in the parish church for the deceased of both their houses. Such a mass is said to be *obligazionentzat*, meaning that it is being celebrated in

fulfillment of the obligations of both families toward their respective ancestors" (Barandiarán, 2007:215).

Beyond interpersonal relationships, many connections between the living and the dead are economic in nature, especially for Basques. Costs incurred included the payment of religious authorities for funeral services and the maintenance of the burial location. The coffin, burial gown, and funerary banquet were also expensive, and family members known to be wealthier were expected to provide more elaborate funerals, allowing for the economic differences between households within the same generation to be leveled-out (Douglass, 1969:213-214).

While the specificity and meaning of funerary practices in the Basque Country are particular to the Basque population, death is important across all cultures and time periods. The significance of death and burial is something which is almost universally shared. When a human being dies, it becomes an inanimate body which immediately begins to decay, generally necessitating some kind of treatment in order to prevent the corpse from becoming unpleasant for the living.

At the same time, the death of a person itself normally has a separate, but related meaning for the survivors, which also generally needs some form of acknowledgement. While a cynical argument about the insignificance of the body in terms of its existence as an inanimate object could be made, the reality is that bodies hold much more meaning than simply their existence as organic matter (Lacquer, 2015:5). Although they decay and eventually become dirt, a corpse holds meaning for people, and the treatment of a body as a simple object therefore has as much cultural meaning as various forms of corpse veneration. By its very nature, the corpse especially is an object that attracts attention, and the burial of it

is likewise something distinctly human, rather than animal (Lacquer, 2015:8; Sofaer, 2006). It is important to remember that the burial of a corpse is not simply done out of practical necessity, but rather as a way to remove the dead from the domain of the living (Pearson, 1999:5). Furthermore, "... funerary ritual lends communal support to the immediate survivors in their time of crisis while at the same time providing them with a ritualized (and therefore safe) outlet for personal grief" (Douglass, 1969:212).

The importance of burial and associated rituals cannot be understated in a discussion of human culture, as death is one of the most significant events in a society. Death, which is often associated with liminality, or existing in between two states of being, is likewise an important rite of passage, both for those who died as well as the living (Turner, 1969). The actions that revolve around death, such as certain rituals or the construction of monuments, mark the importance of the event within a community, and their enactment, or lack thereof, can likewise mark the significance of the person who passed away (Pearson, 1999). Ritual is made up of two parts. The first is semiosis, or ideological meaning, whereas the second part is the physical enactment itself, known as embodiment (Henn, 2008:14). Therefore rituals surrounding death, such as burial, must be considered in how ideological meaning is conveyed through embodiment.

The religious or cosmological beliefs and practices surrounding death similarly work to both maintain or transform human social and psychic structures (Turner, 1969:4). Beliefs and practices, acted out through ritual, are communicative and intended to portray meaning, although theorist Roy Rappaport noted that, "... the transmitters of ritual messages are often, if not always, their most significant receivers" (1974:10). This is because, when understanding the importance of rituals such as those relating to death, ritual works to

maintain the organization of society to help reinforce cooperative actions (Rappaport, 1974:62). Ritualizing death therefore allows individuals to both behave practically towards a body, as well as mark the life of the one who passed away.

The majority of those who are buried have some sort of social significance for those who organize their burial, whether through family ties, friendship, or membership in the same community. Some individuals, however, hold meaning for a larger group of people during their lives and after their death beyond typical personal connection. Many of the dead have an ongoing legacy thanks to their actions during their lifetime. Unlike the simpler memorialization that characterizes most burials, some bodies can conversely be used to propagandize a person's actions, or attribute actions to them that they did not actually perform. In this context people can continue to persist in historical perception (Verdery, 1999).

The treatment of the corpse is (usually) meaningful to the person who once inhabited it, and commemoration of the dead holds meaning for the living by allowing the person who passed away to continue to live on in memory. While all cultures do something with their dead, the method of burial and commemoration differs from culture to culture, and no matter how universal the desire to treat a corpse, the differences in method are cause for further cultural separation (Pearson, 1999). Because of this, the method of burial can help to identify cultural affinity. Factors like orientation, position, grave type, grave markers, burial containers, clothing, religious artifacts, natural materials, personal artifacts, and location can all imply specific cultural affinity (Goldstein et al., 2012:92-3). When the culture group of those buried is approximately the same, these different factors can likewise aid with

narrowing cultural affinity down to more specific individual identity (Goldstein et al., 2012; Pearson, 1999).

Understanding population dynamics and cultural affinity through the study of death and burial is essentially the definition of mortuary archaeology. By looking at the circumstances around a burial or the absence of one, archaeologists try to understand the lives of the people that the deceased person aligned themselves with in life. Often this is done through osteological study and artifact analysis, as both can help to pinpoint activities in life. That said, the presence of artifacts is not inherently equated with larger cosmological or political ideas (Pearson, 1999; Ucko, 1969). Neither does the presence of markers in skeletal features, which, though often used to make assumptions about populations as a whole, can be easily misinterpreted (Larsen, 2015). Even so, often these things are in fact visible from within the grave, and funerary rites can act as idealized representations of social structure (Pearson, 1999:23).

With death, individuals are likewise concerned about pollution. While evidence from the 19th century shows practical fears about literal pollution from the decay of a body, pollution in this context also applies to the existence of the body as symbolic of a torn social fabric (Pearson, 1999:24). Many of the harried accounts of Napoleonic soldiers describe their horror at the magnitude of death, rather than the fact that the bodies themselves were decaying (Glover, 1974; Rose, 1912). When humans are confronted with death, the rites and rituals that are normally practiced ultimately come down to the manner on which they are enforced on individuals, both those that are doing the burying, as well as the body which is being buried. This means that though the actions surrounding death are enforced by structures, human agency necessarily plays a part in how those rituals are enacted.

To understand the effect of human agency on expressions of identity and burial, the connection between agency and cultural structures must be considered. Bioarchaeology as an interdisciplinary science often incorporates concepts from social theory, such as agency theory. While the agency of the living is the predominant force related to the burial of the dead, the dead are not entirely at the mercy of the living. The corpse itself is a powerful object beyond just being the asset of the person who passed away, and the perception of a body's spirit could also be considered an actor, rather than a symbol (Crandall and Martin, 2014:431). In many cultures, including that of the local Catholic Basques, there is a firm belief that the soul or spirit which animated a body in life, continues to persist in death (Douglass, 1969). While the body's spirit can be thought of as a symbol in this context, or as something that has meaning in the world but does not necessarily act, Basque culture also has a well-established conception of the spirit existing as a revenant actor, with ghosts appearing to people who knew them, creating the need to open a window after death to ensure that the spirit can move on (Douglass, 1969:79-80).

Regardless of the existence of spirits or not, most Basque beliefs seem to indicate that the dead are dependent on the living. A lack of supplication allows for revenant spirits to appear, while proper ritual can keep them at bay (Douglass, 1969). Irrespective of the belief in the return of an unhappy spirit, the corpse itself has as much agency as is granted to it by the living. Their very presence requires that the living percieve their resting places differently, and even the thought of bodies can alter behavior (Crandall and Martin, 2014:432). Whether it be the construction of pyramids or mass graves, the unpleasantness of a body and the need for it to be addressed by the living allows the body to have some agency; in many cases enough to physically alter a landscape. While this alteration can change

depending on the identity of the body, be that person a pharaoh or a genocide victim, the existence of a body alone means that some action must be taken, regardless of who that person was in life. The body of a stranger has just as much influence as the body of someone who holds personal significance due to its tendency to decay. Consequently, the agency of the body can be understood as that of an object which requires attention, just as much as a physical representation of a person who may have had beliefs and wishes during life.

Though agency is often considered the manifestation of human action, rather than that of an object, anthropologists aligned with both conceptualizations would agree that it works alongside existing structures to further drive society. For the purposes of this thesis, the consideration of agency as a manifestation of action on behalf of anything, whether animated or inanimate, is important. While human agency is an integral part of the agency of non-human actors, and vice-versa, the prime view of agency in the scope of this work is in the ability of bodies to spur the living to act, and the consequent ability of the living to interact with bodies (Crandall and Martin, 2014).

The structuration of burial practices follows a generally recognizable pattern across Europe, but the key to understanding the greater influence of individual actions requires careful consideration of how this agency fits within the structure itself (Pearson, 1999; Joyce and Lopiparo, 2005). Social structures, generally considered as a set of traditions or institutional practices, are established by societies through purposeful replication of the same activities over time (Joyce and Lopiparo, 2005:367-368). In Europe, rituals surrounding death generally follow a similar pattern of the preparation of a body and subsequent burial (Pearson, 1999). The repetition of these practices reinforces the structure and codifies it over time, though individual agency works within the structure to either strictly adhere to changes,

or to deviate, as was the case in Murélaga, where villagers' faithful commitment to physical tradition contrasted with that of the more ideologically minded clergy (Douglass, 1969:77).

Looking at the repetition of practices, as much as a change in practices can help to account for a certain amount of agency being exercised within a site (Joyce and Lopiparo, 2005); at Roncesvalles this is expressed via various methods of burial. It is also important to view the individual situated within these structures, analyzing the small scale as well as the larger one, allowing for an understanding of how a person's life can be contextualized by social and cultural practices related to their death (Hodder, 2000). Individuals act within custom, but through their use of agency the rules can be bent, leading to the above-described breaks in tradition (Joyce and Lopiparo, 2005; Hodder, 2000; Cowgill, 2000).

Identity, like agency, ultimately boils down to a tangible manifestation of an individual's experience that is "... constructed from embodied cultural knowledge and personal experience" (George et al., 2019:4). This definition of identity is not all-inclusive, however. It is important to consider other individuals' perceptions of someone as a part of that person's identity as well; identity in the social world is as dependent on one's own cultural knowledge and personal experiences as the outsider's perception of them. This more holistic conception of identity is especially important in death, when a deceased individual's personal conception of themselves is difficult if not impossible to detect, particularly when pitted against the perception of those still living. Murélaga, epitomizes this struggle where it was left up to the villagers to determine whether a stranger could be buried in *campo santo* or not, based on what could be ascertained from his corpse regarding his Catholicism (Douglass, 1969:74).

As shown in Murélaga, bodies have importance even after death, and can still be present in the social world as-is. There is not always a clear cultural distinction between the living body and the dead body, so archaeologically a body can be understood in terms of its symbolic role, as the physical properties of materials affect how they are incorporated into the social world (Sofaer, 2006:66-67). The duality of a corpse as both a former living person and an inanimate material creates a conflict between the two though, so skeletons are often considered "biological objects" to link the two factors of their nature (Sofaer, 2006). Therefore, the body as a material can likewise be understood through its plasticity. The organic matter which makes up the human body—bones, muscles, organs, etcetera—changes over a person's life based on how they interact with the world around them. For example, if someone breaks a bone during childhood, or lives for a time with a nutrient deficiency, this will be reflected in both the body's hard and soft tissues. Bodies, therefore, are physically shaped by the culture and socioeconomic circumstances in which they exist, and so a human body is inherently contextually dependent.

While a single skeleton can be important for theorizing about the lives that an individual's contemporaries might have led, human remains are also helpful for understanding how the past can be connected to the present. Learning about individual stories is important for archaeologists and historians to help the broader public to contextualize daily life during a specific time or place. By focusing on a specific person's death, their life becomes more real.

Archaeological Context

Before the ossuary itself can be examined, it is necessary to understand how the Silo of Charlemagne fits in to a broader archaeological context. From the 1980s until the 2010s, archaeologists undertook several excavations and analyses of medieval Basque burial sites from all territories on the Spanish side, though most were done in Alava and Bizkaia, respectively (Argote et al., 2013). For the purposes of this thesis, the typology of the graves identified is of primary importance. In Alava, studies found that most recovered skeletons were buried in plain earth-cut graves, or "slab graves" created by arranging flagstones within an earth-cut grave, though many were also found which were typified as pits dug out of exposed bedrock. The majority of the graves had some kind of stone cover as well, and the subjects buried within were almost invariably buried in a supine position with the arms extended alongside the body, or with the arms on the pelvis or chest (Argote et al. 2013, 276-277).

In Bizkaia, there were nearly as many excavations as in Alava, and the burial methods were generally the same, with individuals commonly being buried in slab or earth-cut graves, though there were also some which were created by digging niches into stone. They were also positioned in the same supine positions with their hands oriented in various ways around the chest or pelvis (Argote et al., 2013: 281).

Gipuzkoa had relatively few burial site excavations, but the findings were the same as in Alava and Bizkaia, with earth-cut or slab graves, or graves cut out of stone. Most individuals were positioned in the same supine way as well, though one was notably buried with the skull resting on its left side, the trunk in a supine position and with a North/South

orientation (Zaldua Goena, 1988; Argote et al., 2013). Sites in Navarre were also similar, with earth-cut or slab burials being the most common by far, and bodies commonly positioned in a supine position with arms arranged in various poses around the body (Valle de Tarazaga and Bonthorne, 2016; Jusué Simonena et al., 2010; Castiella 1991; Nuin et al., 2011).

Various sites in Navarre can be associated with Roncesvalles through their connections to the pilgrimage to Santiago de Compostela (see Figure 3). The first of these is Santa María de Zamartze, a medieval burial site located atop a Roman *mansio* that was excavated by Aditu Arkeologia, the archaeological team responsible for excavating the Silo at Roncesvalles. The medieval cemetery, which can be dated to after the twelfth century based on the existence of a Romanesque church, was home to numerous articulated and disarticulated skeletal remains (Valle de Tarazaga and Bonthorne, 2016). Of the articulated remains, 155 individuals were found in tombs created from stone slabs or earth-cut burials (Valle de Tarazaga and Bonthorne, 2016). Among the human remains, scallop shells, which are associated with pilgrims returning from Santiago de Compostela, were also recovered, some of them perforated to be tied with string, which supports the idea that, like Roncesvalles, Zamartze acted as a pilgrim hospital. Beyond the scallop shells, grave goods were limited, and the most common associated artifacts were iron or bronze pins used to affix burial shrouds (Valle de Tarazaga and Bonthorne, 2016:237).

The city of Pamplona also had various excavations carried out relating to the Way of Saint James. In 2009, archaeologists excavating the Plaza of San José, a square adjacent to a medieval pilgrim's hospital, found a simple earth-cut burial, in which an *in situ* scallop shell accompanied the supine remains of the deceased (Jusué Simonena et al., 2010:214-215).

Other burials in the area displayed similar patterns of grave construction and body positioning, including the presence of scallop shells. In 1993, research undertaken in the Cathedral of Pamplona also uncovered a pilgrim's burial constructed out of ashlar masonry, consisting of seven individuals and a perforated scallop shell, signifying that it was an object used by a pilgrim, rather than a symbolic addition (Jusué Simonena et al., 2010:219). An excavation of a parking lot in 2002 and 2003 also found 60 remains associated with the burial ground of a convent dedicated to Saint James. The burials were constructed out of stone slabs and oriented East-West, though there were disarticulated remains piled at the edge of many of the cists to facilitate the graves' reuse; two of the burials also contained scallop shells (Jusué Simonena et al., 2010:222).

