

THE PLAGUED MUSLIMS

The Plague Pandemics' Influence on the Muslim
Conquest in 7th century Levante



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Introduction

The years 541 AD, 1347, and 2020 all have one thing in common: they all include the start of a global pandemic, which, in every instance, led to major change within the religiously and socially diverse Middle East, especially, in the area of modern-day Syria and Palestine.

The First Plague Pandemic coincided with the downfall of the Byzantine Empire, signalling a major demographic change in the region within its 160 years of reoccurring epidemics. The second Plague pandemic, often called the Black Death, brought on within just 2 years the most drastic demographic change in the history of the Middle East, devastating the Middle East and Northern Africa, but also brought on new medical ideas and procedures. Both of those Pandemics influenced not only the Middle East but Asia, Europe and Africa as well. In that regard, the first global Pandemic of the 21st century is a good point of reference, as even with our modern understanding of medicine, pandemics are still a major influence on human life, on social, demographic and political structures.

Although the above describes three different global pandemics, the overarching factor is that their influences were quite far-reaching in terms of making apparent the structurally weak points within the social, political, and economic systems of the society's that existed during 541, 1347, and 2020. This is because social structures work only under very specific conditions, which, when suddenly changed, can cause a society's systems to reach a breaking point or even fail.

When looking for similar pandemics in the history of the world, and especially the Middle East, the Plague pandemics come to mind. The Justinian Plague – afterwards named after the Roman Emperor Justinian I (482-565) – has been argued to be the first-ever global Plague pandemic. Its starting date of 541 coincided with major social, economic, and ecological changes around the Mediterranean, and the pandemic has since been marked as both a cause that ended Antiquity and one that rang in the period that began after it.

In the bigger picture of those changes falls the Muslim Conquest. The 7th century is marked by the rise of Islam and the consequential conquest of the lands from the Middle East to Northern Africa. The focus of my thesis will lie on the interwoven happenings in the 7th century, in the area of modern Syria and Palestine. Overall, the Plague shaped not only the 7th century but in a reoccurring pattern also the Levante, Northern Africa and Europe from 541 until 750. According to a modern evaluation of Procopius of Caesarea, historian and advisor at Justinian's court, 25 to 50 million people died due to the Plague in the Byzantine Empire.¹ From the 9th until the 14th century, the Middle East would be spared from major outbreaks of the Plague, until the second pandemic broke out, known as the Black Death.

To understand the influence of the Plague on the Middle East and the Muslim conquest, an interdisciplinary approach is needed. As the events of the 6th and 7th centuries do not exist within a vacuum, but in a historical timeframe, an analysis of the contributing

¹ John Horgan, 'Justinian's Plague (541-542 CE)', *Ancient History Encyclopedia*, accessed 1 February 2021, <https://www.ancient.eu/article/782/justinians-Plague-541-542-ce/>.

factors is necessary to assemble a coherent picture. As the Plague is a topic both of scientific and historical importance, a multi-disciplinary view on the 6th century is necessary.

As a basis for my approach serves research done on three topics, namely, geology, the atmosphere, and climate change, which all relate to nature, and which have been known to be linked to historical changes. An earthquake, a volcanic eruption or climate change can shift social and economic conditions via a sudden change in economic and agricultural stability. In this way, a natural event can, like a domino effect, cause a succession of social changes.

I use the term domino effect on purpose in this context of historical research, as seemingly unrelated factors, such as a global climate change and a volcanic outbreak, can introduce social and political disruption periodically. Therefore, climate change can affect agricultural output, which influences social structures, including famine-related conflict. This can influence people towards large-scale migration, therefore influencing regions not primarily influenced by the climate change. Nature and natural changes must, therefore, be seen as a basis for all historical context, whether social, political or even medical.

Ulf Büntgen's research about 2,000-year-old trees shows their distinct growth patterns in accordance with the weather, which can predict data about agricultural repercussions.² Those northern hemisphere trees depict the LALIA, the Late Antiquity Little Ice Age, a period of cool and wet weather. The research shows how the LALIA must be evaluated within the larger topic of climate change. While the topic of climate change is of great priority in the 21st century, the concept of climate change exists as long as the earth itself. Warmer and cooler weather has always changed periodically over a cyclic course. Within the period of the Holocene (10.000 BCE – present) there can be traced several distinct cooler and warmer periods. Researchers have since named those periods for their main historical situation i.e., the Roman Warm Period. While researchers such as Kyle Harper advocate for periodisation of the Mediterranean weather to simplify these complex processes, other researchers have since voiced concerns about the sheer complexity of the topic and that periodisation can only be seen as a localised effect. To fully utilize the informational input of topics such as climate change and historical repercussions, periodisation is not the ideal method of explanation. John Haldon argues, that while climate change is an important factor for human history, it needs to be considered with social evolution, political change and economic developments, as all these factors influence each other multilaterally.³ The weather, therefore, is a factor for historical change, albeit not the main one.

While a cooler period can be a positive influence in the desert-like areas, Europe, Northern Africa and the Northern Middle East suffered from meagre harvests, inducing famine and war. Due to a lack of food in Europe, export from Northern Africa flourished. Harper argues that the climatic change furthered import into Constantinople.⁴

² Ulf Büntgen et al., 'Cooling and Societal Change during the Late Antique Little Ice Age from 536 to around 660 AD', *Nature Geoscience* 9, no. 3 (2016):231–36.

³ John Haldon et al., 'Plagues, Climate Change, and the End of an Empire: A Response to Kyle Harper's *The Fate of Rome* (1): Climate', *History Compass* 16, no. 12 (2018).³

⁴ Harper, Kyle. *Climate, Disease and the Fate of Rome*. (Princeton University Press, Princeton, New Jersey 2017).

Constantinople acted as a centre for the disease of its time and soon all harbours of the Mediterranean were taken in by the Plague.

Until 2013 it was hypothesised by researchers, that the Justinian Plague pandemic was not Plague but a different disease altogether.⁵ But the recent genome sequencing of bodies allocated in southern France and Bavaria, Germany by the teams of Michaela Harbeck and Michel Drancourt found gene markers of *Yersinia pestis*, the bacteria responsible for the Plague in corpses dated from the Early Middle Ages. This confirmed the assumption that the pandemic had been caused by the Plague.

Since this discovery, *Yersinia pestis* has also been securely linked to other pandemics, spread through time, across the entire globe. The knowledge is insofar important, as the Justinian Plague pandemic is a major historical event and shaped our present in several ways. As it is visible in current times that pandemics are still an area of possibility, modern researchers have been arguing that the next outbreak of the Plague is very much possible.⁶ The recent Covid-19 pandemic should have shown us, that in-depth knowledge of diseases is always important.

While the Second Plague Pandemic in the late Middle Ages is a topic of great research, the first Plague Pandemic was seldom academically discussed. The origin of modern Plague research lies with Alfred von Kremer, author of the 1880 Near Eastern *Kulturgeschichte*. A lack of medical understanding, insofar as the disease had not yet been scientifically described, made the research vague and in parts incorrect. This needs to be attributed to a lack of proper distinction between different diseases. The modern research done by Biraben-Le Goff (1969) and later Michael Dols (1974) should be considered the actual origin of proper modern Plague research. The First Plague Pandemic has therefore, despite its importance for world history, not been researched as well as it should be. The reason for the recent surge in interest about the First Plague Pandemic can be manifold. The convergence of important events, like the Plague and the rise of Islam, with the subsequent major territory loss for the Byzantine Empire may have led modern historians into more in-depth research. Important as well, are the emerging translations of Arabic, Greek, Latin and other source materials, giving more people the chance to study the Plague and its context more closely.

Simply because many things happened at the same time, the topics of Plague pandemics and Islamic conquest get mentioned in conjunction. And as they happened not only within the same timeframe, but within the same geographical area, both the Plague and the Muslim conquest must be looked at within this larger context of events, not only as singular events, but in their convergence as well. When wanting to read about the Plague Pandemic in the Middle East, Lester K. Little is probably one of the most important authors

5 Michaela Harbeck et al., 'Yersinia Pestis DNA from Skeletal Remains from the 6th Century AD Reveals Insights into Justinianic Plague', *PLOS Pathogens* 9, no. 5 (2 May 2013)

M. Drancourt and D. Raoult, 'Molecular History of Plague', *Clinical Microbiology and Infection* 22, no. 11 (1 November 2016):911–15.

6 M Thomas P Gilbert, 'Yersinia Pestis: One Pandemic, Two Pandemics, Three Pandemics, More?', *The Lancet Infectious Diseases* 14, no. 4 (1 April 2014):264–65.

and contributors to the discussion. In his compendium *Plague and the End of Antiquity: The Pandemic of 541-750* he and fellow historians like Hugh Kennedy and Michael Morony discuss the Pandemic from different angles and in different areas of the Mediterranean and beyond. Their research remains the basis for many fellow researchers, as their interdisciplinary approach is valuable for many areas of research, such as economy, social life or politics. While they introduce the work of bacteriologists like Alexandre Yersin and Kitasato Shibasaburō, the main sources remain written accounts of the Plague in the main four languages in the 6th and 7th century Levante: Arabic, Greek, Latin, and Syriac. Their work is therefore historical.

For a pandemic to build up, a main carrier is necessary to spread the disease between different places. The main carrier of the Plague since the 6th century has been the rat, and their fleas. As they can be found foraging within the cities' trade warehouses, they are easily moved when wares are traded. With international trade as an important economic pillar, the export and consequential import of rats led to an increase of Plague. The rats, as main distributors of the disease, stand in a direct link to food, humans and sickness. Furthermore, as rats eat the grain and legumes, they live close to humans. This makes them prime distributors of disease, as their death leaves the fleas looking for a new host, which they find in humans living nearby. While humans are not the fleas' primary target, a lack of other host animals forces the fleas to alternate to humans, thus infecting them.

At this point, I want to step away from the biological background and more towards human reasoning. Most researchers look at the Plague as a factor exerting some influence on the economy, politics, military, religion, and social life. Lawrence Conrad wrote a very conductive PhD research about the First Plague Pandemic, with a concentration on the demographic and social impact within certain countries.⁷ He makes a great case for the long-term effect of Plague on the sedentary people in the Middle East, and how political decisions, like taxation-percentages rising, influenced not only the agricultural sector but the overall dispersion of people as well. His understanding of the Plague paints a picture of not only the social change, but the struggles that led normal people to flee from their homes and the subsequent demographic change in the Middle East. His PhD thesis constitutes a very important step into understanding the struggles of normal people, instead of only the leading upper circles.

I want to take this a step further and look for evidence that this demographic change eased the Islamic conquest. Yizhar Hirshfeld's research shows that repeating climatic changes shook urban development and caused migration, and thus demographic change. He links the natural changes with man-made social constructs such as economy or politics.⁸ Many researchers often look at the spoils of war, and how war shapes a community. The displacement, due to famine could have weakened the state of the people in the Levante. Adding to that the rats infecting already weak and sick people, it is possible that the Plague and its background could have eased the way for the Islamic conquest.

⁷ Lawrence Irvin Conrad, 'The Plague in the Early Medieval Near East' (PhD thesis, Princeton University, 1981).

⁸ Hirschfeld, Yizhar. "The crisis of the sixth century: climatic change, natural disasters and the Plague." *Mediterranean Archaeology and Archaeometry* 6.1 (2006):19-32.

Military influence can be seen as twofold. On the one hand, the emergence goes hand in hand with changing political agendas. This is because the Plague killed not only normal people, but leaders and commanders as well, leaving society struggling to fill the positions. On the other hand, the military was, due to its physical closeness, often a greater subject to the Plague death toll as well. Additionally, the famine created by the Little Ice Age meant people left their homes to find more food, thus creating more famine in further regions of the Levante. This can be seen in Hugh Kennedy's research.⁹ The military was used to stop the migration of people and at the same time expand the state.¹⁰ This goes hand in hand with Sevket Pamuk and Maya Shatzmiller's research.¹¹ Their research has successfully linked the Plague to monetary wages. Due to a lack of people, wages rose, as labour was more than ever of the essence to rebuilt society. This can be seen as another economic influence within the Plague pandemic.

All those publications and topics I have introduced so far shine a light on how the communities in the Near East struggled with the Plague pandemic. A lack of food, changing climate, social unrest and the deadly disease influenced the society in this region. And all this happened in the same context as the birth of Islam. During the 7th century, when the Plague had already influenced the Mediterranean and the Middle East, Islam arose in the Arabian Peninsula. While the history of both events is often looked at through different angles, they do have to be seen as a continuation of social and demographic change. Sizgorich makes a case for the importance of the background of the Islamic Umma, or community, and to see this change in the dialogue that happened between the people in the Middle East in and before the 7th century.

As the topic of the Islamic conquest and the history of Islam are a large chapter in human history that is embedded in the history of the Middle East and many states and kingdoms, the research is manifold. Research on the Muslim conquest has been flourishing since the 20th century, with many western scholars either focusing on a specific time, a geographical place or the intertwining history of people and leaders. Hugh Kennedy and Robert Hoyland are two of the main modern researchers who have done extensive research on the conquest.¹² They, and preceding researchers, have successfully put together a timeline of the Conquest with the help of literary and archaeological source material. Interestingly, the literary sources need their origin vetted, to see the political and religious background of the historian writing down the story of the conquest. By that I mean, that a Muslim historian will depict the history of conquest in a very different light than a Christian or Zoroastrian historian.

⁹ Hugh Kennedy, *The Great Arab Conquests*.

¹⁰ Hugh Kennedy, *The Great Arab Conquests: How the Spread of Islam Changed the World We Live In* (London: Phoenix, 2008).

¹¹ Pamuk, Şevket, and Maya Shatzmiller. "Plagues, wages, and economic change in the Islamic Middle East, 700–1500." *The Journal of Economic History* 74.1 (2014):196-229.

¹² Hugh Kennedy, *The Great Arab Conquests*.

Robert G. Hoyland, *In God's Path: The Arab Conquests and the Creation of an Islamic Empire* (Oxford University Press, USA, 2015); Robert G. Hoyland, *Arabia and the Arabs: From the Bronze Age to the Coming of Islam* (Psychology Press, 2001); Robert G. Hoyland, 'Early Islam as a Late Antique Religion', in *The Oxford Handbook of Late Antiquity*, (2012).

It is, therefore, important to know the source's affiliation. Primary source material on the Muslim conquest is, due to mostly time itself and the general non-literacy of many of the people, very rare. Literary sources are often written within a scholastic background, of contemporary researchers and historians travelling, or of court affiliated people writing down personal notes.

