### **1 INTRODUCTION**

#### 1.1 RESEARCH QUESTION AND THEORETICAL BACKGROUND

S leep and dreaming are characterised by spe-cific traits, which incline them to religious interpretations, particularly to religious concepts of death and life after death. Several aspects are relevant here, the most important being the formal resemblance of sleep and death: the immobility of the body and the (seeming) absence of consciousness. At the same time, the dreamer experiences in the mind's eve an alternate reality that is structured in much the same way as the waking world but can still be distinctly different with respect to its content, prompting ideas about other realms.1 Theoretical considerations about the role of sleep and dreaming for concepts of death and immortality can be traced back to 1871 when Edward Burnett Tylor, in his work Primitive Culture, promoted animism as the first step in what he considered the evolution of religions:

"The soul, as recognized in the philosophy of the lower races, may be defined as an ethereal surviving being, conceptions of which preceded and led up to the more transcendental theory of the immaterial and immortal soul, which forms part of the theology of higher nations. It is principally the ethereal surviving soul of early culture that has now to be studied in the religions of savages and barbarians and the folklore of the civilized world. That this soul should be looked on as surviving beyond death is a matter scarcely needing elaborate argument. Plain experience is there to teach it to every savage; his friend or his enemy is dead, yet still in dream or open vision he sees the spectral form which is to his philosophy a real objective being, carrying personality as it carries likelyness. This thought of the soul's continued existence is, however, but the gateway into a complex region of belief."2

Having thus discerned belief in a soul that survives beyond death as crucial for early religions and deduced it from experiences in dreams, he goes on to exemplify his hypothesis:

"Moreover, visits from or to the dead are matters of personal experience and personal testimony. When in dream or vision the seer beholds the spirits of the departed, they give him tidings from the other world, or he may even rise and travel thither himself, and return to tell the living what he has seen among the dead. It is sometimes as if the traveller's material body went to visit a distant land, and sometimes all we are told is that the man's self went, but whether in body or in spirit is a mere detail of which the story keeps no record. Mostly, however, it is the seer's soul which goes forth, leaving his body behind in ecstasy, sleep, coma, or death."<sup>3</sup>

Whereas the embedding of his observations into an evolutionistic theory of religions requires caution, the theory's respective elements are nevertheless subject to empirical study, and it would be premature to discard them due to ideological rather than scientific reasons.<sup>4</sup> The appearance of the deceased in dreams, for example, and them delivering as well as receiving messages is a common occurrence during the grieving process as described in the psychological literature (see chapter 2.9).<sup>5</sup>

Therefore, it is the aim of my work to explore the interconnectedness of ideas about sleep and dreaming with ideas about death and the netherworld. To address this topic, I will investigate how far back in time this connection can be traced and under which circumstances it manifests itself to what extent and in what form. Comprised in this main issue is another subordinate question, namely the role that sleep and dreaming play in religious contexts, especially for burial rites and cosmological ideas. By integrating textual and archaeological data with findings from the natural sciences and examining them against the background of cognitive archaeology and the cognitive science of reli-

- <sup>4</sup> Although social evolutionism has in its beginnings been used as a justification for colonial exploitation, recent archaeological research with an evolutionary perspective, on the contrary, has undermined justifications for colonialism by emphasising the creativity of and progress advanced by indigenous peoples in prehistoric times and therefore streng-thened independence movements. Also, cultural evolution is simply undeniable as all modern societies trace their ancestry to Palaeolithic hunter-gatherer societies and have since undergone changes in social organisation as well as in terms of their worldview (Trigger 2001, 5–6). Preucel has even termed evolutionary theory "the only viable unitary theory in the human sciences" (Preucel 2006, 152).
- <sup>5</sup> Garfield 1996, 188.

<sup>&</sup>lt;sup>1</sup> Revonsuo 2010, 236.

<sup>&</sup>lt;sup>2</sup> Tylor 1889 II, 24.

<sup>&</sup>lt;sup>3</sup> Tylor 1889 II, 49.

gion, a broader perspective on culture-specific manifestations of sleep and dreaming is enabled, particularly in relation to human universals.

The four key concepts - sleep and the dreamworld as well as death and the netherworld form a box whose segments designate the possible combinations between the mental and the physical as well as between this world and other realms (table 1). Because of the fragmentariness of the textual and archaeological record, only in rare cases can we expect to come by sources that pertain to all four concepts, and I will aim to work out the logic behind this interrelation so that inferences about missing information become possible. To do so, an approach is followed in which archaeological and textual sources from the Near East, Egypt and Europe which are older than 1500 BC are compiled and correlated to modern scientific findings.

#### Tab. I Key concepts of the present study.

	Physical	Mental
This world	Sleep	Dreamworld
Other realms	Death	Netherworld

Like any other phenomenon that is based on biological properties, dreaming can be studied in a multilevel explanatory framework as illustrated in table 2.6 My work investigates the phenomenon from a historical and archaeological perspective and is thus mostly concerned with the contextual level of explanation, i.e. how dreaming relates other phenomena, strictly speaking with the social and particularly with the religious consequences of dreaming. Yet, as the different level approaches examine the same phenomenon from different perspectives, valuable insights concerning the contextual can be gained by tying it to discoveries on the constitutive and etiological level, i.e. to human universals. Of significance here are the mental, cognitive or neural constituents of dreaming as well as its developmental level and evolutionary causes.