A 1941 study of a Romanesque church south of Pamplona, Santa María de Eunate, revealed a series of graves, including those containing scallop shells. Though the site was not known to be a pilgrim's hospital, the burials indicated that pilgrims passed through the area, and died in the vicinity of the church, which makes sense considering that it lay along one of the traditional pilgrimage routes (Jusué Simonena et al., 2010:230). Excavations at churches and religious complexes in Estella, Torres del Río, Peralta, and Ujué, all also displayed similar burial context, including at least some evidence of scallop shells further cementing the idea of the sites' relationships to the pilgrimage to Santiago de Compostela (Jusué Simonena et al., 2010).

However, the Church of San Saturnino in Artajona is an exception to the consistent burial practices seen in Navarre. Redevelopment work at San Saturnino in 2008 uncovered more than 100 graves. The top layers were saturated with primarily disarticulated remains, which the researchers attributed to the reuse of graves during times of illness and war. The

researchers also noted that while most of the graves were oriented in the traditional West-East manner, one group of burials was oriented Northeast-Southeast, spaced according to the belltower and its adjoining crypt. Like Roncesvalles, the site was also used from the early medieval period until modern times, which supports the evidence of a greater range of burial methods. Unsurprisingly, multiple scallop shells were found at the site (Jusué Simonena et al., 2010:237-239).

San Salvador de Ibañeta, a former pilgrim's hospital, is the most closely related site to Roncesvalles, being the original hospital in the mountain pass above the village. The site was also known to have a burial ground, which was officially excavated as part of a road construction project in 1934 (Jusué Simonena et al., 2010). The chapel at Ibañeta, which was burned and destroyed in the late 1800s, had a basement which was excavated in the search for graves. The first two skeletons found were in plain earth-cut burials, while another nine were in slab burials, which can be described as an earth-cut grave lined with stone slabs creating an improvised sarcophagus. All individuals were in a supine position with their arms crossed over their torsos (Jusué Simonena et al., 2010:207).

In 2009 the site was excavated again, and another set of burials were found next to the old chapel's location. Three partially preserved skeletons were found in graves that were oriented West-East, with the head to the west and the feet to the east, and all three were in simple earth-cut graves, though the third burial had earmuff stones around the head to prevent it from moving (Jusué Simonena et al., 2010:208, 210-211). Researchers at the site noted that the graves appeared to have been created hastily, noting that though the bodies were positioned in a 'Christian orientation' (East/West), the graves were shallow, and the individual in the second burial had the left leg bent and supported on a stone that had not

been removed when the grave was dug (Jusué Simonena et al., 2010:208, 210-211). None of the burials had a full stone tomb, but the gravedigger placed some coverings of irregular slabs of stone directly on the body of the deceased. The researchers also noted that disarticulated remains from other burials were not deposited with care at the feet of the dead as was customary for other medieval burials but were instead mixed into the fill of the graves alongside scallop shells indicating the individuals' pilgrim status (Jusué Simonena et al., 2010:208, 210-211).

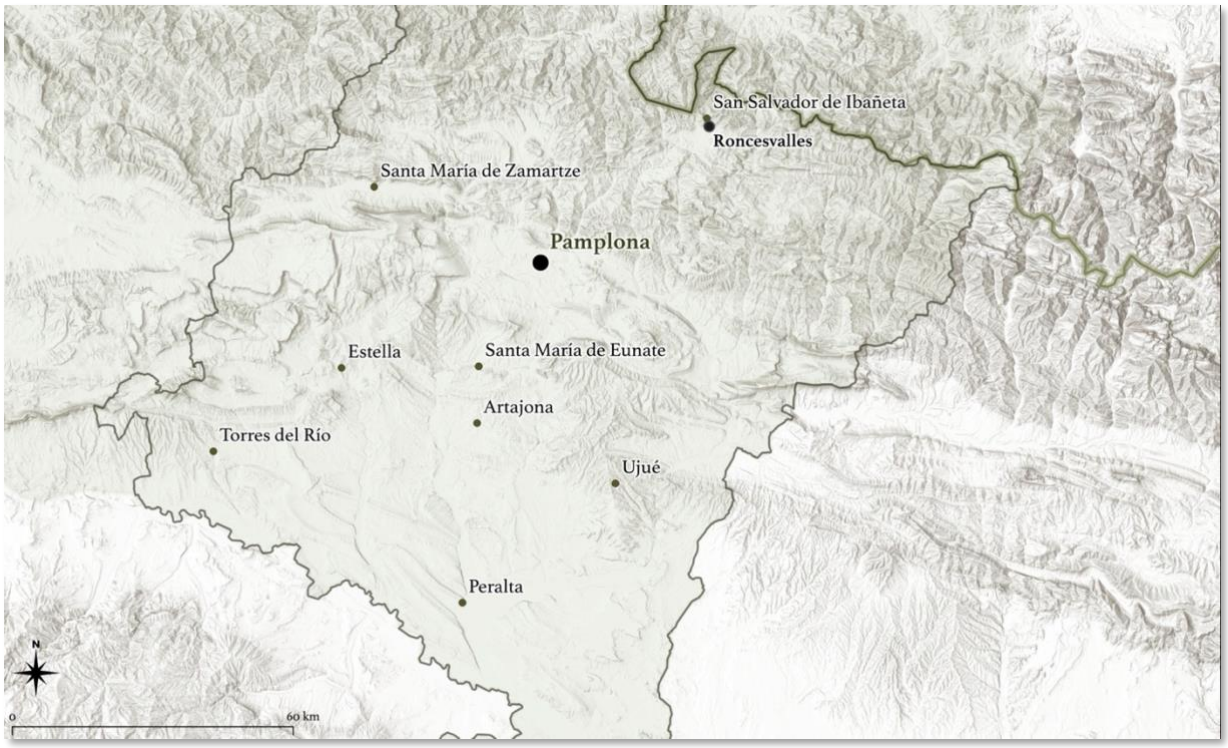

Figure 3. Map of Selected Archaeological Sites in Navarre.

Although the Basque Country is full of medieval cemeteries and burial sites, compared to previous periods, very few ossuaries and charnel houses like Roncesvalles still exist in Europe. The ossuary at Roncesvalles is even more unusual, because it is still in use (Koudounaris, 2011; Musgrave:1997). While the Parisian catacombs are a well-known

example of an ossuary, the catacombs were created in the late 18th century, much later than their medieval counterpart at Roncesvalles, and the city reused its ancient stone quarry rather than constructing the site for the express purpose of being a charnel house (Quigley, 2001:23).

One famous example that does have a similar history and purpose to Roncesvalles is the ossuary of Wamba, near Valladolid, Spain. One of the oldest surviving ossuaries in Europe, the remains are currently located in a room attached to the Church of Santa María de Wamba, a church dating to the 10th century that was later converted into a convent. Originally the bones were in "disorganized heaps," like the disarticulated remains of Roncesvalles, but in the 1950s many of the remains were removed and permanently sent to Madrid to be studied (Koudounaris, 2011:263). Afterwards, the villagers put the remaining bones in a separate area and stacked them along the walls, inspired by the Paris Catacombs (Koudounaris, 2011:263).

Most of the Western European ossuaries with a similar history and function to Roncesvalles are located in the French region of Brittany (Musgrave, 1997). Though the majority were erected between the 16th and 17th centuries, Breton ossuaries were constructed based on traditional burial practices (Musgrave, 1997:63). It was common in medieval Europe for the bones of old interments to be displaced by new inhumations, so ossuaries were a way to allow bones to be placed in a somewhat dignified manner, even after their burial location had been turned over to another individual (Musgrave, 1997:65-66). More than just storage though, iconography, inscriptions, and the remains themselves allowed for the creation of a dialogue between the living and the dead (Musgrave, 1997:67).

The concept of a dialogue between the living and the dead can also be seen in other European ossuaries. Sometimes battles were commemorated with the bones of the deceased through the construction of a chapel. One example is that of Morat, Switzerland, where a chapel was constructed displaying the bones of French forces killed by the Swiss in 1476 as a monument to Swiss valor and independence. In 1798, after the same conflict which resulted in the War of the Pyrenees, French soldiers destroyed the chapel at Morat, considering it an insult much in the same way they viewed the cross of Roland at Ibañeta (Koudounaris, 2011:219).

Ironically, the French also had a desire to memorialize their dead. In 1793, the remains of 209 Lyonese civilians who opposed France's revolutionary forces were later stored in the crypt of the chapel of Brotteaux. After 2,000 people were executed by the republican government, in 1819, nearly 20 years after the destruction of the ossuary at Morat, bones exhumed from eleven mass graves were subsequently moved into the Brotteaux chapel (Koudounaris, 2011:220).

The conflict in Lyon was not the only instance of French opposition to the revolutionary forces. Also in 1793, the Catholic and Royal Army of Vendée clashed with the Republican Army in Le Mans (Thèves et al., 2015). Unlike those who were killed in Lyon, however, there was no attempt at memorialization. Mass graves resulting from France's conflicts in the late 18th and early 19th century are fairly common archaeological finds. The vast scale of death from this period means that many bodies had to be buried, so the ossuary at Lyon is an outlier. However, a 2010 excavation of the mass grave site in Le Mans helps to contextualize the deaths in Lyon. At Le Mans, individuals were deposited head-to-foot, a method characteristic of mass graves, and evidence of sword and bullet hole wounds was

recorded on many of the skulls (Thèves et al., 2015:30). However, researchers were surprised to note the presence of female and juvenile skulls, as most sites associated with warfare have a preponderance of young adult male skeletons (Thèves et al., 2015:30; Horáčková and Benešová, 1997). Two of the graves had military objects, leading the researchers to conclude that the interred individuals were either actively or passively involved in the 1793 Battle of Le Mans (Thèves et al., 2015). A total of nine mass graves containing 154 skeletons were excavated, the majority of which were covered with some amount of lime (Thèves et al., 2015:32).

In Brno, Czech Republic, renovations to an apartment building led to the discovery of another mass grave associated with the Napoleonic Wars. Like the mass graves at Le Mans, the dead were placed in an antipodal position, which is common in other mass grave contexts. The graves contained only young men between the ages of 20 and 30, whose statures fit the minimum height requirements during the Napoleonic wars (157 cm, or 5 ft 2 in) (Vymazalová et al., 2020:148). The researchers also noted that no objects were found in association with the skeletons or in the backfill, suggesting that they were buried either without clothing or in plain linen, which likewise corresponds to the burial of soldiers killed due to injury or disease (Vymazalová et al., 2020:146). Based on this evidence, researchers determined that they likely died in a temporary military hospital, noting that normal burial rites could not be followed, due to the fact that accumulation of remains presented a risk of spreading diseases (Vymazalová et al., 2020:144). Based on contextual evidence, and with the help of radiocarbon dating, the researchers concluded that the individuals were likely killed by injury or disease after the Battle of Austerlitz in 1805 (Vymazalová et al., 2020).

In Kaliningrad, the former capital of East Prussia, twelve mass graves containing the remains of at least 600 individuals were discovered by archaeologists, alongside military buttons, pieces of textile, military hats called shakos, boots, and coins, all of which suggest these were soldiers who died during Napoleon's Russian Campaign in 1812 (Countinho Nogueira et al., 2019:192). In one grave, researchers identified 26 skeletons belonging almost exclusively to young adult males, who were all placed in earth-cut burials with the exception of one individual who was buried in a wooden coffin. Some of the skeletons in a lower layer, including the one in the coffin, were placed along a North-South axis with the head towards the North, while the layer above had skeletons positioned perpendicular to the coffin, oriented foot-to-foot. There was no preferential burial position, though, and many individuals appeared to have been placed in their graves haphazardly (Countinho Nogueira et al., 2019:192-193). One particularly notable individual had a severe facial wound, resulting in the loss of most of the right maxilla and mandible, as well as massive damage to the entirety of the lower cranium (Countinho Nogueira et al., 2019:194). Evidence of healing, however, suggested that the individual was treated after being wounded, suggesting that he did not die on the battlefield (Countinho Nogueira et al., 2019).

In Brno and Kaliningrad, it appears that many of the mass graves were created for deaths which unrelated to combat. This theme is also seen in a mass grave located in Kassel, Germany, which also contained soldiers from this period. Researchers found that most of the individuals had been a mix of young adults and adult males, though the skeletal remains showed no evidence of death due to injury or violence (v. Grumbkow et al., 2012:2). Like the researchers in Brno, archaeologists noted that a lack of artifacts associated with the burials meant that they were likely attributed to people who died at a field hospital rather than

directly on the battlefield (v. Grumbkow et al., 2012:2-3). Through contextual and DNA analysis, the researchers determined that the individuals were most likely members of the French army, who survived the Battle of Leipzig in 1813 only to succumb to typhoid fever (v. Grumbkow et al., 2012:2).

Another mass grave corresponding to the 1805 Battle of Austerlitz was discovered during a rescue excavation in 1994. In a Czech village near the site of the battle, researchers found a mass grave containing 22 individuals, alongside military objects such as buckles and military buttons, which allowed the archaeological team to determine the date of the battle and the identities of the dead (Horáčková and Benešová, 1997:283). While 18 of the individuals were male, two were female and two were subadults, suggesting that the graveyard was used for everyone associated with the army, not just the soldiers themselves. Most notable, however, were the number of injuries seen on the skeletons, which led researchers to suggest that the individuals were patients of Napoleon's chief surgeon, Dominique Larrey (Horáčková and Benešová, 1997). A musket ball wedged in a spinal canal, a splintered right femur and an amputated right femur, both of which displayed no signs of healing, as well as two amputated tibiae, all helped to support the researchers' assertions. Based on the military artifacts and presence of severe and unhealed injuries, the researchers concluded that the soldiers buried in the mass grave were killed in the battle or immediately afterward (Horáčková and Benešová, 1997).

With the exception of the Silo itself, no Napoleonic-era mass graves have ever been discovered in the area around Roncesvalles. In fact, given the historical significance of Roncesvalles and its surroundings, the lack of previous archaeological work in the area is surprising. The aforementioned chapel at Ibañeta is the only other site near Roncesvalles

significant to this period, though most of the archaeological work related to it has been dedicated to research of much earlier eras. Before the official excavation in 2009, three archaeological studies took place in the vicinity of the chapel. The first occurred in 1882, right before the chapel burned down; it unearthed Roman coins, a ring, a cabochon, and various other metal objects (Jusué Simonena et al., 2010:202).

A second, previously mentioned excavation took place in 1934. The first two skeletons found were initially believed to be the bodies of the mythical Roland and the paladin Oliver, and of the nine further skeletons, all were believed to have belonged to men "of great corpulence and robustness" between the ages of 30 to 50, with the exception of one older individual (Jusué Simonena et al., 2010:206). These individuals were reinterred in the Silo of Charlemagne in the 1960s (Iriarte and Igartua, 1981). A set of six silver coins depicting Aethelred II (978-1013) and a copper *styca* from the 9th century—all of which were later determined to be English—were also discovered during this excavation (Jusué Simonena et al., 2010:206).