All these different disciplines explain in passing the influence of the Plague pandemic on the Muslim conquest. But in my opinion, there is a gap on the actual, factual influence on the emerging religion. More All those angles shape my master's thesis' research question into the following: How was the Justinian Plague pandemic an influence on the Muslim conquest in the 7th century within the areas of Syria and Palestine? The goal of this thesis is to study the 7th century Middle East towards the relationship between the Plague and the Muslim conquest. Can there be found instances that link them with each other, events where both events influence each other? I will shine a light on both sides, and on research source materials that bring both events into convergence. To do this, I will research within contemporary primary sources. As my linguistic skills do not include Syriac, Ancient Greek, Latin, and my Arabic is not distinguished enough, I will do this research within academic translations of those texts. Due to my link of the Plague and Islamic conquest, many sources have a Muslim background. But as a Muslim view on the major event of the Muslim conquest is a biased view, outside descriptions such as Christian sources are necessary to form a coherent picture.

The main sources I will use are the literary sources written by the contemporary Byzantine historian Procopius of Caesarea and John of Ephesus. These scholars have been eyewitnesses to the first outbreak of the Plague, first in Caesarea, and later in Constantinople. These literary sources must be considered carefully, as we do not know their motivation for their works, nor do we know if their descriptions tend towards hyperbole, etc. We must ask ourselves, if these historians were aware in what a tumultuous time they were living, and if this is reflected in their work as well. Few non-literary sources survived from the 6th and 7th century, nonetheless I will discuss the opportunities that non-literary sources can bring in the first chapter. Due to their small sample size, those sources cannot form a distinct conclusion regarding the influence of the Plague on the Muslim conquest.

The first chapter will bring light to the background of the Plague, especially the scientific side of recent Plague research. My background in medicine and biochemistry offers me a unique view into the basic building blocks of Plague, furthering the understanding on the spread of the disease. With different angles, the goal of chapter one is to gather knowledge about the first Plague pandemic and its' *modus operandi*.

The second chapter's goal is to give insight into the Muslim conquest. I will gather information about the beginning of the Conquest, the main actors involved in it and the larger path the Muslims took through the Middle East. My focus will lie on the people involved, especially military leaders of different parts of the Muslim army.

The third chapter will merge the information from these two chapters into the wider picture i.e., the Middle East in the 7th century. As primary, translated source material is scarce,

the goal is to find instances, where both the Muslim conquest and the Plague step into a relationship with each other. Do we have succinct primary sources on both events, and what are the consequences of the convergence of the Plague and the Conquest?

The source materials for the Muslim conquest in congruence of the Plague are even scarcer than the Plague Pandemic literature. The third chapter relies mostly on the Muslim historian al-Azdī.¹³ The 8th-century scholar al-Azdī is believed to be the earliest Muslim historical account of the conquest of Syria, introducing not only major military leaders, but also their relations and how and when they sieged which city on their way through the Middle East. The *futuh al-shams*, the conquest of Syria, is how al-Azdī narrates the military movements from 633 to 641, therefore including the reign of caliphs Abū Bakr and ‘Umar. Due to his religious affiliation with the conquest, his accounts must be looked at within their background.

¹³ Jens Scheiner, *The Early Muslim Conquest of Syria : An English Translation of al-Azdī's Futūḥ al-Shām* (London, 2020).

Chapter 1: The Origin of the Plague Pandemic

The Plague was and still is a feared disease, that changed the course of history. The beginning of the first Plague Pandemic in the summer of 541 is, within scholarly circles, often recognized as the end of antiquity.¹⁴ But where did this disease come from, and why did it erupt in the 6th century, in such an explosive way? As the purpose of my thesis is to understand the intersection of the Plague and Muslim conquest, and the importance and influence of the former within the social history of the Levante, the aim of this chapter is fourfold. To understand the long-term influence of the Plague, the focus of this chapter is to understand the Plague itself, the biological and molecular makeup, the consequences of the biology, and the social history it is embedded in. Many answers can be found in disciplines outside of history, and it is those I want to examine further in this chapter.

To understand the Plague, I will briefly discuss the biological basis of this disease and give a short account of the history of this bacterium, explaining how and from where it spread to the Mediterranean basin. However, not only does biology play a role in the spread of the Plague, but external factors, such as weather patterns, must be considered as well, to understand the bigger picture of the Plague. Within the area of biological and natural influences, meteorology also helps to explain the enormous and rapid spread of the Plague. I will investigate how uncommon, global climatic conditions in late Antiquity contributed to the spread of the Plague. The carrier of the Plague and one of the major visual representations, the rat, I want to discuss as well, as its migration patterns and ectoparasites are the foundation for Plague distribution. Lastly, I devote this chapter to the human history of the Levant before the 7th century, putting the outbreak of the Plague into the larger framework of Byzantine social history.

While those topics seem rather unrelated within a thesis of historical purpose, they all abide by the same status, namely, they form the basis for the Plague. Meteorology and the successive weather anomalies form the groundwork for social history, as they influence political and social life. The topics of biology, rodents and parasites form the basis for the Plague as a disease, explaining the severity of this disease and its *modus operandi*. All of them together, thus, form a coherent unit of background knowledge that contributes to this major event in human history.

Byzantine Weather

Weather and weather phenomena have always played a major role in human history. While our modern understanding of climate change is influenced by recent increases in change due to man-made factors, the effect of climate change is not new. The Roman, and later Byzantine, Empire falls into a time in which climate was merciful. According to Kyle Harper, the Romans

¹⁴ Jo N Hays, *Plague and the End of Antiquity: The Pandemic of 541-750* (Cambridge University Press, 2007).
James D Howard-Johnston, *East Rome, Sasanian Persia and the End of Antiquity: Historiographical and Historical Studies*, vol. 848 (Ashgate Publishing, Ltd., 2006).

were lucky.¹⁵ As we look at climate change patterns on a large scale, within the Holocene (10.000 BC-today), the Roman Climate Optimum (200 BC-AD 150), that falls into the foundation of the Empire was especially prosperous, warm and wet.¹⁶ But as climate change is cyclic, when warm and cold period alternate, the RCO turned towards the Late Antique Little Ice Age (LALIA), that occurred 450-700. While temperature was already dropping, volcanic events aggravated the situation further. For Harper, the link between the Climate Change and human history is an *exogenous* factor, as the climate transcends all other man-made structures.¹⁷

As we can see, knowing the Climate of a Period and how this stand within the whole climate system is of utmost importance to understanding history. While Harper advocates for a periodisation of climate and the events that coincide with them in humanity, as it gives a good overview on the exogenous factor, other researchers such as John Haldon think that a periodisation would over-simplify these large and intricate processes. Haldon argues, that while climate change is an important factor for human history, it needs to be considered with social evolution, political change and economic developments, as all these factors influence each other multilaterally.¹⁸

100 years into the LALIA a row of volcanic outbreaks ruptured the fragile system even further. While smaller volcanic eruptions often have less or no impact on human history, the year 536 shows a volcanic event with major consequences.¹⁹ Volcanos can erupt in several different ways, due to their geographical position, their geological makeup and the size of their magma chamber.²⁰ Some eruptions spew rocks and solid matter into the air, while others spread dust and sulphates into the atmosphere.²¹ However, although volcanic eruptions represent a rather explosive change in nature, gradual changes can be seen all the time, when cooler and dryer periods relieve warmer, wetter weather conditions.²² Warmth and humidity are desirable for agricultural purposes, as they promote larger plant growth, therefore supporting the agricultural sector and its place in the economy of states.

When looking at the weather phenomena in the 6th century, what is coined 'the dust veil year' appears as one of those unusual happenings. The description of the dust veil can be traced back to the outcome of a major volcanic eruption, where not only larger bedrock was catapulted into the air, but smaller particles as well. This created a thin layer of particles in the air, disrupting the sun from reaching the ground, thus changing the weather and the

¹⁵ Kyle Harper, *The Fate of Rome: Climate, Disease, and the End of an Empire*, The Princeton History of the Ancient World 2 (Princeton, NJ: Princeton University Press, 2017).14

¹⁶ *ibid.*15

¹⁷ *ibid.*15

¹⁸ John Haldon et al., 'Plagues, Climate Change, and the End of an Empire: A Response to Kyle Harper's *The Fate of Rome* (1): Climate', *History Compass* 16, no. 12 (2018).3

¹⁹ Ann Gibbons, 'Eruption Made 536 "the Worst Year to Be Alive"', *Science (American Association for the Advancement of Science)* 362, no. 6416 (2018):733–34

²⁰ Katharine Cashman and Juliet Biggs, 'Common Processes at Unique Volcanoes—a Volcanological Conundrum', *Frontiers in Earth Science* 2 (2014):28.

²¹ *ibid.*28

²² Ulrich Beck, *The Metamorphosis of the World: How Climate Change Is Transforming Our Concept of the World* (John Wiley & Sons, 2016).

growing cycle of plants.²³ The dust veil in the years 536/537 is suggested to be traced back to a volcanic eruption in either North America or Iceland.²⁴ The traces found in ice cores from the Swiss Alps suggest two volcanic eruptions within 5 years.²⁵ This eruption spewed loose matter into the atmosphere, darkening the sky with a thin layer of dust, propelled by wind blowing across Europe and Asia. This dust brought on weather, that would influence the northern hemisphere dramatically.²⁶ Sources from the Mediterranean to China report the same strange phenomena in the same year. The earlier mentioned historian Procopius of Caesarea wrote:

And it came about during this year that a most dread portent took place. For the sun gave forth its light without brightness, like the moon, during this whole year, and it seemed exceedingly like the sun in eclipse, for the beams it shed were not clear nor such as it is accustomed to shed. And from the time when this thing happened men were free neither from war nor pestilence nor any other thing leading to death. And it was the time when Justinian was in the tenth year of his reign [536/37].²⁷

John of Ephesus, a leader of the Syriac Orthodox Church, who lived from 507 to 586 in Constantinople and Asia Minor, wrote:

In the year 848 [536/37 CE], there was a sign in the sun the like of which had never been seen and reported before in the world. If we had not found it recorded in the majority of proved and credible writings and confirmed by trustworthy people, we would not have recorded it; for it is difficult to conceive. So it is said that the sun became dark and its darkness lasted for one and a half years, that is, eighteen months. Each day it shone for about four hours, and still, this light was only a feeble shadow. Everyone declared that the sun would never recover its original light. The fruits did not ripen, and the wine tasted like sour grapes.²⁸

Procopius of Caesarea and John of Ephesus both aptly describe how the sunlight decreased. John of Ephesus describes it in terms of length “shone for about four hours” and intensity “this light was only a feeble shadow”. Due to the aforementioned data we have now,

²³ Samuli Helama et al., ‘Volcanic Dust Veils from Sixth Century Tree-Ring Isotopes Linked to Reduced Irradiance, Primary Production and Human Health’, *Scientific Reports* 8, no. 1 (2018): 1339–12.

²⁴ Ann Gibbons, ‘Eruption Made 536 “the Worst Year to Be Alive”’, *Science (American Association for the Advancement of Science)* 362, no. 6416 (2018): 733–34.

²⁵ *ibid.* 733–4

²⁶ *ibid.* 733–4

²⁷ Antti Arjava, ‘The Mystery Cloud of 536 CE in the Mediterranean Sources,’ *Dumbarton Oaks Papers* 59 (2005): 73–94, <https://doi.org/10.2307/4128751>.

²⁸ Antti Arjava, ‘The Mystery Cloud of 536 CE in the Mediterranean Sources.’ 78–79

researchers have linked this lack of sun with the volcanic outbreak.²⁹ Therefore, the decrease of the sun is a symptom of how the dust particles in the atmosphere formed a barrier in the air, reflecting the sun into space, leaving the earth to cool down.³⁰ This hinders agricultural growth, which can be seen in several dendrochronological studies. Büntgen's study of tree rings, as well as the Ephesus' text "the fruits did not ripen" show a lack of plant growth.³¹ Büntgen's research concluded that the dust veil event had a long-reaching influence on flora and fauna. The tree rings show how the climate changed in specific years.³² The years 536 and 537 show a lowered growth, which needs to be interpreted as a symptom of the volcanic eruption.³³ The decreased growth can be explained by the lack of sunshine, that hindered the plants' photosynthesis.³⁴

Just after nature recuperated from the dust veil event, a second volcanic eruption cooled the northern hemisphere even further by up to 3 degrees Celsius.³⁵ The repercussions of the agricultural crisis are manifold. During a time, when most people relied on agriculture, a lack of sunshine was a direct link to famine. With a plant-based nutrition, a sudden lack of growth cuts harshly into the diet of people. With a lack of agricultural produce, people did not have a sufficient nutrition to support themselves.

These volcanic eruptions may have facilitated the spread of the plague in three ways. Firstly, those volcanic eruptions changed the existing growth cycle of not only the flora and fauna, but of all agriculture.³⁶ This interfered with food supplies in mostly the northern part of the Mediterranean.³⁷ Due to a lack of agricultural produce, the population weakened. This made them more susceptible to diseases.³⁸

Secondly, the dust veil of 536/37 and the following volcanic eruptions changed the atmosphere in such a way, that not only plants were affected by the change of radiation, but humans as well. The lack of UV-Rays, which were now reflected into space by the dust, posed a threat to human health. UV-B rays are needed to produce Vitamin D in the body, essential for life.³⁹ A lack of UV-B also weakened the immune system further, making people more susceptible to the Plague.⁴⁰

²⁹ Bo Gräslund and Neil Price, 'Twilight of the Gods? The "Dust Veil Event" of AD 536 in Critical Perspective', *Antiquity* 86, no. 332 (2012): 428–43.

³⁰ Helama et al., 'Volcanic Dust Veils from Sixth Century Tree-Ring Isotopes Linked to Reduced Irradiance, Primary Production and Human Health'.

³¹ *ibid.*

³² Büntgen et al., 'Cooling and Societal Change during the Late Antique Little Ice Age from 536 to around 660 AD'.

³³ *ibid.* 231-6

³⁴ *ibid.* 231-6

³⁵ Helama et al., 'Volcanic Dust Veils from Sixth Century Tree-Ring Isotopes Linked to Reduced Irradiance, Primary Production and Human Health'.