Although initially, historical texts seem more accessible, the objection that archaeological remains do not constitute plain texts that can be understood hermeneutically<sup>7</sup> applies in some

way to past written sources also, and in both cases a certain degree of interpretation is necessary.8 Especially when religious topics are concerned, core aspects can stay unmentioned either deliberately or because they were taken for granted.9 Moreover, if historical texts refer to religious issues, this often happens with apologetic intentions, rendering them unreliable concerning realistic depictions of past religious practices. On this account, the most promising approaches can be found in areas where the different categories of evidence intermingle and therefore allow for reciprocal verification.<sup>10</sup> Sleep and dreaming are a case in point, and both are mentioned regularly in the early written sources. In contrast, whereas sleep can show up in the archaeological record, for example in the form of sleeping places or pictorial representations, dreaming usually leaves no trace. Additionally, both sleep and dreaming are universal human phenomena, which is why scientific studies are of use in understanding both the textual and the archaeological sources. While conclusions by analogy are never without problems, those based on quasi-scientific laws are less uncertain.11

Cognitive archaeology and the cognitive science of religion may offer a way to advance the

- Gianluca Miniaci's opinion that written sources offer an emic perspective as opposed to the etic perspective gained from archaeological remains seems too simplified (Miniaci 2016, 89). Instead, both categories of source material encompass an emic as well as an etic component as they were both produced by a cultural insider and are now interpreted by a cultural outsider. Concerning the oft-quoted dichotomy between inductive and deductive method (Zgoll 2006, 40-41), it seems highly doubtful that a scholar could ever be free of presuppositions and solely guided by the material. Instead, these presuppositions must be constantly re-evaluated in the light of the source material employed, i.e. a progressive induction that shifts between induction and deduction, similar to the hermeneutic circle (Bernbeck 1997, 50–51, 60, 280).
- <sup>9</sup> Hansen 2003, 117.

 Kristiansen 2013, 81–82. Needless to say, the comparison between written and archaeological sources is most valuable in cases where they disagree.

<sup>11</sup> Hansen 2003, 117. Generally speaking, the more data an analogy is based on, the more reliable it gets (formal analogy), particularly if the respective elements are in themselves causally interrelated (relational analogy) or if several analogies are employed (complex analogy) (Bernbeck 1997, 85, 94, 98–99, 101, 106–107).

<sup>&</sup>lt;sup>6</sup> Valli 2011, 1084–1088. See also Revonsuo 2015, 53–54.

<sup>&</sup>lt;sup>7</sup> Hansen 2003, 113.

Etiological explanation (backward-looking)	Constitutive explanation (downward-looking)	Contextual explanation (upward-looking)
<ul><li>The causal history of dreaming:</li><li>Neural and cognitive level proximate causes for dreaming</li></ul>	The mental, cognitive or neural constituents of dreaming	How dreaming relates to other phenomena: • Intra-individual level
<ul> <li>Developmental level causes, ontogeny of dreaming</li> </ul>		<ul><li>Behaviour</li><li>Organism-environment inter-</li></ul>
<ul> <li>Evolutionary, ultimate causes for dream- ing: why the brain has the ability to</li> </ul>		action

Tab. 2 Dreaming in the multilevel frame-work.

produce dreams

topic. Generally speaking, cognitive archaeology consists of two research areas - "evolutionary studies" and "cognitive processual studies"12 – which can be distinguished on temporal grounds.<sup>13</sup> Apart from a glance at the evolution of sleep and dreaming in chapter 3, my work is concerned with the Holocene and therefore roughly falls into the latter category. While in the beginning only defined as the study of "the ancient mind"14 by Colin Renfrew and torn by the controversy between processual and post-processual archaeologists, the last two decades have seen an increase in both quality and quantity of research concerned with cognitive processes of prehistoric humans, although there is still no theoretical or methodological consensus apart from a positivist stance. Robert Preucel gives a detailed literary overview of the different trends in cognitive archaeology.<sup>15</sup> I do not wish to enter the debate between conflicting schools in archaeology here; instead, I would merely rather point out that both the criticism directed at processualists, namely that by taking a functionalist perspective they overestimate adaptive factors, as well as the criticism directed at post-processualists, namely that they do not produce significant insights because of a relativist perspective, is to some extent justified.<sup>16</sup> The distinction between innate and culturally determined behaviour should not be a question of theoretical dogma but one of empirical research in a framework that understands environment

- <sup>13</sup> Preucel 2006, 147–148, 162–164.
- <sup>14</sup> Renfrew 1994, 3, 5.
- <sup>15</sup> Preucel 2006, 147–172.
- Bernbeck 1997, 272, 285; Renfrew 1994, 3, 6, 9; Sanders 1990, 44; Trigger 2003, X, 11, 686–687.

and behaviour as mutually influential systems. Instead of confining oneself to the study of the use of symbols, for example in writing or in systems of measurement,<sup>17</sup> or to lower expectations, meaning that one just tells a story, it seems possible to make statements about the mental structures of ancient humans that are verifiable or at least highly plausible. Religion and cosmology are key topics in cognitive archaeology, although, again, they have been mostly studied from a functionalist perspective.

A central premise of the cognitive science of religion lies in the idea that the origin, acquisition and transmission of religion are deducible from the evolution of the human brain, and that therefore religious ideas and religious behaviour can be explained by the sciences, particularly biology, cognitive psychology and evolutionary theory.<sup>18</sup> In this context, a major focus is on the way unconscious processing of information works rather than on mental contents, the former being considered superordinate to the latter. Because religious ideas are understood to arise from natural thinking, religion is considered to be part of every historic and prehistoric culture, and attempts are made to work out the underlying universal cognitive architecture that gives rise to these ideas. These structures are considered to form an integrated whole (connectionism)<sup>19</sup> or to consist of domain-specific cognitive modules (modularism)20 and are supposed to shape the way we think. Still, religions do not solely consist of mental representations (bottom-up processes) but need to be studied

- Schüler 2012, 19, 27, 36–39, 46, 48.
- 19 For example Wynn and Coolidge 2012.

I 2 Preucel 2006, 148.

<sup>17</sup> Renfrew 1998, 1.