A third excavation in the vicinity of the Chapel of San Salvador occurred in 1951 in advance of road construction. This excavation unearthed objects of varying age and significance, such as fragments of a Spanish *sigillata* from the 1st century, a Roman altar, and a coin of Charles III of Francia (898-929) (Jusué Simonena et al., 2010:206). Most of the human remains removed during these three archaeological excavations were said to have been reinterred in the Silo, and likely make up a plurality of the remains from different periods found at the top layers of the ossuary (F. Valle de Tarazaga, personal communication, June 9, 2021). Recently, more attention has been given to the Ibañeta structures, and some studies are still ongoing.

Aside from *Chanson de Roland*-related investigations in the vicinity of the area, archaeologists have also undertaken studies of local prehistoric sites. The nearby Jatsagune Stone Circle, dating to approximately 100 B.C.E, has been archaeologically investigated and, though similar in morphology to a cromlech, has no indications of burial activity, with the only artifact recovered being a cobalt blue glass bead thought to be of Celtic cultural origin (Blot, 1979:226). Though this is one of the only prehistoric structures to have been examined in detail, the Basque Country is known for prehistoric activity, and Roncesvalles is no exception with many stone structures littered throughout the surrounding mountains.

This region was also thoroughly populated in ancient times. Roncesvalles and its surroundings lie directly on a Roman road, which led to the deposition of artifacts such as those at Ibañeta. The nearby Tower of Urkulu was built by the Romans, supposedly to commemorate the end of the wars of Augustus against the *Aquitani* tribe (Tobie, 1997:136). Currently, excavations on the outskirts of Burguete are being undertaken by Aranzadi, another Basque archaeological team, who have so far discovered structures attributable a Roman high-imperial incineration necropolis, which was first excavated between 1989 and 1994 in the nearby town of Espinal (Pérex Agorreta and Unzu Urmeneta, 2013:258). Excavations there are now in their tenth season, and over the summer of 2021, archaeologists found a large Roman bath complex, complete with *caldaria* equipped with hypocausts, which function as underfloor heating systems (Carballo, 2021).

Closer to the Silo of Charlemagne itself, various parts of Roncesvalles have been examined from a historical perspective. The town is made up of the *Colegiata,* and various other religious and pilgrimage-based buildings. As with many sites in Europe, the religious structures and iconography are interesting from an artistic and historical perspective, as well

as an archaeological one. In fact, after skeletons were discovered beneath Our Lady of Roncesvalles during the church's reconstruction, those that could not fit within the church nave were likewise placed in the Silo of Charlemagne (Iriarte and Igartua, 1981). That said, although various renovations have uncovered interesting snippets of information about the village's past, Roncesvalles itself has had little archaeological examination.

Excepting a single excavation undertaken by two students from the University of the Basque Country in 1981, the Silo has been likewise untouched by archaeologists. Per their brief site report, they appear to have limited their exploration to about three-square meters of each of the two southern corners of the ossuary. In "Corner A," they managed to dig down approximately 2.10 meters before hitting water while attempting to reach the bottom of the Silo—though they noted that it appeared remains were still found below the water line (Iriarte and Igartua, 1981). The students kept track of recognizable skeletal elements, such as long bones and crania, but did not note most elements or fragments and mixed them in with the spoil heap. They also mentioned finding a "partially complete" skeleton, which they excavated for further study, along with the recognizable elements described above (Iriarte and Igartua, 1981).

Because of the difficulty of the excavation due to water, they moved on to "Corner B." On this side of the ossuary, they found three intact skeletons, one at a depth of 40 centimeters, and the others at 40-50 centimeters in the same grave; all three were "practically wrapped with lime" (Iriarte and Igartua, 1981). The students also noted that the feet of two other skeletons seemed to be visible, though they did not excavate them. From this corner, they also removed the recognizable elements as they had in Corner A, but concluded their

excavation at a depth of one meter. The students did not note the discovery of any artifacts during their investigation.

In 2019, Aditu Arkeologia was granted permission by the Navarrese government to begin investigating the Silo. The goal of their ongoing study is to understand the origins of the Silo itself and its use through time. Although there are various theories as to the age and initial purpose of the structure, the aim of Aditu Arkeologia is to gain an understanding of the history of the ossuary, one layer at a time. Of course, the potential historical significance of the site plays a part as well, as the oldest structure in Roncesvalles. By being able to understand the origins of the Silo, it may be possible to likewise gain insight into the history of the village itself. While the Napoleonic-era discoveries within the Silo are of interest, of course, the scope of the excavation is much larger, and extends into the early medieval period. The archaeological team's ultimate goal is to reach the earliest layer of the ossuary and discover if it predates the 11th century structure that surrounds it (Bonthorne, 2021). Alongside Aditu Arkeologia and me, another researcher is currently performing an isotopic analysis of the ossuary and its surroundings for her doctoral thesis, while a Lieutenant Colonel of Infantry Regiment "Inmemorial del Rey" No 1., is attempting to identify SK7, a man who is thought to have belonged to the same regiment, for the completion of his master's degree in military history.

Although my own thesis research is narrow in comparison to the overarching goals of study at the site, an examination of the Silo's activity in the late 18th and early 19th century allows for a better understanding of historical perceptions of the structure, as well as how its mythos fits into the greater political context of the European nations which arose from Charlemagne's empire. Furthermore, the large number of remains deposited during this era is

indicative of potential patterns of use during other times (or lack thereof). If, over 1,000 years, such a large portion of the depth of the structure was made up of articulated remains deposited during a 25-year period, it is likely that the other remains deposited within the ossuary were done using a different method. Through the comparison of burial methods shown in the Silo during this period, it may be possible to understand the relationships which led to changes in these burial methods, and how they connect to the identities of the gravediggers, and those who were buried.

Chapter 4: Methodology

This chapter will discuss the Silo of Charlemagne itself, providing a description of the ossuary as well as the difficulties associated with excavating it. Because of the unique history of the Silo, it is important to describe the structure in full. This chapter will also discuss the methodologies used in the excavation of the burials and the analysis of the remains.

To understand the work of Iriarte and Igartua in the 1980s, as well as the current excavations of the site, the Silo itself must be described in more detail. From the outside, the Silo of Charlemagne is surrounded by the chapel of Sancti Spiritus, which looks like a square building with a two-tiered roof, and walls made of short arcades, open at the northern, western, and southern sides, but barred to prevent trespassers. Upon entering the large metal gate on the western (street) side of the structure, one notes that the interior has a large platform at the center, a little less than two meters in height, which is accessible by stone stairs as one enters the building. At the top of the platform is a centered altar, and a basin intended for holy water is carved into the stone of a large column in the back corner of the platform. Each of the large columns at the platform's corners support a high ribbed vault, and at the center is a chandelier of multi-colored stones. Around the outside of the platform, on the northern, eastern, and southern sides of the structure, tombs are set into the floor, and headstones with metal plaques show that most of the individuals buried died in the 20th century. Speaking to the locals, the individuals now interred there are either members of the *Colegiata* or other local villagers, though Javier Ibarra seemed to indicate that during his tenure (the early 20th century), the individuals in the chapel's tombs were solely members of the *Colegiata* (Ibarra, 1934:852). During the 2019 excavation season, a new individual was entombed in the chapel and the bones which had previously taken up the same space were

scattered in the Silo—archaeologists later removed and inventoried these remains alongside other disarticulated bony elements. It is also worth noting that in 2019 other remains were found during landscape excavations in a grassy area several meters away from the Silo, indicating that the Silo itself may not have been the only place where remains were buried. Figures 4 and 5, the latter of which depict a three-dimensional representation of the Silo, show the chapel of Sancti Spiritus and the small entrance to the Silo on the building's north side.

***Figure 4. The entrance to the Silo from the chapel of Sancti Spiritus*, 2021. Photograph by Author.**

As the chapel of Sancti Spiritus encloses the Silo of Charlemagne, the small square opening into the center structure reveals the ossuary as it lies beneath, colloquially known as "the pit."

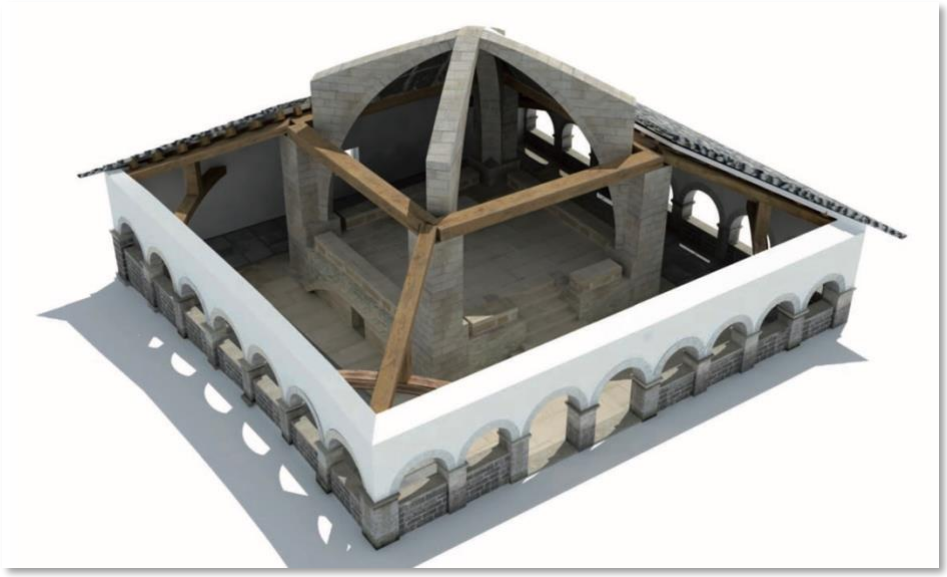

***Figure 5. A three-dimensional illustration of the chapel of Sancti Spiritus* (Martinez de Aguirre et al., 2011:79).**

This primarily subterranean structure is a cavern measuring approximately 9 meters by 9 meters. The small square opening at the base of the chapel's central platform is the only entrance to the ossuary, and is located several meters above the Silo's floor, requiring the construction of a scaffold to facilitate archaeologists' movement in and out. The walls of the ossuary are stone, while the floor is made up of a mix of soil and commingled human remains. The arched ceiling of the pit, located beneath the floor of the central platform, has a square depression that looks to have been a second opening into the ossuary at one time, corresponding to a space near the current location of the altar up above. Although in previous eras the ossuary was usually dark, a light was added to illuminate part of the cavern for tourist visits. By 2022, the site had been excavated down approximately one meter, however it is estimated that there are still at least five meters of the structure left to excavate (Iriarte

and Igartua, 1981). The Silo in its entirety can be seen in Figures 6 and 7, which is another three-dimensional representation of the Silo from Martinez de Aguirre et al. (2011).

***Figure 6. The interior of the Silo of Charlemagne*, 2021. Image Courtesy of Aditu Arkeologia.**

So, how does one go about excavating and researching burials within an ancient subterranean structure? Each skeletal excavation was completed using a specific methodology, based on the British Archaeological Jobs Resource (BAJR) "Field Guide to the Excavation of Inhumated Human Remains." As a skeleton was discovered, the earth around it was carefully removed, to reveal the grave. This method takes advantage of stratigraphic excavation, rather than the arbitrary level excavation sometimes referred to as "pedestaling,"

which generally excavates the area around a burial before excavating the burial itself (Evis et al., 2016).

***Figure 7. Three-dimensional illustration of the chapel of Sancti Spiritus and the Silo of Charlemagne* (Martinez de Aguirre et al., 2011:81).**

Excess soil is removed from the ossuary in buckets by hand, and directly deposited without screening in a spoil heap outside the Silo, a method which, though streamlined, highlights the difficulties of working within the ossuary. Once the remains and any artifacts have been uncovered, the burial is photographed and sketched *in situ*. The remains and artifacts are then removed and stored in labeled bags. While the artifacts are generally put aside to be more closely examined later, the remains are brought to a washing station and carefully cleaned. Once the remains have been cleaned and dried, they are arranged in

anatomical position on a table where analyses, such as the estimation of sex, age, stature, and an evaluation of pathologies and trauma, can be completed. Remains are then stored away, while the excavation continues.

Regarding pathologies and trauma, this thesis only focuses on information that directly relates to the conclusions made by contextual data. Though paleopathologies and trauma are important for understanding one's life, much of that information is beyond the purview of this thesis. Biological sex, on the other hand, is a significant factor for understanding the relationship between the skeletons and the predominantly wartime context. Using Aditu Arkeologia's standard methodologies, sex was estimated based on examinations of the os coxae (Klales et al., 2012, Phenice, 1969; Buikstra and Ubelaker, 1994), the cranium (Walker, 2008), the femur (Albanese 2003; Albanese et al., 2008), and the humerus (Rogers, 1999).

Stature is another important aspect of the biological profiles that Aditu Arkeologia analyzed for these skeletons. However, due to the missing long bones of some individuals, which precluded stature analysis, and plans others to conduct further studies into the skeletons' pathologies and trauma, I will not be referring to those estimations.

Conversely, age is something that should be mentioned in terms of the wartime context in which these skeletons were likely deposited. By looking at the pubic symphysis (Brooks and Suchey, 1990) and auricular surface of the innominate, as well as dental attrition (Lovejoy et al., 1985), sternal rib ends (Işcan and Loth, 1986) and general epiphyseal closure in tandem with evidence of osteoarthritis, individuals were classified into four broad age categories: subadult (~0-14), young adult (~15-25), adult (~26-50), and older adult (50+).

Because of the limited number of burials and size of the site, the method of study was primarily observational. By being present for the excavation of most of the skeletons, as well as during the creation of a biological profile for many of them, I was able to connect contextual information, such as location and position of burial in the Silo, with what was known about each individual, as well as collect data through on-site empirical study of the ossuary. These observations were supplemented by qualitative analyses of the site provided by Aditu Arkeologia.

This data was always intended to be applied to a comparative analysis of other similar European burial sites and excavations. Based on Goldstein et al. (2012) who highlighted the importance of noting various aspects of a burial to gain a better understanding of cultural affinity, I created a data collection form for each individual, which I completed through a combination of first-hand knowledge and use of previous Skeleton Recording Forms filled out by Aditu Arkeologia (see Appendix). A similar form to organizing the potential significance of each piece of recorded data was used post-excavation. I also took unofficial photographs to aid in the contextualization of the site and the inhumations, while official photos were provided by Aditu Arkeologia.

As described in Chapters II and III, historical research was also undertaken to better understand the historical, cultural, and political context surrounding the lives of the individuals who were buried or deposited within the Silo. This included information on the resources available nearby, as well as the demographics of the area, to gain a better understanding of what was possible or likely at the site. I also aimed to understand the historical context surrounding causes of death in more detail, such as illness or warfare.

Utilizing primary and secondary sources, my goal is to apply context to the data collected in the Silo.