³⁶ Antti Arjava, 'The Mystery Cloud of 536 CE in the Mediterranean Sources'. 78-9

³⁷ Harper, *The Fate of Rome*. 174

³⁸ Helama et al., 'Volcanic Dust Veils from Sixth Century Tree-Ring Isotopes Linked to Reduced Irradiance, Primary Production and Human Health'. 8

³⁹ *ibid.* 8

⁴⁰ *ibid.* 8

Finally, the dust veil shook already existing social norms, due to this lack of food.⁴¹ As food supplies were scarcer in the Northern Mediterranean, people migrated towards the South in hopes of more food. This massive input of new people into a society that fared barely better than their Northern neighbours disrupted the Middle Eastern societies as well. The lack of food and the unstable political and social situation made people more susceptible to disease, easing the way for the Plague.

Biological Origins

The history of the Justinian Plague itself starts in Pelusium, an Egyptian port east of the Nile delta.⁴² According to Procopius, the Caesarea-born Byzantine scholar (c. 500-565), the epidemic can be seen to have moved in two different directions. Alexandria and Egypt were subjected to the Plague as well as the borders of Egypt and further away Palestine. From there it spread over the entire Byzantine Empire.⁴³

Traditionally, the general origin of the Plague was placed in Central Africa.⁴⁴ And while this assumption is understandable under the then-given information, it is false.⁴⁵ The emergence of the Plague in the harbour of Pelusium and the ties this city had with the international economy and trade explains the Central-Africa-thesis. Scholars assumed that the commerce between the nations of Byzantium and Aksum at both the end and the beginning of the Nile brought on the Plague.⁴⁶ As the Byzantine Empire stood in close commercial relation with the Kingdom of Aksum, it too believed that Aksum had imported the disease from Central Africa.⁴⁷ Recent biochemical studies of different global strands of Plague show the genetic relations between historical finds worldwide.⁴⁸ These affiliations support the thesis that the Plague originated in China, and that the Plague from Central Africa is a strand of Plague within the wider family of this disease.⁴⁹ I will further explain this reasoning later on in this chapter.

Procopius of Caesarea as a source is valuable to me, as he was an established historian of his time, whose descriptions show a varied and precise view into the happenings during his lifetime. While his writing style emulated Attic Greek texts, his written works shed an

⁴¹ Harper, *The Fate of Rome*. 227

⁴² Procopius, *History of the Wars*, 2: xxii–xxiii, in Procopius, trans. H. B. Dewing (New York: Macmillan, 1914), 1:451–73.

⁴³ *ibid.* 451–73

⁴⁴ George D. Sussman, 'Scientists Doing History: Central Africa and the Origins of the First Plague Pandemic', *Journal of World History* 26, no. 2 (2016): 325–54.

⁴⁵ Mark Achtman et al., 'Yersinia Pestis Genome Sequencing Identifies Patterns of Global Phylogenetic Diversity', *Nat Genet* 42, no. 12 (2010): 1140–43.

⁴⁶ Sussman, 'Scientists Doing History'. 347

⁴⁷ *ibid.* 347

⁴⁸ Mark Achtman et al., 'Yersinia Pestis Genome Sequencing Identifies Patterns of Global Phylogenetic Diversity', *Nat Genet* 42, no. 12 (2010): 1140–43

⁴⁹ *ibid.* 1140–3

important light on 6th century Byzantine Palestine.⁵⁰ Within different genres, he represents the view of the higher-ranking citizens of Byzantium. He was a witness of this major epidemic and had at this point already created numerous works about other recent events as well, like the volcanic outbreak I will talk about further on, or the wars that the Byzantine Empire was involved in.⁵¹

While I have already started explaining that the Plague did not originate in Central Africa, its sudden appearance in Egypt in the mid-6th-century posed an unforeseen threat to humanity. Recent biochemical and genetic research into the history of Plague (*Yersinia pestis*) shows not only the larger scope of epidemics, but brings certain clarity to biological origins and how those links into the human history of epidemics and diseases.⁵² The team of the Max Planck Institute in Berlin around Mark Achtman, created, in 2011, the first global phylogenetic tree for all strains known as Plague.⁵³ According to this research, all strains and their direct relatives can be found either still alive, or in graves in China and the Tibetan Plateau.⁵⁴

I am aware that the topics of genetics and biochemical research are not necessarily studied by historians. Because of that, I will briefly explain the idea behind phylogenetic trees and how they present Evolutionary Theory. As Plague is a bacterium, its lifetime is shorter than, for example, that of mammals. Therefore, genetic change in the form of mutations happen at a faster rate.⁵⁵ Due to evolution, every organism, virus and bacterium has an origin, an ancestor. Within a phylogenetic tree, those ancestors are represented by the tree trunk.⁵⁶ While replicating and living, mutations change the genetic code of the organism in slight ways.⁵⁷ Those mutations are the tree branches.⁵⁸ In the beginning, they branch out of the trunk but can branch out of further branches as well. Every primary branch represents a change within the genetic code, which a secondary branch internalizes as well, adding further changes to the code.⁵⁹ Therefore, every final branch is slightly different from the other(s), but can be traced back to the tree trunk.⁶⁰ In this metaphor, the plague victims are the leaves on the tree. They all died of Plague, but different mutations in different areas of the world at different times in history. This fact is, therefore, important to know as it explains the biological, as well as geographical origin of diseases.

⁵⁰ Christopher Lillington-Martin, *Procopius of Caesarea: Literary and Historical Interpretations* (Taylor & Francis, 2017).2-5

⁵¹ *ibid.*2-5

⁵² Achtman et al., 'Yersinia Pestis Genome Sequencing Identifies Patterns of Global Phylogenetic Diversity'.

⁵³ *ibid.*40-3

⁵⁴ *ibid.*40-3

⁵⁵ Jeremy W Dale, Jeremy W Dale, and Simon F Park, *Molecular Genetics of Bacteria* (John Wiley & Sons, 2004).40

⁵⁶ Ivica Letunic and Peer Bork, 'Interactive Tree Of Life (ITOL): An Online Tool for Phylogenetic Tree Display and Annotation', *Bioinformatics* 23, no. 1 (1 January 2007):127–28.

⁵⁷ Carl Woese, 'Interpreting the Universal Phylogenetic Tree', *Proceedings of the National Academy of Sciences* 97, no. 15 (2000):8392–96.

⁵⁸ *ibid.*92-6

⁵⁹ *ibid.*92-6

⁶⁰ *ibid.*92-6

If we compare Plague victims all over the world, several major strands, or primary branches can be detected. If we can find all those primary branches of Plague in an area, the chances are high, that this is the source of the disease.⁶¹ If we find several secondary branches of a singular primary branch in an area, it cannot be the origin. While archaeological sites in Europe, Africa or the Levant often show one or two branches of the Plague, China provides all primary versions of the plague genome.⁶² Due to this fact, the Max Planck Team is sure that the origin of this disease can be found in the Chinese highlands.⁶³ To understand this claim, I want to shortly explain the scientific method they used. Achtman et al. found four different strains of *Yersinia pestis* globally. When comparing them with each other, the team was able to recreate (backwards) the 'road' the disease took.⁶⁴ Information wise, the Plague victims represent the leaves, we do not have genetic code only from the branches. Therefore, we need to look at the leaves and coordinate them with the different branches they are on. As branches split themselves up along the way, we can trace back the genetic changes, as they cannot be taken back.⁶⁵ Mutations always evolve further, never back.⁶⁶ The team worked themselves from the outside inwards, back through time towards the original bacterium.⁶⁷

Therefore, their thesis holds, that the Plague cannot have come from central Africa, as only one branch of the Plague can be found there, most likely from a later period in time as well.⁶⁸ Along with the mutations within the disease itself, comes a genetic change within the human immune system.⁶⁹ The immune system can be, up to a certain extent, be transmitted from mother to child.⁷⁰ Families that survived the plague before, are much more likely not to get sick or have lesser symptoms, than families who had never come into contact with the disease.⁷¹ The immune system relies on the body surviving the disease, or having the mothers' body surviving it.⁷² Immune response and the creation of immunological keys within the human blood save further generations from developing a disease response either at all, or in its full spectrum of symptoms.⁷³ As the Plague was a new disease in the Middle East in the 6th century, and as it differentiated itself into several different variants, the people living in and around the Mediterranean had no anti-genes to profit from yet.

⁶¹ Achtman et al., 'Yersinia Pestis Genome Sequencing'.40-3

⁶² ibid.40-3

⁶³ ibid.40-3

⁶⁴ ibid.40-3

⁶⁵ ibid.40-3

⁶⁶ ibid.40-3

⁶⁷ ibid.40-3

⁶⁸ ibid.40-3

⁶⁹ Stephen T Smiley, 'Immune Defense against Pneumonic Plague', *Immunological Reviews* 225, no. 1 (2008): 256–71.

⁷⁰ Lars Å Hanson et al., 'The Transfer of Immunity from Mother to Child', *Annals of the New York Academy of Sciences* 987, no. 1 (2003):199–206.

⁷¹ ibid.199-206

⁷² Smiley, 'Immune Defense against Pneumonic Plague'.256-71

⁷³ ibid.256-71

Rats, Fleas and Lice

While the Plague itself is a hazardous disease, it can only be transmitted interpersonally in specific cases, like pulmonary plague.⁷⁴ In most cases, however, a transmitting agent is needed. And although rats and lice are seldomly titled a major player, in this case, they are.⁷⁵ According to recent news, a case of Plague occurred in 2019 in North China, when a couple from the area of Inner Mongolia ate a marmot.⁷⁶ This shows, that the Plague bacteria still live in the 21st century, in areas of low human density.

During the 6th and 7th centuries, the rat provided the ideal hunting ground for Plague infected fleas and lice.⁷⁷ The rat itself was immune to the lice and the diseases it carried. As lice feed on their prey by biting them, a disease in the lice's immune system spreads to the prey and infects it with the disease as well.⁷⁸ Thus, the rats themselves were not the direct cause of the spread, but the lice they carried within their fur.⁷⁹ The dependence between *Y. pestis* and rodent-based lice developed later. A direct contact between humans and rodents was necessary to transfer the Plague.⁸⁰ This is insofar important, as it reduces the point of transmission to only lice found on rodents, therefore reducing the number of victims.⁸¹

As lice in themselves are not long-distance reaching animals, the hosting animal's history and dispersion are just as important. The history of rats has only recently been made a point of focus in studies into the spread of the Plague, so much so that there have even been discussions about whether rats even lived in the Mediterranean Antique.⁸² As there is no Greek word for rat, but only for mouse, all rodents at one time were summarized under the same helm.⁸³

One thing humans and rats had in common in the 6th century was that they both carried lice, either in their fur/hair or in their clothes.⁸⁴ As lice are one of the oldest human ectoparasites, their link between epidemics and humans is just as close. As *Y. pestis* cannot survive long-term within the human body without causing an outbreak, the main factor for spreading the disease was lice.⁸⁵ Those lice, living naturally within the fur of rats, jump to the human body when their primary host is not sufficient anymore, mostly due to death.⁸⁶ Then

⁷⁴ Burrows, TW. 'Virulence of Pasteurella Pestis and Immunity to Plague'. *Ergebnisse Der Mikrobiologie Immunitätsforschung Und Experimentellen Therapie*, 1963, 59–113.

⁷⁵ Michael McCormick, 'Rats, Communications, and Plague: Toward an Ancient and Medieval Ecological History', *Journal of Interdisciplinary History* 34, no. 1 (2003):1–25.

⁷⁶ Christoph von Eichhorn, 'Beulenpest - Was über die Pest-Fälle in China bekannt ist', *Süddeutsche.de*, accessed 1 March 2021, <https://www.sueddeutsche.de/gesundheit/pest-china-lungenpest-ausbruch-1.4689661>.

⁷⁷ McCormick, 'Rats, Communications, and Plague'.1

⁷⁸ Rémi Barbieri, Michel Drancourt, and Didier Raoult, 'The Role of Louse-Transmitted Diseases in Historical Plague Pandemics', *The Lancet Infectious Diseases* 21, no. 2 (February 2021): e17–25.21

⁷⁹ *ibid.*20

⁸⁰ *ibid.*18

⁸¹ *ibid.*18

⁸² McCormick, 'Rats, Communications, and Plague'.4

⁸³ *ibid.*4

⁸⁴ Rémi Barbieri, et.al, 'The Role of Louse-Transmitted Diseases in Historical Plague Pandemics'.19

⁸⁵ Barbieri, Drancourt, and Raoult, 'The Role of Louse-Transmitted Diseases'.19-20

⁸⁶ *ibid.*19-20

the lice infect the other lice already living on the body and pass on the bacteria via bite and excrement.⁸⁷ When the host dies, the lice either die when there are no proximate new hosts, or they are passed on to the next host, which, in the case of lice, occurs mostly via infected textiles.⁸⁸

While the lice are the major vector for spreading the disease, the rodents (mostly rats) are the main carrier for these infected lice.⁸⁹ An increase in natural predators may have influenced the numbers of rats, stopping the Plague in 770.⁹⁰

Byzantine Empire

The history of the Plague and the social history of the Byzantine Empire is often depicted separately, but they existed in the same timeframe and geographical space, thus influencing each other. In the face of powerful and major Byzantium, the history of the Justinian plague unfolds itself. Even the name Justinianic Plague refers to the Byzantine Emperor Justinian I (r. 527-565), who ruled these lands during the first wave of Plague in 541.⁹¹ Historians have named the first wave of the Plague Pandemic after Justinian, as he was the most prominent survivor of the Plague in that time.⁹²

As I mentioned earlier, the story of the Plague starts in Pelusium in 541, when the harbour city in the Nile Delta was first struck by *Y. pestis*.⁹³ Pelusium, as a harbour, acted negatively twofold in the case of the Plague. First, as a major exporter of grains, Egypt was predestined to stand in close relations to Constantinople, as the Northern Byzantines experienced major famine from 536 on.⁹⁴ Secondly, the Port of Pelusium was the final destination of merchants travelling between the Kingdom of Aksum and the Mediterranean, therefore being targeted early on by the Plague.⁹⁵ Historians have been arguing that Aksum, with the access via the Red Sea, stood in economic trade with South Asia.⁹⁶ The economic history of Aksum and its high-born population have been topics of interest, as their background for trade and economic partners differentiated from Egypt or the Mediterranean. In the end, Aksum's global connections led to an import of the Plague with boats from the East.⁹⁷

The location, the close relationships in international trade, and the importance of Pelusium as a harbour within the Byzantine Empire, influenced spread the Plague. The

⁸⁷ *ibid.*19-20

⁸⁸ *ibid.*19-20

⁸⁹ *ibid.*17

⁹⁰ McCormick, 'Rats, Communications, and Plague'.22

⁹¹ 'Justinian I', in *Encyclopædia Britannica* (Encyclopædia Britannica Inc, 2020).