For example Mithen 1996.

holistically, considering the sociocultural dynamics that influence biology and psychology (top-down processes). Fundamental research in the cognitive science of religion has been conducted by E. Thomas Lawson and Robert McCauley,<sup>21</sup> Pascal Boyer,<sup>22</sup> Harvey Whitehouse<sup>23</sup> and others. A detailed literary overview is provided by Sebastian Schüler.<sup>24</sup>

Previous attempts in the study of prehistoric religion can be roughly divided into two categories, namely historico-sociological, i.e. functional, and phenomenological, i.e. substantial, explanations.<sup>25</sup> These were mostly tied to the broader ideological climate of a given time, and a focus on the social organisation of religious customs predominated in periods of rational, positivistic thinking, while attempts to comprehend the inherent nature of religion prevailed in more romantic periods of cultural-historical thinking. It is my opinion, however, that research need not be limited to funcional<sup>26</sup> aspects but that it is possible to gain empirical insights about the underlying mental constitution of past religious phenomena, comparable to structuralist approaches.<sup>27</sup> Yet, while structuralism focused on association and on classification by opposition, in accordance with the above considerations, the embodied processes of spatial organisation and movement will soon become apparent as the main themes significant in this work. Corresponding to this emphasis on mental concepts, myth rather than ritual and cult will dominate in the sources that are discussed.

No comprehensive definition of religion has been generally accepted so far, as is to be expected due to the inherent difference between substantial and functional definitions.<sup>28</sup> Whereas a variety of criteria have been suggested,

- <sup>21</sup> Lawson and McCauley 1990.
- <sup>22</sup> Boyer 1994.
- <sup>23</sup> Whitehouse 2004.
- <sup>24</sup> Schüler 2012, 33–36.
- <sup>25</sup> Hansen 2003, 122–128, 131–132, 140–141; Kristiansen 2013, 78–79.
- <sup>26</sup> Functionalist explanations also face the logical problem that they must be descriptive rather than explanatory as illustrated by the sentence: "The function of x is to do what it does." (Lewis-Williams and Pearce 2009, 78).
- <sup>27</sup> Bernbeck 1997, 273–274, 283. See also Hansen 2003, 141.
- <sup>28</sup> Hansen 2003, 114. Additionally, questions such as whether humans have always believed in gods or at what time these beliefs came into being are still

they have mostly proven too narrow, inflating aspects of individual religions and then transferring them onto others.<sup>29</sup> A basic definition is given by Armin Geertz, who sees religion as "a cultural system and a social institution that governs and promotes ideal interpretations of existence and ideal praxis with reference to postulated transempirical powers or beings".<sup>30</sup> Hartmut Zinser also emphasises religious acts and concepts as well as their embeddedness into their socio-cultural context:

"Ausgehen möchte ich davon, daß unter heuristischen Gesichtspunkten vorläufig das als Religion anzusehen ist, was von den Anhängern einer Religion und ihrer sozialen Umwelt als Religion betrachtet wird. Religionen sind gesellschaftliche und geschichtliche Bildungen und bestehen aus Vorstellungen und daraus folgenden Handlungen von Menschen. Religionen waren und sind eine soziale Wirklichkeit, wie andere kulturelle Phänomene, z. B. das Recht oder das Geld. Von diesen unterscheiden sie sich dadurch, daß beim Recht und Geld, so undurchschaubar für den einzelnen deren Zustandekommen und gesellschaftliche Wirklichkeit sein kann, jeder wissen kann, daß sie von Menschen gemacht sind. Von Religionen aber wird angegeben, von Gott oder Göttern offenbart zu sein, von den divinisierten Ahnen oder Heroen eingesetzt zu sein oder von einer anderen nicht-menschlichen oder nicht-mehr-menschlichen Instanz herzustammen und häufig sich auf ein Jenseitiges, der Erfahrung Entzogenes zu beziehen oder Aussagen darüber zu machen, z.B. über die Frage eines Weiterlebens nach dem Tode."31

With respect to the cultures considered in this work, both the reference to other realms, particularly to life after death, as well as the claim to revelations of the gods will become evident in the following. As opposed to this, the social and cultural differentiation between religion and other aspects of life is less pronounced than in later epochs,<sup>32</sup> and the perceived assignments of the gods are, for example, regularly employed as a legitimation of political action. The above definition, however, leaves out experience as

intensely debated (Hansen 2003, 118; Junker 2014, 67–76; Kristiansen 2013, 80).

- <sup>29</sup> Zinser 2010, 65.
- <sup>30</sup> Geertz 2010, 305.
- <sup>31</sup> Zinser 2010, 67.
- <sup>32</sup> The Egyptian language, for example, does not have a word for "religion" (Trigger 2003, 409).

the third sphere of religion besides practice and belief, as stated by David Lewis-Williams and David Pearce.<sup>33</sup> They have also argued that the three areas are embedded in what they, following Jean-Jacques Rousseau, term "the social contract" and "the consciousness contract", i. e. the basic workings of the nervous system and the cultural milieux that provide most of its particular content:

"Euphoric and transcendent religious experience derives from the human nervous system. Religious beliefs derive fundamentally from attempts to codify religious experiences. Religious practices lead people into religious experiences and manifest beliefs."<sup>34</sup> "The three dimensions of religion are set within social and consciousness contracts. Some people veer to the left and emphasize experience, others to the right and emphasize intellectual belief and ritual practice."<sup>35</sup>

Yet, a "biocultural theory of religion" acknowledges that humans are at the same time biological and cultural creatures, and sees cognition as inextricably tied to brain and body (embrained and embodied), contingent on culture (enculturated), as well as extended and distributed beyond individual brains.<sup>36</sup> A central element in the contemporary cognitive science of religion is the "dynamic systems theory"/"dynamic cognition" that emphasises cognition as an aspect in the complex dynamic interaction between brain, body and its physical and social environment.<sup>37</sup> Any cognition is always embedded in a bodily, social and situational context:

"Kognitionen sind einerseits selbst emergente Ganzheiten, die durch das Zusammenwirken vieler einzelner Neuronen entstehen. Zugleich beeinflussen bewusst und unbewusst ablaufende kognitive Prozesse das Zusammenspiel und die Struktur von neuronalen Netzwerken. Andererseits können Kognitionen als mentale Prozesse beim Menschen verstanden werden, wobei jedes Indviduum seine eigenen Bewusstseinsinhalte besitzt. Diese erlangen aber erst in der Interaktion vieler Individuen ihre Eigenschaft als soziale Kognitionen und Repräsentationen. Somit können Kognitionen selbst als

- Lewis-Williams and Pearce 2009, 25–28, 37–40, 152, 285, 287–288.
- <sup>34</sup> Lewis-Williams and Pearce 2009, 25.
- <sup>35</sup> Lewis-Williams and Pearce 2009, 287.
- <sup>36</sup> Geertz 2010, 304, 306; Geertz 2013, 30.
- <sup>37</sup> Schüler 2012, 109, 212.

funktionale Schnittstelle oder als Feld verstanden werden, bei dem der Übergang von neuronalen zu sozialen Prozessen sichtbar wird. Das Einzelne (das Neuron / das Individuum) kann ohne seine übergeordnete Gesamtheit (Kognition und Körper / die Gesellschaft) nicht hinreichend verstanden und sollte daher auch nicht isoliert von dieser betrachtet werden."<sup>38</sup>

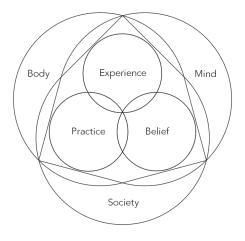


Fig. 1 Three spheres of religion within the mental, bodily and social domain

Whereas Schüler is correct in pointing out the mutual influence of the biological, the psychological and the social (see chapters 2.9 to 2.12), dreams pose a case apart in which the individual operates in a simulated world and in which the structuring grip of society on its inner life is eased.39 Then again, bodily sensations and emotions play a fundamental role in dreams, and they are therefore of great significance in the study of the universal traits of religions. Therefore, I have expanded the scheme by Lewis-Williams and Pearce to incorporate the bodily domain as illustrated in figure 1. That "embodied cognition"40 has already been eminently important for the conceptualisation of the dreamworld in the earliest sources will become apparent in the course of this work.

- <sup>39</sup> Assmann 2007, 11, 114. In accordance with his focus of consciousness as mediated by society, Maurice Halbwachs considers dreaming, in which the mind is most removed from society, a defective form of consciousness (Halbwachs 1992, 41–42).
- "Cognition is embodied when it is deeply dependent upon features of the physical body of an agent, that is, when aspects of the agent's body beyond the brain play a significant causal or physically constitutive role in cognitive processing." (http://plato. stanford. edu/entries/embodied-cognition/ 15 April 2017).

<sup>&</sup>lt;sup>38</sup> Schüler 2012, 62.

#### 1.2 STRUCTURE OF THE WORK, DATA BASE AND METHODOLOGY

In accordance with the considerations described above, I will firstly give an overview of scientific research concerning sleep and dreaming in chapter 2, complemented by evolutionary approaches in chapter 3. Like dreaming itself, taking an interest in dreams is a universal human phenomenon,<sup>41</sup> and chapter 4 on the Near East as well as chapter 5 on Egypt will investigate early written sources that mention sleep and dreaming and explore their connection to ideas about death and the netherworld by considering them in light of the information gathered in chapter 2. Finally, chapter 6 will examine prehistoric Europe for clues about behaviours and beliefs that can be compared and/or related to the ideas of ancient Egypt and Mesopotamia. Whereas in chapters 4 and 5 all known texts are compiled that are concerned with dreaming between 2500 and 1500 BC, chapter 6 constitutes an anthology of archaeological evidence for sleep in the prehistoric regions and therefore also includes earlier periods. Until now, the topic has passed completely unnoticed in the archaeological literature, and the present work constitutes the first study to systematically investigate prehistoric evidence for sleep. With chapters 4 and 5, on the other hand, I have not aimed for exhaustiveness in terms of information about sleep from the Near East and Egypt but have used exemplary sources to illustrate the connection to dreaming and concepts of death and the netherworld. The temporal and the geographic scope of my work are illustrated in the map of sites in figure 2 and in the chronology tables in tables 8, 9 and 10.

<sup>41</sup> Anthropologist Donald Brown states in his work Human Universals: "The UP [= Universal People] dream and attempt to interpret their dreams." (Brown 1991, 139). "Dream interpretation", however, is a misleading term because it evokes ideas about decoding dream images similar to Freudian approaches (see chapter 1.4). Therefore, a more neutral phrasing is preferred here. Universals in human behaviour are, as in this case, usually triggered by an underlying biological universal. This does not mean that cultural interpretation is determined by the biological phenomenon but rather that it is strongly motivated by it. For example, many human societies perform rites de passage for adolescents prompted by obvious bodily changes at a certain age, but the form that these rites will take differs from society to society.

Only dream accounts that can be dated reliably to the third millennium BC or to the first half of the second millennium BC have been included. Because we cannot be sure how individual versions of some text differ, texts dating back to the time considered here were left out if the dream episode in question occurs only in a later version (for example the stories of Etana<sup>42</sup> or Narām-Sîn<sup>43</sup>). I have chosen this temporal frame because shortly after the middle of the third millennium BC, the first written sources on dreaming appeared, whereas around the middle of the second millennium BC, major political and social changes took place, which affected people's worldview and, accordingly, can be expected to have had an impact on concepts of sleep and dreaming as well.44 For example, the earliest instance of an oneirocritic manual or "dream book", i.e. the concept which is today commonly associated with ancient dream work, is only attested from New Kingdom Egypt.45 Furthermore, a diachronic and cross-cultural study allows us to draw inferences about a topic's various aspects by exploring how they change in relation to each other in the course of time.46 Nevertheless, it is not a comparative cross-cultural study in the classic sense because it mostly investigates historically related cultures.47