Chapter 5: Data and Analysis

This chapter will discuss the data collected from the Silo. It should be noted that although my thesis focuses solely on the excavated articulated burials, these are not by any means the only remains which have been observed and/or collected from the site. Disarticulated human remains vastly outnumber those in articulation; the current minimum number of individuals (MNI) from commingled remains stands at more than 1,000 individuals, based on an inventory of 351,000+ bone fragments (Bonthorne, 2021). Commingled bones collected from the surface of the excavation date from modern times (as recently as 2019) through to the medieval period, as remains disinterred from Ibañeta and the cloister of the collegiate church in Roncesvalles were reinterred in the ossuary. The researchers in 1981 also redeposited the remains taken during their excavation into the Silo; the two pits related to their excavation, in the southeast and southwest corners, were only haphazardly refilled with soil afterwards. These pits truncate the remains of several of the articulated skeletons described below.

The entrance to the ossuary is on the north side of the underground structure, and to date, the northern half of the ossuary remains unexcavated. The southern (excavated) half displays two different types of articulated remains (see Fig. 8). The first, which is the focus of the research described here, are those which were purposefully buried within the ossuary. The second belong to a pile of intermixed articulated and disarticulated remains which sits in the center of the ossuary, almost directly beneath the open niche in the ceiling, which is believed to be the original point of access to the Silo. Based on artifacts found in association with the pile of remains, such as musket balls, coins, and hobnails specific to the boots of French soldiers during this era, it is hypothesized that these individuals were members of the

French army during the War of the Pyrenees or the Peninsular War. As this context remains largely unexcavated, a more definitive date cannot be applied to them yet, nor more in-depth analyses of the individuals themselves. These remains do however appear to be from a more recent layer than most of the articulated skeletons described in this thesis, possibly indicating that they came from the later conflict in 1813, which may also explain the change in deposition method. Rather than being buried, like others in the Silo from a wartime context, these individuals appear to have been thrown from the roof of the structure.

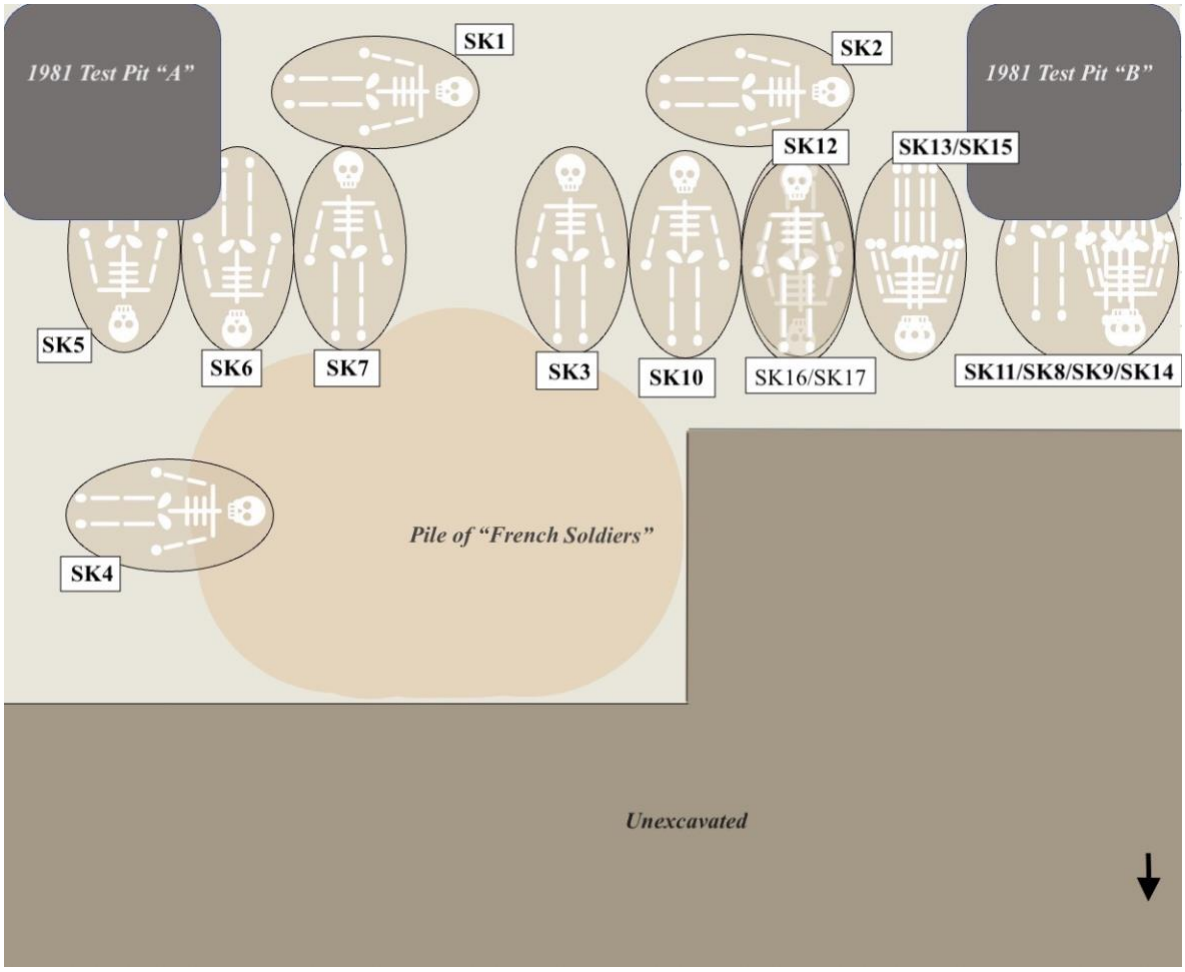

Figure 8. Diagram of articulated skeletons in context. Note the placement of the pile of remains in relation to the articulated skeletons, as well as the two test pits dug by archaeologists in the 1980s.

Of the articulated burials, 17 have been excavated and analyzed, though it appears that there are more in the layers which have yet to be excavated (see Table 1). SK1, SK2, and SK4 form the highest and most recent level of articulated burials. All three appear to have been buried more recently than the center pile of "French soldiers," suggesting that they are from a later context, though artifacts found in the fill and surrounding areas of these graves, like musket balls and gun flints, which can be tacitly associated with different countries' militaries based on the stone's color, suggest that they were likely not interred much later than those individuals. SK1 is a young adult, and SK2 is an adult male, both in a supine extended position and oriented West-East (head to foot) along the southern wall of the ossuary. Both were also buried with lime or quicklime in the upper part of the body, and SK2 was covered in a thick layer which was able to be removed as a large clump.

SK1 had its arms resting alongside the body, while the right arm of SK2 was resting on the pelvis, and the left on top of a layer of lime at the level of the lower lumbar vertebrae. It is worth noting that SK2 displayed evidence of healed trepanation, which may suggest that the individual was treated at the hospital. It is also notable that SK1 and SK2 did not have a discernible grave cut or fill area, which may point to the Silo being used as a *carnarium*, or an area to allow a body to decompose naturally on the surface, rather than through burial. This is further supported by the use of lime for both bodies, which was applied during this period because it was thought to aid the decomposition process. Though the orientation and stratigraphy at the site seem to point to SK1 and SK2 being more recent than some of the other burials, the only one that is definitively more recent is SK4. SK4 belongs to a subadult of approximately five years of age. Age estimated is based on a lack of epiphyseal fusion and rates of dental eruption. The body was in a supine extended position, oriented West-East,

closer to the center of the ossuary than the other two. Though the body did not have lime covering it, a religious medallion in the shape of a cross was found placed on top of the hands of the individual.

Figure 9. The body of a subadult recovered from the Silo of Charlemagne at Roncesvalles. **Image courtesy of Aditu Arkeologia.**

SK3, and SK5 through SK17 are buried in layers beneath the pile of "French soldiers".[2] All of these individuals are male, and the graves were dug separately, either

[2] SK8, SK9, and SK11-SK17 are all grouped at the western corner of the excavated area, and it is impossible to definitively place their burials contemporaneously with those to their east.

oriented North-South or South-North, and not overlapping one another except in the case of purposeful multiple burials. SK3 is an adult, buried South-North in a supine extended position, with a layer of lime over the thoracic region of the body and his right arm resting on the right pelvis, while the left rested along the side of the body. The grave appears to have been hastily dug, as the head and feet were resting on the edges, leaving the center of the body to slope into the most depressed part of the grave.

SK5 is another adult, oriented North-South and also supine extended, but buried without lime. The remains were disturbed from the pelvis on down, presumably by the 1981 test pit in the southeast corner. The right arm was flexed over the chest, and the left was doubled up with the hand resting beneath the mandible. Notably, a scallop shell was found in the center of this individual's pelvis, and while it is possible that it was originally within the fill of the grave, it appears to have purposefully been placed there (E. Bonthorne, personal communication, January 18, 2022).

SK6 was also in a North-South orientation and supine extended position. The remains pertained to those of a young adult, with a thick layer of lime covering the entire upper body, from the mandible to the individual's pelvis. The right arm was crossed over the upper lumbar vertebrae, while the left was found on the pelvis, with both also covered by the layer of lime. Like SK3, the feet rested higher than the rest of the body at the very edge of the grave cut, suggesting a hasty burial.

SK7 is by far the most diagnostic of all the individuals in this area. An adult, this person was oriented South-North, in a supine extended position, but with the head and feet also at the upper margins of the grave cut. What is remarkable, however, was the discovery of 28 bronze buttons, proving the individual's membership in the Infantry Regiment

"Inmemorial del Rey" No 1 (see Figures 10 & 11). Though this regiment participated in both the War of the Pyrenees and the Peninsular War, the likelihood of this individual being involved in the former is more likely, as the regiment was involved in the attack of nearby Valcarlos, and spent time in Roncesvalles (Calleja Leal, 2012:24). This individual was buried without lime, and the hands were placed on the abdomen and pelvis. The buttons found near the skull of the individual are different from those found around the rest of the body, suggesting that he may have been buried with a coat or waistcoat over his face, that was different from the one which remained around his body.

Figure 10. Individuals excavated at the Silo of Charlemagne, Roncesvalles. Burial SK6 is on the right and SK7 is on the left. Also note a corner of the pile of "French soldiers" to the upper left. **Image courtesy of Aditu Arkeologia.**

Because of the placement of this individual's grave directly next to those on either side, it seems likely that all of those who were buried adjacent to him also date to approximately the same period.

Figure 11. A close-up image of SK7. Note the bronze buttons visible near the rib cage, and the bronze staining on the cranium and mandible. **Image courtesy of Aditu Arkeologia.**

The grave of SK8, SK9, and SK11 was located against the western wall of the Silo (see Figure 12). All three skeletons were buried without lime, with SK8 oriented South-North against the wall, SK9 oriented in the opposite direction, North-South beneath SK8, and SK11

also oriented South-North directly next to SK8 and SK9. All three skeletons appear to be in a supine extended position. SK8 is a young adult male, based on epiphyseal fusion, though the majority of the skeleton (above the femora) is absent and appears to have been truncated by the 1981 southwest test pit. Bones from SK9 are missing below the pelvis, also due to the test pit, though severe osteoarthritis and dental attrition indicate that this individual is an older adult. The hands and arms of SK9 were also interestingly both bunched up at the level of the clavicles, beneath the feet of SK8. SK11, like SK8, is also missing bones above the level of the pelvis, though this individual seems to be an adult as all epiphyses of the lower limbs are fully fused.

Figure 12. Burial of SK8 atop SK9 and SK11 (right). **Image courtesy of Aditu Arkeologia.**

No artifacts were found with any of the three skeletons. The adult remains labeled SK14 were found directly beneath SK9, though not within the same grave cut. SK14's lower legs were truncated by the same 1981 test pit as those of the individuals above it. This person was buried in a supine extended position, with the hands over the pelvis.

SK10 is just east of these three individuals, though within its own grave. SK10 is an adult individual oriented South-North and buried with a thick layer of lime covering the abdomen. The body was positioned supine extended, like many of the other burials, though the skull was turned away to face west, meaning either a deliberate positioning or a lack of a burial shroud, allowing the skull to fall to the left.

SK12 was next to SK10. SK12 is an adult who, unlike the others in this line of graves, was buried South-North in a flexed position, with the legs bent to allow the lower half of the body to rest on its left side. This person was buried without lime.

SK13 was found on the other side of SK10. This very young adult was buried in a prone position, with the head at the north side of the grave facing east, and the legs towards the south, making it unique among the inhumations, most of which were buried in supine extended positions. The arms and thoracic region of the body appeared to be compressed, and the elbows jut from the sides of the body, suggesting that the hands were very close together when the person was buried. The legs of the burial appear to have been disturbed by the southwest 1981 test pit (see Figure 13).

SK15, another prone individual, was directly beneath SK13 within the same grave. This adult also had his arms placed beneath the body, with the head again to the north and the legs to the south (see Figure 14). The lower legs were missing due to being truncated by the 1981 test pit. SK13 and SK15 were not buried with lime.

***Figure 13. The remains of SK13*. Image courtesy of Aditu Arkeologia.**

Finally, SK16 and SK17 were found beneath SK10, within the same grave. Located slightly above SK17, SK16 is an adult oriented North-South, in a supine extended position with arms crossed against the upper chest and shoulders. SK17, is an adult facing in the opposite direction, South-North, in a supine extended position with his arms resting over the pelvis. Neither of these people were buried with lime, nor did they have any artifacts directly associated with them.

***Figure 14. The remains of SK15*. Image courtesy of Aditu Arkeologia.**

To summarize, as of 2022, the articulated remains excavated within the Silo indicated that the bottom excavated layer dated to the War of the Pyrenees. These individuals were buried in a line of North-South single graves from the east side of the ossuary to the center, which was then met by a series of multiple burials from approximately the center to the west side of the ossuary. After these people were buried, a pile of soldiers' remains was created after their bodies were presumably thrown into the ossuary from the ceiling. Finally, at what

appears to be the most recent stratigraphic level, there were three East-West oriented graves, with one at the eastern side of the ossuary, and two against the southern wall.