⁹² *ibid.*

⁹³ Lawrence I Conrad, 'The Plague in the Early Medieval Near East' (New Jersey, Princeton University, 1981).92

⁹⁴ *ibid.*102

⁹⁵ 347

⁹⁶ *ibid.*347

⁹⁷ Kostyrya, Inna Oleksandrivna. "Origins of modern diplomacy: Aksum, Syria and Bizantium between the West and the East." *Вісник Національної академії керівних кадрів культури і мистецтв* 3 (2018): 26-36.

practice of import and export was a common trade in the Byzantine Empire.⁹⁸ To supply the increasing population of the metropolis Constantinople with food, the import of grain from Egypt was a basic need for the city to function.⁹⁹ The import of grain from the Southern parts of the Empire has been a practice since the start of the millennium.¹⁰⁰ In Chronicles the import of those goods, as well as the price for the import, show its importance. These reports, the *Annona*, are divided in *Annona Civica* and *Annona Militaris*, i.e. expenses for the general population, and the military each.¹⁰¹ The *Annona* can be seen as the taxation Egypt had to deliver to Constantinople as a province of the Byzantine Empire.

For many, as a result of the large network of trade within the Mediterranean and the coasts, the sea provided a secure income.¹⁰² Because of state subsidies, the sea trade was the most lucrative form of commerce, and at the same time the most direct.¹⁰³ According to Diocletian, roman Emperor from 284-305, it was cheaper to transport grain across the Mediterranean Sea than to trade it via land routes for 75 miles.¹⁰⁴ We can see that the importance of trade was not only to secure the food supply for Constantinople, but that it was also, according to Bishop Augustine, one of the four main careers in the Empire.¹⁰⁵ The job was therefore lucrative, reputable and adventurous.¹⁰⁶

With Constantinople being the capitol of the Byzantine Empire, the city took in the place that Ancient Rome had once held. Under Justinian, the city got modernized, with many structures newly built.¹⁰⁷ One of these new structures was the new harbour of Constantinople. This modernisation made the city even more prominent in the Mediterranean trade, improving the chances of importing the Plague.¹⁰⁸ Once the new, artificial harbours at the Marmara Sea were finished, it is said to have been capable of holding 500 ships at the same time.¹⁰⁹ At the same time, other harbours in the Mediterranean were modernised as well, like the harbour of Antioch, or Caesarea in Palestine.¹¹⁰ Especially the influx of pilgrims in Caesarea led to a need of a bigger, improved harbour.¹¹¹ The Mediterranean was therefore not only a major trading hub, but transported people for all kinds of purposes as well.¹¹²

⁹⁸ *ibid.*394

⁹⁹ Harper, *The Fate of Rome*.205

¹⁰⁰ David Kessler and Peter Temin, 'The Organization of the Grain Trade in the Early Roman Empire', *The Economic History Review* 60, no. 2 (2007): 313–32.313-15

¹⁰¹ Angelo Segrè, 'Essays on Byzantine Economic History'394

¹⁰² Michael McCormick, *Origins of the European Economy: Communications and Commerce, A.D. 300-900* (Cambridge, UK, 2001).83

¹⁰³ *ibid.*84

¹⁰⁴ *ibid.*83

¹⁰⁵ *ibid.*84

¹⁰⁶ *ibid.*84

¹⁰⁷ Harper, *The Fate of Rome*. 205

¹⁰⁸ McCormick, *Origins of the European Economy*. 86

¹⁰⁹ *ibid.*86

¹¹⁰ *ibid.*86

¹¹¹ *ibid.*86

¹¹² *ibid.*86

Because of the rising famine, caused by the dust veil, in the mid-6th century, Constantinople had to rely further on the Annona, the grain import from Egypt.¹¹³ Once the city of Constantinople was infected with Plague, it acted as a disease distributor for the whole empire, due to its centralistic orientation.¹¹⁴ With that I mean that Constantinople was the central place for political, social and economic exchange, therefore everybody and everything leaving the city was potentially infected, carrying the disease from the city into the furthest corners of the Byzantine Empire. This explains the sheer speed with which the Plague was soon detected in the Mediterranean and the Middle East.¹¹⁵

While the Summer of 541 constitutes the start of the pandemic, the course it takes is swift and multi-directional.¹¹⁶ Many scholars have deciphered the exact movements of the plague, following not only sea routes, but also commercial and private land routes. I will not examine every single step the Plague took from 541 to 632, but it is nonetheless necessary to say, that Plague can often be found among major routes, following bigger populations and common trade routes. Archaeological research, especially in Syria, has found that while major cities were hubs for Plague, even the countryside was affected by the Plague, suffering major loss of life.¹¹⁷

Constantinople, as the capital of Byzantium and a major city with a harbour, suffered from the beginning of this disease.¹¹⁸ Approximately 300.000 people died within the first year of the Plague Pandemic, just in Constantinople.¹¹⁹ Historian Agathias (531-582), the successor of Procopius of Caesarea describes the happenings of the second wave in 542 in Constantinople:

During that year at the beginning of spring, a second outbreak of plague swept the capital, destroying a vast number of people. From the fifteenth year of the reign of the Emperor Justinian when the plague first spread to our part of the world it had never really stopped, but had simply moved from one place to another, giving in this way something of a respite to those who had survived its ravages. It now returned to Constantinople almost as though it had been cheated on the first occasion into a needlessly hasty departure.¹²⁰

For the history of the Plague in the Levante and Syria, only snapshots of outbreaks exist.¹²¹ While the beginning of the Plague can be traced back to singular cities within specific

¹¹³ *ibid.*104

¹¹⁴ McCormick, 'Rats, Communications, and Plague'. 14

¹¹⁵ Demetrios Argyriades, 'Administrative Legacies of Greece, Rome, and Byzantium', *International Journal of Public Administration* 21, no. 1 (1998): 109–26.

¹¹⁶ Peter Sarris, 'The Justinianic Plague: Origins and Effects', *Cont. Change* 17, no. 2 (2002): 169–82. 170

¹¹⁷ Hugh N Kennedy, 'Justinianic Plague in Syria and the Archaeological Evidence', 2006, 87–96.

¹¹⁸ Conrad, 'The Plague in the Early Medieval Near East'.99-101

¹¹⁹ George Kohn, *Encyclopaedia of Plague and Pestilence: From Ancient Times to the Present* (Infobase Publishing, 2007). 216-18

¹²⁰ *ibid.*128

¹²¹ Conrad, 'The Plague in the Early Medieval Near East'.

months, later accounts often state either general areas or cities within years. As the Plague circled the Mediterranean in about 18 waves, a Plague outbreak occurred approximately every 11-17 years, leaving obvious gaps in the later accounts.¹²²

In the end, the Plague had a great influence on the Byzantine Empire. Its precise, and fast working trade system worked against the Empire, as the stowaway rats became infected with Plague.¹²³ Within a short amount of time, all harbours in the Mediterranean had been infected by the Plague, while the black rats destroyed the already slim food supplies further.¹²⁴ The LALIA, the Late Antiquity Little Ice Age, would bring such cold and unrelenting weather to the Northern Mediterranean plants, that the population suffered from famine.¹²⁵ Additionally, the dust veil event suppressed the population's immune system further, opening up an even further ground for the emerging Plague Pandemic.¹²⁶ Altogether, the short food supplies and the Plague, in convergence with a centralistic and fast working Empire nurtured the basis for a Pandemic, that would, in the end, weaken the Byzantine Empire to oblivion.¹²⁷ The Byzantine Empire was, up until the 6th century a well-oiled cog, but the Plague was the sand that would slowly destroy the Empire from the inside out.

While the Byzantines, and a bit later the Persian Empire, suffered from major loss of lives, the Arabian Peninsula had its societal change. The following chapter will discuss the emergence of Islam and the subsequent Muslim conquest of the Middle East. Additionally, I will discuss key figures who played a major role both in the conquest and later in the plague as well.

¹²² Stathakopoulos, Dionysios. "Plague, Justinianic." In *The Oxford Dictionary of Late Antiquity*.: Oxford University Press, 2018.

¹²³ McCormick, 'Rats, Communications, and Plague'.7

¹²⁴ *ibid*.3

¹²⁵ Büntgen et al., 'Cooling and Societal Change during the Late Antique Little Ice Age from 536 to around 660 AD'.6

¹²⁶ *ibid*.6

¹²⁷ Ulf Büntgen et al., 'Cooling and Societal Change during the Late Antique Little Ice Age from 536 to around 660 AD',6

Chapter 2 - Early Muslim History

Syria and Palestine have, in the last 2000 years, repeatedly held the gaze of the world. Once rich and densely inhabited provinces of the Byzantine Empire, their cities changed over time from the ideal Roman *polis* to the Arabian *medina* we know now.¹²⁸ Most of the Middle East went through this transition, as a product of social and demographic change. This change began with the decrease of Byzantine power and the increasingly powerful Muslim conquest.

As the goal of my thesis is to research the influence that the Plague had on the Muslim conquest, the history of said conquest is going to be the focus of this chapter. The conquest has been a large chapter of history so far, with great attention to detail. The focus will, therefore, not lie on explaining the conquest in detail, but on building a basis for the potential Plague influence. I will concentrate on the area of Greater Syria and Palestine. The goal of this chapter is to understand how the Muslim armies were constructed, where the soldiers went and what implications this had for the Middle East. To understand the implications found in primary sources discussed in the third chapter, this chapter provides knowledge about people mentioned more elaborately later, and how their involvement in both the Muslim conquest and the Plague had consequences. It is, therefore, necessary to not only introduce key people, such as religious and military leaders, but their circumstances as well. Who were these people and how did they stand to Islam and the conquest? I aim to embed these questions into the larger context of the early Islamic history, and the modern state of research regarding this early history.

While the term Arab or Muslim conquest is often used interchangeably with the fact that the Middle East and North Africa were transformed into Muslim lands, the existence of Arabs in the Middle East was a given long before the conquest.¹²⁹ Cities in the Arabian Peninsula, as well as further North, such as the Syrian desert, showed early settlements of former Arabian nomads.¹³⁰ This interchanging lifestyle led to a mixture of cultures and origins in the cities North of the Peninsula as well. The major discerning point between the inhabitants of these lands was mostly their language, as Arabic speakers had spread over an area from the South of the Peninsula to the Euphrates and Jordan in the North.¹³¹ Within the Northern border of the Arabian Peninsula, the two kingdoms of the Jafnids and the Lakhmids existed until the 6th century.¹³² The Jafnids and the Lakhmids each had bonds to their neighbouring Empires. While the Jafnids managed the Syrian province of the Byzantine Empire, the Lakhmids were in direct contact with the Persian Empire.¹³³

¹²⁸ Hugh Kennedy, "From Polis to Madina: Urban Change in Late Antique and Early Islamic Syria," *Past & Present*, no. 106 (1985): 3-27.

¹²⁹ Hugh Kennedy, *The Prophet and the Age of the Caliphates: The Islamic Near East from the Sixth to the Eleventh Century* (London: Routledge, 2015). 13-14.

¹³⁰ Isabel Toral-Niehoff, *Al-Hīra: Eine Arabische Kulturmetropole Im Spätantiken Kontext* (Brill, 2014). 115

¹³¹ *ibid.* 115-6

¹³² Hoyland, *Arabia and the Arabs*. 79; 49

¹³³ Robert Hoyland, *Arabia and the Arab*. 79; 49

The Sixth and Early Seventh Century in the Middle East

The history of the Middle East must be considered in a constant flux. It is, therefore, interesting that many researchers, quite rigidly, divide its history according to their (individual) fields of interest. According to Averil Cameron, the rigid break we nowadays see in academic literature within the topics of Byzantine Empire and Early Islamic history is not as much a historical fact as it is a problem of periodisation.¹³⁴ To break apart the individual larger topics of late antiquity and Early Islam, a certain periodisation was used to differ these events from one another, but the history of the Middle East is much more fluid and gradual than often depicted. Recently, some efforts have been made by researchers of the late antiquity to further contextualise Islam in its origin, and to discuss whether it can be considered a child of the antique or was an Arabian-born religion put into the mindset of the late antiquity.¹³⁵

The historical narrative of the emergence of Islam and the Muslim conquest has, for a long time, been a popular topic within academic, as well as popular literary circles. It is, therefore, unsurprising that a large amount of work has been done on the different aspects of the conquest itself, Islam and their narratives within the historical background.

Based in a time when the Middle East was made up out of the Byzantine and Persian Empires and set against a background of general unrest due to Plague and a scarcity of natural resources, the Muslim conquest brought forth a new major player onto the political, social, and religious field of the Middle East. The Arabs themselves were, even before the 7th century, not only inhabitants of the Arabian Peninsula, but the adjoining lands as well.¹³⁶ As parts of the larger Byzantine and Persian Empire, the kingdoms of the Jafnid and the Lakhmid respectively included Arabs within their elite circles.¹³⁷ Many scholars, like Peter Pentz and Michael Morony, therefore, argue that the conquest should not be seen as a harsh incision into the history of the Middle East, but as a continuation of events that were already underway, i.e. Arabs had already widened their settlements, and the increase of Arabs in the Middle East was simply a continuation of that.¹³⁸

In the end, the two kingdoms of the Jafnids and Lakhmids fell due to the major upheaval caused by the long Byzantine-Persian war, that ravaged the area from 602-628.¹³⁹ The states of Arabic descent were first integrated into the larger Empires and then conquered by the Muslims shortly after.¹⁴⁰

¹³⁴ Averil Cameron, *Late Antiquity on the Eve of Islam* (New York: Routledge, 2017), XVI.

¹³⁵ Robin, Christian Julien, Robert Hoyland, and Stephen J Shoemaker. "Early Islam as a Late Antique Religion." In *The Oxford Handbook of Late Antiquity*, Vol. 1. (Oxford University Press, 2012)

¹³⁶ Isabel Toral-Niehoff, "Late Antique Iran and the Arabs: The Case of al-Hira," *Journal of Persianate Studies* 6, no. 1-2 (2013): 115-116.

¹³⁷ Greg Fisher, *Between Empires: Arabs, Romans, and Sasanians in Late Antiquity* (Oxford: Oxford University Press, 2011), 175-177.