A considerable number of dream accounts have been preserved from Mesopotamia between the Early Dynastic III and the Old Babylonian period. Chapter 4 draws upon Traum und Welterleben im antiken Mesopotamien by Annette Zgoll, which has been an invaluable source concerning Mesopotamian texts on dreaming.48 However, as Zgoll has not included a text catalogue, translations for all sources will be provided in the following. Chapter 4 will first present an overview of Near Eastern archaeological findings concerning sleep in chapter 4.2 before turning to written sources that mention dreaming. Chapter 4.3 contains the earliest sources from ritual and administrative contexts, namely seals that depict likely dream-

- <sup>42</sup> Haul 2000, 133–151.
- <sup>43</sup> Westenholz 1997, 294–331.
- <sup>44</sup> Trigger 2003, 34–35.
- <sup>45</sup> Szpakowska 2003, 69–71.
- <sup>46</sup> Trigger 2003, 36.
- <sup>47</sup> Smith 2012; Trigger 2003.
- <sup>48</sup> Zgoll 2006. For a detailed account of the history of research concerning Mesopotamian dreams, see Zgoll 2006, 23–35.

ing scenes, an incantation, two tablets that list rewards for incubations and the "song" Ninme-šara, which mentions the tasks of a dream specialist. The custom of employing dreams of kings for various but mostly political means is illustrated in chapter 4.4 by way of the Stele of the Vultures of King Eanatum of Lagaš, cylinder A of King Gudea of Lagaš, the hymns Šulgi O & D of King Šulgi of Ur, King Iddin-Dagan of Isin's hymn about Inana and a letter-prayer by King Sîn-iddinam of Larsa. A glimpse into the dream life of lower-ranking people is offered in chapter 4.5, which deals with nineteen letters from the archive of King Zimri-Lim of Mari as well as with an administrative record and with five private letters. The majority of Mesopotamian sources, however, are literary compositions and include the following texts, which are collected in chapter 4.6: Curse of Agade, Lugalbanda in the Cave of the Mountains, Enmerkar and EnSUHkešda'ana, Sargon Legend, Dumuzi's Dream, Song of the Plowing Oxen, Origin of Grain, Epic of Gilgameš and Epic of Atramhasis. Lastly, chapter 4.7 illustrates what is known about ritual specialists and lists the four earliest examples of possible evidence for dream omens and dream rituals.

Although by no means as numerous as in Mesopotamia, several Egyptian dream accounts with a date between the Old and Middle Kingdom have been discovered. These are analysed in chapter 5, which is mostly based on Behind Closed Eyes. Dreams and Nightmares in Ancient Egypt by Kasia Szpakowska.49 The chapter's structure is similar to that of the Near East chapter, beginning with an overview of archaeological findings in chapter 5.2, followed by written sources. Of these, chapter 5.3 on texts about dreams and the netherworld is the most extensive. It starts with two letters addressed to the dead and then goes on to summarise studies about the significance of sleep and dreaming in the Pyramid and Coffin Texts. Chapter 5.4 is concerned with the role of dreams in rituals and teachings and contains passages from the Execration Texts and the Teaching of Ptabhotep along with the remains of a papyrus with prophylactic spells against bad dreams. Lastly, in chapter 5.5, two literary compositions, namely the Tale of the Eloquent Peasant and the Tale of Sinuhe, are discussed. As the studies by Zgoll and Szpakowska constitute general works in which all previous research concerning dreaming in Mesopotamia and Egypt is discussed, reference should also be made to their role for a literary overview. A detailed discussion of previous studies about dreaming in Mesopotamia and Egypt is therefore omitted here, apart from pointing out the classic works of A. Leo Oppenheim<sup>50</sup> and Adriaan de Buck.<sup>51</sup> With respect to the many different traditions of transcription, I have not aimed for consistency but have preserved the spelling used by individual authors.<sup>52</sup> For the same reason, namely, to avoid an accidental change of meaning, I have also refrained from translating most foreign language quotes into English.

Chapter 6 discusses references to sleep in archaeological findings from prehistoric Europe. Because such evidence has never been systematically examined until now, the chapter aims to address this topic as comprehensively as possible. Therefore, earlier sources than in the preceding chapters were included as well. Chapter 6 is subdivided into geographical sections, treating Anatolia (chapter 6.2), the Aegean and Greece (chapter 6.3), Malta (chapter 6.4), the British Isles (chapter 6.5) and central Europe (chapter 6.6).

Thus, the entirety of texts concerned with dreaming older than 1500 BC is analysed and interpreted in the context of archaeological evidence on the one hand and scientific findings on the other. That the dating, the origin and the type of sources encompasses a wide field and is dependent on the randomness of preservation conditions presents no methodological problem. On the contrary, the more diverse the sources are, the more complex a picture can be expected to emerge. Because of the wide scope of sources and their investigation within an interdisciplinary framework that includes the natural sciences as well as cognitive archaeology and cognitive science of religion, it is also not possible to specify any particular method.53 Rather, the variety of sources calls for a variety of approaches useful under the respective circumstances. Still, it will become apparent in the following that, despite their

<sup>&</sup>lt;sup>50</sup> Oppenheim 1956.

<sup>&</sup>lt;sup>51</sup> De Buck 1939.

<sup>&</sup>lt;sup>52</sup> Transcriptions of personal names follow Zgoll (Zgoll 2006) for Mesopotamia and Hornung and his colleagues (Hornung et al. 2006) for Egypt.

variation, certain themes are pervasive in the different sources.