Table 1. Articulated Burials Excavated from the Silo of Charlemagne

Layer	Individual	Orientation (Head to Feet)	Position	Single/Multiple Burial	Age	Associated Artifacts	Lime (Y/N)
Above (After) "French Soldiers"	SK4	W/E	Supine, Extended	Single	Subadult	Religious medal	N
Possibly Above "French Soldiers"	SK1	W/E	Supine, Extended	Single	Young Adult	n/a	Y
	SK2	W/E	Supine, Extended	Single	Adult	n/a	Y
Below (Before) "French Soldiers"	SK3	S/N	Supine, Extended	Single	Adult	n/a	Y
	SK5	N/S	Supine, Extended	Single	Adult	Scallop shell	N
	SK6	N/S	Supine, Extended	Single	Young Adult	n/a	Y
	SK7	S/N	Supine, Extended	Single	Adult	Military buttons	N
	SK8	S/N	Supine, Extended	Multiple	Young Adult	n/a	N
	SK9	N/S	Supine, Extended	Multiple	Older Adult	n/a	N
	SK10	S/N	Supine, Extended	Single	Adult	n/a	Y
	SK11	S/N	Supine, Extended	Multiple	Adult	n/a	N
	SK12	S/N	Supine, Flexed	Single	Adult	n/a	N
	SK13	N/S	Prone, Flexed	Multiple	Young Adult	n/a	N
	SK14	N/S	Supine, Extended	Multiple	Adult	n/a	N
	SK15	N/S	Prone, Extended	Multiple	Adult	n/a	N
	SK16	N/S	Supine, Extended	Multiple	Adult	n/a	N
	SK17	S/N	Supine, Extended	Multiple	Adult	n/a	N

Chapter 6: Discussion

Based on the contextual information and data collected at the site, it is possible to draw some conclusions about the individuals buried in Roncesvalles, both in terms of the circumstances prior to their burial, as well as the potential reasons for why they were interred in a particular way. In this chapter, I will attempt to explain the changes in systems of burial in the Silo of Charlemagne during the late 18th and early 19th century. Furthermore, I will use this analysis to speak to individual and collective identity during this period, and how this sense of social affinity can affect death and burial.

Understanding the Ossuary

Starting in chronological order, based on the spacing of the coordinated North-South burials, it appears at first that the first few burials began in a row on the eastern side of the ossuary, and individuals were consolidated into the same graves as space became limited across the width of the structure. This supposition is supported by the fact that the single graves included lime, while those with multiple individuals did not, suggesting that the gravediggers may not have been eager to further inter individuals within graves with bodies that were already decomposing, and/or that the available lime had begun to run out. The fact that the graves were consistently spaced and did not intersect one another further suggests that the gravediggers were aware of what existed on either side.

Alternatively, one phase of burials could have begun East to West, beginning with SK5 and ending with SK10. This phase was followed by a burial phase at the southern side of the ossuary involving SK1 and SK2, and then a third phase of more East-West burials that

were disturbed by the presence of French soldiers. This confirmation of either of these theories depends on more evidence than is currently available, however both are important to keep in mind when considering the Silo's function over time.

SK5, the individual at the furthest end of the Silo to the east, had a scallop shell directly on the center of his pelvis. While this could theoretically be indicative of pilgrim status, the idea of a pilgrim being buried in the Silo at the same time as known soldiers seems unlikely, as records from both war periods indicate that Roncesvalles had no pilgrims in those years (Andrés-Gallego, 2012). Despite its deliberate-appearing placement, it is likely that the shell was in the surrounding matrix or fill of the grave and ended up there by accident, since the area below the pelvis of this individual was disturbed by the southeastern 1981 test pit. It is worth noting that the 1981 researchers found "a whole skeleton... surrounded by lime" at 30 cm deep, and a "partially complete skeleton" in their test pit, though they did not provide any information beyond from the idea that the two seemed to be from the same stratigraphic layer (Iriarte and Igartua, 1981).

In the second test pit, Iriarte and Igartua (1981) found three full skeletons at a greater depth: one alone and two others sharing the same grave. All three skeletons were in the supine position, "practically wrapped with lime," along with the "feet" of two other skeletons, which the researchers left in place (Iriarte and Igartua, 1981).

The Summer 2021 field season also unearthed a very old individual (SK9) and a very young individual (SK13). Both were found within graves containing multiple burials: SK9 with SK8 and SK11, and SK13 with SK15 respectively. SK13 was in a prone position, and both SK9 and SK13 were found without lime in the same general area of the ossuary. These people—whose ages were least consistent with the 20 to 30 years of age typical of militarily-

involved males—were the among the most haphazardly buried in the ossuary. The method and location of the burials may be evidence that they were buried near the end of the conflict. In war, it is not uncommon, as time goes on and the need for troops becomes more desperate, to conscript people who do not fit a typical soldier profile, particularly the very young (Crawford, 2017). During the War of the Pyrenees, France enacted a *levée en masse*, or conscription of the civilian population, to help bolster its number of troops (Crawford, 2017). Though the concept of militias and mass conscription was not necessarily new, this conflict was the first time that conscription was done in this manner. Now, while there is not nearly enough evidence to conclude that the age variation of these individuals is due to mass civilian conscription, it nevertheless raises questions as whether they shared commonalities which led to their similar style of burial.

Those who were buried haphazardly can be compared to the individual burials alongside them. While these individuals did seem to have been interred in a hurry based on how their heads and feet were raised at the margins of the grave cut, the fact that all of them were buried in single burials in the traditional extended supine position suggests that there was more care put into their inhumation. This is particularly evident with SK7, who appears to have been buried in uniform, with a jacket around his head. The burial position and method are reminiscent of that of British Lieutenant General John Moore. Remaining lucid for several hours after his fatal wounding during the Peninsular War, Moore was wrapped in his military cloak during his burial (Glover, 1974:86).

Being buried while wrapped in one's uniform was likely a sign of respect. Based on the lack of other artifacts associated with any of the burials from this period, it would be fair to assume that those buried here were treated at the hospital, rather than having been killed

during the heat of battle (Signoli, 2012:221). While being buried in uniform with other artifacts could indicate a body was pulled directly off the battlefield, soldiers were often put into simpler clothing when being medically treated (Signoli, 2012:221). John Moore was also treated for his injuries prior to his death, showing that his burial in his military garb was symbolic rather than convenient, and a probable sign of respect (Glover, 1974). This may have been the case for SK7 as well, meaning that the individual could have had some kind of significance of rank in the eyes of those who buried him. Of course, it is entirely possible that this person did in fact fall in battle and was buried in his coat simply because he was wearing it, and that perhaps a jacket or waistcoat rode up over his face while he was being buried, though this seems unlikely based on the profile of the other individuals who were buried alongside him. The fact that this individual was the only one out of seventeen people who appears to have been buried in his military uniform is most likely not coincidental.

The burial of SK7 contrasts dramatically with the so-called "French soldiers," who were not buried at all. To reiterate, none of these individuals has been excavated yet, and so analyses have not been completed. That said, artifacts suggesting that at least some of them were French soldiers can lend some clues as to how they fit into the Silo's context. At least one of the East-West burials (SK4) conclusively dates from a time after this context based on stratigraphy, and it is quite likely that the other two do as well. Likewise, the North-South oriented burials definitively date to a time prior to this deposition. Based on the variation in the method of internment, this pile of individuals most likely dates to the Peninsular War, though they could theoretically have also been participants in the War of the Pyrenees. Because it appears the bodies were thrown from the roof, rather than buried in the Silo, it suggests that the individuals involved in their deposition did not pay a lot of attention to the

organization of the bodies or to covering them with lime. Hopefully, future analyses of these individuals may be able to pinpoint why they were placed in the Silo this way, and what the attitudes of those who put them there may have been.

Space for burial also would likely have been at a premium during wartime. Mass graves, by definition, contain multiple individuals to help create a more efficient burial process (Schotsmans et al. 2017; Martin et al., 2015:126). To have individuals buried within the Silo in their own graves, no matter how they might have been deposited within them, acts as a testimony to the fact that the ossuary as a burial site was limited to select individuals, rather than the entirety of the war dead. In the War of the Pyrenees alone, more than 4,000 soldiers were killed in the vicinity of Roncesvalles, not to mention the number of dead after the Peninsular War (Smith, 1998:93-94). There is simply not enough space for that many people to have been buried within the ossuary, which suggests that the individuals interred there were put there for a reason. Eyewitness accounts during both the War of the Pyrenees and the Peninsular War noted that the wooded, hilly terrain made travel difficult, let alone fighting. Logistically it would be very difficult to bring every individual to the ossuary for burial. Thus, it is more likely that individuals buried in the ossuary passed away after they were brought to the village, rather than dying in battle. Likewise, it would have been unlikely for locals to have brought bodies to the Silo for burial after the fighting, as it was customary for Basques to bury "strangers" in the yard, rather than transport them for burial in *campo santo* (Douglass, 1969).

Finally, it is important to address the individuals who were buried from West to East. Artifacts from the fill and the surrounding stratigraphic layer, such as musket balls and gun flints, provide good evidence that these individuals are contemporary to the wartime period,

or date to sometime soon after. Given this assumption, the primary question is whether these three East-West burials date to a time before or after the Peninsular War. Based on pilgrim data alone, they seem to correspond to the period directly after the War of the Pyrenees, when the hospital took in several hundred pilgrims and patients each year (Andrés-Gallego, 2012). Records were not thoroughly kept after the Peninsular War, and so the number of pilgrims who might potentially have been buried in the Silo is unknown. SK1 and SK2 appear to have been buried in coordination with each other, as they were both at the same stratigraphic level, and buried in the same way against the back wall of the Silo. As mentioned before, neither had any artifacts that were specifically attributable to them, they were both buried with lime, and the cranium of SK2 was trepanned, indicating they were both probably treated at the hospital. The subadult, SK4, was, conversely, buried away from SK1 and SK2, without lime, closer to the north side of the Silo. The grave also cut into the pile of soldiers at the center of the ossuary as well, indicating a later burial. Notably, the child also carried a religious medallion in its hands.

A lack of artifacts tied directly to SK1 and SK2 and the confusing stratigraphy at the southern wall of the Silo make it difficult to determine whether these two individuals were buried outside of a wartime context. However, their distance from each other, East-West orientation, and careful burials near the surface of the site suggest that they might have more in common with SK4 than the North-South oriented soldiers. Unfortunately, because of this lack of clarity, SK4 is the only skeleton which can be definitively dated to a time after the deposition of both the buried soldiers and the pile at the center of the Silo.

This presents its own problems for dating as well. Although the fill and surrounding matrix of SK4 was full of military artifacts, the child would have had to have been buried a

sufficient time after the event to make it possible for the gravedigger to dig into soil, rather than an actively putrefying pile of soldiers. Within the Silo it is impossible not to dig into human remains, so it seems unlikely that someone buried with so much care was buried at a time when remains in the Silo were so unpleasant and carelessly treated. The decomposition of so many people, in an environment as stable as the temperate ossuary, suggests that SK4 may have perished years after the mass casualty event. Regardless, the testimonies of locals in Roncesvalles support the idea that this last interment would have occurred at some point during the 19th century, as people were not buried in the Silo after this period (Iriarte and Igartua, 1981). Although the uncertainty of dating makes establishing the context of this individual more difficult, the effort put into to the burial of SK4 is still significant, especially when compared to others within the Silo.

Identifying the Dead

In the case of the Silo of Roncesvalles, the method of the burial for articulated remains seems to occur on a spectrum. At the level of most care is the burial of the child, SK4, in its East-West orientation with a religious medal carefully placed within its hands. The burials of SK1 and SK2 were likewise more carefully constructed, also being oriented East-West, with more space within the grave for the body, and lime placed on top. The next level seems to be the hurried burial typified by SK7 and surrounding individuals, whose graves were too small, but still showed some sense of care in that they were buried by themselves, in a supine position, and sometimes with lime, or in the case of SK7, with his military uniform. Next come the haphazard burial of skeletons such as SK8, SK9, or SK13,

who were buried with multiple individuals literally piled on top of each other, or in uncommon flexed and prone positions. Finally, the least careful burial is no burial at all, as is the case with the pile of articulated skeletons at the center of the ossuary.

In terms of understanding affinity in burial, and the connection between the dead and those who buried them, it follows that the most careful burial suggests the most affinity, while the least careful would therefore do the opposite. Unfortunately, in the case of a mass casualty situation, burial ultimately comes down to convenience and efficiency. Soldiers, particularly low-ranking ones, were buried in whichever way was possible at the time, and care was generally reserved only for officers (Rose, 1913:116). While a hospital situation, especially one fitted with an ossuary which already hosts the remains of thousands of people, there may have been more leeway for assigning meaning to burial methods, it is more likely the case that beyond the careful burial of SK4, the level of haphazardness had no bearing on the relationship between the deceased and the survivors.

This determination could be helped greatly by the use of osteobiography, or a much more in-depth examination of skeletal data. Although in my own research, basic biological profiles of these individuals might not be enough to tell the full story of how these individuals' bodies were shaped by their lives and identities, current studies are currently being undertaken to determine potential isotopic differences between the remains, as well as take an in-depth look at paleopathologies and marks of trauma on the remains, which might provide a clearer picture of where they came from and how they lived. Additionally, research is being completed to determine the actual identity of SK7, the member of the Infantry Regiment "Inmemorial del Rey" No 1., by a Lieutenant Colonel of that same regiment.

In the future these analyses will be invaluable for determining the potential significance of the remains to those who buried them. Though a lot of information remains unknown, discussion of the individuals buried in the Silo helps piece together the context surrounding their individual histories. For example, it appears that SK3, and SK5 through SK17 all belong to a military context, and, based on the evacuation of Roncesvalles by its residents prior to the War of the Pyrenees, these male skeletons were associated with the military during this period, as soldiers or possibly as those providing services for the camp. The presence of lime, and the general lack of artifacts and trauma suggests that these people were treated for illness in the hospital, and after passing away were buried in the ossuary. One possible killer was typhus, as the disease was following the French army throughout Europe during the War of the Pyrenees (Garcia-Sanze Marcotegui and Zabalza Cruchaga, 1983). That being said, several individuals were found with paleopathological signs of tuberculosis, as well as perimortem injuries with evidence of wound infection (E. Bonthorne, personal communication, January 18, 2022). These findings suggest that the deaths might have resulted from a range of causes, but also supports the hypothesis that they died after being treated at the hospital. Demographically, these men range in age from very young adulthood to old age, which, though broader than typical ages of individuals from military contexts, does not lie outside the realm of possibility, especially in the later stages of the war.

These individuals were also likely not local. Very few people from the area fought in the War of the Pyrenees, and of those, many deserted and returned home to help their families with agricultural work (Rodríguez Garraza, 1990). The hospital had been taken over by the military during this period, and so it follows that the only people in the village at that

time were nonlocal soldiers, rather than canons, which also meant that these individuals acted as the gravediggers as well.

The exception to the above assumption is SK4, who was presumably buried at some point after either war. In Murélaga, and other Basque towns, strangers or young children were not buried in *campo santo*, or consecrated ground unless it could be determined that they had been baptized (Douglass, 1969). In the case of SK4, while this individual was of an age to have likely been baptized, the placement of a religious symbol within the child's hands signifies that the gravedigger was not only aware of the individual's religious status, but also felt enough affinity for the child to leave it with a significant artifact, and therefore had some relationship with the child.

This is significant, because the majority of the burials in the Silo prior to this period, based on historical data, belonged to pilgrims. People on a Catholic pilgrimage, are, by definition, Catholic. Until the military takeover of Roncesvalles (and presumably afterwards), the Silo would have been thought of as *campo santo*, reserved for individuals whose religious status was assured, as is further evidenced by the internment of those on religious pilgrimage. People local to the area around Roncesvalles and Burguete would have had their own cemetery and been buried in the same general location as their ancestors, in a place that was significant to them (Douglass, 1969). The cloister around the Silo was the burial place of canons, who directly lived and worked in Roncesvalles, while pilgrims, who came from far away were placed in the ossuary beneath.