¹³⁸ Peter Pentz, *The Invisible Conquest: The Ontogenesis of Sixth and Seventh Century Syria* (National Museum of Denmark, Collection of Near Eastern and Classical Antiquities, 1992); Morony, Michael G. *Iraq after the Muslim Conquest*. (Princeton, N.J. : Princeton University Press, 2015) 507-526.

¹³⁹ Howard-Johnston, James D. "The Persian Wars, 602–628." *The Encyclopedia of Ancient Battles* (2017): 1-15.

¹⁴⁰ Irfan Shahid, 'Ghassan', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), II:1020b.

It must be said here, that, while the Muslim conquest, in the long term, changed the main religion in the Middle East into Islam, the conquest itself was not necessarily an Arab one. This is so, firstly, because the Arabs often already lived in lands they had conquered as pagans, Christians, etc., and secondly, because not all people participating in the conquest were Arabs. However, on the other hand, were neither all those participating in the conquest devout Muslims, so either terminology does not fit the historical event and the make-up of the conquering army entirely correct.¹⁴¹ Although it took the Muslims until approximately the 11th century to convert most of the inhabitants of the Middle East and Persia, they were politically dominant, thus, a religious majority not necessary.¹⁴²

Key People in Early Muslim History

The birth of Islam is closely connected to the history of the Arabian Peninsula and the personal history of key figures, such as the prophet Muḥammad. Muḥammad ibn ‘Abd Allāh was born around 570 in Mecca and has been argued to be a merchant in the area.¹⁴³ Muḥammad as a person has been shrouded in mystery and there is a religious reluctance to humanise him i.e., portray him as an ordinary person.¹⁴⁴ However, unlike other religious figures such as Moses, Jesus or Buddha, we can be quite certain that Muḥammad existed and was the founder of Islam.¹⁴⁵

Within academia, and general publications, the life of Muḥammad has brought forth plenty of literature. Depending on the point of view, whether Muslim or non-Muslim, the source material differs, and the credibility of biographies varies in their critical analyses. While Muḥammad was born in the 6th century, the most important part of his life, i.e. the later stages took place in the 7th century, such as the start of Islam. In her article “What do we know about Mohammed?”, Patricia Crone assessed the field and opened the discussion on how to assess literary sources on the prophet, and how scholars with Muslim and non-Muslim backgrounds work with the resources we have.¹⁴⁶

Most of our modern knowledge about the elusive figure of Muḥammad is traced back to Ibn Ishaq, an 8th century scholar. While Ibn Ishaq’s work has been translated into English by Alfred Guillaume, the translation itself is based on an edited version compiled by Ibn Hisham, a 9th century scholar.¹⁴⁷ As we can see, the literary sources on the topic of Muḥammad are scarce and need to be handled with care.

Irfan Shahid, ‘Lakhmids’, in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), V:632b.

¹⁴¹ Walter Emil Kaegi, “Initial Byzantine Reactions to the Arab Conquest,” *Church Hist* 38, no. 2 (1969): 139-149.

¹⁴² Robert Hoyland, *In God’s Path; The Arab Conquests and the Creation of an Islamic Empire* (USA: Oxford University Press, 2015), 5.

¹⁴³ F. Buhl- et al., ‘Muhammad’, in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), VII:360b.

¹⁴⁴ ‘Aniconism’, in *Encyclopaedia Britannica Online* (Encyclopædia Britannica Inc, 2020).

¹⁴⁵ Patricia Crone, “What do we actually know about Mohammed?” *Open Democracy* 10 (2008): 1

¹⁴⁶ *ibid.*1-2

¹⁴⁷ Alfred Guillaume, *New Light on the Life of Muḥammad* (Manchester: Manchester University Press, 1983).

As part of an important tribe that, due to its trade, was widely connected, Muḥammad soon contacted important citizens of Mecca.¹⁴⁸ In the following, I will present the people most important for the conquest of Syria and Palestine. Due to their involvement in the conquest and the decision-making process, they play an integral role in the involvement of the Plague in the Muslim conquest as well. While Fred Donner made a case for extensively researching the companions of Muḥammad, I choose to only present people directly linked with the later discussed Plague.

Due to his status, Muḥammad was widely interconnected within his tribe and amongst the important people of the area surrounding Mecca. One of those Meccan citizens was Abu Bakr, a merchant, who was one of the primary followers of Muḥammad and Islam. Being the closest confidante to Muḥammad, he was not only an early believer, but also Muḥammad's father-in-law. Abu Bakr became the first Caliph to secure Islam after the death of Muḥammad in 632.¹⁴⁹ His death in 634 led to a fast ascension of the second Caliph, Umar ibn al-Chattab, another father-in-law of Muḥammad.¹⁵⁰ During his reign, most of the Near East was conquered and the Muslim army counted grand victories against both the Persians and the Byzantines.¹⁵¹ Umar's reign also brought on the end of the Sassanian Empire in 640.¹⁵² The third Caliph was Uthman ibn Affan, most known for the first textual composition of the Quran, which would, later, be the only official version of the text.¹⁵³ Uthman was a son-in-law of Muḥammad and reigned from 644 until 656. His conquest increased the size of the Arab Empire up to Georgia in the North and later Armenia as well.¹⁵⁴ Due to his expansion, the Byzantine Empire lost almost all foothold in the eastern Mediterranean, with the only exception being Anatolia.¹⁵⁵ The last caliph was Ali ibn Ali Talib, a cousin and son-in-law of Muḥammad, who reigned until 661.¹⁵⁶

The early followers of Islam were activists in their regard to other people's beliefs. Their goal was to not only be pious themselves, but to actively influence the world around them, to engage Islam everywhere and convert as many people as possible.¹⁵⁷ While only later orientations would equate the *jihad* with military action, the easiest opportunity in the 7th century was military conquest of non-believers as well.¹⁵⁸

¹⁴⁸ F. Buhl et al., 'Muhammad', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), VII:360b.

¹⁴⁹ W. Montgomery Watt, 'Abu Bakr', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), I:109b.

¹⁵⁰ G. Levi Della Vida and M. Bonner, 'Umar Ibn Al-Khattab', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), X:818b.

¹⁵¹ *ibid.*

¹⁵² J.J.G. Jansen, *Mohammed: eine Biographie* (München: Beck, 2008).

¹⁵³ G. Levi Della Vida and R.G. Khoury, 'Uthman b. Affan', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), X:946a.

¹⁵⁴ *ibid.*

¹⁵⁵ *ibid.*

¹⁵⁶ L. Veccia Vaglieri, 'Ali b. Abi Talib', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), I:381b.

¹⁵⁷ Fred McGraw Donner, *The Expansion of the Early Islamic State* (Aldershot: Ashgate Variorum, 2007). xviii

¹⁵⁸ John Kelsay and James Turner Johnson, *Just War and Jihad: Historical and Theoretical Perspectives on War and Peace in Western and Islamic Traditions* (New York: Greenwood Press, 1991).

One of the early believers who played an important role in the conquest of Syria was Abū 'Ubayda ibn al-Jarrah. With the death of Abu Bakr, and the demotion of Abu Bakr's military leader, Abū 'Ubayda rose in ranks and was military leader of the army and the executive power of the Syrian conquest.¹⁵⁹ His military knowledge, in addition to the constellation of the army, made him one of the most successful military leaders of the Rashidun caliphate.¹⁶⁰

Abu 'Ubayda is described as a successful military leader, as we can see from his efficient campaigns in Syria and Palestine.¹⁶¹ But his background lies in the personal circle of Muḥammad.¹⁶² 'Ubayda is said to have been one of 10 to whom paradise was promised by Muḥammad.¹⁶³ Additionally, he was one of the first converts to Islam.¹⁶⁴ He then rose in ranks, until, with the appointment of Umar to Caliph, he gained status as military leader.¹⁶⁵ His position of military leader was not only a successful one, but also one that had big consequences. According to *The Oxford Dictionary of Islam*, if he had not died before Umar, 'Ubayda may have succeeded him as the next Caliph.¹⁶⁶

Within primary sources, 'Ubayda is often mentioned in tandem with Umar, which I interpret as a strong bond between those two men, and that they worked together in the conquest of Syria and Palestine. During the siege of Jerusalem, Sophronius came into direct contact with both 'Ubayda and Umar.¹⁶⁷ While 'Ubayda was the military leader that won the siege of Jerusalem, Sophronius refused to capitulate to him. Even 'Ubayda's high standing was not sufficient for the patriarch of Jerusalem, caliph Umar had to be notified.¹⁶⁸

We can, therefore, see that while Abu 'Ubayda was an important man for the Muslim conquest, winning major military strikes against the Byzantine Empire, Umar, second caliph, was much more important to the conquest and Islam itself. Umar made a name for himself in history as the best Caliph and the figurehead for all future caliphs on how to behave. His ingenuity in military and political issues furthered Islam in a major way. Without a doubt, his reign saw the most important steps in the Muslim conquest, and his critical thinking established law and theological thinking still in use today.

Within non-Muslim societies, Umar was seen twofold. We can see from the descriptions of the non-Muslim historians Eutychius and Theophanes respectively, how

¹⁵⁹ John L. Esposito, 'Abu Ubayda Ibn Al-Jarrah', in *The Oxford Dictionary of Islam*, ed. John L. Esposito (Oxford University Press, 2003).

¹⁶⁰ (H.A.R. Gibb), 'Abu Ubayda Amir b. Abd Allah b. al-Djarrah', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), I:158b.

¹⁶¹ *ibid.*

¹⁶² *ibid.*

¹⁶³ *ibid.*

¹⁶⁴ John Bowker, "Abu 'Ubaida b. al-Djarrah," in *The Concise Oxford Dictionary of World Religions*, ed. (Oxford University Press, 2003).

¹⁶⁵ *ibid.*

¹⁶⁶ John L. Esposito, 'Abu Ubayda Ibn Al-Jarrah'.

¹⁶⁷ Daniel J Sahas, 'The Face To Face Encounter Between Patriarch Sophronius Of Jerusalem And The Caliph' Umar Ibn Al-Khaṭṭāb: Friends Or Foes?', in *The Encounter of Eastern Christianity with Early Islam* (Brill, 2007), 33–44.

¹⁶⁸ *ibid.* 33-44

different the meeting between Sophronius and Umar can be described. Eutychius describes the event surrounding the capitulation in a positive and courteous light: ““Do you know, O Patriarch, why I did not pray inside the church?” “Prince of the faithful,” said the patriarch, “I do not know why”.”¹⁶⁹ Theophanes, on the other hand, describes the event as: “Oumaros [Umar] entered the Holy City dressed in filthy garments of camel hair and, showing a devilish pretence, sought the temple of the Jew - the one built by Solomon - that he might take it as a place of worship for his blasphemous religion.”¹⁷⁰ In a clearly stated anti-Muslim bias, discrediting caliph Umar and the courteous relationship with Sophronius, Theophanes describes the whole event very differently. We can see that Umar as a leading figure of Islam was not only important in Muslim circles, but within non-Muslim circles as well, as this clear need for discredit shows a distinct aversion for the caliph.

Important for understanding the Muslim conquest is to look at their military organisation. Muḥammad’s first members of Islam were family members and close friends from Mecca, such as his fathers-in law.¹⁷¹ When we look at the three Caliphs that followed upon Muḥammad’s death, and the appointed military leaders, family and friends often appear repeatedly, as Caliphs until the 13th century were all part of the Quraysh.¹⁷²

Once the peace and the alliances of the Peninsula were solidified, the battalions and troops kept their tribal structure.¹⁷³ This had a few advantages to troops made up of strangers. The trust between the soldiers within a battalion was high, as they all were part of the same tribes. They had known each other a long time, and fighting styles were often attuned within the troop.¹⁷⁴ The leader of a troop was often the leader of the tribe as well and having been accustomed to leading people outside of war proposed a clear advantage in keeping soldiers in line and keeping their trust in the cause.¹⁷⁵

¹⁶⁹ Maher Abu-Munshar, ‘Christian Reactions to the Muslim Conquest of Jerusalem (637CE)’, 2014, 55–65. 62

¹⁷⁰ *ibid.* 63

¹⁷¹ W. Montgomery Watt, ‘Abu Bakr’.

G. Levi Della Vida and M. Bonner, ‘Umar Ibn Al-Khattab’.

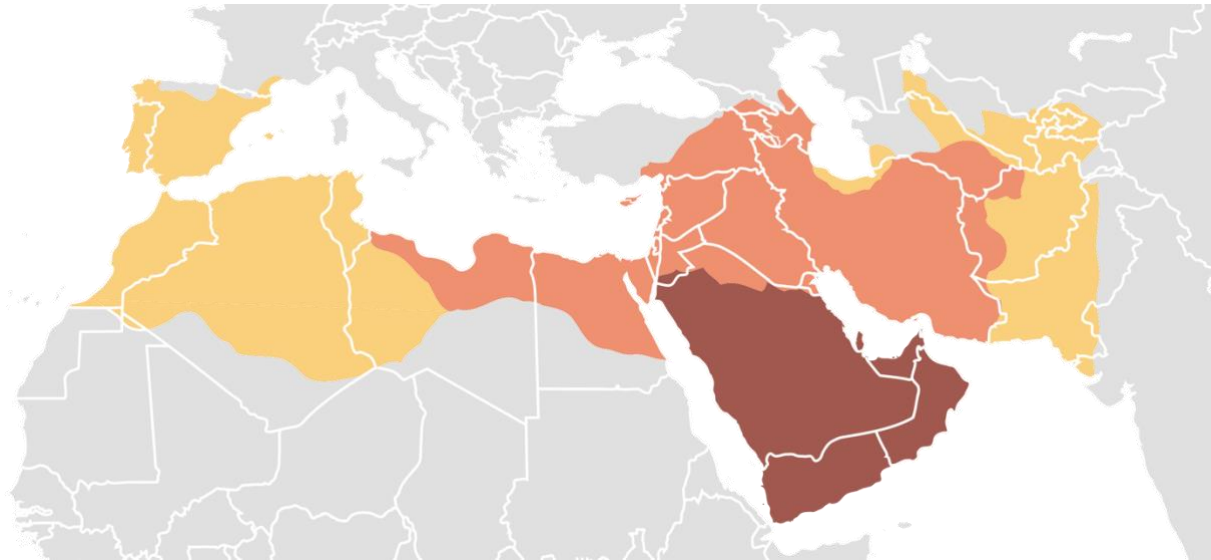
¹⁷² Patricia Crone, ‘Quraysh’, in *The Princeton Encyclopedia of Islamic Political Thought* (Princeton University Press, 2013). 456

¹⁷³ Hugh Kennedy, *The Armies of the Caliphs : Military and Society in the Early Islamic State* (London [etc.] : Routledge, 2001). 1-3

¹⁷⁴ *ibid.* 1

¹⁷⁵ *ibid.* 6-7

The Conquest



Map 1 Muslim Conquest 622-750¹⁷⁶

Brown: Conquest under Muḥammad

Orange: Rashidun Caliphate

Yellow: Umayyad Caliphate

To put the outward motion that the Muslim conquest represents in a clear path, and for easier understanding, I will refer to three phases within the conquest. The first phase represents the conquest that happened during Muḥammad's lifetime, from 622 until 632. The second phase, under the Rightly Guided Caliphs, also called Rashidun, continued until 661, with the Umayyad Caliphs extending the realm again until 750. Map 1 shows, how during a short amount of time, an area from the Atlantic to the borders of China was occupied.