As mentioned above, the archaeological findings from the Near East and Egypt do not claim to be exhaustive but illustrate the assumption that written and material sources are complementary, an assumption also important for the interpretation of findings from prehistoric regions. This means that, for example, only burials were included in which a reference to sleep is apparent. The question of what aspects matter for a reference to sleep, however, is not one of definition but has to be addressed in the context of the culture in question, and it will therefore be discussed in the respective chapters. Especially concerning Egypt, the evidence is vast, which is why Manon Schutz is currently preparing a dissertation on Sleep, Beds and Death in Ancient Egypt, in which she analyses both archaeological as well as linguistic evidence pertaining to these topics.54 Additionally, the dissertation Konzepte von Müdigkeit und Schlaf im alten Ägypten by Simone Gerhards investigates the Egyptian concepts of fatigue, sleep and awakening.55 The same applies to Egyptian burial customs and concepts of death, for which the sheer mass of information requires a limitation to secondary literature such as the works by John Taylor,<sup>56</sup> Hermann Kees<sup>57</sup> or Jan Zandee.<sup>58</sup> Concerning Mesopotamia, sleep has been investigated by Ulrike Steinert,<sup>59</sup> while the topic of beds and sleeping places has been treated by Armas Salonen,60 Nadja Cholidis61 and Maria Krafeld-Daugherty.62 The role of the netherworld in cosmology has been addressed by multiple scholars in the course of time, among them Bruno Meissner,63 Samuel Kramer,64 Jean Bottéro<sup>65</sup> and Markham Geller.<sup>66</sup>

- <sup>53</sup> Hansen 2003, 131.
- <sup>54</sup> Schutz forthcoming.
- 55 Gerhards 2020.
- <sup>56</sup> Taylor 2001.
- 57 Kees 1956.
- <sup>58</sup> Zandee 1960.
- <sup>59</sup> Steinert 2010.
- <sup>60</sup> Salonen 1963.
- <sup>61</sup> Cholidis 1992.
- <sup>62</sup> Krafeld-Daugherty 1994.
- <sup>63</sup> Meissner 1925.
- <sup>64</sup> Kramer 1960.
- 65 Bottéro 1980.
- <sup>66</sup> Geller 2000.

The sequence of written sources in the respective chapters is roughly chronological, and at the same time, they fall into different categories, reflecting the evolution of scripture. Especially for Mesopotamia, development of different forms of writing becomes apparent.<sup>67</sup> During the Uruk period, writing in a notation system unrelated to the structure of spoken language remained confined to administrative purposes, and accordingly, no dream accounts have been preserved. Long-term record keeping starts during the Early Dynastic period in a form of writing that now phonetically represents the structure of spoken language, and it is during this time that we come upon the first mention of dreams. With the reorganisation of kingship and palace administration during the Old Akkadian period, writing was standardised, a process that continued during the Ur III period when new forms of written literature and historiography appeared. Finally, the Old Assyrian and Old Babylonian periods are characterised by a high degree of systematisation as well as by a "democratization of writing"68 in a time of progressive individualisation and privatisation. Furthermore, for the first time, many texts were transmitted in schools linked to temples instead of in the context of palace administration, where power resided. Among the new forms of written knowledge are the first Akkadian literary corpus, private legal documents and letters, as well as texts concerned with divination, astronomy, historiography, healing and grammar to name but a few, and it is therefore hardly surprising that the majority of sources treated in this work stem from this period. Contrary to Mesopotamia, where in the beginning, writing was closely connected to politico-economic administration, in Egypt, it was employed for monumental inscriptions that legitimated the authority of priests and rulers. Because dreaming in Egypt was, unlike in Mesopotamia, not employed for political means, dream accounts were far less abundant and only appeared during the First Intermediate Period.

In regard to the dating of sources, this is not the place to enter in the discussion on different chronology systems. As the purpose of my work is only to sketch a rough outline

- <sup>67</sup> Hyman and Renn 2012, 83–84, 86–87.
- <sup>68</sup> Hyman and Renn 2012, 86.

of the temporal development in relation to other regions - some of them with highly debated chronologies as well - uncertainties in the range of a matter of decades can be disregarded as irrelevant. This also means that this work is not able and does not aim to answer questions connected to chronological subtleties, for example in what place a certain innovation connected to sleep and dreaming arose first. I will mostly refer to the relative chronological system of the individual regions, but when absolute dates are given for Mesopotamia, this text follows the work of Dietz Otto Edzard<sup>69</sup> and Marc Van De Mieroop,<sup>70</sup> both adherents of the middle chronology. For Egypt, absolute dates were taken from the volume edited by Erik Hornung, Rolf Krauss and David Warburton.71 Chronology systems for the European regions mainly rely on Joseph Maran's work.72 All sources are indicated in the individual chronology tables as well.

# 1.3 PRELIMINARIES: RELATIONS BETWEEN THE CULTURES UNDER INVESTIGATION

As the textual and archaeological evidence considered here covers a wide area, my work is based on the central assumption that the cultures of the late third and early second millennium BC were in continual contact. Highly controversial only a couple of decades ago, evidence has greatly increased recently, leading to a multi-faceted picture of the relations between the different regions.<sup>73</sup> The Levant and Mesopotamia have been grouped into one chapter because Mesopotamian material culture appears in Syria as early as the Ubaid period of the fifth millennium BC, with the ties becoming even closer in the course of time.<sup>74</sup> Under Sargon of Akkad (2334–2279 BC<sup>75</sup>) and his successors,

- <sup>70</sup> Van De Mieroop 2007.
- <sup>71</sup> Hornung et al. 2006.
- <sup>72</sup> Maran 1998.
- <sup>73</sup> Aruz et al. 2013.
- <sup>74</sup> Schwartz 2013, 2–4, 10. Although the Mesopotamian city states regarded themselves as a culturally distinct group that did not include the kingdoms in the north (Trigger 2003, 35), this denial indirectly acknowledges a certain familiarity with them.
- <sup>75</sup> Van De Mieroop 2007, 302.