The addition of a grave good of religious significance is likewise interesting in terms of SK4, because this possible stranger to Roncesvalles would have been known to the person who buried him or her. Moreover, the Basque Catholic belief of the ability for the living to

intercede on the dead's behalf, through the completion of burial, for example, is further evidence that SK4 was buried by someone who cared (Douglass, 1969). This suggests then that SK4 may have in fact been local to the area, though this raises more questions than it answers. If the child was from the area around Roncesvalles, why was it buried in a pilgrim's cemetery, rather than in the same local graveyard as the rest of the family?

The presence of only three (at most) West-East graves is further evidence that these individuals were not buried during a mass casualty event, such as a war or an outbreak of disease, and their orientations with their heads to the west and feet to the east indicates that they probably were not canons, as during the early modern era, male clerics were often buried with the head facing east, towards their congregation (Bianucci et al., 2009:617). While canons were not exclusively buried in this orientation, it does provide a clue that these individuals were laymen rather than priests. This is supported by the idea that those buried in the Silo might have been injured or ill.

Generally, the hospitallers were treating the sick, rather than being treated themselves. Traditionally, lime was used in burials to help stave off disease, and during the late 1700s and early 1800s, fear of miasma made its use even more important (Schotsmans et al., 2017). Though the location was remote, lime would have been accessible in Roncesvalles, as it was a common resource for agriculture, and even burial at the time. That said, during wartime, it is logical that like other resources, lime would become relatively scarce. Especially in a mass casualty situation, where lime would have been used to speed decomposition, the use of the mineral on only some skeletons, and only on the abdominal area at that, would make sense if a gravedigger were trying to use it sparingly. Although the use of lime in considerations of the identity of the dead seems tenuous, the addition of lime is

a type of body treatment that allows one to understand how the corpse itself affected the living. While a body with lime may not have been more personally significant to the gravedigger than one that had no lime applied, the limed body nonetheless required an extra step in burial, which further means that the relationships between the living and the dead can be asserted through how the body is treated.

Relationships Between the Living and the Dead

While human remains are representative of a life lived, the body often retains its importance after death. While the importance of a corpse to the living may involve practical matters, such as proper disposal to improve sanitation and/or stave off disease, an interpersonal relationship between the dead and those who survive them can also affect how remains are viewed and treated.

Likewise, a positive or negative relationship created from cultural or political ideology can affect remains as well. While the soldiers thrown from the ceiling might have had no personal relationship with the individual who put them there, it is possible that there may have been a negative relationship based on political ideology, e.g., a member of one of the Allied militaries disposing of the remains of the French. Other soldiers in the Silo may have been buried according to a similar negative social disposition, although they were probably treated at the hospital, and so it would be unlikely that an enemy military force would have had the opportunity to bury them. However, during the Peninsular War, there were French soldiers present in the hospital when the Allies took over the village, so it is

possible that Allied forces may have disposed of dead Frenchmen during the War of the Pyrenees (Ibarra, 1939).

While the apparent disinterest in the disposal of human remains was evident in the case of those thrown from the roof, the haphazard burials of the individuals at the southwest side of the ossuary were also indicative of a lack of relationship between the dead and the living, or possibly even a negative relationship. Traditionally, prone burials have held a lot of significance, especially in medieval and early modern Christian contexts. While a prone burial in some contexts could be a sign of *humilitas*, or humility in front of God, other, more common reasons appear to signify deviance or social exclusion, or to prevent the revenant dead from wreaking havoc on the living (Alterague et al., 2020; Martin et al., 2015). In these types of prone burial, however, the rest of the burial context is clearly purposeful, in terms of orientation of the body, the type and location of the grave cut itself, or the presence of grave goods and other associated artifacts (Alterague et al., 2020). These purposeful prone burials differ from those which resulted from mere carelessness or efforts to save space. In the case of the prone burials in the Silo of Charlemagne, SK13 and SK15 (who were placed on top of one another), it seems much more likely that these people were buried in haste, rather than to signify some greater meaning about their lives or bodies. This is supported by the mass grave context in which they were placed, but also the carelessness evident in the actual deposition of their remains, where their arms and legs are disorganized, and their heads rest on the sides of the grave cuts, rather than facing directly down, as is often the case in purposeful prone burial (Alterague et al., 2020).

While there are certain cases where multiple individuals sharing a single grave serve as evidence of a close relationship between two deceased people, they are also a sign of the

need for haste and efficiency in burial, particularly in this military context. In the case of the Silo of Charlemagne, it is almost certain that these people were buried together out of necessity, rather than some deeper connection that was meant to be signified by their proximity in death. Like the prone burials, individuals like SK8, SK9 and SK14 or SK16 and SK17, who were buried together were buried in opposing directions, with the feet of one person next to or on top of the head of another. This type of positioning within the grave does not suggest relational intimacy, but rather a need to save space. As noted earlier, it seems that the gravediggers worked from east to west, and as they began running out of space at the western side of the ossuary, they resorted to space-saving measures to avoid disinterring remains that had already been buried.

Despite the haphazardness of most of the burials from this period, it seems that those who were burying the soldiers likely bore no ill will toward them. Although it is entirely possible that they were buried by members of an opposing military force, it seems more likely, based simply on the fact that they were buried at all, that the dead and the gravediggers were on the same side. After having treated them at the hospital, someone took the time to remove the remains, bring them to the nearest burial ground—a place that was popularly believed to hold the remains of some of the most culturally significant warriors in European history—and then dig them a grave, in some cases going so far as to cover their remains with lime. Although the graves were obviously done with efficiency, sometimes at the sake of the dignity of the remains themselves, their existence shows that on some level, the living still respected the dead.

The level of respect afforded to the buried soldiers differs dramatically from the pile which had been thrown into the ossuary from the roof. Although analyses have not been

completed for these individuals, the lack of effort put into the treatment of their remains shows, at best, a total absence of social affinity and at worst negative social affinity, in which the deposition of the remains of the Silo was intended as an affront. While the latter scenario seems less likely, simply because they were put into a burial ground at all, there is a clear disconnect in how the survivors identified with the dead in this instance. Perhaps the same anger which led the French to destroy the cross of Roland, led to the disrespectful deposition of bodies in the Silo. Although in both the War of the Pyrenees and the Peninsular War, there is evidence of the officers on both sides showing each other respect, and a generally chivalric sense of mutual regard, the same cannot necessarily be said for the armies (Glover, 1974). During the Peninsular War especially, the French were hated by the Allied soldiers and local citizens alike because they committed serious violence against their enemies and ravaged the fields and agricultural stores of civilians, including their fellow Frenchmen (Glover, 1974:80, 39). Although the French army may have had nationality in common with some of their Basque compatriots, the local Basques worked against them through the majority of the war, proving that they did not identify with them, in spite of being governed by the same force (Glover, 1974). If the pile of soldiers at the center of the ossuary is French, as is suggested by some of the artifacts which have been found in association with them, then it would be no surprise at them having been treated in such a manner.

Although it is possible that locals disposed of the pile of remains, this is unlikely. As mentioned before, the ossuary was evidently considered *campo santo*, and therefore would theoretically have been treated by any local or canon with the same respect that it had been treated with before the wars. Nowhere is this clearer than the post-war burial of SK4. Although the ossuary had been used as a general burial area during wartime, the careful

internment of the child afterward shows that at some point the ossuary came to be thought of as *campo santo* once again. While whomever buried the soldiers in the ossuary might not have identified with them personally, the person who put thought and effort into the burial of SK4 clearly did have a relationship with him or her. While the death of a young child can be perceived as sad and emotionally significant in any context, to attribute the care given to this burial to tragedy alone would be a mistake. Although children are often overlooked in the archaeological record for a perceived lack of influence on culture, children in fact have complex social lives, and interact with the world around them just as much as adults (Beauchesne and Agarwal, 2018). It is more than likely that the sole child given a full burial within the Silo had a connection to the person who conducted the burial.

When considering these three post-death scenarios in terms of identity political, social, or cultural identity—it is necessary to first think about the context in which these people lived their lives and reached their deaths. Europe during this period was going through a dramatic transition from the effects of the Enlightenment. While cultural and social affinity was strongly felt by different groups in Europe, as is evident in the local love for Roland and the connection that the people in the area felt to him and his story, national identity was still a foreign term, and even contemporary historians are loathe to refer to it as such (Mees, 2018:464). This is ironic considering the ongoing creation of new republican nations such as the United States, intended to be held together by a sense of national consciousness, and a strong sense of French nationalism enforced by its government during the Revolution, often at the cost of the lives of its own citizens (Hobsbawm, 1962). Spain, particularly Basque Spain, was likewise going through its own growing pains, with such ideas being hotly contested by the local Catholic clergy. Ibarra's condemnation of the French

soldiers who occupied Roncesvalles during the War of the Pyrenees, nearly 150 years after the fact, highlights the effect that the surge of nationalistic ideas had on rural Europe, at the cost of a growing conflict between religious and political powers (Ibarra, 1934:818).

Local identity was still strongly maintained at the time, which explains the ongoing cooperation between the people of Roncesvalles and their neighbors, and the willingness to take on the village's canons as refugees during the war. The same can be said of the Basques, who, with the exception of some specialist groups like the *Chasseurs*, subtly worked toward their own interests, whether that meant deserting an army they felt no connection to in order to return to their communities and help with agricultural work, or helping the Allied armies navigate the dangerous terrain.

Larger political identity was still a relatively new concept during this period though. While the Basques were generally opposed to the French during this period, it was not necessarily due to a distrust for republicanism (though this distrust was encouraged by the local clergy). Rather, Basques were opposed to the French because of attacks on their way of life, whether that be due to the French Army's pillaging and looting, or the abolition of their traditional system of self-government. Likewise, political territorial disputes during this time had little bearing on the local Basques, who still interacted with their neighbors on either side of the border in much of the same way as they had in the past, continuing to use their shared language and cultural systems.

Instability and Agency

When contextualizing Silo burials in relation to identity, it becomes easier to understand how the wartime period affected how the Silo was used. Outside of its normal context as a burial place with great religious and cultural significance, the ossuary was a convenient location in which to place human remains during a time when the ability to bury a body was uncertain. The ossuary is out of the elements, close to the hospital, and has soft, easy to remove soil, especially compared to the rocky clay characteristic of the Pyrenees. The ideological importance of the Silo became an afterthought during this unstable period if it was considered at all. Instead, considering function over ideology, the ossuary became important to the military during this time for how it could be used as a burial ground rather than a monument. The same can be said for the burials themselves. During times of past stability burial followed a standard set of rules and practices due to its importance as a well-established community rite; the standard practices were set aside to improve the functionality of burial during a time when there was no community.

In stable circumstances, the agency of both the dead and the living improves. These set principles provide people with an understanding as to how they can expect to be buried. Likewise, the living have a range of options available to them as well in terms of the burial of their loved ones, because they know what can feasibly be done, and are able to budget accordingly (Douglass, 1969). A corpse also has more agency during times of stability because its existence may be the most abnormal or important situation to contend with during any given day. Conversely, during wartime personal safety takes precedence on a day-to-day basis, rather than the treatment of someone who is already dead. During times of peace, the

dead can be remembered for the lives that they led and their significance to those taking the time to bury them, while during wartime, this remembrance is often another aspect which goes by the wayside in favor of the survival of the living.

It is simply a reality that bodies must be dealt with in some way, whether it is to address larger spiritual and social considerations of a person's movement from the world of the living to the world of the dead, or for practical considerations of sanitation. During times of stability, the former can take precedence, as time and effort are afforded for burial purposes. This differs from turbulent periods, when bodies may not be dealt with at all if it is at the risk of one's own safety, or they may be dealt with immediately for the same reason, but in such a way that disregards the aforementioned ritual norms. The two situations are both represented in the burials at the Silo of Charlemagne. In wartime, efficiency must take precedence to ensure that not too much valuable time is being taken for burial, and that remains are removed in such a way as to not affect the health of the living.

However, many cultural and social structures are affected in times of chaos, not just burial. As noted in both the wars discussed here, it is common for families to leave their homes and flee ancestral lands during wartime. Friendly relationships between neighbors can become strained as individuals are found on opposite sides of a brutal political struggle. In the case of the War of the Pyrenees and the Peninsular War, soldiers were brought in from across Europe, making it unlikely that they would have established interpersonal relationships, particularly when their own survival was at risk (Rose, 1913). The lack of interpersonal relationships likewise would have had an enormous effect on burial. For example, while General John Moore had to be hurriedly buried on the ramparts of Coruña, his burial was still carefully completed by those close to him (Glover, 1974). While this may

have been the case for SK7, who was similarly buried in military gear, it clearly was not for most of the individuals buried alongside him, who were buried unmethodically.

Because the Silo of Charlemagne is a socially significant site that contains both wartime and peacetime burials, it is an excellent case study for understanding the broader impacts of how ritual can change due to the effects of outside social and political circumstances. In anthropology, a straightforward (if reductionist) explanation of this change is through the concept of homeostasis, where the method used to complete a necessary action, such as the removal of remains from the sphere of the living, changes depending on peoples' ability to complete the action (Bateson, 1972). To maintain some semblance of societal homeostasis, the deceased must be dealt with. In times of war however, this action is completed as quickly and efficiently as possible, with little consideration as to the ritual normally applied, or the spiritual or religious implications that normally accompany burial. This is contrasted with how society normally functions, and how ritualized burial portrays the ideology of said stable society. Though the concept of homeostasis must be applied moderately—as it may be considered too biologically deterministic for contemporary anthropological theory—the concept of cultural practices being dependent on agency is a well-documented aspect of agency theory in archaeology, and the very structures which make up ritual are inherently the realization of that agency (Joyce and Lopiparo, 2005:368). Though individuals generally act within a structure, their adherence to ritual is as representative of their agency as a decision to subvert it would be (Joyce and Lopiparo, 2005:368).

It might be a stretch to say that ideological function would be extraneous in a context where there is no communal identity, but there are certainly some cases in which ritual

becomes less important. Returning to the idea of the construction of ritual, both semiosis and embodiment were still visible at the Silo in the interment of those who were buried there during times of war, but the strict ritual practices of both the locality, culture, and period were evaded. That said, the change caused by extenuating circumstances is often thought to have lasting societal impact, the opposite seems to have happened at the Silo of Charlemagne; after the uncertain period ended, ritual returned via the same practices that had operated in the past.