As I said before, modern literature concerning the topics of Islam and the Muslim conquest exist plenty. Within the modern works of scholarship, major work has been done on translating more Arab works than ever before, therefore opening the field up to even more researchers.

To understand the history of the Muslim conquest, various source materials illuminate on the process in the 7th century. There are two kinds of sources we can use to understand the process of the conquest, literary and archaeological. These different source materials show several very distinct pictures on how the conquest unfolded.

On the one hand, the Byzantine sources in Robert Hoylands *Seeing Islam as Others Saw It*, *In God's Path*, or Walter Kaegis *Byzantium and the Early Islamic Conquest* show a distinct point of view within Byzantine sources.¹⁷⁷ ¹⁷⁸ ¹⁷⁹ According to Sophronius of

¹⁷⁶ Adapted from <http://guides.library.iit.edu/content.php?pid=27903&sid=322018> Information from *The Times Concise Atlas of World History* ed. by Geoffrey Barraclough published by Times Books Ltd. pp. 40-41.

¹⁷⁷ Robert Hoyland, *Seeing Islam as Others Saw It* (Gorgias Press, 2019).

¹⁷⁸ Hoyland, *In God's Path*.

¹⁷⁹ Walter E. Kaegi, *Byzantium and the Early Islamic Conquests* (Cambridge: University Press, 1992).

Jerusalem, patriarch of the city (560-638), the Arabs had “risen up unexpectedly against us because of our sins and ravaged everything with violent and beastly impulse and with impious and ungodly boldness.”¹⁸⁰ Furthermore, the Arabs are described as “fearful” and “pitiful” by others.¹⁸¹ Earlier, as the conquest had just started, Sophronius had written a letter to Constantinople including the statement: “of all the barbarians, especially the Saracens ... who with raw and cruel disposition, impious and godless audacity were ravaging the Christian community ‘unexpectedly’.”¹⁸² The destruction of the Middle East, at the hands of the Muslims in their quest to conquer the land, is described in those texts.

Even the Europeans towards the West shared the same sentiment, when the Muslims reached the Iberian Peninsula. According to the 828 poem of Ermold the Black, Louis the Pious, son of Charlemagne (778-840) said about the Muslims in 801:

“Had this people (the Saracens) worshipped God, pleased Christ and received holy baptism, we should have made peace with them and kept that peace to bind them to God through religion. But this people remains detestable; it spurns the salvation we offer and follows the commandments of the demons.”¹⁸³

The Muslims, on the other hand, have described the conquest in a different light. While the Byzantine descriptions were written shortly after, or during the conquest, the earliest Muslim sources appear in the 8th and 9th century. Al-Ṭabarī, a Muslim scholar (839-923) described in the *Tarikh al-Rusul wa al-Muluk* how according to him, the negotiations with the Persian general Rustam went. The Muslim general said:

God has sent us and has brought us here so that we may extricate those who so desire from servitude to the people [here on earth] and make them servants of God; that we may transform their poverty in this world into affluence, and that we may free them from the inequity of the religions and bestow on them the justice of Islam. He has sent us to bring His religion to His creatures and to call them to Islam. Whoever accepts it from us, we shall be content. We shall leave him on his land to rule it with us; but whoever refuses, we shall fight him, until we fulfill the promise of God.¹⁸⁴

The choice of words within the Muslim sources compared to the Byzantine and European sources shows a distinct bias towards Islam, which is not surprising, as al-Ṭabarī himself was

¹⁸⁰ *ibid.* 211

¹⁸¹ *ibid.* 211

¹⁸² Sahas, ‘The Face To Face Encounter Between Patriarch Sophronius Of Jerusalem And The Caliph’ Umar Ibn Al-Khaṭṭāb: Friends Or Foes?’ 35

¹⁸³ Hoyland, *Seeing Islam as Others Saw It*. 228

¹⁸⁴ Ṭabarī, *The Battle of Al-Qādisiyyah and the Conquest of Syria and Palestine : A.D. 635-637/A.H. 14-15* (Albany : State University of New York Press, 1992). 67

a Muslim.¹⁸⁵ Especially “transform poverty in this world into affluence” speaks of the devastation that the Persians had been suffering from since the loss of the Byzantine-Persian wars in 628.¹⁸⁶ Additionally, he speaks of “his creatures” and “his religion” in the point of view of Allah, to underline that only Islam is the true religion.

On the other hand, we have no concrete archaeological proof that the abovementioned devastation took place at all.¹⁸⁷ The stop in architectural growth can, in most cases, be traced back to the 6th century, long before the Muslims arrived and at a time when the Plague swept through the Middle East.¹⁸⁸ Additionally, we can see that, even after the conquest, churches and synagogues, i.e. non-Muslim houses of worship, were being newly built.¹⁸⁹ And we can see in archaeological evidence that coins were, even long after the conquest, being minted in the style of the conquered lands, i.e. in Byzantine or Sassanian style.¹⁹⁰ This shows that there was no immediate change for the people living in the just conquered lands, as their lives did not change all that drastically.

The reasoning for the Muslim conquest is varied, and scholars have been speculating and arguing about this. Multiple scholarly arguments, that are both of religious and non-religious reasoning, must be considered. Economic restrictions made on the Arabs by the Byzantines have been argued to strike the urge to conquer the Middle East.¹⁹¹ As the only access to the Mediterranean Sea was through Byzantine provinces, Byzantium was in a position of power over the Arabs. Other arguments are that the unity formed by Muḥammad and the new religion, created and shifted the urge to conquer and gain land away from inter-Arabian tribal wars to a unified push into other territories.¹⁹² Religion of course plays a role as well. Like I have already discussed, the urge of the early believers to convert as many people as possible towards Islam was a driving force in their motivation towards the conquest.¹⁹³ From the beginning, *jihad* against polytheists was an important part of Islamic law.¹⁹⁴ And as I have said earlier, the process of outward movement of the Arabs was ongoing, therefore, the conquest must be seen as a continuation of this process.¹⁹⁵

With the Arabian Peninsula united until 661, the motion of conquest now went outward. Since I have already discussed that Arabs were long situated outside the Peninsula,

¹⁸⁵ Bosworth, C.E., “al-Ṭabarī”, in: *Encyclopaedia of Islam, Second Edition*, Edited by: P. Bearman, Th. Bianquis, C.E. Bosworth, E. van Donzel, W.P. Heinrichs.

¹⁸⁶ James D Howard-Johnston, ‘The Persian Wars, 602–628’, *The Encyclopedia of Ancient Battles*, 2017, 1–15.

¹⁸⁷ Peter Pentz, *The Invisible Conquest: The Ontogenesis of Sixth and Seventh Century Syria* (National Museum of Denmark, Collection of Near Eastern and Classical Antiquities, 1992).

¹⁸⁸ *ibid.*

¹⁸⁹ *ibid.*

¹⁹⁰ Michael G Morony, *Iraq after the Muslim Conquest* (Princeton, N.J. : Princeton University Press, 2015). 38-51

¹⁹¹ Hall Gardner and Oleg Kobtzeff, *The Ashgate Research Companion to War: Origins and Prevention* (Routledge, 2016). 208-210

¹⁹² Hoyland, *In God’s Path*. 56

¹⁹³ Kelsay and Johnson, *Just War and Jihad : Historical and Theoretical Perspectives on War and Peace in Western and Islamic Traditions*.

¹⁹⁴ John Kelsay and James Turner Johnson, *Just War and Jihad : Historical and Theoretical Perspectives on War and Peace in Western and Islamic Traditions* (New York, N.Y., [etc.] : Greenwood Press, 1991).

¹⁹⁵ Morony, *Iraq after the Muslim Conquest*. 507-26

the conquest cannot be seen as strictly going from a sole conquest of the Peninsula to the conquest of the Middle East. As it often goes with history, happenings were more fluid, as some regions were easier to conquer than others.

The West-Syrian Chronicle is one of the earliest compendiums of specific historiography regarding the Muslim conquest and the history of the Middle East.¹⁹⁶ The West-Syrian Chronicle is insofar important, as it represents the Muslim counterpart to the Byzantine sources depicting the conquest, and show how Muslims in West Syria thought about the event.¹⁹⁷ To understand the point of view, it is, therefore, necessary to have this chronicle of authors from the 7th to the 13th century. Additionally, many of these texts had been translated for the first time by Andrew Palmer, who gives additional information about the texts in his annotations. Based on several texts, Palmer created a compendium of information for the sole purpose of further research. And although literary source material can be unreliable and has to be read in the context of its time and the author, the Chronicle's information matches the general information we have about the 7th century in the Middle East. Additionally, the Syriac historians producing these Chronicles were all Christians, thus we can assume they had a more distanced view to the religious *jihad* of the early Muslims. Therefore, I use it to demonstrate the rapid changes that happened in the span from 632 until 661, the end of the Rashidun caliphs. The West-Syrian Chronicle describes the time around the Muslim conquest as follows:

AD **637**: The Arabs conquer Mesopotamia.

AD **641**: The Arabs take Dara and Dwin .

AD **642**: The Arabs take Caesarea in Palestine.

AD **644**: Two Byzantine campaigns in Syria, under Valentine and Procopius and Theodore.

AD **649**: Arab invasion of Cyprus, conquest of Arwliid.

AD **652**: Battle of Tripolis.

AD **653**: Habib invades Mesopotamia and Procopius makes peace with the Arabs.

AD **657**: Battle of Siffin.

AD **679**: Earthquake destroys Seriigh and damages cathedral of Edessa.

AD **692**: First Arab census in Mesopotamia.

AD **705**: Plague in northern Mesopotamia.¹⁹⁸

The Chronicle is dated to the year 775.¹⁹⁹ While it does not show the singular steps of the Conquest, we see that the first push of the Muslims is towards the North-Eastern borders, stated as Mesopotamia. Mesopotamia was raided by two Muslim forces, one went directly to the south of Mesopotamia, the other to the North. At the same time, four forces marched

¹⁹⁶ Edward G Mathews, 'The Seventh Century in the West-Syrian Chronicles (Review)', *Journal of Early Christian Studies* 3, no. 1 (1995):95–97.

¹⁹⁷ *ibid.*95-97

¹⁹⁸ Andrew. Palmer, Sebastian P. Brock 1938-, and Robert Hoyland 1966-, *The Seventh Century in the West-Syrian Chronicles* (Liverpool : Liverpool University Press, 1993). 68

¹⁹⁹ *ibid.*69

towards Syria, Dara being one of the cities in the densely populated Syria. From there, it only took one year to reach the coast of the Mediterranean Sea. Within the first 18 years after Muḥammad's death, the Muslim armies seized the land of Egypt, Syria, the Arabian Peninsula and Iraq.²⁰⁰

The Muslim armies established in the 7th century that they were far superior to the Byzantine and Sassanian armies in their swift and merciless conquest of the Middle East. We can see that the strong leadership of singular people like Abu Ubaidah or Umar were necessary to the success of the Muslims. As I have already discussed before, especially Syria and Palestine were densely populated areas. It is, therefore, necessary to take into account needed to be taken into account, that, at the beginning of the Muslim conquest, the Middle East had experienced the Dust Veil Event, famine, war and the Plague. The Plague had ravaged these lands for 90 years, probably destroying long-established social and agricultural systems.

As we can see, the Muslim army albeit very successful against the Byzantine and Persian enemies, struggled with their problems. The incentive of key figures in the history of the conquest played a major role in the way, of how the Muslims reached their goal of conquering the Middle East.

In the following chapter we will take the knowledge we gathered so far on the Plague itself, the situation before the Muslim conquest and how the Muslims worked towards their goal of spreading the new religion and apply them within their framework. We will see how the people I have introduced so far and their connection to the Plague influenced the Muslim conquest in total.

²⁰⁰ Fred McGraw Donner, *The Expansion of the Early Islamic State* (Aldershot [etc.] : Ashgate Variorum, 2007).xv

Chapter 3 - The Plagued Muslims and their Neighbours

By now, I have established how devastating the Plague coursed through the Middle East and the whole Mediterranean lands. The disease shook social and political norms. While not all changes can or have to be attributed to the Plague directly, they certainly played a major role in the upheaval that occurred in the Middle East in the 6th and 7th century. Into this mixture of uncertainty came the establishment of Islam, and the subsequent conquest of the Middle East and North Africa within the 7th and 8th century. Often, these two events are worked separately into historical research, as they are both big topics that require plenty of individual attention. The purpose of this chapter, however, is to link those two events, as they happened in the same space and time.

From 541 to 770, the Plague circled the Mediterranean in several waves, following people on water and land routes. The Muslim conquest expanded from the Arabian Peninsula northwards and from there into several directions. The goal of this chapter is to find, within primary literature of the Middle East, ~~on~~ how the Plague stood in a direct link with the Muslim armies and how that link was established. As primary sources need to be read within their context, I will also explain the circumstances behind the authors and texts. I, additionally, want to answer whether it is possible to gather consequences from the meetings between the Plague and the Muslim armies. The source materials that give both reliable and direct information on the Plague and the Muslim Conquest are literary. However, ~~but~~ indirect sources need to be analysed as well, such as archaeological finds.

Because of the nature of the Plague and the prolonged exposure of the Middle East to the Plague, I decided to categorize my findings into direct and indirect influences. Direct influences include circumstances that had an instant and tangible influence on Muslims and the army. These can be non-harmful, such as the people who encountered the disease and then started a theological thought process about the nature of religion, medicine and diseases. Indirect influences of the Plague are those that occurred before the conquest took place, and specifically those that had long-lasting effects on the Middle East as a geographical place, i.e. not on particularly the Arabs.