military campaigns were led to extract natural resources, and a veritable part of Syria was subjugated. Moreover, the migration of large groups of Amorites from Syria into southern Mesopotamia during the Third Dynasty of Ur and the subsequent establishment of individual city states under Amorite kings from the early second millennium BC to about 1600 BC pertains directly to the timeframe of this work. Permanent contact between these kings is attested from Mari, a city also conspicuous for its wide scope of documents concerned with dreams (see chapter 4.5), and a trading network that connected Babylonia and Assyria with southern Anatolia and that resulted in the foundation of  $k\bar{a}ru^{76}$  existed. Cuneiform writing was eventually adopted by the Hittites, and by the sixteenth century BC, an adoption of Syrian elements into the Hittite religion is verifiable.77 The ports of the Levant also played an important role in linking the interior and Mesopotamia to maritime trade.<sup>78</sup> This process already started with the foundation of cities on the coast during EB III, and, while declining again during EB IV, a time of upheaval that also ran parallel in Egypt and Mesopotamia, the coastal cities reached their zenith of economic growth and prosperity during the first half of the second millennium BC. In Sidon, Lebanon, imports from Crete (MM IIA), Egypt (Dynasty 12), Cyprus (MB II/II B) and Syria (MB I/II A) have been excavated.79

Regular contact between Egypt and the Levant is attested from the third millennium BC by a variety of textual sources, for example by pharaonic inscriptions at Byblos in Lebanon.<sup>80</sup> Trade in cedar, which only grows in Lebanon, Cyprus and Turkey, is mentioned on the Palermo Stone, which records events between Dynasty I and 5,<sup>81</sup> and is affirmed by finds of cedar objects in Early Dynastic contexts. Additionally, objects such as Naqada II pottery, a fragment of an Egyptian stone vase from Dynasty 2 and a gold axehead from Dynasty 4 appear in the Levant. During the Middle Kingdom, inter-

- <sup>77</sup> Beckman 2013, 284, 287, 292.
- <sup>78</sup> Al-Maqdissi 2013, 82–83.
- <sup>79</sup> Doumet-Serhal 2013, 133–138.
- <sup>80</sup> Bussmann 2014, 80, 82–83; Ward 2013, 47; Wiener 2013, 34–35.
- <sup>81</sup> Hornung et al. 2013, 19.

<sup>&</sup>lt;sup>69</sup> Edzard 2009.

<sup>&</sup>lt;sup>76</sup> A kārum is an Assyrian trading establishment, literally a "port" (Edzard 2009, 114).

actions persisted, and expeditions to the Near East are described in the court records of Amenemhet II (Dynasty 12, 1878–1843<sup>+3</sup> BC<sup>82</sup>). Of particular interest are the wall paintings in the tomb chapel of Khnumhotep II in Beni Hasan, Egypt (Middle Kingdom, ca. 1880 BC).<sup>83</sup> Here, a procession of foreigners in brightly patterned garments is depicted, who are designated with the Semitic loanword Aamu (usually translated as "Semites" or, more generally, "Asiatics") in the caption. While opinions on the location of the homeland of the Aamu vary considerably, the painting shows that contact between Egypt and the Near East involved not only the movement of goods but also of people and therefore almost certainly information about their worldview. Similarly, in the Egyptian Tale of Sinuhe, the protagonist leaves Egypt to settle in the Near East (see chapter 5.5).

With respect to the more distant regions of the north-eastern Mediterranean, the evidence is almost as abundant. Large amounts of Anatolian pottery already appeared on Crete at the beginning of EM I and in EM II were followed by a variety of objects (gold, faience, ivory, stone vases, seals) from Egypt and the Near East.<sup>84</sup> Only slightly later, during EB II and III, did pottery of western Anatolian origin materialise on the Cyclades and in central Greece, while being attested from Crete only by two examples, an observation that points to a line of demarcation between Crete and the Cyclades. Whereas the scale of trade between Minoan Crete and its neighbours decreased for a while, it reached its former levels again by EM III-MM I, when intense contact to the Near East and especially to Egypt resumed, lasting for most of the following millennium and coinciding with the first appearance of literacy and monumentality in the Aegean. Among the goods attested are Egyptian stone vases, scarabs and faience, both imported and of local production, with even more evidence pointing to information transfer as regards manufacturing techniques and tools. Contact to the Cyclades and Cyprus is also documented in the occasional finds of foreign pottery, and, as Crete lacks significant metal resources, copper and tin as well as obsidian were imported either from there or from the Near East and Anatolia. Owing to its strategic location between Cyprus and Crete, Thera was part of the metals route, and orientalia are present in late Middle Bronze Age horizons in Akrotiri.<sup>85</sup> Also, as early as from a late third or early second millennium BC horizon, pieces of charcoal from Cedar of Lebanon have been identified. Texts from Mari additionally remark on the export of tin to and the import of bronze weapons from a region that can almost certainly be identified as Crete. Furthermore, Mari and Qatna (see chapter 4.2) are only two of several cities for which there are indications of mutual influences with the Aegean in terms of architectural art, suggesting not only a transfer of goods but also a flow of ideas.<sup>86</sup> The question of the relations with the regions further west and north is, however, too complex to allow me to present an overview. Therefore, the respective evidence will be discussed in the context of the individual regions in chapter 6.

# 1.4 PRELIMINARIES: FREUDIAN DREAM PSYCHOLOGY IN THE LIGHT OF CURRENT EMPIRICAL RESEARCH

Before turning to the science of sleep and dreaming, a few words must be given on psychological approaches from the beginning of the twentieth century, particularly as the work of Sigmund Freud is still associated by many with the study of dreams. More than a century has passed since the publication of Freud's *Die Traumdeutung*,<sup>87</sup> and while he still has some standing as the "father of dream psychology", most of his claims have since been refuted by empirical evidence and must be considered outdated today.<sup>88</sup> Admittedly, Freud correct-ly recognised certain features of dreams, like their highly emotional character and focus on primitive, instinctive drive mechanisms,<sup>89</sup> and

<sup>&</sup>lt;sup>82</sup> Hornung et al. 2013, 491.

<sup>&</sup>lt;sup>83</sup> Kamrin 2013, 156, 161–162.