For the canons of Roncesvalles, the internment of SK4 may have been one way of returning the Silo to its original purpose. The ossuary is still considered *campo santo* to this day, as canons and locals continue to allow their remains to be moved there after spending time in the tombs upstairs. Although the wars of the late 18th and early 19th century greatly impacted the lives of those who lived in the area, continuing to use the Silo while maintaining its cultural importance shows the resilience of the community as well as how death and burial as events are reflective of society as a whole. Thanks to those buried within the ossuary of Roncesvalles, it is possible to see how communities react to adversity, both in terms of how individuals identify with each other, as well as how ritualized practices adapt to maintain the health of a group, both physically and spiritually. By examining this site, one can view how the conflict between personal relationships and efficiency affects burial practices. In turn, this examination helps to clarify the effects of political instability on cultural and social structures.

Chapter 7: Conclusion and Future Work

Summary

This thesis indicates the probable identities and historical context behind individuals buried in the Silo of Charlemagne of Roncesvalles. Though the site is located in a remote part of the Navarrese Pyrenees, the historical significance of the site as the gateway to a mountain pass meant that it became the final resting place of thousands of people, from ancient times to the present. Its position as the location of the "Battle of Roncevaux," immortalized in the *Chanson de Roland*, as well as its significance as a stop along the Way of Saint James led the hamlet to become a popular site for tourists and pilgrims alike, and its hospital treated thousands of people, some of whom were interred in the Silo of Charlemagne. As a result of France's revolution, two different war campaigns were fought in the vicinity of the town, leading to its occupation by various militaries in the 1790s, and again in the 1810s. During these wars individuals were buried in the Silo following attempts at treatment at Roncesvalles' hospital, which treated soldiers almost exclusively for the duration of both wars. At some point during this turbulent period, other soldiers were also deposited into the ossuary through the structure's ceiling, and these were the last articulated individuals deposited into the Silo for many years. Eventually, life in Roncesvalles returned to a state of normalcy, at which point a child was interred in the ossuary via traditional Catholic burial practices, meaning it was buried in a specific orientation with a religious medallion, to signify the individual's relationship to the community via their shared religion.

These events work to highlight how is the Silo is representative of the way that burial, and ritual more broadly, changes depending on the circumstances that affect the living.

Although, during a time of stability, a site can have cultural and ideological significance that is maintained through a community's interaction with it, this can change during times of uncertainty. During mass casualty events, such as two successive wars, traditional practices can be supplanted in an effort to maintain some semblance of stability. Whereas in times of ease, one may be afforded the ability to complete a ceremony such as burial in a socially prescribed way, in times of hardship, this same ceremony is forgone so that the act of burial can be completed at all. By looking at the different burials in the Silo of Charlemagne and their spatial relationships with each other, it is therefore possible to see the effect of such changes in both a small space over a short period of time.

Further Study

Future archaeological study should aim to form an "osteobiography," or a life narrative which can be attributed to each individual skeleton (Hosek and Robb, 2019). The ultimate goal of an osteobiography is to provide as much information about a person's life as possible, through the study of their skeleton and the associated archaeological context. While in the past, biological anthropologists focused on skeletons only for their meaning to a broader population context, or even just as pathological case studies, in recent years osteobiography has become a valid way to understand the life experiences of the individual (Hosek and Robb, 2019). Encompassing more than just the creation of a biological profile (age, sex, stature, ancestry) and an assessment of trauma and illness, an osteobiography is meant to look at an individual in context through other methods, such as ancient DNA

(aDNA) or population studies that analyze a specific individual's relationship to society as a whole (Hosek and Robb, 2019).

The completion of isotopic analyses on the Silo's skeletons will likewise bolster their osteobiographies. While an in-depth study would be invaluable for understanding the specific individual differences between the Silo's buried skeletons, future study of the "French soldiers" who were thrown from the ceiling of the Silo would likewise be greatly helped by osteobiographical analyses. Being able to definitively date them to either the War of the Pyrenees or the Peninsular Wars, as well as understand the relationship between the wartime burials and the peacetime burial of SK4 will provide more information about the Silo. Likewise, further study of the Silo itself may uncover more burials from before and/or after the wars, which can help to illustrate how the ossuary was used over time.

Although this thesis only covers a snapshot of history, by being able to look at more individuals buried within the same space, we can gather more data regarding the ossuary's significance over time. Additionally, 4,000 military burials dating to this area and period are still unaccounted for, so finding the remains of the soldiers who died in battles around Roncesvalles would also help put the ossuary into a broader context. Furthermore, this would allow anthropologists to better understand how societies adapt to conflict, especially over a brief span of time.

Bibliography

Adams, John. “Diary and Autobiography of John Adams vol. 4.” In *The Adams Papers, Autobiography, Parts Two and Three, 1777–1780*, edited by L. H. Butterfield. Cambridge: Harvard University Press, 1961.

Albanese, J. “A metric method for sex determination using the hipbone and the femur.” *Journal of Forensic Sciences* 48, no. 2 (2003): 263-273.

Albanese, John, Greg Eklics, Andrew Tuck. “A Metric Method for Sex Determination Using the Proximal Femur and the Fragmentary Hipbone.” *Journal of Forensic Sciences* 53, no. 6 (2008): 1283-1288.

Alexander, Bobby C. “Correcting Misinterpretations of Turner’s Theory: An African-American Pentecostal Illustration.” *Journal for the Scientific Study of Religion* 30, no. 1 (1991): 26-44.

Alterage, Amelie, Thomas Meier, Bettina Jungklaus, Sandra Lösch. “Between belief and fear – Reinterpreting prone burials during the Middle Ages and early modern period in German-speaking Europe.” *PLoS ONE* 15, no. 8 (2020).

Andrés-Gallego, José. "The Politics of Pilgrim Care: A Study in Roncesvalles." In *Pilgrims and Politics: Rediscovering the power of pilgrimage*, edited by Antón M. Pazos, 119-149. Surrey: Ashgate Publishing Limited, 2012.

Andrés-Gallego, José, Mercedes Unzu, María Peréx, Carlos Zuza, Nicolás Zuazúa, María García-Barberena. "Roncesvalles as a reliquary on the way to Santiago." In *Relics, Shrines and Pilgrimages: Sanctity in Europe from Late Antiquity*, edited by Antón M. Pazos, 78-91. New York: Routledge, 2020.

Anthony, Sian. "Hiding the Body: Ordering Space and Allowing Manipulation of Body Parts within Modern Cemeteries." In *The Archaeological of Death in Post-medieval Europe*, edited by Sarah Tarlow, 170-188. Berlin: De Gruyter Open, 2015.

Aranzadi, T., and J. M. Barandiarán. “Exploraciones de Prehistoria en las carcanías de Roncesvalles (Auritzberri y Auritz) y en Gorriti y Huici.” *Munibe* 5, no. 2 (1953): 74-102.

Argote, Naiara, Miguel Botella, Francisco Etxeberria Gabilondo. “Nécropolis medievales del País Vasco: estado actual de la investigación antropológica.” *Saututola: Revista del Instituto de Prehistoria y Arqueología Saututola* 18 (2013): 275-289.

Ariès, Philippe. *The Hour of Our Death*. New York: Knopf, 1981.

Arraiza Frauca, Jesús. “Ermitas de San Esteban y San Guillermo, en la Aézcoa.” *Cuadernos de etnología de Navarra* 18, no. 67 (1996): 5-12.

Arrizabalaga, Marie-Pierre. “Succession strategies in the Pyrenees in the 19th century: The Basque case." *History of the Family* 10, no. 3 (2005): 271-292.

Badcock, Lovell. “Rough Leaves from a Journal kept in Spain and Portugal Vol. 54.” In *The Quarterly review*, 186-194. London: John Murray, Albemarle Street, 1835.

Barandiarán, José Miguel. *Selected Writings of José Miguel de Barandiarán: Basque Prehistory and Ethnography*, edited by Jésus Altuna. Translated by Frederick H. Fornoff, Linda White, Carys Evans-Corrales. Reno: Center for Basque Studies, University of Nevada Reno, 2007.

Bateson, Gregory. *Steps to an Ecology of Mind: Collected Essays in Anthropology, Psychiatry, Evolution, and Epistemology*. Northvale: Jason Aronson, Inc., 1972.

Beauchesne, Patrick and Sabrina C. Agarwal. “Introduction: Excavating Childhood from the Skeletal Record.” In *Children and Childhood in Bioarchaeology :Bioarchaeological Interpretations of the Human Past: Local, Regional, and Global Perspective*, edited by Patrick Beauchesne and Sabrina C. Agarwal, 1-30. Gainesville: University Press of Florida, 2018.

Berdah, Jean-François. "Pyrenees without Frontiers: the French-Spanish Border in Modern Times, 17th to 20th Centuries." In *Frontiers, regions and identities in Europe*, edited by Steven G. Ellis and Raingard Eßer, 163-184. Pisa: Plus-Pisa University Press, 2009.

Bianucci, Rafaella, Lila Rahalison, Alberto Peluso, Emma Rabino Massa, Ezio Ferroglio, Michel Signoli, Jean-Yves Langlois, and Véronique Gallien. "Plague immunodetection in remains of religious exhumed from burial sites in central France." *Journal of Archaeological Science* 36, no. 3 (2009): 616-621.

Blot, Jacques. "Les rites d’incineration en Pays Basque durant la protohistoire." *MUNIBE Sociedad de Ciencias Naturales ARANZADI* 31, no. 3-4 (1979): 219-236.

Bonthorne, Emma. "Methodological approaches to large-scale commingling at the Ossuary of Roncesvalles (Navarre, Spain)." Presentation at the Theoretical Archaeology Group (TAG) Conference, Durham, UK, December 16-17, 2021.

British Archaeological Jobs Resource (BAJR). *A Field Guide to the Excavation of Inhumated Human Remains.* OSSAFreelance, 2005.

Brooks S. and J. M. Suchey. “Skeletal age determination based on the os pubis: A comparison of the Acsádi-Nemeskeri and Suchey-Brooks methods." *Human Evolution* 5 (1990): 227-238.

Buikstra, J. E. and D. H. Ubelaker. *Standards for Data Collection from Human Skeletal Remains*. Fayetteville: Arkansas Archaeological Survey Report Number 44, 1994.

Carballo, Patricia. "Auritz/Burguete: el yacimiento romano de Zaldua saca a relucir su pasado termal." Navarra. *Diario de Noticias de Navarra*, July 23, 2021. https://www.noticiasdenavarra.com/navarra/2021/07/24/yacimiento-romano-zaldua-saca-relucir/1167018.html.

Calleja Leal, Guillermo. “Breve Historia del Regimiento Inmemorial: El Regimiento de Infantería Inmemorial del Rey No. 1 del Cuartel General del Ejército." *La Coronelía Guardas del Rey* 9, no. 37 (2012): 11-41.

Castiella Amparo. “Consideractiones sobre el poblado y necrópolis de Sansol (Muru-Astrain, Navarra): campaña de 1988." *Trabajos de arqueología Navarra* 10 (1991): 225-316.

Colas, Louis. “La Voie Romaine de Bordeaux a Astorga dans sa Traversée des Pyrénées.” *Bulletin Mensuel de Biarritz = Association, Société des Sciences, Lettres et Arts* 17, no. 8 (1912): 189-216.

Coutinho Nogueira, Dany, Bruno Dutailly, Florent Comte, Alexandr Vasil'iev, Alexandr Khokhlov, Tatiana Shvedchikova, Natalia Berezina, Alexandra Buzhilova, Olivier Dutour, and Hélène Coqueugniot. ""Guele cassée" (facial injuries): a 3D paleotraumatology study and facial approximation of a Napoleonic soldier who died in 1812 at Königsberg during the Russian Campaign." *International Journal of Osteoarchaeology* 29, no. 2 (2019): 191-197.

Cowgill, George L. "’Rationality’ and contexts in agency theory." In *Agency in Archaeology*, edited by Marcia-Anne Dobres and John E. Robb, 52-59. London: Routledge, 2000.

Crandall, John J. and Debra L. Martin. “The Bioarchaeology of Postmortem Agency: Integrating Archaeological Theory with Human Skeletal Remains.” *Cambridge Archaeological Journal* 24, no. 3 (2014): 429-435.

Crawford, Emily. “Tracing the Historical and Legal Development of *Levée en Masse* in the Law of Armed Conflict.” *Journal of the History of International Law* 19 (2017): 329-361.

Douglass, William A. *Death in Murélaga: Funerary Ritual in a Spanish Basque Village*. Seattle: University of Washington Press, 1969.

Duhourcau, Bernard. *Guide des Pyrénées mystérieuses*. Paris: Éditions Sand, 1999.

Dunn-Pattison, R. P. *Napoleon’s Marshalls*. London: Methuen & Co, 1906.

Durant, William and Ariel Durant. *The Age of Napoleon: A History of European Civilization from 1789 to 1815*. New York: Simon and Schuster, 1975.

Evis, Laura Helen, Ian Hanson, Paul Nicholas Cheetham. “An experimental study of two grave excavation methods: Arbitrary Level Excavation and Stratigraphic Excavation.” *STAR: Science and Technology of Archaeological Research* 2, no. 2 (2016): 177-191.

Garcia-Sanze Marcotegui, Ángel and Miguel Ángel Zabalza Cruchaga. “Consecuencias demográficas de la Guerra de la Convención en Navarra: La crisis de mortalidad de 1794-1795.” *Príncipe de Viana* 44, no. 168 (1983): 63-87.

George, Diane F., Bernice Kurchin, and Kelly M. Britt. "O Brave New World: A Look at Identity and Dissonance." In *Archaeology of Identity and Dissonance*, edited by Diane F. George and Bernice Kurchin, 1-18. Gainesville: University Press of Florida, 2019.

Glover, Michael. *The Peninsular War 1807-1814: A Concise Military History*. Hamden: Archon Books, 1974.

Goldstein, Lynne, Joseph T. Hefner, Kristin J. Sewell, and Michael Heilen. "Cultural Affinity, Identity, and Relatedness: Distinguishing Individuals and Cultural Groups." In *Uncovering Identity in Mortuary Analysis: Community Sensitive Methods for Identifying Group Affiliation in Historical Cemeteries*, edited by Michael P. Heilen, 91-103. New York: Taylor & Francis, 2012.

Gowland, Rebecca and Sophie L. Newman. “Children of the Revolution: Childhood Health Inequalities and the Life Course during Industrialization of the 18th and 19th Centuries in England.” In *Children and Childhood in Bioarchaeology :Bioarchaeological Interpretations of the Human Past: Local, Regional, and Global Perspective*, edited by Patrick Beauchesne and Sabrina C. Agarwal, 294-329. Gainesville: University Press of Florida, 2018.

v. Grumbkow, Philipp, Anna Zipp, Birgit Großkopf, Kai Fueldner, and Susanne Hummel. "Analyses to help identify individuals from a historical mass grave in Kassel, Germany." *Anthropologischer Anzeiger* 69, no. 1 (2012): 1-43.

Henn, Alexander. "Introduction: Beyond Norm, Text, and Dialectics. Ritual in Social Praxis." In *Rituals in an Unstable World: Contingency – Hybridity - Embodiment*, edited by Alexander Henn and Klaus-Peter Koepping, 9-29. Bern: Peter Lang AG, 2008.

Hobsbawm, Eric. *The Age of Revolution: Europe 1789-1848*. London: Abacus, 1962.