In general, Arabic sources on the Plague are, due to a lack of specific wording, vague. While the term *tā'ūn* is generally used for the word 'plague', and *wabā'* for 'epidemic' 'pestilence', these words were formed in a time when a concise medical differentiation between diseases was next to impossible.²⁰¹ There were even accounts, in which various natural disasters were coined under the same terminology, to which end both *wabā'* and *tā'ūn* were often used synonymously.²⁰² While we can search for descriptions of plague

²⁰¹ Lawrence I Conrad, 'Tā'ūn and Wabā' Conceptions of Plague and Pestilence in Early Islam', *Journal of the Economic and Social History of the Orient/Journal de l'histoire Economique et Sociale de l'Orient*, 1982, 268–307. 271

²⁰² *ibid.*272

symptoms, few account describes, for example, the bulbous in the major lymph nodes in the neck or groin.²⁰³

Amwās

The most prominent example of a direct and tangible link between the Plague and the Muslim conquest is the Plague of Amwās. As a small city in the Palestinian countryside, Amwās established itself as a known hotspot for Plague in the 7th century, due to a surge of Plague deaths within the Muslim army in 638-9.²⁰⁴ Due to its location 30km west of Jerusalem, the Muslim army arrived in the city after the siege to Jerusalem in 634.²⁰⁵

The importance of Amwās for both the Plague and the Conquest is twofold. As the Arabian Peninsula had been spared from the Plague, the Muslim army represented a rare case of For the Plague, since Amwās represented a new pool of potential plague victims that were mobile, and, until then, spared from the Plague.²⁰⁶ Therefore, the moving army served as a pointed spearhead of Plague. Al-Azdī, Muslim scholar of the 8th century, said that after the Plague of Amwās, the disease was properly introduced to Syria.²⁰⁷ The implications for the Muslims lied within the loss of several military leaders and the subsequent ideological change on how to address diseases and faith. Due to the Plague of Amwās' sheer importance to the Muslims, descriptions about it can be found in all major Muslim medieval historiographies.

The following two quotes can be found in an English translation by Hamada Hassanein and Jens Scheiner of al-Azdī.²⁰⁸ Abū Ismā'īl Muhammad b. 'Abdallāh al-Azdī al-Baṣrī is believed to have written the earliest Muslim historical account of the conquest of Syria, introducing not only major military leaders, but also their relations and how and when they sieged which city on their way through the Middle East.²⁰⁹ The *futuh al-shams*, the conquest of Syria, is how al-Azdī narrates the military movements from 633 to 641, thus including the reigns of caliphs Abū Bakr and 'Umar. The lifetime of al-Azdī and, specifically, his, date of death have been a major discussion for at least a hundred years, however, nowadays, modern researchers have been able to pinpoint his death to the late 8th, early 9th century.²¹⁰ Within his work, al-Azdī recounts several interceptions between the Muslims and the Plague and how this new disease challenged the theology of Islam.²¹¹

²⁰³ Björn P Zietz and Hartmut Dunkelberg, 'The History of the Plague and the Research on the Causative Agent *Yersinia Pestis*', *International Journal of Hygiene and Environmental Health* 207, no. 2 (2004): 165–78. 166

²⁰⁴ Fred M Donner, *The Early Islamic Conquests* (Princeton University Press, 2014). 245

²⁰⁵ S.D. Goitein and O. Grabar, 'Al-Kuds', in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), V:322a.

²⁰⁶ Kohn, *Encyclopedia of Plague and Pestilence: From Ancient Times to the Present*. 216-8

²⁰⁷ Scheiner, *The Early Muslim Conquest of Syria : An English Translation of al-Azdī's Futūḥ al-Shām*. 4

²⁰⁸ *ibid.*4

²⁰⁹ *ibid.*2-5

²¹⁰ *ibid.*6-8

²¹¹ *ibid.*268-83

For the Muslims, the Plague of Amwās shook their leadership foundation. Several major political and military leaders, as well as approximately 20.000 soldiers, died because of the Plague.²¹² Al-Azdī describes the event surrounding ‘Ubayda’s death in the following:

He [=the narrator] said: The Muslims stayed in Syria under the command of Abū ‘Ubayda b. al-Jarrāḥ. He [=Abū ‘Ubayda] stayed there for three [more] years after ‘Umar (r.) had marched out of it [=Syria]. Then he [=Abū ‘Ubayda] died, God rest him, of the plague of al-‘Amwās, which had befallen the people of Syria and of which many people had died. He [=the narrator] said: When Abū ‘Ubayda was afflicted with the plague in [the lands of] the River Jordan, where his grave [still] exists, he summoned the Muslims. When they came into [his dwelling] to [see] him, he [=Abū ‘Ubayda] said [to them]: “I am making a recommendation to you. If you accept it, you will stay in good [conditions] as long as you live and after you perish: Perform the prayer[s], pay the prescribed tax, fast, give alms, perform the [major] pilgrimage (ḥajj) and the minor pilgrimage (‘umra), keep in contact with one another, love one another, be truthful to your commanders, do not deceive them and do not be obsessed with the worldly life. [Even] if a person’s life was prolonged for 1,000 years, it would not be possible for him to escape from the [imminent] death which I [have reached] as you [can] see. God has prescribed death to the children of Adam. So they will [all] die. However, the cleverest of them is the one who is the most obedient to his Lord and the keenest on doing [good deeds in preparation] for his Doomsday (yawm al-ma‘ād)”. Thereafter, he [=Abū ‘Ubayda] said: “O Mu‘ādh, lead the people in prayer[s]”. So Mu‘ādh [b. Jabal] led the people in prayer[s] and [then] Abū ‘Ubayda died; may God’s mercy, forgiveness and satisfaction be upon him as well as upon all the companions of the Messenger of God (ﷺ).²¹³

The quote shows many important factors for why the Plague of Amwās had such an impact on the conquest. First, it is said that ‘Ubayda stayed in Syria, while caliph Umar went back home. We can, therefore, see how important ‘Ubayda was for the immediate control of Syria and the lands they had just conquered, i.e. Jerusalem. As the military commander who was responsible for the sieges on Yarmouk and Jerusalem, ‘Ubayda showed great strategic thinking. Second, we are told that many people died of the Plague in Syria. Donner and Dols argue, that maybe up to 20.000 soldiers died.²¹⁴ According to the Encyclopaedia of Islam, even up to 25.000 people died.²¹⁵ They account this to the size of the army at the time of the siege

²¹² Michael W. Dols, *The Black Death in the Middle East* (Princeton: Princeton University Press, 1977). 18

²¹³ Scheiner, *The Early Muslim Conquest of Syria*. 268

²¹⁴ Donner, *The Early Islamic Conquests*. 245

²¹⁵ J. Sourdel-Thomine, ‘Amwas’, in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), I:460b.

on Yarmouk (24.000 soldiers), and the account that 4.000 people were left.²¹⁶ With the possibility of people fleeing from the army, much of this loss can be accounted to the Plague.

‘Ubayda's speech to the army, and his choice of words "love one another", "perform the pilgrimage" speak to a higher importance of his than him being a military leader. Had he been just a military figure, the speech would have been more about victory and the enemy, and not about religious piety and how to live a life worth living. Within this we can see that ‘Ubayda, one of the prophet’s companions, was as much a religious leader as a military figure. This is underlined by ‘Ubayda’s last words, i.e. him asking his son to lead the people in prayer. It shows how devout a Muslim ‘Ubayda was, and how important he was to the new religion and the community. In the last sentence we can, additionally, see how al-Azdī saw ‘Ubayda. He was a very important figure for the Muslims, especially, due to his companionship with Muhammad.

Additionally, he ‘Ubayda was a skilled military leader, having been included in, and leading parts of the Muslim army from the beginning.²¹⁷ Abū ‘Ubayda was involved in the siege of Mecca, had been informing first Abu Bakr and later Umar on enemy military movements, and was even appointed by Umar to be in line for the Caliphate.²¹⁸ While he died before he could ever be appointed caliph, both his military skills and leadership were of significant importance to the early Muslim conquests. As the military commander who was responsible for the sieges on Yarmouk and Jerusalem, ‘Ubayda showed great strategic thinking.²¹⁹ I argue, therefore, that his loss as a strategic military leader influenced the Muslim conquest negatively.

Abū ‘Ubayda was of such high importance to Umar and his cause, that upon the recognition that Plague had settled in Amwās, Umar ordered Abū ‘Ubayda back to Medina, to save his life.²²⁰ Although he understood the purpose of this request, Abū ‘Ubayda refused to leave his troops to the disease.²²¹

The account of al-Tabari, whose historiography of the conquest and the early Muslim history narrated the discussions between Umar, Abu ‘Ubayda and Sophronius, reads in a very similar way to al-Azdī's. He also describes the thought process of Umar and how he had to proceed with the disease spreading through Syria. According to al-Tabari, the consensus was that if you found yourself in an area ridden with disease, you were not allowed to leave it. Additionally, if an area was plagued by disease, and you knew that, then you were not allowed to enter it either. Several people in al-Tabari’s account quote this rule on behalf of the prophet.²²²

²¹⁶ Donner, *The Early Islamic Conquests*. 245

²¹⁷ Khalil Athamina, ‘Abū ‘Ubayda b. al-Jarrāh’, in *Encyclopaedia of Islam, THREE*, Encyclopaedia of Islam (Brill,).

²¹⁸ Khalil Athamina.; Scheiner, *The Early Muslim Conquest of Syria*. 73.

²¹⁹ H.A.R. Gibb, ‘Abu Ubayda Amir b. Abd Allah b. al-Djarrah’, in *Encyclopaedia of Islam, Second Edition*, Encyclopaedia of Islam (Brill, 2005), I:158b.

²²⁰ Scheiner, *The Early Muslim Conquest of Syria : An English Translation of al-Azdī's Futūḥ al-Shām*.

²²¹ Michael W. Dols, ‘Plague in Early Islamic History’, *Journal of the American Oriental Society* 94, no. 3 (1974): 371–83. 376-7

²²² Ṭabarī, *The Conquest of Iraq, Southwestern Persia, and Egypt* (Albany : State University of New York Press, 1989). 92-6

Theophilus of Edessa, a Christian historian at the court of Abbasid Caliph Al-Mahdi in Mesopotamia, recounts the events in Amwās in his Chronicle as well. But unlike the Muslim sources, he gives just a short account on the event itself:

In the year 18 of the Arabs (639), after ‘Umar had gone back down to his city, a bout of plague was unleashed on all the land of Palestine and Abu ‘Ubayda, emir and general of the Arabs, was struck by this sickness and died at Emmaus (Amwās), a city of Palestine. Mu‘ādh ibn Jabal took his place.²²³

First, the use of the Hijra year, the Muslim calendar, supports Hoyland's theory in the footnotes, that Theophilus used a Muslim source for this event.²²⁴ Furthermore, there is no account of the death of Mu‘ādh shortly afterwards either. And no other loss of lives is noted for the Plague of Amwās either, although up to 25.000 people died. There are also no consequences drawn towards the importance of ‘Ubayda or the theological thought process surrounding the event.

Tā‘ūn and Wabā’

The theological importance of the Plague on the Muslim conquest and the Muslim community lies in the timeframe of those events. With the Plague preceding the conquest, Muslims were subjected to the disease from the beginning of Muslim theological thought. Conrad describes this time as the formative years of Islam, when they were still in the stages of self-definition.²²⁵ The immediate danger that the Plague posed to the Muslims influenced theological thought long lastingly.²²⁶ We know that Muslim medical and biological ideas were posed in the tradition of the ancient Greeks.²²⁷ This means that their understanding of medicine was reliant on humours, a balance of nature, the body and one’s emotions, and the idea that bad air was responsible for diseases.²²⁸ But the discussion was larger than just what diseases were. Important was also how to proceed when diseases, such as the Plague, were raging through Muslim communities.²²⁹ Different people had different ideas on proper epidemic response behaviour. Introduce the following quote:

He [=‘Amr b. al-‘Āṣ] ordered the people to flee from it [=the plague]. Mu‘ādh [b. Jabal], however, was informed of ‘Amr [b. al-‘Āṣ’s] statement and said [to the

²²³ Robert Hoyland, *Theophilus of Edessa’s Chronicle and the Circulation of Historical Knowledge in Late Antiquity and Early Islam*, vol. 57 (Liverpool University Press, 2011). 117

²²⁴ *ibid.*117

²²⁵ Lawrence I Conrad, ‘Umar at Sargh: The Evolution of an Umayyad Tradition on Flight from the Plague’, in *Story-Telling in the Framework of Non-Fictional Arabic Literature* (Wiesbaden : Harrassowitz, 1998).

²²⁶ Conrad, ‘Tā‘ūn and Wabā’ Conceptions of Plague and Pestilence in Early Islam’.

²²⁷ *ibid.*274

²²⁸ *ibid.*274-8

²²⁹ *ibid.*274-8

Muslims]: “What made him [=‘Amr b. al-‘Āṣ] speak about something that he is not knowledgeable about?” Then Mu‘ādh [b. Jabal] came [forward] and ascended the pulpit, praised and thanked God for what He is worth, blessed and saluted the Prophet (ṣ.) and then mentioned the plague (wabā’), saying: “It [=the plague] is not as ‘Amr [b. al-‘Āṣ] has described [it]. Rather, it is a mercy [sent to you] from your Lord, a prayer [for you] from your Prophet and [a means of] death of the righteous [people who lived] before you. O God, give Mu‘ādh and his household the largest share of it [=the plague]”.²³⁰

We can see in the quote from Al-Azdī, that two different responses were formed when the Muslim army encountered the Plague. The first response was to flee, as ‘Amr b. al-‘Āṣ shows. But many devout Muslims knew that, according to the prophets’ teachings, the proper response to the Plague was to stay, as Mu‘ādh's response shows. Al-Tabari has reported the discussion that occurred between Umar and his generals when it became clear that the area around Amwās was riddled with a deadly disease. He says:

Letters describing this reached 'Umar except from Syria. So 'Umar set out and traveled until, when he was near to it, news reached him that the plague there was more severe than it had ever been. So he said, "As the Companions say, the Messenger of God said: 'If there is a pestilence in a certain country, do not enter it and if it breaks out in a country while you happen to be in it, do not leave it.'²³¹

As I have already analysed with the Plague of Amwās and the death of ‘Ubayda, the importance of the military leaders and the sheer number of people who died of the Plague gave the medical theological thinking a high importance for the emerging religion. It is, therefore, understandable that the discussion on what exactly Tā‘ūn and Wabā’ were, has never stopped. With the emergence of the Black Death and other epidemics of other diseases, the topic of disease response never lost its importance.²³²

Chosroes

Just like the Muslims, the Sassanians suffered from a great loss due to the Plague.²³³ Emperor Chosroes II died in February 628 after having reigned for 40 years.²³⁴ The West Syrian Chronicles describe how he succumbed to his death due to the Plague that raged in the capitol

²³⁰ Scheiner, *The Early Muslim Conquest of Syria*. 269

²³¹ Ṭabarī, *The Conquest of Iraq, Southwestern Persia, and Egypt*. 94

²³² Conrad, ‘Tā‘ūn and Wabā’ Conceptions of Plague and Pestilence in Early Islam’. 271-2

²³³ Michael G. Morony, “‘For Whom Does the Writer Write?’”, in *Plague and the End of Antiquity: The Pandemic of 541–750*, ed. Lester K. Little (Cambridge: Cambridge University Press, 2006).