<sup>&</sup>lt;sup>84</sup> Wiener 2013, 34–36, 40–42.

<sup>&</sup>lt;sup>35</sup> Doumas 2013, 181.

<sup>&</sup>lt;sup>86</sup> Koehl 2013, 171–177; Pfälzner 2013, 200–202.

<sup>&</sup>lt;sup>87</sup> Freud 1900.

<sup>&</sup>lt;sup>88</sup> Hobson 2005, 16–17, 132–133; Revonsuo 2010, 236; Wamsley and Stickgold 2009, 331, 334. For a more in-depth critique of the dream theories of Freud and Carl Gustav Jung, see Domhoff 2003, 135–147.

<sup>&</sup>lt;sup>89</sup> Among the most common primitive drive mechanisms and corresponding emotions at work during sleep are sex/approach behaviour (elation, joy, happiness, love), escape/avoidance behaviour (fear, anxiety, panic), and aggression/confrontational show-

he noted the incorporation of day residues into dreams (see chapter 2.7). Then again, his claim that most dreams deal with repressed memories from the distant past does not stand up to empirical data, which have shown that recent experiences constitute the largest proportion of memory references, whereas those to more remote memories decrease correspondingly with increased temporal distance. The observation that the distribution of dream memory sources mirrors waking experience also contradicts his idea that the hidden "latent" content of a dream needs to be discovered by some symbolic decoding process, which is applied to the "manifest" dream by the psychoanalyst. Apart from the fact that dream content appears quite straightforward, the attempt to interpret dreams seems hampered by a lack of objective criteria to do so, rendering dream interpretation more of a belief system than a method of investigation. Freudian dream interpretation can be considered a successor of the ever-popular dream books that first appeared in the second half of the second millennium BC in ancient Egypt<sup>90</sup> and gained widespread favour in antiquity. Its most widely known example, Artemidorus Daldianus' Oneirocritica from the second century AD, was of course known to Freud, who was well versed in antiquity and regularly incorporated Greek and Roman sources into his works. Ironically, the works of Freud, who was inspired by ancient dream interpretation, were later considered descriptions of universal workings of the human mind and projected back onto antiquity, leading generations of scholars to think of dream interpretation as a method dating back to a time before the beginning of written sources. In the following, it will be discussed that this is not the case and that messages in dreams were portrayed as quite unequivocal for most of human history.

# 1.5 WHY WE NEED A COGNITIVE APPROACH TO THE (PRE-)HISTORY OF SLEEP AND DREAMING

The question concerning the interconnectedness of ideas about sleep and dreaming with ideas about death and the netherworld can only be answered in a transdisciplinary framework that considers the mental, bodily and social dimension of the topic. Whereas sleep and dreaming have been extensively examined by the natural sciences, historical and archaeological studies have remained limited to the cultures in question and have mostly failed to incorporate scientific findings and to consider a broad historical context. Moreover, prehistoric regions have not been investigated at all, and the present work constitutes the first instance in which evidence of this sort is analysed. The role that sleep and dreaming played for religious belief, experience and practice - especially for burial rites and cosmological ideas - is furthermore a question of great significance for cognitive archaeology and the cognitive science of religion because in this case, mind, body and society interlock in a unique way. My study is thus characterised by a holistic approach that integrates archaeological, textual and scientific evidence with the goal of advancing our knowledge about embodied cognition as well as the mental structures and social dynamics at play in early religions.

down behaviour (fighting, assaulting, shooting) (Hobson 2005, 132).

<sup>90</sup> Szpakowska 2003, 69–71.

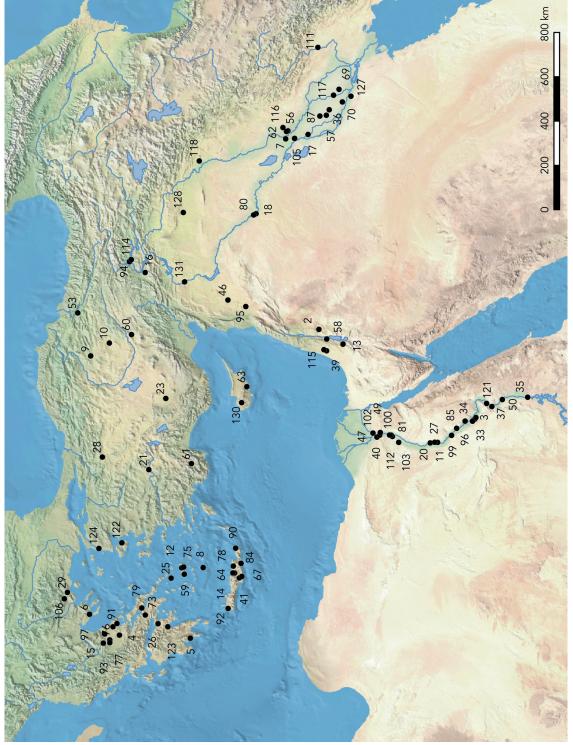


Fig. 2.1 Map of sites

88 Oberbierbaum 89 Osmarsleben 90 Palaikastro 91 Pevkakia-Magula 92 Platianos 93 Platia Magula Zarkou 94 Pulur/Sakyol 95 Qatna 95 Qatna 96 Qau 97 Rachmani 98 Rebešovice 99 Rifeh 100 Rigeh 100 Rigeh 100 Rigen 102 Saqgara 103 Sedment 104 Singen 105 Sippar 105 Sippar 106 Sitagri	
44 Gruting 45 Hal Saflieni 46 Halawa 47 Heliopolis 48 Helmsdorf 49 Helwan 50 Hierakonpolis 51 Holešov 52 Horgen 53 Horoztepe 54 Hörsching 55 Isin 58 Jericho 58 Kampos 60 Kaneš/Kültepe 61 Karataş 62 Khafajah/Tutub 63 Khirokitia 64 Korosci Karataş 64 Karataş	



Fig. 2.2 Map of sites