Hodder, Ian. "Agency and individuals in long-term processes." In *Agency in Archaeology*, edited by Marcia-Anne Dobres and John E. Robb, 22-33. London: Routledge, 2000.

Horáčková, Ladislava, and Lenka Benešová. “Findings of War-Time Injuries from the Battle of Austerlitz.” *Anthropologie* 35, no. 3 (1997): 283-289.

Hosek, Lauren and John Robb. "Osteobiography: A Platform for Bioarchaeological Research." *Bioarchaeology International* 3, no. 1 (2019): 1-15.

v. Humboldt, Wilhelm. *Werke. Dritter Band 1799–1818* (1904): 119, 129 and 292.

Ibarra, Javier. *Historia de Roncesvalles*. Pamplona: Talleres Tipográficos “La Acción Social”, 1934.

Iriarte, Victoria, and Ernesto Igartua. “Silo de Carlomagno (Roncesvalles): Trabajos realizados del 12 al 22 de noviembre de 1981.” Site report, Facultad de Ciencias de Lejona-Bilbao, 1981.

Irigaray Gil, Joxepe. “Auritz/Burguete y Orreaga/Roncesvalles, Ejemplos de Convivencia.” *Pregón siglo XXI* 59 (2021): 134-139.

Işcan, M. Y. and S. R. Loth. “Estimation of age and determination of sex from the sternal rib.” In *Forensic Osteology: Advances in the Identification of Human Remains* edited by K. J. Reichs. Springfield: C. C. Thomas, 1986.

Joyce, Rosemary A. and Jeanne Lopiparo. "Postscript: Doing Agency in Archaeology." *Journal of Archaeological Method and Theory* 12, no. 4 (2005): 365-374.

Jusué Simonena, Carmen, Mercedes Unzu Urmeneta, and María García-Barberena Unzu. "Evidencias arqueológicas sobre la muerte en el Camino de Santiago." *Trabajos de Arqueología Navarra* 22 (2010): 195-248.

Kinzelbach, Annemarie. "Infection, Contagion, and Public Health in Late Medieval and Early Modern German Imperial Towns." *Journal of the History of Medicine and Allied Sciences* 61, no. 3 (2006): 369-389.

Klales, Alexandra R., Stephen D. Ousley, Jennifer M. Vollner. "A revised method of sexing the human innominate using Phenice’s nonmetric traits and statistical methods." *American Journal of Biological Anthropology* 149, no. 1 (2012): 104-114.

Knüsel, C. J. "Bioarchaeology: A Synthetic Approach." *Société d’anthropologie de Paris* 22 (2009): 62-73.

Koudounaris, Paul. *The Empire of Death: A Cultural History of Ossuaries and Charnel Houses*. London: Thames & Hudson, 2011.

Lana-Berasain, José-Miguel. "Dealing with Deflation in Turbulent Times. Agricultural Markets and Rural Management in Southern Navarre (Spain)." *Histoire & Mesure (EHESS)* 26, no.1 (2011): 75-104.

Lana-Berasain, José-Miguel. "Reversible Privatisation. Conflict, Bricolage and the Sale of Common Lands in the Spanish Province of Navarre, 1808-1860." *Continuity & Change* 35, no. 2 (2020): 187-214.

Lacquer, Thomas W. *The Work of the Dead: A Cultural History of Mortal Remains*. Princeton: Princeton University Press, 2015.

Lara Lopez, Emilio Luis. "Los emigrados franceses y la evolucion del afrancesamineto en Espana." *Cuadernos dieciochistas (Ediciones Universidad de Salamanca)* 17 (2016).

Larsen, Clark Spencer. *Bioarchaeology: Interpreting Behavior from the Human Skeleton*. Cambridge: Cambridge University Press, 2015.

Lewis, David Levering. *God's Crucible: Islam and the Making of Europe, 570 to 1215*. New York: W.W. Norton, 2008.

Ley Foral 14/2005, de 22 de noviembre, Del Patrimonio Cultural de Navarra, BOE 141 – 25/11/2005; corr. err. 20/03/2006.
http://www.lexnavarra.navarra.es/detalle.asp?r=4509#Ar.66.

Lovejoy, C. O., R. S. Meindl, R. P. Mensforth, T. J. Barton. "Multifactorial determination of skeletal age at death: A method and blind tests of its accuracy." *American Journal of Physical Anthropology* 68 (1985): 1-14.

MacKinnon, Amy T., Nicholas V. Passalacqua, Eric J. Bartelink. "Exploring diet and status in the Medieval and Modern periods of Asturias, Spain, using stable isotopes from bone collagen." *Archaeological and Anthropological Sciences* 11 (2019): 3837-3855.

Martin, Debra L., Ryan P. Harrod, Ventura R. Pérez. *Bioarchaeology: An Integrated Approach to Working with Human Remains*. New York: Springer, 2015.

Martinez de Aguirre, Javier, Leopoldo Gil, and Mercedes Orbe. *Roncesvalles: Hospital y santuario en el Camino de Santiago*. Pamplona: Fundación para la Conservación del Patrimonia Histórico de Navarra, 2012.

Mees, Ludger. "Ethnogenesis in the Pyrenees: The Contentious Making of a National Identity in the Basque Country." *European History Quarterly* 48, no. 3 (2018): 462-489.

Mendizabal Gorostizu-Orkaiztegi, Amaia. "Anthropological and Pathological Study of High Medieval Cemeteries in the Basque Country. The cases of the unpopulated areas of Aistra and the Castle of Treviño." *Munibe (Antropologia-Arkeologia)* 62 (2011): 403-421.

Murray, Seth. "The Presence of the Past: A Historical Ecology of Basque Commons and the French State." In *Social and Ecological History of the Pyrenees: State, Market, and Landscape*, by Ismael Vaccaro and Oriol Beltran, 25-41. New York: Routledge, 2010.

Musgrave, Elizabeth. "Memento Mori: The Function and Meaning of Breton Ossuaries 1450-1750." In *The Changing Face of Death: Historical Accounts of Death and Disposal*, by Glennys Howarth and Peter C. Jupp, 62-75. London: Palgrave Macmillan UK, 1997.

Nuin, Javier, María del Rosario Mateo, Alexandre Duró, Rosa M. Armendáriz Aznar. "La necrópolis de San Martín de Montalbán. Yerri, Navarra." *Trabajos de Arqueología Navarra* 23 (2011): 161-174.

Oman, Charles. *A History of the Peninsular War*. 7 vols. Oxford: Clarendon Press, 1902.

Ortega, Luis Angel, Iranzu Guede, Maria Cruz Zuluaga, Ainhoa Alonso-Olazabal, Xabier Murelaga, Javier Niso, Miguel Loza, Juan Antonio Quirós Castillo. "Strontium isotopes of human remains from the San Martín de Dulantzi graveyard (Alegría-Dulantzi, Álava) and population mobility in the Early Middle Ages." *Quaternary International* (2013): 1-10.

Pearson, Mike Parker. *The archaeology of death and burial*. College Station: Texas A & M University Press, 1999.

Peréx Agorreta, Jesús and Mercedes Unzu Urmeneta. "Novedades en Torno a la Posible Localización de Iturissa (Espinal/Burguete, Navarra)." *Cuadernos de Arqueología* 21 (2013): 257-268.

Pérez de Villarreal, Vidal. "Kisulabeak: Hornos de cal." *Cuadernos de etnología y etnografía de Navarra* 54 (1989): 377-406.

Phenice, T. W. "A newly developed visual method of sexing the os pubis." *American Journal of Biological Anthropology* 30, no. 2 (1969): 297-301.

Pinto Tortosa, Antonio J. "La cultura popular hispano-dominicana ante la paz de Basilea: Las decimas Meso Monica." *Bulletin of Hispanic Studies* 90, no. 8 (2013): 921+.

Quigley, Christine. *Skulls and Skeletons: Human Bone Collections and Accumulations*. Jefferson: McFarland and Company, 2001.

Quirós Castillo, Juan Antonio. *Arqueología del campesinado medieval: la Aldea de Zaballa*. Bilbao: University of the Basque Country, Servicio de Publicaciones, 2012.

Quirós Castillo, Juan Antonio. "Los comportamentos alimentarios del campesinado medieval en el País Vasco y su entorno (siglos VIII-XIV)." *Historia Agraria* 59 (2013): 13-41.

Quirós Castillo, Juan Antonio, Miguel Loza Uriarte, Javier Niso Lorenzo. "Identities and grave goods in early medieval necropoleis. Isotopes studies in the cemetery of San Martin of Dulantzi, Alava (6^{th}-11^{th} centuries)." *Archivo Español de Arqueología* 86 (2013): 215-232.

Rappaport, Roy A. "Obvious Aspects of Ritual." *The Cambridge Journal of Anthropology* 2, no. 1 (1974): 3-69.

"Recollections of a few Days spent with the Queen's Army in Spain, in Sept 1834." In *The Quarterly review*, 194-230. London: John Murray, Albemarle Street, 1835.

Redman, Harry, Jr. *The Roland Legend in Nineteenth-Century French Literature*. Lexington: University Press of Kentucky, 1991.

Rodríguez Garraza, Rodrigo. “Actitudes politícas en Navarra durante la guerra de la Convención (1793-1795).” *Príncipe de Viana* 51, no. 189 (1990): 113-118.

Rogers, T. L. "A visual method of determining the sex of skeletal remains using the distal humerus." *Journal of Forensic Sciences* 44 (1999): 57-60.

Rose, Achilles. *Napoleon's campaign in Russia anno 1812; medico-historical*. New York: Published by the Author, 1913.

Schotsmans, Eline M. J., Almudena García-Rubio, Howell G. M. Edwards, Tasnim Munshi, Andrew S. Wilson, and Luis Ríos. "Analyzing and Interpreting Lime Burials from the Spanish Civil War (1936 1939): A Case Study from La Carcavilla Cemetery." *Journal of Forensic Sciences* 62, no. 2 (2017): 498-510.

Schotsmans, E. M. J., F. Toksoy-Köksal, R. C. Brettell, M. Bessou, R. Corbineau, A. M. Lingle, D. Bougin, P. Blanchard, K. Becker, D. Castex, C. J. Knüsel, A. S. Wilson, and R. Chapoulie. "'Not All That Is White Is Lime' - White Substances from Archaeological Burial Contexts: Analyses and Interpretations." *Archaeometry* 6, no. 4 (2019): 809-827.

Signoli, M. "Reflections on crisis burials related to past plague epidemics." *Clinical Microbiology & Infection* 18, no. 3 (2012): 218-223.

Smith, Digby. *The Napoleonic Wars Data Book*. London: Greenhill Books, 1998.

Sofaer, Joanna R. *The Body as Material Culture: A Theoretical Osteoarchaeology*. Cambridge: Cambridge University Press, 2006.

Sorbet Ayanz, Alejo. *Roncevaux*. Pamplona: Editorial Gomez, 1965.

Southey, Robert. *History of the Peninsular War*. 6 vols. London: John Murray, Albemarle-Street, 1837.

Steevens, Charles. *Reminiscences of My Military Life from 1795 to 1818*. Edited by Nathaniel Steevens. Winchester: Warren & Son, 1878.

Tarlow, Sarah. 2015. "Introduction: Death and Burial in Post-Medieval Europe." In *The Archaeological of Death in Post-medieval Europe*, edited by Sarah Tarlow, 1-18. Berlin: De Gruyter Open.

The Song of Roland. Translated by C. K. Scott-Moncrieff. Project Gutenberg, 1996. https://www.gutenberg.org/cache/epub/391/pg391.html.

Thèves, Catherine, Elodie Cabot, Caroline Bouakaze, Pierre Chevet, Éric Crubézy and Patricia Balaresque. "About 42% of 154 remains from the 'Battle of Le Mans', France (1793) belong to women and children: Morphological and genetic evidence." *Forensic Science International* 262 (2015): 30-36.

Thorsheim, Peter. "The Corpse in the Garden: Burial, Health, and the Environment in Nineteenth-Century London." *Environmental History* 16, no.1 (2011): 38-68.

Tobie, Jean-Luc. "Two new late antiquity sites in the Lower Navarre: Gazteluzahar in Lantabat/Larceveau and Arteketa/Campaita in Uhart-Cize." *Isturitz: Cuadernos de prehistoria - arqueología* 8 (1997): 125-136.

Tone, John Lawrence. *The fatal knot : the guerilla war in Navarre and the defeat of Napoleon in Spain*. Chapel Hill: University of North Carolina Press, 1994.

Turner, Victor. *The Ritual Process: Structure and Anti-Structure*. London: Routledge, 1969.

Turner, Victor. “Process, System, and Symbol: A New Anthropological Synthesis.” *Daedalus* 106, no. 3 (1977): 61-80.

Ucko, Peter J. "Ethnography and Archaeological Interpretation of Funerary Remains." *World Archaeology* 1, no. 2 (1969): 262-280.

Valle de Tarazaga, Francisco J. and Emma Bonthorne. "Santa María de Zamartze: investigación en la necrópolis medieval y la *mansio* romana de *Aracaeli*." *Trabajos de Arqueología Navarra* 28 (2016): 233-244.

Verdery, Katherine. *The Political Lives of Dead Bodies*. New York: Columbia University Press, 1999.

Veyrin, Philippe. *The Basques of Lapurdi, Zuberoa, and Lower Navarre: their history and their traditions*. Translated by Andrew Brown. Reno: Center for Basque Studies, University of Nevada Reno, 2011.

Vymazalová, Kateřina, Lenka Vargová, Ladislava Horáčková, Jiří Kala, Michal Přichystal, Ivo Světlík, Kateřina Pachnerová Brabcová, Veronika Brychová. "Use of the radiocarbon method for dating of skeletal remains of a mass grave (Brno, the Czech Republic)." *Studia Geophysica et Geodaetica* 63 (2020): 143-152.

Walker, Phillip L. "Sexing skulls using discriminant function analysis of visually assessed traits." *American Journal of Physical Anthropology* 136, no. 1 (2008): 39-50.

White, Tim D. and Pieter A. Folkens. *The Human Bone Manual*. Burlington: Elsevier Academic Press, 2005.

Zaldua Goena, I. “Excavación de la ermita de San Pedro Elcano (Aya, Zarauz).” *Kobie - Serie Paleoantropología* 17 (1988): 267- 268.

Appendix

Data Collection Form

Thesis – Identity and Burial at Roncesvalles

SK # :

Burial Characteristics

Orientation (Head to Toe):_____

Position:_____

Grave type:_____

Burial containers: Y / N

_____

Evidence of lime, other minerals:_____

_____

_____

Artifacts

Clothing:_____

_____

Religious artifacts:_____

_____

Natural materials:_____

_____

Personal artifacts:_____

_____

Potential other SK the above artifacts belong to:_____

_____

Skeletal Characteristics

Subadult: Y / N

Obvious trauma or illness:_____

_____

_____

_____

Taphonomy:_____

_____

_____

General Notes:_____

_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____