²³⁴ Rance, Philip. “Chosroes II.” *The Encyclopedia of Ancient History*. Hoboken, NJ, USA: John Wiley & Sons, Inc, 2012.

Ctesiphon.²³⁵ His successor, his son, followed him into death within 7 months.²³⁶ And while according to the West-Syrian Chronicles, the conquest of Mesopotamia took place in 637, it has since been argued, that from the literary perspective of the Persians, the conquest happened approximately in 628.²³⁷ This would have opened the opportunity for the Plague to not only affect the Sassanian army and the city of Ctesiphon, but the Muslim army as well.²³⁸

According to Michael the Syrian, Jacobite Historian from Antioch (1166-1199), within only a short amount of time, up to a third of the population had died due to Plague.²³⁹ Therefore, although the Plague may or may not have affected the Muslims directly, it did affect their enemies, thus weakening them. It has not yet been discussed how this Plague influenced the military power of the Sassanian Empire in this specific instance, but as their length of survival against the Muslims was not long, it may be a suggestion that the Plague may have had a bigger influence on their military power than thought before. The Plague of Shiroye still happened during Muhammad's lifetime, which is reflected in the Quran, as the religious text talks about the disaster happening in the area North of the Arabs.²⁴⁰

Archaeology

While archaeological source material from the 7th century is sparse, we do have some evidence that the Plague left Syria so sparsely populated, that the Conquest seized empty and destroyed cities.²⁴¹ According to Clive Foss, Antioch was in 636 a “largely ruined city” with its population greatly reduced since 541.²⁴² Other cities must have fared the same. The villages of the Levante, on the other hand, did not suffer from the Plague the same way as did the cities. Their population stagnated, and the close link between the city and countryside, especially regarding the sudden lack of customers of agricultural produce, left the countryside poor and squalor.²⁴³

While I had hoped that more archaeological evidence would support my thesis, several factors made a specific archaeological analysis difficult. Firstly, it could have been the dust veil and the subsequent migration of people that led to the abandonment of houses and

²³⁵ Andrew. Palmer, Sebastian P. Brock, and Robert Hoyland, *The Seventh Century in the West-Syrian Chronicles* (Liverpool : Liverpool University Press, 1993). 18

²³⁶ *ibid.*18

²³⁷ *ibid.*18

²³⁸ Parvaneh Pourshariati, *Decline and Fall of the Sasanian Empire : The Sasanian-Parthian Confederacy and the Arab Conquest of Iran* (London : I.B. Tauris : in assoc. with the Iranian Heritage Foundation, 2008).

²³⁹ Michael G. Morony, “‘For Whom Does the Writer Write?’”, in *Plague and the End of Antiquity: The Pandemic of 541–750*, ed. Lester K. Little (Cambridge: Cambridge University Press, 2006), 59–86.

²⁴⁰ Abdul Nasser Kaadan and Mahmud Angrini, ‘Was the Plague Disease a Motivating or an Inhibiting Factor in the Early Muslim Community?’.

²⁴¹ Clive Foss, ‘Syria in Transition, A.D. 550-750: An Archaeological Approach’, *Dumbarton Oaks Papers* 51 (1997): 189.

²⁴² *ibid.*189

²⁴³ *ibid.*204

villages in the 530s and 540s.²⁴⁴ However, it could have also been the earthquake of 528 in Syria, which destroyed many cities, such as Antioch, therefore, making it hard to pinpoint why certain houses were given up on.²⁴⁵ Furthermore, the Byzantine-Persian wars also devastated several landscapes, and there were also general difficulties with maintaining cityscapes in the arid Syrian landscape. All those factors form a web of hard to read influences that support the archaeological evidence we have of the time.

What we do have, is archaeological proof that most building exploitations ceased in the mid-6th century.²⁴⁶ Inscriptions in rural Syria stop in 541, which matches the beginning of the Plague.²⁴⁷ Funeral inscriptions start being made again in 550.²⁴⁸ This evidence and the lack of building from this specific period, suggest that the Plague caused a massive loss of inhabitants in Syria. This would be another indirect factor for the Muslim conquest, in the following century, as a loss this big would take longer to compensate.²⁴⁹

Inscriptions of different kinds give more detail to the story of the Plague. Nancy Benovitz has done tremendous work on Greek Epitaphs in Palestine, Syria, and Arabia, and how they can be connected to the Plague.²⁵⁰ From her work, and especially the dates she extracted from the epitaphs, we can conclude that by the time the Muslim conquest started, either less people died from Plague, or the notion behind making an epitaph had been given up due to sheer number of deaths.²⁵¹ Both conclusions are equally logical in the face of the amount of people who died of Plague in the Middle East. According to Benovitz' work, the Muslim conquest coincided with the 8th wave of the Plague.²⁵² According to her conclusion, the first and the fourth wave were each more virulent than the others.²⁵³ It could, therefore, be argued, that the Muslim conquest occurred when the Plague was less virulent than it was before, thus being less dangerous to the army.

The differences between the accounts in the *futuh* and the contemporary Sassanian chronicles done by Pourshariati, show that the dates used by at-Tabari do not match with the actual dates that the Conquests must have happened in.²⁵⁴ The contradiction can only be seen in comparison to the Sassanian sources. Pourshariati argues so convincingly, that one can assume that more dates in the chronicle of al-Tabari might be wrong, but as it has been used as a primary source for centuries, there is no contradicting literature. It is, therefore, possible

²⁴⁴ *ibid.*191;204

²⁴⁵ Mohamed Reda Sbeinati, Ryad Darawcheh, and Mikhail Mouty, 'The Historical Earthquakes of Syria: An Analysis of Large and Moderate Earthquakes from 1365 BC to 1900 AD', *Annals of Geophysics*, 2005. 355-7

²⁴⁶ Pentz, *The Invisible Conquest: The Ontogenesis of Sixth and Seventh Century Syria*.

²⁴⁷ Nancy Benovitz, 'The Justinianic Plague: Evidence from the Dated Greek Epitaphs of Byzantine Palestine and Arabia', *Journal of Roman Archaeology* 27, no. 27 (2014): 487–98.

²⁴⁸ *ibid.*490

²⁴⁹ Hugh Kennedy, 'Justinianic Plague in Syria and the Archaeological Evidence', 2006, 87–96.

²⁵⁰ Nancy Benovitz, 'The Justinianic Plague: Evidence from the Dated Greek Epitaphs of Byzantine Palestine and Arabia'.

²⁵¹ *ibid.*496

²⁵² *ibid.*496

²⁵³ *ibid.*495-6

²⁵⁴ Pourshariati, *Decline and Fall of the Sasanian Empire: The Sasanian-Parthian Confederacy and the Arab Conquest of Iran*.

that there exists literary proof that shows that Plague had a further influence on the Muslim armies, than the cases of Amwās and Shiroye. However, due to a fault in the description of the years, the gaps between the instances of Plague and the Muslim conquest cannot be bridged.

Conclusion

This thesis aimed to research the interception of the Muslim conquest within the wider topic of the Plague. The Plague pandemic in the Near East, that started in 541 in an Egyptian port, had consequences that, at the time, were unimaginable. While Plague as a disease has accompanied humanity for at least 5000 years, only in the last 1500 years did the disease have such major impacts on human life, geopolitics and society.

The case of the first Plague Pandemic in the 6th and 7th century represents, in a great way, the interconnections within history. As I have already explained, not only man-made facts are responsible for the deadly disease spreading through the Middle East and Europe, but also natural factors preceding the first case of Plague in Egypt in 541.

Within the larger scope of cyclical climate change, in which cold and warm weather alternate, the sudden change from the Roman Warm Period towards the LALIA represented a large problem for the Mediterranean. The Byzantine Empire, the dominant political player at the time, suffered from the sudden change, especially due to an added stress by volcanic eruptions. Both of those events, which we can prove with modern technology, paint a picture of increasing famine and unrest in the Mediterranean.

Y. pestis is a deathly disease that is reliant on rodents and fleas to find its way into the humans' body. And while source material on antique rats does not exist persistently, we know that rats and their behavioural patterns have uniquely influenced the spread of Plague. As the rodents are both a necessity, and a limiting factor of the Plague, the Annona system of the Byzantine Empire enhanced the dispersion of the Plague in the Mediterranean and the Middle East.

Although the Middle East did not suffer as much as Europe did from the events, the consequences spilled into the lands nonetheless, via large scale demographic change. This only furthered famine in the Middle East, a region known for often arid agricultural conditions. With the increased economic strain on Egypt by the Byzantine Empire, and the highly developed economic structures, the emerging disease found in Egyptian ports, soon spread along the sea and land routes along the Mediterranean.

The Plague, and its quick spread throughout the Mediterranean and Europe, due to trade, has shown, once again, how globalisation is not only a topic of the 21st century but of earlier times as well. The emergence of the Plague that originated from the Chinese highlands, in the ports of Egypt, and the subsequent import of the Plague into Constantinople, certainly played a part in the downfall of the Byzantine Empire. Within 2 years, all lands between Cairo and Constantinople must be considered to have been penetrated by the Plague. At a time when neither medicine, nor proper pandemic response was invented yet, the disease swiftly raged through the civilians.

The argument has been standing, that the Byzantine Empire, once mighty and all-encompassing, was already in a clear decline when the Plague hit. Nonetheless, the Plague itself was a major contributor for a massive loss of life in the Empire, up to 40% of the

inhabitant might have died over the next 100 years. The Byzantines found themselves in their long-standing war against the Persians, with none of them gaining a majority within the war.

It was, therefore, somewhat of a surprise when the Muslims united under the new religious prophet Muhammad, who brought forth the new, monotheistic religion Islam. While officially a Christian Empire, not all Byzantines agreed with their leaders in Constantinople, and strife and unrest were apparent in the provinces the furthest away from the capitol. For some, the new religion was supposed to bring a new and better system to the Middle East. The Muslims themselves, as a new religion, were still finding their religious ground, and were still discussing the nuances and scales of Islam. Just as any other religion, Islam was neither born nor written down perfectly and/or completely.

The Quran tradition, at this point very young, was just starting and the fine details of the scripture were still being discussed. This theological change was, of course, influenced by the main religious leaders of the Muslims, as well as their immediate surroundings. Emerging from a family and tribal system, important roles such as the military leadership were often occupied by family or close relations. One of the most famous cases, Caliph Umar, and military leader Abu 'Ubayda, worked in tandem to increase the Muslim influence in the Middle East. And they were very successful. But at a time when the Plague was still raging through the lands in smaller epidemics and waves, an encounter between the Muslim armies and the Plague was bound to happen. Rather soon the Muslim army got caught by the Plague, many soldiers died, and most importantly, Abu 'Ubayda died as well.

With the help of literary and archaeological proof, we can see that the First Plague Pandemic influenced the Muslim conquest in several ways. First, the direct influence on the Muslim army, with the Plague of Amwās killing not only 20.000 Muslim soldiers, but military leader Abū 'Ubayda and others as well. His successful campaigns of Syria and Palestine were cut short by his death in 639. And while Caliph Abu Bakr intended to save his commander of the army, Abū 'Ubayda refused to go against Islamic rule. His death influenced the Muslims into thinking further about medicine and diseases.

Secondly, there is the passive influence that the Plague had on the Muslim Conquest. Antioch is a great example of a city ravaged by the Plague for 90 years, leaving but a destroyed city for the Muslims to conquer. The same can be assumed for other Syrian cities.

Thirdly, there was also the Plague's influence on the Muslims enemies. Especially, within the Sassanian Empire, the outbreak of Plague in Ctesiphon is of great importance for the ease in which the Muslims conquered the Persians. With the death of Chosroes II and his son within 7 months, the Empire was weakened without repair. New information on the problems of Muslim chronicles and their time frame, have opened the questions of the Conquest of Mesopotamia and the Sassanian Empire may have happened earlier, thus the Plague influencing not only the Sassanians but the Muslims as well.

Therefore, my conclusion is that yes, the Plague did affect the Muslim armies and their conquest. However, I cannot specify if that was merely positive or negative. As the Muslims were, in the end, just as affected as their enemies, the Plague did not support nor hinder them in a major way. Based on the archaeological evidence we have of Syria, the diminished

numbers of inhabitants in the cities may have eased the settlement of Arabs in new places, but this had a larger influence on the Muslims after their conquest. This could be argued to have given the Muslims an easier start at life in these new lands. But all these factors did not influence the conquest itself. The main influence that the Plague had on the conquest, was the death of big military leaders, like Abū 'Ubayda and Mu'ādh. While their succession was either settled before their death or immediately after, the loss of the strong skilled leaders surely influenced the conquest.

Altogether, the information we have on the influence of the Plague on the Muslim conquest is slim. Although, we do have concrete proof that there was a certain overlap at times, there is no proof of such huge it is not the large influence that one may expect from an event as grave as the Plague.

Further research on the larger scope of the Plague and the early Muslim settlements is, therefore, recommended. Academic discussion is still ongoing whether and how Plague influenced those early Muslim settlers in their new places, and how the Plague itself must have influenced the new religion and the Muslims' thoughts on God-given diseases.

Due to the ongoing emergence of new translations of texts written at the time, in various languages, the first Plague pandemic is a topic that should be revised with more and new source material. And in the light of the discrepancies between Muslim and Sassanian source material, a look into the timeline of the Conquest from outside sources may be advisable as well. Should the timeline change, the Plague may have had a different influence on the Muslim Conquest than we have thought so far.

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